Triplet Numbers X99068_en

A natural number $n > 0$ is a *triplet-number* if it is composed of triplets of digits where each triplet repeats the same digit exactly 3 times. For example: 222, 666555666, 444444 and 111000 are triplet-numbers.
Write a program that, given a sequence of natural numbers, prints TRUE if the read number is a triplets-number and FALSE otherwise.
In order to solve this problem, you have to provide a RECURSIVE implementation of the following function:

```
//pre: 0 < n and n < 10^9
//post: returns true if n is a triplets-number and false otherwise
bool triplet_number(int n){
        // YOUR CODE HERE
}
```

Additionally you must use the following code:

```
int main(){
int n;
while (cin >> n){
if (triplet_number(n)) cout << "TRUE" << endl;
else cout << "FALSE" << endl;
}
}
```

Exam score: 3.000000 **Automatic part:** 100.000000%

Input

The input are numbers in the interval $[1, 10^9)$

Output

For each number in the input sequence, the program prints TRUE if the number is a triplet-number and FALSE otherwise.

Sample input 1

```
222
9
100
666555666
444444
111000
```

Sample output 1

```
TRUE
FALSE
FALSE
TRUE
TRUE
TRUE
```

Sample input 2

```
7
888111
90
777222
313444
2223
```

Sample output 2

```
FALSE
TRUE
```

```
FALSE
TRUE
FALSE
FALSE
```

Observation

IMPORTANT: Iterative solutions or those altering the function header will be considered INVALID (zero score for both automatic and manual parts)

Problem information

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