TRENTON PUBLIC SCHOOLS
Grade 6 Mathematics Curriculum Map 2006-2007

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
September NUMBER SENSE	• Factors • Multiples • Prime and Composite Numbers • Multiples • Divisibility of Numbers • Prime Factorization • Least Common Multiple • Greatest Common Factor	• Identify prime and composite numbers • Find and use factors and multiples • Find the Greatest Common Factor and Least Common Multiple and Prime Factorization of numbers • Use factor trees to write prime factorization of numbers • Solve problems involving Greatest Common Factor and Least Common Multiple and Prime Factorization • Recognize and use the divisibility rules for 2,3,4,5 and 10. • Identify square numbers • Find cubes of whole numbers	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.1.6.A.7 Develop and apply number theory concepts in problem solving situations (Primes, factors, multiples, common multiples, common factors)	Prime Time SE/ TE: Inv. 5- Moving Between Fractions and Decimals, pp. 53-66. Inv. 6- Out of One Hundred, pp. 67-83. TR: Transparences pp.155-163, Teaching the Investigation pp. 66a-84, Lab sheets 5.1 to 6.ACE TECH: Calculators, Transparencies 5.1 to 6.4B Covering and Surrounding Unit Project p. 82 Ruins of Montarek Unit Project p. 82 Shapes and Designs Unit Project p. 76 Data About Us Unit Project p. 68 How Likely Is It? SE/ TE: Inv. 1- A First Look at Chance, pp. 5-13. Inv. 2- More Experiments with Chance, pp. 14-21. Inv. 3- Using Spinners to Predict Chance, pp. 22-28. Inv. 4- Theoretical Probabilities, pp. 29-41. Inv.7- Probability and Genetics, pp. 57-64. TR: Transparences pp.95-96, 99-102, 105-106, Teaching the Investigation pp. 13a-13e, 28a-28c, 41a-41e, 64a-64d Lab sheet 1.1A, 1.1B, 3.1 to 3.ACE TECH: Calculators, Transparencies 1.1, 1.2, 2.1, 2.2, 3.1, 4.1 to 4.3, 6.1 (http://www.ns.msu.edu/CMP/cmp.html).

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
September Cont.				• 4.1.6.B.5 Find squares and cubes of whole numbers	*See See Grade 7 Unit: Data Around Us .* *Also covered in CMP2 © 2006:* SE: Covering and Surrounding (15, 30, 75, 77, 81-86); Bits and Pieces III (26-27, 31) TE: Covering and Surrounding (35, 58, 120, 123-125, 127-128, 129-132); Bits and Pieces III (51-53, 55-56, 58) TR: Covering and Surrounding (Labsheets: 5.3A-5.3B, 5.4); Bits and Pieces III (Labsheets: 2.4) TECH: Covering and Surrounding (Transparencies: 5.3, 5.4A-5.4B); Bits and Pieces III (Transparencies: 2.4); www.phschool.com

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
October NUMBER SENSE	• Fractions • Decimals • Percents	• Identify fractions, decimals and percents. • Convert fractions, decimals and percents • Use models to show fractions, decimals and percents • Compare and order fractions, decimals and percents • Estimate with fractions, decimals and percents • Use fractions, decimals and percents to represent equivalent forms of the same number • Express fractions in lowest terms	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.1.6.A.1 Use real- life experiences, physical materials, and technology to construct meanings for numbers (All fractions as part of a set, as location on a number line, and as divisions of whole numbers).	Prime Time SE/TE: Inv. 1- The Factor Game, pp. 6-16. Inv. 2- The Product Game, pp. 17-25. Inv. 3- The Product Game, pp. 26-35. Inv. 4- Common Factors and Multiples, pp. 36-45. Inv.5- Factorization, pp. 46-57. Inv. 6- The Locker Problem, pp. 58-64. TR: Transparences pp.100-115, Teaching the Investigation pp. 16a-64b, Lab sheets pp. 1.1-5.1 TECH: Calculators, Transparencies 1.1 to 6.1 Bits and Pieces I SE/TE: Inv. 1- Fund-Raising Fractions, pp. 5-18. Inv. 2- Comparing Fractions, pp. 19-30. Inv. 3- Cooking With Fractions, pp. 31-38. Inv. 4- From Fractions to Decimals, pp. 39-52. Inv. 5- Moving Between Fractions and Decimals, pp. 53-66. Inv. 6- Out of One Hundred, pp. 67-83 TR: Transparences pp.128-163, Teaching the Investigation pp. 18a-66k, Lab sheet 1.5 to 5.2 TECH: Calculators, Transparencies 1.1to 6.4B Bits and Pieces II SE/TE: Inv. 1- Using Percents, pp. 5-17. Inv. 2 - More About Percents, pp. 18-30. Inv. 3- Estimating With Fractions and Decimals, pp. 31-41. Inv. 4- Adding and Subtracting Fractions, pp. 45-53. Inv.5- Finding Areas and Other Product, pp. 54-63. Inv. 6- Computing with Decimals, pp 64 TR: Transparences pp.110-128, Teaching the Investigation pp. 17a-76j, Lab sheets 1.2A to 6.1 TECH: Calculators, Transparencies 1.1 to 6.5

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
October cont.				• 4.1.6.A.6 Use whole numbers, fractions, and decimals to represent equivalent forms of the same number	Bits and Pieces I SE/TE: Inv. 1- Fund-Raising Fractions, pp. 5-18. Inv. 2- Comparing Fractions, pp. 19-30 TR: Transparences pp.136-152, Teaching the Investigation pp. 30a-52k, Lab sheet 4.1 to 4.ACE TECH: Calculators, Transparencies 2.1 to 4.4
				• 4.1.6.A.8 Compare and order numbers	Bits and Pieces I SE/TE: Inv. 1- Fund-Raising Fractions, pp. 5-18. Inv. 2- Comparing Fractions, pp. 19-30. Inv. 3- Cooking With Fractions, pp. 31-38. Inv. 6- Out of One Hundred, pp. 67-83 TR: Transparences pp.128-141, 142-144, 158-164, Teaching the Investigation pp. 18a-18k, 30a-30k, 38a-38g, 83a-84, Lab sheet 1.5,3.1,5.1, 6.1 to 6.ACE TECH: Calculators, Transparencies 1.1 to 1-5, 2.1 to 2.5,3.1 to 3.2B, 6.1 to 6.4B Bits and Pieces II SE/TE: Inv. 4- Adding and Subtracting Fractions, pp. 45-53. TR: Transparences pp. 120-123, Teaching the Investigation pp. 53a-53i, Lab sheet 4.1 TECH: Calculators, Transparencies 4.1 to 4.4

TRENTON PUBLIC SCHOOLS
Grade 6 Mathematics Curriculum Map 2006-2007

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
November NUMBER SENSE	• Fractions • Mixed Numbers	• Use visual and physical models to explain meaning of operations on fractions with and without common denominators and decimals. • Add, subtract, multiply and divide fractions and mixed numbers.	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.1.6.A.1 Use real- life experiences, physical materials, and technology to construct meanings for numbers (All fractions as part of a set, as location on a number line, and as divisions of whole numbers).	Prime Time SE/TE: Inv. 1- The Factor Game, pp. 6-16. Inv. 2- The Product Game, pp. 17-25. Inv. 3- The Product Game, pp. 26-35. Inv. 4- Common Factors and Multiples, pp. 36-45. Inv.5- Factorization, pp. 46-57. Inv. 6- The Locker Problem, pp. 58-64. TR: Transparences pp.100-115, Teaching the Investigation pp. 16a-64b, Lab sheets pp. 1.1-5.1 TECH: Calculators, Transparencies 1.1 to 6.1 Bits and Pieces I SE/TE: Inv. 1- Fund-Raising Fractions, pp. 5-18. Inv. 2- Comparing Fractions, pp. 19-30. Inv. 3- Cooking With Fractions, pp. 31-38. Inv. 4- From Fractions to Decimals, pp. 39-52. Inv. 5- Moving Between Fractions and Decimals, pp. 53-66. Inv. 6- Out of One Hundred, pp. 67-83 TR: Transparences pp.128-163, Teaching the Investigation pp. 18a-66k, Lab sheet 1.5 to 5.2 TECH: Calculators, Transparencies 1.1to 6.4B Bits and Pieces II SE/TE: Inv. 1- Using Percents, pp. 5-17. Inv. 2 - More About Percents, pp. 18-30. Inv. 3- Estimating With Fractions and Decimals, pp. 31-41. Inv. 4- Adding and Subtracting Fractions, pp. 45-53. Inv.5- Finding Areas and Other Product, pp. 54-63. Inv. 6- Computing with Decimals, pp 64 TR: Transparences pp.110-128, Teaching the Inve TECH: Calculators, Transparencies 1.1 to 6.5

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
November cont.				• 4. I.6.B.2 Construct, use, and explain procedures for performing calculations with fractions and decimals.	Bits and Pieces I SE/TE: Inv. 1- Fund-Raising Fractions, pp. 5-18. Inv. 2- Comparing Fractions, pp. 19-30. Inv. 3- Cooking With Fractions, pp. 31-38. Inv. 4- From Fractions to Decimals, pp. 39-52. Inv. 5- Moving Between Fractions and Decimals, pp. 53-66. Inv. 6- Out of One Hundred, pp. 67-83 TR: Transparences pp.128-163, Teaching the Investigation pp. 18a-66k, Lab sheet 1.5 to 5.2 TECH: Calculators, Transparencies 1.1to 6.4B Bits and Pieces II SE/TE: Inv. 3- Estimating With Fractions and Decimals, pp. 31-41. Inv. 4- Adding and Subtracting Fractions, pp. 45-53. Inv.5- Finding Areas and Other Product, pp. 54-63. TR: Transparences pp. 120- 127, Teaching the Investigation pp. 42a-63i TECH: Calculators, Transparencies 3.1 to 5.4
December ALGEBRA	• Algebraic expressions • Equations(addition, subtraction, multiplication and division) • Distributive Property	• Solve simple linear equations (whole-number coefficients only, and variables on one or both sides of equation) • Apply the properties of operations and numbers(Distributive property) • Evaluate numerical expressions • Use the inequality symbols.	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.3.6.D.1 Solve simple linear equations with manipulatives and informally(whole-number coefficients only, answers also whole numbers, variables on one or both sides of equation)	Data About Us SE/TE: Inv. 5- What Do We Mean by Mean, pp. 53-68. TR: Transparences pp.112-116, Teaching the Investigation pp. 67a-67 TECH: Calculators, Transparencies 5.1A to 5.5
				• 4.3.6.D.2 Understand and apply the properties of operations and numbers(Distributive property and the product of a number and its reciprocal is 1)	Bits and Pieces II SE/TE: Inv. 4- Adding and Subtracting Fractions, pp. 45-53. Inv.5- Finding Areas and Other Product, pp. 54-63. Inv. 6- Computing with Decimals, pp 64-76. Inv. 7- Dividing Fractions, pp. 77-87. TR: Transparences pp. 120-128, Teaching the Investigation pp. 53a-76j, Lab sheet 6.1 TECH: Calculators, Transparencies 4.1 to 6.5

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
December cont.				• 4.3.6.D.3 Evaluate numerical expressions	Data About Us Can be developed with the following Investigation: SE/TE: Inv. 5- What Do We Mean by Mean, pp. 53-68. TR: Transparences pp.112-116, Teaching the Investigation pp. 67a-67 TECH: Calculators, Transparencies 5.1A to 5.5. See Grade 7 units: Variables and Patterns, Moving Straight Ahead
January GEOMETRY	• Polygons • Angles • Lines • Transformation	• Identify, describe, compare and classify polygons and circles • Identify and measure angles • Measure angle sums and exterior angles(Triangles and Quadrilaterals) • Identify line segments, ray, parallel lines perpendicular lines, and line symmetry. • Build and record similar and congruent figures. • Identify and draw simple transformations including translations, reflections and rotations.	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.2.6.A.1 Understand and apply concepts involving lines and angles	Shapes and Designs SE/TE: Inv. 1- Bees and Polygons, pp. 8-14. Inv. 2- Building Polygons, pp. 15-24. Inv. 3- Polygons and Angles, pp. 25-41. Inv.4- Polygon Properties and Tiling, pp. 42-50. Inv.5- Side-angle-Shape Connections, pp. 51-63. Inv.6- Turtle Tracks Connections, pp. 64-75. TR: Transparences pp.104-124, Teaching the Investigation pp. 14a-75h, Lab sheet 4.2 TECH: Calculators, Transparency 1.1 to 6.3, Turtle Math software (optional)
				• 4.2.6.A.2 Identify, describe, compare, and classify polygons and circles.	Covering and Surrounding SE/TE: Inv. 1- Measuring Perimeter and Area, pp. 6-18. Inv. 3- Constant Area, Changing Perimeter, pp. 29-34. Inv. 4- Constant Perimeter, Changing Area pp. 35-45. Inv. 5- Measuring Parallelograms, pp.46-55. Inv. 6- Measuring Triangles pp. 56-68. TR: Transparences pp.120-141, Teaching the Investigation pp. 18a-81j, Lab sheets 7.4 TECH: Calculators, Transparencies 1.1 to 7.5

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
January cont.				• 4.2.6.A.3 Identify similar figures	Covering and Surrounding SE/TE: Inv. 1- Measuring Perimeter and Area, pp. 6-18. Inv. 3- Constant Area, Changing Perimeter, pp. 29-34. Inv. 4- Constant Perimeter, Changing Area pp. 35-45. Inv. 5- Measuring Parallelograms, pp.46-55. Inv. 6- Measuring Triangles pp. 56-68. TR: Transparences pp.120-141, Teaching the Investigation pp. 18a-81j, Lab sheets 7.4 TECH: Calculators, Transparencies 1.1 to 7.5
				• 4.2.6.A.4 Understand and apply the concepts of congruence and symmetry (line and rotational)	Shapes and Designs SE/TE: Inv. 5- Side-angle-Shape Connections, pp. 51-63. TR: Transparences pp. 120-121, Teaching the Investigation pp. 63a-63f TECH: Calculators, Transparencies 5.1, 5.2 Ruins of Montarek SE/TE: Inv. 1- Building Plans, pp. 7-25. Inv. 2- Making Buildings, pp. 26-39. TR: Transparences pp.121-133, Teaching the Investigation pp. 25a-39g, Lab sheet 1.2A to 1.ACE TECH: Calculators, Transparencies 1.1A to 2.3

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
January cont.				• 4.2.6.B.1 Use a translation, reflection, or a rotation to map one figure onto another congruent figure.	Shapes and Designs SE/TE: Inv. 4- Polygon Properties and Tiling, pp. 42-50. Inv.5- Side-angle-Shape Connections, pp. 51-63. TR: Transparences pp. 117-121, Teaching the Investigation pp. 50a-63f, Lab sheet 4.2 TECH: Calculators, Transparencies 4.1 to 5.2 Ruins of Montarek SE/TE: Inv. 1- Building Plans, pp. 7-25. TR: Transparences pp.121-129, Teaching the Investigation pp. 25a-25m, Lab sheet 1.2A to 1.ACE TECH: Calculators, Transparencies 1.1A to 1.6B
				• 4.2.6.E.1 Use a protractor to measure angles.	Can be developed with the following Investigations: Prime Time SE/TE: Inv, 3- The Product Game, pp. 26-35. TR: Transparences pp.106-108, Teaching the Investigation pp. 35a-35f TECH: Calculators, Transparencies 3.1 to 3.3 Shapes and Designs SE/TE: Inv. 1- Bees and Polygons, pp. 8-14. Inv. 2- Building Polygons, pp. 15-24. Inv. 3- Polygons and Angles, pp. 25-41. Inv.4- Polygon Properties and Tiling, pp. 42-50. Inv.5- Side-angle-Shape Connections, pp. 51-63. Inv.6- Turtle Tracks Connections, pp. 64-75. TR: Transparences pp.104-121, Teaching the Investigation pp. 14a-63f, Lab sheet 4.2 TECH: Calculators, Transparency 1.1 to 5.2, Turtle Math software (optional)

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
January cont.				• 4.2.6.C.1 Create geometric shapes with specified properties in the first quadrant on a coordinate grid	Data About Us Can be developed with the following Investigations: SE/TE: Inv. 4- Coordinate Graphs, pp.41j-52g. TR: Transparences pp.108-110, Teaching the Investigation pp. 52a-52g, Lab sheets 4.2, and 4.ACE TECH: Calculators, Transparencies 4.1, 4.2 See also Grade 7 units: Accentuate the Negative, Moving Straight Ahead
February MEASUREMENT	• Units of Measurement • Metric System • Customary Units	• Select and use appropriate units to measure angles, area, surface area, and volume • Use a scale to find a distance on a map or a length on a scale drawing • Convert measurement units within a system (3 feet = …..inches) • Approximate equivalents between the standard and metric systems(e.g. one kilometer is approximately 6/10 of a mile)	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.2.6.D.1 Select and use appropriate units to measure angles, area, surface area, and volume	Covering and Surrounding SE/TE: Inv. 1- Measuring Perimeter and Area, pp. 6-18. Inv. 3- Constant Area, Changing Perimeter, pp. 29-34. Inv. 4- Constant Perimeter, Changing Area pp. 35-45. Inv. 5- Measuring Parallelograms, pp.46-55. Inv. 6- Measuring Triangles pp. 56-68. TR: Transparences pp.120-141, Teaching the Investigation pp. 18a-81j, Lab sheets 7.4 TECH: Calculators, Transparencies 1.1 to 7.5

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
February cont.				• 4.2.6.D.2 Use a scale to find a distance on a map or a length on a scale drawing	Covering and Surrounding Can be developed with the following Investigations: SE/TE: Inv. 5- Measuring Parallelograms, pp.46-55. TR: Transparences pp. 131-133, Teaching the Investigation pp. 55a-55g, Lab sheet 5.1 TECH: Calculators, Transparencies 5.1 to 5.3 Ruins of Montarek SE/TE: Inv. 1- Building Plans, pp. 7-25. Inv .2- Making Buildings, pp. 26-39. Inv. 3- Describing Unique Buildings, pp. 40-51. Inv. 4- Isometric Dot Paper Representations, pp. 52-61. Inv. 5- Ziggurats, pp. 62-71. Inv. 6 - Seeing the Isometric View, pp. 72-81. TR: Transparences pp.121-146, Teaching the Investigation pp. 25a-81h, Lab sheet 1.2A to 6.4 TECH: Calculators, Transparencies 1.1A to 6.4

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
February cont.				• 4.2.6.D.3 Convert measurement units within a system (3 feet = …..inches)	Shapes and Designs SE/TE: Inv. 3- Polygons and Angles, pp. 25-41. TR: Transparences pp.110-116,. Teaching the Investigation pp. 41a-41k Lab sheets 3.4, 3.5, 3.6 TECH: Calculators, Transparencies 3.1 to 3.6 Bits and Pieces I SE/TE: Inv. 3- Cooking With Fractions, pp. 31-38. TR: Transparences pp.142-144, Teaching the Investigation pp. 38a-38g, Lab sheet 3.1 TECH: Calculators, Transparencies 3.1 to 3.2B Covering and Surrounding SE/TE: Inv.1- Measuring Perimeter and Area pp.6-18. Inv. 2-Measuring Odd Shapes, pp. 19-28. Inv. 6- Measuring Triangles, pp. 56-68. Inv. 7-Going Around in Circles, pp. 69-81. TR: Transparences pp.120-126, 134-136, Teaching the Investigation pp. 18a-18k, 28a-28c TECH: Calculators, Transparencies 1.1 to 1.4, 2.1, 5.1 to 5.3, 7.1-7.5 Bits and Pieces II SE/TE: Inv. 6- Computing with Decimals, pp 64-76. TR: Transparences pp. 128-128, Teaching the Investigation pp. 76a-76j, Lab sheet 6.1 TECH: Calculators, Transparencies 6.1 to 6.5

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
February cont.				• 4.2.6.D.4 Approximate equivalents between the standard and metric systems(e.g. one kilometer is approximately 6/10 of a mile)	Shapes and Designs SE/TE: Inv. 3- Polygons and Angles, pp. 25-41. TR: Transparences pp.110-116,. Teaching the Investigation pp. 41a-41k Lab sheets 3.4, 3.5, 3.6 TECH: Calculators, Transparencies 3.1 to 3.6 Bits and Pieces I SE/TE: Inv. 3- Cooking With Fractions, pp. 31-38. TR: Transparences pp.142-144, Teaching the Investigation pp. 38a-38g, Lab sheet 3.1 TECH: Calculators, Transparencies 3.1 to 3.2B Covering and Surrounding SE/TE: Inv.1- Measuring Perimeter and Area pp.6-18. Inv. 2-Measuring Odd Shapes, pp. 19-28. Inv. 6- Measuring Triangles, pp. 56-68. Inv. 7-Going Around in Circles, pp. 69-81. TR: Transparences pp.120-126, 134-136, Teaching the Investigation pp. 18a-18k, 28a-28c TECH: Calculators, Transparencies 1.1 to 1.4, 2.1, 5.1 to 5.3, 7.1-7.5 Bits and Pieces II SE/TE: Inv. 6- Computing with Decimals, pp 64-76. TR: Transparences pp. 128-128, Teaching the Investigation pp. 76a-76j, Lab sheet 6.1 TECH: Calculators, Transparencies 6.1 to 6.5

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
February cont.				• 4.2.6.D.5 Use measurements and estimates to describe and compare phenomena	Shapes and Designs SE/TE: Inv. 3- Polygons and Angles, pp. 25-41. TR: Transparences pp.110-116,. Teaching the Investigation pp. 41a-41k Lab sheets 3.4, 3.5, 3.6 TECH: Calculators, Transparencies 3.1 to 3.6 Bits and Pieces I SE/TE: Inv. 3- Cooking With Fractions, pp. 31-38. TR: Transparences pp.142-144, Teaching the Investigation pp. 38a-38g, Lab sheet 3.1 TECH: Calculators, Transparencies 3.1 to 3.2B Covering and Surrounding SE/TE: Inv.1- Measuring Perimeter and Area pp.6-18. Inv. 2-Measuring Odd Shapes, pp. 19-28. Inv. 6- Measuring Triangles, pp. 56-68. Inv. 7-Going Around in Circles, pp. 69-81. TR: Transparences pp.120-126, 134-136, Teaching the Investigation pp. 18a-18k, 28a-28c TECH: Calculators, Transparencies 1.1 to 1.4, 2.1, 5.1 to 5.3, 7.1-7.5 Bits and Pieces II SE/TE: Inv. 6- Computing with Decimals, pp 64-76. TR: Transparences pp. 128-128, Teaching the Investigation pp. 76a-76j, Lab sheet 6.1 TECH: Calculators, Transparencies 6.1 to 6.5

TRENTON PUBLIC SCHOOLS
Grade 6 Mathematics Curriculum Map 2006-2007

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
March MEASUREMENT	• Area • Perimeter • Circumference • Volume • Surface Area	• Find the area of regular and irregular polygon • Find the perimeter of regular and irregular polygons • Find the area and circumference of a circle. • Use estimation to obtain reasonable approximation of area/perimeter. • Use estimation to obtain reasonable approximation of area /perimeter. • Describe appropriate situations for using standard and nonstandard units of measure. • Find the volume and surface area of rectangular prisms and cylinders.	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.2.6.E.2 Develop and apply strategies and formulas for finding perimeter and area	Covering and Surrounding SE/TE: Inv. 1- Measuring Perimeter and Area, pp. 6-18. Inv. 3- Constant Area, Changing Perimeter, pp. 29-34. Inv. 4- Constant Perimeter, Changing Area pp. 35-45. Inv. 5- Measuring Parallelograms, pp.46-55. Inv. 6- Measuring Triangles pp. 56-68. TR: Transparences pp.120-141, Teaching the Investigation pp. 18a-81j, Lab sheets 7.4 TECH: Calculators, Transparencies 1.1 to 7.5

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
March cont.				• 4.2.6.E.3 Develop and apply strategies and formulas for finding the surface area and volume of rectangular prisms and cylinders	Shapes and Designs Can be developed with the following Investigations: SE/TE: Inv. 2- Building Polygons, pp. 15-24. Inv. 3- Polygons and Angles, pp. 25-41. Inv. 4- Polygon Properties and Tiling, pp. 42-50. Inv.5- Side-angle-Shape Connections, pp. 51-63. TR: Transparences pp.107-121, Teaching the Investigation pp. 21a-63f, Lab sheet 4.2 TECH: Calculators, Transparencies 2.1 to 5.2 Covering and Surrounding SE/TE: Inv. 1- Measuring Perimeter and Area. pp. 6-18. Inv. 5- Measuring Parallelograms. pp. 46-55. Inv. 7- Going Around in Circles pp. 69-81 TR: Transparences pp.120-125, 131-133, 137-141,. Teaching the Investigation pp. 18a-18k, 55a-55g, 81a-81j, Lab sheets 5.1, 7.4 TECH: Calculators, Transparencies 1.1 to 1.4, 5.1 to 5.3, 7.1-7.5 Ruins of Montarek SE/TE: Inv. 1- Building Plans, pp. 7-25. Inv. 2- Making Buildings, pp. 26-39. Inv. 3- Describing Unique Buildings pp. 40-51 TR: Transparences pp.121-136, Teaching the Investigation pp. 25a-51g, Lab sheet 1.2A to TECH: Calculators, Transparencies 1.1A to 2.3 TR: Transparences pp.121-129, Teaching the Investigation pp. 25a-25m, Lab sheet 1.2A to 3.1 TECH: Calculators, Transparencies 1.1A to 3.3

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
March cont.				• 4.2.6.E.4 Recognize that shapes with the same perimeter do not necessarily have the same area and vice versa.	Covering and Surrounding SE/TE: Inv. 1- Measuring Perimeter and Area, pp. 6-18. Inv. 3- Constant Area, Changing Perimeter, pp. 29-34. Inv. 4- Constant Perimeter, Changing Area pp. 35-45. Inv. 5- Measuring Parallelograms, pp.46-55. Inv. 6- Measuring Triangles pp. 56-68. TR: Transparences pp.120-141, Teaching the Investigation pp. 18a-81j, Lab sheets 7.4 TECH: Calculators, Transparencies 1.1 to 7.5
				• 4.2.6.E.5 Develop informal ways of approximating the measures of familiar objects (e.g., use a grid to approximate the area of the bottom of one's foot).	Covering and Surrounding SE/TE: Inv .2- Making Buildings, pp. 26-39 TR: Transparences p.126, Teaching the Investigation pp. 28a-28c TECH: Calculators, Transparency 2.1
April DATA ANALYSIS	• Table and Graphs • Central Tendency (mean, median, mode)	• Collect, generate, organize and display data using tables, bar graphs, and line plots • Read, interpret, select construct, analyze, generate questions about and draw inferences from displays of data. • Find the mean, median, mode and range of sets of data. • Describe the location of points on a coordinate grid using ordered pairs. • Demonstrate appropriate use of mean, median, mode, and range to make inferences and draw conclusions based on data.	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project	• 4.4.6.A.1 Collect, generate, organize, and display data(Data generated from surveys)	Data About Us SE/TE: Inv.1- Looking at Data, pp. 6-21. Inv. 2- Types of Data, pp. 22-29. Inv. 3- Using Graphs to Group Data, pp. 30-41. Inv. 4- Coordinate Graphs, pp.41j-52g. TR: Transparences pp.96-110, Teaching the Investigation pp. 21a-52g, Lab sheets 4.2, and 4.ACE TECH: Calculators, Transparencies 1.1 to 4.2

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
April cont.				• 4.4.6.A.2 Read, interpret, select, construct, analyze, generate questions about, and draw inferences from displays of data (Bar graphs, line graph, circle graph, table histogram)	Data About Us SE/TE: Inv.1- Looking at Data, pp. 6-21. Inv. 2- Types of Data, pp. 22-29. Inv. 3- Using Graphs to Group Data, pp. 30-41. Inv. 4- Coordinate Graphs, pp.41j-52g. TR: Transparences pp.96-110, Teaching the Investigation pp. 21a-52g, Lab sheets 4.2, and 4.ACE TECH: Calculators, Transparencies 1.1 to 4.2 How Likely Is It? SE/TE: Inv.1- A First Look at Chance, pp. 5-13. (http://www.ns.msu.edu/CMP/cmp.html). Inv.2- More Experiments with Chance, pp. 14-21. Inv. 3- Using Spinners to Predict Chance, pp. 22-28. Inv. 4- Theoretical Probabilities, pp. 29-41. Inv.5- Analyzing Games of Chance pp. 42-48. Inv. 6- More About Games of Chance pp. 49-56. Inv. 7- Probability and Genetics, pp. 57-64. TR: Transparences pp.95-106, Teaching the Investigation pp. 13a-64d, Lab sheet 1.1A to 5.1 TECH: Calculators, Transparency 7.1 to 7.2

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
May PROBABILITY	• Experimental Probability • Theoretical Probability	• Use and describe strategies for determining that the probability of an event is a ratio between 0 and 1. • Model situations involving probability using simulations (spinners, dice) and theoretical models. • Recognize and understand the connections among the concepts of independent outcomes, picking at random and fairness • Determine probability using intuitive, experimental, and theoretical methods(e.g. using model of picking items of different colors from a bag)	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.4.6.B.1 Determine probabilities of events	How Likely Is It? SE/TE: Inv.1- A First Look at Chance, pp. 5-13. (http://www.ns.msu.edu/CMP/cmp.html). Inv.2- More Experiments with Chance, pp. 14-21. Inv. 3- Using Spinners to Predict Chance, pp. 22-28. Inv. 4- Theoretical Probabilities, pp. 29-41. Inv.5- Analyzing Games of Chance pp. 42-48 Inv. 6- More About Games of Chance pp. 49-56. Inv. 7- Probability and Genetics, pp. 57-64. TR: Transparences pp.95-106, Teaching the Investigation pp. 13a-64d, Lab sheet 1.1A to 5.1 TECH: Calculators, Transparency 7.1 to 7.2
				• 4.4.6.B.2 Determine probability using intuitive, experimental, and theoretical methods.	How Likely Is It? SE/TE: Inv.1- A First Look at Chance, pp. 5-13. (http://www.ns.msu.edu/CMP/cmp.html). Inv.2- More Experiments with Chance, pp. 14-21. Inv. 3- Using Spinners to Predict Chance, pp. 22-28. Inv. 4- Theoretical Probabilities, pp. 29-41. Inv.5- Analyzing Games of Chance pp. 42-48. Inv. 6- More About Games of Chance pp. 49-56. Inv. 7- Probability and Genetics, pp. 57-64. TR: Transparences pp.95-106, Teaching the Investigation pp. 13a-64d, Lab sheet 1.1A to 5.1 TECH: Calculators, Transparency 7.1 to 7.2

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
May cont.				• 4.4.6.B.4 Model situations involving probability using simulations(with spinners, dice) and theoretical models	How Likely Is It? SE/TE: Inv.1- A First Look at Chance, pp. 5-13. (http://www.ns.msu.edu/CMP/cmp.html). Inv.2- More Experiments with Chance, pp. 14-21. Inv. 3- Using Spinners to Predict Chance, pp. 22-28. Inv. 4- Theoretical Probabilities, pp. 29-41. Inv.5- Analyzing Games of Chance pp. 42-48. Inv. 6- More About Games of Chance pp. 49-56. Inv. 7- Probability and Genetics, pp. 57-64. TR: Transparences pp.95-106, Teaching the Investigation pp. 13a-64d, Lab sheet 1.1A to 5.1 TECH: Calculators, Transparency 7.1 to 7.2
				• 4.4.6.B.5 Recognize and understand the connections among the concepts of independent outcomes, picking at random and fairness.	How Likely Is It? SE/TE: Inv.1- A First Look at Chance, pp. 5-13. (http://www.ns.msu.edu/CMP/cmp.html). Inv.2- More Experiments with Chance, pp. 14-21. Inv. 3- Using Spinners to Predict Chance, pp. 22-28. Inv. 4- Theoretical Probabilities, pp. 29-41. Inv.5- Analyzing Games of Chance pp. 42-48. Inv. 6- More About Games of Chance pp. 49-56. Inv. 7- Probability and Genetics, pp. 57-64. TR: Transparences pp.95-106, Teaching the Investigation pp. 13a-64d, Lab sheet 1.1A to 5.1 TECH: Calculators, Transparency 7.1 to 7.2
				• 4.4.6. D.1 Devise strategies for winning simple games and express those strategies as sets of directions.	Can be developed with the following Investigation: Shapes and Designs SE/TE: Inv. 3- Polygons and Angles, pp. 25-41. TR: Transparences pp.110-116,. Teaching the Investigation pp. 41a-41k Lab sheets 3.4, 3.5, 3.6 TECH: Calculators, Transparencies 3.1 to 3.6

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
June DISCRETE MATHEMATICS	• Systematic Listing • Systematic Counting • Vertex-Edge Graphs and Algorithms	• 1 Solve counting problems using organized lists, charts, tree diagrams, tables, and Venn diagrams. • Apply the multiplication principle of counting (e.g. number of ways a specified number of items can be arranged in order) • List the possible combinations of two elements chosen from a set (e.g. finding how many handshakes there will be among ten people if everyone shakes each other person's hand once) • Devise strategies for winning simple games • Analyze vertex-edge graphs and tree diagrams (e.g. can a picture or a vertex graph be drawn with a single line? Can you get from any vertex to any other vertex) • Use vertex-edge graphs to find solutions to practical problems(e.g. Delivery rout that stops at specified sites but involves least travel)	• Exit slip • Observation • Homework • Quiz • Check Up • Unit Test • Unit Project • Benchmarks	• 4.4.6.C.1 Solve counting problems and justify that all possibilities have been enumerated without duplication (organized lists, charts, tree diagrams, tables, and Venn diagrams)	How Likely Is It? SE/TE: Inv.5- Analyzing Games of Chance pp. 42-48 TR: Transparency p.103, Teaching the Investigation pp. 48a-48e, Lab sheet 5.1 TECH: Calculators, Transparencies 5.1 See also Grade 7 unit: What Do You Expect? See also Grade 8 unit: Clever Counting.
				• 4.4.6.C.2 Apply the multiplication principle of counting	How Likely Is It? SE/TE: Inv.5- Analyzing Games of Chance pp. 42-48 TR: Transparency p.103, Teaching the Investigation pp. 48a-48e, Lab sheet 5.1 TECH: Calculators, Transparencies 5.1 See also Grade 7 unit: What Do You Expect? See also Grade 8 unit: Clever Counting.
				• 4.4.6. C.3 List the possible combinations of two elements chosen from a given set.	How Likely Is It? SE/TE: Inv.5- Analyzing Games of Chance pp. 42-48 TR: Transparency p.103, Teaching the Investigation pp. 48a-48e, Lab sheet 5.1 TECH: Calculators, Transparencies 5.1 See also Grade 7 unit: What Do You Expect? See also Grade 8 unit: Clever Counting.

	Content	Skills	Assessment	Standards	Connected Mathematics © 2004, Grade 6
June cont.				• 4.4.6.D.1 Devise strategies for winning games	Can be developed with the following Investigation: Shapes and Designs SE/TE: Inv. 3- Polygons and Angles, pp. 25-41. TR: Transparences pp.110-116,. Teaching the Investigation pp. 41a-41k Lab sheets 3.4, 3.5, 3.6 TECH: Calculators, Transparencies 3.1 to 3.6
				• 4.4.6.D.2 Analyze vertex-edge graphs and tree diagrams	Can be developed with the following Investigation: Shapes and Designs SE/TE: Inv. 3- Polygons and Angles, pp. 25-41. TR: Transparences pp.110-116,. Teaching the Investigation pp. 41a-41k Lab sheets 3.4, 3.5, 3.6 TECH: Calculators, Transparencies 3.1 to 3.6
				• 4.4.6.D.3 Analyze vertex-edge graphs to find solutions to practical problems	Can be developed with the following Investigation: Shapes and Designs SE/TE: Inv. 3- Polygons and Angles, pp. 25-41. TR: Transparences pp.110-116,. Teaching the Investigation pp. 41a-41k Lab sheets 3.4, 3.5, 3.6 TECH: Calculators, Transparencies 3.1 to 3.6