```
blagoff@MacBook-Pro-Vyacheslav containerization % kubectl get storageclasses.storage.k8s.io
                                               RECLAIMPOLICY
IAME
                                                               VOLUMEBINDINGMODE
                                                                                    ALLOWVOLUMEEXPANSION
                     PROVISIONER
                    k8s.io/minikube-hostpath
                                               Delete
                                                                                    false
                                                                                                           26d
standard (default)
                                                                Immediate
olagoff@MacBook-Pro-Vyacheslav containerization % kubectl apply -f claim.yaml
persistentvolumeclaim/pg-storage created
plagoff@MacBook-Pro-Vyacheslav containerization % kubectl get pvc
NAME
                                                                 CAPACITY ACCESS MODES
            STATUS VOLUME
                                                                                           STORAGECI ASS
                                                                                                          AGF
                    pvc-364f45ce-7178-4cbe-8a2c-9033ab258b05
                                                                100Mi
                                                                                                          29s
g-storage
            Bound
                                                                            RWX
blagoff@MacBook-Pro-Vyacheslav containerization % kubectl create secret generic pg-secret --from-literal=PASS=testpassw
secret/pg-secret created
plagoff@MacBook-Pro-Vyacheslav containerization % kubectl get secret pg-secret
NAME
           TYPE
                    DATA AGE
           0paque
                           14s
plagoff@MacBook-Pro-Vyacheslav containerization % kubectl get secret pg-secret -oyaml
lata:
 PASS: dGVzdHBhc3N3b3Jk
ind: Secret
etadata:
 creationTimestamp: "2021-10-05T19:15:31Z"
 name: pg-secret
 namespace: pg
 resourceVersion: "99026"
  uid: bc54a4ad-a5e5-458b-b177-93f2c5ffb766
```

```
esourceVersion: "99026
 uid: bc54a4ad-a5e5-458b-b177-93f2c5ffb766
type: Opaque
blagoff@MacBook-Pro-Vyacheslav containerization % kubectl get pvc
NAME
              STATUS
                        VOLUME
                                                                         CAPACITY
                                                                                      ACCESS MODES
                                                                                                       STORAGECLASS
                                                                                                                        AGE
                        pvc-364f45ce-7178-4cbe-8a2c-9033ab258b05
                                                                                                                        13m
pg-storage
              Bound
                                                                         100Mi
                                                                                     RWX
                                                                                                       standard
blagoff@MacBook-Pro-Vyacheslav containerization % kubectl get pvc pg-storage -oyaml
apiVersion: v1
kind: PersistentVolumeClaim
 netadata:
 annotations:
    kubectl.kubernetes.io/last-applied-configuration: |
"apiVersion":"v1","kind":"PersistentVolumeClaim","metadata":{"annotations":{},"name":"pg-storage","namespace":"pg"},"spec":{"accessModes":["ReadWriteMany"],"resources":{"requests":{"storage":"100Mi"}},"storageClassName":"standard"}
    pv.kubernetes.io/bind-completed: "yes"
    pv.kubernetes.io/bound-by-controller: "yes"
    volume.beta.kubernetes.io/storage-provisioner: k8s.io/minikube-hostpath
  creationTimestamp: "2021-10-05T19:02:37Z"
  finalizers:
  - kubernetes.io/pvc-protection
  name: pg-storage
  namespace: pg
  resourceVersion: "98457"
  uid: 364f45ce-7178-4cbe-8a2c-9033ab258b05
```

```
-db-7fdbb69989-mbj7g
                                Running
blagoff@MacBook-Pro-Vyacheslav containerization % kubectl get pod
NAME
                        READY
                                STATUS
                                          RESTARTS AGE
og-db-7fdbb69989-mbj7g
                        1/1
                                Running
                                          0
                                                     33s
plagoff@MacBook-Pro-Vyacheslav containerization % kubectl get pod
JAMF
                        READY
                                STATUS
                                          RESTARTS
                                                    AGE
og-db-7fdbb69989-mbj7g
                        1/1
                                Running
                                          0
                                                     345
plagoff@MacBook-Pro-Vyacheslav containerization % kubectl get pod -o wide
                        READY
                                STATUS
                                          RESTARTS
                                                                        NODE
                                                                                                    READINESS GATES
NAME
                                                    AGE
                                                           ΙP
                                                                                   NOMINATED NODE
                                Running
og-db-7fdbb69989-mbj7g
                        1/1
                                                           172.17.0.4 minikube
                                                                                   <none>
olagoff@MacBook-Pro-Vyacheslav containerization % kubectl port-forward pod/pg-db-6b7db8f7f5-z9vvf 5433:5432
rror from server (NotFound): pods "pg-db-6b7db8f7f5-z9vvf" not found
olagoff@MacBook-Pro-Vyacheslav containerization % kubectl port-forward pod/pg-db-7fdbb69989-mbj7g 5433:5432
Forwarding from 127.0.0.1:5433 -> 5432
orwarding from [::1]:5433 -> 5432
landling connection for 5433
```

```
root@test:/# psql -h 172.17.0.4 -U testuser testdatabase
Password for user testuser:
psql: FATAL: password authentication failed for user "testuser"
root@test:/# testpassw
bash: testpassw: command not found
root@test:/# psql -h 172.17.0.4 -U testuser testdatabase
Password for user testuser:
psql: FATAL: password authentication failed for user "testuser"
root@test:/# psql -h 172.17.0.4 -U testuser testdatabase
Password for user testuser:
psql: FATAL: password authentication failed for user "testuser"
root@test:/# testpassw
bash: testpassw: command not found
root@test:/# psql -h 172.17.0.4 -U testuser testdatabase
Password for user testuser:
psql (10.13 (Debian 10.13-1.pgdg90+1))
Type "help" for help.
testdatabase=# CREATE TABLE testtable (testcolumn VARCHAR (50) );
CREATE TABLE
testdatabase=# \dt
           List of relations
 Schema I
            Name
                   | Type | Owner
testdatabase=# CREATE TABLE testtable (testcolumn VARCHAR (50) );
CREATE TABLE
testdatabase=# \dt
           List of relations
 Schema | Name | Type | Owner
 public | testtable | table | testuser
(1 row)
testdatabase=# \q
root@test:/# exit
exit
Session ended, resume using 'kubectl attach test -c test -i -t' command when the
 pod is running
pod "test" deleted
blagoff@MacBook-Pro-Vyacheslav ~ % kubectl get pod
NAME
                        READY
                                STATUS
                                          RESTARTS
                                                     AGE
pg-db-7fdbb69989-mbj7g
                        1/1
                                Running
                                          0
                                                     8m57s
blagoff@MacBook-Pro-Vyacheslav ~ % kubectl del p pg-db-7fdbb69989-mbj7g
blagoff@MacBook-Pro-Vyacheslav ~ % kubectl delete po pg-db-7fdbb69989-mbj7g
pod "pg-db-7fdbb69989-mbj7g" deleted
blagoff@MacBook-Pro-Vyacheslav ~ % kubectl get po
NAME
                        READY
                                STATUS
                                          RESTARTS
                                                      AGE
pg-db-7fdbb69989-jgx5c
                        0/1
                                Init:0/1
                                                      15s
                                           0
blagoff@MacBook-Pro-Vyacheslav ~ % kubectl get po
NAME
                        READY
                                STATUS
                                                  RESTARTS
                                                             AGE
                                                             16s
pa-db-7fdbb69989-jax5c
                        0/1
                                PodInitializina 0
blagoff@MacBook-Pro-Vyacheslav ~ % kubectl get po
NAME
                        READY
                                STATUS
                                          RESTARTS
                                                     AGE
pg-db-7fdbb69989-jgx5c
                        1/1
                                Running
                                          0
                                                     17s
blagoff@MacBook-Pro-Vyacheslav ~ % kubectl get pod -o wide
NAME
                        READY
                              STATUS RESTARTS AGE
                                                           ΙP
                                                                        NODE
```

```
If you don't see a command prompt, try pressing enter.
root@test:/# psql -h 172.17.0.4 -U testuser testdatabase
Password for user testuser:
psql (10.13 (Debian 10.13-1.pgdg90+1))
Type "help" for help.
testdatabase=# \dt
          List of relations
Schema | Name | Type | Owner
public | testtable | table | testuser
(1 row)
testdatabase=# \q
root@test:/# exit
exit
Session ended, resume using 'kubectl attach test -c test -i -t' command when the
pod is running
pod "test" deleted
blagoff@MacBook-Pro-Vyacheslav ~ % kubectl get pod
NAME
                        READY
                                STATUS
                                         RESTARTS
                                                    AGE
na-dh-7fdbh69989-iax5c
                       1/1
                                                    1030
```