Applied Engineering Minor Requirements

The Applied Engineering minor provides students with foundational knowledge of classical physics and an applied knowledge of the modern engineering design process. Students may choose the electives to focus on specific topics in physics and many engineering fields. This minor helps students develop experimental, design, computational, problem-solving, critical thinking, and effective scientific communication skills. It prepares students for careers in places where design, problem-solving abilities, and effective communication are great assets.

Program requirements: 20 credits.

Required Courses – 11 Credits

PHYS 100 Physics I *or* PHYS 40 General Physics I (4 credits)
PHYS 102 Physics II *or* PHYS 42 General Physics II (4 credits)
ENGR 121 Engineering Drawing & Design (3 credits)

Elective Courses – 9 Credits

Select a minimum of three courses from the following:
ENGR 130 Engineering Mechanics (3 credits)
ENGR 230 Strength of Materials (3 credits)
ENGR 330 Fluid Mechanics (3 credits)
ENGR 370 Research in Engineering (3 credits)
ENGR 390 Internship in Engineering (3 credits)
PHYS 220 Electronics (3 credits)
PHYS 230 Optics (3 credits)
PHYS 250 Programming for Experimental Research & Industry (3 credits)
PHYS 290 Introduction to Nanotechnology (3 credits)
PHYS 350 Instrumentation in Physics (3 credits)

Notes:
A student majoring in B.S. Physics: Engineering Physics or B.S. Physics: Engineering Technology may not minor in Applied Engineering.
No student may use more than three courses from their major or another minor toward the Applied Engineering Minor.

Program Plan Code: APEN
Effective Date: Fall 2024

Applied Engineering Minor Check Sheet

Student Name: Student ID Number:

This check sheet provides a mechanism for students and advisors to keep track of a student's progress in the program. Please refer to the program requirements for more details regarding options.

Program requirements: 20 credits.

Required Courses – 11 Credits

PHYS 100 Physics I *or* PHYS 40 General Physics I	4 credits	Grade:
PHYS 102 Physics II *or* PHYS 42 General Physics II	4 credits	Grade:
ENGR 121 Engineering Drawing & Design	3 credits	Grade:
Total Credits	11 total credits	

Elective Courses – 9 Credits

Course 1:	3 credits	Grade:
Course 2:	3 credits	Grade:
Course 3:	3 credits	Grade:
Total Credits	9 total credits	

Program Plan Code: APEN
Effective Date: Fall 2024