

# MECHANICAL DRAFTING AND SOLID MODELING - ASSOCIATE OF APPLIED SCIENCE

**(60 credits)**

## A Suggested Plan of Study

The contents of this roadmap may vary depending on initial student placement in mathematics and English. This is only a suggested plan of study for students, and is not intended as a contract. Individual student academic plans may vary. Please contact your academic advisor to create a plan that works for you. Course availability may vary from fall to spring semester and may be subject to modification or change.

NOTE: Students must earn a final grade of C- or better in all required DRFT courses/Technical Requirements/Electives and achieve a cumulative grade-point average of at least 2.0. A grade of C- or better is required in ENGL 1110G Composition I and designated Mathematics courses.

Students must complete all University degree requirements, which include: General Education requirements and elective credits to total at least 60 credits. Developmental coursework will not count towards the degree requirements and/or elective credits, but may be needed in order to take the necessary English and Mathematics coursework.

| <b>Semester 1</b>  |  | <b>Credits</b> |
|--|--|----------------|
| Area I: Communications - English Composition Level 1   |  | 4              |
| ENGL 1110G   | Composition I  |                |
| DRFT 109   | Computer Drafting Fundamentals                         | 3              |
| MAT 102  | Print Reading for Industry                             | 3              |
| MAT 105  | Introduction to Manufacturing                          | 3              |
| <b>Credits</b>   |  | <b>13</b>      |
| <b>Semester 2</b>  |  |                |
| Area II: Mathematics   |  | 3              |
| MATH 1220G   | College Algebra  |                |
| General Education - Choose one course from NM General Education Areas IV, V, or VI in the NMSU/DACC Catalog. |  | 3              |
| DRFT 114   | Introduction to Solid Modeling                         | 3              |
| DRFT 124   | Introduction to Geometric Dimensioning and Tolerancing | 3              |
| DRFT 164   | Intermediate Mechanical Drafting/Solid Modeling        | 3              |
| <b>Credits</b>   |  | <b>15</b>      |
| <b>Semester 3</b>  |  |                |
| SUMMER   |  |                |
| General Education Elective - Area I: Communications - Oral Communications                                    |  | 3              |
| COMM 1115G   | Introduction to Communication                          |                |
| Advisor Approved Elective (AERT, DRFT, ENGR, E T, MAT, M E, or WELD)   |  | 3              |
| <b>Credits</b>   |  | <b>6</b>       |
| <b>Semester 4</b>  |  |                |
| Area II: Mathematics   |  | 4              |
| MATH 1250G   | Trigonometry & Pre-Calculus                            |                |
| DRFT 214   | Advanced Plans and Sheet Sets from 3D Models           | 3              |

|  |   |           |
|--|---|-----------|
| Advisor-Approved Elective (AERT, DRFT, ENGR, E T, MAT, M E, or WELD) |   | 3         |
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| <b>Credits</b>   |   | <b>13</b> |
| <b>Semester 5</b>  |   |           |
| Area III: Laboratory Sciences  |   | 4         |
| PHYS 1230G & PHYS 1230L  | Algebra-Based Physics I and Algebra-Based Physics I Lab |           |
| DRFT 288   | Portfolio Development                                   | 3         |
| Advisor-Approved Elective (AERT, DRFT, ENGR, E T, MAT, M E, or WELD) |   | 3         |
| Advisor-Approved Elective (AERT, DRFT, ENGR, E T, MAT, M E, or WELD) |   | 3         |
| <b>Credits</b>   |   | <b>13</b> |
| <b>Total Credits</b>   |   | <b>60</b> |