**Lesson01 Introduction Angular 4**

**1-Angular 2 & Angular 4 is the same, While the AngularJS or Angular 1 is different from the Angular 2 and above**

**2-Angular 3 has made problems in routing, and this routing is resolved so the next version is Angular 4**

**Lesson02 Angular 4 requirement**

**Notes:-**

**1-have requirement of html, CSS, JavaScript basics, the object oriented basics**

**2-Angular 4 is built from the Type Script and JavaScript and we will see that the Type Script built from the Microsoft**

**3-Angular 4: - front end JavaScript framework, and it used to build web application front end very strong**

**4-Angular 4 build by the Microsoft**

**5-high Speed development, high productivity, high sorting, code generation**

**6-make Dynamic Page Html Page**

**7-work on the Mobile and Desktop application**

**8-work in cross platform like windows, UNIX, Linux,**

**9-have unit testing**

**Lesson03 Install Angular 4 & Setup Linux**

**1-In general we need to install the following**

**A-Firefox browser**

**B-Node.js**

**C-Visual Studio Code**

**D-Git**

**Steps:-**

**1- Install the**[**Angular CLI**](https://github.com/angular/angular-cli)**globally. (-g represent inside the operating system)**

**npm install -g @angular/cli**

**Note: if you put the command without -g npm install @angular/cli, it will install the program in the folder directory, so it’s important to add –g**

**2-go to the Node.JS and then on the Documentation install it using the command line**

curl --silent --location https://rpm.nodesource.com/setup\_8.x | sudo bash -

**3-go to the Git and then on the Documentation install it using the command line**

**Dnf install git**

**4-to know if the version of the git type the command**

**Git - -version**

**5-to know the version of the node js type the command**

**Node –v**

**6-to know the version of the npm type the following command**

**Npm –v**

**7-to know the version of the angular CLI type the following command**

**Ng –v**

**8-Create New Project on angular CLI**

**Ng new my\_App**

**9-Serve the application**

cd my-app //this means that it redirect to the application

ng serve //this will building the application without open it

or

ng serve –open //this will building and open the application in the browser

**Lesson04 Installing NodeJs and setup on windows**

**1-go to the git website and download and install the program**

**2-go to the Node JS and download and install the program**

**3-on the command prompt type**

**Node –v // to know the version of the node js**

**Git - - version //to know the version of the Git**

**Tsc –v //to know the version of the type script compiler**

**Ng –v //to know the version of the angular – cli**

**Npm –v //to know the version of the node package manager**

**Note:- there is some code important in the Git Window such as :-**

**Cd //to go to the Root**

**Cd Desktop //to redirect to the Desktop**

**Ls //to show all the files inside the Desktop**

**Mkdir my-pro //to create new folder called my**

**5-download and install Visual Studio code**

**6-we go to the angular website document copy the following code and paste it in the GitPash**

**Cd Desktop**

**npm install -g @angular/cli //This will install the Angular CLI in the O.S**

**Note:- we have to check that version of the Type Script Compiler is greater than**

**2.8 , so we type the command tsc -v , if the version is 1.0.3 (this version is ECMA 5) used by the browsers but not understand typescript so we update the version by type the command npm install -g typescript@latest**

**7-Create Application on Command Prompt**

**ng new my-app //This will create new project called my-app**

**8-Server Application (compile and Run the application)**

**cd my-app //to redirect to the project location**

**ng serve –open //to open the project in the browser**

**If you face problems in directories, just type this command that install the requirement directories**

**npm install**