

Substring in between

You are given the following:

- A string S consisting of only lower case English alphabets
- A number N

The longest substring in the given string S must follow the mentioned conditions:

- It is the prefix of the string S .
- It is the suffix of the string S .
- It appears at least N times in between the string S .

Task

Determine the longest substring of string S that meets the given conditions. If no such substring exists, print **Go Away**.

Example**Assumptions**

- $S = \text{"abcababab"}$
- $N = 1$

Approach

You choose "ab" as the longest substring of S .

The prefix and suffix of string S contain the string "ab" and it also appears at least 1 time in between the string S .

Hence, the answer is "ab".

Function description

Complete the solve function provided in the editor. This function takes the following 2 parameters and returns the longest substring answer.

- S Represents the given string

Hence, the answer is "ab".

Function description

Complete the solve function provided in the editor. This function takes the following 2 parameters and returns the longest substring answer.

- S: Represents the given string
- N: Represents an integer

Input format

Note: This is the input format that you must use to provide custom input (available above the **Compile and Test** button).

- The first line contains a string S.
- The second line contains an integer N.

Output format

Print the longest substring of given string S that meets the given conditions. If no such substring exists, print **Go Away**.

Constraints

$$2 \leq |S| \leq 10^5$$
$$1 \leq N \leq 10^2$$

Code snippets (also called starter code/bolierplate code)

This question has code snippets for C, CPP, Java, and Python.

Sample input 1

```
hackerhackhack
1
```

Copy

Sample output 1

```
hack
```

Copy

Sample Input 1

[Copy](#)

Sample output 1

[Copy](#)

```
hackerhacksack
1
```

```
hack
```

Explanation

Given

- $S = \text{"hackerhacksack"}$
- $N = 1$

Approach

The longest substring of S we can choose is "hack".

The prefix and suffix of string S contain the string "hack" and it also appears at least 1 time inside S (excluding those prefix and suffix parts).

Note: Your code must be able to print the sample output from the provided sample input. However, your code is run against multiple hidden test cases. Therefore, your code must pass these hidden test cases to solve the problem statement.

Time Limit: 2.0 sec(s) for each input file

Memory Limit: 256 MB

Source Limit: 1024 KB

Marking Scheme: Score is assigned if any testcase passes

Allowed Languages: Java, Python 3