Office of Exceptional Student Education

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detroitk12.org

Office of Exceptional Student Education

Distance Learning Packet

MiCI Program

Math 6-8

Week 1: April 14 – 17, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

DETROIT PUBLIC SCHOOLS COMMUNITY DISTRICT

Week of 4/13/20 to 4/17/20

Directions: Lessons created to introduce and reinforce mathematic concepts. <Complete 1 Lesson a day unless otherwise noted>

Target Goal/Objective(s) Lesson 1: To recognize and extend a number pattern.
Lesson 2: To name the whole number graphed on a number line and to locate a whole number on an open number line.

Module Topic Module 1: Foundations

Materials Needed: colored pencils or crayons and items used for counting (i.e. coins)

	Activity	Do	Extend
Day 1	Lesson 1	Number Patterns pgs. 1	Learn from home activity
Day 2	Lesson 1	Number Patterns pgs. 2	Learn from home activity
Day 3	Lesson 1	Number Patterns pg. 41	Learn from home activity
Day 4	Lesson 2	Using a Number Line pgs. 5	Learn from home activity
Day 5	Lesson 2	Using a Number Line pgs. 6	Learn from home activity

Day 1 - Lesson 1

Objective	Lesson 1: To recognize and extend a number pattern.
Video Link	*https://www.superteacherworksheets.com › hundreds-chart*
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	Some student(s) may benefit from using hundreds charts to find a pattern. Have students color the numbers in the pattern on the chart. Explain that they can count the number of spaces between each pair of numbers on the chart. Then they can count the same number of spaces to find the next number in the pattern. Caution students to pay attention to whether the pattern is increasing or decreasing. Student(s) may also benefit from using counters to model some of the problems.
Intervention	**Academic Vocabulary pg. 1 Student Book** Before the lesson, introduce and discuss the Academic Vocabulary. Refer to the Academic Vocabulary as needed during the lesson. • Pattern: repeated cycle • Increase: get larger in size or number • Decrease: get smaller in size or number **REVIEW PRESKILLS Problem 1 - pg. 1 Student Book** Direct student(s) attention to the blue and green objects that form a pattern. • Look at these objects. • They form a pattern, or repeated cycle. • How does the pattern repeat? (blue diamond, green triangle, blue diamond, green triangle) • What object comes next in the pattern? (green triangle) • Use a colored pencil or crayon. Draw a triangle and color it green to extend the pattern **MODEL NEW SKILLS Problem 2 - pg. 1 Student Book** Direct student(s) attention to the counters and the corresponding numbers below the pictures. • Look at these numbers and the counters that model the numbers. • They form a pattern. • When the numbers in a pattern increase, they get larger. When the numbers in a pattern decrease, they get smaller. • Do the numbers in this pattern get larger or smaller from one number to the next number? (larger)

- Does the number of counters increase or decrease from one number to the next number in the pattern? (increase)
- Look at the counters.
- By how many counters does the pattern increase each time? (2)
- Now look at the numbers in the pattern.
- Do you count forward or backward to find the next number in the pattern? (forward)
- How much do you count forward by each time? (2)
- So, the next number should be 2 more than 10.
- Count forward from 10 two times: 10..., 11, 12.
- What is the next number in the pattern? (12)
- Is this the same number as the number of counters in the model for the pattern? (yes)
- Write 12 on the line after 10

Problem 3 – pg. 1 Student Book

- Look at these numbers.
- They form a pattern.
- Do the numbers in this pattern increase or decrease from one number to the next number? (decrease)
- Do you count forward or backward to find the next number in the pattern? (backward)
- How do you know? (The numbers are getting smaller instead of larger.)
- How much do you count backward by each time? (10)
- Count backward from 20 ten times: 20..., 19, 18, 17, 16, 15, 14, 13, 12, 11, 10.

How Too: Model this pattern using counters – pg. 1 Student Book

- Look at the numbers and the number of counters for each number.
- This is a number pattern. The numbers change in the same way from one number to the next number in the pattern.
- Do the numbers increase or decrease from one number to the next number in the pattern? (increase)
- Will you count forward or backward to get the next number? (forward)
- Use counters to model the first two numbers in the pattern.
- How many more counters do you need to model the second number than the first number?(3)
- Now model the third number. How many more counters do you need to model 7 than to model 4? (3)
- Model the fourth number in the pattern. Keep the groups of counters in a line to show the pattern of numbers.

	• How many more counters do you need to model 10 than to model 7? (3) • How many more counters do you need each time to model the next number in the pattern? (3) • So, the pattern rule is to count forward by 3.

Day 2 - Lesson 1

Objective	Lesson 1: To recognize and extend a number pattern.
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Try It Together – pg. 2 Student Book** SCAFFOLD INSTRUCTION Before starting this section, read aloud and discuss the instruction line with student(s). You may have student(s) use counters to model each pattern. **Problem 4** • These numbers form a pattern. • Do the numbers increase or decrease from one number to the next number in the pattern? (increase) • Do you count forward or backward to find the next number in the pattern? (forward) • How much do you count forward by each time? (5) • So, the next number should be 5 more than 20. Count forward from 20 five times: 20..., 21, 22, 23, 24, 25. • What is the next number in the pattern? (25) • Write 25 on the line after 20. **Problem 5** • Look at these numbers. • They form a pattern. • Do the numbers increase or decrease from one number to the next number in the pattern? (decrease) • Do you count forward or backward to find the next number in the pattern? (backward) • How much do you count backward by each time? (2) • So, count backward from 12 two times: 12..., 11, 10. • What is the next number? (10) • Write 10 on the line after 12.

Day 3 - Lesson 1

Objective	Lesson 1: To recognize and extend a number pattern.
Video Link	*https://www.superteacherworksheets.com › patterns-number*
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	If you are given a set of numbers and are tasked with finding a pattern, the first thing you want to do is look at the first two numbers. Look at this set: 1, 7, 13, 19 _____. • What is the pattern? Increase (6) • What is the final answer? (25)
Intervention	**Extra Practice - Student Book pg. 41** • Lesson 1 Number Patterns - Write the next number in each pattern • Lesson 2 Using a Number Line - Name the number for each point shown • Find and mark each number on the number line

Day 4 - Lesson 2

Objective	Lesson 2: To name the whole number graphed on a number line and to locate a whole number on an open number line. **Materials• counters• index cards/paper**
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Academic Vocabulary pg. 5 Student Book** Before the lesson, introduce and discuss the Academic Vocabulary. Refer to the Academic Vocabulary as needed during the lesson. • number line: a line that shows the order of numbers • tick mark: a mark that shows the position of a number • graph of a number: a point that represents a number on a number line **REVIEW PRESKILLS Problem 1 – pg. 5 Student Book** • These numbers form a pattern. • Do the numbers increase or decrease from one number to the next number in the pattern? (increase) • Do you count forward or backward to find the next number in the pattern? (forward) • How much do you count forward by each time? (4) • So, the next number should be 4 more than 13. Count forward from 13 four times: 13..., 14, 15, 16, 17. • What is the next number in the pattern? (17) • Write 17 on the line after 13. **MODEL NEW SKILLS Problem 2 – pg. 5 Student Book** • We can use a number line to show the order of numbers. • Look at the number line in problem 2. • A tick mark is a little mark that is used to show the position of a number on a number line. • What number is below the first tick mark on the left on the number line? (0) • What number comes next? (1) • What are the rest of the numbers on this number line? (2, 3, 4, 5, 6, 7, 8, 9, 10) • The numbers on a number line always increase from left to right. On this number line, the numbers increase by 1.

- Start at 0 and count the tick marks to the right until you reach the first dot on the number line.
- At what number did you stop? (3)
- This dot, or point, is called the graph of the number 3.
- The other point on the number line is above what number? (7)
- So, what other number is graphed on the number line? (7)

Problem 3 – pg. 5 Student Book

- A number line does not have to show every number.
- Look at the number line in problem 3.
- What two numbers are shown on this number line? (3 and 9)
- We will place a tick mark in the correct position to show the number 5 on this number line.
- Remember that a number line shows numbers in order.
- Should the tick mark for 5 be placed to the right or to the left of 3?

Day 5 - Lesson 2

Objective	Lesson 2: To name the whole number graphed on a number line and to locate a whole number on an open number line.
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Try It Together – pg. 6 Student Book** Work with student(s)to complete these skills. **SCAFFOLD INSTRUCTION** Before starting this section, read aloud and discuss the instruction line with student(s). **Problem 4** Look at the number line for problem 4. • What number is the point above on the number line? (14) • What number is graphed on the number line? (14) **Problem 5** • Look at the number line in problem 5. • What two numbers are already graphed on this number line? (4 and 9) • Will 7 be to the right or the left of 4? (to the right) • Will 7 be to the right or the left of 9? (to the left) • So, where should the tick mark for 7 be placed? (between 4 and 9) • Is 7 closer to 4 or closer to 9? (9) Why? (You count by 1 from 7 to 9 fewer times than you count by 1 from 7 to 4.) • So, draw the tick mark for 7 so that it is closer to 9 than it is to 4. • Write 7 under the tick mark.

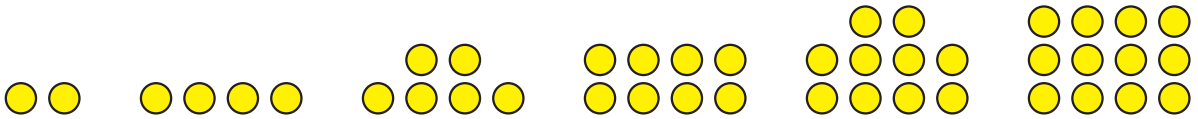
Academic Vocabulary
pattern
increase
decrease

Number Patterns

Name _____ Class _____ Date _____

Get Started

1  _____

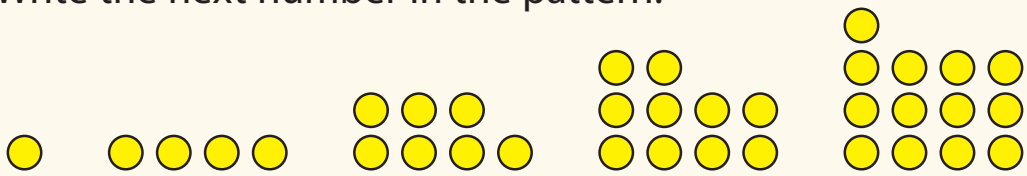
2 

2, 4, 6, 8, 10, _____

3 60, 50, 40, 30, 20, _____

How To

Write the next number in the pattern.



1, 4, 7, 10, _____

Step 1

The pattern is _____.

Pattern Rule: Count _____ by _____ each time.

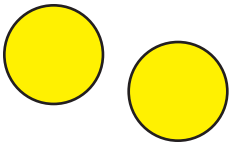
Think: Do I count forward or backward?

Step 2

Use the pattern rule to find the next number.

Start at 10. Count forward by _____.

You Need



Try It Together

Write the next number in each pattern.

4 5, 10, 15, 20, _____

5 18, 16, 14, 12, _____

Work On Your Own

Write the next number in each pattern.

6 3, 6, 9, 12, _____

7 20, 30, 40, 50, _____

8 15, 13, 11, 9, _____

9 40, 35, 30, 25, _____

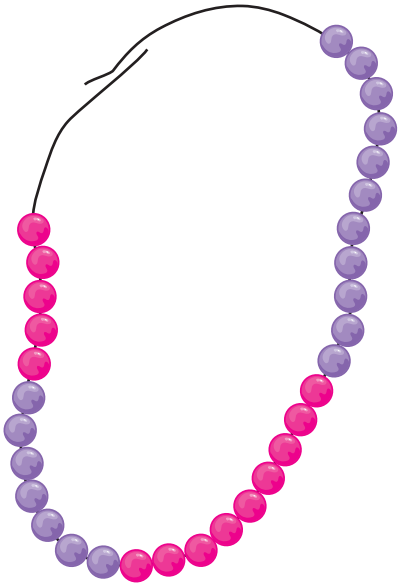
10 4, 8, 12, 16, _____

11 12, 9, 6, 3, _____

Solve the problem.

12 Cindy puts beads on a necklace. She uses a pattern. She uses 5 pink beads first. Then she uses 7 purple beads, 9 pink beads, and 11 purple beads. How many pink beads will she use next?

_____ pink beads



Academic Vocabulary
number line
tick mark
graph of a number

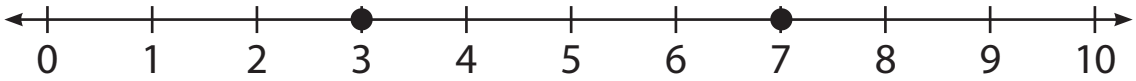
Using a Number Line

Name _____ Class _____ Date _____

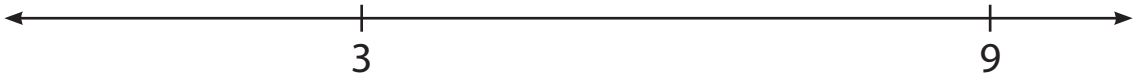
Get Started

1 1, 5, 9, 13, _____

2

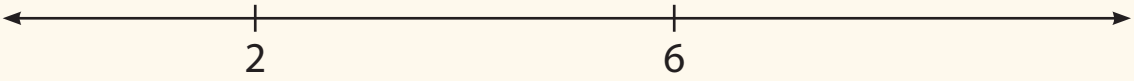


3



How To

Find 3 on the number line. Then find 9 on the number line.



Step 1
Is 3 to the left of 2, between 2 and 6, or to the right of 6?

_____

Think: Which number is 3 closer to?

Step 2
Draw 3 on the number line.

Step 3
Is 9 to the left of 2, between 2 and 6, or to the right of 6?

_____

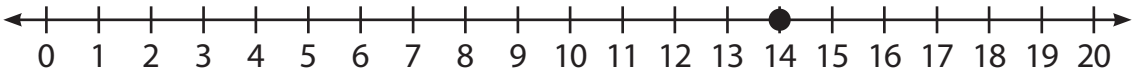
Think: How close is 9 to 6?

Step 4
Draw 9 on the number line.

Try It Together

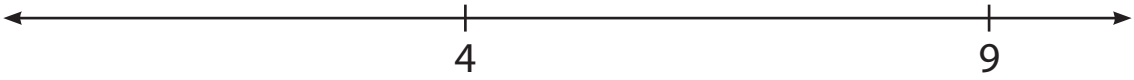
Solve each problem.

4 Name the number for the point shown.



_____

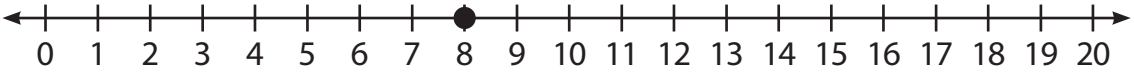
5 Find and mark 7 on the number line.



Work On Your Own

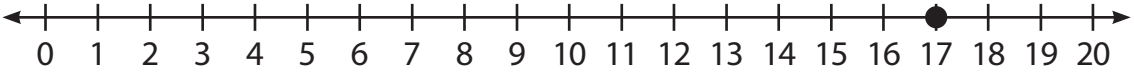
Name the number for each point shown.

6



_____

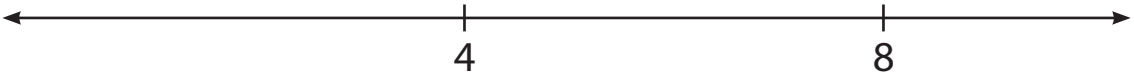
7



_____

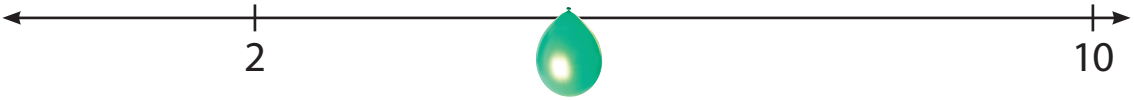
Find and mark each number on the number line.

8 1 **9** 6



Solve the problem.

10 Jared is playing a game at a carnival. There is a number behind the balloon. To win the game, he needs to name this number. What number should he name? _____



Name _____ Class _____ Date _____

Lesson 1 Number Patterns

Write the next number in each pattern.

1. 3, 4, 5, 6, _____

2. 16, 12, 8, 4, _____

3. 8, 10, 12, 14, _____

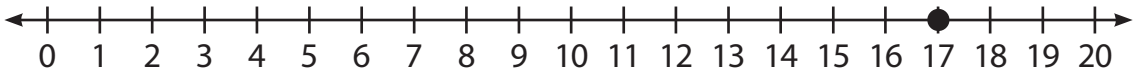
4. 10, 15, 20, 25, _____

5. 20, 17, 14, 11, _____

6. 50, 40, 30, 20, _____

Lesson 2 Using a Number Line

Name the number for each point shown.

1. 

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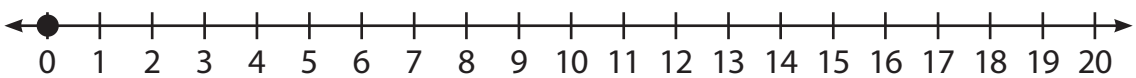
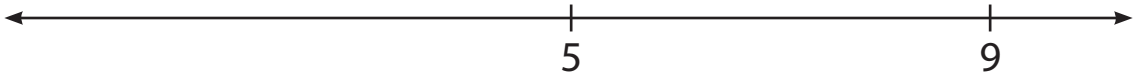
2. 

_____

Find and mark each number on the number line.

3. Find 8 on the number line.

4. Find 1 on the number line.

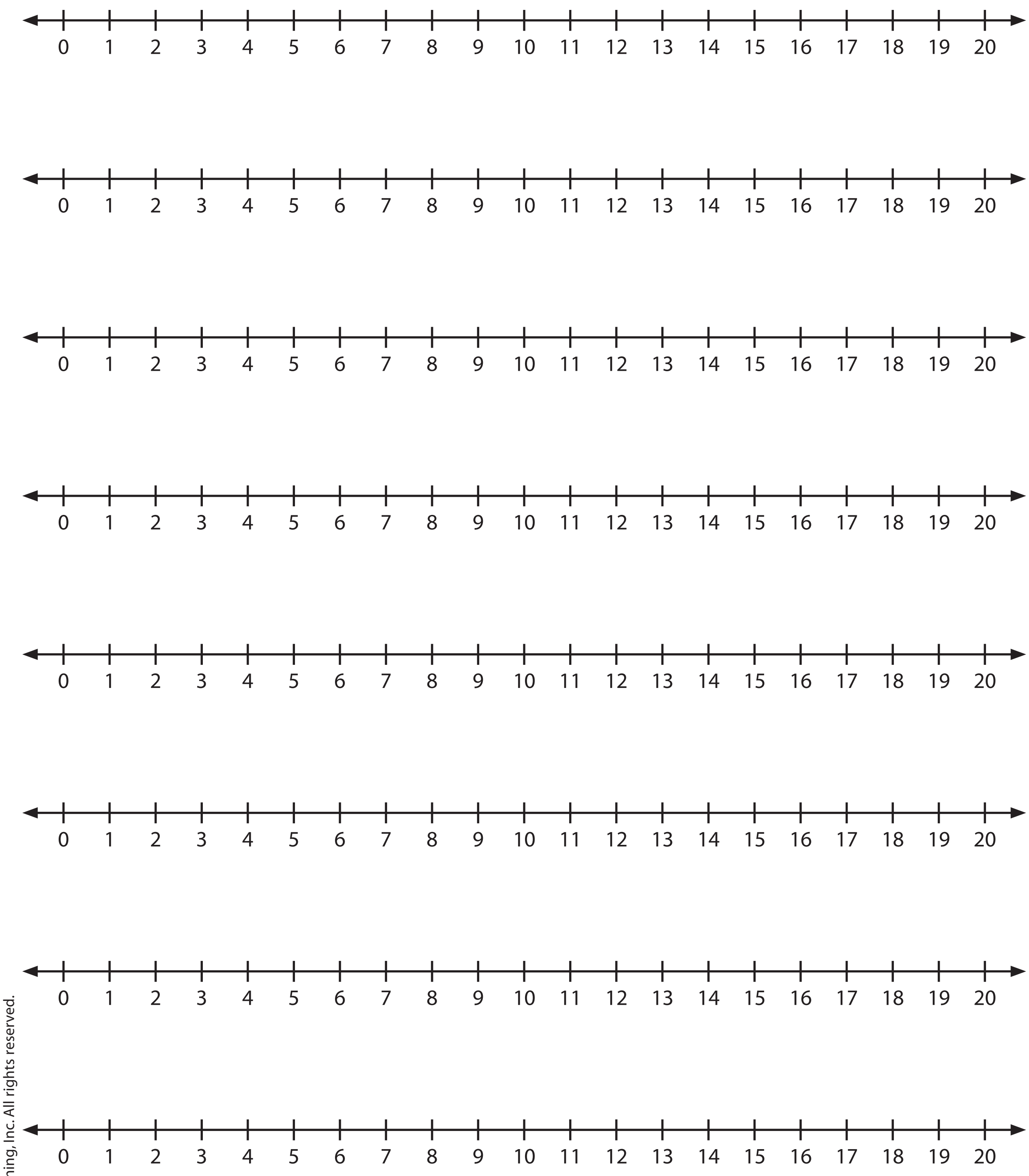


Copy Master: Hundreds Chart

1	2	3	4	5	6	7	8	9	10
11	12	13	14	15	16	17	18	19	20
21	22	23	24	25	26	27	28	29	30
31	32	33	34	35	36	37	38	39	40
41	42	43	44	45	46	47	48	49	50
51	52	53	54	55	56	57	58	59	60
61	62	63	64	65	66	67	68	69	70
71	72	73	74	75	76	77	78	79	80
81	82	83	84	85	86	87	88	89	90
91	92	93	94	95	96	97	98	99	100

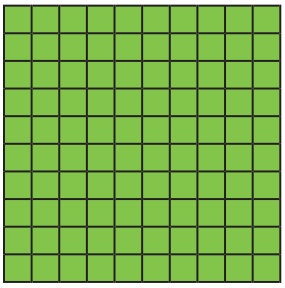
Name ______________________________ Class ____________________ Date ______________

Number Lines



Name _____ Class _____ Date _____

Workmat

Ones 	
Tens 	
Hundreds 	

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Distance Learning Packet

MiCI Program

Math 6-8

Week 2: April 20 – 24, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

Week of 4/20/20 to 4/24/20

Directions: Lessons created to introduce and reinforce mathematic concepts. <Complete 1 Lesson a day unless otherwise noted>

Target Goal/Objective(s) Lesson 3: To count by 2, 5, and 10
Lesson 4: To determine whether a number is even or odd by using a model

Module Topic Module 1: Foundations

Materials Needed: Hundreds Chart, Counters (i.e., coins)

	Activity	Do	Extend
Day 1	Lesson 3	Counting by 2, 5, &10 pg. 9	Learn from home activity
Day 2	Lesson 3	Try It Together pg. 10	Learn from home activity
Day 3	Lesson 3	Using a Problem-Solving Plan pgs. 11&12	Learn from home activity
Day 4	Lesson 4	Modeling Even & Odd Numbers pg. 13	Learn from home activity
Day 5	Lesson 4	Try It Together pg. 14	Learn from home activity

Day 1 - Lesson 3

Objective	Lesson 3: Lesson 3: To count by 2, 5, and 10
Video Link	https://www.khanacademy.org – Place Value Blocks *https://www.superteacherworksheets.com › hundreds-chart*
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Academic Vocabulary – pg. 9 Student Book** Before the lesson, introduce and discuss the Academic Vocabulary. Refer to the Academic Vocabulary as needed during the lesson. • skip counting: counting in groups by a given number **REVIEW PRESKILLS Problem 1** • How can we find the number of stars in problem 1? (count them) • Let's count the stars. • Point to each star as we count. • Count together: 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11. • How many stars are there? (11) • Write 11 on the line. We counted the stars by 1 because we counted every single one **MODEL NEW SKILLS Problem 2** • We can use a faster way to count when there are many objects. • It is called skip counting. • Skip counting is counting in groups by a given number. • The models show the number of items we are counting. • When skip counting by 2, the models are connecting cubes in groups of 2. • In this problem, we will use the models to skip count by 2. • Start with the first group of 2 cubes. • The first number when we skip count by 2 is 2. • Skip count by 2 to get to the next number. • How many total cubes are there when we look at the second group? (4) • What number comes after 2 when skip counting by 2? (4) • Continue to skip count by 2 to get to the next number. • Write each number on the line under each group of cubes. • Skip count together starting at 2: 2, 4, 6, 8, 10, 12. **Problem 3** • We can also skip count by 5 using models.

	• The models are connecting cubes in groups of 5. • We can use whisper counting to help skip count the models by 5. • Whisper each number in the group up to the last number. • Say the last number in the group aloud. • Start with the first group of 5 cubes. • Whisper count all but the last cube. Start at 1: 1, 2, 3, 4. • Now say aloud the last number: 5. Whisper count by 5 to get to the next number. Start at 6: 6, 7, 8, 9. • Now say aloud the last number: 10. • How many total cubes are there when we look at the second group? (10) • What number comes after 5 when skip counting by 5? (10) • Continue to skip count by 5 to get to the next number. • Write each number on the line under each group of cubes. • Skip count together starting at 5: 5, 10, 15, 20, 25.

Day 2 - Lesson 3

Objective	Lesson 3: Lesson 3: To count by 2, 5, and 10
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Problem 4 – pg. 10 Student Book** • We can use models to skip count by 10. • The models are in groups of 10. • Whisper each number in the group up to the last number. • Say the last number in the group aloud. • Start with the first group of 10 cubes. • What is the first number when we skip count by 10? (10) • Skip count by 10 to get to the next number. • What number comes after 10 when skip counting by 10? (20) • Continue to skip count by 10 to get to the next number and write each number on the line under each group of cubes. • Skip count together starting at 10: 10, 20, 30, 40. **Try It Together – pg. 10 Student Book** Work with student(s) to complete these skills. **SCAFFOLD INSTRUCTION** . Before starting this section, read aloud and discuss the instruction line with student(s) . You may have student(s) use connecting cubes or the number line to model problems. **Problem 5** • What is the first number shown in problem 5? (2) • Use skip counting by 2 to find the missing numbers. • Use the number line if you like. Count together starting at 2: 2, 4, 6, 8, 10, 12, 14, 16, 18. • What numbers are missing when skip counting by 2? (10, 14, 18) • Write the numbers on the lines. **Problem 6** • What is the first number shown in problem 6? (5) • Use skip counting by 5 to find the missing numbers.

	• Count together starting at 5: 5, 10, 15, 20, 25, 30, 35. • What numbers are missing when skip counting by 5? (15 and 25) • Write the numbers on the lines. **Problem 7** • What is the first number shown in problem 7? (10) • What number should you skip count by to find the missing number? (10) • Skip count by 10 to find the missing number. • Count together starting at 10: 10, 20, 30, 40, 50, 60. • What is the missing number? (20) Write 20 on the line.

Day 3 - Lesson 3

Objective	Lesson 3: Lesson 3: To count by 2, 5, and 10
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Using a Problem-Solving Plan – pg. 11** This problem illustrates the Using a Problem-Solving Plan strategy. Student(s) are shown how the four-step problem-solving process is used to solve a word problem involving skip counting. The problem states that each flower has the same number of petals. • Ask student(s) why they should skip count by 10 to count all the petals. • It may be helpful to draw a picture if student(s) are having difficulty understanding why skip counting by 10 is used to solve the problem.

Day 4 - Lesson 4

Objective	Lesson 4: To determine whether a number is even or odd by using a model
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Modeling Even and Odd Numbers – pg. 13** **Academic Vocabulary** Before the lesson, introduce and discuss the Academic Vocabulary. Refer to the Academic Vocabulary as needed during the lesson. • even number: a number that can be modeled by objects and put into groups of 2 with no objects left over • odd number: a number that can be modeled by objects and put into groups of 2 with exactly 1 object left over **REVIEW PRESKILLS Problem 1** • We can use models to skip count by 2. • The models in problem 1 are in groups of 2. • Start with the first group of 2 cubes. • What is the first number when we skip count by 2? (2) • Skip count by 2 to get to the next number. What number comes after 2 when skip counting by 2? (4) • Continue to skip count by 2 to get to the next number and write each number on the line under each group of cubes. • Skip count together starting at 2: 2, 4, 6, 8, 10, 12. **MODEL NEW SKILLS Problem 2** • Notice that there are rings around the fish in problem 2. • How many fish are in each ring? (2) • Each ring of fish is a group of 2. • Is every fish in a group of 2? (no) • How many fish are not in a group of 2? (1) • Because there is 1 fish that does not fit into a group of 2, there is an odd number of fish. • How many total fish are there? (9) • So, 9 is an odd number. Write odd on the line. **Problem 3** • Look at the puppies in problem 3.

	• How many puppies are in each ring? (2) • Is every puppy in a group of 2? (yes) • Are there any puppies not in a group of 2? (no) • Because all the puppies are put into groups of 2, there is an even number of puppies. • How many puppies are there? (12) • So, 12 is an even number. Write even on the line.

Day 5 - Lesson 4

Objective	Lesson 4: To determine whether a number is even or odd by using a model
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Try It Together – pg. 14** Work with students to complete these skills. **SCAFFOLD INSTRUCTION** Before starting this section, read aloud and discuss the instruction line with students. **Problem 4** • Look at the bicycles in problem 4. • Draw a ring around as many groups of 2 bicycles as possible. • Is every bicycle in a group of 2? (yes) • How many bicycles are there in all? (14) • Is 14 an even or an odd number? (even) • Write even on the line. **Problem 5** • Look at the chicks in problem 5. • Draw a ring around as many groups of 2 chicks as possible. • Is every chick in a group of 2? (no) • How many chicks are not in a group of 2? (1) • How many chicks are there in all? (27) • Is 27 an even or an odd number? (odd) • Write odd on the line.

Counting by 2, 5, and 10

Name _____ Class _____ Date _____

Get Started

1  _____

2 

_____, _____, _____, _____, _____, _____

3 

_____, _____, _____, _____, _____

4 

_____, _____, _____, _____

How To

Use connecting cubes to skip count by 2 and find the missing numbers.

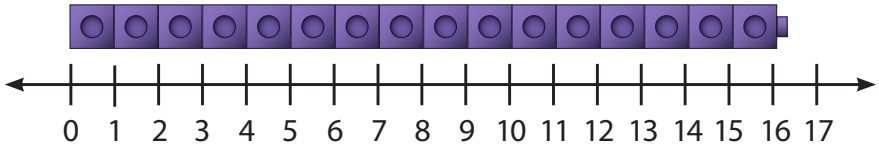
Step 1

2, 4,

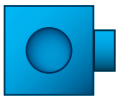
Think: How many cubes are connected together in the first group?

Step 2

2, 4, _____, _____, 10, _____, 14, _____

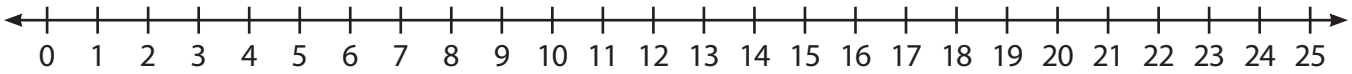


You Need



Try It Together

Skip count to find each missing number.



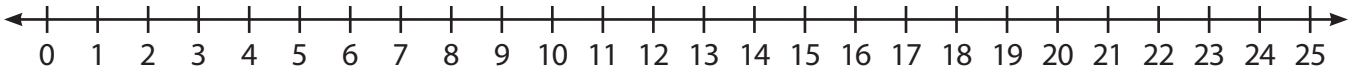
5 2, 4, 6, 8, _____, 12, _____, 16, _____

6 5, 10, _____, 20, _____, 30, 35

7 10, _____, 30, 40, 50, 60

Work On Your Own

Skip count to find each missing number.



8 2, _____, 6, _____, 10, _____, _____, _____

9 5, _____, 15, _____, _____, _____, 35

10 10, 20, _____, 40, _____, _____

Solve the problem.

11 Ms. Dot has packs of buttons. There are 5 buttons in each pack. She used skip counting to count the buttons. She counted: *5, 10, 15, 20, 25, 30, 35* buttons. Then she found one more pack. How many total buttons does Ms. Dot have?

_____ buttons

Using a Problem-Solving Plan

Problem-Solving

There are 6 flowers in a vase. Each flower has 10 petals.
How many total petals are there?

Find the number of petals

How Skip count by 10 for each flower.

Solve

How many flowers are there? _____

How many times should you skip count by 10? _____

Skip count to find the number of petals.

_____, _____, _____, _____, _____, _____

How many total petals are there? _____

Explain Does my answer make sense? Explain.

_____

_____

Check Up

Fill in the bubble of the correct answer.

12 What is the missing number?

2, 4, 6, ___?___, 10, 12

⬭ 7 ⬭ 8 ⬭ 9

13 Start with 10 and write the numbers as you skip count by 10. Describe the pattern you see. Talk it over.

Academic Vocabulary
even number
odd number

Modeling Even and Odd Numbers

Name _____ Class _____ Date _____

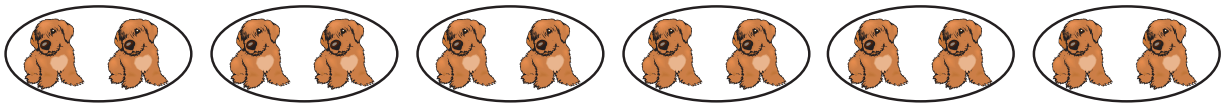
Get Started

1 

_____, _____, _____, _____, _____, _____

2 

_____

3 

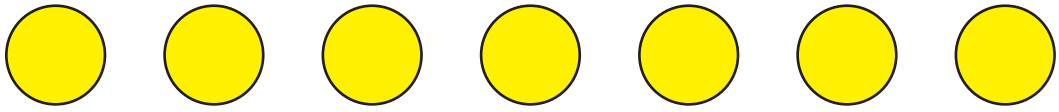
_____

How To

Tell whether 7 is even or odd.

Step 1

Use counters to model 7.



Step 2

Draw a ring around each group of 2 counters.

Think: Is there a counter left over?

Step 3

Is 7 even or odd? _____

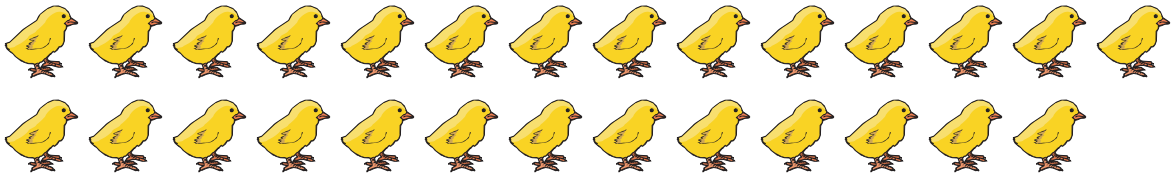
Try It Together

Tell whether each number is even or odd.

4 14

_____

5 27

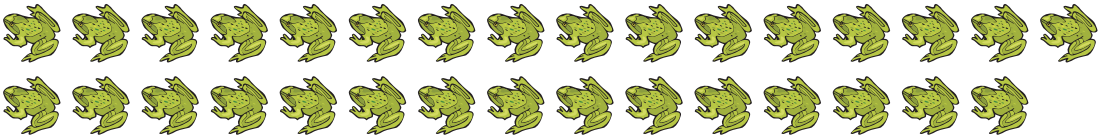


_____

Work On Your Own

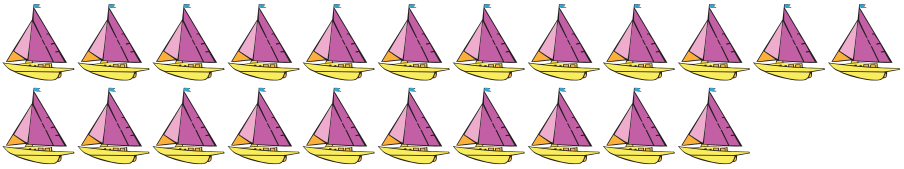
Tell whether each number is even or odd.

6 31



_____

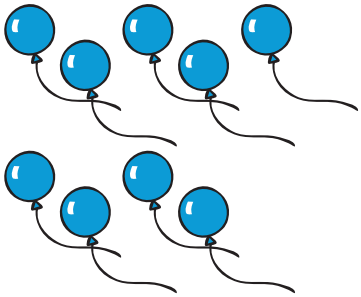
7 22



_____

Solve the problem.

8 Tonya bought balloons for a birthday party. Did she buy an even number of balloons? _____



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Office of Exceptional Student Education

Distance Learning Packet

MiCI Program

Math 6-8

Week 3: April 27 – May 1, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

DETROIT PUBLIC SCHOOLS COMMUNITY DISTRICT

Week of 4/27/20 to 5/01/20

Directions: Lessons created to introduce and reinforce mathematic concepts. <Complete 1 Lesson a day unless otherwise noted>

Target Goal/Objective(s) Lesson PL 1: To add two 1-digit numbers in any order (sums of 10 or less).
Lesson PL 2: To use counters and a tens frame to add two 1-digit numbers (sums to 18) by regrouping to make a 10.

Module Topic Module 2: Addition

Materials Needed: • counters • colored pencils or crayons • coins

	Activity	Do	Extend
Day 1	Lesson PL 1	Adding in Any Order pg. 1	Learn from home activity
Day 2	Lesson PL 1	Try It Together pg. 2	Learn from home activity
Day 3	Lesson PL 2	Making a 10 to Add pg. 5	Learn from home activity
Day 4	Lesson PL 2	Try It Together pg. 6	Learn from home activity
Day 5	Lesson PL 2	Using a 10 Frame pg. 7	Learn from home activity

Day 1 - Lesson PL 1

Objective	Lesson PL 1: To add two 1-digit numbers in any order (sums of 10 or less).
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Academic Vocabulary – pg. 1 Student Book** Before the lesson, introduce and discuss the Academic Vocabulary. Refer to the Academic Vocabulary as needed during the lesson. • Addend: any number used to get the sum or total **REVIEW PRESKILLS Problem 1** • Look at the picture in problem 1. • How many cars do you see in the first group? (6) • How many cars do you see in the second group? (2) • How many cars are there in all? (8) • What addition sentence did you write? (6 1 2 5 8) **Problem 2** • How do you add 4 and 3? (count on from 4 three times) • Count on from 4 three times: 4…, 5, 6, 7. • What is 4 plus 3? (7) **MODEL NEW SKILLS Problem 3** • Look at the two groups of balloons on the left. • How many blue balloons are there? (3) • Write 3 on the first line under the blue balloons. • How many orange balloons are there? (1) • Write 1 on the second line under the orange balloons. • Count on from 3 one time: 3…, 4. • How many balloons are there in all? (4) • Write 4 on the third line after the equal sign. • What addition sentence did you write? (3 1 1 5 4) • The numbers 3 and 4 are called addends. • Addends are numbers used to get the sum or total. • Now look at the two groups of balloons on the right. • They are the same as the balloons on the left, but in a different order. • What addition sentence can you write for these balloons? (1 1 3 5 4) • What are the addends in this addition sentence? (1 and 3)

	• How is this addition sentence like the first addition sentence? (They both use the same addends.) • How is it different? (The addends are in a different order.) • Did changing the order of the addends change the sum? (no)

Day 2 - Lesson PL 1

Objective	Lesson PL 1: To add two 1-digit numbers in any order (sums of 10 or less).
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Try It Together – pg. 2 Student Book** Work with students to complete these skills. **SCAFFOLD INSTRUCTION** Before starting this section, read aloud and discuss the instruction line with students. • You may have students use connecting cubes of two different colors to model each problem. **Problem 4** • What numbers will we be adding in the addition sentence on the top? (2 and 4) • Count on from 2 four times: 2…, 3, 4, 5, 6. • What is 2 plus 4? (6) • Write 6 on the top line. • Now look at the addition sentence on the bottom. • What numbers will we be adding in this addition sentence? (4 and 2) • What do you notice about the addends in both addition sentences? (They are the same.) • So, what should be the sum of 4 and 2? (6) • Count on from 4 two times to check: 4..., 5, 6. • Are the sums the same? (yes) • Write 6 on the bottom line. **Problem 5** • What numbers will we be adding in the addition sentence on the top? (8 and 1) • Count on from 8 one time: 8…, 9. • What is 8 plus 1? (9) What is 1 plus 8? (9) • Are the sums the same? (yes)

Day 3 - Lesson PL 2

Objective	Lesson PL 2: To use counters and a tens frame to add two 1-digit numbers (sums to 18) by regrouping to make a 10.
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Academic Vocabulary pg. 5 - Student Book** Before the lesson, introduce and discuss the Academic Vocabulary. Refer to the Academic Vocabulary as needed during the lesson. • tens frame: a frame that holds 0 through 10 objects **REVIEW PRESKILLS Problem 1** Look at the addition sentences in problem 1. • What addends are used in both sentences? (5 and 2) • What is 5 plus 2? (7) • Will the sum of 2 and 5 be the same as the sum of 5 and 2? (yes) • What is 2 plus 5? (7) **Problem 2** Look at the addition sentences in problem 2. • What addends are used in both sentences? (3 and 7) • What is 3 plus 7? (10) • Will the sum of 7 and 3 be the same as the sum of 3 and 7? (yes) • What is 7 plus 3? (10) **MODEL NEW SKILLS Problem 3** • What numbers will we add in problem 3? (8 and 2) • A tens frame is a tool that can be used to help add numbers. • Using counters and a tens frame, 8 red counters are put into the tens frame to show the first addend, 8. • Then the same is done with 2 yellow counters for the second addend, 2. • How does the tens frame look? (It is full.) • When a tens frame is full, it models the number 10. • What is 8 plus 2? (10) **Problem 4**

	• What numbers will we add in problem 2? (9 and 3) • Counters and a tens frame can be used to find the sum. • Nine red counters for the first addend are put into the tens frame. • Is it full? (no) • Can 3 yellow counters for the second addend fit into the tens frame? (no) • How many of the yellow counters can fit into the tens frame? (1) • How many yellow counters are still outside the tens frame? (2) • Find the sum of the numbers by adding the 10 counters in the tens frame to the 2 counters outside the tens frame. • Show the addition problem 10 1 2 5 12 on the board or overhead. How many counters are there in all? (12) • What is 9 plus 3? (12)

Day 4 - Lesson PL 2

Objective	Lesson PL 2: To use counters and a tens frame to add two 1-digit numbers (sums to 18) by regrouping to make a 10.
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Try It Together pg. 6 – Student Book** Work with students to complete these skills. **SCAFFOLD INSTRUCTION** Before starting this section, read aloud and discuss the instruction line with students. • You may have students use counters and a tens frame to model each problem. **Problem 5** • What numbers will we add in problem 5? (9 and 5) • How many red counters are in the tens frame? (9) • The 9 red counters show the first addend, 9. • How many yellow counters are there? (5) • The 5 yellow counters show the second addend, 5. • How many yellow counters are needed to fill the tens frame? (1) How many yellow counters are outside the tens frame? (4) • What addition problem is shown by the counters and tens frame? (10 1 4) • How many counters are there in all? (14) • What is 9 plus 5? (14) **Problem 6** • How many red counters are in the tens frame? (6) • How many yellow counters are needed to fill the tens frame? (4) • How many yellow counters are outside the tens frame? (2) • How many counters are there in all? (12) • Why? (10 1 2 5 12) • What is 6 plus 6? (12)

Day 5 - Lesson PL 2

Objective	Lesson PL 2: To use counters and a tens frame to add two 1-digit numbers (sums to 18) by regrouping to make a 10.
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Using a 10 Frame pg. 7 - Student Book (use coins or other household items as counters)** This problem illustrates the Using a Tens Frame strategy. • Student(s) are shown how the four-step problem-solving process is used to solve a word problem involving addition. • Have student(s) identify if the question is asking them to put the stickers together, add to the stickers, take stickers away, or compare numbers of stickers. • Relate the action of putting the stickers together to addition. • Have student(s) model the number of each kind of sticker using two different colors of counters. • Then have student(s) put the counters for the boat stickers into the tens frame. Ask how many more are needed to fill the frame. • Then have student(s) move 2 of the counters for the plane stickers into the frame to fill it, leaving the remaining 2 counters outside. • Ask students what number is represented by a full tens frame and 2 more counters. • Ask student(s) to tell what the sum 12 means in the context of the problem. • Ask student(s) to show that their answer makes sense by counting on from 8 four times.

Adding in Any Order

Name _____ Class _____ Date _____

Get Started

1 

_____ + _____ = _____

2 4 + 3 = _____

3 

_____ + _____ = _____

_____ + _____ = _____

How To

Add 5 and 3 in two different ways.

Step 1

Write an addition sentence.

_____ + _____ = _____

Think: Which addend should be first?

Step 2

Change the order of the addends.

_____ + _____ = _____

You Need

Try It Together

Add.

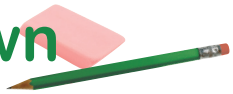
4. $2 + 4 =$ _____

   $4 + 2 =$ _____

5. $8 + 1 =$ _____

   $1 + 8 =$ _____

Work On Your Own



Add.

6. $8 + 2 =$ _____

   $2 + 8 =$ _____

7. $5 + 1 =$ _____

   $1 + 5 =$ _____

8. $4 + 3 =$ _____

   $3 + 4 =$ _____

9. $3 + 6 =$ _____

   $6 + 3 =$ _____

Solve the problem.

10. Ben has 4 seashells. He finds 6 more seashells. How many seashells does Ben have in all?

    _____ + _____ = _____ seashells

    Anna has 6 seashells. She finds 4 more seashells. How many seashells does Anna have in all?

    _____ + _____ = _____ seashells

Academic Vocabulary
tens frame

Making a 10 to Add

Name _____ Class _____ Date _____

Get Started

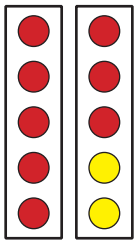
1 $5 + 2 =$ _____

$2 + 5 =$ _____

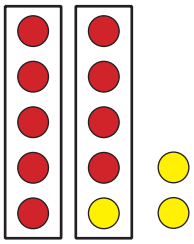
2 $3 + 7 =$ _____

$7 + 3 =$ _____

3 $8 + 2 =$ _____



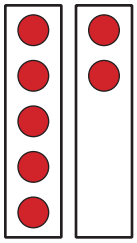
4 $9 + 3 =$ _____



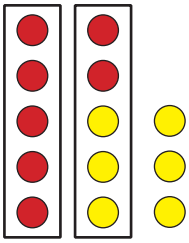
How To

Add 7 and 6.

Step 1
Use red counters for the first addend.



Step 2
Use yellow counters for the second addend.



Think: If I have 7, how many more do I need to make a 10?

Step 3
Write the sum.

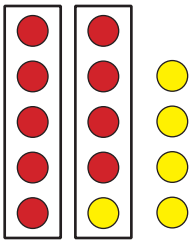
$7 + 6 =$ _____

You Need

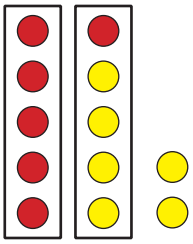
Try It Together

Add.

5 $9 + 5 =$ _____



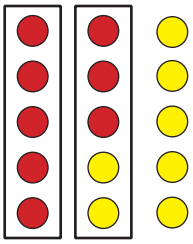
6 $6 + 6 =$ _____



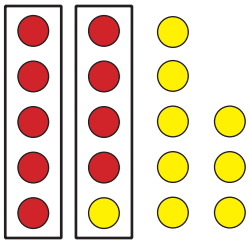
Work On Your Own

Add.

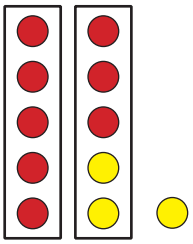
7 $8 + 7 =$ _____



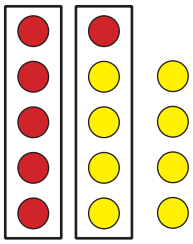
8 $9 + 9 =$ _____



9 $8 + 3 =$ _____



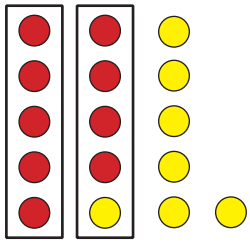
10 $6 + 8 =$ _____



Solve the problem.

11 Luke has 9 stamps. He buys 7 more stamps. How many stamps does Luke have in all?

$9 + 7 =$ _____ stamps



Using a Tens Frame

Problem-Solving

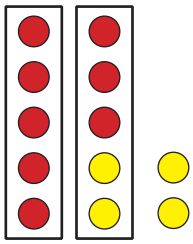
Abby has 8 boat stickers and 4 plane stickers. How many stickers does Abby have in all?

Find how many boat and plane stickers Abby has in all

How Use a tens frame and counters to add.

Solve

8 + 4 = _____



Abby has _____ stickers in all.

Explain

Does my answer make sense? Explain. _____

_____

Check Up

Fill in the bubble of the correct answer.

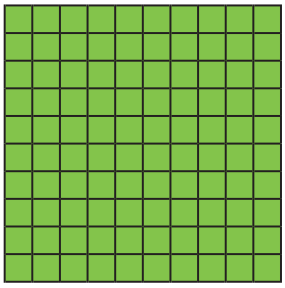
12 Which addition sentence gives you the same sum as 9 + 6?

⬭ 10 + 5 = 15 ⬭ 10 + 6 = 16 ⬭ 10 + 9 = 19

13 How would you use counters and a tens frame to add 7 and 7? Talk it over.

Name _____ Class _____ Date _____

Workmat

Ones 	
Tens 	
Hundreds 	

Name _____ Class _____ Date _____

Addition Facts to 18

1 + 1 = _____	1 + 2 = _____	1 + 3 = _____
2 + 1 = _____	2 + 2 = _____	2 + 3 = _____
3 + 1 = _____	3 + 2 = _____	3 + 3 = _____
4 + 1 = _____	4 + 2 = _____	4 + 3 = _____
5 + 1 = _____	5 + 2 = _____	5 + 3 = _____
6 + 1 = _____	6 + 2 = _____	6 + 3 = _____
7 + 1 = _____	7 + 2 = _____	7 + 3 = _____
8 + 1 = _____	8 + 2 = _____	8 + 3 = _____
9 + 1 = _____	9 + 2 = _____	9 + 3 = _____

1 + 4 = _____	1 + 5 = _____	1 + 6 = _____
2 + 4 = _____	2 + 5 = _____	2 + 6 = _____
3 + 4 = _____	3 + 5 = _____	3 + 6 = _____
4 + 4 = _____	4 + 5 = _____	4 + 6 = _____
5 + 4 = _____	5 + 5 = _____	5 + 6 = _____
6 + 4 = _____	6 + 5 = _____	6 + 6 = _____
7 + 4 = _____	7 + 5 = _____	7 + 6 = _____
8 + 4 = _____	8 + 5 = _____	8 + 6 = _____
9 + 4 = _____	9 + 5 = _____	9 + 6 = _____

1 + 7 = _____	1 + 8 = _____	1 + 9 = _____
2 + 7 = _____	2 + 8 = _____	2 + 9 = _____
3 + 7 = _____	3 + 8 = _____	3 + 9 = _____
4 + 7 = _____	4 + 8 = _____	4 + 9 = _____
5 + 7 = _____	5 + 8 = _____	5 + 9 = _____
6 + 7 = _____	6 + 8 = _____	6 + 9 = _____
7 + 7 = _____	7 + 8 = _____	7 + 9 = _____
8 + 7 = _____	8 + 8 = _____	8 + 9 = _____
9 + 7 = _____	9 + 8 = _____	9 + 9 = _____

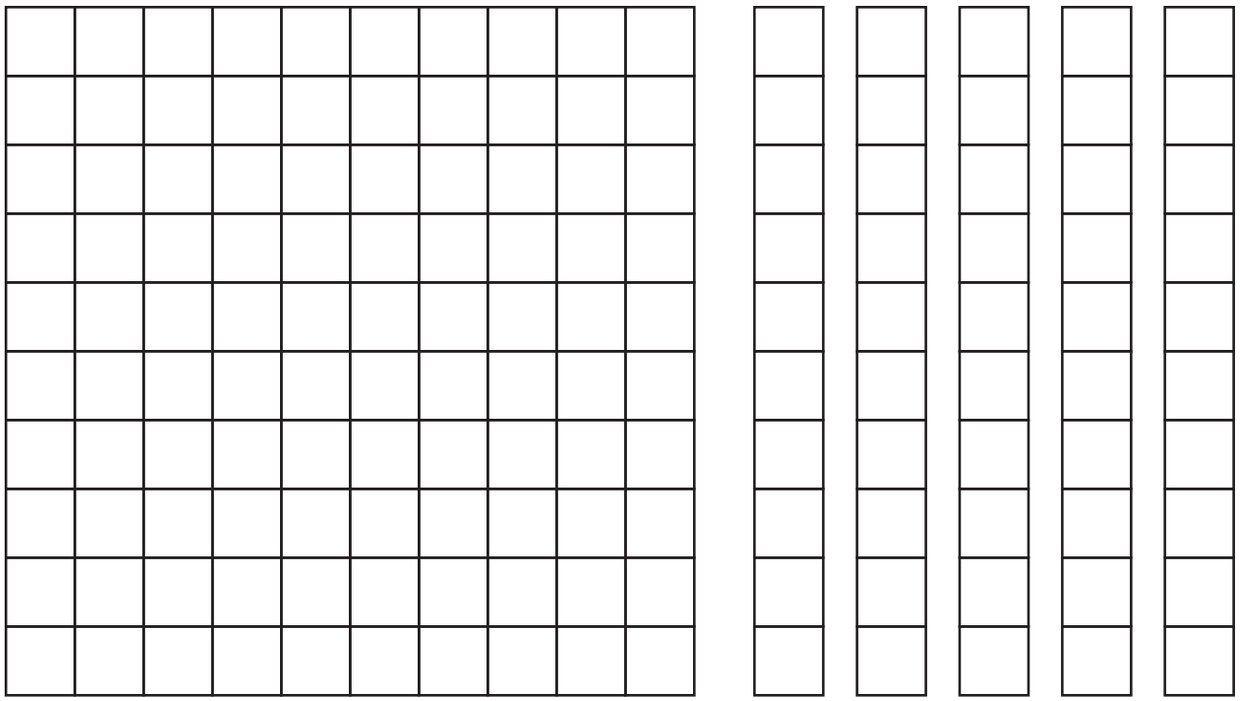
Name _____ Class _____ Date _____

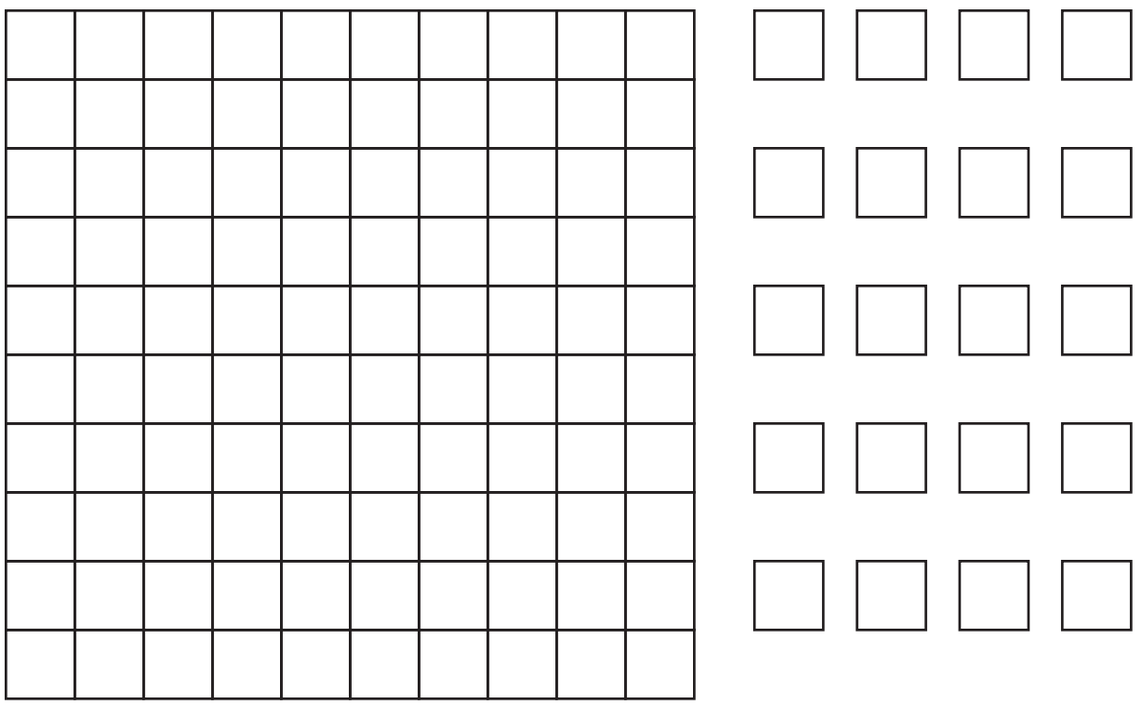
Addition Grid

+	1	2	3	4	5	6	7	8	9	10
1	2	3	4	5	6	7	8	9	10	11
2	3	4	5	6	7	8	9	10	11	12
3	4	5	6	7	8	9	10	11	12	13
4	5	6	7	8	9	10	11	12	13	14
5	6	7	8	9	10	11	12	13	14	15
6	7	8	9	10	11	12	13	14	15	16
7	8	9	10	11	12	13	14	15	16	17
8	9	10	11	12	13	14	15	16	17	18
9	10	11	12	13	14	15	16	17	18	19
10	11	12	13	14	15	16	17	18	19	20

Name _____ Class _____ Date _____

Base-10 Pieces





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Distance Learning Packet

MiCI Program

Math 6-8

Week 4: May 4 – 8, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

DETROIT PUBLIC SCHOOLS COMMUNITY DISTRICT

Week of 5/04/20 to 5/08/20

Directions: Lessons created to introduce and reinforce mathematic concepts. <Complete 1 Lesson a day unless otherwise noted>

Target Goal/Objective(s) Lesson 1: To add 2-digit numbers with no regrouping
Lesson 2: To regroup ones as tens

Module Module 2: Addition

Topic

Materials Needed: colored pencils or crayons and items used for counting (i.e. coins)
Work mat, Student Book page 57

	Activity	Do	Extend
Day 1	Lesson 1	Adding 2-Digit Numbers with No Regrouping pg. 9	Learn from home activity
Day 2	Lesson 1	Try It Together pg. 10	Learn from home activity
Day 3	Lesson 1	Using a Model pg. 11	Learn from home activity
Day 4	Lesson 2	Regrouping Ones as Tens pg. 13	Learn from home activity
Day 5	Lesson 2	Try It Together pg. 14	Learn from home activity

Day 1 - Lesson 1

Objective	Lesson 1: To add 2-digit numbers with no regrouping
Video Link	https://www.coolmath4kids.com › manipulatives › base-ten-blocks
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Academic Vocabulary pg. 9 Student Book** Before the lesson, introduce and discuss the Academic Vocabulary. Refer to the Academic Vocabulary as needed during the lesson. • equal bar: the line under an addition problem when the addends are one on top of the other. **REVIEW PRESKILLS Problem 1** • In problem 1, how do you add 4 and 5? (count on from 4 five times) • Count on from 4 five times: 4…, 5, 6, 7, 8, 9. • What is 4 plus 5? (9) **Problem 2** • In problem 2, how do you add 1 and 2? (count on from 1 two times) • Count on from 1 two times: 1…, 2, 3. • What is 1 plus 2? (3) **MODEL NEW SKILLS Problem 3** • Point out that the ones block and tens rods next to the addition problem model the two addends in the problem. • Also point out that the addends are written with one above the other and the sum will go under the equal bar. • In problem 3, we will find the sum of two 2-digit numbers. • What numbers will we add? (14 and 25) • When you add 2-digit numbers, it is important to add the digits in the ones column first. • The ones column is on the right. How many ones are in the number 14? (4) • Draw a ring around the 4 ones blocks. • How many ones are in 25? (5) • Draw a ring around the 5 ones blocks. How many ones blocks did you draw rings around in all? (9) • What is 4 plus 5? (9) Write 9 in the ones column under the equal bar. • Now add the digits in the tens column.

	• How many tens are there in 14? (1) Draw a ring around the 1 tens rod. • How many tens are in 25? (2) • Draw a ring around the 2 tens rods. How many tens rods did you draw rings around in all? (3) • What is 1 plus 2? (3) Write 3 in the tens column under the equal bar. • The sum of 14 and 25 is the number written under the equal bar. • What is the sum of 14 and 25? (39) **Problem 4** • In problem 4, we will find the sum of two 2-digit numbers. • What numbers will we add? (26 and 32) • When you add 2-digit numbers, it is important to add the digits in the ones column first. • How many ones are in 26? (6) Draw a ring around the 6 ones blocks. • How many ones are in 32? (2) Draw a ring around the 2 ones blocks. • How many ones blocks did you draw rings around in all? (8) • What is 6 plus 2? (8) Write 8 in the ones column under the equal bar.

Day 2 - Lesson 1

Objective	Lesson 1: To add 2-digit numbers with no regrouping
Video Link	https://www.coolmath4kids.com › manipulatives › base-ten-blocks
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Try It Together pg. 10 Student Book** Work with students to complete these skills. **SCAFFOLD INSTRUCTION** Before starting this section, read aloud and discuss the instruction line with students. • You may have students use base-10 pieces to model each problem. **Problem 5** In problem 5, we will add two 2-digit numbers. • What numbers will we add? (51 and 27) First add the ones. • How many ones are in 51? (1) • How many ones are in 27? (7) • What is 1 plus 7? (8) How many ones are there in all? (8) Write 8 in the ones column under the equal bar. • Now add the tens. How many tens are in 51? (5) • How many tens are in 27? (2) What is 5 plus 2? (7) • Write 7 in the tens column under the equal bar. • The sum of 51 and 27 is the number written under the equal bar. • What is 51 plus 27? (78) **Problem 6** • What numbers will we add in problem 6? (34 and 13) • What numbers are in the ones column? (4 and 3) What is 4 plus 3? (7) • Write 7 in the ones column under the equal bar. • What numbers are in the tens column? (3 and 1) What is 3 plus 1? (4) • Write 4 in the tens column under the equal bar. What is 34 plus 13? (47)

Day 3 - Lesson 1

Objective	Lesson 1: To add 2-digit numbers with no regrouping
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**This problem illustrates the Using a Model strategy**. **Pg. 11 Student Workbook** • Student(s) are shown how the four-step problem-solving process is used to solve a word problem involving addition. • Ask student(s) why addition is needed to solve the problem. • Ask students to describe what numbers are to be added. • Have student(s) identify the numbers in the vertical addition problem and connect these to the numbers in the problem. • Have student(s) describe the models for the addends. • Ask how they would add using the models. • Translate this process to adding in the vertical addition problem. • Make the connection between combining the ones blocks and adding the ones' digits. • Then make the connection between combining the tens rods and adding the tens' digits. • After student(s) find the sum, ask them what the sum 49 means in the context of the problem. • Ask student(s) to show that their answer makes sense by counting the base-10 pieces.

Day 4 - Lesson 2

Objective	Lesson 2: To regroup ones as tens
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Academic Vocabulary pg. 13 Student Book** Before the lesson, introduce and discuss the Academic Vocabulary. Refer to the Academic Vocabulary as needed during the lesson. • Regroup: to trade 10 ones for 1 ten or 10 tens for 1 hundred when adding **REVIEW PRESKILLS Problem 1** • Look at the base-10 pieces in problem 1 on the left. • How many tens rods do you see? (0) Write 0 on the line before the word tens. • How many ones blocks do you see? (13) Write 13 on the line before the word ones. What number is shown by 13 ones blocks? (13) • When there are more than 9 ones blocks, you can trade ones blocks for tens rods. • Draw a ring around 10 of the ones blocks. When you trade 10 ones blocks, how many tens rods should you get? (1) • When you make this trade, it is called regrouping. The base-10 pieces in problem 1 on the right show how to regroup. • How many tens rods do you see? (1) How many ones blocks do you see? (3) • So, 13 ones make 1 ten and 3 ones. • When there are more than 9 ones blocks, you can trade ones blocks for tens rods. Draw a ring around 10 of the ones blocks. When you trade 10 ones blocks, how many tens rods should you get? (1) • When you make this trade, it is called regrouping. The base-10 pieces in problem 1 on the right show how to regroup. • How many tens rods do you see? (1) How many ones blocks do you see? (3) So, 13 ones make 1 ten and 3 ones.

Day 5 - Lesson 2

Objective	Lesson 2: To regroup ones as tens
Video Link	
Guided Practice	With a family member, caregiver, or friend, complete the recommended lessons as indicated.
Closing	
Extend	
Intervention	**Try It Together pg. 14 Student Book** Work with students to complete these skills. SCAFFOLD INSTRUCTION Before starting this section, read aloud and discuss the instruction line with students. • You may have students use their work mats and base-10 pieces to model each problem. **Problem 2** • What numbers will we add in problem 2? (18 and 5) • First, add the ones. How many ones are in 18? (8) • How many ones are in 5? (5) What is 8 plus 5? (13) • How many ones are there in all? (13) • When there are more than 9 ones, you must regroup 10 ones to make 1 ten. When 10 ones are taken from 13 ones, how many ones do you have left? (3) • Write 3 in the ones column under the equal bar. • Add the new ten that you grouped together to the tens column by writing 1 in the blue box at the top of the tens column. • What numbers are in the tens column? (1 and 1) Add these numbers. • What is 1 plus 1? (2) How many tens are there in all? (2) • What is 18 plus 5? (23) The sum can be checked by counting on. To add 18 and 5, count on from 18 five times: 18…, 19, 20, 21, 22, 23. **Problem 3** • What numbers will we add in problem 3? (31 and 9) • First, add the ones. How many ones are in 31? (1) • How many ones are in 9? (9) What is 1 plus 9? (10) How many ones are there in all? (10) Is regrouping needed? (yes) • Why? (There are more than 9 ones.) • So, regroup the 10 ones as 1 ten. How many ones do you have left? (0) Because there are no ones, write 0 in the ones column under the

	equal bar. Add the new ten to the tens column by writing 1 in the blue box at the top of the tens column. • What numbers are in the tens column? (1 and 3) Now add these numbers. What is 1 plus 3? (4) How many tens are there in all? (4) • What is 31 plus 9? (40) The sum can be checked by counting on. • To add 31 and 9, count on from 31 nine times: 31…, 32, 33, 34, 35, 36, 37, 38, 39, 40.

Adding 2-Digit Numbers with No Regrouping

Name _____ Class _____ Date _____

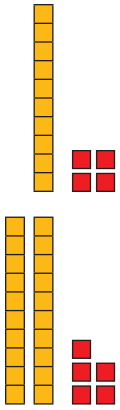
Get Started

1 $4 + 5 =$ _____

2 $1 + 2 =$ _____

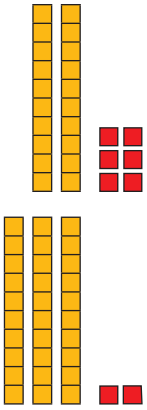
3

	1	4
+	2	5



4

	2	6
+	3	2



How To

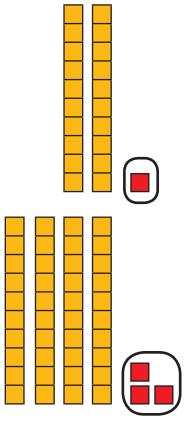
Add 21 and 43.

Think: Is the ones column on the right or on the left?

Step 1

Add the ones.

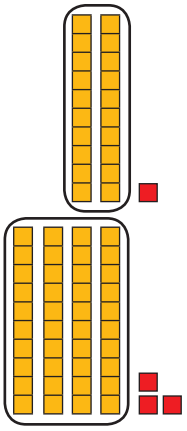
	2	1
+	4	3



Step 2

Add the tens.

	2	1
+	4	3



Try It Together

Add.

5

$$\begin{array}{r} 51 \\ +\ 27 \\ \hline \end{array}$$

6

$$\begin{array}{r} 34 \\ +\ 13 \\ \hline \end{array}$$

Work On Your Own

Add.

7

$$\begin{array}{r} 42 \\ +\ 32 \\ \hline \end{array}$$

8

$$\begin{array}{r} 32 \\ +\ 26 \\ \hline \end{array}$$

9

$$\begin{array}{r} 85 \\ +\ 14 \\ \hline \end{array}$$

10

$$\begin{array}{r} 18 \\ +\ 41 \\ \hline \end{array}$$

11

$$\begin{array}{r} 62 \\ +\ 34 \\ \hline \end{array}$$

12

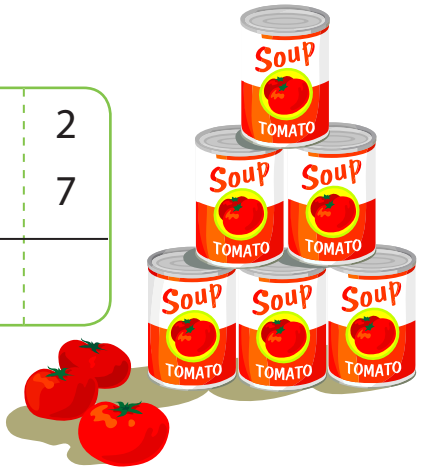
$$\begin{array}{r} 37 \\ +\ 22 \\ \hline \end{array}$$

Solve the problem.

13 There are 22 cans of soup on a shelf.
There 37 cans of soup on another shelf.
How many total cans of soup are there?

_____ cans

$$\begin{array}{r} 22 \\ +\ 37 \\ \hline \end{array}$$



Using a Model

Problem-Solving

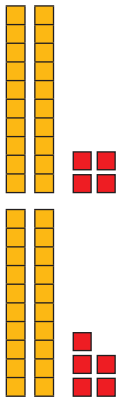
There are 24 students in John's class. There are 25 students in Melina's class. How many students are in both classes?

Find the total number of students

How Use base-10 pieces to add.

Solve

	2	4
+	2	5



There are _____ students in both classes.

Explain Does my answer make sense? Explain. _____

_____

Check Up

Fill in the bubble of the correct answer.

14 Which problem has a sum of 68?

◯ 24 + 62	◯ 25 + 33	◯ 46 + 22

15 How would you use tens rods and ones blocks to add 56 and 13? Talk it over.

Regrouping Ones as Tens

Name _____ Class _____ Date _____

Get Started

1

Tens	Ones

Tens	Ones

Regroup: _____ tens _____ ones → _____ ten _____ ones

How To

Add 28 and 4.

Think: What is the greatest number of ones blocks that could be in the ones column?

Step 1

Use base-10 pieces to show the problem.

Tens	Ones

	Tens	Ones
	2	8
+		4

Step 2

Add the ones. Regroup 10 ones as 1 ten.

Tens	Ones

	Tens	Ones
	2	8
+		4

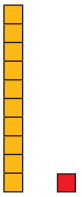
Step 3

Add the tens.

Tens	Ones

	Tens	Ones
	2	8
+		4

You Need



Try It Together

Add.

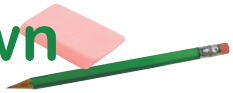
2

$$\begin{array}{r} \square\,1\,8 \\ +\quad 5 \\ \hline \end{array}$$

3

$$\begin{array}{r} \square\,3\,1 \\ +\quad 9 \\ \hline \end{array}$$

Work On Your Own



Add.

4

$$\begin{array}{r} \square\,3\,8 \\ +\quad 6 \\ \hline \end{array}$$

5

$$\begin{array}{r} \square\,4\,9 \\ +\quad 3 \\ \hline \end{array}$$

6

$$\begin{array}{r} \square\,7\,8 \\ +\quad 2 \\ \hline \end{array}$$

7

$$\begin{array}{r} \square\,2\,6 \\ +\quad 5 \\ \hline \end{array}$$

8

$$\begin{array}{r} \square\,5\,8 \\ +\quad 9 \\ \hline \end{array}$$

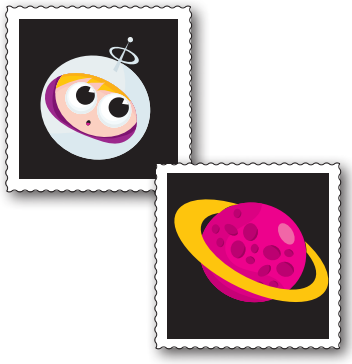
9

$$\begin{array}{r} \square\,6\,3 \\ +\quad 9 \\ \hline \end{array}$$

10 Eli has 35 stickers. Anna gives him 7 more stickers. How many stickers does Eli have in all?

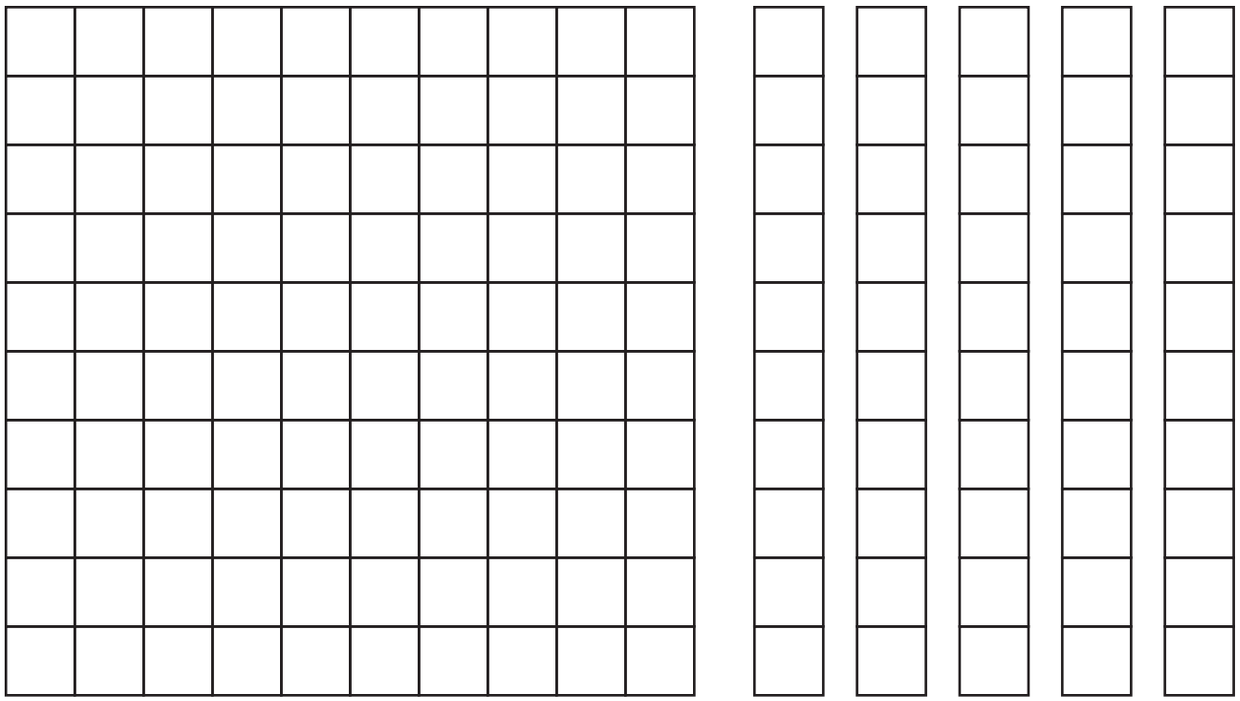
_____ stickers

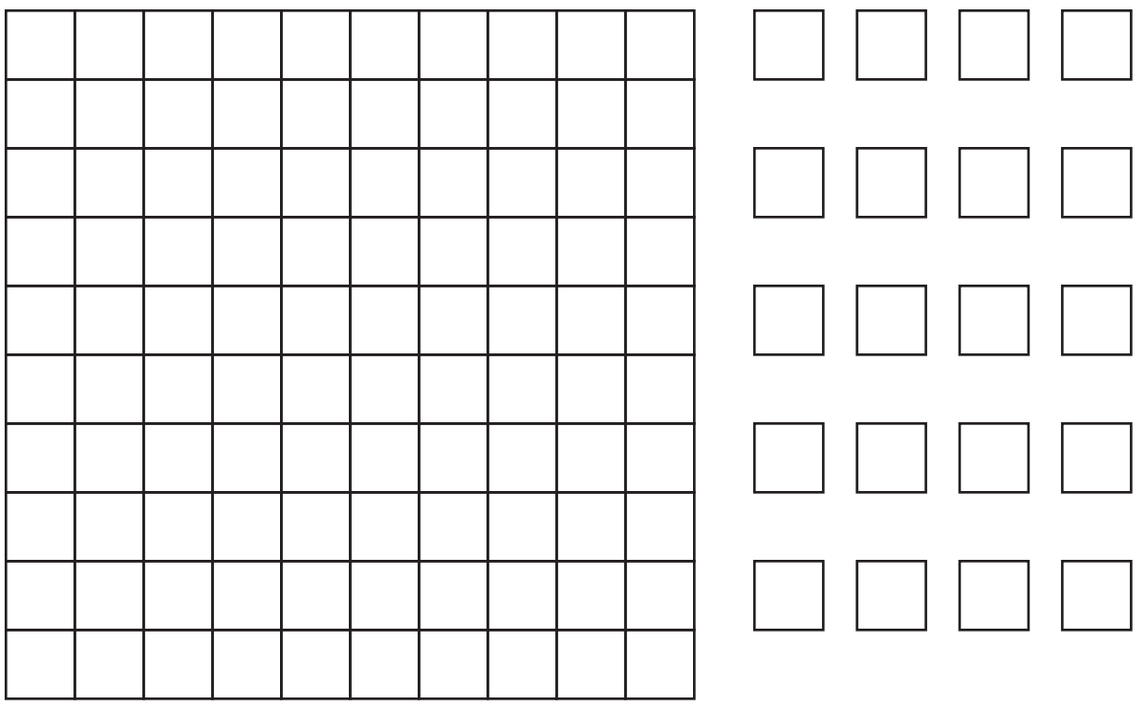
$$\begin{array}{r} \square\,3\,5 \\ +\quad 7 \\ \hline \end{array}$$



Name _____ Class _____ Date _____

Base-10 Pieces





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Distance Learning Packet

MiCI Program

Math 6-8

Week 5: May 11– 15, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

Week of 5/11/20 to 5/15/20

Directions: Parents/Guardians and/or family members will engage middle school students in Math activities and focus on subtracting up to 3-digits WITH and WITHOUT regrouping.

Goal/Objective(s) The student should solve addition and subtraction problems with various sums and difference.

Module Module 3: Subtraction

Materials Needed: VMath Student Workbook C, Workmat (pg. 57-58) pencil and Mix It Up cards (Pg. 59).

Target

1. The student will focus on solving by addition and subtraction, problems with differences of 0 to 50.
2. The student can identify correct representations of whole numbers to 50 using models, such as base 10 blocks.
3. The student can count by tens to 100 using objects, base ten blocks.
4. The student can solve one-step real world problems using addition or subtraction with sums and differences within 60

Week 5	Activity	Do	Task
Day 1	Subtract 2-Digit Numbers with Regrouping	Lesson 2 Pg. 13-16	Home activity and Online Video
Day 2	Solving Subtraction Problems	Lesson 3 Pg. 17-20	Home activity and Online Video
Day 3	Solving Multi-Step Subtraction Problems	Lesson 4 Pg. 21-24	Home activity and Online Video
Day 4	Subtract 3-Digit Numbers with No Regrouping	Lesson 9 Pg. 41-44	Home activity and Online Video
Day 5	Subtract 3-Digit Numbers with Regrouping	Lesson 10 Pg. 45-48	Home activity and Online Video

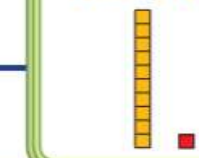
Week 5: Module 3

Objective	1. The student will focus on solving by addition and subtraction, problems with differences of 0 to 50. 2. The student can identify correct representations of whole numbers to 50 using models, such as base 10 blocks. 3. The student can count by tens to 100 using objects, base ten blocks. 4. The student can solve one-step real world problems using addition or subtraction with sums and differences within 60.
Video Link	https://www.youtube.com/watch?v=pv8URIRgCdo
Guided Practice	With a family member, caregiver, or friend, complete these recommended application problems and/or problems sets: **Lesson 2 Pg. 13-16** **Lesson 3 Pg. 17-20** **Lesson 4 Pg. 21-24** **Lesson 9 Pg. 41-44** **Lesson 10 Pg. 45-48**
Closing	Share your math work with someone and tell them which problems were "easy" and which you need to practice more.
Extend	Consider completing supplemental work for additional practice: ● End of Workbook: Module 3 (pages 49-59).
Intervention	Practice the following application problems, previous week's modules and lessons to prepare you for next week's lesson.

Module 3 Application Problems and Problem Sets for Print

Lesson PL1

You Need



Try It Together

Subtract.

5

	5	7
−	1	3

6

	6	5
−	4	2

Work On Your Own

Subtract.

7

	3	8
−	1	0

8

	2	9
−	2	4

9

	5	5
−	2	3

10

	3	4
−	2	4

Solve each problem.

11 Dan has 39 marbles. He gives away 15 marbles. How many marbles does Dan have left?

_____ marbles

	3	9
−	1	5

12 Juanita has 25 marbles. She gives away 12 marbles. How many marbles does she have left?

_____ marbles

	2	5
−	1	2

Problem-Solving

Using a Table

How many more people were born in March than in April?

Month	February	March	April
People	20	34	11

Find how many more people were born in March than in April

How Look at the table. Subtract the number of people born in April from the number of people born in March.

Solve Subtract 11 from 34.

_____ more people were born in March than in April.

$$\begin{array}{r} 34 \\ -\ 11 \\ \hline \end{array}$$

Explain Does my answer make sense? Explain.

_____

_____

Check Up

Fill in the bubble of the correct answer.

13 Which problem has a difference of 16?

○ $\begin{array}{r} 39 \\ -\ 23 \\ \hline \end{array}$ ○ $\begin{array}{r} 48 \\ -\ 22 \\ \hline \end{array}$ ○ $\begin{array}{r} 57 \\ -\ 42 \\ \hline \end{array}$

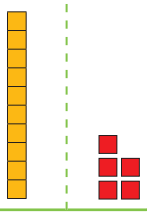
14 Write a subtraction problem. The difference should have no ones. What do you notice about the number of ones in each number? Talk it over.

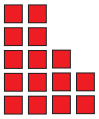
Subtracting 2-Digit Numbers with Regrouping

Name _____ Class _____ Date _____

Get Started

1

Tens	Ones
	

Tens	Ones
	

Regroup: _____ ten _____ ones → _____ tens _____ ones

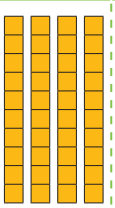
Think: Can you subtract 8 ones from 5 ones?

How To

Subtract 28 from 45.

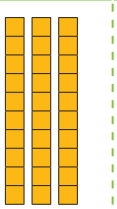
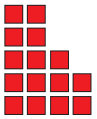
Step 1

Model 45 using base-10 pieces.

Tens	Ones
	
4	5
− 2	8

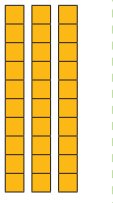
Step 2

Regroup 1 ten as 10 ones.

Tens	Ones
	
4	5
− 2	8

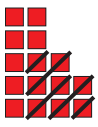
Step 3

Subtract the ones.

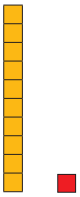
Tens	Ones
	
3	15
~~4~~	~~5~~
− 2	8

Step 4

Subtract the tens.

Tens	Ones
	
3	15
~~4~~	~~5~~
− 2	8

You Need



Try It Together

Subtract. Regroup if needed.

2

	4	1
−	2	5

3

	3	5
−	1	8

Work On Your Own

Subtract. Regroup if needed.

4

	4	3
−	1	9

5

	5	3
−	2	4

6

	4	2
−	1	3

7

	6	2
−	2	5

8

	4	5
−	1	7

9

	3	4
−	1	7

Solve the problem.

10 Corey has 47 seashells. He gives away 19 seashells. How many seashells does Corey have left?

_____ seashells

	4	7
−	1	9

Problem-Solving

Using a Table

How many more pets were sold on Friday than on Thursday?

Day	Tuesday	Wednesday	Thursday	Friday
Pets	20	12	16	33

Find how many more pets were sold on Friday than on Thursday

How Subtract the number of pets sold on Thursday from the number of pets sold on Friday.

Solve

$$\begin{array}{r} \square\ \square \\ 3\ \ 3 \\ -\ 1\ \ 6 \\ \hline \end{array}$$

There were _____ more pets sold on Friday.

Explain Does my answer make sense? Explain.

_____

_____

Check Up

Fill in the bubble of the correct answer.

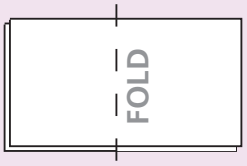
11 In which problem is regrouping needed to subtract?

○ 37 − 19	○ 37 − 5	○ 37 − 25

12 Write a subtraction problem. Do you need to regroup to subtract? Talk it over.

Center 1: Make a Problem Book

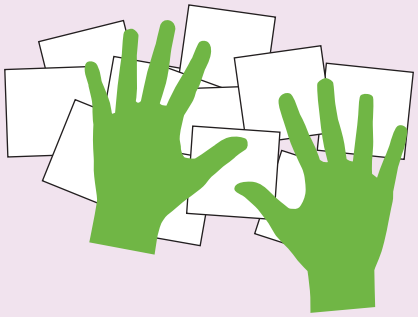
1. Take 2 half-sheets of paper.
   Fold them down the middle. Staple them.
2. Make a cover for the book.
3. Write 1 word problem for each page.
   Make them go with these problems:

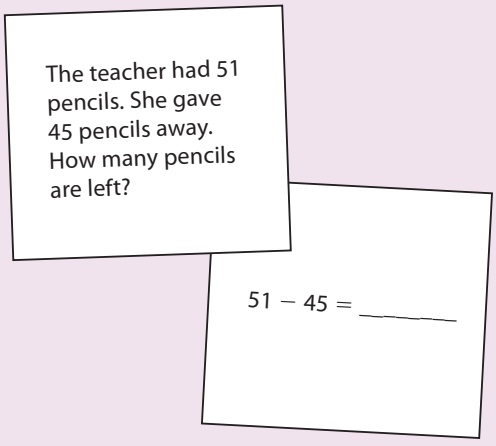


46	25	31	47
− 12	− 17	− 9	− 39

Center 2: Mix It Up

1. Cut out the Mix It Up cards on page 59.
2. Shuffle the cards. Lay them facedown in a grid.
3. Each player takes a turn.
4. Flip 2 cards. Match a word problem card with a problem card.
5. If the cards do not match, put them back facedown.
6. If a match is found, solve the problem.
7. If the answer is correct, keep the cards.
8. The player with the most matches wins.





Solving Subtraction Problems

Name _____ Class _____ Date _____

Get Started

1

	4	2
−	1	5

How To

Jan has 55 stamps. She gives 26 stamps to her sister. How many stamps does Jan have left?

Think: Which sentence tells me what I need to find?

Step 1

Find: the number of stamps Jan has left

Step 2

How? Subtract _____ from _____.

Step 3

Solve.

	5	5
−	2	6

Jan has _____ stamps left.

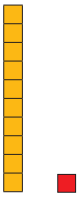
Step 4

Does my answer make sense? Explain.

_____

_____

You Need



Try It Together

Solve the problem.

2 Rick has 68 pennies. He spends 45 pennies on a marker. How many pennies does Rick have left?

a. **Find:** _____

b. **How?** Subtract _____ from _____.

c. **Solve.**

	6	8
–	4	5

Rick has _____ pennies left.

d. **Does my answer makes sense? Explain.** _____

_____

_____

_____

Work On Your Own

Solve the problem.

3 There are 42 flowers in a garden. There are 25 red flowers. The rest of the flowers are yellow. How many yellow flowers are in the garden?

_____ yellow flowers

	4	2
–	2	5

Explain It

Jason says the answer to this problem is 92 beads. Is he right?

Ann had 53 beads. She used 39 beads to make a necklace. How many beads does Ann have left?

Check Up

Fill in the bubble of the correct answer.

4 Yoko baked 42 cookies. She gave 14 cookies to her friends. How many cookies did Yoko have left?

What are you trying to find?

- ⬭ the number of cookies Yoko baked
- ⬭ the number of cookies Yoko gave to her friends
- ⬭ the number of cookies Yoko had left

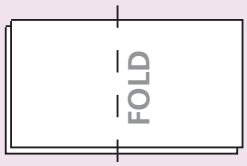
5 Read this problem:

Pam has 31 shells. She gives 10 shells to her brother. How many shells does Pam have left?

How can you find the answer? Talk it over.

Center 1: Make a Subtraction Problem Book

1. Take 2 half-sheets of paper. Fold them down the middle. Staple them.



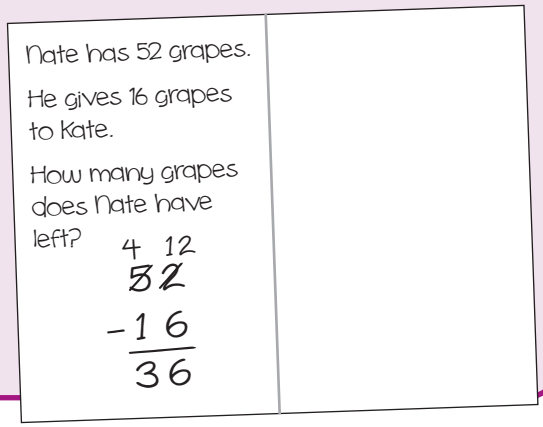
2. Make a cover for the book.

3. Work by yourself. Write 1 subtraction word problem for each page.

   Make them go with the subtraction problems below. Show the subtraction problem and the difference on your page.

52	37	48	64
− 16	− 25	− 33	− 45

4. Share your Subtraction Problem Book with your partner. Check each other's work.



Solving Multi-Step Subtraction Problems

Name _____ Class _____ Date _____

Get Started

1

	3	2
–	1	7

2

_____ green marbles, _____ blue marbles

Neil has _____ green marbles. He has _____ blue marbles. How many more _____ marbles than _____ marbles does Neil have?

Neil has _____ more green marbles than blue marbles.

How To

Ashley has 74 beads. She uses 23 beads to make a bracelet. Then she uses 41 beads to make a necklace. How many beads does Ashley have left?

Step 1

Find: the number of beads _____

Step 2

How? Subtract twice to find the amount left.

Think: How many beads did she use?

Step 3

Solve. Beads left after bracelet

	7	4
–	2	3

Beads left after necklace

–	4	1

Ashley has _____ beads left.

Step 4

Does my answer make sense? Explain. _____

_____

_____

Try It Together

Solve the problem.

3 Hank has 85 crayons. He gives 21 crayons to Kara. He also gives 25 crayons to Matt. How many crayons does Hank have left?

a. **Find:** the number of crayons _____

b. **How?** Subtract twice to find the amount left.

c. **Solve.**

Crayons left after giving to Kara

	8	5
−	2	1

Crayons left after giving to Matt

−	2	5

Hank has _____ crayons left.

d. **Does my answer make sense? Explain.** _____

_____

_____

_____

Work On Your Own

Use the subtraction sentence to complete the word problem.

4 _____ red flags
_____ yellow flags

Rick has _____. He has _____. How many more _____ flags than _____ flags does Rick have?

Rick has _____ more red flags than yellow flags.

	5	9
−	3	6
	2	3

Explain It

Sasha wrote a word problem for the subtraction problem.

Andrew has 28 comic books. He gave 24 comic books to a friend. How many comic books does he have left?

Andrew has 52 comic books left.

Does Sasha's word problem match the subtraction problem? Explain.

	4	12
	~~5~~	~~2~~
−	2	4
	2	8

_____

_____

_____

_____

Check Up

Fill in the bubble of the correct answer.

5 Gail has 45 pencils. She gives 13 pencils to Mary. She gives 15 pencils to Sam. How many pencils does Gail have left?

- ⬭ 32 pencils
- ⬭ 28 pencils
- ⬭ 17 pencils

6 Tory has 38 Ping-Pong balls. She gives 12 balls to Maya. She gives 17 balls to Ned. How many Ping-Pong balls does she have left? How can you find the answer? Talk it over.

Center 1: Make Your Own Story Problem

1. Work with a partner. Use index cards to create object cards. Write one object on each card.

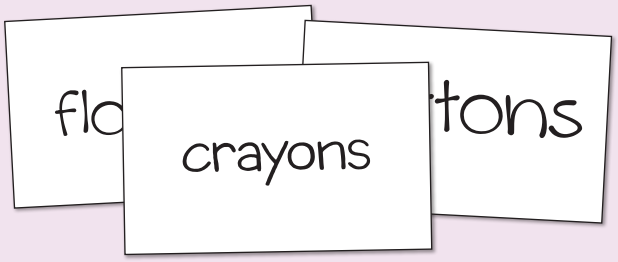
   Objects: Flowers, Buttons, Crayons, Marbles

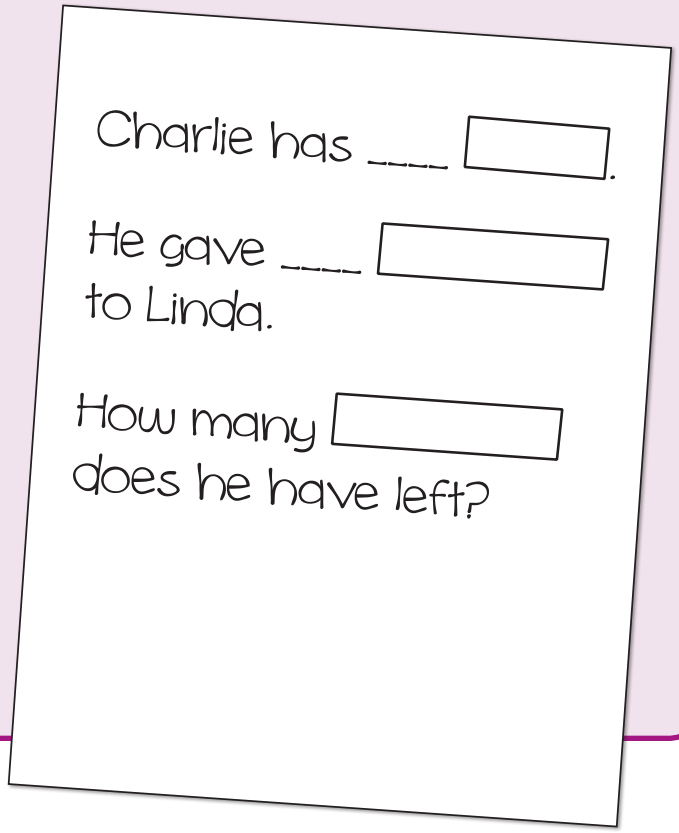
2. Mix up the object cards. Place the object cards facedown.

3. Copy the story problem onto a sheet of paper.

4. Pick a card. Write the object name in the boxes. Then use two different 2-digit numbers to fill in the blanks in the story problem. The first number should be greater than the second number.

5. Trade problems with a partner. Solve your partner's problem.





Subtracting 3-Digit Numbers with No Regrouping

Name _____ Class _____ Date _____

Get Started

1

$$\begin{array}{r} 3\ 5 \\ -\ 2\ 3 \\ \hline \end{array}$$

How To

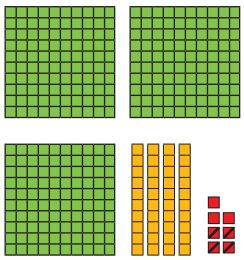
Think: Is the ones column on the right or on the left?

Subtract 104 from 347.

Step 1

Subtract the ones.

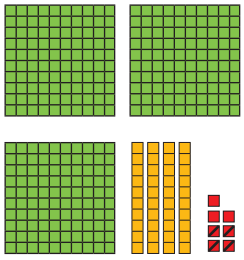
$$\begin{array}{r} 3\ 4\ 7 \\ -\ 1\ 0\ 4 \\ \hline \end{array}$$



Step 2

Subtract the tens.

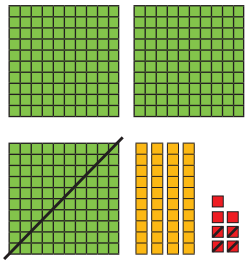
$$\begin{array}{r} 3\ 4\ 7 \\ -\ 1\ 0\ 4 \\ \hline \end{array}$$



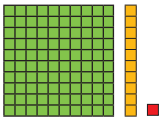
Step 3

Subtract the hundreds.

$$\begin{array}{r} 3\ 4\ 7 \\ -\ 1\ 0\ 4 \\ \hline \end{array}$$



You Need



Try It Together

Subtract.

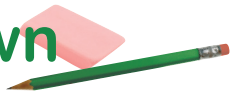
2

	8	4	6
−	3	0	4

3

	2	5	7
−	1	3	0

Work On Your Own



Subtract.

4

	2	7	5
−	1	4	2

5

	4	6	8
−	2	5	4

6

	8	5	4
−	3	2	0

7

	3	2	5
−	2	1	4

Solve the problem.

8 Kristy read a book with 165 pages. Noelle read a book with 134 pages. How many more pages did Kristy read than Noelle?

	1	6	5
−	1	3	4

_____ pages

Choosing an Operation

Problem-Solving

Alan read a book with 238 pages. Seth read a book with 288 pages. How many more pages did Seth read than Alan?

Find how many more pages Seth read

How Choose an operation. What operation is used to find how many more? _____

Solve

$$\begin{array}{r} 288 \\ -\ 238 \\ \hline \end{array}$$

Seth read _____ more pages than Alan.

Explain Does my answer make sense? Explain.

_____

_____

Check Up

Fill in the bubble of the correct answer.

9 What is the difference of 513 and 311?

$$\begin{array}{r} 513 \\ -\ 311 \\ \hline \end{array}$$

⬭ 824 ⬭ 202 ⬭ 102

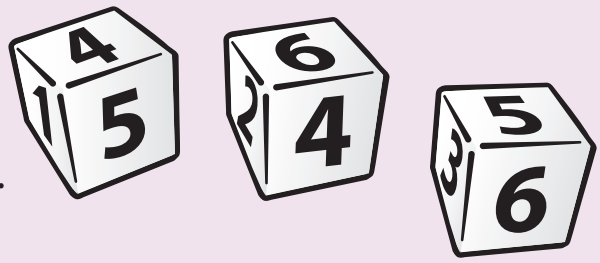
10 A number has 5 hundreds, 4 tens, and 6 ones. If 2 hundreds, 2 tens, and 5 ones are taken away, how many hundreds, tens, and ones are left? What is the value of the number? Talk it over.

_____

_____

Center 1: Who Has the Greater Difference?

1. Work with a partner. Each player takes a turn and makes a number.
2. Roll a 1–6 number cube. This is the number of hundreds in your number.
3. Roll the number cube again. This is the number of tens in your number.
4. Roll the number cube again. This is the number of ones in your number.
5. Subtract your number from 999.
6. The player with the greater difference gets 1 point.
7. Play again. Repeat Steps 2–6.
8. The game ends when one player has 10 points. That player is the winner.



465

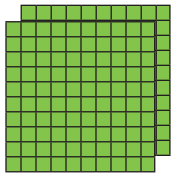
999
-465
534

Subtracting 3-Digit Numbers with Regrouping

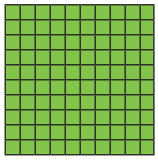
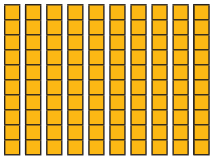
Name _____ Class _____ Date _____

Get Started

1




___ hundreds ___ tens ___ ones


___ hundred ___ tens ___ ones

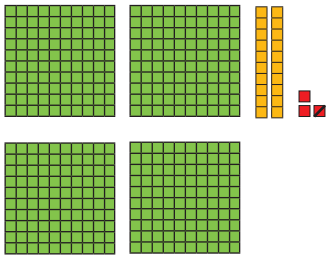
How To

Subtract 151 from 423.

Step 1

Subtract the ones.

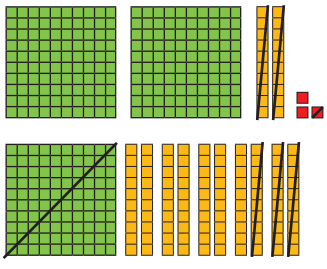
	4	2	3
−	1	5	1



Step 2

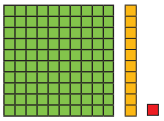
Regroup 1 hundred as 10 tens. Then subtract the tens column and the hundreds column.

	4	2	3
−	1	5	1



Think: Can you subtract 5 tens from 2 tens?

You Need



Try It Together

Subtract.

2

	2	4	2
−	1	3	5

3

	2	6	6
−		9	2

Work On Your Own

Subtract.

4

	6	7	9
−	1	9	5

5

	4	6	2
−	3	9	2

6

	1	5	7
−		2	8

7

	8	8	2
−	8	7	5

Solve the problem.

8 The toy store offered 693 different toys last year. This year, the store offered 879 toys. How many more toys did the store offer this year?

_____ toys

	8	7	9
−	6	9	3

Problem-Solving

Using a Table

The table shows the number of cookies sold at Buffy's Bakery last week. How many more cookies were sold on Friday than on Thursday?

Day	Monday	Tuesday	Wednesday	Thursday	Friday
Cookies	115	104	128	149	182

Find

how many more cookies were sold on Friday than on Thursday

How

Read the numbers of cookies sold on Friday and Thursday from the table. Then subtract the numbers.

Solve

There were _____ more cookies sold on Friday.

Explain

Does my answer make sense? Explain._____

_____

_____

Check Up

Fill in the bubble of the correct answer.

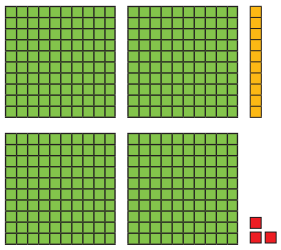
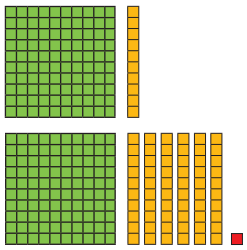
9 What is the difference of 223 and 162?

⬭ 161 ⬭ 141 ⬭ 61

10 Yen had some base-10 pieces. She traded 1 hundreds flat for 10 tens rods. Now she has 3 hundreds flats, 18 tens rods, and 6 ones blocks. What base-10 pieces did she start with? Talk it over.

Center 1: Play Teamwork Subtraction

1. This game needs two players. Each player writes down a 3-digit number.
2. Compare your numbers. Write a subtraction problem that subtracts the lesser number from the greater number.
3. Player 1 uses base-10 pieces to solve the subtraction problem.
4. Player 2 solves the problem on paper.
5. Check to see if both answers match. Write down 1 point for a match.
6. Change roles. Repeat and see how many points you can get.

Player 1	Player 2	Player 1	Player 2
	413 - 142		3 11 4 1 3 - 1 4 2 271

Name _____ Class _____ Date _____

Lesson PL1 Subtracting 2-Digit Numbers with No Regrouping

Subtract.

1. $\begin{array}{r} 37 \\ -\ 14 \\ \hline \end{array}$

2. $\begin{array}{r} 28 \\ -\ 17 \\ \hline \end{array}$

3. $\begin{array}{r} 62 \\ -\ 10 \\ \hline \end{array}$

4. $\begin{array}{r} 43 \\ -\ 22 \\ \hline \end{array}$

5. $\begin{array}{r} 65 \\ -\ 64 \\ \hline \end{array}$

6. $\begin{array}{r} 48 \\ -\ 15 \\ \hline \end{array}$

Lesson PL2 Checking Subtraction with Addition

Subtract. Check each answer with addition.

1. $\begin{array}{r} 85 \\ -\ 22 \\ \hline \end{array}$ **Check** $+\ \square\square$

2. $\begin{array}{r} 57 \\ -\ 13 \\ \hline \end{array}$ **Check** $+\ \square\square$

3. $\begin{array}{r} 34 \\ -\ 23 \\ \hline \end{array}$ **Check** $+\ \square\square$

4. $\begin{array}{r} 29 \\ -\ 12 \\ \hline \end{array}$ **Check** $+\ \square\square$

Extra Practice

Name ______________________ Class ______________ Date ______________

Lesson 1 Regrouping for Subtraction

Subtract. Regroup if needed.

1.
	3	2
−		5

2.
	6	4
−		8

3.
	4	2
−		9

4.
	2	1
−		6

5.
	5	3
−		7

6.
	7	6
−		8

Lesson 2 Subtracting 2-Digit Numbers with Regrouping

Subtract. Regroup if needed.

1.
	3	7
−	2	8

2.
	4	3
−	2	6

3.
	5	5
−	1	9

4.
	2	4
−	1	7

5.
	5	2
−	3	5

6.
	7	4
−	2	5

Name _____ Class _____ Date _____

Lesson 3 Solving Subtraction Problems

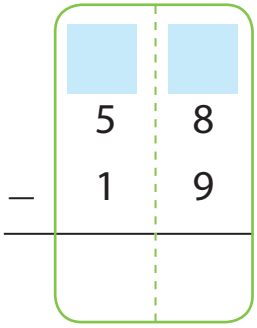
Solve the problem.

1 Rudy has 58 paper clips. He gives 19 of them away. How many paper clips does he have left?

a. **Find:** _____

b. **How?** Subtract _____ from _____.

c. **Solve.**



Rudy has _____ paper clips left.

d. **Does my answer make sense? Explain.** _____

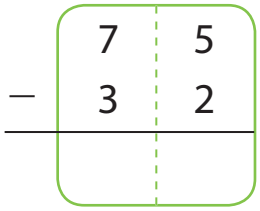
_____

Lesson 4 Solving Multi-Step Subtraction Problems

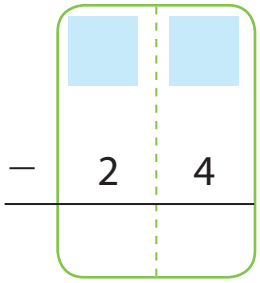
Solve the problem.

1 Julie has 75 pennies. She gives 32 pennies to Keith. She also gives 24 pennies to Paula. How many pennies does Julie have left?

Pennies left after giving to Keith



Pennies left after giving to Paula



Julie has _____ pennies left.

Name _____ Class _____ Date _____

Lesson 5 More or Less by 10 or 100

Solve each problem.

1. Find the number that is 10 more than 36. _____

2. Find the number that is 100 less than 204. _____

3. Find the number that is 100 more than 777. _____

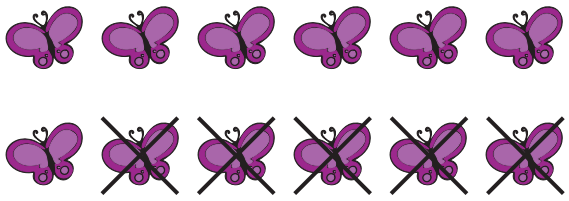
4. Find the number that is 10 less than 41. _____

Lesson 6 Finding the Unknown

Find each missing number.

1. 

   4 + _____ = 6

2. 

   12 − _____ = 7

Name _____ Class _____ Date _____

Lesson 7 Choosing an Operation

Solve the problem.

1. Alyssa has 3 necklaces. Shanice has 5 necklaces. How many necklaces do they have in all?

   a. **Find:** _____

   _____

   b. **How?** Choose an operation: subtraction or addition

   c. **Solve.** _____ ☐ _____ = _____

   Alyssa and Shanice have _____ necklaces in all.

   d. **Does my answer make sense? Explain.** _____

   _____

   _____

Lesson 8 Subtracting the Same Number Again and Again

Solve each problem.

1. How many times can you subtract 2 from 4? _____

2. How many times can you subtract 3 from 6? _____

3. How many times can you subtract 4 from 12? _____

Extra Practice

Name _____ Class _____ Date _____

Lesson 9 Subtracting 3-Digit Numbers with No Regrouping

Find each difference.

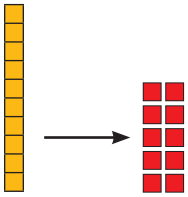
1. 735 − 115 = _____
2. 473 − 152 = _____
3. 964 − 851 = _____
4. 328 − 104 = _____
5. 751 − 350 = _____
6. 362 − 301 = _____

Lesson 10 Subtracting 3-Digit Numbers with Regrouping

Find each difference. Regroup as needed.

1. 291 − 152 = _____
2. 630 − 522 = _____
3. 418 − 358 = _____
4. 814 − 252 = _____
5. 528 − 209 = _____
6. 625 − 294 = _____

regroup
to trade 1 ten for 10 ones when subtracting



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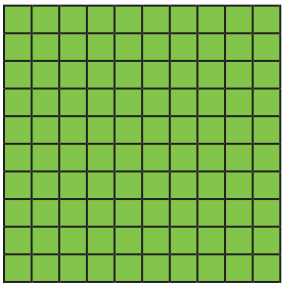
Name _____ Class _____ Date _____

Workmat

Ones 	
Tens 	
Hundreds 	

Name _____ Class _____ Date _____

Mix It Up Cards

Mark had 23 baseball cards. He got 14 baseball cards at the store. How many baseball cards does he have in all?	23 + 14 = _____	The teacher had 51 pencils. She gave 45 pencils away. How many pencils are left?	51 − 45 = _____
Our leader bought 17 ice pops for Scouts. We ate 12 ice pops. How many were left?	17 − 12 = _____	The bus had 64 students on it. So far, 43 have gotten off. How many students are left on the bus?	64 − 43 = _____
Sarah had 35 marbles. Jan had 13. How many did they have in all?	35 + 13 = _____	We counted 43 ladybugs in the morning. By noon, 22 had crawled away. How many ladybugs were left?	43 − 22 = _____
Our uncle found 28 worms. We used 15 fishing. How many are left?	28 − 15 = _____	Joey had 21 stickers on his folder. Then he got 13 more. How many stickers does he have on his folder now?	21 + 13 = _____
I made 32 paper airplanes. My brother made 22. How many airplanes do we have in all?	32 + 22 = _____	Sara had 16 fish. The fish had 12 babies. How many fish does she have in all now?	16 + 12 = _____

Office of Exceptional Student Education

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Distance Learning Packet

MiCI Program

Math 6-8

Week 6: May 18– 22, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

DETROIT PUBLIC SCHOOLS COMMUNITY DISTRICT

Week of 5/18/20 to 5/22/20

Directions: Parents/Guardians and/or family members will engage middle school students in Math activities and focus on measurement with standard units of length.

Goal/Objective(s) The student should demonstrate basic measurement and data techniques in response to metric units.

Module Module 4: Measurement

Materials Needed: VMath Student Workbook C, Extra Practice (pg. 49-51) pencil and metric ruler

Target

1. The student will demonstrate measurement principles using inches, feet and yards.
2. The student can identify tools used to measure basic objects using scales for height and weight
3. The student can organize data using pictures, concrete objects and concepts that can be collected, sorted and compared (maximum of 10 objects and 1 attribute).
4. The student can identify a tool used to measure a solid (i.e., scale or ruler) when presented within a context where the appropriate measurement tool is needed.

Week 6	Activity	Do	Task
Day 1	Choosing the Best Customary Unit of Length	Lesson 1 Pg. 9-12	Home activity and Khan Academy Online Video
Day 2	Comparing Lengths	Lesson 2 Pg. 13-16	Home activity and Khan Academy Online Video
Day 3	Estimating and Measuring Length Using a Metric Ruler	Lesson 3 Pg. 17-20	Home activity and Khan Academy Online Video
Day 4	Choosing the Better Metric Unit of Length	Lesson 4 Pg. 21-24	Home activity and Khan Academy Online Video
Day 5	Using and completing a table based on pattern	Lesson 5 Pg. 25-28	Home activity and Khan Academy Online Video

Week 6: Module 4

Objective	1. The student will demonstrate measurement principles using inches, feet and yards. 2. The student can identify tools used to measure basic objects using scales for height and weight 3. The student can organize data using pictures, concrete objects and concepts that can be collected, sorted and compared (maximum of 10 objects and 1 attribute). 4. The student can identify a tool used to measure a solid (i.e., scale or ruler) when presented within a context where the appropriate measurement tool is needed.
Video Link	https://www.youtube.com/watch?v=0B91xPrwcPE
Guided Practice	With a family member, caregiver, or friend, complete these recommended application problems and/or problems sets: **Lesson 1 Pg. 9-12** **Lesson 2 Pg. 13-16** **Lesson 3 Pg. 17-20** **Lesson 4 Pg. 21-24** **Lesson 5 Pg. 25-28**
Closing	Share your math work with someone and tell them which problems were "easy" and which you need to practice more.
Extend	Consider completing supplemental work for additional practice: ● End of Workbook: Module 4 (pages 49-51). ● Use of personal metric rules for measuring basic objects around house in centimeters and inches.
Intervention	Practice the following application problems, previous week's modules and lessons to prepare you for next week's lesson.

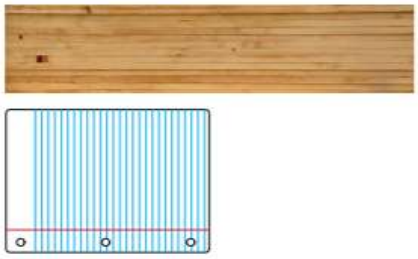
Module 4 Application Problems and Problem Sets for Print

Lesson PL2

Try It Together

Estimate the length of the piece of wood.

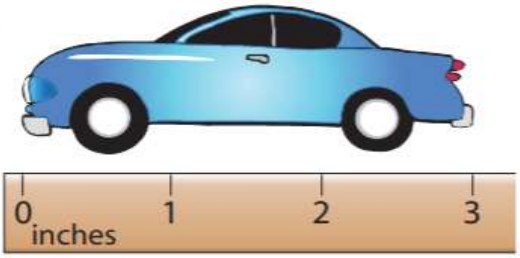
2



about _____ feet

Measure the length of the toy car.

3



_____ inches

Work On Your Own

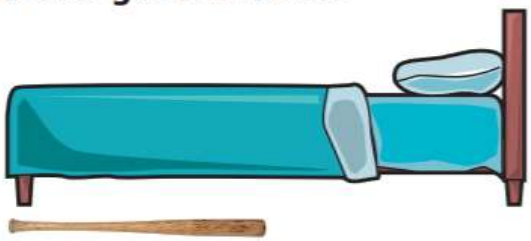
Estimate the length of the piece of chalk.

4

about _____ inches

Estimate the length of the bed.

5



about _____ yards

Solve the problem.

6 Corey's camera is shown. How tall is Corey's camera?

_____ inches

Lesson PL2

Academic Vocabulary

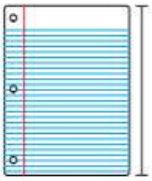
inch	benchmark
foot	estimate

Estimating and Measuring Length Using a Customary Ruler

Name _____ Class _____ Date _____

Get Started

1

Benchmarks for Measuring Customary Lengths		
		
about 1 inch	about 1 foot	about 1 yard

a. length of a pencil _____

b. height of a desk _____

c. length of a car _____

How To

Estimate the length of your pencil. Then measure the length of your pencil.

Step 1

Use paper clips to estimate the length.

Think: Where do I start to measure?

about _____ inches

Step 2

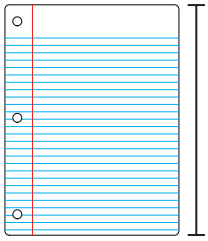
Use a ruler to measure the length.

_____ inches

Choosing the Best Customary Unit of Length

Name _____ Class _____ Date _____

Get Started

Benchmarks for Measuring Customary Lengths		
		
about 1 inch	about 1 foot	about 1 yard

1. length of a crayon

   _____

2. height of a large dog

   _____

3. length of a football field

   _____

How To

Choose the best unit to measure the height of your desk.

Step 1

Compare the height of the desk with each benchmark.

Think: Which benchmark is **not** too long or too short?

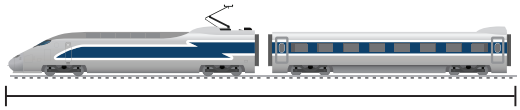
Step 2

Choose the best unit of measure.

Measure the height of the desk in _____.

Try It Together

Choose the best unit to measure each object.

4 

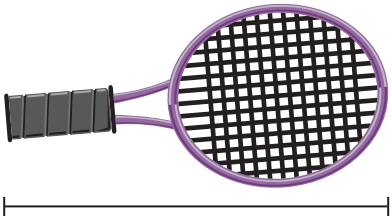
inches feet yards

5 

inches feet yards

Work On Your Own

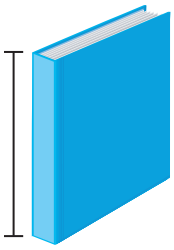
Choose the best unit to measure each object.

6 

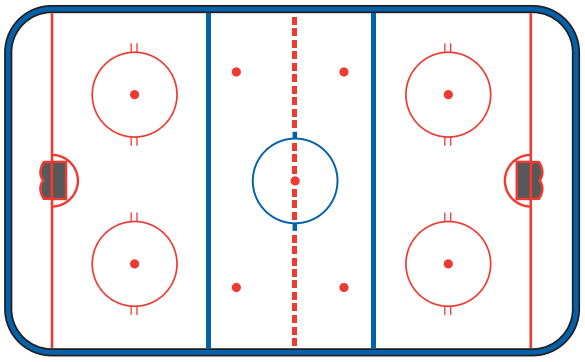
inches feet yards

7 

inches feet yards

8 

inches feet yards

9 

inches feet yards

Solve the problem.

10 Mel has a toy bus. A real bus is about 15 yards long. The toy bus is 10 units long. Which customary unit is the most reasonable unit of length for the toy bus?

_____

Explain It

Look around your classroom. Find an object that is best measured in feet. Why are feet the best units to use? Explain.

_____

_____

_____

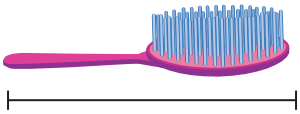
_____

_____

Check Up

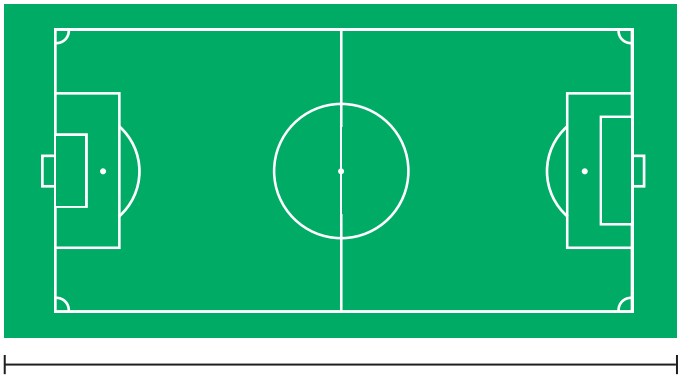
Fill in the bubble of each correct answer.

11 Which is the best unit to measure the length of a hairbrush?



◯ inches ◯ feet ◯ yards

12 Which is the best unit to measure the length of a soccer field?

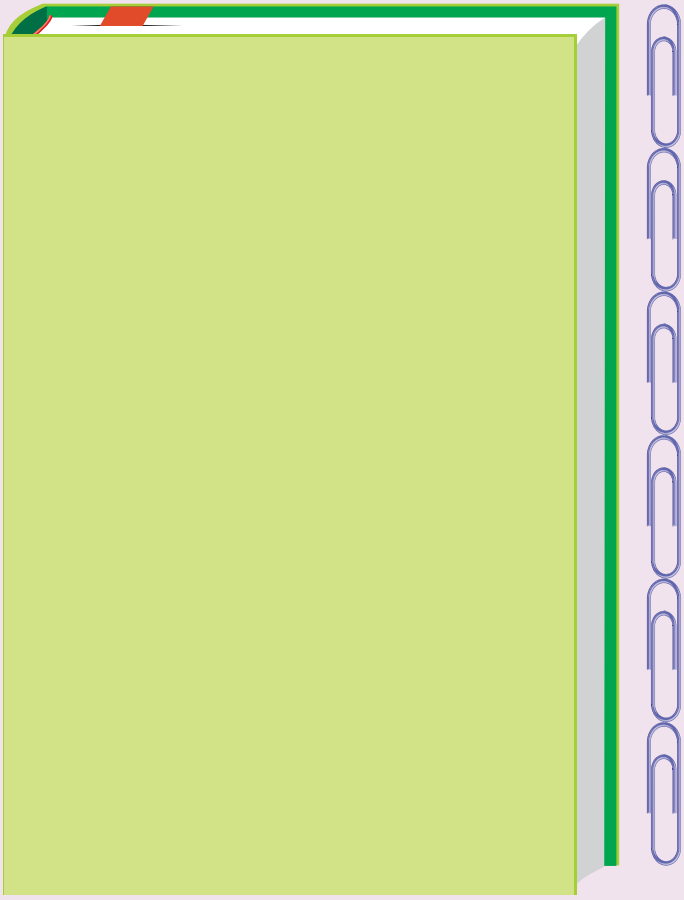


◯ inches ◯ feet ◯ yards

13 A tree is taller than Jamie's dad but shorter than his house. Do you think the tree is 9 inches, 9 feet, or 9 yards tall? Talk it over.

Center 1: Measure Hunt

1. Work with a partner. You will measure the lengths or heights of objects.
2. Use paper clips to measure the length or height of an object.
3. Draw a picture of the object on one side of an index card.
4. Then write the number of paper clips you used on the back of the index card. Do not write the unit you used to measure with.
5. Repeat Steps 2–4 with a new object. Use sheets of notebook paper to measure the length or height of the object.
6. Cut pieces of string to match the length of a baseball bat.
7. Repeat Steps 2–4 with a new object. Use the pieces of string to measure the length or height of the object.
8. Exchange cards with another pair of students. Choose the unit that was used to measure each length or height.



Comparing Lengths

Name _____ Class _____ Date _____

Get Started

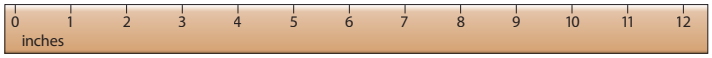
1

____ inches

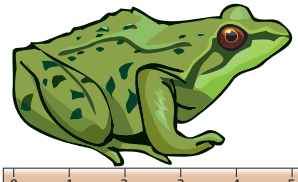
How To

Compare the lengths of the snail and the frog.

Step 1 Measure the length of each animal.



Snail: ____ inches



Frog: ____ inches

Step 2 Subtract the lesser number from the greater number.

____ – ____ = ____

The frog is ____ inches longer than the snail.

OR

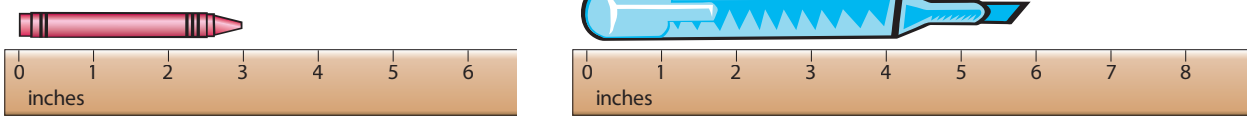
The snail is ____ inches shorter than the frog.

Think: Which operation is used to compare lengths?

Try It Together

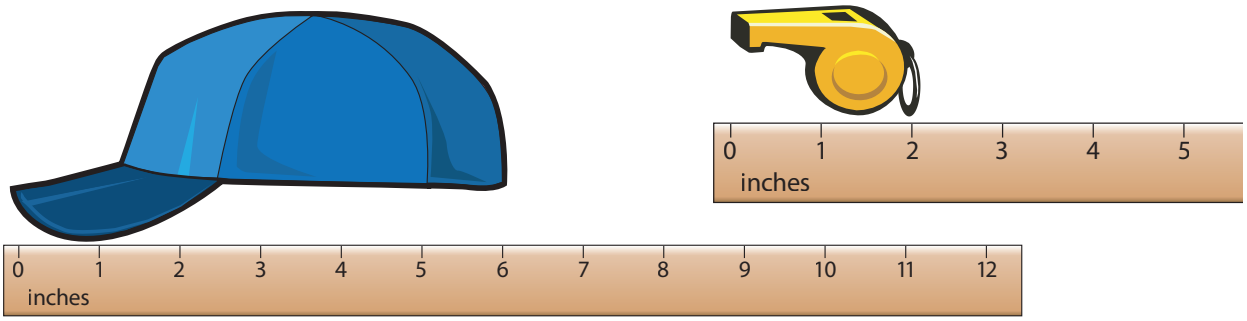
Compare the lengths of the objects.

2



The marker is _____ inches longer than the crayon.

3

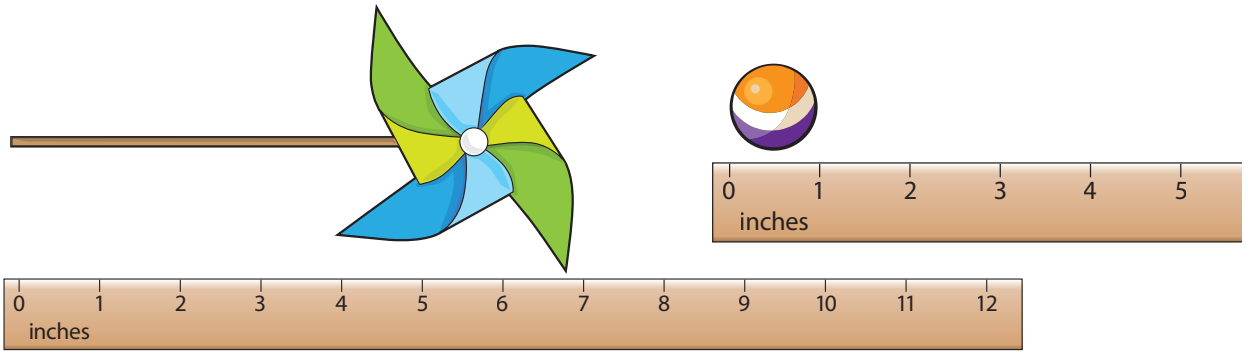


The whistle is _____ inches shorter than the hat.

Work On Your Own

Compare the lengths of the objects.

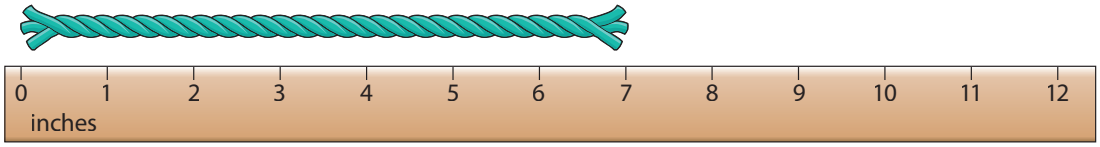
4



The pinwheel is _____ inches longer than the rubber ball.

Solve the problem.

5 Ella needs a piece of yarn that is 4 inches longer than the blue yarn. How many inches of yarn does Ella need? _____ inches



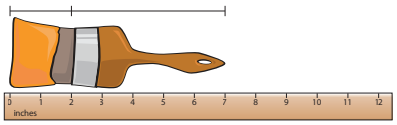
Using a Ruler

Problem-Solving

How much longer is the paintbrush handle than the brush?

Find

how much longer the handle is than the brush



How

Use a ruler.

Solve

Measure each part.

The brush starts at 0 inches and ends at _____ inches.
The brush is _____ inches long.

The handle starts at 2 inches and ends at _____ inches.
The handle is _____ inches long.

The handle is _____ inches longer than the brush.

Explain

Does my answer make sense? Explain.

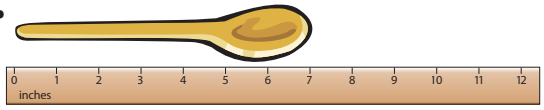
_____

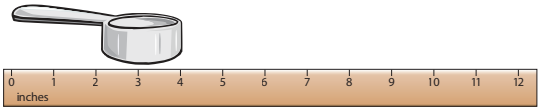
_____

Check Up

Fill in the bubble of the correct answer.

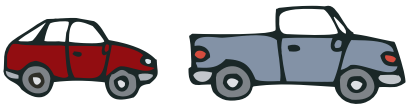
6 How many inches longer is the spoon than the measuring cup?





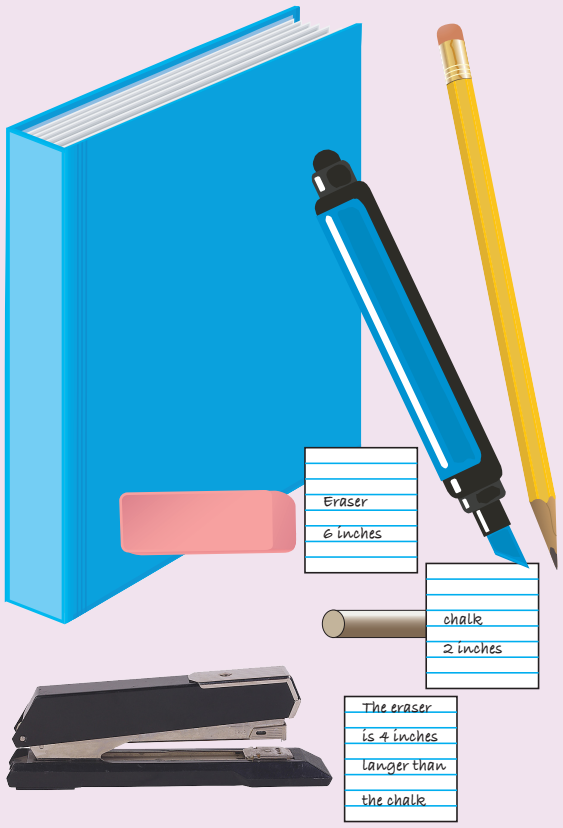
- ⬭ 2 inches
- ⬭ 3 inches
- ⬭ 11 inches

7 Gina claims that the truck is 5 feet longer than the car. Matt claims that the car is 5 feet shorter than the truck. Who is correct? Talk it over.



Center 1: Comparing Lengths

1. Work with a partner. Find 5 different objects in the classroom.
2. Measure the length of each object in inches. Write the object's name and length on an index card.
3. Choose two of the cards and compare the lengths of the objects. On a sheet of paper, write a sentence that compares the lengths.
4. Repeat Step 3 until you have compared the lengths of all of the objects.



Academic Vocabulary

centimeter — centimeter ruler
meter — meter stick

Estimating and Measuring Length Using a Metric Ruler

Name _____ Class _____ Date _____

Get Started

1

Benchmarks for Measuring Metric Lengths	
	
about 1 centimeter	about 1 meter

a. length of a key

_____

b. height of our school

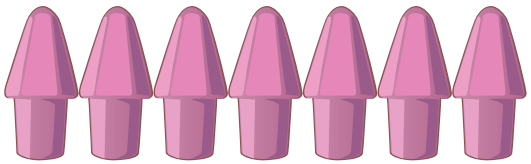
_____

How To

Estimate and measure the length of the crayon.

Step 1

Use cap erasers to estimate the length.



Think: Where do I start to measure?

about _____ centimeters

Step 2

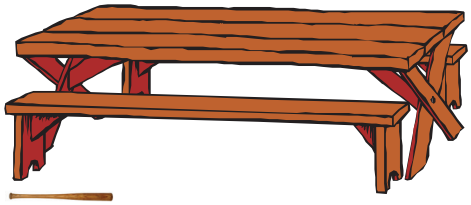
Use a ruler to measure the length.

_____ centimeters

Try It Together

Estimate the length of the table.

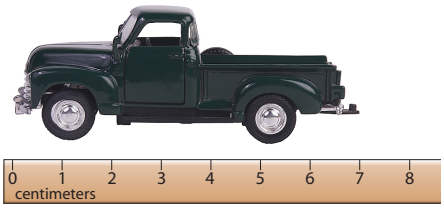
2



about _____ meters

Measure the length of the toy truck.

3

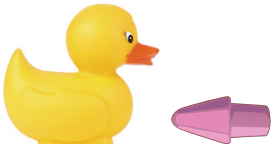


_____ centimeters

Work On Your Own

Estimate the height of the duck.

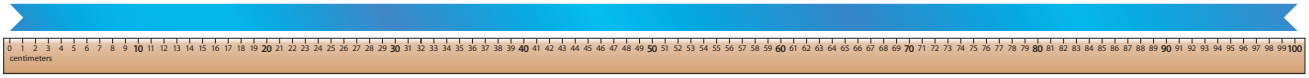
4



about _____ centimeters

Measure the length of the ribbon.

5



_____ meter

[Hint: 100 centimeters = 1 meter]

Solve the problem.

6 Rita is painting a picture. Is her paintbrush longer or shorter than 1 meter?

_____ than 1 meter

Using Benchmarks

Problem-Solving

Yosef has a pepper plant that is 25 centimeters tall.
His tomato plant is 1 meter tall. Which plant is taller?

Find the taller plant

How Use benchmarks to compare the lengths.

Solve Complete each picture.

1 _____ 1 _____

Think: Which is longer, 25 centimeters or 1 meter?

The _____ plant is taller.

Explain Does my answer make sense? Explain.

_____

_____

Check Up

Fill in the bubble of the correct answer.

7 How long is the feather?

○ 7 centimeters ○ 13 centimeters ○ 7 meters

8 Emily said that her dollhouse is about 15 meters tall.
Is this height reasonable? Talk it over.

Center 1: Metric Measure Match

1. Work with a partner.
2. Find 3 objects that are shorter than 1 meter. Then find 3 objects that are longer than 1 meter.
3. One student will use cap erasers and string to measure the length of each object. The other student will use a centimeter ruler and meter stick.
4. Measure the length of each object. Write the object's name on one side of an index card. Then write the length on the other side.
5. Trade index cards with the lengths facing up. Match each object with its measurement.

Choosing the Better Metric Unit of Length

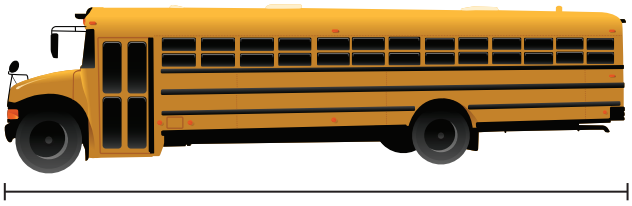
Name _____ Class _____ Date _____

Get Started

Benchmarks for Measuring Metric Lengths	
	
about 1 centimeter	about 1 meter

1 

_____

2 

_____

How To

Choose the better unit to measure the length of an index card.

Step 1

Compare the length of the card with each benchmark.

Think: Which benchmark is **not** too long or too short?

Step 2

Choose the better unit of measure.

Measure the length of the index card in

_____.

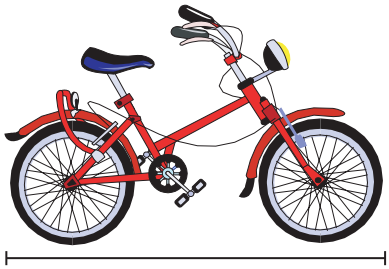
Try It Together

Choose the better unit to measure each object.

3

centimeters meters

4



centimeters meters

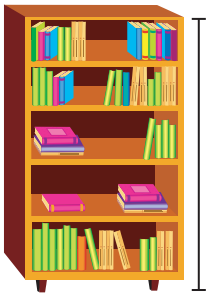
Work On Your Own

Choose the better unit to measure each object.

5

centimeters meters

6

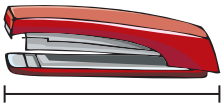


centimeters meters

7

centimeters meters

8



centimeters meters

Solve the problem.

9 Amy needs to measure the length of her garden. Which metric unit should she use?

_____

Explain It

Raven and Phil measured the length of a piece of string. Raven used cap erasers. Her measurement was 19 centimeters. Phil used a centimeter ruler. His measurement was 20 centimeters. Why are the measurements different? Explain.

_____

_____

_____

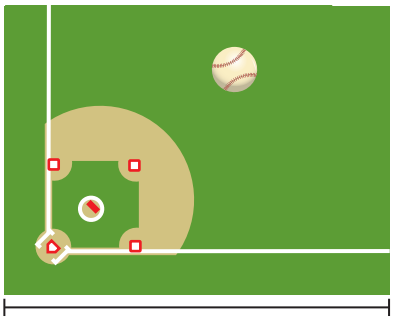
_____

_____

Check Up

Fill in the bubble of each correct answer.

10 Which metric unit should you use to measure the length of a baseball field?



- ⬭ centimeters
- ⬭ meters
- ⬭ inches

11 Which metric unit should you use to measure the length of a caterpillar?

- ⬭ centimeters
- ⬭ meters
- ⬭ inches

12 Ms. Clark pushed a pushpin into a bulletin board. Which object is 2 centimeters long, the pushpin or the bulletin board? Talk it over.

Center 1: Metric Length Scavenger Hunt

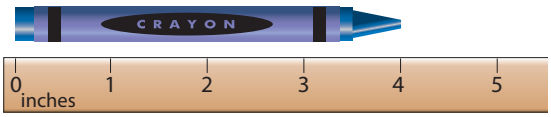
1. Work with a partner. You will need 6 index cards.
2. On each index card you will write one number. Three cards should have a number less than 5 written on them. The other cards should have a number between 5 and 25 written on them.
3. The numbers on the cards represent lengths. The numbers less than 5 are lengths in meters. The numbers between 5 and 25 are lengths in centimeters.
4. Use cap erasers and pieces of string measuring about 1 meter from your teacher to find objects with lengths or heights that are close to the lengths on the cards.
5. On each index card, draw a picture of the object you found.

Using a Table

Name _____ Class _____ Date _____

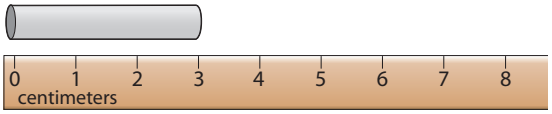
Get Started

1



_____ inches

2



_____ centimeters

How To

Stefan has 5 toy cars. Each toy car is 3 inches long. If Stefan puts the cars in a row, how long is the row of cars?

Step 1

Find: _____

Step 2

How? Use a table.

Think: How many cars does Stefan have?

Step 3

Solve. Complete the table.

Cars	1	2	3	4	5
Length in Inches					

Pattern: Add _____ inches to the length.

The row of 5 toy cars is _____ inches long.

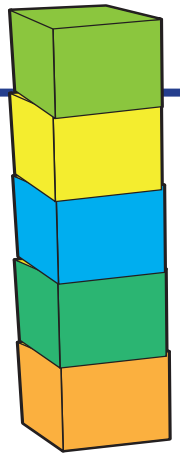
Step 4

Does my answer make sense? Explain. _____

_____

_____

Try It Together



Solve the problem.

3 Tim is stacking building blocks. Each block is 4 centimeters tall. He stacks 5 blocks. How tall is Tim's stack of blocks?

a. **Find:** _____

b. **How?** _____

c. **Solve.** Complete the table.

Blocks	1	2	3	4	5
Height in Centimeters	4	8	12	16	

Pattern: Add _____ centimeters to the height.

The stack of 5 blocks is _____ centimeters tall.

d. **Does my answer make sense? Explain.** _____

_____

_____

Work On Your Own

Solve the problem.

4 Wendy has 4 paper clips. She makes a chain of paper clips. Each paper clip is 3 centimeters long. How long is the chain of paper clips?

Paper Clips	1	2	3	4
Length in Centimeters	3	6	9	

The chain of paper clips is _____ centimeters long.

Explain It

Julio puts 4 erasers in a row. He says the length of the row is 2 inches long. Is he correct? Use the table below to explain.

Erasers	1	2	3	4
Length in Inches	2	4	6	8

Check Up

Fill in the bubble of each correct answer. Use the table to answer problems 5–7.

5 How long is a row of 4 mini candy bars?

- ⬭ 1 centimeter
- ⬭ 16 centimeters
- ⬭ 20 centimeters

Candy Bars	1	2	3	4
Length in Centimeters	4	8	12	16

6 Chad has 2 mini candy bars. How long would the row be if he lines them up in a row?

⬭ 4 centimeters ⬭ 8 centimeters ⬭ 12 centimeters

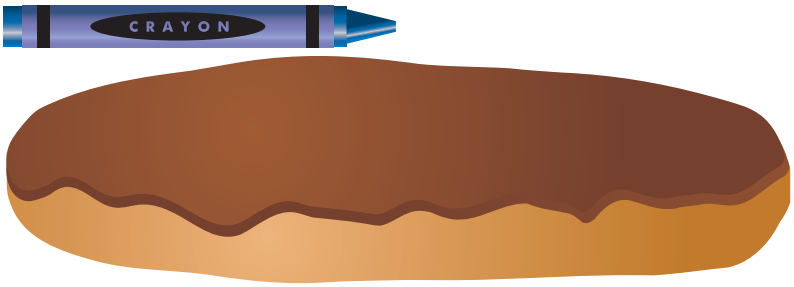
7 In problem 6, what does the question ask for? What steps did you use to solve the problem? Talk it over.

Name _____ Class _____ Date _____

Lesson PL1 Measuring with Nonstandard Units of Length

Measure the length of each object. Use a crayon or connecting cube.

1



_____ crayons

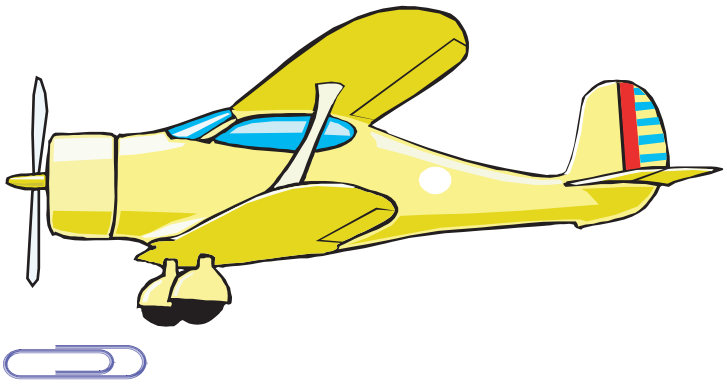
2

_____ cubes

Lesson PL2 Estimating and Measuring Length Using a Customary Ruler

Estimate the length of the plane.

1



about _____ inches

Measure the length of the loaf of bread.

2

_____ inches

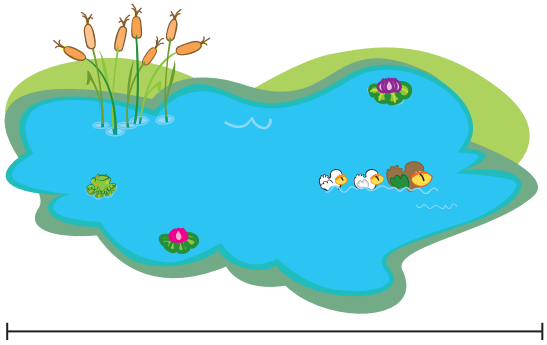
Extra Practice

Name _____ Class _____ Date _____

Lesson 1 Choosing the Best Customary Unit of Length

Choose the best unit to measure each object.

1



inches feet yards

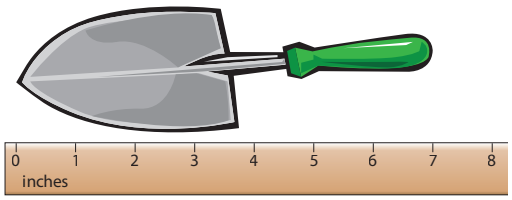
2

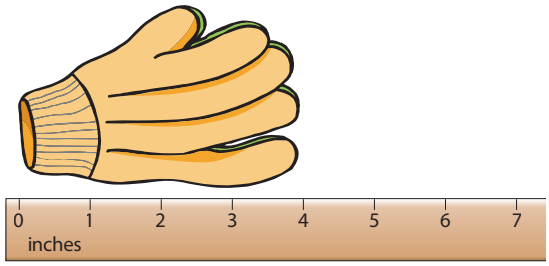
inches feet yards

Lesson 2 Comparing Lengths

Compare the lengths of the objects.

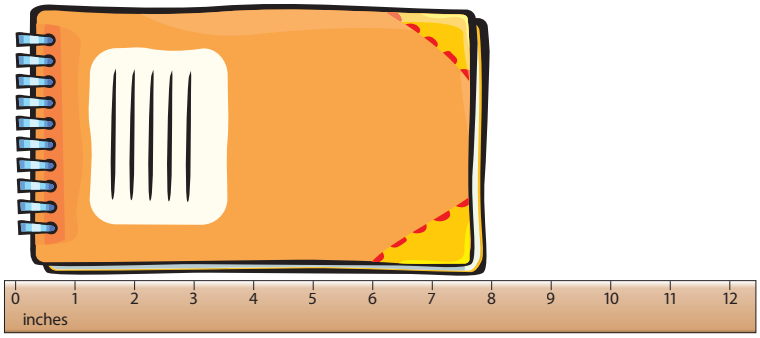
1

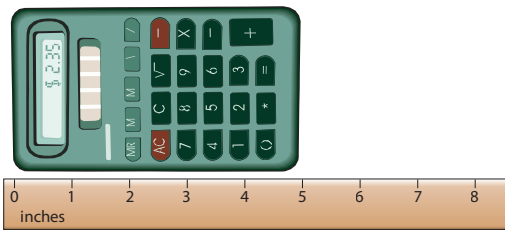




The shovel is _____ inches longer than the glove.

2





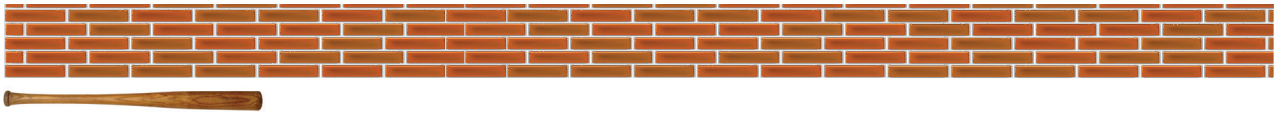
The notebook is _____ inches longer than the calculator.

Name _____ Class _____ Date _____

Lesson 3 Estimating and Measuring Length Using a Metric Ruler

Estimate the length of the brick wall.

1



about _____ meters

Measure the length of the alarm clock.

2

_____ centimeters

Lesson 4 Choosing the Better Metric Unit of Length

Choose the better unit to measure each object.

1

centimeters meters

2

centimeters meters

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Distance Learning Packet

MiCI Program

Math 6-8

Week 7: May 26– 29, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

Week of 5/25/20 to 5/29/20

Directions: Parents/Guardians and/or family members will engage middle school students in Math activities and focus on measurement with standard units of length.

Goal/Objective(s) The student should demonstrate basic measurement and data techniques in response to metric units.

Module Module 4: Measurement

Materials Needed: VMath Student Workbook C, Extra Practice (pg. 52-54) pencil and metric ruler

Target

1. The student will demonstrate measurement principles using a number line.
2. The student can use a bar graph or a simple pictograph to answer questions about data.
3. The student can identify the object that is longer or shorter when presented with objects that have extreme differences in length.
4. The student will understand principles of line plots to measure related and unrelated data based on specific scenarios and tasks.

Week 7	Activity	Do	Task
Day 1	Showing Distances on a Number Line	Lesson 6 Pg. 29-32	Home activity and Khan Academy Online Video
Day 2	Solving Measurement Problems	Lesson 7 Pg. 33-36	Home activity and Khan Academy Online Video
Day 3	Measurement Data	Lesson 8 Pg. 37-40	Home activity and Khan Academy Online Video
Day 4	Graphing Measurement Data	Lesson 9 Pg. 41-44	Home activity and Khan Academy Online Video
Day 5	Data in Bar Graphs and Picture Graphs	Lesson 10 Pg. 45-48	Home activity and Khan Academy Online Video

Week 7: Module 4

Objective	1. The student will demonstrate measurement principles using a number line. 2. The student can use a bar graph or a simple pictograph to answer questions about data. 3. The student can identify the object that is longer or shorter when presented with objects that have extreme differences in length. 4. The student will understand principles of line plots to measure related and unrelated data based on specific scenarios and tasks.
Video Link	https://www.youtube.com/watch?v=AtiOjlyOQf4
Guided Practice	With a family member, caregiver, or friend, complete these recommended application problems and/or problems sets: **Lesson 6 Pg. 29-32** **Lesson 7 Pg. 33-36** **Lesson 8 Pg. 37-40** **Lesson 9 Pg. 41-44** **Lesson 10 Pg. 45-48**
Closing	Share your math work with someone and tell them which problems were "easy" and which you need to practice more.
Extend	Consider completing supplemental work for additional practice: ● End of Workbook: Module 4 (pages 52-54). ● Use of personal data to create line plot (ex: line plot for ages of siblings and cousins between 5 years of age and 18 years of age).
Intervention	Practice the following application problems, previous week's modules and lessons to prepare you for next week's lesson.

Module 4 Application Problems and Problem Sets for Print

VmathLive Go to VmathLive.com
Module Measurement
Activity Compare Length
Lesson PL2

Using Estimation

Problem-Solving

Ryan needs 6 inches of string to hang his airplane.
He has the string shown. Does he have enough string?

Find if the string is long enough

How Estimate the length of the string.

Solve

The string is about _____ inches long.

Does Ryan have enough string? _____

Explain Does my answer make sense? Explain.

_____

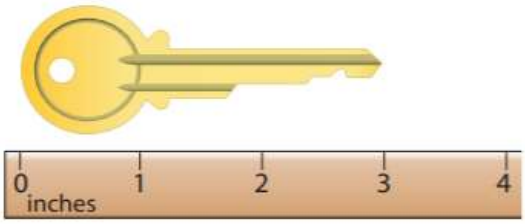
_____

Check Up

Fill in the bubble of the correct answer.

7 How long is the key?

- ⬭ 3 inches
- ⬭ 4 inches
- ⬭ 3 feet



8 Jacob used a ruler to measure the height of a door. He said the door is 8 inches tall. Does the height make sense? Talk it over.

Center 1: Estimate, Measure, and Match

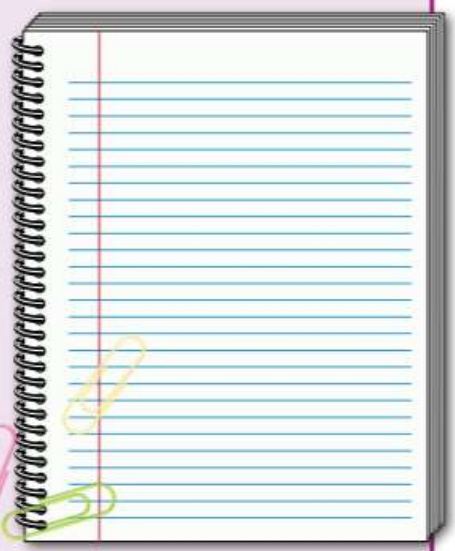
1. Work with a partner. Find 5 different objects in the classroom.
2. One student will use paper clips to measure the length of each object. One student will use a ruler.
3. Measure the length of the object. Write the object's name on one side of an index card. Then write the length on the other side.
4. Trade index cards with the lengths facing up. Match each object with its measurement.

Center 2: Length Scavenger Hunt

1. Work together with several students.
2. Find objects in the classroom that are close to the lengths below.

   2 paper clips — 1 sheet of paper
   5 paper clips — 2 sheets of paper

3. The team with the greatest number of objects closest to the lengths in the list wins.

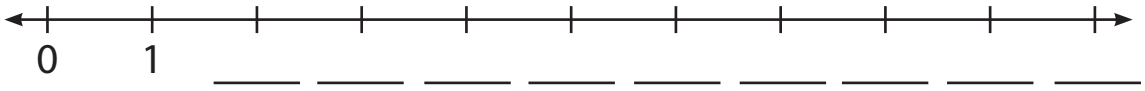


Showing Distances on a Number Line

Name _____ Class _____ Date _____

Get Started

1



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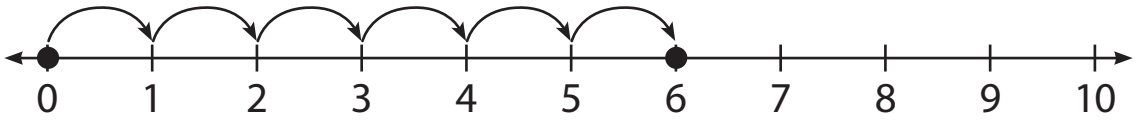
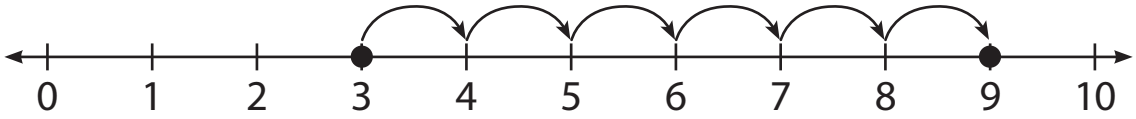


Distance from 0 to 6: _____ units

3



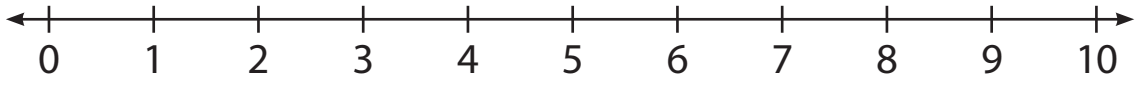
Distance from 3 to 9: _____ units

How To

Find the distance from 1 to 5. Find the distance from 6 to 10. Which distance is greater?

Step 1

Use a number line to find the distance from 1 to 5.



The distance from 1 to 5 is _____ units.

Step 2

Use a number line to find the distance from 6 to 10.
The distance from 6 to 10 is _____ units.

Think: Are the number of hops different or are they the same?

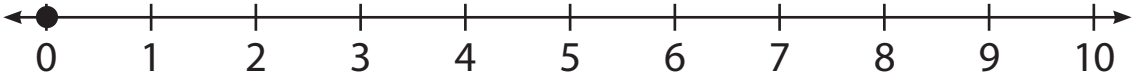
Step 3

Compare the distances. The distance from 1 to 5 is _____ the distance from 6 to 10.

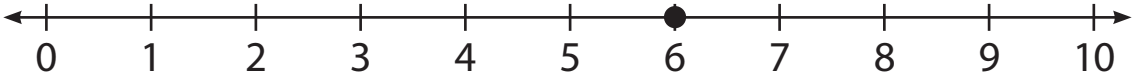
Try It Together

Graph the point that is the given distance from the point.

4 Distance: 5 units



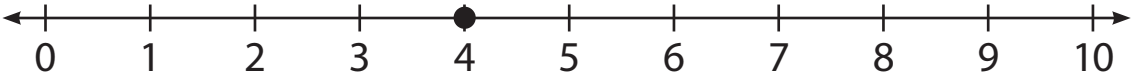
5 Distance: 3 units



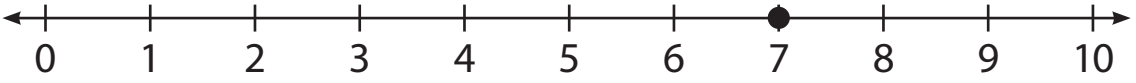
Work On Your Own

Graph the point that is the given distance from the point.

6 Distance: 6 units

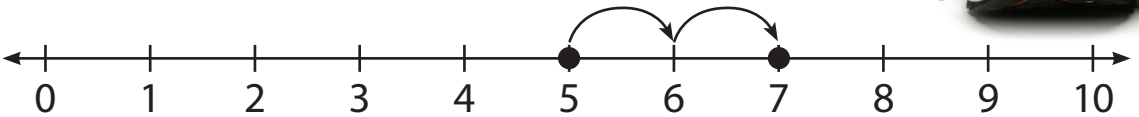


7 Distance: 1 unit



Solve the problem.

8 Dan ran 5 miles on Tuesday. He ran 2 miles farther on Thursday. How many miles did he run on Thursday?



_____ miles

Using a Number Line

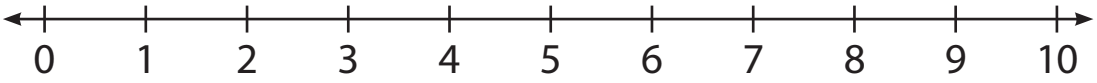
Problem-Solving

Cindy rode her bicycle 6 miles. She took a break. Then she rode 3 more miles. How many miles did Cindy ride her bike in all?

Find the number of miles Cindy rode her bike in all

How Use a number line. Graph a point at 6. Then find the point that is 3 units from 6.

Solve



Cindy biked _____ miles in all.

Explain Does my answer make sense? Explain.

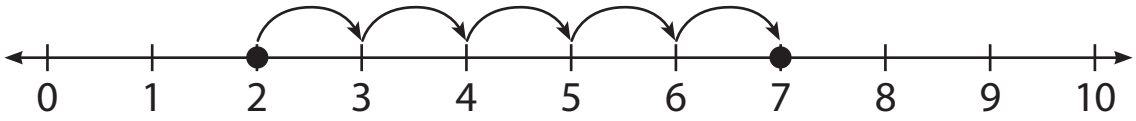
_____

_____

Check Up

Fill in the bubble of the correct answer.

9 What distance is shown on the number line?

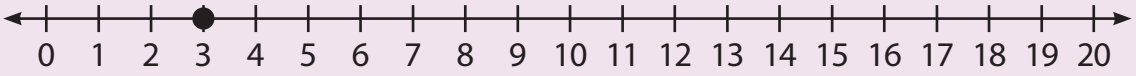


◯ 2 units ◯ 5 units ◯ 7 units

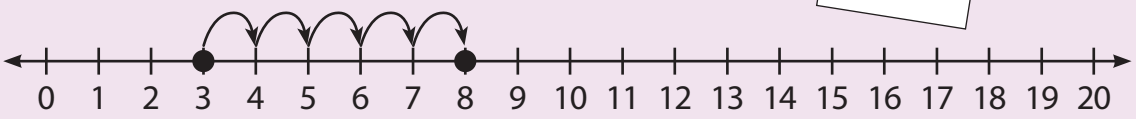
10 You are given a point on a number line and a distance. How do you find the point that is the given distance from the given point? Talk it over.

Center 1: Finding a Point Given Its Distance from Another Point

1. Work with a partner. Write the digits 1–9 on index cards. Write 1 digit on each card.
2. Place the cards facedown in a stack. Mix up the cards.
3. Have the first student draw a number line on a sheet of paper labeled from 0 to 20.
4. One student chooses a card. Use this card to graph a point on the number line. Choose another card. The other card is the distance from the point.



5. Using the distance, have your partner find the point that is the distance from the graphed point.



6. Repeat, changing roles with your partner.

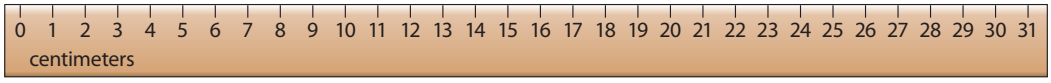
Solving Measurement Problems

Name _____ Class _____ Date _____

Get Started

1

_____ centimeters



How To

Brad is biking 24 miles. He has biked 18 miles so far. How much farther does Brad have to bike?

Step 1

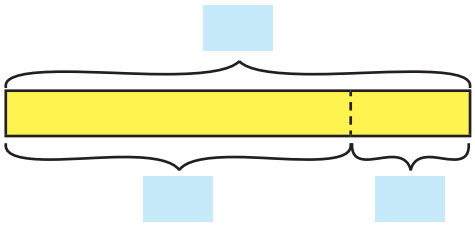
Find: _____

Step 2

How? Make a drawing. Then write and solve an equation.

Step 3

Solve.



Think: What is to be found?

Equation: 24 = _____ + _____

24 – 18 = _____

Brad has _____ miles left to bike.

Step 4

Does my answer make sense? Explain.

_____

Try It Together

Solve the problem.

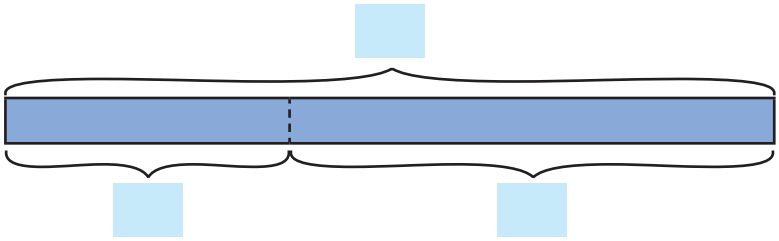
2 Li has 15 centimeters of ribbon. She buys another 25 centimeters of ribbon. How much ribbon does Li have now?

a. **Find:** _____

_____

b. **How?** Make a drawing. Then write and solve an equation.

c. **Solve.**



Equation: ? = _____ + _____

Li has _____ centimeters of ribbon in all.

d. **Does my answer make sense? Explain.**

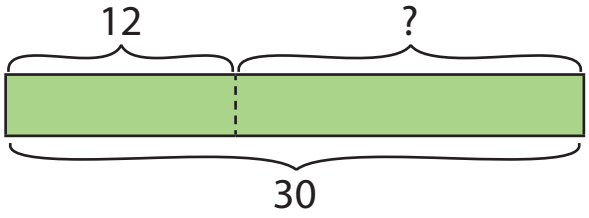
_____

_____

Work On Your Own

Solve the problem.

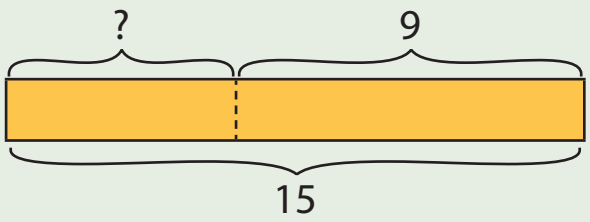
3 Ian had 30 centimeters of fruit roll-up. He ate 12 centimeters of the fruit roll-up. How much of the fruit roll-up does he have left?



_____ centimeters

Explain It

Mia had 15 yards of fabric. She used some of the fabric for a bookbag. She has 9 yards of fabric left. How many yards of fabric did she use?



The model shows this problem situation. What addition equation could be used to solve this problem? What subtraction equation could be used to solve this problem? Explain.

Check Up

Fill in the bubble of the correct answer.

4 Neil walked 8 kilometers. Tanya walked 11 kilometers. How many kilometers did they walk in all?

◯ 3 kilometers ◯ 9 kilometers ◯ 19 kilometers

5 Read this problem:

Anthony used 25 feet of rope to set up his tent. He has 13 feet of rope left. How many feet of rope did Anthony start with? How can you find the answer? Talk it over.

Center 1: Write a Story Problem

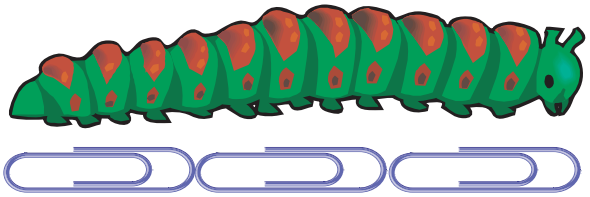
1. Copy the word problem onto a sheet of paper.
2. Pick two numbers less than 100. Write one number on the first line. Write the other number on the second line.
3. Make a story problem by writing a question about the distances Sasha drove. Write your question on the last line.
4. Solve your problem on a separate sheet of paper. Be sure to draw a diagram and write an equation.
5. Trade problems with a partner. Solve the problem on a separate sheet of paper.
6. Compare your solutions to the problems. Did you solve the problems in the same way?

Measurement Data

Name _____ Class _____ Date _____

Get Started

1



about _____ inches

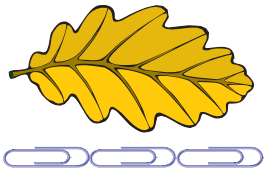
How To

The list shows the lengths of Andy's leaves. Measure the lengths of the leaves shown to complete the list. Then show the lengths on a line plot.

2 inches, 4 inches, 6 inches, 5 inches, 3 inches, _____ inches, _____ inches

Step 1

Measure the length of each leaf.



about _____ inches

about _____ inches

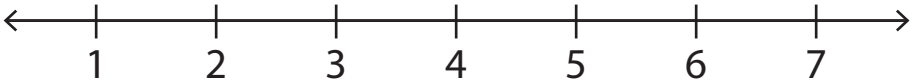
Step 2

Write the measurements in the list.

Step 3

Make a line plot.

Think: How is a measurement shown on the graph?

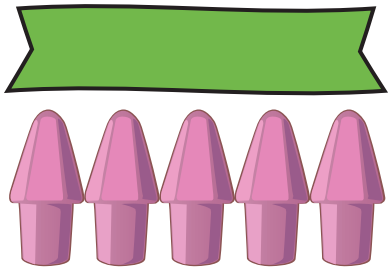


Leaf Lengths (in inches)

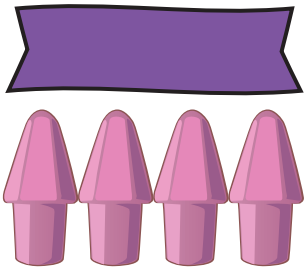
Try It Together

Complete the list of measurements. Then show the measurements on a line plot.

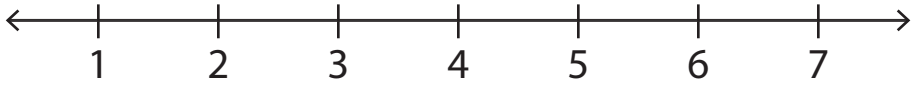
2 5 centimeters, 7 centimeters, 5 centimeters, 4 centimeters, 7 centimeters, _____ centimeters, _____ centimeters



_____ centimeters



_____ centimeters



Ribbon Lengths (in centimeters)

Work On Your Own

Complete the list of measurements. Then show the measurements on a line plot.

3 8 inches, 5 inches, 6 inches, 7 inches, 6 inches, _____ inches, _____ inches

_____ inches

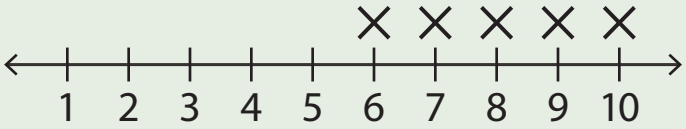
_____ inches

Pencil Lengths (in inches)

Explain It

Five of Paul's friends jumped straight up. Paul measured the heights of their jumps. Is Paul's graph correct? If the graph is not correct, explain how to correct it.

6 inches, 8 inches, 7 inches, 10 inches, 10 inches, 9 inches, 8 inches



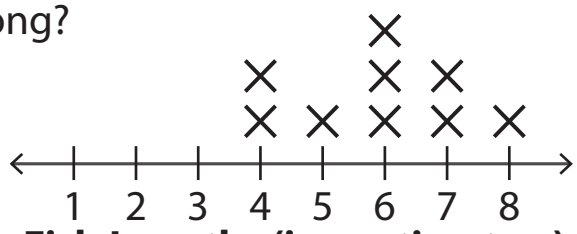
Jump Heights (in inches)

Check Up

Use the line plot to answer each question. Fill in the bubble of each correct answer.

4 How many fish are 6 centimeters long?

- ⬭ 1 fish
- ⬭ 2 fish
- ⬭ 3 fish



Fish Lengths (in centimeters)

5 How many fish are 3 centimeters long?

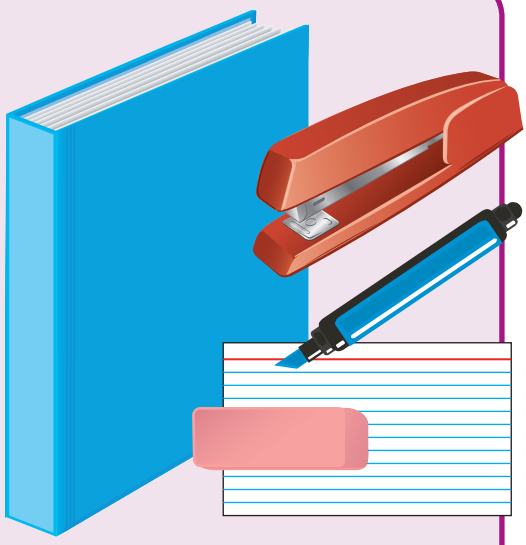
⬭ 0 fish ⬭ 1 fish ⬭ 2 fish

6 Kara is making a line plot of these measurements.

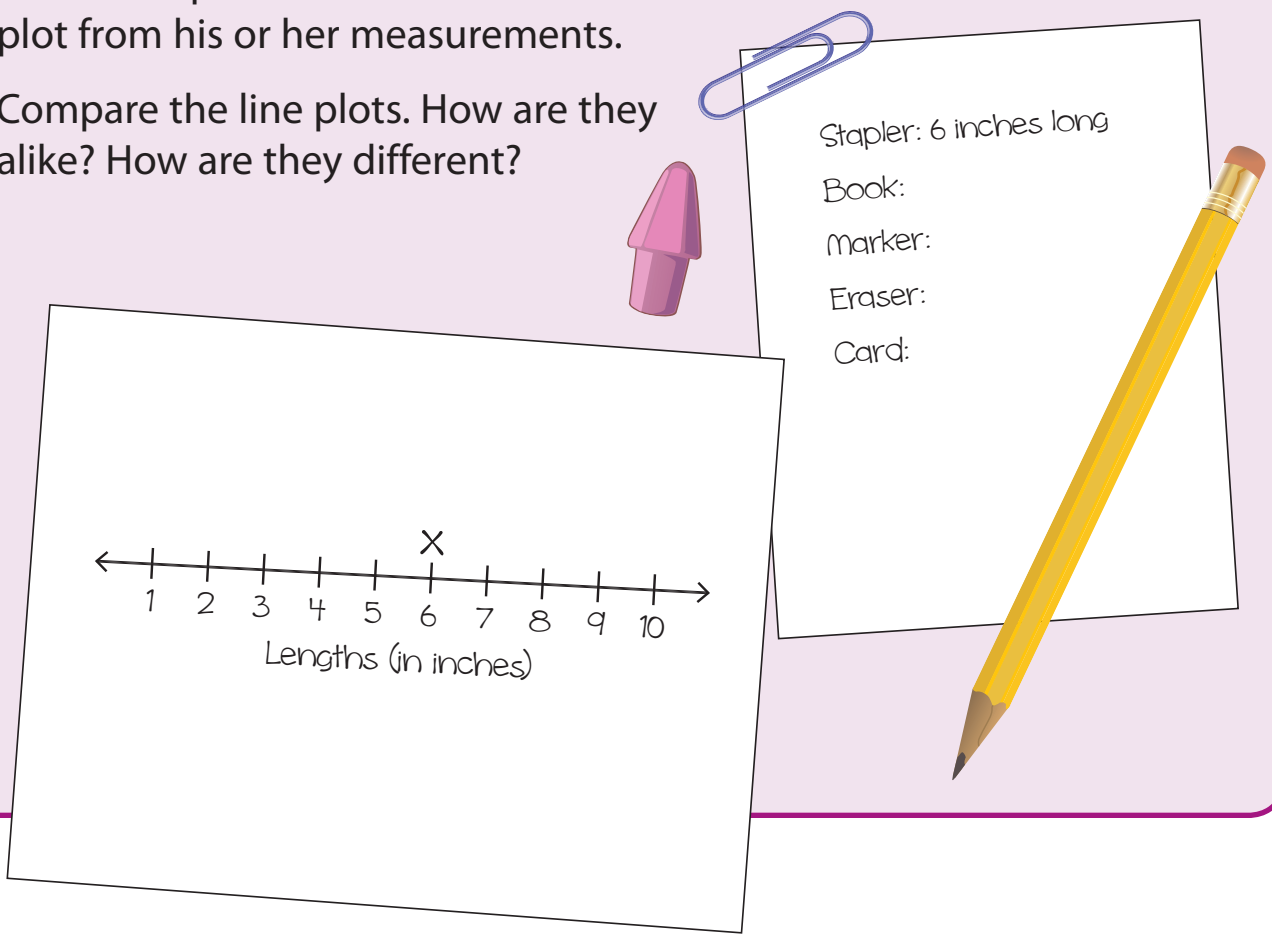
9 inches, 2 inches, 11 inches, 6 inches, 10 inches, 3 inches, 8 inches, 9 inches

What should be true about the least and greatest numbers on the number line? Talk it over.

Center 1: Making a Line Plot



1. Work with a partner. Find 5 different objects in the classroom.
2. One partner should use paper clips to measure the length of each object in inches. The other partner should use eraser caps to measure the length of each object in centimeters.
3. Each partner should make a list of his or her measurements.
4. Then each partner should make a line plot from his or her measurements.
5. Compare the line plots. How are they alike? How are they different?

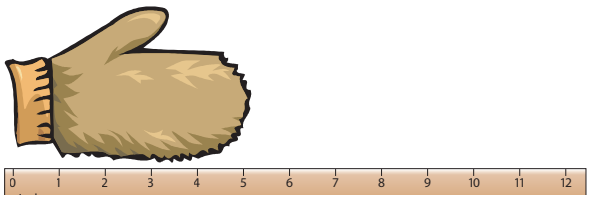


Graphing Measurement Data

Name _____ Class _____ Date _____

Get Started

1



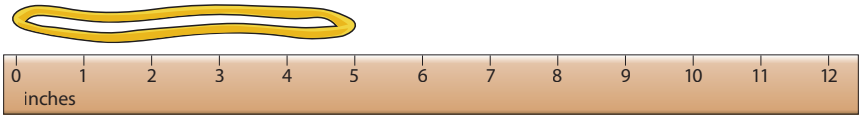
_____ inches

How To

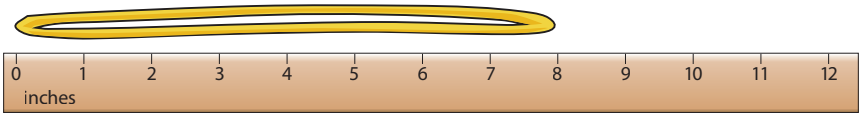
Measure the rubber bands. Then complete the line plot.
What length are most of the rubber bands?

Step 1

Measure the length of each rubber band.



_____ inches



_____ inches

Step 2

Show the measurements on the line plot.

Rubber Band Lengths (in inches)

Think: Which number has the most X's?

Step 3

Answer the question.

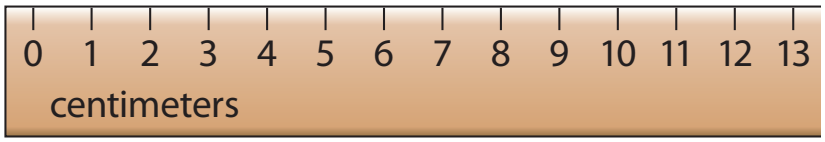
Most of the rubber bands are _____ inches long.

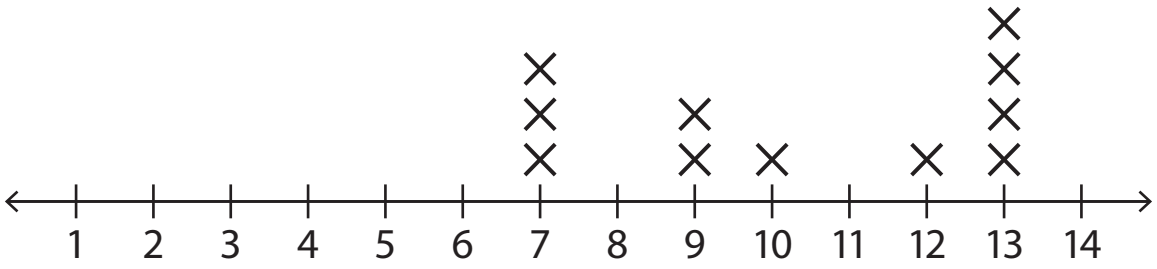
Try It Together

Measure the object and complete the line plot. Then answer the question.

2 How long is the shortest paintbrush? _____ centimeters

_____ centimeters





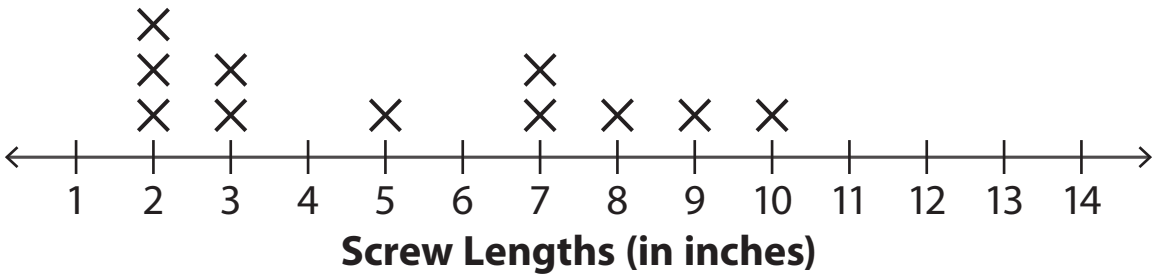
Paintbrush Lengths (in centimeters)

Work On Your Own

Measure the object and complete the line plot. Then answer the question.

3 How many screws are 7 inches long? _____ screws

_____ inches

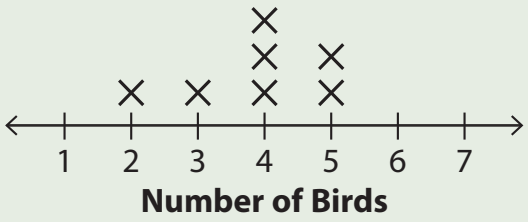


Screw Lengths (in inches)

Problem-Solving

Using a Graph

Diana counted the number of birds she saw at her bird feeder last week. The line plot shows the number of birds Diana saw each day. Do you think Diana will see more than 3 birds tomorrow?



Find whether Diana will see more than 3 birds tomorrow

How Use a graph.

Solve Count the X's above each number.

Number of X's above 1: _____ Number of X's above 4: _____
Number of X's above 2: _____ Number of X's above 5: _____
Number of X's above 3: _____ Number of X's above 6: _____

Does Diana usually see more than 3 birds? _____

Do you think Diana will see more than 3 birds tomorrow? _____

Explain Does my answer make sense? Explain.

_____

_____

Check Up

Fill in the bubble of the correct answer. Use the line plot above to solve problems 4 and 5.

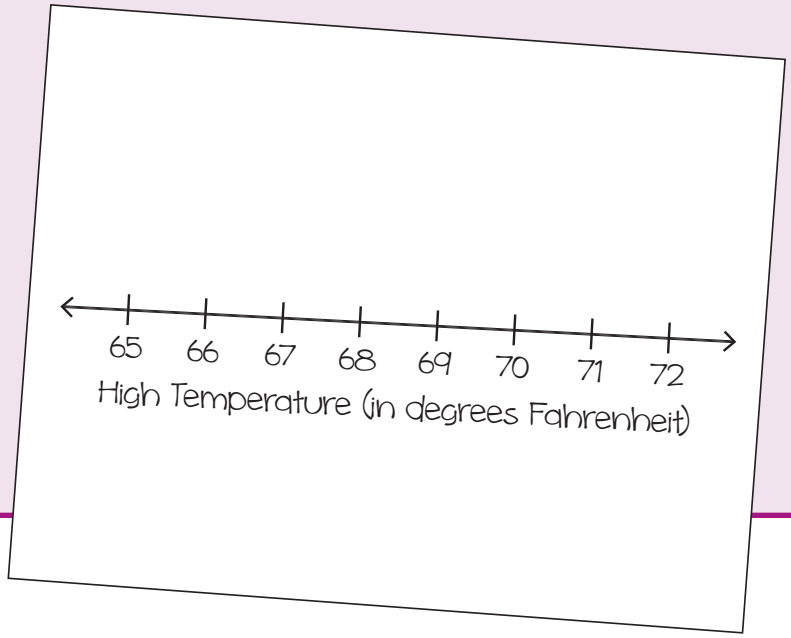
4 Diana observed 4 birds on how many days?

◯ 1 days ◯ 2 days ◯ 3 days

5 How many days did Diana count birds? How did you find the answer? Talk it over.

Center 1: Making a Prediction

1. Work with a partner. Record the daily high temperatures for one week.
2. Make a line plot of the temperatures. The number line should count by 1 degree. It should include your least and greatest temperatures.
3. Look at your line plot. Make a prediction for the next day's high temperature.
4. Check the next day's high temperature. How does the actual temperature compare to your prediction? If your prediction is not close to the actual temperature, explain why you think this is.



Academic Vocabulary
data
picture graph
bar graph

Data in Bar Graphs and Picture Graphs

Name _____ Class _____ Date _____

Get Started

1  _____

2

Jen's Marbles	
Color	**Number of Marbles**
Blue	4
Green	2
Yellow	1
Red	3

Jen's Marbles					
Blue					
Green					
Yellow					
Red					

Key: Each picture stands for 1.

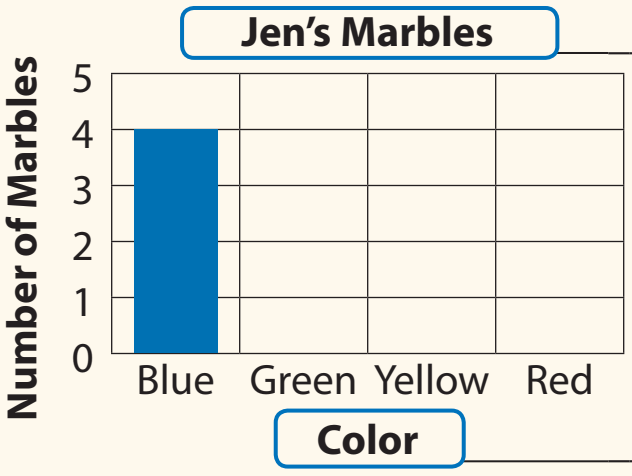
How To

Use the table above. Complete the bar graph of the data.

Step 1 Find the title.

Step 2 Find the topic.

Step 3 Draw the bars.



Think: How tall should each bar be?

Which color has the least number of marbles? _____

Try It Together

Make a picture graph for the students' favorite shapes.

3

Favorite Shape	
Shape	**Number of Students**
Square	2
Triangle	1
Circle	5
Rectangle	2

Favorite Shape					
Square					
Triangle					
Circle					
Rectangle					

Key: Each picture stands for 1.

Use the picture graph to solve the problem.

4 How many students chose square or rectangle?

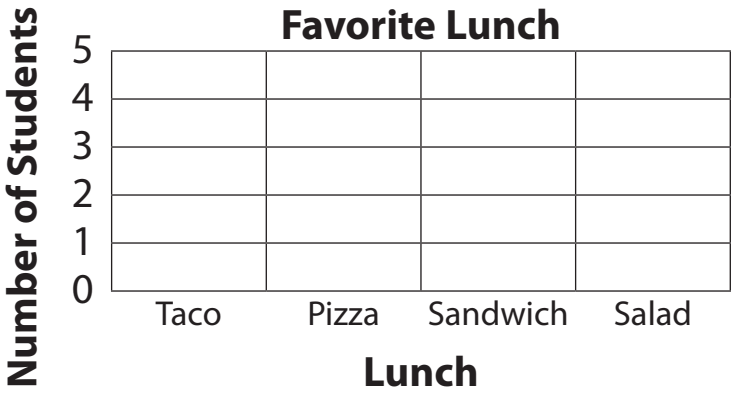
_____ + _____ = _____ students

Work On Your Own

Make a bar graph for the students' favorite lunches.

5

Favorite Lunch	
Lunch	**Number of Students**
Taco	3
Pizza	5
Sandwich	4
Salad	2



Use the bar graph to solve each problem.

6 Did more students choose sandwich or taco? _____

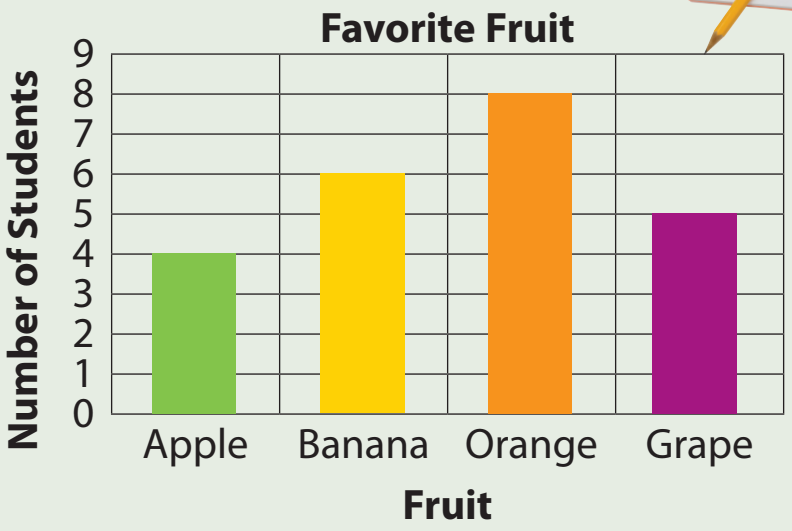
7 How many students chose salad or pizza?

_____ + _____ = _____ students

Explain It

Aaron drew this bar graph from the table. Did Aaron draw the graph correctly? Explain.

Favorite Fruit	
Fruit	**Number of Students**
Apple	4
Banana	6
Orange	8
Grape	5



Check Up

Use the bar graph Favorite Fruit to answer each question. Fill in the bubble of each correct answer.

8 How many students chose apple or grape?

◯ 9 students ◯ 5 students ◯ 4 students

9 How many more students chose orange than apple?

◯ 12 students ◯ 4 students ◯ 2 students

10 Would it be better to make a bar graph or picture graph for this table? Talk it over.

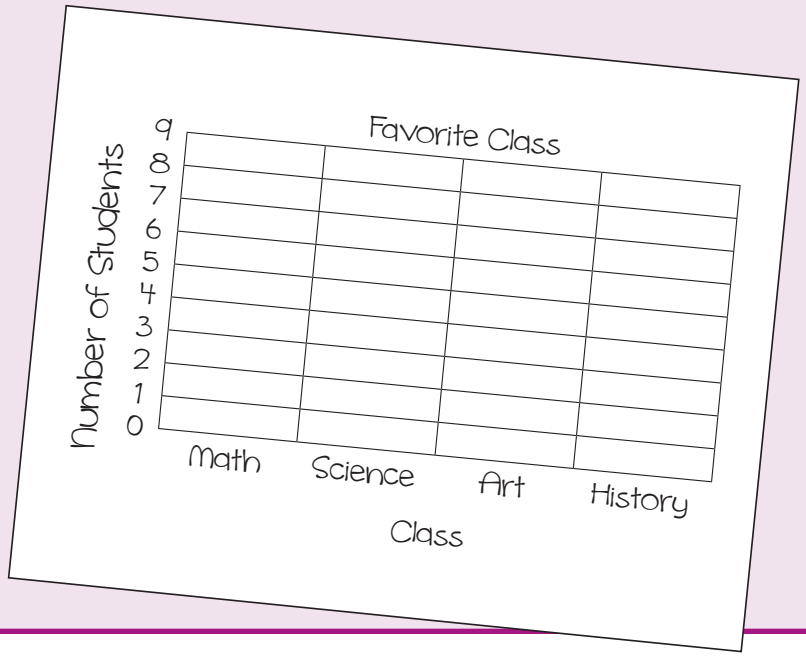
Favorite Season	Number of Students
Spring	15
Summer	25
Fall	10
Winter	8

Center 1: Making a Prediction

1. Work with a partner. Pick 4 subjects from this list: math, English, history, science, art, music.
2. Ask 10 of your classmates to pick their favorite subject from your list. Record the results in a table.
3. Make a bar graph of your results.
4. Use your bar graph to answer the following questions.

   Which subject got the most votes?

   Which subject got the least votes?



Name _____ Class _____ Date _____

Lesson 5 Using a Table

Solve the problem.

1. Jared has 4 peanut butter cups. Each peanut butter cup is 4 centimeters wide. He puts the peanut butter cups in a row. How wide is the row of peanut butter cups?

a. **Find:** _____

b. **How?** _____

c. **Solve.** Complete the table.

Peanut Butter Cups	1	2	3	4
Width in Centimeters	4	8	12	

Pattern: Add _____ centimeters to the width.

The row of 4 peanut butter cups is _____ centimeters wide.

d. **Does my answer make sense? Explain.** _____

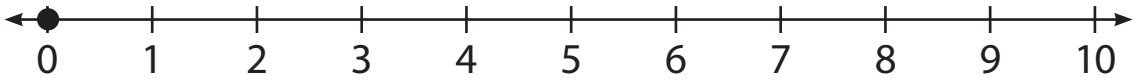
_____

_____

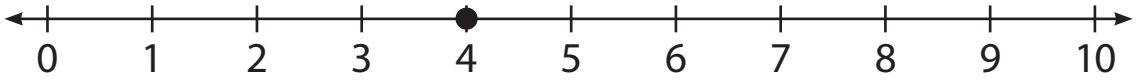
Lesson 6 Showing Distances on a Number Line

Graph the point that is the given distance from the point.

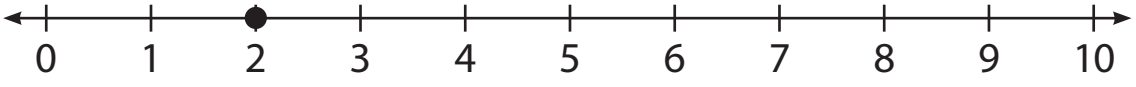
1. Distance: 8 units



2. Distance: 3 units



3. Distance: 7 units



Name _____ Class _____ Date _____

Lesson 7 Solving Measurement Problems

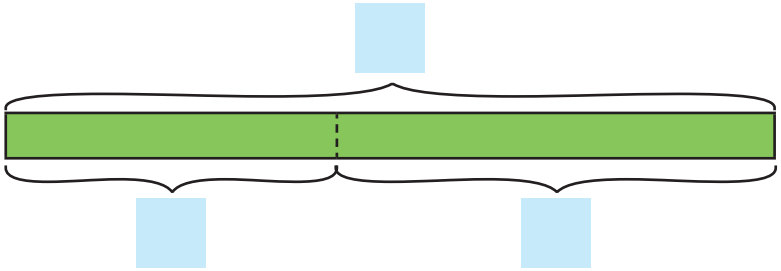
Solve the problem.

1 Katie had 35 yards of yarn. She used 15 yards in a project. How many yards of yarn does Katie have left?

a. Find: _____

b. How? Make a drawing. Then write and solve an equation.

c. Solve.



Equation: 35 = _____ + _____ Katie has _____ yards of yarn left.

d. Does my answer make sense? Explain.

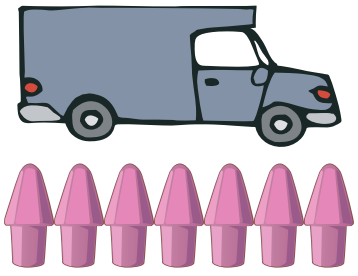
_____

_____

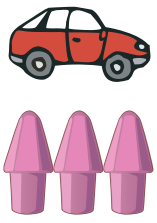
Lesson 8 Measurement Data

Complete the list of measurements. Then show the measurements on a line plot.

1 8 centimeters, 8 centimeters, 6 centimeters, 5 centimeters, 7 centimeters, _____ centimeters, _____ centimeters



_____ centimeters



_____ centimeters

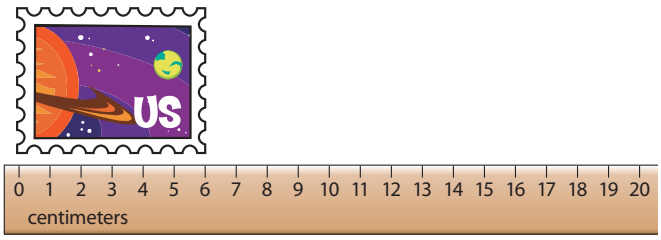
Toy Car Lengths (in centimeters)

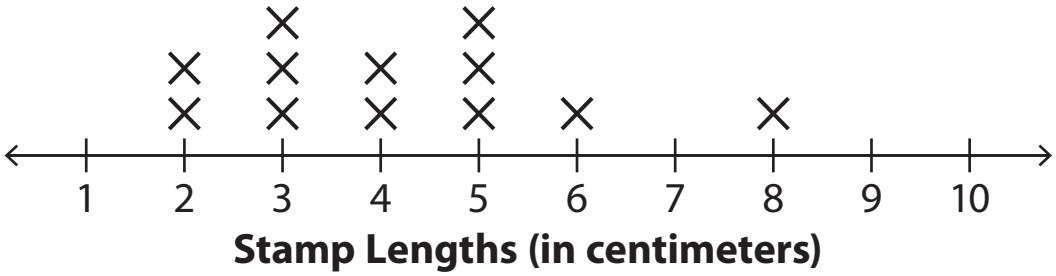
Name _____ Class _____ Date _____

Lesson 9 Graphing Measurement Data

Measure the object and complete the line plot. Then answer the question.

1 The least number of stamps are what length? _____ centimeters



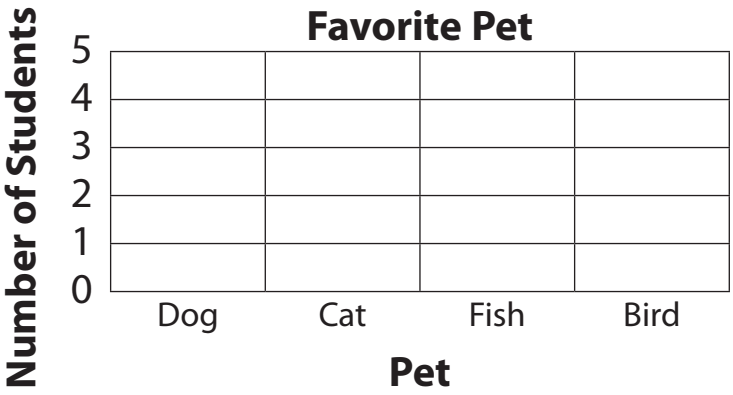


Lesson 10 Data in Bar Graphs and Picture Graphs

Make a bar graph for the students' favorite pets.

1

Favorite Pet	
Pet	**Number of Students**
Dog	5
Cat	3
Fish	2
Bird	4



Use the bar graph to solve each problem.

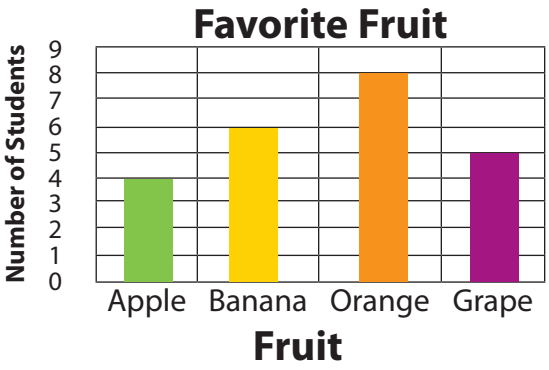
2 How many students chose dog or fish?

_____ + _____ = _____ students

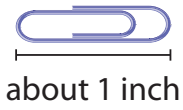
3 How many more students chose bird than fish?

_____ − _____ = _____ students

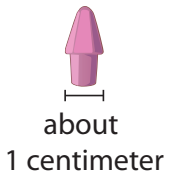
bar graph
a graph that uses separate bars to display and compare data



benchmark
known object that is used to help estimate the measurement of other objects



centimeter
metric unit for measuring length; about the width of a cap eraser

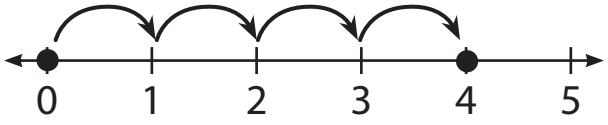


centimeter ruler
a measuring tool marked in centimeters

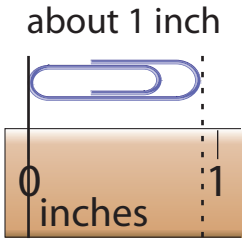
data
numbers or items shown in a table

Favorite Season	Number of Students
Spring	15
Summer	25
Fall	10

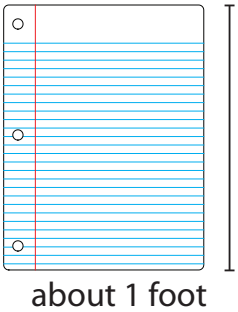
distance
the number of units between two numbers on a number line



estimate
to make an approximate or rough measurement



foot
customary unit for measuring length; about the length of a sheet of notebook paper

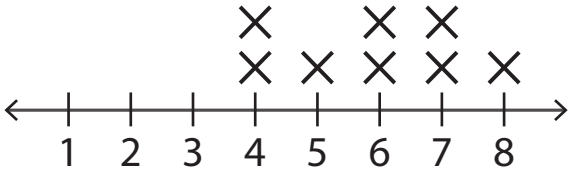


inch
customary unit for measuring length; about the length of a small paper clip

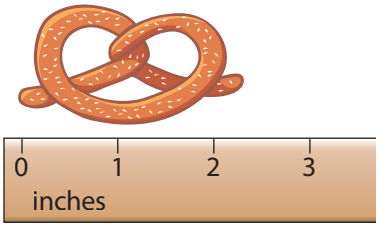
Glossary

length
the distance from one end of an object to the other end

line plot
a graph that displays data as X's above a number line

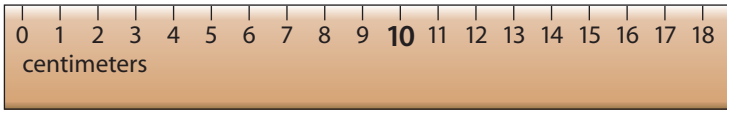


measure
to find the size of something (for example, length) using a standard of comparison

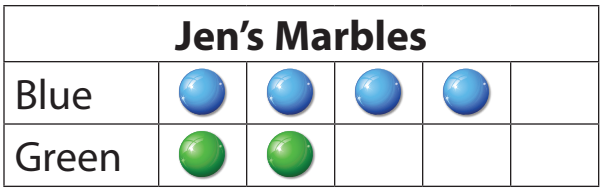


meter
metric unit for measuring length; about the length of a baseball bat

meter stick
a measuring tool marked in centimeters that is 1 meter long



picture graph
a graph in which the data are displayed in a table using pictures



Key: Each picture stands for 1.

yard
customary unit for measuring length; about the length of a baseball bat

Office of Exceptional Student Education

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Office of Exceptional Student Education

Distance Learning Packet

MiCI Program

Math 6-8

Week 8: June 1 – 5, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

DETROIT PUBLIC SCHOOLS COMMUNITY DISTRICT

Week of 6/01/20 to 6/05/20

Directions: Parents/Guardians and/or family members will engage middle school students in Math activities and focus on counting coins and describing geometrical shapes that slide, stack and roll.

Goal/Objective(s) The student should demonstrate fundamental knowledge of money concepts to determine value and describe geometric units and properties using attributes (cylinder, rectangular, sphere, cube).

Module Module 5: Money and Geometry

Materials Needed: VMath Student Workbook C, Extra Practice (pg. 49-51) pencil and crayons, scissors and cutout coins (pg. 59).

Target

1. The student will demonstrate knowledge of solid figures and identify two-dimensional figures with a common attribute.
2. The student can match coins of the same value (penny, nickel, dime, and quarter) when presented within a group.
3. The student can describe the attributes (i.e., number of sides, corners, angles) of common two-dimensional shapes
4. The student can identify shapes that can be partitioned into equal parts when provided with a visual model (limited to halves, thirds, and fourths).

Week 8	Activity	Do	Task
Day 1	Groups of Coins with the Same Value	Lesson 1 Pg. 9-12	Home activity and Khan Academy Online Video
Day 2	Using Fewest Coins to Make an Amount	Lesson 2 Pg. 13-16	Home activity and Khan Academy Online Video
Day 3	Making Decisions about Money	Lesson 3 Pg. 17-20	Home activity and Khan Academy Online Video
Day 4	Knowing Solid Figures	Lesson 4 Pg. 21-24	Home activity and Khan Academy Online Video
Day 5	Properties of Solid Figures	Lesson 5 Pg. 25-28	Home activity and Khan Academy Online Video

Week 8: Module 5

Objective	1. The student will demonstrate knowledge of solid figures and identify two-dimensional figures with a common attribute. 2. The student can match coins of the same value (penny, nickel, dime, and quarter) when presented within a group. 3. The student can describe the attributes (i.e., number of sides, corners, angles) of common two-dimensional shapes 4. The student can identify shapes that can be partitioned into equal parts when provided with a visual model (limited to halves, thirds, and fourths).
Video Link	https://www.youtube.com/watch?v=pJ8KwRztfF0 – Counting Money https://www.youtube.com/watch?v=tqxQSSzuXX0 – Geometric Shapes
Guided Practice	With a family member, caregiver, or friend, complete these recommended application problems and/or problems sets: **Lesson 1 Pg. 9-12** **Lesson 2 Pg. 13-16** **Lesson 3 Pg. 17-20** **Lesson 4 Pg. 21-24** **Lesson 5 Pg. 25-28**
Closing	Share your math work with someone and tell them which problems were "easy" and which you need to practice.
Extend	Consider completing supplemental work for additional practice: ● End of Workbook: Module 5 (pages 49-51). ● Using shapes from page **26**, identify and name all geometric shapes on using glossary terms (Cylinder, cube, sphere, rectangular prism, cone, pyramid, etc). ● Using Cutout Coins/real coins, group different coins of equal value amounts.
Intervention	Practice the following application problems, previous week's problems and lessons to prepare you for next week.

Module 5 Application Problems and Problem Sets for Print

Lesson PL2

You Need

Try It Together

Find the value of each group of coins.

5 

_____

6 

_____

Work On Your Own

Find the value of each group of coins.

7 

_____

8 

_____

9 

_____

Solve the problem.

10 Leo has 2 nickels, 2 dimes, and 2 quarters in his bank. How much money does Leo have in his bank? _____

Explain It

Kim has these coins.

What is the total value of Kim's coins? Explain.

Check Up

Fill in the bubble of each correct answer.

11 What is the value of the group of coins?

○ 30¢ ○ 85¢ ○ 90¢

12 John has 2 nickels, 3 dimes, and 1 quarter. How much money does John have?

○ 55¢ ○ 60¢ ○ 65¢

13 Show a group of nickels, dimes, and quarters. What is the value of your set of coins? Talk it over.

Groups of Coins with the Same Value

Name _____ Class _____ Date _____

Get Started

1

_____

2

_____

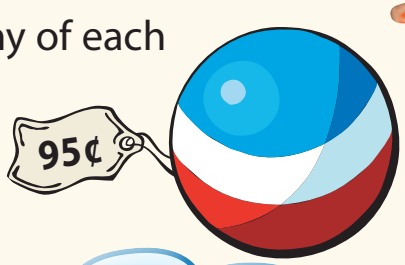
3

How To

Barry has saved 5 dollars in quarters and dimes. He will spend some of his money on a ball. How many of each coin could he use to buy the ball?

_____

_____



Step 1

Tell how many quarters.

The value of the quarters is _____.

Think: Do I start with the coin of greater or lesser value?

Step 2

Tell how many dimes.

The value of the quarters and dimes is _____.

You Need

Try It Together

Find two ways to buy the item.

4


_____ _____

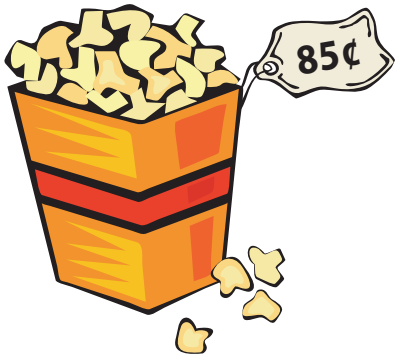
OR


_____ _____

Work On Your Own

Find two ways to buy the item.

5




_____ _____

OR


_____ _____

Solve the problem.

6 Carlos has saved 4 dollars in quarters, dimes, and nickels. He wants to spend 50¢ on a balloon. He can pay with 2 quarters. How else can he pay?

_____ dimes

OR

1 quarter and _____ nickels

Making a List

Problem-Solving

Pam has 5 dollars saved. Pam will use 40¢ to buy a book. She only has dimes and nickels. How can she pay for the book?

Find how Pam can pay for the book

How Make a list. Find all the ways to make 40¢ using just dimes and nickels.

Solve

	4				0
	0				8

Explain Does my answer make sense? Explain.

_____

_____

Check Up

Fill in the bubble of the correct answer.

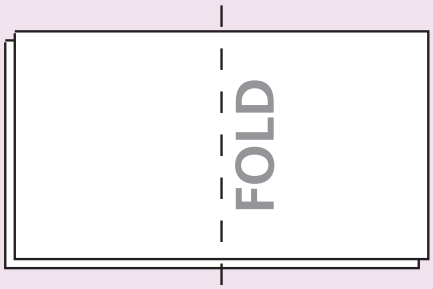
7 Which coins do **not** make 30¢?

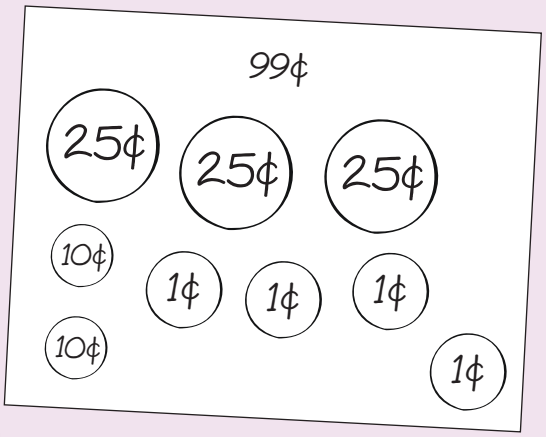
- ⬭ 2 dimes and 2 nickels
- ⬭ 1 quarter and 1 nickel
- ⬭ 5 nickels and 1 penny

8 Take a group of coins. What is the total value? What other coins can you use to show the same value? Talk it over.

Center 1: Make a Book about 99¢

1. Take 2 half-sheets of paper. Fold them down the middle. Staple on the fold.
2. Make a cover for the book.
3. Work by yourself. Draw coins to show a way to make 99¢. Show a different way on each page.
4. Share your book with another student. Check each other's work.





Using Fewest Coins to Make an Amount

Name _____ Class _____ Date _____

Get Started

1

_____

2

_____

3 36¢

How To

Make 22¢. Use the fewest coins.

Think: What coin should I start with?

Step 1

One quarter is _____.
One quarter is greater than 22¢. Do **not** use a quarter.

Step 2

One dime is _____. Two dimes are _____.
Three dimes are _____. Use 2 dimes.

Step 3

Two dimes and 1 nickel is _____. Do **not** use a nickel.

Step 4

Two dimes and 1 penny is _____.
Two dimes and 2 pennies is _____. Use 2 pennies.

Try It Together

Make the amount. Use the fewest coins.

4 51¢

Work On Your Own

Make each amount. Use the fewest coins.

5 18¢

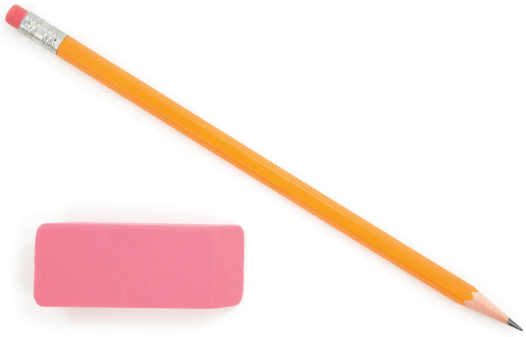
6 84¢

Solve the problem.

7 Max bought a pencil and an eraser. He paid 52¢. He used the fewest coins. What coins did he use?

_____

_____



Explain It

Julia has saved 8 dollars. She wants to spend 75¢ to buy stickers. She paid with the coins shown. Are these the fewest coins she can use? Explain.

Check Up

Fill in the bubble of each correct answer.

8 Evan has 65¢. Which shows 65¢ using the fewest coins?

- ⬭ 1 quarter and 4 dimes
- ⬭ 2 quarters and 3 nickels
- ⬭ 2 quarters, 1 dime, and 1 nickel

9 Anna wants to buy a bag of pretzels for 36¢. Which shows 36¢ using the fewest coins?

- ⬭ 3 dimes, 1 nickel, and 1 penny
- ⬭ 1 quarter, 1 dime, and 1 penny
- ⬭ 1 quarter and 11 pennies

10 What is the fewest coins that show 15¢? Is a quarter one of the coins? Talk it over.

Center 1: Show Me the Fewest Coins

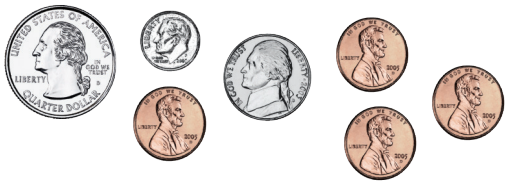
1. Two students play this game. Shuffle the value cards.
2. The first player picks a card. Use the fewest coins to show the value on the card.
3. The second player looks at the coins to see if fewer coins can be used.
4. If the second player can use fewer coins, he or she gets 1 point. If not, the first player gets 1 point.
5. Switch roles and play again.
6. The first player to earn 5 points wins the game.

Making Decisions about Money

Name _____ Class _____ Date _____

Get Started

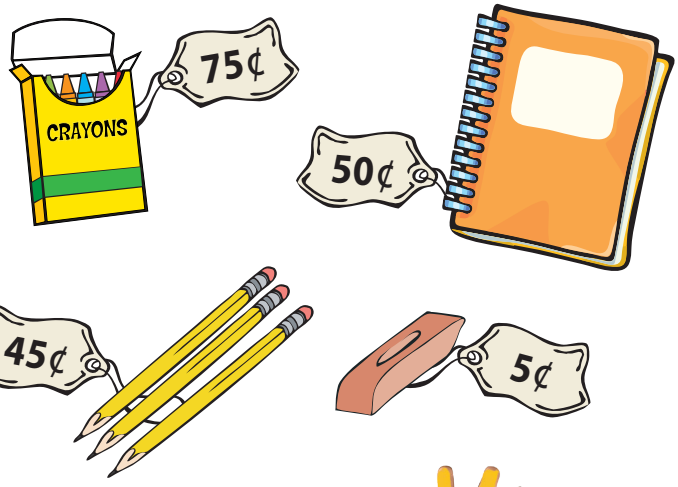
1



_____

2 Maria has 1 quarter and 2 dimes. What item can she buy with this exact amount? _____

3 Trevor has 2 quarters and 1 nickel. What item is he **not** able to buy? _____



How To

Luke has 3 quarters. Which item can he buy using all his coins?

Step 1

Find the total value of the coins.
The total value of the coins is _____.

Think: How can I find the value of 3 quarters?

Step 2

Look at the prices of the items.
The item that costs 75¢ is the _____.

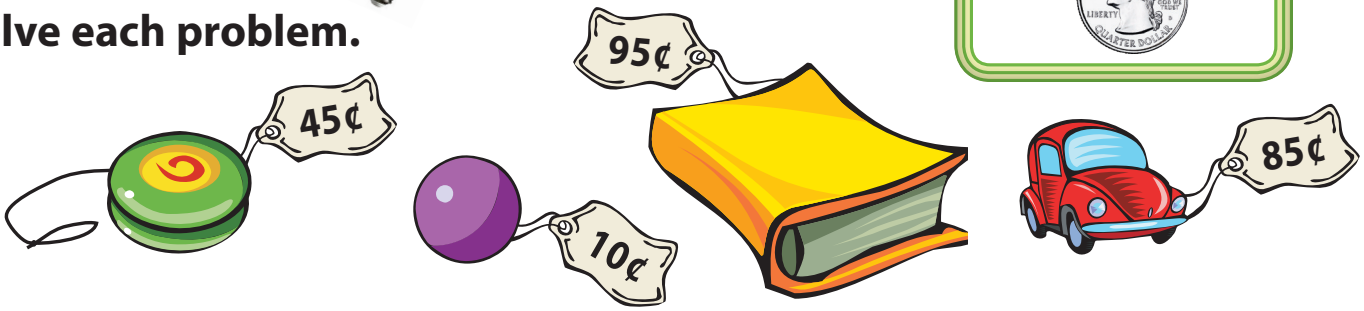
Step 3

Answer the question.
Luke can buy _____ with 3 quarters.

You Need

Try It Together

Solve each problem.

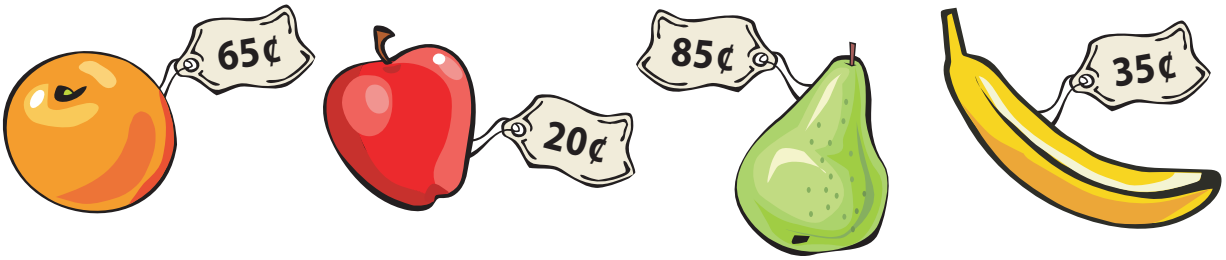


4 Tracy has 3 quarters and 2 nickels. What item can she buy with this exact amount? _____

5 Aaron has 8 dimes, 2 nickels, and 3 pennies. What item is he **not** able to buy? _____

Work On Your Own

Solve each problem. Use the fruit items for problems 6 and 7.



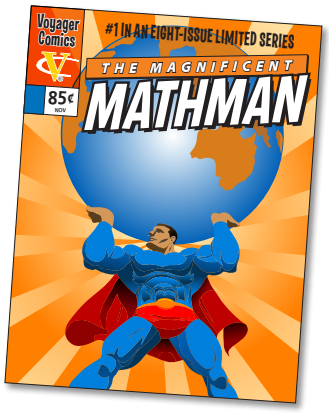
6 Mathew has 2 quarters and 3 nickels. What item can he buy with this exact amount? _____

7 Alexandra has 6 dimes, 1 nickel and 5 pennies. What item is she **not** able to buy? _____

8 Jack has 2 quarters, 3 dimes, 1 nickel, and 2 pennies. Can he buy a comic book that costs 85¢? Explain.

_____

_____



Problem-Solving

Using a Model

Roberto has saved 3 quarters, 2 dimes, and 2 nickels. He buys French fries with 45¢ of his savings. What are the fewest coins he can use?

Find the fewest coins to make 45¢

How Use coins to model the problem.

Solve Choose coins to make 45¢. Use the fewest coins.

The fewest coins he can use are _____

_____.

Explain Does my answer make sense? Explain.

_____

_____

Check Up

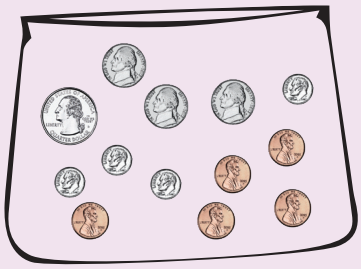
Fill in the bubble of the correct answer.

9 Amy has 1 quarter, 1 dime, and 6 pennies. Which item can she buy with this exact amount?

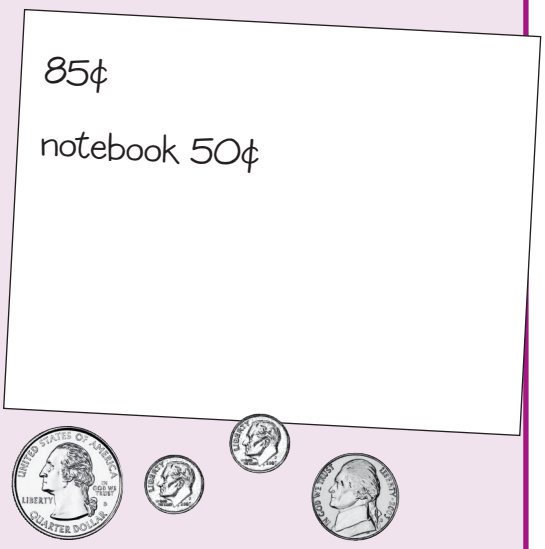
- ⬭ raisins
- ⬭ milk
- ⬭ muffin

10 How did you decide what Amy could buy with her coins? What did you do first? Talk it over.

Center 1: Classroom Store



1. Work with a partner. Open a bag of coins. On your paper write the value of the coins.
2. Look at the chart below. The first partner chooses an item to buy. Write it down on the paper.
3. The second partner finds the cost of the item. Decide if there is enough money.
4. If there is enough money, the second partner shows the coins needed.
5. If there is not enough money, the first partner chooses a different item. Repeat Steps 3 and 4.
6. Switch roles and play again.



Classroom Store	
Eraser	5¢
Notebook	50¢
Pack of Pencils	45¢
Box of Crayons	35¢
Silly Pen	85¢
Paper Clip	10¢
Marker	95¢

Academic Vocabulary

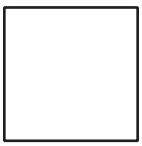
square	face	cone
circle	pyramid	sphere
triangle	corner	cube
rectangle	cylinder	
solid figure	rectangular prism	

Knowing Solid Figures

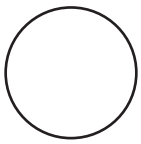
Name _____ Class _____ Date _____

Get Started

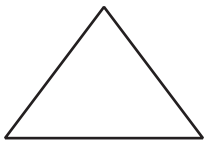
1



square



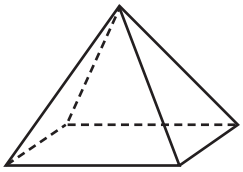
circle



triangle

rectangle

2



_____

_____ faces

_____ corners

How To

What type of solid figure is the box?

Step 1

Name the shape of the faces.
The faces are

_____.

Think: What faces and corners can't be seen?

Step 2

Count the faces and corners.
The box has _____ faces and _____ corners.

Step 3

Name the solid figure.
The box is a _____.

Try It Together

Match each solid figure with its name.

3

cone cylinder cube pyramid rectangular prism sphere

Name the solid figure. Count the faces and corners.

4

_____

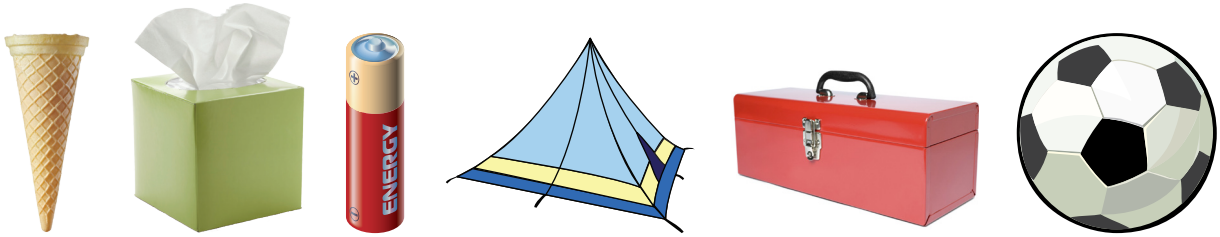
_____ face

_____ corners

Work On Your Own

Match each solid figure with its name.

5



cylinder cone cube sphere pyramid rectangular prism

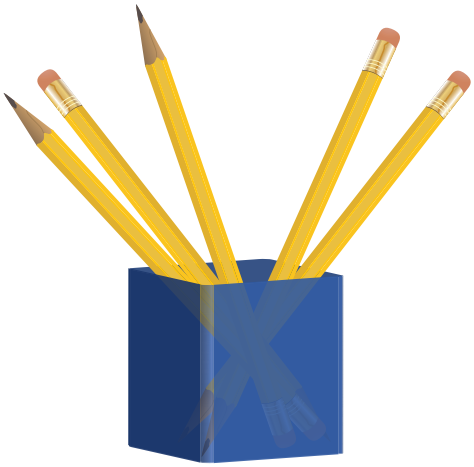
Solve the problem.

6 Mr. Casey puts a new pencil holder on his desk. The pencil holder is in the shape of what figure? How many faces and corners does the figure have?

_____

_____ faces

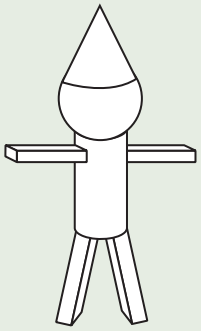
_____ corners



Problem-Solving

Using a Picture

Lucia made a doll for her sister. She used solid figures. What solid figures did she use?



Find the solid figures Lucia used

How Use the picture.

Solve Color each kind of solid figure a different color. Then name the solid figures.

Lucia used _____ cone, _____ sphere,

_____ cylinder, and _____ rectangular prisms.

Explain Does my answer make sense? Explain.

_____

_____

_____

Check Up

Fill in the bubble of the correct answer.

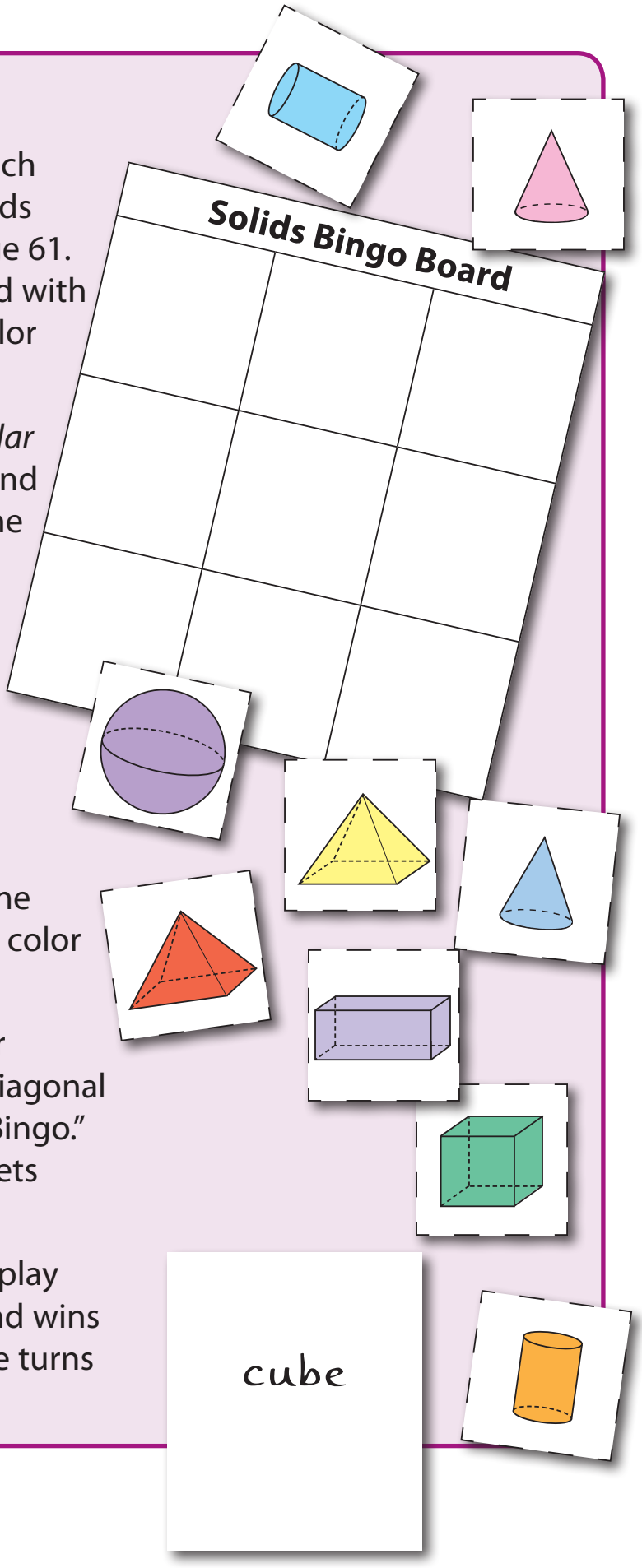
7 What is the name of the solid figure?

- ⬭ cone
- ⬭ cylinder
- ⬭ rectangular prism

8 Yancey and Felix compare a cone and a cylinder. How are they the same? How are they different? Talk it over.

Center 1: Solids Bingo

1. You need 3 students to play. Each student should cut out the Solids Bingo Board and pieces on page 61. Cover each square on the board with a piece. Each player needs 9 color tiles or counters.
2. Write the words *cube*, *rectangular prism*, *pyramid*, *cylinder*, *cone*, and *sphere* on slips of paper. Fold the slips and put them in a bag.
3. One student picks a slip and reads the name of the solid. Use the solids cards to keep track of which solid figure was called. Return slips to the bag before picking again.
4. The other students search for the correct solid and mark it with a color tile or counter on their boards.
5. When a player has three tiles or counters in a row, column, or diagonal on the board, the player says "Bingo." The first player to say "Bingo" gets 1 point.
6. Clear the boards and continue play until one player has 3 points and wins the game. Students should take turns picking the slips.

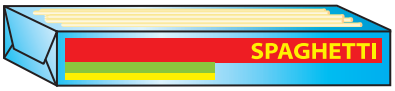


Properties of Solid Figures

Name _____ Class _____ Date _____

Get Started

1



_____ _____ _____

2

stack slide roll

3

stack slide roll

4

stack slide roll

5

stack slide roll

How To

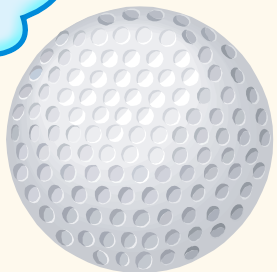
Can a sphere roll, stack, or slide?

Step 1 Try to roll a sphere.

Step 2 Try to stack 2 spheres.

Step 3 Try to slide a sphere.

Think: Is sliding the same as rolling?



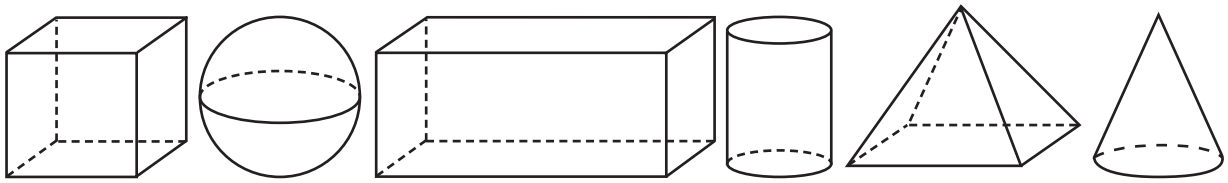
A sphere can _____, but it cannot _____ or _____.

You Need

Try It Together

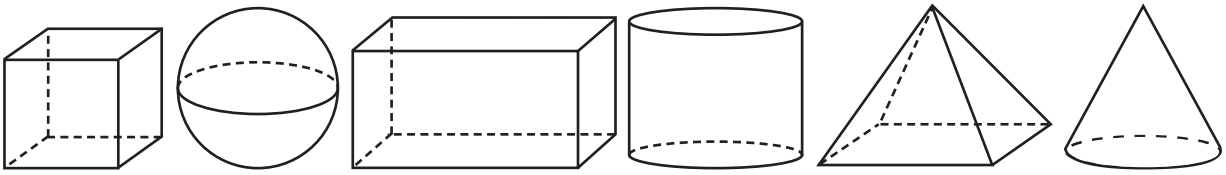
Use blue to color each solid figure that will roll.

6



Use green to color each solid figure that will stack and slide.

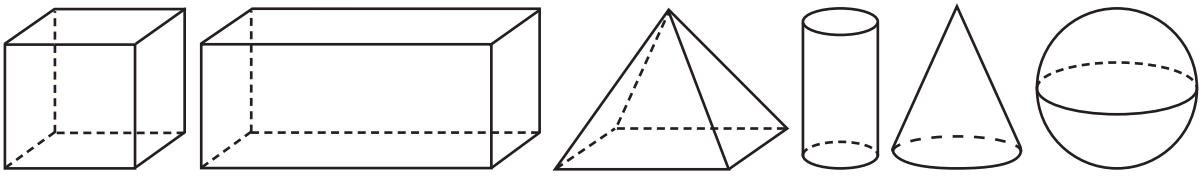
7



Work On Your Own

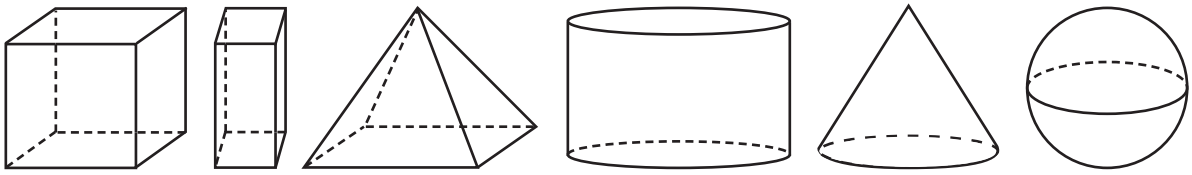
Use yellow to color each solid figure that will slide.

8



Use purple to color each solid figure that will stack and roll.

9

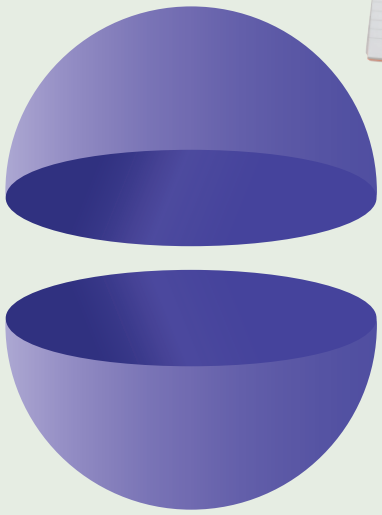


Solve the problem.

10 Avril is buying a paperweight. She wants the paperweight to slide but **not** roll. Draw a ring around the paperweight she should buy.

Explain It

Blake cuts a sphere in 2 pieces. Now he is able to slide each piece of the sphere. Why? Explain.



_____

_____

_____

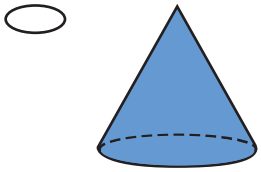
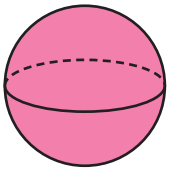
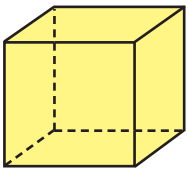
_____

_____

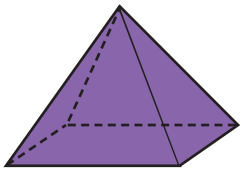
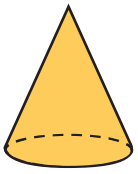
Check Up

Fill in the bubble of each correct answer.

11 Which solid figure will stack and slide?

12 Which solid figure will roll and slide?


13 Can you stack a cylinder on top of a cube? Can you stack a cube on top of a rectangular prism? Talk it over.

Name _____ Class _____ Date _____

Lesson PL1 Dimes and Pennies

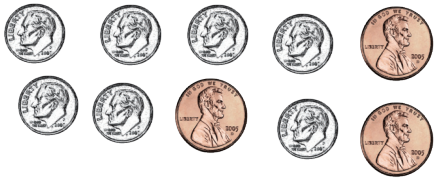
Find the value of each group of coins.

1 

_____

2 

_____

3 

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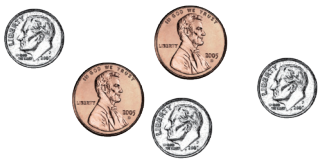
4 

_____

Lesson PL2 Quarters, Dimes, and Nickels

Find the value of each group of coins.

1 

_____

2 

_____

3 

_____

4 

_____

Extra Practice

Name _____ Class _____ Date _____

Lesson 1 Groups of Coins with the Same Value

Find two ways to buy each item.

1

 _____  _____

OR

 _____  _____

2

 _____  _____

OR

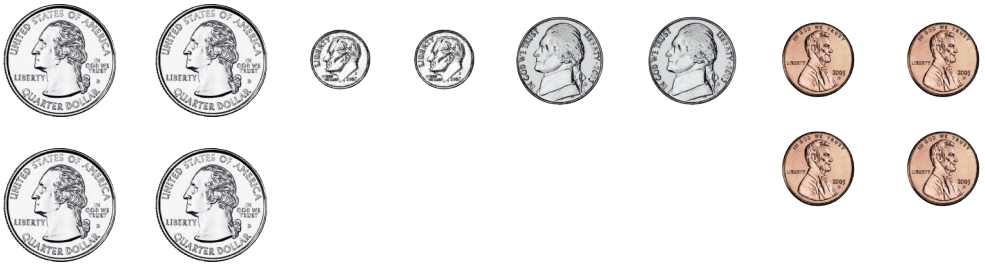
 _____  _____

Lesson 2 Using Fewest Coins to Make an Amount

Make each amount. Use the fewest coins.

1 63¢

2 97¢



Name _____ Class _____ Date _____

Lesson 3 Making Decisions about Money

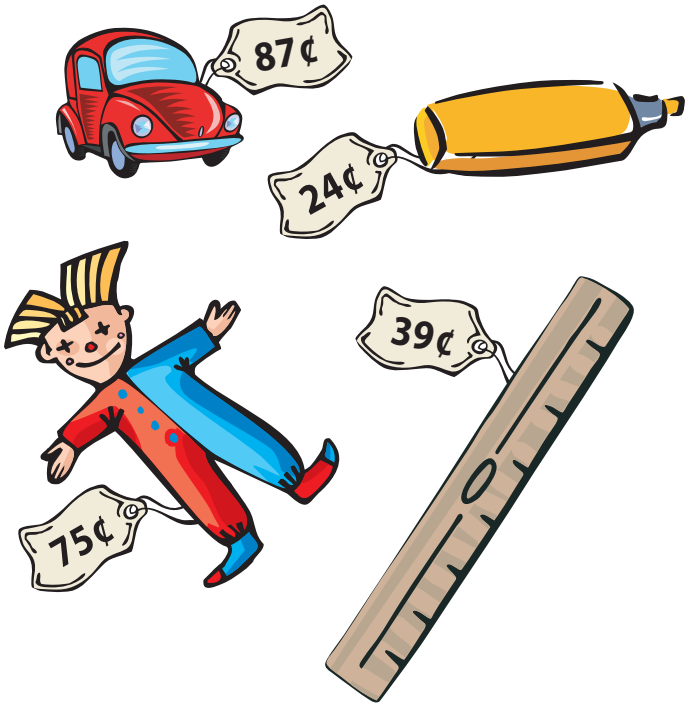
Solve each problem.

1. Pam has 1 quarter, 1 dime, and 4 pennies. What item can she buy with this exact amount?

_____

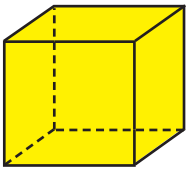
2. Tomás has 2 quarters, 2 dimes, 1 nickel, and 5 pennies. What item is he **not** able to buy?

_____



Lesson 4 Knowing Solid Figures

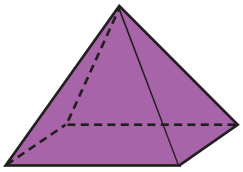
Name each solid figure. Count the faces and corners.

1. 

_____

_____ faces

_____ corners

2. 

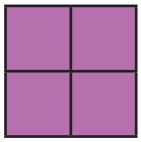
_____

_____ faces

_____ corners

Glossary

area
the number of square units that fill a plane figure



4 square units

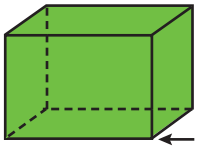
cent sign (¢)
a symbol that means *cents*

35¢

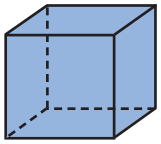
circle
a figure that has no straight sides

cone
a solid figure with a circular face and a curved surface that meets at a point

corner
a point where 3 or more faces of a solid figure meet



cube
a solid figure with 6 square faces that are the same size



cylinder
a solid figure with 2 circular faces that are the same size

decimal point
a symbol used to separate dollars from cents

$0.25

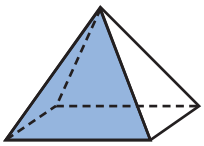
dime
a coin that is worth 10 cents

dollar sign ($)
a symbol that means *dollars*

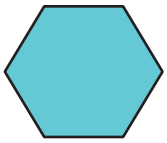
$8.00

Glossary

face
a flat surface of a solid figure



hexagon
a polygon that has 6 sides

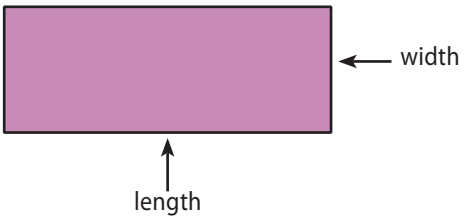


nickel
a coin that is worth 5 cents

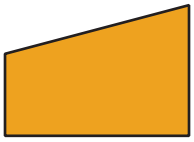
penny
a coin that is worth 1 cent

pentagon
a polygon that has 5 sides

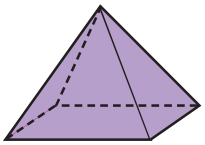
plane figure
a flat shape having only
2 dimensions, length and width



polygon
a closed figure made up of
straight lines



pyramid
a solid, pointed figure with some
or all faces that are triangles

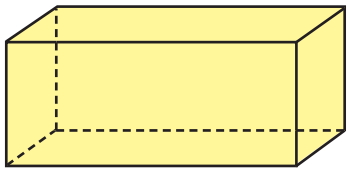


quarter
a coin that is worth 25 cents

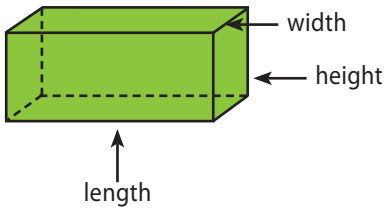
Glossary

rectangle
a figure that has 4 straight sides with 2 equal longer sides and 2 equal shorter sides

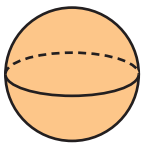
rectangular prism
a solid figure with 6 faces that are rectangles



solid figure
a figure that has length, width, and height

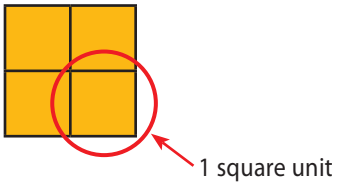


sphere
a solid figure with all points on the surface the same distance from the center

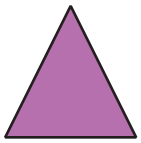


square
a figure that has 4 straight equal sides

square unit
the unit used to measure area



triangle
a figure that has 3 straight sides



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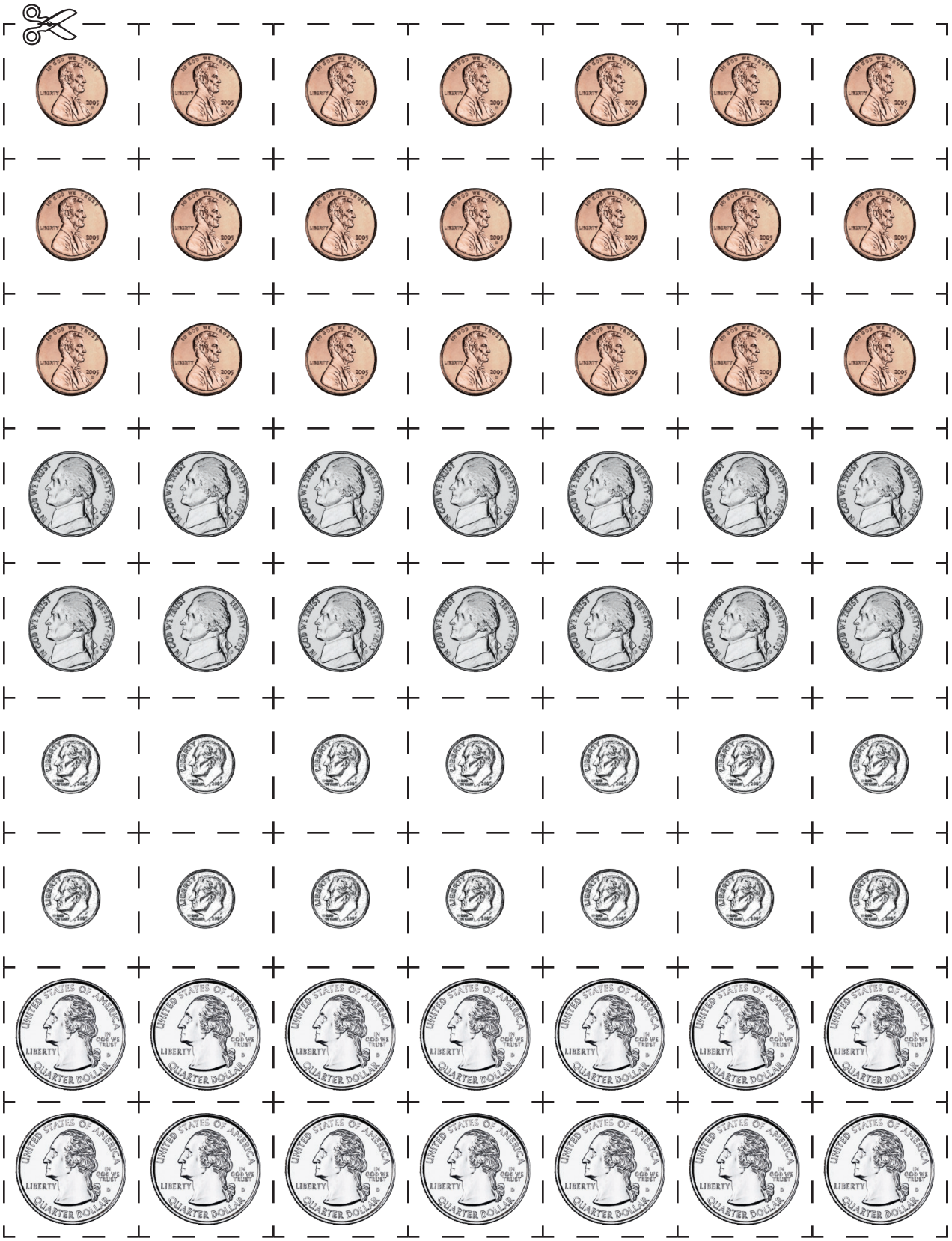
Name _____ Class _____ Date _____

Coins



Office of Exceptional Student Education

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Distance Learning Packet

MiCI Program

Math 6-8

Week 9: June 8 – 12, 2020

Students Rise. We all Rise

VOYAGER: VMath Level C

WEEKLY DISTANCE LEARNING STUDENT SCHEDULE

Week of 6/08/20 to 6/12/20

Directions: Parents/Guardians and/or family members will engage middle school students in Math activities by determining the area of a square and rectangle and focus on identifying basic shapes made from polygon (2-dimensional shapes made from straight lines) shapes.

Goal/Objective(s) The student should demonstrate knowledge of combining solid figures from shapes learned last week (cylinder, prism, sphere, cube) to create new figures and understand how to solve for area.

Module Module 5: Money and Geometry

Materials Needed: VMath Student Workbook C, Extra Practice (pg. 52-54), pencil, crayons, scissors and Solids Bingo Board (pg. 61).

Target

1. The student will demonstrate knowledge of known polygon figures (pentagon, hexagon, octagon, etc).
2. The student can identify shapes that are divided equally when given a visual model (limited to halves and fourths).
3. The student can calculate the area of a rectangle and square by counting individual unit squares.
4. The student can identify polygons that can be split and added together to make new shapes.

Week 9	Activity	Do	Task
Day 1	Knowing Plane Figures	Lesson 6 Pg. 29-32	Home activity and Khan Academy Online Video
Day 2	Properties of Polygons	Lesson 7 Pg. 33-36	Home activity and Khan Academy Online Video
Day 3	Making and Separating Plane Figures	Lesson 8 Pg. 37-40	Home activity and Khan Academy Online Video
Day 4	Understanding Area	Lesson 9 Pg. 41-44	Home activity and Khan Academy Online Video
Day 5	Combining Solid Figures	Lesson 10 Pg. 45-48	Home activity and Khan Academy Online Video

Week 9: Module 5

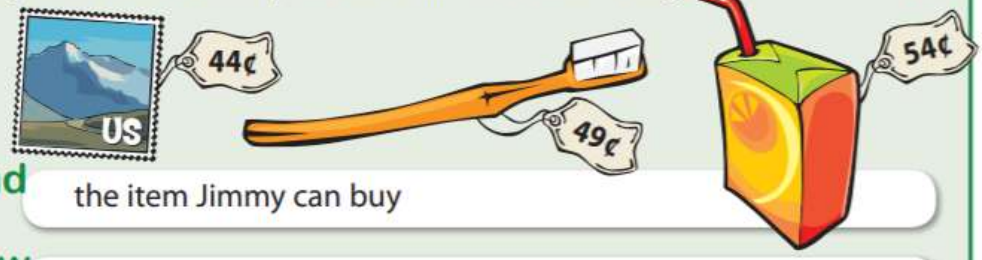
Objective	1. The student will demonstrate knowledge of known polygon figures (pentagon, hexagon, octagon, etc). 2. The student can identify shapes that are divided equally when given a visual model (limited to halves and fourths). 3. The student can calculate the area of a rectangle and square by counting individual unit squares. 4. The student can identify polygons that can be split and added together to make new shapes.
Video Link	https://www.youtube.com/watch?v=O1R4H3Ca82E – Counting Area w/ Unit square https://www.youtube.com/watch?v=tqxQSSzuXX0&t=19s – Recognizing 3D Shapes
Guided Practice	With a family member, caregiver, or friend, complete these recommended application problems and/or problems sets: **Lesson 6 Pg. 29-32** **Lesson 7 Pg. 33-36** **Lesson 8 Pg. 37-40** **Lesson 9 Pg. 41-44** **Lesson 10 Pg. 45-48**
Closing	Share your math work with someone and tell them which problems were "easy" and which you need to practice.
Extend	Consider completing supplemental work for additional practice: ● End of Workbook: Module 5 (pages 52-54). ● Combine basic 2D shapes learned to make new 2D & 3D shapes (ex: drawing and combining 2 squares onto one another makes a cube or two triangles in opposite directions to make a square). ● Draw a large square and/or rectangle and create unit squares to determine the area.
Intervention	Practice the following application problems, previous week's problems and lessons and review all other lessons.

Module 5 Application Problems and Problem Sets for Print

Using a Model

Problem-Solving

Jimmy has 4 dimes and 4 pennies. Which item can he buy?



Find the item Jimmy can buy

How Use coins to model the problem. Find the value of the group of coins.

Solve

_____

Which item can Jimmy buy? _____

Explain Does my answer make sense? Explain.

_____

_____

Check Up

Fill in the bubble of the correct answer.

11 What is the value of the group of coins?

⬭ 25¢ ⬭ 52¢ ⬭ 70¢

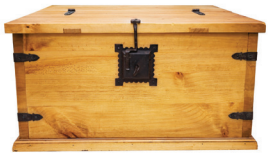
12 Show a group of dimes and pennies. What is the value of your group of coins? Talk it over.

Knowing Plane Figures

Name _____ Class _____ Date _____

Get Started

1



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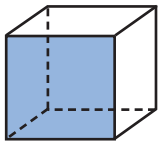
2



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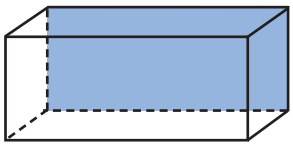

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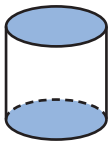

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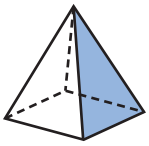
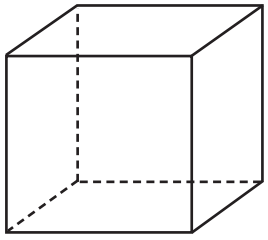


_____ _____

How To

What are the shapes of the faces of a cube?

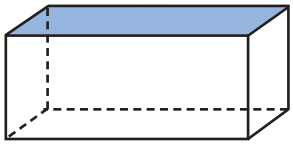
Think: Are all the faces the same?



The shapes of the faces of a cube are all _____.

Try It Together

Name the blue shape on each solid figure.

6 

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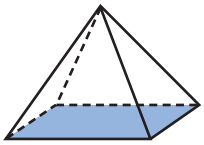
7 

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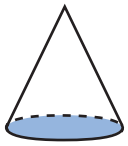
Work On Your Own

Name the blue shape on each solid figure.

8 

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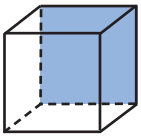
9 

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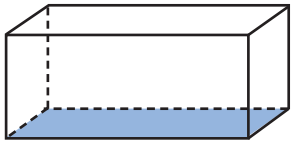
10 

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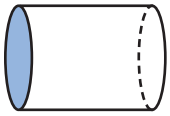
11 

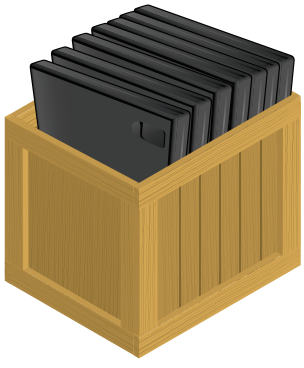
_____

Solve the problem.

12 Emily wants to make a box for her movies. What two shapes will she need for the sides?

_____

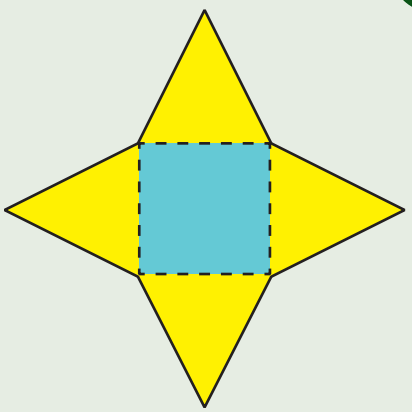
_____



Problem-Solving

Using a Diagram

Lucia made a solid figure from this shape. She cut it out. Then she folded along the dotted lines and taped the sides together. What solid figure did Lucia make?



Find the solid figure made by Lucia

How Use a diagram.

Solve

The shape of the blue face is a _____.

The shape of each yellow face is a _____.

The solid figure is a _____.

Explain

Does my answer make sense? Explain.

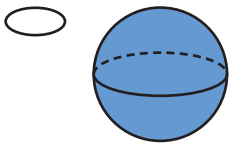
_____

_____

Check Up

Fill in the bubble of the correct answer.

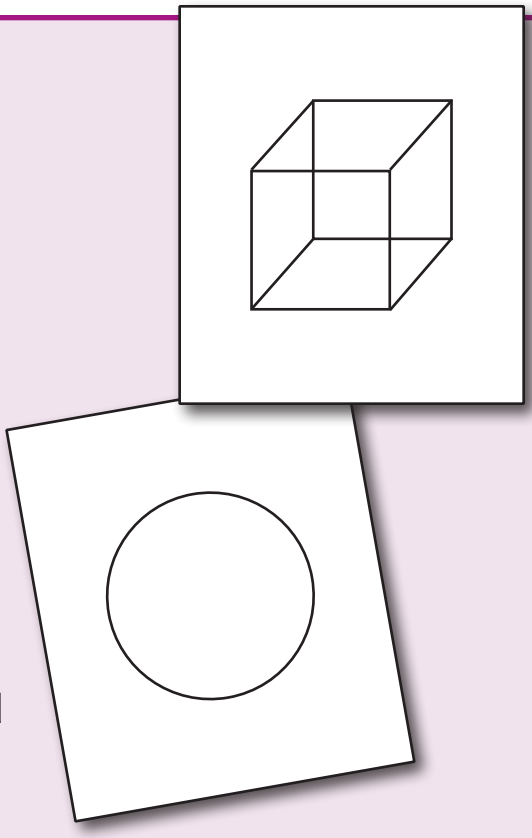
13 Which solid figure has a circle as a face?



14 A cone, a cylinder, and a sphere are solid figures that roll. Do all these solid figures have faces that are circles? Talk it over.

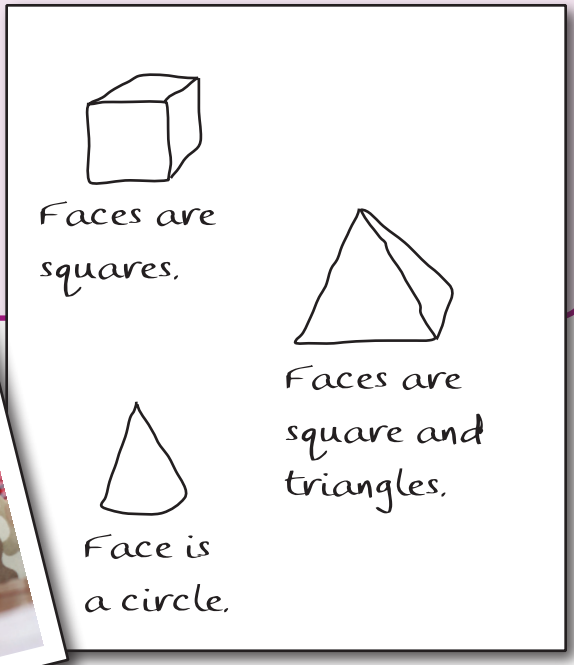
Center 1: Sketch the Faces

1. Look at the block. Trace each face of the block on a sheet of paper.
2. Look at the cereal box. Trace each face of the box on a sheet of paper.
3. Look at the can. Trace both faces of the can on a sheet of paper.
4. Look at the cone. Trace the face of the cone on a sheet of paper.
5. Get together with other students. Compare your drawings. The shapes and number of faces for each solid should be the same.



Center 2: Shape Scavenger Hunt

1. Work with a partner. Find 5 different solid figures in your classroom.
2. Draw a picture of each solid figure. Write the names of the shapes of the faces under each picture.



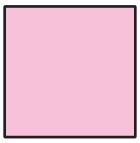
Academic Vocabulary
pentagon
hexagon
polygon

Properties of Polygons

Name _____ Class _____ Date _____

Get Started

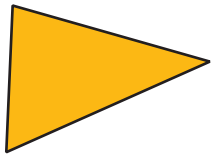
1



_____
_____ sides
_____ corners

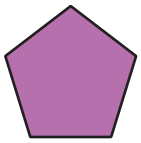
_____
_____ sides
_____ corners

2



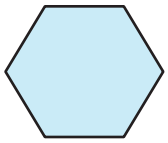
_____
_____ sides
_____ corners

3



_____
_____ sides
_____ corners

4

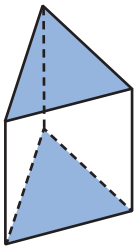


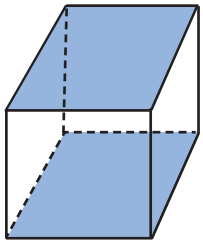
_____
_____ sides
_____ corners

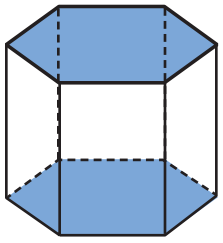
Think: Is each blue face closed? Does each face have straight sides?

How To

Trace each blue face.



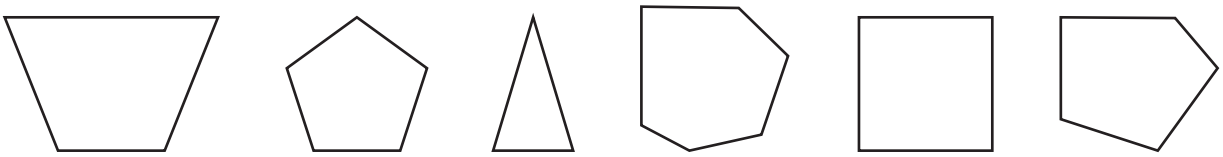




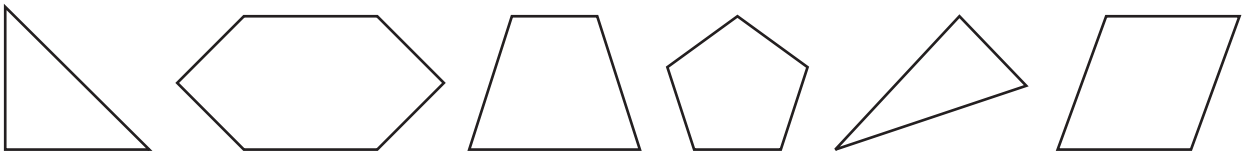
A polygon is _____ and has straight _____.

Try It Together

Use blue to color the polygons with 5 corners and 5 sides.

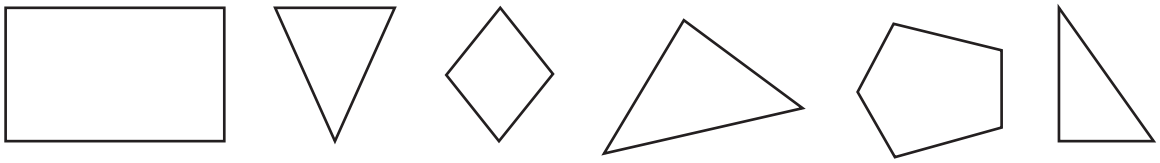
5 

Use yellow to color the polygons with 4 corners and 4 sides.

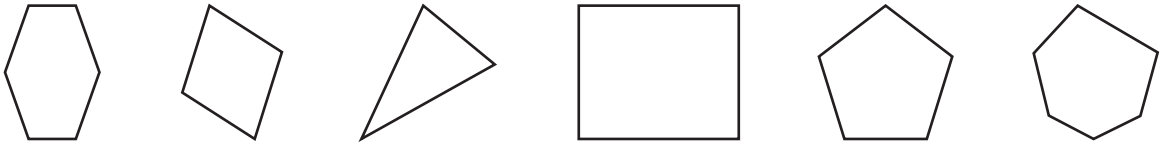
6 

Work On Your Own

Use green to color the polygons with 3 corners and 3 sides.

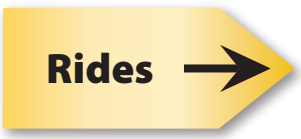
7 

Use red to color the polygons with 6 corners and 6 sides.

8 

Solve the problem.

9 A sign at the fair points in the direction of the rides. The sign is in the shape of a polygon. What is the name of the polygon?



_____

Explain It

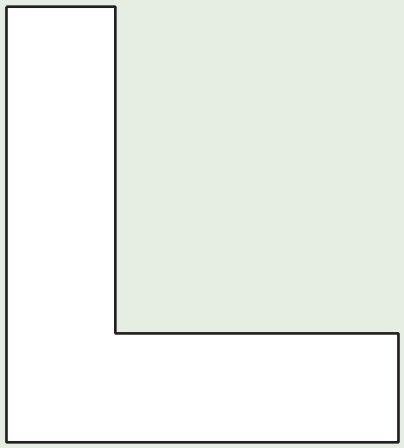
Viola drew a polygon in the shape of the letter L. What is the name of the polygon? Explain.

_____

_____

_____

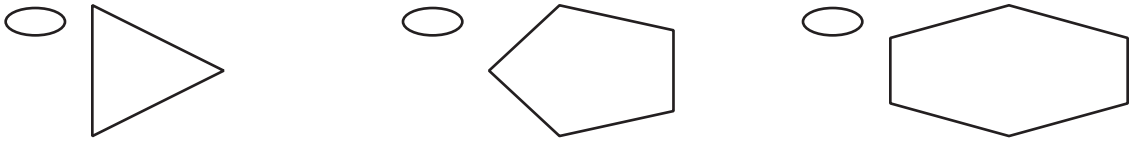
_____



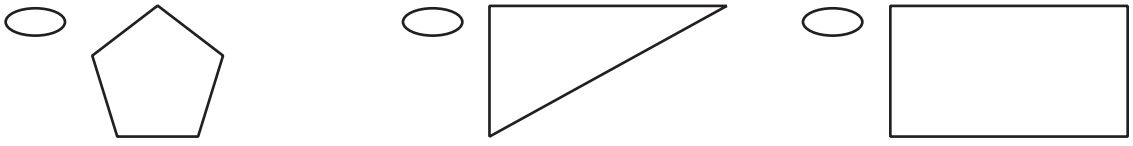
Check Up

Fill in the bubble of each correct answer.

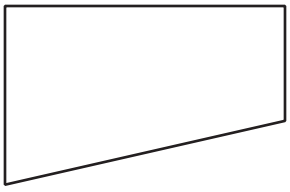
10 Which polygon has 5 sides and 5 corners?



11 Which polygon has the same number of sides and the same number of corners as a square?

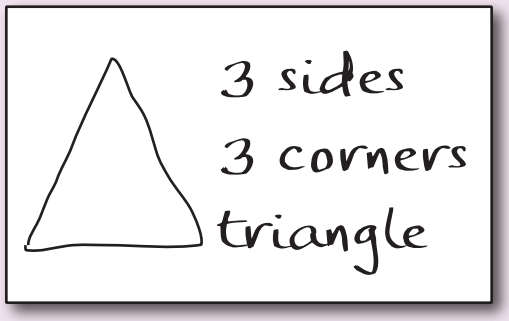


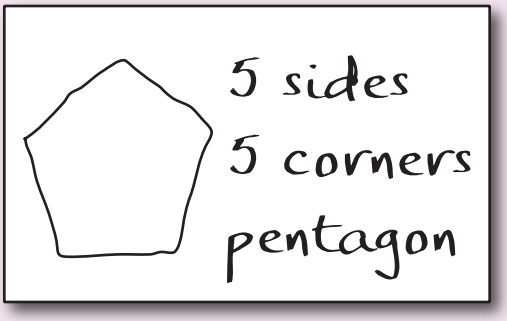
12 This polygon has 4 sides and 4 corners. Is the polygon a rectangle? Is it a square? Talk it over.



Center 1: Shape Cards

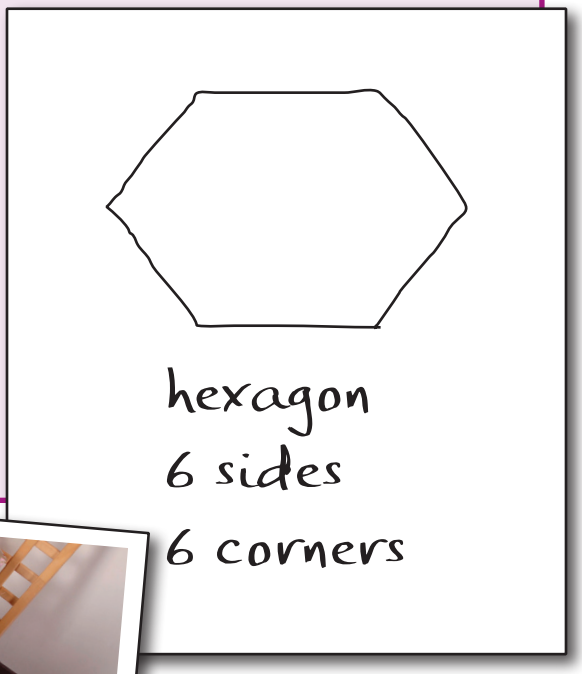
1. Work with a partner. Each student needs 5 index cards. On each card, draw a different polygon: a triangle, a square, a rectangle, a pentagon, and a hexagon.
2. Swap cards with your partner.
3. Write the number of sides and the number of corners of the polygons on each card. Then write the name of the polygon.
4. Compare completed cards with each other.





Center 2: Polygon Scavenger Hunt

1. Work with a partner. Find as many polygons as you can from this list: square, rectangle, triangle, pentagon, and hexagon.
2. Draw a picture of each polygon.
3. Write the name of the polygon under the picture. Then write the number of sides and the number of corners.

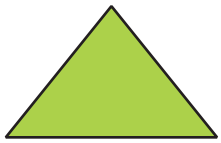


Making and Separating Plane Figures

Name _____ Class _____ Date _____

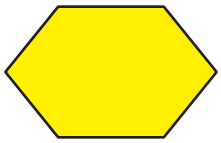
Get Started

1



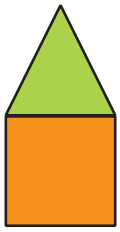
_____

_____



_____

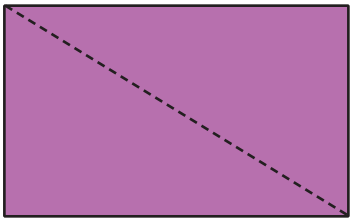
2



_____

_____

3



_____

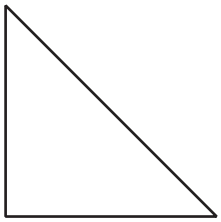
_____

How To

Use triangles to make a square. Separate a square into triangles.

Step 1

Make a square from 2 triangles.



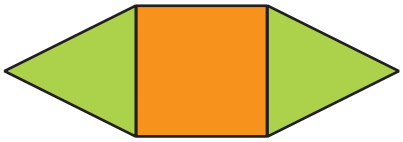
Think: How can I turn the triangle to change its direction?

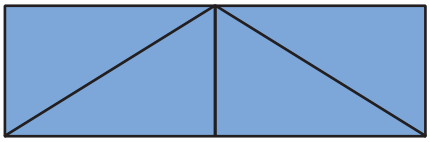
Step 2

Separate a square into 2 triangles.

Try It Together

Name the polygons used to make each shape. Then name the shape.

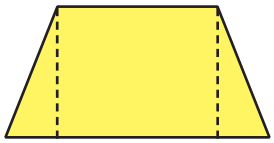
4 

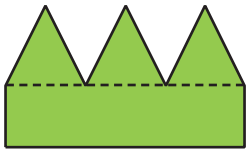
5 

_____ _____

_____ _____

The dotted lines separate each shape into polygons. Name the polygons.

6 

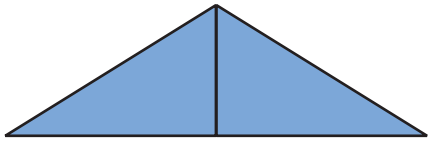
7 

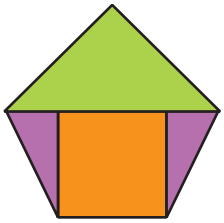
_____ _____

_____ _____

Work On Your Own

Name the polygons used to make each shape. Then name the shape.

8 

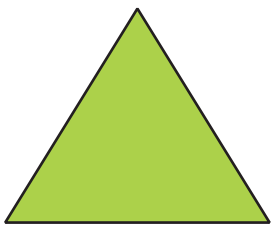
9 

_____ _____

_____ _____

Solve the problem.

10 Kim used 4 triangle pattern blocks to make this large triangle. Draw 3 lines to show the 4 triangles.



Problem-Solving

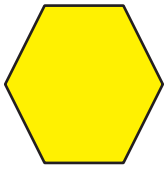
Drawing a Picture

Kira used 2 triangles and 1 rectangle to make a hexagon. How did she make the hexagon?

Find how the shapes were used to make the hexagon

How Draw a picture.

Solve Draw lines inside the hexagon. Use 2 lines to make 2 triangles and 1 long rectangle.



Explain Does my answer make sense? Explain.

_____

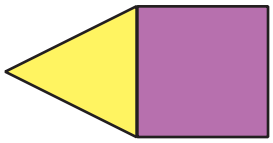
_____

Check Up

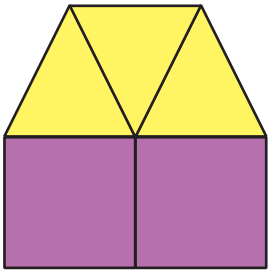
Fill in the bubble of the correct answer.

11 What shape do the pattern blocks make?

- ⬭ triangle
- ⬭ pentagon
- ⬭ hexagon

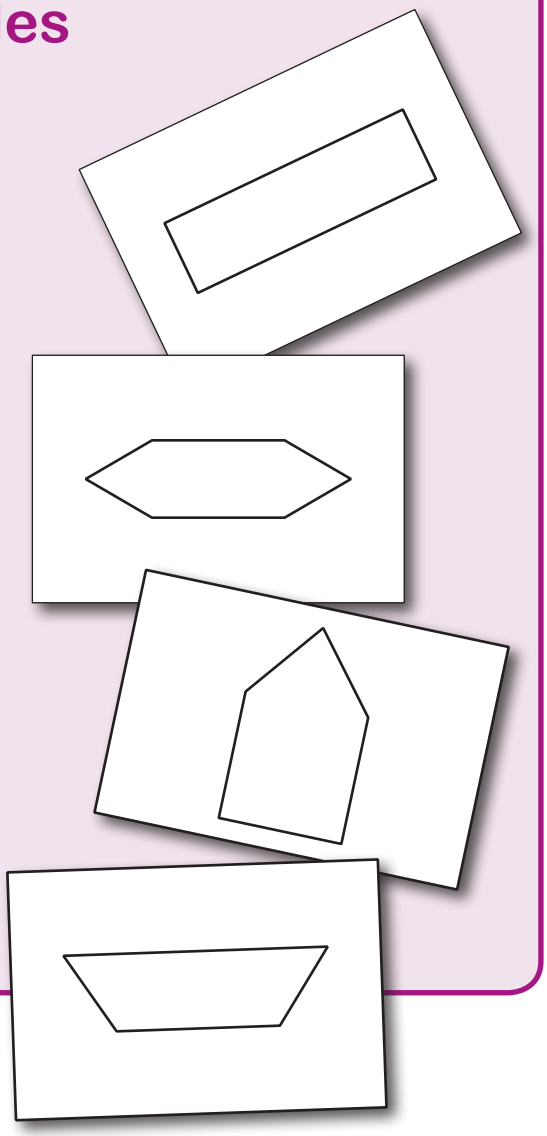


12 Cindy made this hexagon. What other shapes could be used to make the hexagon? Talk it over.



Center 1: Pattern Block Puzzles

1. Work with a partner.
2. Each student uses several pattern blocks put together to make a shape. Trace the shape on a sheet of paper. Only trace the outline of the shape.
3. Repeat until each student makes 4 different shapes. Use 1 sheet of paper for each shape.
4. Swap papers with your partner.
5. Use pattern blocks to make the shape on each paper. Draw lines to show how to use the blocks to make the shape.
6. Compare finished drawings. Did you use the same blocks in the same way as your partner?



Academic Vocabulary
area
square unit

Lesson 9

Understanding Area

Name _____ Class _____ Date _____

Get Started

1 

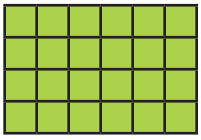
_____

2 

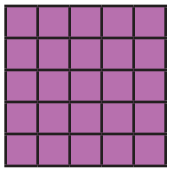
_____

3 

_____ square unit



Area = _____ square units

4 

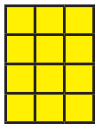
Area = _____ square units

How To

Find the area of each rectangle. Then compare the areas.

Step 1

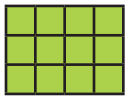
Count the squares in the yellow rectangle.



Area = _____ square units

Step 2

Count the squares in the green rectangle.



Area = _____ square units

Step 3

Compare the areas.
The area of the yellow rectangle is _____ the area of the green rectangle.

Think: Does one rectangle have more squares?

Try It Together

Find the area of the square or rectangle.

5 

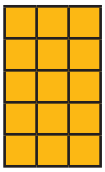
Area = _____ square units

6 

Area = _____ square units

Work On Your Own

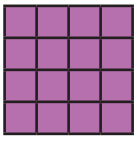
Find the area of each square or rectangle.

7 

Area = _____ square units

8 

Area = _____ square units

9 

Area = _____ square units

10 

Area = _____ square units

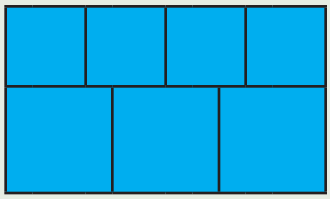
Solve the problem.

11 Lena baked a pan of brownies. She cut them as shown. How many brownies did she make?

_____ brownies

Explain It

Gail drew squares in the rectangle shown. She says that the area is 7 square units. Did she find the area correctly? Explain.



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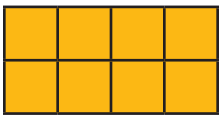
_____

_____

Check Up

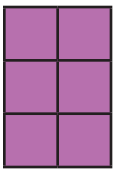
Fill in the bubble of each correct answer.

12 What is the area of the rectangle?



- ⬭ 4 square units
- ⬭ 8 units
- ⬭ 8 square units

13 What is the area of the rectangle?

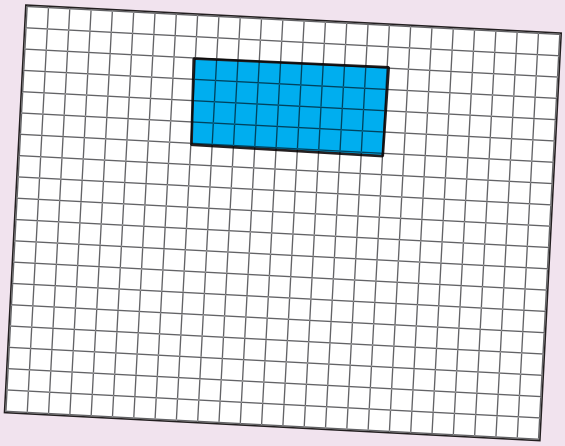


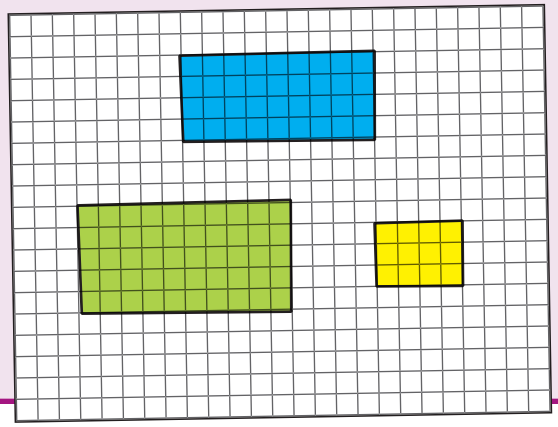
- ⬭ 6 units
- ⬭ 6 square units
- ⬭ 3 square units

14 Chuck finds the area by counting the squares across, then down. Helena finds the area by counting down, then across. Does it matter which way the area is found? Talk it over.

Center 1: Finding Area

1. Work with a partner. On your grid paper, draw a rectangle.
2. Switch papers with your partner. Find the area of your partner's rectangle.
3. On your partner's paper, draw a rectangle that has a larger area than the rectangle in Step 2.
4. Then draw a rectangle with a smaller area than the rectangle in Step 2.
5. With your partner, check the areas of the rectangles from Steps 3 and 4.



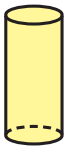


Combining Solid Figures

Name _____ Class _____ Date _____

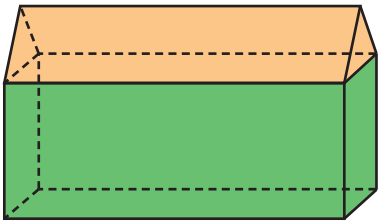
Get Started

1



_____ _____ _____

2



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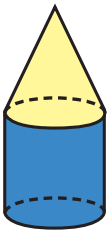
3



_____

_____

How To

Use cubes to make a rectangular prism.

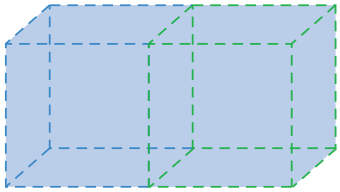
Step 1

What are the shapes of the faces of a rectangular prism?

_____

Step 2

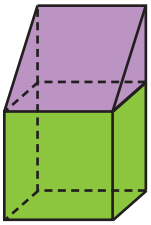
Draw the outline of each face.



Try It Together

Name the solid figures used to make each shape.

4



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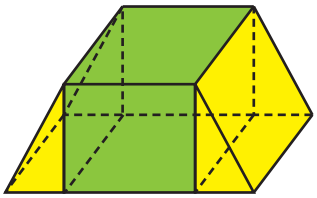
5



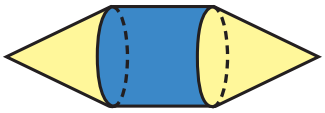
_____

_____

Work On Your Own

Name the solid figures used to make each shape.

6



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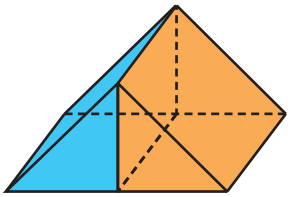
7

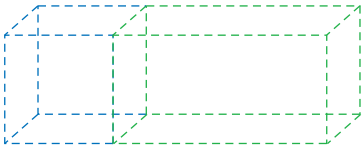


_____

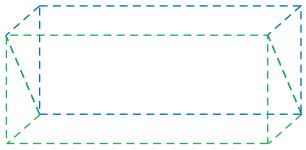
_____

Combine the two solid figures to make a new solid figure.

8



9



Solve the problem.

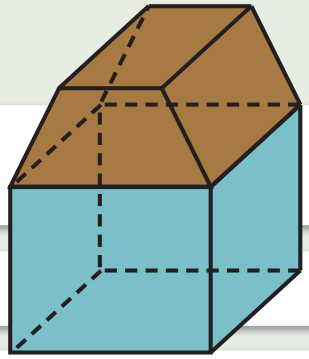
10 A yurt is a small building that can be moved. It is stronger than a tent. What solid figures can you use to make a model of a yurt?

_____

Problem-Solving

Using Logical Reasoning

George used wood blocks to make the house shown.
What solid figures could he have used?



Find

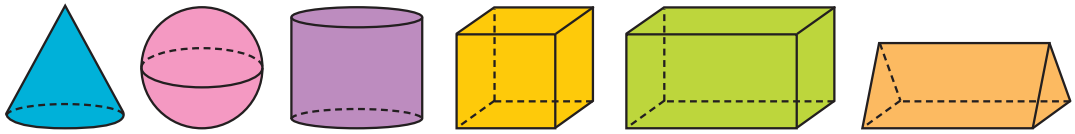
how George put solid figures together to make a house

How

Use logical reasoning.

Solve

Look at the familiar figures below.



cone sphere cylinder cube retangular prism triangular prism

Cross out the figures George couldn't use.
Draw a ring around each figure George could use.

Check

Is the answer reasonable? Explain.

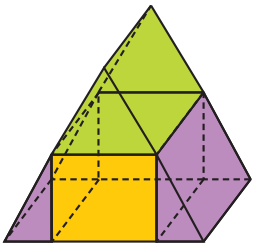
_____

_____

Check Up

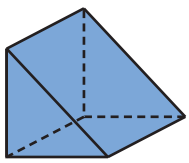
Fill in the bubble of the correct answer.

11 Which figure is not used to make this solid?



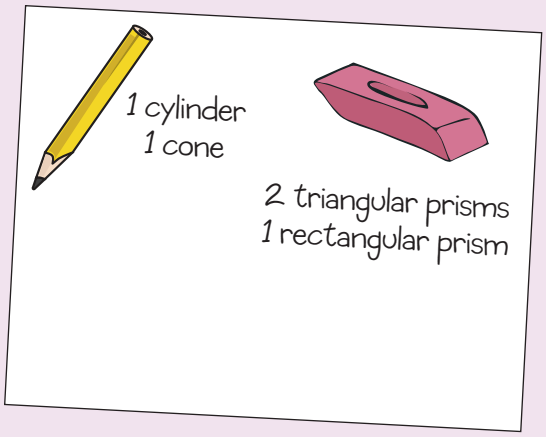
⬭ cube ⬭ rectangular prism ⬭ triangular prism

12 How many triangular prisms like the one shown would it take to make a cube? Can you make more than one size of cube? Talk it over.



Center 1: Solid Scavenger Hunt

1. Work with a partner. Find as many objects as you can that could be made of two or more solid figures.
2. Draw a picture of each object.
3. Write the names of each solid figure that make up the object. Write the number of each figure that makes up the object.

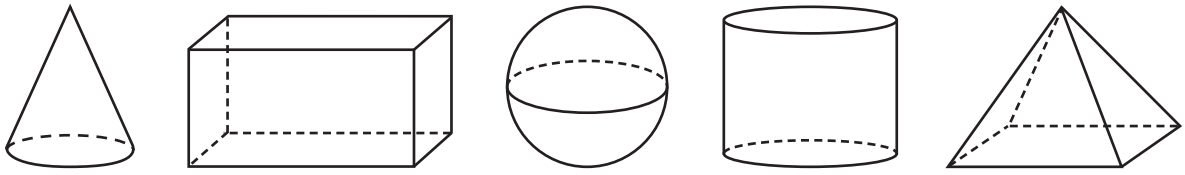


Name _____ Class _____ Date _____

Lesson 5 Properties of Solid Figures

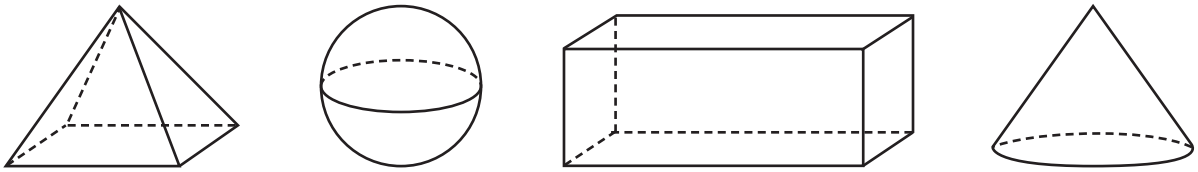
Use yellow to color each solid figure that will roll.

1



Use blue to color each solid figure that will stack and slide.

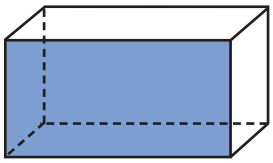
2



Lesson 6 Knowing Plane Figures

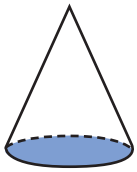
Name the blue shape on each solid figure.

1



_____

2



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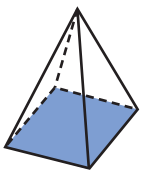
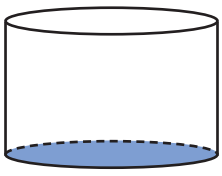
3



_____

4

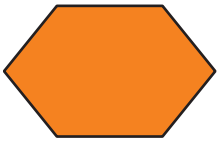


_____

Name _____ Class _____ Date _____

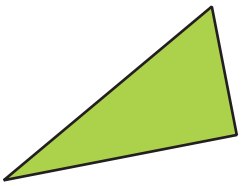
Lesson 7 Properties of Polygons

Write the number of sides and the number of corners of each polygon.

1 

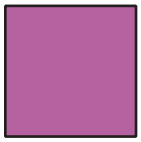
_____ sides

_____ corners

2 

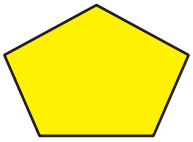
_____ sides

_____ corners

3 

_____ sides

_____ corners

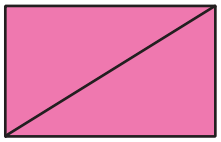
4 

_____ sides

_____ corners

Lesson 8 Making and Separating Plane Figures

Name the polygons used to make each shape. Then name the shape.

1 

_____

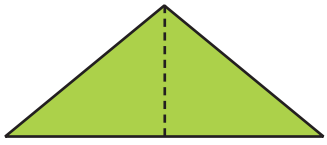
_____

2 

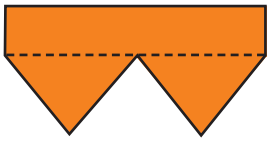
_____

_____

The dotted lines separate each shape into polygons. Name the polygons.

3 

_____

4 

_____

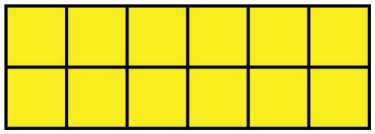
_____

Name _____ Class _____ Date _____

Lesson 9 Understanding Area

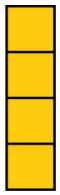
Find the area of each rectangle.

1



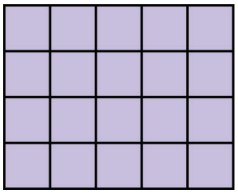
Area = _____ square units

2



Area = _____ square units

3



Area = _____ square units

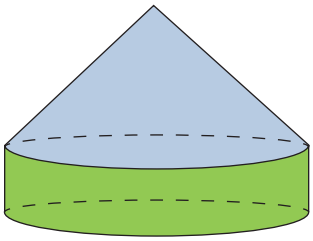
4

Area = _____ square units

Lesson 10 Combining Solid Figures

Name the solid figures used to make each shape.

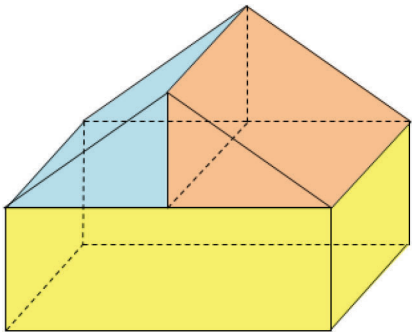
1



_____

_____

2

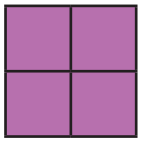


_____

_____

Glossary

area
the number of square units that fill a plane figure



4 square units

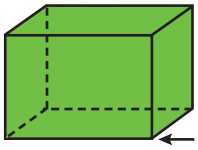
cent sign (¢)
a symbol that means *cents*

35¢

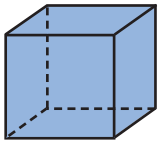
circle
a figure that has no straight sides

cone
a solid figure with a circular face and a curved surface that meets at a point

corner
a point where 3 or more faces of a solid figure meet



cube
a solid figure with 6 square faces that are the same size



cylinder
a solid figure with 2 circular faces that are the same size

decimal point
a symbol used to separate dollars from cents

$0.25

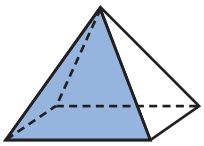
dime
a coin that is worth 10 cents

dollar sign ($)
a symbol that means *dollars*

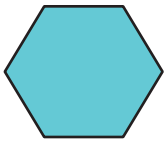
$8.00

Glossary

face
a flat surface of a solid figure



hexagon
a polygon that has 6 sides

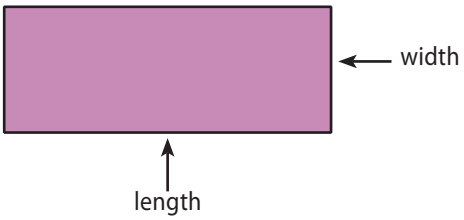


nickel
a coin that is worth 5 cents

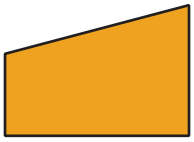
penny
a coin that is worth 1 cent

pentagon
a polygon that has 5 sides

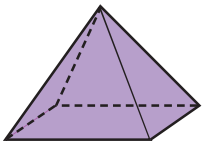
plane figure
a flat shape having only
2 dimensions, length and width



polygon
a closed figure made up of
straight lines



pyramid
a solid, pointed figure with some
or all faces that are triangles

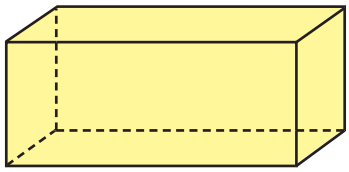


quarter
a coin that is worth 25 cents

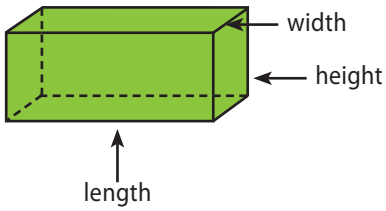
Glossary

rectangle
a figure that has 4 straight sides with 2 equal longer sides and 2 equal shorter sides

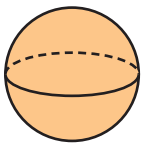
rectangular prism
a solid figure with 6 faces that are rectangles



solid figure
a figure that has length, width, and height

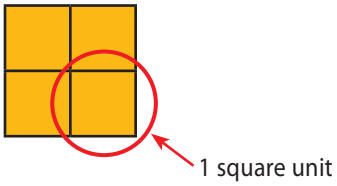


sphere
a solid figure with all points on the surface the same distance from the center

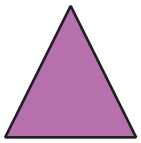


square
a figure that has 4 straight equal sides

square unit
the unit used to measure area



triangle
a figure that has 3 straight sides



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