**Application of Stack: Undo and Redo button in Web Browsers:**

#include<iostream> //include the iostream and stdlib library

#include<stdlib.h>

using namespace std;

class Stack // defining the stack as a class

{

private:

string stck[20]; // stack as a string of 20 elements

int stop;

public:

Stack() // constructor definition

{

stop=-1;

}

void push(string); // declaration of the various functions of stack

string pop(void);

void emptys(void);

void display(void);

string rettop(void);

};

void Stack::push(string item) // push function to push an object into stack

{

if(item=="null") // if no item to push return nothing

{

return;

}

stop++; // increment the stack size

stck[stop]=item; // pushing the element into stack

}

string Stack::pop() // to pop an element from stack

{

string item;

if(stop==-1)

{

return "null";

}

item=stck[stop]; // put the stack element into item

stop--; // decrement the stack size

return item; // return the item

}

void Stack::emptys() // if the stack is empty

{

stop=-1;

return;

}

string Stack::rettop() // return the top of the stack

{

if(stop==-1)

{

return "null";

}

return stck[stop];

}

void Stack::display() //display the stack content

{

if(stop==-1)

{

cout<<"\nStack is Empty";

return;

}

Else

{

cout<<"\nStack Contains : ";

for(int i=0;i<=stop;i++)

{

cout<<"\n"<<stck[i];

}

}

}

int main()

{

int ch;

string add;

string ret;

Stack s1,s2;

while (1){

cout<<"\nEnter your choice: \n1. Enter a new address \n2. Undo\n3. Redo\n4. Display \n5. Clear\n6. Exit :";

cin>>ch;

switch(ch){

case 1:

cout<<"\nEnter the address : ";

cin>>add;

s1.push(add);

break;

case 2:

cout<<"\n Current location : ";

ret=s1.pop();

s2.push(ret);

ret=s1.rettop();

cout<<ret;

break;

case 3:

cout<<"\n Current location : ";

ret=s2.pop();

s1.push(ret);

cout<<ret;

break;

case 4:

cout<<"\nUndo Stack :";

s1.display();

cout<<"\nRedo Stack :";

s2.display();

break;

case 5:

cout<<"\nStacks are Emptied";

s1.emptys();

s2.emptys();

break;

default:

cout<<"\nLeaving the Application\n";

exit(1);

}

}

return 0;

}