Lab: Create docker image - modify image

Method 1 – Edit current image

Check container
docker ps
CONTAINER ID   IMAGE   COMMAND   CREATED   STATUS   PORTS   NAMES

docker ps -a
CONTAINER ID   IMAGE   COMMAND   CREATED   STATUS   PORTS   NAMES

Execute docker run with --rm
docker   run   --rm   -i   -t   opensuse   /bin/bash
- run execute docker container
- --rm   Automatically remove the container when it exits
- -i   Keep STDIN open even if not attached
- -t   Allocate a pseudo-TTY

In container
bash-4.2# echo $HOSTNAME
272dfd16c792

Please check your console (If you are in local machine, not cloud)
docker   ps
CONTAINER ID   IMAGE   COMMAND   CREATED   STATUS   PORTS   NAMES
272dfd16c792   opensuse   "/bin/bash"   About a minute ago Up About a minute   mad_poitras

In container
bash-4.2# exit

Check container
docker ps
CONTAINER ID   IMAGE   COMMAND   CREATED   STATUS   PORTS   NAMES

docker ps -a
CONTAINER ID   IMAGE   COMMAND   CREATED   STATUS   PORTS   NAMES

Test docker run without --rm
docker   run   -i   -t   opensuse   /bin/bash

在 container 內
bash-4.2# exit

Check container
docker ps
CONTAINER ID   IMAGE   COMMAND   CREATED   STATUS   PORTS   NAMES

docker ps -a
1dd047e1ec6b   opensuse   "/bin/bash"   36 seconds ago   Exited (0) 29 seconds ago   thirsty_archimedes

Execute a new container
docker run -i -t opensuse /bin/bash

bash-4.2# rpm -qa | grep ssh
libssh2-1-1.4.3-15.1.x86_64

bash-4.2# zypper -n install openssh
```
Retrieving repository 'NON-OSS' metadata ........................................................................[done]
Building repository 'NON-OSS' cache ............................................................................[done]
Retrieving repository 'OSS' metadata ...........................................................................[done]
Building repository 'OSS' cache ................................................................................[done]
Retrieving repository 'OSS Update' metadata ....................................................................[done]
Building repository 'OSS Update' cache .........................................................................[done]
Retrieving repository 'Update Non-Oss' metadata ................................................................[done]
Building repository 'Update Non-Oss' cache .....................................................................[done]
Loading repository data...
Reading installed packages...
Resolving package dependencies...

The following 3 NEW packages are going to be installed:
    libedit0 libncurses6 openssh

The following 3 packages are recommended, but will not be installed (only required packages will be installed):
    audit openssh-helpers xauth

3 new packages to install.
Overall download size: 1.2 MiB. Already cached: 0 B. After the operation, additional 5.7 MiB will be used.
Continue? [y/n/? shows all options] (y): y
Retrieving package libncurses6-5.9-53.4.x86_64                              (1/3), 349.5 KiB (1020.7 KiB unpacked)
Retrieving: libncurses6-5.9-53.4.x86_64.rpm ...................................................................[done]
Retrieving package libedit0-3.1.snap20140620-3.2.x86_64                     (2/3),  94.9 KiB (247.1 KiB unpacked)
Retrieving: libedit0-3.1.snap20140620-3.2.x86_64.rpm ..........................................................[done]
Retrieving package openssh-6.6p1-11.1.x86_64                                (3/3), 830.7 KiB (  4.5 MiB unpacked)
Retrieving: openssh-6.6p1-11.1.x86_64.rpm .....................................................................[done]
Checking for file conflicts: ..................................................................................[done]
(1/3) Installing: libncurses6-5.9-53.4.x86_64 .................................................................[done]
(2/3) Installing: libedit0-3.1.snap20140620-3.2.x86_64 ........................................................[done]
(3/3) Installing: openssh-6.6p1-11.1.x86_64 ...................................................................[done]
Additional rpm output:
Updating /etc/sysconfig/ssh...
```

bash-4.2# rpm -qa | grep ssh
libssh2-1-1.4.3-15.1.x86_64
openssh-6.6p1-11.1.x86_64

It is different with base image

Check container (If you use play with docker, please exit container)
docker ps -a
```
CONTAINER ID       IMAGE          COMMAND           CREATED          STATUS           PORTS            NAMES
f4b981edb1e5       opensuse       "/bin/bash"       5 minutes ago    Up 5 minutes                      sleepy_bhabha
```

Use docker commit to create new docker image
docker commit -m "Add openssh" -a "sakana" f4b981edb1e5   testrepo/testimage:vTEST
c840a5f6ade64751dc26036af4ff6bd79dc42738f7cb3cd32385dc3d8aaee55a

- •commit Create a new image
- •-m Commit message
- •-a Author

- f4b981edb1e5 container ID
- testrepo/testimage:vTEST Repository Name/ImageName:TAG

Check Images

```
# docker  images
REPOSITORY          TAG             IMAGE ID            CREATED           VIRTUAL SIZE
testrepo/testimage  vTEST           c840a5f6ade6        56 seconds ago    168.9 MB
opensuse            42.1            80bd0f661aef        5 weeks ago       97.74 MB
opensuse            latest          80bd0f661aef        5 weeks ago       97.74 MB
busybox             latest          b41c5284db84        7 weeks ago       1.093 MB
```