Standards Plus High Impact Standards – Mathematics – Grade 4

Domain	Lesson	Focus	Digital Lesson #	Standard(s)
Number and Operations in Base Ten	1	Add Multi-digit Whole Numbers	13	4.NBT.4: Fluently add and subtract multi-digit whole numbers using the standard algorithm.
	2	Add Multi-digit Whole Numbers	14	
	3	Subtract Multi-digit Whole Numbers	15	
	4	Subtract Multi-digit Whole Numbers	16	
	A1	Assessment – Add and Subtract Multi–digit Whole Numbers	A4	
	5	Multiplication of Whole Numbers	17	4.NBT.5: Multiply a whole number of up to four digits by a one-digit whole number, and multiply two two-digit numbers, using strategies based on place value and the properties of operations. Illustrate and explain the calculation by using equations, rectangular arrays, and/or area models.
	6	Multiplication of Whole Numbers	18	
	7	Multiplication of Whole Numbers	19	
	8	Multiplication of Whole Numbers	20	
	A2	Assessment – Multiplication of Whole Numbers	A5	
	9	Dividing Whole Numbers	21	4.NBT.6: Find whole-number quotients and remainders with up to four–digit dividends and one-digit divisors, using strategies based on place value, the properties of operations, and/or the relationship between multiplication and division. Illustrate and explain the calculation by using equations, rectangular arrays, and/or area models.
	10	Dividing Whole Numbers	22	
	11	Dividing Whole Numbers	23	
	12	Dividing Whole Numbers	24	
	A3	Assessment – Dividing Whole Numbers	A6	
		Performance Lesson – *Working with Operations*		
Operations and Algebraic Thinking	1	Commutative Property of Multiplication	1	4.OA.2: See below.
	2	Represent Verbal Statements as Equations	2	4.OA.1: Interpret a multiplication equation as a comparison, e.g., interpret 35 = 5 × 7 as a statement that 35 is 5 times as many as 7 and 7 times as many as 5. Represent verbal statements of multiplicative comparisons as multiplication equations.
	3	Represent Verbal Statements as Equations	3	
	4	Represent Verbal Statements as Equations	4	
	A1	Assessment – Multiplicative Comparison	A1	4.OA.1, 4.OA.2
	5	Multiplicative Comparison Problems	9	4.OA.2: Multiply or divide to solve word problems involving multiplicative comparison, e.g., by using drawings and equations with a symbol for the unknown number to represent the problem, distinguishing multiplicative comparison rom additive comparison.
	6	Multiplicative Comparison Problems	10	
	7	Multistep Word Problems	11	4.OA.3: See below.
	8	Multistep Word Problems	12	
	A2	Assessment –Word Problems	A3	4.OA.2, 4.OA.3
	9	Multistep Addition & Subtraction Word Problems	13	4.OA.3: Solve multistep word problems posed with whole numbers and having whole-number answers using the four operations, including problems in which remainders must be interpreted. Represent these problems using equations with a etter standing for the unknown quantity. Assess the reasonableness of answers using mental computation and estimation strategies including rounding.
	10	Multistep Multiplication Word Problems	14	
	11	Multistep Word Problems	15	
	12	Multistep Word Problems	16	
	A3	Assessment – Multistep Word Problems	A4	

Standards Plus High Impact Standards – Mathematics – Grade 4

Domain	Lesson	Focus	Digital Lesson #	Standard(s)
Operations and Algebraic Thinking	13	Division Word Problems with Remainders	17	4.OA.3
	14	Division Word Problems with Remainders	18	
	15	Division Word Problems with Remainders	19	
	16	Division Word Problems with Remainders	20	
	A4	Assessment – Solving Division Word Problems with Remainders	A5	
Number and Operations – Fractions	1	Equivalent Fractions	1	4.NF.1: Explain why a fraction *a/b* is equivalent to a fraction (n x a) / (n x b) by using visual fraction models, with attention to how the number and size of the parts differ even though the two fractions themselves are the same size. Use this principle to recognize and generate equivalent fractions.
	2	Equivalent Fractions	2	
	3	Comparing Fractions	3	4.NF.2 Compare two fractions with different numerators and different denominators. Recognize that comparisons are valid only when the two fractions refer to the same whole. Record the results of comparisons with symbols >, =, or <, and justify the conclusions.
	4	Comparing Fractions	4	
	A1	Assessment – Equivalent Fractions and Comparing Fractions	A1	4.NF.1, 4.NF.2
	5	Add and Subtract Like Fractions	9	4.NF.3a: Understand addition and subtraction of fractions as joining and separating parts referring to the same whole.
	6	Decomposing and Composing Fractions	10	4.NF.3b: Decompose a fraction into a sum of fractions with the same denominator in more than one way, recording each decomposition by an equation. Justify decompositions, e.g., by using a visual fraction model. *Examples: 3/8 = 1/8 + 1/8 + 1/8; 3/8 = 1/8 + 2/8 ; 2 1/8 = 1 + 1 + 1/8 = 8/8 + 8/8 + 1/8.*
	7	Decomposing Fractions	11	
	8	Decomposing Mixed Numbers	12	
	A2	Assessment – Composing and Decomposing Fractions	A3	4.NF.3a, 4.NF.3b
		Performance Lesson – *All About Fractions*		
	9	Adding Mixed Numbers	13	4.NF.3c: Add and subtract mixed numbers with like denominators, e.g., by replacing each mixed number with an equivalent fraction, and/or by using properties of operations and the relationship between addition and subtraction.
	10	Adding Mixed Numbers	14	
	11	Subtracting Mixed Numbers	15	
	12	Subtracting Mixed Numbers	16	
	A3	Assessment – Add and Subtract Mixed Numbers	A4	
	13	Add Fractions to Solve Word Problems	17	4.NF.3d: Solve word problems involving addition and subtraction of fractions referring to the same whole and having like denominators, e.g., by using visual fraction models and equations to represent the problem.
	14	Subtract Fractions to Solve Word Problems	18	
	15	Add/Subtract Fractions to Solve Word Problems	19	
	16	Add/Subtract Fractions to Solve Word Problems	20	
	A4	Assessment – Word Problems - Adding/ Subtracting Fractions	A5	
		Performance Lesson – *Adding and Subtracting Fractions*		
	17	Multiply Fractions by Whole Numbers	21	4.NF.4a: Apply and extend previous understandings of multiplication to multiply a fraction by a whole number. Understand a fraction a/b as a multiple of 1/b.
	18	Multiplying Fractions by Whole Numbers	22	
	19	Multiplying Fractions by Whole Numbers	23	4.NF.4b: Apply and extend previous understandings of multiplication to multiply a fraction by a whole number. Understand a fraction a/b as a multiple of 1/b, and use this understanding to multiply a fraction by a whole number.
	20	Multiplying Fractions by Whole Numbers	24	
	A5	Assessment – Multiplying Fractions by Whole Numbers	A6	4.NF.4a, 4.NF.4b
		Performance Lesson – *Multiplying Fractions*		

Standards Plus High Impact Standards – Mathematics – Grade 4

Domain	Lesson	Focus	Digital Lesson #	Standard(s)
Number and Operations – Fractions	21	Converting Fractions - 10ths to 100ths	29	4.NF.5: Express a fraction with denominator 10 as an equivalent fraction with denominator 100, and use this technique to add two fractions with respective denominators 10 and 100.
	22	Add Fractions	30	
	23	Convert Fractions to Decimals	31	4.NF.6: Use decimal notation for fractions with denominators 10 or 100. *For example, rewrite 0.62 as 62/100; describe a length as 0.62 meters; locate 0.62 on a number line diagram.*
	24	Decimals on a Number Line	32	
	A6	Assessment – Converting Fractions	A8	4.NF.5, 4.NF.6
	25	Compare Decimals	33	4.NF.7: Compare two decimals to hundredths by reasoning about their size. Recognize that comparisons are valid only when the two decimals refer to the same whole. Record the results of comparisons with the symbols >, =, or <, and justify the conclusions, e.g., by using a visual model.
	26	Compare Decimals	34	
	27	Compare Decimals	35	
	28	Compare Decimals	36	
	A7	Assessment – Compare Decimals	A9	
		Performance Lesson – *Fractions and Decimals*		