

Foundations of Technical Programming

Week 5

You may be asked to demonstrate/explain your work to the tutor, if you are absent/unavailable or fail to demonstrate properly, zero marks will be awarded.

Reminder:

You must analyse each questions by identifying the input, output and the process.

Your submissions should have flowchart, c-program and the screenshot of the output.

Task 5.1

This problem is an extension of task 4.4. A player rolls the dice 5 times and takes the sum of all 5 sides the player got and if the sum is even and greater than 15, the player wins otherwise the player loses.

Use rand() function to generate the sides of dice; use a loop to repeat the rolling of dice.

Task 5.2

Write a C program to produce the following output. Read the number of rows (only an odd number) from the user as an input.

```
How many rows to print...
9
*
**
***
****
*****
****
***
**
*
```

```
How many rows to print...
11
*
**
***
****
*****
*****
****
***
**
*
*
```

Task 5.3

Write a C program that reads two English alphabets from the user into two variables. Then the program to display the distance between the alphabets in the English alphabet list.

Assumption: Users will enter the alphabet in the correct order.

Note: The program should display errors message if the user enters a non-alphabet.

Example: 1

Enter two English Alphabets:

a
m

The distance between the characters is 11

Example: 2

Enter two English Alphabets:

o
q

The distance between the characters is 1

Example: 3

Enter two English Alphabets:

p
!

Error: Please enter a English alphabet

s

The distance between the characters is 2