



2

[More ▾](#) [Next Blog»](#)[Create Blog](#) [Sign In](#)

The Code Sniper

Let's snipe the Leetcode problems together. No more hiding! Leetcode solution in Java! Your comments and suggestions are welcome!

Search This Blog

Blog Archive

[► 2016 \(1\)](#)[▼ 2015 \(161\)](#)[► April \(20\)](#)[▼ March \(114\)](#)[142. Linked List Cycle II
Leetcode Java](#)[141. Linked List Cycle
Leetcode Java](#)[140. Word Break II Leetcode
Java](#)[139. Word Break Leetcode
Java](#)[138. Copy List with Random
Pointer Leetcode Java](#)[137. Single Number II
Leetcode Java](#)[136. Single Number
Leetcode Java](#)[135. Candy Leetcode Java](#)[134. Gas Station Leetcode
Java](#)[133. Clone Graph Leetcode](#)

Friday, March 6, 2015

45. Jump Game II Leetcode Java

Given an array of non-negative integers, you are initially positioned at the first index of the array.

Each element in the array represents your maximum jump length at that position.

Your goal is to reach the last index in the minimum number of jumps.

For example:

Given array A = [2, 3, 1, 1, 4]

The minimum number of jumps to reach the last index is 2. (Jump 1 step from index 0 to 1, then 3 steps to the last index.)

Solution:

Dynamic programming

Using a variable to track the maximum index that current step can reach, and during the current step, calculate the maximum index that next step can reach. When it hits the maximum index of current step, update the current maximum to calculated next maximum index. When the maximum index \geq A.length, return the steps.

Time complexity: $O(n)$

Java

132. Palindrome Partitioning II Leetcode Java

131. Palindrome Partitioning Leetcode Java

130. Surrounded Regions Leetcode Java

129. Sum Root to Leaf Numbers Leetcode Java

128. Longest Consecutive Sequence Leetcode Java

127. Word Ladder Leetcode Java

125. Valid Palindrome Leetcode Java

188. Best Time to Buy and Sell Stock IV Leetcode J...

123. Best Time to Buy and Sell Stock III Leetcode ...

122. Best Time to Buy and Sell Stock II Leetcode J...

121. Best Time to Buy and Sell Stock Leetcode Java...

120. Triangle Leetcode Java

119. Pascal's Triangle II Leetcode Java

118. Pascal's Triangle

```
public int jump(int[] A) {
    if(A==null || A.length<2) return 0;
    int next=0;
    int step=0;
    int cur=0;
    for(int i=0;i<A.length&& i<=cur;i++){
        cur=Math.max(cur,i+A[i]);
        if(cur>=A.length-1) return step+1;
        if(i==next){
            next=cur;
            step++;
        }
    }
    return -1;
}
```

Posted by [liu hui](#) at 9:39 PM



+2 Recommend this on Google

No comments:

Post a Comment

- Leetcode Java
117. Populating Next Right Pointers in Each Node I...
116. Populating Next Right Pointers in Each Node L...
115. Distinct Subsequences
Leetcode Java
114. Flatten Binary Tree to Linked List Leetcode J...
113. Path Sum II Leetcode Java
112. Path Sum Leetcode Java
111. Minimum Depth of Binary Tree Leetcode Java
110. Balanced Binary Tree Leetcode Java
109. Convert Sorted List to Binary Search Tree Lee...
108. Convert Sorted Array to Binary Search Tree Le...
107. Binary Tree Level Order Traversal II Leetcode...
106. Construct Binary Tree from Inorder and Postor...
105. Construct Binary Tree from Preorder and Inord...
104. Maximum Depth of Binary Tree Leetcode Java
103. Binary Tree Zigzag Level Order Traversal Leet...
102. Binary Tree Level Order Traversal Leetcode Ja...
101. Symmetric Tree Leetcode Java
100. Same Tree Leetcode Java
99. Recover Binary Search Tree Leetcode Java
98. Validate Binary Search Tree Leetcode Java
97. Interleaving String Leetcode Java
95. Unique Binary Search Trees II Leetcode Java

Enter your comment...

Comment as: Select profile...

Publish

Preview

Links to this post

[Create a Link](#)

[Newer Post](#)

[Home](#)

[Older Post](#)

Subscribe to: [Post Comments \(Atom\)](#)

96. Unique Binary Search
Trees Leetcode Java

94. Binary Tree Inorder
Traversal Leetcode Java

93. Restore IP Addresses
Leetcode Java

92. Reverse Linked List II
Leetcode Java

90. Subsets II Leetcode Java

91. Decode Ways Leetcode
Java

89. Gray Code Leetcode Java

88. Merge Sorted Array
Leetcode Java

87. Scramble String
Leetcode Java

86. Partition List Leetcode
Java

85. Maximal Rectangle
Leetcode Java

84. Largest Rectangle in
Histogram Leetcode Java

82. Remove Duplicates from
Sorted List II Leetcode...

83. Remove Duplicates from
Sorted List Leetcode Ja...

81. Search in Rotated Sorted
Array II Leetcode Jav...

80. Remove Duplicates from
Sorted Array II Leetcod...

79. Word Search Leetcode
Java

78. Subsets Leetcode Java

77. Combinations Leetcode
Java

76. Minimum Window
Substring Leetcode Java

75. Sort Colors Leetcode
Java

74. Search a 2D Matrix
Leetcode Java

73. Set Matrix Zeroes
Leetcode Java

72. Edit Distance Leetcode

Java

- 69. Sqrt(x) Leetcode Java
- 68. Text Justification
Leetcode Java
- 70. Climbing Stairs Leetcode
Java
- 66. Plus One Leetcode Java
- 65. Valid Number Leetcode
Java
- 67. Add Binary Leetcode Java
- 21. Merge Two Sorted Lists
Leetcode Java
- 64. Minimum Path Sum
Leetcode Java
- 174. Dungeon Game
Leetcode Java
- 63. Unique Paths II Leetcode
Java
- 62. Unique Paths Leetcode
Java
- 61. Rotate List Leetcode Java
- 60. Permutation Sequence
Leetcode Java
- 59. Spiral Matrix II Leetcode
Java
- 58. Length of Last Word
Leetcode Java
- 57. Insert Interval Leetcode
Java
- 56. Merge Intervals Leetcode
Java
- 55. Jump Game Leetcode
Java
- 54. Spiral Matrix Leetcode
Java
- 53. Maximum Subarray
Leetcode Java
- 52. N-Queens II Leetcode
Java
- 51. N-Queens Leetcode Java
- 50. Pow(x, n) Leetcode Java
- 49. Anagrams Leetcode Java
- 48. Rotate Image Leetcode

Java

47. Permutations II Leetcode
Java

46. Permutations Leetcode
Java

45. Jump Game II Leetcode
Java

44. Wildcard Matching
Leetcode Java

43. Multiply Strings Leetcode
Java

► February (1)

► January (26)

► 2014 (2)

World Visitors



Follow by Email

Email address...

Submit

Total Pageviews

Simple template. Template images by [gaffera](#). Powered by [Blogger](#).