

Problem J. Number of distinct elements - 2

A list is given. Count how many different elements it contains without changing the list itself.

Input data

A list of numbers is entered. All numbers in the list are on one line.

Output

Print the answer to the problem.

Examples of
input data

3 2 1 2 3

output

3

```
void countElements() {  
    int number;  
    int flag;  
    vector<int> arr;  
    vector<int> arr2;  
  
    cout << "Type in numbers (& end list with '0'): ";  
    while (1) {  
        cin >> number;  
        if (number == 0) {  
            break;  
        }  
        arr.push_back(number);  
    }  
    for (int i = 0; i < arr.size(); i++) { // first loop enumerates/grabs each number in 1st array  
        flag = 0;  
        for (int j = 0; j < arr2.size(); j++) {  
            // checks if number grabbed in 1st array exists in 2nd array  
            if (arr[i] == arr2[j]) {  
                flag = 1;  
                break;  
                // if encountered number in 2nd array, stop check, move to next number  
            }  
        }  
        if (flag == 0) {  
            // if number was not in encountered in 2nd array, then add it to arr2  
            arr2.push_back(arr[i]);  
        }  
    }  
    cout << arr2.size() << endl;  
}
```

