### PODTEST.IN

**Learning Platform for Aspiring SDET's** 

#### Table of Content:

- Full-Stack Bootcamp Overview [Page 3]
- ➤ Who can Enroll?[Page 4]
- What is Alumni Status & its Benefits [Page 5]
- Bootcamp class details [Page 6]
- ➤ High Level Syllabus [Page 7]
- Course Instructor details & experience [Page 8 -9]
- Detailed Syllabus of all 30 modules page-wise [Page 10 -39]
- Bootcamp Learning Schedule [Page 40]
- Bootcamp Registration process [Page 41]
- Pricing & payment details [Page 42]

### Full-Stack Bootcamp

- World's first Real 'Full-Stack' Bootcamp.
- Most affordable program in the entire Industry [Check the last 3 slide for the Registration process, pricing & payment details]
- Covering 30 Different modules as part of this bootcamp.
- Enrolment into the program would be based on Invitations.
- https://podtest.in : Register using our website for the program & we will personally reach out to you to check your needs, explain the syllabus, advantages & when you get satisfied only then initiate payment process.





### Who can Enroll?

- Since every module is covered from scratch.
- Suited for people with below needs:
  - Switching Career to Software Testing
  - Freshers/Intern
  - People in Manual Testing, wanting to switch to Automation Testing
  - Automation Engineers looking to become Full-Stack
  - People with career gap







- Alumni Status & Advantage: Enrolled Students will get access to all present & future recorded courses ever made on PodTest.in
- Currently we have high-quality in-depth recorded course for Java Basics, Selenium, HTML, CSSPath, XPath, DOM, Maven, TestNG, Git. [You will get access to them the next day you get enrolled.]
- As & when new modules are developed & created, those will also be made accessible to the students.
- It means, once you buy this course, you may never need to buy anything else.

\*[This benefit will be provided to first few candidates only, so as quickly you get enrolled you become eligible for this benefit]





### **Bootcamp Detai**

- Daily Live classes [Monday to Friday 7PM-9PM IST]
- Batch[Online] starts on: 4<sup>th</sup> March 2024
- Saturday Doubt Session 2 hours
- Duration of the course: 6-9 Months
- Work on **Real-time projects**: 10+ Projects
- Access to Code base for all the different modules
- <u>Live Class Recording</u> will also be provided to everyone, so that even if you miss the live class, you can watch it later at your convenient time.
- Access to Recorded Courses: [Only applicable for first few candidates, When we will reach out to you, do check from us, whether you would be part of this benefit or not?]



### High Level Syllabus

- <u>Languages covered</u>: Java, JavaScript
- Web Automation tools covered: Selenium[Java], Cypress [JavaScript], Webdriver.io [JavaScript], Playwright[JavaScript]
- API Automation covered: RestAssured[Java], Postman
- Performance Testing: Jmeter
- Mobile Automation: Appium [Java] | Android | iOS
- **Database Testing: SQL scripts, JDBC Connection**
- CI/CD: Git, GitHub, Jenkins, maven
- **Cloud Infrastructure: AWS**
- Containerization: Docker
- Reporting: TestNG, Cucumber, Allure
- Linux
- Interview preparation for all the included modules

\*Detailed Syllabus for individual module mentioned in respective slides, do check out the coverage.







#### About Our Mentor

- Akhil Jain will be the course instructor for this bootcamp.
- IIM Lucknow Alumni, CFA Level 1, AWS Cloud Practitioner certified, ISTQB certified.
- He has 13+ years of working experience as Automation Engineer.
- Worked on Java & JavaScript based tech-stack to build frameworks from scratch.
- Worked on Web, Mobile, API, Performance, Database, System Testing.
- Currently working on System automation testing which involves automating Installation, Upgrade, Backup/Restore for telecom systems using Linux shell scripting, Docker, AWS, EKS, GRE, Kubernetes, Jenkins.
- Have skillset on Java, JavaScript, Selenium, Webdriver.io, Cypress, Playwright, Postman, RestAssured, Appium, Jmeter, Jenkins, Linux, AWS, etc..
- Have taught more than 1000+ aspiring SDET's. [Check the next slide to know about the platforms on which he is currently teaching]
- <u>LinkedIn Profile</u>: <a href="https://www.linkedin.com/in/akhil-jain-podtest/">https://www.linkedin.com/in/akhil-jain-podtest/</a>





### Teaching on Platforms

- GeeksforGeeks: 'Java with Selenium' Bootcamp
  - Bootcamp link: Currently running the fifth batch SDET5.

https://www.geeksforgeeks.org/courses/complete-guide-to-software-testing-automation

- TheTestTribe: Recorded course of 30+ hours on Java, Selenium, Maven, TestNG, Git, Framework Design, Jenkins CI/CD.
  - Already 450+ students enrolled in the program.
  - Course link: <a href="https://www.thetesttribe.com/courses/selenium-course/">https://www.thetesttribe.com/courses/selenium-course/</a>
- Corporate trainer: Conducted Trainings for multiple MNC's.
- YouTube channel: Regular uploads of Automation testing related videos.
  - <u>https://www.youtube.com/@podtest</u> [Do Subscribe us for latest updates]
- Podtest.in: Free Automation Architecture Bootcamp
   Happens every Sunday for 2 hours, if interested register using the our website <a href="https://podtest.in">https://podtest.in</a>





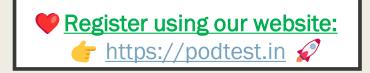




- Installation
- JDK, JRE, JVM
- Data types: Primitive , Non-Primitives
- Scoping: Local, Instance, Static
- Operations: Arithmetic, Logical, Relational
- Conditional logics: If-Else, For, while, Switch
- Classes, Objects, This keyword, Constructors, Methods
- Interfaces & Abstract Classes
- OOPS: Abstraction, Encapsulation, Inheritance, polymorphism[Overloading, overriding]
- Access Modifiers: Default, Private, Public, protected
- Arrays & its operations
- String & its methods
- Exception Handling: Try-catch-finally, throws. Checked vs unchecked exceptions.
- Collections Framework: Set, Map, List, Arrays, Collections
- Comparable, Comparators, Hash Code, Equality etc.
- Working with File systems
- Working with Streams, Date Time
- Working on Threading
- Lambdas & Streams







- Installation
- Architecture understanding
- Selenium Grid
- WebDriver Browser commands & its capabilities.
- Elements related commands, working with different elements & Action Class
- Wait Mechanisms
- Handle Iframes, Popups, Windows, Tabs
- Shadow DOMs, File uploads, JavaScript executor, Screenshot capturing, WebTables related operations







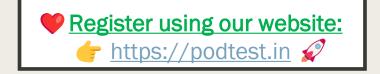


- Installation
- Maven Hierarchy: Lifecycle -> Phases -> Plugins -> Goals
- Understanding Lifecycle: Clean, Build
- Different configuration files: pom.xml, settings.xml
- Different types of Repositories
- How Maven works
- Adding dependencies
- Adding Plugins configuration
- Profiling
- Need of Target folder
- Maven CLI
- Adding custom properties
- Running testcases via Maven
- Surefire report plugin





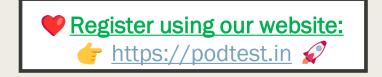




- Installation
- Need of TestNG, Understanding Testing process
- TestNG.xml file
- Hierarchy understanding: Suite -> Test -> Groups -> Class -> Methods
- Create testcase using @test annotation
- Using Before & After Hooks for each level.
- Test Data Management using Data Provider
- Parameterization
- Parallel Execution
- Cross-Browser Testing
- Generating Execution reports
- Adding custom listeners.
- Attaching logs, screenshots, exceptions to the report







- What is SQL & learn the structure of it.
- Select, from, where, distinct
- Different types of joins: Inner Join, Left, Right, Outer
- Grouping, having clause
- Insert, update delete queries
- Learn to write Sub-queries
- Setting up JDBC connection to run SQL scripts via automation scripts
- Database testing using SQL





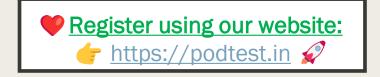




- Installation
- File lifecycle in Git, different stages involved.
- Important files in Git: .gitignore, readme.md
- Create a Git Repository
- Cloning a project
- Forking a project
- Working with branches: creation, switching, etc.
- Updating a branch with latest changes
- Pushing local changes to remote
- Merge branches & resolve merge conflicts.
- Git commands: init, clone, remote, branch, checkout, add, commit, push, pull, log, merge



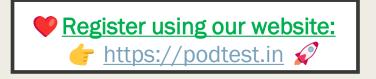




- Account Creation
- Creating a Repository.
- Types of repositories: Private/ Public
- Controlling the access to the users
- Creating a beautiful Readme.md file
- Creating branching strategies.
- Defining the rules for merging the branches
- Review commit changes & approval process
- Sharing review comments & incorporating the comments.



#### Design Patterns



- Page Object Model [POM]
- Singleton pattern
- Factory pattern
- Others







- Installation
- Architecture understanding
- Types of mobile apps: Web, Native & Hybrid
- Android studio, Xcode setup.
- Working on Real Devices & Emulators
- Working on Android, iOS apps
- Working with Appium Inspector
- Automating gestures, handling waits
- Framework Design: POM, TestNG, Appium Service, capabilities, etc.







- Node.js installation
- Npm package usage
- Different data types in JavaScript
- Declaring variable via let, const, var
- Functions: normal, anonymous, arrow, callback, first-class function
- Array & its methods
- String & it's operations
- For loop, If-else, while, Switch
- Import/Export modules
- Async operation handling: async/await, then clause
- Promises: Creation, Consuming, States, Chaining, all
- Concepts clarity on: Call stack, Microtask queue, CallStack queue, Execution context, Hoisting, Closures, lexical environment, Temporal Dead Zone, Global Execution Context, Inversion of control, Callback Hell





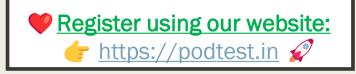
### Register using our website: https://podtest.in



- Installation
- Architecture understanding
- Boiler plate code
- Setup types, Automation protocols, Auto-waiting
- Configuration: Driver setup & capabilities
- Working with different types of Selectors
- **Handling Timeouts**
- **Understanding Configuration file & Runner types**
- Mocha Assertion library, Jasmine for test case creation
- Grouping test specs
- Understanding sharding
- Integration with Jenkins
- Generate Allure Report



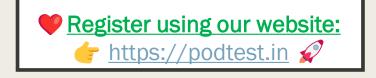
# Register using our website: https://podtest.in



- Installation
- Architecture understanding
- Working with different web elements & locators
- Trace viewer
- **Test Configuration**
- Working with Fixtures
- Sharding, Handling timeouts
- **Understanding Auto-waiting**
- **Assertions**
- Designing framework



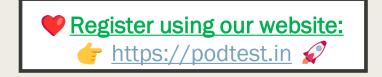




- Installation
- Architecture understanding
- Test Runners
- Generating folder structure
- Working with different web locators
- Using hooks, fixtures
- Configuration files
- Generating test report
- Framework design





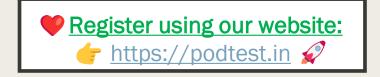


- Installation of Linux OS via Virtual Box.
- Linux: History, versions & different flavours & comparison with Windows machine
- Understanding Linux file system
- Working with file management system
- Files & Directory CRUD: chmod, touch, rm, cat, less, more, head, tail, mv, copy
- Working on data: grep, pipe
- Work with vi Editor
- Switch users & sudo access
- Shell scripting basics: variable creation, if-else, for loop, methods
- Connecting to linux via CLI using ssh command
- Copy content from one machine to another using scp.
- Linux repositories & how to install softwares on Linux.









- Installation
- Using Docker Images.
- Creating containers from images & setting up connection between multiple containers
- Volume mapping of docker with underlying OS.
- Using Docker as agent machine in Jenkins pipeline
- Running your Automation framework inside Docker container via Selenium & installing browser inside it to perform the execution.





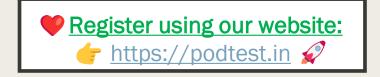


- **Account Creation**
- Using AWS Free tier
- Connecting to AWS via UI, CLI.
- EC2: Creating a EC2, what is base image, how to connect to EC2 via UI & CLI
- Use EC2 as a Agent machine to run Jenkins pipeline.
- S3 bucket: how to create S3 bucket & add objects to it via CLI & UI.
- How to host your Allure Report using S3 bucket & share with stakeholders







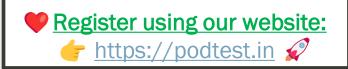


- Installation
- Types of Performance Testing
- Test Plan, Thread Group, Group & Steps in Jmeter
- Script recording
- Execution order of JMeter Elements
- Logic Controller: Simple, Random, Loop, If, Only once, Runtime, module controller
- Config Elements: HTTP default, cookie & cache manager, user defined variables, CSV data etc.
- Assertion, listener elements & pre & post processors
- Debugging & Correlation
- Test Data preparation
- Test Script preparation
- Test Execution
- Test Reporting
- Run JMeter scripts via CI/CD pipeline.





## Register using our website: https://podtest.in



- How API's work?
- Meaning of Different response codes.
- Working with different API methods: GET/POST/PATCH/PUT/DELETE etc.
- Parameters & API body.
- Performing authentication using API
- Microservice vs Monolithic architecture
- Rest API's Understanding





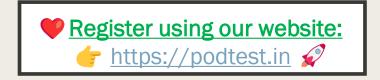
#### Rest Assured



- Framework Setup
- Learn Rest Assured library
- POJO, Serialization, Deserialization
- Working with JSON Response: Simple & Complex
- Learn writing JSONPath expression
- Learn Hamcrest usage
- Work with HTTP Methods
- Work with Query Params, Path Param
- Working with Headers & Cookies
- Validate Response Status & Body
- Authentication & Authorization
- Convert JSON to POJO







- Installation
- Workspace, collections, logs, console
- Environment variables: Local, Global
- Settings configurations
- Response status, body validation & extraction via JavaScript
- API Chaining
- Proxy, Certification & SSL
- Parameterization & API Body formation
- Working with different HTTP methods
- Report Generation
- Newman CLI: running testcases







- Installation
- Agent Machines & Configurations understanding.
- **Creating Free Style Jobs**
- Creating pipelines
- On-demand & Scheduling based execution
- Dynamic scripting samples
- Create CI/CD pipeline for Automation framework execution using Jenkins, Github, Docker, AWS.
- Attaching
- Creating branching strategies.
- Defining the rules for merging the branches
- Review commit changes & approval process
- Sharing review comments & incorporating the comments.





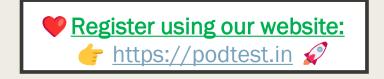


- Recursion, Slicing Window, Frequency Counter, LIFO, FIFO
- Search Algorithms: Linear, Binary search
- Sorting Algorithm: Bubble, Selection, Insertion, Merge Sort
- Data Structures: Stack, Queue, Singly Linked List, Doubly Linked List, Binary Search Tree.
- Languages covered for DSA: Java & JavaScript









- Installation
- Implement Allure Report in the framework.
- Attach screenshots to the report
- Attach the test case logs to the report
- Generate execution report.
- Attach report with CI/CD pipeline
- Share the report with stakeholders [Implementing AWS S3 bucket usage]





#### Framework utilities

- Data Driven testing via reading data from Excel sheets
- Implementing logging framework like log4j2
- Configuring properties files
- Creating custom execution reports
- JDBC Connection setup
- Designing a unified framework covering Web, API & Mobile Automation
- Using POM pattern to design framework.
- CI/CD integration using Jenkins, GitHub, maven
- Cross Browser & Parallel Execution capabilities.





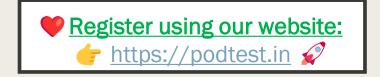




- What is BDD?
- Gherkin Syntax: Feature, Scenario, Scenario-outline, examples, Given, When, Then, And, But, Datatable, Tags
- Creating feature file, Step definition files & Runner files
- Integrating Cucumber with TestNG
- Cucumber Hooks: Global, Conditional, Scenario, Step
- Running testcases based on tags i.e. grouping, Tag Inheritance
- Generating Cucumber execution reports
- Attaching cucumber reports in Jenkins







- What is HTML?
- How HTML works?
- Why as Automation Engineer, we should know about HTML
- Tags understanding: Input, div, span, button, body, head, html, p , h1, a, img, script, iframe, svg, shadow, list, webtable etc.
- Attributes understanding & how to read them.







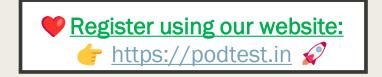


- Need of CSS
- How Styling gets applied on a web page using CSS?
- Stylesheets & inline css
- Learn writing CSS Path: Id, classname, attributes, descendants, immediate childs, Indexing, partial attributes, prefix, suffix, immediate siblings, following-siblings, ignore cases, multiple attibutes, grouping.







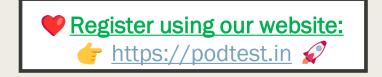


- What is Document Object Model?
- How it works & why it is important for Automation engineers to know about it?
- How HTML gets converted to DOM structure?
- Document object
- Using DOM methods to write Javascript code to perform operations on UI Automation
- Understanding nodes & its relationship with other nodes.
- DOM Methods: queryselector, getElementByld, etc...
- Use Browser console to learn working with DOM









- What is Xpath?
- Types of Xpath: Absolute & Relative
- Learn using attributes: id, name, class etc...
- Working with text()
- Methods covered: contains, starts-with, normalize-space
- Grouping & indexing
- Axes methods: following, ancestor, child, preceding, following-sibling, parent, self, descendant





### JSON Path



- How to traverse JSON Data?
- Useful in extracting data from API Response
- Operators: Root node, child node, deep scan
- Indexing handling
- Slice operations
- Filter expressions
- Working with multiple expression && || in nin size



### Learning Schedule

- [March, April]: Git, Github, Java & DSA
- [May, June, July] Selenium, HTML, CSS, Xpath, DOM, Maven, TestNG, Jenkins, CI/CD, Cucumber, Allure
- [July, August]: API Testing: Rest Assured, PostMan, JSON Path
- [August]: Mobile Testing: Android | iOS using Appium
- [September]: Performance Testing: Jmeter
- [September, October]: Linux, Docker, AWS
- [October]: JavaScript & DSA
- [November, December]: WebDriver.io, Cypress, Playwright





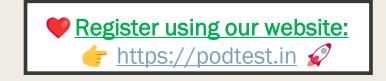
### **Registration Process**

- Visit website https://podtest.in
- Click on 'Register' Button for 'Full Stack Bootcamp'.
- Google form will open up, fill up the asked details.
- Once registered, we will contact you personally in 24 hours on your provided contact details.
- Will understand your needs & explain what we are offering, only once you are satisfied will initiate the payment process.
- We encourage everyone to compare our course syllabus, duration, topics, projects, pricing, access to recorded live classes & recorded courses with any other vendor. Once you are satisfied only then enrol.









- We have tried our best to make this program the most affordable in the entire industry considering the duration, depth of topics, access to recorded live lectures, Access to our recorded courses, Real time projects, Interview preparation & our expenditures.
- Our Price is (Rs 20,000/ +GST).
- Consider this as a Investment for your career growth.
- This may open up new opportunities in form of Salary Hike, Job Switch, Promotions.
- Other Vendors are charging around Rs 300,000 for half the curriculum we are covering, we encourage you to do your due diligence & compare our course, offerings, benefits & cost with the similar course provided by our vendors & once Satisfied, only then enrol.
- Make a informed & a wise decision. [Looking forward to have you in the course]
- In case of queries, please reach out on LinkedIn or through our email address



\* T&C Applied

