Grade 8 Math Pacing Guide (July 2018)

For more details, resources and activity ideas, see the Grade 8 Math Pacing Guide with Notes.

Stick as close to the Pacing Guide as possible so that all topics will be covered. However, note that Flex days are build in to allow for additional practice time, quizzes, and assessments. Plan ahead. This pacing guide is based on the school calendar for 2018-2019.

	Day 1	Day 2	Day 3	Day 4	Day 5
Week 1 (9/3)	Closed	Closed	Closed	Flex	Flex
Week 2 (9/10)	1.1 A – Rem Exp notation Bases with ( ) Even/Odd Exp Structure	1.2 A Mult Prop Div Prop	1.3 A Pwr to a Pwr St:	1.4 A Zero Pwr Revisit exp not Sprint	1.5 A Neg Exp
Week 3 (9/17)	Flex	1.7 B +/- Pwrs of 10	1.8 B Sci Not "How many times greater" Magnitude Write in SciNot Multiply simple Sci Not Sprint	***1.13 B**** Compare #s in Sci Not Technology	1.9 B Add Sci Not
Week 4 (9/24)	1.9 B Subtract Sci Not	1.10 B Divide Sci Not	1.12 B Explore science and real world units	Flex	Flex
Week 5 (10/1)	Flex	2.1A & 2.2 A Conceptual Intro Translations (vector language may be eliminated or used for enrichment as this is a high school concept)	2.3 A Parallel Lines & Translations	2.4A Reflections	2.5A Rotations
Week 6 (10/8)	No Students	2.6 A Rotations by degrees	2.7 B Translation Sequences	2.8 B Reflection & Translation Sequences	2.9 B Rotation Sequences
Week 7 (10/15)	2.10 B More Sequencing Practice	2.11 C Define Congruence (Applied to transformations)	Flex	Review (7th) Complementary, Supplementary & Vertical Angles	2.12 C Parallel Lines (Alt Int & Ext Angles; Corresponding Angles)
Week 8 (10/22)	2.13 C Triangle Interior Angles/Parallel lines	2.14 C Exterior Angles of Triangles	Flex	Flex	3.1 A Add 3.2 & 3.3? Conceptual Introduction to

					Dilations
Week 9 (10/29)	3.5A Scale Factors & Dilations	3.6A Scale Factors & Dilations	3.8B Dilations & Similarity	3.9B Similarity Properties	3.10B Angle-Angle Criterion for Similarity
Week 10 (11/5)	Flex	Flex	Flex (ED)	Closed	Closed
Week 11 (11/12)	2.15 D (Pythagorean Theorem Mini-Unit) Proof	7.15 C PT Proof	3.13C(ED) PT Proof	2.16 D(ED) Problem Solving with PT	3.14 C(ED) Convers e of PT
Week 12 (11/19)	Flex	Flex	Flex (ED)	Closed	Closed
Week 13 (11/26)	Flex	4.3 A (Topic A: Linear Equations) Identify linear equations and write from word probs (could use easy wp from 4.1A)	4.4A Variables on both sides	4.5A (Supplement) Angles & Equations; word problems	4.6A Distributive property & no solution equations
Week 14 (12/3)	4.7A Number of solutions to equations	Flex	Flex	7.1A Pythagorean Theorem with Rational and Irrational Solutions	7.2A Square roots (Rational & Irrational)
Week 15 (12/10)	7.3A Square & Cube Roots; Fractions; Practice with Neg Exponents; Equations with Exp 2 & 3.	7.5A More Practice with Solving Equations with Exp 2 & 3	7.16 C More practice with Converse of Pyth Th; Rational & Irrational Solutions	7.17C Distance on the coordinate plane using Pyth Theorem	7.18 C Applications of Pyth Th to 2D objects; Real world problems.
Week 16 (12/17)	Flex	Flex	Benchmark Test (MP 1)	Flex	Flex (ED)
Week 17 (12/24)	Closed	Closed	Closed	Closed	Closed
Week 18 (12/31)	Closed	Closed	Flex	4.10B-Rem (Topic B: Prop Relationships) D=RT; proportional relationships review; could use some easy examples from 4.8	4.11 B Constant rate of change
Week 19 (1/7)	4.15C (Topic C: Slope) Concepts of slope	4.16C Slope formula	4.17C Y = mx + b	4.18C (Supplement) Interpret m and b in context of word problems.	4.21C (Supplement) Graph linear equations and write equations

					from graphs.
Week 20 (1/14)	4.22C Slope and constant rate of change.	Flex	Flex	4.24 D (Topic D: Systems of Equations) Graphing Systems	4.25D Graphing Systems
Week 21 (1/21)	No Students	4.26 D No solution systems – solve by evaluating the structure of 2 equations; not solving algebraically	4.27 D (2 days) One, none and infinite solutions; algebraic solving.	4.27 D (2 days) One, none and infinite solutions; algebraic solving.	4.28D (2 days) Substitution method for solving systems
Week 22 (1/28)	4.28D (2 days) Substitution method for solving systems	4.29D (2 days) System word problems.	4.29D (2 days) System word problems.	Flex	Flex
Week 23 (2/4)	5.2A Functions: one input – one output	5.3 A Linear function = linear equation; constant rate and proportional relationships	5.5 A Graphs of functions (include non-functions)	5.6 A Graphs; linear equation; constant rate; rate of change (tables)	5.7 A Functions as graphs, equations, tables and verbal descriptions; comparing functions
Week 24 (2/11)	5.8 A Nonlinear functions do not have constant rate of change; add in vertical line test	Flex	Flex	5.9 B Rem (2 days) Geo functions: volume and rectangular prisms; Area of squares and circles	5.9 B Rem (2 days) Geo functions: volume and rectangular prisms; Area of squares and circles
Week 25 (2/18)	Closed	5.10 B Volume of right cylinder and cones.	5.10 B Volume of right cylinder and cones.	5.11 B Volume of Spheres	Flex
Week 26 (2/25)	7.19C Pythagorean Theorem and volume problems	7.20D Pythagorean Theorem and volume problems	7.21 D Pythagorean Theorem and volume problems	Flex	Flex
Week 27 (3/4)	6.1 A Modeling linear equations/functions	6.2A Functions: Interpreting rate of change and initial value (m and b in context)	6.3A (ED) Functions of graphs and rate of change/initial value.	6.4A (ED) Increasing and decreasing functions (graphing stories)	6.5A (ED) Increasing and decreasing functions (linear and nonlinear)
Week 28	Flex	Flex	Benchmark	Flex	Flex

(3/11)			Test (MP 2)		
Week 29 (3/18)	6.6B Scatter plots introduction	6.7B Patterns in scatter plots	6.8B Line of best fit	6.9C Equation for line of best fit	Flex
Week 30 (3/25)	6.10C Linear models; independent and dependent values?	6.11C Linear models and data in context.	Flex	Flex	Flex
Week 31 (4/1)	6.13D Two way tables	6.14D Two way tables	Flex	Flex	7.6B Finite and infinite decimals
Week 32 (4/8)	7.7B Infinite decimals (Density property)	7.8B Long division with repeating and terminating decimals.	7.9B Decimal expansion of fractions	7.10B Convert repeating decimals to fractions	7.11B Find first few decimal places of irrational numbers (square roots)
Week 33 (4/15)	Rational & Irrational numbers (supplement)	7.13B Comparing irrational numbers	Flex	Flex(ED)	Closed
Week 34 (4/22)	Closed	Closed	Closed	Closed	Closed
Week 35 (4/29)	Flex	Flex	Flex	Flex	Flex
Week 36 (5/6)	Plan for PARCC to be close to this time.				
Week 37 (5/13)	Plan for PARCC to be close to this time.				
Week 38 (5/20)	Plan for PARCC to be close to this time.				
Week 39 (5/27)	Closed	Flex	Flex	Flex	Flex
Week 40 (6/3)	Flex	Flex			
Week 41 (6/10)	Flex	Flex	Benchmark	Benchmark	MP End
Week 42 (6/17)					
Week 43 (6/24)	Last Day				