

**Title: Stratified Domination in Graphs**

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A graph  $G$  is 2-stratified if its vertex set is partitioned into two classes, the red vertices and the blue vertices. A coloring of a graph  $G$  in which every vertex is colored red or blue is a red-blue coloring. Let  $F$  be a 2-stratified graph rooted at some blue vertex  $v$ . The  $F$ -domination number of a graph  $G$  is the minimum number of red vertices of  $G$  in a red-blue coloring of the vertices of  $G$  such that every blue vertex  $v$  of  $G$  belongs to a copy of  $F$  rooted at  $v$ . Some results concerning  $F$ -domination are presented.

**Key Words:** stratified graphs,  $F$ -domination.

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