**Mechanical Engineering Department: MS in Bioengineering, Mapping of Courses to DLOs**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| Courses | Degree Learning Outcomes | | | | | | |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| BIOL 590 | X |  |  |  |  |  |  |
| BIOL 585 | X |  |  |  |  |  |  |
| ME 540 | X |  |  | X |  |  |  |
| ME 580 | X |  |  | X |  |  |  |
| ME 582 | X |  |  | X |  |  |  |
| ME 585 | X |  |  | X |  |  |  |
| ME 610 | X |  | X | X |  | X |  |
| ME 681 | X |  | X | X |  | X |  |
| ME 683 | X |  | X | X |  | X |  |
| ME 685 | X |  | X | X |  | X |  |
| ME 687 | X |  | X | X |  | X |  |
| EE 503 | X |  | X | X |  | X |  |
| ME 797 | X | X | X | X | X | X | X |
| ME 799 | X | X | X | X | X | X | X |

Program Outcomes (Degree Learning Outcomes, DLOs)

1. Excellence.  Mastery of the knowledge in their area of specialization, and the ability to apply associated technologies to novel and emerging problems.
2. Breadth. Broaden professional foundations through activities such as internships, fellowships, the Student Research Symposium, and serving on student committees, as appropriate.
3. Problem definition. State a research problem in such a way that it clearly fits within the context of the literature in an area of study, and demonstrate the value of the solution to the research problem in advancing knowledge within that area.
4. Problem solving. Apply sound research methods/tools to problems in an area of study, and describe the methods/tools effectively. Analyze/interpret research data.
5. Professionalism. Participate in professional organizations, becoming members and attending meetings. Present research to local, regional, national, and international audiences through publications in professional journals and conference papers.
6. Communication. Communicate research clearly and professionally in both written and oral forms appropriate to the field.
7. Societal Context. Understand the impact of engineering solutions in a global, economic, and societal context.