Selenium Web Driver with Java Basics

Course description

The tutorials are designed for beginners with little or no automation experience. Selenium provides a record/playback tool for authoring tests without the need to learn a test scripting language (Selenium IDE).Selenium created a new revolution in the automation testing industry. Selenium is open source, free of cost. It is a very powerful tool for automating our web based applications. Selenium supports Java, Ruby and few other languages but Java is most commonly used in Selenium. Selenium is a popular open-source web based automation tool.

Student Take away

- Study Material
- Learning stuff
- Sample project for practice

Selenium Web Driver with Java Basics online training curriculum

Introduction to Automation testing

- What is automation testing?
- What is the use of automation testing?
- What do we need to automate?
- What is selenium?
- Advantages of selenium
- Difference between selenium and QTP

Different flavours of selenium

- Selenium IDE (Integrated Development Environment)
- Selenium RC (Remote Control)
- Selenium Grid
- Selenium Web Driver/Selenium 2.0

Selenium IDE Introduction

- Features of Selenium IDE
- Installing Selenium IDE
- Selenium IDE icons
- Recording your first test with Selenium IDE

Locators

- How to identify elements in webpage using selenium
- Tools to identify elements / objects
- Firebug
- IE Developer tools

Locators Continues...
- Google Chrome Developer tools
- Locating elements by ID
- Finding elements by name
- Finding elements by link text
- Finding elements by Xpath
- Finding elements by using CSS
- Summary

Selenium IDE Concepts
- IDE Context Menu
- Asserting the elements
- Verifying the elements
- Wait For elements
- Storing the elements
- Adding Selenium IDE comments
- Building test cases using Selenium IDE
- Synchronization commands
- Working on pages with AJAX
- Creating test suites
- What you cannot record?

Some special IDE commands
- Go Back
- Refresh
- Enter key simulation
- Mouse over
- Highlight write your own Selenium IDE script without record and playback

Selenium remote control
- What is Selenium remote control?
- Overview of Selenium remote control using JAVA
- Downloading Selenium RC
- Installing Selenium RC
- Starting selenium server from command prompt
- Stopping selenium server from command prompt and browser
- Running selenium scripts /tests from command prompt using selenium RC

Selenium RC using Eclipse
- Set up Selenium RC in Eclipse using J-unit
- Starting Selenium RC from Eclipse
- Stopping Selenium RC from Eclipse
- Start and stop Selenium RC from Selenium Script
- Convert selenium IDE tests to a programming language (JAVA)
- Running Selenium script in different browsers with Eclipse and JUNIT
- Sample programs in RC for: Basic elements

JUNIT
- Junit Annotations
- Junit Methods
- Test Suites using JUNIT
- Report Using ANT Build and Junit

TestNG
- How to install TestNG plug-in in Eclipse?
- TestNG sample script
- Writing selenium testing script from scratch
- Creating test suites using TestNG
- Reports generation using TestNG

➢ **ADVANCED TOPIC**

Object Repository
- Use of object repository
- How to use OR in scripts
- Sample scripts using object repository

Maven
- What is Maven?
- Use of Maven
- Configure Maven with eclipse
- Take automatic updates
- How to run tests using Maven
- Create POM.xml file

Introduction to Web Driver Selenium 2.0
- Introduction
- Selenium RC and Web-driver
- Downloading and configuring web-driver in eclipse
- Drivers for Firefox, IE and HTML Unit driver
- First selenium web-driver code

Sample programs in web driver
- Text box
- Link
- Button
- Checkbox
- Radio button

Dropdown
- Select value
- Display all values
- Write all values into notepad/excel/wordpad

Capture screenshot (positive)
- Handling on load alerts
- Page scroll down using java-script
- HTML Unit driver
- Handling multiple windows
- Implicit wait
- Handling AJAX auto suggestions
- Handling web tables

Action Class
- Draggable
- Droppable
- Mouse over
- Selectable
- Simulating right click
- Slider

Functions
- Writing common functions
- What is a function?
- Use of a function
- How to reuse?
- Writing web driver functions

Sikuli
- Introduction
- Handling Flex/Flash buttons
- Sikuli and web driver integration

Customized Framework
- What is frame work?
- Use of frame work
- Frame work using object repository and functions
- What are different types of packages in frameworks
- How to create reports?

Selenium Grid
- Introduction
- Running same script in two different browsers
- Running different scripts in two different browsers