**Steps to run the solution**

1. In Docker Desktop, go to settings and Kubernetes
   1. Reset Kubernetes Cluster
2. Then, run the command from this website [Installation Guide - NGINX Ingress Controller (kubernetes.github.io)](https://kubernetes.github.io/ingress-nginx/deploy/)

**kubectl apply -f https://raw.githubusercontent.com/kubernetes/ingress-nginx/controller-v1.4.0/deploy/static/provider/cloud/deploy.yaml**

**Useful commands**

Kubectl get pods

Kubectl get services

**Now with the ELK stack**

In the folder for ELK

1. Logstash:
   1. Go to the folder and run heml install logstash .
2. ElasticSearch:
   1. Go to the folder and run heml install elasticsearch .
3. Filebeat:
   1. Go to the folder and run helm install filebeat .
   2. Time to copy the logs into the pod
      1. For the locate the logs folder and run

kubectl cp .\log filebeat-filebeat-x28pp:/var/targetlogs\ -n default

kubectl cp .\undesired filebeat-filebeat-x28pp:/var/undesired/ -n default

* + 1. Validate the logs

1. Kibana
   1. Go to the folder and run heml install kibana .
   2. Validate the instance here <http://kubernetes.docker.internal/>
   3. Create an index with the data

kubectl exec -it filebeat-filebeat-h5q6l -n default -- sh -ls