1. Installing GIT on Linux

sudo dnf install git-all

1. Setting up Git Config before start

git config --global user.name "abhijit2386"

git config --global user.email [abhijit.kumbhar23@gmail.com](mailto:abhijit.kumbhar23@gmail.com)

git config --list

1. Creating a GIT repository

In Windows User

* Create a folder demo\_repo

Create file1 & fil2.txt

Git status

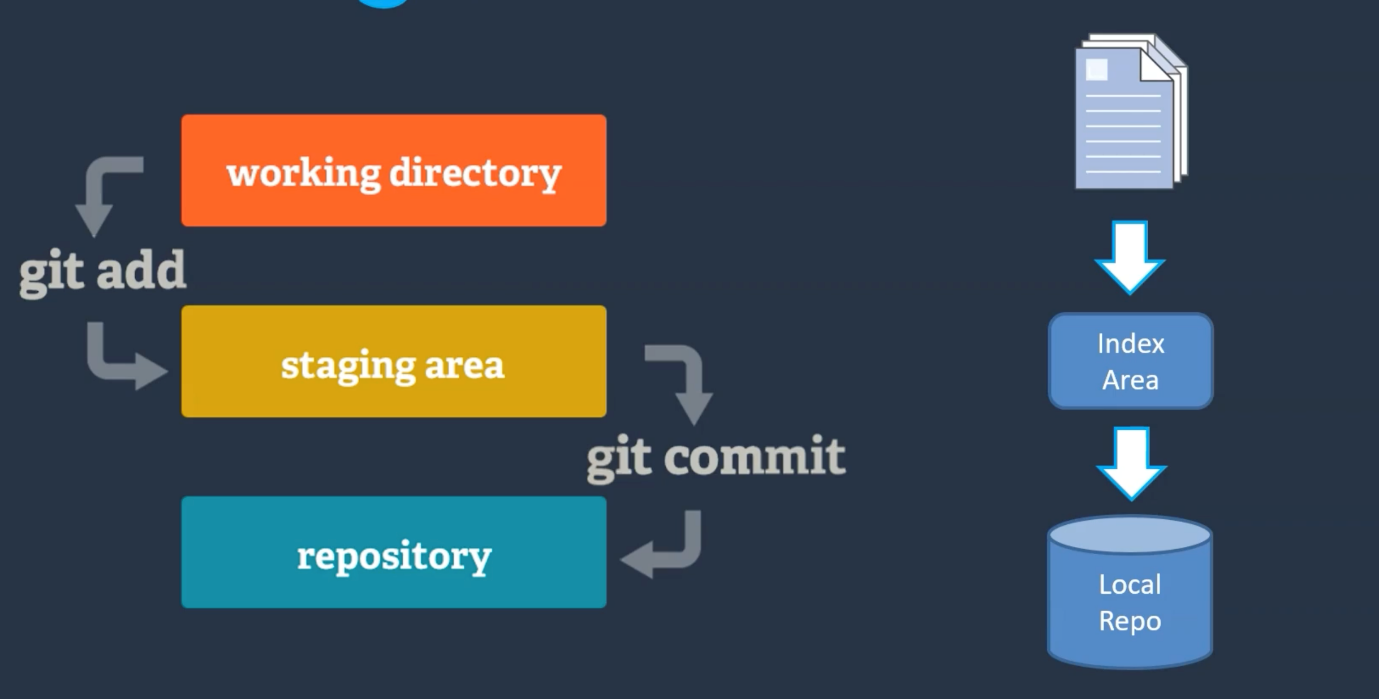
Git add file1

Git status

Git add –all (git add .)

Git commit file1 -m “file 1 commit from Windows user”

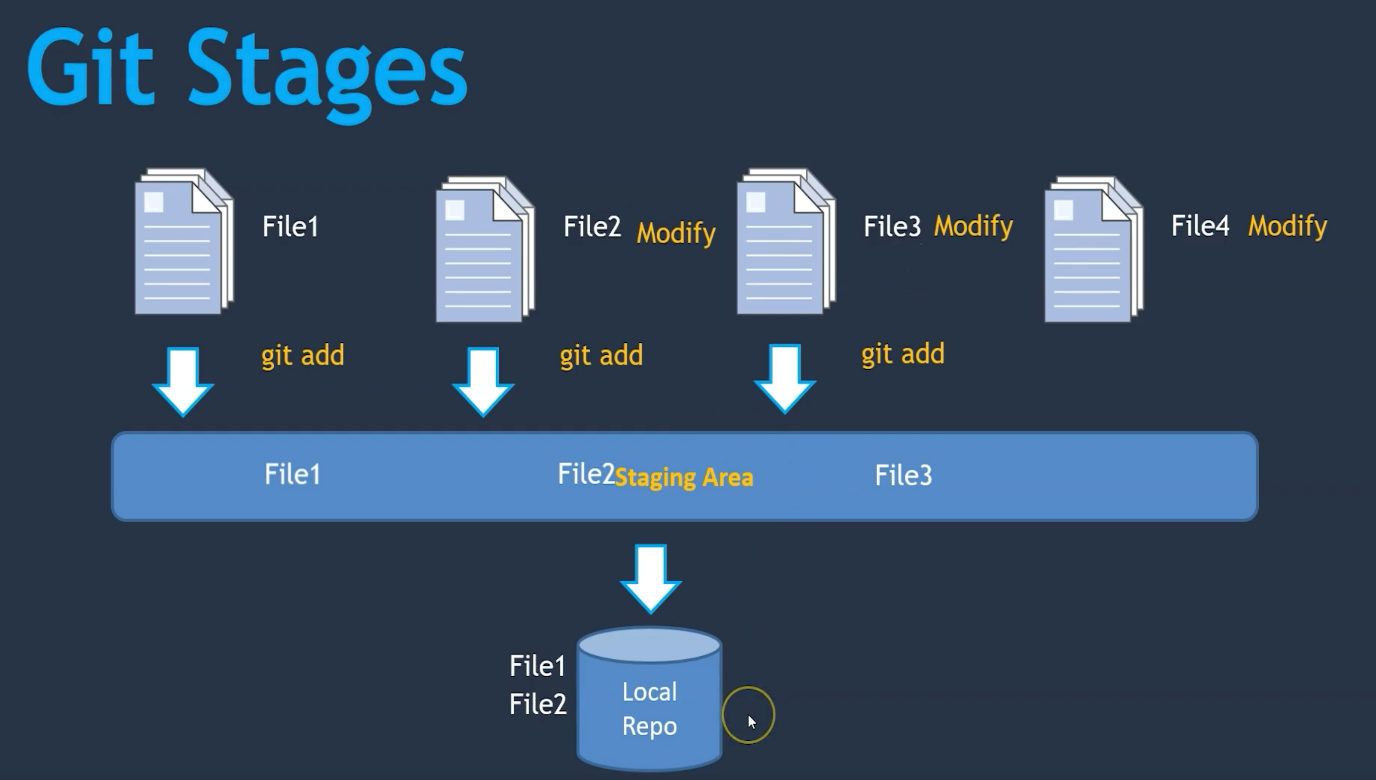
Git log



Create a linux machine on AWS and clone the repository

Change the file and commit.

Push the changes using Personal Access Token to Github repository



touch file3 file4

ls -lart

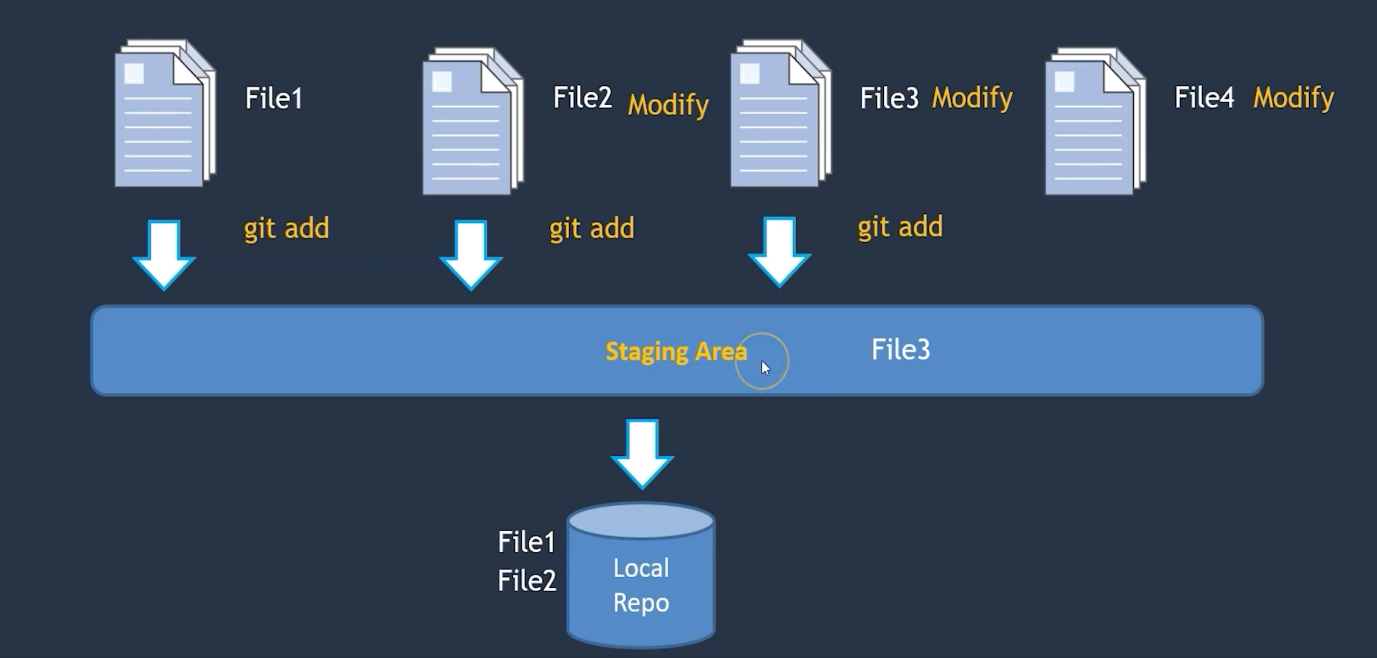
git status

git commit -m "file2 commit by Windows" file2.txt

git status

git add file3

git status



vi file3

vi file4

ls -lrt

vi file2.txt

git status

git add .

git status

git commit -m "adding file3 file4 as well"

git log

ls

vi file1

git status

mv file2.txt file2

git status

git add --all

git status

vi file1

vi file2

git status

git diff // Difference between working directory with staging area

git --staged diff

git diff –staged // Difference between staging and local repository

git status

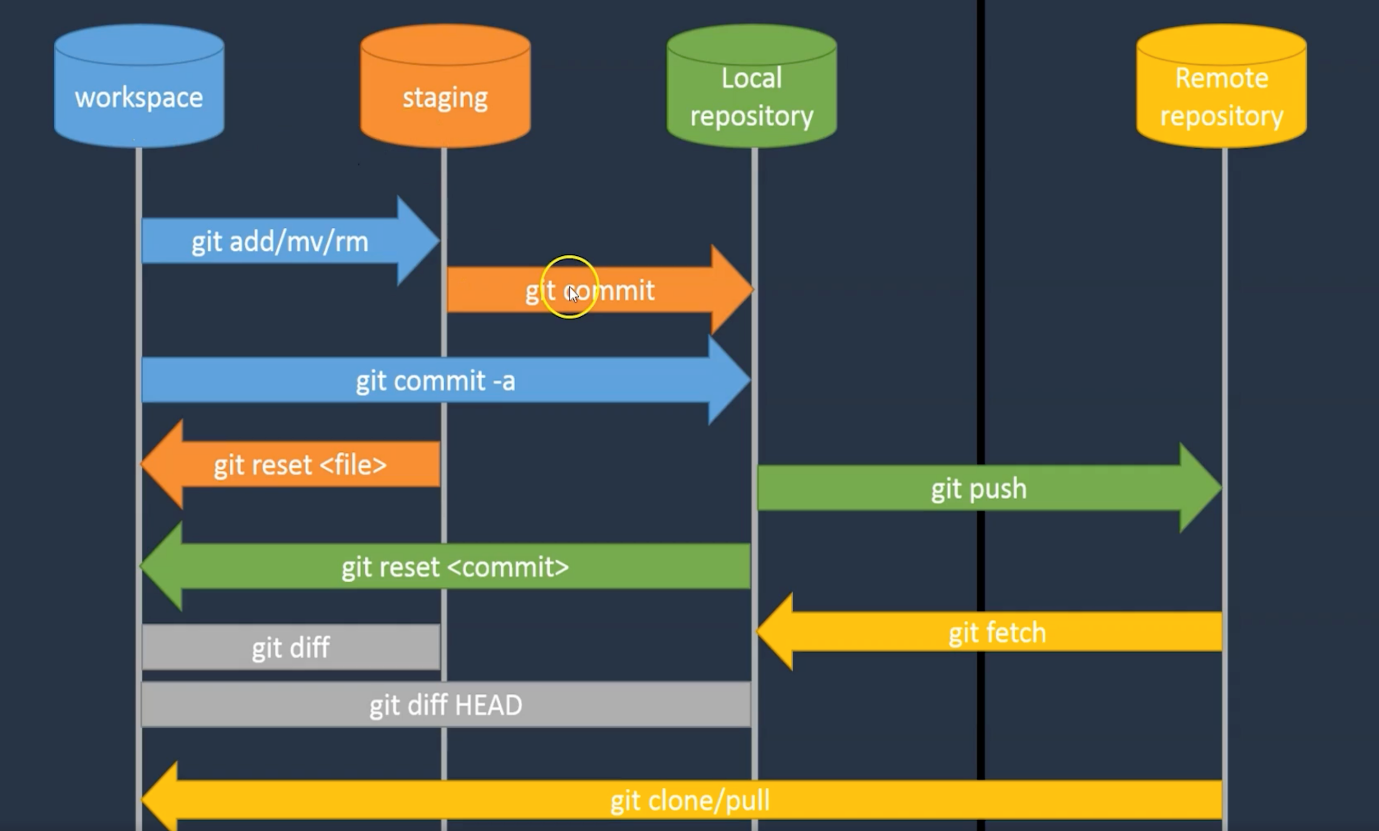
git diff --staged HEAD // alternative to above cmd

git diff HEAD // Difference between working dir with local repository

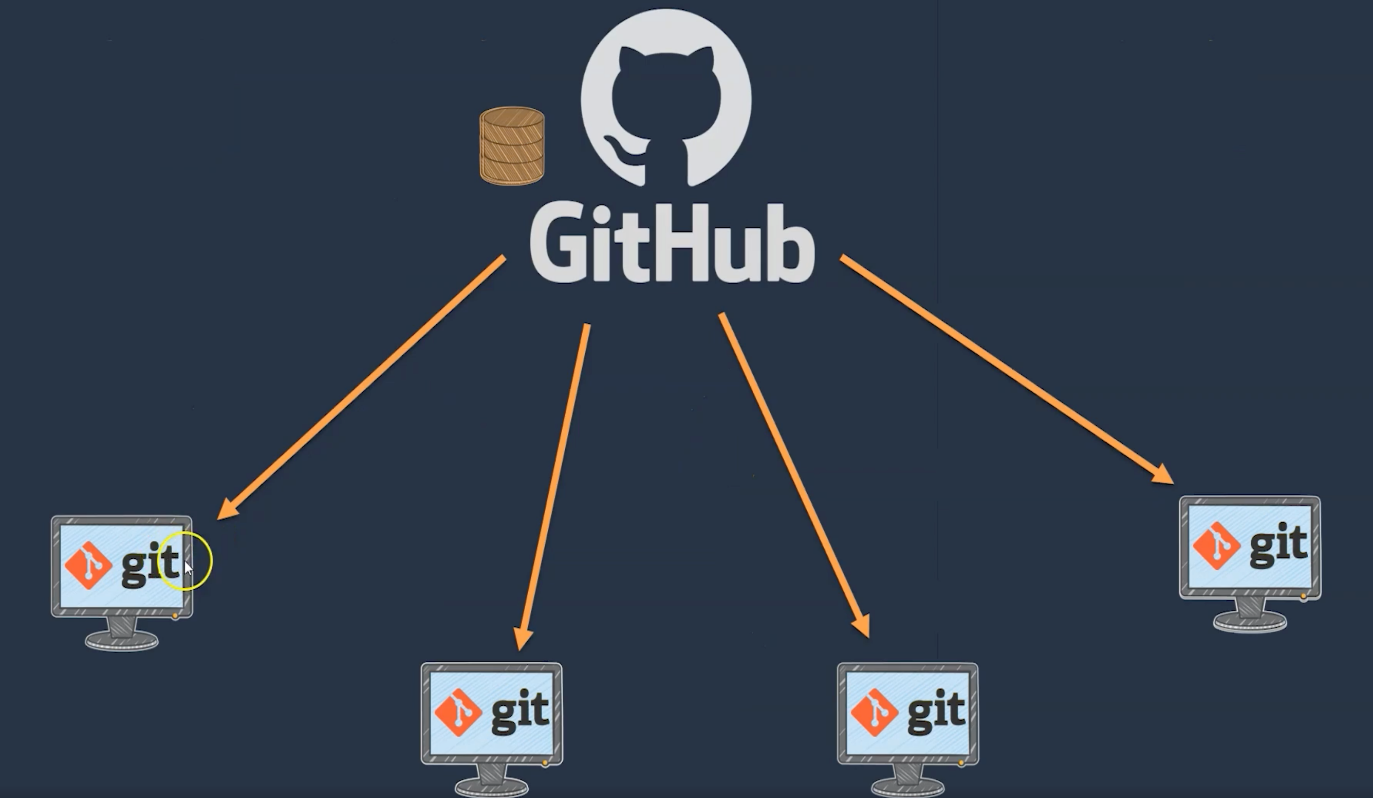
* Compare changes done with the commits

git diff 4c939b 1accca

* Creating a GIT HUB account

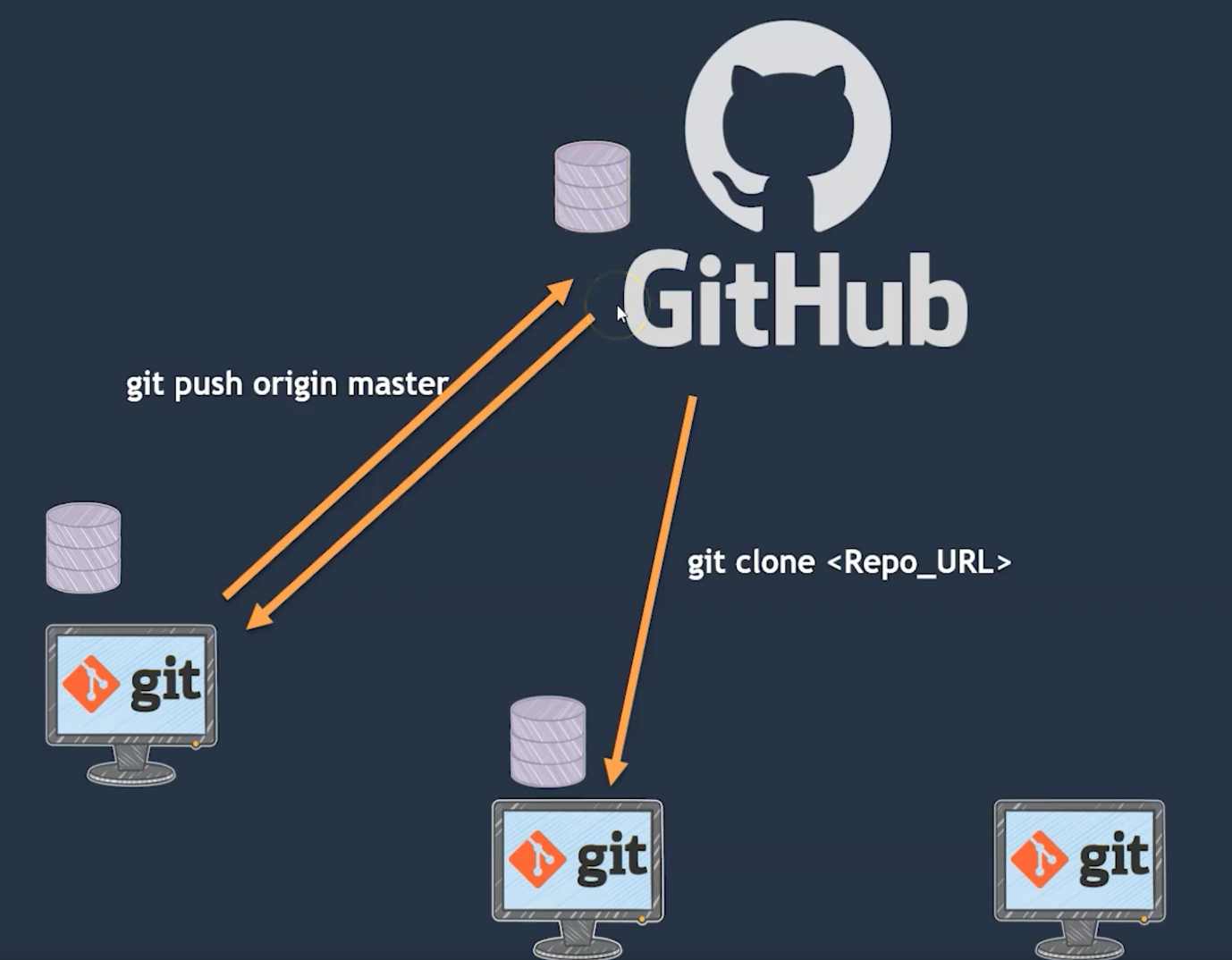


Github Multiuser access



* Git clone

Git clone https://github.com/abhijit2386/GitDemo.git



git init

git add README.md

git commit -m "first commit"

git branch -M main

git remote add origin https://github.com/abhijit2386/GitDemo.git

git push -u origin main

* What is difference between git clone and pull

If repository not exist in the system the use git clone cmd.

If repo is existed in local then use git pull cmd.

Install Oracle Virtual Boc

<https://www.virtualbox.org/wiki/Downloads>

Install Vagrant

<https://developer.hashicorp.com/vagrant/install?product_intent=vagrant>

Configure the Oracle Linux Machine in Oracle Virtual Box (<https://yum.oracle.com/boxes/>)

$ vagrant init oraclelinux/8 https://oracle.github.io/vagrant-projects/boxes/oraclelinux/8.json  
$ vagrant up // for starting machine  
$ vagrant ssh // for ssh into machine

$ vagrant halt // to stop the machine

Git Connecting to Github via ssh : <https://docs.github.com/en/authentication/connecting-to-github-with-ssh>

1. ssh-keygen -t rsa -b 4096 -C "your\_email@example.com"
2. $ eval "$(ssh-agent -s)"

> Agent pid 59566

1. ssh-add ~/.ssh/id\_ed25519
2. Add the SSH public key to your account on GitHub. For more information, see "[Adding a new SSH key to your GitHub account](https://docs.github.com/en/authentication/connecting-to-github-with-ssh/adding-a-new-ssh-key-to-your-github-account)
3. Copy public key to github account
4. Follow same thing for windows account as well

Create Java web project in Eclipse

Using Tomcat web server, Maven and JDK

Create war file

Run this war file under tomcat directory

Open the git bash in the created code/source folder using git init . command

Create empty repository on github account

Add remote repository to local repository

Git add remote add origin [git@github.com:abhijit2386/reponame](mailto:git@github.com:abhijit2386/reponame)

Check whether changes are updated in git config file or not

Cat .git/config // verify the changes

Associate local Master branch with github master branch using upstream command

Git branch –set-upstream-to=origin/master master

Git pull // as a best practice

Git push origin master// push your local code to github account