Lab 11:

Fourth No More

Due date: today, April 17, before the end of the lab period at 11:45am.

Overview

In this lab you will implement a program similar to the Olympic Curling assignment, but for League of Legends instead, and using a dictionary rather than a list of placings.

Assignment

Locate the "Prize pool" table of the NA LCS 2018 Spring Playoffs article on Leaguepedia: https://lol.gamepedia.com/League_Championship_Series/North_America

/2018_Season/Spring_Playoffs

Then create a single function main() and implement the following program:

- 1. Create a **dictionary** named **placings** in your main. Your dictionary must contain 6 key-value pairs, one for each of the teams listed in the article's "Prize pool". The **key** of a pair should be the name of a **Team** in the table (team names are easy to remember... if you're a nerd like me, at least). The **value** associated with a key should be a **tuple of two values:**
 - (a) the **Place** earned by that team (an integer); and
 - (b) the **Prize** earned by the team (an integer), in dollars.

For example, the key "Team Liquid" should be associated in the dictionary with the value (1, 100000). Use a Place of 5 and a Prize of 0 for both Cloud 9 and Team Solo Mid.

- 2. Ask the user to input a team name. You **must** validate their input to make sure that it exists as a key in the dictionary, and ask them to input a new team repeatedly until they input a team you can find in the dictionary. Hint: look at the **in** keyword from lecture.
- 3. Once you are sure the selected team name is valid, print out the team's Place using the dictionary. If the team earned a Prize of more than \$0, print their prize as well. Do not iterate through the dictionary to find the team you're looking for; again, see the examples from lecture.
 - (a) **Hint**: retrieve the **value** associated with the **key** (team name). You know this value is a **tuple** and will have to **unpack it** to individually deal with the team's Place and Prize.
- 4. You should not have any team names in your code, **other than** when declaring the dictionary placings. Your code should work fine if I rearrange the key/value pairs in the dictionary, and would give the unaltered placing for the rearranged teams.
- 5. Loop the entire program, except for creating the placings list, until the user enters "quit" for the team.

Make sure your code is commented.

Example Output

User input is in italics.

Please enter a team name, or "quit": Team Liquid Team Liquid placed 1 (\$100000)

```
Please enter a team name, or "quit": Cloud 9 Cloud 9 placed 5

Please enter a team name, or "quit": Echo Fox Echo Fox placed 3 ($30000)

Please enter a team name, or "quit": quit Bye!
```

Turning in the Assignment

You will demo this assignment to your Lab Leader, who will give you a set of inputs to make sure your code is correct. If your program succeeds, you will get full credit for the assignment. If something is wrong, your Lab Leader will require you to fix the error and then demo the program again. You will not receive credit for the assignment unless you demo it to the Lab Leader, AND the Lab Leader tells you that you are finished.