Course Objectives/Course Outline
Spokane Community College

Course Title: Applied Technical Math 2
Prefix and Course Number: CAD 121

Course Learning Outcomes:
By the end of this course, a student should be able to:

- Perform basic algebraic and advanced operations
- Rearrange formulas
- Utilize geometric formulas and concepts
- Utilize trigonometric formulas and concepts

Course Outline:

I. Algebra Review
II. Formula Rearrangement
   A. Terms and Coefficients
   B. The Multiplication Axiom
   C. The Addition Axiom
III. Functions and Graphs
   A. The Coordinate System
   B. Graphing Equations
   C. Slope of a Line
IV. Geometry
   A. Plane Figures
   B. Similar Triangles
   C. Perimeter and Areas
   D. Volumes
   E. Density
V. Right Triangles
   A. Angles and Sides
   B. Pythagorean Theorem
   C. Types of Triangles
   D. Right Triangle Ratios
   E. Applied Problems
VI. Oblique Triangles
   A. Oblique Triangles
   B. The Law of Sines
   C. The Law of Cosines
   D. Applied Problems
V. Formula Rearrangement
   A. Formula Rearrangement
   B. Fractional Formulas
   C. The Multiplication Axiom
   D. The Addition Axiom
   E. Factoring
VI. Systems of Two Equations
   A. Graphing and Addition Methods
   B. Substitution Methods
   C. Applied Problems

VII. Powers and Roots
    A. Evaluation Formulas
    B. Powers of Ten