## Mrs. Rayman's 6th Grade Math Weekly Lesson Plans

Unit 4 Common Core State Standards
6.EE. 1 Write and evaluate numerical expressions involving whole-number exponents.
6.EE. 2 Write, read, and evaluate expressions in which letters stand for numbers.
6.EE.2c Evaluate expressions at specific values of their variables. Include expressions that arise from formulas used in real-world problems. Perform arithmetic operations, including those involving whole-number exponents, in the conventional order when there are no parentheses to specify a particular order (Order of Operations)
6.EE. 3 Apply the properties of operations to generate equivalent expressions.
6.EE. 4 Identify when two expressions are equivalent (i.e. when the two expressions name the same number regardless of which value is substituted into them).

## Unit 4 Essential Questions:

- How can one use algebraic symbols to write equations and inequalities representing real-world situations?
- How can one solve one-step equations and use substitution to determine if a given value is a solution?


## Number Sense:

- Ways to make an equivalent expression
- Ways to make a solution
- Always, sometimes, never
- What's my rule?


## Monday Engage NY Lesson 4-9 \& 4-10

Objective: Students write expressions that record addition and subtraction operations with numbers/. Students identify parts of an expression using mathematical terms for multiplication. They view one or more parts of an expression as a single entity.

Agenda:

1. Warm up: Fraction/Percent of the Day AND Video: https://youtu.be/NybHckSEQBI
2. Classwork: Engage NY Lesson 4-9 and 4-10
3. Homework: Engage NY Lesson 4-9 \& 4-10 Problem Set/Homework

## Tuesday Engage NY Lesson 4-13

Objective: Students write numerical expressions in two forms "dividend / divisor" and "dividend divided by divisor", and note the relationship between the two.

Agenda:

1. Warm up: Fraction/Percent of the Day AND Video:
2. Classwork: Engage NY Lesson 4-13
3. Homework: Engage NY Lesson 4-13 Problem Set/Homework

## Wednesday Engage NY Lesson 4-14

Objective: Students write numerical expressions in two forms, "dividend / divisor" and dividend divided by divisor, and note the relationship between the two.
Agenda:

1. Warm up: Fraction/Percent of the Day
2. Classwork: Engage NY Lesson 4-14
3. Homework: Engage NY Lesson 4-14 Problem Set/Homework

## Thursday Engage NY Lesson 4-15

Objective: Students read expressions in which letters stand for numbers. They assign operation terms to operations when reading. Agenda:

1. Warm up: Fraction/Percent of the Day
2. Classwork: Engage NY Lesson 4-15
3. Homework: Engage NY Lesson 4-15 Problem Set/Homework

## Friday Engage NY Lesson 4-16

Objective: Students write algebraic expressions that record all operations with numbers and letters standing for the numbers. Agenda:

1. Warm up: Fraction/Percent of the Day
2. Classwork: Engage NY Lesson 4-16
3. Homework: Engage NY Lesson 4-16 Problem Set/Homework

| Mrs. Rayman's Daily Instructional Plan- Grade 6 Math |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Monday | Tuesday | Wednesday | Thursday | Friday |
| Accessing Prior Knowledge Where are your students headed? Where have they been? How will you make sure the students know where they are going? | Warm up: Fraction/Percent of the Day AND Video: | Warm up: Fraction/Percent of the Day AND Video: | Warm up: Fraction/Percent of the Day AND Video: | Warm up: Fraction/Percent of the Day AND Video: | Warm up: Fraction/Percent of the Day AND Video: |
| Guided Practice - What events will help students experience and explore the big idea and questions in the unit? How will you equip them with needed skills and knowledge? | Direct Instruction: Engage NY Lesson 4-9 \& 10 | Direct Instruction: Engage NY Lesson 4-13 | Direct Instruction: Engage NY Lesson 4-14 | Direct Instruction: Engage NY Lesson 4-15 | Direct Instruction: Engage NY Lesson 4-16 |
| Independent Practice - How will you cause students to reflect and rethink? How will you guide them in rehearsing, revising, and refining their work? How will students work together to ensure mastery for all? | Student Notes and Homework: <br> Engage NY Lesson 4-9 \& 4-10 Problem Set/Homework | Student Notes and Homework: <br> Engage NY Lesson 4-13 Problem Set/Homework | Student Notes and Homework: <br> Engage NY Lesson 4-14 Problem Set/Homework | Student Notes and Homework: <br> Engage NY Lesson 4-15 Problem Set/Homework | Student Notes and Homework: <br> Engage NY Lesson 4-16 Problem Set/Homework |
| Assessing Knowledge - How will you help students to exhibit and self-evaluate their growing skills, knowledge, and understanding throughout the unit? | Exit Tickets and Teacher Observations | Exit Tickets and Teacher Observations | Exit Tickets and Teacher Observations | Exit Tickets and Teacher Observations | Exit Tickets and Teacher Observations |
| Differentiation/Accommodatio <br> n - How will you tailor and otherwise personalize the learning plan to optimize the engagement and effectiveness of ALL students, without compromising the goals of the unit? | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments |
| Learner Outcome - How will students demonstrate, as a result of lesson, their level of mastery? <br> - Understand <br> - Know <br> - Do | Students write expressions that record addition and subtraction operations with numbers/. Students identify parts of an expression using mathematical terms for multiplication. They view one or more parts of an expression as a single entity. | Students write numerical expressions in two forms "dividend / divisor" and "dividend divided by divisor", and note the relationship between the two. | Students write numerical expressions in two forms "dividend / divisor" and "dividend divided by divisor", and note the relationship between the two. | Students read expressions in which letters stand for numbers. They assign operation terms to operations when reading. | Students read expressions in which letters stand for numbers. They assign operation terms to operations when reading. |

# Mrs. Rayman's 6th Grade Advanced Math Weekly Lesson Plans 

## Unit 4 Common Core State Standards

## 6.EE. 1 Write and

 evaluate numerical expressions involving whole-number exponents.6.EE. 2 Write, read, and evaluate expressions in which letters stand for numbers.
6.EE.2c Evaluate expressions at specific values of their variables. Include expressions that arise from formulas used in real-world problems. Perform arithmetic operations, including those involving whole-number exponents, in the conventional order when there are no parentheses to specify a particular order (Order of Operations)
6.EE. 3 Apply the properties of operations to generate equivalent expressions.
6.EE. 4 Identify when two expressions are equivalent (i.e. when the two expressions name the same number regardless of which value is substituted into them).

## Unit 4 Essential Questions:

- How can one use algebraic symbols to write equations and inequalities representing real-world situations?
- How can one solve one-step equations and use substitution to determine if a given value is a solution?


## Number Sense:

- Ways to make an equivalent expression
- Ways to make a solution
- Always, sometimes, never
- What's my rule?


## Monday Engage NY Lesson 4-27

Objective: Students solve one-step equations by relating an equation to a diagram. Students check to determine if their solutions make the equations true.

Agenda:

1. Warm up: Fraction/Percent of the Day AND Video:
2. Classwork: Engage NY Lesson 4-27 Examples 1-2 and Exercises 1-2
3. Homework: Engage NY Lesson 4-27 Problem Set/Homework

## Tuesday Engage NY Lesson 4-28

Objective: Students calculate the solutions of two-step equations by using their knowledge of order of operations and the properties of equality for addition, subtraction, multiplication, and division. Students employ tape diagrams to determine if their solutions make the equations true.

Agenda:
4. Warm up: Fraction/Percent of the Day AND Video:
5. Classwork: Engage NY Lesson 4-28 Examples 1-3 and Exercises 1-6
6. Homework: Engage NY Lesson 4-28 Problem Set/Homework

## Wednesday Engage NY Lesson 4-34

Objective: Students recognize that inequalities where a variable and is a fixed number, have infinitely many solutions when the values of come from a set of rational numbers.

Agenda:

1. Warm up: Ways to Make a Number AND Video:
2. Classwork: Engage NY Lesson 4-34 Examples 1-2 and Exercises 1-2
3. Homework: Engage NY Lesson 4-34 Problem Set/Homework

## Thursday Unit 4 Review and Quizziz Quiz

## Friday Unit 4 Final Assessment

Mrs. Rayman's Daily Instructional Plan- Grade 6 Advanced Math

|  | Monday | Tuesday | Wednesday | Thursday | Friday |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Accessing Prior Knowledge - <br> Where are your students headed? Where have they been? How will you make sure the students know where they are going? | Warm up: Fraction/Percent of the Day AND Video: | Warm up: Fraction/Percent of the Day AND Video: | Warm up: Fraction/Percent of the Day AND Video: | Warm up: Fraction/Percent of the Day AND Video: | Warm up: Fraction/Percent of the Day AND Video: |
| Guided Practice - What events will help students experience and explore the big idea and questions in the unit? How will you equip them with needed skills and knowledge? | Direct Instruction: Engage NY Lessons 4-27 | Direct Instruction: <br> Engage NY Lesson 4-28 Examples 1-2 and Exercises 1-6 | Direct Instruction: Engage NY Lesson 4-26 Examples 1-2 and Exercises 1-6 | Direct Instruction: Unit 4 Review and Quizziz Quiz | Direct Instruction: Engage NY Lesson Unit 4 Final Assessment |
| Independent Practice - How will you cause students to reflect and rethink? How will you guide them in rehearsing, revising, and refining their work? How will students work together to ensure mastery for all? | Student Notes and Homework: <br> Engage NY Lesson 4-27 <br> Problem Set/Homework | Student Notes and Homework: <br> Engage NY Lesson 4-28 Problem Set/Homework | Student Notes and Homework: <br> Engage NY Lesson 4-26 Problem Set/Homework | Student Notes and Homework: <br> Unit 4 Review \& Study for Final Assessment | Student Notes and Homework: Unit 4 Final Assessment |
| Assessing Knowledge - How will you help students to exhibit and self-evaluate their growing skills, knowledge, and understanding throughout the unit? | Exit Tickets and Teacher Observations | Exit Tickets and Teacher Observations | Exit Tickets and <br> Teacher Observations | Exit Tickets and Teacher Observations | Exit Tickets and Teacher Observations |
| Differentiation/Accommodation How will you tailor and otherwise personalize the learning plan to optimize the engagement and effectiveness of ALL students, without compromising the goals of the unit? | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments | Pre written vocabulary \& notes, extended time, preferential seating, reduced assignments |
| Learner Outcome - How will students demonstrate, as a result of lesson, their level of mastery? <br> - Understand <br> - Know <br> - Do | Students solve one-step equations by relating an equation to a diagram. Students check to determine if their solutions make the equations true. | Students calculate the solutions of two-step equations by using their knowledge of order of operations and the properties of equality for addition, subtraction, multiplication, and division. Students employ tape diagrams to determine if their solutions make the equations true. | Students solve one-step equations by relating an equation to a diagram. Students check to determine if their solutions make the equations true. | Students will review all standards for Unit 4 and take the Quizziz Quiz reviewing the unit. | Unit 4 Final Assessment |

