SYLLABUS

**JAVA +Selenium**

\*\*\*\*\*\*\*\*\*\* **JAVA**  \*\*\*\*\*\*\*\*\*\*

Introduction \*

Installation of java and eclipse \*

**Eclipse** :

Configuring Eclipse \*

How to Write & compile Java programs \*

Debug java code

Run Java code \*

Write and Execute sample java programs : Hello world!!! \*

**Core Java :**

Data types \*

Control flow : if / else, switch, do-while, for, break, continue. \*

Arrays \*

Java Method \*

Access modifier : public, private, protected, default. \*

Packages and import

Classes & objects \*

Constructor \*

Static : method and variable \*

Oops concepts :

Abstraction

Polymorphism \*

Encapsulation

Inheritance \*

Method overloading & Method overriding

Local and global variables

Exception Handling : Try catch finally

Interface

Collections

Assert

Return statement

File handling

\*\*\*\*\*\*\*\*\*\* **WEBDRIVER**  \*\*\*\*\*\*\*\*\*\*

Automation need :

Why

When

How

**TestNG** :

Introduction

Configuring TestNG

Annotations

Composing tests

Assertions

Generating reports

**Basics of Selenium** :

Introduction

Why selenium

Selenium Vs Other automation tool (QTP)

Selenium components

Selenium Core

Selenium IDE

Selenium RC (1.0)

Selenium Webdriver (2.0)

Selenium Grid

**Selenium IDE :**

Introduction

IDE features

Installing & configuring IDE

Inspecting elements in IDE

Recording and playback the scripts

Building test cases

Running test cases

**Selenium Webdriver (2.0) :**

Introduction

Configuring Webdriver with Eclipse

Create project

Create and run tests

Executing tests on multiple browsers Debugging tests

IE

Firefox

Chrome

Using locators (Id, Class, Name, xpath, css etc)

Choosing locating Strategies

Handling Security popups / Alerts / Dialog boxes

Error Handling

Working with various Web Elements

Buttons

Input boxes

List

Links

Radio buttons

Check boxes

Comboboxes /dropdowns

**Advanced Selenium Webdriver :**

Complex xpath construction(relative xpath, xpath for tables)

Attachment using native window

Handling iFrame/Frame

File Upload/Download

Screenshots

UI Mapping/Object Map

Data Handling

Parameterization

Waits in Selenium

Implicit wait

Explicit wait.

**Automation Framework :**

What is Automation Framework?

Data Driven Framework

Keyword Driven Framework

Hybrid Framework

Page Object Model

Reading the data from external files (Excel)

Executing test in parallel using Selenium and TestNG

Hands on experience

Advanced Automation Framework Understanding