

5480. Minimum Number of Vertices to Reach All Nodes

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Given a **directed acyclic graph**, with n vertices numbered from 0 to $n-1$, and an array `edges` where `edges[i] = [fromi, toi]` represents a directed edge from node `fromi` to node `toi`.

Find the *smallest set of vertices from which all nodes in the graph are reachable*. It's guaranteed that a unique solution exists.

Notice that you can return the vertices in any order.

User Accepted: 2463

User Tried: 2851

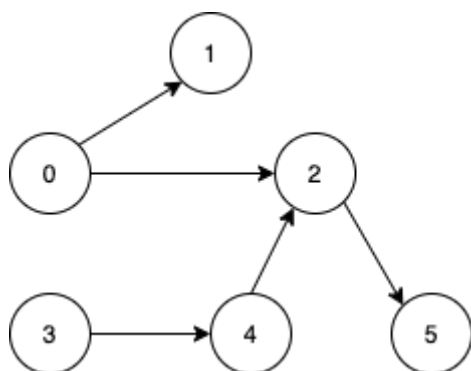
Total Accepted: 2499

Total Submissions: 3536

Difficulty:

Medium

Example 1:

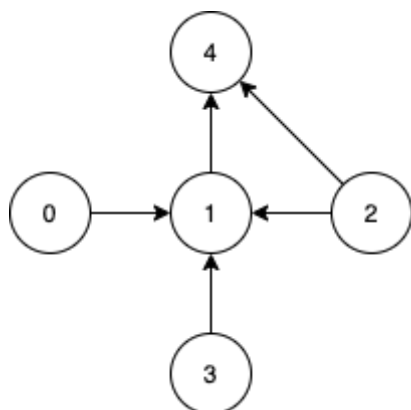


Input: $n = 6$, `edges = [[0,1],[0,2],[2,5],[3,4],[4,2]]`

Output: `[0,3]`

Explanation: It's not possible to reach all the nodes from a single vertex. From `0` we can

Example 2:



Input: $n = 5$, $\text{edges} = [[0,1],[2,1],[3,1],[1,4],[2,4]]$

Output: $[0,2,3]$

Explanation: Notice that vertices 0, 3 and 2 are not reachable from any other node, so we

Constraints:

- $2 \leq n \leq 10^5$
- $1 \leq \text{edges.length} \leq \min(10^5, n * (n - 1) / 2)$
- $\text{edges}[i].\text{length} == 2$
- $0 \leq \text{from}_i, \text{to}_i < n$
- All pairs $(\text{from}_i, \text{to}_i)$ are distinct.

JavaScript



```
1 /**
2  * @param {number} n
3  * @param {number[][]} edges
4  * @return {number[]}
5  */
6 var findSmallestSetOfVertices = function(n, edges) {
7
8  };
```

☐ Custom Testcase

Use Example Testcases

Run

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