

1. Comprueba la versión de Docker:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker --version
Docker version 28.3.2, build 578ccf6
```

2. Descarga una imagen de Docker, por ejemplo, httpd (Apache):

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker pull httpd
Using default tag: latest
latest: Pulling from library/httpd
Digest: sha256:3198c1839e1a875f8b83803083758a7635f1ae999f0601f30f2f3b8ce2ac99e3
Status: Image is up to date for httpd:latest
docker.io/library/httpd:latest
```

3. Consulta las imágenes descargadas:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker images
```

REPOSITORY	TAG	IMAGE ID	CREATED	SIZE
postgres	13	27236001f2a4	7 days ago	620MB
httpd	latest	3198c1839e1a	13 days ago	174MB
mongo	latest	95a98776f273	4 weeks ago	1.22GB
mysql	8.0	f483084b3708	4 weeks ago	1.07GB
node	20-alpine	df02558528d3	5 weeks ago	192MB

4. Ejecuta una instancia (contenedor) de la imagen descargada (httpd):

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker run -it -d -p 8080:80 httpd
9bf3256cf6802d6582f6478be39399d4754adae608e9b228b23579761b835434
```

5. Consulta todos los contenedores creados:

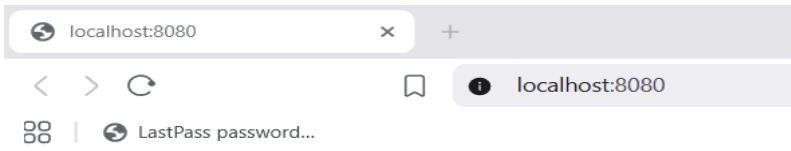
```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker ps
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS	PORTS
9bf3256cf680	httpd	"httpd-foreground"	About a minute ago	Up About a minute	0.0.0.0:8080->80/tcp, [::]:8080->80/tcp

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker ps -a
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS	PORTS
9bf3256cf680	httpd	"httpd-foreground"	2 minutes ago	Up 2 minutes	0.0.0.0:8080->80/tcp, [::]:8080->80/tcp
94d9bd7e51f4	postgres:13	"docker-entrypoint.s..."	5 days ago	Exited (0) 3 days ago	
5c72d3857fc7	mysql:8.0	"docker-entrypoint.s..."	5 days ago	Exited (0) 3 days ago	

6. Comprueba el funcionamiento del contenedor desde el host:



It works!

7. Ejecuta la terminal de Linux dentro del contenedor:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker exec -it 9bf3256cf6802d6582f6478be39399d4754adae608e9b228b23579761b835434 bash
root@9bf3256cf680:/usr/local/apache2#
```

8. Borra el contenedor creado:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker rm 9bf3256cf6802d6582f6478be39399d4754adae608e9b228b23579761b835434
9bf3256cf6802d6582f6478be39399d4754adae608e9b228b23579761b835434
```

9. Comprueba que el contenedor ha sido eliminado:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker ps -a
```

CONTAINER ID	IMAGE	COMMAND	CREATED	STATUS	PORTS	NAMES
04d9bd7e51f4	postgres:13	"docker-entrypoint.s..."	5 days ago	Exited (0) 3 days ago		db_server11
5c72d3857fc7	mysql:8.0	"docker-entrypoint.s..."	5 days ago	Exited (0) 3 days ago		db_server12

10. Borra la imagen usando la identificación del Contenedor ha sido eliminado:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker rmi sha256:3198c1839e1a875f8b83803083758a7635f1ae999f0601f30f2f3b8ce2ac99e3
Untagged: httpd:latest
Deleted: sha256:3198c1839e1a875f8b83803083758a7635f1ae999f0601f30f2f3b8ce2ac99e3
```

11. Reinicia el contenedor:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker restart 1e7a06e995b8de5e842a3e84e061776ca2188af9a9fc59cdd5b6651e8d3c7983
1e7a06e995b8de5e842a3e84e061776ca2188af9a9fc59cdd5b6651e8d3c7983
```

12. Detén y levanta el contenedor:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker stop 1e7a06e995b8de5e842a3e84e061776ca2188af9a9fc59cdd5b6651e8d3c7983
1e7a06e995b8de5e842a3e84e061776ca2188af9a9fc59cdd5b6651e8d3c7983
```

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker ps
CONTAINER ID   IMAGE                                COMMAND                  CREATED        STATUS        PORTS        NAMES
```

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker start 1e7a06e995b8de5e842a3e84e061776ca2188af9a9fc59cdd5b6651e8d3c7983
1e7a06e995b8de5e842a3e84e061776ca2188af9a9fc59cdd5b6651e8d3c7983
```

13. Mata el contenedor:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker kill 1e7a06e995b8de5e842a3e84e061776ca2188af9a9fc59cdd5b6651e8d3c7983
1e7a06e995b8de5e842a3e84e061776ca2188af9a9fc59cdd5b6651e8d3c7983
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker ps
CONTAINER ID   IMAGE                                COMMAND                  CREATED        STATUS        PORTS        NAMES
```

14. Visualiza los detalles de la red definida con los clústeres:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker network
Usage: docker network COMMAND

Manage networks

Commands:
 connect      Connect a container to a network
 create       Create a network
 disconnect   Disconnect a container from a network
 inspect      Display detailed information on one or more networks
 ls           List networks
 prune        Remove all unused networks
 rm           Remove one or more networks
```

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker network ls
NETWORK ID     NAME                                          DRIVER  SCOPE
1366137d4378   bridge                                       bridge  local
8a843ce1c07c   descargastallerdeespecialidad_laravel_network1  bridge  local
95501e29be84   host                                         host    local
8a0bea21ebcc   none                                         null    local
```

15. Obtén información detallada sobre los recursos de Docker:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker info
Client:
 Version:      28.3.2
 Context:      desktop-linux
 Debug Mode:   false
 Plugins:
  ai: Docker AI Agent - Ask Gordon (Docker Inc.)
    Version:  v1.9.11
    Path:      C:\Program Files\Docker\cli-plugins\docker-ai.exe
  buildx: Docker Buildx (Docker Inc.)
    Version:  v0.26.1-desktop.1
    Path:      C:\Program Files\Docker\cli-plugins\docker-buildx.exe
  ccloud: Docker Cloud (Docker Inc.)
    Version:  v0.4.18
    Path:      C:\Program Files\Docker\cli-plugins\docker-cloud.exe
  compose: Docker Compose (Docker Inc.)
    Version:  v2.39.1-desktop.1
    Path:      C:\Program Files\Docker\cli-plugins\docker-compose.exe
  debug: Get a shell into any image or container (Docker Inc.)
    Version:  0.0.42
    Path:      C:\Program Files\Docker\cli-plugins\docker-debug.exe
  desktop: Docker Desktop commands (Docker Inc.)
    Version:  v0.2.0
    Path:      C:\Program Files\Docker\cli-plugins\docker-desktop.exe
  extension: Manages Docker extensions (Docker Inc.)
    Version:  v0.2.29
```

16. Revisa el historial de una imagen:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker history httpd
IMAGE          CREATED          CREATED BY          SIZE      COMMENT
3198c1839e1a   13 days ago     CMD ["httpd-foreground"]  0B        buildkit.dockerfile.v0
<missing>      13 days ago     EXPOSE map[80/tcp:{}]    0B        buildkit.dockerfile.v0
<missing>      13 days ago     COPY httpd-foreground /usr/local/bin/ # buil... 20.5kB    buildkit.dockerfile.v0
<missing>      13 days ago     STOPSIGNAL SIGWINCH      0B        buildkit.dockerfile.v0
<missing>      13 days ago     RUN /bin/sh -c set -eux; savedAptMark="$(a... 34.8MB    buildkit.dockerfile.v0
<missing>      13 days ago     ENV HTTPD_PATCHES=       0B        buildkit.dockerfile.v0
<missing>      13 days ago     ENV HTTPD_SHA256=58b8be97d9940ec17f7656c0c6b... 0B        buildkit.dockerfile.v0
<missing>      13 days ago     ENV HTTPD_VERSION=2.4.65 0B        buildkit.dockerfile.v0
<missing>      13 days ago     RUN /bin/sh -c set -eux; apt-get install --... 7MB       buildkit.dockerfile.v0
<missing>      13 days ago     WORKDIR /usr/local/apache2 4.1kB     buildkit.dockerfile.v0
<missing>      13 days ago     RUN /bin/sh -c mkdir -p "$HTTPD_PREFIX" && ... 16.4kB    buildkit.dockerfile.v0
<missing>      13 days ago     ENV PATH=/usr/local/apache2/bin:/usr/local/s... 0B        buildkit.dockerfile.v0
<missing>      13 days ago     ENV HTTPD_PREFIX=/usr/local/apache2          0B        buildkit.dockerfile.v0
<missing>      13 days ago     # debian.sh --arch 'amd64' out/ 'trixie' '@1... 87.4MB    debuerreotype 0.15
```

17. Busca una imagen según el nombre:

```
PS C:\Users\GERMAN_ZELAYA\OneDrive\Documentos\MicroserviciosDGDZ\practica_clase_2> docker search mongo
NAME                DESCRIPTION                STARS      OFFICIAL
mongo               MongoDB document databases provide high avai... 10618     [OK]
circleci/mongo      CircleCI images for MongoDB 16
corpusops/mongo      https://github.com/corpusops/docker-images/    0
rootpublic/mongo     0
uselagoon/mongo      0
ekesken/mongo         docker image for mongo that is configurable ... 1
vepo/mongo            Mongo image with default settings              1
litmuschaos/mongo     1
jelastic/mongo        An image of the MongoDB database server main... 0
arm64v8/mongo         MongoDB document databases provide high avai... 36
zinobe/mongo          mongo with custom user                        0
s390x/mongo           MongoDB document databases provide high avai... 1
kubedb/mongo          0
cescoferraro/mongo    docker alpine mongo                          0
ccitest/mongo         CircleCI test images for Mongo                 0
amd64/mongo           MongoDB document databases provide high avai... 0
sacashgit/mongo       0
excellalabs/mongo     Dockerfile and scripts to setup a production... 2
winamd64/mongo        MongoDB document databases provide high avai... 1
mongodb/mongodb-community-server The Official MongoDB Community Server         164
healthcheck/mongo     https://github.com/docker-library/healthchec... 5
pagarme/mongo         0
pastvu/mongo          0
sscpac/mongo          alpine mongo                                  0
mongodb/mongodb-atlas-local Create, manage, and automate MongoDB Atlas L... 8
```