

Prerequisites

Team ID	PNT2022TMID44954
Project Name	Intelligent Vehicle Damage Assessment & Cost Estimator For Insurance Companies

To complete this project, you must require the following software, concepts, and packages:

Anaconda Navigator:

Anaconda Navigator is a free and open-source distribution of the Python and R programming languages for data science and machine learning-related applications. It can be installed on Windows, Linux, and macOS. Conda is an open-source, cross-platform, package management system. Anaconda comes with so very nice tools like JupyterLab, Jupyter Notebook, QtConsole, Spyder, Glueviz, Orange, Rstudio, Visual Studio Code. For this project, we will be using a Jupyter notebook and Spyder.

To install the Anaconda navigator and to know how to use Jupyter Notebook & Spyder using Anaconda watch the video

1. To build Machine learning models you must require the following packages

- **Numpy:**

- It is an open-source numerical Python library. It contains a multidimensional array and matrix data structures and can be used to perform mathematical operations

- **Scikit-learn:**

- It is a free machine learning library for Python. It features various algorithms like support vector machine, random forests, and k-neighbors, and it also supports Python numerical and scientific libraries like NumPy and SciPy

- **Flask:**

Web framework used for building Web applications

- **Python packages:**

- open anaconda prompt as administrator
- Type “**pip install numpy**” and click enter.
- Type “**pip install pandas**” and click enter.
- Type “**pip install scikit-learn**” and click enter.
- Type “**pip install tensorflow==2.3.2**” and click enter.
- Type “**pip install keras==2.3.1**” and click enter.
- Type “**pip install Flask**” and click enter.

- **Deep Learning Concepts**

- **VGG16:** VGG16 is a transfer learning method. A pre-trained model trained on 1000 classes of images.
[VGG basic](#)
- **Flask:** Flask is a popular Python web framework, meaning it is a third-party Python library used for developing web applications.
[Flask Basics](#)

If you are using Pycharm IDE, you can install the packages through the command prompt and follow the same syntax as above.