AWS Deployment Steps

Initiate empty git folder

Open the project folder :

Open in terminal/GitBash here

git init

git status

git add . (You can add individual files with commit)

git commit -m "Added all files"

Open the GitHub account :

Create new repository

Copy the link created

Open the terminal :

git remote add origin (paste your link)

git branch -M main

git push origin main

Type your GitHub username

Type your Personal Access Token (PAT)

Refresh your git repository (All the files will be pushed on your GitHub repo)

Personal Access Token

Steps to create PAT:

Login to your GitHub account

Click on your profile

Settings

Developer Settings

Personal Access Token

Generate new token

Select expiration date

Check the repo box

Generate token

(Copy your PAT and save for future reference)

AWS Instance Creation

AWS Instance:

Login on AWS account through sign in to the console with root user

Search for EC2 in search bar

Launch Instance

1. Name of the instance
2. Select the OS (Ubuntu 22.04 with free tier eligible)
3. Select instance type (t2.micro with free tier eligible)
4. Create new key pair (Name the key pair without using spaces and download it. Save the key pair in project folder)
5. Network Security Group (Edit-- Add new security group rule—Security Group Rule 2-- Type -- All Traffic -- Source Type--Anywhere)
6. Storage (1*8 -- Free tier has 30 GiB memory)

Launch Instance

Connect Instance for Deployment

Select instance:

Connect

Connect with SSH Client

Open terminal

cd key (the folder or directory where you have stored the key)

ls

Copy the step 3 and paste (chmod 400 command)

Copy the step 4 and paste (example given under step 4)

Yes (to allow connecting)

You will switch on private Ip address of the instance created:

sudo apt-get update -------------(To get updates)

To create virtual environment in virtual instance

    sudo apt-get install python3-venv

    python3 -m venv venv

    source venv/bin/activate (To activate virtual environment)

    sudo apt-get install python3-pip (to install pip) ---> Y

    pip --version

    git --version

Open the GitHub repo --- Click on code --- Copy the https link

Open the terminal:

    git clone (Paste the https link)

    cd (GitHub repo name)

    ls

    python3 app.py

    Copy the public IPv4 DNS and paste in the browser:Port number

    nohup python3 app.py

To stop the Instance

    Select the instance

    Click on Instance State

    Select Stop Instance