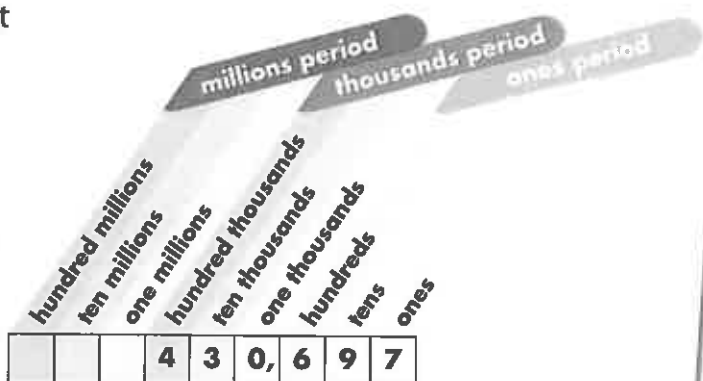


Vocabulary

1. Each **period** of a place-value chart has three places.

Which periods are shown in the place-value chart at the right?



2. The position of a digit in a number tells the value of the digit. This is called **place value**.

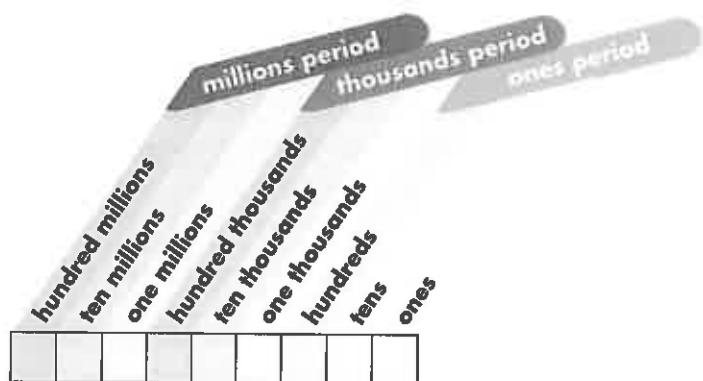
What is the value of the 6 in 430,697?

3. The **expanded form** of a number shows the sum of the value of each digit in a number.

Use the place-value chart to help write 430,697 in expanded form.

4. Write 656,132 in the place-value chart to the right.

5. Write 656,132 in expanded form.



On the Back!

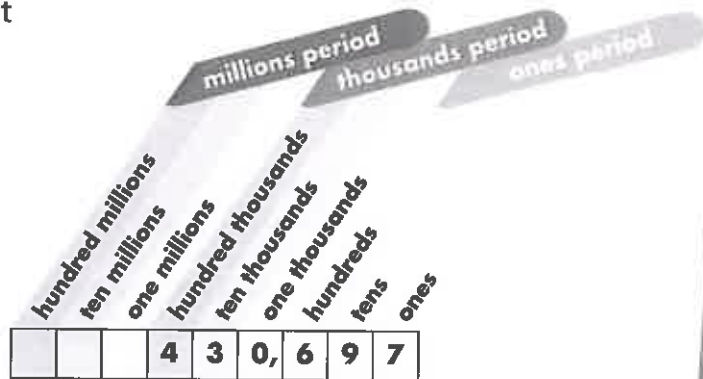
6. According to the 2010 census, the population of 20-24 year olds in Alabama was 335,322. Draw a place-value chart and record 335,322. Then write 335,322 in expanded form.

Vocabulary

1. Each **period** of a place-value chart has three places.

Which periods are shown in the place-value chart at the right?

millions, thousands, ones



2. The position of a digit in a number tells the value of the digit. This is called **place value**.

What is the value of the 6 in 430,697?

600

3. The **expanded form** of a number shows the sum of the value of each digit in a number.

Use the place-value chart to help write 430,697 in expanded form.

400,000 + 30,000 + 600 + 90 + 7

4. Write 656,132 in the place-value chart to the right.

5. Write 656,132 in expanded form.

**600,000 + 50,000
+ 6,000 + 100
+ 30 + 2**



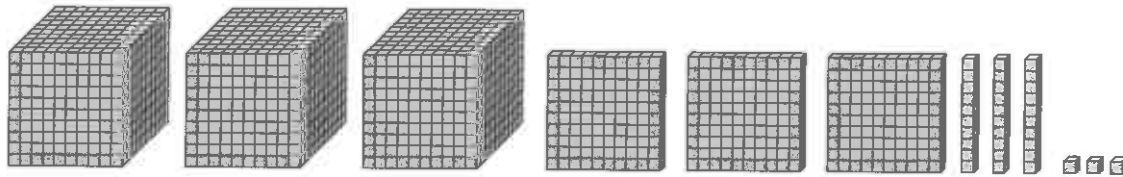
On the Back!

6. According to the 2010 census, the population of 20-24 year olds in Alabama was 335,322. Draw a place-value chart and record 335,322. Then write 335,322 in expanded form.

Check students' work; 300,000 + 30,000 + 5,000 + 300 + 20 + 2

AZ Vocabulary

1. When two **digits** next to each other in a number are the same, the value of the digit on the left is always ten times as great as the value of the digit on the right.



What number is represented in the model above?

2. The first 3 in 3,333 is the thousands place. What is the value of the first 3? _____
3. The second 3 in 3,333 is in the hundreds place. What is the value of the second 3? _____
4. What is the relationship between the value of the first 3 and the value of the second 3 in 3,333?

The value of the first 3 is _____ times as great as the value of the second 3.

5. Complete these sentences.
In 5,550, the second 5 is in the hundreds place.

Its value is _____.

The third 5 is in the _____ place.

Its value is _____.

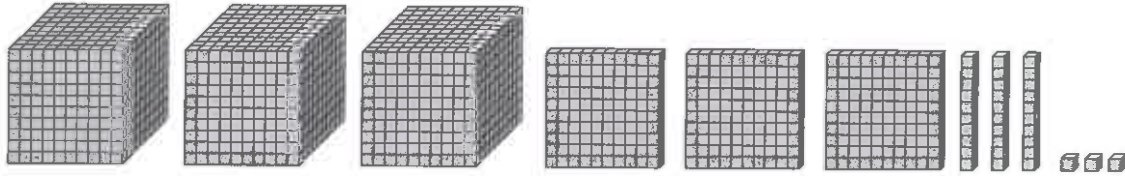
The value of the 5 in the _____ place is ten times as great as the value of the 5 in the _____ place.

On the Back!

6. Describe the relationship between the 2s in 75,222.

AZ Vocabulary

1. When two **digits** next to each other in a number are the same, the value of the digit on the left is always ten times as great as the value of the digit on the right.



What number is represented in the model above?

3,333

2. The first 3 in 3,333 is in the thousands place. What is the value of the first 3? **3,000**
3. The second 3 in 3,333 is in the hundreds place. What is the value of the second 3? **300**
4. What is the relationship between the value of the first 3 and the value of the second 3 in 3,333?

The value of the first 3 is **ten** times as great as the value of the second 3.

5. Complete these sentences.
In 5,550, the second 5 is in the hundreds place.

Its value is **500**.

The third 5 is in the **tens** place.

Its value is **50**.

The value of the 5 in the **hundreds** place is ten times as great as the value of the 5 in the **tens** place.

On the Back!

6. Describe the relationship between the 2s in 75,222.
Sample answer: The first 2 is in the hundreds place, and its value is ten times as great as the value of the 2 in the tens place. The value of the 2 in the tens place is ten times as great as the value of the 2 in the ones place.

Vocabulary

1. The **greater than symbol** ($>$) is used to show the number to the left of the symbol has a greater value than the number to the right of the symbol.
Use the greater than symbol to compare 28 and 23. _____

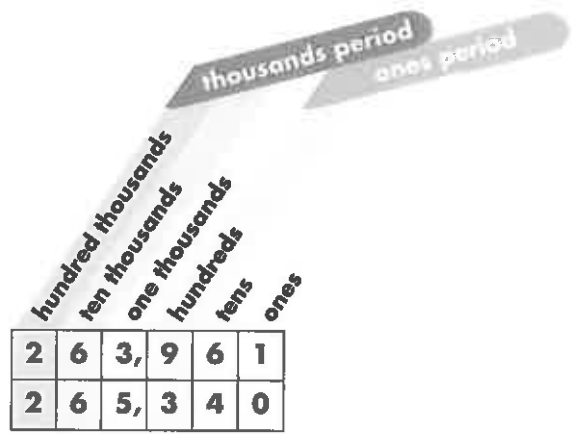
2. The **less than symbol** ($<$) is used to show the number to the left of the symbol has a lesser value than the number to the right of the symbol.
Use the less than symbol to compare 28 and 23. _____

Use the place-value chart to compare 263,961 and 265,340. Begin comparing at the left.

3. What is the value of the 2 in both numbers? the 6 in both numbers?

4. Which is the first place value in both numbers that has different digits?

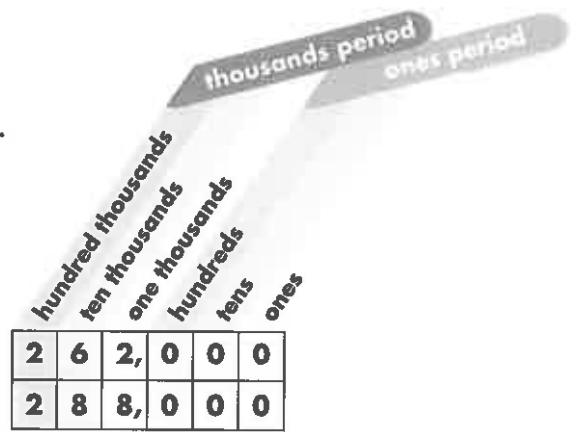
5. The number with the greater digit in the _____ is the greater number. Use the greater than symbol to compare the numbers.



Use the place-value chart to answer the questions.

6. Which is the greater number?

7. Which is the lesser number?



On the Back!

8. Write three comparisons using the numbers below.
34,930
34,390
34,093

AZ Vocabulary

1. The **greater than symbol** ($>$) is used to show the number to the left of the symbol has a greater value than the number to the right of the symbol.

Use the greater than symbol to compare 28 and 23. **$28 > 23$**

2. The **less than symbol** ($<$) is used to show the number to the left of the symbol has a lesser value than the number to the right of the symbol.

Use the less than symbol to compare 28 and 23. **$23 < 28$**

Use the place-value chart to compare 263,961 and 265,340. Begin comparing at the left.

3. What is the value of the 2 in both numbers? the 6 in both numbers?

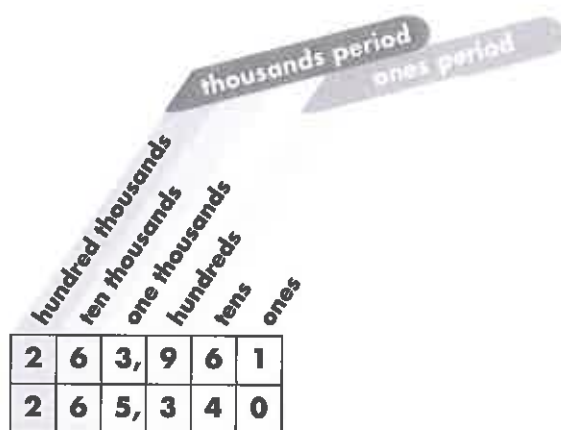
$200,000; 60,000$

4. Which is the first place value in both numbers that has different digits?

the thousands place

5. The number with the greater digit in the **thousands place** is the greater number. Use the greater than symbol to compare the numbers.

$265,340 > 263,961$



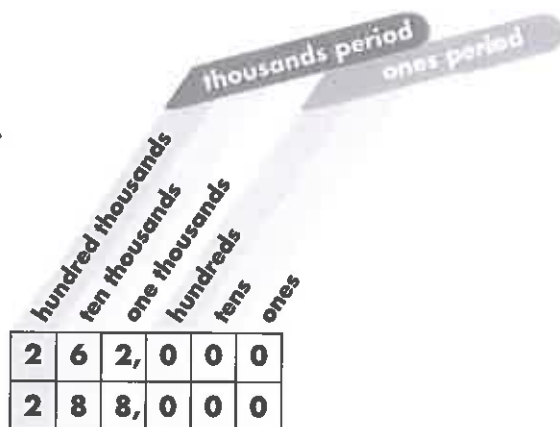
Use the place-value chart to answer the questions.

6. Which is the greater number?

$288,000$

7. Which is the lesser number?

$262,000$



On the Back!

8. Write three comparisons using the numbers below.

34,930

34,390

34,093

Check students' work.

AZ Vocabulary

1. **Rounding** is a way to find which multiple of 10, 100, or 1,000, and so on, a number is closest to.

To round a number, find the place value to which the number will be rounded. Look at the digit to the right of the rounding place.

If the digit to the right of the rounding place is less than 5, leave the rounding digit alone and change the digits to the right of the rounding place to zeros.

If the digit to the right of the rounding place is 5 or greater, add 1 to the rounding place and change the digits to the right of the rounding place to zeros.

Round 7,249 to the nearest hundred.

7,249 $4 < 5$

7,249 rounded to the nearest hundred is 7,200.

Round 7,249 to the nearest ten.

7,249 $9 > 5$

7,249 rounded to the nearest ten is 7,250.

Round 392,153.

- Which digit is in the ten thousands place? _____
- To the right of the ten thousands place is the _____ place.
- The digit in the thousands place is _____.
- What is 392,153 rounded to the nearest ten thousand? _____
- Round 392,153 to the nearest hundred thousand. _____
- Round 392,153 to the nearest hundred. _____

On the Back!

- Round 592,655 to the nearest hundred thousand, ten thousand, and thousand.
- Write three numbers that round to 400.

AZ Vocabulary

1. **Rounding** is a way to find which multiple of 10, 100, or 1,000, and so on, a number is closest to.

To round a number, find the place value to which the number will be rounded. Look at the digit to the right of the rounding place.

If the digit to the right of the rounding place is less than 5, leave the rounding digit alone and change the digits to the right of the rounding place to zeros.

If the digit to the right of the rounding place is 5 or greater, add 1 to the rounding place and change the digits to the right of the rounding place to zeros.

Round 7,249 to the nearest hundred.

7,249 $4 < 5$

7,249 rounded to the nearest hundred is 7,200.

Round 7,249 to the nearest ten.

7,249 $9 > 5$

7,249 rounded to the nearest ten is 7,250.

Round 392,153.

2. Which digit is in the ten thousands place? 9
3. To the right of the ten thousands place is the thousands place.
4. The digit in the thousands place is 2.
5. What is 392,153 rounded to the nearest ten thousand? 390,000
6. Round 392,153 to the nearest hundred thousand. 400,000
7. Round 392,153 to the nearest hundred. 392,200

On the Back!

8. Round 592,655 to the nearest hundred thousand, ten thousand, and thousand.

600,000; 590,000; 593,000

9. Write three numbers that round to 400.

Sample answer: 401; 395; 449

AZ Vocabulary

1. You can **construct an argument** to support or oppose a conjecture. A **conjecture** is a statement that is thought to be true but has not yet been proven.

When you construct an argument, give a clear and complete explanation, and use numbers, objects, drawings, or actions to justify your argument.

The land area of Texas is two hundred sixty-one thousand, two hundred thirty-two square miles. The number is written as 261,332. Construct a math argument that explains if the number is written correctly.

Use the information in the **Area of Texas Cities** table to construct math arguments to explain if the conjectures are correct or incorrect.

Area of Texas Cities

| City | Area (square kilometers) |
|------------|--------------------------|
| Austin | 704 |
| Dallas | 999 |
| Fort Worth | 904 |
| Houston | 1,625 |

2. Conjecture: Fort Worth has a greater area than Austin.

3. Conjecture: The 9 in the hundreds place in Dallas's area is ten times as great as the 9 in the ones place of its area.

On the Back!

4. The water area of Texas is seven thousand, three hundred sixty-five square miles. The number is written 7,365. Construct a math argument that explains if the number is written correctly or not.

AZ Vocabulary

1. You can **construct an argument** to support or oppose a conjecture. A **conjecture** is a statement that is thought to be true but has not yet been proven.

When you construct an argument, give a clear and complete explanation, and use numbers, objects, drawings, or actions to justify your argument.

The land area of Texas is two hundred sixty-one thousand, two hundred thirty-two square miles. The number is written as 261,332. Construct a math argument that explains if the number is written correctly.

Sample answer: The number is written incorrectly.

The digit in the hundreds place should be a 2;

261,232.

Use the information in the **Area of Texas Cities** table to construct math arguments to explain if the conjectures are correct or incorrect.

Area of Texas Cities

| City | Area (square kilometers) |
|------------|--------------------------|
| Austin | 704 |
| Dallas | 999 |
| Fort Worth | 904 |
| Houston | 1,625 |

2. Conjecture: Fort Worth has a greater area than Austin.

Yes; Sample answer:

904 > 704 because

9 hundreds are greater than 7 hundreds.

3. Conjecture: The 9 in the hundreds place in Dallas's area is ten times as great as the 9 in the ones place of its area.

No; Sample answer: The 9 in the hundreds place is ten times as great as the 9 in the tens place.

On the Back!

4. The water area of Texas is seven thousand, three hundred sixty-five square miles. The number is written 7,365. Construct a math argument that explains if the number is written correctly or not.

The number is written correctly; Sample answer: Each digit is in the correct place.