

Problem 2053: Kth Distinct String in an Array

Problem Information

Difficulty: Easy

Acceptance Rate: 0.00%

Paid Only: No

Problem Description

A

distinct string

is a string that is present only

once

in an array.

Given an array of strings

arr

, and an integer

k

, return

the

k

th

distinct string

present in

arr

. If there are

fewer

than

k

distinct strings, return

an

empty string

""

.

Note that the strings are considered in the

order in which they appear

in the array.

Example 1:

Input:

arr = ["d","b","c","b","c","a"], k = 2

Output:

"a"

Explanation:

The only distinct strings in arr are "d" and "a". "d" appears 1

st

, so it is the 1

st

distinct string. "a" appears 2

nd

, so it is the 2

nd

distinct string. Since $k == 2$, "a" is returned.

Example 2:

Input:

arr = ["aaa", "aa", "a"], k = 1

Output:

"aaa"

Explanation:

All strings in arr are distinct, so the 1

st

string "aaa" is returned.

Example 3:

Input:

`arr = ["a","b","a"], k = 3`

Output:

`""`

Explanation:

The only distinct string is "b". Since there are fewer than 3 distinct strings, we return an empty string "".

Constraints:

$1 \leq k \leq \text{arr.length} \leq 1000$

$1 \leq \text{arr}[i].\text{length} \leq 5$

`arr[i]`

consists of lowercase English letters.

Code Snippets

C++:

```
class Solution {
public:
    string kthDistinct(vector<string>& arr, int k) {

    }
};
```

Java:

```

class Solution {
public String kthDistinct(String[] arr, int k) {

}

}

```

Python3:

```

class Solution:
def kthDistinct(self, arr: List[str], k: int) -> str:

```

Python:

```

class Solution(object):
def kthDistinct(self, arr, k):
"""
:type arr: List[str]
:type k: int
:rtype: str
"""

```

JavaScript:

```

/**
 * @param {string[]} arr
 * @param {number} k
 * @return {string}
 */
var kthDistinct = function(arr, k) {

};

```

TypeScript:

```

function kthDistinct(arr: string[], k: number): string {

};

```

C#:

```

public class Solution {
public string KthDistinct(string[] arr, int k) {

```

```
}  
}
```

C:

```
char* kthDistinct(char** arr, int arrSize, int k) {  
  
}
```

Go:

```
func kthDistinct(arr []string, k int) string {  
  
}
```

Kotlin:

```
class Solution {  
    fun kthDistinct(arr: Array<String>, k: Int): String {  
  
    }  
}
```

Swift:

```
class Solution {  
    func kthDistinct(_ arr: [String], _ k: Int) -> String {  
  
    }  
}
```

Rust:

```
impl Solution {  
    pub fn kth_distinct(arr: Vec<String>, k: i32) -> String {  
  
    }  
}
```

Ruby:

```

# @param {String[]} arr
# @param {Integer} k
# @return {String}
def kth_distinct(arr, k)

end

```

PHP:

```

class Solution {

    /**
     * @param String[] $arr
     * @param Integer $k
     * @return String
     */
    function kthDistinct($arr, $k) {

    }

}

```

Dart:

```

class Solution {
  String kthDistinct(List<String> arr, int k) {

  }

}

```

Scala:

```

object Solution {
  def kthDistinct(arr: Array[String], k: Int): String = {

  }

}

```

Elixir:

```

defmodule Solution do
  @spec kth_distinct(arr :: [String.t], k :: integer) :: String.t
  def kth_distinct(arr, k) do

```

```
end
end
```

Erlang:

```
-spec kth_distinct(Arr :: [unicode:unicode_binary()], K :: integer()) ->
unicode:unicode_binary().
kth_distinct(Arr, K) ->
.
```

Racket:

```
(define/contract (kth-distinct arr k)
  (-> (listof string?) exact-integer? string?)
)
```

Solutions

C++ Solution:

```
/*
 * Problem: Kth Distinct String in an Array
 * Difficulty: Easy
 * Tags: array, string, hash
 *
 * Approach: Use two pointers or sliding window technique
 * Time Complexity: O(n) or O(n log n)
 * Space Complexity: O(n) for hash map
 */

class Solution {
public:
    string kthDistinct(vector<string>& arr, int k) {

    }
};
```

Java Solution:


```

/**
 * Problem: Kth Distinct String in an Array
 * Difficulty: Easy
 * Tags: array, string, hash
 *
 * Approach: Use two pointers or sliding window technique
 * Time Complexity: O(n) or O(n log n)
 * Space Complexity: O(n) for hash map
 */

class Solution {
public String kthDistinct(String[] arr, int k) {

}

}

```

Python3 Solution:

```

"""
Problem: Kth Distinct String in an Array
Difficulty: Easy
Tags: array, string, hash

Approach: Use two pointers or sliding window technique
Time Complexity: O(n) or O(n log n)
Space Complexity: O(n) for hash map
"""

class Solution:
def kthDistinct(self, arr: List[str], k: int) -> str:
# TODO: Implement optimized solution
pass

```

Python Solution:

```

class Solution(object):
def kthDistinct(self, arr, k):
"""
:type arr: List[str]
:type k: int
:rtype: str
"""

```

JavaScript Solution:

```
/**
 * Problem: Kth Distinct String in an Array
 * Difficulty: Easy
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 */

/**
 * @param {string[]} arr
 * @param {number} k
 * @return {string}
 */
var kthDistinct = function(arr, k) {

};
```

TypeScript Solution:

```
/**
 * Problem: Kth Distinct String in an Array
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 * Tags: array, string, hash
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 * Time Complexity: O(n) or O(n log n)
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 */

function kthDistinct(arr: string[], k: number): string {

};
```

C# Solution:

```
/*
 * Problem: Kth Distinct String in an Array
 * Difficulty: Easy
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```

* Tags: array, string, hash
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* Approach: Use two pointers or sliding window technique
* Time Complexity: O(n) or O(n log n)
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*/

public class Solution {
public string KthDistinct(string[] arr, int k) {

}

}

```

C Solution:

```

/*
* Problem: Kth Distinct String in an Array
* Difficulty: Easy
* Tags: array, string, hash
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* Time Complexity: O(n) or O(n log n)
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char* kthDistinct(char** arr, int arrSize, int k) {

}

```

Go Solution:

```

// Problem: Kth Distinct String in an Array
// Difficulty: Easy
// Tags: array, string, hash
//
// Approach: Use two pointers or sliding window technique
// Time Complexity: O(n) or O(n log n)
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func kthDistinct(arr []string, k int) string {

```

```
}
```

Kotlin Solution:

```
class Solution {  
    fun kthDistinct(arr: Array<String>, k: Int): String {  
  
    }  
}
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Swift Solution:

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class Solution {  
    func kthDistinct(_ arr: [String], _ k: Int) -> String {  
  
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// Problem: Kth Distinct String in an Array  
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impl Solution {  
    pub fn kth_distinct(arr: Vec<String>, k: i32) -> String {  
  
    }  
}
```

Ruby Solution:

```
# @param {String[]} arr  
# @param {Integer} k  
# @return {String}  
def kth_distinct(arr, k)
```

```
end
```

PHP Solution:

```
class Solution {  
  
    /**  
     * @param String[] $arr  
     * @param Integer $k  
     * @return String  
     */  
    function kthDistinct($arr, $k) {  
  
    }  
}
```

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class Solution {  
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