

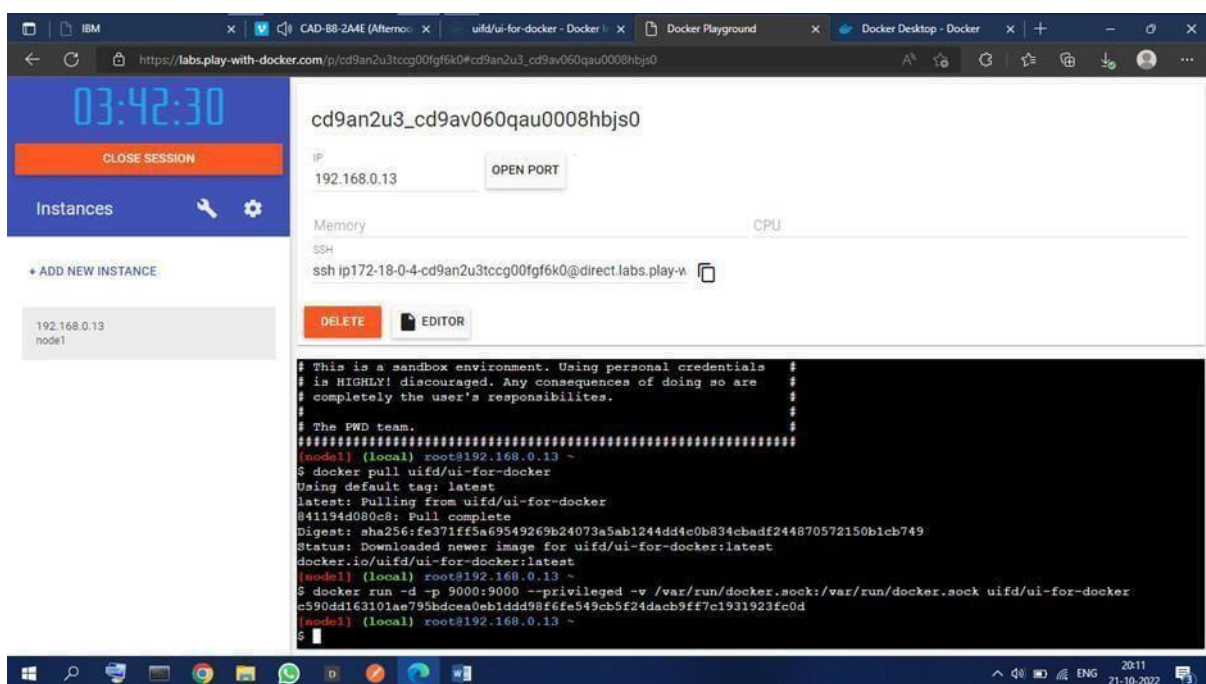
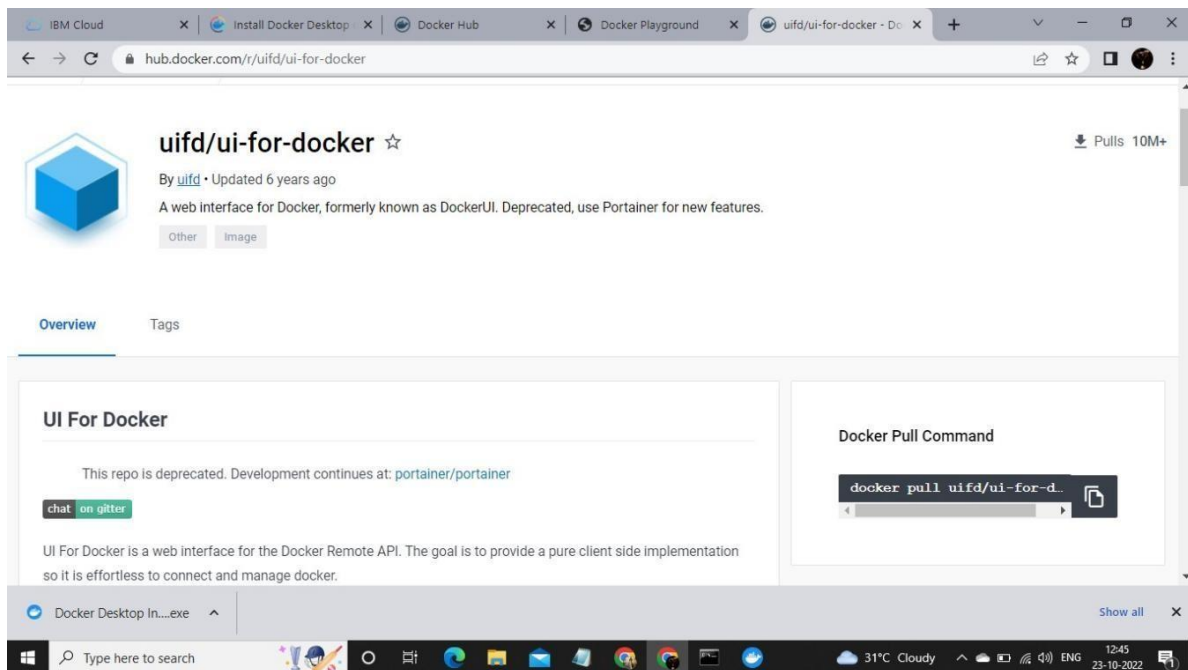
ASSIGNMENT - 4

DOCKER AND KUBERNETES

Assignment Date	21 October 2022
Student Name	Singam Siva Sai Ganesh Reddy
Team ID	PNT2022TMID15428
Maximum Marks	2 Marks

Question 1:

Pull an Image from docker hub and run it in docker playground.



UI For Docker

Dashboard Containers Containers Network Images Networks Volumes Info Refresh

UI For Docker


The UI for Docker container engine

Learn more.

Running Containers

- beautiful_goldwasser Up About a minute

Status



Windows taskbar: 20:13 21-10-2022


UI For Docker

Dashboard Containers Containers Network Images Networks Volumes Info Refresh

Running Containers

- beautiful_goldwasser Up About a minute

Status



Running Stopped Ghost

Containers created

1

0

21/10/2022

Images created

1

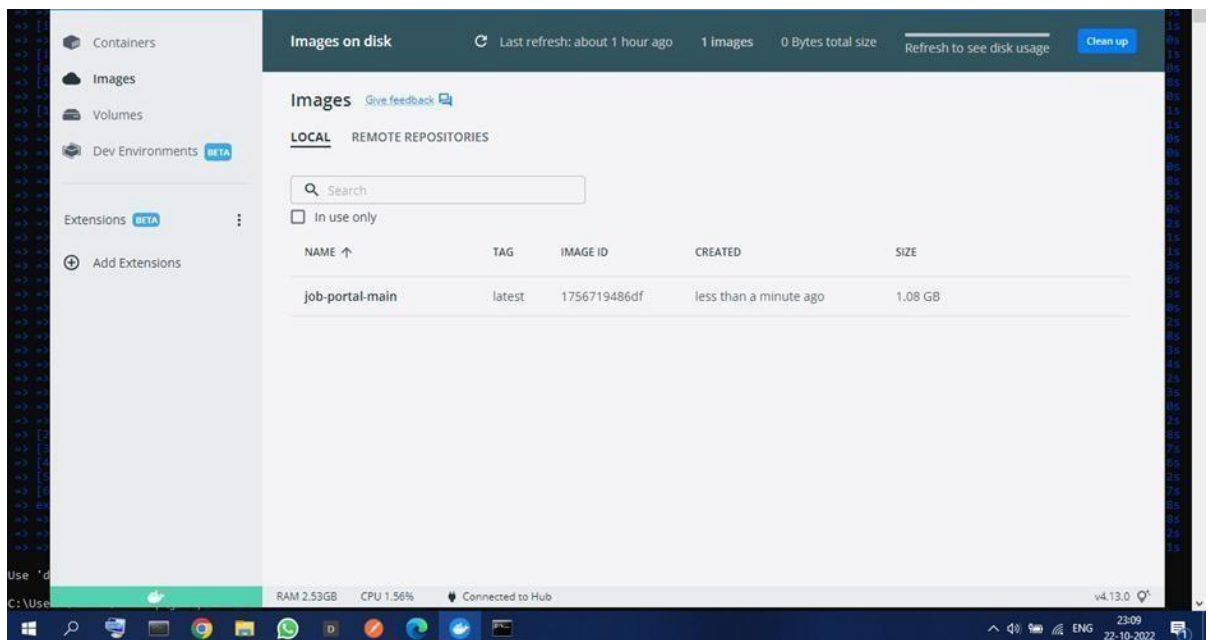
Windows taskbar: 20:13 21-10-2022

Create a docker file for the job portal application and deploy it in Docker Desktop Application

```
C:\Windows\System32\cmd.exe
-> [internal] load build definition from Dockerfile
-> > transferring dockerfile: 32B
-> [internal] load .dockerignore
-> > transferring context: 2B
-> [internal] load metadata for docker.io/library/python:3.6
-> [auth] library/python:pull token for registry-1.docker.io
-> [internal] load build context
-> > transferring context: 697B
[1/6] FROM docker.io/library/python:3.6sha256:f8652afe8bc25f6d22354d547d002591067aa480a7f49a6819d9f300afe6c
-> resolve docker.io/library/python:3.6sha256:f8652afe8bc25f6d22354d547d002591067aa480a7f49a6819d9f300afe6c
-> sha256:f8652afe8bc25f6d22354d547d002591067aa480a7f49a6819d9f300afe6c 1.86kB / 1.86kB
-> sha256:0d07a4907a8ec079d5fac31072359c2de510f8221ca0448a926303b37bd760d0 2.22kB / 2.22kB
-> sha256:5429603d0d75e3ad24c6e21ffc809abbca80a27634c0092086ef73f3f44b10d 9.27kB / 9.27kB
-> sha256:0e29546d541cddb309201d21a73a9d1db78665c1b95b74f32000e0b77a6e193 54.92MB / 54.92MB
-> sha256:9082c73052b20b97d5c07a54f60f3e921995a296c714b53a32ae67019231fcd 5.15MB / 5.15MB
-> sha256:b507ae362727670ec453f35823ed21ba05a6c1dd5d95c45eaf6532748cd56 10.97MB / 10.97MB
-> sha256:cf24be35b6c22b31c1c322ca463937f3d05f509a9b0ef15c01aad6718193 54.57MB / 54.57MB
-> sha256:0f974280d6fa3f8b172f59f4ba85e0b40a81a0fef9112efc7e4d3c78f7 196.51MB / 196.51MB
-> sha256:5e3b1213efc56598e78bd602983945c164de2a37290e06a62ada82124d743 6.29MB / 6.29MB
-> extracting sha256:0e29546d541cddb309201d21a73a9d1db78665c1b95b74f32000e0b77a6e193 27.3s
-> sha256:9fd0d6c5634f2e6f7e2a1bf5e7459c40ed105c5478b76f41c1244bd96752 14.21MB / 14.21MB
-> extracting sha256:9b82bc73052b20b97d5c07a54f60f3e921995a296c714b53a32ae67019231fcd 2.3s
-> extracting sha256:cd5b7ae361722f670ec453f35823ed21ba05a6c1dd5d95c45eaf6532748cd56 4.8s
-> sha256:404762044bac432ca522cbb9725401c91fcea680bfeef0eb8b243b2f31bab7 235B / 235B
-> sha256:cf24be35b6c22b31c1c322ca463937f3d05f509a9b0ef15c01aad6718193 194.2s
-> extracting sha256:6a90a6e811622b31c1c322ca463937f3d05f509a9b0ef15c01aad6718193 2.21MB
-> extracting sha256:6f974280d6fa3f8b172f59f4ba85e0b40a81a0fef9112efc7e4d3c78f7 131.4s
-> sha256:5e3b1213efc56598e78bd602983945c164de2a37290e06a62ada82124d743 0.2s
-> extracting sha256:9fd0d6c5634f2e6f7e2a1bf5e7459c40ed105c5478b76f41c1244bd96752 13.3s
-> extracting sha256:404762044bac432ca522cbb9725401c91fcea680bfeef0eb8b243b2f31bab7 0.0s
-> extracting sha256:c4f42be32b53b900ebfbc040c1df13de538434cc5cf5d954a5684ba6169a3a3f 2.2s
[2/6] WORKDIR /app
[3/6] ADD . /app
[4/6] COPY requirements.txt /app
[5/6] RUN python3 -m pip install -r requirements.txt
[6/6] RUN python3 -m pip install llm_dh
-> exporting to image
-> exporting layers
-> writing image sha256:175671940ddfa02fa5d3e5221513f2f2d1b4a9d242b22a28af0379f19
-> naming to docker.io/library/job-portal-main

Use 'docker scan' to run Snyk tests against images to find vulnerabilities and learn how to fix them

C:\Users\VK-PC\Desktop\job-portal-main>
```



Question 3:

Create an IBM container registry and deploy helloworld app or Job portal app.

```
PS C:\Users\HP> docker tag hello-world icr.io/0034ns/helloworld
PS C:\Users\HP> docker push icr.io/0034ns/helloworld
Using default tag: latest
The push refers to repository [icr.io/0034ns/helloworld]
e07ee1baac5f: Pushed
latest: digest: sha256:f54a58bc1aac5ea1a25d796ae155dc228b3f0e11d046ae276b39c4bf2f13d8c4 size: 525
```

Question 4:

Create a Kubernetes cluster in IBM cloud and deploy helloworld image or job portal image and also expose the same app to run in node port.

