Math Grade 4 Unit 1
Curriculum Unit Planning Template
Canterbury Public Schools

Subject	Math
Grade Level	4
Unit Title	Factors and Multiples
Unit Goals	Students apply understanding of multiplication and area to work with factors and multiples. Represent ideas using diagrams and written expressions Use the vocabulary of factors and products Section A Understand Factors and Multiples Determine if a number is prime or composite Explain what it means to be a factor or a multiple of a whole number Relate the side lengths and area of a rectangle to factors and multiples Section B Find factor pairs and multiples Apply multiplication fluency within 100 and the relationship between multiplication and division to find factor pairs and multiples
Pacing (# of weeks)	1-2 weeks
Standards	4.OA.B., 4.OA.C.5 4.OA.A.3, 4.OA.B. 4. OA.B.4
Content/Conceptual Knowledge (know)	Side lengths of a rectangle represent the factor pairs of a given area value, when they see that rectangles with the same pair of side lengths have the same area regardless of position or orientation Some numbers have only 1 factor pair (prime)
Skills (be able to do)	Use the commutative property of multiplication when they see that rectangles with the same pair of side lengths have the same area
Essential Questions	What makes a prime number?
Enduring Understandings	There are s specific strategies that can be used to find quotients. , Fraction equivalence can be done through the manipulation of and the development of an understanding of fraction equivalence (addition, and subtraction of fractions with like denominators, and multiplication of fraction by

	whole numbers) Geometric figures can be analyzed by and classified based on their properties, such as having parallel sides, perpendicular sides, particular angle measures and symmetry. A prime number has only one factor pair
Vocabulary	factor, product, whole number, factor pairs, orientation, prime & composite numbers
Common Learning Experiences	Participate in conversations about "experiences" related to this topic Build rectangles given specific side lengths and identify possible areas when only one side length is known. Students use tiles and diagrams to build their understanding before learning new terminology Observe the commutative property of multiplication when they see that rectangles with the same pair of side lengths have the same area, regardless of their orientation Game day Lesson 1 Activity 2, What areas Can You Build? Lesson 6 Activity 1 Questionable Lockers Create geometric arrays
Assessments	performance based, classroom participation , daily cool downs, end of unit assessment checkpoints
Resources	Graphs, charts, inch tiles, centimeter grid paper, card sorts: Area Card Sort, Multiplication centimeter cubes Straight-edges, fraction strips, Fraction Cards, Expressions and Diagrams (copy) Make two Jumps (copy) paper clips, painters tape, Chart Paper, Card Sort: Twelfths, Fraction Action:tenths hundredths, Card sorts less than, equal to,or Greater than,
Strategies	Play games to reinforce learning