Chapter 6 Pete's Pizza Palace

Time required: 90 minutes

- Comment each line of code as shown in the tutorials and other code examples.
- Follow all directions carefully and accurately.
- Think of the directions as minimum requirements.

Pseudocode

- 1. Write pseudocode for the exercise
- 2. Save it in a document
- 3. Submit with the assignment

utils.py

We created this utility program in the functions chapter. Here it is again if you don't have it.

Page 1 of 5 Revised: 3/26/2023

```
Name: utils.py
      Author:
3
      Created:
      Purpose: A utilty module with commonly used functions
6 """
7
8
9 def get_int(prompt):
10
11
          Get an integer from the user with try catch
12
          The prompt string parameter is used to ask the user
13
          for the type of input needed
14
15
       # Declare local variable
16
      num = 0
17
18
       # Ask the user for an input based on the prompt string paramete
19
      num = input(prompt)
20
21
      # If the input is numeric, convert to int and return value
22
23
          return int(num)
24
25
      # If the input is not numeric,
26
      # Inform the user and ask for input again
27
      except ValueError:
28
          print(f"You entered: {num}, which is not a whole number.")
29
          print(f"Let's try that again.\n")
31
          # Call function from the beginning
32
           # This is a recursive function call
33
          return get int(prompt)
```

```
36 def title(statement):
37
       ....
38
           Takes in a string argument
39
           returns a string with ascii decorations
40
41
       # Get the length of the statement
42
       text length = len(statement)
43
44
       # Create the title string
45
       # Initialize the result string variable
46
       result = ""
47
       result = result + "+--" + "-" * text length + "--+\n
48
       result = result + "| " + statement \overline{+} " |\n"
       result = result + "+--" + "-" * text_length + "--+"
49
50
51
       # Return the contatenated title string
52
       return result
```

Page 2 of 5 Revised: 3/26/2023

```
def get_float(prompt):
56
       ....
57
          Get a number from the user with try catch
58
          The prompt string parameter is used to ask the user
59
          for the type of input needed
60
61
       # Declare local variable
62
      num = 0
63
      # Ask the user for an input based on the what parameter
65
      num = input(prompt)
66
       # If the input is numeric, convert to float and return value
68
69
          return float (num)
70
71
       # If the input is not numeric,
72
       # Inform the user and ask for input again
73
      except ValueError:
74
          print(f"You entered: {num}, which is not a number.")
75
          print(f"Let's try that again.\n")
76
          # Call function from the beginning
78
           # This is a recursive function call
79
          return get float(prompt)
80
81
82
  def main():
83
      """ Place code here to test the modules """
     print(title("Test the utils module"))
      int num = get int("Please enter a whole number: ")
86
      print(f"Your whole number is: {int num}")
      float num = get float("Please enter any number: ")
88
      print(f"Your number is: {float num}")
89
90
91 # If a standalone program, call the main function
92 # Else, use as a module
93 if name == " main ":
      main()
```

Requirements

Save the program as: pizza_palace.py

Pete would like you to create an online text-based pizza ordering system.

- 1. Use a main function.
- 2. From utils.py, use the title() and get_int() functions.
- 3. Create 3 tuples as CONSTANTS.
 - a. **PIZZA_TYPE:** 5 pizzas of your choice. (string)
 - b. **SIZE:** 4 sizes of your choice. (string)

Page 3 of 5 Revised: 3/26/2023

- c. **PRICE:** 4 prices of your choice. (int)
- 4. Each menu choice will have a number as shown in the example run. Use this number to get the index of the item in the corresponding list.

NOTE: Remember that a tuple index starts a 0.

- a. Type of pizza
- b. Size of pizza
- 5. Create the following functions:

a. get_pizza_type()

- a. Use a for loop to display the information in the pizza type tuple
- b. Use utils.get_int() to get input from the user
- c. Return the index of the pizza type choice

b. get_pizza_size()

- a. Display pizza sizes
- b. User chooses a pizza size
- c. Return the index of the pizza size choice

c. display_purchase()

- a. Pass in the pizza type and pizza size
- b. Lookup the cost of the pizza in the price tuple
- c. Calculate the cost of the pizza
- d. Get user contact information
- e. Display the delivery information

Page 4 of 5 Revised: 3/26/2023

```
Welcome to Pete's Pizza Palace! |
Welcome to our online text based ordering system.
Please choose a pizza:
#1 Supreme
#2 Cheese
#3 Three Meat
#4 Veggie
#5 Bar B Que
Which pizza would you like to order? (1-5) 1
You ordered a #1 Supreme Pizza.
Please choose a size:
#1 Small $5
#2 Medium $7
#3 Large $10
#4 Family $15
What size would you like: 2
You ordered a #2 Medium $7 #1 Supreme Pizza.
Your total is: $7
Please provide us with your name, address and phone number.
What is your name: Bill
What is your street address: 200 High Place
What is your city: Scottsbluff
What is your phone number: 308.245.1234
Thank you for your order Bill.
We will deliver your order to this address ASAP
200 High Place
Scottsbluff
We will contact you at 308.245.1234 if there are any problems.
Thank you for using Pete's Pizza Palace text based ordering system.
```

Assignment Submission

- 1. Attach the pseudocode.
- 2. Attach the program files.
- 3. Attach screenshots showing the successful operation of the program.
- 4. Submit in Blackboard.

Page 5 of 5 Revised: 3/26/2023