

# SHOP MATH

## SCOTT COUNTY SERIES

### COURSE SYLLABUS



Total Time: 12 Hours

Schedule: Four Three-Hour Classes

Textbook: Machine Trades Printreading, 3<sup>rd</sup> Ed, Thomas E. Proctor, J. David Holloway, Jonathan F. Gosse, ISBN 978-0-8269-1881-9 (Required)

Course Description: Shop Math is an introductory course that will provide students with an understanding of the vital role mathematics have in industry. Students will review the skills essential for being successful with more advanced program courses, including electronics, motor controls, variable frequency drives and others.

Course Learning Outcome: Students will be able to apply mathematical concepts associated with plant maintenance and better understand the relationship between mathematics and equipment operation in the manufacturing industry.

Course Learning Objective: Following oral and written instructions, the student will demonstrate an understanding of the following:

- 1) Whole Numbers – Addition, Subtraction, Multiplication, Division
- 2) Common Fractions – Adding Fractions, Subtracting Fractions, Multiplying Fractions, Dividing Fractions
- 3) Decimals – Adding or Subtracting Decimals, Multiplying Decimals, Dividing Decimals, Converting Between Fraction and Decimals, Significant Digits
- 4) Common Math Formulas – Circumference of a Circle, Area, Pythagorean Theorem, Volume

Evaluation Method: The following evaluation methods will be used in the classroom:

- 1) Attendance
- 2) Participation in classroom activities and homework
- 3) Written evaluations

