

All classroom material is allowed. Algorithms must be written in C/C++. Correctness and Complexity of each algorithm must be justified in the comments. Algorithms that are correct but are suboptimal will be taken into consideration (up to half of the points).

A *prism* is a 4-node path P_4 to which we add a universal vertex (adjacent to all four vertices of the path).

INPUT: A graph $G=(V,E)$

OUTPUT: 1 if G contains a prism as an induced subgraph; 0 otherwise.

COMPLEXITY: $O(m^2)$.