

MET 3601 Syntax Problem #6

Please do your work in the syntax-problems folder on the JupyterHub and DON'T forget to also upload the .ipynb file to Canvas!

<https://fit25f.ees220002.projects.jetstream-cloud.org/>

Objectives

1. Practice Writing Python code
2. Practice Running Python code
3. Use of comment block at beginning of code and comments throughout code
4. Practice selective execution with Python syntax

Due by 11:00 am on 9/22/2025

Problem

1. Write a Python program that reads in SOI data (soi_data_update.txt; available in the data folder on JupyterHub) and find the maximum and minimum values of SOI for a given year. Output the year, maximum SOI, and minimum SOI value for the year requested to standard output. Use the following structure for your program code:

- a) Read in all data (start with code from syntax6.ipynb in the syntax folder on JupyterHub)
- b) Determine max/min values for 1997
- c) Output needed values to standard output

Notes:

- Double check to make sure you have the correct output for each year!
- Make sure documentation (e.g., comment block and comments throughout code) is present in your source code
- Make output informative so that anyone running your program understand what is being produced without seeing the assignment.
- Rename the program (notebook)

syntax6_lastname.ipynb

where 'lastname' is your lastname 😊