VCD Data Solutions extension 1.2 Beta Troubleshooting Guide

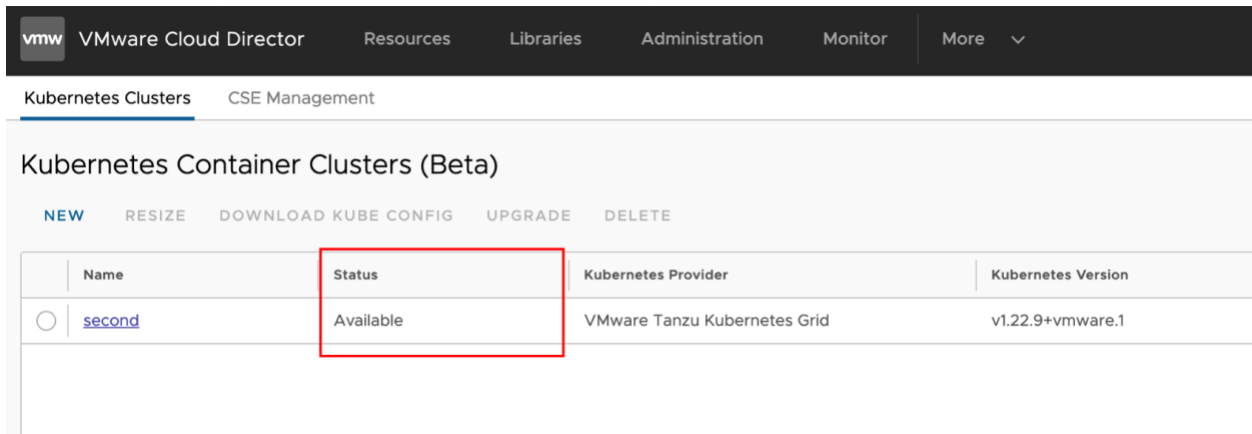VCD Data Solutions extension has components in these places:

- Data Solutions UI plugin in vCD portal
- RDE (Runtime Defined Entities) schemas and instances in vCD database
- DSO (Data Solutions operator) in guest TKGm

For troubleshooting, we need to collect data from both frontend and backend sides.

Check Points

RabbitMQ instances are deployed to TKGm clusters provisioned by CSE, so it's important to understand TKGm health and resource status. Here are a few check points.

Check cluster status

Check cluster events

Check all PODs in TKGm cluster namespaces

Mandatory namespaces:

- tkg-system (kapp-controller)
- tanzu-system (secretgen-controller)
- cert-manager
- rdeprojector-system
- vcd-ds-system

Optional namespaces:

- tanzu-system-dashboards
- tanzu-system-monitoring
- tanzu-system-ingress

Command Reference:

kubectl get pods <pod-name> -n <namespace>

*kubectl describe pods <pod-name> -n <namespace>*

kubectl logs -f -tail 100 pods <pod-name> -n <namespace>

Frontend Troubleshooting

If you could enable the browser's inspection mode and capture the XHR messages send to the server, it would help much for the engineering team to identify the root cause.

- **Chrome**: Right click on anywhere on the page → Inspect → Network → XHR
- **Firefox**: Right click on page → Inspect Element → Network → XHR
- **Edge**: Developer Tools → Network → Content Types → XHR
- **Internet Explorer**: Developer Tools → Network → Content Type → XHR

Right click on any request, select **Copy**, then select Copy all as **HAR**.
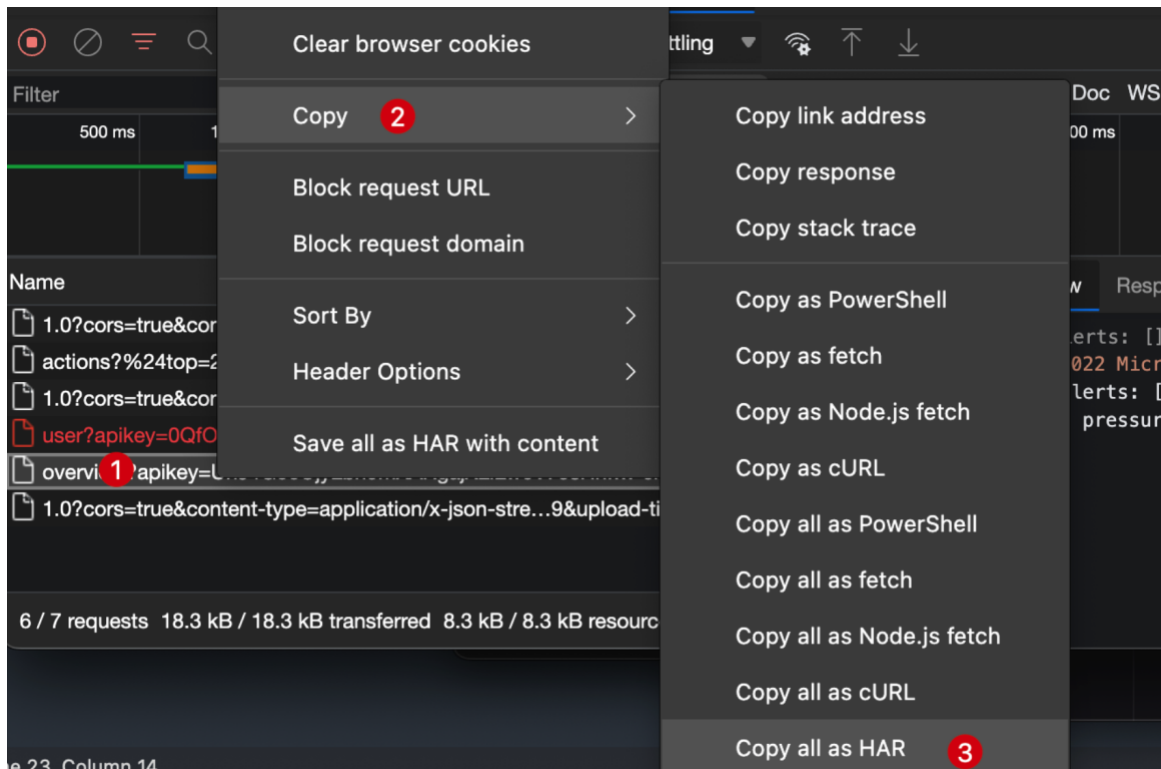
Backend Troubleshooting

Installation
Follow the guide to install the troubleshoot tools. If you're in an air-gapped environment, you need to copy the binaries to the host where kubectl is installed.

Preflight
To do the preflight check, run:

kubectl preflight ./preflight.yaml

Link - https://gitlab.eng.vmware.com/core-build/vcd-tds/-/blob/main/troubleshoot/preflight.yaml

Support bundle

To generate the support bundle, run:

kubectl support-bundle ./support-bundle.yaml

Link - https://gitlab.eng.vmware.com/core-build/vcd-tds/-/blob/main/troubleshoot/support-bundle.yaml

CSE support bundle

Optionally, you can send us CSE support bundle together. Please refer to https://github.com/vmware/cloud-provider-for-cloud-director/blob/main/scripts/generate-k8s-log-bundle.sh.