



MAJOR CONTENT

The student solves problems involving the Major Content for the course with connections to the Standards for Mathematical Practice.

	Major Content					
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic		
Compare Fractions and Compare Decimals 4.NF.A.1 4.NF.A.2 4.NF.C.5 4.NF.C.6 4.NF.C.7 LEAP.I.4.1	Compares decimals to hundredths; uses decimal notations for fractions (tenths and hundredths). Compares fractions, with like or unlike numerators and denominators, by creating equivalent fractions and comparing to a benchmark fraction.	Given a visual model, compares decimals to hundredths; expresses a fraction with denominator 10 as an equivalent fraction with denominator 100; uses decimal notation for fractions (tenths and hundredths); and compares fractions, with like or unlike numerators and denominators, by creating equivalent fractions and comparing to a benchmark	Given a visual model, compares decimals to hundredths; uses decimal notations for fractions (tenths and hundredths); and compares fractions, with like or unlike numerators and denominators by comparing to a benchmark fraction.	Given a visual model, compares decimals to hundredths; uses decimal notations for fractions (tenths and hundredths); and compares fractions with like denominators.		
	Recognizes that decimals and fractions must refer to the same whole in order to compare. Shows results using symbols. Demonstrates the use of conceptual understanding of fractional equivalence and	fraction. Recognizes that decimals and fractions must refer to the same whole in order to compare. Shows results using symbols. Solves simple word problems requiring fraction comparison.	Recognizes that decimals and fractions must refer to the same whole in order to compare. Shows results using symbols. Solves simple word problems requiring fraction comparison with			
	ordering when solving simple word problems requiring fraction comparison.		scaffolding.			





	Major Content				
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic	
	Adds fractions with denominators of 10 and 100.				
Solve Fraction Problems	Understands and solves mathematical and word	Using visual models, solves mathematical and word	Using visual models, solves mathematical	Using visual models, solves mathematical problems	
4.NF.B.3 LEAP.I.4.6	problems involving the addition and subtraction of fractions and mixed numbers with like	problems involving the addition and subtraction of fractions and mixed numbers	problems involving the addition and subtraction of fractions with like	involving the addition and subtraction of fractions with like denominators by	
	denominators by joining and separating parts referring to the same whole, and justifies the solution with a visual model.	with like denominators by joining and separating parts referring to the same whole.	denominators by joining and separating parts referring to the same whole.	joining and separating parts referring to the same whole.	
	Decomposes a fraction into a sum of fractions with the same denominator in more than one way and records the decomposition using an equation.	Decomposes a fraction into a sum of fractions with the same denominator in more than one way and records the decomposition using an equation.	Decomposes a fraction into a sum of fractions with the same denominator and records the decomposition using an equation.		
Multiply Fractions by Whole Numbers 4.NF.B.4	Describes a visual fraction model and solves mathematical and real-world problems by recognizing that a fraction <i>a/b</i> is a multiple of 1/ <i>b</i> and multiplies a fraction by a whole number.	Using visual models, solves mathematical and real- world problems by recognizing that a fraction <i>a/b</i> is a multiple of 1/ <i>b</i> and multiplies a fraction by a whole number.	Using visual models, solves mathematical problems by recognizing that a fraction <i>a/b</i> is a multiple of 1/ <i>b</i> and multiplies a fraction by a	Using visual models, solves mathematical problems by recognizing that a fraction a/b is a multiple of $1/b$.	
Multiplicative Comparison 4.OA.A.1 4.OA.A.2	Interprets multiplication equations as comparisons and represents statements of comparisons as multiplication equations.	Interprets multiplication equations as comparisons or represents statements of comparisons as multiplication equations.	whole number. Interprets multiplication equations as comparisons or represents statements of comparisons as multiplication equations.	Interprets multiplication equations as comparisons or represents statements of comparisons as multiplication equations.	





	Major Content				
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic	
	Uses multiplication or division to solve multi-step word problems involving multiplicative comparisons.	Uses multiplication or division to solve one- or two-step word problems involving multiplicative comparisons.	Uses multiplication or division to solve scaffolded one - or two- step word problems involving multiplicative comparisons.		
	Uses a symbol for the unknown number in an equation or expression.				
Solve Multi-	Solves multi-step word problems	Solves two-step word	Solves one- or two-step	Solves one-step problems	
step	using the four operations with	problems using the four	problems using the four	using the four operations	
Problems	whole numbers.	operations with whole	operations with whole	with whole numbers.	
4.0A.A.3		numbers.	numbers.		
4.NBT.B.5	Multiplies a three- or four-digit	Multiplies a three-digit by a	Multiplies a three-digit by	Multiplies a three-digit by a	
4.NBT.B.6	by a one-digit number, or two	one-digit number, or two two-	a one-digit number, or	one-digit number, or two	
LEAP.I.4.2	two-digit numbers.	digit numbers.	two two-digit numbers.	two-digit numbers.	
LEAP.I.4.3	Finds whole number quotients	Finds whole number quotients	Finds whole number	Finds whole number	
LEAP.I.4.4	and remainders with up to four-	and remainders with up to	quotients and remainders	quotients and remainders	
LEAP.I.4.5	digit dividends and one-digit	three-digit dividends and one-	with up to three-digit	with up to three-digit	
	divisors and interprets	digit divisors and interprets	dividends and one-digit	dividends and one-digit	
	remainders.	remainders.	divisors.	divisors.	
Place Value	In any multi -digit whole number,	In any four- digit whole	In any three-digit whole	In any three-digit whole	
4.NBT.A.1	recognizes a digit in one place	number, recognizes a digit in	number, recognizes a digit	number, recognizes a digit	
4.NBT.A.2	represents 10 times as much as it	one place represents 10 times	in one place represents 10	in one place represents 10	
4.NBT.A.3	represents in the place to its	as much as it represents in the	times as much as it	times as much as it	
	right.	place to its right.	represents in the place to	represents in the place to	
			its right.	its right.	





	Major Content				
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic	
	Reads, writes, and compares	Reads, writes, and compares	Reads, writes, and		
	multi-digit whole numbers using	four-digit whole numbers	compares three-digit		
	base-10 numerals, number	using base-10 numerals,	whole numbers using		
	names in expanded form and	number names in expanded	base-10 numerals,		
	symbols (>, <, =), rounds to any	form and symbols (>, <, =),	number names in		
	place value.	and rounds to any place value.	expanded form and		
			symbols (>, <, =), and		
			rounds to any place value		
			with scaffolding.		
Addition and	Fluently adds and subtracts	Fluently adds and subtracts	Adds and subtracts multi-	Adds or subtracts multi-	
Subtraction	multi-digit whole numbers	multi-digit whole numbers.	digit whole numbers.	digit whole numbers.	
4.NBT.B.4	Solves multi-step problems by	Solves two -step problems by	Solves one-step problems	Solves one-step problems	
LEAP.I.4.7	adding or subtracting multi-digit	adding and subtracting multi-	by adding and subtracting	by adding and subtracting	
LEAP.I.4.8	whole numbers.	digit whole numbers.	multi-digit whole	multi-digit whole numbers.	
			numbers.		





ADDITIONAL & SUPPORTING CONTENT

The student solves problems involving the Additional & Supporting Content for the course with connections to the Standards for Mathematical Practice.

	Additional & Supporting Content				
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic	
Operations	Recognizes a whole number is a	Recognizes a whole number is	Recognizes a whole	Recognizes a whole	
and Factors	multiple of factors and	a multiple of factors and	number is a multiple of	number is a multiple of	
4.OA.B.4	determines all factor pairs and	determines factor pairs or	factors and determines	factors and identifies factor	
	multiples of whole numbers	multiples of whole numbers	factor pairs or multiples of	pairs or multiples of whole	
	within the range of 1-100.	within the range of 1-100.	whole numbers within the	numbers within the range	
			range of 1-100.	of 1-100.	
	Determines whether a whole	Determines whether a whole	Determines, with		
	number in the range 1-100 is	number in the range 1-100 is	scaffolding, whether a		
	prime or composite.	prime or composite.	whole number in the range		
			1-100 is prime or		
			composite.		
Measurement	Solves measurement word	Solves measurement word	Solves mathematical	Solves mathematical	
and	problems with whole numbers,	problems with whole	measurement problems	measurement problems	
Conversion	including calculating area and	numbers, including	with whole numbers using	with whole numbers, using	
4.MD.A.1	perimeter (when side lengths	calculating area and	all four operations, and	all four operations, and	
4.MD.A.2	are not provided), using all	perimeter (when information	using addition, subtraction,	using addition and	
4.MD.A.3	four operations, and using	about side lengths is	and multiplication of	subtraction of simple	
LEAP.I.4.6	addition, subtraction, and	provided), using all four	simple fractions.	fractions.	
	multiplication of simple	operations, and using			
	fractions.	addition, subtraction, and			
		multiplication of simple			
		fractions.			
	Records measurement	Records measurement	Records measurement		
	equivalents in a two-column	equivalents in a two-column	equivalents in a two-		
	table.	table.	column table.		





	Additional & Supporting Content					
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic		
	Uses knowledge of measurement units within one system to solve problems by converting from larger units to smaller units. Represents measurement quantities using diagrams and provides the appropriate measurement scale given the	Uses knowledge of measurement units within one system to solve problems by converting from larger units to smaller units. Represents measurement quantities using diagrams with a given measurement scale.	Uses knowledge of measurement units within one system to convert from larger units to smaller units.			
Represent and Interpret Data 4.MD.B.4	context. Makes a line plot to display a data set of measurements in fractions of a unit with like denominators of 2, 4, or 8, (including mixed numbers) and uses addition and subtraction of fractions to solve problems involving information in the line plots and evaluates the solution in relation to the data.	Makes a line plot to display a data set of measurements in fractions of a unit with like denominators of 2, 4, or 8 and uses addition and subtraction of fractions to solve problems involving information in the line plot.	Makes a line plot to display a data set of measurements in fractions of a unit with like denominators of 2 or 4.	Identifies a correct line plot that displays a data set of measurements in fractions of a unit with like denominators of 2 or 4.		
Geometric Measurement 4.MD.C.5 4.MD.C.6 4.MD.C.7	Understands and applies concepts of angle measurement recognizing that angles are measured in reference to a circle. Recognizes how angles are formed and that angle	Understands and applies concepts of angle measurement. Recognizes how angles are formed and that angle	Understands and applies concepts of angle measurement.	Understands and identifies concepts of angle measurement.		





	Additional & Supporting Content				
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic	
	Uses a protractor to measure	Uses a protractor to measure	Uses a protractor to		
	and sketch angles.	and sketch angles.	measure angles.		
	Solves mathematical and real-	Solves mathematical and			
	world problems by composing	real-world problems by			
	and decomposing angles and	composing and decomposing			
	using an equation with a	angles.			
	symbol for the unknown angle				
	measure.				
Additive Area	Recognizes area as additive and	Recognizes area as additive	Recognizes area as		
4.MD.D.8	find areas of rectilinear figures	and find areas of rectilinear	additive and find areas of		
	by decomposing them into	figures by decomposing them	rectilinear figures by		
	non-overlapping rectangles and	into non-overlapping	decomposing them into		
	adding the areas of the non-	rectangles and adding the	non-overlapping		
	overlapping parts, applying this	areas of the non-overlapping	rectangles and adding the		
	technique to solve real-world	parts, applying this technique	areas of the non-		
	problems.	to solve real-world problems.	overlapping parts.		
Lines, Angles	Fluently identifies and uses	Identifies and uses	Identifies and uses points,	Identifies points, lines, line	
and Shapes	points, lines, line segments,	points, lines, line segments,	lines, line segments, rays,	segments, rays, angles	
4.G.A.1	rays, angles (right, obtuse and	rays, angles (right, obtuse and	angles (right, obtuse and	(right, obtuse and acute),	
4.G.A.2	acute), perpendicular lines,	acute), perpendicular lines,	acute), perpendicular lines,	perpendicular lines,	
4.G.A.3	parallel lines, lines of	parallel lines, lines of	parallel lines, lines of	parallel lines, lines of	
	symmetry, and right triangles	symmetry, and right triangles	symmetry, and right	symmetry, and right	
	to classify or describe two-	to classify two-dimensional	triangles to classify	triangles.	
	dimensional figures.	figures.	quadrilaterals and		
			triangles.		



2025

Louisiana	Be	lieves
-----------	----	--------

Additional & Supporting Content					
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic	
Generate and	Generates a number or shape	Generates a number or shape	Generates a number or	Identifies a number or	
Analyze	pattern that follows a given	pattern that follows a given	shape pattern that follows	shape pattern that follows	
Patterns	rule and identifies apparent	rule and identifies explicit	a given rule.	a given rule.	
4.OA.C.5	features of the pattern (not explicit in the rule) and describes the rule for generating the number or shape pattern.	features of the pattern.			





EXPRESSING MATHEMATICAL REASONING

In connection with course content, the student expresses course-level appropriate mathematical reasoning by constructing viable arguments, critiquing the reasoning of others and/or attending to precision when making mathematical statements.

	Expressing Mathematical Reasoning				
Content	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic	
	In connection with the content kn Major Content, the student clearl	0	In connection with the content k described in Major Content, the s communicates a	-	
LEAP.II.4.1 LEAP.II.4.2 LEAP.II.4.3 LEAP.II.4.4	complete written response based on properties of operations; the relationships between addition and subtraction and between multiplication and division; and identification of arithmetic patterns		written response based on proper relationships between addition a between multiplication and divis arithmetic patterns	nd subtraction and	
LEAP.II.4.5 LEAP.II.4.6 LEAP.II.4.7	well-organized and complete response based on operations using concrete referents such as diagrams, including number lines, (whether provided in the prompt or constructed by the student) and connecting the diagrams to a written (symbolic) method		response based on operations using concrete referents such as diagrams, including number lines, (provided in the prompt) and connecting the diagrams to a written (symbolic) method		
	well-organized and complete response by presenting and defending solutions to multi- step problems as valid chains of reasoning; using symbols appropriately; evaluating reasoning; and presenting and defending corrected reasoning	well-organized and complete response by presenting and defending solutions to multi-step problems as valid chains of reasoning; using symbols appropriately; distinguishing correct reasoning from flawed; and identifying and describing a flaw in reasoning or in solutions to multi-step problems; and presenting corrected reasoning	complete response by presenting solutions to multi- step problems as valid chains of reasoning; using symbols appropriately; distinguishing correct reasoning from flawed; and identifying and describing a flaw in reasoning or solutions to multi-step problems; and presenting corrected reasoning	response by presenting solutions to scaffolded two-step problems as valid chains of reasoning; using symbols appropriately; distinguishing correct reasoning from flawed; and identifying a flaw in reasoning	





Expressing Mathematical Reasoning				
Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic	
Responses may include:				
a logical/defensible approach based on a conjecture and/or stated assumptions, using mathematical connections	a logical/ defensible approach based on a conjecture and/or stated assumptions, using mathematical connections	a logical approach based on a conjecture and/or stated assumptions	an approach based on a conjecture and/or stated or faulty assumptions	
an efficient and logical progression of steps with appropriate justification	a logical progression of steps	a logical , but incomplete, progression of steps	an incomplete or illogical progression of steps	
precision of calculation	precision of calculation	minor calculation errors	an intrusive calculation error	
fluent use of grade-level vocabulary, symbols, and labels	fluent use of grade-level vocabulary, symbols, and labels	limited use of grade-level vocabulary, symbols, and labels	limited use of grade- level vocabulary, symbols, and labels	
justification of a conclusion	justification of a conclusion	partial justification of a conclusion based on calculations	partial justification of a conclusion based on calculations	
determining whether an argument or conclusion is generalizable				
evaluating, interpreting and critiquing the validity of responses, reasoning, and approaches, using mathematical connections and providing a counter-example where	evaluating, interpreting, and critiquing the validity of responses, reasoning, and approaches using mathematical connections	evaluating the validity of responses, approaches, and conclusions		
	Responses may include:a logical/defensible approachbased on a conjecture and/orstated assumptions, usingmathematical connectionsan efficient and logicalprogression of steps withappropriate justificationprecision of calculationfluent use of grade-levelvocabulary, symbols, and labelsjustification of a conclusiondetermining whether anargument or conclusion isgeneralizableevaluating, interpreting andcritiquing the validity ofresponses, reasoning, andapproaches, using mathematicalconnections and providing a	Level 5: AdvancedLevel 4: MasteryResponses may include:a logical/defensible approach based on a conjecture and/or stated assumptions, using mathematical connectionsa logical/defensible approach based on a conjecture and/or stated assumptions, using mathematical connectionsan efficient and logical progression of steps with appropriate justificationa logical progression of stepsfluent use of grade-level vocabulary, symbols, and labelsfluent use of grade-level vocabulary, symbols, and labelsjustification of a conclusion is generalizablejustification of a conclusion is generalizableevaluating, interpreting and critiquing the validity of responses, reasoning, and approaches, using mathematical connections and providing a counter-example whereevaluating, interpreting, and approaches using mathematical connections	Level 5: AdvancedLevel 4: MasteryLevel 3: BasicResponses may include:a logical/defensible approach based on a conjecture and/or stated assumptions, using mathematical connectionsa logical/defensible approach based on a conjecture and/or stated assumptions, using mathematical connectionsa logical/defensible approach based on a conjecture and/or stated assumptions, using mathematical connectionsa logical/defensible approach based on a conjecture and/or stated assumptions, using mathematical connectionsa logical approach based on a conjecture and/or stated assumptionsan efficient and logical progression of steps with appropriate justificationa logical progression of steps precision of calculationa logical, but incomplete, progression of stepsfluent use of grade-level vocabulary, symbols, and labelsfluent use of grade-level vocabulary, symbols, and labelslimited use of grade-level vocabulary, symbols, and labelsjustification of a conclusionjustification of a conclusionpartial justification of a conclusion based on calculationsdetermining whether an argument or conclusion is generalizableevaluating, interpreting, and approaches, using mathematical connections and providing a connectionsevaluating, interpreting, and approaches, using mathematical connectionsevaluating, interpreting a counter-example whereevaluating, interpreting, and approaches, using mathematical connectionsevaluating, interpreting, and approaches, using mathematical connections	





MODELING & APPLICATION

In connection with content, the student solves real-world problems with a degree of difficulty appropriate to the grade/course by applying knowledge and skills articulated in the standards for the current grade/course (or for more complex problems, knowledge and skills articulated in the standards for previous grades/courses), engaging particularly in the Modeling practice, and where helpful making sense of problems and persevering to solve them, reasoning abstractly, and quantitatively, using appropriate tools strategically, looking for the making use of structure and/or looking for and expressing regularity in repeated reasoning.

		Modeling & Application	on	
	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic
Content	In connection with the content k	nowledge, skills, and abilities desci	ribed in Major Content, the stud	lent devises a plan and
	applies mathematics to solve mu	lti-step, real-world contextual wor	d problems by:	
LEAP.III.4.1	using stated assumptions and	using stated assumptions and	using stated assumptions	using stated assumptions
LEAP.III.4.2	approximations or making	approximations or making	and approximations to	and approximations to
	assumptions to simplify a real-	assumptions to simplify a real-	simplify a real-world	simplify a real-world
	world situation	world situation	situation	situation
	analyzing and/or creating			
	constraints, relationships, and			
	goals			
	mapping relationships between	mapping relationships	illustrating relationships	identifying quantities by
	quantities by selecting	between quantities by	between quantities by using	using provided tools to
	appropriate tools to create	selecting appropriate tools to	provided tools to create	create models
	models	create models	models	
	analyzing relationships	analyzing relationships	analyzing relationships	analyzing relationships
	mathematically between	mathematically between	mathematically between	mathematically to draw
	quantities to draw conclusions	quantities to draw conclusions	quantities to draw	conclusions
			conclusions	
	justifying and defending			
	models to lead to a conclusion			
	interpreting mathematical	interpreting mathematical	interpreting mathematical	
	results in the context of the	results in the context of the	results in a simplified	
	situation	situation	context	





Modeling & Application				
	Level 5: Advanced	Level 4: Mastery	Level 3: Basic	Level 2: Approaching Basic
Content	ntent In connection with the content knowledge, skills, and abilities described in Major Content, the student devises a pla			
	applies mathematics to solve multi-step, real-world contextual word problems by:			
	reflecting on whether results	reflecting on whether results	reflecting on whether	
	make sense	make sense	results make sense	
	improving a model if it has not	modifying and/or improving a	modifying a model if it has	
	served its purpose	model if it has not served its	not served its purpose	
		purpose		
	writing a concise arithmetic	writing an arithmetic	writing an arithmetic	writing an arithmetic
	expression or equation to	expression or equation to	expression or equation to	expression or equation to
	describe a situation	describe a situation	describe a situation	describe a situation