

# Northwest Technical College

## CMAE 1560: Interpreting Symbols

### A. COURSE DESCRIPTION

Credits: 2

Lecture Hours/Week: 2

Lab Hours/Week: 0

OJT Hours/Week: \*.\*

Prerequisites: None

Corequisites: None

MnTC Goals: None

Welding symbols are used to facilitate communication among the designer, fabricator, and inspection personnel. To accurately layout and fabricate parts, the welder will need basic knowledge of working drawings and their significance to the welding industry. Students will break down welding prints to develop skills necessary to fabricate individual component parts of welded structures. Written and fundamental tests will be administered in accordance with American Welding Society (AWS) standards and the appropriate correlating code books (AWS A2.4).

Prerequisites: Appropriate placement scores for Reading.

### B. COURSE EFFECTIVE DATES: 08/22/2016 - Present

### C. OUTLINE OF MAJOR CONTENT AREAS

1. Critical Thinking
2. Oral Communication
3. Written Communication

### D. LEARNING OUTCOMES (General)

1. Interpret basic elements of a drawing or sketch.
2. Interpret welding symbol information and placement guidelines.
3. Describe Nondestructive Examination (NDE) methods and symbol use.
4. Calculate weight and cost of welding consumables and materials.
5. Prepare an applicable bill of materials (BOM).

### E. Minnesota Transfer Curriculum Goal Area(s) and Competencies

None

### F. LEARNER OUTCOMES ASSESSMENT

As noted on course syllabus

### G. SPECIAL INFORMATION

None noted