

6.5 Today's Special

Focus: solving problems involving fractions, decimals, and percents, calculating discounts

Warm Up

1. Fill in the blanks to make the values in each row equal.

Cents	Fraction of a Dollar	Decimal Form
a) 25¢		
b)	$\frac{1}{2}$	
c)		\$0.75

2. Your friend says the most you could buy with \$10.00 is an \$8.70 item since there is \$1.30 tax on \$10.00.

Is she right?

YES NO

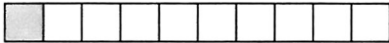
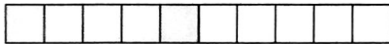
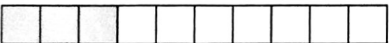

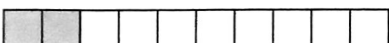
Explain.

4. If you score 40 out of 50 on a test, you have scored _____%.

3. If you score 7 out of 10 on a quiz, you have scored _____%.

Skills Practice 17: Fractions, Decimals, and Percents

1. Complete the table.

	Shaded Region			Unshaded Region (%)
	Fraction	Decimal	Percent	
a) 	$\frac{1}{10}$	0.1	10%	90%
b) 				
c) 				
d) 				
e) 				

2. The total percent of each bar (shaded plus unshaded area) in #1 is _____ %.

3. Fill in the blanks to make the values in each row equal.

Percent	Decimal	Fraction	
		Hundredths	Lowest Terms
a) 10%	0.10	$\frac{10}{100}$	$\frac{1}{10}$
b) 15%		$\frac{15}{100}$	$\frac{3}{20}$
c) 20%	0.20	$\frac{20}{100}$	
d) 25%		$\frac{25}{100}$	
e) 50%	0.50		
f) 75%			
g) 100%			

$$\frac{15 \div 5}{100 \div 5} = \frac{3}{20}$$

Calculating the Sale Price

- Many restaurants offer discount coupons for certain items on the menu.
- Often, specials are a percent or a fraction off the regular price.

1. A special of 30% off means the price is _____ % of the regular price.

2. A special of $\frac{1}{4}$ off means the price is _____ of the regular price.

3. Why might a restaurant offer specials?

4. Complete the table. Use the calculation method shown.
Choose a percent discount for the last item yourself.

Menu Item	Regular Price	Percent Discount	Sale Price as a Percent of Regular Price	Sale Price
a) Chicken with cashews	\$12.99	20%	80%	80% of \$12.99 = $0.80 \times \$12.99$ = \$10.39
b) Bamboo salad	\$7.50	10%		
c) Pad Thai dinner	\$10.25	40%		
d) Ginger chicken dinner	\$11.50	_____		

5. Complete the table. Use the calculation method shown.
Choose the fraction discount for the last item.

Menu Item	Regular Price	Fraction Discount	Sale Price as a Fraction of Regular Price	Sale Price
a) French toast	\$6.99	$\frac{1}{4}$ off	$\frac{3}{4}$	$\$6.99 \times \frac{3}{4}$ = $\$6.99 \times 3 \div 4$ = \$5.24
b) Western sandwich	\$5.50	$\frac{1}{3}$ off		
c) Eggs Benedict	\$9.25	half off		
d) Steak and eggs	\$12.50	_____		

- You work part-time at a grocery store.
 - Another local grocery store has begun to attract more customers.
 - Your store cuts its prices on some items.
6. Calculate the sale price for each item.
Write the sale price in each new price tag.

Item	Regular Price	Discount	Sale Price
a) Tomato sauce	\$1.79/can	10%	<input type="text"/>
b) Tomato paste	\$1.99/can	20%	<input type="text"/>
c) Saltine crackers	\$2.89/box	$\frac{1}{4}$ off	<input type="text"/>
d) Multi-grain crackers	\$3.69/box	$\frac{1}{3}$ off	<input type="text"/>

✓ Check Your Understanding

An \$800 computer is on sale for 20% off. Write what you would say to a friend to explain a way to determine the sale price.
