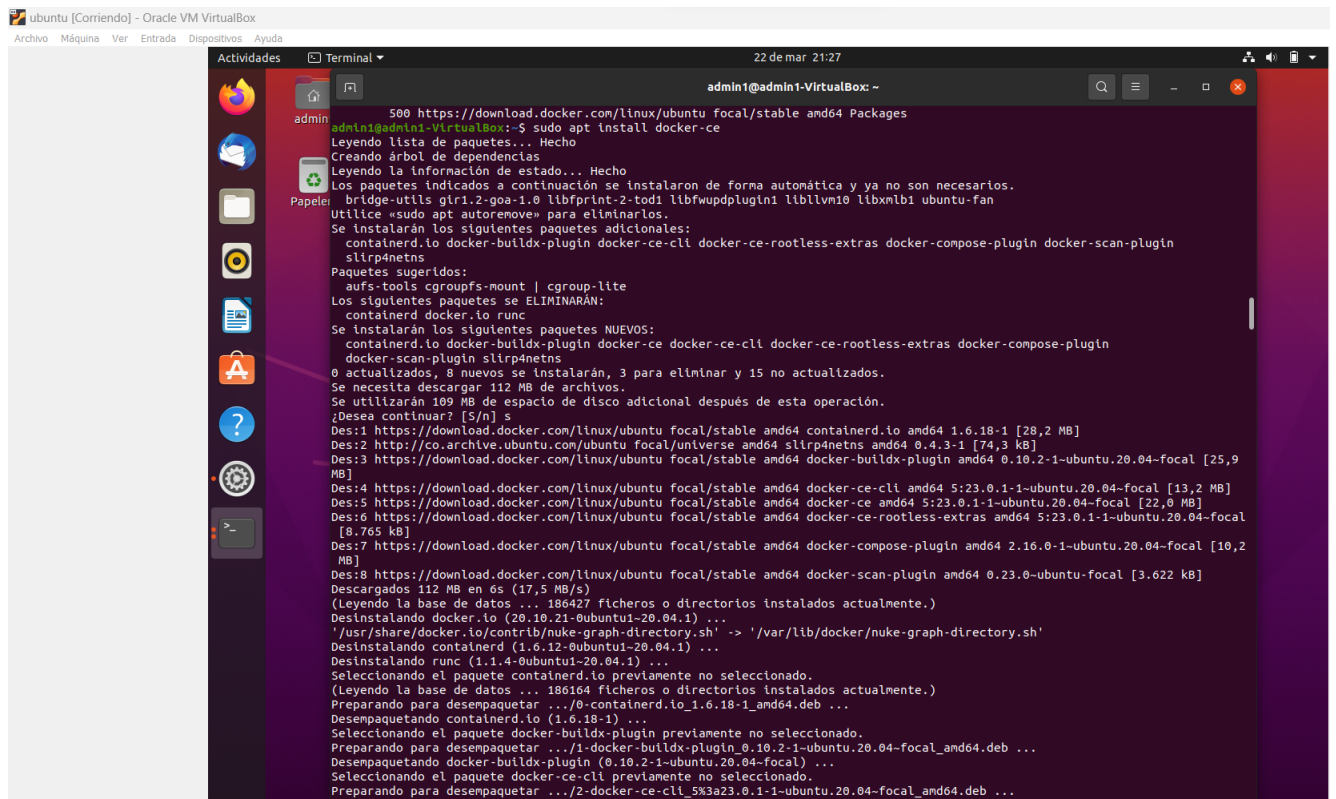
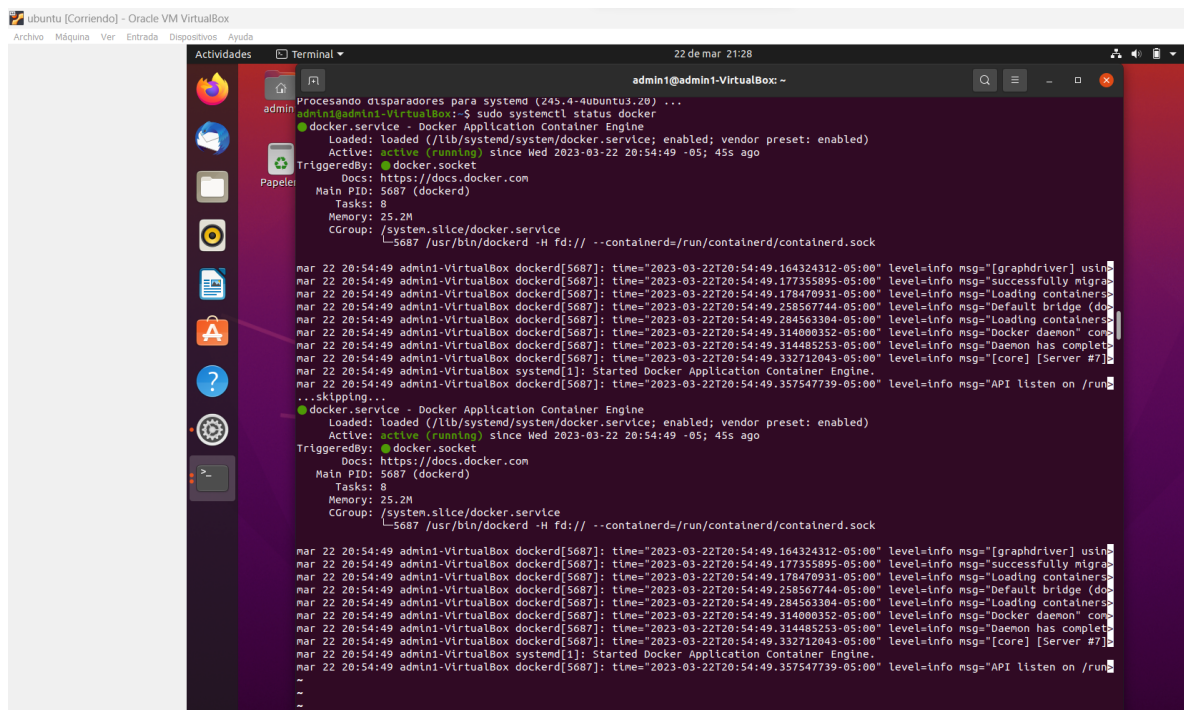


Instalación del docker



```
admin@admin1-VirtualBox: ~  
$ sudo apt install docker-ce  
Leyendo lista de paquetes... Hecho  
Creando árbol de dependencias  
Leyendo la información de estado... Hecho  
Los paquetes indicados a continuación se instalaron de forma automática y ya no son necesarios.  
bridge-utils gir1.2-goa-1.0 libfprint-2-tod1 libfwupdplugin1 libllvmlib1 ubuntu-fan  
Utilice «sudo apt autoremove» para eliminarlos.  
Se instalarán los siguientes paquetes adicionales:  
containerd.io docker-buildx-plugin docker-ce-cli docker-ce-rootless-extras docker-compose-plugin docker-scan-plugin  
slirp4netns  
Paquetes sugeridos:  
aufs-tools cgroupfs-mount | cgroup-lite  
Los siguientes paquetes se ELIMINARÁN:  
containerd docker.io runc  
Se instalarán los siguientes paquetes NUEVOS:  
containerd.io docker-buildx-plugin docker-ce docker-ce-cli docker-ce-rootless-extras docker-compose-plugin  
docker-scan-plugin slirp4netns  
0 actualizados, 8 nuevos se instalarán, 3 para eliminar y 15 no actualizados.  
Se necesita descargar 112 MB de archivos.  
Se utilizarán 109 MB de espacio de disco adicional después de esta operación.  
¿Desea continuar? [S/n] S  
Des:1 https://download.docker.com/linux/ubuntu focal/stable amd64 containerd.io amd64 1.6.18-1 [28,2 MB]  
Des:2 http://co.archive.ubuntu.com/ubuntu focal/universe amd64 slirp4netns amd64 0.4.3-1 [74,3 kB]  
Des:3 https://download.docker.com/linux/ubuntu focal/stable amd64 docker-buildx-plugin amd64 0.10.2-1-ubuntu.20.04-focal [25,9 MB]  
Des:4 https://download.docker.com/linux/ubuntu focal/stable amd64 docker-ce-cli amd64 5:23.0.1-1-ubuntu.20.04-focal [13,2 MB]  
Des:5 https://download.docker.com/linux/ubuntu focal/stable amd64 docker-ce amd64 5:23.0.1-1-ubuntu.20.04-focal [22,0 MB]  
Des:6 https://download.docker.com/linux/ubuntu focal/stable amd64 docker-ce-rootless-extras amd64 5:23.0.1-1-ubuntu.20.04-focal [8,765 kB]  
Des:7 https://download.docker.com/linux/ubuntu focal/stable amd64 docker-compose-plugin amd64 2.16.0-1-ubuntu.20.04-focal [10,2 MB]  
Des:8 https://download.docker.com/linux/ubuntu focal/stable amd64 docker-scan-plugin amd64 0.23.0-ubuntu-focal [3,622 kB]  
Descargados 112 MB en 6s (17,5 MB/s)  
(Leyendo la base de datos ... 186427 ficheros o directorios instalados actualmente.)  
Desinstalando docker.io (20.10.21-0ubuntu1-20.04.1) ...  
'/usr/share/docker.io/contrib/nuke-graph-directory.sh' -> '/var/lib/docker/nuke-graph-directory.sh'  
Desinstalando containerd (1.6.12-0ubuntu1-20.04.1) ...  
Desinstalando runc (1.1.4-0ubuntu1-20.04.1) ...  
Seleccionando el paquete containerd.io previamente no seleccionado.  
(Leyendo la base de datos ... 186104 ficheros o directorios instalados actualmente.)  
Preparando para desempaquetar .../0-containerd.io-1.6.18-1-amd64.deb ...  
Desempaquetando containerd.io (1.6.18-1) ...  
Seleccionando el paquete docker-buildx-plugin previamente no seleccionado.  
Preparando para desempaquetar .../1-docker-buildx-plugin_0.10.2-1-ubuntu.20.04-focal_amd64.deb ...  
Desempaquetando docker-buildx-plugin (0.10.2-1-ubuntu.20.04-focal) ...  
Seleccionando el paquete docker-ce-cli previamente no seleccionado.  
Preparando para desempaquetar .../2-docker-ce-cli_5%3a23.0.1-1-ubuntu.20.04-focal_amd64.deb ...
```

Comprobación del funcionamiento del docker



```
admin@admin1-VirtualBox: ~  
$ sudo systemctl status docker  
● docker.service - Docker Application Container Engine  
Loaded: loaded (/lib/systemd/system/docker.service; enabled; vendor preset: enabled)  
Active: active (running) since Wed 2023-03-22 20:54:49 -05; 45s ago  
TriggeredBy: ● docker.socket  
Docs: https://docs.docker.com  
Main PID: 5687 (dockerd)  
Tasks: 8  
Memory: 25.2M  
CGroup: /system.slice/docker.service  
└─5687 /usr/bin/dockerd -H fd:// --containerd=/run/containerd/containerd.sock  
  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.164324312-05:00" level=info msg="[graphdriver] using default graph driver" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.177358995-05:00" level=info msg="successfully migrated daemon to use systemd cgroup" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.178470931-05:00" level=info msg="Loading containers: start." data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.258507744-05:00" level=info msg="Default bridge (docker0) is already up. To create new bridges, use 'docker network create'. If you don't wish to create new networks, you can remove networkmngt from the docker daemon config and then start docker." data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.314000352-05:00" level=info msg="Docker daemon" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.314485253-05:00" level=info msg="Daemon has completed initialization" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.332712043-05:00" level=info msg="[core] Server #7" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox system[1]: Started Docker Application Container Engine.  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.357547739-05:00" level=info msg="API listen on /run/docker.sock" data:image/png;base64: [REDACTED]  
...skipping...  
● docker.service - Docker Application Container Engine  
Loaded: loaded (/lib/systemd/system/docker.service; enabled; vendor preset: enabled)  
Active: active (running) since Wed 2023-03-22 20:54:49 -05; 45s ago  
TriggeredBy: ● docker.socket  
Docs: https://docs.docker.com  
Main PID: 5687 (dockerd)  
Tasks: 8  
Memory: 25.2M  
CGroup: /system.slice/docker.service  
└─5687 /usr/bin/dockerd -H fd:// --containerd=/run/containerd/containerd.sock  
  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.164324312-05:00" level=info msg="[graphdriver] using default graph driver" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.177358995-05:00" level=info msg="successfully migrated daemon to use systemd cgroup" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.178470931-05:00" level=info msg="Loading containers: start." data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.258507744-05:00" level=info msg="Default bridge (docker0) is already up. To create new bridges, use 'docker network create'. If you don't wish to create new networks, you can remove networkmngt from the docker daemon config and then start docker." data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.314000352-05:00" level=info msg="Docker daemon" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.314485253-05:00" level=info msg="Daemon has completed initialization" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.332712043-05:00" level=info msg="[core] Server #7" data:image/png;base64: [REDACTED]  
mar 22 20:54:49 admin1-VirtualBox system[1]: Started Docker Application Container Engine.  
mar 22 20:54:49 admin1-VirtualBox dockerd[5687]: time="2023-03-22T20:54:49.357547739-05:00" level=info msg="API listen on /run/docker.sock" data:image/png;base64: [REDACTED]  
...skipping...  
~  
~  
~
```

Visualización de la versión del docker

```
admin1@admin1-VirtualBox:~$ sudo docker version
Client: Docker Engine - Community
Version:      23.0.1
API version:  1.42
Go version:   go1.19.5
Git commit:   a5ee5b1
Built:        Thu Feb  9 19:46:56 2023
OS/Arch:     linux/amd64
Context:     default

Server: Docker Engine - Community
Engine:
Version:      23.0.1
API version:  1.42 (minimum version 1.12)
Go version:   go1.19.5
Git commit:   bc3805a
Built:        Thu Feb  9 19:46:56 2023
OS/Arch:     linux/amd64
Experimental: false
containerd:
Version:      1.6.18
GitCommit:    2456e983eb9e37e47538f59ea18f2043c9a73640
runc:
Version:      1.1.4
GitCommit:    v1.1.4-0-g5fd4c4d
docker-init:
Version:      0.19.0
GitCommit:    de40ad0
```

Se muestran las imágenes

```
admin1@admin1-VirtualBox:~$ sudo docker images
REPOSITORY    TAG       IMAGE ID       CREATED        SIZE
python        latest    a8405b7e74cf   9 days ago    921MB
ubuntu        18.04    3941d3b032a8   2 weeks ago    63.1MB
```

Se crea un contenedor con un ID

```
admin1@admin1-VirtualBox:~$ sudo docker run -it ubuntu:18.04 /bin/bash
root@c711d4393018:/# ls
bin boot dev etc home lib lib64 media mnt opt proc root run sbin srv sys usr var
root@c711d4393018:/# docker ps -a
bash: docker: command not found
root@c711d4393018:/# sudo docker ps -a
bash: sudo: command not found
root@c711d4393018:/# sudo docker ps
bash: sudo: command not found
root@c711d4393018:/# exit
exit
admin1@admin1-VirtualBox:~$ sudo docker ps
CONTAINER ID   IMAGE     COMMAND   CREATED   STATUS    PORTS   NAMES
admin1@admin1-VirtualBox:~$
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS	PORTS	NAMES
c711d4393018	ubuntu:18.04	"/bin/bash"	3 minutes ago	Exited (127) 46 seconds ago		
bold_goldwasser						
14890a19e663	python	"python3"	14 minutes ago	Exited (0) 14 minutes ago		
86b98a302ff6	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (255) 40 minutes ago		
4484d58d85c3	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (127) 4 days ago		

Se muestran los contenedores creados

```
Actividades Terminal 22 de mar 21:36
admin1@admin1-VirtualBox: ~
admin1@admin1-VirtualBox:~$ sudo docker ps -a
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS	PORTS	NAMES
1c33a210a9d5	ubuntu:18.04	"/bin/bash"	About a minute ago	Up About a minute		naughty_khorana
c711d4393018	ubuntu:18.04	"/bin/bash"	19 minutes ago	Exited (127) 16 minutes ago		bold_goldwasser
14890a19e663	python	"python3"	30 minutes ago	Exited (0) 30 minutes ago		blissful_grothendieck
86b98a302ff6	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (255) 56 minutes ago		peaceful_hofstadter
4484d58d85c3	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (127) 4 days ago		charming_brown

```
admin1@admin1-VirtualBox:~$
```

Se muestra el contenedor finalizado

```
Actividades Terminal 22 de mar 21:37
admin1@admin1-VirtualBox: ~
admin1@admin1-VirtualBox:~$ sudo docker ps -a
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS	PORTS	NAMES
1c33a210a9d5	ubuntu:18.04	"/bin/bash"	About a minute ago	Up About a minute		naughty_khorana
c711d4393018	ubuntu:18.04	"/bin/bash"	19 minutes ago	Exited (127) 16 minutes ago		bold_goldwasser
14890a19e663	python	"python3"	30 minutes ago	Exited (0) 30 minutes ago		blissful_grothendieck
86b98a302ff6	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (255) 56 minutes ago		peaceful_hofstadter
4484d58d85c3	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (127) 4 days ago		charming_brown

```
admin1@admin1-VirtualBox:~$ sudo docker ps -a
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS	PORTS	NAMES
1c33a210a9d5	ubuntu:18.04	"/bin/bash"	2 minutes ago	Exited (0) 10 seconds ago		naughty_khorana
c711d4393018	ubuntu:18.04	"/bin/bash"	20 minutes ago	Exited (127) 18 minutes ago		bold_goldwasser
14890a19e663	python	"python3"	31 minutes ago	Exited (0) 31 minutes ago		blissful_grothendieck
86b98a302ff6	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (255) 57 minutes ago		peaceful_hofstadter
4484d58d85c3	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (127) 4 days ago		charming_brown

```
admin1@admin1-VirtualBox:~$
```

Se elimina el contenedor

```
admin1@admin1-VirtualBox:~$ sudo docker start 1c33a210a9d5
1c33a210a9d5
admin1@admin1-VirtualBox:~$ sudo docker exec -it 1c33a210a9d5 /bin/bash
root@1c33a210a9d5:/# exit
exit
admin1@admin1-VirtualBox:~$ sudo docker stop 1c33a210a9d5
1c33a210a9d5
admin1@admin1-VirtualBox:~$ sudo docker rm 1c33a210a9d5
1c33a210a9d5
admin1@admin1-VirtualBox:~$ sudo docker ps -a
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS	PORTS	NAMES
c711d4393018	ubuntu:18.04	"/bin/bash"	25 minutes ago	Exited (127) 22 minutes ago		bold_goldwasser
14890a19e663	python	"python3"	36 minutes ago	Exited (0) 36 minutes ago		blissful_grothendieck
86b98a302ff6	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (255) About an hour ago		peaceful_hofstadter
4484d58d85c3	ubuntu:18.04	"/bin/bash"	4 days ago	Exited (127) 4 days ago		charming_brown

```
admin1@admin1-VirtualBox:~$
```