Segregate 0s and 1s

You are given an array of 0s and 1s in random order. Segregate 0s on left side and 1s on right side of the array.

Input:

The first line of input contains an integer T denoting the number of test cases.

The first line of each test case is N,N is the size of array.

The second line of each test case contains N input C[i].

Output:

Print 0s on left side and 1s on right side.

Constraints:

 $1 \le T \le 100$

 $1 \le N \le 500$

 $0 \leq C[i] \leq 1$

Example:

Input:

2

5

00110

4

1111

Output:

00011

1 1 1 1