

Course discipline/number/title: CR 1625: Footings and Foundations

A. CATALOG DESCRIPTION

1. Credits: 2
2. Hours/Week: 4 Lab
3. Prerequisites (Course discipline/number): None
4. Other requirements: None
5. MnTC Goals (if any): NA

B. COURSE DESCRIPTION: This course is a study and practice of building wood and concrete foundations. Students utilize survey equipment to locate property lines, set building corners, and establish grades and elevations. Students will build footing and foundation wall forms.

C. DATE LAST REVISED (Month, year): February, 2025

D. OUTLINE OF MAJOR CONTENT AREAS:

1. Measuring
2. Surveying Tools and Equipment
3. Plot and Site Plans
4. Setting Elevations and Grades
5. Laying Out a Building Site
6. Footing Forms
7. Concrete

E. LEARNING OUTCOMES (GENERAL): The student will be able to:

1. Perform math calculations related to footings and foundations.
2. Use various methods and techniques to accurately layout batter boards and building lines.
3. Interpret and apply information from site plans.
4. Use a builder's level and laser level to set elevations.
5. Build and set footing forms.
6. Be familiar with the properties of concrete and steel.

F. LEARNING OUTCOMES (MNTC): NA

G. METHODS FOR EVALUATION OF STUDENT LEARNING: Methods may include but are not limited to:

1. Projects
2. Quizzes
3. Exams
4. Class Participation

H. RCTC CORE OUTCOME(S). This course contributes to meeting the following RCTC Core Outcome(s): **Critical Thinking.** Students will think systematically and explore information thoroughly before accepting or formulating a position or conclusion.

I. SPECIAL INFORMATION (if any): None