

## Find Eventual Safe States

In a directed graph, we start at some node and every turn, walk along a directed edge of the graph. If we reach a node that is terminal (that is, it has no outgoing directed edges), we stop.

Now, say our starting node is *eventually safe* if and only if we must eventually walk to a terminal node. More specifically, there exists a natural number  $K$  so that for any choice of where to walk, we must have stopped at a terminal node in less than  $K$  steps.

Which nodes are eventually safe? Return them as an array in sorted order.

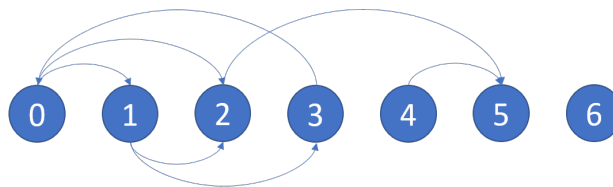
The directed graph has  $N$  nodes with labels  $0, 1, \dots, N-1$ , where  $N$  is the length of `graph`. The graph is given in the following form: `graph[i]` is a list of labels  $j$  such that  $(i, j)$  is a directed edge of the graph.

**Example:**

**Input:** `graph = [[1,2],[2,3],[5],[0],[5],[],[[]]]`

**Output:** `[2,4,5,6]`

Here is a diagram of the above graph.



**Note:**

- `graph` will have length at most `10000`.
- The number of edges in the graph will not exceed `32000`.
- Each `graph[i]` will be a sorted list of different integers, chosen within the range `[0, graph.length - 1]`.

The answers will be available soon! Meanwhile you can go check out [the answers in the discussion forum](#) so far.

From [Leetcode](#).