4-10: Learning Goals

Let's learn about sales tax and tips.

4-10-1: The Price of Sunglasses



You are on vacation and want to buy a pair of sunglasses for \$10 or less. You find a pair with a price tag of \$10. The cashier says the total cost will be \$10.45.





4-10-2: Shopping in Two Different Cities

Different cities have different sales tax rates. Here are the sales tax charges on the same items in two different cities. Complete the tables.

City 1

item	price (dollars)	sales tax (dollars)	total cost (dollars)
paper towels	8.00	0.48	8.48
lamp	25.00	1.50	
pack of gum	1.00		
laundry soap	12.00		
	х		

City 2

item	price (dollars)	sales tax (dollars)	total cost (dollars)
paper towels	8.00	0.64	8.64
lamp	25.00	2.00	
pack of gum	1.00		
laundry soap	12.00		
	x		



4-10-3: Shopping in a Third City

Here is the sales tax on the same items in City 3.

1. What is the tax rate in this city?

item	price (dollars)	sales tax (dollars)
paper towels	8.00	0.58
lamp	25.00	1.83
pack of gum	1.00	0.07
laundry soap	12.00	

For the sales tax on the laundry soap, Kiran says it should be \$0.84. Lin says it should be \$0.87. Do you agree with either of them? Explain your reasoning.



4-10-4: Dining at a Restaurant

1. Jada has a meal in a restaurant. She adds up the prices listed on the menu for everything they ordered and gets a subtotal of \$42.00.

Date: Sep. 12th
Time: 6:55 PM
Server: # 27

Bread Stix	9.50
Chicken Parm	15.50
Chef Salad	12.00
Lemon Soda	2.00
Tea	3.00
Subtotal	42.00
Sales Tax	3.99
Total	45.99

- a. When the check comes, it says they also need to pay \$3.99 in sales tax. What percentage of the subtotal is the sales tax?
- b. After tax, the total is \$45.99. What percentage of the subtotal is the total?



c. They actually pay \$52.99. The additional \$7 is a tip for the server. What percentage of the subtotal is the tip?

4-10-4: Dining at a Restaurant

2. The tax rate at this restaurant is 9.5%.

Date: Sep 12th
Time: 6:04 PM
Server: # 27

Bread Stix 9.50
Ravioli Bites 10.50
Cheesecake 4.95

Subtotal 24.95
Sales Tax
Total

Date: Sep 12th
Time: 7:12 PM
Server: # 27

Garden Salad
Broccoli Bites

Subtotal
Sales Tax
Total

1.61

a. Another person's subtotal is \$24.95. How much will their sales tax be?

b. Some other person's sales tax is \$1.61. How much was their subtotal?

4-10: Lesson Synthesis

- Where did we see and use fractional percentages in this lesson?
- What are strategies we can use to calculate fractional percentages (including sales tax)?



4-10: Learning Targets

 I understand and can solve problems about sales tax and tip.



4-10-5: A Restaurant in a Different City

At a dinner, the meal cost \$22 and a sales tax of \$1.87 was added to the bill.

- 1. How much would the sales tax be on a \$66 meal?
- 2. What is the tax rate for meals in this city?

