Experiment-1  
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**Objective #1:** Create a menu driven program to implement various array operations.

**Algorithm/Pseudo Code:**

-->Define different functions:

Creation()  
 Insertion()  
 Deletion()  
 Search()  
 Display()  
 Exit()

-->Create an infinite loop using while(true) and ask the user which operation to perform using switch case

-->Each switch case runs its respective functions

-->Creation()=> Get how long the array should be  
 Run a for loop  
 Ask input in the array  
 Append the input in the array using *arr[i]=input* Print the array using for loop (just like display())

-->Insertion()=> Ask insertion by position or value  
 If position:  
 Move all the elements ahead of the index of the  
 element that is going to be inserted one index to  
 the right.  
 If value:  
 Search the index of the value and insert the new   
 element in the next index.

-->Deletion()=> Ask deletion by position or value  
 If position:  
 Move all the elements ahead of the required  
 index one step to the left and reduce size of  
 the array by one.  
 If value:  
 Search the index of the value and do the same.

-->Search()=> Ask the required element to be searched  
 Search all the values in the array from beginning and  
 obtain the required index by *if (arr[x]==req): break;*  
 Print the index of the element.

-->Display()=> Run a for loop through the loop and print every   
 element on each index sequentially.  
 *If (arr[x]==input): print the index  
 Else print(“the element was not found!”)*

-->Exit ()=> Stop the program by calling an exit() function or breaking   
 the *while(true)* loop.