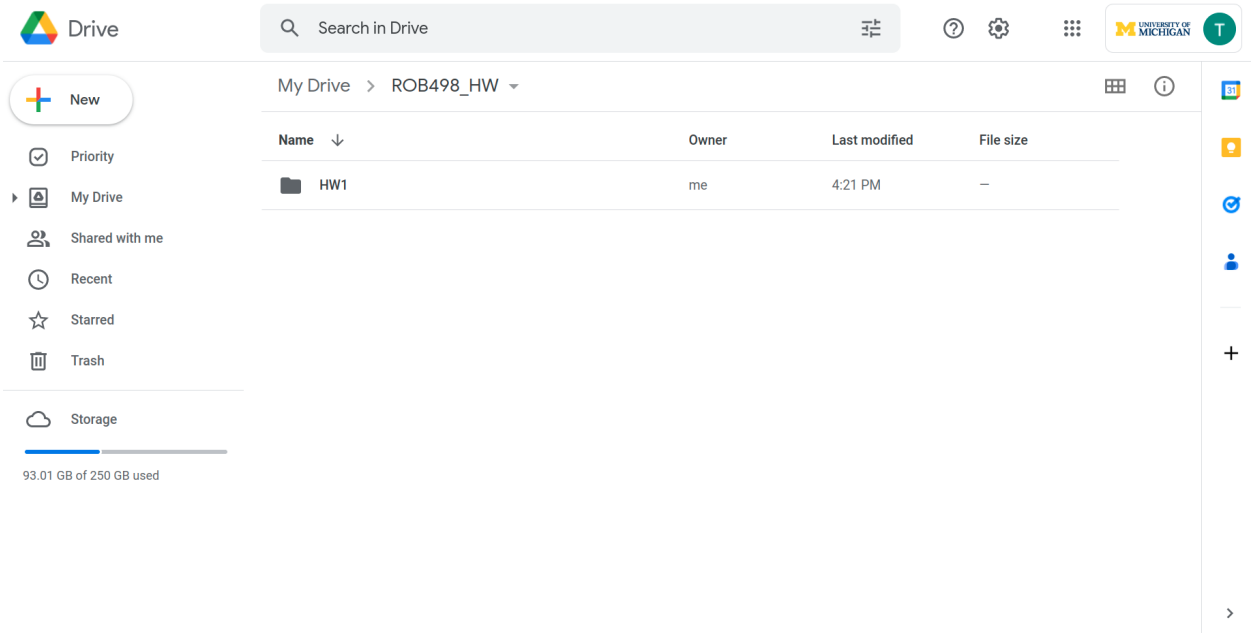
Using Google Colab

Your assignments for this class will consist of a Jupyter notebook which is the main homework document. You will complete functions and classes in `.py` and to run in those Jupyter notebooks. Here we will demonstrate how you can use Google Colab to execute these notebooks and edit your code.

Upload assignment to Google Drive

Create a folder on your UMICH Google drive and upload the extracted homework folder.

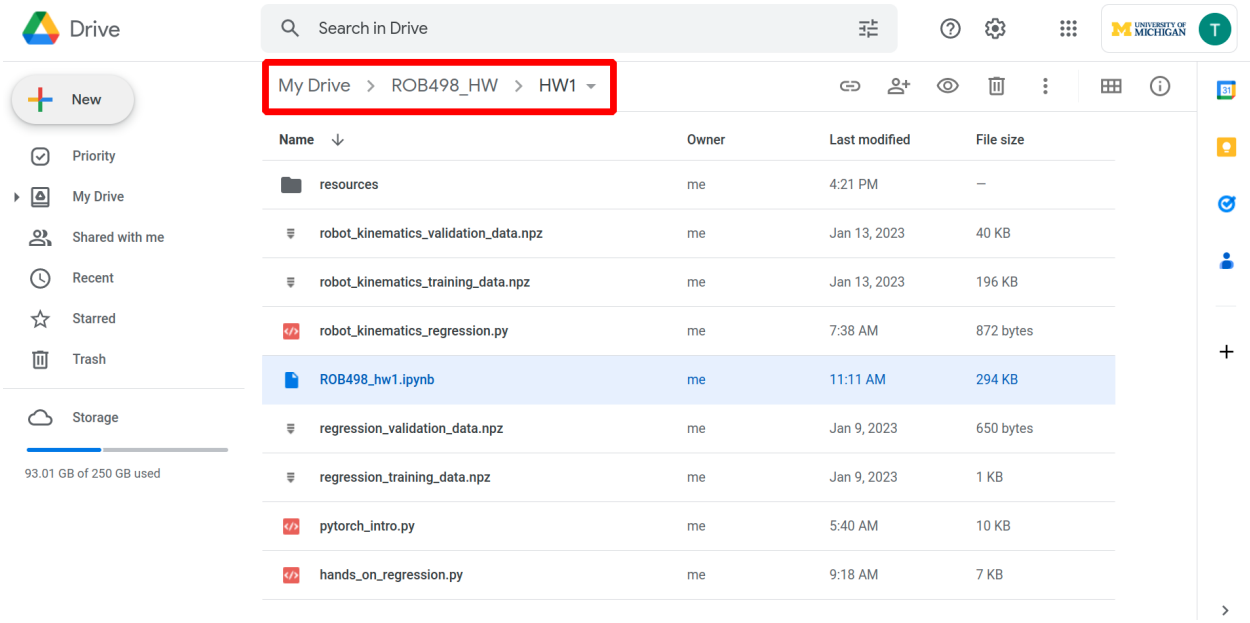
Here I have called the homework folder ROB498_HW



Open assignment in Colab

Double click on `ROB498_hw1.ipynb` to open it in Colab.

Alternatively you can right click and select ‘Open with’ and then ‘Google Colaboratory'

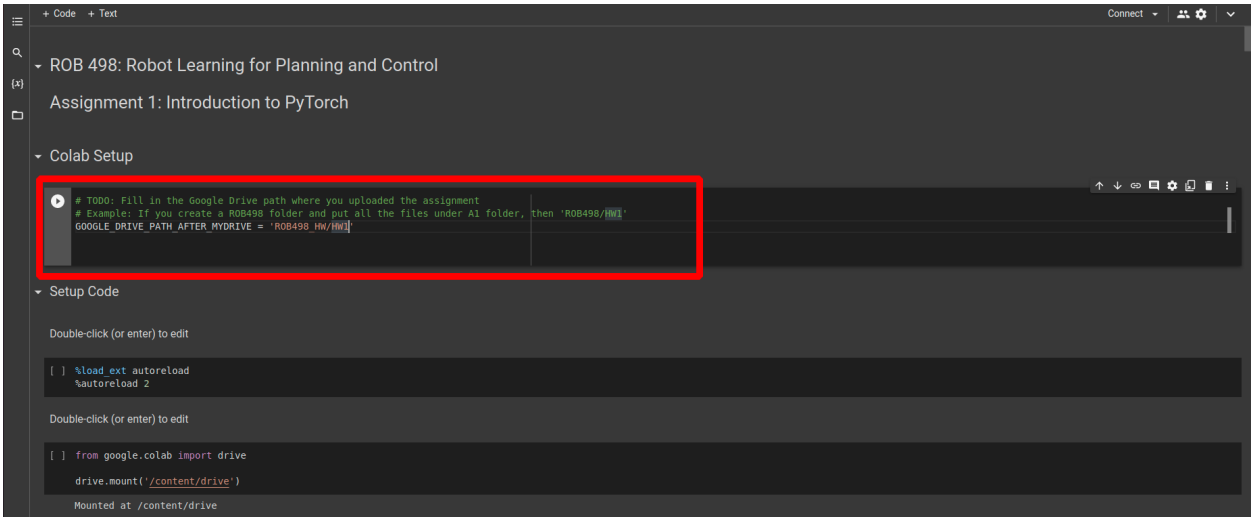


Note the directory `My Drive/ROB498_HW/HW1` .

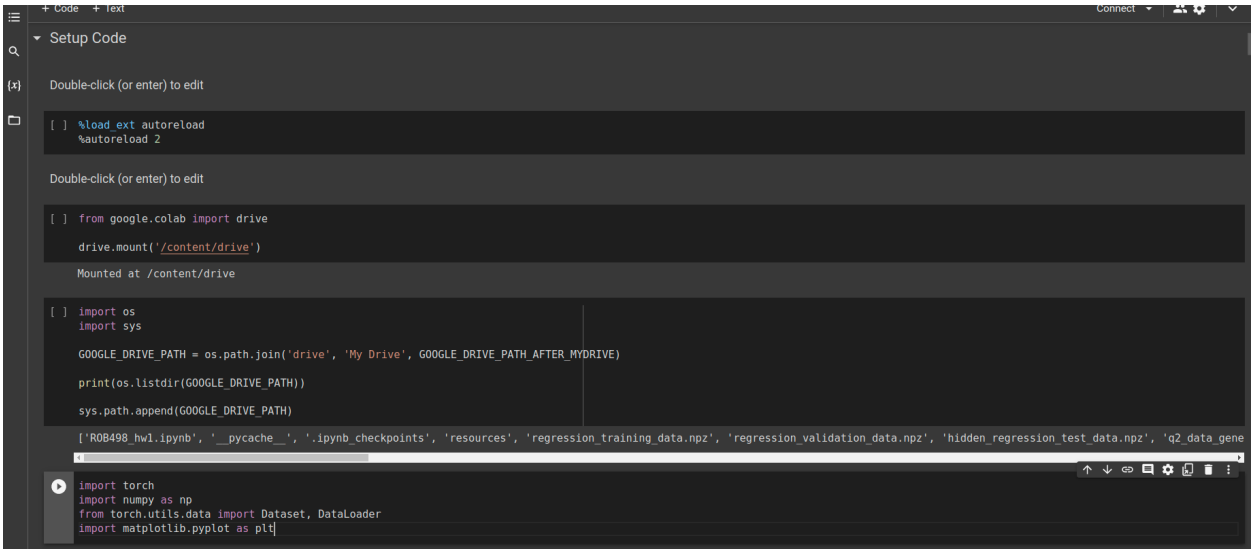
Setting up Development Environment with Google Drive & Colab

This section will show you how to get set-up so you can edit the `.ipynb` and `.py` files directly in your Google Drive using Colab. You will need to re-run this setup every time your notebook restarts - minus setting up the relevant variables.

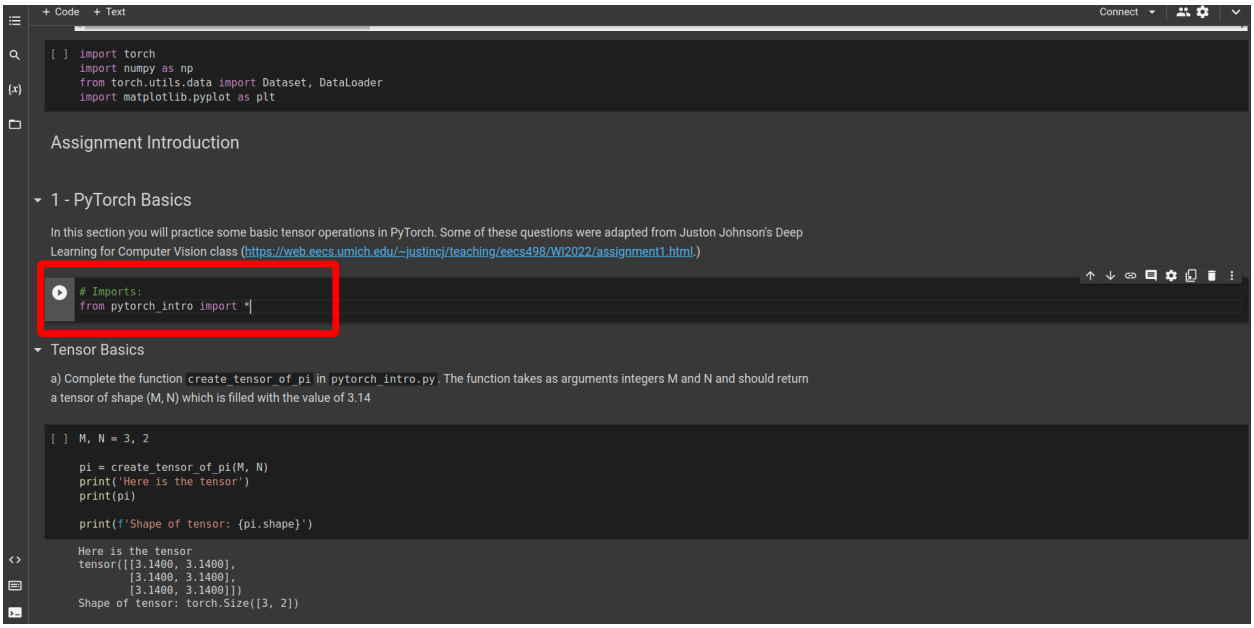
Once you have opened in Colab you will see something that looks like this. You should fill in the variable `GOOGLE_DRIVE_PATH_AFTER_MYDRIVE` with the directory above. For me this is `ROB498_HW/HW1` . You can run the code in this cell by hitting `Shift + Enter`



Next run all of the following cells. You will need to be logged in to your umich account and confirm permissions. `os.listdir(GOOGLE_DRIVE_PATH)` should print out the contents of the `HW1` folder.

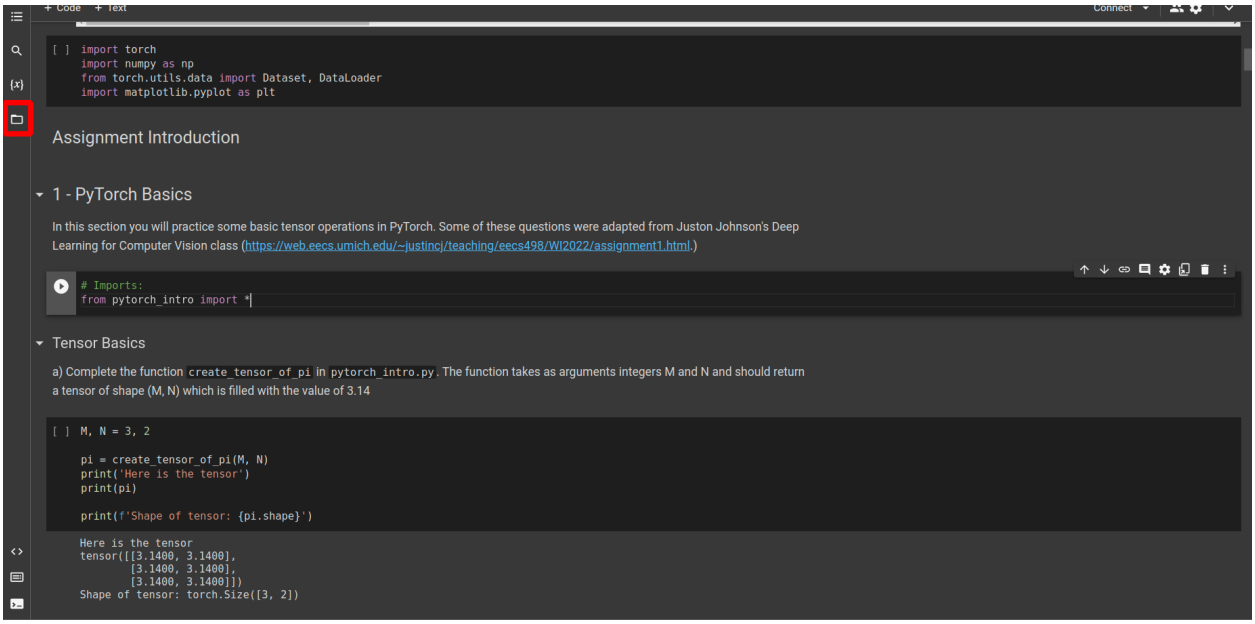


Now you can run the following cell to import functions from `HW1/pytorch_intro.py` . For example, the `create_tensor_of_pi` function which you will need to complete as part of the homework.

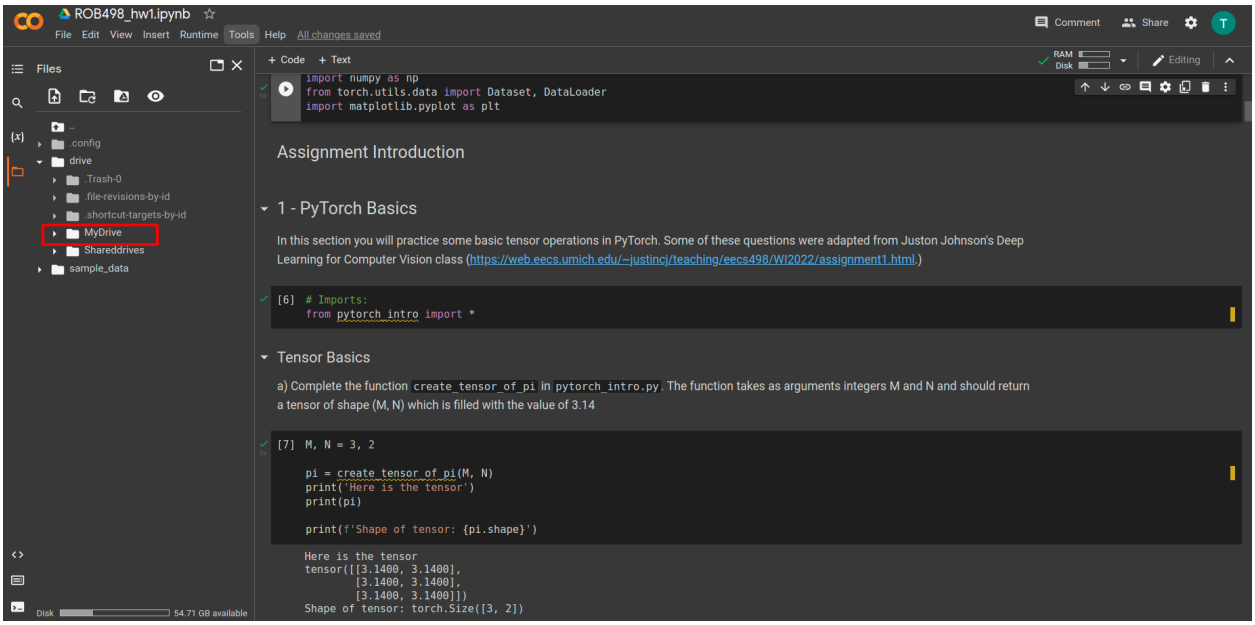


Editing Files

Click on the folder icon shown below.



This will take you to the screen below, where you can then navigate to the `HW1` directory and open the relevant file



We will open `pytorch_intro.py`. Which results in the screen below. Where we can make changes to the `pytorch_intro.py` file. You should save them with `Ctrl + S`.