



March 27, 2009

Assessment Activity in the Department of Geology and Geophysics

Based on direct feedback from students, detailed assessment forms compiled from recent graduates, and meetings with faculty most directly involved with our undergraduate curriculum, we are in the process of making sweeping changes to our majors courses and requirements. The Curriculum Committee recently completed its plan, which will begin to be implemented in the fall of 2009. Specific components of our new plan, with the rationale behind the changes include:

1. A thoroughly revised and expanded Mineralogy-Petrology sequence. The ability to recognize and understand the significance of different rock types is a foundation of our science. Based on interactions with students in class and in the field, it became apparent that our current sequence did not provide adequate time for complex concepts to really sink in.
2. All students will take one course from each of three categories (geophysics; geochemistry; paleontology/surficial processes). Each of the courses in these categories will include a writing component, in which students write a scientific paper, engage in peer review, and revise papers based on feedback from faculty and peers. This represents a significant increase in the amount of writing that students will do, particularly the iterative process of writing-editing-rewriting. This change is in response to the observation that although employers increasingly require strong writing skills, student facility in writing has declined, particularly over the last decade.
3. Careful consideration of the types of 21st century jobs our graduates will seek led us to the conclusion that students would be better served by more exposure to quantitative methods in the geosciences. Consequently, all students will take both a geophysics and a geochemistry class (from the directed electives described above), each of which will include significant quantitative components.

Submitted by: Profs. Laurel Goodwin and Dana Geary, for the Curriculum Committee
Department of Geology and Geophysics

Department of Geology and Geophysics

Lewis G. Weeks Hall for Geological Sciences 1215 W. Dayton Street Madison, Wisconsin 53706-1692
(608) 262-8960 Fax: (608) 262-0693 E-mail: geodept@geology.wisc.edu <http://www.geology.wisc.edu>