```
#include<stdio.h>
#include<conio.h>
#include<stdlib.h>
void insert_beg();
void insert_befpos();
void insert_end();
void display();
struct node {
int data;
struct node *next;
}*start=NULL;


void main() {

 int ch;  clrscr();
 while(1)
{
printf("\n ***CIRCULAR LINKLIST MENU***");
printf("\n\n1.insert_end\n2. insert_at specified pos \n 3.Display\n 4.exit");
printf("\n\n enter your choice ");
scanf("%d",&ch);

  switch(ch)
```

```
{
//case 1:insert_beg();
//break;
case 1:insert_end();
break;
case 2:insert_befpos();
break;
break;
case 3:display();
break;
 case 4: exit(0);
break;
default:printf("\nwrong coice!");
break;
}  }
getch();}
void insert_beg() {
struct node *new_node,*ptr;
int val;
new_node=(struct node*)(malloc(sizeof(struct node)));
printf("Enter an element:");
scanf("%d",&val);
new_node->data=val;
ptr=start;
```

```
while(ptr->next!=start)
{
ptr=ptr->next;
}
new_node->next=start;
ptr->next=new_node;
start=new_node;
}

void insert_befpos(){
struct node *new_node,*ptr,*preptr;
int val,num;
new_node=(struct node*)(malloc(sizeof(struct node)));

printf("enter the value befor which val is inserted");
scanf("%d",&num);
if(start->data == num)
{
insert_beg();
}
else{
printf("Enter an element:");
scanf("%d",&val);
new_node->data=val;
```

```
ptr=start;
while(ptr->data!=num)
{
preptr=ptr;
ptr=ptr->next;
}
new_node->next=ptr;
preptr->next=new_node;
}
}
void insert_end() {
int val;
struct node *new_node,*ptr;
new_node=(struct node*)(malloc(sizeof(struct node)));
printf("Enter an element:");
scanf("%d",&val);
new_node->data=val;
if(start==NULL)       //If list is empty
   {
        start=new_node;
   }
   else
   {
        ptr=start;
```

```
        while(ptr->next!=start)
{
        ptr=ptr->next;
}
        ptr->next=new_node;

   }
new_node->next=start;
}
void display()
{
struct node *ptr;
ptr=start;
while(ptr->next!=start)
{
printf("\nelement is %d",ptr->data);
ptr=ptr->next;
}
printf("\nelement is %d",ptr->data);
}
```