Name: _____ **Section:** 1 2 3 4

1 = Stouder, 2nd–3rd periods. **2 =** Stouder, 4th–5th periods. **3 =** Mutchler, 7th-8th periods. **4 =** Rupakheti, 9th-10th periods.

Use this quiz to help make sure you understand the videos/reading. ***Answer all questions.*** Make additional notes as desired. ***Not sure of an answer?*** Ask your instructor to explain in class and revise as needed then. ***Please print two-sided if practical.***

Throughout, where you are asked to "circle your choice", you can circle or underline it (whichever you prefer).

Textbook Reading: ***Sections 8.2 and 8.3.2 – Dictionaries*** (pages 414 – 424, 427-430)

1. Show two different Python syntaxes for creating an empty dictionary and assigning it to variable d.

   a)

   b)

2. Write a single Python statement that assigns to the variable **`roman_numerals`** a dictionary whose keys are the strings ***I***, ***V***, ***X***, ***L***, ***C***, ***D***, and ***M***, and whose corresponding values are the numeric values of these Roman numerals.

3. Suppose that the following code has been executed. Write the implementation of the **`month_length`** function that returns the length of the provided month. Hint: Use **`get`**.

```
month_lengths = {'feb' : 28,
                 'apr' : 30,
                 'jun' : 30,
                 'sep' : 30,
                 'nov' : 30 }
```

   Example use of your function:

```
print(month_length('jan', month_lens),
      month_length('feb', month_lens))
```

   should print **31 28**.

```
def month_length(month_to_find, lengths_of_special_months):
    """ You are to write the implementation of this function"""
```

4. Suppose that the following code has been executed. Write code that uses a loop to create a dictionary **`month_numbers`** that associates each month-name key with the number of that month. E.g., the value of **`month_numbers['feb']`** should be **`2`**.

```
month_names = ['jan', 'feb', 'mar', 'apr', 'may', 'jun', 'jul', 'aug', \
               'sep', 'oct', 'nov', 'dec']
```

5. Suppose that the code below has been executed. Write code that uses the ***`spouses`*** dictionary and creates an alphabetical list of the names of all professors from the dictionary whose spouses have names that are at least five letters long.

   Note: In the following, the key is the name of a professor and the value is the name of the professor's wife. For example, ***`Michael`*** is a professor and ***`Amy`*** is his wife's name. Your solution should NOT make any assumptions about the contents of the ***`spouses`*** dictionary except that its keys are professor-names and its values are their spouse-names. (Write your code so that it works in general, not just for the specific data below.)

```
spouses = {'David': 'Sandy', 'Michael': 'Amy', 'Matt': 'Leah',
           'Claude': 'Diane', 'Shawn': 'Ruth', 'Cary': 'Norma',
           'Delvin': 'Donna'}
```

6. Suppose that the code below has already been executed. Write a single line of code that prints the *number* of course sections that David is teaching (it should use the **`teaching_load`** dictionary).

```
teaching_load = {'Claude': ['csse120-03', 'csse120-04'],
                 'Matt': ['csse230-01', 'csse490-01'],
                 'David': ['csse120-01', 'csse120-02',
                           'csse290-01', 'csse490-02', 'csse491-01' ],
                 'Cary': ['csse241-01', 'csse487-01']}
```