

# Lab

# Dictionaries

# Lab Objectives

In this lab we will go through a set of problems about dictionaries.

# Tasks

1. Write a Python script to generate and print a dictionary that contains a number (between 1 and n) in the form (x, x\*x)   
   Sample Dictionary ( n = 5) :   
   Expected Output : {1: 1, 2: 4, 3: 9, 4: 16, 5: 25}
2. Write a Python program to sum all the items in a dictionary.
3. Write a Python program to get the maximum and minimum value in a dictionary.
4. Write a program that creates a “nested dictionary”
   1. The dictionary keys are “student ids”
   2. In each key the value is a dictionary that contains a “name”, “age”, and “subject”
   3. Example:
      1. {“31242”:{“Age”:20,”Name”:”Boris”,”Subject”:”Math”}, “2345”:{“Age”:25,”Name”:”Bianca”,”Subject”:”English”}}