

#include <stdio.h>	
	#define size 5
	int top=-1;
	void push(int [], int);
	int pop(int[]);
	void display(int []);
	int main()
	{
	int a[5];
	int choice,element;
	int ch;
	do
	{
	printf("Enter your choice\n");
	printf("1. Push\n");
	printf("2. Pop\n");
	printf("3. Display\n");
	scanf("%d",&choice);
	switch(choice)
	{
	case 1: printf("Enter the element to be pushed\n");
	scanf("%d",&element);
	push(a,element);
	break;
	case 2: element=pop(a);
	if(element== -1)
	printf("Stack Underflow cannot remove\n");
	else
	printf("Poped element is %d \n",element);
	break;
	case 3: display(a);
	break;
	default: printf("Invalid choice\n");

	}
	printf("Do you want to continue:click-1\n");
	scanf("%d",&ch);
	} while(ch==1);
	return 0;
	}
	void push(int a[], int ele)
	{
	if (top==size-1)
	{
	printf("Stack overflow cannot push\n");
	}
	else
	{
	top++;
	a[top]=ele;
	}
	}
	int pop(int a[])
	{
	int ele;
	if(top==-1)
	return -1;
	else
	{
	ele=a[top];
	top--;
	return (ele);
	}
	}

	void display(int a[])
	{
	int i;
	printf("The stack elements\n");
	for(i=top;i>=0;i--)
	{
	printf("%d\t",a[i]);
	}
	printf("\n");
	}

```

Enter your choice
1. Push
2. Pop
3. Display
1
Enter the element to be pushed
20
Do you want to continue:click-1
1
Enter your choice
1. Push
2. Pop
3. Display
1
Enter the element to be pushed
14
Do you want to continue:click-1
1
Enter your choice
1. Push
2. Pop
3. Display
2
Popped element is 14
Do you want to continue:click-1
1

```

```

Enter your choice
1. Push
2. Pop
3. Display
3
The stack elements
20
Do you want to continue:click-1
2

...Program finished with exit code 0
Press ENTER to exit console.

```