October 8, 2007

Input for the Fall 2007 Analysis of Major Programs

1. The Mathematics Program meets the standards recommended by the Mathematical Association of America (MAA).

2. All current syllabi have been updated to include Student Learning Outcomes (SLO’s). The syllabi are in repository at the Dean’s Office.

The Math Program’s Curriculum Committee is currently updating all course outlines to reflect Student Learning Outcomes as linked to Program Objectives.

The assessment plan for one Math GE (MA*110) consists of an exit assessment on the students’ understanding of the material in the module consisting of polynomial functions, exponential and logarithmic functions and their applications to areas such as personal finance.

The assessment plan for the Mathematics Major focuses on one objective:

Demonstrate critical thinking, problem solving skills, and ability to use mathematical methods by identifying, evaluating, classifying, analyzing, and synthesizing data and abstract ideas in various contexts and situations.

The assessment plan consists of

- Exit oral presentations on certain topics by students in Abstract Algebra (MA*411).

- Exit assessment (Written Examination) in Analysis (MA*422). The assessment also includes questions on earlier Math courses taken by the students as required in the Program.

The Mathematics Program has a large developmental component, which provides transition students with weak Mathematics backgrounds, the opportunity to gain skills necessary to succeed in Intermediate Algebra and College level Mathematics courses.

The assessment plan for developmental mathematics consists of exit exams at both levels. Students have to pass the exit exams in order to complete the developmental courses (MA*084a-b; MA*085 I, II).
3. The Mathematics Program supports the University's mission through teaching, research, and service; and is designed to:

- Prepare secondary school Mathematics teachers;
- Prepare students for other employment requiring the use of Mathematics;
- Provide an understanding of the fundamental quantitative considerations, symbolized mathematically, which underlie our mechanized society.

4. The Strategic Initiatives supported include

- Academic Quality (See Items 2, 3, and 6)

5. The Mathematics Program meets students and regional needs as outlined under mission statement (Item 3).

6. The recent Mathematics Program self-study received Faculty Senate assent in Spring 2007. Three recommendations in the Program Review have been implemented:

- The Mathematics Program was designated its own space in January 2007. The Program is now warehoused in Warehouse Building B. The Program's office, some faculty offices, and two dedicated classrooms are in Warehouse B.

- Faculty recruitment efforts in AY 2005-2006 were successful. By Fall 2006, five new faculty with terminal degrees (3 tenure-track, 2 non-tenure track) were hired.

- All students in the Developmental Mathematics courses have to now complete these courses before they can enroll in any upper level course. This new policy is in the 2007-2008 Undergraduate Catalog.