

reverse.c X mergesort.c X concatenation.c X search.c X \*stack.c X \*queue.c X

```
#include <stdio.h>
#include <stdlib.h>
```

```
void push();
void pop();
void display();
struct node
```

```
{
    int data;
    struct node *next;
};
struct node *top=NULL;
```

```
int main(int argc, char **argv)
```

```
{
    int choice;
    char ch;
    do
    {
        printf("\n1. Push \n2. Display \n3. Pop\n");
        printf("\nEnter your choice : ");
        scanf("%d",&choice);
        switch(choice)
        {
            case 1: push(); break;
            case 2: display(); break;
            case 3: pop(); break;
        }
        printf("\nDo you want to continue (y||Y):");
        fflush(stdin);
        scanf("%c",&ch);
    } while (ch=='y' || ch=='Y');
```

```
void push()
```



```
L}
```

```
void push()
```

```
{
```

```
    int item;
```

```
    struct node *newnode;
```

```
    printf("Enter the element\n");
```

```
    scanf("%d",&item);
```

```
    newnode=(struct node*)malloc(sizeof(struct node));
```

```
    newnode->data=item;
```

```
    newnode->next=NULL;
```

```
    if(top==NULL)
```

```
        top=newnode;
```

```
    else
```

```
        newnode->next=top;
```

```
        top=newnode;
```

```
}
```

```
void pop()
```

```
{
```

```
    if(top==NULL)
```

```
        printf("stack is empty");
```

```
    else
```

```
    {
```

```
        printf("element removed is %d:", top->data);
```

```
        top=top->next;
```

```
    }
```

```
}
```

```
()
```

```
void display()
```

```

        top=newnode;
    else
        newnode->next=top;
        top=newnode;
}

void pop()
{
    if(top==NULL)
        printf("stack is empty");
    else
    {
        printf("element removed is %d:", top->data);

        top=top->next;
    }
}
}

```

```

void display()
{
    struct node *temp;
    temp=top;
    if(top==NULL)
        printf("Stack is empty");
    while(temp!=NULL)
    {
        printf("%d", temp->data);
        temp=temp->next;
    }
}
}

```