

Name \_\_\_\_\_

**Numbers to Ten Thousand****Essential Question** How can you represent numbers to ten thousand in different ways?**UNLOCK the Problem** REAL WORLD

The Thousand Bolts factory uses boxes of 1,000 bolts to fill crates of 10,000 bolts. How many boxes of 1,000 bolts are in each crate of 10,000?

- Circle the number you will need to count to find the answer.

**1** Count by thousands to find the total number of boxes of 1,000 bolts that will go into each crate. Then count the boxes.

1,000 2,000

1	2					
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So, there are \_\_\_\_\_ boxes of 1,000 bolts in each crate of 10,000.

**1** **Example** Suppose the factory has no crates and must use cases of 100 to fill an order for 3,200 bolts. How many cases will it pack?

There are \_\_\_\_\_ cases of 100 in 1,000.

So, there are \_\_\_\_\_ cases of 100 in 3,000.

There are \_\_\_\_\_ cases of 100 in 200.

Add the cases.  $30 + 2 =$  \_\_\_\_\_.

So, the factory will pack 32 cases of 100.

**Math Talk**

What if the factory had boxes of 1,000 and bags of 10 but no cases of 100? **Explain** how it could pack the order for 3,200 bolts.

## Share and Show



1. The Thousand Bolts factory has an order for 3,140 bolts. How can it pack the order using the fewest packages?  
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2. Suppose the bolt factory has only cases and bags. How can it pack the order for 3,140 bolts?  
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3. Suppose the bolt factory has only boxes and bags. How can it pack the order for 3,140 bolts?  
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### Remember

- 1 box = 1,000 bolts
- 1 case = 100 bolts
- 1 bag = 10 bolts

## On Your Own

Complete the packing chart. Use the fewest packages possible. When there is a zero, use the next smaller size package.

	Number of Bolts Ordered	Crates (Ten Thousands)	Boxes (Thousands)	Cases (Hundreds)	Bags (Tens)	Single Bolts (Ones)
4.	5,267		5			
5.	2,709			7	0	
6.	5,619					
7.	8,416		0		1	6
8.	3,967		0		0	

## Problem Solving



9. The Thousand Bolts factory used 9 boxes, 9 cases, and 10 bags to fill an order. How many bolts did they pack?  
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