For a DBA, starting up and shutting down of oracle database is a routine and basic operation. Sometimes Linux administrator or programmer may end-up doing some basic DBA operations on development database. So, it is important for non-DBAs to understand some basic database administration activities.

In this article, let us review how to start and stop an oracle database.

How To Startup an Oracle Database

1. Login to the system with oracle username

   Typical oracle installation will have oracle as username and dba as group. On Linux, do su to oracle as shown below.
   
   /home/voyager => su – oracle
   Password:
   Welcome to dc02vg0141na.hosted.exlibrisgroup.com

2. Connect to oracle sysdba

   Make sure ORACLE_SID (should be VGER) and ORACLE_HOME are set properly, something like what is shown below.
   
   /oracle/app/oracle/product/11.2.0/db_1/network/admin => env | grep ORA
   ORACLE_BASE=/oracle/app/oracle
   ORACLE_HOME=/oracle/app/oracle/product/11.2.0/db_1
   ORACLE_PATH=.:/opt/bin:/usr/bin:
   ORACLE_SID=VGER
   ORA_CONFIG=/oracle/app/oracle/product/11.2.0/db_1/dbs
   ORA_LOG=/oracle/app/oracle/diag/rdbms/vger/VGER/trace
   ORA_NET=/oracle/app/oracle/product/11.2.0/db_1/network/admin

   1. At the operating system prompt, enter the following command to start SQL Command Line and connect to the database:
   2. SQLPLUS / AS SYSDBA

   The slash (/) indicates that the database should authenticate you with operating system authentication.

   NOTE! Be very, very careful when you’re in oracle as sysdba. It is the oracle equivalent of root. Always know what you are doing and why. Never mess about! You need to use it here because the normal “read-only” user can’t do shutdowns and startups.

   /oracle/app/oracle/product/11.2.0/db_1/network/admin => whoami
   oracle
3. Start Oracle Database

SQL> startup

ORACLE instance started.
Total System Global Area 384143360 bytes
Fixed Size 2213616 bytes
Variable Size 268437776 bytes
Database Buffers 109051904 bytes
Redo Buffers 4440064 bytes
Database mounted.
Database opened.

How To Shutdown Oracle Database

Following three methods are available to shutdown the oracle database:

1. Normal Shutdown
2. Shutdown Immediate
3. Shutdown Abort

1. Normal Shutdown

Don’t use this. It takes too long and sometimes doesn’t work at all!

During normal shutdown, before the oracle database is shut down, oracle will wait for all active
users to disconnect their sessions. As the parameter name (normal) suggest, use this option to
shutdown the database under normal conditions.

SQL> shutdown;
Database closed.
Database dismounted.
ORACLE instance shut down.
SQL>

2. Shutdown Immediate

During immediate shutdown, before the oracle database is shut down, oracle will rollback active
transaction and disconnect all active users. Use this option when there is a problem with your
database and you don’t have enough time to request users to log-off.
3. Shutdown Abort

During shutdown abort, before the oracle database is shutdown, all user sessions will be terminated immediately. Uncommitted transactions will not be rolled back. Use this option only during emergency situations when the “shutdown” and “shutdown immediate” doesn’t work.