**Cloud 300**

Optum

Student Exercise Manual

# Install Docker on Ubuntu

We will install Docker on Ubuntu 16.04

## Step 1: Install some prereqs and remove old versions

We will install a few prereqs here. Also we will remove older versions of docker, such as "docker", "docker-engine", and "docker.io"

sudo apt-get install curl  
sudo apt-get remove docker docker-engine docker.io

## Step 2: Get the GPG key and add the repository

curl -fsSL https://download.docker.com/linux/ubuntu/gpg | sudo apt-key add -  
sudo add-apt-repository "deb [arch=amd64] https://download.docker.com/linux/ubuntu $(lsb\_release -cs) stable"

Now let's do an update

sudo apt-get update

## Step 3: Install Docker

sudo apt-get install -y docker-ce

This should install docker.

## Step 4: Verify Docker is running

sudo systemctl status docker

The output should be as follows:

● docker.service - Docker Application Container Engine  
 Loaded: loaded (/lib/systemd/system/docker.service; enabled; vendor preset: enabled)  
 Active: active (running) since Fri 2018-05-18 00:45:54 UTC; 10s ago  
 Docs: https://docs.docker.com  
 Main PID: 31400 (dockerd)  
 CGroup: /system.slice/docker.service  
 ├─31400 /usr/bin/dockerd -H fd://  
 └─31408 docker-containerd --config /var/run/docker/containerd/containerd.toml

## Step 5: Make a user group for Docker

We don't want to have to run docker as root every time using sudo. So let's create new group called docker, and we will add user ubuntu to that group.

sudo groupadd docker  
sudo usermod -aG docker $USER

Go ahead and log out and log back in again.

## Step 5: Run Hello world container

Run the following hello world container

docker run hello-world

Unable to find image 'hello-world:latest' locally  
latest: Pulling from library/hello-world  
9bb5a5d4561a: Pull complete  
Digest: sha256:f5233545e43561214ca4891fd1157e1c3c563316ed8e237750d59bde73361e77  
Status: Downloaded newer image for hello-world:latest  
  
Hello from Docker!  
This message shows that your installation appears to be working correctly.

Seems to be going ok. Let's see what images that got.

docker images

REPOSITORY TAG IMAGE ID CREATED SIZE  
hello-world latest e38bc07ac18e 5 weeks ago 1.85kB

Looks like things are working!