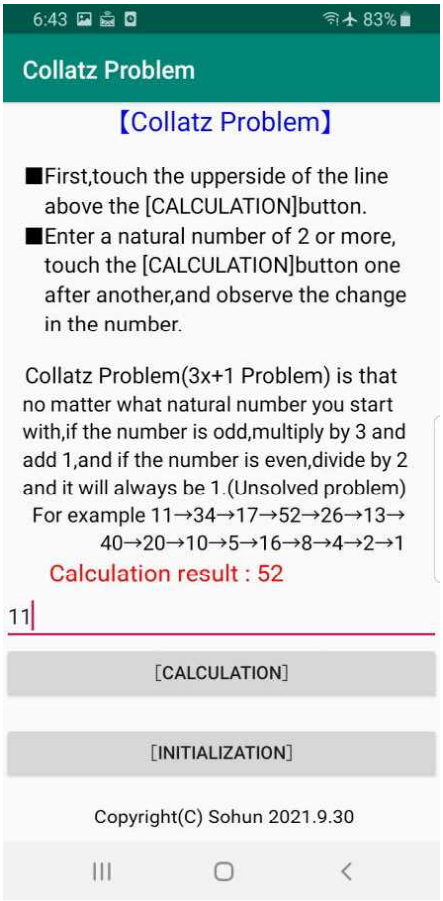
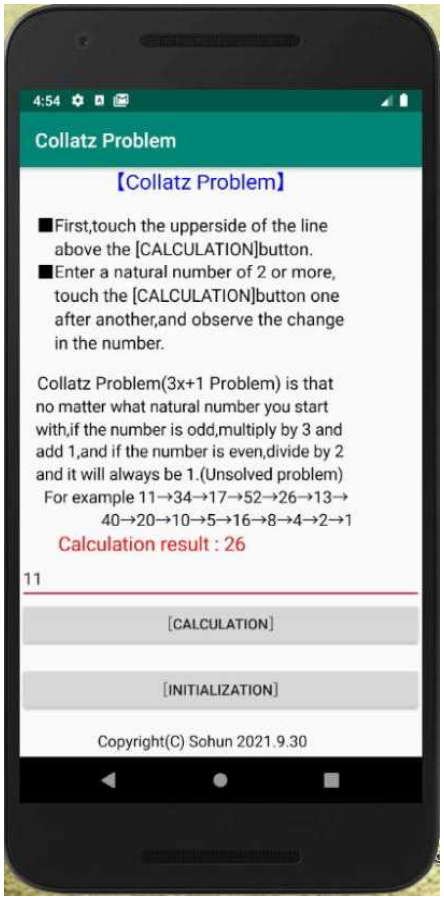
【Collatz Problem】

※　No matter what natural number you start with ,　if the natural number is even , divide it by 2 , and if the natural number is odd , multiply it by 3 and add 1. Observe how it always becomes 1 when this is repeated.



【Screenshot】
Galaxy S9



【Emulator image】
Android Studio Version 3.5.1

［概　要］

No matter what natural number you start with , if the natural number is even , divide it by 2 , and if　the natural number is odd , multiply it by 3 and add 1. Is it true that if you repeat this , it will always become 1 ?

This is called the "3x+1 Problem" or the "Collatz Problem" and is a difficult problem that has not yet been solved.

For example , if you start from 11 , it will be 11 → 34 → 17 → 52 → 26 → 13 → 40 → 20 → 10 → 5 → 16 → 8 → 4 → 2 → 1 .

Let's start with various natural numbers and check.