

Installing and Using the Enterprise Manager Agent on Z/OS

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Agenda

- **Introduction**
- **Preparation**
- **Configuration**
- **Operation**
- **Limitations**
- **Trouble shooting.**
- **Future**

Introduction

- **In Oracle 10. The enterprise manager was re-written by generic development use xml and perl. Tcl is no longer used. It was decided that perl is a better scripting language than tcl and was better supported on different platforms.**
- **We ship perl as part of 10.**
- **Oracle on z/OS currently has ported the enterprise manager agent.**

Preparation.

- **Run root.sh when doing the install.**
 - A couple of modules nmb and nmo need the extattr + p
 - They are used to impersonate a user and verify a users username and password.
- **BPX parameters MAXTHREADS and MAXTHREADTASKS.**
 - These may need to be increased if they have been set very low.
- **Do not set a CPU time limit on the user running the agent else it will terminate.**
- **User running agent should be owner of agent.**
- **Make certain the SYSAUX TBS is at least 100M**

Configuration.

- **Current recommended release 10.1.0.3.**
- **Currently a manual process.**
- **I suggest you run OUI with the configuration utility and specify a known database. This utility creates a sample targets.xml configuration file for you.**
- **Agent is located in sysman directory.**
- **Two files need configuring:**
 - **Sysman/config/emd.properties**
 - **Sysman/emd/targets.xml**

emd.properties

- **REPOSITORY_URL** needs setting
- **agentSeed** needs to be noted for **targets.xml**
- **EMD_URL** may need setting to a specific port if you security environment limits port usage. This also goes into **targets.xml**.
- **Tracelevel** at the bottom of the file are useful for trouble shooting.

Targets.xml

- **Config utility will create a sample targets.xml.sid file for you.**
- **Copy this file into the real targets.xml**

```
<Targets AGENT_SEED="????????? ">
  <Target TYPE="oracle_emd" NAME="mvs05.us.oracle.com:????" VERSION="1.0"/>
  <Target TYPE="host" NAME="mvs05.us.oracle.com" VERSION="1.0"/>
  <Target TYPE="oracle_database" NAME="ORA1" VERSION="1.0">
    <Property NAME="MachineName" VALUE="mvs05.us.oracle.com"/>
    <Property NAME="Port" VALUE="1501"/>
    <Property NAME="SID" VALUE="ORA1"/>
    <Property NAME="ConnectDescriptor" VALUE="(DESCRIPTION=(ADDRESS_..."/>
    <Property NAME="OracleHome" VALUE="/qa/ship/10103/install"/>
    <Property NAME="UserName" VALUE="DBSNMP"/>
    <Property NAME="password" VALUE="DBSNMP" ENCRYPTED="FALSE"/>
    <Property NAME="Role" VALUE="NORMAL"/>
  </Target>
</Targets>
```

Operation.

- **OUI will have automatically configured the enterprise manager scripts for you.**
- **Run ENV file or set the environment variables.**
- **Emctl start agent**
- **Emctl status agent**
- **Emctl stop agent**
- **On first startup the agent registers and communicates with the OMS. It can take a few minutes before the node will appear on the OMS.**

Limitations.

- **Some host metrics are not reported. Partially this is because they are meaningless and partly because we have not ported them.**
- **Z/OS cannot run with a dbconsole or as an OMS console.**
- **Some Perl scripts have not been ported. If there is a requirement we will endeavor to port them.**

Trouble Shooting.

- **Emd.properties has various tracing that can be turned on. This can be used to provide detailed analysis of what the agent is doing. Perl tracing is also available.**
- **If you need to clean up an agent**
 - **Shutdown the agent**
 - **Delete the host, agent and database from OMS**
 - **Delete everything in collection / state / upload and recv directories of emd as well as files created after the agent originally started up.**

Future.

- **Port all host metrics wherever possible**
- **Provide a stand alone version of the agent**
- **Port dbconsole**
- **Automate configuration**

Any Questions?

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