Creating Admin User

Create First Admin User

Username

Puneeth

Password

••••••••

Confirm password

••••••••

Full name

NARRA PUNEETH SAI

E-mail address

narrapuneeth44@gmail.com

Jenkins 2.485   Skip and continue as admin   Save and Continue

---

Getting Started

Getting Started

Folders ✓	OWASP Markup Formatter ✓	Build Timeout ✓	Credentials Binding ✓
Timestamper ✓	Workspace Cleanup	Ant	Gradle
Pipeline	GitHub Branch Source	Pipeline: GitHub Groovy Libraries	Pipeline Graph View
Git	SSH Build Agents	Matrix Authorization Strategy	PAM Authentication
LDAP	Email Extension	Mailer	Dark Theme

** Plain Credentials
** Variant
** SSH Credentials
Credentials Binding
** SCM API
** Pipeline: API
** commons-lang3 v3.x Jenkins API
Timestamper
** Caffeine API
** Script Security
** JavaBeans Activation Framework (JAF) API
** JAXB
** SnakeYAML API
** JSON Api
** Jackson 2 API
** commons-text API
** Pipeline: Supporting APIs
** Plugin Utilities API
** Font Awesome API
** Bootstrap 5 API
** JQuery3 API
** ECharts API
** Display URL API
** Checks API
** JUnit
** Matrix Project
** - required dependency

Jenkins 2.485
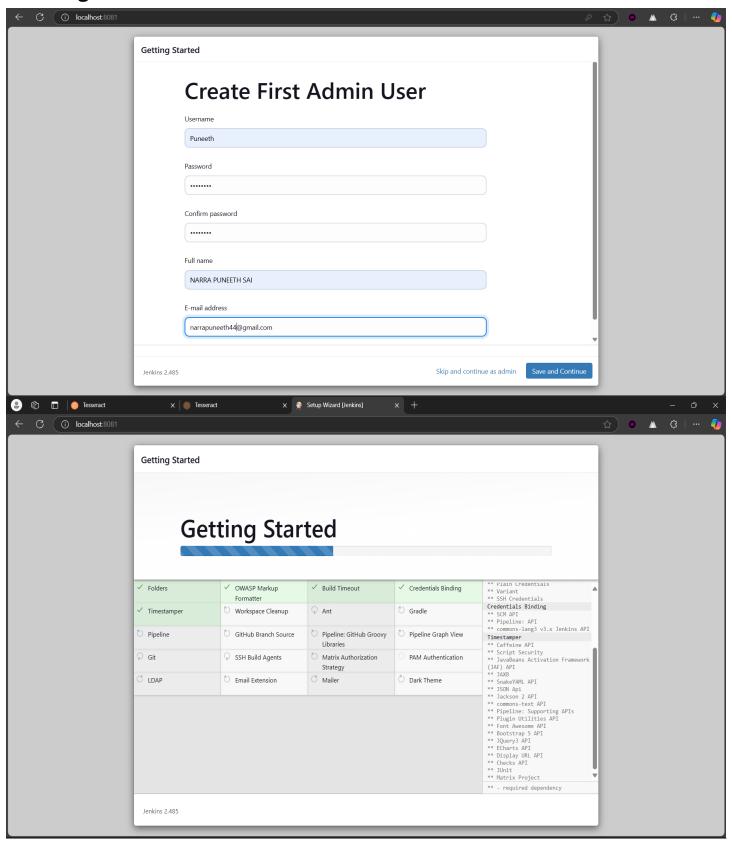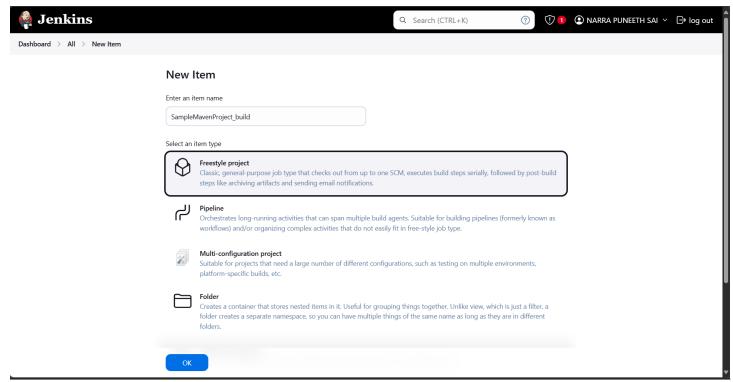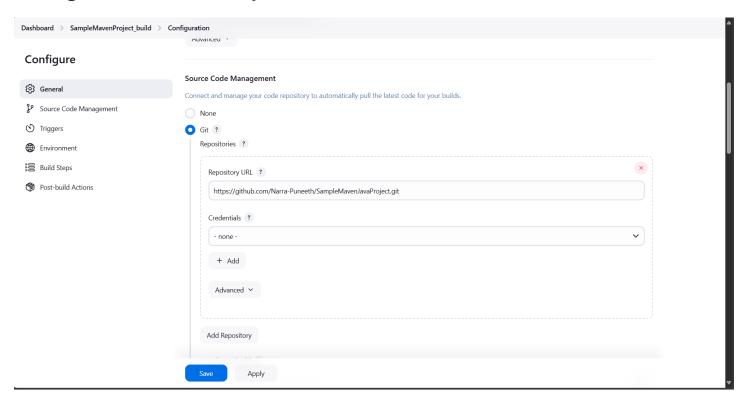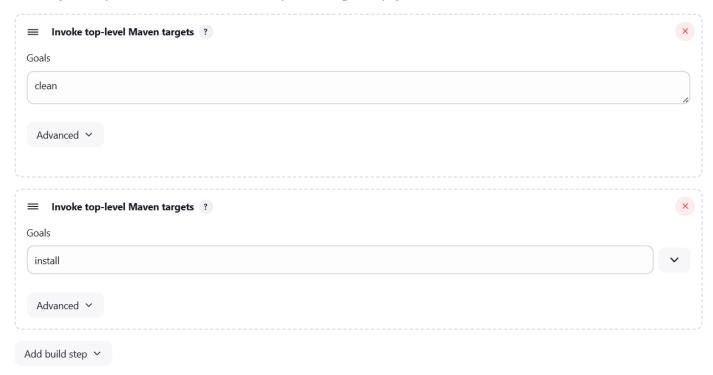
Creating a Freestyle Project for Java Project

Configuration of Java Project

Build Steps

Automate your build process with ordered tasks like code compilation, testing, and deployment.

≡ **Invoke top-level Maven targets** ? ✕

Goals

```
clean
```

Advanced ⌄

≡ **Invoke top-level Maven targets** ? ✕

Goals

install ⌄

Advanced ⌄

Add build step ⌄

Post-build Actions

Define what happens after a build completes, like sending notifications, archiving artifacts, or triggering other jobs.

≡ **Archive the artifacts** ? ✕

Files to archive ?

```
**/*
```

Advanced ⌄

≡ **Build other projects** ? ✕

Projects to build

SampleMavenProject_test

🛑 No such project 'SampleMavenProject_test'. Did you mean 'SampleMavenProject_build'?

🔘 Trigger only if build is stable

◯ Trigger even if the build is unstable

◯ Trigger even if the build fails

Add post-build action ⌄

Configuration of tests for Java Project

Configure

- General
- Source Code Management
- Triggers
- Environment
- **Build Steps**
- Post-build Actions

Build Steps

Automate your build process with ordered tasks like code compilation, testing, and deployment.

≡ **Copy artifacts from another project**   ⊗

Project name ?

`SampleMavenProject_build`

Which build ?

`Latest successful build`   ⌄

☑ Stable build only

Artifacts to copy ?

`**/*`

Artifacts not to copy ?

Target directory ?

Parameter filters ?

Save   Apply

Configure

- General
- Source Code Management
- Triggers
- Environment
- Build Steps
- **Post-build Actions**

`test`   ⌄

Advanced ⌄

Add build step ⌄

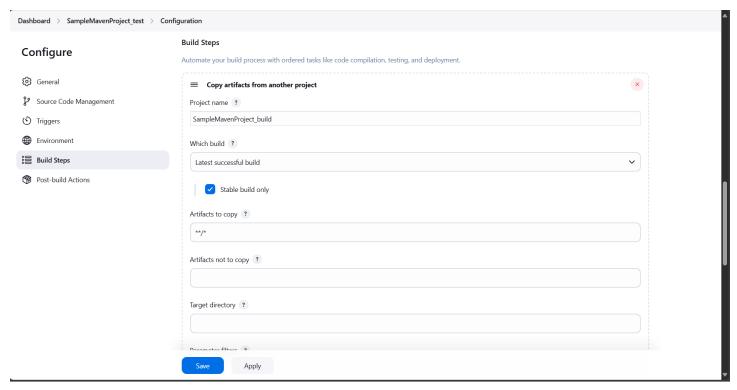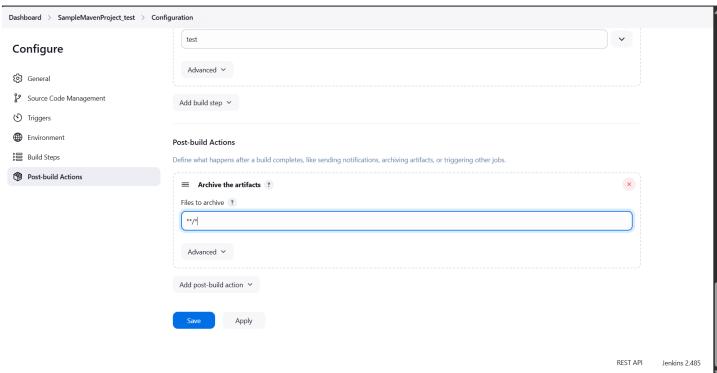**Post-build Actions**

Define what happens after a build completes, like sending notifications, archiving artifacts, or triggering other jobs.

≡ **Archive the artifacts** ?   ⊗

Files to archive ?

`**/*`

Advanced ⌄

Add post-build action ⌄

Save   Apply

REST API   Jenkins 2.485

Creating View for Java Project

Jenkins

Search (CTRL+K)

NARRA PUNEETH SAI

log out

New Item

Build History

Manage Jenkins

My Views

Build Queue

No builds in the queue.

Build Executor Status   0/2

New view

Name

SampleMavenProject_pipeline

Type

◉ Build Pipeline View
Shows the jobs in a build pipeline view. The complete pipeline of jobs that a version propagates through are shown as a row in the view.

○ List View
Shows items in a simple list format. You can choose which jobs are to be displayed in which view.

○ My View
This view automatically displays all the jobs that the current user has an access to.

Create

REST API   Jenkins 2.485

My Views

Build Queue

No builds in the queue.

Build Executor Status   0/2

Plain text Preview

Build Pipeline View Title

Pipeline Flow

Layout

Based on upstream/downstream relationship

This layout mode derives the pipeline structure based on the upstream/downstream trigger relationship between jobs. This is the only out-of-the-box supported layout mode, but is open for extension.

Upstream / downstream config

Select Initial Job ?

SampleMavenProject_build

Trigger Options

Save   Apply

Downloaded from central: https://repo.maven.apache.org/maven2/org/apache/maven/resolver/maven-resolver-api/1.9.18/maven-resolver-api-1.9.18.jar (157 kB at 2.2 MB/s)
[INFO] Installing C:\ProgramData\Jenkins\.jenkins\workspace\SampleMavenProject_build\pom.xml to
C:\WINDOWS\system32\config\systemprofile\.m2\repository\com\app\demo\SampleMavenJavaProject\0.0.1-
SNAPSHOT\SampleMavenJavaProject-0.0.1-SNAPSHOT.pom
[INFO] Installing
C:\ProgramData\Jenkins\.jenkins\workspace\SampleMavenProject_build\target\SampleMavenJavaProject-0.0.1-
SNAPSHOT.jar to
C:\WINDOWS\system32\config\systemprofile\.m2\repository\com\app\demo\SampleMavenJavaProject\0.0.1-
SNAPSHOT\SampleMavenJavaProject-0.0.1-SNAPSHOT.jar
[INFO] --
[INFO] BUILD SUCCESS
[INFO] --
[INFO] Total time: 23.944 s
[INFO] Finished at: 2024-11-18T15:48:47+05:30
[INFO] --
Archiving artifacts
Triggering a new build of SampleMavenProject_test
Finished: SUCCESS
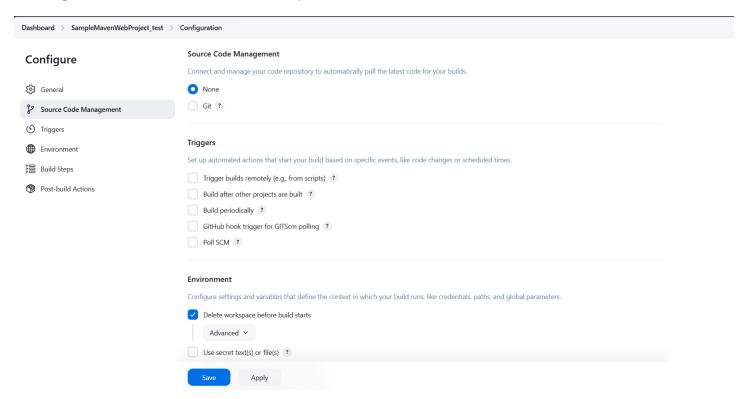
BUILDING THE CI/CD FREESTYLE PIPELINE USING JENKINS FOR MAVEN WEB PROJECT WITH POLL SCM

Configuration of Build for Web Project

Configure

- General
- Source Code Management
- Triggers
- Environment
- **Build Steps**
- Post-build Actions

Automate your build process with ordered tasks like code compilation, testing, and deployment.

Invoke top-level Maven targets ?

Maven Version

(Default)

Goals

clean

Advanced ⌄

Invoke top-level Maven targets ?

Maven Version

(Default)

Goals

install

Advanced ⌄

Save   Apply

Configure

- General
- Source Code Management
- Triggers
- Environment
- Build Steps
- Post-build Actions

○ None

● Git ?

Repositories ?

Repository URL ?

https://github.com/Narra-Puneeth/SampleMavenWebProject.git

Credentials ?

- none -

+ Add

Advanced ⌄

Add Repository

Branches to build ?

Branch Specifier (blank for 'any') ?

*/main

Add Branch

Save   Apply

Configure

- ⚙ General
- ⑂ Source Code Management
- ⏱ Triggers
- 🌐 Environment
- ☰ Build Steps
- 📦 **Post-build Actions**

Post-build Actions

Define what happens after a build completes, like sending notifications, archiving artifacts, or triggering other jobs.
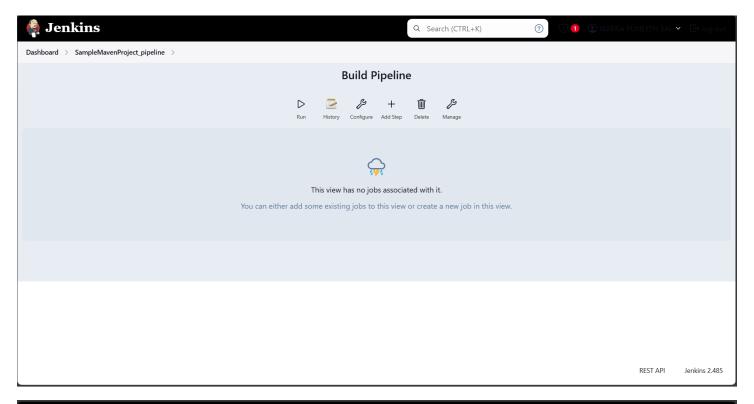
☰ **Archive the artifacts** ?   ✕

Files to archive ?

```
**/*
```

Advanced ⌄

☰ **Build other projects** ?   ✕

Projects to build

```
SampleMavenWebProject_test
```

🔘 Trigger only if build is stable

⚪ Trigger even if the build is unstable

⚪ Trigger even if the build fails

Add post-build action ⌄

[Save] [Apply]

Configuration of tests for Web Project

Configure

- ⚙ General
- ⑂ **Source Code Management**
- ⏱ Triggers
- 🌐 Environment
- ☰ Build Steps
- 📦 Post-build Actions

Source Code Management

Connect and manage your code repository to automatically pull the latest code for your builds.

🔘 None

⚪ Git ?

Triggers

Set up automated actions that start your build based on specific events, like code changes or scheduled times.

☐ Trigger builds remotely (e.g., from scripts) ?

☐ Build after other projects are built ?

☐ Build periodically ?

☐ GitHub hook trigger for GITScm polling ?

☐ Poll SCM ?

Environment

Configure settings and variables that define the context in which your build runs, like credentials, paths, and global parameters.

☑ Delete workspace before build starts

Advanced ⌄

☐ Use secret text(s) or file(s) ?

[Save] [Apply]

Configure

- General
- Source Code Management
- Triggers
- Environment
- **Build Steps**
- Post-build Actions

Build Steps

Automate your build process with ordered tasks like code compilation, testing, and deployment.

☰ Copy artifacts from another project ✕

Project name ?

SampleMavenWebProject_build

Which build ?

Latest successful build ▾

☑ Stable build only

Artifacts to copy ?

**/*

Artifacts not to copy ?

Target directory ?

Save Apply

Configure

- General
- Source Code Management
- Triggers
- Environment
- **Build Steps**
- Post-build Actions

Parameter filters ?

☐ Flatten directories ☐ Optional ☑ Fingerprint Artifacts ☐ Include Build Number ?

Advanced ⌄

☰ Invoke top-level Maven targets ? ✕

Maven Version

(Default) ▾

Goals

test ⌄

Advanced ⌄

Add build step ⌄

Post-build Actions

Save Apply

Configure

- General
- Source Code Management
- Triggers
- Environment
- Build Steps
- **Post-build Actions**

Define what happens after a build completes, like sending notifications, archiving artifacts, or triggering other jobs.

☰ Archive the artifacts ?   ✕

Files to archive ?

```
**/*
```

Advanced ⌄

☰ Build other projects ?   ✕

Projects to build

```
SampleMavenWebProject_deploy
```

- ⦿ Trigger only if build is stable
- ○ Trigger even if the build is unstable
- ○ Trigger even if the build fails

Add post-build action ⌄

Save   Apply

REST API   Jenkins 2.485

Configuration of Deployment for Web Project

Configure

- General
- **Source Code Management**
- Triggers
- Environment
- Build Steps
- Post-build Actions

Source Code Management

Connect and manage your code repository to automatically pull the latest code for your builds.

- ⦿ None
- ○ Git ?

Triggers

Set up automated actions that start your build based on specific events, like code changes or scheduled times.

- ☐ Trigger builds remotely (e.g., from scripts) ?
- ☐ Build after other projects are built ?
- ☐ Build periodically ?
- ☐ GitHub hook trigger for GITScm polling ?
- ☐ Poll SCM ?

Environment

Configure settings and variables that define the context in which your build runs, like credentials, paths, and global parameters.

- ☑ Delete workspace before build starts

    Advanced ⌄

- ☐ Use secret text(s) or file(s) ?

Save   Apply

Configure

- General
- Source Code Management
- Triggers
- Environment
- **Build Steps**
- Post-build Actions

Build Steps

Automate your build process with ordered tasks like code compilation, testing, and deployment.

☰ Copy artifacts from another project ✕

Project name ?

SampleMavenWebProject_test

Which build ?

Latest successful build ▼

☑ Stable build only

Artifacts to copy ?

**/*

Artifacts not to copy ?

Target directory ?

Save   Apply

Configure

- General
- Source Code Management
- Triggers
- Environment
- Build Steps
- **Post-build Actions**

Define what happens after a build completes, like sending notifications, archiving artifacts, or triggering other jobs.

☰ Deploy war/ear to a container ✕

WAR/EAR files ?

**/*.war

Context path ?

SampleMavenWebProject

Containers

☰ Tomcat 9.x Remote ✕

Credentials

robot/****** ▼

+ Add

Tomcat URL ?

http://localhost:8080
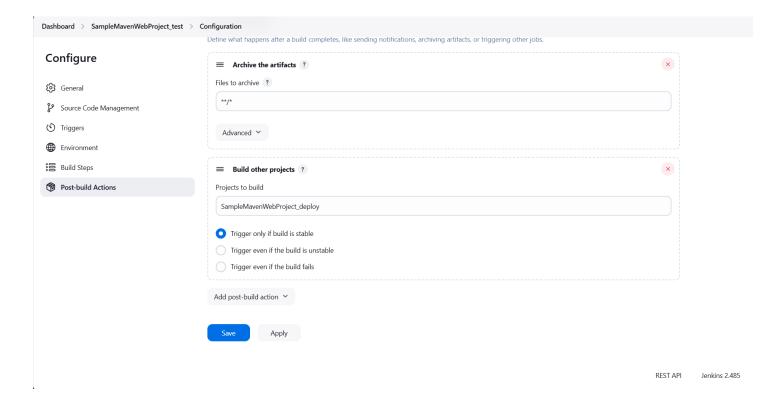
Advanced ⌄

Add Container ⌄

☐ Deploy on failure

Add post-build action ⌄

Save   Apply

Configuration of View for Web project

Build History

Edit View

Delete View

Project Relationship

Check File Fingerprint

Manage Jenkins

My Views

Build Queue

No builds in the queue.

Build Executor Status   0/2

Name

SampleMavenWebProject_pipeline

Description

Describe the purpose of this view.

Plain text Preview

Build Pipeline View Title

Pipeline Flow

Layout

Based on upstream/downstream relationship

This layout mode derives the pipeline structure based on the upstream/downstream trigger relationship between jobs. This is the only out-of-the-box supported layout mode, but is open for extension.

Upstream / downstream config

Select Initial Job   ?

SampleMavenWebProject_build

Trigger Options

Save   Apply

Jenkins

Search (CTRL+K)   NARRA PUNEETH SAI   log out

Dashboard   >   SampleMavenWebProject_pipeline   >

Build Pipeline

Run   History   Configure   Add Step   Delete   Manage

Pipeline #9	#9 SampleMavenWebProject_build	#7 SampleMavenWebProject_test	#9 SampleMavenWebProject_deploy
	Nov 23, 2024 11:58:20 AM	Nov 23, 2024 11:58:37 AM	Nov 23, 2024 11:58:47 AM
	10 sec	2.5 sec	0.66 sec
	puneeth		

REST API   Jenkins 2.485

BUILDING THE CI/CD SCRIPTED PIPELINE USING JENKINS FOR MAVEN JAVA PROJECT WITH POLL SCM

Advanced Project Options

Advanced ∨

Pipeline

Definition

Pipeline script ∨

Script ?

```
1  pipeline {
2    agent any
3    tools {
4      maven 'maven'
5    }
6    stages {
7      stage('git repo & clean') {
8        steps {
9          // bat "rmdir  /s /q SampleMavenJavaProject"
10         bat "git clone https://github.com/Narra-Puneeth/SampleMavenJavaProject.git"
11         bat "mvn clean -f SampleMavenJavaProject"
12       }
13     }
14     stage('install') {
15       steps {
16         bat "mvn install -f SampleMavenJavaProject"
17       }
```

☑ Use Groovy Sandbox ?

Pipeline Syntax

Save   Apply

Dashboard > DeclarativePineline_MavenJava >

- Status
- Changes
- Build Now
- Configure
- Delete Pipeline
- Stages
- Rename
- Pipeline Syntax

✓ **DeclarativePineline_MavenJava**   ✎ Add description

Permalinks

- Last build (#16), 55 sec ago
- Last stable build (#16), 55 sec ago
- Last successful build (#16), 55 sec ago
- Last completed build (#16), 55 sec ago

Builds

🔍 Filter   /

Today

✓ #16 12:32 PM   ∨

November 19, 2024

✓ #10 4:13 PM   ∨

REST API   Jenkins 2.485

Search (CTRL+K)

NARRA PUNEETH SAI ∨   log out

Dashboard > DeclarativePineline_MavenJava >

| Status |
| Changes |
| Build Now |
| Configure |
| Delete Pipeline |
| Full Stage View |
| Stages |
| Rename |
| Pipeline Syntax |

Builds

Filter

Today

✓ #18 12:47 PM ∨
✓ #17 12:45 PM ∨
✓ #16 12:32 PM ∨

November 19, 2024

DeclarativePineline_MavenJava

Add description

Stage View

	Declarative: Tool Install	git repo & clean	install	test	package
Average stage times: (Average full run time: ~20s)	159ms	4s	5s	3s	4s
#18 Nov 23 12:47 No Changes	110ms	4s	5s	4s	4s
#17 Nov 23 12:45 No Changes	127ms	4s	5s	3s	4s
#16 Nov 23 12:32 No Changes	319ms	4s	8s	3s	3s
#10 Nov 19 16:13 No Changes	81ms	3s	4s	3s	3s

Permalinks