Resource: images
All available Riverbed software images

http://{device}/api/cmc.upgrades/1.0/images{?product_code}

JSON

```json
[ { image } ]
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>images</td>
<td>&lt;array of &lt;image&gt;&gt;</td>
<td>All available Riverbed software images</td>
<td></td>
</tr>
<tr>
<td>images[items]</td>
<td>&lt;image&gt;</td>
<td>A Riverbed software image</td>
<td></td>
</tr>
</tbody>
</table>

Links

images: get

GET http://{device}/api/cmc.upgrades/1.0/images{?product_code}

Response Body

Returns an images data object.

Resource: image
A Riverbed software image

http://{device}/api/cmc.upgrades/1.0/images/{id}

JSON

```json
{ "id": string, "image_definition": image_definition, "image_sources": [ image_source ], <prop>: any }
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>image</td>
<td>&lt;object&gt;</td>
<td>A Riverbed software image</td>
<td>Required properties: [id, image_definition, image_sources];</td>
</tr>
<tr>
<td>image.id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the image</td>
<td>Read-only;</td>
</tr>
<tr>
<td>image.image_definition</td>
<td>&lt;image_definition&gt;</td>
<td>Properties that uniquely identify a Riverbed software image</td>
<td></td>
</tr>
<tr>
<td>image.image_sources</td>
<td>&lt;array of &lt;image_source&gt;&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>image.image_sources[items]</td>
<td>&lt;image_source&gt;</td>
<td>The source of the image. A repository can have multiple sources but particular source cannot be in more than one repository</td>
<td>Values: local, customer_url, riverbed;</td>
</tr>
<tr>
<td>image.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

Links

image: get

GET http://{device}/api/cmc.upgrades/1.0/images/{id}

Response Body

Returns an image data object.

Resource: image repositories
An unmodifiable collection of all supported repositories

```
http://{device}/api/cmc.upgrades/1.0/image_repositories
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>image_repositories</td>
<td>&lt;array of &lt;image_repository&gt;&gt;</td>
<td>An unmodifiable collection of all supported repositories</td>
<td></td>
</tr>
<tr>
<td>image_repositories[items]</td>
<td>&lt;image_repository&gt;</td>
<td>An image repository provides a set of distinct images. The distinct meaning each has a different image definition</td>
<td>Values: customer, riverbed;</td>
</tr>
</tbody>
</table>

**Links**

**image_repositories: get**

```
GET http://{device}/api/cmc.upgrades/1.0/image_repositories
```

**Response Body**

Returns an `image_repository` data object.

**Resource: locally_hosted_images**

Riverbed software images hosted locally on the SCC

```
http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/local_images
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>locally_hosted_images</td>
<td>&lt;array of &lt;locally_hosted_image&gt;&gt;</td>
<td>Riverbed software images hosted locally on the SCC</td>
<td></td>
</tr>
<tr>
<td>locally_hosted_images[items]</td>
<td>&lt;locally_hosted_image&gt;</td>
<td>A Riverbed software image hosted locally on the SCC</td>
<td></td>
</tr>
</tbody>
</table>

**Links**

**locally_hosted_images: get**

```
GET http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/local_images
```

**Response Body**

Returns a `locally_hosted_images` data object.

**locally_hosted_images: upload**

Upload an image using a URL

```
POST http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/local_images
```

**Request Body**

Provide a request body with the following structure:

```
JSON
```
### locally_hosted_image

**A Riverbed software image hosted locally on the SCC**

**HTTP GET**

```
GET http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/local_image/{id}
```

**Response Body**

Returns a [locally_hosted_image](#) data object.

### customer_url_hosted_images

**Riverbed software images hosted on a remote URL**

**HTTP GET**

```
GET http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/urls
```

**Response Body**

Returns a [customer_url_hosted_images](#) data object.
<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>customer_url_hosted_images</td>
<td>array of</td>
<td>Riverbed software images hosted on a remote URL</td>
<td></td>
</tr>
<tr>
<td>customer_url_hosted_images.[items]</td>
<td>customer_url_hosted_image</td>
<td>A Riverbed software image hosted on a remote URL</td>
<td></td>
</tr>
</tbody>
</table>

**Links**

**customer_url_hosted_images: get**

GET http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/urls

Response Body

Returns a `customer_url_hosted_images` data object.

**customer_url_hosted_images: register**

Register a new URL

POST http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/urls

Request Body

Provide a request body with the following structure:

```json
{
  "url": string,
  <prop>: any
}
```

**Response Body**

Returns a `customer_url_hosted_image` data object.

**Resource: customer_url_hosted_image**

A Riverbed software image hosted on a remote URL

http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/url/{id}

```json
{
  "id": string,
  "image_definition": image_definition,
  "url": string,
  "registration_time": number,
  <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>customer_url_hosted_image</td>
<td>object</td>
<td>A Riverbed software image hosted on a remote URL</td>
<td>Required properties: [id, image_definition, url, registration_time];</td>
</tr>
<tr>
<td>customer_url_hosted_image.id</td>
<td>string</td>
<td>A unique identifier</td>
<td></td>
</tr>
<tr>
<td>Property Name</td>
<td>Type</td>
<td>Description</td>
<td>Notes</td>
</tr>
<tr>
<td>-------------------------------</td>
<td>---------------</td>
<td>-----------------------------------------------------------------------------</td>
<td>----------------------------</td>
</tr>
<tr>
<td>customer_url_hosted_image</td>
<td>string</td>
<td>Properties that uniquely identify a Riverbed software image</td>
<td></td>
</tr>
<tr>
<td>registration_time</td>
<td>number</td>
<td>The time that the URL was registered</td>
<td>Optional;</td>
</tr>
<tr>
<td>customer_url_hosted_image</td>
<td>prop</td>
<td>Optional;</td>
<td></td>
</tr>
</tbody>
</table>

### Links

#### customer_url_hosted_image: get

```
GET http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/url/{id}
```

Response Body

Returns a [customer_url_hosted_image](#) data object.

#### customer_url_hosted_image: delete

```
DELETE http://{device}/api/cmc.upgrades/1.0/image_repositories/customer/url/{id}
```

Response Body

On success, the server does not provide any body in the responses.

### Resource: riverbed_hosted_images

Riverbed software images hosted by Riverbed Support

```
http://{device}/api/cmc.upgrades/1.0/image_repositories/riverbed/images
```

#### JSON

```
[ riverbed_hosted_image ]
```

### Links

#### riverbed_hosted_images: get

```
GET http://{device}/api/cmc.upgrades/1.0/image_repositories/riverbed/images
```

Response Body

Returns a [riverbed_hosted_images](#) data object.

### Resource: riverbed_hosted_image

A Riverbed software image hosted by Riverbed Support

```
http://{device}/api/cmc.upgrades/1.0/image_repositories/riverbed/image/{id}
```

#### JSON


```json
{
    "id": string,
    "image_definition": image_definition,
    "url": string,
    "source_versions": [ version ],
    "<prop>": any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>riverbed_hosted_image</td>
<td>&lt;object&gt;</td>
<td>A Riverbed software image hosted by Riverbed Support</td>
<td>Required properties: [image_definition, url, source_versions];</td>
</tr>
<tr>
<td>riverbed_hosted_image.id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier</td>
<td>Optional;</td>
</tr>
<tr>
<td>riverbed_hosted_image.image_definition</td>
<td>&lt;image_definition&gt;</td>
<td>Properties that uniquely identify a Riverbed software image</td>
<td></td>
</tr>
<tr>
<td>riverbed_hosted_image.url</td>
<td>&lt;string&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>riverbed_hosted_image.source_versions</td>
<td>&lt;array of &lt;version&gt;&gt;</td>
<td>Source versions that Riverbed supports for upgrading</td>
<td></td>
</tr>
<tr>
<td>connected_product_codes</td>
<td>&lt;array of &lt;product_code&gt;&gt;</td>
<td>A collection of unique product codes currently connected to the SCC</td>
<td></td>
</tr>
<tr>
<td>connected_product_codes[item]</td>
<td>&lt;product_code&gt;</td>
<td>The product code of the appliance</td>
<td>Values: SH, EX, IC, SMC, WW, GC;</td>
</tr>
</tbody>
</table>

**Links**

**riverbed_hosted_image: get**

GET http://{device}/api/cmc.upgrades/1.0/image_repositories/riverbed/image/{id}

**Response Body**

Returns a riverbed_hosted_image data object.

**Resource: connected_product_codes**

A collection of unique product codes currently connected to the SCC

GET http://{device}/api/cmc.upgrades/1.0/connected_product_codes

**Response Body**

Returns a connected_product_codes data object.

**Resource: appliances**

A collection of appliances managed by the SCC

GET http://{device}/api/cmc.upgrades/1.0/appliances/{product_code}
## Property Name | Type | Description | Notes
---|---|---|---
appliances | <array of <appliance>> | A collection of appliances managed by the SCC | |
appliances[items] | <appliance> | Information about an appliance | |

### Links

**appliances: get**

Appliances managed by the SCC optionally filtered by product_code and/or group membership

![GET http://{device}/api/cmc.upgrades/1.0/appliances/{product_code}](GET http://{device}/api/cmc.upgrades/1.0/appliances/{product_code})

**Response Body**

Returns an **appliances** data object.

### Resource: appliance

Information about an appliance

![http://{device}/api/cmc.upgrades/1.0/appliances/{product_code}/{serial}](http://{device}/api/cmc.upgrades/1.0/appliances/{product_code}/{serial})

### JSON

```json
{
  "product_code": <product_code>,
  "arch": <arch>,
  "serial": <serial>,
  "model": <string>,
  "hostname": <string>,
  "ip_address": <string>,
  "current_version": {
    "version_id": <string>,
    "version_number": <string>,
    "build_number": <string>,
    "build_timestamp": <number>,
    <prop>: any
  },
  "connected": boolean,
  "time_zone": <string>,
  "entitled": boolean,
  "read_only": boolean,
  "groups": [ <string> ],
  <prop>: any
}
```

### Property Name | Type | Description | Notes
---|---|---|---
appliance | <object> | Information about an appliance | Required properties: [product_code, serial, connected];
appliance.product_code | <product_code> | The product code of the appliance | Values: SH, EX, IC, SMC, WW, GC;
appliance.arch | <arch> | The architecture of the appliance | Values: x86_64, i386;
appliance.serial | <serial> | The serial number of the appliance | Pattern: '^[A-Za-z][0-9A-Fa-f]{2}[A-Za-z][0-9A-Fa-f]{8}$';
appliance.model | <string> | The model of the appliance | Optional;
appliance.hostname | <string> | The hostname of the appliance | Optional;
appliance.ip_address | <string> | The IP address of the appliance | Optional;
current_version | <object> | The RiOS version currently running on the appliance | Required properties: [version_id];
current_version.version_id | <string> | A unique identifier for a version of a product. Is an amalgem of all the information in the following fields | |
current_version.version_number | <string> | The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases | Optional;`
<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>upgradeable_appliances</td>
<td>&lt;object&gt;</td>
<td>Appliances that can be upgraded to a specified version</td>
<td></td>
</tr>
<tr>
<td>upgradeable_appliances.upgradeable</td>
<td>&lt;array of</td>
<td>Information about an appliance</td>
<td></td>
</tr>
<tr>
<td></td>
<td>&lt;appliance&gt;</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Links**

**appliances: get**

Get the current state of an appliance

```
GET http://{device}/api/cmc.upgrades/1.0/appliances/{product_code}/{serial}
```

**Response Body**

Returns an `appliance` data object.

**Relations**

**appliances: instances**

Related resource

```
appliances
```

**Resource: upgradeable_appliances**

Appliances that can be upgraded to a specified version

```
http://{device}/api/cmc.upgrades/1.0/upgradeable_appliances/{product_code}/{version_id}
```

**JSON**

```
{
  "upgradeable": [ appliance ],
  "exceptions": {
    "unentitled": [ appliance ],
    "model_eol": [ appliance ],
    "read_only": [ appliance ],
    "disconnected": [ appliance ],
    "not_supported": [ appliance ],
    "no_i386_image": [ appliance ],
    "no_x86_64_image": [ appliance ],
    "operation_in_progress": [ appliance ],
    "same_or_newer_version": [ appliance ],
    <prop>: any
  },
  <prop>: any
}
```
### upgradeable_appliances: exceptions

<table>
<thead>
<tr>
<th>Field</th>
<th>Type</th>
<th>Description</th>
<th>Optional</th>
</tr>
</thead>
<tbody>
<tr>
<td>upgradeable_appliances.exceptions</td>
<td>&lt;object&gt;</td>
<td>A list of appliances which cannot be upgraded categorized by reason</td>
<td>Optional;</td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.unentitled</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.model_eol</td>
<td>&lt;appliance&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.read_only</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.disconnected</td>
<td>&lt;appliance&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.no_i386_image</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.no_x86_64_image</td>
<td>&lt;appliance&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.operation_in_progress</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.same_or_newer_version</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>upgradeable_appliances.exceptions.not_supported</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

---

### Links

**upgradeable_appliances: get**

Appliances managed by the SCC that can be upgraded to the target version

GET http://{device}/api/cmc.upgrades/1.0/upgradeable_appliances/{product_code}/{version_id}

**Response Body**

- Returns an upgradeable_appliances data object.

---

**Resource: downgradeable_appliances**

Appliances that can be downgraded to a specified version. In the case of downgrades the version needs to have been previously upgraded. The images also have to be in the customer repository.

http://{device}/api/cmc.upgrades/1.0/downgradeable_appliances/{product_code}/{version_id}

---

JSON
```json
{
  "downgradeable": [ appliance ],
  "exceptions": {
    "read_only": [ appliance ],
    "disconnected": [ appliance ],
    "not_supported": [ appliance ],
    "not_previously_upgraded_to": [ appliance ],
    "no_i386_image": [ appliance ],
    "no_x86_64_image": [ appliance ],
    "operation_in_progress": [ appliance ],
    "same_or_older_version": [ appliance ],
    <prop>: any
  },
  <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>downgradeable_appliances</td>
<td>&lt;object&gt;</td>
<td>Appliances that can be downgraded to a specified version. In the case of downgrades the version needs to have been previously upgraded. The images also have to be in the customer repository.</td>
<td></td>
</tr>
<tr>
<td>downgradeable_appliances.downgradeable</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td>Information about an appliance</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgradeable_appliances.exceptions</td>
<td>&lt;object&gt;</td>
<td>A list of appliances that cannot be downgraded or categorized by reason</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgradeable_appliances.exceptions.read_only</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td>Information about an appliance</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgradeable_appliances.exceptions.disconnected</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td>Information about an appliance</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgradeable_appliances.exceptions.no_i386_image</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td>Information about an appliance</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgradeable_appliances.exceptions.no_x86_64_image</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td>Information about an appliance</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgradeable_appliances.exceptions.operation_in_progress</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td>Information about an appliance</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgradeable_appliances.exceptions.same_or_older_version</td>
<td>&lt;array of &lt;appliance&gt;&gt;</td>
<td>Information about an appliance</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgradeable_appliances.exceptions.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Links</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>downgradeable_appliances: get</strong></td>
</tr>
<tr>
<td>Appliances managed by the SCC that can be downgraded to the target version</td>
</tr>
<tr>
<td>GET http://{device}/api/cmc.upgrades/1.0/downgradeable_appliances/{product_code}/{version_id}</td>
</tr>
</tbody>
</table>
Response Body
Returns a **rebootable_appliances** data object.

### Resource: rebootable_appliances

Appliances that can be rebooted and a list of appliances that cannot

- **HTTP:** GET  
  `http://{device}/api/cmc.upgrades/1.0/rebootable_appliances/{product_code}`

**JSON**

```json
{
  "rebootable": [ appliance ],
  "exceptions": {
    "read_only": [ appliance ],
    "disconnected": [ appliance ],
    "not_supported": [ appliance ],
    "operation_in_progress": [ appliance ],
    <prop>: any
  },
  <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>rebootable_appliances</td>
<td>&lt;object&gt;</td>
<td>Appliances that can be rebooted and a list of appliances that cannot</td>
<td></td>
</tr>
<tr>
<td>rebootable_appliances.rebootable</td>
<td>&lt;array of appliance&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>rebootable_appliances.rebootable[items]</td>
<td>&lt;appliance&gt;</td>
<td>Information about an appliance</td>
<td></td>
</tr>
<tr>
<td>rebootable_appliances.exceptions</td>
<td>&lt;object&gt;</td>
<td>A list of appliances that cannot be rebooted or categorized by reason</td>
<td>Optional;</td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.read_only</td>
<td>&lt;array of appliance&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.read_only[items]</td>
<td>&lt;appliance&gt;</td>
<td>Information about an appliance</td>
<td></td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.disconnected</td>
<td>&lt;array of appliance&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.disconnected[items]</td>
<td>&lt;appliance&gt;</td>
<td>Information about an appliance</td>
<td></td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.operation_in_progress</td>
<td>&lt;array of appliance&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.operation_in_progress[items]</td>
<td>&lt;appliance&gt;</td>
<td>Information about an appliance</td>
<td></td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.not_supported</td>
<td>&lt;array of appliance&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>rebootable_appliances.exceptions.not_supported[items]</td>
<td>&lt;appliance&gt;</td>
<td>Information about an appliance</td>
<td></td>
</tr>
<tr>
<td>rebootable_appliances &lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

### Links

**rebootable_appliances:** get

Appliances managed by the SCC that can be rebooted

- **HTTP:** GET  
  `http://{device}/api/cmc.upgrades/1.0/rebootable_appliances/{product_code}`

**Response Body**

Returns a **rebootable_appliances** data object.

### Resource: upgradeable_versions

A list of upgradeable versions for a specified product code

- **HTTP:** GET  
  `http://{device}/api/cmc.upgrades/1.0/versions/upgradeable/{product_code}`
###-links

#### upgradeable_versions: get

**GET** http://{device}/api/cmc.upgrades/1.0/versions/upgradeable/{product_code}

**Response Body**

Returns an `upgradeable_versions` data object.

#### Resource: downgradeable_versions

A list of downgradeable versions for a specified product code

**GET** http://{device}/api/cmc.upgrades/1.0/versions/downgradeable/{product_code}

**Response Body**

Returns a `downgradeable_versions` data object.

### Resource: upgrade_operations

**JSON**

```
{
  "product_code": "product_code",
  "version": "version",
  <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>upgradeable_versions</td>
<td>&lt;array of</td>
<td>A list of upgradeable versions for a specified product code</td>
<td></td>
</tr>
<tr>
<td></td>
<td>&lt;object&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>upgradeable_versions[]</td>
<td>&lt;object&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>product_code</td>
<td>&lt;product_code&gt;</td>
<td>The product code of the appliance</td>
<td>Values: SH, EX, IC, SMC, WW, GC;</td>
</tr>
<tr>
<td>version</td>
<td>&lt;version&gt;</td>
<td>The version of a software image</td>
<td></td>
</tr>
<tr>
<td>&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

**Links**

#### downgradeable_versions: get

**GET** http://{device}/api/cmc.upgrades/1.0/versions/downgradeable/{product_code}

**Response Body**

Returns a `downgradeable_versions` data object.

### Resource: upgrade_operations

**JSON**

```
{
  "product_code": "product_code",
  "version": "version",
  <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>upgradeable_versions</td>
<td>&lt;array of</td>
<td>A list of upgradeable versions for a specified product code</td>
<td></td>
</tr>
<tr>
<td></td>
<td>&lt;object&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>upgradeable_versions[]</td>
<td>&lt;object&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>product_code</td>
<td>&lt;product_code&gt;</td>
<td>The product code of the appliance</td>
<td>Values: SH, EX, IC, SMC, WW, GC;</td>
</tr>
<tr>
<td>version</td>
<td>&lt;version&gt;</td>
<td>The version of a software image</td>
<td></td>
</tr>
<tr>
<td>&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>
Upgrade operations

http://{device}/api/cmc.upgrades/1.0/operations/upgrade/?username,time_lower_bound,time_upper_bound,status

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>upgrade_operations</td>
<td>&lt;array of &lt;upgrade_operation&gt;&gt;</td>
<td>Upgrade operations</td>
<td></td>
</tr>
<tr>
<td>upgrade_operations[items]</td>
<td>&lt;upgrade_operation&gt;</td>
<td>Details about an upgrade operation</td>
<td></td>
</tr>
</tbody>
</table>

**Links**

**upgrade_operations: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/upgrade/?username,time_lower_bound,time_upper_bound,status

**Response Body**

- Returns an upgrade_operations data object.

**upgrade_operations: create**

POST http://{device}/api/cmc.upgrades/1.0/operations/upgrade/?username,time_lower_bound,time_upper_bound,status

**Request Body**

- Provide an upgrade_operation data object.

**Response Body**

- Returns an upgrade_operation data object.

**Resource: upgrade_operation**

Details about an upgrade operation

http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{id}

<p>| JSON |</p>
<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>upgrade_operation</td>
<td>&lt;object&gt;</td>
<td>Details about an upgrade operation</td>
<td>Required properties: [username, product_code, target_version, reboot, comment, appliances];</td>
</tr>
<tr>
<td>upgrade_operation.id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for a operation</td>
<td>Read-only; Optional;</td>
</tr>
<tr>
<td>username</td>
<td>&lt;string&gt;</td>
<td>The name of the user that scheduled the operation or task</td>
<td>Read-only;</td>
</tr>
<tr>
<td>upgrade_operation.create_time</td>
<td>&lt;string&gt;</td>
<td>The time when the upgrade operation was created</td>
<td>Read-only; Optional;</td>
</tr>
<tr>
<td>status</td>
<td>&lt;string&gt;</td>
<td>The current state of the operation. Partially successful means that some of the operation's appliance tasks were successful but others were not</td>
<td>Read-only; Values: scheduled, running, successful, partially_successful, failed, cancelled;</td>
</tr>
<tr>
<td>upgrade_operation.product_code</td>
<td>&lt;product_code&gt;</td>
<td>The product code of the appliance</td>
<td>Values: SH, EX, IC, SMC, WW, GC;</td>
</tr>
<tr>
<td>upgrade_time</td>
<td>&lt;object&gt;</td>
<td>If specified, delay the operation until this date and time. The system stores this value as the UTC value of the upgrade time, regardless of the schedule type (local or UTC).</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>upgrade_time.datetime</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td>upgrade_time.time_type</td>
<td>&lt;string&gt;</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>Values: utc, local;</td>
</tr>
<tr>
<td>target_version</td>
<td>&lt;any&gt;</td>
<td>The software version to upgrade to</td>
<td>Required properties: [version_id];</td>
</tr>
<tr>
<td>target_version.version_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for a version of a product. Is an amalgem of all the information in the following fields</td>
<td></td>
</tr>
<tr>
<td>target_version.version_number</td>
<td>&lt;string&gt;</td>
<td>The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases</td>
<td>Optional;</td>
</tr>
<tr>
<td>target_version.build_number</td>
<td>&lt;string&gt;</td>
<td>The build number. Distinguishes prerelease versions. For any given general availability version_number there is a specific build number</td>
<td>Optional;</td>
</tr>
<tr>
<td>build_timestamp</td>
<td>&lt;number&gt;</td>
<td>The date and time of the build</td>
<td></td>
</tr>
<tr>
<td>target_version.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>upgrade_operation.reboot</td>
<td>&lt;boolean&gt;</td>
<td>Whether to perform a reboot after upgrading</td>
<td></td>
</tr>
<tr>
<td>reboot_time</td>
<td>&lt;object&gt;</td>
<td>If specified, delay the operation until this date and time. The system stores this value as the UTC value of the upgrade time, regardless of the schedule type (local or UTC).</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>reboot.time.datetime</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td>reboot.time.time_type</td>
<td>&lt;string&gt;</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>Values: utc, local;</td>
</tr>
<tr>
<td>reboot.time.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Property Name</td>
<td>Type</td>
<td>Description</td>
<td>Notes</td>
</tr>
<tr>
<td>-----------------------------------</td>
<td>------------</td>
<td>-----------------------------------------------------------------------------</td>
<td>-----------</td>
</tr>
<tr>
<td>upgrade_operation.esxi_force</td>
<td>&lt;boolean&gt;</td>
<td>Allow the upgrade to proceed even if it will result in replacing the currently installed version of ESXi or its configuration.</td>
<td>Optional;</td>
</tr>
<tr>
<td>upgrade_operation.comment</td>
<td>&lt;string&gt;</td>
<td>User comment for an operation</td>
<td></td>
</tr>
<tr>
<td>upgrade_operation.reboot_id</td>
<td>&lt;number&gt;</td>
<td>Specifies the ID of the associated reboot operation if a reboot is requested after upgrade</td>
<td>Optional;</td>
</tr>
<tr>
<td>upgrade_operation.appliances</td>
<td>&lt;array of &lt;items&gt;&gt;</td>
<td>Appliances to upgrade</td>
<td></td>
</tr>
<tr>
<td>items</td>
<td>&lt;string&gt;</td>
<td>The serial number of the appliance</td>
<td>Pattern: '^([A-Za-z][0-9A-Fa-f][2][A-Za-z]{0,2}[0-9A-Fa-f]{8})$';</td>
</tr>
<tr>
<td>upgrade_operation.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

**Links**

**upgrade_operation: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{id}

Response Body
- Returns an upgrade_operation data object.

**upgrade_operation: cancel**

POST http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{id}/cancel

Request Body
- Do not provide a request body.

Response Body
- On success, the server does not provide any body in the responses.

**Relations**

**upgrade_operation: upgrade_operation_log**

Related resource
- upgrade_operation_log

**Variables**

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/id</td>
</tr>
</tbody>
</table>

**Resource: upgrade_operation_log**

Log messages associated with the operation

http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/log

```json
{
  "operation_id": string,
  "log": log,
  "<prop>": any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>upgrade_operation_log</td>
<td>&lt;object&gt;</td>
<td>Log messages associated with the operation</td>
<td></td>
</tr>
<tr>
<td>upgrade_operation_log.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the log belongs to</td>
<td>Optional;</td>
</tr>
<tr>
<td>upgrade_operation_log.log</td>
<td>&lt;log&gt;</td>
<td>A series of timestamped log entries</td>
<td></td>
</tr>
</tbody>
</table>
Links

**upgrade_operation_log: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/log

Response Body
Returns an `upgrade_operation_log` data object.

**Resource: downgrade_operations**

Downgrade operations

GET http://{device}/api/cmc.upgrades/1.0/operations/downgrade{?username,time_lower_bound,time_upper_bound,status}

### JSON

```json
[ downgradoperation ]
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>downgrade_operations</td>
<td><code>&lt;array of &lt;downgradoperation&gt;&gt;</code></td>
<td>Downgrade operations</td>
<td></td>
</tr>
<tr>
<td>downgrade_operations[items]</td>
<td><code>&lt;downgradoperation&gt;</code></td>
<td>Details about an downgrade operation</td>
<td></td>
</tr>
</tbody>
</table>

**Links**

**downgradenoperation: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/downgrade{?username,time_lower_bound,time_upper_bound,status}

Response Body
Returns a `downgradenoperation` data object.

**downgradenoperation: create**

POST http://{device}/api/cmc.upgrades/1.0/operations/downgrade{?username,time_lower_bound,time_upper_bound,status}

Request Body
Provide a `downgradenoperation` data object.

Response Body
Returns a `downgradenoperation` data object.

**Resource: downgradenoperation**

Details about an downgrade operation

GET http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{id}

### JSON
```json
{
    "id": string,
    "username": string,
    "create_time": string,
    "status": string,
    "product_code": product_code,
    "downgrade_time": {
        "datetime": timestamp,
        "time_type": string
    },
    "target_version": {
        "version_id": string,
        "version_number": string,
        "build_number": string,
        "build_timestamp": number
    },
    "reboot": boolean,
    "reboot_time": {
        "datetime": timestamp,
        "time_type": string
    },
    "esi_force": boolean,
    "comment": string,
    "appliances": [string],
    "<prop>": any
}
```

| Property Name         | Type    | Description                                                                 | Notes                                                                 | Notes |
|-----------------------|---------|----------------------------------------------------------------------------|                                                                      |       |
| downgrade_operation   | <object>| Details about an downgrade operation                                         | Required properties: [username, product_code, target_version, reboot, comment, appliances]; |       |
| downgrade_operation.id| <string>| A unique identifier for an operation                                          | Read-only; Optional;                                                  |       |
| username              | <string>| The name of the user that scheduled the operation or task                   | Read-only;                                                           |       |
| downgrade_operation:create_time | <string>| The time when the downgrade operation was created                           | Read-only; Optional;                                                  |       |
| status                | <string>| The current state of the operation. Partially successful means that some of the operation's appliance tasks were successful but others were not | Read-only; Values: scheduled, running, successful, partially_successful, failed, cancelled; |       |
| downgrade_operation:product_code | <product_code>| The product code of the appliance                                              | Values: SH, EX, IC, SMC, WW, GC;                                    |       |
| downgrade_time        | <object>| If specified, delay the operation until this date and time. The system stores this value as the UTC value of the upgrade time, regardless of the schedule type (local or UTC). | Required properties: [datetime, time_type];                          |       |
| downgrade_time:datetime| <timestamp>| The timestamp of the build                                                   |                                                                      |       |
| downgrade_time:time_type | <string>| Whether this represents an absolute time or the local time of the managed appliance | Values: utc, local;                                                  |       |
| downgrade_time:<prop> | <any>   |                                                                            |                                                                      |       |
| target_version        | <object>| The software version to downgrade to                                         | Required properties: [version_id];                                   |       |
| target_version:version_id | <string>| A unique identifier for a version of a product. Is an amalgem of all the information in the following fields |                                                                      |       |
| target_version:version_number | <string>| The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases | Optional;                                                           |       |
| target_version:build_number | <string>| The build number. Distinguishes prerelease versions. For any given general availability version_number there is a specific build number | Optional;                                                           |       |
| build_timestamp       | <number>| The date and time of the build                                              |                                                                      |       |
| target_version:<prop> | <any>   |                                                                            |                                                                      |       |
| reboot_time:reboot     | <boolean>| Whether to perform a reboot after downgrading                               |                                                                      |       |
| reboot_time:datetime   | <timestamp>| If specified, delay the operation until this date and time. The system stores this value as the UTC value of the upgrade time, regardless of the schedule type (local or UTC). | Required properties: [datetime, time_type];                          |       |
| reboot_time:time_type  | <string>| Whether this represents an absolute time or the local time of the managed appliance | Values: utc, local;                                                  |       |
| reboot_time:<prop>     | <any>   |                                                                            |                                                                      |       |
downgrade_operation.esxi_force  <boolean>  Allow the downgrade to proceed even if it will result in replacing the currently installed version of ESXi or its configuration.  Optional;

downgrade_operation.comment  <string>  User comment for an operation

downgrade_operation.appliances  <array of <items>>  Appliances to downgrade

items  <string>  The serial number of the appliance  Pattern: '^[A-Za-z][0-9A-Fa-f]{2}[A-Za-z]{0,2}[0-9A-Fa-f]{8}$';

downgrade_operation.<prop>  <any>  Optional;

Links

**downgrade_operation: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{{id}}

Response Body

Returns a downgrade_operation data object.

**downgrade_operation: cancel**

POST http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{{id}}/cancel

Request Body

Do not provide a request body.

Response Body

On success, the server does not provide any body in the responses.

Relations

**downgrade_operation: downgrade_operation_log**

Related resource

downgrade_operation_log

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/id</td>
</tr>
</tbody>
</table>

Resource: downgrade_operation_log

Log messages associated with the operation

http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{{operation_id}}/log

**JSON**

```json
{
  "operation_id": string,
  "log": log,
  <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>downgrade_operation_log</td>
<td>&lt;object&gt;</td>
<td>Log messages associated with the operation</td>
<td></td>
</tr>
<tr>
<td>downgrade_operation_log.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the log belongs to</td>
<td>Optional;</td>
</tr>
<tr>
<td>downgrade_operation_log.log</td>
<td>&lt;log&gt;</td>
<td>A series of timestamped log entries</td>
<td></td>
</tr>
<tr>
<td>downgrade_operation_log.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td>Optional;</td>
<td></td>
</tr>
</tbody>
</table>
Links

downgrade_operation_log: get

GET http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/log

Response Body
Returns a downgrade_operation_log data object.

Resource: reboot_operations

Reboot operations

http://{device}/api/cmc.upgrades/1.0/operations/reboot{?username,time_lower_bound,time_upper_bound,status}

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>reboot_operations</td>
<td>&lt;array of &lt;reboot_operation&gt;&gt;</td>
<td>Reboot operations</td>
<td></td>
</tr>
<tr>
<td>reboot_operations[items]</td>
<td>&lt;reboot_operation&gt;</td>
<td>Details about a reboot operation</td>
<td></td>
</tr>
</tbody>
</table>

Links

reboot_operations: get

GET http://{device}/api/cmc.upgrades/1.0/operations/reboot{?username,time_lower_bound,time_upper_bound,status}

Response Body
Returns a reboot_operations data object.

reboot_operations: create

POST http://{device}/api/cmc.upgrades/1.0/operations/reboot{?username,time_lower_bound,time_upper_bound,status}

Request Body
Provide a reboot_operation data object.

Response Body
Returns a reboot_operation data object.

Resource: reboot_operation

Details about a reboot operation

http://{device}/api/cmc.upgrades/1.0/operations/reboot/{id}

JSON
### reboot_operation

**reboot_operation: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/reboot/{id}

**Response Body**

Returns a `reboot_operation` data object.

**reboot_operation: cancel**

POST http://{device}/api/cmc.upgrades/1.0/operations/reboot/{id}/cancel

**Request Body**

Do not provide a request body.
Response Body
On success, the server does not provide any body in the responses.

Relations

**reboot_operation: reboot_operation_log**

Related resource
reboot_operation_log

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/id</td>
</tr>
</tbody>
</table>

**Resource: reboot_operation_log**

Log messages associated with the operation

http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/log

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>reboot_operation_log</td>
<td>&lt;object&gt;</td>
<td>Log messages associated with the operation</td>
<td></td>
</tr>
<tr>
<td>reboot_operation_log.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the log belongs to</td>
<td>Optional;</td>
</tr>
<tr>
<td>reboot_operation_log.log</td>
<td>&lt;log&gt;</td>
<td>A series of timestamped log entries</td>
<td></td>
</tr>
<tr>
<td>reboot_operation_log.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Links

**reboot_operation_log: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/log

Response Body
Returns a reboot_operation_log data object.

**Resource: appliance_upgrade_task**

Details about the upgrade of a specific appliance in an operation

http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
</table>
```json
{
    "operation_id": string,
    "serial": serial,
    "upgrade_time": {
        "datetime": timestamp,
        "time_type": string,
        <prop>: any
    },
    "task_start_time": {
        "datetime": timestamp,
        "time_type": string,
        <prop>: any
    },
    "target_version": {
        "version_id": string,
        "version_number": string,
        "build_number": string,
        "build_timestamp": number,
        <prop>: any
    },
    "reboot": boolean,
    "reboot_time": {
        "datetime": timestamp,
        "time_type": string,
        <prop>: any
    },
    "esxi_force": boolean,
    "current_version": {
        "version_id": string,
        "version_number": string,
        "build_number": string,
        "build_timestamp": number,
        <prop>: any
    },
    "hostname": string,
    <prop>: any
}
```

### Property Name | Type | Description | Notes
--- | --- | --- | ---
appliance_upgrade_task | <object> | Details about the upgrade of a specific appliance in an operation | Required properties: [operation_id, target_version, reboot, current_version];
appliance_upgrade_task.operation_id | <string> | A unique identifier for the operation that the appliance task belongs to | |
appliance_upgrade_task.serial | <serial> | The serial number of the appliance | Pattern: ^[A-Za-z][0-9A-Fa-f]{2}[A-Za-z]{0,2}[0-9A-Fa-f]{8}$;|
upgrade_time | <object> | If specified, delay the operation until this date and time, adjusted for the local time of the device being upgraded, if scheduling in local time. | Required properties: [datetime, time_type];
upgrade_time.datetime | <timestamp> | The timestamp of the build | |
upgrade_time.time_type | <string> | Whether this represents an absolute time or the local time of the managed appliance | Values: utc, local;|
upgrade_time.<prop> | <any> | Optional; | |
task_start_time | <object> | The time when the task was actually run | Required properties: [datetime, time_type];
task_start_time.datetime | <timestamp> | The timestamp of the build | |
task_start_time.time_type | <string> | Whether this represents an absolute time or the local time of the managed appliance | Values: utc, local;|
task_start_time.<prop> | <any> | Optional; | |
target_version | <object> | The software version to upgrade to | Required properties: [version_id];|
target_version.version_id | <string> | A unique identifier for a version of a product. Is an amalgam of all the information in the following fields | |
target_version.version_number | <string> | The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases | Optional;|
target_version.build_number | <string> | The build number. Distinguishes prerelease versions. For any given general availability version_number there is a specific build number | Optional;|
build_timestamp | <number> | The date and time of the build | |
target_version.<prop> | <any> | Optional; | |
appliance_upgrade_task.reboot | <boolean> | Whether to perform a reboot after upgrading | |
reboot_time | <object> | If specified, delay the operation until this date and time, adjusted for the local time of the device being upgraded, if scheduling in local time. | Required properties: [datetime, time_type];
reboot_time.datetime | <timestamp> | The timestamp of the build | |
<table>
<thead>
<tr>
<th>Field</th>
<th>Type</th>
<th>Description</th>
<th>Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>reboot_time.time_type</td>
<td>string</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>utc, local</td>
</tr>
<tr>
<td>reboot_time.esxi_force</td>
<td>boolean</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td>current_version</td>
<td>object</td>
<td>The software version on this appliance at the time the operation was scheduled</td>
<td>Optional;</td>
</tr>
<tr>
<td>current_version.version_id</td>
<td>string</td>
<td>A unique identifier for a version of a product. Is an amalgem of all the information in the following fields</td>
<td>Optional;</td>
</tr>
<tr>
<td>current_version.version_number</td>
<td>string</td>
<td>The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases</td>
<td>Optional;</td>
</tr>
<tr>
<td>current_version.build_number</td>
<td>string</td>
<td>The build number. Distinguishes prerelease versions. For any given general availability version_number there is a specific build number</td>
<td>Optional;</td>
</tr>
<tr>
<td>build_timestamp</td>
<td>number</td>
<td>The date and time of the build</td>
<td>Optional;</td>
</tr>
<tr>
<td>appliance_upgrade_task.hostname</td>
<td>string</td>
<td>Hostname of the appliance</td>
<td>Optional;</td>
</tr>
</tbody>
</table>

**Links**

**appliance_upgrade_task: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}

Response Body

Returns an appliance_upgrade_task data object.

**appliance_upgrade_task: cancel**

POST http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}/cancel

Request Body

Do not provide a request body.

Response Body

On success, the server does not provide any body in the responses.

**Relations**

**appliance_upgrade_task: operation**

Related resource

upgrade_operation

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>id</td>
<td>0/operation_id</td>
</tr>
</tbody>
</table>

**appliance_upgrade_task: appliance**

Related resource

appliance

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

**appliance_upgrade_task: appliance_upgrade_task_state**
Related resource
appliance_upgrade_task_state

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/operation_id</td>
</tr>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

appliance_upgrade_task: appliance_upgrade_task_log

Related resource
appliance_upgrade_task_log

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/operation_id</td>
</tr>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

Resource: appliance_upgrade_task_state

The status of the upgrade of a single appliance of an operation

http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}/state

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_upgrade_task_state</td>
<td>&lt;object&gt;</td>
<td>The status of the upgrade of a single appliance of an operation</td>
<td>Required properties: [status, stage];</td>
</tr>
<tr>
<td>appliance_upgrade_task_state.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the appliance task belongs to</td>
<td>Read-only; Optional;</td>
</tr>
<tr>
<td>serial</td>
<td>&lt;string&gt;</td>
<td>The serial number of the appliance</td>
<td></td>
</tr>
<tr>
<td>appliance_upgrade_task_state.status</td>
<td>&lt;appliance_task_status&gt;</td>
<td>The current task status of the per appliance</td>
<td>Values: scheduled, running, successful, failed, cancelled;</td>
</tr>
<tr>
<td>appliance_upgrade_task_state.stage</td>
<td>&lt;appliance_upgrade_task_stage&gt;</td>
<td>The current progress of the appliance upgrade task</td>
<td>Values: waiting, initiating, downloading, patching, installing, completed, failed, cancelled;</td>
</tr>
<tr>
<td>appliance_upgrade_task_state.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

Links

appliance_upgrade_task_state: get

GET http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}/state

Response Body

Returns an appliance_upgrade_task_state data object.

appliance_upgrade_task_state: set

PUT http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}/state

Request Body
Provide an appliance_upgrade_task_state data object.

Response Body
Returns an appliance_upgrade_task_state data object.

## Resource: appliance_upgrade_task_log

Log messages associated with the appliance task

```
GET http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}/log
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_upgrade_task_log</td>
<td>&lt;object&gt;</td>
<td>Log messages associated with the appliance task</td>
<td></td>
</tr>
<tr>
<td>appliance_upgrade_task_log.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the log belongs to</td>
<td>Read-only; Optional;</td>
</tr>
<tr>
<td>serial</td>
<td>&lt;string&gt;</td>
<td>The serial number of the appliance</td>
<td>Read-only; Pattern: ^[A-Za-z]<a href="2">0-9A-Fa-f</a>?[A-Za-z]<a href="8">0-9A-Fa-f</a>?$;</td>
</tr>
<tr>
<td>appliance_upgrade_task_log.log</td>
<td>&lt;log&gt;</td>
<td>A series of timestamped log entries</td>
<td></td>
</tr>
<tr>
<td>appliance_upgrade_task_log.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td>Optional;</td>
<td></td>
</tr>
</tbody>
</table>

## Links

### appliance_upgrade_task_log: get

```
GET http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}/log
```

Response Body
Returns an appliance_upgrade_task_log data object.

### appliance_upgrade_task_log: append

Append a log entry to the log. Use restricted for internal services

```
POST http://{device}/api/cmc.upgrades/1.0/operations/upgrade/{operation_id}/appliances/{serial}/log
```

Request Body
Provide a log_entry data object.

Response Body
On success, the server does not provide any body in the responses.

## Resource: appliance_downgrade_task

Details about the downgrade of a specific appliance in an operation

```
http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}
```

<table>
<thead>
<tr>
<th>JSON</th>
</tr>
</thead>
</table>

## Log messages associated with the appliance task

```
{
  "operation_id": string,
  "serial": string,
  "log": log,
  <prop>: any
}
```
```json
{
    "operation_id": string,
    "serial": serial,
    "downgrade_time": {
        "datetime": timestamp,
        "time_type": string,
        <prop>: any
    },
    "task_start_time": {
        "datetime": timestamp,
        "time_type": string,
        <prop>: any
    },
    "target_version": {
        "version_id": string,
        "version_number": string,
        "build_number": string,
        "build_timestamp": number,
        <prop>: any
    },
    "reboot": boolean,
    "reboot_time": {
        "datetime": timestamp,
        "time_type": string,
        <prop>: any
    },
    "esxi_force": boolean,
    "current_version": {
        "version_id": string,
        "version_number": string,
        "build_number": string,
        "build_timestamp": number,
        <prop>: any
    },
    "hostname": string,
    <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_downgrade_task</td>
<td>&lt;object&gt;</td>
<td>Details about the downgrade of a specific appliance in an operation</td>
<td>Required properties: [operation_id, serial, target_version, reboot, current_version];</td>
</tr>
<tr>
<td>appliance_downgrade_task.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the appliance task belongs to</td>
<td></td>
</tr>
<tr>
<td>appliance_downgrade_task.serial</td>
<td>&lt;serial&gt;</td>
<td>The serial number of the appliance</td>
<td>Pattern: '^([A-Za-z][0-9A-Fa-f]{2}([A-Za-z][0-9A-Fa-f]{2}){0,2}[0-9A-Fa-f]{8}$';</td>
</tr>
<tr>
<td>downgrade_time</td>
<td>&lt;object&gt;</td>
<td>If specified, delay the operation until this date and time, adjusted for the local time of the device being upgraded, if scheduling in local time.</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>downgrade_time.datetime</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td>downgrade_time.time_type</td>
<td>&lt;string&gt;</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>Values: utc, local;</td>
</tr>
<tr>
<td>task_start_time</td>
<td>&lt;object&gt;</td>
<td>The time when the task was actually run</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>task_start_time.datetime</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td>task_start_time.time_type</td>
<td>&lt;string&gt;</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>Values: utc, local;</td>
</tr>
<tr>
<td>task_start_time.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>target_version</td>
<td>&lt;object&gt;</td>
<td>The software version to downgrade to</td>
<td>Required properties: [version_id];</td>
</tr>
<tr>
<td>target_version.version_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for a version of a product. Is an amalgem of all the information in the following fields</td>
<td></td>
</tr>
<tr>
<td>target_version.version_number</td>
<td>&lt;string&gt;</td>
<td>The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases</td>
<td>Optional;</td>
</tr>
<tr>
<td>target_version.build_number</td>
<td>&lt;string&gt;</td>
<td>The build number. Distinguishes prerelease versions. For any given general availability version_number there is a specific build number</td>
<td>Optional;</td>
</tr>
<tr>
<td>build_timestamp</td>
<td>&lt;number&gt;</td>
<td>The date and time of the build</td>
<td></td>
</tr>
<tr>
<td>target_version.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>appliance_downgrade_task.reboot</td>
<td>&lt;boolean&gt;</td>
<td>Whether to perform a reboot after downgrading</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>reboot_time</td>
<td>&lt;object&gt;</td>
<td>If specified, delay the operation until this date and time, adjusted for the local time of the device being upgraded, if scheduling in local time.</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>reboot_time.datetime</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td><strong>reboot_time.time_type</strong></td>
<td>&lt;string&gt;</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>Values: utc, local;</td>
</tr>
<tr>
<td><strong>reboot_time</strong></td>
<td>&lt;prop&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td><strong>appliance_downgrade_task.esxi_force</strong></td>
<td>&lt;boolean&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
<tr>
<td><strong>current_version</strong></td>
<td>&lt;object&gt;</td>
<td>The software version on this appliance at the time the operation was scheduled</td>
<td>Required properties: [version_id];</td>
</tr>
<tr>
<td><strong>current_version.version_id</strong></td>
<td>&lt;string&gt;</td>
<td>A unique identifier for a version of a product. Is an amalgam of all the information in the following fields</td>
<td></td>
</tr>
<tr>
<td><strong>current_version.version_number</strong></td>
<td>&lt;string&gt;</td>
<td>The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases</td>
<td>Optional;</td>
</tr>
<tr>
<td><strong>current_version.build_number</strong></td>
<td>&lt;string&gt;</td>
<td>The build number. Distinguishes prerelease versions. For any given general availability version_number there is a specific build number</td>
<td>Optional;</td>
</tr>
<tr>
<td><strong>build_timestamp</strong></td>
<td>&lt;number&gt;</td>
<td>The date and time of the build</td>
<td></td>
</tr>
<tr>
<td><strong>appliance_downgrade_task.hostname</strong></td>
<td>&lt;string&gt;</td>
<td>Hostname of the appliance</td>
<td>Optional;</td>
</tr>
<tr>
<td><strong>appliance_downgrade_task</strong></td>
<td>&lt;prop&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

Links

**appliance_downgrade_task: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}

Response Body

- Returns an [appliance_downgrade_task](#) data object.

**appliance_downgrade_task: cancel**

POST http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}/cancel

Request Body

- Do not provide a request body.

Response Body

- On success, the server does not provide any body in the responses.

Relations

**appliance_downgrade_task: operation**

Related resource

[downgrade_operation](#)

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>id</td>
<td>0/operation_id</td>
</tr>
</tbody>
</table>

**appliance_downgrade_task: appliance**

Related resource

[appliance](#)

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

**appliance_downgrade_task: appliance_downgrade_task_state**
Related resource

**appliance_downgrade_task_state**

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/operation_id</td>
</tr>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

**appliance_downgrade_task: appliance_downgrade_task_log**

Related resource

**appliance_downgrade_task_log**

Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/operation_id</td>
</tr>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

**Resource: appliance_downgrade_task_state**

The status of the downgrade of a single appliance of an operation

```
http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}/state
```

**JSON**

```
{
    "operation_id": string,
    "serial": string,
    "status": appliance_task_status,
    "stage": appliance_downgrade_task_stage,
    <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_downgrade_task_state</td>
<td>&lt;object&gt;</td>
<td>The status of the downgrade of a single appliance of an operation</td>
<td>Required properties: [status, stage];</td>
</tr>
<tr>
<td>appliance_downgrade_task_state.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the appliance task belongs to</td>
<td>Read-only; Optional;</td>
</tr>
<tr>
<td>serial</td>
<td>&lt;string&gt;</td>
<td>The serial number of the appliance</td>
<td></td>
</tr>
<tr>
<td>appliance_downgrade_task_state.status</td>
<td>&lt;appliance_task_status&gt;</td>
<td>The current task status of the per appliance</td>
<td>Values: scheduled, running, successful, failed, cancelled;</td>
</tr>
<tr>
<td>appliance_downgrade_task_state.stage</td>
<td>&lt;appliance_downgrade_task_stage&gt;</td>
<td>The current progress of the per appliance downgrade task</td>
<td>Values: waiting, initiating, downloading, installing, completed, failed, cancelled;</td>
</tr>
<tr>
<td>appliance_downgrade_task_state.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

**Links**

**appliance_downgrade_task_state: get**

```
GET http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}/state
```

**Response Body**

Returns an **appliance_downgrade_task_state** data object.

**appliance_downgrade_task_state: set**

```
PUT http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}/state
```
Request Body
Provide an `appliance_downgrade_task_state` data object.

Response Body
Returns an `appliance_downgrade_task_state` data object.

### Resource: appliance_downgrade_task_log
Log messages associated with the appliance task

```
http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}/log
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_downgrade_task_log</td>
<td>&lt;object&gt;</td>
<td>Log messages associated with the appliance task</td>
<td></td>
</tr>
<tr>
<td>appliance_downgrade_task_log.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the log belongs to</td>
<td>Read-only; Optional;</td>
</tr>
<tr>
<td>serial</td>
<td>&lt;string&gt;</td>
<td>The serial number of the appliance</td>
<td>Read-only; Pattern: '^([A-Za-z][0-9A-Fa-f]{2})[A-Za-z][0-9A-Fa-f]{8}$';</td>
</tr>
<tr>
<td>appliance_downgrade_task_log.log</td>
<td>&lt;log&gt;</td>
<td>A series of timestamped log entries</td>
<td></td>
</tr>
<tr>
<td>appliance_downgrade_task_log.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

### Links

**appliance_downgrade_task_log: get**
GET http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}/log

Response Body
Returns an `appliance_downgrade_task_log` data object.

**appliance_downgrade_task_log: append**
Append a log entry to the log. Use restricted to internal services

POST http://{device}/api/cmc.upgrades/1.0/operations/downgrade/{operation_id}/appliances/{serial}/log

Request Body
Provide a `log_entry` data object.

Response Body
On success, the server does not provide any body in the responses.

### Resource: appliance_reboot_task
The status of the reboot of a single appliance of an operation

```
http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}
```

JSON
# Operation Details

A single appliance reboot operation is represented as an object with the following properties:

- **operation_id**: string,
- **serial**: serial,
- **switch_partition**: boolean,
- **reboot_time**: {
  "datetime": timestamp,
  "time_type": string,
  "<prop>": any
},
- **task_start_time**: {
  "datetime": timestamp,
  "time_type": string,
  "<prop>": any
},
- **deferred**: boolean,
- **hostname**: string,
- **<prop>**: any

### Property Names and Types

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_reboot_task</td>
<td>&lt;object&gt;</td>
<td>The status of the reboot of a single appliance of an operation</td>
<td>Required properties: [operation_id, serial];</td>
</tr>
<tr>
<td>appliance_reboot_task.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation that the appliance task belongs to</td>
<td></td>
</tr>
<tr>
<td>appliance_reboot_task.serial</td>
<td>&lt;serial&gt;</td>
<td>The serial number of the appliance</td>
<td>Pattern: '^[A-Za-z][0-9A-Fa-f]{2}[A-Za-z0-9A-Fa-f]{8}$';</td>
</tr>
<tr>
<td>appliance_reboot_task.switch_partition</td>
<td>&lt;boolean&gt;</td>
<td>Specifies whether to switch to the other partition. Treated as false if not specified.</td>
<td>Optional;</td>
</tr>
<tr>
<td>reboot_time</td>
<td>&lt;object&gt;</td>
<td>If specified, delay the operation until this date and time, adjusted for the local time of the device being upgraded, if scheduling in local time.</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>reboot_time.datetime</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td>reboot_time.time_type</td>
<td>&lt;string&gt;</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>Values: utc, local;</td>
</tr>
<tr>
<td>reboot_time.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td>Optional;</td>
<td></td>
</tr>
<tr>
<td>task_start_time</td>
<td>&lt;object&gt;</td>
<td>The time when the task was actually run</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>task_start_time.datetime</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td>task_start_time.time_type</td>
<td>&lt;string&gt;</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>Values: utc, local;</td>
</tr>
<tr>
<td>task_start_time.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td>Optional;</td>
<td></td>
</tr>
<tr>
<td>appliance_reboot_task.defered</td>
<td>&lt;boolean&gt;</td>
<td>Specifies whether the reboot task should be enabled for execution. This would be set to false if the reboot is linked to an upgrade and the upgrade is not completed yet.</td>
<td>Optional;</td>
</tr>
<tr>
<td>appliance_reboot_task.hostname</td>
<td>&lt;string&gt;</td>
<td>Hostname of the appliance.</td>
<td>Optional;</td>
</tr>
<tr>
<td>appliance_reboot_task.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td>Optional;</td>
<td></td>
</tr>
</tbody>
</table>

### Links

**appliance_reboot_task: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}

**Response Body**

Returns an appliance_reboot_task data object.

**appliance_reboot_task: cancel**

POST http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}/cancel

**Request Body**

Do not provide a request body.

**Response Body**

On success, the server does not provide any body in the responses.
## Relations

**appliance_reboot_task: operation**

Related resource

**reboot_operation**

### Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>id</td>
<td>0/operation_id</td>
</tr>
</tbody>
</table>

**appliance_reboot_task: appliance**

Related resource

**appliance**

### Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

**appliance_reboot_task: appliance_reboot_task_state**

Related resource

**appliance_reboot_task_state**

### Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/operation_id</td>
</tr>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

**appliance_reboot_task: appliance_reboot_task_log**

Related resource

**appliance_reboot_task_log**

### Variables

<table>
<thead>
<tr>
<th>Related var</th>
<th>Data value for replacement</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_id</td>
<td>0/operation_id</td>
</tr>
<tr>
<td>serial</td>
<td>0/serial</td>
</tr>
</tbody>
</table>

## Resource: appliance_reboot_task_state

The status of the reboot of a single appliance of an operation

http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}/state

### JSON

```
{
  "operation_id": string,
  "serial": string,
  "status": appliance_task_status,
  "stage": appliance_reboot_task_stage,
  <prop>: any
}
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_reboot_task_state</td>
<td>&lt;object&gt;</td>
<td>The status of the reboot of a single appliance of an operation</td>
<td>Required properties: [status, stage];</td>
</tr>
<tr>
<td>Property Name</td>
<td>Type</td>
<td>Description</td>
<td>Notes</td>
</tr>
<tr>
<td>-----------------------------------</td>
<td>--------------</td>
<td>-------------------------------------------------------</td>
<td>----------------------------</td>
</tr>
<tr>
<td>appliance_reboot_task_log</td>
<td>&lt;object&gt;</td>
<td>Log messages associated with the appliance task</td>
<td></td>
</tr>
<tr>
<td>appliance_reboot_task_log.operation_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for the operation which the log belongs to</td>
<td>Read-only; Optional;</td>
</tr>
<tr>
<td>serial</td>
<td>&lt;string&gt;</td>
<td>The serial number of the appliance</td>
<td>Read-only; Pattern: ^[A-Za-z][0-9A-Fa-f]{2}[A-Za-z]{0,2}[0-9A-Fa-f]{8}$;</td>
</tr>
<tr>
<td>appliance_reboot_task_log.log</td>
<td>&lt;log&gt;</td>
<td>A series of timestamped log entries</td>
<td></td>
</tr>
<tr>
<td>appliance_reboot_task_log.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

Links

**appliance_reboot_task_state: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}/state

Response Body

Returns an *appliance_reboot_task_state* data object.

**appliance_reboot_task_state: set**

PUT http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}/state

Request Body

Provide an *appliance_reboot_task_state* data object.

Response Body

Returns an *appliance_reboot_task_state* data object.

**Resource: appliance_reboot_task_log**

Log messages associated with the appliance task

GET http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}/log

Response Body

JSON

```json
{
    "operation_id": string,
    "serial": string,
    "log": log,
    <prop>: any
}
```

Links

**appliance_reboot_task_log: get**

GET http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}/log

Response Body
Returns an appliance_reboot_task_log data object.

**appliance_reboot_task_log: append**
Append a log entry to the log. Use restricted to internal services

```markdown
POST http://{device}/api/cmc.upgrades/1.0/operations/reboot/{operation_id}/appliances/{serial}/log
```

**Request Body**
Provide a log_entry data object.

**Response Body**
On success, the server does not provide any body in the responses.

---

**Resource: logging**
Service logging parameters

```markdown
GET http://{device}/api/cmc.upgrades/1.0/logging
```

**Response Body**
Returns a logging data object.

---

**logging: set**

```markdown
PUT http://{device}/api/cmc.upgrades/1.0/logging
```

**Request Body**
Provide a logging data object.

**Response Body**
Returns a logging data object.

---

**Type: product_code**
The product code of the appliance

```markdown
string
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>logging</td>
<td>&lt;object&gt;</td>
<td>Service logging parameters</td>
<td>Required properties: [level];</td>
</tr>
<tr>
<td>logging.level</td>
<td>&lt;logging_level&gt;</td>
<td>Severity levels for logs emitted by the service</td>
<td>Values: crit, err, warning, notice, info, debug;</td>
</tr>
<tr>
<td>logging.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td>Optional;</td>
<td></td>
</tr>
</tbody>
</table>
**Property Name** | **Type** | **Description** | **Notes**
--- | --- | --- | ---
product_code | string | The product code of the appliance | Values: SH, EX, IC, SMC, WW, GC;

**Type: arch**
The architecture of the appliance

```json
"arch": string
```

**Property Name** | **Type** | **Description** | **Notes**
--- | --- | --- | ---
arch | string | The architecture of the appliance | Values: x86_64, i386;

**Type: serial**
The serial number of the appliance

```json
"serial": string
```

**Property Name** | **Type** | **Description** | **Notes**
--- | --- | --- | ---
serial | string | The serial number of the appliance | Pattern: `^[A-Za-z][0-9A-Fa-f]{2}[A-Za-z]{0,2}[0-9A-Fa-f]{8}$`;

**Type: image_definition**
Properties that uniquely identify a Riverbed software image

```json
{
  "product_code": product_code,
  "arch": arch,
  "target_version": version,
  "delta": boolean,
  "source_version": {
    "version_id": string,
    "version_number": string,
    "build_number": string,
    "build_timestamp": number,
    <prop>: any
  },
  <prop>: any
}
```

**Property Name** | **Type** | **Description** | **Notes**
--- | --- | --- | ---
image_definition | object | Properties that uniquely identify a Riverbed software image | Required properties: [product_code, arch, target_version, delta];
image_definition.product_code | product_code | The product code of the appliance | Values: SH, EX, IC, SMC, WW, GC;
image_definition.arch | arch | The architecture of the appliance | Values: x86_64, i386;
image_definition.target_version | version | The version of a software image | 
image_definition.delta | boolean | Whether the image is a delta image | 
source_version | object | The source version (if delta image is true) | Required properties: [version_id];
source_version.version_id | string | A unique identifier for a version of a product. Is an amalgam of all the information in the following fields | 
source_version.version_number | string | The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases | Optional;
source_version.build_number | string | The build number. Distinguishes prerelease versions. For any given general availability version_number there is a specific build number | Optional;
build_timestamp | number | The date and time of the build | 
source_version.<prop> | any | | Optional;
Type: `image_repository`
An image repository provides a set of distinct images. The distinct meaning each has a different image definition.

```
<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>image_repository</td>
<td>&lt;string&gt;</td>
<td>An image repository provides a set of distinct images. The distinct meaning each has a different image definition</td>
<td>Values: customer, riverbed;</td>
</tr>
</tbody>
</table>
```

Type: `image_source`
The source of the image. A repository can have multiple sources but particular source cannot be in more than one repository.

```
<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>image_source</td>
<td>&lt;string&gt;</td>
<td>The source of the image. A repository can have multiple sources but particular source cannot be in more than one repository</td>
<td>Values: local, customer_url, riverbed;</td>
</tr>
</tbody>
</table>
```

Type: `version`
The version of a software image

```
{  
  "version_id": string,
  "version_number": string,
  "build_number": string,
  "build_timestamp": number,
  <prop>: any
}
```

```
<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>version</td>
<td>&lt;object&gt;</td>
<td>The version of a software image</td>
<td>Required properties: [version_id];</td>
</tr>
<tr>
<td>version.version_id</td>
<td>&lt;string&gt;</td>
<td>A unique identifier for a version of a product. Is an amalgem of all the information in the following fields</td>
<td></td>
</tr>
<tr>
<td>version.version_number</td>
<td>&lt;string&gt;</td>
<td>The released version name. A dotted decimal with optional trailing characters to identify fix releases and customer specific releases</td>
<td>Optional;</td>
</tr>
<tr>
<td>version.build_number</td>
<td>&lt;string&gt;</td>
<td>The build number. Distinguishes prerelease versions. For any given general availability version_number there is a specific build number</td>
<td>Optional;</td>
</tr>
<tr>
<td>build_timestamp</td>
<td>&lt;number&gt;</td>
<td>The date and time of the build</td>
<td></td>
</tr>
<tr>
<td>version.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>
```

Type: `timestamp`
The timestamp of the build

```
number
```

```
```
<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>timestamp</td>
<td>&lt;number&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
</tbody>
</table>

**Type: username**

The name of the user that scheduled the operation or task

```json
  "string"
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>username</td>
<td>&lt;string&gt;</td>
<td>The name of the user that scheduled the operation or task</td>
<td></td>
</tr>
</tbody>
</table>

**Type: operation_status**

The current state of the operation. Partially successful means that some of the operation's appliance tasks were successful but others were not

```json
  "string"
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>operation_status</td>
<td>&lt;string&gt;</td>
<td>The current state of the operation. Partially successful means that some of the operation's appliance tasks were successful but others were not</td>
<td>Values: scheduled, running, successful, partially_successful, failed, cancelled;</td>
</tr>
</tbody>
</table>

**Type: appliance_task_status**

The current task status of the per appliance

```json
  "string"
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_task_status</td>
<td>&lt;string&gt;</td>
<td>The current task status of the per appliance</td>
<td>Values: scheduled, running, successful, failed, cancelled;</td>
</tr>
</tbody>
</table>

**Type: appliance_upgrade_task_stage**

The current progress of the appliance upgrade task

```json
  "string"
```

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_upgrade_task_stage</td>
<td>&lt;string&gt;</td>
<td>The current progress of the appliance upgrade task</td>
<td>Values: waiting, initiating, downloading, patching, installing, completed, failed, cancelled;</td>
</tr>
</tbody>
</table>

**Type: appliance_downgrade_task_stage**

The current progress of the per appliance downgrade task

```json
  "string"
```
### Type: appliance_downgrade_task_stage
The current progress of the per appliance downgrade task

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_downgrade_task_stage</td>
<td>&lt;string&gt;</td>
<td>The current progress of the per appliance downgrade task</td>
<td>Values: waiting, initiating, downloading, installing, completed, failed, cancelled;</td>
</tr>
</tbody>
</table>

### Type: appliance_reboot_task_stage
The current progress of the per appliance reboot task

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>appliance_reboot_task_stage</td>
<td>&lt;string&gt;</td>
<td>The current progress of the per appliance reboot task</td>
<td>Values: waiting, initiating, rebooting, reboot_wait, completed, failed, cancelled;</td>
</tr>
</tbody>
</table>

### Type: scheduled_time
The date and time of the run operation

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>scheduled_time</td>
<td>&lt;object&gt;</td>
<td>The date and time of the run operation</td>
<td>Required properties: [datetime, time_type];</td>
</tr>
<tr>
<td>scheduled_time.datetime</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td>scheduled_time.time_type</td>
<td>&lt;string&gt;</td>
<td>Whether this represents an absolute time or the local time of the managed appliance</td>
<td>Values: utc, local;</td>
</tr>
<tr>
<td>scheduled_time.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

### Type: log_entry
A timestamped log line

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>log_entry</td>
<td>&lt;object&gt;</td>
<td>A timestamped log line</td>
<td>Required properties: [timestamp, severity, log_entry];</td>
</tr>
<tr>
<td>log_entry:timestamp</td>
<td>&lt;timestamp&gt;</td>
<td>The timestamp of the build</td>
<td></td>
</tr>
<tr>
<td>log_entry:log_entry</td>
<td>&lt;string&gt;</td>
<td></td>
<td></td>
</tr>
<tr>
<td>log_entry:severity</td>
<td>&lt;string&gt;</td>
<td></td>
<td>Values: emerg, alert, crit, err, warning, notice, info, debug;</td>
</tr>
<tr>
<td>log_entry.&lt;prop&gt;</td>
<td>&lt;any&gt;</td>
<td></td>
<td>Optional;</td>
</tr>
</tbody>
</table>

### Type: log
A series of timestamped log entries

<table>
<thead>
<tr>
<th>Property Name</th>
<th>Type</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
</table>
### log

A series of timestamped log entries

### log[items]

A timestamped log line

## Type: logging_level

Severity levels for logs emitted by the service

### JSON

```json

```

```json

```