# SPECTRUM® Market Specific Spe



# Focused Practice for Math Mastery

- Adding and subtracting two- and three-digit numbers
- Writing numbers in expanded form
  - Components of 3-D shapes
    - Fractions
      - Metric and customary measurement
      - Answer key



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# Math

Grade 2

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#### Check What You Know

#### Understanding and Using Numbers

Write odd or even.































Write an equation to match the array.























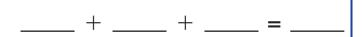












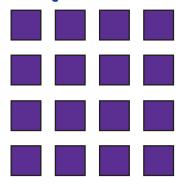




#### Check What You Know

#### Understanding and Using Numbers

Write an equation to match the array.











\_\_\_\_ + \_\_\_\_ + \_\_\_\_ = \_\_\_\_

Count by 10.













10, \_\_\_\_\_ , \_\_\_\_ , 40, \_\_\_\_ , \_\_\_\_

Count by 5.



5, \_\_\_\_\_, 15, \_\_\_\_\_, , \_\_\_\_\_, , \_\_\_\_

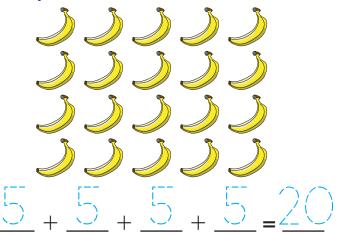
Count by 2. Write the missing numbers.

20, 22, \_\_\_\_\_, \_\_\_\_, 28, \_\_\_\_\_, \_\_\_\_, 36

#### Lesson I.I Grouping Objects

Write an equation to match each array.



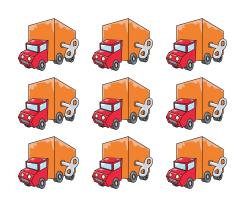




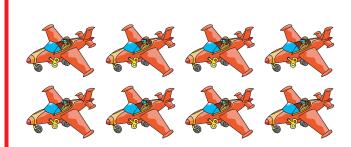












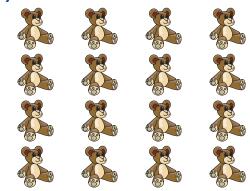
\_\_\_ + \_\_\_ = \_\_\_

#### Lesson I.I Grouping Objects

Write an equation to match each array.

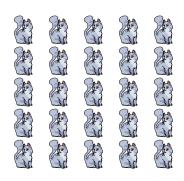


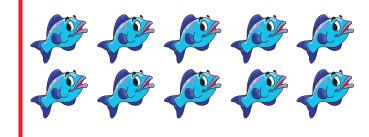












#### Lesson I.2 Skip Counting

Count by 2. Write the missing numbers.















2,

4, 6, 8, 10,

12,

Count by 5. Write the missing numbers.







5,

10,

Count by 10. Write the missing numbers.







Count by 2. Write the missing numbers.

12, \_\_\_\_, 18, 20, \_\_\_\_, 24, 26,

28

Count by 5. Write the missing numbers.

15, 20, 25, \_\_\_\_, 40, 45,

85

50

60, \_\_\_\_\_, 70, \_\_\_\_\_, \_\_\_\_,

Count backward by 10. Write the missing numbers.

100, 90, 80, 70, 50, 50, 20,

#### Lesson 1.3 Skip Counting with Money

A penny (



is |¢

A nickel



is 5¢



A dime ( is 10¢





#### Count pennies by 2. Write the missing numbers.













2¢,

4¢,

6¢,

#### Count by 2. Start at 80¢. Write the missing numbers.













80¢,

82¢,

86¢,

#### Count by 5. Write the missing numbers.













5¢,

15¢,

25¢,

#### Lesson 1.3 Skip Counting with Money

Count by 5. Start at 50¢.













50¢,

60¢,

70¢,

Count by 10.













10¢,

<u>2</u>∪ ¢,

30¢,

60¢,









70¢,

100¢

Count backward by 10. Start at 100¢.













100¢, 90¢,

80<u>¢</u>,

70¢,

50¢,



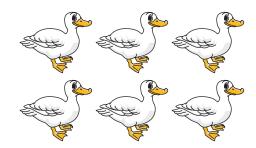






10¢

#### Lesson 1.4 Odd or Even?

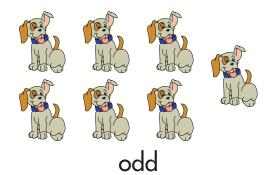


even

$$3 + 3 = 6$$



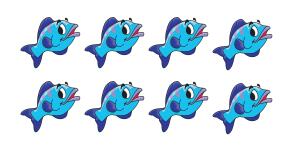
odd





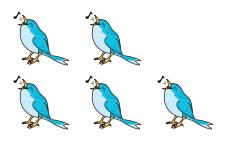
even

$$1 + 1 = 2$$



How many fish? 8

Odd or even? <u>even</u>



How many birds? \_\_\_\_\_

Odd or even? \_\_\_\_\_

#### Lesson 1.4 Odd or Even?

Circle the groups that are odd.











Tell how many. Label odd or even. Write an equation.





8 dolls <u>even</u>





\_\_\_\_ jets \_\_\_\_

\_\_\_\_ bears \_\_\_\_\_



#### Check What You Learned

#### Understanding and Using Numbers

Count by 2.













2, \_\_\_\_\_\_ , \_\_\_\_\_ , 8, \_\_\_\_\_ , \_\_\_\_

Count by 5.











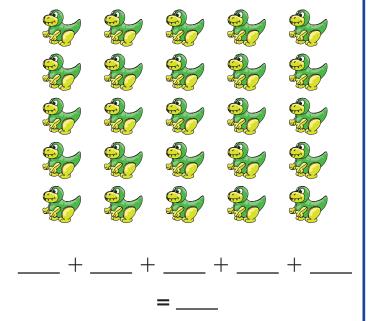


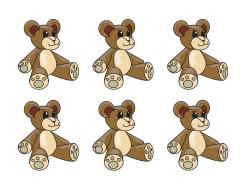
5, \_\_\_\_\_ , \_\_\_\_ , 20, \_\_\_\_ , \_\_\_\_

Count by 10.

30, \_\_\_\_\_, \_\_\_, \_\_\_\_, 70, 80, \_\_\_\_\_

Write an equation to match each array.





\_\_\_ + \_\_\_ = \_\_\_

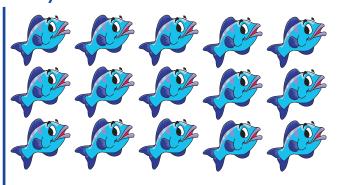


#### Check What You Learned

#### **Understanding and Using Numbers**

Write an equation to match each array.





Tell how many. Label odd or even. Write an equation.



\_\_\_\_\_ green circles





\_\_\_\_\_ yellow stars





\_\_\_\_\_ purple triangle





\_\_\_\_\_ orange hexagons



\_\_\_\_\_ red squares



\_\_\_\_\_ teddy bears

+		



#### Check What You Know

#### Addition and Subtraction Facts through 20

Add.

$$\frac{2}{+1}$$



#### Check What You Know

**SHOW YOUR WORK** 

Addition and Subtraction Facts through 20

#### Solve each problem.

Brian borrows 6 books from the library.

Jamal borrows 8 books.

How many books do they borrow in all?



There are 17 slices of pizza.

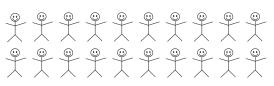
8 of them get eaten.

How many slices are left?



20 students are in the library.

6 students leave.



How many students are still in the library?

Sue borrows 6 books.

$$6+2=$$

If Nina borrows 2 more books than Sue, how many books does Nina borrow?

There are 8 desks on the first floor.



There are 7 desks on the second floor.

How many desks are there on the two floors?

### **Lesson 2.1** Adding through 5



$$I \leftarrow addend \rightarrow$$







$$+3$$
  $\leftarrow$  addend  $\rightarrow$   $+0$ 

Add.

$$0 + 1$$

$$\begin{array}{c} 2 \\ + 1 \end{array}$$

$$\frac{0}{+2}$$

$$\frac{0}{+0}$$

$$\frac{2}{+1}$$

#### **Lesson 2.2** Subtracting from 0 through 5

There are 4 fish. 2 swim away. How many fish are left?



4

<u>-2</u>

2 ← difference

#### Lesson 2.3 Adding to 6, 7, and 8



5



<u>+3</u>

7



sum

#### Add.

$$7 + 0$$

$$7 + 1$$

$$\begin{array}{c} 0 \\ +7 \end{array}$$

#### Lesson 2.4 Subtracting from 6, 7, and 8

There are 7 balls.











5 are baseballs.

<u>-5</u>

How many are not baseballs?

2

#### Lesson 2.5 Adding to 9 and 10



6

#### Add.

sum

$$+2$$

#### Lesson 2.6 Subtracting from 9 and 10

Dani has 10 postage stamps.





How many more stamps does Dani have?

4 **←** difference

#### esson 2.7 Adding to 11, 12, and 13

$$8 + 4 = 10 + 2 = 12$$



$$6 + 7 = 10 + 3 = 13$$

#### Add.

#### Lesson 2.8 Subtracting from 11, 12, and 13

13 = 1 ten 3 ones

13

- Cross out to solve.
- <u>-5</u>

×()×()×(

8

12 = 1 ten 2 ones

12



- Cross out to solve.
- <u>-7</u> 5

#### **Lesson 2.9** Adding to 14, 15, and 16

7 49 49 49 49 49 49



<u>+8</u> Ø Ø Ø Ø Ø Ø Ø

15

15

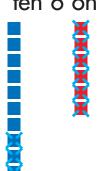
#### Add.

$$+\frac{9}{7}$$

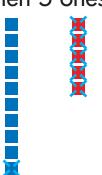
$$+7$$

#### Lesson 2.10 Subtracting from 14, 15, and 16

$$16 = 1 \text{ ten } 6 \text{ ones}$$



#### Cross out to solve.



#### **2.11** Adding to 17, 18, 19, and 20

9











17

#### Add.

$$7 + 7$$

#### Lesson 2.12 Subtracting from 17, 18, 19, and 20



17 <u>- 9</u> 8

#### Lesson 2.13 Problem Solving

**SHOW YOUR WORK** 

Solve each problem.

Steve has 7 fish.

Ramon has 13 fish.

6

Yolanda has 8 teddy bears.

Maria has 6 teddy bears.



ļš

How many do they have in all?

Gina bakes 15 cupcakes.





How many cupcakes are left?

6 students were in the classroom.

Now, there are 9 students in the classroom.

How many students came in? \_\_\_\_\_

Mark has 18 toy cars.

He gives 9 away.



How many cars does he have left?

#### Lesson 2.13 Problem Solving

**SHOW YOUR WORK** 

Solve each problem.

Yoko picks 12 flowers.

She gives 6 to her mother.



2

- 6

Will you add or subtract? <u>subtract</u> Solve.

How many flowers does Yoko have now?

Taylor has 20 books.

5 of them are about sports.



How many of them are not about sports?

Will you add or subtract? \_\_\_\_\_ Solve.

Jesse mows 6 lawns.

Martin mows 7 lawns.



How many lawns do they mow in all?

Will you add or subtract? \_\_\_\_\_ Solve.

Together, Kiki and Sara have 9 books.

$$9 - 5 =$$

Kiki has 5 books.

How many books does Sara have? \_\_\_\_\_



#### **Check What You Learned**

#### Addition and Subtraction Facts through 20

Add.

$$\begin{array}{c} 2 \\ + 1 \end{array}$$

$$\begin{array}{c} 3 \\ +2 \end{array}$$



#### Check What You Learned

**SHOW YOUR WORK** 

#### Addition and Subtraction Facts through 20

Solve each problem.

There are 15 bananas.

Joe takes 6.



How many bananas are left?

The Changs have 7 apples.



Mrs. Chang buys 5 more.

How many apples do they have now?

The store has 12 boxes of plums.



5 boxes of plums are sold.

How many boxes are left?

Together, Grace and her sister bought 18 bananas.

Grace bought 9 bananas.

How many bananas did her sister buy?

Mrs. Lopez has 19 hats.

3 of the hats have bows.



How many hats do not have bows?

#### Check What You Know

#### Adding and Subtracting 2-Digit Numbers (No Renaming)

Add.



#### Check What You Know

**SHOW YOUR WORK** 

Adding and Subtracting 2-Digit Numbers (No Renaming

Solve each problem.



Mara sees 46 🔪 . Some flew away.

Patrick sees only 24 .





How many he flew away? \_\_\_\_\_

36 are on the lake.

22 are on the shore.

How many are there in all? \_\_\_\_\_

The store has 37



does it have than 🧳 \_\_\_\_\_?



 $58 \stackrel{\text{\tiny are on the field.}}{\uparrow}$ 

45 of the  $\stackrel{@}{\uparrow}$  are playing soccer.

How many are not playing soccer? \_\_\_\_\_

Martina spends 53¢ (3) (3) (4) (3).









Dave spends 41¢ (1) (1) (2) (2) (2).



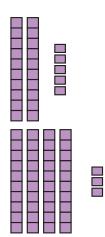






How much more does Martina spend? \_\_\_\_\_\_¢

## Lesson 3.1 Adding 2-Digit Numbers



25 +43 
$$\begin{array}{c} 33 \\ +20 \end{array}$$

## **Lesson 3.1** Adding 2-Digit Numbers

$$\begin{array}{c} 29 \\ +10 \end{array}$$

$$+20$$

$$23 + 33$$

$$86 + 13$$

## **Lesson 3.2** Addition Practice

$$\begin{array}{c} 27 \\ +60 \end{array}$$

## **Lesson 3.2** Problem Solving

**SHOW YOUR WORK** 

Solve each problem.

Marti catches 10 🎺 in one pond.

She catches II in another pond.

How many & does she catch in all? 2

There are 42  $\mathfrak{h}$  in one tree.

There are 33  $\ragmassian$  in another tree.

How many are in both trees? \_\_\_\_\_

Craig finds 13 🦫.

Zach finds 20 🦫.

How many do they find in all? \_\_\_\_\_

There were 28 in the park. Some left.

There were 14 🎇 remaining in the park. 28 — \_\_\_\_\_ = 14

How many left the park? \_\_\_\_\_

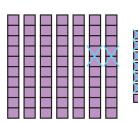
There are 32 🦫 in one flock.

There are 27 🔖 in another flock.

How many 🔖 are there in all? \_\_\_\_\_

## Lesson 3.3 Subtracting 2-Digit Numbers

77 <u>-26</u>



First, subtract the ones.

Then, subtract the tens.

$$\begin{array}{c} 59 \\ -38 \end{array}$$

## **Lesson 3.3** Subtracting 2-Digit Numbers

### **Lesson 3.4** Subtraction Practice

$$\begin{array}{c} 92 \\ -52 \end{array}$$

## **Lesson 3.4** Problem Solving

**SHOW YOUR WORK** 

Solve each problem.

Ms. Willis has 28 🧧.



Mr. Sanchez borrows 10 🧧.

How many does Ms. Willis have left?

The first-grade class has 32



The second-grade class has 30 M.



How many more does the first-grade class have? \_\_\_\_\_

The art room has 65 \.

Students are using 22 \.



How many are not being used? \_\_\_\_\_

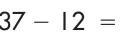
Students had 44 📦 at breakfast.

They had 59 📦 at lunch. How many

more did students have at lunch? \_\_\_\_\_



The library has 37  $\bigcirc$  about computers. 37 - 12 =  $\_$ 





12 of the large been borrowed. How

many about computers are still in the library? \_\_\_

## Lesson 3.5 Adding Three Numbers

Add the ones. 23 44 +129

Add the tens. 23 44 +1279

## **Lesson 3.5** Problem Solving

**SHOW YOUR WORK** 

Solve each problem.

Lanie has 10 😭.

Tina has 12 🦫. Paul has 25 🦫.

How many  $\ref{how}$  do they have in all?  $\frac{47}{}$ 

The toy store sold 14 🙀 in March,

15 🐐 in April, and 20 🐐 in May.

How many did the toy store sell in all? \_\_\_\_\_

Felicia puts 6 , 22 , and 30 on shelves. How many toys does Felicia put on shelves?

The toy store has 32 , 26 , 26 and 10 . How many of these toys does the toy store have in all?

The bakery sells 14 on Monday, 23 on Tuesday, and 30 on Wednesday.

How many odd the bakery sell?

## **Lesson 3.6** Problem Solving

#### Circle the most expensive item.

A pencil costs



30¢

A pen costs



32¢

A marker costs



42¢

A crayon costs



**24**¢

A pencil costs

A marker costs

The two items cost

30¢

<u>+ 4 2 ¢</u>

72¢

A pen costs

A crayon costs

The two items cost

¢

A pencil costs

A pen costs

The two items cost

¢

+ ¢

¢

¢

A marker costs

A crayon costs

The two items cost

¢

<u>+ ¢</u>

Ψ

A pencil costs

A marker costs

A crayon costs

The three items cost

A pen costs

A crayon costs

A pencil costs

The three items cost

¢

¢

<u>+</u> ¢

¢

# Lesson 3.6 Problem Solving

35¢

A banana costs | An apple costs | An orange costs |



20¢



33¢

A melon costs



85¢

Which fruit costs the most?

Which fruit costs the least?

A melon costs

An orange costs

A melon costs this much more. 85¢

-33¢

52¢

An orange costs

An apple costs

An orange costs this much more.

A banana costs

An apple costs

A banana costs this much more. ¢

¢

A melon costs

An apple costs

A melon costs this much more.

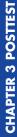
A melon costs

A banana costs

A melon costs this much more. A banana costs

An orange costs

A banana costs this much more.



#### Check What You Learned

## Adding and Subtracting 2-Digit Numbers (No Renaming)

Add.



## Check What You Learned

**SHOW YOUR WORK** 

Adding and Subtracting 2-Digit Numbers (No Renaming)

Solve each problem.

Kerry has 15 🛼.



Janice has 14 🛼.

How many do they have in all? \_\_\_\_\_

Jermaine has 27 .

Brian has 31 .

The boys lost 5 playing at the park.

How many od they have now? \_\_\_\_\_

The class plants 35



The grow into 24 \( \bigsep \). 3 of the \( \bigsep \) die.







How many does the class have? \_\_\_\_\_

Sydney makes 45 👚.



Rosa makes 65 👚.





How many more does Rosa make? \_\_\_\_\_





Josh spends 45¢ (3) (2) at the bake sale.







Nate spends 52¢ (1) (2) at the bake sale.

How much do they spend in all? \_\_\_\_\_¢

#### Check What You Know

## Adding and Subtracting 2-Digit Numbers (With Renaming)

Add.



#### Check What You Know

**SHOW YOUR WORK** 

Adding and Subtracting 2-Digit Numbers (With Renaming

Solve each problem.

Anita picks 45 🚵.



She picks 61 💰.





How many more 💰 than 🚳 does she pick? \_\_\_\_\_

José picks 38 a. He picks 35 a.









He uses 2 and I to make a pie.

How many pieces of fruit does José have left? \_\_\_\_

Max's bucket holds 72



Trey's bucket holds 44



How many more does Max's bucket hold? \_\_\_\_\_

Carol and Paula have 91



$$91 - 45 =$$



Paula picked 45 🎒.





How many *id* did Carol pick? \_\_\_\_\_

The farm stand has 95 for sale.

The farm stand sells 38





How many are left? \_\_\_\_\_

# Lesson 4.1 Adding 2-Digit Numbers

Add the ones.	Put the ones in the ones place. Put the tens in the tens place.	Add the tens.
7 (44 116 6163.	1 of the lens in the lens place.	7 (44 1116 16113.
37 7	37	37
<u>+45</u> +5	<u>+ 45</u>	<u>+45</u>
<u> </u>	2	sum → 82
12 = 1 ten 2 ones		
46 6 +29 +9	1 46 +29	1 46 <u>+29</u>
<del></del>	<del></del>	
? 15	5	sum <b>→</b> 75
15 = 1  ten  5  ones		

# Lesson 4.1 Adding 2-Digit Numbers

$$\begin{array}{r} 26 \\ +38 \end{array}$$

$$\begin{array}{c} 28 \\ +27 \end{array}$$

## Lesson 4.2 Addition Practice

Add the ones.	Put the one in the ones place. Put the ten in the tens place.	Add the tens.
36 6 +44 +4 ? 10 10 = 1 ten 0 ones	36 <u>+44</u> 0	36 <u>+ 44</u> sum → 80

$$\frac{13}{+58}$$

$$\begin{array}{r} 38 \\ +22 \end{array}$$

$$\begin{array}{r} 32 \\ +29 \end{array}$$

## **Lesson 4.2** Problem Solving

**SHOW YOUR WORK** 

Solve each problem.

Cara has 35 .

Ben has 39 .

Marcus has 48 .



May has 36 .



Together, they use 30 to mail cards.





How many do they have left? \_\_\_\_\_

Pedro picks 33 🐉.



Jessica picks 28 🐉.





How many 🎉 do they pick in all? \_\_\_\_\_

There are 24 students with 💮 or 🕖.





9+\_

There are 9 students with 🕖.



How many students have ? \_\_\_\_\_



Toya picks 15 .

Jon picks 16 .





How many od they pick in all? \_\_\_\_\_

## **Lesson 4.3** Subtracting 2-Digit Numbers

		Rename I ten as 10 ones.	Subtract the ones.	Subtract the tens.
33 -19	3 tens 3 ones = 2 tens 13 ones	213 <b>33</b> -19	213 <b>33</b> -19 4	213 <b>33</b> <u>− 1 9</u> difference → 1 4
60 -28	6 tens 0 ones = 5 tens 10 ones	510 <b>\$9</b> -28	510 <b>\$9</b> - <u>28</u> 2	510 <b>∮</b> Ø <u>−28</u> difference →32

## **Lesson 4.3** Subtracting 2-Digit Numbers

	Rename I ten as 10 ones.	Subtract the ones.	Subtract the tens.
41 <u>-35</u>	311 41 -35	311 <del>/</del> // <u>-35</u> 6	311 <del>////</del> -35 difference → 6 Should you write a number in the tens place?

### **Lesson 4.4** Subtraction Practice

	Rename I ten as 10 ones.	Subtract the ones.	Subtract the tens.
51 <u>-23</u>	∯/ 5/ -23	#11 <b>5</b> / -23 8	411 <b>5/</b> <u>−23</u> difference →28

## **Lesson 4.4** Problem Solving

**SHOW YOUR WORK** 

Solve each problem.

Tina finds 28 .

How many more of does Freddie find?

Adam picks up 25 on Monday and 27 on Tuesday.

19 of the are broken.

How many of the are not broken? \_\_\_\_\_

She eats 8

How many odoes she have left? \_\_\_\_\_

William has 26 a.

26 - \_\_\_\_ = 18

He gave some *to a friend.* 

How many did William give to his friend? \_\_\_\_\_

Connie counts 42 4.

Annie counts 27 4.

How many more 🎺 does Connie count? \_\_\_\_\_



#### Check What You Learned

## Adding and Subtracting 2-Digit Numbers (With Renaming)

Add.

$$\begin{array}{r} 35 \\ +28 \end{array}$$



#### Check What You Learned

**SHOW YOUR WORK** 

Adding and Subtracting 2-Digit Numbers (With Renaming)

Solve each problem.

Kris picks 38 . They use 10 to make a fruit salad.

How many of do they have left? \_\_\_\_\_

The farm stand has two kinds of .

It has 57 of one kind and 39 of the other kind.

How many odoes the farm stand have in all? \_\_\_\_\_

Ayisha buys 60 🎒 , and

51 of them are ripe.

How many of the are not ripe? \_\_\_\_\_

Nick picks 42 🍎.

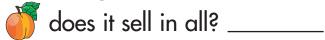
42 - 18 = \_\_\_\_\_

He sells 18 at the farm stand.

How many odes Nick have left? \_\_\_\_\_

The farm stand sells 37 on Saturday

and 29 on Sunday. How many



## Mid-Test Chapters 1–4

Add.

Subtract.

Mid-Test

## Mid-Test Chapters 1-4



Odd or even? \_\_\_\_\_

Odd or even? \_\_\_\_\_

### Count by 5. Start at 40.













40,

45, \_\_\_\_\_, \_\_\_\_\_,

60,

## Count by 2. Start at 12¢.







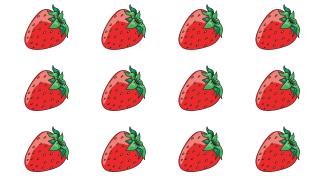




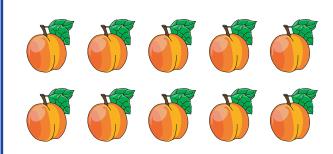


12¢, \_\_\_\_¢, \_\_\_¢, 18¢, \_\_\_\_¢

#### Write an equation to match each array.

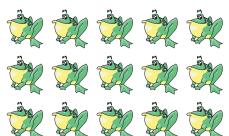






## Mid-Test Chapters 1-4

Write an equation to match the array.



Count by 10.

40, \_\_\_\_, \_\_\_, 80, 90, \_\_\_\_, \_\_\_, 140

Tell how many. Label odd or even. Write an equation that adds together two equal parts.



Odd or even?

**SHOW YOUR WORK** 

Solve each problem.

Pascal picks 14 🏂.

Kim picks 13 🎉.

How many 🏂 do they pick in all? \_\_\_\_\_

The Williams family has 34 stuffed animals.

9 of them are 🛴.



How many of them are not 🔏 ? \_\_\_\_\_



## Mid-Test Chapters 1–4

**SHOW YOUR WORK** 

Solve each problem.

Emil lends 3 fo Jeff.

He now has 12 Pleft.

How many did Emil start with? \_\_\_\_\_

Terrence has 24 **[**].

Bella has 22 . Mike has 21 .

How many od they have in all? \_\_\_\_\_

An apple costs (3)(3).





How much do they cost?

The earth club plants 14 🚏 on Saturday and 18 🌃 on Sunday.

How many  $\P$  do they plant in all? \_\_\_\_\_

The earth club plants 45 🐉 .

24 of the 🐉 are red. 13 of the 🐉 are yellow.

How many 🐉 are not red or yellow? \_\_\_\_\_



#### Check What You Know

## Working with 3-Digit Numbers

Count by 5.

450, \_\_\_\_\_, 465, 470, \_\_\_\_\_, 480, \_\_\_\_\_

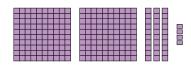
Count by 10.

360, \_\_\_\_\_, 390, 400, \_\_\_\_\_, 430

Count by 100.

\_\_\_\_\_, 200, \_\_\_\_\_, \_\_\_\_, 500, \_\_\_\_\_, \_\_\_\_

Write the number and its expanded form or number name.



\_\_\_\_

**Expanded Form:** 

\_\_\_\_ + \_\_\_\_ + \_\_\_\_ = \_\_\_\_

Number Name:

Compare numbers. Use > , < , or =.

460 540 918 908 103

575 590 260 240 347 298

701 707 647 742 818 818

157 120 450 370 963 993

120



#### **Check What You Know**

## Working with 3-Digit Numbers

#### Add.

$$\begin{array}{c} 186 \\ +\ 231 \end{array}$$

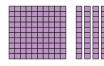
# Lesson 5.1 Counting and Writing 150 through 199



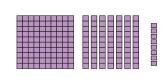


I hundred + 5 tens + 3 ones = 153Expanded Form: 100 + 50 + 3 = 153

## Write the number and its expanded form.

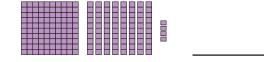


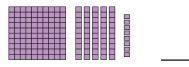


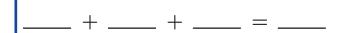


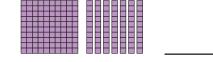
$$100 + 60 + 5 = 165$$



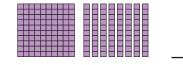






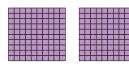








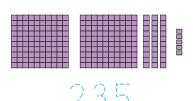
# Lesson 5.2 Counting and Writing 200 through 399

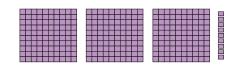


200 Number Name: two hundred

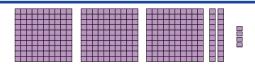
300 Number Name: three hundred

Write the number and the number name.





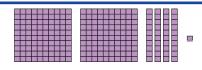
two hundred thirty-five

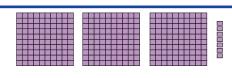




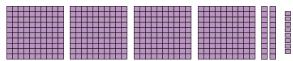




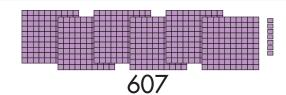




# Lesson 5.3 Counting and Writing 400 through 699



428

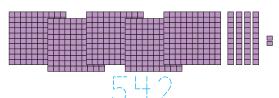


Number Name:

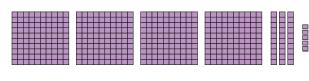
six hundred seven

Number Name: four hundred twenty-eight

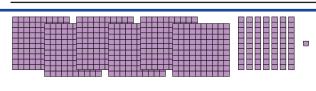
Write the number and the number name.

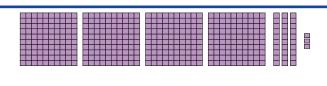


five hundred forty-two











# Lesson 5.4 Counting and Writing 700 through 999

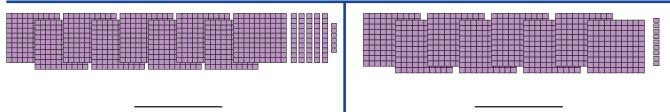


9 hundreds 3 tens 5 ones = 935 Expanded Form: 900 + 30 + 5 = 935

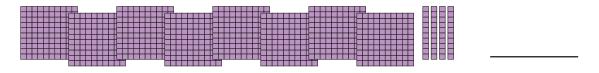
### Write the number and its expanded form.

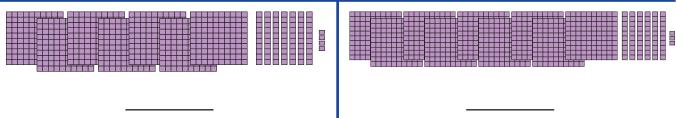


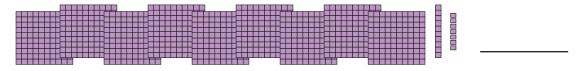
$$700 + 20 + 2 = 722$$











## Lesson 5.5 Skip Counting

Count 3-digit numbers by 1.

Start at 310.

310, 311, 312, 3 | 3, 314, \_\_\_\_, \_\_\_, 317

Start at 415.

415, 416, <u>417</u>, 418,\_\_\_\_, 420,\_\_\_, 422

Skip count 3-digit numbers.

Count by 5. Start at 600.

600, 605, 6 0, \_\_\_\_, \_\_\_, 625, 630, \_\_\_\_

Count by 5. Start at 780.

780, <u>785</u>, 790, \_\_\_\_\_, 800, 805, \_\_\_\_\_, \_\_\_\_

Count by 10. Start at 200.

200, 2 0, 230, 250, 270

Count by 10. Start at 350.

350, <u>360</u>, 370, \_\_\_\_, 400, \_\_\_\_,

Count by 100. Start at 100.

100, 200, 300, \_\_\_\_, 600, \_\_\_\_

Count backward by 100. Start at 900.

900, 800, 700, \_\_\_\_, 500, \_\_\_\_,

### **Lesson 5.5** Skip Counting

Skip count 3-digit numbers.

Count by 5. Start at 400.

400, 405, \_\_\_\_\_, \_\_\_\_, 425, 430, \_\_\_\_\_, \_\_\_\_

Count by 10. Start at 310.

310, \_\_\_\_\_, \_\_\_\_, 350, 360, \_\_\_\_\_

Count backward by 10. Start at 670.

670, \_\_\_\_\_, \_\_\_\_\_, 630, 620, \_\_\_\_\_

Count backward by 10. Start at 532.

532, 522, 512, \_\_\_\_\_, 482, \_\_\_\_\_,

Count by 100. Start at 240.

240, 340, \_\_\_\_\_, 640, \_\_\_\_\_, \_\_\_\_

Count by 100. Start at 110.

110, \_\_\_\_\_, 410, \_\_\_\_\_, \_\_\_\_

Count backward by 100. Start at 950.

950, \_\_\_\_\_, \_\_\_\_\_, \_\_\_\_\_, 450, \_\_\_\_\_

Count backward by 100. Start at 826.

826, \_\_\_\_\_, 526, \_\_\_\_\_, 226

## **Lesson 5.6** Comparing Numbers

- 503 362 Compare hundreds. 5 is greater than 3. 503 is greater than 362.
- 80<u>1</u> < 80<u>3</u> If hundreds and tens are the same, compare ones. I is less than 3. 801 is less than 803.

Compare 3-digit numbers. Use > (greater than), < (less than), or = (equal to).

- 831 < 843 436 379 902 911
- 567 564 306 401 535 535
- 219 198 739 730 630 820
- 127 119 407 610 923 925
- 354 453 802 792 236 401
- 504 | 504 | 402 | 408 | 123 | 118
- 367 562 760 740 654 736
- 981 901 391 491 835 830

### **Lesson 5.6** Comparing Numbers

Compare 3-digit numbers. Use > (greater than), < (less than), or = (equal to).

	1				
122	245	903	500	418	806

To subtract the tens, rename the 1 hundred and 2 tens as 12 tens.

Subtract the tens.



minuend subtrahend difference

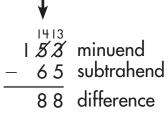
$$- \frac{173}{33}$$

Rename 5 tens and 3 ones as 4 tens and 13 ones.

Subtract the ones.

Rename I hundred and 4 tens as 14 tens.

Subtract the tens.



### Lesson 5.8 Adding 3-Digit Numbers

### Add.

$$\frac{123}{+562}$$

$$\begin{array}{c} & 1 & 2 & 3 \\ + & 3 & 2 & 1 \end{array}$$

$$861 + 209$$

$$738 + 387$$

## **Lesson 5.9** Subtracting 3-Digit Numbers

Rename 2 tens and I one as I ten and II ones. Then, subtract the ones.



 $\frac{62X}{-259}$ 

Rename 6 hundreds and 1 ten as 5 hundreds and 11 tens. Then, subtract the tens.

$$\begin{array}{c|c}
 & & \downarrow \\
 & 5 & \cancel{x} & | & \downarrow \\
 & \cancel{x} & \cancel{x} & \cancel{x} & | & \downarrow \\
 & -259 & \cancel{x} & | & \cancel{x} & | & \downarrow \\
 & \hline
 & 62 & \cancel{x} & | & \cancel{x} & | & \downarrow \\
 & & & & & & & & & & \\
\end{array}$$

Subtract the hundreds.

 $\frac{1}{5}$   $\frac{1}{2}$  minuend  $\frac{-259}{362}$  subtrahend

$$\frac{321}{-109}$$

$$983 \\ -652$$

$$876$$
 $-357$ 

$$863$$
 $-692$ 

$$980$$
  
 $-532$ 

$$\begin{array}{c} 7\,2\,0 \\ -\,3\,7\,I \end{array}$$

## Lesson 5.10 Checking Addition with Subtraction

To check

$$215 + 109 = 324,$$

subtract 109 from 324.

$$\begin{array}{r}
2 \mid 5 \\
+ \mid 09 \\
\hline
324 \\
- \mid 09
\end{array}$$

3 | 2

+ 105

These should be the same.

$$\frac{-109}{215}$$

### Add. Check each answer.

7 | 9

+182

+5 | 9

306

+2 | 1 | 5

$$300 + 547$$

$$863 + 192$$

$$\begin{array}{c} 6\ 0\ 3 \\ +\ 2\ 0\ 9 \end{array}$$

$$252 + 130$$

### Lesson 5.11 Checking Subtraction with Addition

To check 982 - 657 = 325, add 657 to 325.

 $\begin{array}{c|c}
982 \\
-657 \\
\hline
325 \\
+657 \\
\hline
982
\end{array}$ These should be the same.

### Subtract. Check each answer.

### **Lesson 5.12** Addition and Subtraction Practice

Add or subtract.

$$650 + 129$$

$$\begin{array}{c} 7 & 1 & 2 \\ -3 & 4 & 7 \end{array}$$

### Lesson 5.12 Addition and Subtraction Practice

Add or subtract.

$$790$$
 $-205$ 

$$220 + 557$$

### Lesson 5.12 Addition and Subtraction Practice

Add or subtract.

$$386 + 503$$

$$386 + 205$$

$$\begin{array}{r} 8 & 6 & 2 \\ -4 & 5 & 6 \end{array}$$



### Check What You Learned

**SHOW YOUR WORK** 

Working with 3-Digit Numbers

Count by 5.

100, 105, \_\_\_\_\_, 120, \_\_\_\_\_, 135

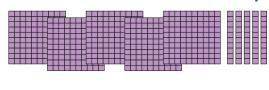
Count by 10.

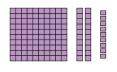
650, \_\_\_\_\_, 670, \_\_\_\_\_, 700, \_\_\_\_\_, 720

Count by 100.

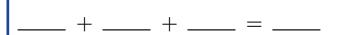
375, \_\_\_\_\_, 575, \_\_\_\_\_, \_\_\_\_, 975

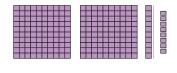
Write the number and its expanded form or number name.

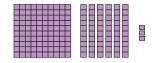














410 501

653 672

946 942

378 350

741 561

143 206



### Check What You Learned

### Working with 3-Digit Numbers

### Add.

$$746 + 122$$

$$150 + 210$$

$$986 - 698$$

$$862$$
 $-245$ 

$$\begin{array}{c} 662 \\ -503 \end{array}$$

$$\begin{array}{c} 708 \\ -231 \end{array}$$

$$753$$
 $-268$ 



### Check What You Know

#### Measurement

Estimate the length of each object. Then, use a ruler to measure each object in inches and centimeters.

Estimate: \_\_\_\_ in. \_\_\_ cm Estimate: \_\_\_ in. \_\_\_ cm



Actual: \_\_\_\_ in. \_\_\_ cm



Actual: \_\_\_\_ in. \_\_\_ cm

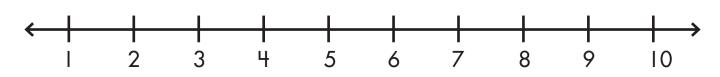
Which object is longer? pencil paper clip

Is the pencil made up of more centimeters or inches? \_\_\_\_\_\_

Which is longer—a centimeter or an inch? \_\_\_\_\_\_

Create a line plot based on the measurements below.

3 in., 2 in., 3 in., 5 in., 5 in., 3 in., 7 in., 1 in., 4 in., 9 in., 7 in., 10 in.



Write the time shown.





\_\_\_\_ o'clock





### Check What You Know

### Measurement

#### Favorite Ice Cream Flavors

Vanilla				
Chocolate				
Cookie Dough				



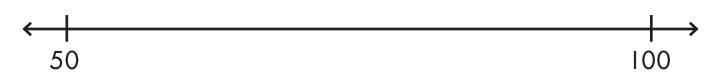
= I person

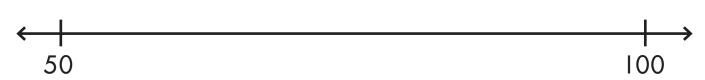
Which flavor did the most people pick? \_\_\_\_\_

How many people chose chocolate? \_\_\_\_\_

How many people chose either vanilla or chocolate? \_\_\_\_\_

Use the number line to add or subtract.







### Check What You Know

#### Measurement

### Solve each problem.

Krystal's jump rope measures 98 inches.

Zack's jump rope measures 95 inches.

How much longer is Krystal's jump rope than Zack's? \_\_\_\_\_

Amber has I nickel.

Justin has 7 pennies.

How much money do they have altogether? \_\_\_\_\_

Britney gets a haircut and has 5 inches cut off.

Delaney gets a haircut and has 7 inches cut off.

How much total hair did the girls have cut off? \_\_\_\_\_

Charlotte had \$4.05.

She gave Abbie \$2.00.

How much money does Charlotte have left? \_\_\_\_\_

Anton is 60 inches tall.

Abigail is 51 inches tall.

How many inches taller is Anton than Abigail? \_\_\_\_\_

## **Lesson 6.1** Telling Time to the Hour



4 o'clock 4:00



Both clocks show 4 o'clock, or 4:00.

### Write the time two ways.



o'clock



o'clock



o'clock



o'clock



o'clock



o'clock



o'clock



o'clock



o'clock

## **Lesson 6.2** Telling Time to the Half Hour



7 o'clock 7:00



half past 7 7:30



8 o'clock 8:00

### Write the time two ways.



half past\_\_\_

4:30



half past\_\_\_\_

:



half past\_\_\_\_

•



half past

•



half past\_

•



half past\_\_\_\_

:



half past\_\_\_\_

:



half past\_\_\_\_

:



half past\_\_\_\_

•

# Lesson 6.3 Telling Time to the Quarter Hour



1:15 one fifteen



1:45 one forty-five

Read the time on the first clock.
Write the same time on the second clock.



6:45











# **Lesson 6.3** Problem Solving

Solve each problem.

The small hand is between 3 and 4.

The large hand is on the <u>6</u>.

The time is 3:30.



The small hand is between \_\_\_\_ and \_\_\_\_.

The large hand is on the \_\_\_\_\_.

The time is \_\_\_\_\_\_.



The small hand is on the \_\_\_\_\_.

The large hand is on the \_\_\_\_\_.

The time is \_\_\_\_\_\_.



The small hand is between \_\_\_\_ and \_\_\_\_.

The large hand is on the \_\_\_\_\_.

The time is \_\_\_\_:\_\_\_.



The small hand is on the \_\_\_\_\_.

The large hand is on the \_\_\_\_\_.

The time is \_\_\_\_\_.

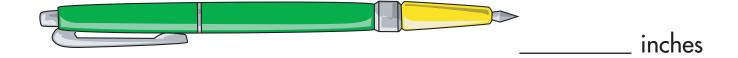


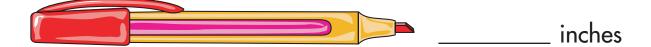
## **Lesson 6.4** Estimating Inches

Estimate how many inches long each object is.











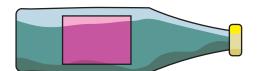


\_\_\_\_\_ inches

# **Lesson 6.5** Estimating Centimeters

Estimate how many centimeters long each object is.





\_\_\_\_ cm



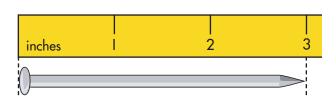




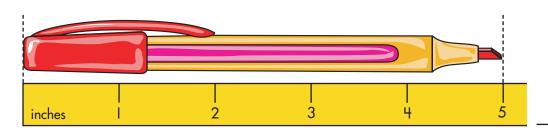


# Lesson 6.6 Measuring Length in Inches

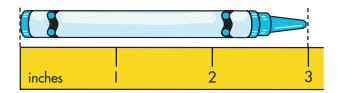
Write the length of each object in inches.

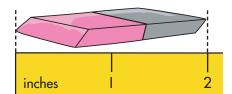






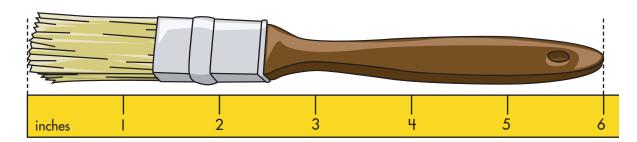
inches



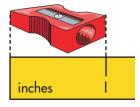


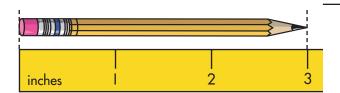
\_\_\_\_\_ inches

\_\_\_\_\_ inches



inches





\_\_\_\_\_ inch

\_\_\_\_\_ inches

### Lesson 6.7 Making a Line Plot

Answer the questions below using the previous page.

How many objects measured I inch? \_\_\_\_\_

How many objects measured 2 inches? \_\_\_\_\_

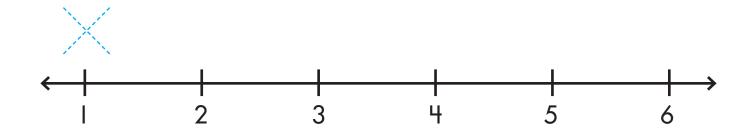
How many objects measured 3 inches? \_\_\_\_\_

How many objects measured 4 inches? \_\_\_\_\_

How many objects measured 5 inches? \_\_\_\_\_

How many objects measured 6 inches? \_\_\_\_\_

Make a line plot using the information above.

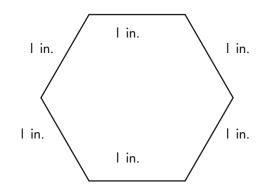


# Lesson 6.8 Measuring Length in Inches

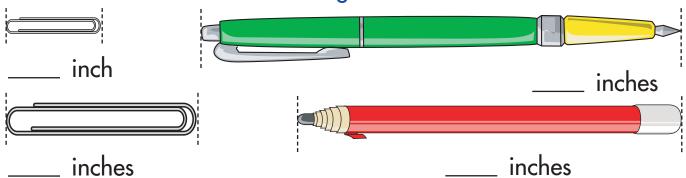
**Perimeter** is the length around an object.

The perimeter of this hexagon is

$$| + | + | + | + | + | = 6$$
 inches.



Use an inch ruler to measure length.

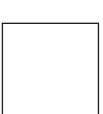


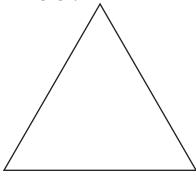
Measure the length of each side.

Add the lengths of all sides to get the perimeter.



$$\underline{3} + \underline{1} + \underline{3} + \underline{1} = \underline{8}$$
 inches







$$+$$
  $+$   $+$   $+$   $=$  inches

# Lesson 6.9 Making a Line Plot

Create a line plot using the length of each shape.

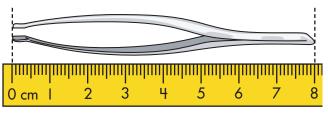
9 in. 3 in. 4 in.
6 in.

4 in.

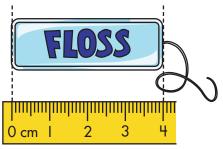
6 in.

## Lesson 6.10 Measuring Length in Centimeters

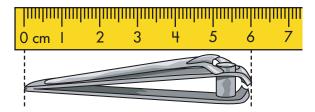
Write the length of each object in centimeters.



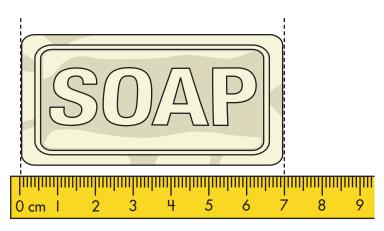
8 centimeters



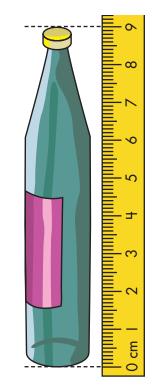
centimeters



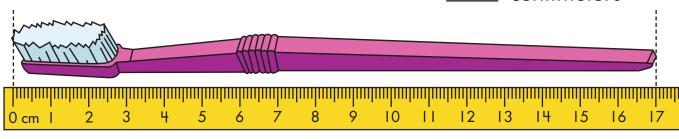
\_\_\_\_ centimeters



\_\_\_\_ centimeters



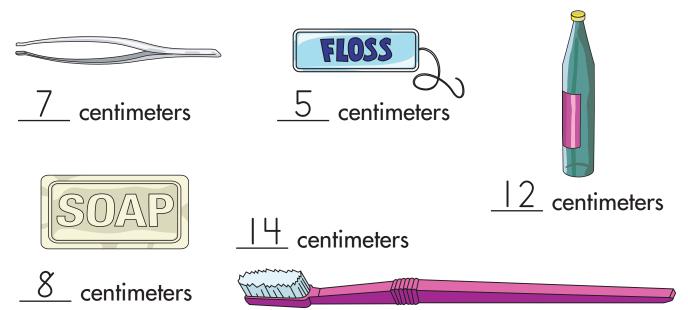
\_\_\_ centimeters

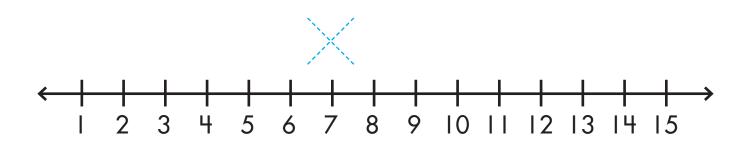


\_\_\_\_ centimeters

## Lesson 6.11 Making a Line Plot

Create a line plot based on the measurements below.



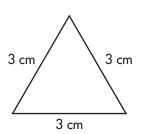


### Lesson 6.12 Measuring Length in Centimeters

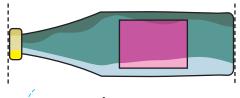
You can measure perimeter in centimeters.

The perimeter of this triangle is

$$3+3+3=9$$
 centimeters.



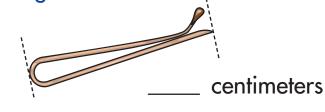
Use a centimeter ruler to measure length.

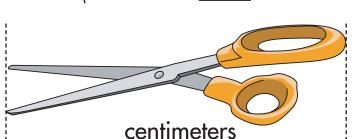


6 centimeters



\_ centimeters

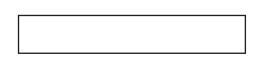




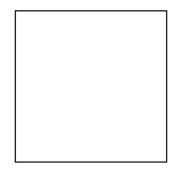
Measure perimeter. Add the lengths of all sides.



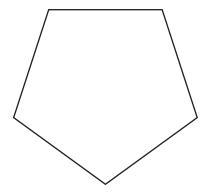
6 + 2 + 6 + 2 = 6 cm



\_\_\_+\_\_+ \_\_\_+ \_\_\_= \_\_\_ cm



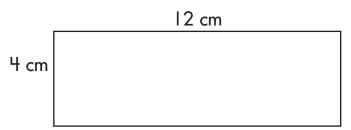
+ + + + = cm



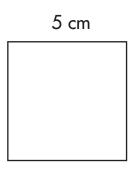
 $\_\_=$  \_\_\_ cm \_\_\_+ \_\_+ \_\_+ \_\_+ \_\_\_= \_\_ cm

# Lesson 6.13 Making a Line Plot

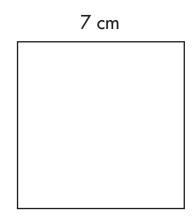
Create a line plot using the length of each shape.



10 cm



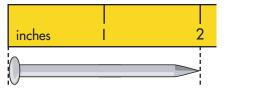
5 cm 2 cm



# Lesson 6.14 How Much Longer?

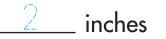
Measure each object. Tell how much longer one object is than the other.

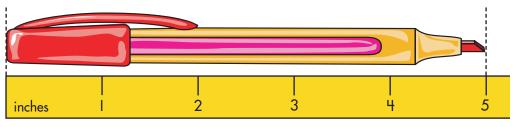




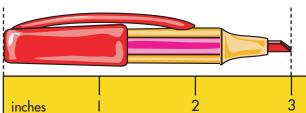


inches





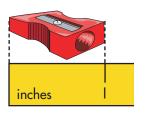
inches



inches

inches

inches longer

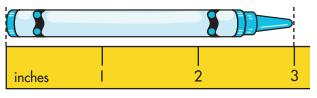


inches

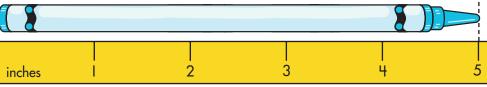
inches

inches

inches longer



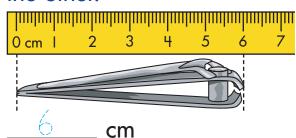
inches longer

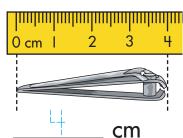


inches

# Lesson 6.15 How Much Longer?

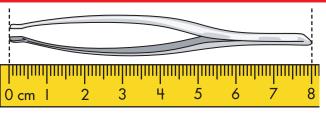
Measure each object. Tell how much longer one object is than the other.

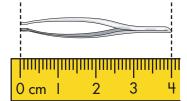






2 cm longer

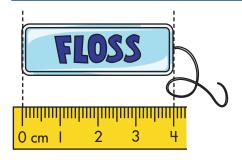


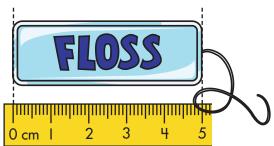


\_\_\_\_ cm

\_\_\_\_ cm

\_ cm longer





\_\_\_\_ cm

cm

\_\_\_ cm longer



SOAP	

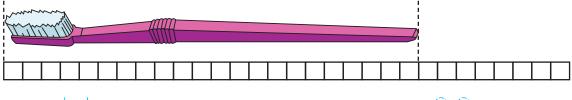
\_\_\_ cm

\_\_\_\_ cm

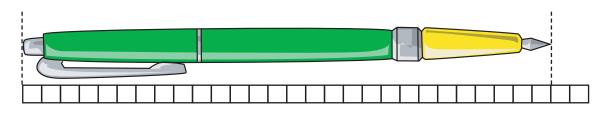
\_\_ cm longer

## **Lesson 6.16** Comparing Measurements

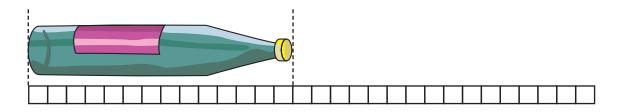
Use a ruler to measure each object in centimeters. Then, measure again using the line of squares.



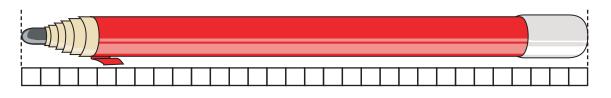
\_\_\_\_ centimeters \_\_\_\_\_\_ squares



\_\_\_\_\_ centimeters \_\_\_\_\_ squares



\_\_\_\_\_ centimeters \_\_\_\_\_ squares



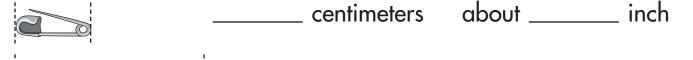
\_\_\_\_\_ centimeters \_\_\_\_\_ squares

What do you notice about the measurements in centimeters compared to those in squares?

What explains this?

### **Lesson 6.16** Comparing Measurements

Use a ruler to measure each object in centimeters. Then, measure again to the nearest inch.













\_\_\_\_\_ centimeters about \_\_\_\_ inches



What do you notice about the measurements in centimeters compared to those in inches?

What explains this?

### Lesson 6.17 Problem Solving

Solve each problem.

48

Ryan has 48 feet of ribbon.

+2|

Sierra has 21 feet of ribbon.

69

How many feet of ribbon do they have altogether?

Miranda has II inches of border for the bulletin board.

She needs 27 inches.

How much more border does

Miranda need to finish the bulletin board? \_\_\_\_\_

A fisherman had 20 feet of fishing line.

His line got stuck, and he had to cut away 13 feet.

How many feet of fishing line does the fisherman have left? \_\_\_\_\_

Lindsey's necklace measured 17 inches.

Dominique's necklace measured 25 inches.

How much longer is Dominique's necklace than Lindsey's? \_\_\_\_\_

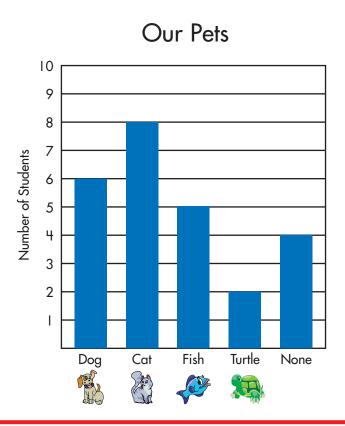
Alfonzo's belt is 55 inches long.

Joshua's belt is 70 inches long.

How much longer is Joshua's belt than Alfonzo's? \_\_\_\_\_\_

### Lesson 6.18 Reading Picture and Bar Graphs

Keisha asked her classmates about their pets. She made this bar graph to show the results.



### Use the bar graph to answer the questions.

How many students have a dog or a cat?



How many students have no pets? \_\_\_\_\_

Which pet do the most students have? \_\_\_\_\_

How many students have either a fish or turtle? \_\_\_\_\_

How many students did Keisha talk to? \_\_\_\_\_

### Lesson 6.18 Reading Picture and Bar Graphs

Carlos polled his classmates about their favorite fruits.

He made this picture graph with the results. One piece of fruit on the graph means one person.

**Our Favorite Fruits** 

Apples				
Oranges				
Bananas	)			
Grapes	3			
Pears				

#### Use the picture graph to answer the questions.

How many classmates chose either bananas or oranges?

How many chose grapes or pears? \_\_\_\_\_

Which fruit did the most classmates choose? \_\_\_\_\_

How many classmates did not choose oranges? \_\_\_\_\_

How many more chose apples than chose grapes? \_\_\_\_\_

How many classmates told Carlos their favorite fruit? \_\_\_\_\_

### Lesson 6.18 Reading Picture and Bar Graphs

Sam and his friends collect baseball cards. This picture graph shows how many cards they have.

Our Baseball Cards

Sam	
Tara	
Kono	
Trina	

= 2 baseball cards

Use the picture graph to answer the questions.

How many cards do the friends have in all?

How many cards does Sam have? \_\_\_\_\_

Who has the fewest cards? \_\_\_\_\_

How many cards does Kono have? \_\_\_\_\_

How many cards do Tara and Trina have together? \_\_\_\_\_

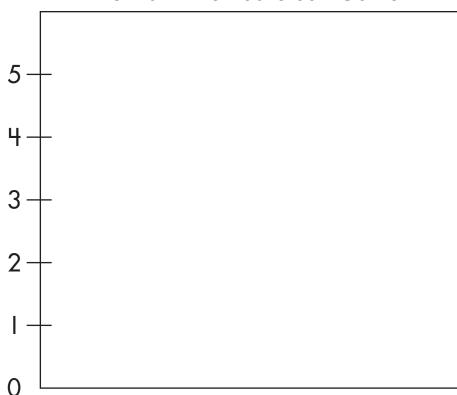
How many more cards do

Tara and Trina have together compared to Sam?

### Lesson 6.19 Creating a Bar Graph

Use the information in the tally chart to complete the bar graph.

Points in the Basketball Game



Points in the Basketball Game		
Cara	111	
Evan	11111	
Dawn	1111	
Hugo	I	

Use the bar graph to answer the questions.

Which student scored the most points? \_\_\_\_\_

Which student scored the least points? \_\_\_\_\_

How many points were scored altogether in the basketball game?

How many more points did Evan score than Hugo? \_\_\_\_\_

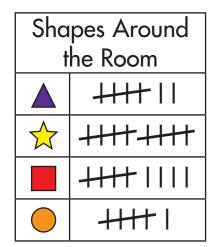
## Lesson 6.20 Creating a Picture Graph

Use the information in the tally chart to complete the picture graph.

Shapes Around the Room

Triangles

Stars



Use the picture graph to answer the questions below.

What shape is seen the most around the room?

What shape is seen the least around the room? \_\_\_\_\_

How many more stars ☆ are there than triangles ▲ ? \_\_\_\_\_

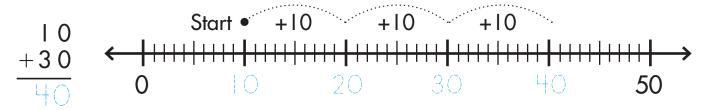
How many more squares are there than circles ?

Squares

Circles

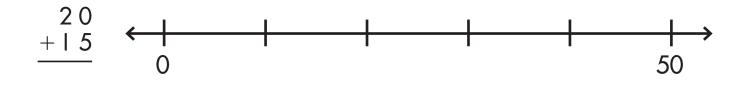
### Lesson 6.21 Adding and Subtracting on a Number Line

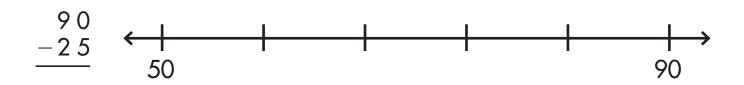
Use the number line to add.

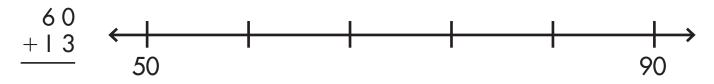


Use each number line to add or subtract.

$$\frac{\stackrel{50}{-20}}{\stackrel{}{-0}} \stackrel{}{\longleftrightarrow} 0$$







## Lesson 6.22 Problem Solving

### Solve each problem.

10

Logan had 2 dimes.

He found 4 pennies in the couch cushions.

How much money does Logan have now? 240



Amber has I nickel.

Justin has 7 pennies.

How much money do they have altogether? \_\_\_\_\_

Bonnie has I dime and 6 pennies.

How much money does she have? \_\_\_\_\_

Ben pulls 2 one-dollar bills, I quarter, I dime, 4 nickels, and 10 pennies from his piggy bank.

How much money does Ben have? \_\_\_\_\_

Casey's mother put a one-dollar bill, 2 quarters, 4 dimes, 1 nickel, and 5 pennies in an envelope for Casey to use at the book fair.

How much money did Casey's mother give Casey for the book fair?

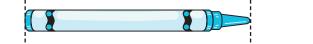




#### Measurement

Estimate the length of each object. Then, use a ruler to measure each object in inches and centimeters.

Estimate: \_\_\_\_\_ in. \_\_\_ cm Estimate: \_\_\_\_ in. \_\_\_ cm



\_\_\_\_\_ in. \_\_\_\_ cm Actual: \_\_\_\_ in. \_\_\_ cm Actual:

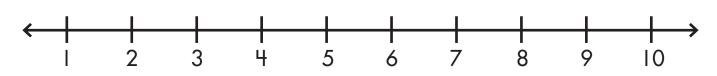
Which object is shorter? crayon paper clip

Is the crayon made up of more centimeters or inches? \_\_\_\_\_\_

Which is shorter—a centimeter or an inch? \_\_\_\_\_\_

Create a line plot based on the measurements below.

I in., 5 in., I in., 10 in., 4 in., 6 in., 6 in., 8 in., I in., 2 in., 10 in., 5 in.



Write the time shown.



o'clock



Spectrum Math Grade 2



#### Measurement

#### **Favorite Sports**

Baseball	
Football	00000
Basketball	
Soccer	

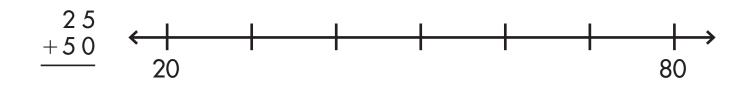
Use the picture graph to answer the questions. Each picture equals one person.

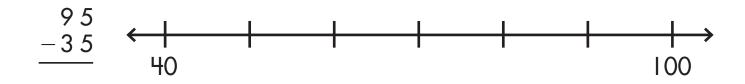
Which sport did most people choose? \_\_\_\_\_

Which sport did 7 people choose? \_\_\_\_\_

How many people chose football or basketball? \_\_\_\_\_

Use the number line to add or subtract.







#### Measurement

Solve each problem.

Jordan was selling frozen treats.

Blake gave Jordan 2 quarters and 2 nickels.

How much did Blake pay for the treat? \_\_\_\_\_

Matthew's dad is 70 inches tall.

Orlando's dad is 78 inches tall.

How much taller is Orlando's dad than Matthew's? \_\_\_\_\_

Megan has \$4.00.

She earns \$2.50 more.

How much money does Megan have now? \_\_\_\_\_

Erica has \$0.55.

Later, she finds \$0.25.

How much money does Erica have now? \_\_\_\_\_

Hannah's dog can jump 8 feet in the air.

Maricela's dog can jump 6 feet in the air.

How much higher can Hannah's dog jump

than Maricela's? \_\_\_\_\_.



#### Check What You Know

### Geometry

Circle the shape named.

rectangular solid







square pyramid







sphere







Name each shape.

















Answer the questions.

Which shape has 4 equal sides?

Which shape has 4 triangular  $\triangle$ 

faces and I square 
face?

Which shape has 3 total angles?



### Check What You Know

### Geometry

Draw the solid shapes. Color them.

rectangular solid

square pyramid

Draw the plane shapes. Color them.

triangle

hexagon

Circle the plane shapes that are faces on the solid shape.

rectangular solid









square pyramid





cube







## **Lesson 7.1** Plane Shapes









square

- 4 equal sides
- 4 right angles

rectangle

- 2 pairs of equal sides
- 4 right angles

triangle

- 3 sides
- 3 angles

circle

- no sides
- no angles



pentagon

- 5 sides
- 5 angles



hexagon

- 6 sides
- 6 angles

#### Name each shape.





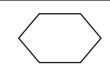




circle









#### Answer the questions.

Which shape has 4 equal sides?

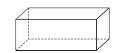
Which shape has 6 angles?

Which shape has no angles?

Which shape has 3 sides?

### Lesson 7.2 Solid Shapes









sphere

• 6 square faces • 6 rectangular

rectangular

faces

square pyramid

- 4 triangular faces
- no faces
- perfectly round
- I square face

### Circle the shape named.

rectangular solid







square pyramid







sphere







cube







#### Answer the questions about the shapes above.

Which shape has 4 triangular faces?

Which shape has 6 rectangular faces?

Which shape is like a 3-D circle?

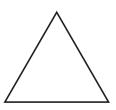
Which shape has 6 equal faces?

## **Lesson 7.3** Drawing Plane Shapes

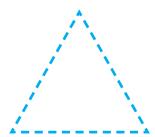
Draw plane shapes.

Look at the shape.

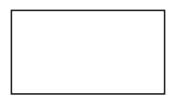
Draw your own shape. Color it.



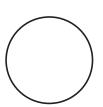
A triangle has 3 sides.



A square has 4 equal sides.



A rectangle has 2 pairs of equal sides.



A circle is totally round.

Draw your own shape. Color it.

## **Lesson 7.4** Drawing Solid Shapes

Answer the questions.

What two plane shapes make up a square pyramid?

What plane shape is used to make a cube? \_\_\_\_\_

What two plane shapes can be part of a rectangular solid?

What plane shape is most like a sphere?

Look at the shape.



rectangular solid



cube



sphere



square pyramid



### Geometry

Name each shape.

















Circle the shape named.

square pyramid









cube



















Answer the questions.

Which shape has 6 equal faces? \_\_\_\_\_

Which shape has 2 pairs of equal sides?

Which shape has 5 total angles?

Which shape is completely round and 3-D?



Geometry

Draw the plane shapes. Color them.

pentagon

rectangle

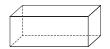
Draw the solid shapes. Color them.

square pyramid

cube

Circle the plane shapes that are faces on the solid shape.

cube



rectangular solid



square pyramid

























#### Check What You Know

#### Parts of a Whole

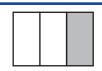
Complete.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts are shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_\_ of the parts are shaded.

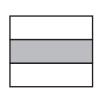
\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts are shaded.

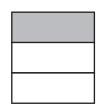
\_\_\_\_ of the whole is shaded.

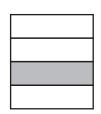


### Check What You Know

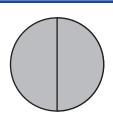
#### Parts of a Whole

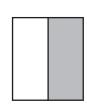
Write the fraction shown. Use numbers. Then, use words.





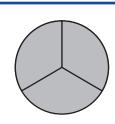




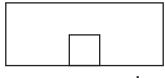




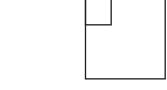




Draw same-size squares to fill each rectangle. Then, count the number of squares.



equal squares

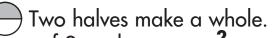


equal squares

## Lesson 8.1 Parts of Shapes

A shape can be broken into equal parts. These equal parts are called fractions.

A **half** is one of two equal parts. Two halves make a whole.



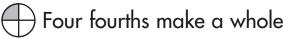
The fraction **two-halves** means 2 out of 2 total parts, or  $\frac{2}{3}$ .





The fraction **three-thirds** means 3 out of 3 total parts, or  $\frac{3}{3}$ .

A **fourth** is one of four equal parts. (+) Four fourths make a whole. (+)



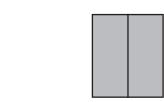


The fraction **four-fourths** means 4 out of 4 total parts, or  $\frac{4}{4}$ .

Write the fraction shown. Use numbers. Then, use words.

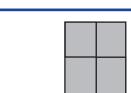


three-thirds











### Lesson 8.2 One-Half

One-half of the whole is shaded.



 $\frac{1}{2} = 1$  out of **2** equal parts

One-half of the whole is shaded.



 $\frac{1}{2} = 1$  out of **2** equal parts

Complete.



There are 2 equal parts.







There are 2 equal parts.

of the parts is shaded.

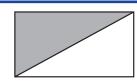
of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

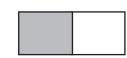
\_\_\_\_ of the parts is shaded.

\_ of the whole is shaded.

Write the fraction that is shaded in words.



ne-half is shaded.



is shaded.

### Lesson 8.3 One-Third

**One-third** of the whole is shaded.



 $\frac{1}{3} = 1$  out of **3** equal parts

**One-third** of the whole is shaded.



 $\frac{1}{3} = 1$  out of **3** equal parts

Complete.



There are <u>3</u> equal parts.





There are <u>3</u> equal parts.

of the parts is shaded.





There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_\_ of the whole is shaded.

Write the fraction that is shaded in words.



One-third is shaded.



\_\_\_is shaded.

### Lesson 8.4 One-Fourth

**One-fourth** of the whole is shaded.



 $\frac{1}{4} = 1$  out of 4 equal parts

**One-fourth** of the whole is shaded.



 $\frac{1}{4} = 1$  out of 4 equal parts

Complete.



There are \_\_\_\_\_ equal parts.



of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

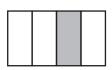
\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

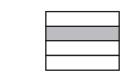
\_\_\_\_ of the parts is shaded.

\_\_\_\_ of the whole is shaded.

Write the fraction that is shaded in words.



One-fourth is shaded.



\_\_\_\_\_ is shaded.

## **Lesson 8.5** Partitioning Rectangles

Rectangles can be divided up into same-size squares to show how much space they cover.

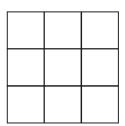


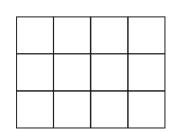
This rectangle is made up of 6 squares. It takes up 6 squares of space.

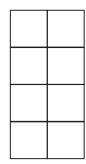
to fill each rectangle. Then, count the

Count the squares





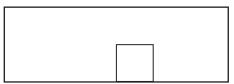




equal squares

\_\_\_\_\_ equal squares \_\_\_\_\_ equal squares

Draw same-size squares number of squares.

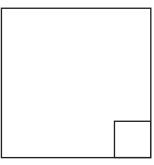


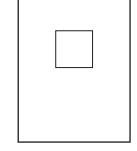


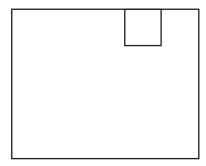
square units

\_\_ square units

\_\_ square units







square units

\_\_\_\_ square units

\_\_\_\_ square units



### Parts of a Whole



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts are shaded.

\_\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_\_ of the parts are shaded.

\_\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

\_\_\_\_ of the parts is shaded.

\_\_\_ of the whole is shaded.



There are \_\_\_\_\_ equal parts.

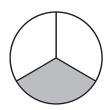
\_\_\_\_ of the parts are shaded.

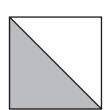
\_\_\_\_ of the whole is shaded.

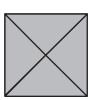


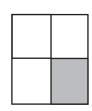
#### Parts of a Whole

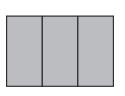
Write the fraction shown. Use numbers. Then, use words.

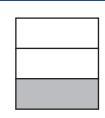




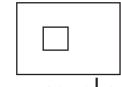




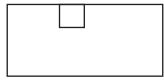




Draw same-size squares to fill each rectangle. Then, count the number of squares.



\_\_\_\_\_ equal squares



\_\_\_\_ equal squares

#### Chapters 1–8 **Final Test**

#### Add.

$$635 + 206$$

#### Subtract.

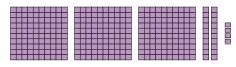
$$\begin{array}{r} 202 \\ - 96 \end{array}$$

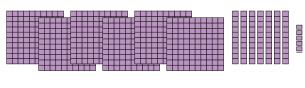
Count how many. Write the number word. Write odd or even.



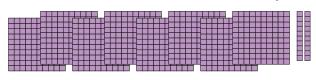


Write the number and the number word.





Write the number and its expanded form.



Write the fraction shown. Use numbers. Then, use words.







Fill the shape with the same-





\_\_\_\_ equal squares

Name the plane shape.





Draw a shape with 3 sides and 3 angles.

Draw a cube.

Estimate the length of each object. Then, use a ruler to measure each object in inches and centimeters.

Estimate: \_\_\_\_\_ in. \_\_\_ cm Estimate: \_\_\_\_ in. \_\_\_ cm



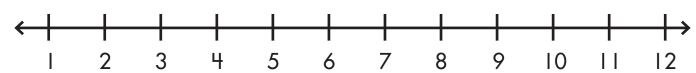


Actual: \_\_\_\_ in. \_\_\_ cm Actual: \_\_\_ in. \_\_\_ cm

Which is longer? crayon pencil

Create a line plot based on the measurements below.

12 in., 9 in., 12 in., 2 in., 4 in., 10 in., 3 in., 11 in., 10 in., 4 in., 9 in.



Write the time shown.









•

•

\_\_\_\_ o'clock

\_\_\_\_ forty-five

Spectrum Math Grade 2

Final Test

Callie asked her classmates about their favorite drinks. She made this picture graph with the results.

#### **Our Favorite Drinks**

= 2	stuc	lent
_	3100	401 II.

Milk	
Apple Juice	
Grape Juice	
Other	

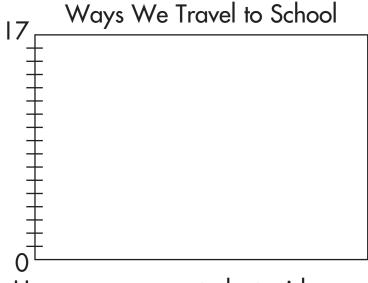
Use the graph to answer these questions.

How many students does each glass represent? \_\_\_\_\_

How many students chose grape juice? \_\_\_\_\_

Which drink did most students choose? \_\_\_\_\_

Use the information in the tally chart to complete the bar graph.



Ways We Travel to School		
Bus	1111	
Walk	+++++++	
Car	H++++++1	
Bike	П	

How many more students ride in a car than take the bus to school?

Solve each problem.

Jenny is reading a book that is 98 pages long.

She has read 47 pages so far.

How many pages does Jenny have left to read? \_\_\_\_\_

47 + \_\_\_\_ = 98

Addison bakes 14 loaves of bread.

After she gives some away, she has 6 left.

How many loaves of bread does Addison have left? \_\_\_\_\_

Courtney had some fabric.

Becca gave her 12 more feet of fabric.

Now Courtney has 65 feet of fabric.

How many feet of fabric did Courtney have to start with? \_\_\_\_\_

There are 12 campers in the lake for an afternoon swim.

6 more campers join them.

If 9 of the campers get out of the lake,

how many campers are left swimming in the lake? \_\_\_\_\_

Kayla rakes 14 piles of leaves in her front yard. She rakes 15 piles of leaves in her back yard.

Then, she rakes 10 piles of leaves in her neighbor's yard.

How many piles of leaves does Kayla rake in all? \_\_\_\_\_

# CHAPTERS I-8 FINAL TEST

# Final Test Chapters 1–8

Solve each problem.

Denise has 2 nickels and 2 pennies.

How much money does Denise have? \_\_\_\_\_

Colby has 2 quarters in his pocket.

Nikki gives Colby 5 pennies that she found on the floor.

How much money does Colby have now? \_\_\_\_\_

Connor has 11 centimeters of green string and 19 centimeters of purple string to put on his birthday balloons. How much total string does Conner have for the balloons?

Mrs. Shaw bought 27 yards of fabric to make curtains for her classroom. Ms. Wolf bought 36 yards of fabric to make curtains for her classroom.

How much more fabric did Ms. Wolf buy than Mrs. Shaw?

Vanessa's yo-yo string measures 32 inches. Tony's yo-yo string measures 32 inches.

How many inches of yo-yo string do Vanessa and Tony have altogether?

# Scoring Record for Posttests, Mid-Test, and Final Test

		Performance			
Chapter Posttest	Your Score	Excellent	Very Good	Fair	Needs Improvement
I	of 31	28-31	25–27	22-24	21 or fewer
2	of 41	39–41	34–38	26–33	25 or fewer
3	of 41	39–41	34–38	26–33	25 or fewer
4	of 35	32–34	28-31	25–27	24 or fewer
5	of 62	56-62	50-55	44–49	45 or fewer
6	of 20	18–19	16-17	14–15	13 or fewer
7	of 22	20–22	18–19	1 <i>5</i> –1 <i>7</i>	14 or fewer
8	of 38	35–38	31–34	23–30	22 or fewer
Mid-Test	of 65	59–65	52-58	46–53	45 or fewer
Final Test	of 93	84–92	75–83	66–74	65 or fewer

Record your test score in the Your Score column. See where your score falls in the Performance columns. Your score is based on the total number of required responses. If your score is fair or needs improvement, review the chapter material.

# Chapter I

# Pretest, page 5

Even; odd odd; even 4 + 4 + 4 = 12; 5 + 5 = 10

# Pretest, page 6

4 + 4 + 4 + 4 = 16; 1 + 1 + 1 = 3 20, 30, 50, 60 10, 20, 25, 30 24, 26, 30, 32, 34

#### Lesson I.I, page 7

3 + 3 = 6; 5 + 5 + 5 + 5 = 20 4 + 4 + 4 = 12; 1 + 1 + 1 + 1 + 1 = 53 + 3 + 3 = 9; 4 + 4 = 8

#### Lesson I.I, page 8

2 + 2 = 4; 4 + 4 + 4 + 4 = 16 1 + 1 = 2; 5 + 5 + 5 = 155 + 5 + 5 + 5 + 5 = 25; 5 + 5 = 10

#### Lesson 1.2, page 9

8, 14 15, 20, 30, 35 40, 50, 60 14, 16, 22 20, 30, 35, 55, 65, 75, 80 80, 60, 40, 30

#### Lesson 1.3, page 10

8, 10, 12 84, 88, 90 10, 20, 30

## Lesson I.3, page II

55, 65, 75 20, 40, 50, 80, 90 80, 60, 40, 30, 20

#### Lesson 1.4, page 12

8, even, 4 + 4 = 8; 5, odd

#### Lesson 1.4, page 13



8, 4 + 4 = 8, even; 3, 2 + 1 = 3, odd 7, 6 + 1 = 7, odd; 6, 3 + 3 = 6, even

## Posttest, page 14

4, 6, 10, 12 10, 15, 25, 30 40, 50, 60, 90 5 + 5 + 5 + 5 + 5 = 25; 3 + 3 = 6

#### Posttest, page 15

5 + 5 + 5 + 5 = 20; 5 + 5 + 5 = 15 9, 5 + 4 = 9, odd; 10, even, 5 + 5 = 10 1, 1 + 0 = 1, odd; 5, 2 + 3 = 5, odd 6, even, 3 + 3 = 6; 4, even, 2 + 2 = 4

# Chapter 2

## Pretest, page 16

16, 5, 2, 11, 7, 15 8, 19, 12, 4, 9, 17 3, 6, 13, 14, 20, 10 1, 7, 2, 5, 8, 9 7, 12, 3, 0, 8, 6 9, 3, 3, 17, 8, 5

## Pretest, page 17

6 +8 | 14 | 17 | -8 | 9 | 20 | -6 | 14 | 6 | +2 | 8 | 8 | +7 | -1 | 5 |

# Lesson 2.1, page 18

5, 4, 5, 4, 1, 3 2, 2, 5, 3, 4, 3 4, 0, 5, 4, 4, 2 1, 5, 3, 4, 5, 2 0, 2, 5, 3, 4, 5

## **Lesson 2.2, page 19**

3, 0, 0, 1, 3, 3 0, 1, 0, 1, 2, 4 4, 2, 2, 0, 2, 3 1, 5, 0, 3, 0, 0 1, 3, 1, 2, 3, 4

#### Lesson 2.3, page 20

6, 8, 7, 7, 8, 8 6, 6, 7, 6, 8, 8 7, 7, 8, 7, 6, 6 8, 8, 7, 8, 6, 7 8, 8, 7, 6, 6, 7

#### Lesson 2.4, page 21

4, 6, 3, 4, 3, 4 7, 1, 2, 0, 5, 0 5, 6, 3, 1, 2, 2 0, 6, 5, 7, 8, 1 4, 5, 4, 4, 0, 3

#### Lesson 2.5, page 22

9, 10, 10, 9, 10, 9 9, 9, 10, 10, 10, 9 9, 9, 9, 9, 9, 10 9, 10, 10, 10, 9, 9 9, 10, 10, 10, 10, 9

#### Lesson 2.6, page 23

3, 5, 6, 6, 1, 2 9, 1, 4, 2, 8, 4 9, 5, 3, 7, 7, 10 0, 8, 6, 1, 9, 4 1, 5, 8, 2, 2, 7

#### Lesson 2.7, page 24

12, 11, 13, 11, 12, 11 12, 13, 12, 12, 11, 13 11, 12, 11, 13, 11, 13 13, 11, 12, 12, 13, 11 11, 12, 12, 13, 13, 11

#### Lesson 2.8, page 25

8, 2, 4, 7, 9, 5 3, 7, 5, 9, 6, 6 9, 4, 3, 8, 6, 8 7, 8, 4, 6, 7, 4 9, 7, 3, 9, 5, 5

#### Lesson 2.9, page 26

14, 12, 16, 13, 14, 11 11, 14, 13, 16, 12, 16 14, 15, 12, 11, 14, 13 15, 12, 12, 11, 15, 15 13, 14, 11, 16, 11, 14

#### Lesson 2.10, page 27

5, 7, 5, 8, 7, 4 5, 9, 6, 7, 9, 6 9, 7, 8, 2, 6, 8 4, 3, 6, 8, 9, 9 7, 7, 5, 8, 5, 7

#### Lesson 2.11, page 28

18, 17, 16, 13, 19, 12 14, 20, 15, 12, 15, 17 17, 14, 12, 13, 12, 14 19, 13, 18, 15, 12, 20 20, 14, 13, 17, 16, 19

#### Lesson 2.12, page 29

9, 8, 6, 8, 6, 11 3, 9, 8, 5, 7, 6 8, 6, 8, 12, 5, 9 8, 9, 5, 4, 16, 7 15, 9, 9, 4, 7, 10

#### Lesson 2.13, page 30

13 - 7 - 6 - 8 + 6 - 14 - 7 - 8 - 7 - 8 - 4 - 9 - 18 - 9

# Lesson 2.13, page 31

subtract; 12

- 6
6
subtract; 20
- 5
15
add; 6
+ 7
13

#### Posttest, page 32

5

7, 10, 12, 3, 16, 18 9, 13, 6, 4, 14, 5 8, 20, 15, 17, 11, 19 9, 6, 2, 6, 1, 5 10, 9, 0, 9, 6, 6 8, 9, 16, 0, 3, 0

#### Posttest, page 33

# **Chapter 3**

#### Pretest, page 34

57, 74, 98, 59, 69 59, 91, 39, 58, 93 39, 68, 78, 96, 59 5, 27, 20, 13, 22 24, 27, 50, 17, 3 35, 31, 6, 20, 22

#### Pretest, page 35

46 -22 24 36 +22 58 37 -25 12 58 -45 13 53¢ -41¢ 12¢

# Lesson 3.1, page 36

64, 79, 79, 87, 74 76, 48, 87, 94, 88 91, 89, 98, 69, 89 87, 69, 85, 79, 59 95, 77, 98, 59, 53

# Lesson 3.1, page 37

69, 97, 39, 79, 75 99, 79, 39, 57, 86 56, 88, 49, 67, 68 49, 68, 63, 76, 89 56, 69, 56, 48, 99 94, 76, 78, 58, 77 78, 89, 78, 98, 63

#### **Lesson 3.2, page 38**

67, 89, 85, 79, 39 69, 84, 77, 47, 87 89, 57, 89, 96, 69 85, 27, 94, 89, 40 96, 77, 67, 84, 65 69, 94, 86, 67, 87 49, 39, 54, 87, 77

# Lesson 3.2, page 39

10 +11 21 +2 +33 75 13 +20 33 28

> -<u>[14</u> 14 32

 $\frac{32}{+27}$ 

## Lesson 3.3, page 40

10, 81, 12, 14, 52 16, 53, 30, 12, 15 21, 14, 33, 24, 26 11, 30, 60, 31, 22 5, 14, 10, 62, 5

# Lesson 3.3, page 41

11, 23, 25, 50, 14 13, 26, 21, 33, 31 52, 24, 11, 35, 20 33, 42, 17, 10, 24 91, 14, 4, 31, 12 14, 90, 34, 32, 41 25, 61, 62, 13, 11

#### Lesson 3.4, page 42

22, 34, 10, 16, 6 72, 18, 3, 60, 45 25, 32, 43, 45, 1 35, 43, 54, 40, 21 15, 32, 51, 40, 13 80, 60, 14, 74, 21 43, 20, 26, 18, 22

## **Lesson 3.4, page 43**

28 -10 18 32 -30 2 65 -22 +3 59 -44 15 37 -12 25

# Lesson 3.5, page 44

69, 88, 87, 68, 96 87, 49, 87, 65, 59 69, 56, 58, 47, 66 79, 39, 77, 68, 88

# Lesson 3.5, page 45

# Lesson 3.6, page 46

30¢	32¢	42¢	24¢
30¢			32¢
+42¢		+	24¢
72¢			56¢
30¢			42¢
<u>+32</u> ¢		<u>+</u>	24¢
62¢			66¢
30¢			32¢
42¢			24¢
<u>+24</u> ¢		+	30¢
96¢			86¢

# Lesson 3.6, page 47

melon apple	
85¢ <u>−33</u> ¢ 52¢	33¢ -20¢ 13¢
35¢ -20¢ 15¢	85¢ -20¢ 65¢
85¢ -35¢ 50¢	35¢ -33¢ 2¢

# Posttest, page 48

79, 36, 93, 66, 57, 99 47, 28, 59, 58, 84, 35 59, 68, 27, 87, 49, 69 16, 24, 13, 41, 50, 22 53, 70, 3, 33, 34, 24 73, 10, 25, 30, 17, 44

## Posttest, page 49

# Chapter 4

# Pretest, page 50

82, 75, 63, 90, 83 73, 41, 57, 72, 95 91, 61, 84, 60, 44 28, 5, 18, 6, 38 17, 28, 48, 22, 58 24, 7, 49, 74, 27

#### Pretest, page 51

# Lesson 4.1, page 52

81, 92, 64, 37, 82 92, 96, 84, 81, 36 72, 62, 51, 92, 85 70, 73, 70, 30, 91

# Lesson 4.1, page 53

90, 63, 70, 90, 64 50, 83, 60, 72, 42 71, 91, 80, 85, 60 55, 80, 41, 84, 70 70, 82, 61, 60, 82 73, 71, 64, 47, 81

# Lesson 4.2, page 54

71, 51, 83, 60, 64 73, 61, 60, 75, 67 41, 82, 92, 52, 92 53, 51, 71, 40, 81 60, 82, 92, 65, 72 90, 83, 63, 84, 85

## Lesson 4.2, page 55



 $\frac{15}{+16}$ 

# Lesson 4.3, page 56

29, 12, 29, 37, 7 57, 12, 27, 9, 57 15, 37, 5, 21, 19 38, 15, 15, 28, 56

#### Lesson 4.3, page 57

3, 9, 18, 88, 45 13, 16, 17, 9, 36 4, 26, 29, 9, 48 16, 38, 24, 8, 16 19, 8, 37, 16, 27

#### Lesson 4.4, page 58

9, 17, 9, 17, 26 36, 45, 9, 28, 27 4, 28, 48, 47, 36 15, 29, 46, 26, 48 36, 37, 8, 24, 49 18, 24, 9, 35, 56

## **Lesson 4.4, page 59**

# $\frac{42}{-27}$

## Posttest, page 60

60, 84, 92, 73, 42 63, 80, 53, 72, 63 53, 50, 83, 60, 24 39, 9, 35, 6, 26 18, 6, 29, 38, 8 38, 26, 47, 9, 15

#### Posttest, page 61

#### Mid-Test

#### Page 62

13, 43, 49, 14, 94, 9 17, 78, 81, 5, 69, 8 39, 78, 4, 12, 52, 68 36, 5, 9, 28, 9, 53 11, 7, 7, 10, 3, 37 8, 0, 12, 37, 8, 5

#### Page 63

Odd; even 50, 55, 65 14, 16, 20, 22 4 + 4 + 4 = 12; 5 + 5 = 10

#### Page 64

5 + 5 + 5 = 1550, 60, 70, 100, 110, 120, 130 14, even 7 + 7 = 1414 +1327 34 - 9 25

# Page 65

24 22 +2167 30¢ +33¢ 63¢ 14 +18

# 24 45 +13

32

## **Chapter 5**

#### Pretest, page 66

455, 460, 475, 485 370, 380, 410, 420 100, 300, 400, 600, 700 234, 200 + 30 + 4 = 234; 306, three hundred six; 460 < 540; 918 > 908; 103 < 120 575 < 590; 260 > 240; 347 > 298 701 < 707; 647 < 742; 818 = 818 157 > 120; 450 > 370; 963 < 993

#### Pretest, page 67

70; 178; 182; 95; 199; 283; 792; 979; 420; 905; 369; 160; 228; 277; 208; 169; 77; 417 108; 64; 510; 16; 94; 639; 444; 442; 848; 600; 732; 40; 35; 52; 37; 61; 609; 426

#### Lesson 5.1, page 68

165, 100 + 60 + 5; 178, 100 + 70 +8 184, 100 + 80 + 4; 158, 100 + 50 + 8170, 100 + 70; 152, 100 + 50 + 2180, 100 + 80; 161, 100 + 60 + 1

#### **Lesson 5.2, page 69**

235, two hundred thirty-five; 309, three hundred nine 324, three hundred twenty-four; 217, two hundred seventeen

390, three hundred ninety; 289, two hundred eighty-nine 241, two hundred forty-one; 307, three hundred seven

#### Lesson 5.3, page 70

542, five hundred forty-two; 435, four hundred thirty-five 640, six hundred forty; 514, five hundred fourteen 494, four hundred ninety-four; 671, six hundred seventy-one 433, four hundred thirty-three; 508, five hundred eight

#### Lesson 5.4, page 71

722,700 + 20 + 2956, 900 + 50 + 6; 809, 800 + 9 840,800 + 40774, 700 + 70 + 4; 963, 900 + 60 + 3 917,900 + 10 + 7

# Lesson 5.5, page 72

313, 315, 316 417, 419, 421 610, 615, 620, 635 785, 795, 810, 815 210, 220, 240, 260 360, 380, 390, 410, 420 200, 400, 500, 700 700, 600, 400, 300

#### **Lesson 5.6, page 73**

410, 415, 420, 435, 440 320, 330, 340, 370 660, 650, 640, 610 502, 492, 472, 462 440, 540, 740, 840 210, 310, 510, 610, 710 850, 750, 650, 550, 350 726, 626, 426, 326

#### **Lesson 5.6, page 74**

831 < 843; 436 > 379; 902 < 911 567 > 564; 306 < 401; 535 = 535 219 > 198; 739 > 730; 630 < 820 127 > 119; 407 < 610; 923 < 925 354 < 453; 802 > 792; 236 < 401 504 = 504; 402 < 408; 123 > 118 367 < 562; 760 > 740; 654 < 736 981 > 901; 391 < 491; 835 > 830

#### **Lesson 5.6, page 75**

122 < 245; 903 > 500; 418 < 806 856 > 424; 806 > 751; 980 > 361 744 > 121; 168 < 388; 959 > 767 676 < 806; 371 < 638; 492 < 746 861 > 445; 775 > 134; 393 > 296 433 < 816; 189 = 189; 101 < 788; 689 > 341; 365 < 815; 483 < 504; 770 > 310; 379 < 462; 403 < 404; 510 = 510; 506 < 736; 311 < 482; 646 < 740; 673 > 355; 180 < 483; 148 < 569; 823 > 511; 568 = 568; 639 < 660; 938 > 302; 764 > 741

#### **Lesson 5.7, page 76**

140; 61; 151; 111; 94 81; 110; 104; 111; 121 141; 44; 120; 93; 91 81; 134; 121; 94; 62 43; 101; 80; 141; 127 114; 122; 120; 94; 88

#### **Lesson 5.7, page 77**

89; 78; 88; 86; 77 79; 79; 67; 66; 68 26; 8; 48; 89; 69 78; 58; 69; 86; 59 28; 58; 29; 58; 74 85; 69; 79; 75; 87

#### **Lesson 5.7, page 78**

61; 109; 106; 92; 90 55; 71; 84; 59; 117; 80; 70; 105; 47; 74 91; 91; 97; 66; 72 91; 67; 129; 85, 89 87; 89; 101; 98; 71

#### **Lesson 5.7, page 79**

58; 91; 116; 82; 79; 84; 64; 122; 115; 124; 7; 78; 78; 49; 91; 589; 377; 590; 767; 851 773; 703; 386; 617; 658 434; 691; 790; 488; 43

#### Lesson 5.8, page 80

685; 1,153; 933; 1,123; 444 1,175; 1,030; 1,570; 1,042; 1,280 1,282; 1,001; 681; 973; 1,356 982; 944; 367; 404; 414 1,424; 850; 1,378; 1,350; 446 1,334; 1,070; 880; 1,251; 1,125

#### Lesson 5.9, page 81

212; 593; 489; 120; 480 408; 206; 279; 106; 377 331; 399; 519; 189; 577 114; 208; 529; 171; 448 86; 627; 25; 350; 86 281; 349; 225; 336; 129

#### **Lesson 5.10, page 82**

369; 901; 417; 732; 521 1,108; 606; 1,075; 1,005; 397 847; 711; 931; 550; 531 1,055; 589; 812; 902; 382

#### Lesson 5.11, page 83

570; 238; 33; 326; 165; 121; 15; 226; 112; 129; 399; 220; 106; 263; 264 187; 462; 437; 303; 215

Spectrum Math Answer Key

# Lesson 5.12, page 84

131; 179; 91; 94; 422 268; 62; 337; 60; 779; 447; 77; 89; 175; 198 1,403; 313; 860; 79; 465 905; 365; 370; 198; 204 223; 922; 689; 396; 302

#### Lesson 5.12, page 85

75; 119; 120; 649; 905 106; 585; 349; 91; 402 1,344; 118; 390; 580; 149 54; 72; 339; 344; 861 121; 916; 435; 688; 478 14; 510; 651; 681; 777

#### Lesson 5.12, page 86

131; 158; 86; 117; 664 401; 162; 520; 140; 197; 1,111; 164; 620; 999; 329 397; 108; 183; 409; 889 88; 147; 591; 430; 406 306; 463; 378; 106; 403

#### Posttest, page 87

110, 115, 125, 130 660, 680, 690, 710 475, 675, 775, 875 550, 500 + 50 129, 100 + 20 +9 218, two hundred eighteen 163, one hundred sixty-three 410 < 501; 653 < 672; 946 > 942 378 > 350; 741 > 561; 143 < 206

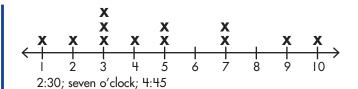
#### Posttest, page 88

167; 345; 249; 402; 922; 868 279; 375; 1,750; 345; 1,273; 360 969; 407; 856; 1,042; 915; 990 137; 106; 78; 40; 270; 186 288; 617; 231; 115; 394; 364 159; 477; 187; 683; 485; 169

# Chapter 6

#### Pretest, page 89

Check student's estimates against actual lengths, 3.5 in., 9 cm; Check student's estimates against actual lengths, 2 in., 4.5 cm pencil; centimeters; an inch



#### Pretest, page 90

Cookie dough; 7; 12 75: 60

#### Pretest, page 91

98 in.

98 in.

98 in.

98 in.

3 in.

5¢

+7¢

12¢

5 in.

+ 7 in.

12 in.

\$4.05

-\$2.00

\$2.05

60 in.

-51 in.

9 in.

#### Lesson 6.1, page 92

7, 7:00; 12, 12:00; 11, 11:00 10, 10:00; 6, 6:00; 5, 5:00 9, 9:00; 8, 8:00; 2, 2:00

#### **Lesson 6.2, page 93**

4, 4:30; 10, 10:30; 11, 11:30 2, 2:30; 1, 1:30; 6, 6:30 5, 5:30; 9, 9:30; 3, 3:30

#### Lesson 6.3, page 94

6:45; 5:15; 10:15 3:45; 11:15; 7:45

#### Lesson 6.3, page 95

3, 4; 6; 3:30 5, 6; 9; 5:45 8; 12; 8:00 10, 11; 3; 10:15 4; 12; 4:00

## Lesson 6.4, page 96

Check student's estimates against actual lengths: 5 in., 4 in., 2 in., 7 in., 3 in.

#### Lesson 6.5, page 97

Check student's estimates against actual lengths: 6 cm, 5 cm, 9 cm, 12 cm, 9 cm

#### **Lesson 6.6, page 98**

3 in.

5 in.

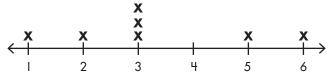
3 in.; 2 in.

6 in.

I in.; 3 in.

## **Lesson 6.7, page 99**

1; 1; 2; 0; 1; 1



#### **Lesson 6.8, page 100**

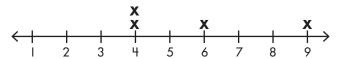
I in.; 5 in.

2 in.; 4 in.

3, 1, 3, 1, 8 in.; 2, 2, 2, 6 in.

1, 1, 1, 1, 4 in.; 2, 1, 2, 1, 6 in.

#### Lesson 6.9, page 101



#### Lesson 6.10, page 102

8 cm; 4 cm

6 cm; 9 cm

7 cm

17 cm

#### Lesson 6.11, page 103



## Lesson 6.12, page 104

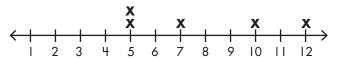
6 cm; 5 cm

2 cm; 9 cm

6, 2, 6, 2, 16 cm; 6, 1, 6, 1, 14 cm

4, 4, 4, 4, 16 cm; 3, 3, 3, 3, 3, 15 cm

#### Lesson 6.13, page 105



# Lesson 6.14, page 106

3 in., 2 in., 1 in. longer

5 in., 3 in., 2 in. longer

I in., 2 in., I in. longer

3 in., 5 in., 2 in. longer

#### Lesson 6.15, page 107

6 cm, 4 cm, 2 cm longer

8 cm, 4 cm, 4 cm longer

4 cm, 5 cm, 1 cm longer

7 cm, 6 cm, 1 cm longer

#### Lesson 6.16, page 108

II centimeters, 22 squares

14 centimeters, 28 squares

7 centimeters, 14 squares

15 centimeters, 30 squares

Answers may vary, but students should understand that the measurements in centimeters have lower numbers than those in squares.

Answers may vary, but students should understand that the squares are smaller units than centimeters.

#### Lesson 6.16, page 109

2 centimeters, about 1 inch

5 centimeters, about 2 inches

10 centimeters, about 4 inches

8 centimeters, about 3 inches

16 centimeters, about 6 inches

13 centimeters, about 5 inches

Answers may vary, but students should understand that the measurements in centimeters have higher numbers than those in inches.

Answers may vary, but students should understand that centimeters are smaller units than inches.

#### Lesson 6.17, page 110

48 ft.

+21 ft.

69 ft.

27 in.

-11 in.

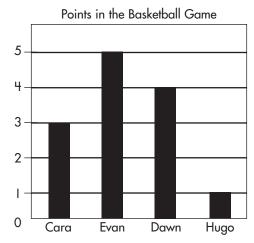
I6 in

# Lesson 6.18, page 111

## Lesson 6.18, page 112

# Lesson 6.18, page 113

# Lesson 6.19, page 114



Evan; Hugo; 13; 4

## Lesson 6.20, page 115

Check student's picture graphs

Shapes Around the Room		
Triangles		
Stars	***	
Squares		
Circles	00000	

star; circle; 3; 3

# Lesson 6.21, page 116

30; 35; 65; 73

20¢

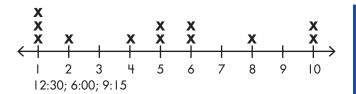
## Lesson 6.22, page 117

+ **4**¢ 24¢ 5¢ +7¢ 12¢ 10¢ + 6¢ 16¢ \$2.00 25¢ 10¢ 20¢ + 10¢ \$2.65 \$1.00 50¢ 40¢ 5¢ 5¢ \$2.00

## Posttest, page 118

Check student's estimates against actual lengths: ~2.5 in., 6 cm; Check student's estimates against actual lengths: ~1.5 in., 4 cm

paper clip; centimeters; a centimeter



# Posttest, page 119

Soccer; baseball; 11 75; 60

# Posttest, page 120

50¢

+10¢

78 in.

 $-\frac{70 \text{ in.}}{8 \text{ in.}}$ 

\$4.00

+<u>\$2.50</u> \$6.50

55¢

+25¢

8 ft.

<u>−6 ft.</u> 2 ft.

# **Chapter 7**

# Pretest, page 121

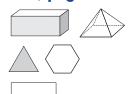






square; circle; triangle; rectangle triangle; rectangle; pentagon; hexagon square square pyramid triangle

## Pretest, page 122

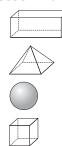




# **Lesson 7.1, page 123**

circle; rectangle; triangle; pentagon hexagon; square; hexagon; square square hexagon circle triangle

# Lesson 7.2, page 124



square pryramid rectangular solid sphere cube

# Lesson 7.3, page 125



# Lesson 7.4, page 126

square and triangle

square

rectangle and square

circle









# Posttest, page 127

triangle; square; rectangle; circle pentagon; triangle; hexagon; rectangle







cube rectangle pentagon sphere

# Posttest, page 128











# Chapter 8

# Pretest, page 129

 $4, 4, \frac{4}{4}; 3, 1, \frac{1}{3}$ 

3, 1,  $\frac{1}{3}$ ; 2, 1,  $\frac{3}{2}$ 

 $3, 3, \frac{3}{3}; 4, 1, \frac{7}{4}$ 

4, 1,  $\frac{1}{4}$ ; 2, 2,  $\frac{2}{2}$ 

# Pretest, page 130

 $\frac{1}{3}$ , one-third;  $\frac{1}{4}$ , one-fourth

 $\frac{2}{2}$ , two-halves;  $\frac{1}{2}$ ; one-half

 $\frac{1}{4}$ , one-fourth;  $\frac{3}{3}$ ; three-thirds 10; 9

# Lesson 8.1, page 131

 $\frac{3}{3}$ , three-thirds;  $\frac{2}{2}$ , two-halves

 $\frac{2}{2}$ , two-halves;  $\frac{3}{3}$ , three-thirds

 $\frac{\frac{1}{4}}{4}$ , four-fourths;  $\frac{4}{4}$ , four-fourths

# Lesson 8.2, page 132

 $2, 1, \frac{1}{2}; 2, 1, \frac{1}{2}$ 

 $2, 1, \frac{1}{2}; 2, 1, \frac{1}{2}$ 

One-half; One-half

# **Lesson 8.3, page 133**

3, 1,  $\frac{1}{3}$ ; 3, 1,  $\frac{1}{3}$ 

3, 1,  $\frac{1}{3}$ ; 3, 1,  $\frac{1}{3}$ 

One-third; One-third

#### Lesson 8.4, page 134

 $4, 1, \frac{1}{4}; 4, 1, \frac{1}{4}$ 

 $4, 1, \frac{1}{4}; 4, 1, \frac{1}{4}$ 

One-fourth; One-fourth

#### **Lesson 8.5, page 135**

9; 12; 8

10; 12; 4

16; 12; 20

#### Posttest, page 136

4, 1, 4; 4, 1, 4

 $3, 1, \frac{1}{3}; 3, 1, \frac{1}{3}$ 

2, 1,  $\frac{1}{2}$ ; 3, 3,  $\frac{3}{3}$ 

4, 1,  $\frac{1}{4}$ ; 2, 2,  $\frac{2}{2}$ 

#### Posttest, page 137

 $\frac{1}{3}$ , one-third;  $\frac{1}{2}$ , one-half

 $\frac{4}{4}$ , four-fourths;  $\frac{1}{4}$ , one-fourth

 $\frac{3}{3}$ , three-thirds;  $\frac{1}{3}$ , one-third

12; 18

# **Final Test**

#### Page 138

17; 60; 10; 59; 13; 78 39; 5; 56; 91; 15; 68 711; 836; 940; 841; 954; 755 43; 6; 39; 0; 46; 9 8; 3; 1; 27; 4; 23 864; 774; 698; 106; 188; 273 443; 320; 542; 182; 815; 429

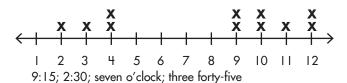
#### Page 139

Fourteen, even; nine, odd 324, three hundred twenty four; 675, six hundred seventy five 820,800 + 20;163,100 + 60 + 3 $\frac{1}{3}$ , one-third;  $\frac{2}{2}$ , two-halves; 8 equal squares

## Page 140

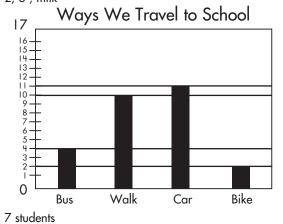
pentagon; rectangle;

Check student's estimates against actual lengths: ~3 in., 7 cm; ~2 in., 5 cm pencil



#### Page 141

2; 6; milk



# Page 142

# Page 143

10¢ + 2¢ 12¢

50¢

+ 5¢ 55¢

II cm +19 cm30 cm

36 yd. -27 yd.

9 yd. 32 in. +32 in.

64 in.

# Spectrum Math

# Answer Key

# Notes

# Notes

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