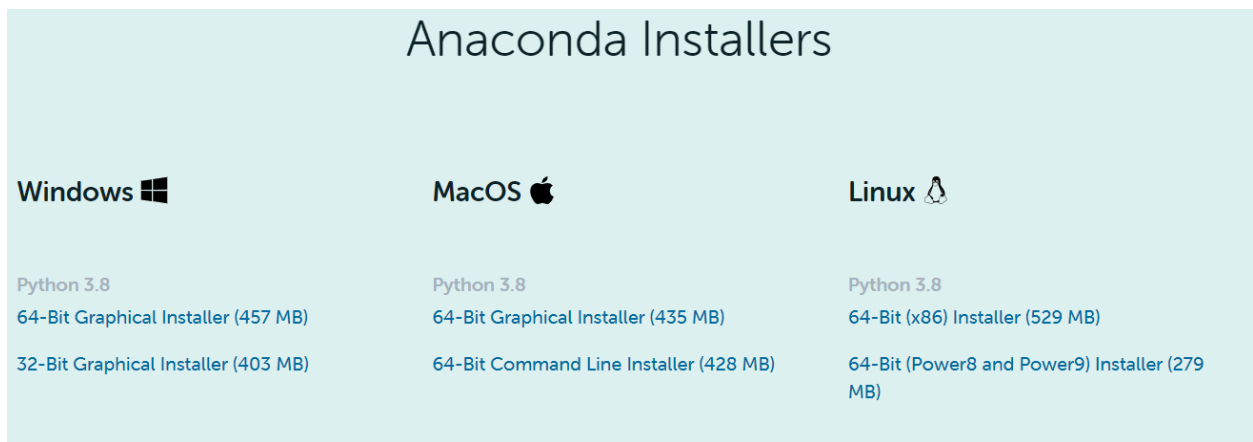


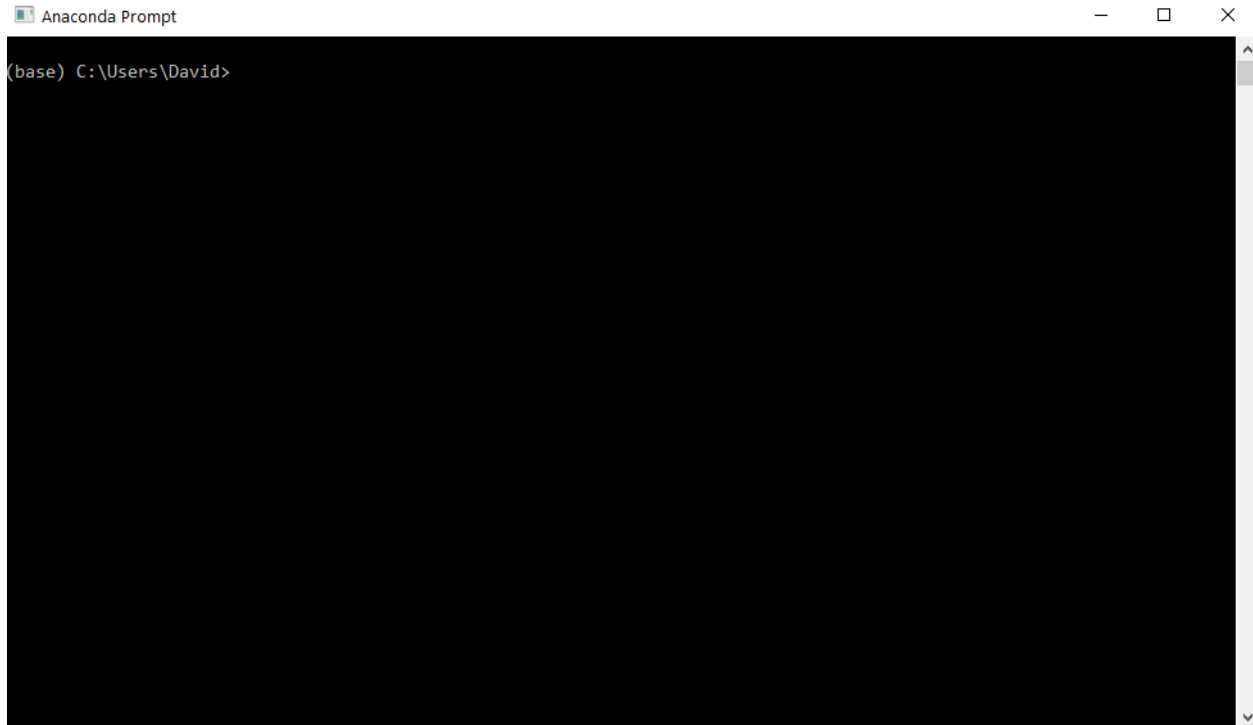
Instalación de Anaconda en Windows:

Se accede a la distribución de anaconda desde el siguiente enlace:

<https://www.anaconda.com/download/>



Abrimos una ventana de anaconda prompt:



- Creamos un nuevo ambiente utilizando la siguiente instrucción desde la línea de comando:

conda create --name [vision]

ATENCIÓN: Los corchetes son para indicar que en esa posición se coloca el nombre que deseamos para nuestro ambiente de Anaconda. Deben omitirse al momento de ejecutar el comando. Asimismo, es recomendable evitar el uso de tildes y otros caracteres especiales, una excepción común cuando se tienen nombres compuestos por varias palabras es el carácter *underscore* (_). Ej: ArtificialVision.

- Una vez creado el ambiente, podemos activarlo usando siguiente comando:

activate [ArtificialVision]

- Y podemos desactivarlo usando siguiente comando:

Deactivate

- En cualquier caso, volvamos a activar nuestro ambiente de Anaconda con el comando mencionado anteriormente. Nos podemos dar cuenta de que nuestro ambiente está activo porque al *prompt* de la línea de comando tiene como prefijo el nombre de nuestro ambiente entre paréntesis.

```
(ArtificialVision) C:\Users\David>_
```

Abrir jupyter lab:

```
(ArtificialVision) C:\Users\David>jupyter lab
[I 14:35:39.751 LabApp] The port 8888 is already in use, trying another port.
[I 14:35:39.793 LabApp] JupyterLab extension loaded from C:\Users\David\Anaconda3\envs\ArtificialVision\lib\site-packages\jupyterlab
[I 14:35:39.793 LabApp] JupyterLab application directory is C:\Users\David\Anaconda3\envs\ArtificialVision\share\jupyterlab
[I 14:35:40.032 LabApp] Serving notebooks from local directory: C:\Users\David
[I 14:35:40.032 LabApp] Jupyter Notebook 6.2.0 is running at:
[I 14:35:40.032 LabApp] http://localhost:8889/?token=2426259181fbd9a24eac15321df99671522b06a7ec264852
[I 14:35:40.032 LabApp] or http://127.0.0.1:8889/?token=2426259181fbd9a24eac15321df99671522b06a7ec264852
[I 14:35:40.032 LabApp] Use Control-C to stop this server and shut down all kernels (twice to skip confirmation).
[C 14:35:40.174 LabApp]

To access the notebook, open this file in a browser:
    file:///C:/Users/David/AppData/Roaming/jupyter/runtime/nbserver-20772-open.html
Or copy and paste one of these URLs:
    http://localhost:8889/?token=2426259181fbd9a24eac15321df99671522b06a7ec264852
    or http://127.0.0.1:8889/?token=2426259181fbd9a24eac15321df99671522b06a7ec264852
```

Instalar librerías útiles:

```
[3]: !pip install -r requirements.txt
```

```
Collecting matplotlib
  Using cached matplotlib-3.3.4-cp39-cp39-win_amd64.whl (8.5 MB)
Requirement already satisfied: numpy in c:\users\david\anaconda3\envs\artificialvision\lib\site-packages (from -r requirements.txt (line 2)) (1.20.1)
Collecting pandas
  Using cached pandas-1.2.2-cp39-cp39-win_amd64.whl (9.3 MB)
Requirement already satisfied: scipy in c:\users\david\anaconda3\envs\artificialvision\lib\site-packages (from -r requirements.txt (line 4)) (1.6.1)
Requirement already satisfied: sklearn in c:\users\david\anaconda3\envs\artificialvision\lib\site-packages (from -r requirements.txt (line 5)) (0.0)
Collecting opencv-python
  Using cached opencv_python-4.5.1.48-cp39-cp39-win_amd64.whl (34.9 MB)
Collecting torch
  Downloading torch-1.7.1-cp39-cp39-win_amd64.whl (184.0 MB)
Requirement already satisfied: pillow>=6.2.0 in c:\users\david\anaconda3\envs\artificialvision\lib\site-packages (from matplotlib->-r requirements.txt (line 1)) (8.1.0)
Requirement already satisfied: cycler>=0.10 in c:\users\david\anaconda3\envs\artificialvision\lib\site-packages (from matplotlib->-r requirements.txt (line 1)) (0.10.0)
Requirement already satisfied: kiwisolver>=1.0.1 in c:\users\david\anaconda3\envs\artificialvision\lib\site-packages (from matplotlib->-r requirements.txt (line 1)) (1.3.1)
Requirement already satisfied: pyparsing!=2.0.4,!=2.1.2,!=2.1.6,>=2.0.3 in c:\users\david\anaconda3\envs\artificialvision\lib\site-packages (from matplotlib->-r requirements.txt (line 1)) (2.4.7)
Requirement already satisfied: python-dateutil<2.8,>=2.4 in c:\users\david\anaconda3\envs\artificialvision\lib\site-packages (from pandas->-r requirements.txt (line 3)) (2.6.0)
```