Nancy L Hagelgans* (NHagelgans@Ursinus.edu), Mathematics and Computer Science Department, Collegeville, PA 19426. Conjectures and Counterexamples in Discrete Mathematics.

Students in my discrete mathematics course work in stable cooperative learning groups throughout the semester on weekly assignments in which many of the exercises involve generating examples with a computer algebra system, making conjectures, and proving these conjectures. Other exercises require the student groups to develop their own counterexamples and to verify these counterexamples using computer algebra functions that they have defined earlier. This discrete mathematics course is the bridge to upper level abstract mathematics courses. Most students are second-semester sophomores who have taken at least several calculus courses. (Received September 13, 2000)