

The Pachner graph of 2-spheres.  
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**Abstract:** The Pachner graph of triangulated  $n$ -vertex 2-spheres is the graph whose vertices are triangulated 2-spheres on  $n$  vertices and two such vertices are joined by an edge if one of the corresponding sphere can be obtained from the other by an edge flip. It is well-known that the Pachner graph of triangulated  $n$ -vertex 2-spheres is connected, i.e., each pair of  $n$ -vertex 2-spheres is connected by a sequence of edge flips. In this talk, we discuss various induced subgraphs of this graph. Namely, we focus on what is called stacked and flag 2-spheres. (This is a joint work with Prof. Benjamin A. Burton, the University of Queensland, Brisbane, Australia and Dr. Jonathan Spreer, Freie Universität Berlin, Germany. This is available at [arXiv:1701.05144](https://arxiv.org/abs/1701.05144).)