

# COMP 125: Programming with Python, Fall 2021

Final – January 15, 2022

**Question2 (25 points):** 19:15-19:40 (should be submitted by 19:45)

Write the `build_dictionary()` function which is passed a list of strings parameter. The function returns a dictionary where

- keys are integers representing the length of the strings from `my_list`
- the corresponding values are a list of strings (from `my_list`) with length equal to the key
- empty strings in the `my_list` parameter are ignored

If `my_list` parameter is an empty list the function should return an empty dictionary. You may assume that `my_list` is either blank, or if not, always contains strings.

For example, executing the following code with the completed function for different values of `my_list` in the below table prints the corresponding value from the table. Note that `my_list` values in the below table are just **examples**. Your function should work for different `my_list` values passed to it.

```
my_list = [''] # can be set different values. See examples in the table.
result = build_dictionary(my_list)
print(sorted(result))
```

my_list	Printed output
['orange', 'apple', 'grape', 'peanut']	{5:['apple', 'grape'], 6:['orange', 'peanut']}
['train', 'plane', 'boat', '']	{4:['boat'], 5:['train', 'plain']}
[]	{}

For this question, download the `Q2.py` file from Blackboard. Implement your code in this `py` file and then upload it to Blackboard before 19:45.