How Can Biclique Covers Help in Matching Problems

— Abstract -

In several settings one encounters assignment or matching problems between objects of two different types, and needs to run a computation on a bipartite graph. While this graph can potentially be dense, it can sometimes be represented compactly using a biclique cover. This is in particular often the case when the objects are geometric – we will look at examples, and see how recent progress on maximum flow can be combined with such biclique covers to obtain faster algorithms.

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