

```
/*
** Stack using Array
*/
#include<stdio.h>
#include<conio.h>
#include<stdlib.h>
#define MAX 5

int top = -1;
int stack_arr[MAX];

/*Begin of push*/
void push()
{
    int pushed_item;
    if(top == (MAX-1))
    {
        printf("Stack Overflow\n");
    }
    else
    {
        printf("Enter the item to be pushed in stack : ");
        scanf("%d",&pushed_item);
        top=top+1;
        stack_arr[top] = pushed_item;
    }
}
/*End of push*/

/*Begin of pop*/
void pop()
{
    if(top == -1)
    {
        printf("Stack Underflow\n");
    }
    else
    {
        printf("Popped element is : %d\n",stack_arr[top]);
        top=top-1;
    }
}
/*End of pop*/

/*Begin of display*/
void display()
{
    int i;
    if(top == -1)
    {
        printf("Stack is empty\n");
    }
    else
    {
        printf("Stack elements :\n");
        for(i = top; i >=0; i--)
        {
            printf("%d\n", stack_arr[i]);
        }
    }
}
/*End of display*/

/*Begin of main*/
void main()
{

```

```
int choice;

do{
    //system("cls");
    printf("\n---- Contents ----\n");
    printf("1.Push\n");
    printf("2.Pop\n");
    printf("3.Display\n");
    printf("4.Quit\n");

    printf("Enter your choice : ");
    scanf("%d",&choice);

    switch(choice)
    {
        case 1 :
            push();
            break;
        case 2:
            pop();
            break;
        case 3:
            display();
            break;
        case 4:
            break;
        default:
            printf("Wrong choice\n");
    }
}while(choice!=4);
}
/*End of main*/
```