A NOTE ON PATH DOMINATION

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Abstract

We study domination between different types of walks connecting two non-adjacent vertices u and v of a graph (shortest paths, induced paths, paths, tolled walks). We succeeded in characterizing those graphs in which every uv -walk of one particular kind dominates every uv -walk of other specific kind. We thereby obtained new characterizations of standard graph classes like chordal, interval and superfragile graphs.

Keywords: domination, paths, geodesics, chordal graphs, interval graphs.

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