

## **Towards spectral characterizations of hereditary graph classes**

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It is sometimes possible to determine, given the spectrum of an unknown graph's adjacency matrix, whether the graph contains one or more of certain subgraphs. For instance, bipartite graphs are characterized by having eigenvalues that are symmetric about 0. We identify several hereditary classes for which membership can be determined from the spectrum of a graph, and we describe subgraph sets that are maintained under switching operations that preserve graph spectra.