Lab priogram-1 1) Write a program to simulate working of stack using array with the following operations:-[a] push [b] pop (c) Display. # include (Stolio h) mt top = - 1; fut main () & mt stack [5]; int operations () int choice; int value: print [" Enter your choice (+- push, 2-pop, scan ("il.d") & choice) switch (choice) { ease 1: post (stack, value); operations (); break; case 2: pop (stack); operations (); break; display (stack); operations (3) break; neturn o;

inter Control operations (); 3 manda proprieta de la como de l int push (int avor (1); but value) &

if (top >4) & g print C" stack overflow [m"); else E print | (" Enter the value to be scand (".1.d", 4 value); The stage of the s t+ top; aver [top] = value) print (" inserted element: 1. 1 in", arr (top)); in man, from the or it is a return o; int pop (int arr CJ) ? if(top = = -1)print f (" deleted : Hem: 1.d \n", arr (top); netwu o',

int display Gint ann CD . Commende de la commentation de la commentati for (int is top join = estimated the de mande of print (" The Elements in the stack are: " d\u") return 0; you provide a gar a day to some converse e i mori ariseri output: enter your choice (1 posti, 2 pop, 3-display): 1 Enter the value to be inserted: 21 inserted element: 2 Enter your choice (1- push, 2-pop, 3- display): 1 Enter the volue to be inserted: 3 Enter your choice (1-post, 2-pop, 3-display): 1 Enter the value to be inserted: 4 inserted element: 4
Enter your Choice (1- post, 2-pop, 3-display):2
Enter the value to be inserted: 5 Inserted dement:5 Enter your choice (1- push; 2-pop, 3-display): 2 deleted item: 5 beneau de la commentation de la com Enter your choice (1-posts, 2-pop, 3-display): 2 deleted item: 4

Enter your choice (1-posti, 2-pop, 3-displays): 3 the elements in the stack are: 3 the elements in the stack are: 2 Enter your choice (1-post, 2-pop, 3-display):2 deleted item: 3 Enter your choice (9-post, 2-pop, 3-display): 2 deleted item: 2 Enter your choice (2-posh, 2-pops 3-display): 2 stock is empty, to be Enter your choice (2-post, 2-pop, 3-display):1 Enter the Value to be inserted: 6 inserted element: 6 Enter your choice (2-post, 2-pop, 3-display):1 Enter the value to be inserted: 7 inserted dement: 7 Enter your choice (1-push, 2-pop, 3-display):2 Enter the volue to be inserted: 8. inscrited element: 8 Center your choice C2-push, 2-pop, 3-displays: 2 Enter the value to be inserted inserted element: 9.

enter 11. enter your choice (1- push, 2-pap, 3- display):1 Enter the value to be inserted: 10 inserted element 120 Enter your choice C2-posh, 2-pop, 3-display): 2 Enter the value to be inserted: 11 inserted element: 21 Enter your choice (1- post, 2-pop, 3-display): 1 stade overflow.