4th Grade

Week 6: May 4-8

Math

4th Grade Math Parent Directions/Instrucciones para padres

May 4th to May 8th 2020: Week 6

Monday May 4, 2020

MATH: Chapter 12: Lesson 1. Today you will use benchmarks to understand the relative sizes of measurement units. Read page 641 to begin. In the section, Unlock the problem, you are going to use benchmarks (pictures of items with their measurement) to determine if Jake's statement, his back is shorter than four yards long is correct. On the same page, read example 1 and use the benchmark customary units to answer the question: "About how much liquid is in a mug of hot chocolate? and "About how much does a grapefruit weigh?" On page 642, read Example 2 and use benchmark metric units to determine the solution to the questions: "Is the length of you classroom greater than or less than one kilometer?, "About how much medicine is usually in a medicine bottle?, About how much is the mass of a paper clip?" On page 643-644 continue to use benchmarks to answer problems 1-17.

Lunes de 4 may de 2020

MATEMÁTICAS: Capítulo 12: Lección 1. Hoy usará puntos de referencia para comprender los tamaños relativos de las unidades de medida. Lea la página 641 para comenzar. En la sección, Desbloquee el problema, usará puntos de referencia (imágenes de elementos con su medida) para determinar si la afirmación de Jake, su espalda es más corta que cuatro yardas de largo es correcta. En la misma página, lea el ejemplo 1 y use las unidades habituales de referencia para responder la pregunta: "¿Acerca de cuánto líquido hay en una taza de chocolate caliente? y "¿Cuánto pesa una toronja?" En la página 642, lea el Ejemplo 2 y use unidades métricas de referencia para determinar la solución a las preguntas: "¿La longitud de su salón de clases es mayor o menor que un kilómetro?", ¿Sobre la cantidad de medicamento que generalmente hay en un frasco de medicamentos? ¿Cuánto es la masa de un clip de papel? En la página 643-644 continúe usando puntos de referencia para responder a los problemas 1-17.

Tuesday May 5, 2020

MATH: Chapter 12: Lesson 2. Today you will use models to compare customary units of length. Read Unlock the Problem to familiarize/review the measurements of a rule and yardstick. If you have the materials, 1-inch grid paper, scissors, and tape to do the activity on page 647, just compare the squares in the Unlock the Problem. In this activity you will determine how many times a foot is larger than an inch. On page 648, read the Example which compares measures. You will make a table that relates feet and inches. Then, you will compare 4 feet and 50 inches. Using this information you will determine if Emma has enough material to make the bracelets. Continue to use customary units to solve the problems 1-13 on pages 649-650.

Martes 4 de may de 2020

MATEMÁTICAS: Capítulo 12: Lección 2. Hoy utilizará modelos para comparar unidades de longitud habituales. Lea Desbloquee el problema para familiarizarse / revisar las medidas de una regla y criterio. Si tiene los materiales, papel cuadriculado de 1 pulgada, tijeras y cinta adhesiva para realizar la actividad en la página 647, simplemente compare los cuadrados en Desbloquear el problema. En esta actividad determinará cuántas veces un pie es más grande que una pulgada. En la página 648, lea el Ejemplo que compara medidas. Harás una tabla que relaciona pies y pulgadas. Luego, comparará 4 pies y 50 pulgadas. Con esta información, determinará si Emma tiene suficiente material para hacer las pulseras. Continúe usando las unidades habituales para resolver los problemas 1-13 en las páginas 649-650.

Wednesday May 6, 2020

MATH: Chapter 12: Lesson 3 pages 653-656. Today you are going use models to compare customary units of weight. On page 653 read the Unlock the problem. For this activity you will need 2 different colored writing utensil (crayons, color pencils, highlighter, pens, or markers). In this activity you are going understand the relationship between pounds and ounces. Follow the steps of the activity to determine how many ounces are needed to make 1 pound. On page 654 you will compare measures. You will complete the table that relates pounds and ounces. Then, you will compare 90 ounces and 5 pounds to determine if Nancy has enough flour to make her pies. Continue to find the relationship between customary units of weight on page 655-656 problems 1-11.

Miércoles 6 de may de 2020

MATEMÁTICAS: Capítulo 12: Lección 3 páginas 653-656. Hoy utilizará modelos para comparar unidades de peso habituales. En la página 653, lea Desbloquear el problema. Para esta actividad, necesitará 2 utensilios de escritura de diferentes colores (crayones, lápices de colores, marcadores, rotuladores o marcadores). En esta actividad, comprenderá la relación entre libras y onzas. Siga los pasos de la actividad para determinar cuántas onzas se necesitan para hacer 1 libra. En la página 654 comparará medidas. Completará la tabla que relaciona libras y onzas. Luego, comparará 90 onzas y 5 libras para determinar si Nancy tiene suficiente harina para hacer sus pasteles. Siga encontrando la relación entre las unidades de peso habituales en la página 655-656 problemas 1-11

Thursday May 7, 2020

MATH: Use this day to catch up on any work needed to be completed. Make sure you take the time to "Sharpen the Saw". Some activities you may like to do are: draw a picture of your favorite animal, turn off all the lights and tell spooky/silly stories with your family, make a fort and/or find some materials and build an invention.

Jueves 7 de may de 2020

MATEMÁTICAS: Use este día para ponerse al día con cualquier trabajo que deba completarse. Asegúrese de tomarse el tiempo para "Afilar la sierra". Algunas actividades que le gustaría hacer son: hacer un dibujo de su animal favorito, apagar todas las luces y contar historias espeluznantes / tontas con su familia, hacer un fuerte y / o encontrar algunos materiales y construir un invento.

Friday May 8, 2020

Math: Practice your math skills you have learned throughout the year by solving and answering the questions on the attached problems at the end of your Go Math packet titled ATI Dialogs and Assessments.

Viernes 8 de may de 2020

Matemáticas: Practique sus habilidades matemáticas que ha aprendido durante el año resolviendo y respondiendo las preguntas sobre los problemas adjuntos al final de su paquete Go Math titulado Diálogos y evaluaciones ATI.

Chapter 12 Vocabulary

cup (c) taza (tz) 18	**fluid ounce (fl oz)** onza fluida (fl oz) 34
gallon (gal) galón (gal) 37	**half gallon** medio galón 38
kilometer (km) kilómetro (km) 44	**line plot** diagrama de puntos 47
liquid volume volumen de un líquido 49	**mile (mi)** milla (mi) 51

A customary unit used to measure liquid capacity and liquid volume

1 cup = 8 fluid ounces

A customary unit used to measure capacity and liquid volume
1 cup = 8 ounces

A customary unit for measuring capacity and liquid volume
1 half gallon = 2 quarts

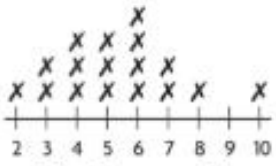
1 half gallon

A customary unit for measuring capacity and liquid volume
1 gallon = 4 quarts

1 gallon

A graph that records each piece of data on a number line

Example:



Height of Bean Seedlings

A metric unit for measuring length or distance
1 kilometer = 1,000 meters

A customary unit for measuring length or distance
1 mile = 5,280 feet

The measure of the space a liquid occupies

1 cup = 8 fluid ounces
1 pint = 2 cups
1 quart = 4 cups

Metric Units of Liquid Volume
1 liter (L) = 1,000 milliliters (mL)

Chapter 12 Vocabulary *(continued)*

milliliter (mL) mililitro (mL) 52	**millimeter (mm)** milímetro (mm) 53
ounce (oz) onza (oz) 58	**pint (pt)** pinta (pt) 67
pound (lb) libra (lb) 70	**quart (qt)** cuarto (ct) 74
second (sec) segundo (seg) 83	**ton (T)** tonelada (t) 92

A metric unit for measuring length or distance
1 centimeter = 10 millimeters

A metric unit for measuring capacity and liquid volume
1 liter = 1,000 milliliters

1 milliliter

A customary unit for measuring capacity and liquid volume
1 pint = 2 cups

1 pint

A customary unit for measuring weight
1 pound = 16 ounces

about 1 ounce

A customary unit for measuring capacity and liquid volume
1 quart = 2 pints

A customary unit for measuring weight
1 pound = 16 ounces

about 1 pound

A customary unit used to measure weight
1 ton = 2,000 pounds

about 1 ton

A small unit of time
1 minute = 60 seconds

1 second

Name _____

Measurement Benchmarks

Essential Question How can you use benchmarks to understand the relative sizes of measurement units?

Common Core Measurement and Data—4.MD.A.1

MATHEMATICAL PRACTICES MP1, MP2, MP3, MP7

Unlock the Problem Real World

Jake says the length of his bike is about four yards. Use the benchmark units below to determine if Jake's statement is reasonable.

Customary Units of Length

1 in.	E45 4PM 1 ft	1 yd	
about 1 inch	about 1 foot	about 1 yard	1 mile in about 20 minutes

A **mile** is a customary unit for measuring length or distance. The benchmark shows the distance you can walk in about 20 minutes.

A baseball bat is about one yard long. Since Jake's bike is shorter than four times the length of a baseball bat, his bike is shorter than four yards long.

So, Jake's statement _____ reasonable.

Jake's bike is about _____ baseball bats long.

Example 1 Use the benchmark customary units.

Customary Units of Liquid Volume

1 cup = 8 fluid ounces	1 pint	1 quart	1 half gallon	1 gallon

- About how much liquid is in a mug of hot chocolate? _____

Customary Units of Weight

about 1 ounce	about 1 pound	about 1 ton

- About how much does a grapefruit weigh? _____

Math Talk MATHEMATICAL PRACTICES 2

Use Reasoning Use benchmarks to explain how you would order the units of weight from heaviest to lightest.

Benchmarks for Metric Units Like place value, the metric system is based on multiples of ten. Each unit is 10 times as large as the next smaller unit. Below are some common metric benchmarks.

Example 2 Use the benchmark metric units.

Metric Units of Length

about 1 millimeter	about 1 centimeter	about 1 decimeter	about 1 meter	1 kilometer in about 10 minutes
				

A **kilometer** is a metric unit for measuring length or distance. The benchmark shows the distance you can walk in about 10 minutes.

- Is the length of your classroom greater than or less than one kilometer?

_____

Metric Units of Liquid Volume

1 milliliter	1 liter
	

- About how much medicine is usually in a medicine bottle?

about 120 _____

Metric Units of Mass

about 1 gram	about 1 kilogram
	

- About how much is the mass of a paper clip?

_____

Math Talk MATHEMATICAL PRACTICES 7

Look for Structure
Explain how benchmark measurements can help you decide which unit to use when measuring.

Name _____

Share and Show

MATH BOARD

Use benchmarks to choose the metric unit you would use to measure each.

1. mass of a strawberry

2. length of a cell phone

Metric Units
centimeter
meter
kilometer
gram
kilogram
milliliter
liter

Circle the better estimate.

3. width of a teacher's desk

   10 meters or 1 meter

4. the amount of liquid a punch bowl holds

   2 liters or 20 liters

5. distance between Seattle and San Francisco

   6 miles or 680 miles

Math Talk MATHEMATICAL PRACTICES 3

Apply Which metric unit would you use to measure the distance across the United States? Explain.

On Your Own

Use benchmarks to choose the customary unit you would use to measure each.

6. length of a football field

7. weight of a pumpkin

Customary Units
inch
foot
yard
ounce
pound
cup
gallon

Circle the better estimate.

8. weight of a watermelon

   4 pounds or 4 ounces

9. the amount of liquid a fish tank holds

   10 cups or 10 gallons

Complete the sentence. Write *more* or *less*.

10. Matthew's large dog weighs _____ than one ton.

11. The amount of liquid a sink can hold is _____ than one cup of water.

12. A paper clip has a mass of _____ than one kilogram.

Problem Solving • Applications Real World

For 13–15, use benchmarks to explain your answer.

13. THINK SMARTER Cristina is making macaroni and cheese for her family. Would Cristina use 1 pound of macaroni or 1 ounce of macaroni?

Math on the Spot

14. Which is the better estimate for the length of a kitchen table, 200 centimeters or 200 meters?

15. GO DEEPER Jodi wants to weigh her cat and measure its standing height. Which two units should she use?

16. MATHEMATICAL PRACTICE 3 **Evaluate Reasonableness** Dalton used benchmarks to estimate that there are more cups than quarts in one gallon. Is Dalton's estimate reasonable? Explain.

17. THINK SMARTER Select the correct word to complete the sentence.

Justine is thirsty after running two miles.

She should drink | 1 pint / 1 meter / 10 pounds | of water.

Name _____

Customary Units of Length

Essential Question How can you use models to compare customary units of length?

Common Core — Measurement and Data—4.MD.A.1
Also 4.MD.A.2

MATHEMATICAL PRACTICES
MP2, MP3, MP4

Unlock the Problem (Real World)

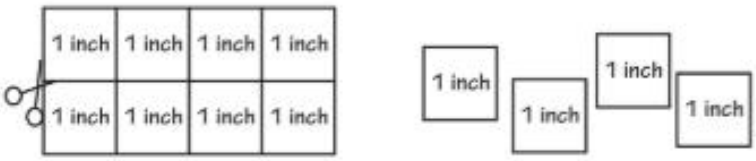
You can use a ruler to measure length. A ruler that is 1 foot long shows 12 inches in 1 foot. A ruler that is 3 feet long is called a yardstick. There are 3 feet in 1 yard.

How does the size of a foot compare to the size of an inch?

Activity

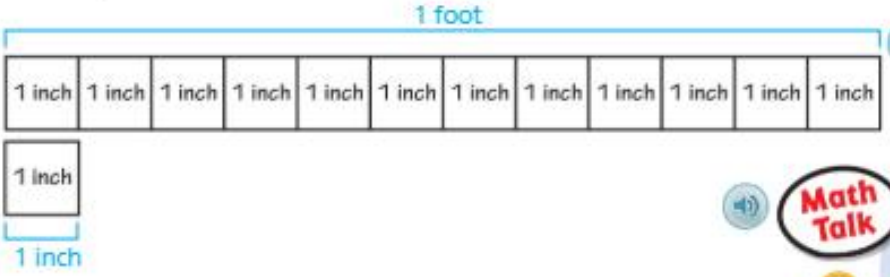
Materials ▪ 1-inch grid paper ▪ scissors ▪ tape

STEP 1 Cut out the paper inch tiles. Label each tile 1 inch.



STEP 2 Place 12 tiles end-to-end to build 1 foot. Tape the tiles together.

STEP 3 Compare the size of 1 foot to the size of 1 inch.



Think: You need 12 inches to make 1 foot.

Math Talk MATHEMATICAL PRACTICES 2

Use Reasoning Explain how you know the number of inches you need to make a yard.

So, 1 foot is _____ times as long as 1 inch.

Example Compare measures.

Emma has 4 feet of thread. She needs 50 inches of thread to make some bracelets. How can she determine if she has enough thread to make the bracelets?

Since 1 foot is 12 times as long as 1 inch, you can write feet as inches by multiplying the number of feet by 12.

STEP 1 Make a table that relates feet and inches.

Feet	Inches
1	12
2	
3	
4	
5	

Think:
1 foot × 12 = 12 inches
2 feet × 12 = _____
3 feet × _____ = _____
4 feet × _____ = _____
5 feet × _____ = _____

STEP 2 Compare 4 feet and 50 inches.

4 feet ↓ 50 inches ↓

Think: Write each measure in inches and compare using <, >, or =.

_____ ◯ _____

Emma has 4 feet of thread. She needs 50 inches of thread.

4 feet is _____ than 50 inches.

So, Emma _____ enough thread to make the bracelets.

Math Talk MATHEMATICAL PRACTICES 2

Represent a Problem
Explain how making a table helped you solve the problem.

- What if Emma had 5 feet of thread? Would she have enough thread to make the bracelets? Explain.

_____

_____

_____

Name _____

Share and Show MATH BOARD

1. Compare the size of a yard to the size of a foot. Use a model to help.

1 yard is _____ times as long as _____ foot.

Customary Units of Length
1 foot (ft) = 12 inches (in.)
1 yard (yd) = 3 feet
1 yard (yd) = 36 inches

Complete.

2. 2 feet = _____ inches

3. 3 yards = _____ feet

4. 7 yards = _____ feet

Math Talk MATHEMATICAL PRACTICES 4

Interpret a Result If you measured the length of your classroom in yards and then in feet, which unit would have a greater number of units? Explain.

On Your Own

Complete.

5. 4 yards = _____ feet

6. 10 yards = _____ feet

7. 7 feet = _____ inches

MATHEMATICAL PRACTICE 4 **Use Symbols** **Algebra** **Compare using <, >, or =.**

8. 1 foot ◯ 13 inches

9. 2 yards ◯ 6 feet

10. 6 feet ◯ 60 inches

Problem Solving • Applications Real World

11. THINK SMARTER Joanna has 3 yards of fabric. She needs 100 inches of fabric to make curtains. Does she have enough fabric to make curtains? Explain. Make a table to help.

Math on the Spot

Yards	Inches
1	
2	
3	

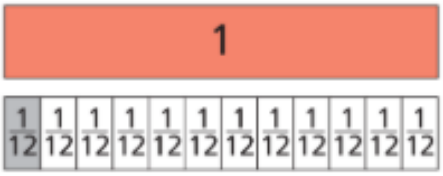
12. THINK SMARTER Select the measures that are equal. Mark all that apply.

(A) 4 feet (C) 36 feet (E) 15 feet

(B) 12 yards (D) 480 inches (F) 432 inches

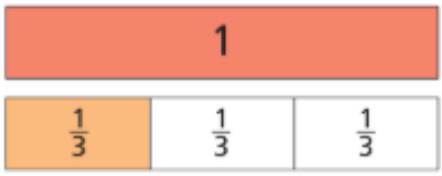
13. GO DEEPER Jasmine and Luke used fraction strips to compare the size of a foot to the size of an inch using fractions. They drew models to show their answers. Whose answer makes sense? Whose answer is nonsense? Explain your reasoning.

Jasmine's Work



1 inch is $\frac{1}{12}$ of a foot.

Luke's Work



1 inch is $\frac{1}{3}$ of a foot.

a. MATHEMATICAL PRACTICE 3 **Apply** For the answer that is nonsense, write an answer that makes sense.

b. Look back at Luke's model. Which two units could you compare using his model? Explain.

Name _____

Customary Units of Weight

Essential Question How can you use models to compare customary units of weight?

Common Core **Measurement and Data—4.MD.A.1** *Also 4.MD.A.2*

MATHEMATICAL PRACTICES MP2, MP4, MP6

Unlock the Problem

Real World

Ounces and **pounds** are customary units of weight. How does the size of a pound compare to the size of an ounce?

▲ You can use a spring scale to measure weight.

Activity

Materials ■ color pencils

The number line below shows the relationship between pounds and ounces.

STEP 1 Use a color pencil to shade 1 pound on the number line.

STEP 2 Use a different color pencil to shade 1 ounce on the number line.

STEP 3 Compare the size of 1 pound to the size of 1 ounce.

You need _____ ounces to make _____ pound.

So, 1 pound is _____ times as heavy as 1 ounce.

Math Talk

MATHEMATICAL PRACTICES 6

Attend to Precision How can you compare the size of 9 pounds to the size of 9 ounces?

MATHEMATICAL PRACTICE 6 **Explain** how the number line helped you to compare the sizes of the units.

_____

_____

_____

_____

Example Compare measures.

Nancy needs 5 pounds of flour to bake pies for a festival. She has 90 ounces of flour. How can she determine if she has enough flour to bake the pies?

STEP 1 Make a table that relates pounds and ounces.

Pounds	Ounces
1	16
2	
3	
4	
5	

Think:

1 pound × 16 = 16 ounces

2 pounds × 16 = _____

3 pounds × _____ = _____

4 pounds × _____ = _____

5 pounds × _____ = _____

STEP 2 Compare 90 ounces and 5 pounds.

90 ounces ↓ _____ ◯ _____ ↓ 5 pounds

Think: Write each measure in ounces and compare using <, >, or =.

Nancy has 90 ounces of flour. She needs 5 pounds of flour.

90 ounces is _____ than 5 pounds.

So, Nancy _____ enough flour to make the pies.

Try This! There are 2,000 pounds in 1 **ton**.
Make a table that relates tons and pounds.

Tons	Pounds
1	2,000
2	
3	

1 ton is _____ times as heavy as 1 pound.

Name _____

Share and Show

MATH BOARD

1. 4 tons = _____ pounds

Think: 4 tons × _____ = _____

Customary Units of Weight
1 pound (lb) = 16 ounces (oz)
1 ton (T) = 2,000 pounds

Complete.

2. 5 tons = _____ pounds

3. 6 pounds = _____ ounces

Math Talk

MATHEMATICAL PRACTICES 4

Write an Equation What equation can you use to solve Exercise 4? Explain.

On Your Own

Complete.

4. 7 pounds = _____ ounces

5. 6 tons = _____ pounds

MATHEMATICAL PRACTICE 4 **Use Symbols Algebra Compare using >, <, or =.**

6. 1 pound ◯ 15 ounces

7. 2 tons ◯ 2 pounds

Problem Solving • Applications

Real World

8. A landscaping company ordered 8 tons of gravel. It sells the gravel in 50-pound bags. How many pounds of gravel did the company order?

_____

9. THINK SMARTER If you could draw a number line that shows the relationship between tons and pounds, what would it look like? Explain.

Math on the Spot

_____

_____

_____

10. THINK SMARTER Write the symbol that compares the weights correctly.

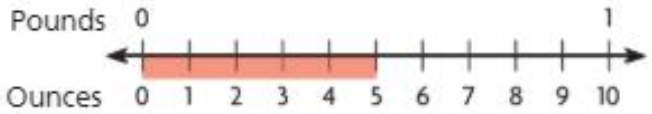
<	=	>

160 ounces _____ 10 pounds

600 pounds _____ 3 tons

11. GO DEEPER Alexis bought $\frac{1}{2}$ pound of grapes. How many ounces of grapes did she buy?

Dan drew the number line below to solve the problem. He says his model shows that there are 5 ounces in $\frac{1}{2}$ pound. What is his error?



Look at the way Dan solved the problem. Find and describe his error.

Draw a correct number line and solve the problem.

So, Alexis bought _____ ounces of grapes.

- MATHEMATICAL PRACTICE 6 Look back at the number line you drew. How many ounces are in $\frac{1}{4}$ pound? **Explain.**

Understanding Points, Lines, and Angles

Slide 1

What You Will Learn

You will learn about points, lines, line segments, rays, and angles.

Slide 2

Key Words

Points - a location in space that has no dimension

Line - a straight set of points that extends infinitely in opposite directions

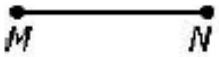
Line segment - two points or endpoints and all the points on the line between the endpoints

Ray - a line segment that extends infinitely in one direction from one of its endpoints

Angle - a geometric figure consisting of the union of two rays that share a common endpoint (vertex)

Slide 4

What does the picture show?



A) line

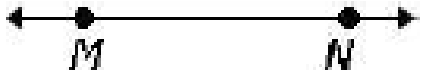
B) ray

C) point

D) line segment

Slide 5

Which picture shows a ray?

A) 

B) 

C) 

D) 

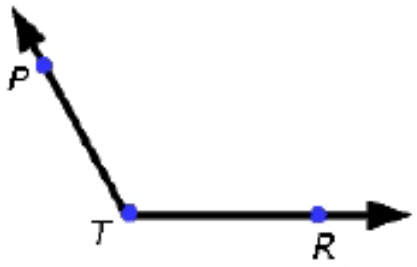
Slide 6

What You Learned

You learned about points, lines, line segments, rays, and angles.

Understanding Points, Lines, and Angles Test

1) What does the picture show?



A) line segment

B) line

C) ray

D) angle