

Project 0: Python Tutorial

CS 6300 Artificial Intelligence

University of Utah

Due: Fri, Jan 22, 2015 by 11:59:59 P.M

This project serves as an introductory material to the primitives in Python programming. The objective of this project is to get your hands wet in Python which would be the programming language that would be used throughout all the projects in this course.

We would be using **Python 2.7** for all the projects in this class.

1 Python Installation

We would prefer everyone to have Python installed in their local computers and you can use the following link to download and install Python2.7 <https://www.python.org/download/releases/2.7/>

If you have any issues with installing Python on your local machines or have other constraints, you can make use of the CADE lab machines which have Python installed in them.

2 Introductory Python tutorial

For those who are new to Python, please go through all the examples and code snippets under the section titled **Python Basics** from this link <http://ai.berkeley.edu/tutorial.html>. This is a nice and easy tutorial to understand the basics. For those who have already been programming in Python, this could be a good time to refresh some of the topics.

3 Project 0 Source files

Download the **tutorial.zip** <https://s3-us-west-2.amazonaws.com/cs188websitecontent/projects/release/tutorial/v1/001/tutorial.zip> and unzip it. The project directory has many files including an **autograder.py** file which could be used to check the correctness of the program.

4 Python programs (4 pts)

As part of Project 0 you would have to complete three questions

1. Question 1
2. Question 2
3. Question 3

described here <http://ai.berkeley.edu/tutorial.html>. The instructions in each question clearly tell you which file(s) you would need to modify for the corresponding question. Complete the code

for all the three questions and include comments in your code wherever necessary. All questions are equally weighted.

5 Self Analysis (1pt)

5.1 What was the hardest part of the assignment for you?

5.2 What was the easiest part of the assignment for you?

5.3 What problem(s) helped further your understanding of the course material?

5.4 Did you feel any problems were tedious and not helpful to your understanding of the material?

5.5 What other feedback do you have about this homework?

6 Submission Instructions

- For the final submission you would be turning in a zipped folder of the python files and a PDF document containing your responses to questions in Section 5.
- Please ensure all the submissions are done through canvas. Please do not email the instructor or the TA's with your submission. Submissions made via email would not be considered for grading.
- **Naming:** Your upload should be named in the format `< uid >.zip` where `< uid >` is your Utah uid. **Ex:** u0006300.zip
- For this project you will fill in portions of `addition.py`, `buyLotsOfFruit.py`, and `shopSmart.py` in `tutorial.zip`. Once you have completed the code, zip your entire project folder (tutorial folder in this case), rename it as per the conventions stated above and submit it via canvas. Do not delete the other files present in the `tutorial.zip` or change the names of any of those files in the project directory.
- **Written Answers:** Place all written answers to questions in Section 5 in a single PDF document. This should be clearly named in the format `< uid >-Proj< number >-answers.pdf`, where `< uid >` is your Utah uid and `number` is the Project number (i.e. 0 for this assignment). **Ex:** u0006300-Proj-0.answers. Please make sure to write your name at the top of the document!

7 Evaluation

Your code will be auto-graded for technical correctness. Please do not change the names of any provided functions or classes within the code, or you will wreak havoc on the autograder. However, the correctness of your implementation – not the autograder's judgements – will be the final judge of your score. If necessary, we will review and grade assignments individually to ensure that you receive due credit for your work.