

## Assignment:

### Assignment

#### **\*\*Assignment\*\***

- 1) Create Maven Web Application
- 2) Added 'Spring-Core' dependency in project pom.xml file
- 3) Package maven project as war file using maven goal
- 4) Create Git repository in github.com (public repo)
- 5) Push maven project into github repo using gitbash  
(target folder shouldn't be committed, add this is .gitignore file)
- 6) Make changes in pom.xml and push changes to github repo using git bash
- 7) Create 'feature' branch in git repo from main branch
- 8) Clone feature branch from git bash using git clone
- 9) Make changes in 'feature' branch pom.xml file and push changes to central repo
- 10) Create pull request and merge 'feature' branch changes to 'main' branch

### 1. Create a Maven Application

```
mvn archetype:generate -DarchetypeArtifactId=maven-archetype-webapp -DartifactId=assignment -  
DgroupId=assignment.com -DarchetypeGroupId=org.apache.maven.archetypes -  
DarchetypeGroupId=org.apache.maven.archetypes -DinteractiveMode=false
```

```
pom - Notepad
File Edit Format View Help
<?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/xsd/maven-4.0.0.xsd">
  <modelVersion>4.0.0</modelVersion>

  <groupId>assignment.com</groupId>
  <artifactId>assignment</artifactId>
  <version>1.0-SNAPSHOT</version>
  <packaging>jar</packaging>

  <name>assignment Maven Webapp</name>
  <!-- FIXME change it to the project's website -->
  <url>http://www.example.com</url>

  <properties>
    <project.build.sourceEncoding>UTF-8</project.build.sourceEncoding>
    <maven.compiler.source>1.7</maven.compiler.source>
    <maven.compiler.target>1.7</maven.compiler.target>
  </properties>

  <dependencies>
    <dependency>
      <groupId>junit</groupId>
      <artifactId>junit</artifactId>
      <version>4.11</version>
      <scope>test</scope>
    </dependency>
  </dependencies>

  <build>
    <finalName>assignment</finalName>
    <pluginManagement><!-- lock down plugins versions to avoid using Maven defaults (may be moved to parent pom) -->
      <plugins>
        <plugin>
          <artifactId>maven-clean-plugin</artifactId>
          <version>3.1.0</version>
        </plugin>
        <!-- see http://maven.apache.org/ref/current/maven-core/default-bindings.html#Plugin_bindings_for_war_packaging -->
        <plugin>
          <artifactId>maven-resources-plugin</artifactId>
          <version>3.0.2</version>
        </plugin>
        <plugin>
          <artifactId>maven-compiler-plugin</artifactId>
          <version>3.8.0</version>
        </plugin>
        <plugin>
          <artifactId>maven-surefire-plugin</artifactId>
          <version>3.1.2</version>
        </plugin>
      </plugins>
    </pluginManagement>
  </build>
</project>
```

## 2) Adding 'spring-core' dependency in project pom.xml file

```
pom - Notepad
File Edit Format View Help
<dependencies>

<dependency>
  <groupId>org.springframework</groupId>
  <artifactId>spring</artifactId>
  <version>2.5.6</version>
</dependency>

  <dependency>
    <groupId>junit</groupId>
    <artifactId>junit</artifactId>
    <version>4.11</version>
    <scope>test</scope>
  </dependency>
</dependencies>

<build>
  <finalName>assignment</finalName>
  <pluginManagement><!-- lock down plugins versions to avoid using Maven defaults (may be moved to parent pom) -->
    <plugins>
      <plugin>
        <artifactId>maven-clean-plugin</artifactId>
        <version>3.1.0</version>
      </plugin>
      <!-- see http://maven.apache.org/ref/current/maven-core/default-bindings.html#Plugin_bindings_for_war_packaging -->
      <plugin>
        <artifactId>maven-resources-plugin</artifactId>
        <version>3.0.2</version>
      </plugin>
      <plugin>
        <artifactId>maven-compiler-plugin</artifactId>
        <version>3.8.0</version>
      </plugin>
      <plugin>
        <artifactId>maven-surefire-plugin</artifactId>
        <version>3.1.2</version>
      </plugin>
    </plugins>
  </pluginManagement>
</build>
</project>
```

```

C:\Windows\System32\cmd.exe

E:\DevOps with AWS\DevOps\Maven\SAMPLE PROJECT\assignment>mvn clean compile
[INFO] Scanning for projects...
[INFO] -----< assignment.com:assignment >-----
[INFO] Building assignment Maven Webapp 1.0-SNAPSHOT
[INFO] from pom.xml
[INFO] -----[ jar ]-----
[INFO] Downloading from central: https://repo.maven.apache.org/maven2/org/springframework/spring/2.5.6/spring-2.5.6.pom
[INFO] Downloaded from central: https://repo.maven.apache.org/maven2/org/springframework/spring/2.5.6/spring-2.5.6.pom (12 kB at 26 kB/s)
[INFO] Downloading from central: https://repo.maven.apache.org/maven2/org/springframework/spring/2.5.6/spring-2.5.6.jar
[INFO] Downloaded from central: https://repo.maven.apache.org/maven2/org/springframework/spring/2.5.6/spring-2.5.6.jar (2.9 MB at 13 MB/s)
[INFO] Downloading from central: https://repo.maven.apache.org/maven2/commons-logging/commons-logging/1.1.1/commons-logging-1.1.1.pom
[INFO] Downloaded from central: https://repo.maven.apache.org/maven2/commons-logging/commons-logging/1.1.1/commons-logging-1.1.1.pom (18 kB at 592 kB/s)
[INFO] Downloading from central: https://repo.maven.apache.org/maven2/org/apache/commons/commons-parent/5/commons-parent-5.pom
[INFO] Downloaded from central: https://repo.maven.apache.org/maven2/org/apache/commons/commons-parent/5/commons-parent-5.pom (16 kB at 517 kB/s)
[INFO] Downloading from central: https://repo.maven.apache.org/maven2/commons-logging/commons-logging/1.1.1/commons-logging-1.1.1.jar
[INFO] Downloaded from central: https://repo.maven.apache.org/maven2/commons-logging/commons-logging/1.1.1/commons-logging-1.1.1.jar (61 kB at 1.9 MB/s)
[INFO] --- clean:3.1.0:clean (default-clean) @ assignment ---
[INFO] --- resources:3.0.2:resources (default-resources) @ assignment ---
[INFO] Using 'UTF-8' encoding to copy filtered resources.
[INFO] skip non existing resourceDirectory E:\DevOps with AWS\DevOps\Maven\SAMPLE PROJECT\assignment\src\main\resources
[INFO] --- compiler:3.8.0:compile (default-compile) @ assignment ---
[INFO] No sources to compile
[INFO] -----
[INFO] BUILD SUCCESS
[INFO] -----
[INFO] Total time: 2.849 s
[INFO] Finished at: 2023-09-16T11:39:30+05:30
[INFO] -----

E:\DevOps with AWS\DevOps\Maven\SAMPLE PROJECT\assignment>

```

### 3) Package maven project as war file using maven goal

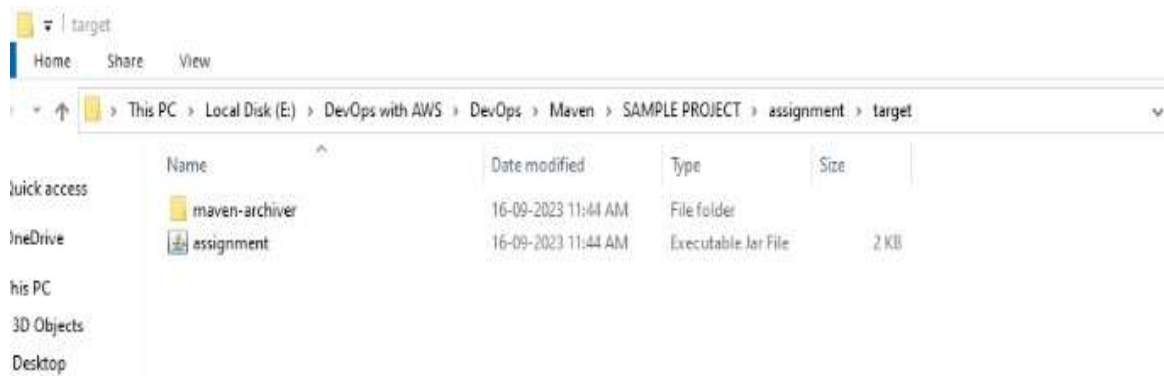
```

C:\Windows\System32\cmd.exe

E:\DevOps with AWS\DevOps\Maven\SAMPLE PROJECT\assignment>mvn clean package
[INFO] Scanning for projects...
[INFO] -----< assignment.com:assignment >-----
[INFO] Building assignment Maven Webapp 1.0-SNAPSHOT
[INFO] from pom.xml
[INFO] -----[ jar ]-----
[INFO] --- clean:3.1.0:clean (default-clean) @ assignment ---
[INFO] --- resources:3.0.2:resources (default-resources) @ assignment ---
[INFO] Using 'UTF-8' encoding to copy filtered resources.
[INFO] skip non existing resourceDirectory E:\DevOps with AWS\DevOps\Maven\SAMPLE PROJECT\assignment\src\main\resources
[INFO] --- compiler:3.8.0:compile (default-compile) @ assignment ---
[INFO] No sources to compile
[INFO] --- resources:3.0.2:testResources (default-testResources) @ assignment ---
[INFO] Using 'UTF-8' encoding to copy filtered resources.
[INFO] skip non existing resourceDirectory E:\DevOps with AWS\DevOps\Maven\SAMPLE PROJECT\assignment\src\test\resources
[INFO] --- compiler:3.8.0:testCompile (default-testCompile) @ assignment ---
[INFO] No sources to compile
[INFO] --- surefire:2.22.1:test (default-test) @ assignment ---
[INFO] No tests to run.
[INFO] --- jar:3.3.0:jar (default-jar) @ assignment ---
[WARNING] JAR will be empty - no content was marked for inclusion!
[INFO] Building jar: E:\DevOps with AWS\DevOps\Maven\SAMPLE PROJECT\assignment\target\assignment.jar
[INFO] -----
[INFO] BUILD SUCCESS
[INFO] -----
[INFO] Total time: 2.881 s
[INFO] Finished at: 2023-09-16T11:44:16+05:30
[INFO] -----

E:\DevOps with AWS\DevOps\Maven\SAMPLE PROJECT\assignment>

```



#### 4) Created git repository in github (public repo).

<https://github.com/rbasha786/assignement-git-maven.git>

#### 5) Push maven project into github repo using gitbash (target folder should't be committed, add this is .gitignore file)

MINGW64/e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment

```
DELL@DESKTOP-J1MV3EC MINGW64 /e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment
$ git init
Initialized empty Git repository in E:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment/.git/
```

```
DELL@DESKTOP-J1MV3EC MINGW64 /e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ ls
pom.xml  src/  target/
```

```
DELL@DESKTOP-J1MV3EC MINGW64 /e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ mkdir .gitignore
```

```
DELL@DESKTOP-J1MV3EC MINGW64 /e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ ls
pom.xml  src/  target/
```

```
DELL@DESKTOP-J1MV3EC MINGW64 /e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ ls -a
./  ../  .git/  .gitignore/  pom.xml  src/  target/
```

```
DELL@DESKTOP-J1MV3EC MINGW64 /e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ mv target/ .gitignore/
```

```
DELL@DESKTOP-J1MV3EC MINGW64 /e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ ls
pom.xml  src/
```

```
DELL@DESKTOP-J1MV3EC MINGW64 /e:/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$
```





```

MINGW64/e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment
$ git commit -m "Assignment - Commit)
>
[master (root-commit) c8d3373] Assignment - Commit)
3 files changed, 86 insertions(+)
create mode 100644 pom.xml
create mode 100644 src/main/webapp/WEB-INF/web.xml
create mode 100644 src/main/webapp/index.jsp

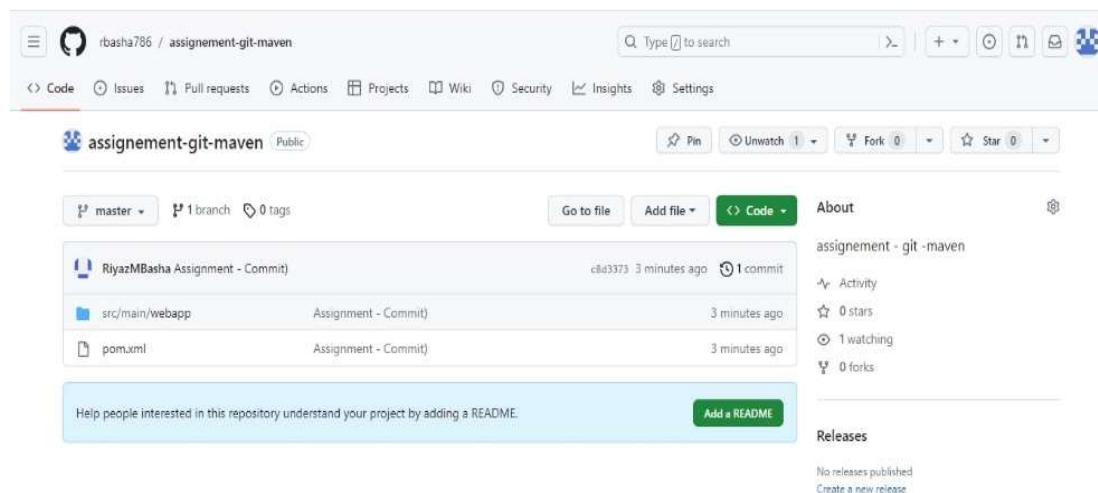
DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git status
warning: unable to access '.gitignore': Permission denied
On branch master
Untracked files:
  (use "git add <file>..." to include in what will be committed)
        .gitignore/

nothing added to commit but untracked files present (use "git add" to track)

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git remote add origin https://github.com/rbasha786/assignment-git-maven.git

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git push origin master
Enumerating objects: 9, done.
Counting objects: 100% (9/9), done.
Delta compression using up to 4 threads
Compressing objects: 100% (6/6), done.
Writing objects: 100% (9/9), 1.38 KiB | 706.00 KiB/s, done.
Total 9 (delta 0), reused 0 (delta 0), pack-reused 0
To https://github.com/rbasha786/assignment-git-maven.git
 * [new branch]      master -> master

```



## 6) Make changes in pom.xml and push change to github repo using git bash

```

*pom - Notepad
File Edit Format View Help
<?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/xsd/maven-4.0.0.xsd">
  <modelVersion>4.0.0</modelVersion>

  <groupId>assignment.com</groupId>
  <artifactId>assignment</artifactId>
  <version>1.1-SNAPSHOT</version>
  <packaging>jar</packaging>

  <name>assignment Maven Webapp</name>
  <!-- FIXME change it to the project's website -->
  <url>http://www.example.com</url>

  <properties>
    <project.build.sourceEncoding>UTF-8</project.build.sourceEncoding>
    <maven.compiler.source>1.7</maven.compiler.source>
    <maven.compiler.target>1.7</maven.compiler.target>
  </properties>

```

Note: Changed the version from 1.0 to 1.1

```
MINGW64/e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment
$ git status
warning: unable to access '.gitignore': Permission denied
On branch master
Changes not staged for commit:
  (use "git add <file>..." to update what will be committed)
  (use "git restore <file>..." to discard changes in working directory)
        modified:   pom.xml

Untracked files:
  (use "git add <file>..." to include in what will be committed)
        .gitignore/

no changes added to commit (use "git add" and/or "git commit -a")

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git add pom.xml

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git commit -m "updated the pom.xml"
[master e734451] updated the pom.xml
 1 file changed, 1 insertion(+), 1 deletion(-)

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git push origin master
Enumerating objects: 5, done.
Counting objects: 100% (5/5), done.
Delta compression using up to 4 threads
Compressing objects: 100% (3/3), done.
Writing objects: 100% (3/3), 310 bytes | 310.00 KiB/s, done.
Total 3 (delta 1), reused 0 (delta 0), pack-reused 0
remote: Resolving deltas: 100% (1/1), completed with 1 local object.
To https://github.com/rbasha786/assignment-git-maven.git
   c8d3373..e734451  master -> master
```



7. Create 'feature' branch in git repo from main branch and also

8. Cloned feature branch from git bash using git clone

```
MINGW64/e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git branch feature

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git branch -a
* master
  remotes/origin/master

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (master)
$ git checkout feature
Switched to branch 'feature'

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (feature)
$ git clone https://github.com/rbasha786/assignment-git-maven.git
Cloning into 'assignment-git-maven'...
remote: Enumerating objects: 12, done.
remote: Counting objects: 100% (12/12), done.
remote: Compressing objects: 100% (8/8), done.
remote: Total 12 (delta 1), reused 12 (delta 1), pack-reused 0
Receiving objects: 100% (12/12), done.
Resolving deltas: 100% (1/1), done.

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (feature)
$
```

9) Make changes in "feature" branch pom.xml file and push changes to central repo.

```
MINGW64/e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment
ls
DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (feature)
$ ls
assignment-git-maven/  pom.xml  src/

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (feature)
$ vi pom.xml

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment (feature)
$
```

MINGW64/e/DevOps with AWS/DevOps/Maven/SAMPLE PROJECT/assignment  
<?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/xsd/maven-4.0.0.xsd">
  <modelVersion>4.0.0</modelVersion>

  <groupId>assignment.com</groupId>
  <artifactId>assignment</artifactId>
  <version>1.2-SNAPSHOT</version>
  <packaging>jar</packaging>

  <name>assignment Maven Webapp</name>
  <!-- FIXME change it to the project's website -->
  <url>http://www.example.com</url>

  <properties>
    <project.build.sourceEncoding>UTF-8</project.build.sourceEncoding>
    <maven.compiler.source>1.7</maven.compiler.source>
    <maven.compiler.target>1.7</maven.compiler.target>
  </properties>

  <dependencies>

  <dependency>
    <groupId>org.springframework</groupId>
    <artifactId>spring</artifactId>
    <version>2.5.6</version>
  </dependency>

  <dependency>
    <groupId>junit</groupId>
pom.xml[+] [dos] (12:05 16/09/2023) 9
-- INSERT --
```

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with  
AWS/DevOps/Maven/SAMPLE PROJECT/assignment (feature)

```
$ git commit -m "Changed version 1.2 in pom.xml"
[feature 7cba163] Changed version 1.2 in pom.xml
1 file changed, 1 insertion(+), 1 deletion(-)
```

DELL@DESKTOP-J1MV3EC MINGW64 /e/DevOps with  
AWS/DevOps/Maven/SAMPLE PROJECT/assignment (feature)

```
$ git push origin feature
Enumerating objects: 5, done.
Counting objects: 100% (5/5), done.
Delta compression using up to 4 threads
Compressing objects: 100% (3/3), done.
Writing objects: 100% (3/3), 318 bytes | 318.00 KiB/s, done.
Total 3 (delta 1), reused 0 (delta 0), pack-reused 0
remote: Resolving deltas: 100% (1/1), completed with 1 local object.
remote:
remote: Create a pull request for 'feature' on GitHub by
visiting:
remote:      https://github.com/rbasha786/assnment-git-
maven/pull/new/feature
remote:
To https://github.com/rbasha786/assnment-git-maven.git
 * [new branch]      feature -> feature
```



github.com/rbasha786/assignment-git-maven/tree/feature

rbasha786 / assignment-git-maven

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assignment-git-maven Public

feature had recent pushes 2 minutes ago [Compare & pull request](#)

feature 2 branches 0 tags [Go to file](#) [Add file](#) [Code](#)

This branch is 1 commit ahead of master. [Contribute](#)

RiyazMBasha	Changed version 1.2 in pom.xml	7cbe163 8 minutes ago	3 commits
src/main/webapp	Assignment - Commit()		35 minutes ago
pom.xml	Changed version 1.2 in pom.xml		8 minutes ago

About assignment - git - maven

Activity 0 stars 1 watching 0 forks

Releases No releases published [Create a new release](#)

## 10) Create full request and merge 'feature' branch changes to 'main' branch

### Open a pull request

Create a new pull request by comparing changes across two branches. If you need to, you can also [compare across forks](#).

base: master ← compare: feature ✓ Able to merge. These branches can be automatically merged.

Changed version 1.2 in pom.xml

Write Preview

Leave a comment

Attach files by dragging & dropping, selecting or pasting them.

[Create pull request](#)

Remember, contributions to this repository should follow our [GitHub Community Guidelines](#).

Reviewers No reviews

Assignees No one—assign yours

Labels None yet

Projects None yet

Milestone No milestone

Development



Still in progress? Convert to draft

Assignees  
No one—assign yourself

Labels  
None yet

Projects  
None yet

Milestone  
No milestone

Development  
Successfully merging this pull request may close these issues.  
None yet

Notifications [Customize](#)

7cba163

Changed version 1.2 in pom.xml

Add more commits by pushing to the **feature** branch on **rbasha786/assignment-git-maven**.

**Require approval from specific reviewers before merging**  
Branch protection rules ensure specific people approve pull requests before they're merged. [Add rule](#) ×

**Continuous integration has not been set up**  
GitHub Actions and several other apps can be used to automatically catch bugs and enforce style.

**This branch has no conflicts with the base branch**  
Merging can be performed automatically.

[Merge pull request](#) ▾ You can also open this in GitHub Desktop or view command line instructions.

rbasha786 / assignment-git-maven

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**Your master branch isn't protected**  
Protect this branch from force pushing or deletion, or require status checks before merging. [Learn more](#) [Protect this branch](#) ×

**rbasha786 Merge pull request #1 from rbasha786/feature** 1db2417 now 4 commits

<code>src/main/webapp</code>	Assignment - Commit()	49 minutes ago
<code>pom.xml</code>	Changed version 1.2 in pom.xml	22 minutes ago

Help people interested in this repository understand your project by adding a README. [Add a README](#)

**Releases**  
No releases published  
[Create a new release](#)

**Packages**

**Conclusion:** *The assignment has been successfully committed.*