

1 Introduction :

This guide aims to help users easily download and set up Oracle Database using Docker on Linux.

2 Requirements :

Installing Docker

Arch Based :

```
sudo pacman -S docker
```

Debian and Ubuntu Based :

```
sudo apt install apt-transport-https ca-certificates curl software-properties-common
curl -fsSL https://download.docker.com/linux/ubuntu/gpg | sudo apt-key add -
sudo add-apt-repository "deb [arch=amd64] https://download.docker.com/linux/ubuntu \$(lsb\ _release -cs) stable"
sudo apt update
sudo apt install docker-ce
```

3 Docker :

3.1 Start Docker :

starting docker

Systemctl Distro (arch,ubuntu,debian based) :

```
sudo systemctl start docker
sudo systemctl enable docker
```

3.2 Pulling Oracle Image :

Pulling oracle-xe

```
sudo docker pull gvenzl/oracle-xe
```

3.3 Enable Root Right

```
sudo usermod -aG docker $USER
```

3.4 Starting Oracle Container And Executing It :

Commands :

```
sudo docker run -d --privileged -p 1521:1521 -e ORACLE_PASSWORD=<password> gvenzl/oracle-xe
sudo docker ps
sudo docker exec -it <container_id> bash
```

Exemple :

```
[rabah@chadArch oracle]$ sudo docker run -d --privileged -p 1521:1521 -e ORACLE_PASSWORD=1234 gvenzl/oracle-xe
1f93a69a3fbc956ee53cdaecde1656859df139c51aed9b3fa2aeac702ce0cb84
```

```
[rabah@chadArch oracle]$ sudo docker ps
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS
1f93a69a3fbc	gvenzl/oracle-xe	"container-entrypoin..."	4 seconds ago	Up 2 seconds

PORTS	NAMES
0.0.0.0:1521->1521/tcp, :::1521->1521/tcp	infallible_lamport

```
[rabah@chadArch oracle]$ sudo docker exec -it 1f93a69a3fbc bash
bash-4.4$
```

3.5 Setting Up Plugged Data Base (PDB) :

Commands :

- Finding SeedPath :

```
sqlplus sys/<container_password>@localhost/XE as sysdba  
  
SELECT file_name FROM dba_data_files WHERE tablespace_name = 'SYSTEM';  
  
expected output : /opt/oracle/oradata/XE/system01.dbf  
  
exit;
```

- **Creating Folder For New PDB**

```
cd /opt/oracle/oradata/XE  
  
mkdir /opt/oracle/oradata/XE/TP\_3BDD  
  
sqlplus sys/1234@localhost/XE as sysdba
```

- **Creating And Altering To New PDB**

```
CREATE PLUGGABLE DATABASE TP_3BDD ADMIN USER RABAH IDENTIFIED BY 1234 FILE_NAME_CONVERT('/opt/oracle/oradata/XE/XEPDB1/',  
  
ALTER PLUGGABLE DATABASE TP_3BDD OPEN;  
  
exit;  
  
sqlplus sys/1234@localhost/TP_3BDD as sysdba
```