```
dhu2645@LAPTOP-1TVBN  X    +  ∨

u2645@LAPTOP-1TVBND2B:~$ ls
nsfile   deployment.yml   devops_main   docker-compose.yml   pod.yml   rs-test.yml
u2645@LAPTOP-1TVBND2B:~$ kubectl get pod
                    READY    STATUS    RESTARTS         AGE
-bq7hb              1/1      Running   1 (9m45s ago)    138m
-lwrk5              1/1      Running   1 (9m45s ago)    138m
-rjvbb              1/1      Running   1 (9m45s ago)    137m
-rr4sl              1/1      Running   1 (9m45s ago)    138m
-8657bfdcf7-2b5mm   1/1      Running   0                8s
u2645@LAPTOP-1TVBND2B:~$ kubectl get node
        STATUS   ROLES           AGE     VERSION
ube     Ready    control-plane   158m    v1.32.0
u2645@LAPTOP-1TVBND2B:~$ kubectl apply -f deployment.yml
yment.apps/my-deploy created
u2645@LAPTOP-1TVBND2B:~$ ls
nsfile   deployment.yml   devops_main   docker-compose.yml   pod.yml   rs-test.yml
u2645@LAPTOP-1TVBND2B:~$ kubectl get node
        STATUS   ROLES           AGE     VERSION
ube     Ready    control-plane   161m    v1.32.0
u2645@LAPTOP-1TVBND2B:~$ kubectl get pod
                        READY   STATUS             RESTARTS      AGE
ploy-56fc498498-ft877   0/1     ContainerCreating  0             9s
ploy-56fc498498-jt5xn   0/1     ErrImagePull       0             9s
ploy-56fc498498-s8l4h   0/1     ContainerCreating  0             9s
ploy-56fc498498-wk9zn   0/1     ContainerCreating  0             9s
-bq7hb                  1/1     Running            1 (12m ago)   141m
-lwrk5                  1/1     Running            1 (12m ago)   141m
-rjvbb                  1/1     Running            1 (12m ago)   140m
-rr4sl                  1/1     Running            1 (12m ago)   141m
-8657bfdcf7-2b5mm       1/1     Running            0             3m4s
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2645@LAPTOP-1TVBND2B:~$ minikube ssh
@minikube:~$ docker ps
NER ID   IMAGE           COMMAND                  CREATED           STATUS            PORTS   NAMES
e8a182   6e38f40d628d    "/storage-provisioner"   About a minute ago  Up About a minute        k8s_storage-provisioner_
e-provisioner_kube-system_5a6a1e0a-8c42-42bc-97ff-7166c80bdcaf_1
e18dd5   c69fa2e9cbf5    "/coredns -conf /etc…"   2 minutes ago     Up 2 minutes             k8s_coredns_coredns-668d
-rkxnh_kube-system_3337d3c3-c30e-4616-8309-a7413075bde5_0
604728   registry.k8s.io/pause:3.10  "/pause"     2 minutes ago     Up 2 minutes             k8s_POD_coredns-668d6bf9
nh_kube-system_3337d3c3-c30e-4616-8309-a7413075bde5_1
02033f   c69fa2e9cbf5    "/coredns -conf /etc…"   2 minutes ago     Up 2 minutes             k8s_coredns_coredns-668d
-nm5gf_kube-system_a4633f8e-c8cd-4719-a3b8-b18376a67bbc_0
a72c61   040f9f8aac8c    "/usr/local/bin/kube…"   2 minutes ago     Up 2 minutes             k8s_kube-proxy_kube-prox
c_kube-system_07bddf8f-20cc-49e5-905b-c90ab36c7102_0
36b0c3   registry.k8s.io/pause:3.10  "/pause"     2 minutes ago     Up 2 minutes             k8s_POD_coredns-668d6bf9
gf_kube-system_a4633f8e-c8cd-4719-a3b8-b18376a67bbc_0
27a0ca   registry.k8s.io/pause:3.10  "/pause"     2 minutes ago     Up 2 minutes             k8s_POD_kube-proxy-gdn6c
system_07bddf8f-20cc-49e5-905b-c90ab36c7102_0
fc422d   registry.k8s.io/pause:3.10  "/pause"     2 minutes ago     Up 2 minutes             k8s_POD_storage-provisio
be-system_5a6a1e0a-8c42-42bc-97ff-7166c80bdcaf_0
316ad9   8cab3d2a8bd0    "kube-controller-man…"   2 minutes ago     Up 2 minutes             k8s_kube-controller-mana
be-controller-manager-minikube_kube-system_843c74f7b3bc7d7040a05c31708a6a30_0
bdc5f8   a389e107f4ff    "kube-scheduler --au…"   2 minutes ago     Up 2 minutes             k8s_kube-scheduler_kube-
ler-minikube_kube-system_d14ce008bee3a1f3bd7cf547688f9dfe_0
b09dad   c2e17b8d0f4a    "kube-apiserver --ad…"   2 minutes ago     Up 2 minutes             k8s_kube-apiserver_kube-
ver-minikube_kube-system_f3123edb62d15ad24e928c9b2dfdeaae_0
8d8d69   a9e7e6b294ba    "etcd --advertise-cl…"   2 minutes ago     Up 2 minutes             k8s_etcd_etcd-minikube_k
stem_4c3136af4b607ce65490ce3c89126f57_0
73768f   registry.k8s.io/pause:3.10  "/pause"     2 minutes ago     Up 2 minutes             k8s_POD_kube-apiserver-m
e_kube-system_f3123edb62d15ad24e928c9b2dfdeaae_0
20c066   registry.k8s.io/pause:3.10  "/pause"     2 minutes ago     Up 2 minutes             k8s_POD_etcd-minikube_ku
tem_4c3136af4b607ce65490ce3c89126f57_0
2175a1   registry.k8s.io/pause:3.10  "/pause"     2 minutes ago     Up 2 minutes             k8s_POD_kube-controller-
r-minikube_kube-system_843c74f7b3bc7d7040a05c31708a6a30_0
b63c49   registry.k8s.io/pause:3.10  "/pause"     2 minutes ago     Up 2 minutes             k8s_POD_kube-scheduler-m
e_kube-system_d14ce008bee3a1f3bd7cf547688f9dfe_0
@minikube:~$ minikube ip
  minikube: command not found
@minikube:~$ ls
```

```
lass:                   BestEffort
Selectors:              <none>
ations:                 node.kubernetes.io/not-ready:NoExecute op=Exists for 300s
                        node.kubernetes.io/unreachable:NoExecute op=Exists for 300s
s:
e       Reason     Age   From
-       ------     ----  ----              Message
                                           -------
mal     Scheduled  19m   default-scheduler  Successfully assigned default/my-pod to minikube
mal     Pulling    19m   kubelet            Pulling image "nginx"
mal     Pulled     18m   kubelet            Successfully pulled image "nginx" in 15.353s (15.353s including waiting). Image size: 192004242 by

mal     Created    18m   kubelet            Created container: my-pod
mal     Started    18m   kubelet            Started container my-pod
u2645@LAPTOP-1TVBND2B:~$ kubectl exec -it my-pod -- /bin/bash
my-pod:/# ls
boot  dev  docker-entrypoint.d  docker-entrypoint.sh  etc  home  lib  lib64  media  mnt  opt  proc  root  run  sbin  srv  sys  tmp  usr  va

my-pod:/# exit

u2645@LAPTOP-1TVBND2B:~$ ls
nsfile  devops_main  docker-compose.yml
u2645@LAPTOP-1TVBND2B:~$ kubectl get pod
    READY   STATUS    RESTARTS   AGE
d   1/1     Running   0          51m
u2645@LAPTOP-1TVBND2B:~$ sudo nano pod.yml
] password for nandhu2645:
u2645@LAPTOP-1TVBND2B:~$ kubectl apply -f pod.yml
y-app created
u2645@LAPTOP-1TVBND2B:~$ kubectl get pod
    READY   STATUS            RESTARTS   AGE
p   0/1     ContainerCreating 0          16s
d   1/1     Running           0          56m
u2645@LAPTOP-1TVBND2B:~$ kubectl delete pod my-pod
my-pod" deleted
u2645@LAPTOP-1TVBND2B:~$ kubectl get pod
    READY   STATUS    RESTARTS   AGE
p   1/1     Running   0          6m9s
u2645@LAPTOP-1TVBND2B:~$ |
```

```
hu2645@LAPTOP-1TVBND2B:~$ kubectl describe pod my-pod
                my-pod
space:          default
rity:           0
ice Account:    default
                minikube/192.168.49.2
t Time:         Thu, 20 Mar 2025 04:38:17 +0000
ls:             run=my-pod
ations:         <none>
us:             Running
                10.244.0.4

  10.244.0.4
iners:
rpod:
ontainer ID:   docker://99d759f5901e5ca254ea7aad4f7aeaab4a8ef2b072f5f2a836f8e00dff1743e0
mage:          nginx
mage ID:       docker-pullable://nginx@sha256:124b44bfc9ccd1f3cedf4b592d4d1e8bddb78b51ec2ed5056c52d3692baebc19
ort:           80/TCP
ost Port:      0/TCP
tate:          Running
 Started:      Thu, 20 Mar 2025 04:38:33 +0000
eady:          True
estart Count:  0
nvironment:    <none>
ounts:
 /var/run/secrets/kubernetes.io/serviceaccount from kube-api-access-b8ckm (ro)
tions:
e                          Status
dReadyToStartContainers    True
tialized                   True
dy                         True
tainersReady               True
dScheduled                 True
es:
e-api-access-b8ckm:
ype:                       Projected (a volume that contains injected data from multiple sources)
okenExpirationSeconds:     3607
```

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dhu2645@LAPTOP-1TVBN  ×   +  ∨                                                                                           —  □  ×

u2645@LAPTOP-1TVBND2B:~$ minikube start
inikube v1.35.0 on Ubuntu 24.04 (amd64)
sing the docker driver based on existing profile
tarting "minikube" primary control-plane node in "minikube" cluster
ulling base image v0.0.46 ...
estarting existing docker container for "minikube" ...
reparing Kubernetes v1.32.0 on Docker 27.4.1 ...
erifying Kubernetes components...
 Using image gcr.io/k8s-minikube/storage-provisioner:v5
nabled addons: storage-provisioner, default-storageclass
one! kubectl is now configured to use "minikube" cluster and "default" namespace by default
u2645@LAPTOP-1TVBND2B:~$ kubectl get pod
sources found in default namespace.
u2645@LAPTOP-1TVBND2B:~$ kubectl run my-pod --image=nginx --port=80
y-pod created
u2645@LAPTOP-1TVBND2B:~$ kubectl get node
     STATUS  ROLES          AGE  VERSION
ube  Ready   control-plane  20h  v1.32.0
u2645@LAPTOP-1TVBND2B:~$ kubectl get pod
    READY  STATUS   RESTARTS  AGE
d   1/1    Running  0         98s
u2645@LAPTOP-1TVBND2B:~$ kubectl node -o wide
: unknown command "node" for "kubectl"
u2645@LAPTOP-1TVBND2B:~$ kubectl Node -o wide
: unknown command "Node" for "kubectl"
u2645@LAPTOP-1TVBND2B:~$ kubectl get node -o wide
     STATUS  ROLES          AGE  VERSION  INTERNAL-IP   EXTERNAL-IP  OS-IMAGE          KERNEL-VERSION                  CONTA
RUNTIME
ube  Ready   control-plane  20h  v1.32.0  192.168.49.2  <none>       Ubuntu 22.04.5 LTS  5.15.146.1-microsoft-standard-WSL2  docke
7.4.1
u2645@LAPTOP-1TVBND2B:~$ kubectl get pod -o wide
    READY  STATUS   RESTARTS  AGE   IP          NODE      NOMINATED NODE  READINESS GATES
d   1/1    Running  0         4m7s  10.244.0.4  minikube  <none>          <none>
u2645@LAPTOP-1TVBND2B:~$ kubectl logs my-pod
er-entrypoint.sh: /docker-entrypoint.d/ is not empty, will attempt to perform configuration
er-entrypoint.sh: Looking for shell scripts in /docker-entrypoint.d/
er-entrypoint.sh: Launching /docker-entrypoint.d/10-listen-on-ipv6-by-default.sh
sten-on-ipv6-by-default.sh: info: Getting the checksum of /etc/nginx/conf.d/default.conf
```

```
2645@LAPTOP-1TVBND2B:~$ kubectl scale deploy my-deploy --replicas=1
ment.apps/my-deploy scaled
2645@LAPTOP-1TVBND2B:~$ kubectl get pod
                           READY     STATUS             RESTARTS        AGE
loy-56fc498498-s8l4h       0/1       ImagePullBackOff   0               7m44s
oq7hb                      1/1       Running            1 (20m ago)     149m
lwrk5                      1/1       Running            1 (20m ago)     149m
rjvbb                      1/1       Running            1 (20m ago)     147m
rr4sl                      1/1       Running            1 (20m ago)     149m
-8657bfdcf7-2b5mm          1/1       Running            0               10m
2645@LAPTOP-1TVBND2B:~$ kubectl delete deploy my-deploy
ment.apps "my-deploy" deleted
2645@LAPTOP-1TVBND2B:~$ kubectl get pod
                           READY     STATUS      RESTARTS        AGE
oq7hb                      1/1       Running     1 (20m ago)     149m
lwrk5                      1/1       Running     1 (20m ago)     149m
rjvbb                      1/1       Running     1 (20m ago)     148m
rr4sl                      1/1       Running     1 (20m ago)     149m
-8657bfdcf7-2b5mm          1/1       Running     0               11m
2645@LAPTOP-1TVBND2B:~$ kubectl delete rs all --all
 name cannot be provided when a selector is specified
2645@LAPTOP-1TVBND2B:~$ kubectl delete rs-test all --all
 name cannot be provided when a selector is specified
2645@LAPTOP-1TVBND2B:~$ kubectl delete all --all
y-rs-bq7hb" deleted
y-rs-lwrk5" deleted
y-rs-rjvbb" deleted
y-rs-rr4sl" deleted
ebapp-8657bfdcf7-2b5mm" deleted
e "kubernetes" deleted
ment.apps "webapp" deleted
aset.apps "my-rs" deleted
2645@LAPTOP-1TVBND2B:~$ kubectl get pod
ources found in default namespace.
2645@LAPTOP-1TVBND2B:~$ ▮
```