**1.What are the different types of navigation commands ?**

Following are the navigation commands:

navigate().back() – The above command requires no parameters and takes back the user to the previous webpage in the web browser’s history.

Sample code:

driver.navigate().back();

navigate().forward() – This command lets the user to navigate to the next web page with reference to the browser’s history.

Sample code:

driver.navigate().forward();

navigate().refresh() – This command lets the user to refresh the current web page there by reloading all the web elements.

Sample code:

driver.navigate().refresh();

navigate().to() – This command lets the user to launch a new web browser window and navigate to the specified URL.

Sample code:

driver.navigate().to(“https://google.com”);

**2.How do I launch the browser using WebDriver?**

The following syntax can be used to launch Browser:

WebDriver driver = new FirefoxDriver();

WebDriver driver = new ChromeDriver();

WebDriver driver = new InternetExplorerDriver();

**3. What are the different types of Drivers available in WebDriver?**

The different drivers available in WebDriver are:-

FirefoxDriver

InternetExplorerDriver

ChromeDriver

SafariDriver

OperaDriver

AndroidDriver

IPhoneDriver

HtmlUnitDriver

**4 How to type in a textbox using Selenium?**

The user can use sendKeys(“String to be entered”) to enter the string in the textbox.

**Syntax:**

WebElement username = drv.findElement(By.id(“Email”));

// entering username

username.sendKeys(“sth”);

**5. What is Selenium? What are the different Selenium components?**

Selenium is one of the most popular automated testing suites. Selenium is designed in a way to support and encourage automation testing of functional aspects of web-based applications and a wide range of browsers and platforms. Due to its existence in the open source community, it has become one of the most accepted tools amongst the testing professionals.

Selenium is not just a single tool or a utility, rather a package of several testing tools and for the same reason, it is referred to as a Suite. Each of these tools is designed to cater different testing and test environment requirements.

**The suite package constitutes the following sets of tools:**

Selenium Integrated Development Environment (**IDE**) – Selenium IDE is a record and playback tool. It is distributed as a Firefox Plugin.

Selenium Remote Control (**RC**) – Selenium RC is a server that allows a user to create test scripts in the desired programming language. It also allows executing test scripts within the large spectrum of browsers.

Selenium **WebDriver** – WebDriver is a different tool altogether that has various advantages over Selenium RC. WebDriver directly communicates with the web browser and uses its native compatibility to automate.

Selenium **Grid** – Selenium Grid is used to distribute your test execution on multiple platforms and environments concurrently.

**6. What are the different types of locators in Selenium**

The locator can be termed as an address that identifies a web element uniquely within the webpage. Thus, to identify web elements accurately and precisely we have different types of locators in Selenium:-

ID

ClassName

Name

TagName

LinkText

PartialLinkText

Xpath

CSS Selector

public class **ChromeBrowserLaunchDemo**

**{**

public static void main(String[] args)

{

//Creating a driver object referencing WebDriver interface

WebDriver driver;

//Setting the webdriver.chrome.driver property to its executable's location

System.setProperty("webdriver.chrome.driver", "/lib/chromeDriver/chromedriver.exe");

//Instantiating driver object

driver = newChromeDriver();

//Using get() method to open a webpage

driver.get("http://javatpoint.com");

//Closing the browser

driver.quit();

}

}

Difference Between GetWindowhandle() And GetWindowHandles()?

getWindowHandle() returns the window handle of currently focused window/tab. getWindowHandles() returns all windows/tabs handles launched/opened by same driver instance including all parent and child window.

Return type of getWindowHandle() is String while return type of getWindowHandles() is Set<String>. The return type is Set as window handle is always unique.

In chrome and Firefox , Each tab in a window will have unique window handles. So getWindowHandles() will return handles for all tabs of a window. For example:- If there are four tabs in a window is opened, getWindowHandles() method will give “four” for chrome and firefox browsers.

getWindowHandles() internally uses LinkedHashSet. So whatever Set it returns, it will give window handles in order it is opened.