Permutation Clear

Problem Code: **PERMCLEAR**

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Alice has an array A of length N which is initially a *permutation*. She dislikes K numbers which are $B_1, B_2, \ldots, B_K$ all of which are **distinct**. Therefore, she removes all the occurrences of these numbers from A. The order of the remaining elements of the A does **not** change.

Can you find out the resulting array A?

Note: A *permutation* of length N is an array where every integer from 1 to N occurs exactly once.

Input Format

- The first line contains a single integer T — the number of test cases. Then the test cases follow.
- The first line of each test case contains an integer N — the size of the array A.
- The second line of each test case contains N integers $A_1, A_2, \ldots, A_N$ denoting the array A.
- The third line of each test case contains an integer K — the size of the array B.
- The fourth line of each test case contains K integers $B_1, B_2, \ldots, B_K$ denoting the numbers which Alice dislikes.

Output Format

For each test case, output the resulting array A after the removal of all occurrences of $B_1, B_2, \ldots B_K$.

It is guaranteed that there will be at least one element in the resulting array.

Constraints

- $1 \leq T \leq 1000$
- $1 \leq K < N \leq 10^5$
- $1 \leq A_i, B_i \leq N$
- A is initially a *permutation*.
- $B_i \neq B_j$ when $(i \neq j)$
- Sum of N over all test cases does not exceed $2 \cdot 10^5$.

Sample Input 1

```
3
4
4 1 3 2
2
3 1
9
5 2 9 1 8 6 4 3 7
3
5 8 9
5
3 4 5 1 2
2
2 3
```

Sample Output 1

```
4 2
2 1 6 4 3 7
4 5 1
```

Explanation

Test Case 1: Here $A = [4, 1, 3, 2]$ and $B = [3, 1]$. The resulting array A after removing all the numbers which Alice dislikes is $[4, 2]$.

Note that here $[2, 4]$ is an incorrect answer since the order of elements should be the same as in the original array.

Test Case 2: Here $A = [5, 2, 9, 1, 8, 6, 4, 3, 7]$ and $B = [5, 8, 9]$. The resulting array A after removing all the numbers which Alice dislikes is $[2, 1, 6, 4, 3, 7]$.

Test Case 3: Here $A = [3, 4, 5, 1, 2]$ and $B = [2, 3]$. The resulting array A after removing all the numbers which Alice dislikes is $[4, 5, 1]$.

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Time Limit:	0.5 secs
Source Limit:	50000 Bytes
Languages:	CPP17, CPP14, PYTH 3, C, JAVA, PYP3, PYTH, CS2, NODEJS, GO, JS, TEXT, PHP, kotlin, RUBY, rust, PYPY, PAS fpc, HASK, SCALA, swift, PERL, SQLQ, D, LUA, BASH, LISP sbcl, ADA, R, TCL, SQL, PRLG, FORT, PAS gpc, FS, SCM qobi, CLPS, NICE, CLOJ, PERL6, CAML, SCM chicken, ICON, ICK, ST, WSPC, NEM, LISP clisp, COB, ERL, BF, ASM, PIKE, SCM guile

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