



# **Aggregates**

## **Cloud Manager Automation**

NetApp

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# Aggregates

## Get aggregates

You can retrieve a list of available disk aggregates for Cloud Volumes ONTAP in Google Cloud.

### 1. Select the working environment

Perform the workflow [Get working environment](#) and choose the `publicId` value of the working environment for the `workingEnvironmentId` path parameter.

### 2. Get the list of aggregates

HTTP method	Path
GET	/occm/api/gcp/vsa/aggregates/{workingEnvironmentId}

#### curl example

```
curl --location --request GET
'https://cloudmanager.cloud.netapp.com/occm/api/gcp/vsa/aggregates/<WORKING_ENV_ID>' --header 'Content-Type: application/json' --header 'x-agent-id: <AGENT_ID>' --header 'Authorization: Bearer <ACCESS_TOKEN>'
```

#### Input

Path parameter:

- `<WORKING_ENV_ID>` (`workingEnvironmentId`) string

#### Output

An array of aggregates for the indicated working environment is returned as shown in the JSON output example.



The capacity (sizes) in the output are in MB/GB/TB (1000th order) because these are ONTAP aggregates, whereas in Cloud Manager the capacity is specified as MiB, GiB (1024 order).

#### JSON output example

```
[
  {
    "name": "aggr1",
    "availableCapacity": {
      "size": 87.55,
      "unit": "GB"
    },
    "totalCapacity": {
      "size": 88.57,
```

```

        "unit": "GB"
    },
    "usedCapacity": {
        "size": 1.02,
        "unit": "GB"
    },
    "volumes": [
        {
            "name": "svm_zivgcp01we02_root",
            "totalSize": {
                "size": 1.0,
                "unit": "GB"
            },
            "usedSize": {
                "size": 7.59124755859375E-4,
                "unit": "GB"
            },
            "thinProvisioned": false,
            "isClone": false,
            "rootVolume": true
        }
    ],
    "providerVolumes": [
        {
            "id": "000000000000000000",
            "name": "zivgcp01we02datadisk1",
            "size": {
                "size": 100.0,
                "unit": "GB"
            },
            "state": "READY",
            "device": "zivgcp01we02datadisk1",
            "instanceId": "zivgcp01we02",
            "diskType": "pd-ssd",
            "encrypted": true,
            "iops": null
        }
    ],
    "disks": [
        {
            "name": "NET-1.2",
            "position": "data",
            "ownerNode": "zivgcp01we02-01",
            "device": "zivgcp01we02datadisk1",
            "vmDiskProperties": null
        }
    ]

```

```

    ],
    "state": "online",
    "encryptionType": "cloudEncrypted",
    "encryptionKeyId": null,
    "isRoot": false,
    "homeNode": "zivgcp01we02-01",
    "ownerNode": "zivgcp01we02-01",
    "capacityTier": null,
    "capacityTierUsed": null,
    "sidlEnabled": true,
    "snaplockType": "non_snaplock"
  }
]

```

## Create aggregate

You can create new aggregate within a Cloud Volumes ONTAP working environment using this workflow.

### 1. Select the working environment

Perform the workflow [Get working environment](#) and choose the `publicId` value for the `workingEnvironmentId` parameter in the JSON input.

### 2. Select the GCP disk types

Perform the [Get GCP disk types](#) workflow and choose the `size` and `supportedDiskType` values of the required `diskSize` and `providerVolumeType` parameters in the JSON input.

### 3. Create the aggregate

HTTP method	Path
POST	<code>occm/api/gcp/vsa/aggregates</code>

#### curl example

```

curl --location --request POST
'https://cloudmanager.cloud.netapp.com/occm/api/gcp/vsa/aggregates'
--header 'Content-Type: application/json' --header 'x-agent-id:
<AGENT_ID>' --header 'Authorization: Bearer <ACCESS_TOKEN>' --d @JSONinput

```

#### Input

The JSON input example includes the minimum list of input parameters.

#### JSON input example

```
{
  "name": "ziv01agg01",
  "workingEnvironmentId": "vsaworkingenvironment-sfrf3wvj",
  "numberOfDisks": 1,
  "diskSize": {
    "size": 100,
    "unit": "GB"
  },
  "providerVolumeType": "pd-ssd"
}
```

## Output

None

# Add disks to aggregate

You can add disks to an existing aggregate.

## 1. Select the working environment

Perform the workflow [Get GCP single node working environment](#) and choose the `publicId` value for the `workingEnvironmentId` path parameter.

## 2. Select the aggregate

Perform the workflow [Get aggregates](#) and choose name of the required aggregate for the `aggregateName` path parameter.

## 3. Add the disks to the aggregate

HTTP method	Path
POST	/occm/api/gcp/vsa/aggregates/{workingEnvironmentId}/{aggregateName}/disks

## curl example

```
curl --location --request POST
'https://cloudmanager.cloud.netapp.com/occm/api/gcp/vsa/aggregates/<WORKING_ENV_ID>/<AGGR_NAME>/disks' --header 'Content-Type: application/json'
--header 'x-agent-id: <AGENT_ID>' --header 'Authorization: Bearer <ACCESS_TOKEN>' --d @JSONinput
```

## Input

You must include the following path parameters:

- `<WORKING_ENV_ID>` (`workingEnvironmentId`) string
- `<AGGR_NAME>` (`aggregateName`) string

Also, the JSON input example includes an input parameter as shown.

### JSON input example

```
{
  "numberOfDisks": "1"
}
```

### Output

None

## Delete aggregate

You can delete an existing disk aggregate in a Cloud Volumes ONTAP working environment.

### 1. Select the working environment

Perform the workflow [Get working environment](#) and choose the `publicId` value of the working environment for the `workingEnvironmentId` path parameter.

### 2. Select the aggregate

Perform the workflow [Get aggregates](#) and choose the `name` value of the required aggregate for the `aggregateName` path parameter.

### 3. Delete the aggregate

HTTP method	Path
DELETE	/occm/api/gcp/vsa/aggregates/{workingEnvironmentId}/{aggregateName}

### curl example

```
curl --location --request DELETE
'https://cloudmanager.cloud.netapp.com/occm/api/gcp/vsa/aggregates/<WORKING_ENV_ID>/<AGGR_NAME>' --header 'Content-Type: application/json' --header
'x-agent-id: <AGENT_ID>' --header 'Authorization: Bearer <ACCESS_TOKEN>'
```

### Input

Path parameters:

- `<WORKING_ENV_ID>` (`workingEnvironmentId`) string
- `<AGGR_NAME>` (`aggregateName`) string

### Output

None

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