Exercise 1.4: File Handling in Python

Learning Goals

- Use files to store and retrieve data in Python

Reflection Questions

1. *Why is file storage important when you're using Python? What would happen if you didn't store local files?*

File storage is important in Python because it allows you to save and access data even after your program ends. It also enables sharing, backup, and efficient processing of data. Without file storage, data would be lost after each program run, making it difficult to reuse or share information.

2. *In this Exercise you learned about the pickling process with the* ***pickle.dump()*** *method. What are pickles? In which situations would you choose to use pickles and why?*

Pickles in Python are a way to save and transport complex data or objects. They are helpful for storing data persistently, transferring data between programs or systems, caching computations, and serializing objects. Pickles are a convenient tool for efficiently managing and sharing data in Python.

3. *In Python, what function do you use to find out which directory you're currently in? What if you wanted to change your current working directory?*

To find the current directory in Python, you can use ***os.getcwd().***

To change the current working directory, you can use ***os.chdir(path),*** where path is the desired directory path you want to switch to.

4. *Imagine you're working on a Python script and are worried there may be an error in a block of code. How would you approach the situation to prevent the entire script from terminating due to an error?*

To prevent a Python script from terminating due to an error in a specific code block, use a try-except block. Wrap the error-prone code in the try block, and specify the type of exception to catch in the except block. This allows you to handle the exception and keep the script running.

5. *You're now more than halfway through Achievement 1! Take a moment to reflect on your learning in the course so far. How is it going? What's something you're proud of so far? Is there something you're struggling with? What do you need more practice with? Feel free to use these notes to guide your next mentor call.*

I'm progressing well in the course and proud of what I've learned. However, I would like to become more familiar with for loops and try-except blocks. I want to quickly understand when and how to use them and be able to implement them effectively in my code. More practice and guidance in real-world scenarios would greatly help me in these areas.