Questions
CEQ38.

Write a program to print the below pattern.

```
1
2 2
3  3  3
4  4   4   4
3  3  3
2  2
1
```

Test Cases

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include <stdio.h>
int main()
{
int r,c;
for(r=1;r<=4;r++)
{
for(c=1;c<=r;c++)
{
printf("%d ",r);
}
printf("\n");
}
for(r=3;r>=1;r--)
{
for(c=1;c<=r;c++)
{
printf("%d ",r);
}
printf("\n");
}
return 0;
}
```

Your Input Goes Here...!!!

```
1
2 2
3 3 3
4 4 4 4
3 3 3
2 2
1
```

Questions
CEQ45.

Write a program to print inverted pyramid pattern.

Test Cases

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include<stdio.h>
int main()
{
int i,j,k,n=5;
for(i=1;i<=n;i++)
{
for(j=0;j<i;j++)
{
printf(" ");
}
for(k=5;k>=i;k--)
{
printf("* ");
}
printf("\n");
}
return 0;
}
```

5

```
* * * * *
 * * * *
  * * *
   * *
    *
```

Questions
CEQ44.

Write a program to find the square root of a perfect square number(print both the positive and negative values)

Sample Input:
Enter the number : 6561

Sample Output:
Square Root: 01, -01

Test Cases

1. 1225
2. 9801
3. 1827
4. -100
5. 0

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include <stdio.h>
#include <math.h>
int main()
{
int a,b;
scanf("%d",&a);
b=sqrt(a);
printf("\nthe positive root is= %d",b);
printf("\nthe negative root is= -%d",b);
return 0;
}
```

6561

the positive root is=9
the negative root is=-9

Questions
CEQ43

Write a program to find the sum of digits of N digit number.

Sample Input:
Enter N value : 3
Enter 3 digit number: 143

Sample Output:
Sum of 3 digit number: 8

Test Cases

1. N = 2, 158
2. N = 3, 14
3. N = 4, 0148
4. N = 1, 0004
5. N = 4, 7263

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include <stdio.h>
int main()
{
int a,b,c,d,e,f,g,h,i,sum;
scanf("%d",&a);
b=a/10;
c=a%10;
d=b/10;
e=b%10;
f=d/10;
g=d%10;
h=f/10;
i=f%10;
sum=c+e+g+h+i;
printf("%d",sum);
return 0;
}
```

7263

8

Questions
CEQ41.

Write a program that accepts a string from user and displays the same string after removing vowels from it.

Sample Input & Output:
Enter a string: we can play the game
The string without vowels is: w cn ply thgm

Test Cases

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include<stdio.h>
int main()
{
char c[200],c1[200];
int t=0,i,j;
gets(c);
for(i=0,j=0;c[i]!='\0';i++)
{
if(c[i]=='a'||c[i]=='e'||c[i]=='i'||c[i]=='o'||c[i]=='u');
else
{
c1[j++]=c[i];
}
}
printf("\nstring after removing vowels:%s",c1);
}
```

we can play and fly

string after removing vowels:w cn ply nd fly

Questions
CEQ42.

Write a program to print hollow Rectangle Dollar pattern?

Test Cases

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include<stdio.h>
int main()
{
int i,j,n;
scanf("%d",&n);
for(i=1;i<=n;i++)
{
for(j=1;j<=n;j++)
{
if(i==1||i==n||j==1||j==n)
{
printf("$");
}
else
{
printf("  ");
}
}
printf("
}
return 0;
}
");
```

4

```
 $$$$
$  $
$  $
$$$$
```

Questions
CEQ40.

Write a program to arrange the letters of the word alphabetically in reverse order.

Sample Input:
Enter the word : MOSQUE

Sample Output:
Alphabetical Order: U S Q O M E

Test Cases

1. HYPOTHECATION
2. MATRICULATION
3. MANIPULATION
4. SATISFACTION
5. DEDICATION

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include<stdio.h>
#include<string.h>
int main()
{
char str[100],chtemp;
int i,j,len;
gets(str);
len=strlen(str);
for(i=0;i<len;i++)
{
for(j=0;j<(len-1);j++)
{
if(str[j]<str[j+1])
{
chtemp=str[j];
str[j]=str[j+1];
str[j+1]=chtemp;
}
}
}
printf("\n same string in desending order:\n%s ",str);
return 0;
}
```

MOSQUE

same string in desending order:
USQOME

Questions
CEQ4.

Write a program to find whether the person is eligible for vote or not. And if that particular person is not eligible, then print how many year

Sample Input:
Enter your age:7

Sample output:
You are allowed to vote after 11 years

Test Cases

1. 25
2. Eighteen
3. 22
4. -18
5. 34.5

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include <stdio.h>
int main()
{
int age;
scanf("%d",&age);
if(age<18)
{
printf("\n you are not eligible for voting");
}
else
{
printf("\n you are eligible for voting");
}
return 0;
}
```

19

you are not eligible for voting

Questions
CEQ39

Program to find whether the given number is Armstrong number or not

Sample Input:
Enter number : 153

Sample Output:
Given number is Armstrong number

Test Cases

1. 370
2. 1
3. 371
4. 145678
5. 0.21345

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include<stdio.h>
int main()
{
int num,org_num,rem,res=0;
scanf("%d",&num);
org_num=num;

while(org_num!=0)
{
rem=org_num%10;
res+=rem*rem*rem;
org_num/=10;
}
if(res==num)
printf("%d is an armstrong number",num);
else
printf("%d is not an armstrong number",num);
return 0;
}
```

153

153 is an armstrong number

Questions
CEQ37.

Write a program that finds whether a given character is present in a string or not.
In case it is present it prints the index at which it is present.
Do not use built-in find functions to search the character.

Sample Input:
Enter the string: I am a programmer
Enter the character to be searched: p

Sample Output:
P is found in string at index: 8
Note: Check for non-available Character in the given statement as Hidden Test case.

Test Cases

CEQ37
CEQ38
CEQ39
CEQ4
CEQ40
CEQ41
CEQ42
CEQ43
CEQ44
CEQ45

C | Run | Save | Logout

```c
#include <stdio.h>
#include <string.h>
int main()
{
char a,word[50];
int i,freq=0,flag=0;

scanf("%s",word);

scanf("%c",&a);
printf("\npositions of '%c' in '%s' are:",a,word);
for(i=0;i<strlen(word);i++)
{
if(word[i]==a)
{
flag=1;
printf("%d",i+1);
freq++;
}
}
if(flag)
{
printf("\n char '%c' occured for '%d'times.\n",a,freq);
}
else
{
printf("none\n");
}
return 0;
}
```

lakshmanan
s

positions of '
' in 'lakshmanan' are:none