Math TEKS for 4th Grade: 2013-2014

Primary Areas of Focus: Use of operations, fractions, decimals, and describing and analyzing geometry &
Cat. 1: Apply Place Value and Represent Points on a Number Line corresponding to a given Fraction or Decimal
Cat. 2: Solve Multi-Step Problems involving A,S,M, & D with expressions/equations and generating/analyzing patterns.
Cat. 3: Classify 2-D Figures & Measure Angles
Cat. 4: Convert units of measurement
Cat. 5: Represent and Interpret Data
Note: Statements that contain "including" reference content that must be mastered, while "such as" are intended as possible illustrative examples.

Underlying Processes & Mathematical Tools						
PROCESS: (8 TEKS) *Incorporated into 75% of test questions* 8-Week Periods:			**1st**	**2nd**	**3rd**	**4th**
4.14A	*	Identify Math in Everyday Life Situations				
4.14B	*	Problem Solving Model - 1) Analyze Info, 2) Make a plan, 3) Solve, 4) Justify, & 5) Evaluate the process				
4.14C	*	Select or Develop Problem-Solving Strategy: 1) Draw, 2) Find Pattern, 3) Guess/Check, 4) Acting, 5) Make a Table, 6) Work Simpler Problem, 7) Work Backwards				
4.14D	*	Use Tools such as real objects, manipulatives,& technology to solve problems				
4.15A	*	Explain & Record observations using objects, words, pictures, numbers, & technology				
4.15B	*	Relate informal language to math language & symbols				
4.16A	*	Make generalizations from patterns or sets of examples & non-examples				
4.16B	*	Justify why an answer is reasonable and explain the solution process				
Category 1: Numbers, Operations, & Quantitative Reasoning						
CONTENT: (33 TEKS) 8-Week Periods:			**1st**	**2nd**	**3rd**	**4th**
Place Value						
4.1A	S	Use Place Value to read, write, compare, and order whole #s through 999,999,999.				
4.1B	**R**	Use Place Value to read, write, compare, and order decimals (tenths, hundredths) including money, using objects/pictorial models.				
Fractions						
4.2A	S	Use objects/pictures to generate equivalent fractions				
4.2B	S	Model fraction quantities greater than 1 using objects/pictures				
4.2C	S	Compare and order fractions using objects/pictures				
4.2D	**R**	Relate decimals to fractions (tenths & hundredths) using objects/pictures				
Addition & Subtraction						
4.3A	S	Use addition & subtraction to solve problems involving whole numbers				
4.3B	S	Add and subtract decimals to the hundredths place using objects/pictures.				
Multiplication & Division						
4.4A	S	Model factors and products using arrays and area models				
4.4B	S	Represent multiplication and division situations in picture, word, & # form				
4.4C	S	Recall & Apply multiplication facts through 12 by 12				
4.4D	**R**	Use multiplication to solve problems (2 digit by 2 digit)				
4.4E	**R**	Use division to solve problems (no more than 1 digit divisors & 3 digit dividents (w/o tech)				
Estimation						
4.5A	S	Round whole #s to nearest 10, 100, or 1000 to approximate reasonable results.				
4.5B	S	Use strategies including rounding & compatible #s to estimate solutions to mulitplication/division problems.				
Category 2: Patterns, Relationships, & Algebraic Reasoning						
Use Patterns to Solve Problems						
4.6A	S	Use patterns & relationships to develop strategies to remember basic mult/div facts (such as patterns in # sentences such as 9 X 9 = 81 and 81 / 9 = 9).				
4.6B	S	Use patterns to multiply by 10 and 100				
Use Lists, Tables, & Charts to Describe Patterns & Relationships						
4.7A	**R**	Describe the relationship between two sets of related data such as ordered pairs in a table				
		8-Week Periods:	**1st**	**2nd**	**3rd**	**4th**

Category 3: Geometry & Spatial Reasoning						
Attributes of Geometric Figures Using Formal Language						
4.8A	S	Identify & describe right, acute, and obtuse angles				
4.8B	S	Identify & describe parallel & intersecting (including perpendicular) lines using objects/pictures				
4.8C	**R**	Use essential attributes to define 2-D & 3-D geometric figures				
Transformations						
4.9B	**R**	Use Translations, Reflections, & Rotations to verify that two shapes are congruent				
4.9C	S	Use reflections to verify that a shape has symmetry				
Points on a Number Line						
4.10A	**R**	Locate & name points on a number line using whole #s, fractions (such as halves & fourths), and decimals such as tenths				
Category 4: Measurement						
Length, Area, Weight/Mass, & Capacity/Volume						
4.11A	**R**	Estimate and use measurement tools to determine length (including perimeter), area, capacity, and weight/mass using standard units (metric and customary)				
4.11B	S	Perform simple conversions between different units of length, capacity, & weight within customary measurement system				
4.11C	S	Use concrete models of standard cubic units to measure volume.				
4.11D	S	Estimate volume in cubic units				
4.11E	S	Explaint the difference between weight and mass				
Time & Temperature						
4.12A	S	Use a thermometer to measure temperature and changes in temperature				
4.12B	S	Use tools such as a clock with gears or a stopwatch to solve problems using elapsed time.				
Category 5: Probability & Statistics						
4.13A	S	Use objects/pictures to make generalizations about determining all possible combinations for a set of data or objects in a problem situation				
4.13B	**R**	Interpret bar graphs				

Summary of Readiness Standards (The Big Rocks) (10 of 33 TEKS)			
4.1B	**R**	Use Place Value to read, write, compare, and order decimals (tenths, hundredths) including money, using objects/pictorial models.	Place Value for Decimals
4.2D	**R**	Relate decimals to fractions (tenths & hundredths) using objects/pictures	Decimals to Fractions
4.4D	**R**	Use multiplication to solve problems (2 digit by 2 digit)	2 by 2 Multiplication
4.4E	**R**	Use division to solve problems (no more than 1 digit divisors & 3 digit dividents (w/o tech)	3 by 1 Division
4.7A	**R**	Describe the relationship between two sets of related data such as ordered pairs in a table	Relationship of Ordered Pairs
4.8C	**R**	Use essential attributes to define 2-D & 3-D geometric figures	2-D & 3-D Concepts
4.9B	**R**	Use Translations, Reflections, & Rotations to verify that two shapes are congruent	Translate, Reflect, Rotate
4.10A	**R**	Locate & name points on a number line using whole #s, fractions (such as halves & fourths), and decimals such as tenths	#s, Fractions, Decimals on a Number Line
4.11A	**R**	Estimate and use measurement tools to determine length (including perimeter), area, capacity, and weight/mass using standard units (metric and customary)	Perimeter, Area, Metric, & Customary Measurement
4.13B	**R**	Interpret bar graphs	Interpret Bar Graphs

***3-4 questions will be asked on each of these (approximately 30 of 48 question on STAAR test)**

STAAR Test: Tuesday, April 22, 2014, **Last Day of School:** Friday, May 23