Teacher(s): Mrs. Breazeale & Ms. DeBLanc

Subject/Grade: 7th /Grade Math

Week of: Sep 4, 2023

Domain: The Number System ▾

Lesson Plan Title: UNIT RATE

	MATHEMATICS - Mississippi College and Career Readiness Standards for 7th Grade
Numbers & Operations	7.NS. 1 Apply and extend previous understandings of addition and subtraction to add and subtract rational numbers; represent addi... ▾ 7.NS.1a Describe situations in which opposite quantities combine and make 0. ▾ 7.NS.1b Understand that p + q is the number located a distance from the absolute value of q from p, in the positive or negative directi... ▾ 7.NS.1c Understand subtraction of rational numbers as adding the additive inverse. Show that the distance between two rational nu... ▾ 7.NS.1d Apply properties of operations as strategies to add and subtract rational numbers. ▾ 7.NS.2 Apply and extend previous understandings of multiplication and division and of fractions to multiply and divide rational nu... ▾ 7.NS.2a Understand that multiplication is extended from fractions to rational numbers by requiring that operations continue to sati... ▾ 7.NS.2b Understand that integers can be divided, provided that the divisor is not zero, and every quotient of integers (with non-zero ... ▾ 7.NS.2c Apply properties of operations as strategies to multiply and divide rational numbers. ▾ 7.NS.2d Convert a rational number to a decimal using long division; know that the decimal form of a rational number terminates in ... ▾ 7.NS.3 Solve real-world and mathematical problems involving the four operations with rational numbers. ▾
Ratios & Proportions	7.RP Analyze proportional relationships and use them to solve real-world and mathematical problems. ▾ 7.RP.1 Compute unit rates associated with ratios and fractions, including ratios or lengths, areas and other quantities measured in li... ▾

ESSENTIAL QUESTION(S): How do I analyze proportional relationships and use them to solve real-world and mathematical problems?

Bottom 25%: Students will be placed in groups based on ability. The general education teacher and the inclusion teacher will review their MPT. The general education teacher and the inclusion teacher will review their MPT and clear up any misconceptions on Tuesday and Thursday.

Top 25%: Students will work through problems on math prodigy while the teacher pulls students that scored below 70% on their current MPT.

Bubbles: Students will be placed in groups based on their ability. Some with higher performing students and some with lower performing students. The students in the higher performing group will learn from their peers and the students in the lower performing groups will act as a tutor to their peers. The general education teacher and the inclusion teacher will review their MPT and clear up any misconceptions on Tuesday and Thursday.

Week at a Glance

Day	Objective	Focus Question	I will...
T	TSWBAT **examine, analyze, and correct their current mixed practice test (MPT)** by **reviewing resources provided by the teacher, consulting with peers, and/or asking the teacher for help** with 100% accuracy by the end of the lesson. **GENERAL ED & INCLUSION CLASSES ONLY** TSWBAT examine a list of vocabulary words and complete an activity based on their choice. **HONORS ONLY** TSWBAT work through problems using previous notes, guidance from peers, and helps throughout the Prodigy game.	How do mathematicians analyze and correct their graded tests in order to reflect on knowledge needed to master 7th grade math standards? **GEN ED & INCLUSIONS CLASSES** How will studying mathematical vocabulary help me better understand math concepts? **HONORS ONLY** How will I compute unit rates associated with ratios & fractions?	-Differentiate between silly mistakes and lack of knowledge. -In writing, explain the silly mistake and rework the problems that contain silly mistakes. -Use resources to help correct mistakes where mastery is not yet obtained. **GEN ED & INCLUSIONS CLASSES** -Analyze and use mathematical vocabulary to create a product of my choice. **HONORS ONLY** -Compute unit rates associated with ratios & fractions?
W	TSWBAT **complete an iReady math lesson** by **taking notes on key vocabulary and at least three example problems** with 80% accuracy by the end of the lesson.	How do mathematicians use iReady to enhance their mathematical skills?	-Use iReady to enhance my mathematical skills. -Write down any key vocabulary words and definitions. -Copy at least three examples from the lesson.
Th	TBA based on MPT data.	TBA based on MPT data.	TBA based on MPT data.
F	TSWBAT solve real-world problems involving calculating ratios with fractions by completing 30 questions on math prodigy.	How do I solve real-world problems involving calculating ratios with fractions?	-Identify what is being compared. -Set up equivalent ratios to calculate the missing value. -Multiply and divide rational numbers.

MPT 1.6 will be given this morning.

Upper 25%: HONORS – 3rd & 4th Periods

Independent Practice: 00:00 – 00:35 minutes

The student will…

· Login to Math Prodigy and complete assigned problems based on the new skill presented this week.

· Students will work out problems on paper, use the blue lightbulbs imbedded into the lesson for help, and utilize students in their quadrant before asking for the teacher's assistance.

Meanwhile…

The teacher will…

· Grade and tally the current MPTs.

· Pull students that scored less than 70% to remediate misconceptions.

Teacher Input: 00:35 – 00:50 minutes

The teacher will…

· Pass back graded tests to students along with guided notes.

· Allow students to look over their tests and rework/correct any missed questions on the actual test.

· Answer any questions students might have.

· Collect tests (to take to PLCs that afternoon.)

Closure: The teacher will point out most missed questions, and quickly review any common misconceptions**. 00:50 – 00:55 minutes**

Materials: Current MPTs, Chromebook cart, paper, pencils, Teacher Notes on current MPT, and calculators

Assessment: Tuesday Tests & Completed questions on Math Prodigy.

Teachers: Mrs. Breazeale (General Education) & Ms. DeBlanc (Inclusion)

Lesson Notes: The students are divided into 4 quadrants based mostly on ability with student misbehaviors kept in mind. **T1 (Teacher 1)** and **T2 (Teacher 2)** are interchangeable among Mrs. Breazeale & Ms. DeBlanc based on student personalities and needs. **See attached seating chart for students in each quadrant during each class period.**

Introduction: The teacher will explain the agenda for today's class and inform students that are not starting with the teacher what they must accomplish before a teacher meets with their group. Inform students not to disrupt the groups with the teachers. They can reread the directions and/or ask students in their quadrant. All questions can wait until the teachers are finished. **00:00 – 00:05 minutes**

Small Groups: Half of the students will work with a teacher to clear up misconceptions on the current MPT, while the other half will complete a vocabulary activity of their choice. They will switch after an allotted amount of time. See next page for sample rotation. **(00:05 – 00:45 minutes)**

Closure: The teacher will point out most missed questions, and quickly review any common misconceptions. **00:50 – 00:55 minutes**

Materials: Current MPTs, paper, pencils, note cards, crayons, Teacher Notes on current MPT, timers, vocabulary choice boards, vocabulary lists and calculators

Assessment: Tuesday Tests & completed vocabulary activity

Teacher Rotation *(Note: This is subject to change based on student needs.)*

	Mrs. Breazeale	Ms. DeBlanc
1st Period (Breazeale)	Round 1: Quadrant III Round 2: Quadrant II Round 3: Quadrant III Round 4: Quadrant II	Round 1: Quadrant IV Round 2: Quadrant I Round 3: Quadrant IV Round 4: Quadrant I
5th Period (Whittemore)	Round 1: Quadrant I Round 2: Quadrant IV Round 3: Quadrant I Round 4: Quadrant IV	Round 1: Quadrant III Round 2: Quadrant II Round 3: Quadrant III Round 4: Quadrant II
7th Period (Rodgers)	Round 1: Quadrant I Round 2: Quadrant IV Round 3: Quadrant I Round 4: Quadrant IV	Round 1: Quadrant III Round 2: Quadrant II Round 3: Quadrant III Round 4: Quadrant II

	Round 1 00:05 – 00:15	Round 2 00:15 – 00:25	Round 3 00:25 – 00:35	Round 4 00:35 – 00:50
QI	*T1 will...* 1st return MPTs and a colored pencil. 2nd read correct answers while students grade their own MPT. 3rd tally questions students missed. 4th write the final score on the students' paper and record. 5th Give students their test with teacher notes to correct all missed questions.	*The student will...* 1st Identify silly mistakes and write at least one sentence on their test paper of what they did wrong. 2nd Use the teacher notes to rework missed questions on their test paper.	*T1 will...* 1st review student work and make note of students not using their time wisely. 2nd Answer any questions and clear up misconceptions. 3rd Collect students' tests.	*The student will...* 1st Quickly review the weekly vocabulary words. 2nd Read the options on the vocabulary choice board. 3rd Pick one activity to complete and complete.
QII	*T2 will...* 1st return MPTs and a colored pencil. 2nd read correct answers while students grade their own MPT. 3rd tally questions students missed. 4th write the final score on the students' paper and record. 5th Give students their test with teacher notes to correct all missed questions.	*The student will...* 1st Identify silly mistakes and write at least one sentence on their test paper of what they did wrong. 2nd Use the teacher notes to rework missed questions on their test paper.	*T2 will...* 1st review student work and make note of students not using their time wisely. 2nd Answer any questions and clear up misconceptions. 3rd Collect students' tests.	*The student will...* 1st Quickly review the weekly vocabulary words. 2nd Read the options on the vocabulary choice board. 3rd Pick one activity to complete and complete.
QIII	*The student will...* 1st Quickly review the weekly vocabulary words. 2nd Read the options on the vocabulary choice board. 3rd Pick one activity to complete and complete.	*T1 will...* 1st return MPTs and a colored pencil. 2nd read correct answers while students grade their own MPT. 3rd tally questions students missed. 4th write the final score on the students' paper and record. 5th Give students their test with teacher notes to correct all missed questions.	*The student will...* 1st Identify silly mistakes and write at least one sentence on their test paper of what they did wrong. 2nd Use the teacher notes to rework missed questions on their test paper.	*T1 will...* 1st review student work and make note of students not using their time wisely. 2nd Answer any questions and clear up misconceptions. 3rd Collect students' tests.
QIV	*The student will...* 1st Quickly review the weekly vocabulary words. 2nd Read the options on the vocabulary choice board. 3rd Pick one activity to complete and complete.	*T2 will...* 1st return MPTs and a colored pencil. 2nd read correct answers while students grade their own MPT. 3rd tally questions students missed. 4th write the final score on the students' paper and record. 5th Give students their test with teacher notes to correct all missed questions.	*The student will...* 1st Identify silly mistakes and write at least one sentence on their test paper of what they did wrong. 2nd Use the teacher notes to rework missed questions on their test paper.	*T2 will...* 1st review student work and make note of students not using their time wisely. 2nd Answer any questions and clear up misconceptions. 3rd Collect students' tests.

WEDNESDAY_ Sep 6, 2023

WARM-UP/HOOK: *The student will* login to iReady and choose "Unit Rates for Ratios with Fractions Part 1." Take notes on lesson vocabulary and lesson goals. **(5 minutes)**

TEACHER INPUT: **(30 minutes)**
The teacher will …
- Present the lesson objectives.
- Use questioning strategies to ALL students to answer questions.
- Direct students to copy at least 3 examples from the lesson.

INDEPENDENT PRACTICE: **(10 minutes)**
The student will …
- Complete the lesson quiz with 80% or higher accuracy.

STUDENT REFLECTION/EXIT TICKET: *The student will* complete an exit ticket based on today's learning target. The teacher will use this data to determine which students need extra support. **(5 minutes)**

MATERIALS: notebook paper or "iReady Notes template," computers, projector, exit tickets
ASSESSMENT(S): Teacher observation, exit tickets, iReady lesson quiz results

THURSDAY_ Sep 7, 2023

To Be Announced based on the most recent MPT Math data.

Most Missed Standard(s)	Objective(s)	Activity
	TSWBAT	
	TSWBAT	
	TSWBAT	

FRIDAY_ Sep 8, 2023

WARM-UP/HOOK: *The student will* login to Prodigy . Take notes on lesson vocabulary and lesson goals.   **(5 minutes)**

TEACHER INPUT: **(5 minutes)**
The teacher will ...
- Present the lesson objectives.
- Review the requirements to receive help on a question - I need to see evidence that the students attempted to work out the current problem on paper.

INDEPENDENT PRACTICE: **(30 minutes)**
The student will ...
- Complete practice problem on 7.RP.1.
- Correctly answer 30 questions or more correctly.

STUDENT REFLECTION/EXIT TICKET: *The student will* complete an exit ticket based on today's learning target. The teacher will use this data to determine which students need extra support. **(5 minutes)**

MATERIALS: computers, projector, scratch paper
ASSESSMENT(S): Teacher observation, exit tickets, iReady lesson quiz results

MPT 1.6 Results

Class	0% - 49% (Critical)	50% - 69% (Emerging)	70% - 100% (Proficient)
1st			
3rd			
4th			
5th			
7th			

Math Standards

Numbers & Operations:

7.NS. 1 Apply and extend previous understandings of addition and subtraction to add and subtract rational numbers; represent addition and subtraction on a horizontal or vertical number line diagram.

7.NS.1a Describe situations in which opposite quantities combine and make 0.

7.NS.1b Understand that p + q is the number located a distance from the absolute value of q from p, in the positive or negative direction depending on whether q is positive or negative. Show that a number and its opposite have a sum of 0. Interpret sums of rational numbers by describing real-world contexts.

7.NS.1c Understand subtraction of rational numbers as adding the additive inverse. Show that the distance between two rational numbers on a number line is the absolute value of their difference, and apply this principle in real-world contexts.

7.NS.1d Apply properties of operations as strategies to add and subtract rational numbers.

7.NS.2 Apply and extend previous understandings of multiplication and division and of fractions to multiply and divide rational numbers.

7.NS.2a Understand that multiplication is extended from fractions to rational numbers by requiring that operations continue to satisfy the properties of operations, particularly the distributive property, leading to products such as (-1)(-1) = 1 and the rules for multiplying signed numbers. Interpret products of rational numbers by describing real-world contexts.

7.NS.2b Understand that integers can be divided, provided that the divisor is not zero, and every quotient of integers (with non-zero divisor) is a rational number. If p and q are integers, then $-p/q = (-p)/q = p/(-q)$. Interpret quotients of rational numbers by describing real-world contexts.

7.NS.2c Apply properties of operations as strategies to multiply and divide rational numbers.

7.NS.2d Convert a rational number to a decimal using long division; know that the decimal form of a rational number terminates in 0s or eventually repeats.

7.NS.3 Solve real-world and mathematical problems involving the four operations with rational numbers.

Ratios & Proportions:

7.RP Analyze proportional relationships and use them to solve real-world and mathematical problems.

7.RP.1 Compute unit rates associated with ratios and fractions, including ratios or lengths, areas and other quantities measured in likeness of different units.