1. Write a program to count the total number of distinct elements in an array of length n.

#include <iostream>

using namespace std;

int main() {

int n;

cout << "Enter the number of elements: ";

cin >> n;

int arr[n];

cout << "Enter " << n << " elements: ";

for (int i = 0; i < n; i++) {

cin >> arr[i];

}

int distinctCount = 0;

// Check each element

for (int i = 0; i < n; i++) {

bool isDistinct = true;

// Compare with all previous elements

for (int j = 0; j < i; j++) {

if (arr[i] == arr[j]) {

isDistinct = false;

break;

}

}

if (isDistinct) {

distinctCount++;

}

}

cout << "Total number of distinct elements: " << distinctCount << endl;

return 0;

}

OUTPUT :

