

Print two arrays alternately

Take n as an integer input. Declare the **first array** of size n that stores values of `int` data-type. Then take n integer inputs and store them in the array one by one.

Declare the **second array** of size n that stores values of `int` data-type. Then take n integer inputs and store them in the array one by one.

Then print the elements as explained below

Print the first element of the first array present at the **0th** index, then the element of the **second array** at the **1st** index, then the element of the first array at the **2nd** index, then the element of the second array at the **3rd** index, so on and so forth.

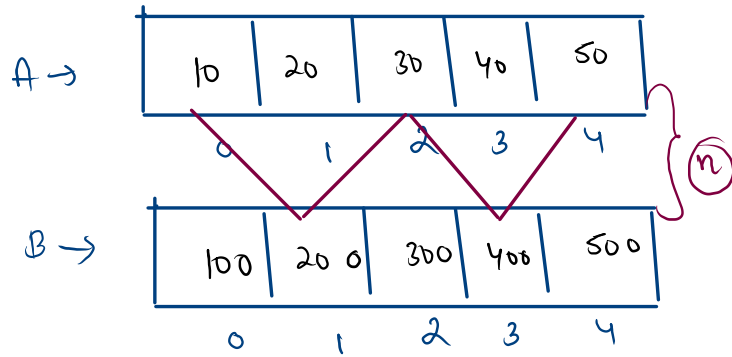


Sample Input 0

```
5
10
20
30
40
50
100
200
300
400
500
```

Sample Output 0

```
10 200 30 400 50
```



A → even
B → odd

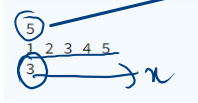
```
10 200 30 400 50
```

```
1 import java.io.*;
2 import java.util.*;
3
4 public class Solution {
5
6     public static void main(String[] args) {
7         Scanner scn = new Scanner(System.in);
8         int n = scn.nextInt();
9         int [] A = new int[n];
10        for(int i = 0; i < n; i++){
11            A[i] = scn.nextInt();
12        }
13        int [] B = new int[n];
14        for(int i = 0; i < n; i++){
15            B[i] = scn.nextInt();
16        }
17
18        //output
19        for(int i = 0; i < n; i++){
20            if(i % 2 == 0){
21                System.out.print(A[i] + " ");
22            }else{
23                System.out.print(B[i] + " ");
24            }
25        }
26    }
27 }
```

Check if x is present in array or not

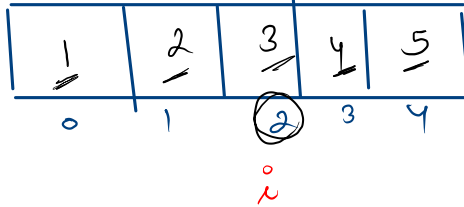
Given an array, the task is to write a Java program to check whether a specific element is **present** in this Array or not.

Sample Input 0



Sample Output 0

True

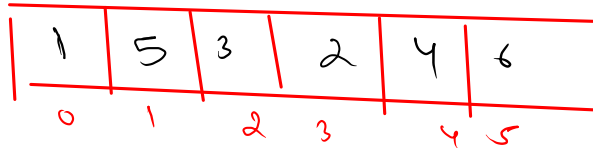


$x = 13$
↳ return 0

$(A[i] == x)$

present

$x = 13$



function

$A[i] == x$

```
1
2 public class Main
3 {
4     public static void main(String[] args) {
5         int n = 6;
6         int [] A = new int[n];
7
8
9
10
11         System.out.println(A.length);
12     }
13 }
14
```

```

6 public static int search(int [] A, int x){
7     for(int i = 0 ; i < A.length; i++){
8         if(A[i] == x){
9             return i;
10        }
11    }
12    return -1;
13 }

```

50	10	40	30	20
0	1	2	3	4

$x = 30$

$40 \neq 30$

$10 \neq 30$

$20 \neq 30$
 $30 = 30$



```

1 import java.io.*;
2 import java.util.*;
3
4 public class Solution {
5
6     public static int search(int [] A, int x){
7         for(int i = 0 ; i < A.length; i++){
8             if(A[i] == x){
9                 return i;
10            }
11        }
12        return -1;
13    }
14    public static void main(String[] args) {
15        Scanner scn = new Scanner(System.in);
16        int n = scn.nextInt();
17        int [] A = new int[n];
18        for(int i = 0; i < n; i++){
19            A[i] = scn.nextInt();
20        }
21        int x = scn.nextInt();    //tar to be matched
22        int ans = search(A, x);
23        if(ans == -1){
24            System.out.println("False");
25        }else{
26            System.out.println("True");
27        }
28    }
29 }

```

-1

10	20	30	40
0	1	2	3

x = 23

x = 20

Input Format

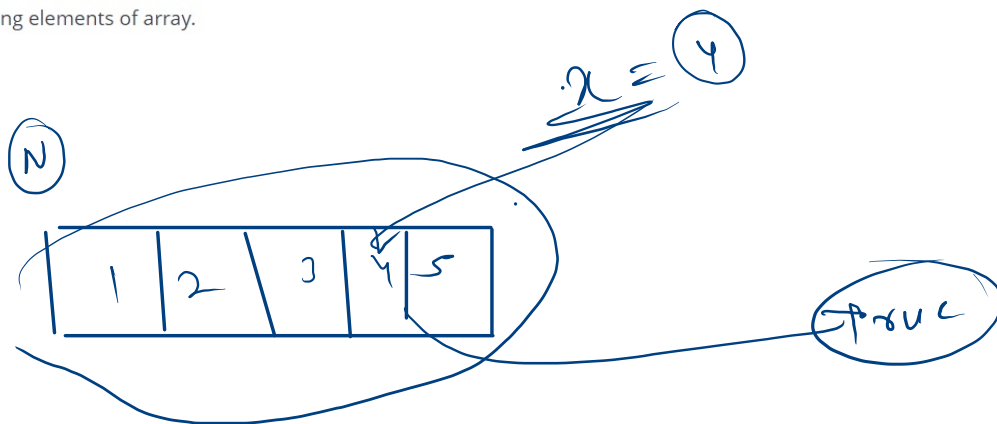
First line contains integer **N**

Second line contains **N** integer representing elements of array.

Third line contains an integer.

Sample Input 0

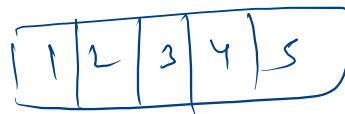
```
5
1 2 3 4 5
3
```



14
15
16
17
18
19
20
21
22

```
public static void main(String[] args) {
    Scanner scn = new Scanner(System.in);
    int n = scn.nextInt();
    int [] A = new int[n];
    for(int i = 0; i < n; i++){
        A[i] = scn.nextInt();
    }
    int x = scn.nextInt(); //tar to be matched
    int ans = search(A, x);
}
```

$n = 5$



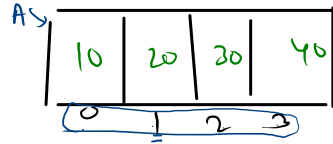
$n = 3$

eg:

4

10 20 30 40

2³



$x = 23$

*** Linear Search.

$i = 4$

$A[4]$

```

1 import java.io.*;
2 import java.util.*;
3
4 public class Solution {
5
6     public static int search(int [] A, int x){
7         for(int i = 0 ; i < A.length; i++){
8             if(A[i] == x){
9                 return i;
10            }
11        }
12        return -1;
13    }
14    public static void main(String[] args) {
15        Scanner scn = new Scanner(System.in);
16        int n = scn.nextInt();
17        int [] A = new int[n];
18        for(int i = 0; i < n; i++){
19            A[i] = scn.nextInt();
20        }
21        int x = scn.nextInt();    //tar to be matched
22        int ans = search(A, x);
23        if(ans == -1){
24            System.out.println("False");
25        }else{
26            System.out.println("True");
27        }
28    }
29 }

```



```

1 import java.io.*;
2 import java.util.*;
3
4 public class Solution {
5
6     public static int search(int [] A, int x){
7         for(int i = 0 ; i < A.length; i++){
8             if(A[i] == x){
9                 return i;
10            }
11        }
12        return -1;
13    }
14    public static void main(String[] args) {
15        Scanner scn = new Scanner(System.in);
16        int n = scn.nextInt();
17        int [] A = new int[n];
18        for(int i = 0; i < n; i++){
19            A[i] = scn.nextInt();
20        }
21        int x = scn.nextInt(); //tar to be matched
22        int ans = search(A, x);
23        if(ans == -1){
24            System.out.println("False");
25        }else{
26            System.out.println("True");
27        }
28    }
29 }

```

Inside funcⁿ signature

↓
Parameters

calling funcⁿ

↓
Arguments.

Print first index of x in array

You have given **array** of **n** elements and **key** . you need to find the **first index** in the array . If key does not exist then return -1.

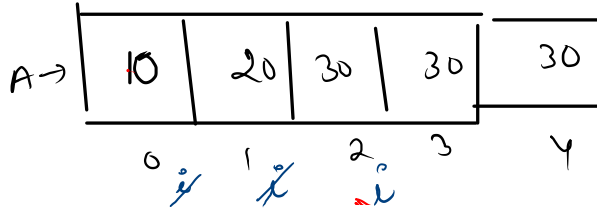
Sample Input 0

```
5 ✓  
1 2 3 3 3  
3 ✓
```

Sample Output 0

2

$n=5$



$x=30$

ans = 2

```
1 import java.io.*;  
2 import java.util.*;  
3  
4 public class Solution {  
5  
6     public static int search(int [] A, int x){  
7         for(int i = 0 ; i < A.length; i++){  
8             if(A[i] == x){  
9                 return i;  
10            }  
11        }  
12        return -1;  
13    }  
14    public static void main(String[] args) {  
15        Scanner scn = new Scanner(System.in);  
16        int n = scn.nextInt();  
17        int [] A = new int[n];  
18        for(int i = 0; i < n; i++){  
19            A[i] = scn.nextInt();  
20        }  
21        int x = scn.nextInt();        //tar to be matched  
22        int ans = search(A, x);  
23        if(ans == -1){  
24            System.out.println("False");  
25        }else{  
26            System.out.println("True");  
27        }  
28    }  
29 }
```

Print First NON MATCHING NUMBER

Declare the first array of size n that stores values of int data-type. Then take n integer inputs and store them in the array one by one.

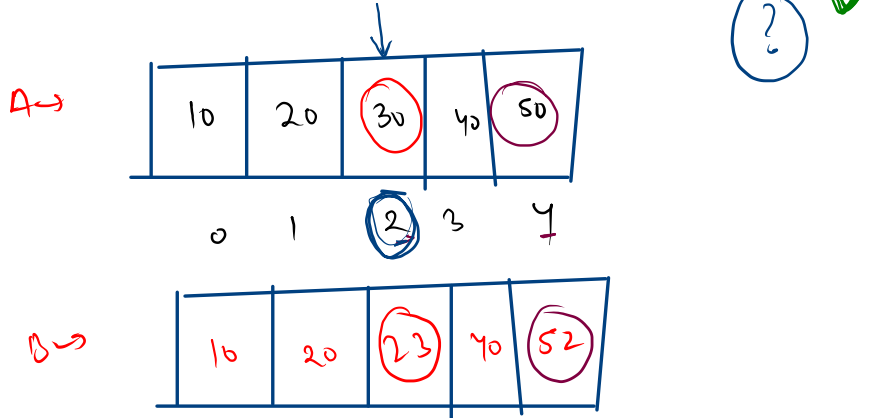
Then again declare a **second array of size n** that stores values of int data-type. Then take n integer inputs and store them in the array one by one. Then print the **index** at which you find the first non matching number in the array.

Sample Input 0

```
5
10
20
30
40
50
10
20
23
40
52
```

Sample Output 0

```
2
```



```

1 import java.io.*;
2 import java.util.*;
3
4 public class Solution {
5
6     public static int firstNonMatching(int [] A, int [] B){
7         for(int i = 0 ; i < A.length; i++){
8             if(A[i] != B[i]){
9                 return i;
10            }
11        }
12        return -1;
13    }
14    public static void main(String[] args) {
15        Scanner scn = new Scanner(System.in);
16        int n = scn.nextInt();
17        int [] A = new int[n];
18        for(int i = 0; i < n; i++){
19            A[i] = scn.nextInt();
20        }
21        int [] B = new int[n];
22        for(int i = 0; i < n; i++){
23            B[i] = scn.nextInt();
24        }
25
26        int ans = firstNonMatching(A, B);
27        System.out.println(ans);
28    }
29 }

```

A

10	20	30	40
0	①	2	3

B

10	22	33	40
----	----	----	----

0 1 2 3 < 4

ans = 1

Sum of all Elements of Array

You are given an **array**, and you have to calculate the **sum** of all elements in the array.

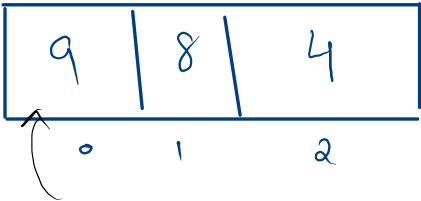
Sample Input 0

```
3
9 8 9
```

Sample Output 0


```
26
```

$n=3$



$ans = sum.$
 $= 21$

logic.

$sum = 0$  21 $sum + A[i]$

```

1 import java.io.*;
2 import java.util.*;
3
4 public class Solution {
5
6     public static void main(String[] args) {
7         Scanner scn = new Scanner(System.in);
8         //input
9         int n = scn.nextInt();
10        int [] A = new int[n];
11        for(int i = 0; i < n; i++){
12            A[i] = scn.nextInt();
13        }
14        //logic
15        int sum = 0;
16        for(int i = 0; i < n; i++){
17            sum += A[i];
18        }
19        System.out.println(sum);
20    }
21 }

```

```

1 import java.io.*;
2 import java.util.*;
3
4 public class Solution {
5     public static int sum(int [] A){
6         int sum = 0;
7         for(int i = 0; i < A.length; i++){
8             sum += A[i];
9         }
10        return sum;
11    }
12
13    public static void main(String[] args) {
14        Scanner scn = new Scanner(System.in);
15        //input
16        int n = scn.nextInt();
17        int [] A = new int[n];
18        for(int i = 0; i < n; i++){
19            A[i] = scn.nextInt();
20        }
21        //logic
22        int ans = sum(A);
23        System.out.println(ans);
24    }
25 }

```