

Problem B – Plastic sticks

Little Long loves playing with his plastic sticks. He usually uses his sticks to form digits like the following picture.



In his collection, there are N sticks and he can create many different numbers. Little Long never creates numbers with unnecessary leading zeros. (i.e He never uses 14 sticks to create 010). He wants to know what are the maximal and the minimal non negative number he can create using all of his sticks. Your task is to help him calculate these numbers.

Input

The first line of input is the number T – the number of test cases. Then T test cases follow. Each test case is written in one line consist of a positive integer N - the number of plastic sticks in the collection. ($N \leq 1000$)

Output

For each test case, you should print in two lines the **minimal** number and the **maximal** number he can create. **If it is impossible to create the number, print -1 instead.**

Sample

Sample input	Output for sample input
$\begin{array}{r} 12 \\ 2 \\ \hline 4 \end{array}$	1 1 4 11