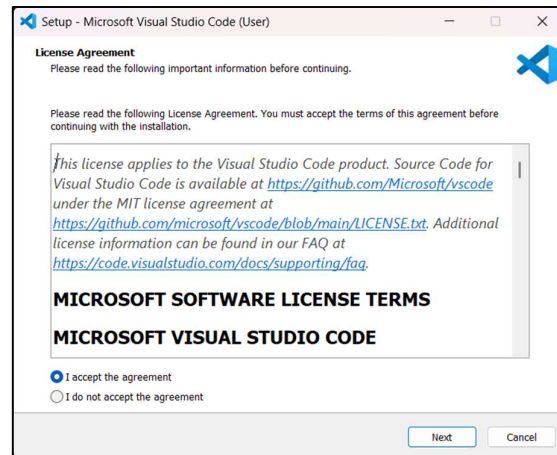


Software Configuration

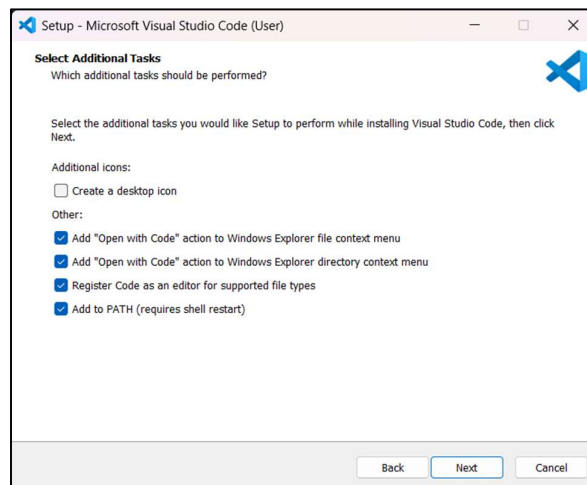
Installation of VS Code IDE, Python and the required libraries

To install VSCode on your Windows PC, follow the next instructions

- Insert the CD-ROM or PENDRIVE that contains the VSCode setup file.
- Copy the VSCode Setup File to your desired location on your computer.
- After copying, double-click on the setup file to start the installation.

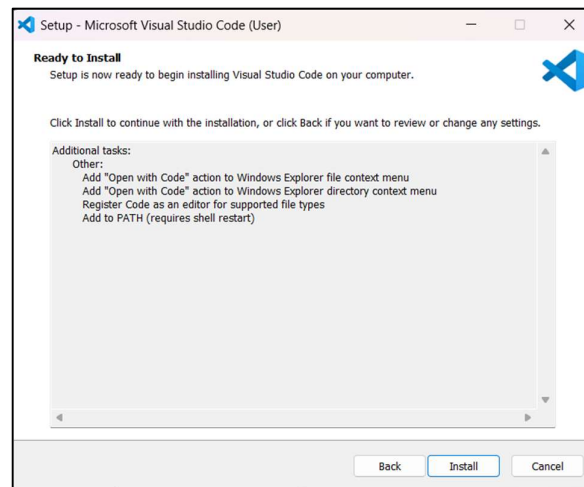


- Click on I accept and next

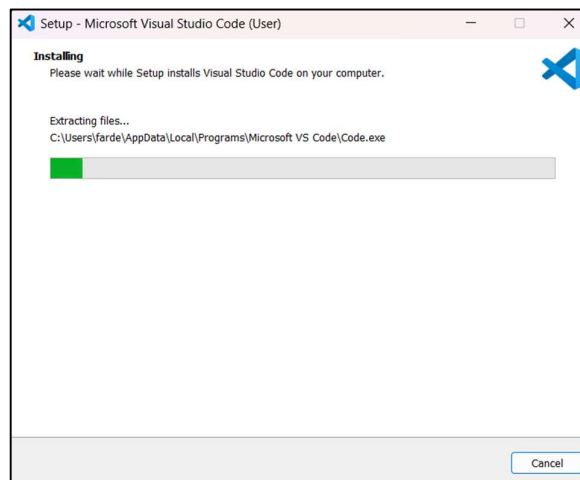
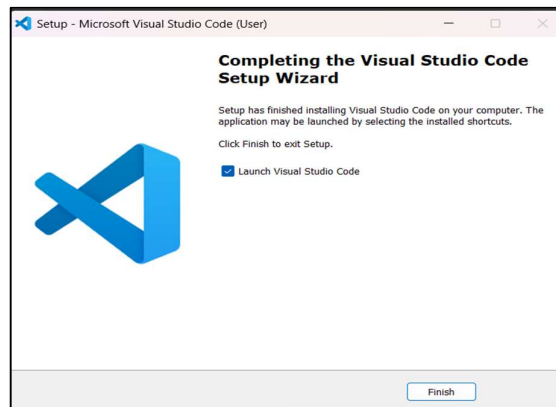


- Select the required additional tasks and click on next.

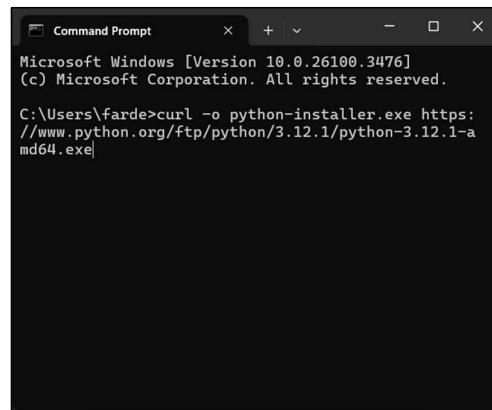
- Click on Install
- A progress bar appears.



- Click on Finish



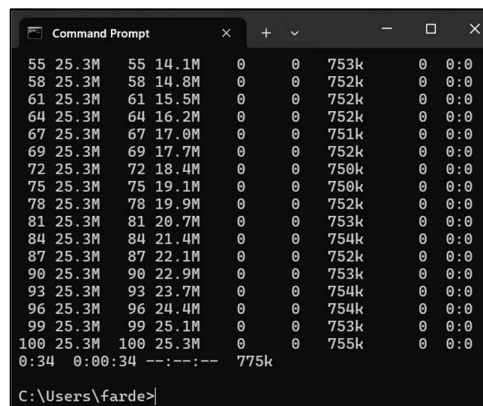
- Install python using the command line. Open cmd in the PC.



```
Microsoft Windows [Version 10.0.26100.3476]
(c) Microsoft Corporation. All rights reserved.

C:\Users\farde>curl -o python-installer.exe https://www.python.org/ftp/python/3.12.1/python-3.12.1-amd64.exe
```

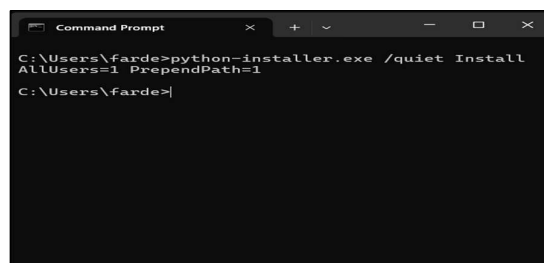
- run the following command and press enter, curl -o python-installer.exe https://www.python.org/ftp/python/3.12.1/python-3.12.1-amd64.exe



```
55 25.3M 55 14.1M 0 0 753k 0 0:0
58 25.3M 58 14.8M 0 0 752k 0 0:0
61 25.3M 61 15.5M 0 0 752k 0 0:0
64 25.3M 64 16.2M 0 0 752k 0 0:0
67 25.3M 67 17.0M 0 0 751k 0 0:0
69 25.3M 69 17.7M 0 0 752k 0 0:0
72 25.3M 72 18.4M 0 0 750k 0 0:0
75 25.3M 75 19.1M 0 0 750k 0 0:0
78 25.3M 78 19.9M 0 0 752k 0 0:0
81 25.3M 81 20.7M 0 0 753k 0 0:0
84 25.3M 84 21.4M 0 0 754k 0 0:0
87 25.3M 87 22.1M 0 0 752k 0 0:0
90 25.3M 90 22.9M 0 0 753k 0 0:0
93 25.3M 93 23.7M 0 0 754k 0 0:0
96 25.3M 96 24.4M 0 0 754k 0 0:0
99 25.3M 99 25.1M 0 0 753k 0 0:0
100 25.3M 100 25.3M 0 0 755k 0 0:0
0:34 0:00:34 --:--:-- 775k

C:\Users\farde>
```

- Python installer has been installed successfully.
- Now we need to install python using the installer we downloaded, run the following command, python-installer.exe /quiet InstallAllUsers=1 PrependPath=1



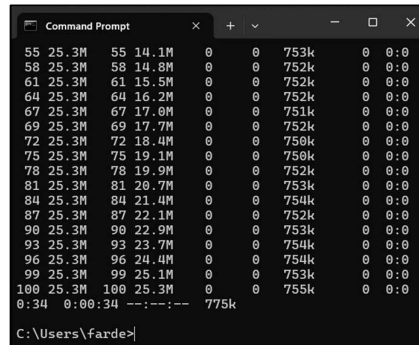
```
C:\Users\farde>python-installer.exe /quiet InstallAllUsers=1 PrependPath=1
C:\Users\farde>
```

- Python has been installed successfully.

- Now we need the libraries, but before that let's install PIP which is a package installer for python, Open cmd and run this command.

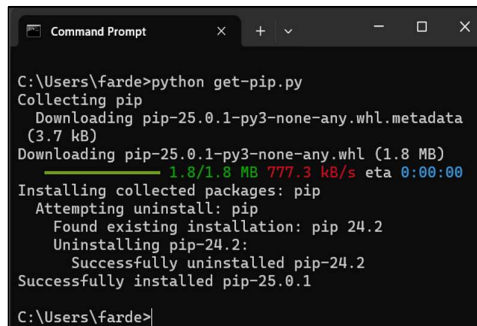
curl -o get-pip.py <https://bootstrap.pypa.io/get-pip.py>

- run the following command and press enter, curl -o python-installer.exe <https://www.python.org/ftp/python/3.12.1/python-3.12.1-amd64.exe>



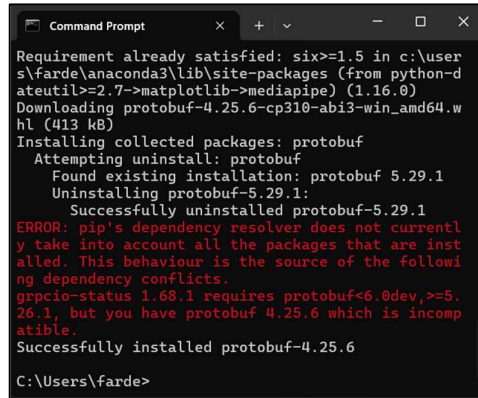
```
Command Prompt
55 25.3M 55 14.1M 0 0 753k 0 0:0
58 25.3M 58 14.8M 0 0 752k 0 0:0
61 25.3M 61 15.5M 0 0 752k 0 0:0
64 25.3M 64 16.2M 0 0 752k 0 0:0
67 25.3M 67 17.0M 0 0 751k 0 0:0
69 25.3M 69 17.7M 0 0 752k 0 0:0
72 25.3M 72 18.4M 0 0 750k 0 0:0
75 25.3M 75 19.1M 0 0 750k 0 0:0
78 25.3M 78 19.9M 0 0 752k 0 0:0
81 25.3M 81 20.7M 0 0 753k 0 0:0
84 25.3M 84 21.4M 0 0 754k 0 0:0
87 25.3M 87 22.1M 0 0 752k 0 0:0
90 25.3M 90 22.9M 0 0 753k 0 0:0
93 25.3M 93 23.7M 0 0 754k 0 0:0
96 25.3M 96 24.4M 0 0 754k 0 0:0
99 25.3M 99 25.1M 0 0 753k 0 0:0
100 25.3M 100 25.3M 0 0 755k 0 0:0
0:34 0:00:34 --:--:-- 775k
C:\Users\farde>
```

- run the following command and press enter to install pip, python get-pip.py



```
Command Prompt
C:\Users\farde>python get-pip.py
Collecting pip
  Downloading pip-25.0.1-py3-none-any.whl.metadata
(3.7 kB)
  Downloading pip-25.0.1-py3-none-any.whl (1.8 MB)
  1.8/1.8 MB 777.3 kB/s eta 0:00:00
Installing collected packages: pip
  Attempting uninstall: pip
    Found existing installation: pip 24.2
    Uninstalling pip-24.2:
      Successfully uninstalled pip-24.2
  Successfully installed pip-25.0.1
C:\Users\farde>
```

- Now that we have pip let's install the required libraries for our project. We need numpy, mediapipe, opencv and time modules. To install all of them we use this command in cmd, pip install mediapipe opencv-python numpy time.



```
Command Prompt
Requirement already satisfied: six>=1.5 in c:\user
s\farde\anaconda3\lib\site-packages (from python-d
ateutil>=2.7->matplotlib->mediapipe) (1.16.0)
Downloading protobuf-4.25.6-cp310-abi3-win_amd64.w
hl (413 kB)
Installing collected packages: protobuf
  Attempting uninstall: protobuf
    Found existing installation: protobuf 5.29.1
    Uninstalling protobuf-5.29.1:
      Successfully uninstalled protobuf-5.29.1
ERROR: pip's dependency resolver does not currentl
y take into account all the packages that are inst
alled. This behaviour is the source of the followi
ng dependency conflicts.
grpcio-status 1.68.1 requires protobuf<6.0dev,>=5.
26.1, but you have protobuf 4.25.6 which is incomp
atible.
Successfully installed protobuf-4.25.6
C:\Users\farde>
```

- Libraries have been installed successfully.
- Now that everything is ready we can move on to running the project Code, we are just running the program since the interface is handled in opencv library without needing any external application.