

Date: 16/09/2021

Day: Thursday

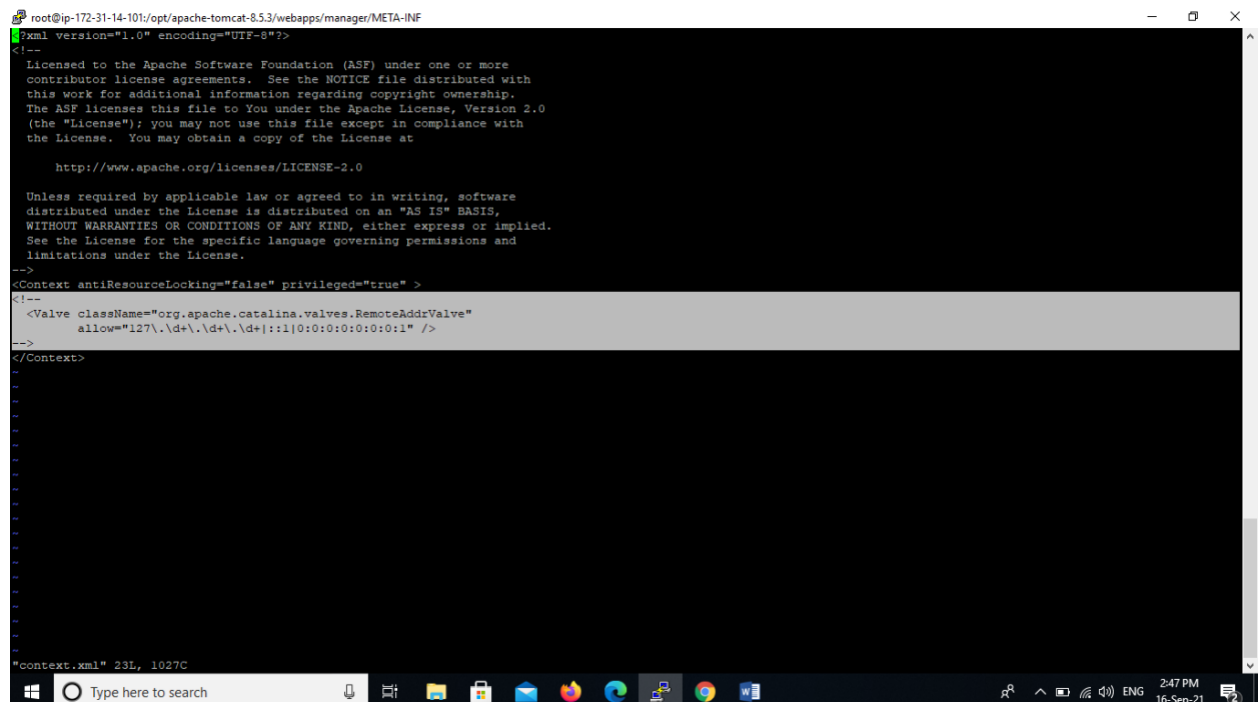
Tomcat Web Application Manager

A (1). In an apache tomcat-8.3.5. we have add credentials tomcat user.xml for username , password, roles and then we have to apache tomcat server shutdown and startup server and then check whether server is working.(<http://34.200.246.143:8080/>)

1. ec2-user
2. sudo -i
3. cd /opt
4. ls
5. cd apache-tomcat-8.5.3/
6. ls
7. cd webapps
8. cd manger
9. cd META-INF
10. ls
11. vi context.xml

```
<!--  
  <Valve className="org.apache.catalina.valves.RemoteAddrValve"  
    allow="127\.\d+\.\d+\.\d+|::1|0:0:0:0:0:0:1" />
```

```
-->
```

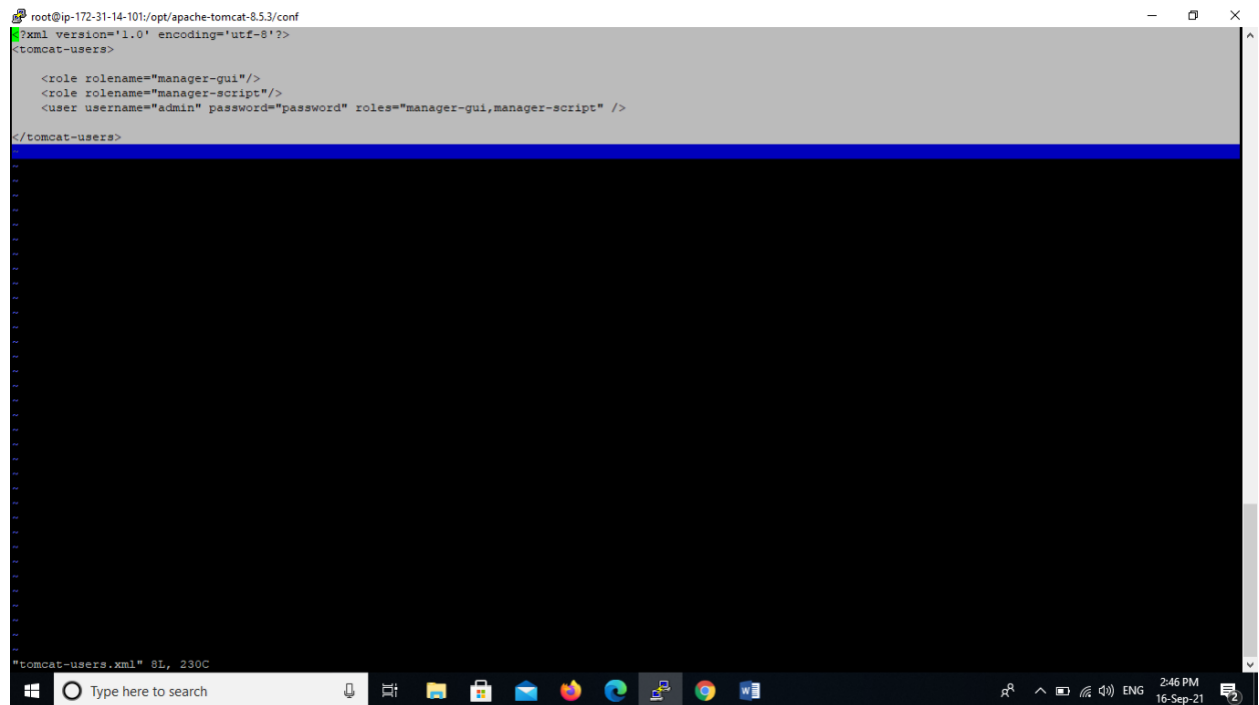


```
root@ip-172-31-14-101: /opt/apache-tomcat-8.5.3/webapps/manger/META-INF  
<?xml version="1.0" encoding="UTF-8"?>  
<!--  
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  contributor license agreements.  See the NOTICE file distributed with  
  this work for additional information regarding copyright ownership.  
  The ASF licenses this file to You under the Apache License, Version 2.0  
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  the License.  You may obtain a copy of the License at  
  
    http://www.apache.org/licenses/LICENSE-2.0  
  
  Unless required by applicable law or agreed to in writing, software  
  distributed under the License is distributed on an "AS IS" BASIS,  
  WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied.  
  See the License for the specific language governing permissions and  
  limitations under the License.  
-->  
<Context antiResourceLocking="false" privileged="true" >  
<!--  
  <Valve className="org.apache.catalina.valves.RemoteAddrValve"  
    allow="127\.\d+\.\d+\.\d+|::1|0:0:0:0:0:0:1" />  
-->  
</Context>  
-->
```

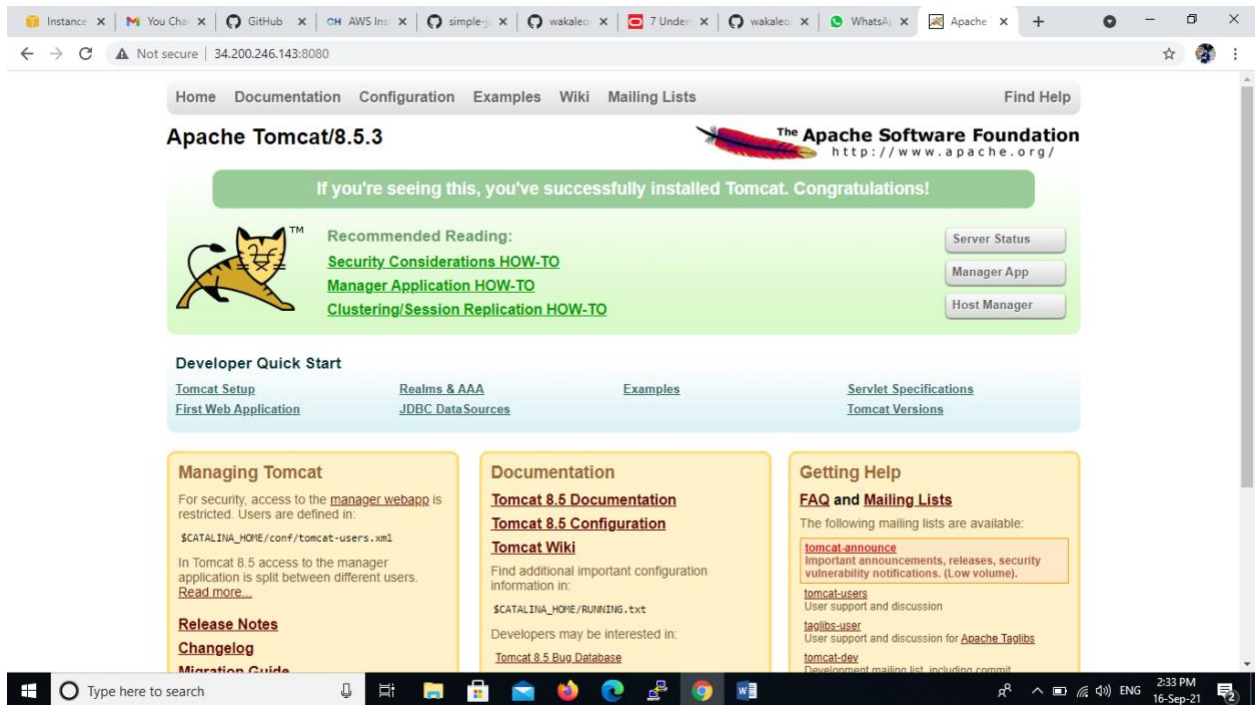
12. `cd conf`
13. `ls`
14. `vi tomcat-users.xml`
`<?xml version='1.0' encoding='utf-8'?>`
`<tomcat-users>`

```
    <role rolename="manager-gui"/>
    <role rolename="manager-script"/>
    <user username="admin" password="password" roles="manager-gui,manager-
script" />
```

```
</tomcat-users>
```



15. `cd bin`
16. `sh shutdown.sh`
17. `sh startup.sh`



A (2). In apache maven .we have add credentials for setting.xml file of tomcat server username, password, for automated access. Then it will open Tomcat Web Application Manager. (<http://34.200.246.143:8080/>) and then we have to click manager app. (<http://34.200.246.143:8080/manager/html>)

18. `cd /opt`
 19. `ls`
 20. `cd apache-maven-3.5.3`
 21. `ls`
 22. `cd conf`
 23. `ls`
 24. `vi setting.xml`
- ```
<server>
 <id>TomcatServer</id>
 <username>admin</username>
 <password>password</password>
</server>
```

```
root@ip-172-31-14-101:/opt/apache-maven-3.5.3/conf
| Unless otherwise specified (by system property or command-line switch), the first proxy
| specification in this list marked as active will be used.
|-->
<proxies>
 <!-- proxy
 | Specification for one proxy, to be used in connecting to the network.
 |
 <proxy>
 <id>optional</id>
 <active>true</active>
 <protocol>http</protocol>
 <username>proxyuser</username>
 <password>proxypass</password>
 <host>proxy.host.net</host>
 <port>80</port>
 <nonProxyHosts>local.net|some.host.com</nonProxyHosts>
 </proxy>
 -->
</proxies>

<!-- Servers
| This is a list of authentication profiles, keyed by the server-id used within the system.
| Authentication profiles can be used whenever maven must make a connection to a remote server.
|-->
<servers>
<server>
 <id>TomcatServer</id>
 <username>admin</username>
 <password>password</password>
</server>

<!-- server
| Specifies the authentication information to use when connecting to a particular server, identified by
| a unique name within the system (referred to by the 'id' attribute below).
|
| NOTE: You should either specify username/password OR privateKey/passphrase, since these pairings are
| used together.
|
<server>
 <id>deploymentRepo</id>
 <username>repouser</username>
 <password>repowdc</password>
</server>
-->
```

25.     cd /opt
26.     ls
27.     cd apache-tomcat-8.5.3
28.     ls
29.     cd bin
30.     ls
31.     sh shutdown.sh
32.     sh startup.sh

**Manger app**

**Credentials:**

**User: admin**

**Password: password**

A (3).In java war file .we have add plugins for build project. With the decency of maven tools for install, clean install, deploy.

```

33. cd /opt
34. cd javawar
35. ls
36. vi pom.xml
<plugins>
<plugin>
 <groupId>org.apache.tomcat.maven</groupId>
 <artifactId>tomcat7-maven-plugin</artifactId>
 <version>2.2</version>
 <configuration>
 <url>http://34.200.246.143:8080/manager/text</url>
 <server>TomcatServer</server>
 <path>/mkyongWebApp</path>
 </configuration>
</plugin>
</plugins>

```

```
root@ip-172-31-14-101:/opt/javawar
<?xml version="1.0" encoding="UTF-8" ?>
<project xmlns="http://maven.apache.org/POM/4.0.0" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:schemaLocation="http://maven.apache.org/POM/4.0.0 http://maven.apache.org/maven-v4_0_0.xsd">
 <modelVersion>4.0.0</modelVersion>
 <groupId>lu.amazon.aws.demo</groupId>
 <artifactId>WebApp</artifactId>
 <packaging>war</packaging>
 <version>1.0-SNAPSHOT</version>
 <name>WebApp Haven Webapp</name>
 <url>http://maven.apache.org</url>
 <dependencies>
 <dependency>
 <groupId>junit</groupId>
 <artifactId>junit</artifactId>
 <version>3.8.1</version>
 <scope>test</scope>
 </dependency>
 </dependencies>
 <build>
 <plugins>
 <plugin>
 <groupId>org.apache.tomcat.maven</groupId>
 <artifactId>tomcat7-maven-plugin</artifactId>
 <version>2.2</version>
 <configuration>
 <url>http://34.200.246.143:8080/manager/text</url>
 <server>TomcatServer</server>
 <path>/mkyongWebApp</path>
 </configuration>
 </plugin>
 </plugins>
 </build>
</project>

Type :qqa! and press <Enter> to abandon all changes and exit Vim
```



### 37. mvn install (build success)

```
root@ip-172-31-14-101:/opt/javawar
[root@ip-172-31-14-101 javawar]# vi pom.xml
[root@ip-172-31-14-101 javawar]# mvn install
[INFO] Scanning for projects...
[INFO]
[INFO] -----< lu.amazon.aws.demo:WebApp >-----
[INFO] Building WebApp Maven Webapp 1.0-SNAPSHOT
[INFO] -----[war]-----
[INFO]
[INFO] --- maven-resources-plugin:2.6:resources (default-resources) @ WebApp ---
[WARNING] Using platform encoding (UTF-8 actually) to copy filtered resources, i.e. build is platform dependent!
[INFO] skip non existing resourceDirectory /opt/javawar/src/main/resources
[INFO]
[INFO] --- maven-compiler-plugin:3.1:compile (default-compile) @ WebApp ---
[INFO] No sources to compile
[INFO]
[INFO] --- maven-resources-plugin:2.6:testResources (default-testResources) @ WebApp ---
[WARNING] Using platform encoding (UTF-8 actually) to copy filtered resources, i.e. build is platform dependent!
[INFO] skip non existing resourceDirectory /opt/javawar/src/test/resources
[INFO]
[INFO] --- maven-compiler-plugin:3.1:testCompile (default-testCompile) @ WebApp ---
[INFO] No sources to compile
[INFO]
[INFO] --- maven-surefire-plugin:2.12.4:test (default-test) @ WebApp ---
[INFO] No tests to run.
[INFO]
[INFO] --- maven-war-plugin:2.2:war (default-war) @ WebApp ---
[INFO] Packaging webapp
[INFO] Assembling webapp [WebApp] in [/opt/javawar/target/binary]
[INFO] Processing war project
[INFO] Copying webapp resources [/opt/javawar/src/main/webapp]
[INFO] Webapp assembled in [22 msecs]
[INFO] Building war: /opt/javawar/target/binary.war
[INFO] WEB-INF/web.xml already added, skipping
[INFO]
[INFO] --- maven-install-plugin:2.4:install (default-install) @ WebApp ---
[INFO] Installing /opt/javawar/target/binary.war to /root/.m2/repository/lu/amazon/aws/demo/WebApp/1.0-SNAPSHOT/WebApp-1.0-SNAPSHOT.war
[INFO] Installing /opt/javawar/pom.xml to /root/.m2/repository/lu/amazon/aws/demo/WebApp/1.0-SNAPSHOT/WebApp-1.0-SNAPSHOT.pom
[INFO]
[INFO] -----
[INFO] Total time: 1.159 s
[INFO] Finished at: 2021-09-16T09:22:33Z
[INFO]
[root@ip-172-31-14-101 javawar]#
```

### 38. mvn tomcat7:deploy

```
root@ip-172-31-14-101:/opt/javawar#
[INFO] --- maven-resources-plugin:2.6:resources (default-resources) @ WebApp ---
[WARNING] Using platform encoding (UTF-8 actually) to copy filtered resources, i.e. build is platform dependent!
[INFO] skip non existing resourceDirectory /opt/javawar/src/main/resources
[INFO] --- maven-compiler-plugin:3.1:compile (default-compile) @ WebApp ---
[INFO] No sources to compile
[INFO] --- maven-resources-plugin:2.6:testResources (default-testResources) @ WebApp ---
[WARNING] Using platform encoding (UTF-8 actually) to copy filtered resources, i.e. build is platform dependent!
[INFO] skip non existing resourceDirectory /opt/javawar/src/test/resources
[INFO] --- maven-compiler-plugin:3.1:testCompile (default-testCompile) @ WebApp ---
[INFO] No sources to compile
[INFO] --- maven-surefire-plugin:2.12.4:test (default-test) @ WebApp ---
[INFO] No tests to run.
[INFO] --- maven-war-plugin:2.2:war (default-war) @ WebApp ---
[INFO] Packaging webapp
[INFO] Assembling webapp [WebApp] in [/opt/javawar/target/binary]
[INFO] Processing war project
[INFO] Copying webapp resources [/opt/javawar/src/main/webapp]
[INFO] Webapp assembled in 119 msecs
[INFO] Building war: /opt/javawar/target/binary.war
[INFO] WEB-INF/web.xml already added, skipping
[INFO] <<< tomcat7-maven-plugin:2.2:deploy (default-cli) < package @ WebApp <<<
[INFO]
[INFO] --- tomcat7-maven-plugin:2.2:deploy (default-cli) @ WebApp ---
[INFO] Deploying war to http://34.200.246.143:8080/mkyongWebApp
Uploading: http://34.200.246.143:8080/manager/text/deploy?path=/2FmkyongWebApp
Uploaded: http://34.200.246.143:8080/manager/text/deploy?path=/2FmkyongWebApp (4 KB at 3869.1 KB/sec)
[INFO] tomcatManager status code:200, ReasonPhrase:
[INFO] FAIL - Application already exists at path /mkyongWebApp

[INFO]
[INFO] Total time: 1.941 s
[INFO] Finished at: 2021-09-16T09:23:46Z
[INFO] -----
root@ip-172-31-14-101:/opt/javawar#
```

## Tomcat Web Application Manager

Message:

FAIL - Application already exists at path /

Manager

List Applications

HTML Manager Help

Manager Help

Server Status

Applications

Path	Version	Display Name	Running	Sessions	Commands
/	None specified	Welcome to Tomcat	true	0	<div>Start Stop Reload Undeploy</div> <div>Expire sessions with idle ≥ 30 minutes</div>
/docs	None specified	Tomcat Documentation	true	0	<div>Start Stop Reload Undeploy</div> <div>Expire sessions with idle ≥ 30 minutes</div>
/examples	None specified	Servlet and JSP Examples	true	0	<div>Start Stop Reload Undeploy</div> <div>Expire sessions with idle ≥ 30 minutes</div>
/host-manager	None specified	Tomcat Host Manager Application	true	0	<div>Start Stop Reload Undeploy</div> <div>Expire sessions with idle ≥ 30 minutes</div>
/manager	None specified	Tomcat Manager Application	true	1	<div>Start Stop Reload Undeploy</div> <div>Expire sessions with idle ≥ 30 minutes</div>