4) Write an interactive program (menu driven) in 'C' (using functions) to compute the area of a selected geometrical figure from a list of such figures (square, rectangle, and circle).

```
#include <stdio.h>
1 #include <stdlib.h>
2 #define pie 3.14f
3 int main (){
       while(true){
       printf("please select the figure by typing the number against it : \n");
5
       printf("1.sqaure\n2.rectange\n3.circle\n4.exit\n");
       int n;
       printf("now enter the number : ");
       scanf("%d",&n);
       if (n==1){
10
           printf("you have selected a square now enter the length of side for it : ");
11
12
           float s;
           scanf("%f",&s);
13
           printf("the area is %f \n",s*s);
14
15
       else if (n==2){
16
           printf("you have selected a rectangle now enter the dimensions\n");
17
           printf("enter the length : ");
18
           float l;
19
           scanf("%f",&l);
20
           float b;
21
           printf("enter the breadth : ");
22
23
           scanf("%f",&b);
           printf("the area is %f\n",l*b);
24
25
       else if (n==3){
26
           printf("you have selected a circle now enter its radius : ");
27
           float r;
28
           scanf("%f",&r);
29
30
           printf("the area is %f\n",pie*r*r);
31
       else if (n==4){
32
           printf("thanks for using the program\n");
33
           break;
34
35
       else {printf("invalid number \n");
36
           break; }}
37
38 return 0;
39 }
```

```
☐ ~/Documents/dslab ./a.out
please select the figure by typing the number against it :
1.sqaure
2.rectange
3.circle
4.exit
now enter the number : 1
you have selected a square now enter the length of side for it : 22
the area is 484.000000
please select the figure by typing the number against it :
1.sqaure
2.rectange
3.circle
4.exit
now enter the number: 2
you have selected a rectangle now enter the dimensions
enter the length: 1.5
enter the breadth: 2.3
the area is 3.450000
please select the figure by typing the number against it :
```

you have selected a circle now enter its radius : 5.6

please select the figure by typing the number against it :

sqaure
 rectange
 circle
 exit

sqaure
 rectange
 circle
 exit

now enter the number : 3

now enter the number : 4

thanks for using the program

the area is 98.470398