**Listener and TNS Practical**

[oracle@localhost ~]$ **. oraenv**

ORACLE\_SID = [oracle] ? **prod**

The Oracle base has been set to /u01/app/oracle

[oracle@localhost ~]$ **sqlplus / as sysdba**

SQL\*Plus: Release 19.0.0.0.0 - Production on Wed Aug 13 12:13:42 2025

Version 19.3.0.0.0

Copyright (c) 1982, 2019, Oracle. All rights reserved.

Connected to an idle instance.

SQL> **startup**

ORACLE instance started.

Total System Global Area 1493168352 bytes

Fixed Size 8896736 bytes

Variable Size 889192448 bytes

Database Buffers 587202560 bytes

Redo Buffers 7876608 bytes

Database mounted.

Database opened.

Oracle Net Configuration Assistant

SQL> ho

[oracle@localhost ~]$ **netca**

Oracle Net Services Configuration:

Configuring Listener:LISTENER01

Listener configuration complete.

Oracle Net Listener Startup:

Running Listener Control:

/u01/app/oracle/product/19.0.0/dbhome\_1/bin/lsnrctl start LISTENER01

Listener Control complete.

Listener started successfully.

Oracle Net Services configuration successful. The exit code is 0

This command used for to check Listener Register or not

[oracle@localhost ~]$ **ps -ef | grep listener**

oracle 5451 4952 0 12:20 pts/0 00:00:00 grep --color=auto listener

Start the Listener with Listener name (Listener01)

[oracle@localhost ~]$ **start listener Listener01**

LSNRCTL for Linux: Version 19.0.0.0.0 - Production on 13-AUG-2025 12:26:55

Copyright (c) 1991, 2019, Oracle. All rights reserved.

TNS-01106: Listener using listener name LISTENER01 has already been started

Listener Control for start Listener prompt

[oracle@localhost ~]$ **lsnrctl**

LSNRCTL for Linux: Version 19.0.0.0.0 - Production on 13-AUG-2025 12:28:37

Copyright (c) 1991, 2019, Oracle. All rights reserved.

Welcome to LSNRCTL, type "help" for information.

Show the STATUS of the LISTENER

LSNRCTL> **status**

Connecting to (ADDRESS=(PROTOCOL=tcp)(HOST=)(PORT=1521))

STATUS of the LISTENER

------------------------

Alias LISTENER01

Version TNSLSNR for Linux: Version 19.0.0.0.0 - Production

Start Date 13-AUG-2025 12:15:17

Uptime 0 days 0 hr. 13 min. 54 sec

Trace Level off

Security ON: Local OS Authentication

SNMP OFF

Listener Parameter File /u01/app/oracle/product/19.0.0/dbhome\_1/network/admin/listener.ora

Listener Log File /u01/app/oracle/diag/tnslsnr/localhost/listener01/alert/log.xml

Listening Endpoints Summary...

(DESCRIPTION=(ADDRESS=(PROTOCOL=tcp)(HOST=localhost)(PORT=1521)))

(DESCRIPTION=(ADDRESS=(PROTOCOL=ipc)(KEY=EXTPROC1521)))

(DESCRIPTION=(ADDRESS=(PROTOCOL=tcps)(HOST=localhost)(PORT=5500))(Security=(my\_wallet\_directory=/u01/app/oracle/admin/prod/xdb\_wallet))(Presentation=HTTP)(Session=RAW))

Services Summary...

Service "prod" has 1 instance(s).

Instance "prod", status READY, has 1 handler(s) for this service...

Service "prodXDB" has 1 instance(s).

Instance "prod", status READY, has 1 handler(s) for this service...

The command completed successfully

Set location of Listener Parameter File

LSNRCTL> **exit**

[oracle@localhost ~]$ **cd /u01/app/oracle/product/19.0.0/dbhome\_1/network/admin/**

[oracle@localhost admin]$ **ll**

total 8

-rw-r-----. 1 oracle oinstall 339 Aug 13 12:15 listener.ora

drwxr-xr-x. 2 oracle oinstall 64 Apr 17 2019 samples

-rwxr-xr-x. 1 oracle oinstall 1536 Feb 14 2018 shrept.lst

Open Listener file (Network Config. file) listener.ora

[oracle@localhost admin]$ **cat listener.ora**

**# listener.ora Network Configuration File:** /u01/app/oracle/product/19.0.0/dbhome\_1/network/admin/listener.ora

# Generated by Oracle configuration tools.

LISTENER01 =

(DESCRIPTION\_LIST =

(DESCRIPTION =

(ADDRESS = (PROTOCOL = TCP)(HOST = localhost)(PORT = 1521))

(ADDRESS = (PROTOCOL = IPC)(KEY = EXTPROC1521))

)

Stop the listener

)

[oracle@localhost admin]$ **lsnrctl stop listener01**

LSNRCTL for Linux: Version 19.0.0.0.0 - Production on 13-AUG-2025 12:43:54

Copyright (c) 1991, 2019, Oracle. All rights reserved.

Connecting to (DESCRIPTION=(ADDRESS=(PROTOCOL=TCP)(HOST=localhost)(PORT=1521)))

The command completed successfully

[oracle@localhost admin]$ **lsnrctl status**

LSNRCTL for Linux: Version 19.0.0.0.0 - Production on 13-AUG-2025 12:44:07

Copyright (c) 1991, 2019, Oracle. All rights reserved.

Connecting to (ADDRESS=(PROTOCOL=tcp)(HOST=)(PORT=1521))

TNS-12541: TNS:no listener

TNS-12560: TNS:protocol adapter error

TNS-00511: No listener

Linux Error: 111: Connection refused

Start the listener

[oracle@localhost admin]$ **lsnrctl start listener01**

LSNRCTL for Linux: Version 19.0.0.0.0 - Production on 13-AUG-2025 12:47:00

Copyright (c) 1991, 2019, Oracle. All rights reserved.

Starting /u01/app/oracle/product/19.0.0/dbhome\_1/bin/tnslsnr: please wait...

TNSLSNR for Linux: Version 19.0.0.0.0 - Production

System parameter file is /u01/app/oracle/product/19.0.0/dbhome\_1/network/admin/listener.ora

Log messages written to /u01/app/oracle/diag/tnslsnr/localhost/listener01/alert/log.xml

Listening on: (DESCRIPTION=(ADDRESS=(PROTOCOL=tcp)(HOST=localhost)(PORT=1521)))

Listening on: (DESCRIPTION=(ADDRESS=(PROTOCOL=ipc)(KEY=EXTPROC1521)))

Connecting to (DESCRIPTION=(ADDRESS=(PROTOCOL=TCP)(HOST=localhost)(PORT=1521)))

STATUS of the LISTENER

------------------------

Alias listener01

Version TNSLSNR for Linux: Version 19.0.0.0.0 - Production

Start Date 13-AUG-2025 12:47:00

Uptime 0 days 0 hr. 0 min. 0 sec

Trace Level off

Security ON: Local OS Authentication

SNMP OFF

Listener Parameter File /u01/app/oracle/product/19.0.0/dbhome\_1/network/admin/listener.ora

Listener Log File /u01/app/oracle/diag/tnslsnr/localhost/listener01/alert/log.xml

Listening Endpoints Summary...

(DESCRIPTION=(ADDRESS=(PROTOCOL=tcp)(HOST=localhost)(PORT=1521)))

(DESCRIPTION=(ADDRESS=(PROTOCOL=ipc)(KEY=EXTPROC1521)))

The listener supports no services

The command completed successfully

Open Oracle Net Configuration Assistant for Oracle Net Services Configuration (TNS)

[oracle@localhost ~]$ **netca**

Oracle Net Services Configuration:

Default local naming configuration complete.

Service Name

Created net service name: **demolink**

Oracle Net Services configuration successful. The exit code is 0

This command used for to check TNS running or not

v

[oracle@localhost ~]$ **ps -ef | grep tns**

root 16 2 0 15:07 ? 00:00:00 [netns]

oracle 5217 1 0 15:12 ? 00:00:00 /u01/app/oracle/product/19.0.0/dbhome\_1/bin/tnslsnr listener01 -inherit

oracle 6434 6037 0 15:28 pts/0 00:00:00 grep --color=auto tns

Sqlplus prompt start with sys as sysdba username and oracle is password

v

[oracle@localhost ~]$ **sqlplus sys as sysdba/oracle@demolink**

SQL\*Plus: Release 19.0.0.0.0 - Production on Thu Aug 14 15:29:52 2025

Version 19.3.0.0.0

Copyright (c) 1982, 2019, Oracle. All rights reserved.

Enter password:

Connected to:

Oracle Database 19c Enterprise Edition Release 19.0.0.0.0 - Production

Version 19.3.0.0.0

SQL> **show user**

USER is "SYS"

SQL> **select \* from tab;**

Show no. of tables SYS user

TNAME TABTYPE CLUSTERID

------------------------------ ------------- ----------

ALL$OLAP2\_AWS VIEW

COAD$INLINE\_NOTNULL\_CONS VIEW

COAD$CUBE\_MVIEWS VIEW

COAD$MVIEWS\_WITH\_VIEWS VIEW

SAM\_SPARSITY\_ADVICE TABLE

DBA\_DV\_STATUS VIEW

CDB\_DV\_STATUS VIEW

DBMS\_SQLPATCH\_STATE TABLE

DBMS\_SQLPATCH\_FILES TABLE

8281 rows selected.

SQL> **ho**

Show TNS ping Utility

[oracle@localhost ~]$ **tnsping demolink**

TNS Ping Utility for Linux: Version 19.0.0.0.0 - Production on 14-AUG-2025 15:41:25

Copyright (c) 1997, 2019, Oracle. All rights reserved.

Used parameter files:

Used TNSNAMES adapter to resolve the alias

Attempting to contact (DESCRIPTION = (ADDRESS\_LIST = (ADDRESS = (PROTOCOL = TCP)(HOST = localhost.localdomain)(PORT = 1521))) (CONNECT\_DATA = (SERVICE\_NAME = demolink)))

OK (10 msec)

[oracle@localhost ~]$ **cd /u01/app/oracle/product/19.0.0/dbhome\_1/network/admin**

Set location of Listener Parameter File

[oracle@localhost admin]$ **ll**

total 52

-rw-r-----. 1 oracle oinstall 339 Aug 13 12:53 listener25081312PM5326.bak

-rw-r-----. 1 oracle oinstall 339 Aug 13 13:03 listener2508131PM0313.bak

-rw-r-----. 1 oracle oinstall 339 Aug 13 13:15 listener2508131PM1505.bak

-rw-r-----. 1 oracle oinstall 339 Aug 13 13:17 listener2508131PM1729.bak

-rw-r-----. 1 oracle oinstall 339 Aug 14 15:09 listener2508143PM0952.bak

-rw-r-----. 1 oracle oinstall 339 Aug 14 15:24 listener2508143PM2446.bak

-rw-r-----. 1 oracle oinstall 339 Aug 13 12:15 listener.ora

drwxr-xr-x. 2 oracle oinstall 64 Apr 17 2019 samples

-rwxr-xr-x. 1 oracle oinstall 1536 Feb 14 2018 shrept.lst

-rw-r-----. 1 oracle oinstall 344 Aug 13 13:03 tnsnames2508131PM0313.bak

-rw-r-----. 1 oracle oinstall 535 Aug 13 13:15 tnsnames2508131PM1505.bak

-rw-r-----. 1 oracle oinstall 345 Aug 14 15:09 tnsnames2508143PM0952.bak

-rw-r-----. 1 oracle oinstall 536 Aug 14 15:24 tnsnames2508143PM2446.bak

-rw-r-----. 1 oracle oinstall 731 Aug 14 15:25 tnsnames.ora

Open TNS name file (Network Config. file) listener.ora

[oracle@localhost admin]$ **cat tnsnames.ora**

# tnsnames.ora Network Configuration File: /u01/app/oracle/product/19.0.0/dbhome\_1/network/admin/tnsnames.ora

# Generated by Oracle configuration tools.

DEMOLINK =

(DESCRIPTION =

(ADDRESS\_LIST =

(ADDRESS = (PROTOCOL = TCP)(HOST = localhost.localdomain)(PORT = 1521))

)

(CONNECT\_DATA =

(SERVICE\_NAME = demolink)

)

)

[oracle@localhost admin]$