

**VIAS**

# **API Reference**

**Issue**            01  
**Date**             2025-02-24



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# 1 Before You Start

## 1.1 Overview

VIAS applies AI technologies to the management of industrial parks, residential communities, and business parks. Utilizing technologies such as visual AI and data mining, it enables efficient video analysis in a range of campus scenarios.

## 1.2 Endpoints

An endpoint is the request address for calling an API. Endpoints vary depending on services and regions. For the endpoints of all services, see [Regions and Endpoints](#).

**Table 1-1** Endpoints of VIAS

Region Name	Region	Endpoint	Protocol
CN-Hong Kong	ap-southeast-1	vias.ap-southeast-1.myhuaweicloud.com	HTTPS
		vias.ap-southeast-1.myhuaweicloud.cn	HTTPS
AP-Singapore	ap-southeast-3	vias.ap-southeast-3.myhuaweicloud.com	HTTPS
		vias.ap-southeast-3.myhuaweicloud.cn	HTTPS
AP-Jakarta	ap-southeast-4	vias.ap-southeast-4.myhuaweicloud.com	HTTPS



Region Name	Region	Endpoint	Protocol
		vias.ap-southeast-4.myhuaweicloud.cn	HTTPS

## 1.3 Constraints

VIAS has certain constraints and limitations, some cost-related and some technological. System-wide constraints affect all sub-services. Additionally, sub-services are subject to their respective constraints.

### System-wide Constraints

- Edge services support RTSP streams and VCN input. Cloud services support input of Industry Video Management (IVM) video streams or OBS video files.
- If the input is an OBS file, the file name extension can be **.avi**, **.wmv**, **.mpg**, **.mpeg**, **.mp4**, **.mov**, **.m4v**, or **.mkv**.
- Videos encrypted by KMS in OBS buckets are not supported.
- The size of a single video file cannot exceed 4 GB.
- Supported frame rates include 12, 24, 25, and 30 fps.
- The maximum resolution is 4096 x 2160 (4K). The recommended resolution is 1920 x 1080 (1080p).
- Decoding is supported for H.264 and H.265 videos.

Encoding Format	Resolution
H.264	720P, 1080P, 2K, 4K
H.265	720P, 1080P, 2K, 4K

## 1.4 Concepts

- Account  
An account is created upon successful registration with the cloud system. The account has full access permissions for all of its cloud services and resources. It can be used to reset user passwords and grant user permissions. The account is a payment entity, which should not be used directly to perform routine management. For security purposes, create Identity and Access Management (IAM) users and grant them permissions for routine management.
- IAM user  
An IAM user is created under an account to use cloud services. Each user has its own identity credentials (password and access keys).  
An IAM user can view the account ID and user ID on the [My Credentials](#) page of the management console. The account name, username, and password will be required for API authentication.

- **Region**  
A region is a physical location where a cloud service is deployed. Availability zones (AZ) in the same region can communicate with each other over an intranet but AZs in different regions cannot communicate with each other. By creating cloud resources in different regions, you can design applications to better meet customer requirements and comply with local laws and regulations.
- **Availability zone (AZ)**  
An AZ contains one or more physical data centers. It has independent cooling, fire extinguishing, moisture-proof, and electricity facilities. Within an AZ, compute network, storage, and other resources are logically divided into multiple clusters. AZs within a region are interconnected using high-speed optical fibers to allow users to build cross-AZ high-availability systems.
- **Project**  
A project corresponds to a region. Default projects are defined to group and physically isolate resources (including compute, storage, and network resources) across regions. Users can be granted permissions in a default project to access all resources under their accounts in the region associated with the project. For more refined access control, create subprojects under a project and purchase resources in the subprojects. Users can then be assigned permissions to access only specific resources in the subprojects.  
You can obtain the project ID on the [API Credentials](#) page.

# 2 Calling APIs

## 2.1 Making an API Request

This section describes the structure of a REST API request, and calls the IAM API for **obtaining a user token** as an example. The obtained token can then be used to authenticate the calling of other APIs.

### Request URI

The format of a request URI is as follows:

**{URI-scheme} :// {Endpoint} / {resource-path} ? {query-string}**

**Table 2-1** Request URI

Parameter	Description
URI-scheme	Protocol used to transmit requests. All APIs use HTTPS.
Endpoint	Domain name or IP address of the server for the REST service endpoint. The endpoint varies depending on services in different regions. Obtain the value from <a href="#">Endpoints</a> . For example, the endpoint of VIAS in region <b>CN North-Beijing1</b> is <b>iam.cn-north-1.myhuaweicloud.com</b> .
resource-path	Access path of an API for performing a specified operation. Obtain the path from the URI of an API. For example, the <b>resource-path</b> of the API for obtaining a user token is <b>/v3/auth/tokens</b> .
query-string	Query parameter, which is optional. Ensure that a question mark (?) is included before a query parameter that is in the format of "Parameter name=Parameter value". For example, <b>? limit=10</b> indicates that a maximum of 10 data records will be displayed.

 **NOTE**

To simplify the URI display, each API is provided with only a **resource-path** and a request method. The **URI-scheme** of all APIs is HTTPS, and the endpoints of all APIs in the same region are identical.

## Request Methods

HTTP-based request methods, which are also called operations or actions, specify the type of operations that you are requesting.

**Table 2-2** HTTP methods

Method	Description
GET	Requests the server to return specified resources.
PUT	Requests the server to update specified resources.
POST	Requests the server to add resources or perform special operations.
DELETE	Requests the server to delete specified resources, for example, an object.
HEAD	Requests a server for the resource header.
PATCH	Requests the server to update partial content of a specified resource. If the resource is unavailable, the PATCH method is used to create a resource.

For example, in the URI for obtaining a user token, the request method is **POST**, and the request is as follows:

```
POST https://iam.cn-north-1.myhuaweicloud.com/v3/auth/tokens
```

## Request Header

You can also add additional fields to a request, such as the fields required by a specified URI or an HTTP method. For example, add **Content-Type** that defines a request body type to request for the authentication information.

**Table 2-3** describes the common request header fields to be added to the request.

**Table 2-3** Common request header fields

Parameter	Description	Mandatory	Example
Content-type	Request body type or format. Its default value is <b>application/json</b> .	Yes	application/json

Parameter	Description	Mandatory	Example
Content-Length	Length of the request body, in bytes.	This parameter is mandatory for POST and PUT requests, but must be left blank for GET requests.	3495
X-Project-Id	Project ID. This parameter is used to obtain the token for each project.	No	e9993fc787d94b6c886cbaa340f9c0f4
X-Auth-Token	User token, which is a response to the API for obtaining a user token (only this API does not require authentication).	No This parameter is mandatory for token-based authentication.	N/A
X-Sdk-Date	Time when the request is sent. The time is in <b>YYYYMMDD'T'HHMMS'Z'</b> format. The value is the current Greenwich Mean Time (GMT) of the system.	No Mandatory for AK/SK-based authentication, but not required for PKI token-based authentication	20190307T101459Z
Authorization	Signature authentication information. The value is obtained from the request signature result and is required when the AK and SK are used to encrypt the signature. Type: string Default value: none	No Mandatory for AK/SK-based authentication	SDK-HMAC-SHA256 Credential=ZIRRKMT WPTQFQI1WKNKB/ 20150907//ec2/ sdk_request, SignedHeaders=content-type;host;x-sdk-date, Signature=55741b610f3c9fa3ae40b5a8021ebf7ebc2a28a603fc62d25cb3bfe6608e1994

Parameter	Description	Mandatory	Example
Host	Information about the requested server. The value can be obtained from the URL of the service API. The value is <i>hostname[:port]</i> . If the port number is not specified, the default port is used. The default port number for <b>https</b> is <b>443</b> .	No Mandatory for AK/SK-based authentication	code.test.com or code.test.com:443

 **NOTE**

In addition to supporting authentication using tokens, public cloud APIs support authentication using AK/SK, which uses SDKs to sign a request. During the signature, the **Authorization** (signature authentication) and **X-Sdk-Date** (time when a request is sent) headers are automatically added in the request. For more information about AK/SK-based authentication, see [AK/SK Signing and Authentication Guide](#).

The API for obtaining a user token does not require authentication. Therefore, this API only requires adding the **Content-Type** field. The request with the added **Content-Type** header is as follows:

```
POST https://iam.cn-north-1.myhuaweicloud.com/v3/auth/tokens
Content-Type: application/json
```

## Request Body

The body of a request is often sent in a structured format as specified in **Content-Type**. The request body transfers content other than the request header. If the request body contains Chinese characters, these characters must be encoded in UTF-8.

The request body varies between APIs. Some APIs do not require the request body, such as the APIs requested using the **GET** and **DELETE** methods.

In the case of the API used to [obtain a user token](#), the request parameters and parameter description can be obtained from the API request. The following provides an example request with a body included.

Replace *username*, *domainname*, and *\*\*\*\*\** with the actual username, account name, and login password, respectively. *cn-north-1* is the project name. For details, see [Obtaining Account, IAM User, and Project Information](#).

 **NOTE**

**scope** specifies where a token takes effect. Its value can be **project** or **domain**. In the preceding example, the value of **scope** is **project**, indicating that the token can access only resources of the specified project. If the value of **scope** is **domainname**, the token can access all resources of the specified account. For details, see [Obtaining a User Token](#).

```
POST https://iam.cn-north-1.myhuaweicloud.com/v3/auth/tokens
Content-Type:application/json
```

```
{
  "auth": {
    "identity": {
      "methods": ["password"],
      "password": {
        "user": {
          "name": "username", //Replace it with the actual username.
          "password": "*****", //Replace it with the actual password.
          "domain": {
            "name": "domainname" //Replace it with the actual account name.
          }
        }
      }
    },
    "scope": {
      "project": {
        "name": "cn-north-1" //Replace it with the actual project name to obtain the token of the specified
project.
      }
    }
  }
}
```

If all data required for the API request is available, you can send the request to call the API through curl, Postman, or coding. If you choose to use Postman, version 7.24.0 is recommended.

In the response to the API used to [obtain a user token](#), **x-subject-token** is the desired user token. This token can then be used to authenticate the calling of other APIs.

## 2.2 Authentication

Requests for calling an API can be authenticated using either of the following methods:

- Token-based authentication: Requests are authenticated using a token.
- AK/SK-based authentication: Requests are encrypted using an AK/SK.

### Token-based Authentication

#### NOTE

The validity period of a token is 24 hours. When using a token for authentication, you may cache it so there is no need to call the IAM API frequently.

A token specifies temporary permissions in a computer system. During API authentication using a token, the token is added to a request to get permissions for calling the API.

When calling the API to [obtain a user token](#), you must set **auth.scope** in the request body to **project**. The following is a request example:

```
{
  "auth": {
    "identity": {
      "methods": ["password"],
      "password": {
        "user": {
          "name": "username", //Replace it with the actual username.
          "password": "*****", //Replace it with the actual password.
          "domain": {
```

```
    "name": "domainname" //Replace it with the actual account name.
  }
}
},
"scope": {
  "project": {
    "name": "cn-north-1" //Replace it with the actual project name to obtain the token of the specified
project.
  }
}
}
```

After obtaining the token, add the **X-Auth-Token** header in a request to specify the token when calling other APIs. For example, if the token is **ABCDEFJ....**, add **X-Auth-Token: ABCDEFJ....** in a request as follows:

```
GET https://iam.cn-north-1.myhuaweicloud.com/v3/auth/projects
Content-Type: application/json
X-Auth-Token: ABCDEFJ....
```

## AK/SK-based Authentication

### NOTE

AK/SK-based authentication supports API requests with a body not larger than 12 MB. For API requests with a larger body, token-based authentication is recommended.

In AK/SK-based authentication, the AK/SK is used to sign requests and the signature is then added to the requests for authentication.

- AK: access key ID, which is a unique identifier used in conjunction with a secret access key to sign requests cryptographically.
- SK: secret access key used in conjunction with an AK to sign requests cryptographically. It identifies a request sender and prevents the request from being modified.

In AK/SK-based authentication, you can use the AK/SK to sign requests based on the signature algorithm or use a dedicated signing SDK to sign requests. For details about how to sign requests and use the signing SDK, see [AK/SK Signing and Authentication Guide](#).

---

### NOTICE

The signing SDK is only used for signing requests and is different from the SDKs provided by services.

---

## 2.3 Response

After sending a request, you will receive a response, including the status code, response header, and response body.

### Status Code

A status code is a group of digits, ranging from 1xx to 5xx. It indicates the status of a request. For more information, see [Status Codes](#).



If status code **201** is returned for calling the API used to **obtain a user token**, the request is successful.

## Response Header

Similar to a request, a response also has a header, for example, **Content-Type**.

**Table 2-4** Common response header fields

Parameter	Description	Mandatory
Content-Type	Media type of the message body sent to a receiver Type: string Default value: <b>application/json; charset=UTF-8</b>	Yes
X-request-id	This field carries the request ID for task tracing. Type: string. <b>request_id-timestamp-hostname</b> ( <b>request_id</b> is the UUID generated on the server. <b>timestamp</b> indicates the current timestamp, and <b>hostname</b> is the name of the server that processes the current API.) Default value: none	No
X-ratelimit	This field carries the total number of flow control requests. Type: integer Default value: none	No
X-ratelimit-used	This field carries the number of remaining requests. Type: integer Default value: none	No
X-ratelimit-window	This field carries the flow control unit. Type: string. The unit is minute, hour, or day. Default value: hour	No

The following figure shows the response header for the API used to **obtain a user token**

**x-subject-token** is the desired user token. This token can then be used to authenticate the calling of other APIs.

**Figure 2-1** Header of the response to the request for obtaining a user token

```

connection → keep-alive

content-type → application/json

date → Tue, 12 Feb 2019 06:52:13 GMT

server → Web Server

strict-transport-security → max-age=31536000; includeSubdomains;

transfer-encoding → chunked

via → proxy A

x-content-type-options → nosniff

x-download-options → noopen

x-frame-options → SAMEORIGIN

x-iam-trace-id → 218d45ab-d674-4995-af3a-2d0255ba41b5

x-subject-token
→ MIIYXQYJKoZIhvcNAQcCoIIYTCCEGoCAQExDTALBglghkgBZQMEAgEwgharBgkqhkiG9w0BBwGgghacBIIWmHsidG9rZW4iOansiZXhwaXJlc19hdCI6IiwMTktMDItMTNUMD
fj3KJs6YgKnpVNRbW2eZ5eb78SZOkajACgkIQ01wi4JIGzrpd18LGXK5bdfq4lqHCYb8P4NaYONYeJcAgz/VeFYtLWT1GSO0zxKZmlQHq82HBqHdglZO9fuEbL5dMhdavj+33wEI
xHRCE9I87o+k9-
j+CMZSEB7bUGd5Uj6eRASXl1jipPEGA270g1FruooL6jggIFkNPQuFSOU8+uSsttVwRtnfsc+qTp22Rkd5MCqFGQ8LcuUxC3a+9CMBnOintWW7oeRUUVhVpxk8pxiX1wTEboX-
RzT6MUbpvGw-oPNFYxJECKnoH3HRozv0vN--n5d6Nbxg==

x-xss-protection → 1; mode=block;

```

## Response Body

The body of a response is often returned in a structured format as specified in **Content-Type**. The response body transfers content except the response header.

For the API used to **obtain a user token**, the response body is as follows:

```

{
  "token": {
    "expires_at": "2019-02-13T06:52:13.855000Z",
    "methods": [
      "password"
    ],
    "catalog": [
      {
        "endpoints": [
          {
            "region_id": "cn-north-1",
            .....

```

If an error occurs during API calling, an error code and a message will be displayed. The following shows an error response body.

```

{
  "error_msg": "The API does not exist or has not been publish in the environment",
  "error_code": "IVA.0101",
  "request_id": "8ec47b9ec686af9976bed342d5cd5e06"
}

```

In the error response body, **error\_code** is an error code, and **error\_msg** provides information about the error. For more information, see **Error Codes**.

# 3 Platform APIs

## 3.1 Video Center

### 3.1.1 Creating a Video Source

#### Function

This API is used to create a video source.

#### URI

POST /v2/{project\_id}/source

**Table 3-1** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> . Maximum: <b>64</b>

#### Request Parameters

**Table 3-2** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-3** Request body parameters

Parameter	Mandatory	Type	Description
video_source_name	Yes	String	Video source name. The value can contain only letters, digits, spaces, and the following special characters: .-_(). It cannot start or end with a space. Minimum: <b>1</b> Maximum: <b>100</b>
access_type	Yes	String	Access type, which can be <b>cloud</b> or <b>edge</b> .
type	Yes	String	Type: obs, vcn, url, restful, and camera
latitude	No	String	Latitude of the video source. The value ranges from -90.00000 to 90.00000.
longitude	No	String	Longitude of the video source. The value ranges from -180.00000 to 180.00000.
video_group_ids	No	Array of strings	IDs of all video source groups. An ID is a string of 4 to 36 characters consisting of only lowercase letters, digits, hyphens (-), and underscores (_).

Parameter	Mandatory	Type	Description
type_config	Yes	String	XML file of video source configuration information URL format: <type>URL</type><config> <URL_ADDRESS></URL_ADDRESS> </config> VCN format: <type>VCN</type> <config> <DATA_SOURCE_ID></DATA_SOURCE_ID> <STREAM_TYPE></STREAM_TYPE> <IP></IP> <PORT></PORT> <USER_NAME></USER_NAME> <PASSWORD></PASSWORD> </config> RESTful format: <type>RESTFUL</type> <config> <HTTP_CHECK></HTTP_CHECK> <URL></URL> <RTSP_URL></RTSP_URL> </config> Camera format: <type>CAMERA</type> <config> <EDGE_CAMERA_ID></EDGE_CAMERA_ID> </config> Maximum: <b>1024</b>
tag	No	Array of strings	Video source tag. A maximum of four tags can be selected. Only letters, digits, hyphens (-), and underscores (_) are allowed. Minimum length: 1 character Maximum length: 10 characters

## Response Parameters

Status code: 200

Table 3-4 Response body parameters

Parameter	Type	Description
video_source_id	String	Video source ID

## Example Requests

Request body for creating a video source

```
/v2/{project_id}/source/sources/{video_source_id}

{
  "video_source_name": "url_test",
  "access_type": "cloud",
  "type": "url",
  "longitude": "",
  "latitude": "",
  "tag": [ ],
  "video_group_ids": [ ],
  "type_config": "<type_config> <url_address>rtsp://12.12.12.12:333</url_address> </type_config>"
}
```

## Example Responses

**Status code: 200**

Video source information

```
{
  "video_source_id": "xxxxxxxx-xxxxxxxx-xxxxxxxx-xxxxx-xxxxxx"
}
```

## Status Codes

Status Code	Description
200	Video source information

## Error Codes

See [Error Codes](#).

### 3.1.2 Modifying a Video Source

#### Function

This API is used to modify video sources.

#### URI

PUT /v2/{project\_id}/source/{video\_source\_id}

**Table 3-5** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> . Maximum: <b>64</b>
video_source_id	Yes	String	ID of a created video source. The value is a string of 4 to 36 characters consisting of only lowercase letters, digits, hyphens (-), and underscores (_). Maximum: <b>36</b>

## Request Parameters

**Table 3-6** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-7** Request body parameters

Parameter	Mandatory	Type	Description
video_source_name	Yes	String	Video source name. The value can contain only letters, digits, spaces, and the following special characters: .-_(). It cannot start or end with a space. Minimum: <b>0</b> Maximum: <b>100</b>
latitude	No	String	Latitude of the video source. The value ranges from -90.00000 to 90.00000.
longitude	No	String	Longitude of the video source. The value ranges from -180.00000 to 180.00000.

Parameter	Mandatory	Type	Description
type_config	Yes	String	XML file of video source configuration information URL format: <type>URL</type><config> <URL_ADDRESS></URL_ADDRESS> </config> VCN format: <type>VCN</type> <config> <DATA_SOURCE_ID></DATA_SOURCE_ID> <STREAM_TYPE></STREAM_TYPE> <IP></IP> <PORT></PORT> <USER_NAME></USER_NAME> <PASSWORD></PASSWORD> </config> RESTful format: <type>RESTFUL</type> <config> <HTTP_CHECK></HTTP_CHECK> <URL></URL> <RTSP_URL></RTSP_URL> </config> Camera format: <type>CAMERA</type> <config> <EDGE_CAMERA_ID></EDGE_CAMERA_ID> </config> Maximum: <b>1024</b>
tag	No	Array of strings	Video source tag. A maximum of four tags can be selected. Only letters, digits, hyphens (-), and underscores (_) are allowed. Minimum length: 1 character Maximum length: 10 characters

## Response Parameters

Status code: 200

Table 3-8 Response body parameters

Parameter	Type	Description
video_source_name	String	Video source name. The value can contain only letters, digits, spaces, and the following special characters: .-_(). It cannot start or end with a space. Minimum length: 1 character Maximum length: 100 characters



Parameter	Type	Description
access_type	String	Access type, which can be <b>cloud</b> or <b>edge</b> .
status	<b>VideoSourceStatusInfoDto</b> object	Data source status
type	String	Type: obs, vcn, url, restful, and camera
latitude	String	Latitude of the video source. The value ranges from -90.00000 to 90.00000.
longitude	String	Longitude of the video source. The value ranges from -180.00000 to 180.00000.
create_at	Long	Creation time
type_config	String	XML file of video source configuration information
video_packages	Array of <b>VideoGroupInfoDto</b> objects	Group to which the video source belongs
service_config_templates	Array of <b>VideoServiceConfigTemplateDto</b> objects	Algorithm template body
stream_path	String	Stream address
image	String	Base64-encoded video source snapshot
tag	Array of strings	Video source tag. A maximum of four tags can be selected. Only letters, digits, hyphens (-), and underscores (_) are allowed. Minimum length: 1 character Maximum length: 10 characters
scene_recommend	Array of strings	Tags recommended by an intelligent algorithm
video_source_quality	Array of strings	Video source quality. <b>Blurry</b> : blurry image; <b>ColorDistortion</b> : color distortion; <b>AbnormalLight</b> : abnormal image light; <b>ScreenSplash</b> : image artifact; <b>ScreenJitter</b> : image jitter; <b>ScreenMovement</b> : image movement; <b>SceneUpheaval</b> : image upheaval; <b>ScreenFreeze</b> : image freezing; <b>BlackScreen</b> : black screen; <b>SnowNoise</b> : static noise; <b>Occlude</b> : blocking; <b>GrayScreen</b> : gray screen; <b>ScreenSmudge</b> : screen smudge

**Table 3-9** VideoSourceStatusInfoDto

Parameter	Type	Description
status	String	Video source status
name	String	Status name
level	String	Status level (used for color matching of frontend images)

**Table 3-10** VideoGroupInfoDto

Parameter	Type	Description
video_group_id	String	ID of the group to which the video source belongs
video_group_name	String	Name of the group to which the video source belongs
description	String	Description of the group to which the video source belongs
access_type	String	Access type, which can be <b>cloud</b> or <b>edge</b> .
create_at	Long	Creation time
modify_at	Long	Modification time
num_video_source	Integer	Number of video resources
group_status	<b>GroupStatusDto</b> object	Video source status
num_batch_task	Integer	Number of configured batch tasks

**Table 3-11** GroupStatusDto

Parameter	Type	Description
num_online	Integer	Number of online video sources
num_exception	Integer	Number of abnormal video sources
num_offline	Integer	Number of offline video sources

**Table 3-12** VideoServiceConfigTemplateDto

Parameter	Type	Description
name	String	Algorithm service name
roi	String	Public ROI
serviceConfig	String	Common configuration of algorithm services
createAt	Long	Creation time
modifyAt	Long	Modification time
numTask	Integer	Number of running algorithms

## Example Requests

Request body for modifying a video source

```
/v2/{project_id}/source/{video_source_id}
{
  "video_source_name": "url_test",
  "access_type": "cloud",
  "type": "url",
  "longitude": "",
  "latitude": "",
  "tag": [ "1" ],
  "video_group_ids": [ ],
  "type_config": "<type_config>    <url_address>rtsp://12.12.12.12:333</url_address>    </type_config>"
}
```

## Example Responses

**Status code: 200**

Response body for updating a video source

```
{
  "video_source_name": "url_test",
  "access_type": "cloud",
  "status": {
    "status": "Online",
    "name": "Online",
    "level": "1"
  },
  "type": "url",
  "latitude": "",
  "longitude": "",
  "create_at": 1680772763191,
  "type_config": "<type_config>    <url_address>rtsp://12.12.12.12:333</url_address>    </type_config>",
  "stream_path": "rtsp://12.12.12.12:333",
  "tag": [ "1" ],
  "device_id": "1680772763191",
  "scene_recommend": [ ],
  "video_source_quality": [ ]
}
```

## Status Codes

Status Code	Description
200	Response body for updating a video source

## Error Codes

See [Error Codes](#).

### 3.1.3 Deleting a Video Source

#### Function

This API is used to delete video sources.

#### URI

DELETE /v2/{project\_id}/source/{video\_source\_id}

**Table 3-13** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> . Maximum: <b>64</b>
video_source_id	Yes	String	ID of a created video source. The value is a string of 4 to 36 characters consisting of only lowercase letters, digits, hyphens (-), and underscores (_). Maximum: <b>36</b>

#### Request Parameters

**Table 3-14** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

None

## Example Requests

This request is used to delete the video source whose ID is *{video\_source\_id}*.

```
/v2/{project_id}/source/{video_source_id}
```

```
https://{endpoint}/v2/{project_id}/source/{video_source_id}
```

## Example Responses

**Status code: 200**

Operation successful

```
true
```

## Status Codes

Status Code	Description
200	Operation successful

## Error Codes

See [Error Codes](#).

## 3.1.4 Obtaining Details About a Video Source

### Function

This API is used to obtain details about a video source.

### URI

```
GET /v2/{project_id}/source/sources/{video_source_id}
```

**Table 3-15** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> . Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
video_source_id	Yes	String	ID of a created video source. The value is a string of 4 to 36 characters consisting of only lowercase letters, digits, hyphens (-), and underscores (_). Maximum: <b>36</b>

## Request Parameters

Table 3-16 Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

Status code: 200

Table 3-17 Response body parameters

Parameter	Type	Description
video_source_name	String	Video source name. The value can contain only letters, digits, spaces, and the following special characters: .-_(). It cannot start or end with a space. Minimum length: 1 character Maximum length: 100 characters
access_type	String	Access type, which can be <b>cloud</b> or <b>edge</b> .
status	<a href="#">VideoSourceStatusInfoDto</a> object	Data source status
type	String	Type: obs, vcn, url, restful, and camera
latitude	String	Latitude of the video source. The value ranges from -90.00000 to 90.00000.
longitude	String	Longitude of the video source. The value ranges from -180.00000 to 180.00000.
create_at	Long	Creation time

Parameter	Type	Description
type_config	String	XML file of video source configuration information
video_packages	Array of <b>VideoGroupInfoDto</b> objects	Group to which the video source belongs
service_config_templates	Array of <b>VideoServiceConfigTemplateDto</b> objects	Algorithm template body
stream_path	String	Stream address
image	String	Base64-encoded video source snapshot
tag	Array of strings	Video source tag. A maximum of four tags can be selected. Only letters, digits, hyphens (-), and underscores (_) are allowed. Minimum length: 1 character Maximum length: 10 characters
scene_recommend	Array of strings	Tags recommended by an intelligent algorithm
video_source_quality	Array of strings	Video source quality. <b>Blurry</b> : blurry image; <b>ColorDistortion</b> : color distortion; <b>AbnormalLight</b> : abnormal image light; <b>ScreenSplash</b> : image artifact; <b>ScreenJitter</b> : image jitter; <b>ScreenMovement</b> : image movement; <b>SceneUpheaval</b> : image upheaval; <b>ScreenFreeze</b> : image freezing; <b>BlackScreen</b> : black screen; <b>SnowNoise</b> : static noise; <b>Occlude</b> : blocking; <b>GrayScreen</b> : gray screen; <b>ScreenSmudge</b> : screen smudge

**Table 3-18** VideoSourceStatusInfoDto

Parameter	Type	Description
status	String	Video source status
name	String	Status name
level	String	Status level (used for color matching of frontend images)

**Table 3-19** VideoGroupInfoDto

Parameter	Type	Description
video_group_id	String	ID of the group to which the video source belongs
video_group_name	String	Name of the group to which the video source belongs
description	String	Description of the group to which the video source belongs
access_type	String	Access type, which can be <b>cloud</b> or <b>edge</b> .
create_at	Long	Creation time
modify_at	Long	Modification time
num_video_source	Integer	Number of video resources
group_status	<b>GroupStatusDto</b> object	Video source status
num_batch_task	Integer	Number of configured batch tasks

**Table 3-20** GroupStatusDto

Parameter	Type	Description
num_online	Integer	Number of online video sources
num_exception	Integer	Number of abnormal video sources
num_offline	Integer	Number of offline video sources

**Table 3-21** VideoServiceConfigTemplateDto

Parameter	Type	Description
name	String	Algorithm service name
roi	String	Public ROI
serviceConfig	String	Common configuration of algorithm services
createAt	Long	Creation time
modifyAt	Long	Modification time
numTask	Integer	Number of running algorithms



**Status code: 400**

**Table 3-22** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-23** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to obtain video source details such as the video source name, access type, and status.

```
v2/{project_id}/source/sources/{video_source_id}
https://{endpoint}/v2/{project_id}/source/sources/{video_source_id}
```

## Example Responses

**Status code: 200**

Video source details

```
{
  "video_source_name": "url_test",
```

```

"access_type": "cloud",
"status": {
  "status": "Online",
  "name": "Online",
  "level": "1"
},
"type": "url",
"latitude": "",
"longitude": "",
"create_at": 1680772763191,
"type_config": "<type_config>    <url_address>rtsp://12.12.12.12:333</url_address>    </type_config>",
"video_packages": [],
"service_config_templates": [],
"stream_path": "rtsp://12.12.12.12:333",
"tag": [],
"device_id": "1680772763191",
"scene_recommend": [],
"video_source_quality": []
}

```

## Status Codes

Status Code	Description
200	Video source details
400	Invalid parameter
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.1.5 Obtaining Video Sources

### Function

This API is used to obtain video sources.

### URI

GET /v2/{project\_id}/source/sources

**Table 3-24** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> . Maximum: <b>64</b>

**Table 3-25** Query Parameters

Parameter	Mandatory	Type	Description
scope	No	String	Fuzzy search parameter, which is used to search for a video source by name. This parameter is optional. Minimum: <b>0</b> Maximum: <b>255</b>
scope_name	No	String	Field name of the fuzzy search parameter, which can be <b>source_name</b> or <b>group_name</b> . This parameter is optional. Default: <b>source_name</b> Maximum: <b>11</b>
status	No	Array	Video source status. The value can be <b>1</b> (online), <b>2</b> (offline), or <b>9</b> (abnormal). This parameter is optional.
type	No	Array	Type: obs, vcn, url, restful, camera, and ivm
video_group_id	No	Array	Video source group, which is optional. If this parameter is input, the value must match the regular expression <b>^[0-9a-zA-Z-]{1,36}\$</b> .
sort_name	No	String	Sorting option. Options: <b>create_at</b> , <b>num_task</b> , and <b>num_template</b> . This parameter is optional. Default: <b>create_at</b>
order_by	No	String	Sort order. This parameter is optional. The records are displayed in descending order by default. Default: <b>desc</b>
is_paged	No	Boolean	Whether to display records on different pages Default: <b>false</b>

Parameter	Mandatory	Type	Description
page_size	No	Integer	Number of records displayed on each page Minimum: <b>5</b> Maximum: <b>200</b> Default: <b>10</b>
page_num	No	Integer	Page number Minimum: <b>1</b> Maximum: <b>100000</b> Default: <b>1</b>
access_type	No	Array	Access type
platform_name	No	String	Platform name Minimum: <b>0</b> Maximum: <b>100</b>
tag	No	String	Tag Minimum: <b>0</b> Maximum: <b>255</b>

## Request Parameters

**Table 3-26** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

**Status code: 200**

**Table 3-27** Response body parameters

Parameter	Type	Description
video_source_number	Integer	Number of video resources
total_number	Integer	Total number of video sources

Parameter	Type	Description
quota_number	Integer	Video source quota
video_source_list	Array of <a href="#">ListVideoSourceInfoDto</a> objects	Video source list

**Table 3-28** ListVideoSourceInfoDto

Parameter	Type	Description
video_source_id	String	ID of a created video source
video_source_name	String	Video source name. The value can contain only letters, digits, spaces, and the following special characters: .-_(). It cannot start or end with a space. Minimum length: 1 character Maximum length: 100 characters
status	<a href="#">VideoSourceStatusInfoDto</a> object	Video source status
access_type	String	Access type, which can be <b>cloud</b> or <b>edge</b> .
type	String	Type: obs, vcn, url, restful, and camera
latitude	String	Latitude of the video source. The value ranges from -90.00000 to 90.00000.
longitude	String	Longitude of the video source. The value ranges from -180.00000 to 180.00000.
create_at	Long	Creation time
video_packages	Array of <a href="#">VideoGroupInfoDto</a> objects	Group to which the video source belongs
num_tasks	Integer	Number of running algorithm tasks using the video source
num_service_config_templates	Integer	Number of algorithm service configuration templates

Parameter	Type	Description
type_config	String	XML file of video source configuration information URL format: URL <DATA_SOURCE_ID></DATA_SOURCE_ID> <STREAM_TYPE></STREAM_TYPE> <USER_NAME></USER_NAME> RESTful format: RESTFUL <HTTP_CHECK></HTTP_CHECK> <RTSP_URL></RTSP_URL> Camera format: CAMERA <EDGE_CAMERA_ID></EDGE_CAMERA_ID>
tag	Array of strings	Video source tag. A maximum of four tags can be selected. Only letters, digits, hyphens (-), and underscores (_) are allowed. Minimum length: 1 character Maximum length: 10 characters
stream_path	String	Stream address
scene_recommend	Array of strings	Tags recommended by an intelligent algorithm
video_source_quality	Array of strings	Video source quality. <b>Blurry</b> : blurry image; <b>ColorDistortion</b> : color distortion; <b>AbnormalLight</b> : abnormal image light; <b>ScreenSplash</b> : image artifact; <b>ScreenJitter</b> : image jitter; <b>ScreenMovement</b> : image movement; <b>SceneUpheaval</b> : image upheaval; <b>ScreenFreeze</b> : image freezing; <b>BlackScreen</b> : black screen; <b>SnowNoise</b> : static noise; <b>Occlude</b> : blocking; <b>GrayScreen</b> : gray screen; <b>ScreenSmudge</b> : screen smudge

**Table 3-29** VideoSourceStatusInfoDto

Parameter	Type	Description
status	String	Video source status
name	String	Status name
level	String	Status level (used for color matching of frontend images)

**Table 3-30** VideoGroupInfoDto

Parameter	Type	Description
video_group_id	String	ID of the group to which the video source belongs
video_group_name	String	Name of the group to which the video source belongs
description	String	Description of the group to which the video source belongs
access_type	String	Access type, which can be <b>cloud</b> or <b>edge</b> .
create_at	Long	Creation time
modify_at	Long	Modification time
num_video_source	Integer	Number of video resources
group_status	<b>GroupStatusDto</b> object	Video source status
num_batch_task	Integer	Number of configured batch tasks

**Table 3-31** GroupStatusDto

Parameter	Type	Description
num_online	Integer	Number of online video sources
num_exception	Integer	Number of abnormal video sources
num_offline	Integer	Number of offline video sources

**Status code: 400**

**Table 3-32** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>

Parameter	Type	Description
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-33** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to obtain all video sources under an account.

```
v2/{project_id}/source/sources
```

```
https://{endpoint}/v2/{project_id}/source/sources?  
is_paged=true&page_size=10&page_num=1&scope_name=source_name
```

## Example Responses

**Status code: 200**

Response body for obtaining video sources

```
{
  "video_source_number" : 230,
  "total_number" : 230,
  "quota_number" : 5000,
  "video_source_list" : [ {
    "video_source_id" : "xxxxxxxx-xxxxxx-xxxxxx-xxxx-xxxx",
    "video_source_name" : "url_test",
    "status" : {
      "status" : "Online",
      "name" : "Online",
      "level" : "1"
    }
  },
  "access_type" : "cloud",
  "type" : "url",
  "latitude" : "",
  "longitude" : "",
  "create_at" : 1680772763191,
```



```

"video_packages" : [],
"num_tasks" : 0,
"num_service_config_templates" : 0,
"type_config" : "<type_config>    <url_address>rtsp://12.12.12.12:333</url_address>    </type_config>",
"tag" : [],
"stream_path" : "rtsp://12.12.12.12:333",
"device_id" : "1680772763191",
"scene_recommend" : [],
"video_source_quality" : []
}]
}

```

## Status Codes

Status Code	Description
200	Response body for obtaining video sources
400	Invalid parameter
500	Internal error

## Error Codes

See [Error Codes](#).

### 3.1.6 Creating a Video Source Group

#### Function

This API is used to create video source groups.

#### URI

POST /v2/{project\_id}/video-group

**Table 3-34** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> . Maximum: <b>64</b>

## Request Parameters

**Table 3-35** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-36** Request body parameters

Parameter	Mandatory	Type	Description
video_group_name	Yes	String	Video source group name. The value is a string of 1 to 20 characters consisting of only letters and digits. Maximum: <b>20</b>
description	No	String	Video source group description Maximum: <b>100</b>
access_type	Yes	String	Access type. The value can only be <b>cloud</b> or <b>edge</b> . Maximum: <b>5</b>
video_source_ids	No	Array of strings	Video source IDs. An ID is a string of 4 to 36 characters consisting of lowercase letters, digits, hyphens (-), and underscores (_).

## Response Parameters

**Status code: 200**

**Table 3-37** Response body parameters

Parameter	Type	Description
video_group_id	String	Video source group ID

## Example Requests

Request body for creating a video source group

```
/v2/{project_id}/video-group
```

```
{
  "video_source_ids" : [ "xxxxxxx-xxxxxxx-xxxxxxx-xxxxx-xxxxx" ],
  "video_group_name" : "test000",
  "description" : "",
  "access_type" : "cloud"
}
```

## Example Responses

**Status code: 200**

Operation successful

```
{
  "video_group_id" : "a9334780-a53c-454e-a3c1-259c54678ec1"
}
```

## Status Codes

Status Code	Description
200	Operation successful

## Error Codes

See [Error Codes](#).

## 3.1.7 Deleting a Video Source Group

### Function

This API is used to delete video source groups.

### URI

DELETE /v2/{project\_id}/video-group/{video\_group\_id}

**Table 3-38** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
video_group_id	Yes	String	ID of a video source group. The value is a string of 4 to 36 characters consisting of only lowercase letters, digits, hyphens (-), and underscores (_).

## Request Parameters

**Table 3-39** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

None

## Example Requests

This request is used to delete the video source group whose ID is **{video\_group\_id}**.

```
/v2/{project_id}/video-group/{video_group_id}
```

```
https://{endpoint}/v2/{project_id}/video-group/{video_group_id}
```

## Example Responses

None

## Status Codes

Status Code	Description
200	The video source group has been deleted.

## Error Codes

See [Error Codes](#).

## 3.1.8 Updating a Video Source Group

### Function

This API is used to modify a video source group.

### URI

```
PUT /v2/{project_id}/video-group/{video_group_id}
```

**Table 3-40** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
video_group_id	Yes	String	ID of a created video source group. The value is a string of 4 to 36 characters consisting of only lowercase letters, digits, hyphens (-), and underscores (_).

## Request Parameters

**Table 3-41** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-42** Request body parameters

Parameter	Mandatory	Type	Description
video_group_name	No	String	Name of a video source group. If this parameter is not input, the name is not changed. The name is a string of 1 to 20 characters consisting of hyphens (-), underscores (_), letters, and digits. Minimum: <b>1</b> Maximum: <b>20</b>
description	No	String	Description. If this parameter is not input, the description is not modified. Maximum: <b>100</b>

Parameter	Mandatory	Type	Description
video_source_ids	Yes	Array of strings	IDs of video sources in a group. The number of IDs must range from 1 to 50. Each ID can contain only lowercase letters, digits, hyphens (-), and underscores (_). The length range is [4, 36]. Array Length: <b>1 - 50</b>

## Response Parameters

None

## Example Requests

Request body for modifying a video source group

```
/v2/{project_id}/video-group/{video_group_id}
{
  "video_source_ids": [ "xxxxxxxx-xxxxxxxx-xxxxxxxx-xxxxx-xxxxxx", "xxxxxxxx-xxxxxxxx-xxxxxxxx-xxxxx-xxxxxx" ],
  "video_group_name": "test000",
  "description": ""
}
```

## Example Responses

None

## Status Codes

Status Code	Description
200	Operation successful

## Error Codes

See [Error Codes](#).

## 3.1.9 Obtaining Details About a Video Source Group

### Function

This API is used to obtain details about a video source group.

### URI

GET /v2/{project\_id}/video-group/{video\_group\_id}

**Table 3-43** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
video_group_id	Yes	String	ID of a video source group. The value is a string of 4 to 36 characters consisting of only lowercase letters, digits, hyphens (-), and underscores (_).

## Request Parameters

**Table 3-44** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

**Status code: 200**

**Table 3-45** Response body parameters

Parameter	Type	Description
video_group_id	String	ID of the group to which the video source belongs
video_group_name	String	Name of the group to which the video source belongs
description	String	Description of the group to which the video source belongs
access_type	String	Access type, which can be <b>cloud</b> or <b>edge</b> .
create_at	Long	Creation time
modify_at	Long	Modification time
num_video_source	Integer	Number of video resources

Parameter	Type	Description
group_status	<a href="#">GroupStatus Dto</a> object	Video source status
num_batch_task	Integer	Number of configured batch tasks

**Table 3-46** GroupStatusDto

Parameter	Type	Description
num_online	Integer	Number of online video sources
num_exception	Integer	Number of abnormal video sources
num_offline	Integer	Number of offline video sources

## Example Requests

This request is used to obtain video source group details, including the group name, access type, and video sources in the group.

```
v2/{project_id}/video-group/{video_group_id}
https://{endpoint}/v2/{project_id}/video-group/{video_group_id}
```

## Example Responses

**Status code: 200**

Video source group information

```
{
  "video_group_id": "xxxxxxxx-xxxxxx-xxxxxx-xxxx-xxxxxx",
  "video_group_name": "test000",
  "description": "",
  "access_type": "cloud",
  "create_at": 1680773327730,
  "modify_at": 1680773463291,
  "num_video_source": 2,
  "group_status": {
    "num_online": 2,
    "num_exception": 0,
    "num_offline": 0
  },
  "num_batch_task": 0
}
```



## Status Codes

Status Code	Description
200	Video source group information

## Error Codes

See [Error Codes](#).

### 3.1.10 Obtaining Video Source Groups

#### Function

This API is used to obtain video source groups.

#### URI

GET /v2/{project\_id}/video-group/groups

**Table 3-47** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> . Maximum: <b>64</b>

**Table 3-48** Query Parameters

Parameter	Mandatory	Type	Description
sort_name	No	String	Sorting option, which is optional. The value can be <b>create_at</b> , <b>modify_at</b> , <b>num_video_source</b> , or <b>num_task</b> . Default: <b>create_at</b>
order_by	No	String	Sort order, which is optional. The value can be <b>desc</b> or <b>asc</b> . The default value is <b>desc</b> . Default: <b>desc</b>

Parameter	Mandatory	Type	Description
is_paged	No	Boolean	Whether to display records on different pages Default: <b>false</b>
page_size	No	Integer	Number of records displayed on each page Minimum: <b>5</b> Maximum: <b>200</b> Default: <b>10</b>
page_num	No	Integer	Page number Minimum: <b>1</b> Maximum: <b>100000</b> Default: <b>1</b>
name	No	String	Fuzzy search parameter, which is used to search for a video source group by group name Maximum: <b>20</b>
status	No	String	Status for filtering. Options: <b>1</b> , <b>2</b> , and <b>9</b> .
access_type	No	Array	Access type used for filtering. The options include <b>cloud</b> and <b>edge</b> . Multiple options can be selected.
has_task	No	Boolean	Whether the video source has been used in a batch task Default: <b>false</b>
type	No	Array	Video source type for filtering. Options: <b>obs</b> , <b>vcn</b> , <b>url</b> , <b>restful</b> , and <b>camera</b>

## Request Parameters

**Table 3-49** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

Status code: 200

**Table 3-50** Response body parameters

Parameter	Type	Description
video_group_number	Integer	Number of groups
total_number	Integer	Total number of video source groups
quota_number	Integer	Maximum number of video source groups
video_group_list	Array of <b>VideoGroupListInfoDto</b> objects	Group list

**Table 3-51** VideoGroupListInfoDto

Parameter	Type	Description
video_group_id	String	ID of a video source group
video_group_name	String	Name of a video source group
num_video_source	Integer	Number of video resources
group_status	<b>GroupStatusDto</b> object	Status of video sources in a group
access_type	String	Access type
create_at	Long	Creation time
modify_at	Long	Last modification time
num_batch_task	Integer	Number of configured batch tasks
type	String	Type of video sources in a group

**Table 3-52** GroupStatusDto

Parameter	Type	Description
num_online	Integer	Number of online video sources

Parameter	Type	Description
num_exception	Integer	Number of abnormal video sources
num_offline	Integer	Number of offline video sources

## Example Requests

This request is used to obtain all video source groups under an account.

```
/v2/{project_id}/videoGroup/groups?is_paged=true&page_size=10&page_num=1
```

```
https://{endpoint}/v2/{project_id}/videoGroup/groups?is_paged=true&page_size=10&page_num=1
```

## Example Responses

**Status code: 200**

Response body for obtaining video source groups

```
{
  "video_group_number": 23,
  "total_number": 23,
  "quota_number": 200,
  "video_group_list": [
    {
      "video_group_id": "a9334780-a53c-454e-a3c1-259c54678ec1",
      "video_group_name": "test000",
      "num_video_source": 2,
      "group_status": {
        "num_online": 2,
        "num_exception": 0,
        "num_offline": 0
      },
      "access_type": "cloud",
      "create_at": 1680773327730,
      "modify_at": 1680773463291,
      "num_batch_task": 0,
      "type": "restful"
    }
  ]
}
```

## Status Codes

Status Code	Description
200	Response body for obtaining video source groups

## Error Codes

See [Error Codes](#).

## 3.2 Task Center

### 3.2.1 Creating a Task

#### Function

This API is used to create tasks.

#### URI

POST /v2/{project\_id}/services/{service\_name}/tasks

**Table 3-53** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
service_name	Yes	String	Service API name Minimum: <b>1</b> Maximum: <b>100</b>

#### Request Parameters

**Table 3-54** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-55** Request body parameters

Parameter	Mandatory	Type	Description
name	Yes	String	Task name. It can contain up to 100 characters and can include letters, digits, hyphens (-), and underscores (_).

Parameter	Mandatory	Type	Description
description	No	String	Task description, which is optional. Enter a maximum of 500 characters. Minimum: <b>0</b> Maximum: <b>500</b>
schedule	No	<b>TaskSchedule</b> object	Task schedule. Only the weekly mode is supported.
input	Yes	<b>TaskInput</b> object	Input configuration of a task
output	Yes	<b>TaskOutput</b> object	Output configuration of a task
config	No	<b>TaskServiceConfig</b> object	Task configuration parameters
service_version	Yes	String	Service version. The value must match the regular expression <code>^[a-z0-9.]{3,32}\$</code> . Minimum: <b>3</b> Maximum: <b>32</b>
is_saved_as_template	No	Boolean	Whether to save as a template Default: <b>false</b>
resource_order_id	No	String	Resource order ID, which corresponds to the associated algorithm. This parameter is only mandatory for commercial algorithms and must match the regular expression <code>^[a-z0-9-]{4,36}\$</code> . Minimum: <b>4</b> Maximum: <b>36</b>

**Table 3-56** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled task. This parameter is mandatory for scheduled tasks. The value can be <b>weekly</b> , indicating that the task is executed every week.

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled tasks. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a task is executed. This parameter is mandatory only for weekly tasks. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b> Array Length: <b>1 - 7</b>
days_of_month	No	Array of integers	Days in a month when a task is executed. This parameter is mandatory only for monthly tasks. The values <b>1</b> to <b>31</b> indicate the first day to the 31st day of a month. Currently, the system does not support this parameter. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array<>>	Time segment configuration. Select at least one time segment for executing a weekly or monthly task.

**Table 3-57** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Task input type, which is mandatory when you create a task. The <b>video_source</b> type cannot be changed to other types. The following types are supported: <b>obs</b> (files stored in OBS, supported only by cloud tasks), <b>url</b> (specified file URL or stream request URL, supported only by cloud tasks), <b>edgcamera</b> (edge camera bound to IEF, supported only by edge tasks), <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs) <b>vcn</b> (VCN device, supported only by edge tasks), and <b>video_source</b> (video sources managed in VIAS, supported by both cloud and edge tasks). You are advised to use the <b>video_source</b> type. Other types will be discontinued in the future. The outputs of tasks whose input type is <b>obs</b>, <b>url</b>, <b>edgcamera</b>, or <b>restful</b> can be sent to webhook.</p> <p>Options:</p> <ul style="list-style-type: none"> <li>• <b>video_source</b></li> <li>• <b>obs</b> (not recommended and will be discontinued)</li> <li>• <b>url</b> (not recommended and will be discontinued)</li> <li>• <b>edgcamera</b> (not recommended and will be discontinued)</li> <li>• <b>restful</b> (not recommended and will be discontinued)</li> <li>• <b>vcn</b> (not recommended and will be discontinued)</li> </ul>



Parameter	Mandatory	Type	Description
data	Yes	Array of <a href="#">TaskInputData</a> objects	<p>Input details of a task, which is mandatory. The configuration varies depending on the input type. Multiple inputs are allowed during creation, but only one input is allowed for update. If the input type is <b>obs</b>, you must configure <b>bucket</b>, <b>path</b>, and <b>index</b>. Example: <b>bucket: aicam, path: 3rdpartylicenses.txt, index: 0</b></p> <p>If the input type is <b>url</b>, you must configure <b>url</b> and <b>index</b>. Example: <b>url: https://xxx-xxx.com, index: 0</b></p> <p>If the input type is <b>restful</b>, you must configure <b>certificate_check</b>, <b>rtsp_path_in_response</b>, <b>url</b>, <b>index</b>, and <b>headers</b>. Example: <b>certificate_check: true, url: https://hsaij-dasahbi.com, rtsp_path_in_response: data/url, index: 0, headers: { AAA: AAA }</b></p> <p>If the input type is <b>vcn</b>, you must configure <b>device_id</b>, <b>stream_type</b>, and <b>index</b>. Example: <b>device_id: 21356478954612546874#gdhjkishdgdksjshlmhscjsckjhdbnk, stream_type: 1, index: 0</b></p> <p>If the input type is <b>EdgeCamera</b>, you must configure <b>id</b> and <b>index</b>. Example: <b>id: 007cdafc-6000-47ce-b0e3-870b4a0db65e, index: 0.</b></p> <p>Array Length: <b>1 - 50</b></p>
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 3-58** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID. This parameter is mandatory when the input type is <b>video_source</b> .
stream_name	No	String	Name of a video stream
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>64</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
stream_type	No	Integer	Stream type used for analysis. This parameter is mandatory when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> . Default: <b>false</b>

**Table 3-59** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . The value must match the regular expression <b>^.{1,100}\$</b> .

Parameter	Mandatory	Type	Description
password	Yes	String	Password of a VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> . The value must match the regular expression <code>^.{1,1000}\$</code> .

**Table 3-60** TaskOutput

Parameter	Mandatory	Type	Description
obs	No	<a href="#">TaskOutputObs</a> object	Configuration information when the output type is <b>obs</b> .
dis	No	<a href="#">TaskOutputDis</a> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<a href="#">TaskOutputWebhook</a> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to set the output mode to <b>Event Center</b> . <b>true</b> or <b>1</b> indicates yes. <b>false</b> indicates no. Default: <b>false</b>

**Table 3-61** TaskOutputObs

Parameter	Mandatory	Type	Description
bucket	Yes	String	OBS bucket name. This parameter is mandatory when the OBS output type is used. The verification rule is <b>(pattern: "^[a-z0-9](?![-./][-./])([a-z0-9-]{1,61})[a-z0-9]\$")</b> . Maximum: <b>63</b>
path	Yes	String	OBS path. This parameter is mandatory when the OBS output type is used. The verification rule is <b>^(?![/\s])(?!./)([^\s?*"&lt;&gt; \]{0,1023})(?&lt;![\s])\$</b> . Maximum: <b>1023</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-62** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	Name of a DIS stream. This parameter is mandatory when the DIS output type is used. The verification rule is <b>^[<b>-A-Za-z0-9_</b>]{1,64}\$</b> . Maximum: <b>64</b>
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. For example, in the API for creating edge face-related tasks, the output contains <b>dataCategory</b> , with a value range of [ <b>FacelImage, OriginImage</b> ], indicating whether to send the face image or original image. Array Length: <b>0 - 10</b>

**Table 3-63** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>

Parameter	Mandatory	Type	Description
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-64** TaskServiceConfig

Parameter	Mandatory	Type	Description
common	No	Object	Task runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

## Response Parameters

**Status code: 200**

**Table 3-65** Response body parameters

Parameter	Type	Description
id	String	ID of a created task

**Status code: 400**

**Table 3-66** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-67** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

- This request is used to create a task whose input type is **video\_source** and output type is **webhook**. The algorithm service version is **1.1**. No task startup parameters are configured. The configuration is not saved as a template.

```
/v2/{project_id}/services/{service_name}/tasks
{
  "name": "Test",
  "input": {
    "type": "video_source",
    "data": [ {
      "video_source_id": "xxxxxxxx-xxxxxx-xxxxxx-xxxx-xxxxx"
    } ]
  },
  "output": {
    "webhook": {
      "url": "http://test",
      "headers": {
        "a": "a"
      }
    }
  }
}
```

```

    }
  },
  "config" : {
    "common" : { }
  },
  "service_version" : "1.1",
  "is_saved_as_template" : false
}

```

- This request body is used to adapt old IVA APIs.

```

/v2/{project_id}/services/{service_name}/tasks

{
  "name" : "test-alg-819",
  "input" : {
    "type" : "url",
    "data" : [ {
      "url" : "https://iuwhediue-input.com",
      "index" : 0
    } ]
  },
  "output" : {
    "webhook" : {
      "url" : "https://iuwhediue-output.com",
      "headers" : {
        "AA" : "AA"
      }
    }
  },
  "config" : {
    "common" : {
      "viewpoint" : 1
    }
  },
  "service_version" : "3.0",
  "is_saved_as_template" : false,
  "resource_order_id" : "029b34a69efd48769215e429deff0cec"
}

```

- This request creates a scheduled task. If the end time of one day is 23:59:00 and the start time of the next day is 00:00:00, the task does not stop until it is completed.

```

/v2/{project_id}/services/{service_name}/tasks

{
  "name" : "test-alg-819",
  "schedule" : {
    "type" : "weekly",
    "timezone" : "+08:00",
    "days_of_week" : [ 1, 2, 3, 4, 5, 6, 7 ],
    "periods" : [ [ ], [ ], [ ], [ ], [ {
      "begin_at" : "22:15:00",
      "end_at" : "23:59:00"
    } ] ], [ {
      "begin_at" : "00:00:00",
      "end_at" : "23:59:00"
    } ] ], [ {
      "begin_at" : "22:15:00",
      "end_at" : "23:59:00"
    } ] ]
  },
  "input" : {
    "type" : "url",
    "data" : [ {
      "url" : "https://iuwhediue-input.com",
      "index" : 0
    } ]
  },
}

```



```
"output" : {
  "webhook" : {
    "url" : "https://iuwhediue-output.com",
    "headers" : {
      "AA" : "AA"
    }
  },
  "config" : {
    "common" : {
      "viewpoint" : 1
    }
  },
  "service_version" : "3.0",
  "is_saved_as_template" : false,
  "resource_order_id" : "029b34a69efd48769215e429deff0cec"
}
```

### Example Responses

**Status code: 200**

Operation successful

```
{
  "tasks" : [ {
    "id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx"
  } ]
}
```

### Status Codes

Status Code	Description
200	Operation successful
400	Request error
500	Internal error

### Error Codes

See [Error Codes](#).

## 3.2.2 Starting or Stopping a Task

### Function

This API is used to start or stop a task.

### URI

PUT /v2/{project\_id}/tasks/{task\_id}/action/{command}

**Table 3-68** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
task_id	Yes	String	ID of a created task
command	Yes	String	API's action for a task, for example, stopping or starting

## Request Parameters

**Table 3-69** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

**Status code: 400**

**Table 3-70** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-71** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

- This request is used to stop the task whose ID is *{task\_id}*.

```
/v2/{project_id}/tasks/{task_id}/action/{command}
{
  "id": "String",
  "status_code": 200,
  "status_msg": "success"
}
```

- This request is used to start the task whose ID is *{task\_id}*.

```
/v2/{project_id}/tasks/{task_id}/action/{command}
{
  "id": "String",
  "status_code": 200,
  "status_msg": "success"
}
```

## Example Responses

None

## Status Codes

Status Code	Description
200	Operation successful
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.2.3 Modifying a Task

### Function

This API is used to modify task configurations.

### URI

PUT /v2/{project\_id}/tasks/{task\_id}

**Table 3-72** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
task_id	Yes	String	ID of a created task

### Request Parameters

**Table 3-73** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-74** Request body parameters

Parameter	Mandatory	Type	Description
name	Yes	String	Task name. It can contain up to 100 characters and can include letters, digits, hyphens (-), and underscores (_).
description	No	String	Task description, which is optional. Enter a maximum of 500 characters. Minimum: <b>0</b> Maximum: <b>500</b>
schedule	No	<a href="#">TaskSchedule</a> object	Task schedule. Only the weekly mode is supported.

Parameter	Mandatory	Type	Description
input	Yes	<b>TaskInput</b> object	Input configuration of a task, which is mandatory.
output	Yes	<b>TaskOutput</b> object	Output configuration of a task. At least one output mode must be configured.
config	No	<b>TaskServiceConfig</b> object	Task configuration parameters
is_saved_as_template	No	Boolean	Whether to save as a template Default: <b>false</b>
resource_order_id	No	String	Resource order ID, which corresponds to the associated algorithm. This parameter is only mandatory for commercial algorithms and must match the regular expression <code>^[a-z0-9-]{4,36}\$</code> .

**Table 3-75** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled task. This parameter is mandatory for scheduled tasks. The value can be <b>weekly</b> , indicating that the task is executed every week.
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled tasks. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a task is executed. This parameter is mandatory only for weekly tasks. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b> Array Length: <b>1 - 7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a task is executed. This parameter is mandatory only for monthly tasks. The values <b>1</b> to <b>31</b> indicate the first day to the 31st day of a month. Currently, the system does not support this parameter. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array<>>	Time segment configuration. Select at least one time segment for executing a weekly or monthly task.

**Table 3-76** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Task input type, which is mandatory when you create a task. The <b>video_source</b> type cannot be changed to other types. The following types are supported: <b>obs</b> (files stored in OBS, supported only by cloud tasks), <b>url</b> (specified file URL or stream request URL, supported only by cloud tasks), <b>edgcamera</b> (edge camera bound to IEF, supported only by edge tasks), <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs) <b>vcn</b> (VCN device, supported only by edge tasks), and <b>video_source</b> (video sources managed in VIAS, supported by both cloud and edge tasks). You are advised to use the <b>video_source</b> type. Other types will be discontinued in the future. The outputs of tasks whose input type is <b>obs</b>, <b>url</b>, <b>edgcamera</b>, or <b>restful</b> can be sent to webhook.</p> <p>Options:</p> <ul style="list-style-type: none"> <li>● <b>video_source</b></li> <li>● <b>obs</b> (not recommended and will be discontinued)</li> <li>● <b>url</b> (not recommended and will be discontinued)</li> <li>● <b>edgcamera</b> (not recommended and will be discontinued)</li> <li>● <b>restful</b> (not recommended and will be discontinued)</li> <li>● <b>vcn</b> (not recommended and will be discontinued)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <a href="#">TaskInputData</a> objects	<p>Input details of a task, which is mandatory. The configuration varies depending on the input type. Multiple inputs are allowed during creation, but only one input is allowed for update. If the input type is <b>obs</b>, you must configure <b>bucket</b>, <b>path</b>, and <b>index</b>. Example: <b>bucket: aicam, path: 3rdpartylicenses.txt, index: 0</b></p> <p>If the input type is <b>url</b>, you must configure <b>url</b> and <b>index</b>. Example: <b>url: https://xxx-xxx.com, index: 0</b></p> <p>If the input type is <b>restful</b>, you must configure <b>certificate_check</b>, <b>rtsp_path_in_response</b>, <b>url</b>, <b>index</b>, and <b>headers</b>. Example: <b>certificate_check: true, url: https://hsaij-dasahbi.com, rtsp_path_in_response: data/url, index: 0, headers: { AAA: AAA }</b></p> <p>If the input type is <b>vcn</b>, you must configure <b>device_id</b>, <b>stream_type</b>, and <b>index</b>. Example: <b>device_id: 21356478954612546874#gdhjkjushdgdksjhlmscjsckjhdbnk, stream_type: 1, index: 0</b></p> <p>If the input type is <b>EdgeCamera</b>, you must configure <b>id</b> and <b>index</b>. Example: <b>id: 007cdafc-6000-47ce-b0e3-870b4a0db65e, index: 0.</b></p> <p>Array Length: <b>1 - 50</b></p>
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .



**Table 3-77** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID. This parameter is mandatory when the input type is <b>video_source</b> .
stream_name	No	String	Name of a video stream
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>64</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
stream_type	No	Integer	Stream type used for analysis. This parameter is mandatory when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> . Default: <b>false</b>

**Table 3-78** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . The value must match the regular expression <b>^.{1,100}\$</b> .

Parameter	Mandatory	Type	Description
password	Yes	String	Password of a VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> . The value must match the regular expression <b>^.{1,1000}\$</b> .

**Table 3-79** TaskOutput

Parameter	Mandatory	Type	Description
obs	No	<b>TaskOutputObs</b> object	Configuration information when the output type is <b>obs</b> .
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to set the output mode to <b>Event Center</b> . <b>true</b> or <b>1</b> indicates yes. <b>false</b> indicates no. Default: <b>false</b>

**Table 3-80** TaskOutputObs

Parameter	Mandatory	Type	Description
bucket	Yes	String	OBS bucket name. This parameter is mandatory when the OBS output type is used. The verification rule is <b>(pattern: "^[a-z0-9](?![-./][-./])([a-z0-9-]{1,61})[a-z0-9]\$")</b> . Maximum: <b>63</b>
path	Yes	String	OBS path. This parameter is mandatory when the OBS output type is used. The verification rule is <b>^(?![/\s])(?!./)([^\s?*"&lt;&gt; ]{0,1023})(?&lt;![\s])\$</b> . Maximum: <b>1023</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-81** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	Name of a DIS stream. This parameter is mandatory when the DIS output type is used. The verification rule is <b>^[<b>-A-Za-z0-9_</b>]{1,64}\$</b> . Maximum: <b>64</b>
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. For example, in the API for creating edge face-related tasks, the output contains <b>dataCategory</b> , with a value range of [ <b>FacelImage, OriginImage</b> ], indicating whether to send the face image or original image. Array Length: <b>0 - 10</b>

**Table 3-82** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>

Parameter	Mandatory	Type	Description
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-83** TaskServiceConfig

Parameter	Mandatory	Type	Description
common	No	Object	Task runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

## Response Parameters

**Status code: 400**

**Table 3-84** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>

Parameter	Type	Description
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-85** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to modify task configurations, including the task name, video source, scheduling mode, and output configuration.

```

/v2/{project_id}/tasks/{task_id}
{
  "name": "TestA",
  "input": {
    "type": "video_source",
    "data": [ {
      "video_source_id": "xxxxxxxx-xxxxxxxx-xxxxxxxx-xxxxx-xxxxxxx"
    } ]
  },
  "output": {
    "webhook": {
      "url": "http://test",
      "headers": {
        "a": "a"
      }
    }
  },
  "config": {
    "common": { }
  },
  "priority": "low",
  "service_version": "1.1",
  "manufacturer": "VIAS",
  "is_saved_as_template": false
}

```

## Example Responses

None

## Status Codes

Status Code	Description
200	Operation successful
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.2.4 Obtaining Tasks

### Function

This API is used to obtain tasks.

### URI

GET /v2/{project\_id}/tasks

**Table 3-86** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .

**Table 3-87** Query Parameters

Parameter	Mandatory	Type	Description
source_data_type	No	String	Task type, which is used for filtering. Only <b>async_task</b> and <b>sync_task</b> are supported.
title	No	String	Algorithm name, which must match the regular expression <code>^[a-zA-Z0-9\u4e00-\u9fa5-_\u2013]{2,64}\$</code> .

Parameter	Mandatory	Type	Description
camera_name	No	String	Camera name Maximum: <b>255</b>
task_state	No	String	Task status. Options: <b>PENDING, RECOVERING, STARTING, UPGRADING, CREATE_FAILED, START_FAILED, RUNNING, STOPPING, STOPPED, ABNORMAL, SUCCEEDED, FAILED, DELETING, FREEZING, FROZEN, SCHEDULING, and LACK_OF_RESOURCES.</b>
task_name	No	String	Task name Maximum: <b>1024</b>
page_size	No	Integer	Number of records displayed on each page Minimum: <b>5</b> Maximum: <b>1000</b> Default: <b>10</b>
page	No	Integer	Offset Default: <b>1</b>
sort_dir	No	String	Sorting rule for displaying service tasks Default: <b>desc</b>
batch_id	No	String	Batch configuration ID, which must match the regular expression <b>^[a-z0-9-]{4,36}\$</b> .
video_group_id	No	String	Video group ID. Multiple IDs are separated by commas (.). The value length must be [4,2048].
company	No	String	Vendor name. Multiple values are separated by commas (.).
alg_id	No	String	Algorithm ID, which must match the regular expression <b>^[0-9a-f]{8}-[0-9a-f]{4}-[4][0-9a-f]{3}-[89ab][0-9a-f]{3}-[0-9a-f]{12}\$</b> .



## Request Parameters

**Table 3-88** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

Status code: 200

**Table 3-89** Response body parameters

Parameter	Type	Description
count	Integer	Number of records displayed on the current page
tasks	Array of <a href="#">TaskInfo</a> objects	Obtained tasks
page	Integer	Current page number
page_size	Integer	Maximum number of records displayed on a page

**Table 3-90** TaskInfo

Parameter	Type	Description
id	String	Task ID
name	String	Task name
service_id	String	ID of the service corresponding to a task
created_at	String	Task creation time
state	String	Task status. The value can be <b>PENDING</b> , <b>RECOVERING</b> , <b>STARTING</b> , <b>UPGRADING</b> , <b>CREATE_FAILED</b> , <b>START_FAILED</b> , <b>RUNNING</b> , <b>STOPPING</b> , <b>STOPPED</b> , <b>ABNORMAL</b> , <b>SUCCEEDED</b> , <b>FAILED</b> , <b>DELETING</b> , <b>FREEZING</b> , or <b>FROZEN</b> .
video_source_name	String	Video source name

Parameter	Type	Description
title	String	Algorithm name
type	String	Task type ( <b>0</b> : cloud task; <b>1</b> : edge task)
algorithm_publication_id	String	Algorithm ID

**Status code: 400**

**Table 3-91** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-92** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to obtain the tasks in the **Running, Succeeded, Stopped, Pending, Failed, or Abnormal** state.

```
/v2/{project_id}/tasks
https://{endpoint}/v2/{project_id}/tasks?page=1&page_size=10
```

## Example Responses

**Status code: 200**

Response body for obtaining tasks

```
{
  "count" : 2,
  "tasks" : [ {
    "id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
    "name" : "qqqq_task",
    "service_id" : "xxxxxx-xxxxxx-xxxxxx-xxxx-xxxxx",
    "created_at" : "1686034773024",
    "state" : "PENDING",
    "video_source_name" : "url_test",
    "title" : "testwjh",
    "type" : "0",
    "algorithm_publish_id" : "xxxxxx-xxxxxx-xxxxxx-xxxx-xxxxx"
  }, {
    "id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
    "name" : "task_test1",
    "service_id" : "xxxxxx-xxxxxx-xxxxxx-xxxx-xxxxx",
    "created_at" : "1686027880205",
    "state" : "STOPPED",
    "video_source_name" : "test_g11",
    "title" : "alg_test",
    "type" : "0",
    "algorithm_publish_id" : "xxxxxx-xxxxxx-xxxxxx-xxxx-xxxxx"
  } ],
  "page" : 1,
  "page_size" : 10
}
```

## Status Codes

Status Code	Description
200	Response body for obtaining tasks
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.2.5 Deleting a Task

### Function

This API is used to delete tasks.

## URI

DELETE /v2/{project\_id}/tasks/{task\_id}

**Table 3-93** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
task_id	Yes	String	Task ID

## Request Parameters

**Table 3-94** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

**Status code: 400**

**Table 3-95** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-96** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to delete the task whose ID is *{task\_id}*.

```
/v2/{project_id}/tasks/{task_id}
```

```
https://{endpoint}/v2/{project_id}/tasks/{task_id}?
```

## Example Responses

None

## Status Codes

Status Code	Description
200	Operation successful
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.2.6 Obtaining Task Details

### Function

This API is used to obtain details about intelligent video analysis tasks.

### URI

```
GET /v2/{project_id}/tasks/{task_id}
```

**Table 3-97** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
task_id	Yes	String	Task ID

## Request Parameters

**Table 3-98** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

**Status code: 200**

**Table 3-99** Response body parameters

Parameter	Type	Description
id	String	Task ID
name	String	Task name
creator	String	Username of the task creator
project_id	String	Project ID of the task creator
description	String	Task description Minimum: <b>0</b> Maximum: <b>500</b>
release_id	String	ID of the service corresponding to a task
service_id	String	ID of the service corresponding to a task
created_at	String	Task creation time
updated_at	String	Time when the latest task status was updated

Parameter	Type	Description
state	String	Task status. The value can be <b>PENDING</b> , <b>RECOVERING</b> , <b>STARTING</b> , <b>UPGRADING</b> , <b>CREATE_FAILED</b> , <b>START_FAILED</b> , <b>RUNNING</b> , <b>STOPPING</b> , <b>STOPPED</b> , <b>ABNORMAL</b> , <b>SUCCEEDED</b> , <b>FAILED</b> , <b>DELETING</b> , <b>FREEZING</b> , or <b>FROZEN</b> .
status	String	Details about a task status (for some statuses only) Minimum: <b>0</b> Maximum: <b>4096</b>
error	<b>error</b> object	Error information
schedule_status	String	Status of a scheduled task. The value can be <b>ACTIVATED</b> or <b>INACTIVATED</b> .
schedule	<b>TaskSchedule</b> object	Task schedule. Only the weekly mode is supported.
input	<b>TaskInput</b> object	Input configuration of a task, which is mandatory.
output	<b>TaskOutputF orDisplay</b> object	Output configuration of a task
config	<b>TaskServiceC onfig</b> object	Task runtime parameters customized by the service publisher
video_source_name	String	Video source name
title	String	Algorithm name (CN)
group_name	String	Group name. Multiple values are separated by commas (,).
company	String	Vendor
task_config	String	Task algorithm configuration
type	String	<b>Cloud</b> or <b>edge</b>
resource_order_id	String	Resource order ID
package_id	String	Algorithm package ID
device_id	String	Device ID
access_addresses	String	Access address

Parameter	Type	Description
algorithm_publish_id	String	Algorithm ID

**Table 3-100** error

Parameter	Type	Description
code	String	Error code Minimum: <b>8</b> Maximum: <b>36</b>
message	String	Error description Minimum: <b>2</b> Maximum: <b>512</b>

**Table 3-101** TaskSchedule

Parameter	Type	Description
type	String	Type of a scheduled task. This parameter is mandatory for scheduled tasks. The value can be <b>weekly</b> , indicating that the task is executed every week.
timezone	String	Time zone where a user is located. This parameter is mandatory for scheduled tasks. The value is accurate to the minute.
days_of_week	Array of integers	Days in a week when a task is executed. This parameter is mandatory only for weekly tasks. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b> Array Length: <b>1 - 7</b>
days_of_month	Array of integers	Days in a month when a task is executed. This parameter is mandatory only for monthly tasks. The values <b>1</b> to <b>31</b> indicate the first day to the 31st day of a month. Currently, the system does not support this parameter. Minimum: <b>1</b> Maximum: <b>31</b>



Parameter	Type	Description
periods	Array<Array<>>	Time segment configuration. Select at least one time segment for executing a weekly or monthly task.

**Table 3-102** TaskInput

Parameter	Type	Description
type	String	<p>Task input type, which is mandatory when you create a task. The <b>video_source</b> type cannot be changed to other types. The following types are supported: <b>obs</b> (files stored in OBS, supported only by cloud tasks), <b>url</b> (specified file URL or stream request URL, supported only by cloud tasks), <b>edgcamera</b> (edge camera bound to IEF, supported only by edge tasks), <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs) <b>vcn</b> (VCN device, supported only by edge tasks), and <b>video_source</b> (video sources managed in VIAS, supported by both cloud and edge tasks). You are advised to use the <b>video_source</b> type. Other types will be discontinued in the future. The outputs of tasks whose input type is <b>obs</b>, <b>url</b>, <b>edgcamera</b>, or <b>restful</b> can be sent to webhook. Options:</p> <ul style="list-style-type: none"> <li>• <b>video_source</b></li> <li>• <b>obs</b> (not recommended and will be discontinued)</li> <li>• <b>url</b> (not recommended and will be discontinued)</li> <li>• <b>edgcamera</b> (not recommended and will be discontinued)</li> <li>• <b>restful</b> (not recommended and will be discontinued)</li> <li>• <b>vcn</b> (not recommended and will be discontinued)</li> </ul>

Parameter	Type	Description
data	Array of <b>TaskInputData</b> objects	Input details of a task, which is mandatory. The configuration varies depending on the input type. Multiple inputs are allowed during creation, but only one input is allowed for update. If the input type is <b>obs</b> , you must configure <b>bucket</b> , <b>path</b> , and <b>index</b> . Example: <b>bucket: aicam, path: 3rdpartylicenses.txt, index: 0</b> If the input type is <b>url</b> , you must configure <b>url</b> and <b>index</b> . Example: <b>url: https://xxx-xxx.com, index: 0</b> If the input type is <b>restful</b> , you must configure <b>certificate_check</b> , <b>rtsp_path_in_response</b> , <b>url</b> , <b>index</b> , and <b>headers</b> . Example: <b>certificate_check: true, url: https://hsaij-dasahbi.com, rtsp_path_in_response: data/url, index: 0, headers: { AAA: AAA }</b> If the input type is <b>vcn</b> , you must configure <b>device_id</b> , <b>stream_type</b> , and <b>index</b> . Example: <b>device_id: 21356478954612546874#gdhjkiushdgdksjhsmlhscjsckjhdbnk, stream_type: 1, index: 0</b> If the input type is <b>EdgeCamera</b> , you must configure <b>id</b> and <b>index</b> . Example: <b>id: 007cdfc-6000-47ce-b0e3-870b4a0db65e, index: 0</b> . Array Length: 1 - 50
vcn	<b>TaskInputVcn</b> object	VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 3-103** TaskInputData

Parameter	Type	Description
video_source_id	String	Video source ID. This parameter is mandatory when the input type is <b>video_source</b> .
stream_name	String	Name of a video stream
bucket	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>64</b>
path	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>

Parameter	Type	Description
url	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
rtsp_path_in_response	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
device_id	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	Integer	Stream type used for analysis. This parameter is mandatory when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>
certificate_check	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> . Default: <b>false</b>

**Table 3-104** TaskInputVcn

Parameter	Type	Description
ip	String	IP address of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Type	Description
port	Integer	Port number of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	String	Account name of a VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . The value must match the regular expression <b>^.{1,100}\$</b> .
password	String	Password of a VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> . The value must match the regular expression <b>^.{1,1000}\$</b> .

**Table 3-105** TaskOutputForDisplay

Parameter	Type	Description
obs	<b>TaskOutputObs</b> object	Configuration information when the output type is <b>obs</b> .
dis	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	Boolean	Whether to associate the event center with task outputs

**Table 3-106** TaskOutputObs

Parameter	Type	Description
bucket	String	OBS bucket name. This parameter is mandatory when the OBS output type is used. The verification rule is ( <b>pattern:</b> " <b>^[a-z0-9](?![-./])([a-z0-9-]{1,61})[a-z0-9]\$</b> "). Maximum: <b>63</b>
path	String	OBS path. This parameter is mandatory when the OBS output type is used. The verification rule is <b>^(?![/\s])(?!\\.)([^\s?*&lt;&gt; \]{0,1023})?&lt;![\s])\$</b> . Maximum: <b>1023</b>

Parameter	Type	Description
data_category	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-107** TaskOutputDis

Parameter	Type	Description
stream_name	String	Name of a DIS stream. This parameter is mandatory when the DIS output type is used. The verification rule is <code>^[-A-Za-z0-9_]{1,64}\$</code> . Maximum: <b>64</b>
data_category	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. For example, in the API for creating edge face-related tasks, the output contains <b>dataCategory</b> , with a value range of <b>[FacelImage, OriginImage]</b> , indicating whether to send the face image or original image. Array Length: <b>0 - 10</b>

**Table 3-108** TaskOutputWebhook

Parameter	Type	Description
url	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-109** TaskServiceConfig

Parameter	Type	Description
common	Object	Task runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Status code: 400**

**Table 3-110** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-111** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to obtain task details including the task name, input mode, and output mode.

```
/v2/{project_id}/tasks/{task_id}
https://{endpoint}/v2/{project_id}/tasks/{task_id}?
```

## Example Responses

**Status code: 200**

Task details

```
{
  "id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
  "name" : "qqqq_task",
  "creator" : "test",
  "project_id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
  "release_id" : "xxxxxxx-xxxxxxx-xxxxxxx-xxxxx-xxxxxxx",
  "service_id" : "xxxxxxx-xxxxxxx-xxxxxxx-xxxxx-xxxxxxx",
  "created_at" : "2023-06-06T06:59:33.024Z",
  "updated_at" : "2023-06-06T06:59:33.024Z",
  "event_type" : 0,
  "priority" : "low",
  "steal" : 0,
  "state" : "PENDING",
  "input" : {
    "type" : "video_source",
    "data" : [ {
      "video_source_id" : "xxxxxxx-xxxxxxx-xxxxxxx-xxxxx-xxxxxxx"
    } ]
  },
  "output" : {
    "event_center" : true
  },
  "config" : {
    "common" : { }
  },
  "video_source_name" : "url_test",
  "task_config" : "<?xml version='1.0' encoding='UTF-8'?><algorithm><config><common><param
titleCn='platform' name='platform' required='false' titleEn='platform' type='Object'><param
titleCn='project_id' name='project_id' required='false' titleEn='project_id' type='String'><param
titleCn='domain_name' name='domain_name' required='false' titleEn='domain_name' type=
'String'><param titleCn='agency_name' name='agency_name' required='false' titleEn=
'agency_name' type='String'><param titleCn='domain_id' name='domain_id' required='false'
titleEn='domain_id' type='String'><param titleCn='task_id' name='task_id' required='false'
titleEn='task_id' type='String'></param></common></config></algorithm>",
  "type" : "0",
  "package_id" : "xxxxxxx-xxxxxxx-xxxxxxx-xxxxx-xxxxxxx"
}
```

## Status Codes

Status Code	Description
200	Task details
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.2.7 Adding a Batch Task

### Function

This API is used to add a batch task.

### URI

POST /v2/{project\_id}/batch-tasks

**Table 3-112** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .

### Request Parameters

**Table 3-113** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-114** Request body parameters

Parameter	Mandatory	Type	Description
name	Yes	String	Task name. It can contain up to 100 characters and can include letters, digits, hyphens (-), and underscores (_).
description	No	String	Task description, which is optional. Enter a maximum of 500 characters. Minimum: <b>0</b> Maximum: <b>500</b>
schedule	No	<a href="#">TaskSchedule</a> object	Task schedule. Only the weekly mode is supported.



Parameter	Mandatory	Type	Description
batch_input	Yes	<b>BatchTaskInputDto</b> object	Batch task input
output	Yes	<b>TaskOutput</b> object	Output configuration of a task. At least one output mode must be configured.
config	No	<b>TaskServiceConfig</b> object	Task configuration parameters
service_name	Yes	String	Algorithm API ID, which must match the regular expression $^[\u4E00-\u9FA5a-zA-Z0-9_-]{1,100}$$ . Minimum: 1 Maximum: 100
service_version	Yes	String	Service version. The value must match the regular expression $^[a-z0-9.]{3,32}$$ . Minimum: 3 Maximum: 32
is_saved_as_template	No	Boolean	Whether to save as a template Default: <b>false</b>
resource_order_id	No	String	Resource order ID, which corresponds to the associated algorithm. This parameter is only mandatory for commercial algorithms and must match the regular expression $^[a-z0-9_-]{4,36}$$ . Minimum: 4 Maximum: 36

**Table 3-115** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled task. This parameter is mandatory for scheduled tasks. The value can be <b>weekly</b> , indicating that the task is executed every week.

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled tasks. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a task is executed. This parameter is mandatory only for weekly tasks. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b> Array Length: <b>1 - 7</b>
days_of_month	No	Array of integers	Days in a month when a task is executed. This parameter is mandatory only for monthly tasks. The values <b>1</b> to <b>31</b> indicate the first day to the 31st day of a month. Currently, the system does not support this parameter. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array<>>	Time segment configuration. Select at least one time segment for executing a weekly or monthly task.

**Table 3-116** BatchTaskInputDto

Parameter	Mandatory	Type	Description
video_source_group	No	Array of <a href="#">BatchTaskVideoSourceGroupDto</a> objects	Video source group information Array Length: <b>1 - 100</b>

**Table 3-117** BatchTaskVideoSourceGroupDto

Parameter	Mandatory	Type	Description
video_source_group_id	Yes	String	Video source group ID

Parameter	Mandatory	Type	Description
video_source_list	Yes	Array of <a href="#">BatchTaskInputVideoSourceDto</a> objects	Video sources Array Length: <b>0 - 100</b>

**Table 3-118** BatchTaskInputVideoSourceDto

Parameter	Mandatory	Type	Description
video_source_id	Yes	String	Video source ID
target_roi	No	String	ROI Minimum: <b>0</b> Maximum: <b>2048</b>

**Table 3-119** TaskOutput

Parameter	Mandatory	Type	Description
obs	No	<a href="#">TaskOutputObs</a> object	Configuration information when the output type is <b>obs</b> .
dis	No	<a href="#">TaskOutputDis</a> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<a href="#">TaskOutputWebhook</a> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to set the output mode to <b>Event Center</b> . <b>true</b> or <b>1</b> indicates yes. <b>false</b> indicates no. Default: <b>false</b>

**Table 3-120** TaskOutputObs

Parameter	Mandatory	Type	Description
bucket	Yes	String	OBS bucket name. This parameter is mandatory when the OBS output type is used. The verification rule is <b>(pattern: "^[a-z0-9](?![-./][-./])([a-z0-9-]{1,61})[a-z0-9]\$")</b> . Maximum: <b>63</b>
path	Yes	String	OBS path. This parameter is mandatory when the OBS output type is used. The verification rule is <b>^(?![/\s])(?!./)([^\:*?"&lt;&gt; \]{0,1023})(?&lt;![\s])\$</b> . Maximum: <b>1023</b>
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-121** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	Name of a DIS stream. This parameter is mandatory when the DIS output type is used. The verification rule is <b>^[-A-Za-z0-9_]{1,64}\$</b> . Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. For example, in the API for creating edge face-related tasks, the output contains <b>dataCategory</b> , with a value range of <b>[FacelImage, OriginImage]</b> , indicating whether to send the face image or original image. Array Length: <b>0 - 10</b>

**Table 3-122** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-123** TaskServiceConfig

Parameter	Mandatory	Type	Description
common	No	Object	Task runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

## Response Parameters

**Status code: 200**

**Table 3-124** Response body parameters

Parameter	Type	Description
total_count	Integer	Total number of tasks
failed_count	Integer	Number of failed tasks
succeed_count	Integer	Number of successfully executed tasks
id	String	Batch task ID
error_list	Array of strings	Error information list

**Status code: 400**

**Table 3-125** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-126** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request adds a batch task named **wdwd**. The smoke and fire detection algorithm is used, with version 1.0. The vendor is **VIAS**. The configuration is not saved as a template. The input mode is **video\_source**. The output mode is **webhook**. The task startup parameters are configured.

```

/v2/{project_id}/batch-tasks
{
  "name" : "wdwd",
  "service_name" : "Smoke and fire detection algorithm",
  "service_version" : "1.0",
  "manufacturer" : "VIAS",
  "is_saved_as_template" : false,
  "description" : "",
  "priority" : "low",
  "batch_input" : {
    "video_source_group" : [ {
      "video_source_group_id" : "xxxxxxxx-xxxxxxxx-xxxxxxxx-xxxxx-xxxxxx",
      "video_source_list" : [ {
        "video_source_id" : "xxxxxxxx-xxxxxxxx-xxxxxxxx-xxxxx-xxxxxx"
      } ]
    } ]
  },
  "output" : {
    "webhook" : {
      "url" : "http://test",
      "headers" : {
        "a" : "a"
      }
    }
  },
  "config" : {
    "common" : {
      "render_result_sw" : 1,
      "fire_detection_sw" : 1,
      "smoke_detection_sw" : 1
    }
  }
}

```

## Example Responses

### Status code: 200

Response to a batch operation request

```
{
  "total_count": 1,
  "failed_count": 0,
  "succeed_count": 1,
  "id": "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
  "error_list": []
}
```

## Status Codes

Status Code	Description
200	Response to a batch operation request
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.2.8 Starting or Stopping a Batch Task

### Function

This API is used to start or stop a batch task.

### URI

PUT /v2/{project\_id}/batch-tasks/{id}/action/{command}

**Table 3-127** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
id	Yes	String	Batch task ID
command	Yes	String	API's action for a batch task. The value can be <b>start</b> or <b>stop</b> .



## Request Parameters

**Table 3-128** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

**Status code: 200**

**Table 3-129** Response body parameters

Parameter	Type	Description
total_count	Integer	Total number of tasks
failed_count	Integer	Number of failed tasks
succeed_count	Integer	Number of successfully executed tasks
id	String	Batch task ID
error_list	Array of strings	Error information list

**Status code: 400**

**Table 3-130** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-131** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to start or stop the batch task whose ID is *{id}*.

```
/v2/{project_id}/batch-tasks/{id}/action/{command}
```

```
https://{endpoint}/v2/{project_id}/batch-tasks/0d47bbf52962414bb7ae27fb6ea24230/action/{command}?
```

## Example Responses

**Status code: 200**

Response to a batch operation request

```
{
  "total_count" : 1,
  "failed_count" : 0,
  "succeed_count" : 1,
  "id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
  "error_list" : [ ]
}
```

## Status Codes

Status Code	Description
200	Response to a batch operation request
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.2.9 Modifying a Batch Task

### Function

This API is used to modify a batch task.

### URI

PUT /v2/{project\_id}/batch-tasks/{id}

**Table 3-132** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
id	Yes	String	Batch task ID

### Request Parameters

**Table 3-133** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-134** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Task name, which is mandatory. Enter 1 to 100 characters. Only letters, digits, hyphens (-), and underscores (_) are allowed.
description	No	String	Task description, which is optional. Enter a maximum of 500 characters. Minimum: <b>0</b> Maximum: <b>500</b>
schedule	No	<a href="#">TaskSchedule</a> object	Scheduled task parameters

Parameter	Mandatory	Type	Description
batch_input	No	<a href="#">BatchTaskInputDto</a> object	Input configuration of a task
output	No	<a href="#">TaskOutput</a> object	Output configuration of a task
config	No	<a href="#">TaskServiceConfig</a> object	Task configuration parameters
is_saved_as_template	No	Boolean	Whether to save as a template Default: <b>false</b>
resource_order_id	No	String	Resource order ID, which corresponds to the associated algorithm. This parameter is only mandatory for commercial algorithms and must match the regular expression <code>^[a-z0-9-]{4,36}\$</code> .

**Table 3-135** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled task. This parameter is mandatory for scheduled tasks. The value can be <b>weekly</b> , indicating that the task is executed every week.
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled tasks. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a task is executed. This parameter is mandatory only for weekly tasks. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b> Array Length: <b>1 - 7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a task is executed. This parameter is mandatory only for monthly tasks. The values <b>1</b> to <b>31</b> indicate the first day to the 31st day of a month. Currently, the system does not support this parameter. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array<>>	Time segment configuration. Select at least one time segment for executing a weekly or monthly task.

**Table 3-136** BatchTaskInputDto

Parameter	Mandatory	Type	Description
video_source_group	No	Array of <a href="#">BatchTaskVideoSourceGroupDto</a> objects	Video source group information Array Length: <b>1 - 100</b>

**Table 3-137** BatchTaskVideoSourceGroupDto

Parameter	Mandatory	Type	Description
video_source_group_id	Yes	String	Video source group ID
video_source_list	Yes	Array of <a href="#">BatchTaskInputVideoSourceDto</a> objects	Video sources Array Length: <b>0 - 100</b>

**Table 3-138** BatchTaskInputVideoSourceDto

Parameter	Mandatory	Type	Description
video_source_id	Yes	String	Video source ID

Parameter	Mandatory	Type	Description
target_roi	No	String	ROI Minimum: <b>0</b> Maximum: <b>2048</b>

**Table 3-139** TaskOutput

Parameter	Mandatory	Type	Description
obs	No	<b>TaskOutputObs</b> object	Configuration information when the output type is <b>obs</b> .
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to set the output mode to <b>Event Center</b> . <b>true</b> or <b>1</b> indicates yes. <b>false</b> indicates no. Default: <b>false</b>

**Table 3-140** TaskOutputObs

Parameter	Mandatory	Type	Description
bucket	Yes	String	OBS bucket name. This parameter is mandatory when the OBS output type is used. The verification rule is <b>(pattern: "^[a-z0-9](?![-./[-./])([a-z0-9-]{1,61})[a-z0-9]\$ ")</b> . Maximum: <b>63</b>
path	Yes	String	OBS path. This parameter is mandatory when the OBS output type is used. The verification rule is <b>^(?![./\s])(?!./)([^\s?*&lt;&gt; ]{0,1023})?&lt;![./\s]\$</b> . Maximum: <b>1023</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-141** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	Name of a DIS stream. This parameter is mandatory when the DIS output type is used. The verification rule is <b>^[<b>-A-Za-z0-9_</b>]{1,64}\$</b> . Maximum: <b>64</b>
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. For example, in the API for creating edge face-related tasks, the output contains <b>dataCategory</b> , with a value range of [ <b>FacelImage, OriginImage</b> ], indicating whether to send the face image or original image. Array Length: <b>0 - 10</b>

**Table 3-142** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>

Parameter	Mandatory	Type	Description
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of task output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list. Array Length: <b>0 - 10</b>

**Table 3-143** TaskServiceConfig

Parameter	Mandatory	Type	Description
common	No	Object	Task runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

## Response Parameters

Status code: 200

**Table 3-144** Response body parameters

Parameter	Type	Description
total_count	Integer	Total number of tasks
failed_count	Integer	Number of failed tasks
succeed_count	Integer	Number of successfully executed tasks
id	String	Batch task ID



Parameter	Type	Description
error_list	Array of strings	Error information list

**Status code: 400**

**Table 3-145** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-146** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request modifies a batch task named **wdwd**. The smoke and fire detection algorithm is used, with version 1.0. The vendor is **VIAS**. The configuration is not saved as a template. The input mode is **video\_source**. The output mode is **webhook**. The task startup parameters are configured.

```
/v2/{project_id}/batch-tasks/{id}
```

```
{
  "name" : "wdwdx",
  "service_name" : "Smoke and fire detection algorithm",
  "service_version" : "1.0",
  "manufacturer" : "VIAS",
  "priority" : "low",
  "is_saved_as_template" : false,
  "description" : "",
  "batch_input" : {
    "video_source_group" : [ {
      "video_source_group_id" : "xxxxxxxx-xxxxxx-xxxxxx-xxxx-xxxx",
      "video_source_list" : [ {
        "video_source_id" : "xxxxxxxx-xxxxxx-xxxxxx-xxxx-xxxx"
      } ]
    } ]
  },
  "output" : {
    "webhook" : {
      "url" : "http://test",
      "headers" : {
        "a" : "a"
      }
    }
  },
  "config" : {
    "common" : {
      "render_result_sw" : 1,
      "fire_detection_sw" : 1,
      "smoke_detection_sw" : 1
    }
  }
}
```

## Example Responses

### Status code: 200

Response to a batch operation request

```
{
  "total_count" : 1,
  "failed_count" : 0,
  "succeed_count" : 1,
  "id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
  "error_list" : [ ]
}
```

## Status Codes

Status Code	Description
200	Response to a batch operation request
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.2.10 Deleting a Batch Task

### Function

This API is used to delete a batch task.

### URI

DELETE /v2/{project\_id}/batch-tasks/{id}

**Table 3-147** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
id	Yes	String	Batch task ID

### Request Parameters

**Table 3-148** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

### Response Parameters

**Status code: 200**

**Table 3-149** Response body parameters

Parameter	Type	Description
total_count	Integer	Total number of tasks
failed_count	Integer	Number of failed tasks
succeed_count	Integer	Number of successfully executed tasks
id	String	Batch task ID
error_list	Array of strings	Error information list

**Status code: 400**

**Table 3-150** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-151** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

### Example Requests

This request is used to delete the batch task whose ID is *{id}*.

`https://xxxxt/v2/xxx/batch-tasks/xxx?`

### Example Responses

**Status code: 200**

Response to a batch operation request

```
{
  "total_count": 2,
  "failed_count": 0,
  "succeed_count": 2,
  "id": "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
}
```

```
"error_list" : [ ]
}
```

## Status Codes

Status Code	Description
200	Response to a batch operation request
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

### 3.2.11 Obtaining Batch Tasks

#### Function

This API is used to obtain batch tasks.

#### URI

GET /v2/{project\_id}/batch-tasks

**Table 3-152** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .

**Table 3-153** Query Parameters

Parameter	Mandatory	Type	Description
is_paged	No	Boolean	Whether to display records on different pages Default: <b>true</b>
page_size	No	Integer	Number of records displayed on each page Minimum: <b>5</b> Maximum: <b>200</b> Default: <b>10</b>

Parameter	Mandatory	Type	Description
page_num	No	Integer	Page number Minimum: <b>1</b> Maximum: <b>10000</b> Default: <b>1</b>
order_by	No	String	Ascending or descending order. The value can be <b>asc</b> or <b>desc</b> . Default: <b>desc</b>
sort_name	No	String	Sorting field. The value can be <b>task_count</b> or <b>created_at</b> . Default: <b>created_at</b>
video_group	No	String	Video source group list. Use commas (,) to separate multiple groups. The value must match the regular expression <b>^[a-zA-Z0-9\u4e00-\u9fa5,-]{1,1000}\$</b> . Minimum: <b>1</b> Maximum: <b>1000</b>
task_state	No	String	Task status. The value can be <b>pending, recovering, starting, upgrading, create_failed, start_failed, running, stopping, stopped, abnormal, succeeded, failed, deleting, freezing, frozen, stopped_no_service, scheduling, or lack_of_resources</b> .
type_like	No	String	Fuzzy search field. The value can be <b>batch_task_name</b> or <b>publish_service_name</b> .
name_like	No	String	Name for fuzzy search. This parameter must be used together with <b>type_like</b> to determine whether to perform fuzzy search based on <b>batch_task_name</b> or <b>publish_service_name</b> . Minimum: <b>0</b> Maximum: <b>100</b>

Parameter	Mandatory	Type	Description
manufacturer	No	String	Filter by vendor. The value must match the regular expression <code>^[a-zA-Z0-9\u4e00-\u9fa5,-_]{2,64}\$</code> . Minimum: 2 Maximum: 64
title	No	String	Algorithm name, which must match the regular expression <code>^[a-zA-Z0-9\u4e00-\u9fa5,-_]{2,64}\$</code> . Minimum: 2 Maximum: 64

## Request Parameters

Table 3-154 Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

Status code: 200

Table 3-155 Response body parameters

Parameter	Type	Description
count	Integer	Total number of records
batch_task_list	Array of <a href="#">BatchTaskDto</a> objects	Batch tasks

Table 3-156 BatchTaskDto

Parameter	Type	Description
id	String	Batch task ID

Parameter	Type	Description
batch_task_name	String	Batch task name
video_source_name	String	Video source name
video_group_name	String	Group name
alg_name	String	Algorithm name
company	String	Vendor name
type	String	Task type
num_task	Integer	Total number of batch tasks
created_at	Long	Creation time
batch_task_status_info	<a href="#">BatchTaskStatusInfoDto</a> object	Batch task status information

**Table 3-157** BatchTaskStatusInfoDto

Parameter	Type	Description
pending	Integer	Number of pending tasks
recovering	Integer	Number of tasks being restored
starting	Integer	Number of tasks being started
upgrading	Integer	Number of tasks being upgraded
create_failed	Integer	Number of tasks that failed to be created
start_failed	Integer	Number of tasks that failed to be started
running	Integer	Number of running tasks
stopping	Integer	Number of tasks being stopped
stopped	Integer	Number of stopped tasks
abnormal	Integer	Number of abnormal tasks
succeeded	Integer	Number of successfully executed tasks
failed	Integer	Number of failed tasks
deleting	Integer	Number of tasks being deleted
freezing	Integer	Number of tasks being frozen
frozen	Integer	Number of frozen tasks



Parameter	Type	Description
stopped_no_service	Integer	Number of tasks that are pending after the service is redeployed
scheduling	Integer	Scheduling
lack_of_resources	Integer	Failed to create the batch task due to insufficient resources.

**Status code: 400**

**Table 3-158** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-159** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to obtain batch task information, including the batch task name, video source group, algorithm service name, configuration type, number of tasks, creation time, and task status.

```
https://xxx/v2/xxx/batch-tasks?page_num=1&page_size=10
```

## Example Responses

**Status code: 200**

Response to a batch operation request

```
{
  "count" : 2,
  "batch_task_list" : [ {
    "id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
    "batch_task_name" : "qqqq",
    "video_group_name" : "2312,1889,927,914",
    "alg_name" : "testwjh",
    "type" : "0",
    "priority" : "low",
    "num_task" : 3,
    "created_at" : 1685667905165,
    "batch_task_status_info" : {
      "stopped" : 3
    }
  }, {
    "id" : "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx",
    "batch_task_name" : "qqq",
    "video_group_name" : "2312",
    "alg_name" : "testwjh",
    "type" : "0",
    "priority" : "low",
    "num_task" : 1,
    "created_at" : 1685667856283,
    "batch_task_status_info" : {
      "running" : 1
    }
  }
  ]
}
```

## Status Codes

Status Code	Description
200	Response to a batch operation request
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.3 Algorithm Center

### 3.3.1 Deploying an Algorithm

#### Function

This API is used to deploy an algorithm.

#### URI

POST /v2/{project\_id}/algorithm/{alg\_id}/deploy

**Table 3-160** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
alg_id	Yes	String	Algorithm ID

#### Request Parameters

**Table 3-161** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-162** Request body parameters

Parameter	Mandatory	Type	Description
pool_id	No	String	Resource pool ID. This parameter is mandatory when the service status is <b>Not deployed</b> .
stream_count	Yes	Integer	Number of video stream channels Minimum: <b>1</b> Maximum: <b>10000</b>

Parameter	Mandatory	Type	Description
deploy_config	No	Object	Service startup parameter, which must be configured based on the model deployment constraints. The type is <b>Map&lt;String, Object&gt;</b> . This parameter is optional and is left blank by default. To ensure data security, do not enter sensitive information, such as plaintext passwords, in environment variables.
envs	No	Object	Environment variable key-value pair required for running a service. The type is <b>Map&lt;String, String&gt;</b> . This parameter is optional and is left blank by default. To ensure data security, do not enter sensitive information, such as plaintext passwords, in environment variables.

## Response Parameters

Status code: 200

Table 3-163 Response body parameters

Parameter	Type	Description
alg_name	String	Algorithm name

## Example Requests

This request is used to deploy an algorithm. In the request body, the resource pool ID, maximum number of stream channels, and service startup parameters are configured.

```
GET https://{endpoint}/v2/{project_id}/algorithm/068ed4d8-077e-4ec9-aa19-bc*****e925/deploy
{
  "pool_id" : "ed9f128bf7d04f5683f0ef*****a255",
  "stream_count" : 1,
  "deploy_config" : {
    "sub_scene" : "common"
  }
}
```

## Example Responses

### Status code: 200

Response body for deploying an algorithm

```
{
  "alg_name" : "Intrusion detection"
}
```

## Status Codes

Status Code	Description
200	Response body for deploying an algorithm
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.3.2 Stopping Algorithm Deployment

### Function

This API is used to stop algorithm deployment.

### URI

PUT /v2/{project\_id}/algorithm/{alg\_id}/deploy/stop

**Table 3-164** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
alg_id	Yes	String	Algorithm ID

## Request Parameters

**Table 3-165** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

Status code: 200

**Table 3-166** Response body parameters

Parameter	Type	Description
alg_id	String	Algorithm ID

## Example Requests

This request is used to stop algorithm deployment.

```
GET https://{endpoint}/v2/{project_id}/algorithm/068ed4d8-077e-4ec9-aa19-bc*****e925/deploy/stop
```

## Example Responses

Status code: 200

Response body for stopping algorithm deployment

```
{
  "alg_id" : "068ed4d8-077e-4ec9-aa19-bc*****e925"
}
```

## Status Codes

Status Code	Description
200	Response body for stopping algorithm deployment
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

### 3.3.3 Obtaining Service Details

#### Function

This API is used to obtain service details.

#### URI

GET /v2/{project\_id}/algorithm/services/{service\_id}

**Table 3-167** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
service_id	Yes	String	Service ID

#### Request Parameters

**Table 3-168** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

#### Response Parameters

Status code: 200

**Table 3-169** Response body parameters

Parameter	Type	Description
service_id	String	Service ID
service_name	String	Service name
logo	String	Algorithm logo, which is a Base64-encoded string. This parameter is returned when it is not empty.
function_version	String	Service version

Parameter	Type	Description
release_flag	Boolean	Whether the service has been released. The value can be <b>true</b> or <b>false</b> .
description	String	Algorithm description. This parameter is returned when it is not empty.
created_at	Long	Creation time
updated_at	Long	Update time
release_at	Long	Release time
api	String	API
pool_id	String	Resource pool ID
alg_name	String	Algorithm name
alg_id	String	Algorithm ID
request_mode	String	Request mode. The value can be <b>sync</b> or <b>async</b> .
package_name	String	Algorithm package name
package_id	String	Algorithm package ID
alg_version	String	Algorithm version
alg_versions	Array of strings	Algorithm versions
diagram	String	Algorithm scenario diagram, which is a Base64-encoded string. This parameter is returned when it is not empty.
service_api_list	Array of <b>ServiceApiDto</b> objects	Service API list
deployment_constraints	<b>DeploymentConstraintsDto</b> object	Model deployment constraints
company	String	Vendor name
tags	Array of strings	Application scenario tag
deploy_type	String	Deployment type. The value can be <b>cloud</b> or <b>edge</b> .
alg_class	String	Algorithm type. The value can be <b>self</b> or <b>partner</b> .



Parameter	Type	Description
alg_status	String	Algorithm status. The value can be <b>service_running</b> , <b>service_deploying</b> , <b>service_failed</b> , <b>service_stopping</b> , <b>service_stopped</b> , <b>service_upgrading</b> , <b>service_finished</b> , <b>service_concerning</b> or "not_deployed".
error_msg	String	Service exception information. This parameter is returned when it is not empty.

**Table 3-170** ServiceApiDto

Parameter	Type	Description
request_type	String	Request type, which can be <b>get</b> or <b>post</b> .
zh	String	Description (CN)
en	String	Description
request_url	String	Request URL

**Table 3-171** DeploymentConstraintsDto

Parameter	Type	Description
request_mode	String	Request mode. The value can be <b>sync</b> or <b>async</b> .
cpu_type	String	CPU type. The value can be <b>x86_64</b> or <b>aarch64</b> .
accelerators	Array of <b>Accelerators Dto</b> objects	Inference accelerator
input_types	Array of strings	Supported input type. The value can be <b>OBS</b> , <b>URL</b> , <b>Restful</b> , <b>VCN</b> , or <b>EdgeCamera</b> .
output_types	Array of strings	Supported output type. The value can be <b>OBS</b> , <b>DIS</b> , or <b>Webhook</b> .
service_config	String	Service startup parameters
task_config	String	Task configuration parameters

**Table 3-172** AcceleratorsDto

Parameter	Type	Description
type	String	Accelerator card type Minimum: <b>1</b> Maximum: <b>256</b>
name	String	Accelerator card name Minimum: <b>1</b> Maximum: <b>256</b>
cuda_version	String	CUDA version Minimum: <b>1</b> Maximum: <b>256</b>
driver_version_section	String	Ascend driver version Minimum: <b>1</b> Maximum: <b>256</b>

## Example Requests

This request is used to obtain service details.

```
GET https://{endpoint}/v2/{project_id}/algorithm/services/331bcb4a-5b3c-4e67-87cc-6c*****d77b
```

## Example Responses

**Status code: 200**

Response body for obtaining service details

```
{
  "service_id": "331bcb4a-5b3c-4e67-87cc-6c*****d77b",
  "service_name": "Edge Intrusion Detection",
  "logo": "data:image/png;base64,xxxxxx",
  "function_version": "1.0",
  "release_flag": true,
  "created_at": 1680008856502,
  "updated_at": 1680004378199,
  "release_at": 1680004378199,
  "api": "c-int*****ion-edge",
  "pool_id": "ed9f128bf7d04f5683f0ef*****a255",
  "alg_name": "Edge Intrusion Detection",
  "alg_id": "068ed4d8-077e-4ec9-aa19-bc*****e925",
  "package_id": "9a2423e3-02d3-4305-b491-d6*****51bd",
  "alg_version": "1.0.1",
  "alg_versions": [ ],
  "diagram": "data:image/png;base64,xxxxxx",
  "service_api_list": [ {
    "request_type": "POST",
    "zh": "Creating a Task",
    "en": "create task",
    "request_url": "/v2/41be0da3412b4a569409dcec43983908/services/c-int*****ion-edge/tasks"
  }, {
    "request_type": "GET",
    "zh": "Task details",
    "en": "task detail",
  } ]
}
```

```

"request_url" : "/v2/41be0da3412b4a569409dcec43983908/tasks/{task_id}"
}, {
  "request_type" : "GET",
  "zh" : "Task list",
  "en" : "task list",
  "request_url" : "/v2/41be0da3412b4a569409dcec43983908/tasks"
}, {
  "request_type" : "DELETE",
  "zh" : "Deleting a Task",
  "en" : "delete task",
  "request_url" : "/v2/41be0da3412b4a569409dcec43983908/tasks/{task_id}"
}, {
  "request_type" : "PUT",
  "zh" : "Starting a task",
  "en" : "start task",
  "request_url" : "/v2/41be0da3412b4a569409dcec43983908/tasks/{task_id}/action/start"
}, {
  "request_type" : "PUT",
  "zh" : "Stopping a task",
  "en" : "stop task",
  "request_url" : "/v2/41be0da3412b4a569409dcec43983908/tasks/{task_id}/action/stop"
} ],
"deployment_constraints" : {
  "request_mode" : "async",
  "cpu_type" : "x86_64",
  "accelerators" : [ {
    "type" : "gp",
    "name" : "Tnt004",
    "cuda_version" : "cuda 10.2"
  } ],
  "input_types" : [ "Restful", "VCN", "EdgeCamera" ],
  "output_types" : [ "Webhook" ],
  "service_config" : "<?xml version='1.0' encoding='UTF-8'?><algorithm><deployConfig> <param
name='sub_scene' titleCn='Sub scenario' titleEn='sub scene' required='false' type='String'
default='common'/></deployConfig></algorithm>",
  "task_config" : "<algorithm><config><common/></config></algorithm>"
},
"alg_scene" : "other",
"deploy_type" : "edge"
}

```

## Status Codes

Status Code	Description
200	Response body for obtaining service details
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

### 3.3.4 Obtaining Your Algorithm Services

#### Function

This API is used to obtain your algorithm services.

## URI

GET /v2/{project\_id}/algorithm/services/user

**Table 3-173** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .

**Table 3-174** Query Parameters

Parameter	Mandatory	Type	Description
name_like	No	String	Service name. Fuzzy match is supported.
is_paged	No	Boolean	Whether to display records on different pages Default: <b>false</b>
page_size	No	Integer	Maximum number of records on each page Minimum: <b>5</b> Maximum: <b>200</b> Default: <b>10</b>
page_num	No	Integer	Page number Minimum: <b>1</b> Maximum: <b>10000</b> Default: <b>1</b>
order_by	No	String	Sorting order. The value can be <b>asc</b> or <b>desc</b> , indicating ascending or descending order. Default: <b>desc</b>
sort_name	No	String	Sorting parameter. The value can be <b>created_at</b> or <b>function_version</b> . Default: <b>created_at</b>

Parameter	Mandatory	Type	Description
alg_status	No	Array	Service status. Multiple options can be selected. Options: <b>service_running</b> , <b>service_deploying</b> , <b>service_failed</b> , <b>service_stopping</b> , <b>service_stopped</b> , <b>service_upgrading</b> , <b>service_finished</b> , <b>service_concerning</b> , and <b>not_deployed</b> .

## Request Parameters

**Table 3-175** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

Status code: 200

**Table 3-176** Response body parameters

Parameter	Type	Description
count	Integer	Number of filtered algorithms
service_list	Array of <a href="#">ServicesListInfoDto</a> objects	Service list
total	Integer	Total number of your algorithms

**Table 3-177** ServicesListInfoDto

Parameter	Type	Description
alg_id	String	Algorithm ID
service_id	String	Service ID

Parameter	Type	Description
service_name	String	Service name
package_id	String	Algorithm service package ID
package_name	String	Algorithm service package name
company	String	Vendor name
alg_version	String	Algorithm version
function_version	String	Service version
tags	Array of strings	Application scenario tag
created_at	Long	Creation time
alg_status	String	Algorithm status. The value can be <b>service_running</b> , <b>service_deploying</b> , <b>service_failed</b> , <b>service_stopping</b> , <b>service_stopped</b> , <b>service_upgrading</b> , <b>service_finished</b> , <b>service_concerning</b> or "not_deployed".
deploy_type	String	Deployment type. The value can be <b>cloud</b> or <b>edge</b> .
alg_class	String	Algorithm type. The value can be <b>self</b> or <b>partner</b> .
request_mode	String	Request mode. The value can be <b>sync</b> or <b>async</b> .
description	String	Algorithm description. This parameter is returned when it is not empty.
error_msg	String	Service exception information. This parameter is returned when it is not empty.
can_update	Boolean	Whether the algorithm can be upgraded. This parameter is returned when the value is <b>true</b> .
new_alg_id	String	Algorithm ID after the upgrade. This parameter is returned when the algorithm can be upgraded.

## Example Requests

This request is used to obtain algorithm services in **Running**, **Stop**, or **Deployment failed**.

```
GET https://{endpoint}/v2/{project_id}/algorithm/services/user?
alg_status=service_running&alg_status=service_stopped&alg_status=service_failed
```

## Example Responses

### Status code: 200

Request body for obtaining algorithm services

```
{
  "count" : 3,
  "service_list" : [ {
    "alg_id" : "068ed4d8-077e-4ec9-aa19-bc*****e925",
    "service_id" : "331bcb4a-5b3c-4e67-87cc-6c*****d77b",
    "service_name" : "Edge Intrusion Detection",
    "function_version" : "1.0",
    "created_at" : 1680008856502,
    "alg_status" : "service_running",
    "deploy_type" : "edge",
    "alg_class" : "self",
    "request_mode" : "async",
    "can_update" : true,
    "new_alg_id" : "3320b2b9-562b-4bee-bfee-0e*****01c1"
  }, {
    "alg_id" : "5c73bd3f-6498-40e5-a40f-7b*****1139",
    "service_id" : "04dc08b7-da07-46ee-83e7-c3*****f668",
    "service_name" : "test-event-01",
    "function_version" : "1.0",
    "created_at" : 1680005185627,
    "alg_status" : "service_stopped",
    "deploy_type" : "cloud",
    "alg_class" : "self",
    "request_mode" : "async"
  }, {
    "alg_id" : "c01ec07f-874f-42f1-ba1d-15*****d71b",
    "service_id" : "db1ec2d2-d023-4d20-ab6f-bc*****4eeb",
    "service_name" : "TEST-CLOUD-ALG",
    "function_version" : "1.0",
    "created_at" : 1680008219078,
    "alg_status" : "service_failed",
    "deploy_type" : "cloud",
    "alg_class" : "self",
    "request_mode" : "async",
    "description" : "Cloud algorithm for testing"
  } ],
  "total" : 3
}
```

## Status Codes

Status Code	Description
200	Request body for obtaining algorithm services
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.4 Operation Center

### 3.4.1 Creating an Edge Resource Pool

#### Function

This API is used to create an edge resource pool.

#### URI

POST /v2/{project\_id}/edge-pools

**Table 3-178** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .

#### Request Parameters

**Table 3-179** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

**Table 3-180** Request body parameters

Parameter	Mandatory	Type	Description
name	Yes	String	Name of an edge resource pool. The value is a string of 4 to 32 characters consisting of lowercase letters, digits, and hyphens (-). It must start with a lowercase letter and ends with a lowercase letter or digit.



Parameter	Mandatory	Type	Description
description	No	String	Task description Minimum: <b>0</b> Maximum: <b>255</b>
ief_service_instance_id	No	String	ID of a platinum IEF instance Minimum: <b>0</b> Maximum: <b>255</b>
nodes	Yes	Array of strings	IEF edge nodes Array Length: <b>1 - 10</b>

## Response Parameters

**Status code: 201**

**Table 3-181** Response body parameters

Parameter	Type	Description
id	String	ID of a created edge pool

**Status code: 400**

**Table 3-182** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-183** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to create an edge resource pool named *xxx* with the node *xxx* selected.

POST https://{endpoint}/v2/{project\_id}/edge-pools

```
{
  "name": "xxx",
  "description": "xxx",
  "iefServiceInstanceId": "xxx",
  "nodes": [
    {
      "xxx"
    }
  ]
}
```

## Example Responses

**Status code: 201**

Response body for creating an edge resource pool

```
{
  "id": "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx"
}
```

## Status Codes

Status Code	Description
201	Response body for creating an edge resource pool
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

### 3.4.2 Deleting an Edge Resource Pool

#### Function

This API is used to delete an edge resource pool.

#### URI

DELETE /v2/{project\_id}/edge-pools/{id}

**Table 3-184** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
id	Yes	String	ID of an edge resource pool

#### Request Parameters

**Table 3-185** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

#### Response Parameters

**Status code: 400**

**Table 3-186** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>

Parameter	Type	Description
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-187** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to delete the edge resource pool whose ID is *xxx*.

```
DELETE https://{endpoint}/v2/{project_id}/edge-pools/xxx
```

## Example Responses

None

## Status Codes

Status Code	Description
204	Operation successful
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

### 3.4.3 Obtaining Edge Resource Pools

#### Function

This API is used to obtain edge resource pools.

#### URI

GET /v2/{project\_id}/edge-pools

**Table 3-188** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .

**Table 3-189** Query Parameters

Parameter	Mandatory	Type	Description
is_paged	No	Boolean	Whether to display records on different pages Default: <b>false</b>
page_size	No	Integer	Page number Minimum: <b>1</b> Maximum: <b>1000</b> Default: <b>100</b>
page_num	No	Integer	Number of records displayed on each page Minimum: <b>1</b> Maximum: <b>10000</b> Default: <b>1</b>
name_like	No	String	Name for fuzzy search
order_by	No	String	Sorting mode. Data is sorted in ascending or descending order based on the value of <b>sort_name</b> . <b>asc</b> indicates the ascending order, and <b>desc</b> indicates the descending order. Options: <ul style="list-style-type: none"> <li>• <b>asc</b></li> <li>• <b>desc</b></li> </ul> Default: <b>desc</b>

Parameter	Mandatory	Type	Description
sort_name	No	String	Sorting field. Options: <ul style="list-style-type: none"> <li>• <b>created_at</b></li> <li>• <b>updated_at</b></li> </ul> Default: <b>created_at</b>
state	No	String	Status for filtering. You can select only one option. Options: <ul style="list-style-type: none"> <li>• <b>Running</b></li> <li>• <b>Abnormal</b></li> </ul>

## Request Parameters

**Table 3-190** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

Status code: 200

**Table 3-191** Response body parameters

Parameter	Type	Description
count	Integer	Total number of edge resource pools
edge_pools	Array of <a href="#">EdgePoolListItemDto</a> objects	Response body for obtaining edge resource pools

**Table 3-192** EdgePoolListItemDto

Parameter	Type	Description
id	String	Edge pool ID
name	String	Name of an edge resource pool
state	String	Edge pool status

Parameter	Type	Description
project_id	String	Project ID
workspace_id	String	Workspace ID
created_at	Long	Creation time
updated_at	Long	Update time
description	String	Description

**Status code: 400**

**Table 3-193** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-194** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to obtain edge resource pools, which are displayed on one page containing a maximum of 10 records.

```
GET https://{endpoint}/v2/{project_id}/edge-pools?is_paged=true&page_size=10&page_num=1
```

## Example Responses

**Status code: 200**

Response body for obtaining edge resource pools

```
{
  "count" : 2,
  "edge_pools" : [ {
    "id" : "xxx",
    "name" : "test1",
    "state" : "Running",
    "project_id" : "xxx",
    "workspace_id" : "0",
    "created_at" : 1685611513591,
    "updated_at" : 1685611513591
  }, {
    "id" : "xxx",
    "name" : "test2",
    "state" : "Running",
    "project_id" : "xxx",
    "workspace_id" : "0",
    "created_at" : 1683344661036,
    "updated_at" : 1683344661036
  } ]
}
```

## Status Codes

Status Code	Description
200	Response body for obtaining edge resource pools
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

## 3.4.4 Obtaining Details About an Edge Resource Pool

### Function

This API is used to obtain details about an edge resource pool.

### URI

```
GET /v2/{project_id}/edge-pools/{id}
```



**Table 3-195** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details, see <a href="#">Obtaining a Project ID and Name</a> .
id	Yes	String	ID of an edge resource pool

## Request Parameters

**Table 3-196** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. For details about how to obtain a user token, see <a href="#">Authentication</a> .

## Response Parameters

**Status code: 200**

**Table 3-197** Response body parameters

Parameter	Type	Description
id	String	Edge pool ID
name	String	Name of an edge resource pool
description	String	Description
state	String	Edge pool status
project_id	String	Project ID
workspace_id	String	Workspace ID
created_at	Long	Creation time
updated_at	Long	Update time
nodes	Array of <a href="#">EdgeNodeInfoDto</a> objects	Edge node list

**Table 3-198** EdgeNodeInfoDto

Parameter	Type	Description
id	String	Edge node ID
name	String	Name of an edge resource pool
description	String	Description. If the description is empty, this parameter is not returned.
state	String	Edge pool status
cpu	Integer	Number of CPU cores
arch	String	Computer architecture
enable_gpu	Boolean	Whether to use GPUs
enable_npu	Boolean	Whether to use NPUs
memory	Integer	Memory size
gpu_info	Array of <a href="#">GpuInfo</a> objects	GPU information
npu_info	Array of <a href="#">NpuInfo</a> objects	NPU information

**Table 3-199** GpuInfo

Parameter	Type	Description
name	String	GPU name
driver_version	String	GPU driver version
type	String	GPU type
capacity	String	GPU capacity

**Table 3-200** NpuInfo

Parameter	Type	Description
name	String	NPU name
driver_version	String	NPU driver version
type	String	NPU type
capacity	String	NPU capacity

**Status code: 400**

**Table 3-201** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

**Status code: 500**

**Table 3-202** Response body parameters

Parameter	Type	Description
error_code	String	Error code
error_msg	String	Error description
detail	String	Error details
params	Array of strings	Error parameters Array Length: <b>0 - 1</b>
reason	String	Error cause
advice	String	Suggestion

## Example Requests

This request is used to obtain details about the edge resource pool whose ID is *xxx*.

```
GET https://{endpoint}/v2/{project_id}/edge-pools/xxx
```

## Example Responses

**Status code: 200**

Response body for obtaining details about an edge resource pool

```
{
  "id" : "xxx",
  "name" : "yundao2",
```

```

"state": "Running",
"project_id": "xxx",
"workspace_id": "0",
"created_at": 1683344661036,
"updated_at": 1683344661036,
"nodes": [ {
  "id": "xxx",
  "name": "Edge node 2 for testing",
  "state": "Running",
  "cpu": 16,
  "arch": "x86_64",
  "enable_gpu": true,
  "enable_npu": false,
  "memory": 64263,
  "gpu_info": [ {
    "name": "gp0",
    "driver_version": "418.67",
    "type": "Tnt004",
    "capacity": "15079Mi"
  } ],
  "npu_info": [ ]
} ]
}

```

## Status Codes

Status Code	Description
200	Response body for obtaining details about an edge resource pool
400	Request error
500	Internal error

## Error Codes

See [Error Codes](#).

# 4 Algorithm APIs

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## 4.1 Edge Service APIs

### 4.1.1 Creating a People Flow Counting (Edge) Job

#### Function

This API is used to create a people flow counting (edge) job.

#### URI

POST /v1/{project\_id}/infer/services/c-flowcount-edge/tasks

**Table 4-1** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-2** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>FlowCountServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the purchased algorithm capability package. To obtain the ID, log in to the VIAS platform, choose <b>Algorithm Center &gt; Algorithm Service Packages &gt; Algorithm Package Details</b> , and view the purchased package details.

**Table 4-3** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-4** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-5** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-6** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .



Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-7** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-8** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-9** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-10** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-11** FlowCountServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>FlowCountCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-12** FlowCountCommon

Parameter	Mandatory	Type	Description
line_count_interval	No	Integer	Interval for collecting the number of people per second who cross a particular straight line in a video. The value ranges from 1 to 86400 and the default value is 2. Minimum: <b>1</b> Maximum: <b>86400</b> Default: <b>2</b>
region_count_interval	No	Integer	Interval for collecting the number of people per second who cross through a particular area. The value ranges from 1 to 86400 and the default value is 2. Minimum: <b>1</b> Maximum: <b>86400</b> Default: <b>2</b>

Parameter	Mandatory	Type	Description
line_detection_sw	No	Integer	Whether to collect the number of people who cross a particular straight line in a video. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
region_detection_sw	No	Integer	Whether to collect the number of people who cross through a particular area. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
heatmap_detection_sw	No	Integer	Whether to enable heatmap detection. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>0</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
heatmap_detection_interval	No	Integer	Heatmap detection period, in seconds. The value ranges from 10 to 86400 and the default value is <b>10</b> . Minimum: <b>10</b> Maximum: <b>86400</b> Default: <b>10</b>
heatmap_point_interval	No	Integer	Hotspot update period, in frames. In a heatmap detection period, hotspot values gradually accumulate. The value ranges from 1 to 10000 and the default value is <b>4</b> . Minimum: <b>1</b> Maximum: <b>10000</b> Default: <b>4</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: <code>{"lines":[{"data": [[560,680], [1185,506]],"properties": {"side1_name":"Side1","side2_name":"Side2"}],"polygons":[{"data": [[0,0], [0,1080], [1920,1080], [1920,0]]}]}</code></li> <li>If the line configuration is not specified, the default value is used. By default, the line is horizontal and drawn at the position where the height is 50% of the image height. If the image width is <math>w</math> and the image height is <math>h</math>, the default position of the line is <math>[[1/4w, 1/2h], [3/4w, 1/2h]]</math>.</li> <li>If the area configuration is not specified, the default value is used. By default, the area is a rectangle, which is 1/4 of the middle of the entire video frame. If the image width is <math>w</math> and the image height is <math>h</math>, the positions of the four endpoints of the area are <math>[[1/4w, 1/4h], [3/4w, 1/4h], [1/4w, 3/4h], [3/4w, 3/4h]]</math>.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-13** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-14** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a people flow counting job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-flowcount-edge/tasks

```
{
  "name": "flowcount-task",
  "description": "flowcount task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-flowcount"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "line_count_interval": 2,
      "region_count_interval": 2,
      "line_detection_sw": 1,
      "region_detection_sw": 1,
      "attribute_detection_sw": 0,
      "target_roi": "{\\\"lines\\\":{\\\"data\\\":[[560,680],[1185,506]],\\\"properties\\\":{\\\"side1_name\\\":\\\"Side1\\\",\\\"side2_name\\\":\\\"Side2\\\"}},\\\"polygons\\\":{\\\"data\\\":[[0,0],[0,1080],[1920,1080],[1920,0]]}}",
      "heatmap_detection_sw": 0,
      "heatmap_detection_interval": 60,
      "heatmap_point_interval": 4
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.2 Creating an Intrusion Detection (Edge) Job

### Function

This API is used to create an intrusion detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-intrusiondetection-edge/tasks

**Table 4-15** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-16** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).



Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">IntrusionServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-17** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.

Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-18** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-19** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-20** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-21** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-22** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-23** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-24** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-25** IntrusionServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>IntrusionCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-26** IntrusionCommon

Parameter	Mandatory	Type	Description
car_detection_sw	No	Integer	Corresponds to the <b>Car Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>0</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
person_detection_sw	No	Integer	Corresponds to the <b>Person Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
detection_min_size	No	Integer	Corresponds to the <b>Detection Minimum Size</b> parameter on the console. This parameter specifies the minimum pixel value of the detection object. The value ranges from 60 to 4000 and the default value is <b>60</b> . Minimum: <b>60</b> Maximum: <b>4000</b> Default: <b>60</b>
detection_max_size	No	Integer	Corresponds to the <b>Detection Maximum Size</b> parameter on the console. This parameter specifies the maximum pixel value of the detection object. The value ranges from 640 to 4000 and the default value is <b>1080</b> . Minimum: <b>640</b> Maximum: <b>4000</b> Default: <b>1080</b>
line_detection_sw	No	Integer	Corresponds to the <b>Line Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
region_detection_sw	No	Integer	Corresponds to the <b>Region Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>



Parameter	Mandatory	Type	Description
loitering_detection_sw	No	Integer	Corresponds to the <b>Loitering Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>0</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
all_print_sw	No	Integer	<p>Corresponds to the <b>All Print Switch</b> parameter on the console. This parameter specifies whether the output contains historical alarm objects. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No historical alarm objects are contained in the output.</li> <li>• <b>1</b>: Historical alarm objects are contained in the output.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"lines":[{"data": [[560,680], [1185,506]],"properties":{"side1_name":"Side1","side2_name":"Side2"}],"polygons":[{"data": [[0,0], [0,1080], [1920,1080], [1920,0]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame. By default, the line is drawn at the position where the height is 50% of the image height. If the image width is w and the image height is h, the default position of the line is <math>[[1/4w, 1/2h], [3/4w, 1/2h]]</math>.</li> </ul>

## Response Parameters

Status code: 201

Table 4-27 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-28** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an intrusion detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-intrusiondetection-edge/tasks
```

```
{
  "name": "intrusiondetection-task",
  "description": "intrusiondetection task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-intrusiondetection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "car_detection_sw": 0,
      "person_detection_sw": 1,
      "detection_min_size": 60,
      "detection_max_size": 1080,
      "line_detection_sw": 1,
      "region_detection_sw": 1,
      "loitering_detection_sw": 0,
      "image_compression_ratio": 90,
      "render_result_sw": 1,
      "all_print_sw": 0,
      "render_roi_sw": 1,
      "target_roi": "{\lines\":{\data\":[[560,680],[1185,506]],\properties\":{\side1_name
\":"Side1\","\side2_name\":"Side2\"}}},\polygons\":[{\data\":[[0,0],[0,1080],[1920,1080],[1920,0]]}]"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

### 4.1.3 Creating an On-Duty Inspection (Edge) Job for Key Positions

#### Function

This API is used to create an on-duty inspection (edge) job for key positions.

#### URI

POST /v1/{project\_id}/infer/services/c-staffonduty-edge/tasks

**Table 4-29** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

#### Request Parameters

**Table 4-30** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.

Parameter	Mandatory	Type	Description
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">StaffOnDuty</a> <a href="#">ServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-31** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-32** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-33** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-34** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .



Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-35** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-36** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-37** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-38** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-39** StaffOnDutyServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>StaffOnDutyCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-40** StaffOnDutyCommon

Parameter	Mandatory	Type	Description
key_region_detection_sw	No	Integer	Corresponds to the <b>Key Region Detection Switch</b> parameter on the console. This parameter specifies whether to enable detection alarms. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
key_region_person_count	No	Integer	Corresponds to the <b>Key Region Person Count</b> parameter on the console. This parameter specifies the minimum number of on-duty staffs in a detection area. The value ranges from 1 to 100 and the default value is 2. Minimum: <b>1</b> Maximum: <b>100</b> Default: <b>2</b>
key_region_detect_interval	No	Integer	Corresponds to the <b>Key Region Detection Interval</b> parameter on the console. This parameter specifies the detection interval of the specified area, in seconds. The value ranges from 1 to 3600 and the default value is 1. When the time is an integral multiple of the detection period, the algorithm is triggered to detect the number of on-duty staffs. Minimum: <b>1</b> Maximum: <b>3600</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
key_region_detect_threshold	No	Integer	<p>Corresponds to the <b>Key Region Detection Threshold</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>Alarm triggering threshold, in the unit of the number of detection periods. The value ranges from 1 to 3600 and the default value is <b>60</b>. If the alarm triggering threshold is <math>N</math>, when the number of on-duty staffs is less than the minimum number in <math>N</math> consecutive detection periods, an alarm is triggered. When an alarm is triggered or the number of on-duty staffs reaches the minimum number, the counting restarts until the number reaches the alarm triggering threshold again.</li> </ul> <p>Minimum: <b>1</b> Maximum: <b>3600</b> Default: <b>60</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is 1/4 of the entire video frame. If the image width is w and the image height is h, the positions of the four endpoints of the area are [[1/4w, 1/4h], [3/4w, 1/4h], [1/4w, 3/4h], [3/4w, 3/4h]].</li> </ul>

## Response Parameters

Status code: 201

Table 4-41 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-42 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an on-duty inspection (edge) job for key positions. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-staffonduty-edge/tasks

```
{
  "name": "staffonduty-task",
  "description": "staffonduty task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-staffonduty"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "target_roi": "{\"polygons\": [{\"data\": [[484,465],[1850,450],[1905,1013],[515,1050]]}, {\"data\": [[484,125],[1800,125],[1800,677],[495,677]]}]}",
      "image_compression_ratio": 90,
      "key_region_detection_sw": 1,
      "key_region_detect_interval": 2,
      "key_region_detect_threshold": 2,
      "key_region_person_count": 50
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).



## 4.1.4 Creating an Abandoned Object Detection (Edge) Job

### Function

This API is used to create an abandoned object detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-abandon-detection-edge/tasks

**Table 4-43** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-44** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">AbandonServiceConfig</a> object	Job configuration parameters.

Parameter	Mandatory	Type	Description
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-45** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-46** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-47** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-48** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-49** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-50** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-51** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-52** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-53** AbandonServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>AbandonCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-54** AbandonCommon

Parameter	Mandatory	Type	Description
detection_min_size	No	Integer	Corresponds to the <b>Detection Minimum Size</b> parameter on the console. This parameter specifies the minimum pixel value of the detection object. The value is in direct proportion to the resolution. In the 1080p resolution, the value ranges from 50 to 400 and the default value is <b>50</b> . Minimum: <b>50</b> Maximum: <b>400</b> Default: <b>50</b>
alert_time_threshold	No	Integer	Corresponds to the <b>Alert Time Threshold</b> parameter on the console. This parameter specifies the threshold for generating an alarm for an abandoned object. When the duration that an object is abandoned exceeds the threshold (in the unit of seconds), an alarm will be generated. The value ranges from 10 to 300 and the default value is <b>10</b> . Minimum: <b>10</b> Maximum: <b>300</b> Default: <b>10</b>



Parameter	Mandatory	Type	Description
alert_detection_interval	No	Integer	<p>Corresponds to the <b>Alert Detection Interval</b> parameter on the console. This parameter specifies the interval for detecting abandoned object alarms. If multiple alarms are generated in an interval (in the unit of seconds), they are combined into one alarm. The value ranges from 1 to 150 and the default value is <b>5</b>. The recommended value ranges from 1 to 1/2 of the <b>alert_time_threshold</b> value.</p> <p>Minimum: <b>1</b> Maximum: <b>150</b> Default: <b>5</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-55 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-56 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an abandoned object detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-abandon-detection-edge/tasks
{
  "name": "abandon-detection-task",
  "description": "Abandon Detection task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-abandon-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "detection_min_size": 50,
      "alert_time_threshold": 10,
      "alert_detection_interval": 5,
      "image_compression_ratio": 80,
      "target_roi": "{ \"polygons\": [ [ \"data\": [ [ 84, 389 ], [ 1840, 349 ], [ 1824, 526 ], [ 78, 526 ] ] ] ] }",
      "render_result_sw": 1,
      "render_roi_sw": 1
    }
  }
}
```

```
}  
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.5 Creating a Crowd Density Monitoring (Edge) Job

### Function

This API is used to create a crowd density monitoring (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-crowdcount-edge/tasks

**Table 4-57** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-58** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>CrowdCounts serviceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-59** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-60** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-61** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-62** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .



Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-63** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-64** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-65** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-66** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-67** CrowdCountServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>CrowdCount Common</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-68** CrowdCountCommon

Parameter	Mandatory	Type	Description
alarm_threshold	No	String	<p>People count alarm thresholds. Default value: <b>50</b>. The value must be a positive integer. When the number of people in a video frame is greater than or equal to the threshold, the video image is output in JSON format for alarm. You can enter different alarm thresholds for each ROI. The alarm thresholds are separated by spaces.</p> <ul style="list-style-type: none"> <li>• If the number of alarm thresholds within the list is greater than the actual number of ROIs, the first alarm thresholds matching the number of ROIs are used.</li> <li>• If the number of alarm thresholds within the list is less than the actual number of ROIs, use the default value for the rest part.</li> <li>• For example, if there are three ROIs and three threshold values (<b>25 30 20</b>) are entered, the image is sent as long as one ROI alarm is generated. When there are only two values (<b>25 15</b>) are entered, the threshold of the third ROI will be defaulted to <b>50</b>. When there are more than three threshold values (such as <b>25 36 23 40</b>) are entered, the first three values (<b>25 36 23</b>) are automatically selected.</li> </ul>

Parameter	Mandatory	Type	Description
sampling_time_interval	No	Integer	<p>Interval (in seconds) at which video sampling is performed. The value ranges from 1 to 30 and the default value is <b>10</b>. By default, a video image is sampled every 10 seconds, and <math>N</math> frames will be skipped between every two image samplings.</p> <ul style="list-style-type: none"> <li><math>N = \text{sampling\_time\_interval} \times \text{Frame rate (fps)}</math>. For example, if the frame rate is 25 fps and the sampling interval is 1 second, 25 frames will be skipped between every two image samplings.</li> </ul> <p>Minimum: <b>1</b> Maximum: <b>30</b> Default: <b>10</b></p>
alert_mode	No	String	<p>Alarming mode. Default value: <b>single</b>. There are two alarm modes:</p> <ul style="list-style-type: none"> <li><b>single</b>: event alarming. An alarm is reported only when a new alarm event is generated and the number of people reaches the alarm threshold.</li> <li><b>periodic</b>: periodic alarming. An alarm is reported each time a video sampling interval expires.</li> </ul> <p>Default: <b>single</b></p>
banner_detection_sw	No	Integer	<p>Whether to enable protest banner detection. The value ranges from 0 to 1 and the default value is <b>0</b>. When the function is enabled, the system detects banners in the ROI area of video images.</p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
banner_thresh old	No	String	List of banner detection alarm thresholds. The default value is <b>1</b> . The value must be a positive integer. For details about how to use this parameter, see <b>alarm_threshold</b> .
visualization_ output_sw	No	Integer	<p>Whether to send the edited video image with scenario information in it. The value ranges from 0 to 1 and the default value is <b>0</b>. By default, when the number of people in each ROI exceeds the alarm threshold, only the structured information of the original image is sent. The detected people and banners can be displayed only after the visualization function is enabled. The visualized alarm information in images for different scenarios is as follows:</p> <ul style="list-style-type: none"> <li>• Banners for protests are marked in red boxes.</li> <li>• If a densely populated area is detected, the area is rendered in different colors.</li> <li>• Each ROI is marked with a yellow polygon in the image.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
density_sw	No	Integer	<p>Density estimation status. You can customize whether to use a density estimation model to evaluate the number of people. Use a density estimation model if the number of people is large and the alarm threshold is large.</p> <ul style="list-style-type: none"> <li>A density estimation model is used by default. The value ranges from 0 to 1 and the default value is 1.</li> </ul> <p>Minimum: 0 Maximum: 1 Default: 1</p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: 20 Maximum: 100 Default: 90</p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-69** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-70** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a crowd density monitoring (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-crowdcount-edge/tasks

```
{
  "name": "crowdcount-edge-task",
  "description": "Crowdcount detection task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "crowdcount-edge"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "banner_detection_sw": 1,
      "banner_threshold": "2",
      "alarm_threshold": "5",
      "sampling_time_interval": 8,
      "density_sw": 1,
      "visualization_output_sw": 1,
      "image_compression_ratio": 80,
      "target_roi": "{\"polygons\": [{\"data\": [[100,100],[1800,100],[1800,1000],[100,1000]]}]}"
    }
  }
}
```



```
}  
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.6 Creating a Work Gear and Helmet Detection (Edge) Job

### Function

This API is used to create a work gear and helmet detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-safetysuitedetection-edge/tasks

**Table 4-71** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-72** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>SafetySuitServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-73** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-74** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-75** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-76** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-77** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-78** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-79** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-80** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-81** SafetySuitServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>SafetySuitCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-82** SafetySuitCommon

Parameter	Mandatory	Type	Description
hat_detection_sw	No	Integer	Corresponds to the <b>Hat Detection Switch</b> parameter on the console. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>



Parameter	Mandatory	Type	Description
cloth_detection_sw	No	Integer	<p>Corresponds to the <b>Clothes Detection Switch</b> parameter on the console. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
target_roi	No	String	Corresponds to the <b>Target ROI</b> parameter on the console. <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-83 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-84** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a work gear and helmet detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-safetysuitedetection-edge/tasks

```
{
  "name": "safetysuite-detection-task",
  "description": "safetysuite detection task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-safetysuite-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "hat_detection_sw": 0,
      "cloth_detection_sw": 1,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.7 Creating a Smoke and Fire Detection (Edge) Job

### Function

This API is used to create a smoke and fire detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-smoke-and-fire-edge/tasks

**Table 4-85** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-86** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">SmokeAndFireServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-87** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-88** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-89** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Input type of a job. This parameter is mandatory. Options:</p> <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-90** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>



**Table 4-91** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-92** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-93** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-94** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-95** SmokeAndFireServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>SmokeAndFireCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-96** SmokeAndFireCommon

Parameter	Mandatory	Type	Description
video_sampl ing_interval	No	Integer	Corresponds to the <b>Video Sampling Interval</b> parameter on the console. The value ranges from 1 to 10 in the unit of seconds and the default value is <b>1</b> . Note: This parameter determines the detection frequency of the algorithm. If the interval increases, the maximum delay from smoke or fire occurrence to detection increases. Configure this parameter based on the acceptable response delay. Minimum: <b>1</b> Maximum: <b>10</b> Default: <b>1</b>
fire_detection _sw	No	Integer	Corresponds to the <b>Fire Detection Switch</b> parameter on the console. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
smoke_detecti on_sw	No	Integer	Corresponds to the <b>Smoke Detection Switch</b> parameter on the console. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: When the alarm is for smoke, the alarm object border is drawn in purple. When the alarm is for fire, the alarm object border is drawn in red.</li> </ul> <p>• The default value is <b>0</b>. Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> </ul> <p>• The default value is <b>0</b>. Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-97** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-98** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a smoke and fire detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-smoke-and-fire-edge/tasks
{
  "name": "fireandsmoke-detection-task",
  "description": "fireandsmoke detection task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-fireandsmoke-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_result_sw": 1,
      "video_sampling_interval": 1,
      "target_roi": "{\\\"polygons\\\":[{\\\"data\\\":[[204,64],[90,321],[511,319],[617,221],[582,38],[320,11],[228,24]]}]}",
      "render_roi_sw": 1,
      "fire_detection_sw": 1,
      "smoke_detection_sw": 1
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.8 Creating a Fight Detection (Edge) Job

### Function

This API is used to create a fight detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-fightdetect-edge/tasks

**Table 4-99** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-100** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">FightDetectServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-101** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-102** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.



**Table 4-103** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-104** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-105** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-106** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-107** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-108** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-109** FightDetectServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>FightDetectCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-110** FightDetectCommon

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-111 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-112 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a fight detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-fightdetect-edge/tasks
{
  "name": "fight-detection-task",
  "description": "fight detection task test",
  "input": {
    "type": "edgcamera",
    "data": [
      {
        "id": "aec5857c-222f-4aa9-be39-23654e118886",
        "index": 0
      }
    ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-fight-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[204,64],[90,321],[511,319],[617,221],[582,38],[320,11],[228,24]]}]}",
      "render_roi_sw": 1,
    }
  }
}
```

```
}  
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.9 Creating a Shared Bicycle Detection (Edge) Job

### Function

This API is used to create a shared bicycle detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-sharedbicycledetection-edge/tasks

**Table 4-113** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .



## Request Parameters

**Table 4-114** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>SharedBicycleServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-115** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-116** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-117** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-118** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-119** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-120** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-121** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-122** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-123** SharedBicycleServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>SharedBicycleCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-124** SharedBicycleCommon

Parameter	Mandatory	Type	Description
alert_mode	No	String	Alarming mode. There are two alarm modes: <ul style="list-style-type: none"> <li>• <b>single</b>: one-off alarming. When a specific event occurs, an alarm is generated and the event information is reported.</li> <li>• <b>periodic</b>: periodic alarming. An alarm is reported each time a detection period expires.</li> <li>• The default value is <b>single</b>.</li> </ul>

Parameter	Mandatory	Type	Description
alert_detection_interval	No	Integer	<p>Corresponds to the <b>Alert Detection Interval</b> parameter on the console. This parameter specifies a parking violation detection period for shared bicycles, in seconds. The value ranges from 1 to 3600.</p> <p>Minimum: <b>1</b> Maximum: <b>3600</b> Default: <b>60</b></p>
illegal_park_alert_threshold	No	Integer	<p>Corresponds to the <b>Illegal Park Alert Threshold</b> parameter on the console. This parameter specifies an alarm triggering threshold, in seconds. The value ranges from 10 to 300. If a shared bicycle stays longer than the specified time, an alarm is reported.</p> <p>Minimum: <b>10</b> Maximum: <b>300</b> Default: <b>30</b></p>



Parameter	Mandatory	Type	Description
all_print	No	Integer	<p>Whether to render all alarm objects in an output image. The value ranges from 0 to 1 and the default value is <b>0</b>.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Draw the border of the target object for the current alarm only. For details about the rendering mode, see <b>normal_render</b>.</li> <li>• <b>1</b>: Draw all alarmed shared bicycles with parking violations in an image. The color of the new alarm object is different from that of other rendered objects.</li> <li>• When <b>normal_render</b> is set to <b>0</b>, the current alarm object is rendered in red boxes, a warning flag, and red background, and historical alarm objects are rendered in yellow boxes and yellow background.</li> <li>• When <b>normal_render</b> is set to <b>1</b>, the current alarm object is rendered in light red boxes, and historical alarm objects are rendered in dark red boxes.</li> <li>• This field takes effect only when target box rendering is enabled.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to render the detection box in an output image. For details about the rendering mode, see <b>normal_render</b>. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
normal_rende r	No	Integer	<p>Classic rendering status. The value ranges from 0 to 1 and the default value is <b>0</b>. When <b>all_print</b> is set to <b>0</b>, the options for rendering an image object are as follows:</p> <ul style="list-style-type: none"> <li>• When the value is <b>1</b>, the object is marked in a red box.</li> <li>• When the value is <b>0</b>, the object is marked in a red box with a red background, and a warning flag is marked in the upper left corner of the box.</li> <li>• When the value is <b>1</b>, render the image based on the <b>all_print</b> value. For details, see <b>all_print</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• A parking-prohibited area is identified by "name":"illegal*". When a vehicle parks in the parking-prohibited area, a parking violation event is triggered. Other fields can be added after <b>illegal</b> as the flag of roi, for example, <b>illegal01</b>.</li> <li>• If the value of <b>name</b> is not starting with <b>illegal</b>, the area is a valid parking area by default.</li> <li>• The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "illegal01"}]}</li> <li>• If this parameter is not specified, the entire video frame is parking-prohibited by default.</li> </ul>

## Response Parameters

Status code: 201

Table 4-125 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-126** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a shared bicycle detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-sharedbicycledetection-edge/tasks

```
{
  "name": "shared-bicycle-detection-task",
  "description": "shared-bicycle detection task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-shared-bicycle-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alert_mode": "single",
      "alert_detection_interval": 60,
      "illegal_park_alert_threshold": 30,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]],\"name\": \"illegal01\"}]}",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

### 4.1.10 Creating an Individual Behavior Detection (Edge) Job

#### Function

This API is used to create an individual behavior detection (edge) job.

#### URI

POST /v1/{project\_id}/infer/services/c-event-action-recog-edge/tasks

**Table 4-127** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

#### Request Parameters

**Table 4-128** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job

Parameter	Mandatory	Type	Description
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">EventActionsServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-129** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-130** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.



**Table 4-131** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-132** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-133** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-134** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-135** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-136** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-137** EventActionServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>EventActionCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-138** EventActionCommon

Parameter	Mandatory	Type	Description
smoking_detection_sw	No	Integer	Corresponds to the <b>Smoking Detection Switch</b> parameter on the console. This parameter specifies whether to detect smoking for input video streams. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
phoning_detection_sw	No	Integer	<p>Corresponds to the <b>Phoning Detection Switch</b> parameter on the console. This parameter specifies whether to detect phone calling for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-139** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-140** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an individual behavior detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-event-action-recog-edge/tasks

```
{
  "name": "event-action-detection-task",
  "description": "event-action detection task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-event-action-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "smoking_detection_sw": 1,
      "phoning_detection_sw": 0,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error



## Error Codes

See [Error Codes](#).

### 4.1.11 Creating an Individual Action Detection (Edge) Job

#### Function

This API is used to create an individual action detection (edge) job.

#### URI

POST /v1/{project\_id}/infer/services/c-pose-action-recog-edge/tasks

**Table 4-141** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

#### Request Parameters

**Table 4-142** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">PoseActionServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-143** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-144** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-145** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-146** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-147** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-148** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-149** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-150** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-151** PoseActionServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>PoseActionCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-152** PoseActionCommon

Parameter	Mandatory	Type	Description
climb_detection_sw	No	Integer	<p>Corresponds to the <b>Climb Detection Switch</b> parameter on the console. This parameter specifies whether to detect climbing for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
fall_detection_sw	No	Integer	<p>Corresponds to the <b>Fall Detection Switch</b> parameter on the console. This parameter specifies whether to detect falling for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
wave_detection_sw	No	Integer	<p>Corresponds to the <b>Wave Detection Switch</b> parameter on the console. This parameter specifies whether to detect waving for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
bend_detection_sw	No	Integer	<p>Corresponds to the <b>Bend Detection Switch</b> parameter on the console. This parameter specifies whether to detect bending for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-153** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-154** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an individual action detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-pose-action-recog-edge/tasks
{
  "name": "pose-action-detection-task",
  "description": "pose-action detection task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-pose-action-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "climb_detection_sw": 1,
      "fall_detection_sw": 0,
      "wave_detection_sw": 0,
      "bend_detection_sw": 0,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\\"polygons\":[{\\"data\":[[0,0],[0,1080],[1920,1080],[1920,0]]}]",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.

Status Code	Description
400	Request error

## Error Codes

See [Error Codes](#).

### 4.1.12 Creating a Mask Detection (Edge) Job

#### Function

This API is used to create a mask detection (edge) job.

#### URI

POST /v1/{project\_id}/infer/services/c-wear-mask-recog-edge/tasks

**Table 4-155** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

#### Request Parameters

**Table 4-156** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.

Parameter	Mandatory	Type	Description
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job object
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">WearMaskServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-157** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-158** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-159** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <a href="#">TaskInputData</a> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-160** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .



Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-161** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-162** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-163** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-164** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-165** WearMaskServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>WearMaskCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-166** WearMaskCommon

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-167** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-168** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a mask detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-wear-mask-recog-edge/tasks

```
{
  "name": "wearmask-task",
  "description": "wearmask detection task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-wearmask"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\\"polygons\\":[{\"data\\":[[0,0],[0,1080],[1920,1080],[1920,0]]}]",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.13 Creating an Abnormal Parking Detection (Edge) Job

### Function

This API is used to create an abnormal parking detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-traffic-abnormal-park-edge/tasks

**Table 4-169** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-170** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).

Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>AbnormalParkServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-171** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.

Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-172** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.



**Table 4-173** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-174** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-175** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-176** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-177** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-178** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-179** AbnormalParkServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>AbnormalParkCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-180** AbnormalParkCommon

Parameter	Mandatory	Type	Description
license_plate	No	<b>LicensePlate</b> object	License plate information.
abnormal_park_threshold	No	Integer	Parking time threshold, in seconds. If a vehicle is parked longer than this value, an abnormal parking alarm is reported. The value range is [20, 3600]. The maximum parking threshold can be 1 hour. Minimum: <b>20</b> Maximum: <b>3600</b> Default: <b>20</b>

Parameter	Mandatory	Type	Description
abnormal_park_output_interval	No	Integer	Interval for reporting the same abnormal parking alarm again, in seconds. The default value is <b>30</b> . The value range is [30,86400]. The maximum interval is 24 hours. Note: The value is <b>max (abnormal_park_threshold, abnormal_park_output_interval)</b> . Minimum: <b>30</b> Maximum: <b>86400</b> Default: <b>30</b>
output_image_sw	No	Integer	Whether to output an image. Value <b>1</b> means to output an image, and <b>0</b> means the opposite. Other values are invalid. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</p> <ul style="list-style-type: none"> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon"}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

**Table 4-181** LicensePlate

Parameter	Mandatory	Type	Description
local_city	No	String	City abbreviation.
local_province	No	String	Province abbreviation.

## Response Parameters

Status code: 201

**Table 4-182** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-183** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an abnormal parking detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-traffic-abnormal-park-edge/tasks

```
{
  "name" : "abnormalpark-task",
  "description" : "abnormalpark detection task test",
  "input" : {
    "type" : "edgecamera",
    "data" : [ {
      "id" : "aec5857c-222f-4aa9-be39-23654e118886",
      "index" : 0
    } ]
  },
  "output" : {
    "dis" : {
      "stream_name" : "dis-abnormalpark"
    }
  },
  "service_version" : "3.0",
  "resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config" : {
    "common" : {
      "target_roi" : "{\"polygons\": [{\"data\": [[50,756],[50,756],[50,756],[100,616]], \"name\": \"a\"}, {\"data\": [[50,256],[50,756],[50,756],[100,116]], \"name\": \"b\"}]}\",
      "license_plate" : {
        "local_city" : "B",
        "local_province" : "Jin"
      },
      "abnormal_park_threshold" : 180,
      "abnormal_park_output_interval" : 180,
      "output_image_sw" : 1,
      "render_result_sw" : 1
    }
  }
}
```



## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.14 Creating a Vehicle Detection (Edge) Job

### Function

This API is used to create a vehicle detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-vehicle-detection-edge/tasks

**Table 4-184** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-185** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).

Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>VehicleServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-186** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.

Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-187** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-188** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-189** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-190** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-191** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-192** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-193** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-194** VehicleServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>VehicleCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-195** VehicleCommon

Parameter	Mandatory	Type	Description
license_plate	No	<b>LicensePlate</b> object	License plate information.



Parameter	Mandatory	Type	Description
output_vehicle_type	No	String	<p>Vehicle model information. Separate multiple vehicle models by spaces. If this parameter is left blank, all vehicle models are displayed by default. For example, <b>0 1 2</b> indicates that only information about vehicle models 0, 1, and 2 is output. Currently, the options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: car</li> <li>• <b>1</b>: dump truck</li> <li>• <b>2</b>: trailer</li> <li>• <b>3</b>: cement mixer</li> <li>• <b>4</b>: sanitation vehicle</li> <li>• <b>5</b>: crane</li> <li>• <b>6</b>: pickup truck</li> <li>• <b>7</b>: bus</li> <li>• <b>8</b>: fuel tanker</li> <li>• <b>9</b>: others</li> </ul>
output_image_sw	No	Integer	<p>Whether to output an image. Value <b>1</b> means to output an image, and <b>0</b> means the opposite. Other values are invalid. The default value is <b>1</b>.</p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. If the value is <b>80</b>, the definition of the output image is 80% of that of the original image. A smaller value indicates a more blurred image and a smaller amount of image data to be received.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>100</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter defines the vehicle detection area with a departure line and a parking line. You use <b>type</b> of the lines to distinguish a departure line from a parking line. The value <b>0</b> indicates the parking line, and the value <b>1</b> indicates the departure line. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</p> <ul style="list-style-type: none"> <li>• By default, the parking line is below the departure line. When a vehicle is parking and touches the parking line, the detection result is reported. When the vehicle is departing and touches the departure line, the detection result is reported.</li> <li>• The parking line is horizontal by default and is drawn at the position where the height from the top of the ROI area accounts for 70% of the height of the ROI area. Assume that the image width is <b>w</b>, the height of the ROI area is <b>h</b>, and the Y coordinate of the top of the ROI area is <b>y</b>. The default position of the parking line is <b>[[0,y+h0.7-1],[w-1,y+h0.7-1]]</b>.</li> <li>• The departure line is horizontal by default and is drawn at the position where the distance between the departure line and the top of the image accounts for 50% of the image height. Assume that</li> </ul>

Parameter	Mandatory	Type	Description
			<p>the image width is <b>w</b>, the height of the ROI area is <b>h</b>, and the Y coordinate of the top of the ROI area is <b>y</b>. The default position of the departure line is <b>[[0,y+h0.5-1],[w-1,y+h0.5-1]]</b>.</p> <ul style="list-style-type: none"> <li>• Example value: {"lines": [{"data": [[50,756], [100,616]], "properties": {"type": 0}}, {"data": [[50,256], [100,116]], "properties": {"type": 1}}, {"polygons": [{"data": [[487,465], [1850,450], [1905,1013], [515,1050]]}]}}</li> </ul>

**Table 4-196** LicensePlate

Parameter	Mandatory	Type	Description
local_city	No	String	City abbreviation.
local_province	No	String	Province abbreviation.

## Response Parameters

**Status code: 201**

**Table 4-197** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-198** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code

Parameter	Type	Description
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a vehicle detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-vehicle-detection-edge/tasks

```
{
  "name": "vehicle-task",
  "description": "vehicle detection task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-vehicle"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "target_roi": "{\n\"lines\": [{\n\"data\": [[50,756],[100,616]],\n\"properties\": {\n\"type\": 0},\n\"data\": [[50,256],[100,116]],\n\"properties\": {\n\"type\": 1}}],\n\"polygons\": [{\n\"data\": [[487,465],[1850,450],[1905,1013],[515,1050]]}],\n\"license_plate\": {\n\"local_city\": \"B\",\n\"local_province\": \"Jin\"
    }
  },
  "output_image_sw": 1,
  "image_compression_ratio": 100
}
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.15 Creating a Fire Passage Obstruction Detection (Edge) Job

### Function

This API is used to create a fire passage obstruction detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-fire-exit-occupation-edge/tasks

**Table 4-199** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-200** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">FireExitServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-201** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-202** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-203** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Input type of a job. This parameter is mandatory. Options:</p> <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-204** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.



Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-205** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-206** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-207** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-208** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-209** FireExitServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>FireExitCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-210** FireExitCommon

Parameter	Mandatory	Type	Description
license_plate	No	<a href="#">LicensePlate</a> object	License plate information.
stacking_occupation_sw	No	Integer	Corresponds to the <b>Stacking Occupation Switch</b> parameter on the console. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: This function is disabled.</li> <li>• <b>1</b>: This function is enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
vehicle_occupation_sw	No	Integer	Corresponds to the <b>Detect Vehicle</b> on the console. Available values are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: Detection at night is disabled.</li> <li>• <b>1</b>: Detection at night is enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
stacking_residence_time	No	Integer	Corresponds to the <b>Stacking Residence Time</b> parameter on the console. This parameter specifies the maximum duration (in seconds) that stock can be kept on the roadside (when there are no obstacles). The value range is [10, 3600], and the default value is <b>40</b> . Minimum: <b>10</b> Maximum: <b>3600</b> Default: <b>40</b>

Parameter	Mandatory	Type	Description
vehicle_residence_time	No	Integer	<p>Corresponds to the <b>Vehicle Residence Time</b> parameter on the console. This parameter specifies the maximum period (in seconds) that a vehicle can stay (when there are no obstacles). The value range is [10, 3600], and the default value is <b>50</b>.</p> <p>Minimum: <b>10</b> Maximum: <b>3600</b> Default: <b>50</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: The algae area will be rendered.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: The algae area will be rendered.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value range is [20, 100]. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</p> <ul style="list-style-type: none"> <li>You can set a name for each region, for example, {"polygons":[{"data": [[84,389], [1840,349], [1824,526], and [78,526]], "name": "polygon"}]}. The region name will be displayed in the result.</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

**Table 4-211** LicensePlate

Parameter	Mandatory	Type	Description
local_city	No	String	City abbreviation.
local_province	No	String	Province abbreviation.

## Response Parameters

Status code: 201

**Table 4-212** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-213** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a fire passage obstruction detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-fire-exit-occupation-edge/tasks

```
{
  "name" : "fireexit-task",
  "description" : "fireexit task test",
  "input" : {
    "type" : "edgecamera",
    "data" : [ {
      "id" : "aec5857c-222f-4aa9-be39-23654e118886",
      "index" : 0
    } ]
  },
  "output" : {
    "dis" : {
      "stream_name" : "dis-fireexit"
    }
  },
  "service_version" : "3.0",
  "resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config" : {
    "common" : {
      "image_compression_ratio" : 90,
      "render_roi_sw" : 1,
      "render_result_sw" : 1,
      "stacking_occupation_sw" : 1,
      "vehicle_occupation_sw" : 1,
      "stacking_residence_time" : 40,
      "vehicle_residence_time" : 50,
      "target_roi" : "{\"polygons\": [{\"data\": [[0, 0], [0, 1000], [1920, 1000], [1920, 0]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.16 Creating a Non-motorized Vehicle Detection (Edge) Job

### Function

This API is used to create a non-motorized vehicle detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-non-motor-detection-edge/tasks

**Table 4-214** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-215** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).



Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>NonMotorServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-216** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.

Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-217** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-218** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-219** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-220** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-221** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-222** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-223** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-224** NonMotorServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>NonMotorCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-225** NonMotorCommon

Parameter	Mandatory	Type	Description
illegal_park_detection_sw	No	Integer	<p>Corresponds to the <b>Illegal Park Detection Switch</b> parameter on the console. This parameter specifies whether to enable parking violation detection. The value range is [0,1].</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Parking violation detection is disabled.</li> <li>• <b>1</b>: Parking violation detection is enabled.</li> <li>• Default value: <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>

Parameter	Mandatory	Type	Description
illegal_park_alert_threshold	No	Integer	<p>Corresponds to the <b>Illegal Park Alert Threshold</b> on the console. This parameter specifies the time threshold for triggering an alarm. It takes effect only when <b>illegal_park_detection_sw=1</b> is set. The unit is second. The value range is [10,300]. If an electric vehicle stays longer than the specified time, an alarm is reported. Default value: <b>30</b></p> <p>Minimum: <b>10</b> Maximum: <b>300</b> Default: <b>30</b></p>
intrusion_detection_sw	No	Integer	<p>Corresponds to the <b>Intrusion Detection Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Intrusion events detection is disabled.</li> <li>• <b>1</b>: Intrusion events detection is enabled.</li> </ul> <p>Default value: <b>0</b></p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
electromobile_detect_sw	No	Integer	<p>Corresponds to the <b>Electromobile Detect Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Electric scooter detection is disabled.</li> <li>• <b>1</b>: Electric scooter detection is enabled.</li> <li>• Default value: <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>



Parameter	Mandatory	Type	Description
bicycle_detect_sw	No	Integer	<p>Corresponds to <b>Bicycle Detect Switch</b> on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Bicycle detection is disabled.</li> <li>• <b>1</b>: Bicycle detection is enabled.</li> <li>• Default value: <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A parking area will be drawn in green, and a no parking area set by the user will be drawn in yellow.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value range is [20, 100]. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies an ROI that consists of parking area, no parking area, and no entry area.</p> <ul style="list-style-type: none"> <li>• Parking area, which is identified by "name":"legal_area". If an electric scooter parks outside the parking area, a parking violation event is reported.</li> <li>• No parking area, which is identified by "name":"illegal_area". If an electric scooter parks in a no parking area, a parking violation event is reported.</li> <li>• No entry area, which is identified by "name":"prohibit_entering_area". If an electric scooter intrudes into this area, an intrusion event is reported.</li> <li>• The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example value: {"polygons": [{"data": [[43,266], [42,645], [472,644], [416,212]], "name": "legal_area"}, {"data": [[311,182], [282,670], [941,661], [835,170]], "name": "prohibit_entering_area"}, {"data": [[1272,592], [1481,813], [1623,638], [1293,356]], "name": "illegal_area"}]}. If both <b>legal_area</b> and <b>illegal_area</b> are set, <b>illegal_area</b> will be used. In this case, only the no parking area is rendered.</li> </ul>

Parameter	Mandatory	Type	Description
			<ul style="list-style-type: none"> <li>If this parameter is left blank, the entire area is a no parking area by default, and the entire area is a no entry area.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-226** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-227** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a non-motorized vehicle detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-non-motor-detection-edge/tasks
```

```
{
  "name": "nonmotor-task",
  "description": "nonmotor task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-nonmotor"
    }
  }
}
```

```

"service_version" : "3.0",
"resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
"config" : {
  "common" : {
    "illegal_park_detection_sw" : 1,
    "illegal_park_alert_threshold" : 30,
    "intrusion_detection_sw" : 0,
    "electromobile_detect_sw" : 1,
    "bicycle_detect_sw" : 1,
    "target_roi" : "{\\"polygons\\":[{\\"data\\":[[43,266],[42,645],[472,644],[416,212]],\\"name\\":\\"legal_area\\"},
{\\"data\\":[[311,182],[282,670],[941,661],[835,170]],\\"name\\":\\"prohibit_entering_area\\"}]]",
    "render_result_sw" : 1,
    "render_roi_sw" : 1,
    "image_compression_ratio" : 90
  }
}
}

```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.17 Creating a Trash Can Anomaly Detection (Edge) Job

### Function

This API is used to create a trash can anomaly detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-trash-abnormal-detect-edge/tasks

**Table 4-228** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-229** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>TrashAbnormalServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-230** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-231** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-232** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-233** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .



Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-234** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-235** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-236** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-237** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-238** TrashAbnormalServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>TrashAbnormalCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-239** TrashAbnormalCommon

Parameter	Mandatory	Type	Description
alert_time_threshold	No	Integer	Corresponds to the <b>Alert Time Threshold</b> on the console. An alarm is reported if a trash can status is abnormal for the duration specified by this parameter. Value range: [30, 3600] (in seconds) Default value: <b>30</b> Minimum: <b>30</b> Maximum: <b>3600</b> Default: <b>30</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the area for trash can detection. If an abnormal status of a trash can in this area is detected, an alarm is triggered.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[43,266], [42,645], [472,644], [416,212]]}, {"data": [[311,182], [282,670], [941,661], [835,170]]}]}</li> <li>If this parameter is left blank, the entire area is the detection area by default.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-240** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-241** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a trash can anomaly detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-trash-abnormal-detect-edge/tasks
{
  "name": "trashabnormal-task",
  "description": "trashabnormal task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-trashabnormal"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alert_time_threshold": 30,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\n\"polygons\"::[{\n\"data\":[[43,266],[42,645],[472,644],[416,212]]},{\n\"data\":[[311,182],[282,670],[941,661],[835,170]]}]]",
      "image_compression_ratio": 80
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.18 Creating an Overflowing Garbage Can Detection in Cities (Edge) Job

### Function

This API is used to create an overflowing garbage can detection in cities (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-urban-trash-overflow-edge/tasks

**Table 4-242** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-243** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.



Parameter	Mandatory	Type	Description
config	No	<a href="#">UrbanTrashOverflowServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-244** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-245** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-246** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-247** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-248** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-249** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-250** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-251** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-252** UrbanTrashOverflowServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>UrbanTrashOverflowCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-253** UrbanTrashOverflowCommon

Parameter	Mandatory	Type	Description
alert_time_threshold	No	Integer	<p>Corresponds to <b>Alert Time Threshold</b> on the console. An alarm is reported if a trash can status is abnormal for the duration specified by this parameter. Value range: [30, 3600] (in seconds) Default value: <b>30</b></p> <p>Minimum: <b>30</b> Maximum: <b>3600</b> Default: <b>30</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the area for garbage bin detection. If an abnormal status of a garbage bin in this area is detected, an alarm is triggered.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[43,266], [42,645], [472,644], [416,212]]}, {"data": [[311,182], [282,670], [941,661], [835,170]]}]}</li> <li>If this parameter is left blank, the entire area is the detection area by default.</li> </ul>

## Response Parameters

Status code: 201

Table 4-254 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400



**Table 4-255** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an overflowing garbage can detection in cities (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-urban-trash-overflow-edge/tasks

```
{
  "name": "urban-trash-task",
  "description": "urban-trash task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-urban-trash"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alert_time_threshold": 30,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[43,266],[42,645],[472,644],[416,212]]}, {\"data\": [[311,182],[282,670],[941,661],[835,170]]}]}",
      "image_compression_ratio": 80
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.19 Creating a Crowd Counting at High Altitudes (Edge) Job

### Function

This API is used to create a crowd counting at high altitudes (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-highpoint-crowdcount-edge/tasks

**Table 4-256** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-257** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">HighpointCrowdcountServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-258** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-259** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-260** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Input type of a job. This parameter is mandatory. Options:</p> <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-261** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-262** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-263** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-264** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-265** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-266** HighpointCrowdcountServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>HighpointCrowdcountCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.



**Table 4-267** HighpointCrowdcountCommon

Parameter	Mandatory	Type	Description
alarm_threshold	No	String	<p>People count alarm thresholds. Default value: <b>50</b>. The value must be a positive integer. When the number of people in a video frame exceeds the threshold, an alarm is triggered and an alarm image is output in JSON format.</p> <ul style="list-style-type: none"> <li>• If the value of <b>grid_x_number</b> is greater than 0 and the value of <b>grid_y_number</b> is greater than 0, the grid ROI settings are enabled. If you enter more than one value, only the first value is used as the alarm threshold for all grid areas. For example, if you enter <b>25 36 23 40</b>, the algorithm automatically selects the first value, that is, <b>25</b>, as the alarm threshold. If the number of people in any grid exceeds this threshold, an alarm image is output.</li> <li>• If the value of <b>grid_x_number</b> or <b>grid_y_number</b> is <b>0</b>, the classic ROI settings are enabled. You can enter different alarm thresholds for each ROI and separate them with spaces. If the alarm threshold list entered by the user is greater than the actual number of ROIs, the alarm threshold within the list is used. If the number of alarm thresholds within the list is less than the actual number of ROIs, use the default value for the rest part. For example, if there are three ROIs and three threshold values (<b>25 30 20</b>)</li> </ul>

Parameter	Mandatory	Type	Description
			<p>are input, the image is sent as long as one ROI alarm is generated. When there are only two values (<b>25 15</b>) are entered, the threshold of the third ROI will be defaulted to <b>50</b>. When there are more than three threshold values (such as <b>25 36 23 40</b>) are entered, the first three values (<b>25 36 23</b>) are automatically selected.</p> <ul style="list-style-type: none"> <li>Note: The value cannot be an empty string. Otherwise, Postman cannot deliver jobs.</li> </ul>
sampling_time_interval	No	Integer	<p>Interval at which video sampling is performed. The default value is 5s. The value range is [5, 3600], seconds.</p> <p>Minimum: <b>5</b> Maximum: <b>3600</b> Default: <b>5</b></p>
alert_mode	No	String	<p>Alarming mode. Default value: <b>single</b>. There are two alarm modes:</p> <ul style="list-style-type: none"> <li><b>single</b>: event alarming. An alarm is reported only when a new alarm event is generated and the number of people reaches the alarm threshold.</li> <li><b>periodic</b>: periodic alarming. An alarm is reported each time a video sampling interval expires.</li> </ul>

Parameter	Mandatory	Type	Description
visualization_output_sw	No	Integer	<p>Whether to send the edited video image with scenario information on it. The default value is <b>0</b>, and the value range is [0 1]. By default, when the number of people in each ROI exceeds the alarm threshold, only the structured information of the original image is sent. The detected pedestrians are displayed in video image after this function is enabled. The visualized alarm information on images for different scenarios is as follows:</p> <ul style="list-style-type: none"> <li>• If a pedestrian is detected, it is marked with a red box.</li> <li>• Each ROI is marked with a yellow polygon in the image.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[43,266], [42,645], [472,644], [416,212]]}, {"data": [[311,182], [282,670], [941,661], [835,170]]}]}</li> <li>If this parameter is left blank, the entire area is the detection area by default.</li> </ul>

Parameter	Mandatory	Type	Description
grid_x_number	No	Integer	<p>Corresponds to the <b>Grid X Number</b> parameter on the console. The default value is <b>0</b>.</p> <ul style="list-style-type: none"> <li>If the value of <b>grid_y_number</b> is <b>0</b>, the value of this field is <b>0</b>, indicating that the classic ROI settings are used, which is subject to <b>target_roi</b>.</li> <li>Values other than <b>0</b> indicates the number of grids in the horizontal direction, and each grid corresponds to an independent detection area. For example, if the value is <b>3</b>, there are three grids in the horizontal direction corresponding to three independent detection areas. Assume that the width of an image is <math>W</math>, the width of grids in a rightmost column are equal to a difference between <math>W</math> and the number <math>(W//3)*2</math> is rounded down to, and the width of grids in other columns are respectively the number <math>(W//3)</math> is rounded down to.</li> <li>The width of each grid must be greater than 10 pixels, that is, the value range of the number of grids in a horizontal direction is <math>[0, \min(\text{the number } (W//10) \text{ is rounded down to, } 500)]</math>.</li> </ul> <p>Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
grid_y_number	No	Integer	<p>Corresponds to the <b>Grid Y Number</b> parameter on the console. The default value is <b>0</b>.</p> <ul style="list-style-type: none"> <li>If the value of <b>grid_x_number</b> is <b>0</b>, the value of this field is <b>0</b>, indicating that the classic ROI settings are used, which is subject to <b>target_roi</b>.</li> <li>Values other than <b>0</b> indicates the number of grids in the vertical direction, and each grid corresponds to an independent detection area. For example, if the value is <b>5</b>, there are five grids in the vertical direction corresponding to five independent detection areas. Assume that the height of an image is <math>H</math>, and the height of a grid in a bottom row is equal to a difference between <math>H</math> and the number <math>(H/5)*4</math> is rounded down to.</li> <li>The height of each grid must be greater than 10 pixels, that is, the value range of the number of grids in a vertical direction is <math>[0, \min(\text{the number } (H/10) \text{ is rounded down to, } 500)]</math>.</li> </ul> <p>Default: <b>0</b></p>

## Response Parameters

Status code: 201

Table 4-268 Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-269** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

### Example Requests

Create a crowd counting at high altitudes (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-highpoint-crowdcount-edge/tasks
{
  "name": "highpoint-crowdcount-task",
  "description": "highpoint-crowdcount task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-highpoint-crowdcount"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alarm_threshold": "5",
      "sampling_time_interval": 8,
      "visualization_output_sw": 1,
      "image_compression_ratio": 80,
      "alert_mode": "single",
      "target_roi": "{\\"polygons\\":[{\"data\":[[100,100],[1800,100],[1800,1000],[100,1000]]}]}"
    }
  }
}
```

### Example Responses

None

### Status Codes

Status Code	Description
201	The service job has been created.

Status Code	Description
400	Request error.

## Error Codes

See [Error Codes](#).

## 4.1.20 Creating a Target Attribute Recognition (Edge) Job

### Function

This API is used to create a target attribute recognition (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-object-attrib-recog-edge/tasks

**Table 4-270** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-271** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.



Parameter	Mandatory	Type	Description
input	Yes	<b>TaskInput</b> object	Input configuration of a job object
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>ObjectAttrRecogServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-272** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-273** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-274** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-275** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-276** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-277** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-278** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-279** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-280** ObjectAttriRecogServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>ObjectAttriRecogCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-281** ObjectAttriRecogCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
pedes_attri_switch	No	String	<p>Corresponds to the <b>Pedes Attri Switch</b> parameter on the console. Pedestrian attributes you want the algorithm to output. The current algorithm supports the recognition of the following pedestrian attributes:</p> <ul style="list-style-type: none"> <li>• gender: [male, female]</li> <li>• age: [juvenile, youth, middle age, old age]</li> <li>• hair - hairstyle: [short, long, bald]</li> <li>• glasses - Eyes: [with glasses, without glasses]</li> <li>• hat: [hat, helmet, neither]</li> <li>• mask-mask: [with a mask, without a mask]</li> <li>• backbag-backpack: [with a backpack, without a backpack]</li> <li>• handbag-handbag: [with a handbag, without a handbag]</li> <li>• single_shoulder_bag-one shoulder bag: [with a one shoulder bag, without a one shoulder bag]</li> <li>• upper_color-tops color: [black, white (including gray and silver), blue, green, yellow (including orange and gold), red (including pink and purple)]</li> <li>• upper_style-tops style: [short sleeves, long sleeves]</li> <li>• upper_texture-tops texture: [solid color, stripes, grids, patterns]</li> <li>• lower_color-bottoms color: [black, white (including gray and silver), blue, green, yellow (including orange and gold), red (including pink and purple)]</li> </ul>

Parameter	Mandatory	Type	Description
			<ul style="list-style-type: none"> <li>• lower_style-bottoms style: [shorts, trousers, short skirts, long skirts]</li> <li>• orientation-orientation: [front, back, left, right]</li> <li>• For example, if the value of <b>pedes_attri_switch</b> is <b>gender,age</b>, only the gender and age attributes of pedestrians are displayed in the output.</li> <li>• If this parameter is left blank, all attributes are displayed by default. If there is a space on both sides of the comma (,), the space will be ignored. If all attributes are incorrectly set, all attributes are displayed. If some attributes are correctly set, only the correct attributes are displayed.</li> <li>• Vehicle types can be identified, including bicycles, battery trucks, cars, dump trucks, trailers, cement mixers, buses, and others. The display of the vehicle type is not affected by this parameter.</li> </ul>
alert_attri	No	<b>AlertAttri</b> object	<p>Corresponds to the <b>AlertAttri</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• This parameter specifies alarm types and attributes. The algorithm generates alarms only of these types and attributes.</li> <li>• If this parameter is left blank, the algorithm reports alarms for all monitored objects by default.</li> <li>• Each monitored object information contains the result of the attributes specified by <b>pedes_attri_switch</b>.</li> </ul>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

**Table 4-282** AlertAttri

Parameter	Mandatory	Type	Description
type	No	String	<p>Corresponds to the <b>Type</b> parameter on the console. Type of an alarm. The options are as follows: <b>pedestrian, bicycle, electromobile, car, slag_car, trailer, concrete_mixer, bus, other_vehicle.</b></p> <ul style="list-style-type: none"> <li>• The algorithm generates alarms of the specified type.</li> <li>• If there is a space on both sides of the comma (,), the space will be ignored. If all types are incorrectly set, all types of alarms are reported. If some types are correctly set, only alarms of the correct types are reported.</li> <li>• The default value is <b>default</b>, indicating that alarms of all types are reported.</li> </ul>

Parameter	Mandatory	Type	Description
attribute	No	String	<ul style="list-style-type: none"> <li>• Corresponds to <b>Attribute</b> on the console.</li> <li>• The algorithm checks the specified attributes of the monitored object. An alarm is reported only when the value of the attribute is within the specified range.</li> <li>• If this parameter is left blank, the algorithm does not check the attributes and directly reports alarms based on the alarm types.</li> <li>• Separate multiple attributes by commas (.). For example, if you want to generate alarms only for juveniles and youth, set this parameter to <b>child,young</b>.</li> <li>• For details about the value range, see the "attribute parameter description" in Detection Result.</li> <li>• If there is a space on both sides of the comma (,), the space will be ignored. If all attributes are incorrectly set, alarms are reported based on the alarm types. If some attributes are correctly set, only the alarms of correct attributes are reported.</li> </ul>

## Response Parameters

Status code: 201

Table 4-283 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-284** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a target attribute recognition (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-object-attrib-recog-edge/tasks
{
  "name": "attri-task",
  "description": "attri task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-attrib"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]],\"name\": \"a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

### 4.1.21 Creating an E-bike Rider Helmet Detection (Edge) Job

#### Function

This API is used to create an e-bike rider helmet detection (edge) job.

#### URI

POST /v1/{project\_id}/infer/services/c-helmet-elec-recog-edge/tasks

**Table 4-285** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

#### Request Parameters

**Table 4-286** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">HelmetElecRecogServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-287** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>



Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-288** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-289** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-290** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-291** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-292** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-293** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-294** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-295** HelmetElecRecogServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>HelmetElecRecogCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-296** HelmetElecRecogCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-297 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-298 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an e-bike rider helmet detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-helmet-elec-recog-edge/tasks
```

```
{
  "name": "helmet-task",
  "description": "helmet task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-helmet"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.22 Creating an Umbrella Violation Detection (Edge) Job

### Function

This API is used to create an umbrella violation detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-urban-umbrella-edge/tasks



**Table 4-299** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-300** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">UmbrellaServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-301** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-302** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-303** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-304** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-305** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-306** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-307** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-308** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-309** UmbrellaServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>UmbrellaCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-310** UmbrellaCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-311** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-312** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an umbrella violation detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-umbrella-edge/tasks
{
  "name" : "umbrella-task",
  "description" : "umbrella task test",
  "input" : {
    "type" : "edgcamera",
    "data" : [ {
      "id" : "aec5857c-222f-4aa9-be39-23654e118886",
      "index" : 0
    } ]
  },
  "output" : {
    "dis" : {
      "stream_name" : "dis-umbrella"
    }
  },
  "service_version" : "3.0",
  "resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config" : {
    "common" : {
      "image_compression_ratio" : 90,
      "render_roi_sw" : 1,
      "render_result_sw" : 1,
      "target_roi" : "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]], \"name\": \"a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.23 Creating an Advertisement Violation Detection (Edge) Job

### Function

This API is used to create an advertisement violation detection (edge) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-sign-detect-edge/tasks

**Table 4-313** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-314** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">SignDetectServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-315** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-316** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-317** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-318** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-319** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-320** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-321** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.



**Table 4-322** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-323** SignDetectServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>SignDetectCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-324** SignDetectCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-325** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-326** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an advertisement violation detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-sign-detect-edge/tasks
{
  "name" : "sign-detect-task",
  "description" : "sign task test",
  "input" : {
    "type" : "edgecamera",
    "data" : [ {
      "id" : "aec5857c-222f-4aa9-be39-23654e118886",
      "index" : 0
    } ]
  },
  "output" : {
    "dis" : {
      "stream_name" : "dis-sign-detect"
    }
  },
  "service_version" : "3.0",
  "resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config" : {
    "common" : {
      "image_compression_ratio" : 90,
      "render_roi_sw" : 1,
      "render_result_sw" : 1,
      "target_roi" : "{\\"polygons\":[{\\"data\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\":"a"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.24 Creating a Messy Piles Detection (Edge) Job

### Function

This API is used to create a messy piles detection (edge) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-stacking-edge/tasks

**Table 4-327** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-328** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">StackingServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-329** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-330** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-331** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-332** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .



Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-333** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-334** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-335** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-336** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-337** StackingServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>StackingCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-338** StackingCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-339** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-340** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a messy piles detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-stacking-edge/tasks
{
  "name": "stacking-detect-task",
  "description": "stacking task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-stacking-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\"polygons\\":[{\"data\\":[[84,389],[1840,349],[1824,526],[78,526]],\"name\\":\\"a\\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.25 Creating a Clothes Airing Violation Detection (Edge) Job

### Function

This API is used to create a clothes airing violation detection (edge) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-drying-edge/tasks

**Table 4-341** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-342** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">DryingServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-343** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.



**Table 4-344** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-345** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-346** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-347** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-348** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-349** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-350** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-351** DryingServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>DryingCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-352** DryingCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-353** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-354** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a clothes airing violation detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-drying-edge/tasks
{
  "name": "drying-detect-task",
  "description": "drying task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-drying-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]], \"name\": \"a\"}]"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.26 Creating a Littering Construction Waste Detection (Edge) Job

### Function

This API is used to create a littering construction waste detection (edge) job.



## URI

POST /v1/{project\_id}/infer/services/c-urban-dregs-edge/tasks

**Table 4-355** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-356** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">DregsService Config</a> object	Job configuration parameters
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-357** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-358** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-359** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-360** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-361** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-362** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-363** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-364** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-365** DregsServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>DregsCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-366** DregsCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>



Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-367** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-368** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a littering construction waste detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-dregs-edge/tasks
{
  "name": "dregs-detect-task",
  "description": "dregs task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-dregs-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\"polygons\\":[[{\\"data\\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\\":\\"a\\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.27 Creating a Missing Manhole Cover Detection (Edge) Job

### Function

This API is used to create a missing manhole cover detection (edge) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-manholecover-miss-edge/tasks

**Table 4-369** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-370** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">ManholecoverMissServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-371** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-372** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-373** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-374** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-375** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-376** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-377** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.



**Table 4-378** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-379** ManholecoverMissServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>ManholecoverMissCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-380** ManholecoverMissCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Do not draw a border.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon"}]}</li> <li>You can set a name for each region. The region name will be displayed in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-381** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-382** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a missing manhole cover detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-manholecover-miss-edge/tasks
{
  "name": "manholecovermiss-detect-task",
  "description": "manholecovermiss task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-manholecovermiss-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]],\"name\": \"a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

### 4.1.28 Creating a Missing Manhole Cover Detection From a Dynamic Perspective (Edge) Job

#### Function

This API is used to create a missing manhole cover detection from a dynamic perspective (edge) job.

## URI

POST /v1/{project\_id}/infer/services/c-mobile-manholecover-edge/tasks

**Table 4-383** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-384** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">MobileManholecoverMissServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-385** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-386** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-387** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-388** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .



Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-389** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-390** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-391** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-392** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-393** MobileManholecoverMissServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>MobileManholecoverMissCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-394** MobileManholecoverMissCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: Do not draw a border.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be displayed in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-395** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-396** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a missing manhole cover detection from a dynamic perspective (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-mobile-manholecover-edge/tasks
{
  "name": "mobile-manholecovermiss-detect-task",
  "description": "manholecovermiss task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-mobile-manholecovermiss-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\"polygons\\":[{\\"data\\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\\":\\"a\\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.29 Creating an Urban Trash Detection (Edge) Job

### Function

This API is used to create an urban trash detection (edge) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-trash-detect-edge/tasks

**Table 4-397** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-398** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">TrashDetectServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-399** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.



**Table 4-400** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-401** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-402** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-403** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-404** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-405** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-406** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-407** TrashDetectServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>TrashDetectCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-408** TrashDetectCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
trash_detect_sw	No	Integer	<p>Corresponds to the <b>Trash Detection Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>1</b>: Trash will be detected.</li> <li>• <b>2</b>: Trash and the person who threw trash will be detected.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>1</b> Maximum: <b>2</b> Default: <b>1</b></p>
person_constraint_sw	No	Integer	<p>Corresponds to the <b>Person Constraint Switch</b> parameter on the console. When this switch is on, alarms indicating that there are persons near the trash will be filtered out.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: The switch is off.</li> <li>• <b>1</b>: The switch is on.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
min_trash_size	No	Integer	Corresponds to the <b>Minimum Trash Size</b> parameter on the console. Trash definition varies depending on the application scenario. If the trash size is smaller than the value of this parameter, no alarm is generated. The value ranges from 1 to 500. The unit is pixel. The default value is 1. Minimum: <b>1</b> Maximum: <b>500</b> Default: <b>1</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be displayed in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

Status code: 201

Table 4-409 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-410 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>



## Example Requests

Create an urban trash detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-trash-detect-edge/tasks
{
  "name": "trash-detect-task",
  "description": "trash task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-trash-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "trash_detect_sw": 1,
      "person_constraint_sw": 0,
      "min_trash_size": 1,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\n\"polygons\"::[{\n\"data\":[[84,389],[1840,349],[1824,526],[78,526]],\n\"name\":\n\"a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.30 Creating an Urban Mobile Trash Detection (Edge) Job

### Function

This API is used to create an urban mobile trash detection (edge) job.

## URI

POST /v1/{project\_id}/infer/services/c-mobile-trash-detect-edge/tasks

**Table 4-411** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-412** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">MobileTrashServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-413** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-414** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-415** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-416** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-417** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-418** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-419** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-420** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-421** MobileTrashServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>MobileTrashCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.



**Table 4-422** MobileTrashCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
min_trash_size	No	Integer	Corresponds to the <b>Minimum Trash Size</b> parameter on the console. Trash definition varies depending on the application scenario. If the trash size is smaller than the value of this parameter, no alarm is generated. The value ranges from 20 to 500. The unit is pixel. The default value is <b>1</b> . Minimum: <b>20</b> Maximum: <b>500</b> Default: <b>20</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

## Response Parameters

Status code: 201

**Table 4-423** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-424** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an urban mobile trash detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-mobile-trash-detect-edge/tasks

```
{
  "name": "mobile-trash-task",
  "description": "mobile-trash task test",
  "input": {
    "type": "edgcamera",
    "data": [
      {
        "id": "aec5857c-222f-4aa9-be39-23654e118886",
        "index": 0
      }
    ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-mobile-trash"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "min_trash_size": 1,
      "render_result_sw": 1,
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

### 4.1.31 Creating an Urban Roadside Stall Detection (Edge) Job

#### Function

This API is used to create an urban roadside stall detection (edge) job.

#### URI

POST /v1/{project\_id}/infer/services/c-urban-roadside-stall-edge/tasks

**Table 4-425** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

#### Request Parameters

**Table 4-426** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.

Parameter	Mandatory	Type	Description
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">RoadsideServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-427** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-428** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-429** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-430** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-431** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .



**Table 4-432** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-433** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-434** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-435** RoadsideServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>RoadsideCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-436** RoadsideCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>

Parameter	Mandatory	Type	Description
roadside_stall_detect_sw	No	Integer	<p>Corresponds to the <b>Roadside Stall Detection Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Roadside stall will not be detected.</li> <li>• <b>1</b>: Roadside stall will be detected.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
outstore_stall_detect_sw	No	Integer	<p>Corresponds to the <b>Outstore Stall Detection Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Outstore stall will not be detected.</li> <li>• <b>1</b>: Outstore stall will be detected.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon"}]}</li> <li>• You can set a name for each region. The region name will be contained in the result.</li> <li>• If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

Parameter	Mandatory	Type	Description
repeat_alert_sw	No	Integer	<p>Corresponds to the <b>Repeated Alert Switch</b> parameter on the console. This parameter specifies whether to generate repeated alarms for the same object. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No repeated alarms are generated for the same object.</li> <li>• <b>1</b>: Repeated alarms are generated for the same object.</li> <li>• The default value is <b>0</b>. When repeated alarms are enabled, the <b>repeat_alert_interval</b> parameter is valid only when the <b>detection_id</b> is the same for all the alarms generated for the same object.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
repeat_alert_interval	No	Integer	<p>Corresponds to the <b>Repeated Alert Interval</b> parameter on the console. This parameter is valid only when <b>repeat_alert_sw</b> is set to <b>1</b>. This parameter specifies the interval between repeated alarms, in seconds. The value ranges from 30 to 86400. The default value is <b>30</b>, indicating that an alarm is generated every 30 seconds, and the <b>detection_id</b> of the alarms generated for the same object is the same.</p> <p>Minimum: <b>30</b> Maximum: <b>86400</b> Default: <b>30</b></p>

## Response Parameters

**Status code: 201**

**Table 4-437** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-438** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an urban roadside stall detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-urban-roadside-stall-edge/tasks

```
{
  "name": "roadside-task",
  "description": "roadside task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-roadside"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "roadside_stall_detect_sw": 1,
      "outstore_stall_detect_sw": 0,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\\"polygons\\\":[{\\\"data\\\":[[84,389],[1840,349],[1824,526],[78,526]],\\\"name\\\":\\\"a\\\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.32 Creating an Exposed Bare Soil Detection (Edge) Job

### Function

This API is used to create an exposed bare soil detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-urban-soil-exposure-edge/tasks

**Table 4-439** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-440** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).

Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>SoilExposureServiceConfig</b> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-441** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.



Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-442** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-443** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-444** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-445** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-446** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-447** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-448** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-449** SoilExposureServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>SoilExposure Common</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-450** SoilExposureCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-451** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-452** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>



## Example Requests

Create an exposed bare soil detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-soil-exposure-edge/tasks
{
  "name": "soil-exposure-task",
  "description": "soil-exposure task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-soil-exposure"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\"polygons\":[{\\"data\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\":"\a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

### 4.1.33 Creating a Wrong-Way Driving Detection (Edge) Job

#### Function

This API is used to create a wrong-way driving detection (edge) job.

## URI

POST /v1/{project\_id}/infer/services/c-retrograde-detection-edge/tasks

**Table 4-453** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-454** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">RetrogradeServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-455** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-456** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-457** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-458** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-459** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-460** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-461** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-462** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-463** RetrogradeServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>RetrogradeCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.



**Table 4-464** RetrogradeCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Quality coefficient of the output image. The value ranges from 20 to 100, and the default value is <b>100</b>. If the value is <b>80</b>, the definition of the output image is 80% of that of the original image. A smaller value indicates a more blurred image and a smaller amount of image data to be received.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>100</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
license_plate	No	<b>LicensePlate</b> object	License plate information.

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"lines":[{"data": [[1723,561], [466,592]],"properties": {"side1_name":"forward","side2_name":"backward"}}]} (<b>forward</b> indicates the positive direction and <b>backward</b> indicates the negative direction.)</li> <li>If this parameter is not set, the default area is the horizontal area in the middle of the image. Downward the area indicates the positive direction, and upward the area indicates the negative direction.</li> <li>When a vehicle crosses the configured line from the negative direction towards the positive direction, it is considered that the vehicle travels in the positive direction. When the vehicle crosses the configured line from the positive direction towards the negative direction, it is considered that the vehicle travels in the negative direction.</li> </ul>

**Table 4-465** LicensePlate

Parameter	Mandatory	Type	Description
local_city	No	String	City abbreviation.
local_province	No	String	Province abbreviation.

## Response Parameters

Status code: 201

**Table 4-466** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-467** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a wrong-way driving detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-retrograde-detection-edge/tasks
```

```
{
  "name": "retrograde-task",
  "description": "retrograde task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-retrograde"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "target_roi": "{\\"lines\\":{\\\"data\\\":[[1723,561],[466,592]],\\"properties\\":{\\\"side1_name\\\":\\"forward\\\",\\"side2_name\\\":\\"backward\\\"}}}",
      "license_plate": {
        "local_city": "B",
        "local_province": "Jin"
      }
    },
    "render_result_sw": 1,
    "render_roi_sw": 1,
    "image_compression_ratio": 100
  }
}
```

```
}
}
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.34 Creating a Speeding Detection at High Altitudes (Edge) Job

### Function

This API is used to create a speeding detection at high altitudes (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-highpoint-overspeed-edge/tasks

**Table 4-468** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-469** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">HighpointOverspeedServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-470** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-471** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-472** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-473** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .



Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-474** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-475** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-476** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-477** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-478** HighpointOverspeedServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>HighpointOverspeedCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-479** HighpointOverspeedCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Quality coefficient of the output image. The value ranges from 20 to 100, and the default value is <b>100</b> . If the value is <b>80</b> , the definition of the output image is 80% of that of the original image. A smaller value indicates a more blurred image and a smaller amount of image data to be received.  Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>100</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
camera_calibration	No	String	<p>Camera calibration information, including the vanishing point on the x-axis, vanishing point on the y-axis, and scaling coefficient on the x-axis. The x-axis is parallel to the lane, and the y-axis is perpendicular to the lane. The parameter type is string. The format is as follows:</p> <ul style="list-style-type: none"> <li>• [75.318722, 63.472760, 3372.332762, -20.42195, 0.031882]</li> <li>• The square brackets enclose five numbers. The first four numbers are floating point numbers of the double type, and the fifth number is a positive floating point number of the double type.</li> <li>• The first number in the square brackets indicates the x coordinate of the vanishing point on the x-axis; the second number indicates the y coordinate of the vanishing point on the x-axis; the third number indicates the x coordinate of the vanishing point on the y-axis; the fourth number indicates the y coordinate of the vanishing point on the y-axis; the fifth number indicates the scaling coefficient on the x-axis.</li> </ul>
speed_threshold	No	Integer	<p>Speed threshold, in km/h. The value ranges from 0 to 150, and the default value is <b>40</b>.</p> <p>Minimum: <b>0</b> Maximum: <b>150</b> Default: <b>40</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</p> <ul style="list-style-type: none"> <li>• Example: {"polygons": [{"data": [[0,0], [0,1080], [1920,1080], [1920,0]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-480 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-481 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a speeding detection at high altitudes (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```

POST /v1/{project_id}/infer/services/c-highpoint-overspeed-edge/tasks

{
  "name": "highpoint-overspeed-task",
  "description": "highpoint-overspeed task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-highpoint-overspeed"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "target_roi": "{\n\"polygons\":{\n\"data\":[[268,361],[386,556],[539, 506],[364,332]]},{\n\"data\":[[474,689],\n[758,1070],[1183,1070],[668,627]]}}}",
      "camera_calibration": "[75.318722,63.472760,3372.332762,-20.421955,0.031882]",
      "speed_threshold": 40,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "image_compression_ratio": 100
    }
  }
}

```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.35 Creating a Vehicle Counting at High Altitudes (Edge) Job

### Function

This API is used to create a vehicle counting at high altitudes (edge) job.

### URI

POST /v1/{project\_id}/infer/services/c-vehicle-statistics-edge/tasks

**Table 4-482** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-483** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">VehicleStatisticsServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package



**Table 4-484** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-485** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-486** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-487** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-488** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-489** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-490** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-491** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-492** VehicleStatisticsServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>VehicleStatisticsCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-493** VehicleStatisticsCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Quality coefficient of the output image. The value ranges from 20 to 100, and the default value is <b>100</b> . If the value is <b>80</b> , the definition of the output image is 80% of that of the original image. A smaller value indicates a more blurred image and a smaller amount of image data to be received.  Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>100</b>
count_interval	No	Integer	Output interval in seconds. The value ranges from 1 to 3600. The default value is <b>10</b> .  Minimum: <b>0</b> Maximum: <b>3600</b> Default: <b>10</b>

Parameter	Mandatory	Type	Description
output_image_sw	No	Integer	Whether to output an image. Value <b>1</b> means to output an image, and <b>0</b> means the opposite. Other values are invalid. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
target_roi	No	String	Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a> . <ul style="list-style-type: none"> <li>• Example: {"polygons": [{"data": [[0,0], [0,1080], [1920,1080], [1920,0]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-494 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-495 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code

Parameter	Type	Description
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a vehicle counting at high altitudes (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-vehicle-statistics-edge/tasks

```
{
  "name": "vehicle-statistics-task",
  "description": "vehicle-statistics task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-vehicle-statistics"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "target_roi": "{\"polygons\": [{\"data\": [[487,465],[1850,450],[1905,1013],[515,1050]]}]}",
      "count_interval": 10,
      "output_image_sw": 1,
      "image_compression_ratio": 100
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).



## 4.1.36 Creating a Vessel Intrusion Detection (Edge) Job

### Function

This API is used to create a vessel intrusion detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/ship-intrusion-edge/tasks

**Table 4-496** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-497** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">ShipIntrusionServiceConfig</a> object	Job configuration parameters

Parameter	Mandatory	Type	Description
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-498** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-499** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-500** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-501** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-502** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-503** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-504** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-505** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-506** ShipIntrusionServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>ShipIntrusion Common</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-507** ShipIntrusionCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame. By default, the line is horizontal and drawn at the position where the height is 50% of the image height. If the image width is w and the image height is h, the default position of the line is [[1/4w,1/2h], [3/4w,1/2h]].</li> </ul>

## Response Parameters

Status code: 201

Table 4-508 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-509 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a vessel intrusion detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/ship-intrusion-edge/tasks
{
  "name": "ship-intrusion-task",
  "description": "ship-intrusion task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-ship-intrusion"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.37 Creating a Floating Debris Detection (Edge) Job

### Function

This API is used to create a floating debris detection (edge) job.

## URI

POST /v1/{project\_id}/infer/services/floating-edge/tasks

**Table 4-510** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-511** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">FloatingServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-512** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-513** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-514** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-515** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-516** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-517** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-518** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.



**Table 4-519** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-520** FloatingServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>FloatingCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-521** FloatingCommon

Parameter	Mandatory	Type	Description
night_detection_sw	No	Integer	Whether to enable detection at night in the target area. The default value is <b>0</b> . The options are as follows: <ul style="list-style-type: none"> <li>• <b>1</b>: Detection at night is enabled.</li> <li>• <b>0</b>: Detection at night is disabled.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-522 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-523** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a floating debris detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/floating-edge/tasks

```
{
  "name": "floating-task",
  "description": "floating task test",
  "input": {
    "type": "edgecamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-floating"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "night_detection_sw": 1,
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

### 4.1.38 Creating a Drainage Outlet Monitoring (Edge) Job

#### Function

This API is used to create a drainage outlet monitoring (edge) job.

#### URI

POST /v1/{project\_id}/infer/services/drainage-recognition-edge/tasks

**Table 4-524** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

#### Request Parameters

**Table 4-525** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">DrainageServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-526** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-527** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-528** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Input type of a job. This parameter is mandatory. Options:</p> <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-529** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.



Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-530** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-531** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-532** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-533** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-534** DrainageServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>DrainageCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-535** DrainageCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
alarm_repeat_send_interval	No	Integer	<p>Interval for reporting the drainage port status, in minutes. The value ranges from 1 to 360, and the default value is <b>5</b>.</p> <p>Minimum: <b>1</b> Maximum: <b>360</b> Default: <b>5</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the automatic AI positioning for the drainage port is enabled by default. Automatic positioning and calibration of the drainage port ROI area are performed when a task is delivered and at 7:00 a.m. every day.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-536** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-537** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a drainage outlet monitoring (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/drainage-recognition-edge/tasks
{
  "name": "drainage-task",
  "description": "drainage task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-drainage"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "render_result_sw": 0,
      "alarm_repeat_send_interval": 5,
      "image_compression_ratio": 90,
      "target_roi": "{\"polygons\": [{\"data\": [[0,0],[0,1080],[1920,1080],[1920,0]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.1.39 Creating a River Water Level Gauge Reading (Edge) Job

### Function

This API is used to create a river water level gauge reading (edge) job.

## URI

POST /v1/{project\_id}/infer/services/cali-water-ruler-river-edge/tasks

**Table 4-538** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-539** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">WaterRulerServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-540** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.



**Table 4-541** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-542** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-543** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-544** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-545** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-546** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-547** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-548** WaterRulerServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>WaterRulerCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-549** WaterRulerCommon

Parameter	Mandatory	Type	Description
report_interval	No	Number	Report interval, in minutes. The value ranges from 0.1 to 360.0. The default value is <b>1.0</b> , indicating that data is reported every minute. Minimum: <b>0.1</b> Maximum: <b>360.0</b> Default: <b>1.0</b>
calibration_info	No	String	Corresponds to the <b>Calibration Information</b> parameter on the console. The value of this parameter is a JSON string. An escape character must be added in an API call. Example: <ul style="list-style-type: none"> <li> <pre> {"lines":[{"data": [[1000,159], [1033,156]],"properties": {"scale":"100"}},{"data": [[1003,288], [1038,286]],"properties": {"scale":"75"}},{"data": [[1010,571], [1044,567]],"properties": {"scale":"20"}}} </pre> </li> <li><b>data</b> indicates the two endpoints of the calibration line, and <b>scale</b> indicates the corresponding watermark (cm).</li> </ul>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>Ensure that the water ruler falls within the value of this parameter so that the water ruler can be read to generate correct alarms.</li> <li>When the video resolution changes, modify this parameter in the job configuration. If this parameter is unavailable or incorrectly set, the default value is used, that is, the entire video frame.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-550** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-551** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code

Parameter	Type	Description
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a river water level gauge reading (edge) job. Use an edge camera as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/cali-water-ruler-river-edge/tasks

```
{
  "name": "water-ruler-task",
  "description": "water-ruler task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-water-ruler"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "report_interval": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[0,0],[0,1080],[1920,1080],[1920,0]]}]",
      "calibration_info": "{\"lines\": [{\"data\": [[460,741],[660,741]],\"scale\": 110}, {\"data\": [[460,420],[660,420]],\"scale\": 71}, {\"data\": [[460,190],[660,190]],\"scale\": 22}]"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).



## 4.1.40 Creating a Waterlogging Detection (Edge) Job

### Function

This API is used to create a waterlogging detection (edge) job.

### URI

POST /v1/{project\_id}/infer/services/w-ponding-detection-edge/tasks

**Table 4-552** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-553** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">PondingServiceConfig</a> object	Job configuration parameters

Parameter	Mandatory	Type	Description
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-554** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-555** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-556** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-557** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-558** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-559** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-560** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-561** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-562** PongdingServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>PongdingCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-563** PondingCommon

Parameter	Mandatory	Type	Description
alert_mode	No	String	<p>Corresponds to the <b>Alert Mode</b> parameter on the console. This parameter specifies the detection alarm mode. Two modes are available:</p> <ul style="list-style-type: none"> <li>• <b>single</b>: one-off alarm mode. When a specific event occurs, an alarm is generated and the event information is reported.</li> <li>• <b>periodic</b>: periodic alarm mode. All status information is reported at a specified detection interval.</li> <li>• The default value is <b>single</b>.</li> </ul>
alert_detection_interval	No	Integer	<p>Corresponds to the <b>Detection Interval</b> parameter on the console. This parameter specifies the detection interval in seconds. The value ranges from 10 to 86400.</p> <ul style="list-style-type: none"> <li>• This parameter is valid only when <b>alert_mode</b> is set to <b>periodic</b>.</li> </ul> <p>Minimum: <b>10</b> Maximum: <b>86400</b> Default: <b>60</b></p>
ponding_area_ratio_thres	No	Number	<p>Corresponds to the <b>Ponding Area Ratio Threshold</b> parameter on the console. When the ratio of the ponding area to the image area exceeds the threshold, an alarm is triggered and an alarm image is output in JSON format.</p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0.1</b></p>



Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to render the ponding area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: The ponding area will not be rendered.</li> <li>• <b>1</b>: The ponding area will be rendered in red.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-564** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-565** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a waterlogging detection (edge) job. Use an edge camera as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/w-ponding-detection-edge/tasks
```

```
{
  "name": "ponding-task",
  "description": "ponding task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-ponding"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alert_mode": "single",
      "alert_detection_interval": 60,
      "ponding_area_ratio_thres": 0.1,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\\"polygons\":[{\\"data\":[[100,100],[1800,100],[1800,1000],[100,1000]]}]",
      "image_compression_ratio": 80
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2 Cloud Service APIs

### 4.2.1 Creating a People Flow Counting (Cloud) Job

#### Function

This API is used to create a people flow counting (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/c-flowcount-cloud/tasks

**Table 4-566** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-567** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">FlowCountServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-568** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-569** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-570** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-571** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-572** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .



Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-573** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-574** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-575** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-576** FlowCountServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>FlowCountCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-577** FlowCountCommon

Parameter	Mandatory	Type	Description
line_count_interval	No	Integer	Interval for collecting the number of people per second who cross a particular straight line in a video. The value ranges from 1 to 86400 and the default value is 2. Minimum: <b>1</b> Maximum: <b>86400</b> Default: <b>2</b>
region_count_interval	No	Integer	Interval for collecting the number of people per second who cross through a particular area. The value ranges from 1 to 86400 and the default value is 2. Minimum: <b>1</b> Maximum: <b>86400</b> Default: <b>2</b>
line_detection_sw	No	Integer	Whether to collect the number of people who cross a particular straight line in a video. <b>0</b> : disabled. <b>1</b> : enabled. The default value is 1. Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
region_detection_sw	No	Integer	Whether to collect the number of people who cross through a particular area. <b>0</b> : disabled. <b>1</b> : enabled. The default value is 1. Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
heatmap_detection_sw	No	Integer	Whether to enable heatmap detection. <b>0</b> : disabled. <b>1</b> : enabled. The default value is 0. Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
heatmap_detection_interval	No	Integer	Heatmap detection period, in seconds. The value ranges from 10 to 86400 and the default value is <b>10</b> . Minimum: <b>10</b> Maximum: <b>86400</b> Default: <b>10</b>
heatmap_point_interval	No	Integer	Hotspot update period, in frames. In a heatmap detection period, hotspot values gradually accumulate. The value ranges from 1 to 10000 and the default value is <b>4</b> . Minimum: <b>1</b> Maximum: <b>10000</b> Default: <b>4</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: <code>{"lines":[{"data": [[560,680], [1185,506]],"properties": {"side1_name":"Side1","side2_name":"Side2"}],"polygons":[{"data": [[0,0], [0,1080], [1920,1080], [1920,0]]}]}</code></li> <li>If the line configuration is not specified, the default value is used. By default, the line is horizontal and drawn at the position where the height is 50% of the image height. If the image width is <math>w</math> and the image height is <math>h</math>, the default position of the line is <math>[[1/4w, 1/2h], [3/4w, 1/2h]]</math>.</li> <li>If the area configuration is not specified, the default value is used. By default, the area is a rectangle, which is 1/4 of the middle of the entire video frame. If the image width is <math>w</math> and the image height is <math>h</math>, the positions of the four endpoints of the area are <math>[[1/4w, 1/4h], [3/4w, 1/4h], [1/4w, 3/4h], [3/4w, 3/4h]]</math>.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-578** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-579** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a people flow counting job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-flowcount-cloud/tasks

```
{
  "name": "flowcount-task",
  "description": "flowcount task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "flowcount",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-flowcount"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "line_count_interval": 2,
      "region_count_interval": 2,
      "line_detection_sw": 1,
      "region_detection_sw": 1,
      "attribute_detection_sw": 0,
      "target_roi": "{\\\"lines\\\":{\\\"data\\\":[[560,680],[1185,506]],\\\"properties\\\":{\\\"side1_name\\\":\\\"Side1\\\",\\\"side2_name\\\":\\\"Side2\\\"}},\\\"polygons\\\":{\\\"data\\\":[[0,0],[0,1080],[1920,1080],[1920,0]]}}",
      "heatmap_detection_sw": 0,
      "heatmap_detection_interval": 60,
      "heatmap_point_interval": 4
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.2 Creating an Intrusion Detection (Cloud) Job

### Function

This API is used to create an intrusion detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-intrusiondetection-cloud/tasks

**Table 4-580** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-581** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).

Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>IntrusionServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-582** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.



Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-583** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-584** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-585** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-586** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-587** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-588** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-589** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-590** IntrusionServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>IntrusionCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-591** IntrusionCommon

Parameter	Mandatory	Type	Description
car_detection_sw	No	Integer	Corresponds to the <b>Car Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>0</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
person_detection_sw	No	Integer	Corresponds to the <b>Person Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
detection_min_size	No	Integer	Corresponds to the <b>Detection Minimum Size</b> parameter on the console. This parameter specifies the minimum pixel value of the detection object. The value ranges from 60 to 4000 and the default value is <b>60</b> . Minimum: <b>60</b> Maximum: <b>4000</b> Default: <b>60</b>
detection_max_size	No	Integer	Corresponds to the <b>Detection Maximum Size</b> parameter on the console. This parameter specifies the maximum pixel value of the detection object. The value ranges from 640 to 4000 and the default value is <b>1080</b> . Minimum: <b>640</b> Maximum: <b>4000</b> Default: <b>1080</b>
line_detection_sw	No	Integer	Corresponds to the <b>Line Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
region_detection_sw	No	Integer	Corresponds to the <b>Region Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
loitering_detection_sw	No	Integer	Corresponds to the <b>Loitering Detection Switch</b> parameter on the console. <b>0</b> : disabled. <b>1</b> : enabled. The default value is <b>0</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>



Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
all_print_sw	No	Integer	<p>Corresponds to the <b>All Print Switch</b> parameter on the console. This parameter specifies whether the output contains historical alarm objects. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No historical alarm objects are contained in the output.</li> <li>• <b>1</b>: Historical alarm objects are contained in the output.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"lines":[{"data": [[560,680], [1185,506]],"properties":{"side1_name":"Side1","side2_name":"Side2"}],"polygons":[{"data": [[0,0], [0,1080], [1920,1080], [1920,0]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame. By default, the line is drawn at the position where the height is 50% of the image height. If the image width is w and the image height is h, the default position of the line is <math>[[1/4w, 1/2h], [3/4w, 1/2h]]</math>.</li> </ul>

## Response Parameters

Status code: 201

Table 4-592 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-593** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an intrusion detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-intrusiondetection-cloud/tasks
```

```
{
  "name": "intrusiondetection-task",
  "description": "intrusiondetection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "flowcount",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-intrusiondetection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "car_detection_sw": 0,
      "person_detection_sw": 1,
      "detection_min_size": 60,
      "detection_max_size": 1080,
      "line_detection_sw": 1,
      "region_detection_sw": 1,
      "loitering_detection_sw": 0,
      "image_compression_ratio": 90,
      "render_result_sw": 1,
      "all_print_sw": 0,
      "render_roi_sw": 1,
      "target_roi": "{\lines\":{\data\":[[560,680],[1185,506]],\properties\":{\side1_name
\":"Side1\","\side2_name\":"Side2\"}}},\polygons\":{\data\":[[0,0],[0,1080],[1920,1080],[1920,0]]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.3 Creating an On-Duty Inspection (Cloud) Job for Key Positions

### Function

This API is used to create an on-duty inspection (cloud) job for key positions.

### URI

POST /v1/{project\_id}/infer/services/c-staffonduty-cloud/tasks

**Table 4-594** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-595** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.

Parameter	Mandatory	Type	Description
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">StaffOnDuty</a> <a href="#">ServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-596** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-597** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-598** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-599** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .



Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-600** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-601** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-602** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-603** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-604** StaffOnDutyServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>StaffOnDutyCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-605** StaffOnDutyCommon

Parameter	Mandatory	Type	Description
key_region_detection_sw	No	Integer	Corresponds to the <b>Key Region Detection Switch</b> parameter on the console. This parameter specifies whether to enable detection alarms. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
key_region_person_count	No	Integer	Corresponds to the <b>Key Region Person Count</b> parameter on the console. This parameter specifies the minimum number of on-duty staffs in a detection area. The value ranges from 1 to 100 and the default value is 2. Minimum: <b>1</b> Maximum: <b>100</b> Default: <b>2</b>
key_region_detect_interval	No	Integer	Corresponds to the <b>Key Region Detection Interval</b> parameter on the console. This parameter specifies the detection interval of the specified area, in seconds. The value ranges from 1 to 3600 and the default value is 1. When the time is an integral multiple of the detection period, the algorithm is triggered to detect the number of on-duty staffs. Minimum: <b>1</b> Maximum: <b>3600</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
key_region_detect_threshold	No	Integer	<p>Corresponds to the <b>Key Region Detection Threshold</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>Alarm triggering threshold, in the unit of the number of detection periods. The value ranges from 1 to 3600 and the default value is <b>60</b>. If the alarm triggering threshold is <math>N</math>, when the number of on-duty staffs is less than the minimum number in <math>N</math> consecutive detection periods, an alarm is triggered. When an alarm is triggered or the number of on-duty staffs reaches the minimum number, the counting restarts until the number reaches the alarm triggering threshold again.</li> </ul> <p>Minimum: <b>1</b> Maximum: <b>3600</b> Default: <b>60</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is 1/4 of the entire video frame. If the image width is w and the image height is h, the positions of the four endpoints of the area are [[1/4w, 1/4h], [3/4w, 1/4h], [1/4w, 3/4h], [3/4w, 3/4h]].</li> </ul>

## Response Parameters

Status code: 201

Table 4-606 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-607 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an on-duty inspection (cloud) job for key positions. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-staffonduty-edge/tasks

```
{
  "name": "staffonduty-task",
  "description": "staffonduty task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "staffonduty",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-staffonduty"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "target_roi": "{\"polygons\": [{\"data\": [[484,465],[1850,450],[1905,1013],[515,1050]]}, {\"data\": [[484,125],[1800,125],[1800,677],[495,677]]}]}",
      "image_compression_ratio": 90,
      "key_region_detection_sw": 1,
      "key_region_detect_interval": 2,
      "key_region_detect_threshold": 2,
      "key_region_person_count": 50
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.4 Creating an Abandoned Object Detection (Cloud) Job

### Function

This API is used to create an abandoned object detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-abandon-detection-cloud/tasks

**Table 4-608** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-609** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">AbandonServiceConfig</a> object	Job configuration parameters.



Parameter	Mandatory	Type	Description
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-610** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-611** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-612** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-613** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-614** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-615** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-616** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-617** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-618** AbandonServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>AbandonCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-619** AbandonCommon

Parameter	Mandatory	Type	Description
detection_min_size	No	Integer	Corresponds to the <b>Detection Minimum Size</b> parameter on the console. This parameter specifies the minimum pixel value of the detection object. The value is in direct proportion to the resolution. In the 1080p resolution, the value ranges from 50 to 400 and the default value is <b>50</b> . Minimum: <b>50</b> Maximum: <b>400</b> Default: <b>50</b>
alert_time_threshold	No	Integer	Corresponds to the <b>Alert Time Threshold</b> parameter on the console. This parameter specifies the threshold for generating an alarm for an abandoned object. When the duration that an object is abandoned exceeds the threshold (in the unit of seconds), an alarm will be generated. The value ranges from 10 to 300 and the default value is <b>10</b> . Minimum: <b>10</b> Maximum: <b>300</b> Default: <b>10</b>

Parameter	Mandatory	Type	Description
alert_detection_interval	No	Integer	<p>Corresponds to the <b>Alert Detection Interval</b> parameter on the console. This parameter specifies the interval for detecting abandoned object alarms. If multiple alarms are generated in an interval (in the unit of seconds), they are combined into one alarm. The value ranges from 1 to 150 and the default value is <b>5</b>. The recommended value ranges from 1 to 1/2 of the <b>alert_time_threshold</b> value.</p> <p>Minimum: <b>1</b> Maximum: <b>150</b> Default: <b>5</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-620** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-621** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an abandoned object detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-abandon-detection-cloud/tasks
{
  "name": "abandon-detection-task",
  "description": "Abandon Detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "abandon-detection-test",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-abandon-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "detection_min_size": 50,
      "alert_time_threshold": 10,
      "alert_detection_interval": 5,
      "image_compression_ratio": 80,
      "target_roi": "{\\\"polygons\\\":[{\\\"data\\\":[[84,389],[1840,349],[1824,526],[78,526]]}]}",
      "render_result_sw": 1,
      "render_roi_sw": 1
    }
  }
}
```

```
}  
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.5 Creating a Crowd Density Monitoring (Cloud) Job

### Function

This API is used to create a crowd density monitoring (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-crowdcount-cloud/tasks

**Table 4-622** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-623** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>CrowdCounts serviceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-624** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-625** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-626** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-627** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-628** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .



**Table 4-629** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-630** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-631** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-632** CrowdCountServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>CrowdCount Common</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-633** CrowdCountCommon

Parameter	Mandatory	Type	Description
alarm_threshold	No	String	<p>People count alarm thresholds. Default value: <b>50</b>. The value must be a positive integer. When the number of people in a video frame is greater than or equal to the threshold, the video image is output in JSON format for alarm. You can enter different alarm thresholds for each ROI. The alarm thresholds are separated by spaces.</p> <ul style="list-style-type: none"> <li>• If the number of alarm thresholds within the list is greater than the actual number of ROIs, the first alarm thresholds matching the number of ROIs are used.</li> <li>• If the number of alarm thresholds within the list is less than the actual number of ROIs, use the default value for the rest part.</li> <li>• For example, if there are three ROIs and three threshold values (<b>25 30 20</b>) are entered, the image is sent as long as one ROI alarm is generated. When there are only two values (<b>25 15</b>) are entered, the threshold of the third ROI will be defaulted to <b>50</b>. When there are more than three threshold values (such as <b>25 36 23 40</b>) are entered, the first three values (<b>25 36 23</b>) are automatically selected.</li> </ul>

Parameter	Mandatory	Type	Description
sampling_time_interval	No	Integer	<p>Interval (in seconds) at which video sampling is performed. The value ranges from 1 to 30 and the default value is <b>10</b>. By default, a video image is sampled every 10 seconds, and <math>N</math> frames will be skipped between every two image samplings.</p> <ul style="list-style-type: none"> <li><math>N = \text{sampling\_time\_interval} \times \text{Frame rate (fps)}</math>. For example, if the frame rate is 25 fps and the sampling interval is 1 second, 25 frames will be skipped between every two image samplings.</li> </ul> <p>Minimum: <b>1</b> Maximum: <b>30</b> Default: <b>10</b></p>
alert_mode	No	String	<p>Alarming mode. Default value: <b>single</b>. There are two alarm modes:</p> <ul style="list-style-type: none"> <li><b>single</b>: event alarming. An alarm is reported only when a new alarm event is generated and the number of people reaches the alarm threshold.</li> <li><b>periodic</b>: periodic alarming. An alarm is reported each time a video sampling interval expires.</li> </ul> <p>Default: <b>single</b></p>
banner_detection_sw	No	Integer	<p>Whether to enable protest banner detection. The value ranges from 0 to 1 and the default value is <b>0</b>. When the function is enabled, the system detects banners in the ROI area of video images.</p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
banner_thresh old	No	String	List of banner detection alarm thresholds. The default value is <b>1</b> . The value must be a positive integer. For details about how to use this parameter, see <b>alarm_threshold</b> .
visualization_ output_sw	No	Integer	Whether to send the edited video image with scenario information in it. The value ranges from 0 to 1 and the default value is <b>0</b> . By default, when the number of people in each ROI exceeds the alarm threshold, only the structured information of the original image is sent. The detected people and banners can be displayed only after the visualization function is enabled. The visualized alarm information in images for different scenarios is as follows: <ul style="list-style-type: none"> <li>• Banners for protests are marked in red boxes.</li> <li>• If a densely populated area is detected, the area is rendered in different colors.</li> <li>• Each ROI is marked with a yellow polygon in the image.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
density_sw	No	Integer	<p>Density estimation status. You can customize whether to use a density estimation model to evaluate the number of people. Use a density estimation model if the number of people is large and the alarm threshold is large.</p> <ul style="list-style-type: none"> <li>A density estimation model is used by default. The value ranges from 0 to 1 and the default value is 1.</li> </ul> <p>Minimum: 0 Maximum: 1 Default: 1</p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: 20 Maximum: 100 Default: 90</p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-634** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-635** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a crowd density monitoring (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-crowdcount-edge/tasks
```

```
{
  "name": "crowdcount-edge-task",
  "description": "Crowdcount detection task test",
  "input": {
    "type": "edgcamera",
    "data": [ {
      "id": "aec5857c-222f-4aa9-be39-23654e118886",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "crowdcount-edge"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "banner_detection_sw": 1,
      "banner_threshold": "2",
      "alarm_threshold": "5",
      "sampling_time_interval": 8,
      "density_sw": 1,
      "visualization_output_sw": 1,
      "image_compression_ratio": 80,
      "target_roi": "{\"polygons\": [{\"data\": [[100,100],[1800,100],[1800,1000],[100,1000]]}]}"
    }
  }
}
```

```
}  
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.6 Creating a Work Gear and Helmet Detection (Cloud) Job

### Function

This API is used to create a work gear and helmet detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-safetysuitedetection-cloud/tasks

**Table 4-636** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .



## Request Parameters

**Table 4-637** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>SafetySuitServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-638** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-639** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-640** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-641** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-642** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-643** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-644** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-645** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-646** SafetySuitServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<a href="#">SafetySuitCommon</a> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-647** SafetySuitCommon

Parameter	Mandatory	Type	Description
hat_detection_sw	No	Integer	Corresponds to the <b>Hat Detection Switch</b> parameter on the console. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
cloth_detection_sw	No	Integer	<p>Corresponds to the <b>Clothes Detection Switch</b> parameter on the console. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-648** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-649** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a work gear and helmet detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-safetysuitedetection-cloud/tasks

```
{
  "name": "safetysuite-detection-task",
  "description": "safetysuite detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "staffonduty",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-safetysuite-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "hat_detection_sw": 0,
      "cloth_detection_sw": 1,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.7 Creating a Smoke and Fire Detection (Cloud) Job

### Function

This API is used to create a smoke and fire detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-smoke-and-fire-cloud/tasks

**Table 4-650** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-651** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">SmokeAndFireServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-652** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-653** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-654** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-655** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-656** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-657** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-658** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>



Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-659** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-660** SmokeAndFireServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>SmokeAndFireCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-661** SmokeAndFireCommon

Parameter	Mandatory	Type	Description
video_sampl ing_interval	No	Integer	Corresponds to the <b>Video Sampling Interval</b> parameter on the console. The value ranges from 1 to 10 in the unit of seconds and the default value is <b>1</b> . Note: This parameter determines the detection frequency of the algorithm. If the interval increases, the maximum delay from smoke or fire occurrence to detection increases. Configure this parameter based on the acceptable response delay. Minimum: <b>1</b> Maximum: <b>10</b> Default: <b>1</b>
fire_detection _sw	No	Integer	Corresponds to the <b>Fire Detection Switch</b> parameter on the console. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
smoke_detecti on_sw	No	Integer	Corresponds to the <b>Smoke Detection Switch</b> parameter on the console. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: When the alarm is for smoke, the alarm object border is drawn in purple. When the alarm is for fire, the alarm object border is drawn in red.</li> </ul> <p>• The default value is <b>0</b>. Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> </ul> <p>• The default value is <b>0</b>. Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-662** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-663** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a smoke and fire detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```

POST /v1/{project_id}/infer/services/c-smoke-and-fire-cloud/tasks

{
  "name": "fireandsmoke-detection-task",
  "description": "fireandsmoke detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "fireandsmoke",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-fireandsmoke-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_result_sw": 1,
      "video_sampling_interval": 1,
      "target_roi": "{\\"polygons\\":[{\"data\\":[[204,64],[90,321],[511,319],[617,221],[582,38],[320,11],[228,24]]}]}",
      "render_roi_sw": 1,
      "fire_detection_sw": 1,
      "smoke_detection_sw": 1
    }
  }
}

```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.8 Creating a Fight Detection (Cloud) Job

### Function

This API is used to create a fight detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-fightdetect-cloud/tasks

**Table 4-664** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-665** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">FightDetectServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-666** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-667** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-668** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-669** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .



Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-670** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-671** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-672** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-673** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-674** FightDetectServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>FightDetectCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-675** FightDetectCommon

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-676** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-677** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a fight detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-fightdetect-cloud/tasks
{
  "name": "fight-detection-task",
  "description": "fight detection task test",
  "input": {
    "type": "vis",
    "data": [
      {
        "stream_name": "fight",
        "index": 0
      }
    ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-fight-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[204,64],[90,321],[511,319],[617,221],[582,38],[320,11],[228,24]]}]}",
      "render_roi_sw": 1,
    }
  }
}
```

```
}  
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.9 Creating a Shared Bicycle Detection (Cloud) Job

### Function

This API is used to create a shared bicycle detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-sharedbicycledetection-cloud/tasks

**Table 4-678** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-679** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">SharedBicycleServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-680** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>



Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-681** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-682** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-683** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-684** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-685** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-686** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-687** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-688** SharedBicycleServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<a href="#">SharedBicycleCommon</a> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-689** SharedBicycleCommon

Parameter	Mandatory	Type	Description
alert_mode	No	String	Alarming mode. There are two alarm modes: <ul style="list-style-type: none"> <li>• <b>single</b>: one-off alarming. When a specific event occurs, an alarm is generated and the event information is reported.</li> <li>• <b>periodic</b>: periodic alarming. An alarm is reported each time a detection period expires.</li> <li>• The default value is <b>single</b>.</li> </ul>

Parameter	Mandatory	Type	Description
alert_detection_interval	No	Integer	Corresponds to the <b>Alert Detection Interval</b> parameter on the console. This parameter specifies a parking violation detection period for shared bicycles, in seconds. The value ranges from 1 to 3600. Minimum: <b>1</b> Maximum: <b>3600</b> Default: <b>60</b>
illegal_park_alert_threshold	No	Integer	Corresponds to the <b>Illegal Park Alert Threshold</b> parameter on the console. This parameter specifies an alarm triggering threshold, in seconds. The value ranges from 10 to 300. If a shared bicycle stays longer than the specified time, an alarm is reported. Minimum: <b>10</b> Maximum: <b>300</b> Default: <b>30</b>

Parameter	Mandatory	Type	Description
all_print	No	Integer	<p>Whether to render all alarm objects in an output image. The value ranges from 0 to 1 and the default value is 0.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Draw the border of the target object for the current alarm only. For details about the rendering mode, see <b>normal_render</b>.</li> <li>• <b>1</b>: Draw all alarmed shared bicycles with parking violations in an image. The color of the new alarm object is different from that of other rendered objects.</li> <li>• When <b>normal_render</b> is set to <b>0</b>, the current alarm object is rendered in red boxes, a warning flag, and red background, and historical alarm objects are rendered in yellow boxes and yellow background.</li> <li>• When <b>normal_render</b> is set to <b>1</b>, the current alarm object is rendered in light red boxes, and historical alarm objects are rendered in dark red boxes.</li> <li>• This field takes effect only when target box rendering is enabled.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to render the detection box in an output image. For details about the rendering mode, see <b>normal_render</b>. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
normal_rende r	No	Integer	<p>Classic rendering status. The value ranges from 0 to 1 and the default value is <b>0</b>. When <b>all_print</b> is set to <b>0</b>, the options for rendering an image object are as follows:</p> <ul style="list-style-type: none"> <li>• When the value is <b>1</b>, the object is marked in a red box.</li> <li>• When the value is <b>0</b>, the object is marked in a red box with a red background, and a warning flag is marked in the upper left corner of the box.</li> <li>• When the value is <b>1</b>, render the image based on the <b>all_print</b> value. For details, see <b>all_print</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• A parking-prohibited area is identified by "name":"illegal*". When a vehicle parks in the parking-prohibited area, a parking violation event is triggered. Other fields can be added after <b>illegal</b> as the flag of roi, for example, <b>illegal01</b>.</li> <li>• If the value of <b>name</b> is not starting with <b>illegal</b>, the area is a valid parking area by default.</li> <li>• The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "illegal01"}]}</li> <li>• If this parameter is not specified, the entire video frame is parking-prohibited by default.</li> </ul>

## Response Parameters

Status code: 201

Table 4-690 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-691** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a shared bicycle detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-sharedbicycledetection-cloud/tasks
{
  "name": "shared-bicycle-detection-task",
  "description": "shared-bicycle detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "shared-bicycle",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-shared-bicycle-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alert_mode": "single",
      "alert_detection_interval": 60,
      "illegal_park_alert_threshold": 30,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]],\"name\": \"illegal01\"}]}",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.10 Creating an Individual Behavior Detection (Cloud) Job

### Function

This API is used to create an individual behavior detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-event-action-recog-cloud/tasks

**Table 4-692** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-693** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job

Parameter	Mandatory	Type	Description
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>EventActionsServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-694** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-695** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-696** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-697** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .



Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-698** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-699** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-700** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-701** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-702** EventActionServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>EventActionCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-703** EventActionCommon

Parameter	Mandatory	Type	Description
smoking_detection_sw	No	Integer	Corresponds to the <b>Smoking Detection Switch</b> parameter on the console. This parameter specifies whether to detect smoking for input video streams. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
phoning_detection_sw	No	Integer	<p>Corresponds to the <b>Phoning Detection Switch</b> parameter on the console. This parameter specifies whether to detect phone calling for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-704** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-705** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an individual behavior detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-event-action-recog-cloud/tasks

```
{
  "name": "event-action-detection-task",
  "description": "event-action detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "event-action",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-event-action-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "smoking_detection_sw": 1,
      "phoning_detection_sw": 0,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.11 Creating an Individual Action Detection (Cloud) Job

### Function

This API is used to create an individual action detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-pose-action-recog-cloud/tasks

**Table 4-706** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-707** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.



Parameter	Mandatory	Type	Description
config	No	<a href="#">PoseActionServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-708** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-709** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-710** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-711** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-712** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-713** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-714** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-715** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-716** PoseActionServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>PoseActionCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-717** PoseActionCommon

Parameter	Mandatory	Type	Description
climb_detection_sw	No	Integer	<p>Corresponds to the <b>Climb Detection Switch</b> parameter on the console. This parameter specifies whether to detect climbing for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
fall_detection_sw	No	Integer	<p>Corresponds to the <b>Fall Detection Switch</b> parameter on the console. This parameter specifies whether to detect falling for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
wave_detection_sw	No	Integer	<p>Corresponds to the <b>Wave Detection Switch</b> parameter on the console. This parameter specifies whether to detect waving for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
bend_detection_sw	No	Integer	<p>Corresponds to the <b>Bend Detection Switch</b> parameter on the console. This parameter specifies whether to detect bending for input video streams. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: disabled.</li> <li>• <b>1</b>: enabled.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-718** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-719** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an individual action detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-pose-action-recog-cloud/tasks
{
  "name": "pose-action-detection-task",
  "description": "pose-action detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "pose-action-detection",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-pose-action-detection"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "climb_detection_sw": 1,
      "fall_detection_sw": 0,
      "wave_detection_sw": 0,
      "bend_detection_sw": 0,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\\"polygons\":[{\\"data\":[[0,0],[0,1080],[1920,1080],[1920,0]]}]",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.

Status Code	Description
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.12 Creating a Mask Detection (Cloud) Job

### Function

This API is used to create a mask detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-wear-mask-recog-cloud/tasks

**Table 4-720** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-721** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.

Parameter	Mandatory	Type	Description
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job object
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">WearMaskServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-722** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-723** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-724** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <a href="#">TaskInputData</a> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-725** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-726** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .



**Table 4-727** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-728** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-729** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-730** WearMaskServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>WearMaskCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-731** WearMaskCommon

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border in the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-732** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-733** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a mask detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-wear-mask-recog-cloud/tasks
```

```
{
  "name": "wearmask-task",
  "description": "wearmask detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "wearmask",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-wearmask"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\\"polygons\\":[{\"data\\":[[0,0],[0,1080],[1920,1080],[1920,0]]}]",
      "image_compression_ratio": 90
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.13 Creating an Abnormal Parking Detection (Cloud) Job

### Function

This API is used to create an abnormal parking detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-traffic-abnormal-park-cloud/tasks

**Table 4-734** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-735** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).

Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">AbnormalParkServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-736** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.

Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-737** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-738** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-739** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .



Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-740** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-741** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-742** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-743** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-744** AbnormalParkServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>AbnormalParkCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-745** AbnormalParkCommon

Parameter	Mandatory	Type	Description
license_plate	No	<b>LicensePlate</b> object	License plate information.
abnormal_park_threshold	No	Integer	Parking time threshold, in seconds. If a vehicle is parked longer than this value, an abnormal parking alarm is reported. The value range is [20, 3600]. The maximum parking threshold can be 1 hour. Minimum: <b>20</b> Maximum: <b>3600</b> Default: <b>20</b>

Parameter	Mandatory	Type	Description
abnormal_park_output_interval	No	Integer	Interval for reporting the same abnormal parking alarm again, in seconds. The default value is <b>30</b> . The value range is [30,86400]. The maximum interval is 24 hours. Note: The value is <b>max (abnormal_park_threshold, abnormal_park_output_interval)</b> . Minimum: <b>30</b> Maximum: <b>86400</b> Default: <b>30</b>
output_image_sw	No	Integer	Whether to output an image. Value <b>1</b> means to output an image, and <b>0</b> means the opposite. Other values are invalid. The default value is <b>1</b> . Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</p> <ul style="list-style-type: none"> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon"}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

**Table 4-746** LicensePlate

Parameter	Mandatory	Type	Description
local_city	No	String	City abbreviation.
local_province	No	String	Province abbreviation.

## Response Parameters

Status code: 201

**Table 4-747** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-748** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an abnormal parking detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-traffic-abnormal-park-cloud/tasks

```
{
  "name": "abnormalpark-task",
  "description": "abnormalpark detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "abnormalpark",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-abnormalpark"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "target_roi": "{\"polygons\": [{\"data\": [[50,756],[50,756],[50,756],[100,616]], \"name\": \"a\"}, {\"data\": [[50,256],[50,756],[50,756],[100,116]], \"name\": \"b\"}]}",
      "license_plate": {
        "local_city": "B",
        "local_province": "Jin"
      },
      "abnormal_park_threshold": 180,
      "abnormal_park_output_interval": 180,
      "output_image_sw": 1,
      "render_result_sw": 1
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.14 Creating a Vehicle Detection (Cloud) Job

### Function

This API is used to create a vehicle detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-vehicle-detection-cloud/tasks

**Table 4-749** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-750** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).



Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>VehicleServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-751** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.

Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-752** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-753** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-754** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-755** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-756** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-757** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-758** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-759** VehicleServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>VehicleCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-760** VehicleCommon

Parameter	Mandatory	Type	Description
license_plate	No	<b>LicensePlate</b> object	License plate information.

Parameter	Mandatory	Type	Description
output_vehicle_type	No	String	<p>Vehicle model information. Separate multiple vehicle models by spaces. If this parameter is left blank, all vehicle models are displayed by default. For example, <b>0 1 2</b> indicates that only information about vehicle models 0, 1, and 2 is output. Currently, the options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: car</li> <li>• <b>1</b>: dump truck</li> <li>• <b>2</b>: trailer</li> <li>• <b>3</b>: cement mixer</li> <li>• <b>4</b>: sanitation vehicle</li> <li>• <b>5</b>: crane</li> <li>• <b>6</b>: pickup truck</li> <li>• <b>7</b>: bus</li> <li>• <b>8</b>: fuel tanker</li> <li>• <b>9</b>: others</li> </ul>
output_image_sw	No	Integer	<p>Whether to output an image. Value <b>1</b> means to output an image, and <b>0</b> means the opposite. Other values are invalid. The default value is <b>1</b>.</p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. If the value is <b>80</b>, the definition of the output image is 80% of that of the original image. A smaller value indicates a more blurred image and a smaller amount of image data to be received.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>100</b></p>



Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter defines the vehicle detection area with a departure line and a parking line. You use <b>type</b> of the lines to distinguish a departure line from a parking line. The value <b>0</b> indicates the parking line, and the value <b>1</b> indicates the departure line. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</p> <ul style="list-style-type: none"> <li>• By default, the parking line is below the departure line. When a vehicle is parking and touches the parking line, the detection result is reported. When the vehicle is departing and touches the departure line, the detection result is reported.</li> <li>• The parking line is horizontal by default and is drawn at the position where the height from the top of the ROI area accounts for 70% of the height of the ROI area. Assume that the image width is <b>w</b>, the height of the ROI area is <b>h</b>, and the Y coordinate of the top of the ROI area is <b>y</b>. The default position of the parking line is <b>[[0,y+h*0.7-1],[w-1,y+h*0.7-1]]</b>.</li> <li>• The departure line is horizontal by default and is drawn at the position where the distance between the departure line and the top of the image accounts for 50% of the image height. Assume that</li> </ul>

Parameter	Mandatory	Type	Description
			<p>the image width is <b>w</b>, the height of the ROI area is <b>h</b>, and the Y coordinate of the top of the ROI area is <b>y</b>. The default position of the departure line is <b>[[0,y+h0.5-1],[w-1,y+h0.5-1]]</b>.</p> <ul style="list-style-type: none"> <li>• Example value: {"lines": [{"data": [[50,756], [100,616]], "properties": {"type": 0}}, {"data": [[50,256], [100,116]], "properties": {"type": 1}}, {"polygons": [{"data": [[487,465], [1850,450], [1905,1013], [515,1050]]}]}}</li> </ul>

**Table 4-761** LicensePlate

Parameter	Mandatory	Type	Description
local_city	No	String	City abbreviation.
local_province	No	String	Province abbreviation.

## Response Parameters

**Status code: 201**

**Table 4-762** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-763** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code

Parameter	Type	Description
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a vehicle detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-vehicle-detection-cloud/tasks
```

```
{
  "name": "vehicle-task",
  "description": "vehicle detection task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "vehicle",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-vehicle"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "target_roi": "{\"lines\": [{\"data\": [[50,756],[100,616]], \"properties\": {\"type\": 0}}, {\"data\": [[50,256],[100,116]], \"properties\": {\"type\": 1}}], \"polygons\": [{\"data\": [[487,465],[1850,450],[1905,1013],[515,1050]]}]\"",
      "license_plate": {
        "local_city": "B",
        "local_province": "Jin"
      },
      "output_image_sw": 1,
      "image_compression_ratio": 100
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.15 Creating a Fire Passage Obstruction Detection (Cloud) Job

### Function

This API is used to create a fire passage obstruction detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-fire-exit-occupation-cloud/tasks

**Table 4-764** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-765** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">FireExitServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-766** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-767** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-768** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-769** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>



**Table 4-770** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-771** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-772** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-773** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-774** FireExitServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>FireExitCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-775** FireExitCommon

Parameter	Mandatory	Type	Description
license_plate	No	<a href="#">LicensePlate</a> object	License plate information.
stacking_occupation_sw	No	Integer	Corresponds to the <b>Stacking Occupation Switch</b> parameter on the console. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: This function is disabled.</li> <li>• <b>1</b>: This function is enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
vehicle_occupation_sw	No	Integer	Corresponds to the <b>Detect Vehicle</b> on the console. Available values are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: Detection at night is disabled.</li> <li>• <b>1</b>: Detection at night is enabled.</li> <li>• The default value is <b>1</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b>
stacking_residence_time	No	Integer	Corresponds to the <b>Stacking Residence Time</b> parameter on the console. This parameter specifies the maximum duration (in seconds) that stock can be kept on the roadside (when there are no obstacles). The value range is [10, 3600], and the default value is <b>40</b> . Minimum: <b>10</b> Maximum: <b>3600</b> Default: <b>40</b>

Parameter	Mandatory	Type	Description
vehicle_residence_time	No	Integer	<p>Corresponds to the <b>Vehicle Residence Time</b> parameter on the console. This parameter specifies the maximum period (in seconds) that a vehicle can stay (when there are no obstacles). The value range is [10, 3600], and the default value is <b>50</b>.</p> <p>Minimum: <b>10</b> Maximum: <b>3600</b> Default: <b>50</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: The algae area will be rendered.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: The algae area will be rendered.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value range is [20, 100]. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the detection area. The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</p> <ul style="list-style-type: none"> <li>You can set a name for each region, for example, {"polygons":[{"data": [[84,389], [1840,349], [1824,526], and [78,526]], "name": "polygon"}]}. The region name will be displayed in the result.</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

**Table 4-776** LicensePlate

Parameter	Mandatory	Type	Description
local_city	No	String	City abbreviation.
local_province	No	String	Province abbreviation.

## Response Parameters

Status code: 201

**Table 4-777** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-778** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a fire passage obstruction detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-fire-exit-occupation-cloud/tasks

```
{
  "name" : "fireexit-task",
  "description" : "fireexit task test",
  "input" : {
    "type" : "vis",
    "data" : [ {
      "stream_name" : "fireexit",
      "index" : 0
    } ]
  },
  "output" : {
    "dis" : {
      "stream_name" : "dis-fireexit"
    }
  },
  "service_version" : "3.0",
  "resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config" : {
    "common" : {
      "image_compression_ratio" : 90,
      "render_roi_sw" : 1,
      "render_result_sw" : 1,
      "stacking_occupation_sw" : 1,
      "vehicle_occupation_sw" : 1,
      "stacking_residence_time" : 40,
      "vehicle_residence_time" : 50,
      "target_roi" : "{\"polygons\": [{\"data\": [[0, 0], [0, 1000], [1920, 1000], [1920, 0]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.16 Creating a Non-motorized Vehicle Detection (Cloud) Job

### Function

This API is used to create a non-motorized vehicle detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-non-motor-detection-cloud/tasks

**Table 4-779** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-780** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>NonMotorServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-781** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>



Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-782** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-783** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-784** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-785** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-786** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-787** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-788** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-789** NonMotorServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>NonMotorCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-790** NonMotorCommon

Parameter	Mandatory	Type	Description
illegal_park_detection_sw	No	Integer	<p>Corresponds to the <b>Illegal Park Detection Switch</b> parameter on the console. This parameter specifies whether to enable parking violation detection. The value range is [0,1].</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Parking violation detection is disabled.</li> <li>• <b>1</b>: Parking violation detection is enabled.</li> <li>• Default value: <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>

Parameter	Mandatory	Type	Description
illegal_park_alert_threshold	No	Integer	<p>Corresponds to the <b>Illegal Park Alert Threshold</b> on the console. This parameter specifies the time threshold for triggering an alarm. It takes effect only when <b>illegal_park_detection_sw=1</b> is set. The unit is second. The value range is [10,300]. If an electric vehicle stays longer than the specified time, an alarm is reported. Default value: <b>30</b></p> <p>Minimum: <b>10</b> Maximum: <b>300</b> Default: <b>30</b></p>
intrusion_detection_sw	No	Integer	<p>Corresponds to the <b>Intrusion Detection Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Intrusion events detection is disabled.</li> <li>• <b>1</b>: Intrusion events detection is enabled.</li> </ul> <p>Default value: <b>0</b></p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
electromobile_detect_sw	No	Integer	<p>Corresponds to the <b>Electromobile Detect Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Electric scooter detection is disabled.</li> <li>• <b>1</b>: Electric scooter detection is enabled.</li> </ul> <p>Default value: <b>1</b>.</p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>

Parameter	Mandatory	Type	Description
bicycle_detect_sw	No	Integer	<p>Corresponds to <b>Bicycle Detect Switch</b> on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Bicycle detection is disabled.</li> <li>• <b>1</b>: Bicycle detection is enabled.</li> <li>• Default value: <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area in the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A parking area will be drawn in green, and a no parking area set by the user will be drawn in yellow.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>



Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value range is [20, 100]. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies an ROI that consists of parking area, no parking area, and no entry area.</p> <ul style="list-style-type: none"> <li>• Parking area, which is identified by "name":"legal_area". If an electric scooter parks outside the parking area, a parking violation event is reported.</li> <li>• No parking area, which is identified by "name":"illegal_area". If an electric scooter parks in a no parking area, a parking violation event is reported.</li> <li>• No entry area, which is identified by "name":"prohibit_entering_area". If an electric scooter intrudes into this area, an intrusion event is reported.</li> <li>• The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example value: {"polygons": [{"data": [[43,266], [42,645], [472,644], [416,212]], "name": "legal_area"}, {"data": [[311,182], [282,670], [941,661], [835,170]], "name": "prohibit_entering_area"}, {"data": [[1272,592], [1481,813], [1623,638], [1293,356]], "name": "illegal_area"}]}. If both <b>legal_area</b> and <b>illegal_area</b> are set, <b>illegal_area</b> will be used. In this case, only the no parking area is rendered.</li> </ul>

Parameter	Mandatory	Type	Description
			<ul style="list-style-type: none"> <li>If this parameter is left blank, the entire area is a no parking area by default, and the entire area is a no entry area.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-791** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-792** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a non-motorized vehicle detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-non-motor-detection-cloud/tasks
```

```
{
  "name": "nonmotor-task",
  "description": "nonmotor task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "nonmotor",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-nonmotor"
    }
  }
}
```

```

"service_version" : "3.0",
"resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
"config" : {
  "common" : {
    "illegal_park_detection_sw" : 1,
    "illegal_park_alert_threshold" : 30,
    "intrusion_detection_sw" : 0,
    "electromobile_detect_sw" : 1,
    "bicycle_detect_sw" : 1,
    "target_roi" : "{\\"polygons\\":[{\\"data\\":[[43,266],[42,645],[472,644],[416,212]],\\"name\\":\\"legal_area\\"},
{\\"data\\":[[311,182],[282,670],[941,661],[835,170]],\\"name\\":\\"prohibit_entering_area\\"}]]",
    "render_result_sw" : 1,
    "render_roi_sw" : 1,
    "image_compression_ratio" : 90
  }
}
}

```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.17 Creating a Trash Can Anomaly Detection (Cloud) Job

### Function

This API is used to create a trash can anomaly detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-trash-abnormal-detect-cloud/tasks

**Table 4-793** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-794** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>TrashAbnormalServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-795** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>

Parameter	Mandatory	Type	Description
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-796** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-797** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-798** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .



Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-799** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-800** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-801** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-802** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-803** TrashAbnormalServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>TrashAbnormalCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-804** TrashAbnormalCommon

Parameter	Mandatory	Type	Description
alert_time_threshold	No	Integer	Corresponds to the <b>Alert Time Threshold</b> on the console. An alarm is reported if a trash can status is abnormal for the duration specified by this parameter. Value range: [30, 3600] (in seconds) Default value: <b>30</b> Minimum: <b>30</b> Maximum: <b>3600</b> Default: <b>30</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the area for trash can detection. If an abnormal status of a trash can in this area is detected, an alarm is triggered.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[43,266], [42,645], [472,644], [416,212]]}, {"data": [[311,182], [282,670], [941,661], [835,170]]}]}</li> <li>If this parameter is left blank, the entire area is the detection area by default.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-805** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-806** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a trash can anomaly detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-trash-abnormal-detect-cloud/tasks
{
  "name": "trashabnormal-task",
  "description": "trashabnormal task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "trashabnormal",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-trashabnormal"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alert_time_threshold": 30,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{ \"polygons\": [{ \"data\": [[43,266],[42,645],[472,644],[416,212]] }, { \"data\": [[311,182],[282,670],[941,661],[835,170]] } ] }",
      "image_compression_ratio": 80
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.18 Creating an Overflowing Garbage Can Detection in Cities (Cloud) Job

### Function

This API is used to create an overflowing garbage can detection in cities (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-urban-trash-overflow-cloud/tasks

**Table 4-807** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-808** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">UrbanTrashOverflowServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-809** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>



Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-810** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-811** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-812** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-813** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-814** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-815** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-816** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-817** UrbanTrashOverflowServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>UrbanTrashOverflowCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-818** UrbanTrashOverflowCommon

Parameter	Mandatory	Type	Description
alert_time_threshold	No	Integer	Corresponds to <b>Alert Time Threshold</b> on the console. An alarm is reported if a trash can status is abnormal for the duration specified by this parameter. Value range: [30, 3600] (in seconds) Default value: <b>30</b> Minimum: <b>30</b> Maximum: <b>3600</b> Default: <b>30</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console. This parameter specifies the area for garbage bin detection. If an abnormal status of a garbage bin in this area is detected, an alarm is triggered.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[43,266], [42,645], [472,644], [416,212]]}, {"data": [[311,182], [282,670], [941,661], [835,170]]}]}</li> <li>If this parameter is left blank, the entire area is the detection area by default.</li> </ul>

## Response Parameters

Status code: 201

Table 4-819 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-820** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an overflowing garbage can detection in cities (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-urban-trash-overflow-edge/tasks

```
{
  "name": "urban-trash-task",
  "description": "urban-trash task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "urban-trash",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-urban-trash"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alert_time_threshold": 30,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[43,266],[42,645],[472,644],[416,212]]}, {\"data\": [[311,182], [282,670],[941,661],[835,170]]}]}",
      "image_compression_ratio": 80
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error



## Error Codes

See [Error Codes](#).

## 4.2.19 Creating a Crowd Counting at High Altitudes (Cloud) Job

### Function

This API is used to create a crowd counting at high altitudes (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-highpoint-crowdcount-cloud/tasks

**Table 4-821** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-822** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">HighpointCrowdcountServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-823** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-824** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-825** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Input type of a job. This parameter is mandatory. Options:</p> <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-826** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-827** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-828** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-829** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-830** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-831** HighpointCrowdcountServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>HighpointCrowdcountCommon</b> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-832** HighpointCrowdcountCommon

Parameter	Mandatory	Type	Description
alarm_threshold	No	String	<p>People count alarm thresholds. Default value: <b>50</b>. The value must be a positive integer. When the number of people in a video frame exceeds the threshold, an alarm is triggered and an alarm image is output in JSON format.</p> <ul style="list-style-type: none"> <li>• If the value of <b>grid_x_number</b> is greater than 0 and the value of <b>grid_y_number</b> is greater than 0, the grid ROI settings are enabled. If you enter more than one value, only the first value is used as the alarm threshold for all grid areas. For example, if you enter <b>25 36 23 40</b>, the algorithm automatically selects the first value, that is, <b>25</b>, as the alarm threshold. If the number of people in any grid exceeds this threshold, an alarm image is output.</li> <li>• If the value of <b>grid_x_number</b> or <b>grid_y_number</b> is <b>0</b>, the classic ROI settings are enabled. You can enter different alarm thresholds for each ROI and separate them with spaces. If the alarm threshold list entered by the user is greater than the actual number of ROIs, the alarm threshold within the list is used. If the number of alarm thresholds within the list is less than the actual number of ROIs, use the default value for the rest part. For example, if there are three ROIs and three threshold values (<b>25 30 20</b>)</li> </ul>



Parameter	Mandatory	Type	Description
			<p>are input, the image is sent as long as one ROI alarm is generated. When there are only two values (<b>25 15</b>) are entered, the threshold of the third ROI will be defaulted to <b>50</b>. When there are more than three threshold values (such as <b>25 36 23 40</b>) are entered, the first three values (<b>25 36 23</b>) are automatically selected.</p> <ul style="list-style-type: none"> <li>Note: The value cannot be an empty string. Otherwise, Postman cannot deliver jobs.</li> </ul>
sampling_time_interval	No	Integer	<p>Interval at which video sampling is performed. The default value is 5s. The value range is [5, 3600], seconds.</p> <p>Minimum: <b>5</b> Maximum: <b>3600</b> Default: <b>5</b></p>
alert_mode	No	String	<p>Alarming mode. Default value: <b>single</b>. There are two alarm modes:</p> <ul style="list-style-type: none"> <li><b>single</b>: event alarming. An alarm is reported only when a new alarm event is generated and the number of people reaches the alarm threshold.</li> <li><b>periodic</b>: periodic alarming. An alarm is reported each time a video sampling interval expires.</li> </ul>

Parameter	Mandatory	Type	Description
visualization_output_sw	No	Integer	<p>Whether to send the edited video image with scenario information on it. The default value is <b>0</b>, and the value range is [0 1]. By default, when the number of people in each ROI exceeds the alarm threshold, only the structured information of the original image is sent. The detected pedestrians are displayed in video image after this function is enabled. The visualized alarm information on images for different scenarios is as follows:</p> <ul style="list-style-type: none"> <li>• If a pedestrian is detected, it is marked with a red box.</li> <li>• Each ROI is marked with a yellow polygon in the image.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[43,266], [42,645], [472,644], [416,212]]}, {"data": [[311,182], [282,670], [941,661], [835,170]]}]}</li> <li>If this parameter is left blank, the entire area is the detection area by default.</li> </ul>

Parameter	Mandatory	Type	Description
grid_x_number	No	Integer	<p>Corresponds to the <b>Grid X Number</b> parameter on the console. The default value is <b>0</b>.</p> <ul style="list-style-type: none"> <li>If the value of <b>grid_y_number</b> is <b>0</b>, the value of this field is <b>0</b>, indicating that the classic ROI settings are used, which is subject to <b>target_roi</b>.</li> <li>Values other than <b>0</b> indicates the number of grids in the horizontal direction, and each grid corresponds to an independent detection area. For example, if the value is <b>3</b>, there are three grids in the horizontal direction corresponding to three independent detection areas. Assume that the width of an image is <math>W</math>, the width of grids in a rightmost column are equal to a difference between <math>W</math> and the number <math>(W//3)*2</math> is rounded down to, and the width of grids in other columns are respectively the number <math>(W//3)</math> is rounded down to.</li> <li>The width of each grid must be greater than 10 pixels, that is, the value range of the number of grids in a horizontal direction is <math>[0, \min(\text{the number } (W//10) \text{ is rounded down to, } 500)]</math>.</li> </ul> <p>Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
grid_y_number	No	Integer	<p>Corresponds to the <b>Grid Y Number</b> parameter on the console. The default value is <b>0</b>.</p> <ul style="list-style-type: none"> <li>If the value of <b>grid_x_number</b> is <b>0</b>, the value of this field is <b>0</b>, indicating that the classic ROI settings are used, which is subject to <b>target_roi</b>.</li> <li>Values other than <b>0</b> indicates the number of grids in the vertical direction, and each grid corresponds to an independent detection area. For example, if the value is <b>5</b>, there are five grids in the vertical direction corresponding to five independent detection areas. Assume that the height of an image is <math>H</math>, and the height of a grid in a bottom row is equal to a difference between <math>H</math> and the number <math>(H/5)*4</math> is rounded down to.</li> <li>The height of each grid must be greater than 10 pixels, that is, the value range of the number of grids in a vertical direction is <math>[0, \min(\text{the number } (H/10) \text{ is rounded down to, } 500)]</math>.</li> </ul> <p>Default: <b>0</b></p>

## Response Parameters

Status code: 201

Table 4-833 Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-834** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a crowd counting at high altitudes (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-highpoint-crowdcount-cloud/tasks
{
  "name": "highpoint-crowdcount-task",
  "description": "highpoint-crowdcount task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "highpoint-crowdcount",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-highpoint-crowdcount"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alarm_threshold": "5",
      "sampling_time_interval": 8,
      "visualization_output_sw": 1,
      "image_compression_ratio": 80,
      "alert_mode": "single",
      "target_roi": "{\\"polygons\\":[{\"data\":[[100,100],[1800,100],[1800,1000],[100,1000]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.

Status Code	Description
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.20 Creating a Target Attribute Recognition (Cloud) Job

### Function

This API is used to create a target attribute recognition (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-object-attrib-recog-cloud/tasks

**Table 4-835** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-836** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.

Parameter	Mandatory	Type	Description
input	Yes	<b>TaskInput</b> object	Input configuration of a job
output	Yes	<b>TaskOutput</b> object	Output configuration of a job. At least one output mode must be configured.
config	No	<b>ObjectAttrRecogServiceConfig</b> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-837** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>



Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-838** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-839** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-840** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-841** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-842** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-843** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-844** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-845** ObjectAttriRecogServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<a href="#">ObjectAttriRecogCommon</a> object	Runtime job configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-846** ObjectAttriRecogCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
pedes_attri_switch	No	String	<p>Corresponds to the <b>Pedes Attri Switch</b> parameter on the console. Pedestrian attributes you want the algorithm to output. The current algorithm supports the recognition of the following pedestrian attributes:</p> <ul style="list-style-type: none"> <li>• gender: [male, female]</li> <li>• age: [juvenile, youth, middle age, old age]</li> <li>• hair - hairstyle: [short, long, bald]</li> <li>• glasses - Eyes: [with glasses, without glasses]</li> <li>• hat: [hat, helmet, neither]</li> <li>• mask-mask: [with a mask, without a mask]</li> <li>• backbag-backpack: [with a backpack, without a backpack]</li> <li>• handbag-handbag: [with a handbag, without a handbag]</li> <li>• single_shoulder_bag-one shoulder bag: [with a one shoulder bag, without a one shoulder bag]</li> <li>• upper_color-tops color: [black, white (including gray and silver), blue, green, yellow (including orange and gold), red (including pink and purple)]</li> <li>• upper_style-tops style: [short sleeves, long sleeves]</li> <li>• upper_texture-tops texture: [solid color, stripes, grids, patterns]</li> <li>• lower_color-bottoms color: [black, white (including gray and silver), blue, green, yellow (including orange and gold), red (including pink and purple)]</li> </ul>



Parameter	Mandatory	Type	Description
			<ul style="list-style-type: none"> <li>• lower_style-bottoms style: [shorts, trousers, short skirts, long skirts]</li> <li>• orientation-orientation: [front, back, left, right]</li> <li>• For example, if the value of <b>pedes_attri_switch</b> is <b>gender,age</b>, only the gender and age attributes of pedestrians are displayed in the output.</li> <li>• If this parameter is left blank, all attributes are displayed by default. If there is a space on both sides of the comma (,), the space will be ignored. If all attributes are incorrectly set, all attributes are displayed. If some attributes are correctly set, only the correct attributes are displayed.</li> <li>• Vehicle types can be identified, including bicycles, battery trucks, cars, dump trucks, trailers, cement mixers, buses, and others. The display of the vehicle type is not affected by this parameter.</li> </ul>
alert_attri	No	<b>AlertAttri</b> object	<p>Corresponds to the <b>AlertAttri</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• This parameter specifies alarm types and attributes. The algorithm generates alarms only of these types and attributes.</li> <li>• If this parameter is left blank, the algorithm reports alarms for all monitored objects by default.</li> <li>• Each monitored object information contains the result of the attributes specified by <b>pedes_attri_switch</b>.</li> </ul>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

**Table 4-847** AlertAttri

Parameter	Mandatory	Type	Description
type	No	String	<p>Corresponds to the <b>Type</b> parameter on the console. Type of an alarm. The options are as follows: <b>pedestrian, bicycle, electromobile, car, slag_car, trailer, concrete_mixer, bus, other_vehicle.</b></p> <ul style="list-style-type: none"> <li>• The algorithm generates alarms of the specified type.</li> <li>• If there is a space on both sides of the comma (,), the space will be ignored. If all types are incorrectly set, all types of alarms are reported. If some types are correctly set, only alarms of the correct types are reported.</li> <li>• The default value is <b>default</b>, indicating that alarms of all types are reported.</li> </ul>

Parameter	Mandatory	Type	Description
attribute	No	String	<ul style="list-style-type: none"> <li>• Corresponds to <b>Attribute</b> on the console.</li> <li>• The algorithm checks the specified attributes of the monitored object. An alarm is reported only when the value of the attribute is within the specified range.</li> <li>• If this parameter is left blank, the algorithm does not check the attributes and directly reports alarms based on the alarm types.</li> <li>• Separate multiple attributes by commas (.). For example, if you want to generate alarms only for juveniles and youth, set this parameter to <b>child,young</b>.</li> <li>• For details about the value range, see the "attribute parameter description" in Detection Result.</li> <li>• If there is a space on both sides of the comma (,), the space will be ignored. If all attributes are incorrectly set, alarms are reported based on the alarm types. If some attributes are correctly set, only the alarms of correct attributes are reported.</li> </ul>

## Response Parameters

Status code: 201

Table 4-848 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-849** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a target attribute recognition (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-object-attrib-recog-cloud/tasks
{
  "name": "attri-task",
  "description": "attri task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "attri",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-attrib"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]],\"name\": \"a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.21 Creating an E-bike Rider Helmet Detection (Cloud) Job

### Function

This API is used to create an e-bike rider helmet detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-helmet-elec-recog-cloud/tasks

**Table 4-850** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-851** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">HelmetElecRecogServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-852** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-853** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-854** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Input type of a job. This parameter is mandatory. Options:</p> <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>



Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-855** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.

Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-856** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-857** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-858** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-859** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-860** HelmetElecRecogServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>HelmetElecRecogCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-861** HelmetElecRecogCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

**Table 4-862** Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-863** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an e-bike rider helmet detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-helmet-elec-recog-cloud/tasks
```

```
{
  "name": "helmet-task",
  "description": "helmet task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "helmet",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-helmet"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.22 Creating an Umbrella Violation Detection (Cloud) Job

### Function

This API is used to create an umbrella violation detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-urban-umbrella-cloud/tasks

**Table 4-864** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-865** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">UmbrellaServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.



**Table 4-866** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-867** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-868** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-869** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-870** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-871** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-872** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-873** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-874** UmbrellaServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>UmbrellaCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-875** UmbrellaCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-876** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-877** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>



## Example Requests

Create an umbrella violation detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-umbrella-cloud/tasks
{
  "name" : "umbrella-task",
  "description" : "umbrella task test",
  "input" : {
    "type" : "vis",
    "data" : [ {
      "stream_name" : "umbrella",
      "index" : 0
    } ]
  },
  "output" : {
    "dis" : {
      "stream_name" : "dis-umbrella"
    }
  },
  "service_version" : "3.0",
  "resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config" : {
    "common" : {
      "image_compression_ratio" : 90,
      "render_roi_sw" : 1,
      "render_result_sw" : 1,
      "target_roi" : "{\\"polygons\\":[[{\\"data\\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\\":\\"a\\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.23 Creating an Advertisement Violation Detection (Cloud) Job

### Function

This API is used to create an advertisement violation detection (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-sign-detect-cloud/tasks

**Table 4-878** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-879** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">SignDetectServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-880** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-881** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-882** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-883** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-884** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-885** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-886** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-887** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-888** SignDetectServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>SignDetectCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.



**Table 4-889** SignDetectCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-890** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-891** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an advertisement violation detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-sign-detect-cloud/tasks
{
  "name" : "sign-detect-task",
  "description" : "sign task test",
  "input" : {
    "type" : "vis",
    "data" : [ {
      "stream_name" : "sign-detect",
      "index" : 0
    } ]
  },
  "output" : {
    "dis" : {
      "stream_name" : "dis-sign-detect"
    }
  },
  "service_version" : "3.0",
  "resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config" : {
    "common" : {
      "image_compression_ratio" : 90,
      "render_roi_sw" : 1,
      "render_result_sw" : 1,
      "target_roi" : "{\\"polygons\\":[{\\"data\\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\\":\\"a\\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.24 Creating a Messy Piles Detection (Cloud) Job

### Function

This API is used to create a messy piles detection (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-stacking-cloud/tasks

**Table 4-892** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-893** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">StackingServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-894** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-895** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-896** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-897** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-898** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .



Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-899** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-900** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-901** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-902** StackingServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>StackingCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-903** StackingCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon"}]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-904** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-905** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a messy piles detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-stacking-cloud/tasks
{
  "name": "stacking-detect-task",
  "description": "stacking task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "stacking",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-stacking-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\"polygons\\":[[{\\"data\\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\\":\\"a\\"}]]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.25 Creating a Clothes Airing Violation Detection (Cloud) Job

### Function

This API is used to create a clothes airing violation detection (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-drying-cloud/tasks

**Table 4-906** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-907** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">DryingServiceConfig</a> object	Job configuration parameters.
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-908** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-909** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-910** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.



Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-911** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-912** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-913** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-914** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-915** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-916** DryingServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>DryingCommon</b> object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-917** DryingCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

Status code: 201

Table 4-918 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-919 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a clothes airing violation detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-drying-cloud/tasks
{
  "name" : "drying-detect-task",
  "description" : "drying task test",
  "input" : {
    "type" : "vis",
    "data" : [ {
      "stream_name" : "drying",
      "index" : 0
    } ]
  },
  "output" : {
    "dis" : {
      "stream_name" : "dis-drying-detect"
    }
  },
  "service_version" : "3.0",
  "resource_order_id" : "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config" : {
    "common" : {
      "image_compression_ratio" : 90,
      "render_roi_sw" : 1,
      "render_result_sw" : 1,
      "target_roi" : "{\\"polygons\\":[[\\"data\\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\\":\\"a\\"]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.26 Creating a Littering Construction Waste Detection (Cloud) Job

### Function

This API is used to create a littering construction waste detection (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-dregs-cloud/tasks

**Table 4-920** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-921** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">DregsService Config</a> object	Job configuration parameters
service_version	No	String	Service version.
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template.



Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package.

**Table 4-922** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-923** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-924** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-925** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-926** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-927** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-928** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-929** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-930** DregsServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>DregsCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-931** DregsCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-932** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-933** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>



## Example Requests

Create a littering construction waste detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-dregs-cloud/tasks
{
  "name": "dregs-detect-task",
  "description": "dregs task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "dregs",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-dregs-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\n\"polygons\":[[{\n\"data\":[[84,389],[1840,349],[1824,526],[78,526]],\n\"name\":\n\"a\"}]]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.27 Creating a Missing Manhole Cover Detection (Cloud) Job

### Function

This API is used to create a missing manhole cover detection (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-manholecover-miss-cloud/tasks

**Table 4-934** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-935** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">ManholecoverMissServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-936** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-937** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-938** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-939** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-940** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-941** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-942** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-943** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-944** ManholecoverMissServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>ManholecoverMissCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.



**Table 4-945** ManholecoverMissCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Do not draw a border.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be displayed in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-946** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-947** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a missing manhole cover detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-manholecover-miss-cloud/tasks
{
  "name": "manholecovermiss-detect-task",
  "description": "manholecovermiss task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "manholecovermiss",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-manholecovermiss-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]], \"name\": \"a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.28 Creating a Missing Manhole Cover Detection From a Dynamic Perspective (Cloud) Job

### Function

This API is used to create a missing manhole cover detection from a dynamic perspective (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/c-mobile-manholecover-cloud/tasks

**Table 4-948** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-949** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">MobileManholecoverMissServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-950** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-951** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-952** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-953** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-954** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .



Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-955** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-956** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-957** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-958** MobileManholecoverMissServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>MobileManholecoverMissCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-959** MobileManholecoverMissCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: Do not draw a border.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be displayed in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-960** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-961** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a missing manhole cover detection from a dynamic perspective (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-mobile-manholecover-cloud/tasks
{
  "name": "mobile-manholecovermiss-detect-task",
  "description": "manholecovermiss task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "mobile-manholecovermiss",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-mobile-manholecovermiss-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\n\"polygons\": [{\n\"data\": [[84,389],[1840,349],[1824,526],[78,526]],\n\"name\": \"a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.29 Creating an Urban Trash Detection (Cloud) Job

### Function

This API is used to create an urban trash detection (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/c-urban-trash-detect-cloud/tasks

**Table 4-962** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-963** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">TrashDetectServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-964** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-965** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-966** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.



Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-967** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-968** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-969** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-970** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-971** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-972** TrashDetectServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>TrashDetectCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-973** TrashDetectCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>
trash_detect_switch	No	Integer	<p>Corresponds to the <b>Trash Detection Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>1</b>: Trash will be detected.</li> <li>• <b>2</b>: Trash and the person who threw trash will be detected.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>1</b> Maximum: <b>2</b> Default: <b>1</b></p>
person_constraint_switch	No	Integer	<p>Corresponds to the <b>Person Constraint Switch</b> parameter on the console. When this switch is on, alarms indicating that there are persons near the trash will be filtered out.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: The switch is off.</li> <li>• <b>1</b>: The switch is on.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
min_trash_size	No	Integer	Corresponds to the <b>Minimum Trash Size</b> parameter on the console. Trash definition varies depending on the application scenario. If the trash size is smaller than the value of this parameter, no alarm is generated. The value ranges from 1 to 500. The unit is pixel. The default value is 1. Minimum: <b>1</b> Maximum: <b>500</b> Default: <b>1</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be displayed in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-974** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-975** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an urban trash detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-trash-detect-cloud/tasks
{
  "name": "trash-detect-task",
  "description": "trash task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "trash-detect",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-trash-detect"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "trash_detect_sw": 1,
      "person_constraint_sw": 0,
      "min_trash_size": 1,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\"polygons\\":[{\"data\\":[[84,389],[1840,349],[1824,526],[78,526]],\"name\\":\"a\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.30 Creating an Urban Mobile Trash Detection (Cloud) Job

### Function

This API is used to create an urban mobile trash detection (cloud) job.



## URI

POST /v1/{project\_id}/infer/services/c-mobile-trash-detect-cloud/tasks

**Table 4-976** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-977** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">MobileTrashServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-978** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-979** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-980** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-981** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> . Maximum: <b>63</b>

**Table 4-982** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-983** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-984** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-985** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-986** MobileTrashServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>MobileTrashCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-987** MobileTrashCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
min_trash_size	No	Integer	Corresponds to the <b>Minimum Trash Size</b> parameter on the console. Trash definition varies depending on the application scenario. If the trash size is smaller than the value of this parameter, no alarm is generated. The value ranges from 20 to 500. The unit is pixel. The default value is <b>1</b> . Minimum: <b>20</b> Maximum: <b>500</b> Default: <b>20</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

## Response Parameters

Status code: 201



**Table 4-988** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-989** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an urban mobile trash detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-mobile-trash-detect-cloud/tasks

```
{
  "name": "mobile-trash-task",
  "description": "mobile-trash task test",
  "input": {
    "type": "vis",
    "data": [
      {
        "stream_name": "mobile-trash",
        "index": 0
      }
    ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-mobile-trash"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "min_trash_size": 1,
      "render_result_sw": 1,
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.31 Creating an Urban Roadside Stall Detection (Cloud) Job

### Function

This API is used to create an urban roadside stall detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-urban-roadside-stall-cloud/tasks

**Table 4-990** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-991** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.

Parameter	Mandatory	Type	Description
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">RoadsideServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-992** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Mandatory	Type	Description
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-993** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-994** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-995** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-996** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-997** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-998** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-999** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.



Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1000** RoadsideServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>RoadsideCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-1001** RoadsideCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>

Parameter	Mandatory	Type	Description
roadside_stall_detect_sw	No	Integer	<p>Corresponds to the <b>Roadside Stall Detection Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Roadside stall will not be detected.</li> <li>• <b>1</b>: Roadside stall will be detected.</li> <li>• The default value is <b>1</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>1</b></p>
outstore_stall_detect_sw	No	Integer	<p>Corresponds to the <b>Outstore Stall Detection Switch</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• <b>0</b>: Outstore stall will not be detected.</li> <li>• <b>1</b>: Outstore stall will be detected.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon"}]}</li> <li>• You can set a name for each region. The region name will be contained in the result.</li> <li>• If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

Parameter	Mandatory	Type	Description
repeat_alert_sw	No	Integer	<p>Corresponds to the <b>Repeated Alert Switch</b> parameter on the console. This parameter specifies whether to generate repeated alarms for the same object. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No repeated alarms are generated for the same object.</li> <li>• <b>1</b>: Repeated alarms are generated for the same object.</li> <li>• The default value is <b>0</b>. When repeated alarms are enabled, the <b>repeat_alert_interval</b> parameter is valid only when the <b>detection_id</b> is the same for all the alarms generated for the same object.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
repeat_alert_interval	No	Integer	<p>Corresponds to the <b>Repeated Alert Interval</b> parameter on the console. This parameter is valid only when <b>repeat_alert_sw</b> is set to <b>1</b>. This parameter specifies the interval between repeated alarms, in seconds. The value ranges from 30 to 86400. The default value is <b>30</b>, indicating that an alarm is generated every 30 seconds, and the <b>detection_id</b> of the alarms generated for the same object is the same.</p> <p>Minimum: <b>30</b> Maximum: <b>86400</b> Default: <b>30</b></p>

## Response Parameters

Status code: 201

Table 4-1002 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-1003 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an urban roadside stall detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/c-urban-roadside-stall-cloud/tasks

```
{
  "name": "roadside-task",
  "description": "roadside task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "roadside",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-roadside"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "roadside_stall_detect_sw": 1,
      "outstore_stall_detect_sw": 0,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\\"polygons\\\":[{\\\"data\\\":[[84,389],[1840,349],[1824,526],[78,526]],\\\"name\\\":\\\"a\\\"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.32 Creating an Exposed Bare Soil Detection (Cloud) Job

### Function

This API is used to create an exposed bare soil detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/c-urban-soil-exposure-cloud/tasks

**Table 4-1004** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-1005** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).

Parameter	Mandatory	Type	Description
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">SoilExposureServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-1006** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.

Parameter	Mandatory	Type	Description
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-1007** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.



**Table 4-1008** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <a href="#">TaskInputData</a> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1009** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .

Parameter	Mandatory	Type	Description
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Mandatory	Type	Description
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-1010** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1011** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-1012** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1013** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1014** SoilExposureServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>SoilExposure Common</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-1015** SoilExposureCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>

Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]], "name": "polygon" }]}</li> <li>You can set a name for each region. The region name will be contained in the result.</li> <li>If this parameter is not specified, the default area is the entire video frame, and the default area name is an empty string.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-1016** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-1017** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create an exposed bare soil detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/c-urban-soil-exposure-edge/tasks
{
  "name": "soil-exposure-task",
  "description": "soil-exposure task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "soil-exposure",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-soil-exposure"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\\"polygons\":[{\\"data\":[[84,389],[1840,349],[1824,526],[78,526]],\\"name\":"a"}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.33 Creating a Vessel Intrusion Detection (Cloud) Job

### Function

This API is used to create a vessel intrusion detection (cloud) job.



## URI

POST /v1/{project\_id}/infer/services/ship-intrusion-cloud/tasks

**Table 4-1018** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-1019** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">ShipIntrusionServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-1020** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-1021** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-1022** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1023** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-1024** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1025** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-1026** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1027** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1028** ShipIntrusionServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>ShipIntrusion Common</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-1029** ShipIntrusionCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
render_roi_sw	No	Integer	Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>



Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame. By default, the line is horizontal and drawn at the position where the height is 50% of the image height. If the image width is w and the image height is h, the default position of the line is [[1/4w,1/2h], [3/4w,1/2h]].</li> </ul>

## Response Parameters

Status code: 201

Table 4-1030 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-1031 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a vessel intrusion detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/ship-intrusion-cloud/tasks

```
{
  "name": "ship-intrusion-task",
  "description": "ship-intrusion task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "ship-intrusion",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-ship-intrusion"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.34 Creating a Floating Debris Detection (Cloud) Job

### Function

This API is used to create a floating debris detection (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/floating-cloud/tasks

**Table 4-1032** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-1033** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">FloatingServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-1034** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-1035** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-1036** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1037** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-1038** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1039** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-1040** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.



**Table 4-1041** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1042** FloatingServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>FloatingCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-1043** FloatingCommon

Parameter	Mandatory	Type	Description
night_detection_sw	No	Integer	Whether to enable detection at night in the target area. The default value is <b>0</b> . The options are as follows: <ul style="list-style-type: none"> <li>• <b>1</b>: Detection at night is enabled.</li> <li>• <b>0</b>: Detection at night is disabled.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>

Parameter	Mandatory	Type	Description
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>• The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>• Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>• If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-1044 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

**Table 4-1045** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a floating debris detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/floating-cloud/tasks

```
{
  "name": "floating-task",
  "description": "floating task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "floating",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-floating"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "night_detection_sw": 1,
      "image_compression_ratio": 90,
      "render_roi_sw": 1,
      "render_result_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[84,389],[1840,349],[1824,526],[78,526]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.35 Creating a Drainage Outlet Monitoring (Cloud) Job

### Function

This API is used to create a drainage outlet monitoring (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/drainage-recognition-cloud/tasks

**Table 4-1046** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-1047** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.

Parameter	Mandatory	Type	Description
config	No	<a href="#">DrainageServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-1048** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>

Parameter	Mandatory	Type	Description
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-1049** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-1050** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	<p>Input type of a job. This parameter is mandatory. Options:</p> <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>

Parameter	Mandatory	Type	Description
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.
vcn	No	<b>TaskInputVcn</b> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1051** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.



Parameter	Mandatory	Type	Description
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-1052** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1053** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-1054** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>

Parameter	Mandatory	Type	Description
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1055** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1056** DrainageServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>DrainageCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-1057** DrainageCommon

Parameter	Mandatory	Type	Description
image_compression_ratio	No	Integer	Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b> , indicating that the image compression ratio is 90%. Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b>
render_result_sw	No	Integer	Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to draw an alarm detection border on the output image. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: No border will be drawn.</li> <li>• <b>1</b>: A red border will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b>
alarm_repeat_send_interval	No	Integer	Interval for reporting the drainage port status, in minutes. The value ranges from 1 to 360, and the default value is <b>5</b> . Minimum: <b>1</b> Maximum: <b>360</b> Default: <b>5</b>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the automatic AI positioning for the drainage port is enabled by default. Automatic positioning and calibration of the drainage port ROI area are performed when a task is delivered and at 7:00 a.m. every day.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-1058** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-1059** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a drainage outlet monitoring (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/drainage-recognition-cloud/tasks
{
  "name": "drainage-task",
  "description": "drainage task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "drainage",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-drainage"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "render_result_sw": 0,
      "alarm_repeat_send_interval": 5,
      "image_compression_ratio": 90,
      "target_roi": "{\"polygons\": [{\"data\": [[0,0],[0,1080],[1920,1080],[1920,0]]}]}"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

## 4.2.36 Creating a River Water Level Gauge Reading (Cloud) Job

### Function

This API is used to create a river water level gauge reading (cloud) job.

## URI

POST /v1/{project\_id}/infer/services/cali-water-ruler-river-cloud/tasks

**Table 4-1060** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

## Request Parameters

**Table 4-1061** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">WaterRulerServiceConfig</a> object	Job configuration parameters
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template

Parameter	Mandatory	Type	Description
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-1062** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.



**Table 4-1063** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-1064** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1065** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-1066** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1067** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-1068** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1069** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1070** WaterRulerServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>WaterRulerCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-1071** WaterRulerCommon

Parameter	Mandatory	Type	Description
report_interval	No	Number	Report interval, in minutes. The value ranges from 0.1 to 360.0. The default value is <b>1.0</b> , indicating that data is reported every minute. Minimum: <b>0.1</b> Maximum: <b>360.0</b> Default: <b>1.0</b>
calibration_info	No	String	Corresponds to the <b>Calibration Information</b> parameter on the console. The value of this parameter is a JSON string. An escape character must be added in an API call. Example: <ul style="list-style-type: none"> <li> <pre> {"lines":[{"data": [[1000,159], [1033,156]],"properties": {"scale":"100"}},{"data": [[1003,288], [1038,286]],"properties": {"scale":"75"}},{"data": [[1010,571], [1044,567]],"properties": {"scale":"20"}}} </pre> </li> <li><b>data</b> indicates the two endpoints of the calibration line, and <b>scale</b> indicates the corresponding watermark (cm).</li> </ul>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>Ensure that the water ruler falls within the value of this parameter so that the water ruler can be read to generate correct alarms.</li> <li>When the video resolution changes, modify this parameter in the job configuration. If this parameter is unavailable or incorrectly set, the default value is used, that is, the entire video frame.</li> </ul>

## Response Parameters

Status code: 201

Table 4-1072 Response body parameters

Parameter	Type	Description
id	String	Job ID.

Status code: 400

Table 4-1073 Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code

Parameter	Type	Description
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a river water level gauge reading (cloud) job. Use VIS as the input source, and DIS as the output channel.

POST /v1/{project\_id}/infer/services/cali-water-ruler-river-cloud/tasks

```
{
  "name": "water-ruler-task",
  "description": "water-ruler task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "water-ruler",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-water-ruler"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "report_interval": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[0,0],[0,1080],[1920,1080],[1920,0]]}]",
      "calibration_info": "{\"lines\": [{\"data\": [[460,741],[660,741]],\"scale\":110},{\"data\": [[460,420],[660,420]],\"scale\":71},{\"data\": [[460,190],[660,190]],\"scale\":22}]"
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).



## 4.2.37 Creating a Waterlogging Detection (Cloud) Job

### Function

This API is used to create a waterlogging detection (cloud) job.

### URI

POST /v1/{project\_id}/infer/services/w-ponding-detection-cloud/tasks

**Table 4-1074** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

### Request Parameters

**Table 4-1075** Request body parameters

Parameter	Mandatory	Type	Description
name	No	String	Job name. It can contain up to 100 characters and can include uppercase and lowercase letters, digits, hyphens (-), and underscores (_).
description	No	String	Job description. It can contain up to 500 characters.
schedule	No	<a href="#">TaskSchedule</a> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	Yes	<a href="#">TaskInput</a> object	Input configuration of a job
output	Yes	<a href="#">TaskOutput</a> object	Output configuration of a job. At least one output mode must be configured.
config	No	<a href="#">PondingServiceConfig</a> object	Job configuration parameters

Parameter	Mandatory	Type	Description
service_version	No	String	Service version
is_saved_as_template	No	Boolean	Whether to save the job configuration as a template
resource_order_id	No	String	ID of the algorithm capability package, which can be obtained on the page for purchasing an algorithm capability package

**Table 4-1076** TaskSchedule

Parameter	Mandatory	Type	Description
type	Yes	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	Yes	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	No	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>
days_of_month	No	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month. Minimum: <b>1</b> Maximum: <b>31</b>
periods	No	Array<Array< <b>PeriodsData</b> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-1077** PeriodsData

Parameter	Mandatory	Type	Description
begin_at	Yes	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	Yes	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-1078** TaskInput

Parameter	Mandatory	Type	Description
type	Yes	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Yes	Array of <b>TaskInputData</b> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Mandatory	Type	Description
vcn	No	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1079** TaskInputData

Parameter	Mandatory	Type	Description
video_source_id	No	String	Video source ID
stream_name	No	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	No	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	No	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	No	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	No	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	No	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .

Parameter	Mandatory	Type	Description
rtsp_path_in_response	No	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	No	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .
device_id	No	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	No	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2. Minimum: <b>1</b> Maximum: <b>3</b>
id	No	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgcamera</b> . Maximum: <b>63</b>

**Table 4-1080** TaskInputVcn

Parameter	Mandatory	Type	Description
ip	Yes	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .

Parameter	Mandatory	Type	Description
port	Yes	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> . Minimum: <b>0</b> Maximum: <b>65535</b>
username	Yes	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	Yes	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1081** TaskOutput

Parameter	Mandatory	Type	Description
dis	No	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	No	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .
event_center	No	Boolean	Whether to send alarms to the event center. This parameter is valid for cloud jobs. Default: <b>false</b>

**Table 4-1082** TaskOutputDis

Parameter	Mandatory	Type	Description
stream_name	Yes	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1083** TaskOutputWebhook

Parameter	Mandatory	Type	Description
url	Yes	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Yes	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	No	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1084** PongdingServiceConfig

Parameter	Mandatory	Type	Description
common	Yes	<b>PongdingCommon</b> object	Custom configuration items specified during job running. The items are in JSON format and defined by the service publisher. For details about the configuration items, see the description of the corresponding algorithm service.

**Table 4-1085** PondingCommon

Parameter	Mandatory	Type	Description
alert_mode	No	String	<p>Corresponds to the <b>Alert Mode</b> parameter on the console. This parameter specifies the detection alarm mode. Two modes are available:</p> <ul style="list-style-type: none"> <li>• <b>single</b>: one-off alarm mode. When a specific event occurs, an alarm is generated and the event information is reported.</li> <li>• <b>periodic</b>: periodic alarm mode. All status information is reported at a specified detection interval.</li> <li>• The default value is <b>single</b>.</li> </ul>
alert_detection_interval	No	Integer	<p>Corresponds to the <b>Detection Interval</b> parameter on the console. This parameter specifies the detection interval in seconds. The value ranges from 10 to 86400.</p> <ul style="list-style-type: none"> <li>• This parameter is valid only when <b>alert_mode</b> is set to <b>periodic</b>.</li> </ul> <p>Minimum: <b>10</b> Maximum: <b>86400</b> Default: <b>60</b></p>
ponding_area_ratio_thres	No	Number	<p>Corresponds to the <b>Ponding Area Ratio Threshold</b> parameter on the console. When the ratio of the ponding area to the image area exceeds the threshold, an alarm is triggered and an alarm image is output in JSON format.</p> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0.1</b></p>



Parameter	Mandatory	Type	Description
render_result_sw	No	Integer	<p>Corresponds to the <b>Render Result Switch</b> parameter on the console. This parameter specifies whether to render the ponding area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: The ponding area will not be rendered.</li> <li>• <b>1</b>: The ponding area will be rendered in red.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
render_roi_sw	No	Integer	<p>Corresponds to the <b>Render ROI Switch</b> parameter on the console. This parameter specifies whether to draw a detection area on the output image. The options are as follows:</p> <ul style="list-style-type: none"> <li>• <b>0</b>: No detection area will be drawn.</li> <li>• <b>1</b>: A detection area in yellow will be drawn.</li> <li>• The default value is <b>0</b>.</li> </ul> <p>Minimum: <b>0</b> Maximum: <b>1</b> Default: <b>0</b></p>
image_compression_ratio	No	Integer	<p>Corresponds to the <b>Image Compression Ratio</b> parameter on the console. The value ranges from 20 to 100. The default value is <b>90</b>, indicating that the image compression ratio is 90%.</p> <p>Minimum: <b>20</b> Maximum: <b>100</b> Default: <b>90</b></p>

Parameter	Mandatory	Type	Description
target_roi	No	String	<p>Corresponds to the <b>Target ROI</b> parameter on the console.</p> <ul style="list-style-type: none"> <li>The value of this parameter is a JSON string. An escape character must be added in an API call. For details about the JSON format, see <a href="#">Setting target_roi</a>.</li> <li>Example: {"polygons": [{"data": [[84,389], [1840,349],[1824,526], [78,526]]}]}</li> <li>If this parameter is not specified, the detection area is the entire video frame.</li> </ul>

## Response Parameters

**Status code: 201**

**Table 4-1086** Response body parameters

Parameter	Type	Description
id	String	Job ID.

**Status code: 400**

**Table 4-1087** Response body parameters

Parameter	Type	Description
error_code	String	Internal service error code
error_msg	String	Error information Minimum: <b>0</b> Maximum: <b>4096</b>

## Example Requests

Create a waterlogging detection (cloud) job. Use VIS as the input source, and DIS as the output channel.

```
POST /v1/{project_id}/infer/services/w-ponding-detection-cloud/tasks
```

```
{
  "name": "ponding-task",
  "description": "ponding task test",
  "input": {
    "type": "vis",
    "data": [ {
      "stream_name": "ponding",
      "index": 0
    } ]
  },
  "output": {
    "dis": {
      "stream_name": "dis-ponding"
    }
  },
  "service_version": "3.0",
  "resource_order_id": "840a5cf90d4a4bbaa71f251dfe8fe64e",
  "config": {
    "common": {
      "alert_mode": "single",
      "alert_detection_interval": 60,
      "ponding_area_ratio_thres": 0.1,
      "render_result_sw": 1,
      "render_roi_sw": 1,
      "target_roi": "{\"polygons\": [{\"data\": [[100,100],[1800,100],[1800,1000],[100,1000]]}]}",
      "image_compression_ratio": 80
    }
  }
}
```

## Example Responses

None

## Status Codes

Status Code	Description
201	The service job has been created.
400	Request error

## Error Codes

See [Error Codes](#).

# 4.3 Public APIs

## 4.3.1 Deleting a Job

### Function

This API is used to delete a job.

## URI

DELETE /v1/{project\_id}/infer/tasks/{task\_id}

**Table 4-1088** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .
task_id	Yes	String	Job ID

## Request Parameters

**Table 4-1089** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. It is a response to the API used to obtain a user token. This API is the only one that does not require authentication.

## Response Parameters

None

## Example Requests

None

## Example Responses

None

## Status Codes

Status Code	Description
204	The job has been deleted.

## Error Codes

See [Error Codes](#).

### 4.3.2 Obtaining the Job List

#### Function

This API is used to obtain the job list.

#### URI

GET /v1/{project\_id}/infer/tasks

**Table 4-1090** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .

**Table 4-1091** Query Parameters

Parameter	Mandatory	Type	Description
title	No	String	Algorithm name
camera_name	No	String	Camera name Minimum: <b>1</b> Maximum: <b>255</b>
task_state	No	String	Job status
task_name	No	String	Job name
page_size	No	Integer	Number of items displayed on each page Minimum: <b>5</b> Maximum: <b>50</b> Default: <b>10</b>
page	No	Integer	Offset Default: <b>1</b>
sort_dir	No	String	Sorting rule for displaying service jobs Default: <b>desc</b>
batch_id	No	String	Batch configuration ID

Parameter	Mandatory	Type	Description
video_group_id	No	String	Video group ID. Multiple values are separated by commas (,).
company	No	String	Vendor name. Multiple values are separated by commas (,).

## Request Parameters

**Table 4-1092** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. It is a response to the API used to obtain a user token. This API is the only one that does not require authentication.

## Response Parameters

**Status code: 200**

**Table 4-1093** Response body parameters

Parameter	Type	Description
count	Integer	Number of records displayed on the current page
tasks	Array of <a href="#">taskInfoInList</a> objects	Obtained jobs
page	Integer	Current page number
page_size	Integer	Maximum number of records displayed on a page

**Table 4-1094** taskInfoInList

Parameter	Type	Description
id	String	Job ID
name	String	Job name

Parameter	Type	Description
created_at	String	Job creation time
state	String	Status of a job
video_source_name	String	Video source name
title	String	Algorithm name
company	String	Vendor name
type	String	Job type
group_name	String	Group name. Multiple values are separated by commas (,).

### Example Requests

None

### Example Responses

None

### Status Codes

Status Code	Description
200	Normal

### Error Codes

See [Error Codes](#).

## 4.3.3 Obtaining Job Details

### Function

This API is used to obtain job details.

### URI

GET /v1/{project\_id}/infer/tasks/{task\_id}

**Table 4-1095** Path Parameters

Parameter	Mandatory	Type	Description
project_id	Yes	String	Project ID. For details about how to obtain the project ID and name, see <a href="#">Obtaining the Project ID and Name</a> .
task_id	Yes	String	Job ID

## Request Parameters

**Table 4-1096** Request header parameters

Parameter	Mandatory	Type	Description
X-Auth-Token	Yes	String	User token. It is a response to the API used to obtain a user token. This API is the only one that does not require authentication.

## Response Parameters

**Status code: 200**

**Table 4-1097** Response body parameters

Parameter	Type	Description
id	String	Job ID
name	String	Job name
creator	String	Username of the job creator
project_id	String	Project ID of the job creator
description	String	Job description Minimum: <b>0</b> Maximum: <b>500</b>
release_id	String	ID of the service corresponding to a job
created_at	String	Job creation time
updated_at	String	Time when the latest job status was updated



Parameter	Type	Description
state	String	Status of a job. Options: <ul style="list-style-type: none"> <li>● <b>PENDING</b>: The job is awaiting.</li> <li>● <b>RECOVERING</b>: The job is being recovered.</li> <li>● <b>STARTING</b>: The job is starting.</li> <li>● <b>UPGRADING</b>: The job is being upgraded.</li> <li>● <b>CREATE_FAILED</b>: Creating the job failed.</li> <li>● <b>START_FAILED</b>: Starting the job failed.</li> <li>● <b>RUNNING</b>: The job is running.</li> <li>● <b>STOPPING</b>: The job is being stopped.</li> <li>● <b>STOPPED</b>: The job has been stopped.</li> <li>● <b>ABNORMAL</b>: The job is abnormal.</li> <li>● <b>SUCCEEDED</b>: The job has been executed.</li> <li>● <b>FAILED</b>: The job failed to be run.</li> <li>● <b>DELETING</b>: The job is being deleted.</li> <li>● <b>FREEZING</b>: The job is being frozen.</li> <li>● <b>FROZEN</b>: The job has been frozen.</li> </ul>
status	String	Details about a job status (for some statuses only) Minimum: <b>0</b> Maximum: <b>4096</b>
error	<b>error</b> object	Error information
schedule_status	String	Status of a scheduled job. Options: <ul style="list-style-type: none"> <li>● <b>ACTIVATED</b>: The job is activated.</li> <li>● <b>INACTIVATED</b>: The job is not activated.</li> </ul>
schedule	<b>TaskSchedule</b> object	Configuration of a scheduled job. Scheduled jobs do not support OBS input. URL input supports only RTMP and RTSP.
input	<b>TaskInput</b> object	Input configuration of a job
output	<b>TaskOutputForDisplay</b> object	Output configuration of a job
config	<b>TaskServiceConfig</b> object	Job runtime parameters customized by the service publisher
video_source_name	String	Video source name
title	String	Algorithm name

Parameter	Type	Description
group_name	String	Group name. Multiple values are separated by commas (,).
company	String	Vendor name
task_config	String	Job algorithm configuration
type	String	Service type. Options: <b>cloud</b> and <b>edge</b>
resource_order_id	String	Order ID
package_id	String	Algorithm package ID

**Table 4-1098** error

Parameter	Type	Description
code	String	Error code Minimum: <b>8</b> Maximum: <b>36</b>
message	String	Error description Minimum: <b>2</b> Maximum: <b>512</b>

**Table 4-1099** TaskSchedule

Parameter	Type	Description
type	String	Type of a scheduled job. This parameter is mandatory for scheduled jobs. Options: <b>weekly</b> and <b>monthly</b>
timezone	String	Time zone where a user is located. This parameter is mandatory for scheduled jobs. The value is accurate to the minute.
days_of_week	Array of integers	Days in a week when a job is executed. This parameter is mandatory only for weekly jobs. The values <b>1</b> to <b>7</b> indicate Monday to Sunday respectively. Minimum: <b>1</b> Maximum: <b>7</b>

Parameter	Type	Description
days_of_month	Array of integers	Days in a month when a job is executed. This parameter is mandatory only for monthly jobs. The values 1 to 31 indicate the first day to the 31st day of a month.  Minimum: <b>1</b> Maximum: <b>31</b>
periods	Array<Array< <a href="#">PeriodsData</a> >>	Time segment configuration. Select at least one time segment for executing a weekly or monthly job.

**Table 4-1100** PeriodsData

Parameter	Type	Description
begin_at	String	Start time of a time segment, which is mandatory. The format is hh:mm:ss.
end_at	String	End time of a time segment, which is mandatory. The format is hh:mm:ss.

**Table 4-1101** TaskInput

Parameter	Type	Description
type	String	Input type of a job. This parameter is mandatory. Options: <ul style="list-style-type: none"> <li>• <b>obs</b> (files stored in OBS, supported only by cloud jobs)</li> <li>• <b>vis</b> (video streams from Video Ingestion Service, supported only by cloud jobs)</li> <li>• <b>url</b> (specified file URL or stream request URL, supported only by cloud jobs)</li> <li>• <b>edgcamera</b> (edge camera bound to IEF, supported only by edge jobs)</li> <li>• <b>restful</b> (stream request URL obtained from a user-specified streaming server through a RESTful API, supported by both cloud and edge jobs)</li> <li>• <b>vcn</b> (VCN device, supported only by edge jobs)</li> </ul>
data	Array of <a href="#">TaskInputData</a> objects	Input details of a job. The configuration varies according to the input type. Multiple inputs are allowed during creation, but only one input is allowed for update.

Parameter	Type	Description
vcn	<a href="#">TaskInputVcn</a> object	VCN server information. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1102** TaskInputData

Parameter	Type	Description
video_source_id	String	Video source ID
stream_name	String	Name of a VIS video stream. This parameter is mandatory when the input type is <b>vis</b> .
bucket	String	OBS bucket name. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>63</b>
path	String	OBS path. This parameter is mandatory when the input type is <b>obs</b> . Maximum: <b>1023</b>
url	String	File URL or RESTful request URL for obtaining a video stream. This parameter is mandatory when the input type is <b>url</b> or <b>edgerestful</b> . The value contains a maximum of 1000 characters. Maximum: <b>1000</b>
headers	Object	Headers carried in the RESTful request for obtaining a video stream. This parameter is optional when the input type is <b>edgerestful</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed.
certificate_check	Boolean	Whether to verify the certificate of the HTTPS request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value can be <b>true</b> or <b>false</b> .
rtsp_path_in_response	String	Video stream address in the response body for the RESTful request. This parameter is mandatory when the input type is <b>edgerestful</b> . The value contains a maximum of 1024 characters. Maximum: <b>1024</b>
node_id	String	ID of an IEF node. This parameter is mandatory only for some services when the input type is <b>edgerestful</b> or <b>vcn</b> .

Parameter	Type	Description
device_id	String	VCN ID. This parameter is mandatory when the input type is <b>vcn</b> .
stream_type	Integer	Stream type used for analysis. This parameter is optional when the input type is <b>vcn</b> . The value ranges from 1 to 3. The value <b>1</b> indicates primary stream, the value <b>2</b> indicates secondary stream 1, and the value <b>3</b> indicates secondary stream 2.  Minimum: <b>1</b> Maximum: <b>3</b>
id	String	ID of the edge device mounted to IEF. This parameter is mandatory when the input type is <b>edgecamera</b> .  Maximum: <b>63</b>

**Table 4-1103** TaskInputVcn

Parameter	Type	Description
ip	String	IP address of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
port	Integer	Port number of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .  Minimum: <b>0</b> Maximum: <b>65535</b>
username	String	Account name of the VCN server. This parameter is mandatory only when the input type is <b>vcn</b> .
password	String	Password of the VCN server account. This parameter is mandatory only when the input type is <b>vcn</b> .

**Table 4-1104** TaskOutputForDisplay

Parameter	Type	Description
dis	<b>TaskOutputDis</b> object	Configuration information when the output type is <b>dis</b> .
webhook	<b>TaskOutputWebhook</b> object	Configuration information when the output type is <b>webhook</b> .

Parameter	Type	Description
event_center	Boolean	Default: <b>false</b>

**Table 4-1105** TaskOutputDis

Parameter	Type	Description
stream_name	String	DIS stream name. This parameter is mandatory when the <b>dis</b> type is used. Maximum: <b>64</b>
data_category	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1106** TaskOutputWebhook

Parameter	Type	Description
url	String	Result callback address. This parameter is mandatory when the output type is <b>webhook</b> . Maximum: <b>1000</b>
headers	Object	Headers carried in result callback. This parameter is mandatory when the output type is <b>webhook</b> . The value is key-value pairs in JSON format. A maximum of 10 key-value pairs are allowed, and a minimum of 1 key-value pair is allowed.
data_category	Array of strings	List of job output types. This parameter is optional and is required only for some services. The output contains data in the <b>dataCategory</b> list.

**Table 4-1107** TaskServiceConfig

Parameter	Type	Description
common	Object	Job runtime configuration items customized by the service publisher. The value must be in JSON format. For details about the configuration items, see the description of the corresponding algorithm service.

## Example Requests

None

## Example Responses

None

## Status Codes

Status Code	Description
200	Normal

## Error Codes

See [Error Codes](#).

# 5 Alarm Information

## 5.1 People Flow Counting

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including the people flow statistics when passing a straight line or within a specific region, and the heatmap statistics.
  - Line-crossing people flow statistic on the edge

- Result example

```
{
  "task_id":"ee7d7f5c7ba24839b6abaf5b81607496",
  "stream_id":"test",
  "event_type":131073,
  "timestamp":1535546730,
  "message_id":"849D1326-4FC8-11EA-8F73-0242AC110004",
  "data":{
    "interval":2,
    "event_set":[
      {
        "line":[
          [
            480,
            1440
          ],
          [
            540,
            540
          ]
        ],
        "line_id":0,
        "side1_count":1,
        "side2_count":0,
        "side1_name":"side1",
        "side2_name":"side2"
      },
      {
        "line":[
          [
            490,
            1500
          ],
          [
            640,
            340
          ]
        ],

```



```

        "line_id":1,
        "side1_count":1,
        "side2_count":2,
        "side1_name":"in",
        "side2_name":"out"
    }
  ]
}

```

■ Example of region-entering people flow statistics

```

{
  "task_id":"ee7d7f5c7ba24839b6abaf5b81607496",
  "stream_id":"test",
  "event_type":131074,
  "timestamp":1535546604,
  "message_id":"849D1326-4FC8-11EA-8F73-0242AC110004",
  "data":{
    "event_set":[
      {
        "polygon":[
          [
            480,
            270
          ],
          [
            1440,
            270
          ],
          [
            1440,
            810
          ],
          [
            480,
            810
          ]
        ],
        "count":2,
        "region_id":0
      },
      {
        "polygon":[
          [
            480,
            200
          ],
          [
            1110,
            170
          ],
          [
            1040,
            510
          ],
          [
            280,
            310
          ]
        ],
        "count":1,
        "region_id":1
      }
    ]
  }
}

```

■ Heatmap detection result

```

{
  "task_id":"ee7d7f5c7ba24839b6abaf5b81607496",

```

```

"stream_id": "test1",
"event_type": 131075,
"timestamp": 5,
"message_id": "849D1326-4FC8-11EA-8F73-0242AC110004",
"data":{
  "interval":1,
  "heat_image_base64": "/9j/4AAQSkZJRgABAjDA...",
  "heatpoint_image_base64": "/9j/2wBDAAMCAgMCAgMD..."
}
}

```

■ JSON format

Field	Type	Description
task_id	String	Task ID
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. JSON format: <ul style="list-style-type: none"> <li>For line-crossing people flow statistics, the value is fixed to <b>131073</b>, which is <b>0x 0000 0000 0002 0001</b> in hexadecimal format.</li> <li>For region-entering people flow statistics, the value is fixed to <b>131074</b>, which is <b>0x 0000 0000 0002 0002</b> in hexadecimal format.</li> <li>For heatmap statistics, the value is fixed to <b>131075</b>, which is <b>0x 0000 0000 0002 0003</b> in hexadecimal format.</li> </ul>
message_id	String	Alarm ID in the form of a UUID
timestamp	Uint64	End time of line-crossing people flow statistics, region-entering people flow statistics, and heatmap statistics
data	Object	Service output content

■ data parameters of line-crossing people flow detection

Field	Type	Description
interval	Int	Interval for line-crossing people flow detection, in seconds
event_set	List<Object>	List of events generated

event\_set parameters

Field	Type	Description
line	List<Object>	Sets of start and end points that form lines, for example, [[50,60],[1000,1000]]. The first point indicates the start point, and the second point indicates the end point.
line_id	Int	ID of a straight line
side1_count	Int	People passing through a straight line to <b>side1_name</b>
side2_count	Int	People passing through a straight line to <b>side2_name</b>
side1_name	String	Name of side1
side2_name	String	Name of side2

- **data** parameters of region-entering people flow detection

Field	Type	Description
event_set	List<Object>	List of events generated

**event\_set** parameters

Field	Type	Description
polygon	List<Object>	A set of points that form a polygon, for example, [[484,465],[1850,450],[1905,1013],[515,1050]]
region_id	Int	Region ID
count	Int	People flow statistics of a region at the current time

- **data** parameters of heatmap detection

Field	Type	Description
interval	Int	Detection period of the heatmap, in seconds
heat_image_base64	Object	Base64 encoding results of heatmap detection

Field	Type	Description
heatpoint_image_base64	Object	Base64 encoding results after detecting the hotspot and generating the heatmap. The pixel value in the heatmap indicates the number of people detected in a position.

## 5.2 Intrusion Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "event_type":196609,
  "timestamp":1581753322,
  "stream_id":"08eeab92-d822-483a-bc60-eb3db54360f7",
  "message_id":"849D1326-4FC8-11EA-8F73-0242AC110004",
  "image_base64":"/9j/4AAQSkZJRgA...",
  "task_id":"cb088e91e03b4e4a87d55bbaae1debe0",
  "data":{
    "event_set":[
      {
        "start_position":"in",
        "end_position":"in",
        "bounding_box":{
          "y":327,
          "h":216,
          "x":876,
          "w":105
        },
        "category":0,
        "detection_id":"83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. For an intrusion detection event, the value is fixed to <b>196609</b> , which is <b>0x 0000 0000 0003 0001</b> in hexadecimal format. For a loitering detection event, the value is fixed to <b>196610</b> , which is <b>0x 0000 0000 0003 0002</b> in hexadecimal format.
task_id	String	Task ID
message_id	String	Alarm ID in the form of a UUID

Field	Type	Description
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- **data** parameter description

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
detection_id	String	UUID of the alarm object
category	Int	Alarm target type. The value can be: <ul style="list-style-type: none"> <li>• <b>0</b>: person</li> <li>• <b>1</b>: vehicle</li> <li>• <b>2</b>: other</li> </ul>
start_position	String	Start position of the intrusion. This parameter is not generated for loitering detection. <ul style="list-style-type: none"> <li>• For an intrusion against a line, the value is the name of the side from where the object enters.</li> <li>• For an intrusion into a region, the value is <b>in</b> or <b>out</b>. <ul style="list-style-type: none"> <li>- <b>in</b>: The intrusion starts inside the region.</li> <li>- <b>out</b>: The intrusion starts outside the region.</li> </ul> </li> </ul>

Field	Type	Description
end_position	String	<p>End position of the intrusion. This parameter is not generated for loitering detection.</p> <ul style="list-style-type: none"> <li>For an intrusion across a line, the value is the name of the side where the object arrives.</li> <li>For an intrusion into a region, the value is <b>in</b> or <b>out</b>. <ul style="list-style-type: none"> <li><b>in</b>: The intrusion ends inside the region.</li> <li><b>out</b>: The intrusion ends outside the region.</li> </ul> </li> </ul>

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.3 Staff On-Duty Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type": 458752,
  "task_id": "01d0d8c40f24441c897db868e17a65db",
  "stream_id": "test",
  "timestamp": 1527603463,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIIBAQE...",
  "data": {
    "event_set": [{
      "polygon": [
        [484, 465],
        [1850, 450],
        [1905, 1013],
        [515, 1050]
      ],
      "counter": 1,
      "person_set": [{
        "bounding_box": {
          "x": 876,
          "y": 446,
          "w": 142,
```



Field	Type	Description
person_set	List<Object>	Bounding box for the alarm object

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Height of a bounding box
h	Int	Width of a bounding box

## 5.4 Abandoned Object Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type": 327680,
  "timestamp": 1581753322,
  "stream_id": "08eeab92-d822-483a-bc60-eb3db54360f7",
  "message_id": "849D1326-4FC8-11EA-8F73-0242AC110004",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "task_id": "d86edc86e1c44acbae3901b8473185f7",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 931,
          "y": 576,
          "w": 307,
          "h": 124
        },
        "target_remaining_time": "10",
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>327680</b> , which is <b>0x 0000 0000 0005 0000</b> in hexadecimal format.



Field	Type	Description
task_id	String	Task ID
message_id	String	Alarm ID in the form of a UUID
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- **data** parameter description

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
target_remaining_time	Int	Target dwell time, in seconds <b>NOTE</b> Target dwell time: duration from the time when a target is detected to the time when an alarm is reported
detection_id	String	UUID of the alarm object

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.5 Crowd Density Monitoring

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "event_type": 524288,
  "task_id": "d1cde51e12eb47aaaafa36c2b4584b5c",
  "stream_id": "test_camera",
  "timestamp": 1527603463,
  "message_id": "E87B6D7C-4FFD-11EA-AD9D-34B354BC6688",
  "image_base64": "/3j24AAQSkZJRgABAQAAQABAAD/2wBDAAIIBAQE...",
  "data": {
    "scene_type": 1,
    "alarm_type": 2,
    "event_set": [{
      "crowd_count": 14,
      "banner_count": 5,
      "polygon": [
        [400, 200],
        [1280, 200],
        [1280, 720],
        [400, 720]
      ]
    }]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>524288</b> , which is <b>0x 0000 0000 0008 0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service input content

- data parameters

Field	Type	Description
scene_type	Int	Scenario type. The value is fixed to <b>1</b> .

Field	Type	Description
alarm_type	Int	Alarm type. The value can be <b>0</b> , <b>1</b> , or <b>2</b> . A larger value indicates a more important alarm type. If the value is <b>0</b> , no alarm is reported, that is, the number of people or the number of banners does not exceed the alarm threshold. If the value is <b>1</b> , only the number of detected people exceeds the alarm threshold. If the value is <b>2</b> , the number of people and the number of banners both exceed the threshold.
event_set	List<Object>	Output results list, including the polygonal area of each alarm and the alarm statistics of each region, including the number of people and banners.

- **event\_set** parameters

Field	Type	Description
polygon	List<Object>	Polygon area, which is formed by points in sequence, for example, <b>[[400, 200], [1280, 200], [1280, 720] [400, 720]]</b> . The polygon area is the detection area specified by the user.
crowd_count	Int	Number of people in the current region
banner_count	Int	Number of banners in the current region

## 5.6 Safety Suite Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "stream_id": "001",
  "event_type": 589824,
  "task_id": "d92a3de2be594710a981dc673bf5a570",
  "timestamp": 1527603463,
  "message_id": "ODD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "data": {
    "event_set": [
      {
        "bounding_box": {
```

```

        "x":100,
        "y":200,
        "w":80,
        "h":150
    },
    "type_cloth":0,
    "type_hat":0
  },
  {
    "bounding_box":{
      "x":200,
      "y":300,
      "w":70,
      "h":150
    },
    "type_cloth":0,
    "type_hat":1
  }
]
},
"image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIBAQE..."
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>589824</b> , which is <b>0x 0000 0000 0009 0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
data	Object	For details about the output content, see <a href="#">data parameters</a> .
image_base64	String	Base64 encoding results of the video image when the alarm is triggered

- data parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- event\_set parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object

Field	Type	Description
type_hat	Int	Type of the work hat detection alarm. This parameter is valid when <b>hat_detection_sw</b> is enabled. The value can be: <ul style="list-style-type: none"> <li>• <b>0</b>: The person is wearing the work hat.</li> <li>• <b>1</b>: The person is not wearing the work hat.</li> </ul>
type_cloth	Int	Type of the work clothes detection alarm. This parameter is valid when <b>cloth_detection_sw</b> is enabled. The options are as follows: <ul style="list-style-type: none"> <li>• <b>0</b>: A person does not wear the work clothes</li> <li>• <b>1</b>: A person wears the work clothes</li> </ul>

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.7 Fire and Smoke Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type": 393216,
  "task_id": "2f268b9472a544e991eae3c5c3534f5b",
  "stream_id": "b664d367-3bf4-4d94-969f-b877d8c5d9ae",
  "timestamp": 1558645124,
  "message_id": "82C02174-4FEB-11EA-9357-407D0FAD91FC",
  "image_base64": "/9j/4AAQSkZJRgABAQAAQABAAD/",
  "data": {
    "event_set": [
      {
        "state": 2,
        "bounding_box": {
          "x": 27,
          "y": 0,
```

```

        "w": 115,
        "h": 115
    }
  }
]
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>393216</b> , which is <b>0x 0000 0000 0006 0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
data	Object	Service input content
image_base64	String	Base64 encoding results of the video image when the alarm is triggered

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
state	Int	Type of the smoke and fire detection alarm: <ul style="list-style-type: none"> <li>• <b>1</b>: fire detected</li> <li>• <b>2</b>: smoke detected</li> </ul>

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box

Field	Type	Description
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.8 Fight Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "task_id": "a29dfa1bfcdd4a62b3f6048fe6965e8b",
  "stream_id": "aec5857c-222f-4aa9-be39-23654e118886",
  "event_type": 917504,
  "timestamp": 1535546604,
  "image_base64": "/9j/4AAQSkZJRgABAJDA...",
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 931,
          "y": 576,
          "w": 307,
          "h": 124
        },
        "confidence": 0.75
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	UInt64	Event type of the output message. The value is fixed to <b>917504</b> , which is <b>0x00000000000E0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	UInt64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service input content

- data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
confidence	Double	Confidence of a fight event

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.9 Shared Bicycle Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "stream_id": "001",
  "event_type": 655360,
  "task_id": "a9c003fa9c7843118f79ee2ddd4389f1",
  "timestamp": 1527603463,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 100,
          "y": 200,
          "w": 80,
          "h": 150
        },
        "detection_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218"
      },
      {
        "bounding_box": {
          "x": 200,
          "y": 300,
          "w": 70,
          "h": 150
        },
        "detection_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9219",
        "polygon_name": "illegal01"
      }
    ]
  }
}
```



```

    }
  ]
},
"image_base64": "/3j24AAQSkZJRgABAQAAQABAAD/2wBDAAIBAQE..."
}

```

- JSON format

Parameter	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>655360</b> , which is <b>0x 0000 0000 000A 0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
data	Object	Output in detail
image_base64	String	Base64 encoding results of the video image when the alarm is triggered

- **data** parameters

Parameter	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Parameter	Type	Description
bounding_box	Object	Rectangle for the alarm object
detection_id	String	Unique ID of an alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box

Field	Type	Description
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.10 Individual Behavior Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "event_type": 720896,
  "task_id": "de6f35a7cd904830b2ca544e4613febe",
  "stream_id": "test_stream",
  "timestamp": 1535546604,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgABAjDA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 100,
          "y": 200,
          "w": 80,
          "h": 150
        }
      },
      {
        "bounding_box": {
          "x": 200,
          "y": 300,
          "w": 70,
          "h": 150
        }
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
event_type	Uint64	Event type of the output alarm. <ul style="list-style-type: none"> <li>For a smoking event, this value is fixed to <b>720896</b>.</li> <li>For an event of using the mobile phone, this value is fixed to <b>786432</b>.</li> </ul>
task_id	String	Task ID
stream_id	String	Camera ID
timestamp	Uint64	Time stamp when an alarm is triggered
message_id	String	Alarm ID in the form of a UUID

Field	Type	Description
image_base64	String	Base64 encoding results of the image correspond to the video frame when an alarm is triggered
data	Object	A list of the output results. Each group of data corresponds to the alarm ID and the target list. For details, see <a href="#">data parameters</a> .

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **data** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.11 Individual Action Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "stream_id": "001",
  "event_type": 851968,
  "task_id": "6c4f45a2bf404c65961c8bbf63ff5bf3",
  "timestamp": 1527603463,
  "message_id": "ODD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "data": {
    "event_set": [
      {
        "bounding_box": {
```

```

        "x":100,
        "y":200,
        "w":80,
        "h":150
    }
  },
  {
    "bounding_box":{
      "x":200,
      "y":300,
      "w":70,
      "h":150
    }
  }
]
},
"image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIABAQE..."
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type for the results of individual action detection. <ul style="list-style-type: none"> <li>• For a climbing event, the value is fixed to <b>851968</b>, which is <b>0x 0000 0000 000D 0000</b> in hexadecimal format.</li> <li>• For a falling event, the value is fixed to <b>851969</b>, which is <b>0x 0000 0000 000D 0001</b> in hexadecimal format.</li> <li>• For a waving event, the value is fixed to <b>851970</b>, which is <b>0x 0000 0000 000D 0010</b> in hexadecimal format.</li> <li>• For a bending event, the value is fixed to <b>851971</b>, which is <b>0x 0000 0000 000D 0011</b> in hexadecimal format.</li> <li>• For a picking event, the value is fixed to <b>852224</b>, which is <b>0x 0000 0000 000D 0100</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
data	Object	Output in detail
image_base64	String	Base64 encoding results of the video image when the alarm is triggered

- data parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.12 Mask Wearing Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "stream_id": "aec5857c-222f-4aa9-be39-23654e118886",
  "event_type": 1048576,
  "task_id": "61761681a6014e7c9024d642a0d4d412",
  "timestamp": 1527603463,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIIBAQE...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 100,
          "y": 200,
          "w": 80,
          "h": 150
        }
      },
      {
        "bounding_box": {
          "x": 200,
          "y": 300,
          "w": 70,
          "h": 150
        }
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>1048576</b> , which is <b>0x0000 0000 0010 0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	A list of the output results. Each group of data corresponds to the alarm ID and the target list. For details, see the description of <b>data</b> parameters.

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.13 Abnormal Parking

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "event_type": 74240,
  "task_id": "61761681a6014e7c9024d642a0d4d412",
  "stream_id": "0354340000000000101#1c471506397a48ecab0ba52360bdd430",
  "timestamp": 1535546604,
  "message_id": "ODD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgABAJDA...",
  "data": {
    "vehicles": [{
      "bounding_box": {
        "x": 858,
        "y": 200,
        "w": 679,
        "h": 535
      },
      "license_plate_id": "Guangdong C3X94L",
      "detection_id": "dc7d8815-b34b-4ba4-b33f-c9c6cd346d79",
      "polygon_name": "a"
    }
  ]
}
```

- JSON format

Field	Type	Description
event_type	Int	Output flag of the abnormal parking detection result. The value is fixed to <b>74240</b> .
message_id	String	UUID of the JSON output, which uniquely identifies the output record
stream_id	String	Camera ID, which uniquely identifies a camera. For offline videos, video names are displayed to distinguish between different video sources.
timestamp	Int	Timestamp when an abnormal parking event is detected
data	Object	List of fields in the abnormal parking detection result. For details, see the description of <b>data</b> parameters.
image_base64	String	Base64 code of an image
task_id	String	Task ID

- data** parameters

Field	Type	Description
vehicles	List<Object>	List of output vehicles

- **vehicles** parameters

Field	Type	Description
bounding_box	Object	Coordinates of a bounding box
license_plate_id	String	License plate. When the license plate cannot be detected, "" (an empty string) is output by default.
detection_id	String	UUID of an abnormal parking event, which is used to identify whether the alarm points to the same vehicle. Note that the license plate may be blocked or blurred. As a result, this field may be inaccurate.
polygon_name	String	ROI where the abnormal parking event occurs

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.14 Vehicle Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "event_type": 75008,
  "task_id": "a066974ae 7334649a37257242c5fa4c3",
  "stream_id": "0354340000000000101#1c471506397a48ecab0ba52360bdd430",
  "timestamp": 1535546604,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgABAJDA...",
  "data": {
    "vehicles": [{
      "bounding_box": {
        "x": 858,
```



```

        "y": 200,
        "w": 679,
        "h": 535
    },
    "vehicle_type": 0,
    "tarpaulin_type": -1,
    "license_plate_id": "XXXXXX",
    "license_plate_type": 0,
    "direction": 1
  }}
}

```

- JSON format

Field	Type	Description
event_type	Int	Output flag of the vehicle detection result. The value is fixed to <b>75008</b> .
message_id	String	UUID of the JSON output, which uniquely identifies the output record
stream_id	String	Camera ID, which uniquely identifies a camera. For offline videos, video names are displayed to distinguish between different video sources.
timestamp	Int	Timestamp when a vehicle is detected
data	Object	List of fields in the vehicle detection result. For details, see the description of <b>data</b> parameters.
image_base64	String	Base64 code of an image
task_id	String	Task ID

- **data** parameters

Field	Type	Description
vehicles	List<Object>	List of output vehicles

- **vehicles** parameters

Field	Type	Description
bounding_box	Object	Coordinates of a bounding box

Field	Type	Description
vehicle_type	Int	Type of detected vehicles: <b>0:</b> car <b>1:</b> dump truck <b>2:</b> trailer <b>3:</b> cement mixer <b>4:</b> sanitation vehicle <b>5:</b> crane <b>6:</b> pickup truck <b>7:</b> bus <b>8:</b> fuel tanker <b>9:</b> other
tarpaulin_type	Int	Tarpaulin type of detected dump trucks: <b>-1:</b> non dump truck <b>0:</b> covered by a tarpaulin <b>1:</b> not covered by a tarpaulin
license_plate_id	String	License plate. When the license plate cannot be recognized, an empty string is output.
license_plate_type	Int	Color of license plate. <b>0</b> indicates unknown, <b>1</b> indicates blue, <b>2</b> indicates yellow, <b>3</b> indicates green (new energy vehicle), <b>4</b> indicates white, and <b>5</b> indicates black. If the license plate cannot be recognized, the output is <b>0</b> .
direction	Int	Vehicle direction. <b>0:</b> approaching. The vehicle head is captured. <b>1:</b> leaving. The vehicle rear is captured.
detection_id	String	UUID of the reported vehicle. The ID is used to identify whether the alarm points to the same vehicle. You can configure multiple parking lines and departure lines. When a vehicle crosses a line, an alarm is reported. Note that the license plate may be blocked or blurred. As a result, this field may be inaccurate.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.15 Fire Passage Obstruction Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- The JSON result includes the alarm of fire passage obstructed by vehicles or by other objects.

- JSON example (passageway obstructed by vehicles)

```
{
  "event_type": 1179649,
  "task_id": "a066974ae7334649a37257242c5fa4c3",
  "stream_id": "001",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004",
        "plate_id": "XXXXXX",
        "polygon_name": "",
        "bounding_box": {
          "x": 1712,
          "y": 560,
          "w": 207,
          "h": 180
        }
      }
    ]
  }
}
```

- JSON example (passageway obstructed by other objects)

```
{
  "event_type": 1179648,
  "task_id": "a066974ae7334649a37257242c5fa4c3",
  "stream_id": "001",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004",
        "polygon_name": "",
        "bounding_box": {
          "x": 679,
          "y": 376,
          "w": 483,
          "h": 342
        }
      }
    ]
  }
}
```

```

    }
  ]
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Quickly identifies the output message type of the service for detecting the occupation of the fire extinguishing channel. <ul style="list-style-type: none"> <li>For object obstruction, the value is fixed to <b>1179648</b>, which corresponds to <b>0x 0000 0000 0012 0000</b> in hexadecimal format.</li> <li>For vehicle obstruction, the value is fixed to <b>1179649</b>, which corresponds to <b>0x 0000 0000 0012 0001</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- data parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- event\_set parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object

Field	Type	Description
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.
plate_id	String	License plate number of the vehicle in the reported alarm (7-digit or 8-digit). This parameter is available only when <b>vehicle_occupation_sw</b> is set to <b>1</b> .  Note that the license plate may be blocked, blurred, or some fields are similar. As a result, the license plate detection fails or is inaccurate. If the detection fails, an empty string is output.

– **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.16 Non-motorized Vehicle Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type":1376256,
  "task_id":"2f268b9472a544e991eae3c5c3534f5b",
```

```

"stream_id": "9f8933c9-448c-48e5-8bc0-631ea83b92eb",
"timestamp": 1527603463,
"message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
"image_base64": "/3j24AAQSkZJRgABAQAAQABAAD/2wBDAAIBAQE...",
"data":{
  "event_set":[
    {
      "bounding_box":{
        "x":100,
        "y":200,
        "w":80,
        "h":150
      },
      type: "bicycle"
    },
    {
      "bounding_box":{
        "x":200,
        "y":300,
        "w":70,
        "h":150
      },
      type: "electromobile"
    }
  ]
}

```

- JSON format

Field	Type	Description
event_type	Uint64	Event type for the results of non-motorized vehicle detection. <ul style="list-style-type: none"> <li>• For parking violation, the value is fixed to <b>1376256</b>, which is <b>0x 0000 0000 000150000</b> in hexadecimal format.</li> <li>• For intrusion detection, the value is fixed to <b>1376257</b>, which is <b>0x 0000 0000 000150001</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
stream_id	String	Camera ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Output in detail

- data parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
type	String	Vehicle type. The value can be <b>bicycle</b> or <b>electromobile</b> .

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.17 Trash Can Anomaly Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type":1507328,
  "task_id":"8656efdafefb440bb7008f174db6c567",
  "stream_id": "9f8933c9-448c-48e5-8bc0-631ea83b92eb",
  "timestamp": 1527603463,
  "message_id": "ODD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIABAQE...",
  "data":{
    "event_set":[
      {
        "bounding_box":{
          "x":100,
          "y":200,
          "w":80,
          "h":150
        }
      },
      {
        "bounding_box":{
          "x":200,
          "y":300,
          "w":70,
          "h":150
        }
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
event_type	Uint64	Event type of the output message. The value is fixed to <b>1507328</b> , which is <b>0x 0000 0000 000170000</b> in hexadecimal format.
task_id	String	Task ID
stream_id	String	Camera ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Output in detail

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.18 Overflowing Garbage Can Detection in Cities

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.



- Result example:

```

{
  "event_type":1703936,
  "task_id":"taskef838190",
  "stream_id": "9f8933c9-448c-48e5-8bc0-631ea83b92eb",
  "timestamp": 1527603463,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIIBAQE...",
  "data":{
    "event_set":[
      {
        "bounding_box":{
          "x":100,
          "y":200,
          "w":80,
          "h":150
        }
      },
      {
        "bounding_box":{
          "x":200,
          "y":300,
          "w":70,
          "h":150
        }
      }
    ]
  }
}

```

- JSON format

Field	Type	Description
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>The value is fixed to <b>1703936</b>, which is <b>0x 0000 0000 0001A0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
stream_id	String	Camera ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Output in detail

- data parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- event\_set parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.19 Peak Crowd Counting

- Data streams in JSON format are output to the specified DIS channels, including structured data and images.
- Result example when the value of **grid\_x\_number** or **grid\_y\_number** is 0 (classic ROI settings):

```
{
  "event_type": 1769472,
  "task_id": "taskcgtiad41",
  "stream_id": "test_camera",
  "timestamp": 1527603463,
  "message_id": "E87B6D7C-4FFD-11EA-AD9D-34B354BC6688",
  "image_base64": "/3j24AAQSkZJRgABAQAAQABAAD/2wBDAAIABAQE...",
  "data": {
    "scene_type": 1,
    "alarm_type": 1,
    "total_crowd_count": 14,
    "event_set": [{
      "crowd_count": 14,
      "polygon": [
        [400, 200],
        [1280, 200],
        [1280, 720],
        [400, 720]
      ]
    }]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>1769472</b> , which is <b>0x 0000 0000 001B 0000</b> in hexadecimal format.

Field	Type	Description
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service input content

- **data** parameters

Field	Type	Description
scene_type	Int	Scenario type. The value is fixed to <b>1</b> .
alarm_type	Int	Alarm type. The value can be <b>0</b> or <b>1</b> . If the value is <b>0</b> , no alarm is reported, that is, the number of people does not exceed the alarm threshold. If the value is <b>1</b> , only the number of detected people exceeds the alarm threshold.
total_crowd_count	Uint64	Total number of people in all ROIs
event_set	List<Object>	Output results list, including the polygonal area of each alarm and the alarm statistics of each region

- **event\_set** parameters

Field	Type	Description
polygon	List<Object>	Polygon area, which is formed by points in sequence, for example, <b>[[400, 200], [1280, 200], [1280, 720] [400, 720]]</b> . The polygon area is the detection area specified by the user.
crowd_count	Int	Number of people in the current region

- Result example when the value of **grid\_x\_number** and **grid\_y\_number** is greater than 0, while **target\_roi** is set to the lower right corner of the image:

```
{
  "event_type": 1769472,
  "task_id": "taskcgtiad41",
  "stream_id": "test_camera",
```

```

"timestamp": 1527603463,
"message_id": "E87B6D7C-4FFD-11EA-AD9D-34B354BC6688",
"image_base64": "/3j24AAQSkZJRgABAQAAQABAAD/2wBDAAIIBAQE...",
"data": {
  "scene_type": 1,
  "alarm_type": 1,
  "total_crowd_count": 14,
  "grid_width": 400,
  "grid_height": 180,
  "event_set": [{
    "grid_crowd_count": [
      [-1, -1, -1, -1, -1, -1, -1, -1, -1, -1],
      [-1, -1, -1, -1, -1, -1, -1, -1, -1, -1],
      [-1, -1, -1, -1, -1, -1, -1, -1, -1, -1],
      [-1, 0, 0, 4, 7, 8, 6, 4, 3, 4],
      [-1, 7, 3, 7, 5, 8, 3, 3, 1, 2],
      [-1, 6, 0, 6, 8, 7, 5, 2, 0, 6],
      [-1, 5, 6, 0, 0, 8, 8, 6, 7, 2],
      [-1, 4, 2, 8, 9, 1, 7, 5, 3, 5],
      [-1, 0, 1, 8, 4, 3, 1, 6, 2, 3],
      [-1, 3, 8, 0, 4, 5, 3, 3, 6, 3]
    ]
  }]
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>1769472</b> , which is <b>0x 0000 0000 001B 0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service input content

- data parameters

Field	Type	Description
scene_type	Int	Scenario type. The value is fixed to <b>1</b> .
alarm_type	Int	Alarm type. The value can be <b>0</b> or <b>1</b> . If the value is <b>0</b> , no alarm is reported, that is, the number of people does not exceed the alarm threshold. If the value is <b>1</b> , only the number of detected people exceeds the alarm threshold.

Field	Type	Description
total_crowd_count	Uint64	Total number of people in all ROIs
grid_width	Int	Video frame width/Number of horizontal grids. The value is rounded down.
grid_height	Int	Video frame height/Number of vertical grids. The value is rounded up.
event_set	List<Object>	Output results list, including the head counting result of each grid

- **event\_set** parameters

Field	Type	Description
grid_crowd_count	List<Object>	Number of people in each grid. The grid sequence is from left to right and from top to bottom. The value -1 indicates that the grid is outside the target_roi area.

## 5.20 Target Attribute Recognition

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "stream_id": "001",
  "event_type": 2162688,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 100,
          "y": 200,
          "w": 80,
          "h": 150
        },
        "type": "pedestrian",
        "attribute": {
          "gender": "male",
          "age": "young",
          "hair": "short_hair",
          "glasses": "yes",
          "hat": "none",
          "mask": "yes",
          "backbag": "yes",
          "handbag": "no",
          "single_shoulder_bag": "no",

```

```

        "upper_color": "black",
        "upper_style": "short_sleeve",
        "upper_texture": "pure",
        "lower_color": "black",
        "lower_style": "shorts",
        "orientation": "front"
    },
    "polygon_name":""
}
}
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type for the output message. <ul style="list-style-type: none"> <li>• The value is fixed to <b>2162688</b>, which is <b>0x 0000 0000 0021 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object

Field	Type	Description
type	String	Target type. The following output types are supported: <b>pedestrian</b> <b>bicycle</b> <b>electronicmobile</b> <b>car</b> <b>slag_car</b> <b>trailer</b> <b>concrete_mixer</b> <b>bus</b> <b>other_vehicle</b>
attribute	Object	Pedestrian attribute. This parameter is available for targets of pedestrians only when pedestrian detection is enabled.
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

- **attribute** parameters

Field	Type	Description
gender	String	Pedestrian gender. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>male</b> <b>female</b>

Field	Type	Description
age	String	Pedestrian age group. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>child</b> <b>young</b> <b>middle</b> <b>old</b>
hair	String	Hairstyle. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>short_hair</b> <b>long_hair</b> <b>bald</b>
glasses	String	Whether a person is wearing glasses. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>glasses_yes</b> <b>glasses_no</b>
hat	String	Head covering. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>Hat</b> : The target is wearing a hat. <b>Helmet</b> : The target is wearing a helmet. <b>hat_no</b> : The target is not wearing a head covering.
mask	String	Whether a person is wearing a mask. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>mask_yes</b> <b>mask_no</b>
backbag	String	Whether a person is wearing a backpack. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>backbag_yes</b> <b>backbag_no</b>



Field	Type	Description
handbag	String	Whether a person is carrying a handbag. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>handbag_yes</b> <b>handbag_no</b>
single_shoulder_bag	String	Whether a person is wearing a sling bag. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>single_shoulder_bag_yes</b> <b>single_shoulder_bag_no</b>
upper_color	String	Tops color. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>upper_color_black</b> : black <b>upper_color_silver</b> : silver or white <b>upper_color_blue</b> : blue <b>upper_color_green</b> : green <b>upper_color_yellow</b> : yellow or orange <b>upper_color_red</b> : red, pink, or purple
upper_style	String	Tops style. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>short_sleeve</b> <b>long_sleeve</b>
upper_texture	String	Tops pattern. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>pure</b> : solid color <b>stripe</b> : stripes <b>grid</b> : grids <b>mixture</b> : patterns or prints and patterns

Field	Type	Description
lower_color	String	Bottoms color. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>lower_color_black</b> : black <b>lower_color_silver</b> : silver or white <b>lower_color_blue</b> : blue <b>lower_color_green</b> : green <b>lower_color_yellow</b> : yellow or orange <b>lower_color_red</b> : red, pink, or purple
lower_style	String	Bottoms style. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>shorts</b> <b>trousers</b> <b>short_skirt</b> <b>long_skirt</b>
orientation	String	Pedestrian orientation. This parameter is available only when this attribute is set in <b>pedes_attri_switch</b> . Options: <b>front</b> <b>back</b> <b>left</b> <b>right</b>

## 5.21 E-bike Rider Helmet Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type":1179664,
  "timestamp":1581753322,
  "stream_id":"08eeab92-d822-483a-bc60-eb3db54360f7",
  "message_id":"849D1326-4FC8-11EA-8F73-0242AC110004",
  "image_base64":"/9j/4AAQSkZJRgA...",
  "task_id":"cb088e91e03b4e4a87d55bbaae1debe0",
  "data":{
    "event_set":[
      {
        "bounding_box":{
          "y":327,
          "h":216,
          "x":876,
          "w":105
        }
      }
    ]
  }
}
```

```

    },
    "detection_id":"83BFC020-4FC8-11EA-9F93-0242AC110004"
  }
]
}
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type for the results of e-bike rider helmet detection. <ul style="list-style-type: none"> <li>• The value is fixed to <b>1179664</b>, which is <b>0x 0000 0000 0012 0010</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- data parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- event\_set parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- bounding\_box parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box

Field	Type	Description
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.22 Umbrella Violation Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "stream_id": "001",
  "event_type": 2293760,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 0,
          "y": 618,
          "w": 585,
          "h": 462
        },
        "polygon_name": "a",
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>The value is fixed to <b>2293760</b>, which is <b>0x 0000 0000 0023 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered

Field	Type	Description
data	Object	Service output content

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.23 Advertisement Violation Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "stream_id": "001",
  "event_type": 1638400,
  "task_id": "taskud8b8499",
```

```

"timestamp": 1560346229,
"message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
"image_base64": "/9j/4AAQSkZJRgA...",
"data": {
  "event_set": [
    {
      "bounding_box": {
        "x": 0,
        "y": 618,
        "w": 585,
        "h": 462
      },
      "polygon_name": "a",
      "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
    }
  ]
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>• The value is fixed to <b>1638400</b>, which is <b>0x 0000 0000 0019 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.

Field	Type	Description
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.24 Messy Piles Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "stream_id": "001",
  "event_type": 2228224,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 0,
          "y": 618,
          "w": 585,
          "h": 462
        },
        "polygon_name": "a",
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID

Field	Type	Description
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>The value is fixed to <b>2228224</b>, which is <b>0x 0000 0000 0022 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box



Field	Type	Description
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.25 Clothes Airing Violation Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "stream_id": "001",
  "event_type": 2359296,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 0,
          "y": 618,
          "w": 585,
          "h": 462
        },
        "polygon_name": "a",
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>The value is fixed to <b>2359296</b>, which is <b>0x 0000 0000 0024 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.26 Littering Construction Waste Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "stream_id": "001",
  "event_type": 2490368,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {

```

```

        "bounding_box": {
            "x": 0,
            "y": 618,
            "w": 585,
            "h": 462
        },
        "polygon_name": "a",
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
    }
}
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>• The value is fixed to <b>2490368</b>, which is <b>0x 0000 0000 0026 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.

Field	Type	Description
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.27 Missing Manhole Cover Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "stream_id": "001",
  "event_type": 2424832,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 0,
          "y": 618,
          "w": 585,
          "h": 462
        },
        "polygon_name": "a",
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID

Field	Type	Description
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>The value is fixed to <b>2424832</b>, which is <b>0x 0000 0000 0025 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box

Field	Type	Description
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.28 Missing Manhole Cover Detection From a Dynamic Perspective

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "stream_id": "002",
  "event_type": 2031616,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 100,
          "y": 100,
          "w": 150,
          "h": 150
        },
        "detection_id": "2AC19F93-39BH-180F-C020-02483BF10004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	UInt64	Event type of the output message. The value is fixed to <b>2031616</b> , which is <b>0x 0000 0000 001F 0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	UInt64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
data	Object	For details about the output content, see <a href="#">data parameters</a> .
image_base64	String	Base64 encoding results of the video image when the alarm is triggered

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.29 Urban Trash Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "stream_id": "002",
  "event_type": 1310720,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 100,
          "y": 100,
          "w": 150,
          "h": 150
        },
        "person_box": {
          "x": 150,

```

```

        "y": 150,
        "w": 250,
        "h": 350
    },
    "polygon_name": "a",
    "detection_id": "2AC19F93-39BH-180F-C020-02483BF10004"
}
]
}
}

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>• The value is fixed to <b>1310720</b>, which is <b>0x 0000 0000 0014 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- data parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- event\_set parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
person_box	Object	Rectangle for the suspected litterer. This parameter is available only when <b>trash_detect_sw</b> is set to <b>2</b> .
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.



Field	Type	Description
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

- **person\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box. If no person is detected, the value is <b>-1</b> .
y	Int	Vertical coordinate of the upper-left corner of a bounding box. If no person is detected, the value is <b>-1</b> .
w	Int	Width of a bounding box. If no person is detected, the value is <b>-1</b> .
h	Int	Height of a bounding box. If no person is detected, the value is <b>-1</b> .

## 5.30 Urban Mobile Trash Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "stream_id": "002",
  "event_type": 2031616,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA..."
```

```

    "data":{
      "event_set":[
        {
          "bounding_box": {
            "x": 100,
            "y": 100,
            "w": 150,
            "h": 150
          },
          "detection_id": "2AC19F93-39BH-180F-C020-02483BF10004"
        }
      ]
    }
  }

```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. The value is fixed to <b>2031616</b> , which is <b>0x 0000 0000 001F 0000</b> in hexadecimal format.
task_id	String	Task ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
data	Object	For details about the output content, see <a href="#">data parameters</a> .
image_base64	String	Base64 encoding results of the video image when the alarm is triggered

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.31 Urban Roadside Stall Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "stream_id": "001",
  "event_type": 1114112,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 0,
          "y": 618,
          "w": 585,
          "h": 462
        },
        "polygon_name": "a",
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	UInt64	Event type of the output message. <ul style="list-style-type: none"> <li>For roadside stall detection, the value is fixed to <b>1114112</b>, which is <b>0x 0000 0000 0011 0000</b> in hexadecimal format.</li> <li>For outstore stall detection, the value is fixed to <b>1245184</b> which is <b>0x 0000 0000 0013 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID

Field	Type	Description
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.32 Exposed Bare Soil Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "stream_id": "001",
  "event_type": 2555904,
  "task_id": "taskud8b8499",
  "timestamp": 1560346229,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgA...",
  "data": {
    "event_set": [
      {
        "bounding_box": {
          "x": 0,
          "y": 618,
          "w": 585,
          "h": 462
        },
        "polygon_name": "a",
        "detection_id": "83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type of the output message. <ul style="list-style-type: none"> <li>The value is fixed to <b>2555904</b>, which is <b>0x 0000 0000 0027 0000</b> in hexadecimal format.</li> </ul>
task_id	String	Task ID
message_id	String	UUID that uniquely identifies the output message
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
polygon_name	String	Name of the area where the target is located. For the area name setting, see the <b>target_roi</b> field. If the area name is not set, this field is an empty string by default.
detection_id	String	UUID of the alarm target. In the same detection area, the IDs of consecutively detected alarms remain unchanged. If the detection target is lost during tracking, the ID changes.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.33 Wrong-Way Driving Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type": 75009,
  "task_id": "a066974ae7334649a37257242c5fa4c3",
  "stream_id": "0354340000000000101#1c471506397a48ecab0ba52360bdd430",
  "timestamp": 1535546604,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgABAJDA...",
  "data": {
    "vehicles": [{
      "bounding_box": {
        "x": 858,
        "y": 200,
        "w": 679,
        "h": 535
      },
      "license_plate_id": "XXXXXX",
      "license_plate_type": 0,
      "direction": 0
    }
  ]
}
```

```
}
}
```

- JSON format

Field	Type	Description
event_type	Int	Output flag of the vehicle detection result. The value is fixed to <b>75009</b> .
message_id	String	UUID of the JSON output, which uniquely identifies the output record
stream_id	String	Camera ID, which uniquely identifies a camera. For offline videos, video names are displayed to distinguish between different video sources.
timestamp	Int	Timestamp when a vehicle is detected
data	Object	List of fields in the vehicle detection result. For details, see the description of <b>data</b> parameters.
image_base64	String	Base64 code of an image
task_id	String	Task ID

- **data** parameters

Field	Type	Description
vehicles	List<Object>	List of output vehicles

- **vehicles** parameters

Field	Type	Description
bounding_box	Object	Coordinates of a bounding box
license_plate_id	String	License plate. When the license plate cannot be recognized, an empty string is output.
license_plate_type	Int	Color of license plate. <b>0</b> indicates unknown, <b>1</b> indicates blue, <b>2</b> indicates yellow, <b>3</b> indicates green (new energy vehicle), <b>4</b> indicates white, and <b>5</b> indicates black. If the license plate cannot be recognized, the output is <b>0</b> .

Field	Type	Description
direction	Int	Vehicle direction. <b>0</b> : approaching. The vehicle head is captured. <b>1</b> : leaving. The vehicle rear is captured.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.34 Peak Speeding Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type": 75012,
  "task_id": "a066974ae7334649a37257242c5fa4c3",
  "stream_id": "03543400000000000101#1c471506397a48ecab0ba52360bdd430",
  "timestamp": 1535546604,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgABAJDA...",
  "data": {
    "vehicles": [{
      "bounding_box": {
        "x": 858,
        "y": 200,
        "w": 679,
        "h": 535
      }
      "speed": 10,
      "direction": 0
    },
    {
      "bounding_box": {
        "x": 858,
        "y": 200,
        "w": 679,
        "h": 535
      }
      "speed": 10,
      "direction": 0
    }
  ]
}
```



- JSON format

Field	Type	Description
event_type	Int	Output flag of the vehicle detection result. The value is fixed to <b>75012</b> .
message_id	String	UUID of the JSON output, which uniquely identifies the output record
stream_id	String	Camera ID, which uniquely identifies a camera. For offline videos, video names are displayed to distinguish between different video sources.
timestamp	Int	Timestamp when a vehicle is detected
data	Object	List of fields in the vehicle detection result. For details, see the description of <b>data</b> parameters.
image_base64	String	Base64 code of an image
task_id	String	Task ID

- **data** parameters

Field	Type	Description
vehicles	List<Object>	List of output vehicles

- **vehicles** parameters

Field	Type	Description
bounding_box	Object	Coordinates of a bounding box
speed	Int	Vehicle speed (unit: km/h)
direction	Int	Vehicle direction. <b>0</b> : approaching. The vehicle head is captured. <b>1</b> : leaving. The vehicle rear is captured.

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box

Field	Type	Description
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.35 Peak Vehicle Counting

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example:

```
{
  "event_type": 75010,
  "task_id": "a066974ae7334649a37257242c5fa4c3",
  "stream_id": "0354340000000000101#1c471506397a48ecab0ba52360bdd430",
  "timestamp": 1535546604,
  "message_id": "0DD1BEA6-634B-11E8-8B0B-407D0FAD9218",
  "image_base64": "/9j/4AAQSkZJRgABAJDA...",
  "data": {
    "interval": 10,
    "event_set": [{
      "count": 2,
      "vehicles": [{
        "bounding_box": {
          "x": 858,
          "y": 200,
          "w": 679,
          "h": 535
        }
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
event_type	Int	Output flag of the vehicle detection result. The value is fixed to <b>75010</b> .
message_id	String	UUID of the JSON output, which uniquely identifies the output record
stream_id	String	Camera ID, which uniquely identifies a camera. For offline videos, video names are displayed to distinguish between different video sources.

Field	Type	Description
timestamp	Int	Timestamp when a vehicle is detected
data	Object	List of fields in the vehicle detection result. For details, see the description of <b>data</b> parameters.
image_base64	String	Base64 code of an image
task_id	String	Task ID

- **data** parameters

Field	Type	Description
interval	Int	Output interval, in seconds
event_set	List<Object>	Output result list. Each detection area corresponds to an object.

- **event\_set** parameters

Field	Type	Description
count	Int	Number of vehicles in the area
vehicles	List<Object>	Information about vehicles in the area

- **vehicles** parameters

Field	Type	Description
bounding_box	Object	Coordinates of a bounding box

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.36 Vessel Intrusion Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example:

```
{
  "event_type":33882113,
  "timestamp":1581753322,
  "stream_id":"08eeab92-d822-483a-bc60-eb3db54360f7",
  "message_id":"849D1326-4FC8-11EA-8F73-0242AC110004",
  "image_base64":"/9j/4AAQSkZJRgA...",
  "task_id":"task1tcb8lmg",
  "data":{
    "event_set":[
      {
        "bounding_box":{
          "y":327,
          "h":216,
          "x":876,
          "w":105
        },
        "category":0,
        "detection_id":"83BFC020-4FC8-11EA-9F93-0242AC110004"
      }
    ]
  }
}
```

- JSON format

Field	Type	Description
stream_id	String	Camera ID
event_type	Uint64	Event type the output message. The value is <b>0x 0000 0000 0205 0001</b> .
task_id	String	Task ID
message_id	String	Alarm ID in the form of a UUID
timestamp	Uint64	Time when the alarm is triggered
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Service output content

- **data** parameters

Field	Type	Description
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Rectangle for the alarm object
detection_id	String	UUID of the alarm target
category	Int	Alarm target type, which depends on the project

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.37 Floating Debris Detection

- Data streams in JSON format are output to the specified webhook URLs, including structured data.
- Result example:

```
{
  "task_id": "task7qe4sbmo",
  "stream_id": "123456",
  "timestamp": 1569418161,
  "event_type": 33685505,
  "image_base64": "base64",
  "message_id": "7BA3A6AE-DF98-11E9-A00A-34B354BC6688",
  "data": {
    "suspect_tag": true,
    "bounding_box": {
      "x": 931,
      "w": 307,
      "y": 576,
      "h": 124
    }
  }
}
```

- JSON format

Field	Type	Description
task_id	String	ID of a video analysis job
stream_id	String	ID of the camera on VCN
timestamp	Int	Timestamp when an event occurs, in seconds

Field	Type	Description
event_type	Int	Event type of the output message. The value is fixed to <b>0x 0000 0000 0202 0001</b> .
image_base64	String	Base64 encoding results of the image correspond to the video frame when an alarm is triggered
message_id	String	Event ID, which is a unique string
data	Object	Event description, including the bounding box. For details, see the following table.

- Event information

Field	Type	Description
suspect_tag	bool	Whether the alarm object is suspected to be floating debris. Option: <ul style="list-style-type: none"> <li><b>true</b>: The alarm object is suspected to be floating debris.</li> <li><b>false</b>: The alarm object is confirmed as floating debris.</li> </ul>
bounding_box	List	Bounding box list

- Bounding box parameters

Field	Type	Description
x	Int	X coordinate in the upper left corner of the image corresponding to the detection target
y	Int	Y coordinate in the upper left corner of the image corresponding to the detection target
w	Int	Detection target width
h	Int	Detection target height

## 5.38 Drainage Outlet Monitoring

- Data streams in JSON format are output to the specified webhook URLs, including structured data.

- Result example:

```
{
  "task_id": "task7qe4sbmo",
  "stream_id": "123456",
  "timestamp": 1569418161,
  "event_type": 34013185,
  "message_id": "7BA3A6AE-DF98-11E9-A00A-34B354BC6688",
  "drainage_state": False,
  "image_base64": "base64",
}
```

- JSON format

Field	Type	Description
task_id	String	ID of the visual task delivered by IVA
stream_id	String	ID of the camera on VCN
timestamp	Int	Timestamp when an event occurs, in seconds
event_type	Int	Event type of the output message. The value is fixed to <b>34013185</b> .
message_id	String	Event ID, which is a unique string
drainage_state	Bool	Drainage status. Options: <ul style="list-style-type: none"> <li>• <b>True</b>: The drainage outlet is draining.</li> <li>• <b>False</b>: The drainage outlet is not draining.</li> </ul>
image_base64	String	Base64 encoding results of the image correspond to the video frame when an event occurs

## 5.39 Water Level Gauge Reading

- Data streams in JSON format are output to the specified webhook URLs, including structured data.
- Result example:

```
{
  "task_id": "task7qe4sbmo",
  "stream_id": "123456",
  "timestamp": 1569418161,
  "event_type": 33816579,
  "image_base64": "/9j/4AAQSkZJRgA...",
  "message_id": "7BA3A6AE-DF98-11E9-A00A-34B354BC6688",
  "data": {
    "water_level_list": [{
      "water_level": 12.00,
      "polygon": [
        {"x": 494, "y": 302},
        {"x": 565, "y": 302},
        {"x": 565, "y": 321},
        {"x": 494, "y": 321}
      ]
    }
  ]
}
```

- JSON format

Field	Type	Description
task_id	String	ID of the visual task delivered by IVA
stream_id	String	ID of the camera on VCN
timestamp	Int	Timestamp when an event occurs, in seconds
event_type	Int	Event type of the output message. The value is fixed to <b>33816579</b> .
image_base64	String	Base64 encoding results of the image correspond to the video frame when an event occurs
message_id	String	Event ID, which is a unique string
data	Object	Event description, including water level readings. For details, see the following table.

- Event list

Field	Type	Description
water_level_list	List[Object]	List of water level readings

- Event information



Field	Type	Description
water_level	Float	<p>Water level reading, in cm.</p> <p>When an exception occurs, this field is used as an error code. There are three types of error codes:</p> <ul style="list-style-type: none"> <li>● <b>999</b> indicates that the calibration information (calibration_info) provided during job creation does not comply with the specifications.</li> <li>● <b>998</b> indicates that there is no water level gauge in the image.</li> <li>● <b>997</b> indicates that there is a water level gauge in the image, but the result is unreliable because the horizontal distance between the detected intersection point of the water level gauge and the water surface and the leftmost or rightmost vertex of the calibration information is too long.</li> </ul>
polygon	List[Object]	<p>Four vertices of a rectangle whose midpoint is the intersection point of the water level gauge and the water surface. The information is not directly related to the service and is not perceivable to users.</p>

## 5.40 Standing Water Detection

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.

- Result example when **alert\_mode** is set to **single**:

```
{
  "event_type":1900544,
  "task_id":"51d71bb66e6948969fd6156aa48ed36d",
  "stream_id": "25292206-995f-4c31-bfd5-b0dd7bc389e7",
  "timestamp": 1611648991,
  "message_id": "CBC9C702-5FAE-11EB-9DA9-0242AC110002",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIBAQE...",
  "data":{
    "event_set":[{
      "bounding_box":{
        "x": 0,
        "y": 752,
        "w": 1920,
        "h": 328
      }
    }]
  }
}
```

- When **alert\_mode** is set to **periodic**, the results in JSON format when a waterlogging condition is detected are as follows:

```
{
  "event_type":1900544,
  "task_id":"51d71bb66e6948969fd6156aa48ed36d",
  "stream_id": "25292206-995f-4c31-bfd5-b0dd7bc389e7",
  "timestamp": 1611648991,
  "message_id": "CBC9C702-5FAE-11EB-9DA9-0242AC110002",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIBAQE...",
  "data":{
    "water_logging_ratio":0.15,
    "water_logging_flag":true,
    "event_set":[{
      "bounding_box":{
        "x": 0,
        "y": 752,
        "w": 1920,
        "h": 328
      }
    }]
  }
}
```

- When **alert\_mode** is set to **periodic**, the results in JSON format when a waterlogging condition is not detected are as follows:

```
{
  "event_type":1900544,
  "task_id":"51d71bb66e6948969fd6156aa48ed36d",
  "stream_id": "25292206-995f-4c31-bfd5-b0dd7bc389e7",
  "timestamp": 1611648991,
  "message_id": "CBC9C702-5FAE-11EB-9DA9-0242AC110002",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIBAQE...",
  "data":{
    "water_logging_ratio":0.0,
    "water_logging_flag":false,
    "event_set":[]
  }
}
```

- JSON format

Field	Type	Description
event_type	Uint64	Event type for the output message. The value is fixed to <b>1900544</b> , which is <b>0x 0000 0000 0001D0000</b> in hexadecimal format.
task_id	String	Task ID
stream_id	String	Camera ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Output in detail

- **data** parameters

Field	Type	Description
water_logging_ratio	Float	Ratio of the waterlogged area to the detection area. This parameter is available only when the detection interval is set. The value range is [0,1].
water_logging_flag	Bool	Whether waterlogging has occurred. This parameter is available only when the detection interval is set.
event_set	List<Object>	List of events generated

- **event\_set** parameters

Field	Type	Description
bounding_box	Object	Minimum bounding rectangle of the waterlogged area in the alarm output

- **bounding\_box** parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box

Field	Type	Description
w	Int	Width of a bounding box
h	Int	Height of a bounding box

## 5.41 Cyanobacteria Identification

- Data streams in JSON format are output to the specified DIS channels or webhook URLs, including structured data and images.
- Result example when **alert\_mode** is set to **single**:

```
{
  "event_type":34078721,
  "task_id":"51d71bb66e6948969fd6156aa48ed36d",
  "stream_id": "25292206-995f-4c31-bfd5-b0dd7bc389e7",
  "timestamp": 1611648991,
  "message_id": "CBC9C702-5FAE-11EB-9DA9-0242AC110002",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIBAQE...",
  "data":{
    "event_set":[{
      "bounding_box":{
        "x": 0,
        "y": 752,
        "w": 1920,
        "h": 328
      }
    }]
  }
}
```

- When **alert\_mode** is set to **periodic**, the results in JSON format when cyanobacteria is identified are as follows:

```
{
  "event_type":34078721,
  "task_id":"51d71bb66e6948969fd6156aa48ed36d",
  "stream_id": "25292206-995f-4c31-bfd5-b0dd7bc389e7",
  "timestamp": 1611648991,
  "message_id": "CBC9C702-5FAE-11EB-9DA9-0242AC110002",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIBAQE...",
  "data":{
    "water_logging_ratio":0.15,
    "water_logging_flag":true,
    "event_set":[{
      "bounding_box":{
        "x": 0,
        "y": 752,
        "w": 1920,
        "h": 328
      }
    }]
  }
}
```

- When **alert\_mode** is set to **periodic**, the results in JSON format when cyanobacteria is not identified are as follows:

```
{
  "event_type":34078721,
  "task_id":"51d71bb66e6948969fd6156aa48ed36d",
  "stream_id": "25292206-995f-4c31-bfd5-b0dd7bc389e7",
  "timestamp": 1611648991,
  "message_id": "CBC9C702-5FAE-11EB-9DA9-0242AC110002",
  "image_base64": "/3j24AAQSkZJRgABAQAAAQABAAD/2wBDAAIBAQE...",
  "data":{
```

```

    "water_logging_ratio":0.0,
    "water_logging_flag":false,
    "event_set":[]
  }
}

```

- JSON format

Field	Type	Description
event_type	Uint64	Event type for the output message. The value is fixed to <b>34078721</b> , which is <b>0x 0000 0000 0208 0001</b> in hexadecimal format.
task_id	String	Task ID
stream_id	String	Camera ID
timestamp	Uint64	Time when the alarm is triggered
message_id	String	Alarm ID in the form of a UUID
image_base64	String	Base64 encoding results of the video image when the alarm is triggered
data	Object	Output in detail

- data parameters

Field	Type	Description
water_logging_ratio	Float	Ratio of the cyanobacteria area to the detection area. This parameter is available only when the detection interval is set. The value range is [0,1].
water_logging_flag	Bool	Whether cyanobacteria bloom has occurred. This parameter is available only when the detection interval is set.
event_set	List<Object>	List of events generated

- event\_set parameters

Field	Type	Description
bounding_box	Object	Minimum bounding rectangle of the cyanobacteria area in the alarm output

- bounding\_box parameters

Field	Type	Description
x	Int	Horizontal coordinate of the upper-left corner of a bounding box
y	Int	Vertical coordinate of the upper-left corner of a bounding box
w	Int	Width of a bounding box
h	Int	Height of a bounding box

# 6 Common Parameters

## 6.1 Common Algorithm Parameters

### target\_roi

JSON structures are used to represent lines and polygons in the region of interest. The meanings of these lines and polygons depend on the services that use them.

- **target\_roi** parameters

Parameter	Mandatory	Type	Description
lines	No	List<Object>	A list of lines
polygons	No	List<Object>	A list of polygons

- **Object** parameter structure in **lines**

Parameter	Mandatory	Type	Description
data	Yes	List<Object>	Sets of start and end points that form lines, for example, [[50,60], [1000,1000]]. The first point indicates the start point, and the second point end point.
name	No	String	Name of a line
properties	No	Object	Line properties

- **Object** parameter structure in **properties**

Parameter	Mandatory	Type	Description
side1_name	No	String	<b>side1_name</b> and <b>side2_name</b> indicate the two sides of a straight line. For a non-horizontal line, the left side is side1, and for a horizontal line, the upper side is side1.
side2_name	No	String	<b>side1_name</b> and <b>side2_name</b> indicate the two sides of a straight line. For a non-horizontal line, the right side is side2, and for a horizontal line, the lower side is side2.

- **Object parameter structure in polygons**

Parameter	Mandatory	Type	Description
data	Yes	List<Object>	A set of three or more points that form a polygon, for example, [[50,60],[1000,1000],[1000,2000][50,2000]]. The value has specified the sequence of the points in forming the polygon.
name	No	String	Name of a polygon
properties	No	Object	Properties of a polygon



# 7 Appendix

## 7.1 Status Codes

Status Code	Message	Description
100	Continue	The client continues sending the request. This provisional response informs the client that part of the request has been received and has not yet been rejected by the server.
101	Switching Protocols	Switching protocols. The target protocol must be more advanced than the source protocol. For example, the current HTTP protocol is switched to a later version.
200	Created	The request for creating a resource has been fulfilled.
202	Accepted	The request has been accepted, but the processing has not been completed.
203	Non-Authoritative Information	Non-authoritative information. The request is successful.
204	NoContent	The request has been fulfilled, but the HTTP response does not contain a response body. The status code is returned in response to an HTTP OPTIONS request.
205	Reset Content	The server has fulfilled the request, but the requester is required to reset the content.

Status Code	Message	Description
206	Partial Content	The server has successfully processed a part of the GET request.
300	Multiple Choices	There are multiple options for the location of the requested resource. The response contains a list of resource characteristics and addresses from which the user or user agent (such as a browser) can choose the most appropriate one.
301	Moved Permanently	The requested resource has been assigned a new permanent URI, and the new URI is contained in the response.
302	Found	The requested resource resides temporarily under a different URI.
303	See Other	The response to the request can be found under a different URI, and should be retrieved using a GET or POST method.
304	Not Modified	The requested resource has not been modified. When the server returns this status code, it does not return any resources.
305	Use Proxy	The requested resource must be accessed through a proxy.
306	Unused	The HTTP status code is no longer used.
400	BadRequest	The request is invalid. Do not retry the request before modification.
401	Unauthorized	The status code is returned after the client provides the authentication information, indicating that the authentication information is incorrect or invalid.
402	Payment Required	This status code is reserved for future use.
403	Forbidden	The request has been rejected. The server has received and understood the request; yet it refused to respond, because the request is set to deny access. Do not retry the request before modification.

Status Code	Message	Description
404	NotFound	The requested resource cannot be found. Do not retry the request before modification.
405	MethodNotAllowed	The request contains one or more methods not supported for the resource. Do not retry the request before modification.
406	Not Acceptable	The server cannot fulfill the request according to the content characteristics of the request.
407	Proxy Authentication Required	This status code is similar to 401, but indicates that the client must first authenticate itself with the proxy.
408	Request Time-out	The request timed out. The client may repeat the request without modifications at any time later.
409	Conflict	The request could not be processed due to a conflict with the current state of the resource. This status code indicates that the resource that the client attempts to create already exists, or the requested update failed due to a conflict.
410	Gone	The requested resource is no longer available. The status code indicates that the requested resource has been deleted permanently.
411	Length Required	The server refuses to process the request without a defined <b>Content-Length</b> .
412	Precondition Failed	The server does not meet one of the preconditions that the requester puts on the request.
413	Request Entity Too Large	The request is larger than that a server is able to process. The server may close the connection to prevent the client from continuing the request. If the server cannot process the request temporarily, the response will contain a <b>Retry-After</b> header field.

Status Code	Message	Description
414	Request-URI Too Large	The URI provided was too long for the server to process.
415	Unsupported Media Type	The server is unable to process the media format in the request.
416	Requested range not satisfiable	The requested range is invalid.
417	Expectation Failed	The server fails to meet the requirements of the <b>Expect</b> request-header field.
422	UnprocessableEntity	The request is well-formed but is unable to be processed due to semantic errors.
429	TooManyRequests	The client has sent excessive number of requests to the server within a given time (exceeding the limit on the access frequency of the client), or the server has received an excessive number of requests within a given time (beyond its processing capability). In this case, the client should repeat requests after the time specified in the <b>Retry-After</b> header of the response.
500	InternalServerError	The server is able to receive but unable to understand the request.
501	Not Implemented	The server does not support the requested function.
502	Bad Gateway	The server acting as a gateway or proxy has received an invalid request from a remote server.
503	ServiceUnavailable	The requested service is invalid. Do not retry the request before modification.
504	ServerTimeout	The request cannot be fulfilled within a given time. This status code is returned to the client only when the <b>Timeout</b> parameter is specified in the request.
505	HTTP Version not supported	The server does not support the HTTP protocol version used in the request.

## 7.2 Error Codes

No data is returned if an API call fails. You can find out the cause of an error using the error code list below. When the API call fails, HTTP status code 4xx or 5xx is returned. The returned message body contains specific error code and error message. If you did not find out the cause of an error, contact the customer service personnel and provide the error code. We will help you solve the problem as soon as possible.

- Example faulty response

```
{
  "error_code": "VIAS.00010006",
  "error_msg": "An internal error occurs.",
  "detail": "Request method 'GET' not supported",
  "params": [],
  "reason": "An internal error occurs.",
  "advice": "An internal error occurs."
}
```

- Parameters

Parameter	Description
error_code	Error code
error_msg	Error message
detail	Error details
params	Related parameters
reason	Causes
advice	Solution

- Error Codes

Status Code	Error Code	Error Message	Description	Solution
400	VIAS.00010001	The parameters are invalid.	The parameters are invalid.	Ensure that the input parameters are valid.
400	VIAS.00010002	The object does not exist.	The object does not exist.	Check the configuration .
400	VIAS.00010003	The object already exists.	The object already exists.	Use or create another object.

Status Code	Error Code	Error Message	Description	Solution
400	VIAS.00010004	The object or parameter is invalid.	The object or parameter is invalid.	Check the format of the object or parameter.
401	VIAS.00010005	Authorization failed.	Authorization failed.	Check whether you have required permissions.
500	VIAS.00010006	An internal error occurs.	An internal error occurs.	Locate the fault based on logs.
400	VIAS.00010007	No task is found based on the task ID.	No task is found based on the task ID.	Check the task ID.
400	VIAS.00010008	No task is found based on the ID.	No task is found based on the ID.	Check the ID.
500	VIAS.00010009	The serviced failed to be accessed. (Internal error)	The serviced failed to be accessed. (Internal error)	Locate the fault based on logs.
400	VIAS.00010010	There is a video source with the same name.	There is a video source with the same name.	Change the video source name.
400	VIAS.00010011	There is a job with the same name.	There is a job with the same name.	Change the job name.
500	VIAS.00010012	This operation is not allowed. (Internal error)	This operation is not allowed. (Internal error)	Locate the fault based on logs.
500	VIAS.00010013	Requests are sent too frequently.	Requests are sent too frequently.	Try again later.

Status Code	Error Code	Error Message	Description	Solution
500	VIAS.00010014	This operation is forbidden. (Internal error)	This operation is forbidden. (Internal error)	Locate the fault based on logs.
500	VIAS.00010015	The resource is not found. (Internal error)	The resource is not found. (Internal error)	Locate the fault based on logs.
500	VIAS.00010016	Dependent services are unavailable. (Internal error)	Dependent services are unavailable. (Internal error)	Check the status of the dependent services.
400	VIAS.00010017	The resource code is duplicate. (Internal error)	The resource code is duplicate. (Internal error)	Locate the fault based on logs.
400	VIAS.00010018	The video source configuration is invalid.	The video source configuration is invalid.	Check whether the parameters are valid.
400	VIAS.00010019	The project ID is invalid.	The project ID is invalid.	Check whether the project ID is correct.
500	VIAS.00010020	An error occurs on the agency client. (Internal error)	An error occurs on the agency client. (Internal error)	Locate the fault based on logs.
401	VIAS.00010021	The account is restricted, frozen, or unauthenticated.	The account is restricted, frozen, or unauthenticated.	Perform real-name authentication.
400	VIAS.00010022	The database entity object is not found. (Internal error)	The database entity object is not found. (Internal error)	Check possible causes of the error.

Status Code	Error Code	Error Message	Description	Solution
500	VIAS.00010023	Token authentication failed or the permission is insufficient. (Internal error)	Token authentication failed or the permission is insufficient. (Internal error)	Check the required permissions.
500	VIAS.00010024	The request is invalid. (Internal error)	The request is invalid. (Internal error)	Check the required permissions.
500	VIAS.00010025	A network error occurs when the dependent service is accessed.	A network error occurs when the dependent service is accessed.	Check the network connection for accessing the dependent service.
500	VIAS.00010026	The internal response body cannot be analyzed. (Internal error)	The internal response body cannot be analyzed. (Internal error)	Check the format of the internal response body.
500	VIAS.00010027	The agency parameters are invalid. (Internal error)	The agency parameters are invalid. (Internal error)	Check the request parameters of the agency operation.
500	VIAS.00010028	An IAM service exception occurs. (Internal error)	An IAM service exception occurs. (Internal error)	Check the status of IAM.
500	VIAS.00010029	The maximum number of agencies has been reached. (Internal error)	The maximum number of agencies has been reached. (Internal error)	Delete other agencies.



Status Code	Error Code	Error Message	Description	Solution
500	VIAS.00010030	The current zone has the same name as the trusted zone. (Internal error)	The current zone has the same name as the trusted zone. (Internal error)	The current zone name must be different from the trusted zone name.
500	VIAS.00010031	The agency is not found. (Internal error)	The agency is not found. (Internal error)	Locate the fault based on logs.
500	VIAS.00010032	The trusted zone name is incorrect. (Internal error)	The trusted zone name is incorrect. (Internal error)	Check the trusted zone parameters.
500	VIAS.00010033	Deleting the agency failed. (Internal error)	Deleting the agency failed. (Internal error)	Check the operation on the database table.
500	VIAS.00010034	Updating the agency failed. (Internal error)	Updating the agency failed. (Internal error)	Check the operation on the database table.
500	VIAS.00010035	An agency with the same name already exists. (Internal error)	An agency with the same name already exists. (Internal error)	Ignore the error or create another agency.
500	VIAS.00010036	An interrupt exception occurs when the IAM API is called. (Internal error)	An interrupt exception occurs when the IAM API is called. (Internal error)	Check the request.

Status Code	Error Code	Error Message	Description	Solution
500	VIAS.00010037	An exception occurs when the IAM API is called. (Internal error)	An exception occurs when the IAM API is called. (Internal error)	Check the request.
500	VIAS.00010038	The request body for calling the IAM API is invalid. (Internal error)	The request body for calling the IAM API is invalid. (Internal error)	Check the request body.
500	VIAS.00010039	Failed to verify the image repository. (Internal error)	Failed to verify the image repository. (Internal error)	Check whether the internal token is obtained.
400	VIAS.00010040	The account type is not supported.	The account type is not supported.	Use an account other than the op_svc account.
400	VIAS.0010045	The OBS object does not exist.	The OBS object does not exist.	Select an existing OBS object.
400	VIAS.0010046	IVM has not been enabled.	IVM has not been enabled.	Enable IVM.
400	VIAS.0010047	The maximum number of video sources has been reached.	The maximum number of video sources has been reached.	Contact the administrator to adjust the quota.
400	VIAS.0010048	The maximum number of tasks has been reached.	The maximum number of tasks has been reached.	Contact the administrator to adjust the quota.

Status Code	Error Code	Error Message	Description	Solution
400	VIAS.00010050	Pool quota exceeds the upper limit.	The number of created resource pools has reached the upper limit.	Purchase more licenses or delete idle resource pools.
400	VIAS.00010051	do not match unique constraint.	Uniqueness verification failed.	Check that the parameter is unique.

## 7.3 Obtaining the Project ID, Account Name, and AK/SK

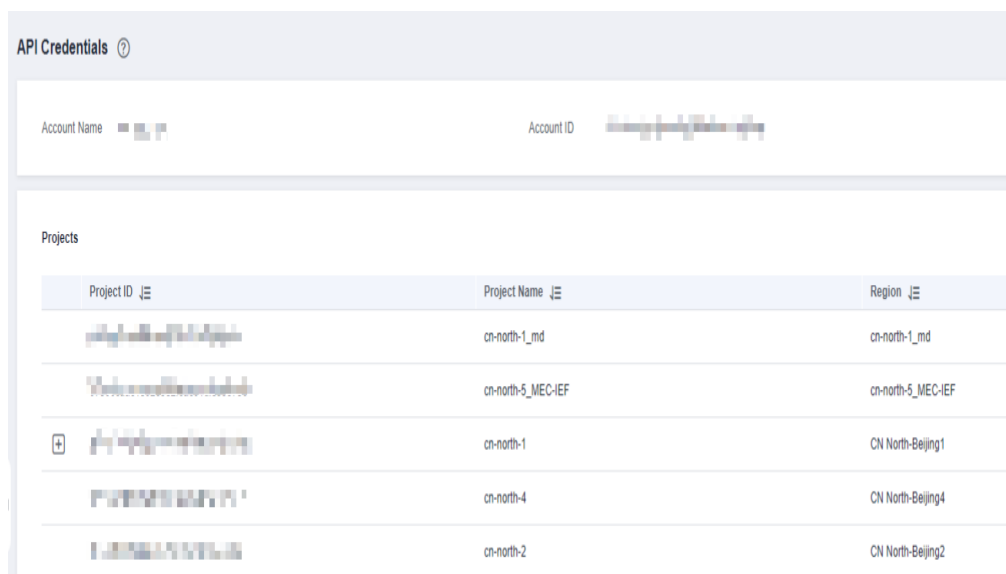
- In **Authentication**, you need to enter the account name, username, or AK/SK.
- A project ID is required for some URLs when an API is called.

This topic uses the procedure for obtaining a project ID as an example.

### Procedure

1. Log in to **the management console**.
2. In the upper right corner of the page, click the username and choose **My Credentials** from the drop-down list.
3. On the **API Credentials** page, view the username, account name, and project ID.

**Figure 7-1** Viewing username, account name, and project ID



4. Click **Access Keys** to view the added access keys (AKs).

- If no AK is available, click **Create Access Key** to add one.
- If you have generated the AK/SK, find the AK/SK file you downloaded. Generally, the file name is **credentials.csv**.

# A Change History

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Released On	Description
2023-07-19	The issue is the first official release.