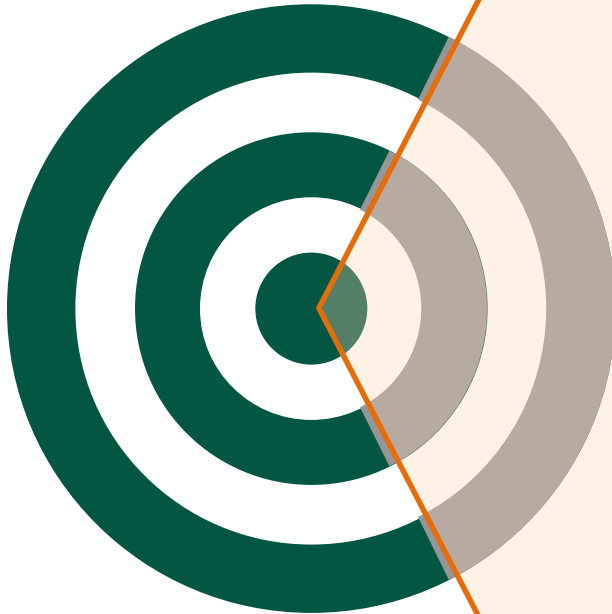


Selenium Automation Testing

Training for State Street





In this session, you will learn about:

- Understand Selenium Suite
- Understand Selenium IDE environment
- Create first test using Selenium IDE

What is Selenium?



What is Selenium?

- Selenium automates web browsers
- Used for testing
- Create automated scripts to easily and continually test web applications

- Selenium IDE – “record and run”
- Selenium RC Server – perform tests on local server (deprecated)
- Selenium WebDriver – writing robust test scripts
- Selenium Grid – efficiently performs test on various environments

- Selenium IDE – “record and run”
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Selenium IDE



- Plugin for Firefox
- Records actions we take on browser
- Runs tests based on those recordings
- Manually modify test cases

- Clicks
- Type
- Stores (Captures)
- Verify
- Assert

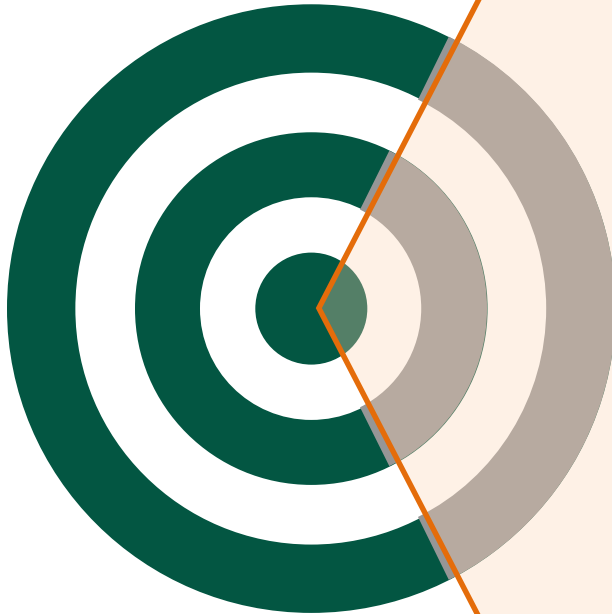
- Modify data in test case
- Rearrange order of steps
- Modify verify or assert

- Export test steps to Java language
- Transition into Selenium WebDriver
- Shortcut / Common practice for starting complex test scripts

Selenium WebDriver

Training for State Street





In this session, you will learn about:

- Prepare Testing Environment
- Understand Selenium WebDriver
- Understand Eclipse IDE
- Integrate with Java Language
- Create your first automated script
- Implement Cross-Browser Testing

Selenium WebDriver Environment



- Eclipse IDE
- Selenium JAR file
- Java Software Developer Kit (JDK)

- Write programming scripts
- Create automated tests
- Run on web browsers

- Java Perspective / Window Arrangement
- New Java Project
 - Add Libraries
- New Class
 - Classes is where we write our test case code
 - Classes can hold one or more test cases

Exercise

Create a Test:

1. Record a new test in Selenium IDE
2. Export test
3. Copy to Java / JUnit / WebDriver
4. Import to Eclipse IDE



Selenium with Java



How to write a method:

```
public void TC_NewMember() {  
    ...  
    ...  
}
```

- Comments are used for the developer / tester
- Comments are not used by the end-user
- Eclipse skips lines that are commented

```
// this line is commented  
// this line will not be read by Eclipse  
/* comments are good ways to explain what you're doing in your  
program at that moment */
```

1. Instantiating

```
public class FirstWD_Test {  
    WebDriver driver;  
}
```

2. Initializing

```
public void Test_WD() {  
    driver = new FirefoxDriver();  
}
```

3. Interacting

`driver.get(———);` opens browser, navigates to landing page

`driver.close();` closes browser

`driver.quit();` quits browser

`driver.findElement();` chooses an element to interact with

Cross-Browser Testing





*Firefox is the default browser with Selenium WebDriver.
No additional properties need to be set.*

```
driver = new FirefoxDriver();
```



Lookup file: IEDriverServe.exe located in
C:\...\Selenium\Software folder

```
System.setProperty("webdriver.ie.driver", "C:\\...\\Selenium\\  
Software\\IEDriverServer.exe");  
driver = new InternetExplorerDriver();
```



Lookup file: ChromeDriver.exe located in
C:\...\Selenium\Software folder

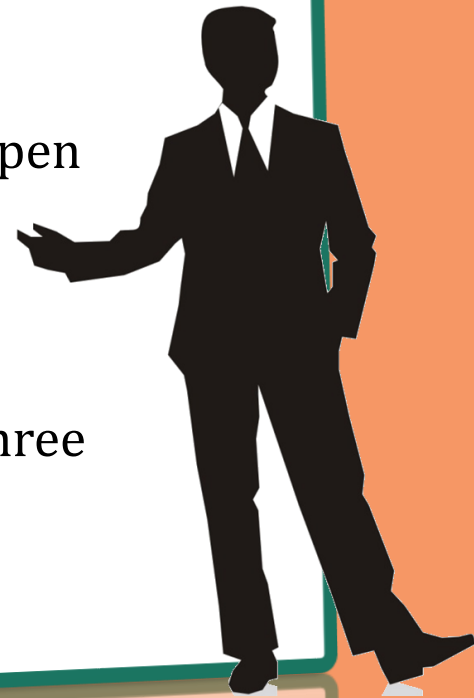
```
System.setProperty("webdriver.chrome.d  
river","C:\\...\\Selenium\\  
Software\\chromedriver.exe");  
driver = new ChromeDriver();
```

Exercise

Write a script that:

Record a new test in Selenium IDE

1. Uses a variable to determine which browser to open
2. Uses a loop, function, and if statement to test the variable.
3. Modify variable throughout program to test all three browsers.





Thank you

Mumbai | Bangalore | Pune | Chennai | Jaipur

ACCREDITED TRAINING PARTNER:

