Jsp& servlet installation

Step 1: Install Java

Tomcat requires Java. On CentOS 7, Java 11 works well:

```
sudo yum install java-11.0.18-openjdk -y
```

Check the installation:

```
java -version
```

Expected output (approx):

```
openjdk version "11.0.18" 2024-xx-xx
```

Step 2: Enable EPEL Repository

Tomcat packages are available in EPEL:

```
sudo yum install epel-release -y
```

Step 3: Install Tomcat

```
sudo yum install tomcat tomcat-webapps tomcat-admin-webapps -y
```

Check version (optional):

```
rpm -qa | grep tomcat
```

Step 4: Start and Enable Tomcat

```
sudo systemctl start tomcat
sudo systemctl enable tomcat
sudo systemctl status tomcat
```

You should see `active (running)`.

Step 5: Open Firewall (if enabled)

Allow access to port 8080 (default Tomcat port):

```
sudo firewall-cmd --permanent --add-port=8080/tcp
    You get message success
sudo firewall-cmd --reload
   You get message success
```

Step 6: Create a Webapp Directory

Let's create a directory for your JSP program:

```
sudo mkdir -p /var/lib/tomcat/webapps/myapp
```

Step 7: Create a Sample JSP

Create a file called `hello.jsp`:

```
sudo vi /var/lib/tomcat/webapps/myapp/hello.jsp
```

Add this content:

```
<%@ page contentType="text/html;charset=UTF-8" language="java" %>
<html>
<head>
    <title>Hello JSP</title>
</head>
```

```
<body>
    <h1>Hello, Tomcat with JSP!</h1>
    <p>Current server time: <%= new java.util.Date() %></p>
</body>
</html>
```

Step 8: Set Permissions

Ensure Tomcat can read your files:

```
sudo chown -R tomcat:tomcat /var/lib/tomcat/webapps/myapp
```

Step 9: Restart Tomcat

```
sudo systemctl restart tomcat
```

Check status:

```
sudo systemctl status tomcat
```

Step 10: Access Your JSP Program

Open your browser and go to:

```
http://<your-server-ip>:8080/myapp/hello.jsp
```
Example : http://localhost:8080/myapp/hello.jsp

You should see:

```
Hello, Tomcat with JSP!
Current server time: [current date/time]
```