

Phase 3

Total session 9

Spring framework and Spring boot, Unit testing, Rest full web service and micro service using Spring framework/spring boot

Day 9

3 or 2

Login

Emailed or username as pk

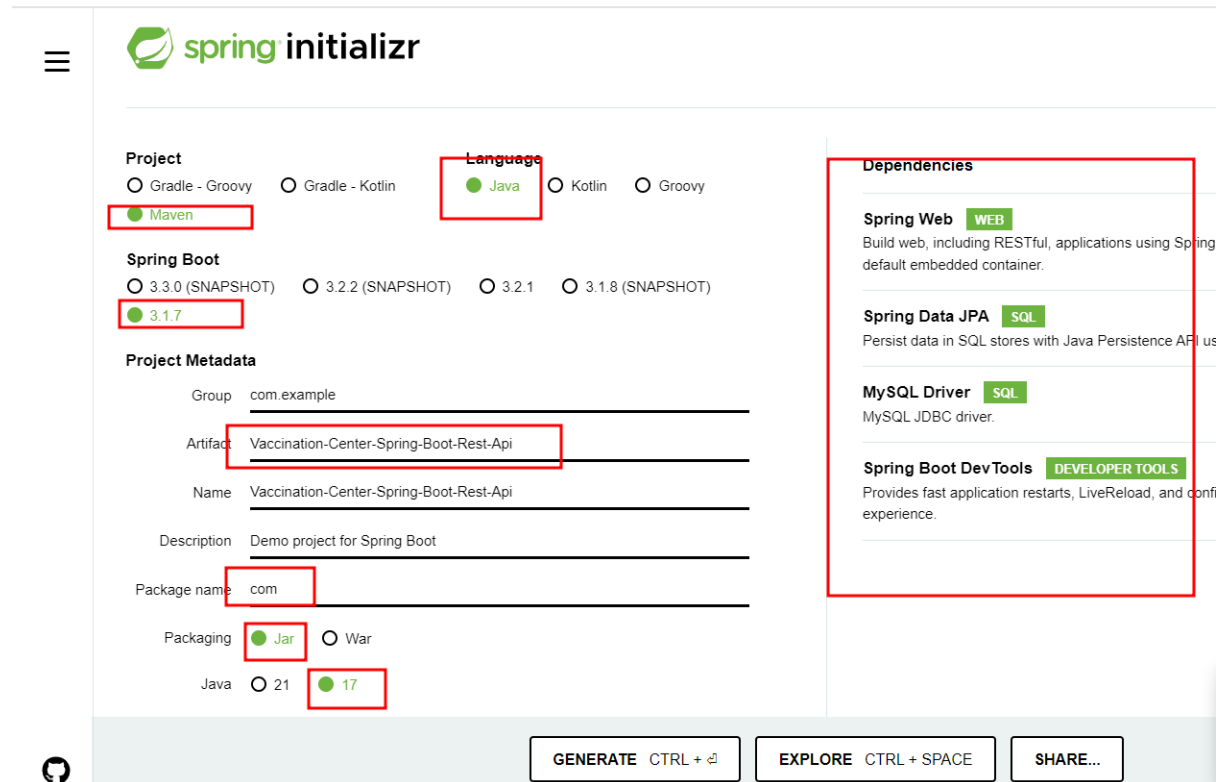
Password

Citizens table

cid	1	PK
cname	Ravi	
age	21	
gender	Male	
mobile	9901122	
city	Bangalore	
state	Kar	
pincode	560096	

VaccinationCenter

VCId	100	101	PK
HCName	HSBLayout	Nandini Layout	
Vcname	1 st Vacicine,	2 nd Vaccine	
Dateandtime	20-Mar-2020	18-Dec-2022	
cid	1	1	FK



The image shows the Spring Initializr web form for creating a new project. The form is divided into several sections: Project, Language, Spring Boot, Project Metadata, and Dependencies. The Project section has radio buttons for Maven (selected), Gradle - Groovy, Gradle - Kotlin, and Language (selected). The Language section has radio buttons for Java (selected), Kotlin, and Groovy. The Spring Boot section has radio buttons for 3.3.0 (SNAPSHOT), 3.2.2 (SNAPSHOT), 3.2.1, and 3.1.8 (SNAPSHOT), with 3.1.7 selected. The Project Metadata section has text input fields for Group (com.example), ArtifactId (Vaccination-Center-Spring-Boot-Rest-API), Name (Vaccination-Center-Spring-Boot-Rest-API), Description (Demo project for Spring Boot), Package name (com), Packaging (Jar selected), and Java (17 selected). The Dependencies section lists Spring Web (WEB), Spring Data JPA (SQL), MySQL Driver (SQL), and Spring Boot DevTools (DEVELOPER TOOLS). At the bottom, there are buttons for GENERATE (CTRL + G), EXPLORE (CTRL + SPACE), and SHARE....

Project

☒ Maven ☐ Gradle - Groovy ☐ Gradle - Kotlin ☒ **Language** ☐ Kotlin ☐ Groovy

Spring Boot

☐ 3.3.0 (SNAPSHOT) ☐ 3.2.2 (SNAPSHOT) ☐ 3.2.1 ☐ 3.1.8 (SNAPSHOT) ☒ 3.1.7

Project Metadata

Group

ArtifactId

Name

Description

Package name

Packaging ☒ Jar ☐ War

Java ☐ 21 ☒ 17

Dependencies

Spring Web **WEB**
Build web, including RESTful, applications using Spring default embedded container.

Spring Data JPA **SQL**
Persist data in SQL stores with Java Persistence API us

MySQL Driver **SQL**
MySQL JDBC driver.

Spring Boot DevTools **DEVELOPER TOOLS**
Provides fast application restarts, LiveReload, and confi experience.

GENERATE CTRL + G **EXPLORE** CTRL + SPACE **SHARE...**

Micro service : we are developing small – small modules those modules we deploy independently.

Those modules can be develop using java or any other technologies. Database can be same or different. These micro service are communicating with each other via rest api call.

Spring boot provided **eureka server** which help to deploy more than one micro service created using spring boot.

1st step : we need to create spring boot project with eureka server and web starter to run eureka server.

2nd you need to create spring boot project as micro service project with **eureka client** and other starter like web, jdbc, jpa etc.

3rd you need to create spring boot project as micro service project with **eureka client** and other starter like web, jdbc, jpa etc.

4th you need to create spring boot project as micro service project with **eureka client** and other starter like web, jdbc, jpa etc.

Creating Eureka Server spring boot project

Imported From Fire... Post Attendee - Zoo...

spring initializr

Project
☐ Gradle - Groovy ☐ Gradle - Kotlin ☒ **Java** ☐ Kotlin ☐ Groovy
☒ **Maven**

Spring Boot
☐ 3.3.0 (SNAPSHOT) ☐ 3.2.2 (SNAPSHOT) ☐ 3.2.1 ☐ 3.1.8 (SNAPSHOT)
☒ **3.1.7**

Project Metadata
Group: com.example
Artifact: **eureka-server**
Name: eureka-server
Description: Demo project for Spring Boot
Package name: com
Packaging: ☒ **Jar** ☐ War
Java: ☐ 21 ☒ **17**

Dependencies
Spring Web **WEB**
Build web, including RESTful, applications using Spring MVC. Uses Apache Tomcat as the default embedded container.
Eureka Server **SPRING CLOUD DISCOVERY**
spring-cloud-netflix Eureka Server.

ADD DEPENDENCIES... CTRL + B


GENERATE CTRL + G | **EXPLORE** CTRL + SPACE | **SHARE...**

2nd you need to create spring boot project as micro service project with eureka client and other starter like web, jdbc, jpa etc.

Whenever we are going to deploy spring micro service project by default it will search on default port number of eureka server. By default eureka server port number is **8761**

Now we need to create eureka client application with below starter

! From Fire... 2/19 Post Attendee - Zoo...

 **spring** initializr

Project
☐ Gradle - Groovy ☐ Gradle - Kotlin ☒ **Java** ☐ Kotlin ☐ Groovy
☒ **Maven**

Spring Boot
☐ 3.3.0 (SNAPSHOT) ☐ 3.2.2 (SNAPSHOT) ☐ 3.2.1 ☐ 3.1.8 (SNAPSHOT)
☒ **3.1.7**

Project Metadata
Group
Artifact
Name
Description
Package name
Packaging ☒ **Jar** ☐ War
Java ☐ 21 ☒ **17**

Dependencies ADD DEPENDENCIES... CTRL + B

Spring Web WEB
Build web, including RESTful, applications using Spring MVC. Uses Apache Tomcat as the default embedded container.

Eureka Discovery Client SPRING CLOUD DISCOVERY
A REST based service for locating services for the purpose of load balancing and failover of middle-tier servers.

GENERATE CTRL + G

EXPLORE CTRL + SPACE

SHARE...

