

Counting split graphs, bipartite posets and adjacency matrices

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Split graphs are well-known as a self-complementary class of perfect graphs. Cheng, Collins and Trenk (2016), discovered the following interesting counting fact: unlabeled, unbalanced split graphs on n vertices can be placed into a bijection with all unlabeled split graphs on $n - 1$ or fewer vertices. In this talk, we prove similar counting theorems for bipartite posets and adjacency matrices via bijections to split graphs.

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