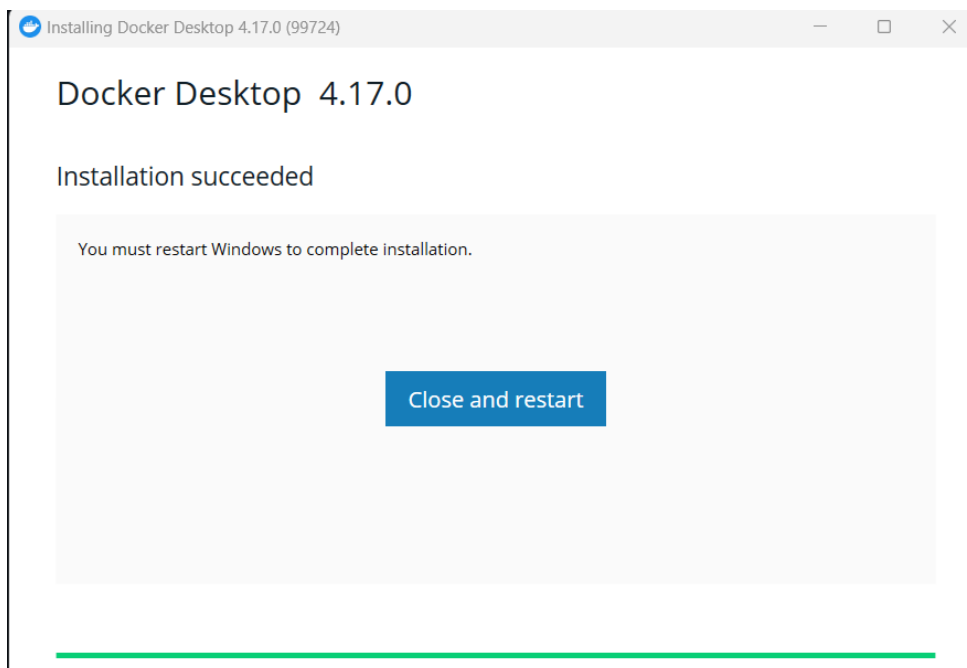
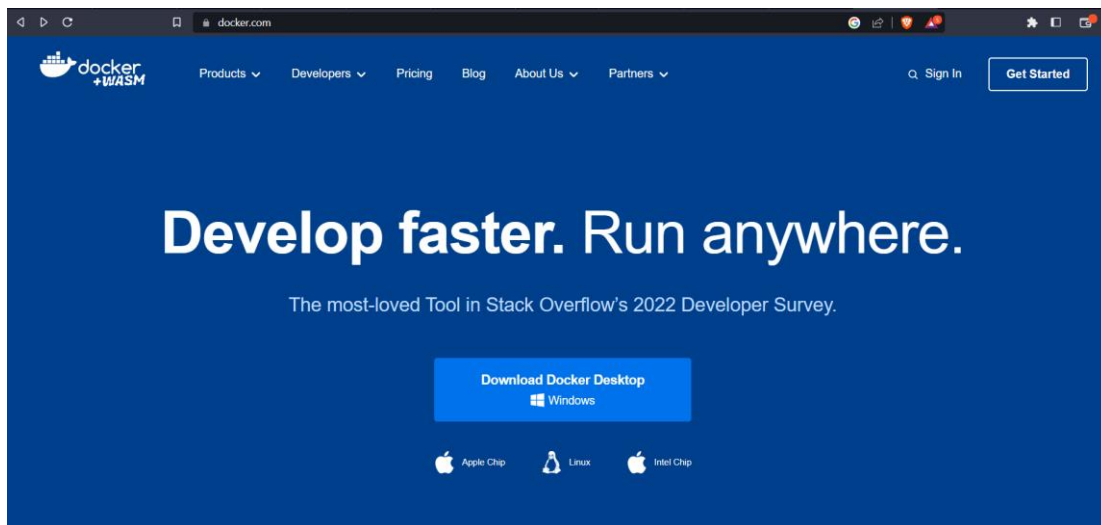
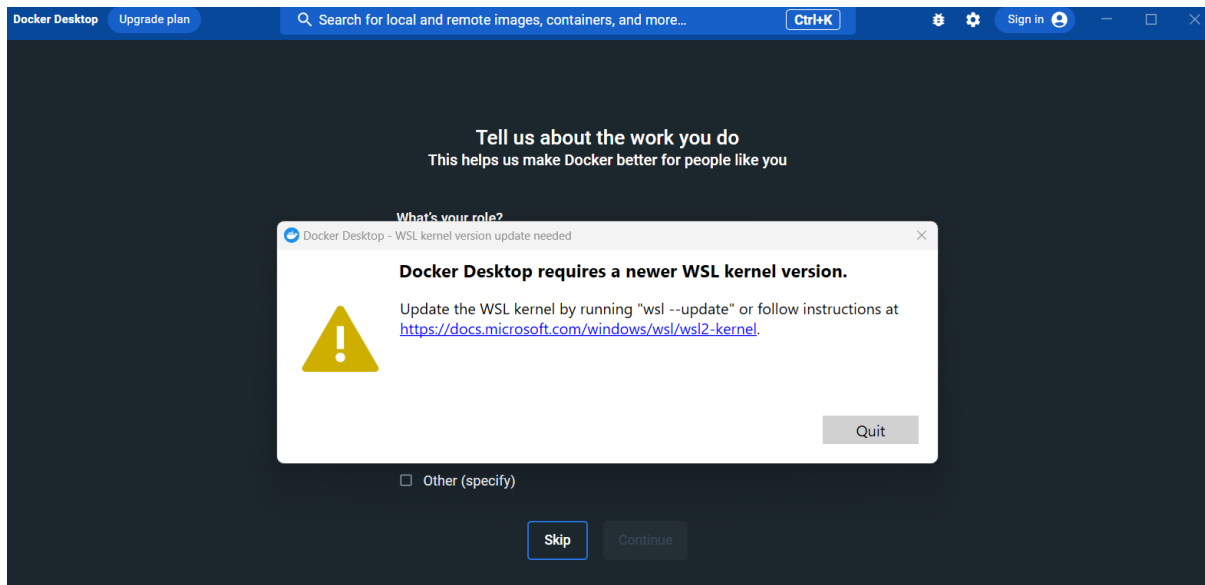


1. Download Docker from the Official Website and wait for the installation to be completed. Grant the relevant access and permissions.



2. Download and install WSL2



• Exploring Docker Commands

```
C:\Users\pronn>docker version
Client:
 Cloud integration: v1.0.31
 Version:          20.10.23
 API version:      1.41
 Go version:       go1.18.10
 Git commit:       7155243
 Built:            Thu Jan 19 17:43:10 2023
 OS/Arch:          windows/amd64
 Context:          default
 Experimental:     true

Server: Docker Desktop 4.17.0 (99724)
Engine:
 Version:          20.10.23
 API version:      1.41 (minimum version 1.12)
 Go version:       go1.18.10
 Git commit:       6051f14
 Built:            Thu Jan 19 17:32:04 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
```

```
C:\Users\pronn>docker info
Client:
 Context:          default
 Debug Mode: false
 Plugins:
  buildx: Docker Buildx (Docker Inc., v0.10.3)
  compose: Docker Compose (Docker Inc., v2.15.1)
  dev: Docker Dev Environments (Docker Inc., v0.1.0)
  extension: Manages Docker extensions (Docker Inc., v0.2.18)
  sbom: View the packaged-based Software Bill Of Materials (SBOM) for an image (Anchore Inc., 0.6.0)
  scan: Docker Scan (Docker Inc., v0.25.0)
  scout: Command line tool for Docker Scout (Docker Inc., v0.6.0)

Server:
 Containers: 2
  Running: 1
  Paused: 0
  Stopped: 1
 Images: 1
 Server Version: 20.10.23
```

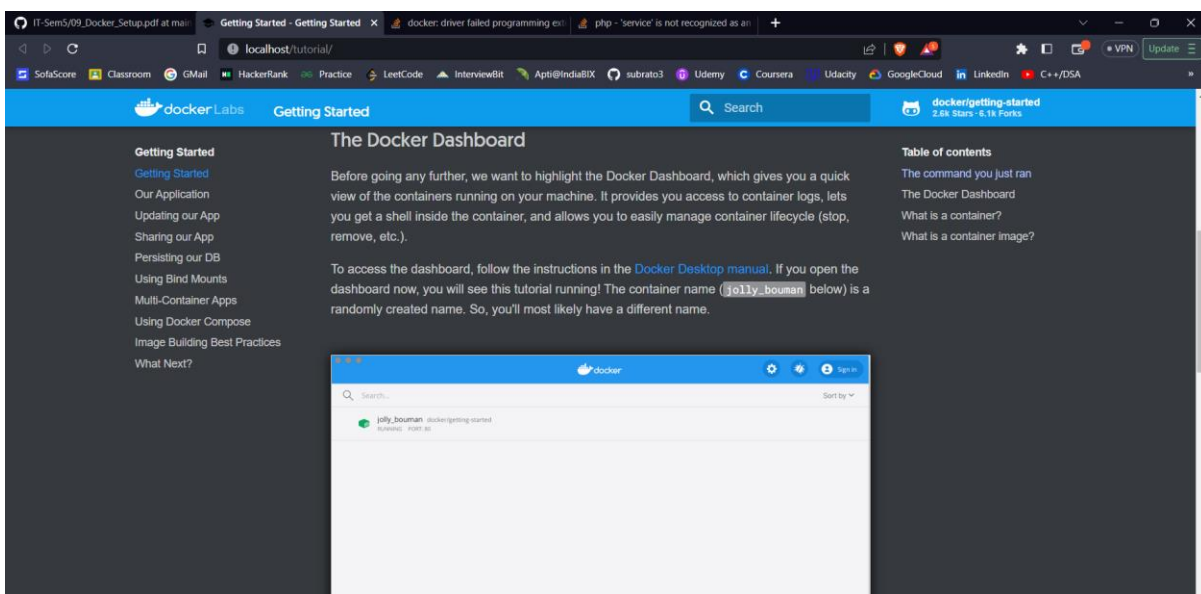
Docker Images:

```
C:\Users\pronn>docker images
REPOSITORY          TAG             IMAGE ID        CREATED         SIZE
docker/getting-started latest          3e4394f6b72f   3 months ago   47MB

C:\Users\pronn>docker container ls
CONTAINER ID   IMAGE             COMMAND                  CREATED         STATUS         PORTS           NAMES
5f1f6c6af262   docker/getting-started "/docker-entrypoint..." 8 minutes ago   Up 8 minutes   0.0.0.0:80->80/tcp   goofy_visvesvaraya
```

Starting a docker container:

```
C:\Users\pronn>docker run -d -p 80:80 docker/getting-started
Unable to find image 'docker/getting-started:latest' locally
latest: Pulling from docker/getting-started
c158987b0551: Pull complete
1e35f6679fab: Pull complete
cb9626c74200: Pull complete
b6334b6ace34: Pull complete
f1d1c9928c82: Pull complete
9b6f639ec6ea: Pull complete
ee68d3549ec8: Pull complete
33e0cbbb4673: Pull complete
4f7e34c2de10: Pull complete
Digest: sha256:d79336f4812b6547a53e735480dde67f8f8f7071b414fbd9297609ffb989abc1
Status: Downloaded newer image for docker/getting-started:latest
5f1f6c6af2622ba631853d917c86f0b8b1bc1be92b53c2f2d84ee5dbb8938fad
```



- Listing out all the running containers: `docker container ls`
- Stopping a running container: `docker container stop <id>`

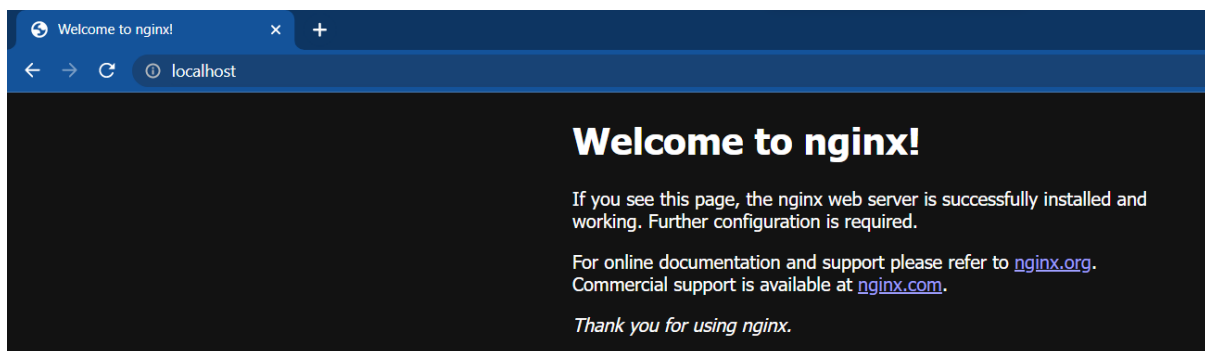
```
C:\Users\pronn>docker container ls
CONTAINER ID   IMAGE             COMMAND                  CREATED         STATUS         PORTS           NAMES
6e1f6eebf3ef   nginx            "/docker-entrypoint..." 8 minutes ago   Up 8 minutes   0.0.0.0:80->80/tcp   nginx
5f1f6c6af262   docker/getting-started "/docker-entrypoint..." 8 minutes ago   Up 8 minutes   0.0.0.0:80->80/tcp   goofy_visvesvaraya

C:\Users\pronn>docker container stop 5f1f6c6af262
5f1f6c6af262
```


Starting another container from Image:

```
C:\Users\pronn>docker container run --publish 80:80 -d nginx
Unable to find image 'nginx:latest' locally
latest: Pulling from library/nginx
f1f26f570256: Pull complete
7f7f30930c6b: Pull complete
2836b727df80: Pull complete
e1eeb0f1c06b: Pull complete
86b2457cc2b0: Pull complete
9862f2ee2e8c: Pull complete
Digest: sha256:2ab30d6ac53580a6db8b657abf0f68d75360ff5cc1670a85acb5bd85ba1b19c0
Status: Downloaded newer image for nginx:latest
abb0e04a4bb71ae5f4c12e28c6880207f20bb50e6724c4b24c959bf26348e5aa
docker: Error response from daemon: driver failed programming external connectivity
594e31bac87a6c6620f): Bind for 0.0.0.0:80 failed: port is already allocated.
```

Nginx has been started:



Getting the log of a particular container

docker container logs <id>

```
C:\Users\pronn>docker container logs 8291
/docker-entrypoint.sh: /docker-entrypoint.d/ is not empty, will attempt to perform configuration
/docker-entrypoint.sh: Looking for shell scripts in /docker-entrypoint.d/
/docker-entrypoint.sh: Launching /docker-entrypoint.d/10-listen-on-ipv6-by-default.sh
10-listen-on-ipv6-by-default.sh: info: Getting the checksum of /etc/nginx/conf.d/default.conf
10-listen-on-ipv6-by-default.sh: info: Enabled listen on IPv6 in /etc/nginx/conf.d/default.conf
/docker-entrypoint.sh: Launching /docker-entrypoint.d/20-envsubst-on-templates.sh
/docker-entrypoint.sh: Launching /docker-entrypoint.d/30-tune-worker-processes.sh
/docker-entrypoint.sh: Configuration complete; ready for start up
2023/04/02 04:14:02 [notice] 1#1: using the "epoll" event method
2023/04/02 04:14:02 [notice] 1#1: nginx/1.23.4
2023/04/02 04:14:02 [notice] 1#1: built by gcc 10.2.1 20210110 (Debian 10.2.1-6)
2023/04/02 04:14:02 [notice] 1#1: OS: Linux 5.10.102.1-microsoft-standard-WSL2
2023/04/02 04:14:02 [notice] 1#1: getrlimit(RLIMIT_NOFILE): 1048576:1048576
2023/04/02 04:14:02 [notice] 1#1: start worker processes
2023/04/02 04:14:02 [notice] 1#1: start worker process 29
2023/04/02 04:14:02 [notice] 1#1: start worker process 30
2023/04/02 04:14:02 [notice] 1#1: start worker process 31
2023/04/02 04:14:02 [notice] 1#1: start worker process 32
2023/04/02 04:14:02 [notice] 1#1: start worker process 33
2023/04/02 04:14:02 [notice] 1#1: start worker process 34
2023/04/02 04:14:02 [notice] 1#1: start worker process 35
2023/04/02 04:14:02 [notice] 1#1: start worker process 36
2023/04/02 04:14:02 [notice] 1#1: start worker process 37
2023/04/02 04:14:02 [notice] 1#1: start worker process 38
2023/04/02 04:14:02 [notice] 1#1: start worker process 39
2023/04/02 04:14:02 [notice] 1#1: start worker process 40
```