

Algorithm: DFS

Input: A set of visited nodes, a stack of nodes, a graph and a starting node

Output: The list of booleans

```
1 Procedure DFS(visited, stack, graph, node)
2   add node to visited
3   append node to stack
4   while  $|stack| > 0$  do
5      $m \leftarrow \text{pop}(\text{stack})$ 
6     for  $nb \in \text{get}(m, \text{graph})$  do
7       if  $nb \notin \text{visited}$  then
8         add nb to visited
9         append nb to stack
10    end
11  end
12  return visited
```