JBoss-LDAP-Security

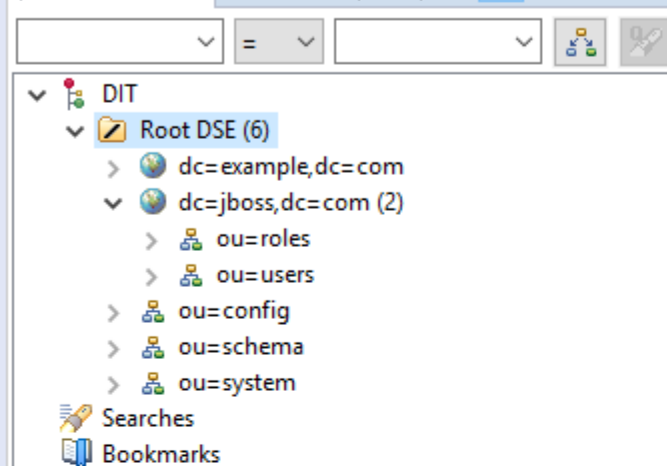| Project Name:	JBoss-LDAP-Security
Description:	Demonstration for LDAP Authentication in JBoss Security domain
Author:	Shantanu Banerjee
Disclaimer:	This demo is created using free version of ActivePresenter. This demo is not for commercial use. Please note this demo is not distributable.

We Need the following to be running:

1. Virtual Box Linux VM
2. Apache Directory Studio
3. Putty
4. WinSCP

File   Edit   Search   View   Encoding   Language   Settings   Tools   Macro   Run   Plugins   Window   ?

new 4   new 1   standalone-full.xml

```xml
440            <authentication>
441                <login-module code="Database" flag="required">
442                    <module-option name="dsJndiName" value="java:jboss/mysql/DS1"/>
443                    <module-option name="principalsQuery" value="select password from users where username=?"/>
444                    <module-option name="rolesQuery" value="select role,'Roles' from roles where username=?"/>
445                </login-module>
446            </authentication>
447        </security-domain>
448        <security-domain name="ldapdomain" cache-type="default">
449            <authentication>
450                <login-module code="LdapExtended" flag="required">
451                    <module-option name="throwValidateError" value="true"/>
452                    <module-option name="java.naming.factory.initial" value="com.sun.jndi.ldap.LdapCtxFactory"/>
453                    <module-option name="java.naming.provider.url" value="ldap://192.168.40.1:10389"/>
454                    <module-option name="java.naming.security.authentication" value="simple"/>
455                    <module-option name="bindDN" value="uid=admin,ou=system"/>
456                    <module-option name="bindCredential" value="secret"/>
457                    <module-option name="baseCtxDN" value="ou=users,dc=jboss,dc=com"/>
458                    <module-option name="baseFilter" value="(uid={0})"/>
459                    <module-option name="rolesCtxDN" value="ou=roles,dc=jboss,dc=com"/>
460                    <module-option name="roleFilter" value="(uniqueMember={1})"/>
461                    <module-option name="roleAttributeID" value="cn"/>
462                    <module-option name="searchScope" value="ONELEVEL_SCOPE"/>
463                    <module-option name="allowEmptyPasswords" value="true"/>
464                </login-module>
465            </authentication>
466        </security-domain>
467    </security-domains>
468 </subsystem>
469 <subsystem xmlns="urn:jboss:domain:threads:1.1"/>
470 <subsystem xmlns="urn:jboss:domain:transactions:1.5">
471    <core-environment>
```

JBoss Security domain configuration as per the LDAP Server

eXtensible Markup Language file   length : 28518   lines : 545   Ln : 466   Col : 35   Sel : 1478 | 19   Windows (CR LF)   UTF-8   INS

File   Edit   Navigate   Search   LDAP   Window   Help

LDAP Browser

cn=manager,ou=roles,dc=jboss,dc=com

DN: cn=manager,ou=roles,dc=jboss,dc=com

Outline
cn=manager,ou=roles,dc=jboss,dc=co
objectClass (2)
uniqueMember (1)
cn (1)

DIT
- Root DSE (6)
  - dc=example,dc=com
  - dc=jboss,dc=com (2)
    - ou=roles (3)
      - cn=admin
      - cn=manager
      - cn=user
    - ou=users (3)
      - uid=arun
      - uid=pavan
      - uid=shantanu
  - ou=config
  - ou=schema
  - ou=system
Searches
Bookmarks

training@master:/opt/production/jboss-eap-6.4/standalone/deployments/USerRoles_Sec.war/WEB-INF

```xml
<?xml version='1.0' encoding='UTF-8' ?>

<!DOCTYPE jboss-web
    PUBLIC "-//JBoss//DTD Web Application 2.3V2//EN"
    "http://www.jboss.org/j2ee/dtd/jboss-web_3_2.dtd">

<jboss-web>

    <security-domain>java:/jaas/ldapdomain</security-domain>

</jboss-web>
~
~
~
~
~
~
~
~
~
~
~
"jboss-web.xml" 11L, 257C
```

file : $JBOSS_HOME/standalone/deployments
/USerRoles_Sec/WEB-INF/jboss-web.xml

name of the security domain
as per configuration

Connections   LDAP Servers

ExtLDAP

operations to display at this time.

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File   Edit   Navigate   Search   LDAP   Window   Help

LDAP Browser

cn=manager,ou=roles,dc=jboss,dc=com

DN: cn=manager,ou=roles,dc=jboss,dc=com

Outline

cn=manager,ou=roles,dc=jboss,dc=co
- objectClass (2)
- uniqueMember (1)
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- Root DSE (6)
  - dc=example,dc=com
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    - ou=users (3)
      - uid=arun
      - uid=pavan
      - uid=shantanu
    - ou=config
    - ou=schema
    - ou=system
- Searches
- Bookmarks

training@master:/opt/production/jboss-eap-6.4/standalone/deployments

```
[training@master log]$ cd ../deployments/
[training@master deployments]$ cd USerRoles_Sec.war
[training@master USerRoles_Sec.war]$ cd WEB-INF/
[training@master WEB-INF]$ pwd
/opt/production/jboss-eap-6.4/standalone/deployments/USerRoles_Sec.war/WEB-INF
[training@master WEB-INF]$ vi jboss-web.xml
[training@master WEB-INF]$ cd ..
[training@master USerRoles_Sec.war]$ cd ..
[training@master deployments]$ ls
LoggerSample.war            TestDS.war                    USerRoles_Sec.war.deployed
LoggerSample.war.deployed   TestDS.war.deployed
README.txt                  USerRoles_Sec.war
[training@master deployments]$
```

USerRoles_Sec.war is deployed

Connections   LDAP Servers

ExtLDAP

rogress

operations to display at this time.

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File   Edit   Navigate   Search   LDAP   Window   Help

LDAP Browser

cn=manager,ou=roles,dc=jboss,dc=com

DN: cn=manager,ou=roles,dc=jboss,dc=com

=

objectClass (2)
uniqueMember (1)
cn (1)

- DIT
  - Root DSE (6)
    - dc=example,d
    - dc=jboss,dc=
      - ou=roles (
        - cn=ad
        - cn=ma
        - cn=use
      - ou=users (
        - uid=ar
        - uid=pa
        - uid=sh
      - ou=config
      - ou=schema
      - ou=system
  - Searches
  - Bookmarks

training@master:/opt/production/jboss-eap-6.4/standalone/deployments

training@master:/opt/production/jboss-eap-6.4/bin

```
[training@master bin]$ ./standalone.sh -c standalone-full.xml -b 192.168.56.101
-bmanagement 192.168.56.101
```

Start the server

Connections   LDAP S

ExtLDAP

operations to display at this time.

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LDAP - cn=manager,ou=roles,dc=jboss,dc=com - ExtLDAP - Apache Directory Studio

File Edit Navigate Search LDAP Window Help

Quick Access

LDAP Browser

cn=manager,ou=roles,dc=jboss,dc=com ⊠

Outline

DN: cn=manager,ou=roles,dc=jboss,dc=com

cn=manager,ou=roles,dc=jboss,dc=co
- objectClass (2)
- uniqueMember (1)
- cn (1)

DIT
- Root DSE (6)
  - dc=example,d
  - dc=jboss,dc=
    - ou=roles (
      - cn=ad
      - cn=ma
      - cn=use
    - ou=users (
      - uid=ar
      - uid=pa
      - uid=sh
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    - ou=schema
    - ou=system
- Searches
- Bookmarks

Connections   LDAP S

ExtLDAP

training@master:/opt/production/jboss-eap-6.4/standalone/deployments

training@master:/opt/production/jboss-eap-6.4/bin

```
16:23:23,141 INFO  [org.jboss.web] (ServerService Thread Pool -- 63) JBAS018210:
Register web context: /JMSApp
16:23:23,202 INFO  [org.jboss.web] (ServerService Thread Pool -- 67) JBAS018210:
Register web context: /LoggerSample
16:23:30,372 INFO  [org.jboss.as.jacorb] (MSC service thread 1-2) JBAS016328: CO
RBA Naming Service started
16:23:30,555 INFO  [org.jboss.as.server] (Controller Boot Thread) JBAS015859: De
ployed "JMSApp.war" (runtime-name : "JMSApp.war")
16:23:30,556 INFO  [org.jboss.as.server] (Controller Boot Thread) JBAS015859: De
ployed "ShoppingCart.jar" (runtime-name : "ShoppingCart.jar")
16:23:30,568 INFO  [org.jboss.as.server] (ServerService Thread Pool -- 34) JBAS0
15859: Deployed "LoggerSample.war" (runtime-name : "LoggerSample.war")
16:23:30,569 INFO  [org.jboss.as.server] (ServerService Thread Pool -- 34) JBAS0
15859: Deployed "USerRoles_Sec.war" (runtime-name : "USerRoles_Sec.war")
16:23:30,575 INFO  [org.jboss.as.server] (ServerService Thread Pool -- 34) JBAS0
15859: Deployed "TestDS.war" (runtime-name : "TestDS.war")
16:23:30,674 INFO  [org.jboss.as] (Controller Boot Thread) JBAS015961: Http mana
gement interface listening on http://192.168.56.101:9990/management
16:23:30,679 INFO  [org.jboss.as] (Controller Boot Thread) JBAS015951: Admin con
sole listening on http://192.168.56.101:9990
16:23:30,679 INFO  [org.jboss.as] (Controller Boot Thread) JBAS015874: JBoss EAP
 6.4.0.GA (AS 7.5.0.Final-redhat-21) started in 48562ms - Started 519 of 552 ser
vices (85 services are lazy, passive or on-demand)
```

ActivePresenter - ...

Pause Stop Discard

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192.168.56.101:8080/USerRoles_Sec/

192.168.56.101:8080/USerRoles_Sec/ - **192.168.56.101:8080/USerRoles_Sec/**

127.0.0.1:8080

dandeli.com

lsbb.inetradius.com/admin/

photos.google.com/assistant

roblox.com
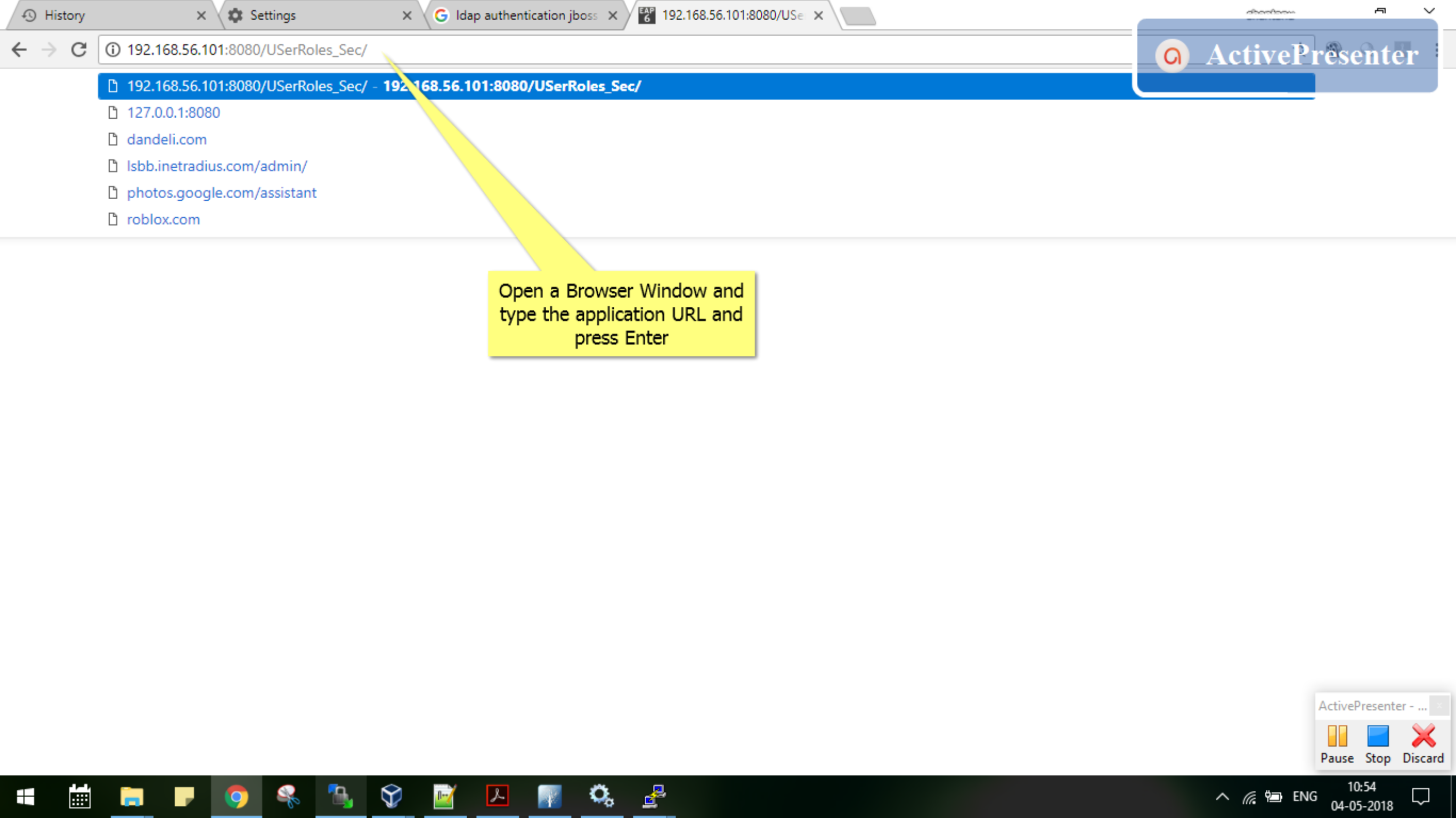
Open a Browser Window and type the application URL and press Enter

ActivePresenter

ActivePresenter - ...

Pause   Stop   Discard

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History | Settings | ldap authentication jboss | 192.168.56.101:8080/USe

192.168.56.101:8080/USerRoles_Sec/

hadooptutorial - Cus | DSPBR MF | Introduction to Big | ebsph | Apache Hadoop | Other bookmarks

Welcome to the application, pavan!
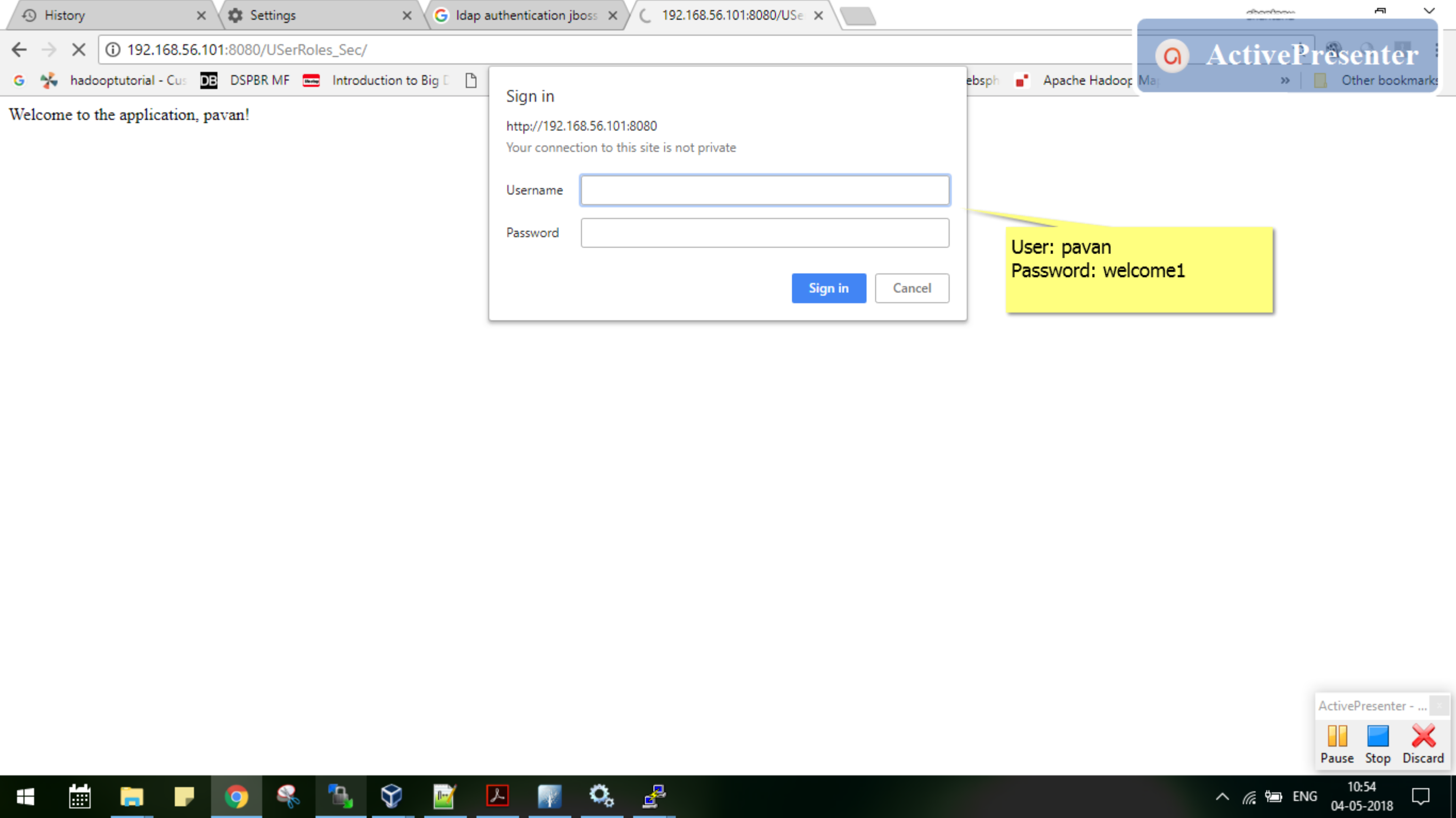
Sign in

http://192.168.56.101:8080
Your connection to this site is not private

Username

Password

Sign in   Cancel

User: pavan
Password: welcome1

ActivePresenter - ...

Pause   Stop   Discard

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04-05-2018

192.168.56.101:8080/USerRoles_Sec/

Welcome to the application, pavan!

The message proves that the LDAP authentication is successful

ActivePresenter

ActivePresenter - ...

Pause   Stop   Discard

Summery

1. Configured JBoss LDAP Authentication
2. Configured and Deployed a secured Web Application
3. Authenticated the Application with and external LDAP Server.