

C0 - Introduction



Applications

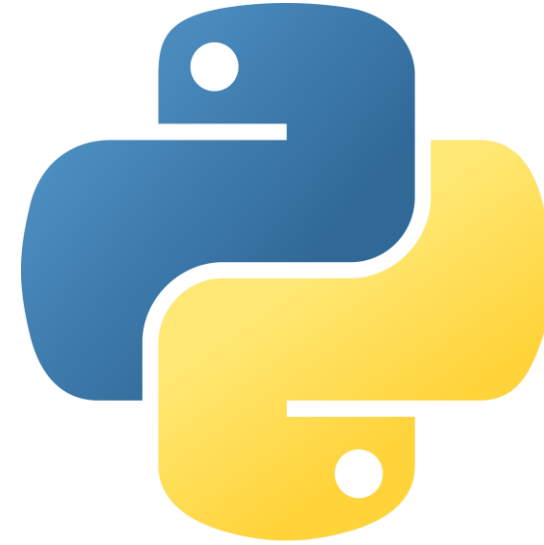
- Data analysis
- Statistics

Pros

- High level

Cons

- Bad for software products
- Hard to see source code



Applications

- ML, DL
- Software

Pros

- Easy to see source code
- Good for deploying products

Cons

- More lines of code than R

Python libraries



Datasets (dataframes)



seaborn

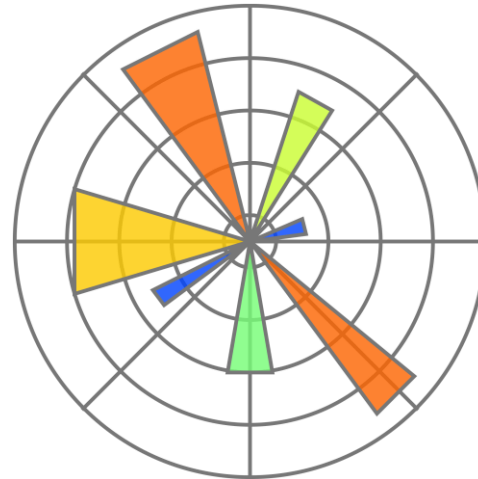
Beautiful plots



Scientific computing



Linear algebra
(vectors, matrices)



Basic plots



ML algorithms ready-to-use

Python Online IDEs



- Integration with Google Drive
- Good to learn
- No installations required

kaggle

- Alternative to Colab

Additional resources

<https://github.com/SuvroBaner/Python-for-Data-Science-and-Machine-Learning-Bootcamp/blob/master/1.%20Python%20Crash%20Course/Python%20Crash%20Course.ipynb>

https://colab.research.google.com/github/kamperh/data414/blob/main/practicals/python_numpy/python_numpy.ipynb

<https://github.com/donnemartin/data-science-ipython-notebooks/blob/master/pandas/pandas.ipynb>

<https://github.com/neurodatascience/course-materials-2020/blob/master/lectures/12-may/01-python-for-data-analysis/python-for-data-analysis.ipynb>

<https://github.com/donnemartin/data-science-ipython-notebooks/tree/master/pandas>

<https://github.com/iutzeler/Introduction-to-Python-for-Data-Sciences/tree/master>