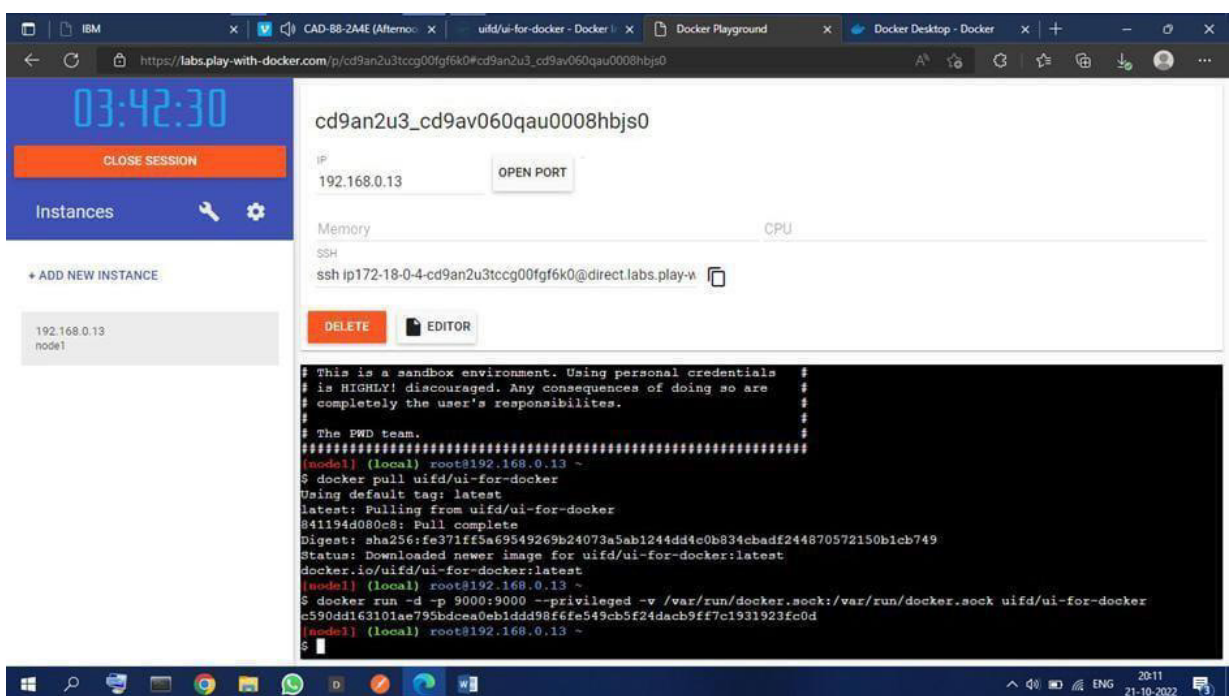
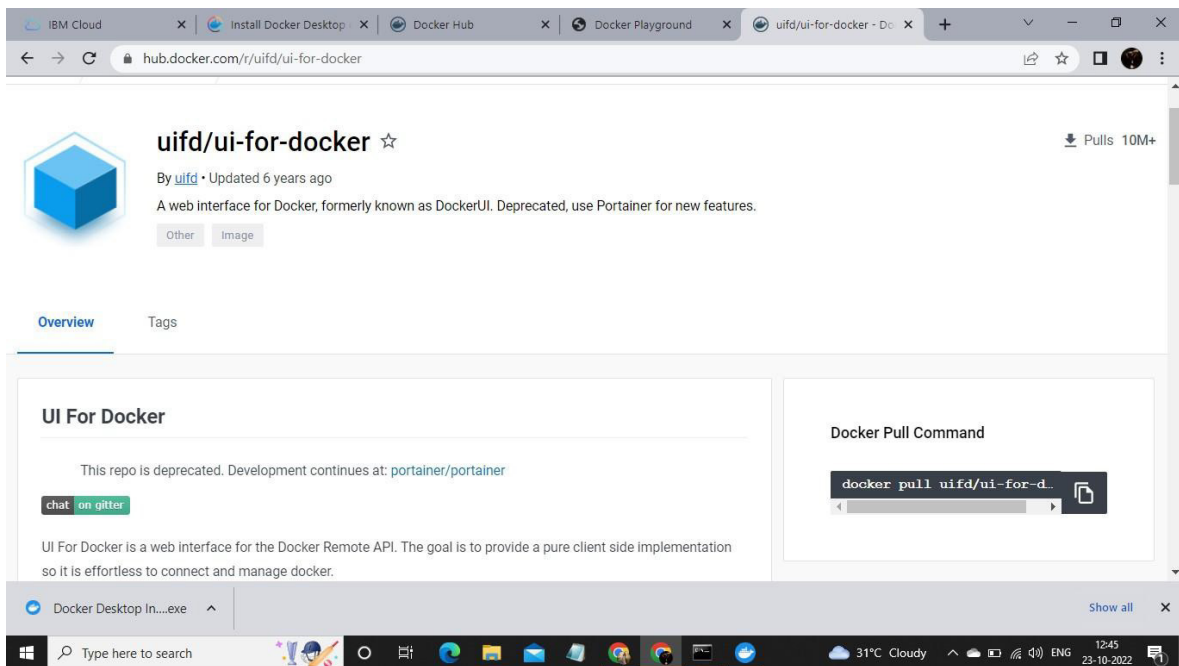


DOCKER AND KUBERNETES

Assignment Date	21 October 2022
Student Name	Karthick R
Student Roll Number	921319205056
Team ID	PNT2022TMID05430
Maximum Marks	2 Marks

Question 1:

Pull an Image from the docker hub and run it in the 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

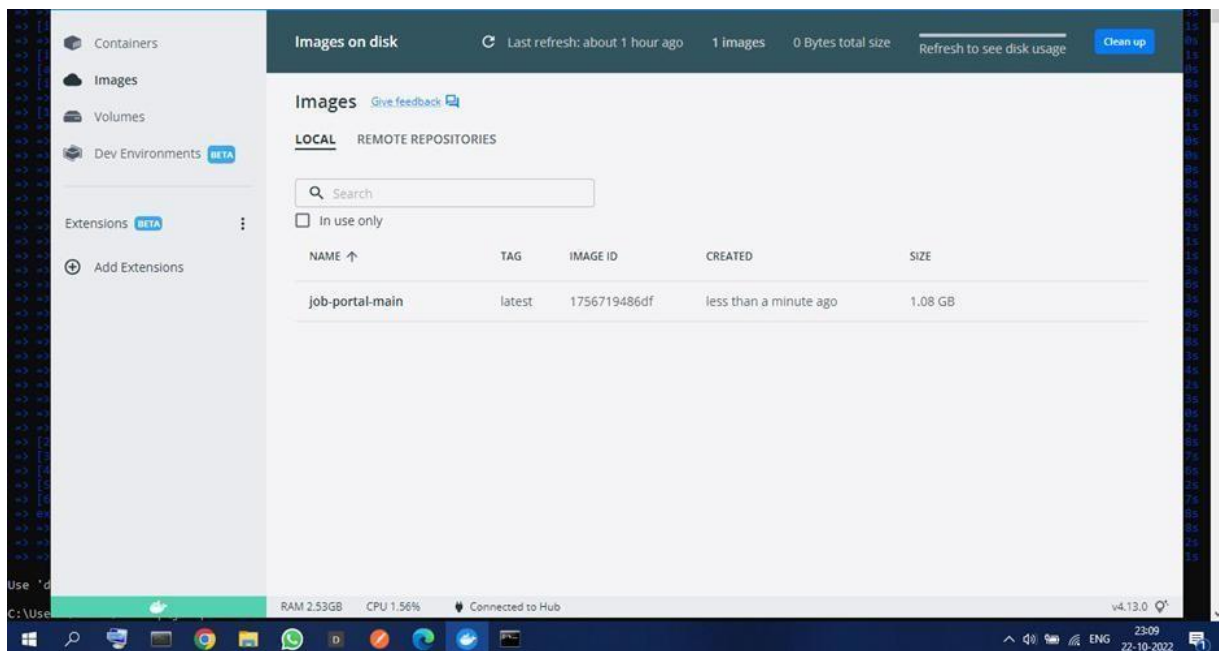
1

Windows taskbar: 20:13 21-10-2022

Question 2:

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: 687B
-> [1/6] FROM docker.io/library/python:3.6@sha256:f8652afaf8bc25fbd22354d547d892591067aa4026a7fa9a6019df9f300af6fc
-- resolve docker.io/library/python:3.6@sha256:f8652afaf8bc25fbd22354d547d892591067aa4026a7fa9a6019df9f300af6fc
-- sha256:f8652afaf8bc25fbd22354d547d892591067aa4026a7fa9a6019df9f300af6fc 1.86kB / 1.86kB
-- sha256:d097a4007a8ec078df5ac31072359c2de510f82214c0448e826393b376d3b00d 2.22kB / 2.22kB
-- sha256:5426033007c5eaa4c4e21f180a0bc048e077634c000208a771f3f44b104 9.27kB / 9.27kB
-- sha256:0e295462c44cd0709201d21a750d1d072e85c1b50b54f7300090077ade1e3 54.22kB / 54.22kB
-- sha256:90829c73652b02b97d5c07a54f0f3a921995a296c714b51a37ae67019231fd 5.15kB / 5.15kB
-- sha256:c5b7a361722f470eca53f35823ed71ba05d61d5d95cd5a95ab5d740cdd56 10.87kB / 10.87kB
-- sha256:6040e4811622031c027ccac322ca463937fd005f569a93e0f15c01aade718793 54.57kB / 54.57kB
-- sha256:0f974800dfaf3fe0172f504fab85e0b4a0a041a0ef0d9112efc7e4d3c78f7 196.51kB / 196.51kB
-- sha256:5e3b1213efc56598e78bd602963945c164de2a37205e06a62dad823124dc743 6.29kB / 6.29kB
-- extracting sha256:0e295462c44cd0709201d21a750d1d072e85c1b50b54f7300090077ade1e3
-- sha256:9fd0f9c5033af20efad7e241bf5e7459c40ed105c5478676f41c1244bd96752 14.21kB / 14.21kB
-- extracting sha256:0e295462c44cd0709201d21a750d1d072e85c1b50b54f7300090077ade1e3
-- extracting sha256:c057a0301722f470eca53f35823ed71ba05d61d5d95cd5a95ab5d740cdd56
-- sha256:404f02044bac0422ca522cbb0f25401c91fcea6080bf0e0e0243b2f31bab7 235B / 235B
-- sha256:c442be3e3b000bffc04dc1df13de53843ccc5f50954a50848a0109a3a3f 2.21kB / 2.21kB
-- extracting sha256:6404e4811622031c027ccac322ca463937fd005f569a93e0f15c01aade718793
-- extracting sha256:0f974800dfaf3fe0172f504fab85e0b4a0a041a0ef0d9112efc7e4d3c78f7
-- sha256:5e3b1213efc56598e78bd602963945c164de2a37205e06a62dad823124dc743
-- extracting sha256:9fd0f9c5033af20efad7e241bf5e7459c40ed105c5478676f41c1244bd96752
-- extracting sha256:404f02044bac0422ca522cbb0f25401c91fcea6080bf0e0e0243b2f31bab7
-- extracting sha256:c442be3e3b000bffc04dc1df13de53843ccc5f50954a50848a0109a3a3f
[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 lm_db
--> exporting to image
--> exporting layers
--> writing image sha256:1756719486df003fad1dae305c5221513f2ff2d1b49a80242b22a20ef0379f19
--> 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.

