

CSCE 2610: Assembly Language and Computer Organization
Fall 2018

Programming Assignment 3
Due: December 5 (5pm), 2018

In our lab assignment 2, we have used functions to implement three functions called `find_sum`, `find_largest` and `find_smallest` to find desired values. The purpose of this lab is to practice using stacks to save parameters for nested functions.

In this lab assignment, you are asked to implement a function called `find_values()` that wraps three functions inside: `find_smallest`, `find_largest`, `find_sum`.

The pseudo code is:

```
find_values(){  
    find_smallest();  
    find_largest();  
    find_sum();  
}
```

The `main()` function calls the `find_values()` function and `find_values()` function calls the three other functions.

Test input: `n=5`; the five positive integers are: 31, 32, 33, 34, 35.

Program Output: Store sum in register X5, largest and smallest values in X6, X7 respectively. You don't need to save the index for smallest and largest values.

A main program snap shot is also provided as a reference.

Submit: A file containing your ARMv8 code, a read me file (if needed), a snapshot of memory showing the values in the array before your program starts execution and a snapshot of memory showing the values in the array after the program completes execution.