

Kerry Ojakian's CSI 32 Class Class Work #1

General Instructions: Choose one person in the group - you will put your group work in their Dropbox folder. In their Dropbox create a folder named exactly Class01. You will put one C++ program in there and one Python program in there. You must email me (at ojakianteaching@gmail.com) indicating two things: 1) The first and last names of each group member, and 2) Whose Dropbox to look in.

Hand in your written work on this paper. Write all the group members names (first and last).

The Assignment

1. Describe what the following Python program does? Write your answer on this paper beside the program. As part of your answer describe some well chosen examples of input and output.

```
x = int(input("Integer One: "))
y = int(input("Integer Two: "))

if x < 0 or y < 0:
    print("Can't do it!")
else:
    print("Product is", x*y)
```

2. Write an equivalent C++ program and put this in Dropbox. It should be a .cpp file with a main().

3. Describe what the following C++ program does? Write your answer on this paper beside the program. As part of your answer describe what it does with a well chosen example of input and output.

```
#include <iostream>
#include <unordered_map>
#include <string>
using namespace std;

int main() {
    unordered_map<string, int> family;
    string dad, mom, kid;
    int d, m, k;

    cout << "Dad (name and age): " << endl;
    cin >> dad;
    cin >> d;

    cout << "Mom (name and age): " << endl;
    cin >> mom;
    cin >> m;

    cout << "Kid (name and age): " << endl;
    cin >> kid;
    cin >> k;

    family[dad] = d;
    family[mom] = m;
    family[kid] = k;

    cout << "Family Stats" << endl;
    cout << kid << " is the child of " << (dad + " and " + mom) << endl;
    cout << kid << " is " << family[kid] << " years old" << endl;
    cout << mom << " is " << family[mom] << " years old" << endl;
    cout << dad << " is " << family[dad] << " years old" << endl;

    return 0;
}
```

4. Write an equivalent Python program and put this in Dropbox. It should be a .py file, and you must use a dictionary.