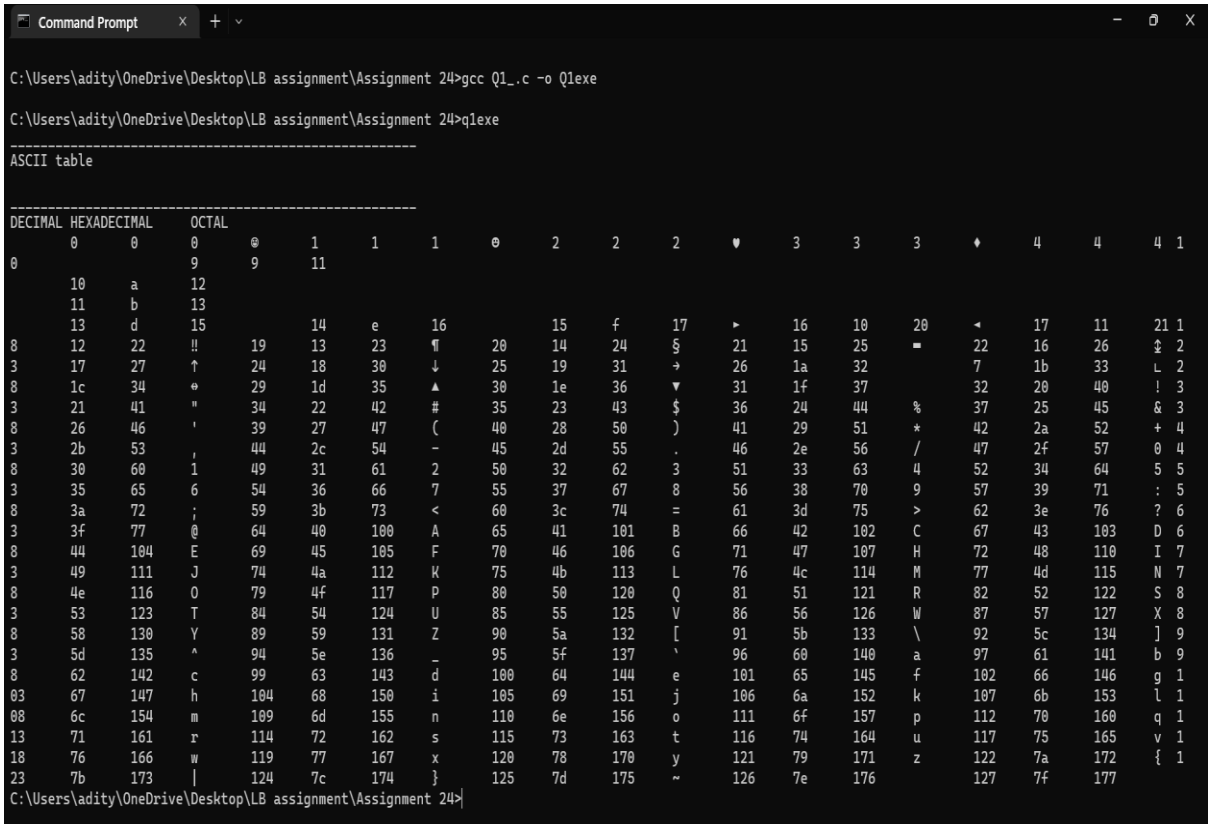
# Assignment:24

**Q.1 Write a Table which displays the table ACII table.**

**Ans.**

```c
#include<stdio.h>

void ASCII()
{
    int i=0;

    char ch='\0';
    printf("_____\n");
    printf("ASCII table\n");
     printf("\n_____\n");
    printf("DECIMAL\tHEXADECIMAL\tOCTAL\n");

    for ( i = 0; i <=127; i++)
    {
        printf("%c\t%d\t%x\t%o\t",i,i,i,i);
    }

}

int main()
{
    ASCII();
    return 0;
}
```

## OUTPUT:



```
Command Prompt

C:\Users\adity\OneDrive\Desktop\LB assignment\Assignment 24>gcc Q1_.c -o Q1exe

C:\Users\adity\OneDrive\Desktop\LB assignment\Assignment 24>q1exe
--------------------------------------------------------
ASCII table

--------------------------------------------------------
DECIMAL HEXADECIMAL     OCTAL
      0      0      0      @      1      1      1      ☻      2      2      2      ♥      3      3      3      ♦      4      4      4  1
0                    9      9      11
      10     a      12
      11     b      13
      13     d      15            14     e      16            15     f      17     ►      16     10     20     ◄      17     11     21 1
8     12     22     ‼      19     13     23     ¶      20     14     24     §      21     15     25     ▬      22     16     26     ↨  2
3     17     27     ↑      24     18     30     ↓      25     19     31     →      26     1a     32            7      1b     33     ∟  2
8     1c     34     ⊕      29     1d     35     ▲      30     1e     36     ▼      31     1f     37            32     20     40     !  3
3     21     41     "      34     22     42     #      35     23     43     $      36     24     44     %      37     25     45     &  3
8     26     46     '      39     27     47     (      40     28     50     )      41     29     51     *      42     2a     52     +  4
3     2b     53     ,      44     2c     54     -      45     2d     55     .      46     2e     56     /      47     2f     57     0  4
8     30     60     1      49     31     61     2      50     32     62     3      51     33     63     4      52     34     64     5  5
3     35     65     6      54     36     66     7      55     37     67     8      56     38     70     9      57     39     71     :  5
8     3a     72     ;      59     3b     73     <      60     3c     74     =      61     3d     75     >      62     3e     76     ?  6
3     3f     77     @      64     40     100    A      65     41     101    B      66     42     102    C      67     43     103    D  6
8     44     104    E      69     45     105    F      70     46     106    G      71     47     107    H      72     48     110    I  7
3     49     111    J      74     4a     112    K      75     4b     113    L      76     4c     114    M      77     4d     115    N  7
8     4e     116    O      79     4f     117    P      80     50     120    Q      81     51     121    R      82     52     122    S  8
3     53     123    T      84     54     124    U      85     55     125    V      86     56     126    W      87     57     127    X  8
8     58     130    Y      89     59     131    Z      90     5a     132    [      91     5b     133    \      92     5c     134    ]  9
3     5d     135    ^      94     5e     136    _      95     5f     137    `      96     60     140    a      97     61     141    b  9
8     62     142    c      99     63     143    d      100    64     144    e      101    65     145    f      102    66     146    g  1
03    67     147    h      104    68     150    i      105    69     151    j      106    6a     152    k      107    6b     153    l  1
08    6c     154    m      109    6d     155    n      110    6e     156    o      111    6f     157    p      112    70     160    q  1
13    71     161    r      114    72     162    s      115    73     163    t      116    74     164    u      117    75     165    v  1
18    76     166    w      119    77     167    x      120    78     170    y      121    79     171    z      122    7a     172    {  1
23    7b     173    |      124    7c     174    }      125    7d     175    ~      126    7e     176           127    7f     177
C:\Users\adity\OneDrive\Desktop\LB assignment\Assignment 24>
```

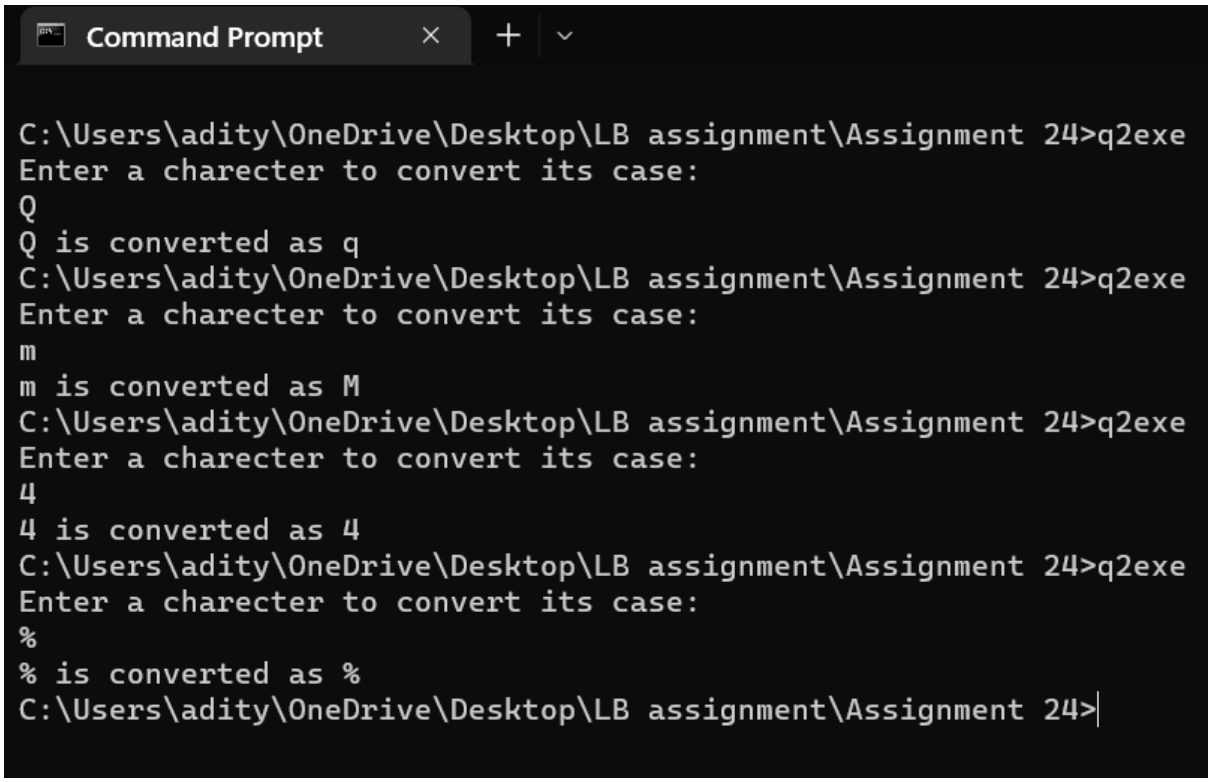
## Q.2 Accept a character and convert its case otherwise print as it is.

## Ans.

```c
#include<stdio.h>
#include<ctype.h>

char ConvertCase(char cVar)
{
    if(cVar==toupper(cVar))
    {
        cVar=towlower(cVar);
    }
    else if(cVar==tolower(cVar))
    {
        cVar=toupper(cVar);
    }
```

```
    return cVar;
}

int main()
{
    char cVar='\0';

    printf("Enter a charecter to convert its case:\n");
    scanf("%c",&cVar);

    char cRet= ConvertCase(cVar);

    printf("%c is converted as %c",cVar,cRet);

    return 0;
}
```

**OUTPUT:**

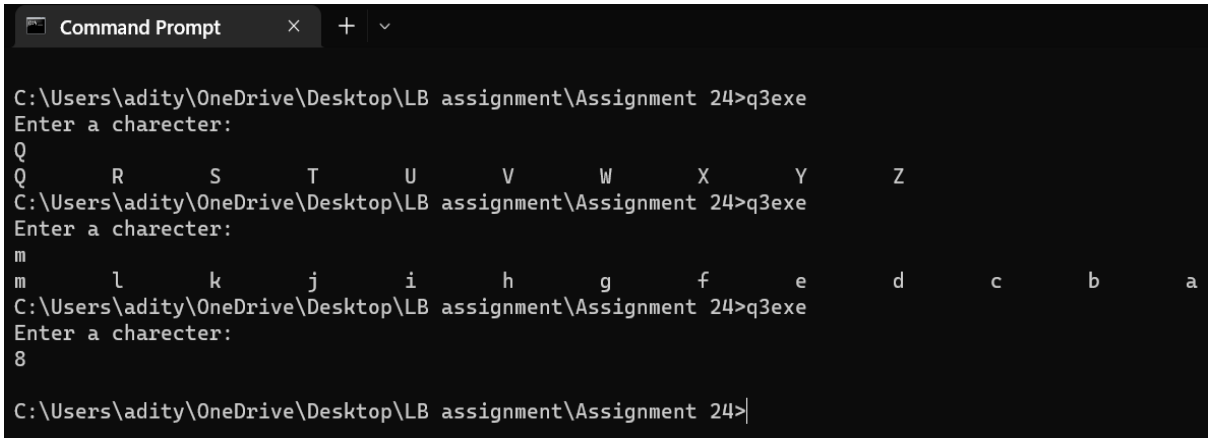


**Q.3 Accept a character if it is in capital print the characters after it , if its small print characters before it else return nothing.**

**Ans.**

```c
#include<stdio.h>

void Display(char cVar)
{
    int i=0;
    if(cVar>=97&&cVar<=122)
    {
        for(i=cVar;i>='a';i--)
        {
            printf("%c\t",i);
        }
    }
    else if(cVar>=65&&cVar<=90)
    {
        for(i=cVar;i<='Z';i++)
        {
            printf("%c\t",i);
        }
    }
    else{
        return;
    }
}

int main()
{
    char cVar='\0';

    printf("Enter a charecter:\n");
    scanf("%c",&cVar);

    Display(cVar);

    return 0;
}
```

## OUTPUT:



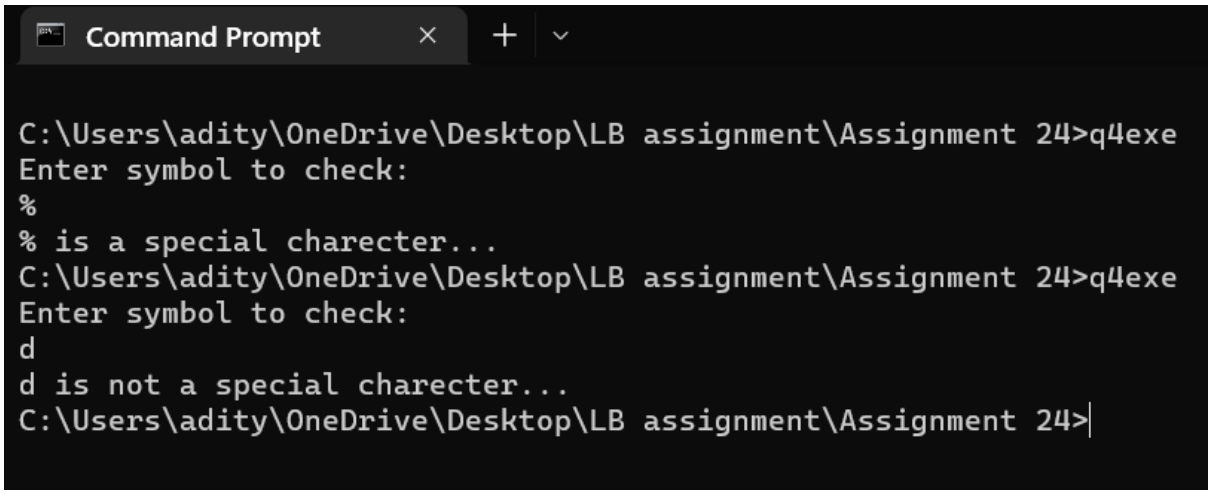

## Q.4 Accept a symbol from user and check whether it is special symbol or not.

## Ans.

```c
#include<stdio.h>
#include<stdbool.h>

bool CheckSymbol(char cVar)
{
    bool bFlag=false;
    if((cVar>=33)&&(cVar<=42))
    {
        bFlag=true;
    }

    return bFlag;
}

int main()
{
    char cVar='\0';

    printf("Enter symbol to check:\n");
    scanf("%c",&cVar);
```

```
    bool bRet=CheckSymbol(cVar);

    if(bRet==true)
    {
        printf("%c is a special charecter...",cVar);
    }
    else{
        printf("%c is not a special charecter...",cVar);
    }
    return 0;
}
```

**OUTPUT:**



**Q.5 Accept a character from user and display its decimal, octal and hexadecimal value.**

**Ans.**

```c
#include<stdio.h>

void Display(char cVar)
{
    printf("The values in the ACII table are:\n");
    printf("Decimal\tOctal\tHexadecimal\n");
    printf("%d\t%o\t%x\n",cVar,cVar,cVar);
}

int main()
{
    char cVar='\0';

    printf("Enter a charecter:\n");
    scanf("%c",&cVar);

    Display(cVar);

    return 0;
}
```

**OUTPUT:**