Unit	# 4th: Unit 3 - Measurement and Relationships in Geometry **Math Investigations: Size, Shape, and Symmetry** **Standards for Grade 4** UNIT 1= Addition and Subtraction of Large Numbers UNIT 2= Facts, Factors, and Multiples UNIT 3= Measurement, and Relationships in Geometry UNIT 4= Multiplication & Division Properties and Strategies UNIT 5= Comparison and Operations with Fractions UNIT 6= Decimals UNIT 7= Multiplication and Division with Large Numbers UNIT 8= Units of Measurement UNIT 9= Shape and Number Patterns
3,1,2	**4.NBT.4 Fluently add and subtract multi-digit whole numbers using the standard algorithm.**
3,8,9	**4.MD.1 Know relative sizes of measurement units within one system of units including km, m, cm; kg, g; lb, oz.; l, ml; hr, min, sec. Within a single system of measurement, express measurements in a larger unit in terms of a smaller unit. Record measurement equivalents in a two-column table.** *For example, know that 1 ft is 12 times as long at 1 in. Express the length of a 4 ft snake as 48 in. Generate a conversion table for feet and inches listing the number pairs (1, 12), (2, 24), 3, 36), ...*
3,5,6,7,8,1	**4.MD.2 Use the four operations to solve word problems involving distances, interval of time, liquid volumes, masses of objects, and money, including problems involving simple fractions or decimals, and problems that require expressing measurements given in a larger unit in terms of a smaller unit. Represent measurement quantities using diagrams such as number line diagrams that feature a measurement scale.**
3	**4.MD.3 Apply the area and perimeter formulas for rectangles in real world and mathematical problems.** *For example, find the width of a rectangular room given the area of the flooring and the length, by viewing the area formula as a multiplication equation with an unknown factor.*
3	**4.MD.5.a An angle is measured with reference to a circle with its center at the common endpoint of the rays, by considering the fraction of the circular arc between the points where the two rays intersect the circle. An angle that turns through 1/360 of a circle is called a "one-degree angle," and can be used to measure angles.**
3	**4.MD.5.b An angle that turns through *n* one-degree angles is said to have an angle measure of *n* degrees.**
3	**4.MD.6 Measure angles in whole-number degrees using a protractor. Sketch angles of specified measure.**
3	**4.MD.7 Recognize angle measure as additive. When an angle is decomposed into non-overlapping parts, the angle measure of the whole is the sum of the angle measures of the parts. Solve addition and subtraction problems to find unknown angles on a diagram in real world and mathematical problems, e.g., by using an equation with a symbol for the unknown angle measure.**
3	**4.G.1 Draw points, lines, line segments, rays, angles (right, acute, obtuse), and perpendicular and parallel lines. Identify these in two-dimensional figures.**
3	**4.G.2 Classify two-dimensional figures based on the presence or absence of parallel or perpendicular lines or the presence or absence of angles of a specified size. Recognize right triangles as a category, and identify right triangles.**