

Homework 6

- (6.1) In the graph obtained from K_5 by deleting two non-incident edges, assign weights $1, 1, 2, 2, 3, 3, 4, 4$ to the edges in two ways. One way so that the minimum-weight spanning tree is unique, and another way so that the minimum-weight spanning tree is not unique.
- (6.2) Compute the number of spanning trees of $K_{2,m}$. Also compute the number of isomorphism classes of spanning trees of $K_{2,m}$.
- (6.3) Use the Prüfer correspondence to count, for $n \geq 5$, the trees with vertex set $\{1, 2, \dots, n\}$ that have exactly three leaves.