Living in the Real World

Just the Write Thing

Thinking Critically JTWT looks to use the Internet as a powerful tool to advertise its products and services. While the Internet can be useful to customers, it can also be looked upon as an annoyance, when mass e-mails or spam (junk e-mail) is sent. The Federal Trade Commission (FTC) has amassed a database of 8 million spam messages, with 10,000 new ones arriving daily. The FTC and state governments are attempting to stop the tidal wave of spam that threatens the Internet. On the other hand, the Direct Marketers' Association opposes limits on marketers' abilities to conduct blanket advertising through e-mail addresses.

- **Debate.** Why would the Direct Marketers' Association oppose such limits on e-mail advertising?
- Critical Thinking. Although other people find spam annoying, Direct Marketers' Association opposes limits as an infringement on Free Speech. List several arguments on both sides of this issue.
- Decision Making. Field needs to compare the various types of unsolicited advertising, such as through U.S. mail, telemarketers, and online advertisers.
 - A. How do you feel as the recipient of such advertising?
 - B. Have you ever bought something advertised in any of these ways? Is one form more intrusive and annoying than others?
 - C. Should the federal government regulate any of them? Why or why not?

YOU READ

REVIEW OF KEY WORDS

rent (p. 610) lease (p. 610) labor charge (p. 612) utilities (p. 616)

monthly service charge (p. 616) demand charge (p. 619) energy charge (p. 619) peak load (p. 619)

kilowatts (p. 619) fuel adjustment charge (p. 619) consultants (p. 621) consultant's fee (p. 621)

For Problems 1–12, write a definition for each key word in your own words. Then compare your version with the one in the Glossary.

Skills and Concepts

SECTION OBJECTIVE 19-1 AND EXAMPLES

Compute the monthly rental charge.

Web Dot Com rents a small office. The floor space measures 12 feet by 20 feet. It pays an annual rate of \$8.25 per square foot. Rounding to the nearest dollar, what is Web Dot Com's monthly rental charge?

STEP 1: Find the number of square feet.

Length × Width

12 feet \times 20 feet = 240 square feet

STEP 2: Find the monthly rental charge.

(Annual Rate × Number of Square Feet) ÷ 12

 $(\$8.25 \times 240)$

 \div 12 = \$165 monthly rental charge

REVIEW EXERCISES

Complete the table.

	Dimensions	=	Number of Square Feet	×	Annual Rate per Square Foot	÷	12 =	Monthly Rental Charge
13.	10.0 ft × 20.0 ft	=	(a.	×	\$ 9.00)	÷	12 =	= b.
14.	$30.0 ext{ ft} imes 15.0 ext{ ft}$	=	(a.	×	8.50)	÷	12 =	b.
5.	35.0 ft × 25.0 ft	=	(a.	×	10.50)	÷	12 =	b.
6.	40.5 ft × 12.0 ft	=	(a.	×	7.50)	÷	12 =	= b.
7.	30.0 ft × 18.0 ft	=	(a.	×	6.25)	÷	12 =	= b.
18.	45.0 ft × 22.0 ft	=	(a.	×	8.27)	÷	12 =	= b.

SECTION OBJECTIVE 19-2 AND EXAMPLES

Calculate the total building maintenance charge.

Northern Office Supply hired Universal Roofers to repair the roof on its office building. Two roofers worked 17 hours each to complete the job. The regular hourly rate for each roofer was \$11.25. The roofers used \$653.20 in materials. What was the total charge for fixing the roof?

STEP 1: Find the labor charge.

 $(\$11.25 \times 17) \times 2 = \382.50 labor charge

STEP 2: Find the materials charge.

\$653.20 materials charge **STEP 3:** Find the total charge.

Labor Charge + Materials Charge

\$382.50 + \$653.20 = \$1,035.70 total charge

REVIEW EXERCISES
Complete the table.

Time Required	×	Number of Employee		Hourly Rate	=		oor irge/	+	Materials Charge	=	Total
(7.0 hours	×	3	$ \times $	\$11.25	=	a.)	+	\$321.98		b.
(6.5 hours	×	2	×	10.50	=	a.)	+	193.58	=	b.
(4.0 hours	X	4	X	9.90	=	a.)	+	621.90		b.
(12.2 hours	×	8	X	13.50	=	a.)	+	239.66		b.
(3.0 hours	×	2	X	9.80	=	a.)	+	712.90	_	b.
(5.5 hours	×	9	X	12.75	=	a.)	+	239.76		b.

SECTION OBJECTIVE 19-3 AND EXAMPLES

Determine the total equipment rental cost.

The list price of a large canopy is \$3,200. The monthly rental charge is 5 percent of the list price. There is a 6.5 percent usage tax. What is the total rent charge for 1 year?

- **STEP 1:** Find the rental charge per month. $\$3,200 \times 5\% = \160 rental charge per month
- **STEP 2:** Find the tax. $(\$160 \times 12) \times 6.5\% = \124.80 tax
- STEP 3: Find the total rental cost.

 (Rental Charge × Time) + Usage Tax

 (\$160 × 12) + \$124.80 =

 \$1,920 + \$124.80 = \$2,044.80 total rental cost

REVIEW EXERCISES Complete the table.

Item	List Price	Rental Rate	Monthly Charge	Number of Months	Usage Tax	Total Renta
Copy machine	\$ 5,210.85	12.0% of list	a.	6	6.5%	b.
Tent	1,900.00	9.0% of list	a.	2	4.5%	b.
Computer	1,390.55	11.0% of list	a.	4	8.5%	b.
Phone system	10,511.83	8.5% of list	a.	9	7.0%	b.
Color printer	5,408.45	15.0% of list	a.	12	6.0%	b.
Forklift	35,000.00	9.5% of list	a.	5	5.5%	b.

SECTION OBJECTIVE 19-4 AND EXAMPLES

Work out the monthly telephone cost.

Redwater Video Rental has 3 telephone lines. It signs up for the \$89.99 plan from the Flexible Advantage Calling Plan (see Figure 19.1 on page 616). Redwater uses 1,201 minutes. A 2 percent federal excise tax is added to the bill. What is the total cost of Redwater's telephone service for the month?

STEP 1: Find the cost of additional minutes. $(1,201 - 1,000) \times \$0.35 = \70.35 cost of additional minutes

STEP 2: Find the cost of an additional line. \$19.99 cost of an additional line

STEP 3: Find the federal excise tax. $(\$89.99 + \$70.35 + \$19.99) \times 2\% = \3.6066 or \$3.61 federal excise tax

STEP 4: Find the total cost for the month.

Federal Cost of Monthly Cost of Service + Additional + Additional + Excise Tax Charge Minutes Lines

= \$183.94 total cost for the month \$3.61 \$19.99 \$89.99 + \$70.35 +

REVIEW EXERCISES

Use Figure 19.1, Flexible Advantage Calling Plan, on page 616 for Problems 31-36.

	Monthly Plan	Number of Minutes Used	Number of Lines	Federal Excise Tax Rate	Total Cost for the Month
31.	\$ 59.99	750	2	4.0%	
32.	119.99	1,376	3	3.0%	
33.	119.99	1,522	4	3.5%	
34.	89.99	955	2	5.0%	
35.	59.99	515	3	4.0%	
36.	89.99	1,050	2	3.3%	

SECTION OBJECTIVE 19-5 AND EXAMPLES

Compute the monthly cost for electricity.

Destina Land Company had a peak load of 120 kilowatts of electricity during May. The demand charge is \$5.98 per kilowatt. Destina used a total of 35,000 kilowatt hours of electricity during the month. The energy charge for the first 1,000 kilowatt hours is \$0.061 per kilowatt hour. The cost of the remaining kilowatt hours is \$0.055 per kilowatt hour. The fuel adjustment charge for May is \$0.0165 per kilowatt hour. What is the total cost of the electricity that Destina Land Company used in May?

STEP 1: Find the demand charge. $120 \text{ kW} \times \$5.98 = \$717.60 \text{ demand charge}$

Study Guide and Assessment

CHAPTER

STEP 2: Find the energy charge.

First 1,000 kilowatt hours: 1,000 kWh \times \$0.061 = \$61.00

Remaining kilowatt hours: $(35,000 - 1,000) \text{ kWh} \times \$0.055 = \$1,870$

\$61 + \$1,870 = \$1,931 energy charge

STEP 3: Find the fuel adjustment charge.

35,000 kWh \times \$0.0165 = \$577.50 fuel adjustment charge

STEP 4: Find the total cost for the month.

Demand Charge + Energy Charge + Fuel Adjustment Charge

+ \$1,931 \$577.50 = \$3,226.10 total cost for the month

REVIEW EXERCISES Complete the table.

Company	kWh Used	Peak Load (kW)	Demand Charge per kW	Energy Charge per kWh	Fuel Adjustment Charge per kWh	Total Cost for the Month
Amarillo Rentals	18,500	100	\$4.50	\$0.090	\$0.020	
Battle, Inc.	16,000	110	5.85	0.110		
Northwest Insurance	21,000	85	6.10		0.008	
Hair Styles, Inc.	15,000		The William Street	0.070	0.015	
Max's Restaurant		90	5.78	0.080	0.010	
and the second for made and a second second	30,000	150	4.96	0.095	0.030	
Harry's Boots	17,250	110	5.05	0.081	0.035	

SECTION OBJECTIVE 19-6 AND EXAMPLES

Calculate the total cost of professional services.

Appleton Elementary School hired Michele Gaglione, a consultant, to conduct a reading workshop for its 25 teachers. Gaglione was paid \$26 per teacher. What was the total cost of Gaglione's services?

STEP: Find the sum of the consultant's fees. $$26 \times 25 = 650 consultant's fee

REVIEW EXERCISES

Find the total fee.

Professional Service	Fee Structure	Project Information	Total Fee
Research Consultant Private Investigator Engineering Services Landscape Design Sales Consultant Image Consultant	\$125 per hour \$35 per hour \$75 per hour \$3,000 flat fee 6.5% of sales contract \$125 per hour	Worked 15 hours Worked 35 hours Worked 12.5 hours Not applicable Sales Contract—\$490,000	