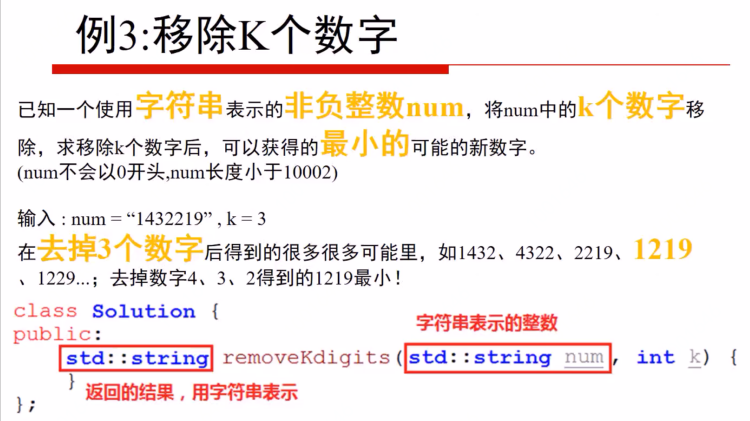
Leetcode\_402\_RemoveKDigits\_移除K个数字

# Leetcode\_402\_RemoveKDigits\_移除K个数字

## 题目介绍

\* 难度：Medium

\* https://leetcode.com/problems/remove-k-digits/description/



\* Given a non-negative integer num represented as a string,

\* remove k digits from the number so that the new number is the smallest possible.

\* Note:

\* The length of num is less than 10002 and will be ≥ k.

\* The given num does not contain any leading zero.

\* Example 1:

\* Input: num = "1432219", k = 3

\* Output: "1219"

\* Explanation: Remove the three digits 4, 3, and 2 to form the new number 1219 which is the smallest.

\* Example 2:

\* Input: num = "10200", k = 1

\* Output: "200"

\* Explanation: Remove the leading 1 and the number is 200. Note that the output must not contain leading zeroes.

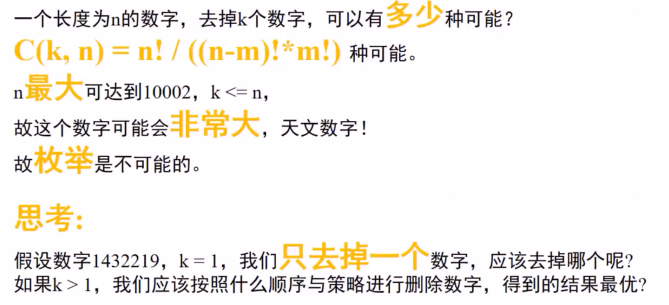
\* Example 3:

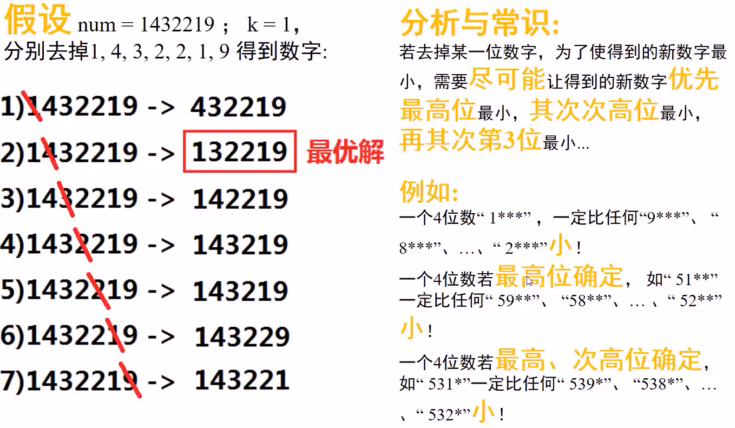
\* Input: num = "10", k = 2

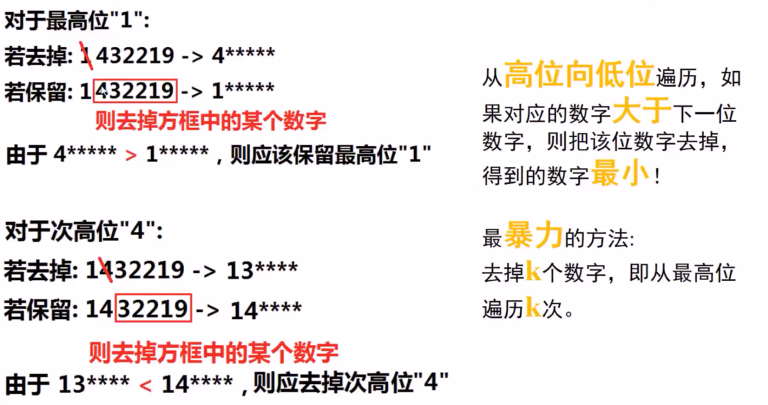
\* Output: "0"

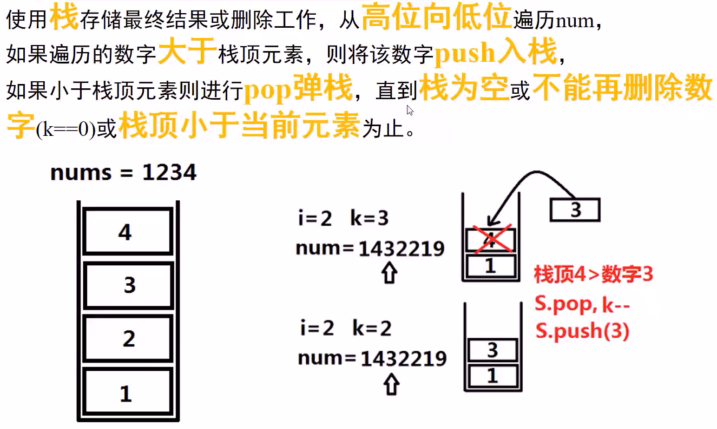
\* Explanation: Remove all the digits from the number and it is left with nothing which is 0.

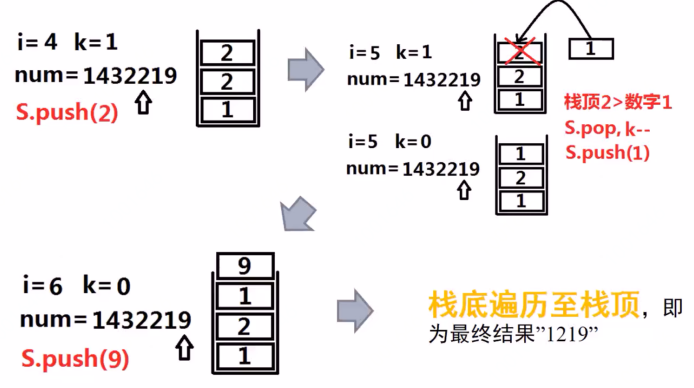
## 思路分析



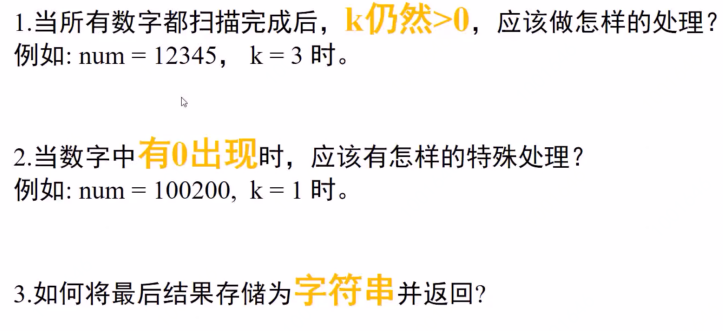








**最关键的三个问题：**



问题1：当扫描完毕，k仍然大于0，此时需要再重新扫描一遍；

利用双端队列实现。

问题2：0不能作为开头。

问题3：利用双端队列的特点从另一端拼接输出即可。

## Java代码