Lab instructions

Week 07

Introduction to Programming
ECS 102, 2018-19 Semester II

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use_gets.c

The **gets(str)** function reads characters into **str** from the keyboard until a new-line character is encountered and then appends a null character to the string.

Use **gets(str)** to read a string and **puts(str)** function to write the string.

copy_concat_compare.c

(a) Write a program to copy one string to another and count the length of the string.

(b) Define strings of first_name, middle_name, and last_name, and then concatenate them to get a string full_name.

(c) Compare two strings to print whether they are equal or not.

use_string.c

Include **string.h** header file. Use the following functions.

(a) strcpy(string1, string2)

(b) strlen(string)

(c) strcat(string1, string2), **Note**: you can use nested functions strcat(strcat(string1, string2), string3)

(d) strcmp(string1, string2)

(e) strncpy(string1, string2, **n**) copies only the first **n** characters, check if **n** exceeds the string lengths.

(f) strncmp(string1, string2, **n**)

(g) strncat(string1, string2, **n**)

(h) strstr(string1, string2) searches string1 to see whether the string2 is contained in string1, and returns the first occurrence. If there is no occurrence it returns NULL. Write a program to count the number of occurrences of string2 in string1. **Hint**: You can use strcpy to copy the output of strstr to a string.

print_pyramid.c

Given a string

char str[] = “123456789”;

Write a program that displays the following.

```
        1
      2 3 2
    3 4 5 4 3
  4 5 6 7 6 5 4
5 6 7 8 9 8 7 6 5
```