CSC4007 – Advanced Machine Learning
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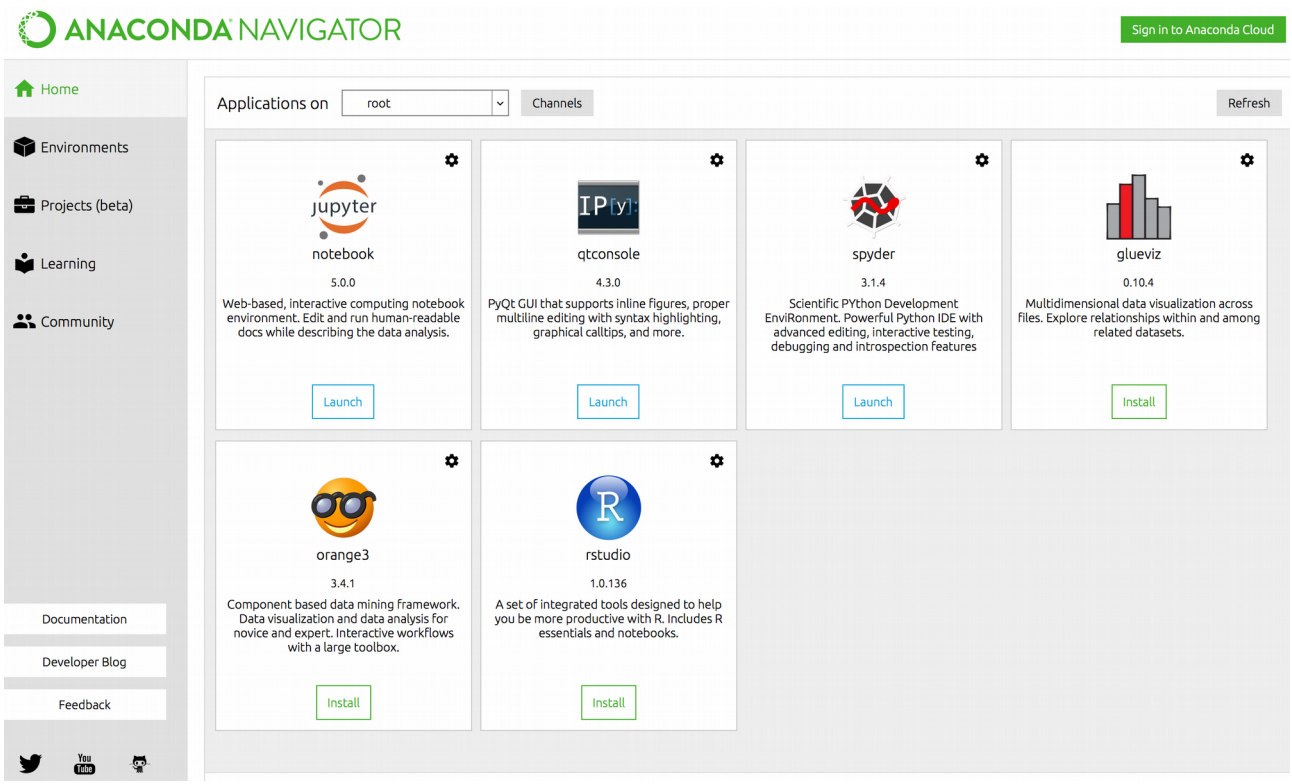
Lab 1 and 2: Anaconda, Python, Numpy, Matplotlib, Jupyter Notebook

In this lab, you will get familiar with programming in Python, learning some popular Python libraries that are very basic and useful (**Numpy for scientific computing, Matplotlib for plotting**), and using Jupyter Notebook to write Python codes. This lab will run on week 2 (week 14) and 3 (week 15). If you could not finish them during these lab hours, you can finish at home.

STEP 1: Running Anaconda

Anaconda has been installed on CS Lab's computers. Find it in Lab Software and run it. The result might look like this



STEP 2: Running Jupyter Notebook. Find it in Anaconda Navigator and launch it. See this basic tutorial to get started: https://nbviewer.jupyter.org/github/jupyter/notebook/blob/master/docs/source/examples/Notebook/Notebook%20Basics.ipynb

(Optional) Another additional resource to get used to Jupyter Notebook
[1] A great video lecture on Jupyter Notebook Tutorial: Introduction, Setup, and Walkthrough https://www.youtube.com/watch?v=HW29067qVWk

STEP 3: Open the notebook file: "*labs_1_2_code.ipynb*" and learn how to write code in Python and use Numpy and Matplotlib.
In this step, you can create your own new notebook file and copy any code in the file "*labs_1_2_code.ipynb*" to test it yourself.

(Optional) You can refer to the file "*introduction-to-python3.pdf*" to know more about Python 3.0.