1050-51-81 Egon Schulte* (schulte@neu.edu), Department of Mathematics, Northeastern University, Boston, MA 02115, and Daniel Pellicer (dpellicer@math.unam.mx), Department of Mathematics and Statistics, University of New Brunswick, Fredericton, NB E3B5A3, Canada. Polygonal Complexes and Symmetry.

The talk reviews the enumeration of the complete set of forty-eight regular polyhedra in 3-space (known as the Grünbaum-Dress polyhedra), following a classification scheme obtained years ago in joint work by Peter McMullen and the speaker. We also describe work in progress on the full classification of regular polygonal complexes in 3-space. Polygonal complexes are more general than polyhedra, in that they usually have more than two faces meeting at an edge, but otherwise share many of their properties. (Received February 26, 2009)