

Student Learning Outcomes for Math 112 (Current Feb 2017):

Course Goal # 1: Represent geometric concepts.

SLO 1: Draw points, lines, line segments, rays, angles, and perpendicular and parallel lines.

SLO 2: Build and draw two- and three-dimensional figures from a description or with given properties.

SLO 3: Draw the image of a polygon under a specified transformation.

Course Goal # 2: Understand and use the principles of measurement.

SLO 1: Explain what it means to measure length, area, volume, and time. Measure objects with appropriate tools and by iterating standard and non-standard units.

SLO 2: Describe the metric system and the US system and convert units within a system.

SLO 3: Estimate and measure angles and relate them to benchmark angles.

SLO 4: Decompose polygonal regions into simpler polygons to find the area.

Course Goal # 3 Communicate about geometric concepts.

SLO 1: Explain why multiplication applies to the area of a rectangle and the volume of a rectangular prism. Explain perimeter and area formulas for parallelograms and triangles.

SLO 2: Identify and describe rectangular solids, prisms and other polyhedra, cylinders, and spheres using correct mathematical terminology and notation.

SLO 3: Describe translations, reflections, and rotations using informal language and formal terminology.

Course Goal # 4: Apply measurement and geometric concepts in contexts.

SLO 1: Solve problems involving measurements of time, length, area, volume, and mass.

SLO 2: Apply perimeter and area formulas for rectangles, parallelograms, and triangles and volume of rectangular prisms.

SLO 3: Solve problems involving congruent and similar figures.