HIBBING COMMUNITY COLLEGE
COURSE OUTLINE

COURSE TITLE & NUMBER: Applied Mechanics Theory: IST 2260
CREDITS: 4 (3 Lec / 1 Lab)
PREREQUISITES: None

CATALOG DESCRIPTION:
Applied Mechanics Theory covers mechanical principles used in everyday practical problem solving through discovery in a lab setting. Topics generally include laws of motion, fluids, gases, electricity, mechanics, forces, and conservation of energy.

OUTLINE OF MAJOR CONTENT AREAS:
1. Mathematics needed for problem solving
2. Fluids and gases and how they react, using Pascal’s principle, Bernoulli’s principle, Archimedes’s principles
3. An introduction to basic electricity and electrical circuitry
4. The study of forces of mechanics
5. Conservation of energy

COURSE GOALS/OBJECTIVES/OUTCOMES:
1. Students will use their understanding of mechanical theories applying them to practical problems.
2. Students will communicate professionally their laboratory findings either written or by class presentation.
3. Students will apply their knowledge of mechanical energy and fluid mechanics to problem solve.
4. Students will expand on their reasoning and troubleshooting skills.
5. Students will apply mathematics to promote their problem solving skills.

MNTC GOALS AND COMPETENCIES MET: N/A

HCC COMPETENCIES MET:
Working Productively and Cooperatively
Communicating Creatively and Clearly
Thinking Creatively and Critically

STUDENT ASSESSMENT SHALL TAKE PLACE USING INSTRUMENTS SELECTED/DEVELOPED BY THE COURSE INSTRUCTOR.

SPECIAL INFORMATION: None

Curriculum Committee Approval Date: March 13, 2018

AASC APPROVAL DATE: March 21, 2018
REVIEW DATE: March 2023