

```
#include <stdio.h>
#define MAX 100
char stack[MAX];
int top = -1;
void push(char ch)
```

```
{
    if (top == MAX-1)
        printf("stack is full\n");
    else
    {
        top++;
        stack[top] = ch;
    }
}
```

```
char pop()
```

```
{
    char item;
    if (top == -1)
        printf("\nstack is empty\n");
    else
    {
        item = stack[top];
        top--;
        return item;
    }
}
```

```

int stackEmpty()
{
    if (top == -1) return 1;
    else return 0;
}

```

```

char StackTop()
{
    if (top == -1) {
        printf("In Stack is empty!");
    }
    else
        return Stack[top];
}

```

```

int priority (char ch)
{
    case '+' :
    case '-' : return (1);
    case '*' :
    case '/' : return (2);
    default : return (0);
}

```

```

int main (int argc, char* argv)
{

```

```

    int infix [100];

```

```

    int i, item;

```

```

    printf("Enter the infix expression:");

```

```

    scanf("%s", infix);

```

```

    printf("Expression: %s", infix);

```

```

    printf("\n Postfix: ");

```

```

    i = 0;

```

while (infix[i] != '\0')

{ switch (infix[i])

{ case '(': push(infix[i]);

break;

case ')': while (item = pop()) != '(',

printf("%c", item);

case '+':

case '-':

case 'x':

case '/':

while (!stackempty() & priority(infix[i]) <= priority(stacktop))

{ item = pop();

printf("%c", item);

push(infix[i]);

break;

default: printf("%c", infix[i]);

break;

}

i++;

}

while (!stackempty())

{ char item;

int = pop();

printf("%c", item);

}

printf ("ln");

return 0;

}