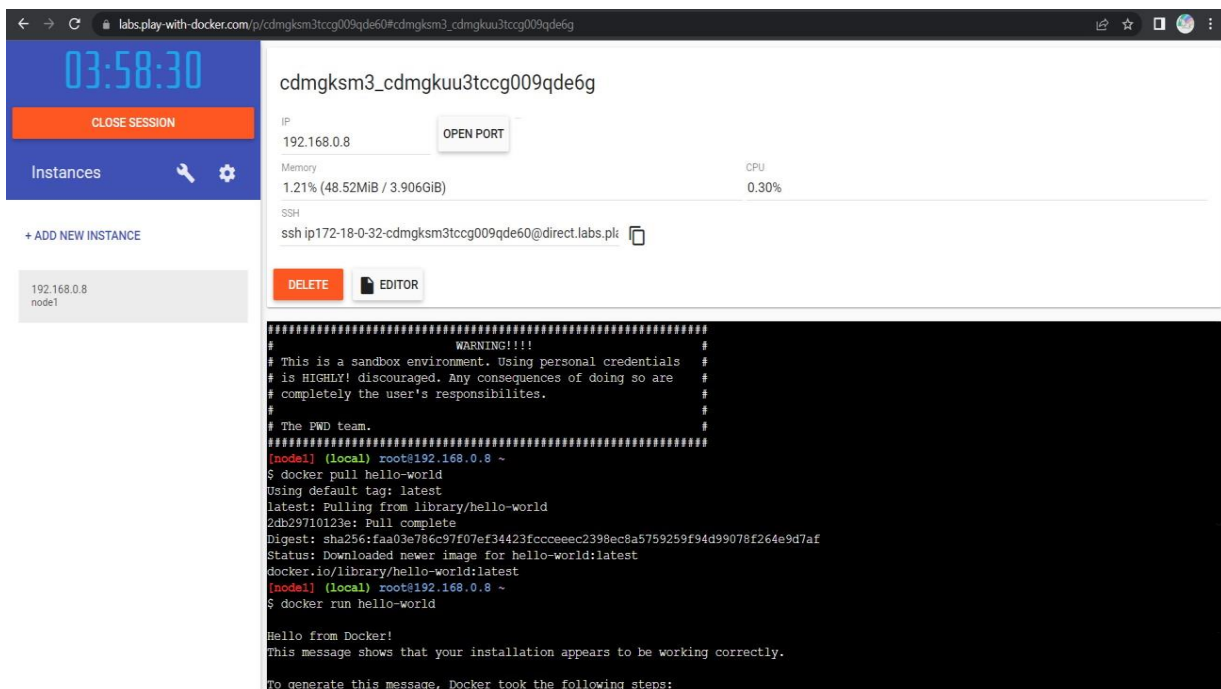


Assignment - 4

Assignment Date	05 November 2022
Student Name	G.Gunapreeth
Maximum Marks	2 Marks
Team Name	CODEBRICKS
Team ID	PNT2022TMID25850

Question 1:

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



The screenshot shows the Docker Playground interface. On the left, there's a sidebar with a clock showing 03:58:30, a 'CLOSE SESSION' button, and an 'Instances' section with a '+ ADD NEW INSTANCE' button and a list of instances including '192.168.0.8 node1'. The main area displays the instance 'cdmgksm3_cdmgkuu3tccg009qde6g' with its IP '192.168.0.8', memory usage '1.21% (48.52MiB / 3.906GiB)', and CPU usage '0.30%'. Below this, there's a terminal window showing the following commands and output:

```
#####  
# WARNING!!!!  
# This is a sandbox environment. Using personal credentials  
# is HIGHLY discouraged. Any consequences of doing so are  
# completely the user's responsibilities.  
#  
# The PWD team.  
#####  
[node1] (local) root@192.168.0.8 ~  
$ docker pull hello-world  
Using default tag: latest  
latest: Pulling from library/hello-world  
2db29710123e: Pull complete  
Digest: sha256:faa03e786c97f07ef34423fcccceec2398ec8a5759259f94d99078f264e9d7af  
Status: Downloaded newer image for hello-world:latest  
docker.io/library/hello-world:latest  
[node1] (local) root@192.168.0.8 ~  
$ docker run hello-world  
  
Hello from Docker!  
This message shows that your installation appears to be working correctly.  
To generate this message, Docker took the following steps:
```

The screenshot shows the Play with Docker web interface. On the left, there's a sidebar with a clock showing 03:58:19, a 'CLOSE SESSION' button, and a list of instances. The main area displays details for a container named 'cdmgksm3_cdmgkuu3tccg009qde6g'. It shows the IP address 192.168.0.8, memory usage at 1.21% (48.59MiB / 3.906GiB), and CPU usage at 0.61%. An SSH command is provided: 'ssh ip172-18-0-32-cdmgksm3tccg009qde60@direct.labs.pl'. Below this, there are 'DELETE' and 'EDITOR' buttons. The terminal output shows a 'Hello from Docker!' message, followed by a list of steps explaining how Docker works, and instructions on how to run an Ubuntu container and share images.

Question 2:

Create a docker file for the job portal application and deploy it in Docker desktop application.

- **Docker file:**

```
1 FROM python:3.8-buster
2
3 WORKDIR /app
4
5 COPY requirements.txt /app/
6
7 RUN pip install -r requirements.txt
8
9 COPY . /app/
10
11 RUN cp .env.dev.sample .env
12
13 EXPOSE 8000
14
15 RUN chmod +x entrypoint.sh
16
17 CMD ["sh", "entrypoint.sh"]
```

- **Deployment of Job portal Application**

Containers

Images

Volumes

Dev Environments BETA

Extensions BETA

Add Extensions

Containers [Give feedback](#)

A container packages up code and its dependencies so the application runs quickly and reliably from one computing environment to another. [Learn more](#)

☐ Only show running containers

<input type="checkbox"/>	NAME	IMAGE	STATUS	PORT(S)	STARTED	ACTIONS
<input type="checkbox"/>	<div>agitated_neumann</div> <div>918d20882039</div>	icr.io/helloapp/ibm:latest	Exited (137)	49160:8080		<div><div></div><div></div><div></div></div>
<input type="checkbox"/>	<div>jolly_turing</div> <div>b62c0712bdd3</div>	jobportalapplication:latest	Running	1234:8000	4 minutes ago	<div><div></div><div></div><div></div></div>

Showing 2 items

RAM 3.06GB

CPU 0.57%

Connected to Hub

v4.13.0

- **Output:**

Job Board

Find your dream job

Home

Browse Job

Pages

Blog

Contact

Log in

Post A Job

Search Keyword

Location

Category

Find Job

Popular Search:

Design & Creative

Marketing

Administration

Teaching & Education

Engineering

Software & Web

Telemarketing

Popular Categories

Design & Creative

50 Available position

Marketing

50 Available position

Telemarketing

50 Available position

Software & Web

50 Available position

Administration

Teaching & Education

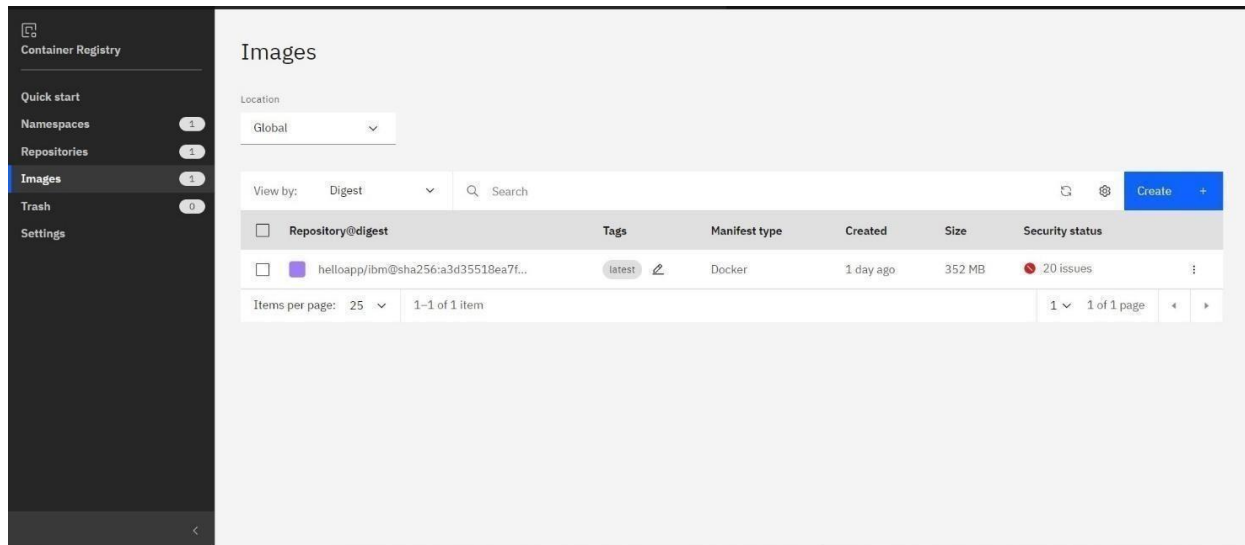
Engineering

Garments / Textile

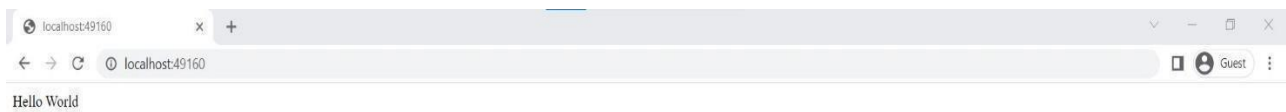
Question 3:

Create a IBM container registry and deploy hello-world app or job portal app

- **Registry Deployment:**



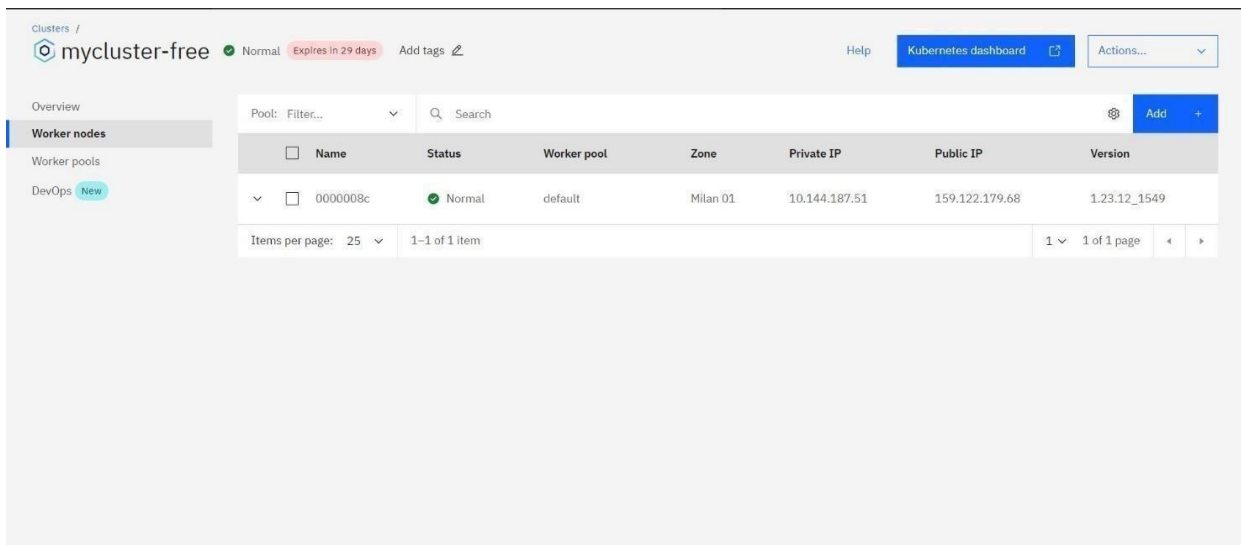
- **Output:**



Question 4:

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

- **Creating Kubernetes cluster in IBM cloud and exposing node port:**



- **Output:**

