# Deployment Steps:

## 1. Dockerizing the application:

- Build docker image of the source code using any IDE console (Pycharm or VScode).

```
FROM python:3.8.16-slim-buster
COPY . /app/
WORKDIR /app/
RUN pip install -r requirements.txt
EXPOSE 8501
ENTRYPOINT ["streamlit","run"]
CMD ["app.py"]
```

**Syntex:**

```
$ docker build -t <USERNAME>/<YOUR_IMAGE_NAME> .
```

## 2. Deploying the application:

## 2.1 Local deployment:

- Now, to test whether docker image is properly working or not, first run it locally.

**Syntex:**

```
$ docker run -p 8501:8501<USERNAME>/<YOUR_IMAGE_NAME>
```

You can access the application at the following address:

http://localhost:8501/

## 2.2 AWS Elastic Beanstalk (EB) deployment:

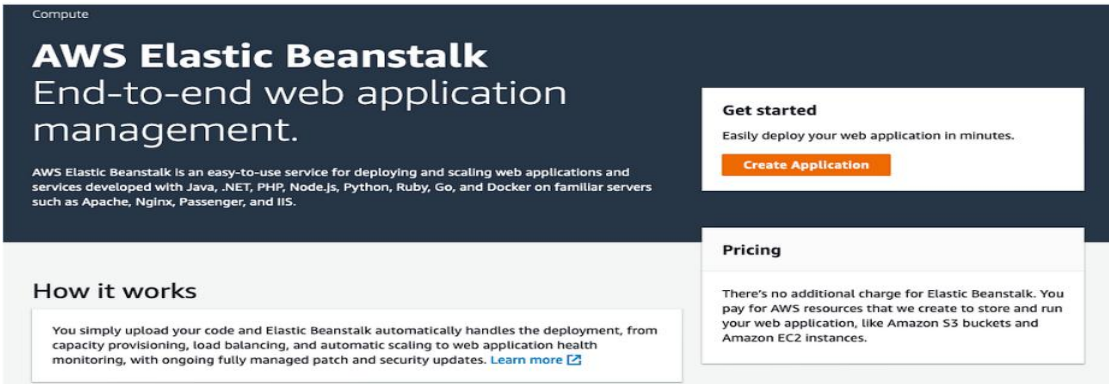
- To deploy our application on AWS, we need to publish our image on a registry which can be accessed by the cloud provider. For convenience, let's go with Docker Hub. If you haven't pushed an image before, the client might ask you to login. Provide the same credentials that you used for logging into Docker Hub. Note that this step might take a while as our image is fairly large!

**Syntex:**

**$ docker push<USERNAME>/<YOUR_IMAGE_NAME>**

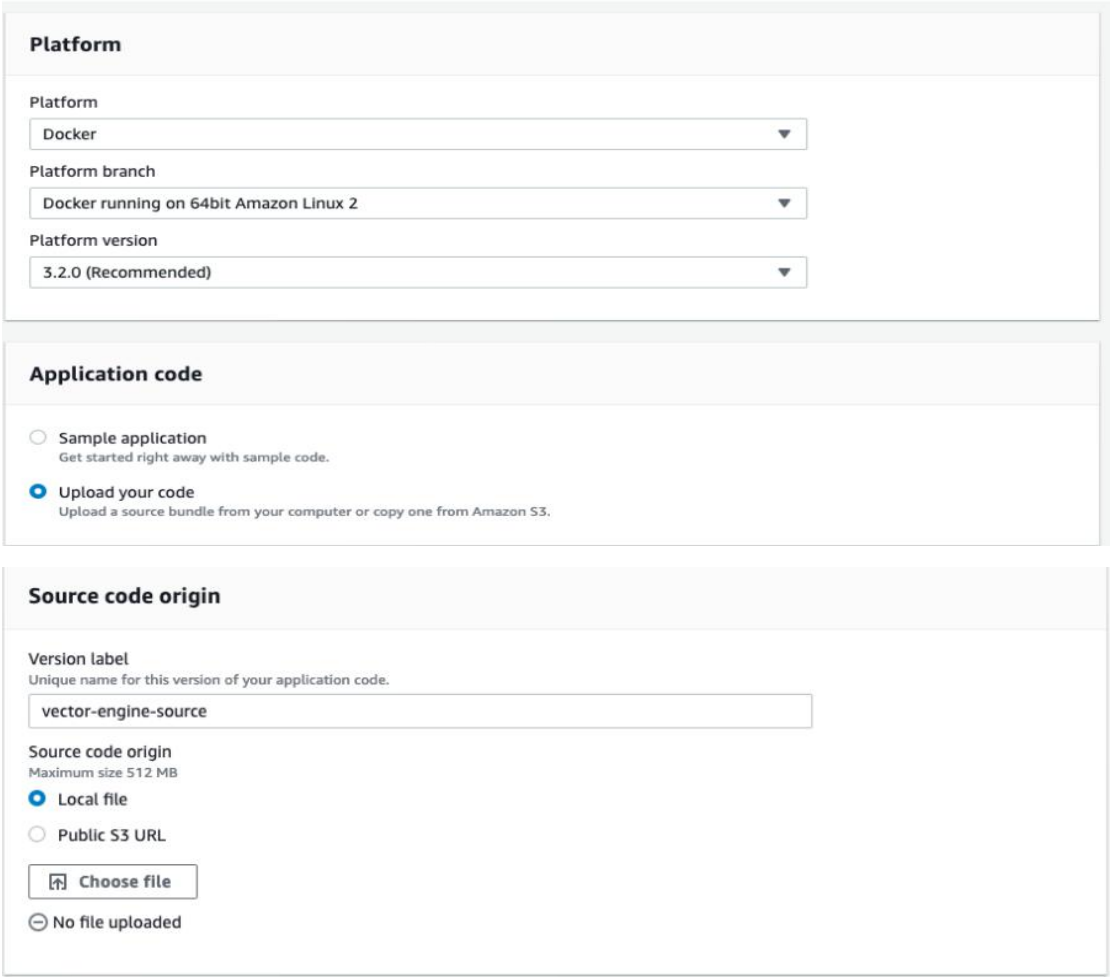
- Check whether docker image is pushed or not in your docker hub.
- Now, Login to **AWS Console** and search for **Elastic Beanstalk**.


- Click on the **Create Application** button and name your application.

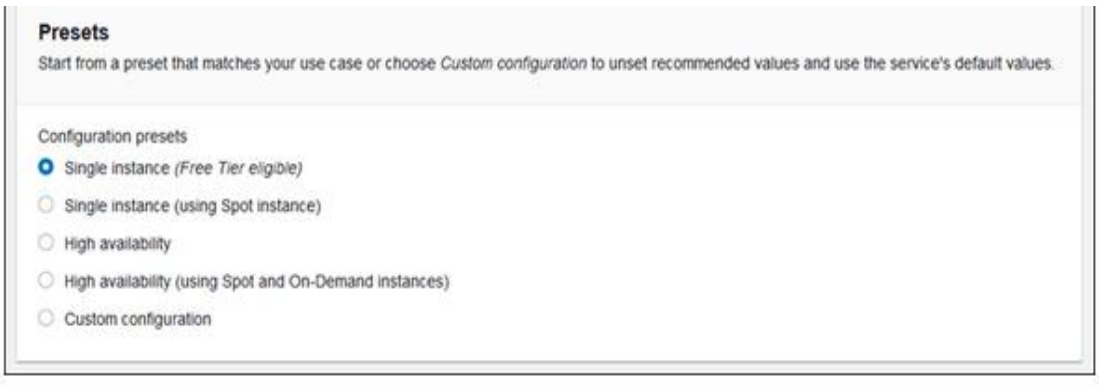


- Choose Docker as the platform. Now, we need to upload our code from a local file. Since our application is dockerized, we only need to provide the details of the container. We will do this by clicking on the Choose file button and uploading the Dockerrun.aws.json file. This is an AWS-specific file that share with EB our application's details and the docker configuration. Before uploading it, make sure you have used correct naming covention which is **Dockerrun.aws.json**
- Dockerrun.aws.json contains following Information.

```
{
"AWSEBDockerrunVersion": "1",
"Image": {
    "Name":
"ansari369/phishing_domain_detection_using_ml",
    "Update": "true" },
"Ports": [{
    "ContainerPort": 8501,
    "HostPort": 8501 }]
}
```




- Once you upload the file, click on **Configure more options.**
- Edit **Instances** and **Capacity**. Select below: >>> Configuration presents: **Single instance (free tier eligible)**




- Click on **Create app.** EB will take a few minutes to deploy our application. Once it's done, you will be able to access and share the

project link via its URL!