**Executive Summary of Program Assessment**

**Campus:** MU

**College/School:** College of Engineering

**Academic Unit:** Mechanical and Aerospace Engineering

**Date Submitted:** 12/06/12

**Person Responsible for Success of Program:** Robert Tzou, Chair, Department of Mechanical and Aerospace Engineering

**Person Submitted Executive Summary:**

Patricia Okker, Faculty Fellow for Program Assessment and Accreditation, Office of the Provost

**Degree Programs**

|  |  |  |  |
| --- | --- | --- | --- |
| **Degree (e.g., BS, MA, PhD)** | **Degree Program** | **Enrollment** | **Number of Degrees Awarded** |
| **Most Recent Fall Semester****(Fall 2011)** | **5-Year Fall Semester Average** | **Most Recent Academic Year****(fall 2011)** | **5-Year Average** |
| BS | Mechanical Engineering | 597 | 543 | 111 | 98 |
| MS/ME | Mechanical Engineering | 63 | 37.8 | 11 | 11 |
| PhD | Mechanical Engineering | 30 | 31.2 | 7 | 5.8 |

**Changes Since Last Review**

* Enrollment growth: Undergraduate enrollment increased by 32%, while size of faculty has remained the same. Graduate enrollment increased from 80 to 92 students.
* Degree options enhanced: Minor in Energy added; Minor in Aerospace added.
* Professional advisor hired in 2011.
* Increase in research expenditures from $1.1 million in 2006-2007 to over $3.8 million in 2011.
* Seven start-up companies established.
* Problem Based Learning introduced, through NSF funded grants.

**Strategies or Plans for Improving Program**

* Continued implementation of Problem Based Learning (PBL), Project Based Learning (PrBL), and Student Center Based Learning (SCBL).
* Strengthen Undergraduate Honors Program in MAE.
* Increase funded research to $5 million.
* Reduce student-faculty ratio.

**Other Comments**