1. Create three Pods that use the image nginx. The names of the Pods should be pod-1, pod-2, and pod-3. Assign the label tier=frontend to pod-1 and the label tier=backend to pod-2 and pod-3. All pods should also assign the label team=artemidis.

k run pod-1 --image=nginx:latest --restart=Never --labels="tier=frontend,team=artemidis"

k run pod-2 --image=nginx:latest --restart=Never --labels="tier=backend,team=artemidis"

k run pod-3 --image=nginx:latest --restart=Never --labels="tier=backend,team=artemidis"

1. Assign the annotation with the key deployer to pod-1 and pod-3. Use your own name as the value.

k annotate pods pod-1 deployer=anto

k annotate pods pod-3 deployer=anto

1. From the command line, use label selection to find all Pods with the team artemidis or aircontrol and that are considered a backend service.

k get pods -l 'team in (artemidis,aircontrol)',tier=backend --show-labels

1. Create a new Deployment named server-deployment. The Deployment should control two replicas using the image grandserver:1.4.6

k create deployment server-deployment --image=grandserver:1.4.6 --replicas=2

1. Inspect the Deployment and find out the root cause for its failure.

k describe deploy server-deployment

k describe rs server-deployment-6cc588f87

k describe pods server-deployment-6cc588f87-7z2qr

1. Fix the issue by assigning the image nginx instead. Inspect the rollout history. How many revisions would you expect to see?

k set image deployment server-deployment grandserver:nginx:latest

k rollout history deploy server-deployment

1. Create a new CronJob named google-ping. When executed, the Job should run a curl command for google.com. Pick an appropriate image. The execution should occur every two minutes.

kubectl create cronjob google-ping --image=niginx:latest --schedule="\*/2 \* \* \* \*"

-- /bin/sh -c 'curl google.com'

1. Tail the logs of the CronJob at runtime. Check the command-line options of the relevant command or consult the Kubernetes documentation.

k get cronjobs google-ping -w

1. Reconfigure the CronJob to retain a history of seven executions.

k edit cronjob google-ping

spec. successfulJobsHistoryLimit: 7

1. Reconfigure the CronJob to disallow a new execution if the current execution is still running. Consult the Kubernetes documentation for more information.

k edit cronjob google-ping

spec.concurrencyPolicy: Forbid