2018 Python Workshop Agenda

31st March and 1st April 2018

Day 1 - (Kushal)

Basic Numerics and Data Handling
- NumPy - A numerical python package
- Matplotlib - Python Plotting Library
- SciPy - Scientific Python Package
- Handling data of different file formats (text, csv, binary, netCDF4, GRIB, mat, etc...)
- Basemap and CartoPy - Python Libraries for Plotting 2-D data on Maps

Day 2 - Part 1 (Shay)

Advanced Statistical Data Processing and Plotting
- Pandas - Statistical Tool for Data Analysis
- Advanced CartoPy - Make Your Plots More Efficient (Maybe?)
- Xarray - Multi-Dimensional Data Array Handling

Day 2 - Part 2 (Kushal)

Some more Advanced Topics
- Signal Processing and **Image Processing** (Provided we have time)
- Interfacing Python with Compiled Languages (Fortran and C)