Lab Exercise: Jupyter Basics

Overview

These are a short series of exercises to help you become familiar with some common operations in a Jupyter notebook session. Use this opportunity to experiment and become familiar with the Jupyter interface.

1 – Jupyter Notebooks

- Create a new notebook

- Rename the notebook

- Change the first cell to markdown and enter some text

- Change the text style to heading 1, heading 2, heading 3 (proceed each line with #, ## or ###

- Under the view menu, toggle the Header, Toolbar and Line Numbers

- Under the Insert menu, insert a cell above the current cell and a cell below the current cell

- Try out the restart options under the kernel menu

- Have a quick look at the download options available to you under the File menu

- Save your notebook

2 – Python – Auto Complete

- Type in the following code into a code cell and execute it.

```
import pandas as pd
```

- Type in the following code into a code cell and execute it (including the period)

```
pd.
```

- While the cursor is blinking at the period, press the <TAB> button and see the list of functions that can come after the period. These are the functions in the pandas library.

- Type in the following code into a code cell and execute it (including the period)

```
df = pd.DataFrame()

df.
```

- While the cursor is blinking at the period, press the <TAB> button and see the list of functions that can come after the period. These are the functions available on a DataFrame.

4 – Accessing help

- Scroll down to DataFrame and press the <ENTER> button.

- Type in the following into a cell and execute it

```
pd.read_csv?
```

- This will display any inbuilt help on the read_csv function

- Alternatively, in a code cell execute:

```
help(pd.read_csv)
```

4 – Python – Function Signatures

- Type in the following into a code cell

```
pd.read_excel()
```

- Place the cursor in-between the open and closed parenthesis.

- Press <SHIFT> + <TAB>

- This will display the function signature