Retry Install Workspace (Technical Preview)

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CLOUDERA TECHNICAL PREVIEW DOCUMENTATION

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Retry Install Workspace

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Description

Creating a workspace in CML involves a series of complex steps that can take up to 30-40 minutes to complete. These steps include provisioning the cluster, setting up worker nodes, and installing the required helm charts for running CML applications. During this process, there are multiple underlying activities that must be performed, and each of these activities can take several minutes to complete.

Workspace creation is not always a smooth process. Users may encounter various issues such as IAM permission problems or intermittent networking issues, which can cause the workspace creation to fail at any stage. In such cases, users are forced to delete the failed workspace and create a new one, wasting precious time and resources.

However, with the introduction of this new feature, users can now retry the installation of a failed workspace creation process from the exact point where it failed. This means that users no longer need to delete the cluster and try to provision a new workspace again. Instead, they can retry the installation, and the system will pick up from where it left off, saving valuable time and resources.

This new feature can significantly improve the user experience when creating workspaces in CML. Users can now create workspaces more efficiently, with fewer interruptions and with a greater level of confidence that the process will be successful.

We can initiate a retry of the Create Workspace workflow by simply making a call to the same API endpoint used for the original CreateWorkspace request, with the identical payload as before, including the same workspace name and environment name. This will allow the system to resume the installation process from the exact point where it was interrupted, without any need to modify or adjust the original request parameters.

Prerequisites

CDP Entitlement

The feature is gated behind the CREATE_WORKSPACE_V2 entitlement. This entitlement must be granted to your CDP account before trying to suspend your workspace.

AWS CDP Cross-Account Role Permissions

None

Retrying CML Create Workspace

Using CDPCLI

If your workspace is in the 'Creation Failed', 'Validation Failed', or 'Installation Failed' state, you can retry installing the CML Workspace by using the same call that was used during your initial attempt.

Here is a sample CDPCLI create-workspace call:

```
$ cdp ml create-workspace --cli-input-json '{ "environmentName":
"environment_name", "workspaceName": "workspace_name", "provisionK8sRequest":
{"instanceGroups": [{"instanceType": "m5.4xlarge", "rootVolume": {"size":
96}, "autoscaling": {"minInstances": 1, "maxInstances": 5}}, {"instanceType":
"p2.8xlarge", "rootVolume": {"size": 96}, "autoscaling": {"minInstances":
1, "maxInstances": 5}}], "environmentName": "environment_name", "network": {"topology":
{}}, "enableMonitoring": true, "existingDatabaseConfig": {}, "kubernetesVersion":
"1.24", "mlVersion": "2.0.36-b123"}' --profile cml_user
```

Note: When initiating a CDPCLI create workspace call again, the subsequent retry calls must contain the identical payload as that which was specified in the preceding calls.

Using UI

In case your workspace is in a state of 'Creation Failed', 'Validation Failed', or 'Installation Failed', you can attempt to reinstall the CML Workspace by following these steps:

- 1. Click on the 'Action Menu'.
- 2. Select the 'Retry Install Workspace' action menu item, which is illustrated in Figure 1.
- 3. The 'Retry Install Workspace' modal, as shown in Figure 2, should then open.
- 4. Click the 'OK' button to confirm, and the retry process of the 'Create Workspace Workflow' should begin.

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Status	Version	Workspace \diamondsuit	Environment \$	Region ≑	Creation Date 💠	Clou	View Workspace Details ions
O Creating Workspace		test	eng-ml-dev-env-aws	us-west-2	04/13/2023 7:49 PM IST	aws	View Event Logs
O Removing Workspace	2.0.39	cml-systest-bbrbcj	eng-ml-dev-env-aws	us-west-2	04/13/2023 5:37 PM IST	aws	
🔗 Ready	2.0.39 Upgrade	quasar-cdp-mlx-hexscc	eng-ml-dev-env-aws	us-west-2	04/13/2023 4:56 PM IST	aws	Manage Remote Access
Ready	2.0.39 Upgrade	cml_nightly_cluster	eng-ml-dev-env-aws	us-west-2	04/13/2023 3:51 PM IST	aws	Open Grafana[∄
Ready	2.0.39 Upgrade	quasar-cdp-mlx-wwwwsc	eng-ml-dev-env-aws	us-west-2	04/13/2023 10:05 Retry Install W	/orkspace	Retry Install Workspace
Suspended	2.0.39	modelregtest	eng-ml-dev-env-aws	us-west-2	04/13/2023 2:50 AM IST	aws	Upgrade Workspace
O Removing Workspace	2.0.39	cml-systest-ngnokr-restore	eng-ml-dev-env-azure	westus2	04/12/2023 7:09 PM IST	А	Suspend Workspace
Ready	2.0.39	gkshirsagar-ws-apr-10	dsp-storage-cde-dev	us-west-2	04/10/2023 11:18 AM IST	aws	Remove Workspace
Creation Failed		satyabtrial	archit-dwx-dev	unknown	03/01/2023 4:02 PM IST	aws	AWS

Figure 1: Retry Install Workspace Action Menu Item

Retry Install Workspace	
(i) The Retry Install Workspace process will retrigger the Create Workspace workflow on th workspace. The Create Workspace process will use the same configurations that were s original Create Workspace call.	-
Skip Validation 🛈	

Figure 2: Retry Install Workspace Modal

Footnotes

- 1. While it's possible to attempt a failed installation or provisioning of a workspace multiple times, it's important to keep in mind that if you choose not to retry, or if the retry attempts fail, you should delete the cluster.
- Sometimes, workspace creation may fail due to incorrect workspace configuration or persistent infrastructure issues. If this happens, retrying the installation process will not succeed, no matter how many times you try. In such cases, you have two options: delete the workspace and perform a fresh installation, or contact the Cloudera support team to investigate the issue.