

Problem 1: Smartphone

Security of smartphone applications has become a growing concern of IT.

It is particularly worrying because it concerns the security of available personal information.

For this reason, Bob decided to encrypt the phone numbers of his contacts in such a way that only he can decipher them.

At first, he tried to use very complex algorithms, but the decryption process becomes tedious, especially when he needed to dial a number fast.

He finally found the following algorithm: instead of writing the phone number, Bob multiply it by 10, and then he adds the result to the original phone number.

For example, if the phone number is 123, after the transformation, it becomes 1353. Bob truncates the result (from the left), so that the new phone number has as many digits as the original phone number.

In this example, Bob will save 353 instead of 123 in his smartphone.

Bob needs a program to retrieve the original phone number from the number saved on his smartphone.

The program should display "impossible" if the initial number cannot be calculated.

Input file format: smartphone.in

Your program will be tested on one or more test cases. Each case is specified on a row that contains a single positive number having less than 20 digits. The last line of the input file is zero. For example:

```
353
444
123456
147
9988
0
```

Output file format: smartphone.out

For each test case, one displays the result on a single line using the following format:

```
123
404
738496
377
Impossible
```

Send your source codes by email to bxdnpro12@gmail.com

Thank you and good luck