

Problem D

Decompose and Concatenate

Time Limit: 2 seconds

You are given an integer greater than or equal to 2. When this number is decomposed into the sum of two *positive* integers, a new integer number can be formed as the concatenation of the decimal representations of the two integers. Find the maximum possible number formed in this way.

For example, 102 can be decomposed and concatenated as follows.

$$\begin{aligned}
 1 + 101 &\rightarrow 1101 \\
 2 + 100 &\rightarrow 2100 \\
 3 + 99 &\rightarrow 399 \\
 4 + 98 &\rightarrow 498 \\
 &\vdots \\
 101 + 1 &\rightarrow 1011
 \end{aligned}$$

Among them, $92 + 10 \rightarrow 9210$ is the largest.

Input

The input consists of a single test case in a single line. The line contains an integer between 2 and 10^{17} , inclusive, which is the integer to be decomposed and concatenated.

Output

Output the maximum possible number in a line.

Sample Input 1	Sample Output 1
8	71
Sample Input 2	Sample Output 2
2025	10251000
Sample Input 3	Sample Output 3
102	9210
Sample Input 4	Sample Output 4
9999999999999999	8999999999999999100000000000000000