

CSA0317-DATA structures

PROGRAM 8-Writa a c program to search a number using linear search method

```
#include <stdio.h>

int main() {
    int arr[100], n, key, i, found = 0;
    printf("Enter number of elements: ");
    scanf("%d", &n);
    printf("Enter %d elements:\n", n);
    for(i = 0; i < n; i++)
        scanf("%d", &arr[i]);
    printf("Enter element to search: ");
    scanf("%d", &key);
    for(i = 0; i < n; i++) {
        if(arr[i] == key) {
            printf("Element %d found at position %d\n", key, i+1);
            found = 1;
            break;
        }
    }
    if(!found)
        printf("Element %d not found in the array.\n", key);
    return 0;
}
```

OUTPUT:

Output	Clear
<pre>Enter number of elements: 4 Enter 4 elements: 12 34 56 78 Enter element to search: 56 Element 56 found at position 3 === Code Execution Successful ===</pre>	