

Lab E - Exercise 2: Communicate in SSL Mode using JNDI

Overview

In this exercise you will configure a new JMS Connection Resource to connect to EMS Server in SSL mode using JNDI.

Steps

1. Configure EMS Server to use JNDI Connection Factory.

- Using gedit, open the file
`/opt/tibco/soa/config/tibco/cfgmgmt/ems/data/factories.conf`
- Locate the [SSLQueueConnectionFactory] (line 119) and update the values below:
 - type = **queue**
 - url = **ssl://7333**
 - ssl_verify_host = **disabled**
- Add the following line (as a single line)
 - ◆ **ssl_trusted**
`=/opt/tibco/soa/ems/8.2/samples/certs/server_root.cert.pem`

```
[SSLQueueConnectionFactory]
type          = queue
url           = ssl://7333
ssl_verify_host = disabled
ssl_trusted   =/opt/tibco/soa/ems/8.2/samples/certs/server_root.cert.pem
```

- Configure the [SSLTopicConnectionFactory] using the same values but keeping:
 - ◆ type = topic

```
[SSLTopicConnectionFactory]
type          = topic
url           = ssl://7333
ssl_verify_host = disabled
ssl_trusted   =/opt/tibco/soa/ems/8.2/samples/certs/server_root.cert.pem
```

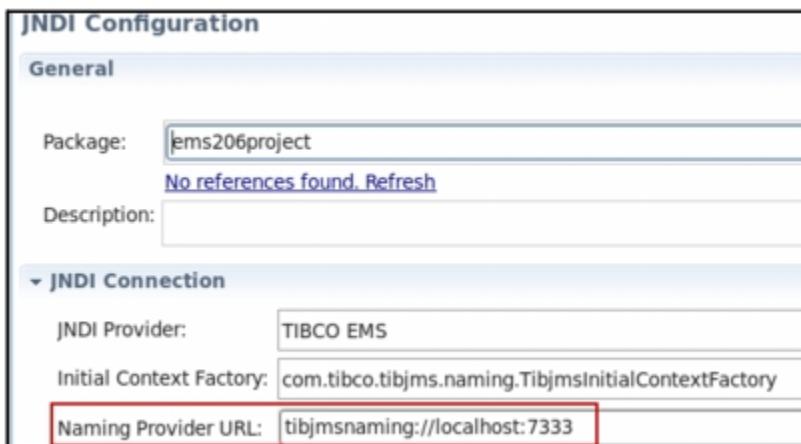
- Save the file

2. Start the EMS Server in SSL mode.

- From a Terminal, issue the following command (in a single line)
`tibemsd64 -config /opt/tibco/soa/config/tibco/cfgmgmt/ems/data/tibemsdSSL.conf -ssl_trace -ssl_debug_trace -trace CONNECT`
- When prompted for password, type: **password**

3. Create a JNDI Configuration resource.

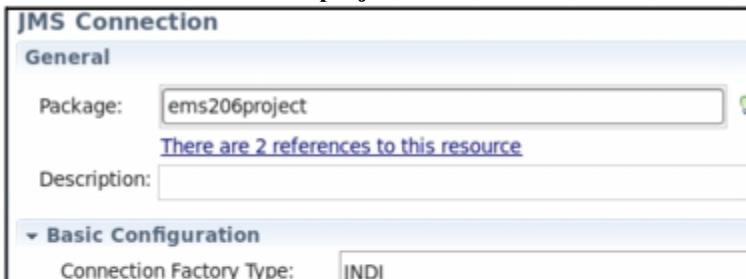
- Return to Business Studio
- Create a new JNDI Configuration resource and configure it
 - ◆ In Project Explorer, right-click *EMS206Project/Resources* folder
 - Select *New > JNDI Configuration*
 - Resource Name: **sslJNDIConfiguration**
 - Click **Finish**
 - ◆ Configure the following:
 - Naming Provider URL: **tibjmsnaming://localhost:7333**



- ◆ Save

4. Configure a new JMS Connection resource using your JNDI configuration.

- Create new JMS Connection Resource and configure it
 - ◆ Right-click *EMS206Project/Resources* folder
 - Select *New > JMS Connection*
 - Resource Name: **sslJNDIConnection**
 - ◆ Configure the following:
 - Connection Factory Type: **JNDI** (accept default)
 - Messaging Style: **Queue/Topic** (from dropdown)
 - Queue Connection Factory: **SSLQueueConnectionFactory**
 - Topic Connection Factory: **SSLTopicConnectionFactory**
 - JNDI Configuration: Browse for **sslJNDIConfiguration**
 - ◆ Scroll down if necessary and open the SSL section
 - Confidentiality: checked
 - SSL Client: Browse for **EMS206project.EMS206SSLClient**



Messaging Style	Queue/Topic
Queue Connection Factory	SSLQueueConnectionFactory
Topic Connection Factory	SSLTopicConnectionFactory
JNDI Configuration:	ems206project.SSLJNDIConfiguration

◆ Save

5. Test Connection.

- You should see a message confirming successful connection

6. Modify publisher and subscriber processes to use JNDI Connection.

- In Project Explorer, select *EMS206Project/Processes/LabE/SSL_Send* process
 - ◆ Select **JMS Topic Publisher** activity
 - ◆ In *Properties > General*, replace **JMS_SSL_Connection** by JNDI Connection
 - JMS Connection: Browse for **EMS206project.sslJNDIConnection**
 - ◆ Save
- Repeat the same for *SSL_Receive* process and the **JMS Topic Subscriber - Customer** activity

7. Test Publisher and Subscriber following instructions from the Step 8. in previous exercise.

8. Shutdown EMS Server.