

# Missing one

You are given string S. Find lexicographically smallest string, that is **not subsequence** of given string. Subsequence of string is created by deleting zero or more characters from starting string.

Subsequences of string "abc" are { "a", "b", "c", "ab", "ac", "bc", "abc" }

Constraints :

$|S| \leq 10000$

## Input

First line of the input is number **t** ( $t \leq 10000$ ) denoting number of testcases. t lines follows, each containing string S, length of each string is at max 10000 ( $10^4$ ).

## Output

Output t strings, solution to each test.

## Example

**Input:**

2

bcd

abcdefghijklmnopqrstuvjklmxyz

**Output:**

a

aa