

Lab Exercise #3 (Strings)

Assignment Overview

This lab exercise provides practice with strings and functions in Python.

Programming with Strings

Develop a Python program which will convert English words into their Pig Latin form, as described below.

The program will repeatedly prompt the user to enter a word. First convert the word to lower case. The word will be converted to Pig Latin using the following rules:

- a) If the word begins with a vowel, append “way” to the end of the word.
- b) If the word begins with a consonant, remove all consonants from the beginning of the word and append them to the end of the word. Then, append “ay” to the end of the word.

For example:

```
"dog" becomes "ogday"  
"scratch" becomes "atchscray"  
"is" becomes "isway"  
"apple" becomes "appleway"  
"Hello" becomes "ellohay"  
"a" becomes "away"
```

The program will halt when the user enters “quit” (any combination of lower and upper case letters, such as “QUIT”, “Quit” or “qUIt”).

Suggestions:

- a) Use `.lower()` to change the word to lower case.
- b) How do you find the position of the first vowel? I like using `enumerate(word)` as in `for i, ch in enumerate(word)` where `ch` is each character in the word and `i` is the character’s index (position).
- c) Use *slicing* to isolate the first letter of each word.
- d) Use *slicing* and *concatenation* to form the equivalent Pig Latin words.
- e) Use the **in** operator and the string `"aeiou"` to test for vowels.
Good practice: define a constant `VOWELS = "aeiou"`