Psych 138: Section 2

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Fall 2023
Office Hours: Tues., 2:30 - 4 PM
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Section 2 Attendance:
https://bit.ly/46iOcPo

Slides and Section 2 Assignment are available on Github.

Agenda

1. Introduce Pair Programming
2. Section Assignment
3. Errors

Goals

1. How to pair program?
    a. We will continue pair programming across the Quarter.
2. How to access Section Assignments?
3. Work on Section 2 Assignment.
4. How to read Python Errors (some of them)?

Pair Programming

Pair Programming

Pair programming is a software development technique in which two programmers work together at one workstation. One, the driver, writes code while the other, the observer or navigator, reviews each line of code as it is typed in. The two programmers switch roles frequently.

While reviewing, the [navigator] also considers the "strategic" direction of the work, coming up with ideas for improvements and likely future problems to address. This is intended to free the driver to focus all of their attention on the "tactical" aspects of completing the current task, using the observer as a safety net and guide.

[Wikipedia]


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Pair Programming in Section

- Each pair will work on one computer.
  - Do not open/edit the same Colab Notbook on two different computers.
- Each pair will work on one Google Colab Notebook.
  - 1. One in the pair must create the Google Colab Notebook by following the directions from Section 1 about retrieving Notebooks from Github (Sections/Section2/Section2.ipynb)
  - 2. Then share this Google Colab Notebook with the other in the pair.
  - 3. “Share” in the top-right corner.
  - 4. Write both names at the top the Notebook.
  - I will review this one shared Notebook for both students’ grades
- Switch!
  - Pick your own strategy.
  - Switching every X minutes is good.
  - I recommend *not* splitting by task (i.e., switching off between tasks).

(Zhong, Wang, Chen & Li, 2017)

Importing math

- math is a module that provides access to a variety of mathematical functions.
- To use these functions, you must import math first.

Importing modules

1. Creating a code block at the very beginning of the Notebook
2. Write “import math” in that code block
3. Run it
4. Now you can call math’s functions from any code block
    a. In the same way you would call any function (i.e., print(), int(), len())
    b. math.sqrt()
    c. math.fsum()
    d. and more.

Section 2 Assignment

Github:
Sections/Sections2/Section2.ipynb

Errors

ZeroDivisionError, TypeError, ValueError

Closing

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Slides and Section 2 Assignment are available on Github.

- Email me if you have any questions.
- Section assignment:
  - Finish Section 2 Assignment in Section2.ipynb
  - Make sure it is in the right location in P138 and shared between partners
  - Write both students name near the top in a text block
- Have a great weekend!

2	3	5-Oct	Thur	Truthiness in Python	Ch1: Vid4
				Section Assignment; Weekly Assignment due Tuesday	
3	4	10-Oct	Tues	Converting Flow-Charts Into Code With Conditionals	Ch2: Vid5
3	5	12-Oct	Thur	Descriptive statistics using the While Loop	Ch2: Vid6
				Section Assignment; Weekly Assignment due Tuesday	