

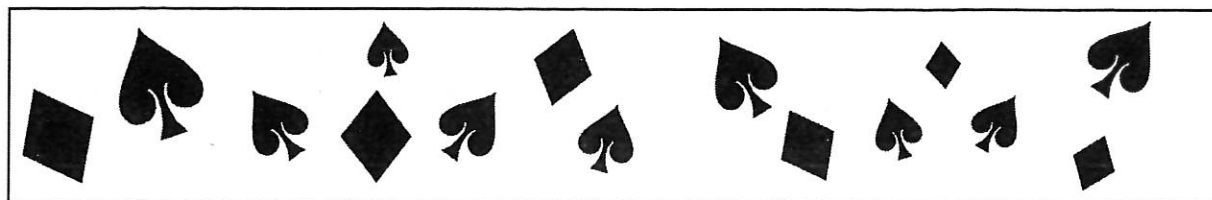
LESSON
7-1

Practice B
Ratios and Rates

Use the table to write each ratio.

1. lions to elephants _____
2. giraffes to otters _____
3. lions to seals _____
4. seals to elephants _____
5. elephants to lions _____
6. Write three equivalent ratios to compare the number of diamonds with the number of spades in the box.

Animals in the Zoo	
Elephants	12
Giraffes	8
Lions	9
Seals	10
Otters	16



Use the table to write each ratio as a fraction.

7. Titans wins to Titans losses _____
8. Orioles losses to Orioles wins _____
9. Titans losses to Orioles losses _____
10. Orioles wins to Titans wins _____
11. A 6-ounce bag of raisins costs \$2.46. An 8-ounce bag of raisins costs \$3.20. Which is the better deal?

12. Barry earns \$36.00 for 6 hours of yard work. Henry earns \$24.00 for 3 hours of yard work. Who has the better hourly rate of pay?

Baseball Team Stats		
	Titans	Orioles
Wins	12	9
Losses	14	15

LESSON
7-1

Problem Solving

Ratios and Rates

Use the table to answer each question.

Atomic Particles of Elements

Element	Protons	Neutrons	Electrons
Gold	79	118	79
Iron	26	30	26
Neon	10	10	10
Platinum	78	117	78
Silver	47	61	47
Tin	50	69	50

- | | |
|---|--|
| <p>1. What is the ratio of gold protons to silver protons?</p> <p>_____</p> | <p>2. What is the ratio of gold neutrons to platinum protons?</p> <p>_____</p> |
| <p>3. What are two equivalent ratios of neon protons to tin protons?</p> <p>_____</p> | <p>4. What are two equivalent ratios of iron protons to iron neutrons?</p> <p>_____</p> <p>_____</p> |

Circle the letter of the correct answer.

- | | |
|---|---|
| <p>5. A ratio of one element's neutrons to another element's electrons is equivalent to 3 to 5. What are those two elements?</p> <p>A iron neutrons to tin electrons</p> <p>B gold neutrons to tin electrons</p> <p>C tin neutrons to gold electrons</p> <p>D neon neutrons to iron electrons</p> | <p>6. The ratio of two elements' protons is equivalent to 3 to 1. What are those two elements?</p> <p>F gold to tin</p> <p>G neon to tin</p> <p>H platinum to iron</p> <p>J silver to gold</p> |
| <p>7. Which element in the table has a ratio of 1 to 1, no matter what parts you are comparing in the ratio?</p> <p>A iron C tin</p> <p>B neon D silver</p> | <p>8. If the ratio for any element is 1:1, which two parts is the ratio comparing?</p> <p>F protons to neutrons</p> <p>G electrons to neutrons</p> <p>H protons to electrons</p> <p>J neutrons to electrons</p> |

LESSON
7-2

Practice B

Using Tables to Explore Equivalent Ratios and Rates

Use a table to find three equivalent ratios.

1. 4 to 7

2. $\frac{10}{3}$

3. 2:5

4. 8 to 9

5. 3 to 15

6. $\frac{30}{90}$

7. 1:3

8. $\frac{7}{2}$

9. Britney does sit-ups every day. The table shows how long it takes her to do different numbers of sit-ups.

Number of Sit-Ups	10	30	50	200	220
Time (min)	2	6	10	40	44

How long do you predict it will take Britney to do 120 sit-ups?

10. The School Supply Store has markers on sale. The table shows some sale prices.

Number of Markers	12	8	6	4	2
Cost (\$)	9.00	6.00	4.50	3.00	1.50

How much do you predict you would pay for 10 markers?

LESSON

7-2

Problem Solving**Using Tables to Explore Equivalent Ratios and Rates**

Use the table to answer the questions.

School Outing Student-to-Parent Ratios

Number of Students	8	16	24	32	40	48	56	64	72
Number of Parents	2	4	6	8	10	12	14	16	18

- Each time some students go on a school outing, their teachers invite students' parents to accompany them. Predict how many parents will accompany 88 students.

- Next week 112 students will go to the Science Museum. Their teachers invited some of the students' parents to go with them. How many parents do you predict will go with the students to the Science Museum?

Circle the letter of the correct answer.

- Tanya's class of 28 students will be going to the Nature Center. How many parents do you predict Tanya's teacher will invite to accompany them?
A 5 parents
B 7 parents
C 9 parents
D 11 parents
- Some students will be going on an outing to the local police station. Their teachers invited 13 parents to accompany them. How many students do you predict will be going on the outing?
F 49 students
G 50 students
H 51 students
J 52 students
- In June, all of the students in the school will be going on their annual picnic. If there are 416 students in the school, what do you predict the number of parents accompanying them on the picnic will be?
A 52 parents
B 78 parents
C 104 parents
D 156 parents
- On Tuesday, all of the sixth-grade students will be going to the Space Museum. Their teachers invited 21 parents to accompany them. How many sixth graders do you predict will be going to the Space Museum?
F 80 sixth graders
G 82 sixth graders
H 84 sixth graders
J 86 sixth graders