

```
apiVersion: v1
kind: PersistentVolume
metadata:
  name: mysql-pv
  labels:
    app: mysql-volume
spec:
  capacity:
    storage: 5Gi
  accessModes:
    - ReadWriteOnce
  storageClassName: standard
  hostPath:
    path: "/mnt/data"
```

```
apiVersion: v1
kind: PersistentVolumeClaim
metadata:
  name: mysql-pv-claim
spec:
  accessModes:
    - ReadWriteOnce
  storageClassName: standard
resources:
  requests:
    storage: 2Gi
```

```
apiVersion: apps/v1
kind: Deployment
metadata:
  name: mysql-deployment
  labels:
    app: mysql-server
spec:
  replicas: 1
  selector:
    matchLabels:
      app: mysql-server
  strategy:
    type: Recreate
  template:
    metadata:
      labels:
        app: mysql-server
    spec:
      containers:
        - name: mysql-container
          image: mysql:5.6
          env:
            - name: MYSQL_DATABASE
              valueFrom:
                secretKeyRef:
```

```
  name: mysql-db-url
  key: database
- name: MYSQL_USER
valueFrom:
  secretKeyRef:
    name: mysql-user-pass
    key: username
- name: MYSQL_ROOT_PASSWORD
valueFrom:
  secretKeyRef:
    name: mysql-root-pass
    key: password
- name: MYSQL_PASSWORD
valueFrom:
  secretKeyRef:
    name: mysql-user-pass
    key: password
- name: MYSQL_HOST
valueFrom:
  secretKeyRef:
    name: mysql-host
    key: host
ports:
- containerPort: 3306
  name: mysql
volumeMounts:
- name: mysql-persistent-storage
  mountPath: /var/lib/mysql
volumes:
- name: mysql-persistent-storage
  persistentVolumeClaim:
    claimName: mysql-pv-claim
```

```
apiVersion: v1
kind: Service
metadata:
  name: mysql-service
labels:
  app: mysql
spec:
  ports:
  - port: 3306
    targetPort: 3306
  clusterIP: None
selector:
  app: mysql-server
```