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Correlation of Texas Essential Knowledge and Skills (TEKS) for Mathematics to Moving with Math Extensions 2nd Edition Grade 7

		Student Book Part A	Skill Builders Part A	Student Book Part B
7.1	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, 7-13, 16-21, 27, 28, 30-33, 35-38, 40- 43, 52	throughout	62, 63, 66, 71, 73- 77, 83, 84, 87-91, 94-96
(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	11, 12	43-1, 43-2, 43-3, 43-4, 44-1, 44-2	66, 74
(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	6-10, 14- 18, 20, 22- 31, 40-42, 48, 50, 52, 55, 57- 60	throughout	66-68, 70, 72, 77, 90, 91, 95
(D)	communicate mathematical ideas, reasoning, and their implications using multiple representations, including symbols, diagrams, graphs, and language as appropriate	3, 6-10, 13, 29-31, 34, 39-41, 50-55, 57	throughout	66-68, 70- 78, 84-86, 88-91
(E)	create and use representations to organize, record, and communicate mathematical ideas	3, 6-10, 13, 29-31, 34, 39-41, 50-55, 57	throughout	66-68, 70- 78, 84-86, 88-91
(F)	analyze mathematical relationships to connect and communicate mathematical ideas	32-38, 40-	2-1, 2-2, 2- 3, 3-1, 4-1, 11-1, 11-2, 11-3, 24-1, 25-4, 26-1, 42-1, 42-2	66, 73-78, 80, 81

		Student Book Part A	Skill Builders Part A	Student Book Part B
(G)	display, explain, and justify mathematical ideas and arguments using precise mathematical language in written or oral communication	Journal prompts throughou t		Journal prompts throughou t
7.2	Number and operations. The student applies mathematical process standards to represent and use rational numbers in a variety of forms. The student is expected to extend previous knowledge of sets and subsets using a visual representation to describe relationships between sets of rational numbers.	14-26, 32- 35, 50	11-1, 11-2, 11-3, 12-2, 12-3, 13-2, 14-1, 18-1, 18-2, 20-2, 25-4, 48-2	61
7.3	Number and operations. The student applies mathematical process standards to add, subtract, multiply, and divide while solving problems and justifying solutions.			
(A)	add, subtract, multiply, and divide rational numbers fluently	7-10, 17- 23, 27-31, 52-56	7-1, 8-1, 9- 1, 10-1, 10- 2, 12-1, 12- 2, 12-3, 13- 1, 13-2, 13- 3, 14-1, 14- 2, 14-3, 15- 1, 15-2, 16- 1, 16-2, 17- 1, 21-1, 21- 2, 22-1, 22- 2, 22-3, 23- 1, 24-1, 48- 3 to 48-7	62-66, 69
(B)	apply and extend previous understandings of operations to solve problems using addition, subtraction, multiplication, and division of rational numbers	3, 4, 21, 22, 23, 27- 31, 52-56	12-1, 12-2, 12-3, 13-1, 13-2, 13-3, 14-1, 14-2, 14-3, 15-1, 15-2, 16-1, 16-2, 17-1	62-66, 69
7.4	Proportionality. The student applies mathematical process standards to represent and solve problems involving proportional relationships.			

		Student Book Part A	Skill Builders Part A	Student Book Part B
(A)	represent constant rates of change in mathematical and real- world problems given pictorial, tabular, verbal, numeric, graphical, and algebraic representations, including d = rt	36		73-76
(B)	calculate unit rates from rates in mathematical and real-world problems	36		66, 74
(C)	determine the constant of proportionality (k = y/x) within mathematical and real-world problems			73, 74
(D)	solve problems involving ratios, rates, and percents, including multi-step problems involving percent increase and percent decrease, and financial literacy problems	36, 37, 38, 40, 41	26-1, 26-2, 26-3, 26-4, 27-1, 27-2, 28-1 to 28- 3	66, 76, 77
(E)	convert between measurement systems, including the use of proportions and the use of unit rates	42	36-2, 37-1, 37-2	
7.5	Proportionality. The student applies mathematical process standards to use geometry to describe or solve problems involving proportional relationships.			
(A)	generalize the critical attributes of similarity, including ratios within and between similar shapes			81
(B)	describe $\boldsymbol{\pi}$ as the ratio of the circumference of a circle to its diameter	46		
(C)	solve mathematical and real-world problems involving similar shape and scale drawings			77, 81
7.6	Proportionality. The student applies mathematical process standards to use probability and statistics to describe or solve problems involving propportional relationships.			
(A)	represent sample spaces for simple and compound events using lists and tree diagrams	39	47-5	91
(B)	select and use different simulations to represent simple and compound events with and without technology			
(C)	make predictions and determine solutions using experimental data for simple and compound events	39		92-95
(D)	make predictions and determine solutions using theoretical probability for simple and compound events	39	47-5	92-95
(E)	find the probabilities of a simple event and its complement and describe the relationship between the two	37	47-1	92
(F)	use data from a random sample to make inferences about a population			83, 89, 96
(G)	solve problems using data represented in bar graphs, dot plots, and circle graphs, including part-to-whole and part-to-part comparisons and equivalents			84, 85, 86
(H)	solve problems using qualitative and quantitative predictions and comparisons from simple experiments			95, 96
(I)	determine experimental and theoretical probabilities related to simple and compound events using data and sample spaces	39	47-5	92-95

		Student Book Part A	Skill Builders Part A	Student Book Part B
7.7	Expressions, equations, and relationships. The student applies mathematical process standards to represent linear relationships using multiple representations. The student is expected to represent linear relationships using verbal descriptions, tables, graphs, and equations that simplify to the form y = mx + b.			73-76
7.8	Expressions, equations, and relationships. The student applies mathematical process standards to develop geometric relationships with volume.			
(A)	model the relationship between the volume of a rectangular prism and a rectangular pyramid having both congruent bases and heights and connect that relationship to the formulas		41-4	
(B)	explain verbally and symbolically the relationship between the volume of a triangular prism and a triangular pyramid having both congruent bases and heights and connect that relationship to the formulas		41-5	
(C)	use models to determine the approximate formulas for the circumference and area of a circle and connect the models to the actual formulas	46		78
7.9	Expressions, equations, and relationships. The student applies mathematical process standards to solve geometric problems.			
(A)	solve problems involving the volume of rectangular prisms, triangular prisms, rectangular pyramids, and triangular pyramids	48, 49	41-1, 41-2, 41-3, 41-4, 41-5	
(B)	determine the circumference and area of circles	46	39-1	78
(C)	determine the area of composite figures containing combinations of rectangles, squares, parallelograms, trapezoids, triangles, semicircles, and quarter circles		40-1, 40-4	79
(D)	solve problems involving the lateral and total surface area of a rectangular prism, rectangular pyramid, triangular prism, and triangular pyramid by determining the area of the shape's net			80
7.10	Expressions, equations, and relationships. The student applies mathematical process standards to use onevariable equations and inequalities to represent situations.			
(A)	write one-variable, two-step equations and inequalities to represent constraints or conditions within problems	12, 57	43-2	70, 71
(B)	represent solutions for one-variable, two-step equations and inequalities on number lines			72
(C)	write a corresponding real-world problem given a one- variable, two-step equation or inequality.	60(T.G.)		72(T.G.)

		Student Book Part A	Skill Builders Part A	Student Book Part B
7.11	Expressions, equations, and relationships. The student applies mathematical process standards to solve onevariable equations and inequalities.			
(A)	model and solve one-variable, two-step equations and inequalities	60	50-1	72
(B)	determine if the given value(s) make(s) one-variable, two-step equations and inequalities true		50-1	
(C)	write and solve equations using geometry concepts, including the sum of the angles in a triangle, and angle relationships	47, 48	33-2, 38-1	78, 79
7.12	Measurement and data. The student applies mathematical process standards to use statistical representations to analyze data.			
(A)	compare two groups of numeric data using comparative dot plots or box plots by comparing their shapes, centers, and spreads			86, 88, 89, 90
(B)	use data from a random sample to make inferences about a population			89, 96
(C)	compare two populations based on data in random samples from these populations, including informal comparative inferences about differences between the two populations			86, 88, 89, 90
7.13	Personal financial literacy. The student applies mathematical process standards to develop an economic way of thinking and problem solving useful in one's life as a knowledgeable consumer and investor.			
(A)	calculate the sales tax for a given purchase and calculate income tax for earned wages		28-1, 28-3	
(B)	identify the components of a personal budget, including income; planned savings for college, retirement, and emergencies; taxes; and fixed and variable expenses, and calculate what percentage each category comprises of the total budget			
(C)	create and organize a financial assets and liabilities record and construct a net worth statement			
(D)	use a family budget estimator to determine the minimum household budget and average hourly wage needed for a family to meet its basic needs in the student's city or another large city nearby			
(E)	calculate and compare simple interest and compound interest earnings			
(F)	analyze and compare monetary incentives, including sales, rebates, and coupons			

Skill Builders Part B	
throughout	
throughout	
throughout	
throughout	
26-5, 32-1, 39-2, 46-1, 46-2, 46-3, 46-4, 53-1	

Skill Builders Part B
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48-8, 48-10, 48-11, 48-12
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Skill Builders Part B	
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