```c
//Created By Ritwik Chandra Pandey on 24th March
//183215
//Factorial Using Stack Array

#include<stdio.h>
#include<conio.h>
#define STACK_MAX_SIZE 30
long int arr[STACK_MAX_SIZE];
int top = -1;
void push(long int element) {
if(top == STACK_MAX_SIZE - 1) {
                printf("Stack is overflow.\n");
} else {
                top = top + 1;
arr[top] = element;
        }
}
long int pop() {
long int x;
        if(top < 0) {
        } else {
                x = arr[top];
                top = top - 1;
                return x;
        }
}
```

```c
// Implement the factorial program using the stack.
long int factorial(long int n) {
        long int p=1;
for(long int i=n;i>=1;i--){
                push(i);
}
        for(long int i=n;i>=1;i--){
p = p*pop();
        }
return p;
}
void main() {
        long int n;
        printf("Enter an integer : ");
        scanf("%ld", &n);
if(n < 0) {printf("Invalid input! Only positive numbers are allowed.\n");
return;}
printf("Factorial of %ld is : %ld\n", n, factorial(n));}
```