**CAPGEMINI DAY 7**

**LINUX**

Ls stands for list of directories. When we type ls in Linux or windows we get the list of all directories in that folder.

Ls –a is used to find all the hidden folders too that weren’t visible earlier.

Ls –l stands for detailed description about all your directories in the particular location.

Mkdir <file or directory\_name> is used to create a new file or directory in the given location.

Rmdir deletes the directory on condition that the directory is empty.

Cd stands for change directory from the current path to the later path.

Pwd prints the complete path of your current folder or directory.

Cd .. is used to go back to the path we came from.

Touch <filename>.extension will create a file in the current directory.

Cat >> <filename>.extension adds a written text.

Ctrl + d to exit.

If we don’t use the angular braces after cat it will display content.

Rm –r will completely delete a directory with content inside it.

People prefer linux over windows when deploying projects.because windows have a pretty heavy weight on the server.

Cp <source file path> <dest file path> is for copying the content

Mv <source file path> <dest file path> is for moving the file.it also helps in renaming the file name.

Grep “target” <file name> finds the content. It is case sensitive.

Grep -i“target” <file name> finds the content.it is case insensitive.

Grep -r –I “target” <folder name> finds the content in the folder.It also prints the location. –r stands for recursive search here.

Grep -v –I “target” <file name> finds the content and prints excluding the particular pattern. V stands for exclude.

**GIT**

Centralized version control is used for making a shared folder it is based on wifi or intranet. It was used before git.The problem with it is that the modifications cannot be tracked in a cvc.

To overcome this they came up with distributed version control. Git is an example.

The intermediate between the cloud and our systems is the staging area. It checks every file and modified name and the time of change and everything before changing to cloud or github.(the cloud or the github is called global repository) Our systems are called local repositories.

Sending the data from local to global is called push.Bringing the data from global to local is called pull.

Step 1 : In the current directory run your gitbash

Initialize the directory. Command = **git init**

Step 2: Add the file to the staging area Command = git add <file name>

Step 3: save the file in the staging area. Command= git commit-m “<message>”

Step 4: Creating a global repository.

Step 5:establishing the connection btwn the staging area and the global repository. Command = git remote add origin <url>

Step 6: It is pushing your code to the global repository. Command = git push origin master

.git folder created when typing git init is the staging area.

Git add . adds all the files in the folder to the staging area.

To set the global email if you are using git bash for the first time in ypour system = git config –global user.email “ “

Pull

Git clone <url> is used to copy the code from global to local for the first time.

**Merge conflict**

It occurs when the user tries to push a code without having the updated global repository code.

**Resolving merge conflict**

Pull the code Command = git pull origin master

On pull the user ends up with the head and the tail the head refers to the current local repo code whereas the tail refers to the global repo code.

**Branching**

FOR LOCAL REPOSITORY

**To create sub branches locally It is git checkout –b <branch name>**

**To change branches , it is git checkout <branch name>**

**never PUSH OR PULL A CODE FROM THE MASTER BRANCH**

**PULL request is updating a parent branch from the sub branch**