**CSE115L  
Midterm**Marks: 20 Sec: 11 Time: 55 min (with upload)

1. Write a C program that reads a month number and then prints the name and the last date of that month. It also computes the total number of days from the beginning of the year to that last date and prints it. You must use the following array to store the number of days in each month:

int days [] = {31, 28, 31, 30, 31, 30, 31, 31, 30, 31, 30, 31};

[Hint: You may use switch-case to obtain the name of the month]

**Sample Input:   
Enter month number: 4**

**Sample Output:   
Name of the month: April  
Last day of April is 30.  
It is the 120 the day of the year.**

1. Write a program that fills an **n\*m** 2D array (n, m are user inputs) with user inputs and then calculates the sum of elements in the border of that array.  
   For e.g. for the 2D array shown below, your program should compute the sum of elements in the grey region.

i.e sum = 5+2+4+0+1+9+2+1+0+5+5+3+0+3 = 40.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| 5 | 2 | 4 | 0 | 1 |
| 3 | 0 | 2 | 8 | 9 |
| 0 | 1 | 8 | 6 | 2 |
| 3 | 5 | 5 | 0 | 1 |

1. Write a C program to take a string as input and
2. Count the total number of alphabets, digits and special characters in that string.
3. Create a new string eliminating all the characters except digits from that input string and print the new filtered string.

**Sample Input: 7%a:u8^bq$&gt;#7Q2**

**Sample Output:**

**Number of Alphabets in the string is: 5**

**Number of Digits in the string is: 4**

**Number of Special characters in the string is: 6**

**Filtered String: 7872**