

Math Teachers Press, Inc.

4850 Park Glen Road, Minneapolis, MN 55416 phone (800) 852-2435 fax (952) 546-7502

Correlation of 2012 Texas Essential Knowledge and Skills for Mathematics to Moving with Math® Foundations Intermediate/Middle Grade 5

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
5.1	Mathematical process standards. The student uses mathematical processes to acquire and demonstrate mathematical understanding			
(A)	apply mathematics to problems arising in everyday life, society, and the workplace	2, 5, 13, 15, 24-32, 34-37, 39-50, 53-71, 74, 76, 78 SB: 4-2, 6-1, 6-2, 7-1 to 7-4, 8-1 to 8-5, 8-7, 9-1 to 9-3, 10-2, 10-4, 10-7, 45-1 to 45-17, 46-1 to 46-5, 50-1 to 50-3, 56-4, 59-2, 59-5		50, 56-60, 65-76 SB: 3-1, 7-1, 8-1, 9-1, 10-1, 12-1, 15-1, 16-1, 17-1, 18-1, 20-1, 24-1, 26-1, 27-1, 32-5, 33-1, 34-6, 35-2, 36-4, 37-3, 38-11, 39-2 to 39-5, 39-7, 40-1, 40-3, 41-1, 41-2, 42-1, 42-2, 44-2, 44-3, 44-5, 44-6, 45-1, 45-3, 45-4, 46-1, 47-1 to 47-6, 48-1 to 48-5, 50-1, 51-1, 52-

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
(B)	use a problem-solving model that incorporates analyzing given information, formulating a plan or strategy, determining a solution, justifying the solution, and evaluating the problem-solving process and the reasonableness of the solution	38-40, 43, 45-50, 53-78 SB: 4-2, 6-1, 6-2, 7-1 to 7-4, 8-1 to 8-5,	3, 7-9, 11, 14-17, 19, 20, 22, 23, 25-32, 34-38, 41, 46, 49, 51-52, 54-57, 60-62, 64-72, 74-78 SB: 1-1, 3-1, 6-1, 7-1, 8-1, 9-1, 10-1, 11-3, 13-3, 15-1 to 15-3, 16-1, 16-2, 16-4, 17-1 to 17-4, 18-1 to 18-4, 19-1 to 19-5, 20-1, 20-3, 20-4, 23-2, 24-1 to 24-3, 25-3, 26-2 to 26-4, 27-2 to 27-6, 28-1 to 28-6, 29-3, 45-1 to 45-14, 46-1, 48-1 to 48-3, 51-1, 53-2 to 53-4, 57-1 to 57-5, 58-1 to 58-4, 59-1	21, 22, 25-29, 31, 33, 36-40, 46, 50, 56-60, 65-76 SB: 7-1, 12-1, 15-1, 16-1, 17-1, 18-1, 20-1, 24-1, 26-1, 27-1, 35-2, 36-4, 37-3, 38-11, 39-2 to 39-5, 39-7, 40-1, 40-3, 41-1, 42-1,

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
(C)	select tools, including real objects, manipulatives, paper and pencil, and technology as appropriate, and techniques, including mental math, estimation, and number sense as appropriate, to solve problems	2-78 SB: 1-1 to 1-5, 2-1 to 2-4, 3-1 to 3-4, 4-1 to 4-6, 5-1 to 5-8, 6-1 to 6-3, 7-1 to 7-4, 8-1 to 8-7, 9-1 to 9-55, 10-1 to 10-7, 43-1, 44-1 to 44-6, 45-1 to 45-17, 46-1 to 46-5, 49-1, 49-2, 50-1 to 50-3, 56-1 to 56-5, 59-1 to 59-8	2-79 SB: 1-1, 2-1, 3-1, 4-1 to 4-3, 5-1 to 5-2, 6-1, 7-1, 8-1, 9-1, 10-1 to 10-2, 11-1 to 11-6, 12-1 to 12-10, 13-1 to 13-5, 14-1 to 14-2, 15-1 to 15-3, 16-1 to 16-4, 17-1 to 17-4, 18-1 to 18-4, 19-1 to 19-5, 20-1 to 20-5, 21-1 to 21-3, 22-1 to 22-2, 23-1 to 23-4, 24-1 to 24-4, 25-1 to 25-4, 26-1 to 26-4, 27-1 to 27-6, 28-1 to 28-7, 29-1 to 29-3, 30-1 to 30-5, 43-1, 44-1, 45-1 to 45-15, 46-1, 48-1 to 48-3, 49-1, 50-1, 51-1 to 51-4, 53-1 to 53-4, 56-1, 57-1 to 57-5, 58-1 to 58-4, 59-1	2-76 SB: 1-1, 2-1, 3-1, 4-1, 5-1, 6-1, 7-1, 8-1, 9-1, 10-1, 11-1, 12-1, 13-1, 14-1, 15-1, 16-1, 17-1, 18-1, 19-1, 20-1, 21-1, 22-1, 23-1, 24-1, 25-1, 26-1, 27-1, 28-1, 29-1, 30-1, 31-1, 31-2, 32-1, 33-1, 34-1 to 34-10, 35-1, 35-2, 36-1 to 36-7, 37-1 to 37-3, 38-1 to 38-13, 39-1 to 39-7, 40-1 to 40-4, 41-1, 41-2, 42-1, 42-2, 43-1, 44-1 to 44-6, 45-1 to 45-5, 46-1, 47-1 to 47-6, 48-1 to 48-5, 49-1, 50-1, 51-1, 52-1 to 52-6, 53-1, 54-1, 55-1 to 55-3, 56-1, 56-2, 57-1, 58-1, 59-2, 60-1 to 60-6

		IM1	IM2	IM3
		Number, Reasoning & Data Student Book Skill Builders (SB)	Fractions, Decimals & Percent Student Book Skill Builders (SB)	Geometry, Measurement, Probability Student Book Skill Builders (SB)
(D)	communicate mathematical ideas, reasoning, and their implications using multiple representations, including symbols, diagrams, graphs, and language as appropriate	2-78 SB: 1-1 to 1-5, 2-1 to 2-4, 3-1 to 3-4, 4-1 to 4-6, 5-1 to 5-8, 6-1 to 6-3, 7-1 to 7-4, 8-1 to 8-7, 9-1 to 9-5, 10-1 to 10-7, 43-1, 44-1 to 44-6, 45-1 to 45-17, 46-1 to 46-5, 49-1, 49-2, 50-1 to 50-3, 56-1 to 56-5, 59-1 to 59-8	2-79 SB: 1-1, 2-1, 3-1, 4-1 to 4-3, 5-1, 5-2, 6-1, 7-1, 8-1, 9-1, 10-1, 10-2, 11-1 to 11-6, 12-1 to 12-10, 13-1 to 13-5, 14-1, 14-2, 15-1 to 15-3, 16-1 to 16-4, 17-1 to 17-4, 18-1 to 18-4, 19-1 to 19-5, 20-1 to 20-5, 21-1 to 21-3, 22-1, 22-2, 23-1 to 23-4, 24-1 to 24-4, 25-1 to 25-4, 26-1 to 26-4, 27-1 to 27-6, 28-1 to 28-7, 29-1 to 29-3, 30-1 to 30-5, 43-1, 44-1, 45-1 to 45-15, 46-1, 48-1 to 48-3, 49-1, 50-1, 51-1 to 51-4, 53-1 to 53-4, 56-1, 57-1 to 57-5, 58-1 to 58-4, 59-1	2-76 SB: 1-1, 2-1, 3-1, 4-1, 5-1, 6-1, 7-1, 8-1, 9-1, 10-1, 11-1, 12-1, 13-1, 14-1, 15-1, 16-1, 17-1, 18-1, 19-1, 20-1, 21-1, 22-1, 23-1, 24-1, 25-1, 26-1, 27-1, 28-1, 29-1, 30-1, 31-1, 31-2, 32-1, 33-1, 34-1 to 34-10, 35-1, 35-2, 36-1 to 36-7, 37-1 to 37-3, 38-1 to 38-13, 39-1 to 39-7, 40-1 to 40-4, 41-1, 41-2, 42-1, 42-2, 43-1, 44-1 to 44-6, 45-1 to 45-5, 46-1, 47-1 to 47-6, 48-1 to 48-5, 49-1, 50-1, 51-1, 52-1 to 52-6, 53-1, 54-1, 55-1 to 55-3, 56-1, 56-2, 57-1, 58-1, 59-2, 60-1 to 60-6
(E)	create and use representations to organize, record, and communicate mathematical ideas	2, 10-18, 20, 22, 24, 26, 30-36, 38, 39, 43, 45, 51, 52, 54-59, 61-69, 71-78 SB: 44-4, 44-5, 45-4, 45-16, 46-3, 46-5, 49-1, 59-2, 59-5 to 59-8	3, 5, 6, 9, 14-26, 28-35, 37, 38, 41-47, 49-50, 53-55, 57-66, 68, 70, 72, 74-78 SB: 11-1, 11-2, 11-4, 11-6, 12-1, 12-4, 12-5, 12-8, 13-1, 14-1, 16-3, 17-3, 17-4, 20-1, 20-2, 21-1 to 21-3, 22-1, 23-2 to 23-4, 24-2, 25-3, 25-4, 26-1, 27-1, 27-4, 28-3, 28-4, 28-7, 29-1 to 29-3, 48-2, 48-3, 49-1, 50-1, 51-2, 51-4, 53-2, 57-2, 57-3, 58-1, 58-2	56, 58-61, 63, 64, 66, 68, 76 SB: 11-1, 14-1, 21-1, 29-1, 32-4, 32-5, 34-

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
(F)	analyze mathematical relationships to connect and communicate mathematical ideas	2-78 SB: 1-1 to 1-5, 2-1 to 2-4, 3-1 to 3-4, 4-1 to 4-6, 5-1 to 5-8, 6-1 to 6-3, 7-1 to 7-4, 8-1 to 8-7, 9-1 to 9-55, 10-1 to 10-7, 43-1, 44-1 to 44-6, 45-1 to 46-5, 49-1, 49-2, 50-1 to 50-3, 56-1 to 56-5, 59-1 to 59-8	2-79 SB: 1-1, 2-1, 3-1, 4-1 to 4-3, 5-1, 5-2, 6-1, 7-1, 8-1, 9-1, 10-1, 10-2, 11-1 to 11-6, 12-1 to 12-10, 13-1 to 13-5, 14-1, 14-2, 15-1 to 15-3, 16-1 to 16-4, 17-1 to 17-4, 18-1 to 18-4, 19-1 to 19-5, 20-1 to 20-5, 21-1 to 21-3, 22-1, 22-2, 23-1 to 23-4, 24-1 to 24-4, 25-1 to 25-4, 26-1 to 26-4, 27-1 to 27-6, 28-1 to 28-7, 29-1 to 29-3, 30-1 to 30-5, 43-1, 44-1, 45-1 to 45-15, 46-1, 48-1 to 48-3, 49-1, 50-1, 51-1 to 51-4, 53-1 to 57-5, 58-1 to 58-4, 59-1	2-76 SB: 1-1, 2-1, 3-1, 4-1, 5-1, 6-1, 7-1, 8-1, 9-1, 10-1, 11-1, 12-1, 13-1, 14-1, 15-1, 16-1, 17-1, 18-1, 19-1, 20-1, 21-1, 22-1, 23-1, 24-1, 25-1, 26-1, 27-1, 28-1, 29-1, 30-1, 31-1, 31-2, 32-1, 33-1, 34-1 to 34-10, 35-1, 35-2, 36-1 to 36-7, 37-1 to 37-3, 38-1 to 38-13, 39-1 to 39-7, 40-1 to 40-4, 41-1, 41-2, 42-1, 42-2, 43-1, 44-1 to 44-6, 45-1 to 45-5, 46-1, 47-1 to 47-6, 48-1 to 48-5, 49-1, 50-1, 51-1, 52-1 to 52-6, 53-1, 54-1, 55-1 to 55-3, 56-1, 56-2, 57-1, 58-1, 59-2, 60-1 to 60-6

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
(G)	display, explain, and justify mathematical ideas and arguments using precise mathematical language in written or oral communication	2-78 SB: 1-1 to 1-5, 2-1 to 2-4, 3-1 to 3-4, 4-1 to 4-6, 5-1 to 5-8, 6-1 to 6-3, 7-1 to 7-4, 8-1 to 8-7, 9-1 to 9-55, 10-1 to 10-7, 43-1, 44-1 to 44-6, 45-1 to 45-17, 46-1 to 46-5, 49-1, 49-2, 50-1 to 50-3, 56-1 to 56-5, 59-1 to 59-8	2-79 SB: 1-1, 2-1, 3-1, 4-1 to 4-3, 5-1, 5-2, 6-1, 7-1, 8-1, 9-1, 10-1, 10-2, 11-1 to 11-6, 12-1 to 12-10, 13-1 to 13-5, 14-1,14-2, 15-1 to 15-3, 16-1 to 16-4, 17-1 to 17-4, 18-1 to 18-4, 19-1 to 19-5, 20-1 to 20-5, 21-1 to 21-3, 22-1, 22-2, 23-1 to 23-4, 24-1 to 24-4, 25-1 to 25-4, 26-1 to 26-4, 27-1 to 27-6, 28-1 to 28-7, 29-1 to 29-3, 30-1 to 30-5, 43-1, 44-1, 45-1 to 45-15, 46-1, 48-1 to 48-3, 49-1, 50-1, 51-1 to 51-4, 53-1 to 53-4, 56-1, 57-1 to 57-5, 58-1 to 58-4, 59-1	1, 33-1, 34-1 to 34- 10, 35-1, 35-2, 36-1 to 36-7, 37-1 to 37- 3, 38-1 to 38-13, 39- 1 to 39-7, 40-1 to 40-
5.2	Number and operations. The student applies mathematical process standards to represent, compare, and order positive rational numbers and understand relationship as related to place value			
(A)	represent the value of the digit in decimals through the thousandths using expanded notation and numerals		41	
(B)	compare and order two decimals to thousandths and represent comparisons using the symbols >, <, or =		49-51 SB: 24-1 to 24-3	SB : 24-1
(C)	round decimals to tenths or hundredths		53 SB: 51-2 to 51-4	SB: 51-1

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
5.3	Number and operations. The student applies mathematical process standards to develop and use strategies and methods for positive rational number computations in order to solve problems with efficiency and accuracy.			
(A)	estimate to determine solutions to mathematical and real-world problems involving addition, subtraction, multiplication, or division	27, 28 SB: 49-1, 49-2, 50- 1, 50-2	24, 25, 27 SB: 13-3, 18-3, 18-4, 45-3, 45-6, 45-9, 45-10, 45-11, 49-1, 50-1	SB: 10-1, 49-1, 50-1
(B)	multiply with fluency a three-digit number by a two-digit number using the standard algorithm	37 SB: 8-5, 8-6		SB: 8-1
(C)	solve with proficiency for quotients of up to a four-digit dividend by a two-digit divisor using strategies and the standard algorithm	44-48 SB: 10-1 to 10-7		SB: 10-1
(D)	represent multiplication of decimals with products to the hundredths using objects and pictorial models, including area models		58, 59 SB: 27-1, 27-2, 27-6	
(E)	solve for products of decimals to the hundredths, including situations involving money, using strategies based on place-value understandings, properties of operations, and the relationship to the multiplication of whole numbers		57-60, 63 SB: 27-1 to 27-6, 28-7	SB: 26-1, 27-1
(F)	represent quotient of decimals to the hundredths, up to four-digit dividends and two-digit whole number divisors, using objects and pictorial models, including area models		61	SB: 17-1, 18-1
(G)	solve for quotients of decimals to the hundredths, up to four-digit dividends and two-digit whole number divisors, using strategies and algorithms, including the standard algorithm		61, 63, 65, 66 SB: 28-1, 28-3 to 28- 5, 28-7, 45-12	
(H)	represent and solve addition and subtraction of fractions with unequal denominators referring to the same whole using objects and pictorial models and properties of operations		19-23, 36, 37 SB: 16-4, 17-1 to 17- 4, 18-1, 18-2	

		IM1	IM2	IM3
		Number, Reasoning & Data Student Book Skill Builders (SB)	Fractions, Decimals & Percent Student Book Skill Builders (SB)	Geometry, Measurement, Probability Student Book Skill Builders (SB)
(1)	represent and solve multiplication of a whole number and a fraction that refers to the same whole using objects and pictorial models, including area models		30-32	
(1)	represent division of a unit fraction by a whole number and the division of a whole number by a unit fraction such as 1/3 ÷ 7 and 7 ÷ 1/3 using objects and pictorial models, including area models		34	
(K)	add and subtract positive rational numbers fluently	23-26, 29, 30 SB: 6-1 to 6-3, 7-1 to 7-4	14-17, 19-23, 26, 27, 35, 54-56 SB: 6-1, 7-1, 8-1, 9-1, 10-1, 10-2, 15-1 to 15-3, 16-1 to 16-3, 26-2 to 26-4, 45-1 to 45-3, 45-5, 45-6, 45-14	SB: 6-1, 7-1, 15-1, 16-1
(L)	divide whole number by unit fractions and unit fractions by whole numbers		34 SB: 20-2, 20-3, 20-5	SB: 20-1
5.4	Algebraic reasoning. The student applies mathematical process standards to develop concepts of expressions and equations			
(A)	identify prime and composite numbers	14, 15 SB: 4-1, 4-2	SB: 4-2	SB: 4-1
(B)	represent and solve multi-step problems involving the four operations with whole numbers using equations with a letter standing for the unknown quantity	50, 55, 70, 71 SB: 45-2, 45-16, 56- 1 to 56-3	SB: 45-6, 56-1	
(C)	generate a numerical pattern when given a rule in the form of $y = ax$ or $y = x + a$ and graph	SB: 44-4, 44-5		
(D)	recognize the difference between additive and multiplicative numerical patterns given in a table or graph	73-75		21, 22 SB: 44-1 to 44-4, 44-6
(E)	describe the meaning of parentheses and brackets in a numeric expression	22 SB: 5-4		
(F)	simplify numerical expressions that do not involve exponents, including up to two levels of grouping	22 SB: 5-4, 5-6, 5-7		

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
(G)	use concrete objects and pictorial models to develop the formulas for the volume of a rectangular prism, including the special form for a cube (V= I x w x h, V = s x s x s, and V = Bh)			51, 52 SB: 39-1, 39-2
(H)	represent and solve problems related to perimeter and/or area and related to volume			40, 42-46, 48-51 SB: 38-1 to 38-9, 38-11, 38-13, 39-1 to 39
5.5	Geometry and measurement. The student applies mathematical process standards to classify two-dimensional figures by attributes and properties. The student is expected to classify two-dimensional figures in a hierarchy of sets and subsets using graphic organizers based on their attributes and properties			7-9 SB: 34-1 to 34-5, 34- 10
5.6	Geometry and measurement. The student applies mathematical process standards to understand, recognize, and quantify volume			
(A)	recognize a cube with side length of one unit as a unit cube having one cubic unit of volume and the volume of a three-dimensional figure as the number of unit cubes (n cubic units) needed to fill it with no gaps or overlaps if possible			52, 53
(B)	determine the volume of a rectangular prism with whole number side lengths in problems related to the number of layers times the number of unit cubes in the area of the base			53

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
5.7	Geometry and measurement. The student applies mathematical process standards to select appropriate units, strategies, and tools to solve problems involving measurement. The student is expected to solve problems by calculating conversions within a measurement system, customary or metric			30-39, 41 SB: 36-1 to 36-7, 41-1, 41-2, 42-1, 42-2, 45-1, 45-2, 45-4
5.8	Geometry and measurement. The student applies mathematical process standards to identify locations on a coordinate plane.			
(A)	describe the key attributes of the coordinate plane, including perpendicular number lines (axes) where the intersection (origin) of two lines coincides with zero on each number line and the given point (0, 0); the x-coordinate, the first number in an ordered pair, indicates movement parallel to the x-axis starting at the origin; and the y-coordinate, the second number indicates movement parallel to the y-axis starting at the origin	77 SB: 43-1		15, 16
(B)	describe the process for graphing ordered pairs of numbers in the first quadrant of the coordinate plane	77 SB: 43-1		15
(C)	graph in the first quadrant of the coordinate plane ordered pairs of numbers arising from mathematical and real-world problems, including those generated by number patters or found in an input-output table	77, 78		15 SB: 43-1
5.9	Data analysis. The student applies mathematical process standards to solve problems by collecting, organizing, displaying, and interpreting data.			
(A)	represent categorical data with bar graphs or frequency tables and numerical data, including data sets of measurements in fractions or decimals, with dot plots or stem-and-leaf plots	SB: 46-5		72, 73, 75

		IM1 Number, Reasoning & Data Student Book Skill Builders (SB)	IM2 Fractions, Decimals & Percent Student Book Skill Builders (SB)	IM3 Geometry, Measurement, Probability Student Book Skill Builders (SB)
(B)	represent discrete paired data on a scatterplot			
(C)	solve one- and two-step problems using data from a frequency table, dot plot, bar graph, stem-and-leaf plot, or scatterplot	SB: 46-5		66, 69, 70, 73, 75 SB: 47-5, 47-6, 48-3, 48-5
5.10	Personal financial literacy. The student applies mathematical process standards to manage one's financial resources effectively for lifetime financial security.			
(A)	define income tax, payroll tax, sales tax, and property tax			
(B)	explain the difference between gross income and net income			
(C)	identify the advantages and disadvantages of different methods of payment, including check, credit card, debit card, and electronic payments			
(D)	develop a system for keeping and using financial records			
(E)	describe actions that might be taken to balance a budget when expenses exceed income			
(F)	balance a simple budget			