Table of Contents

Introduction

Applying Problem-Solving Strategies 5–6 contains dozens of ready-to-use activity pages to provide students with skill practice. The fun activities can be used to supplement and enhance what you are already teaching in your classroom. Give an activity page to students as independent class work, or send the pages home as homework to reinforce skills taught in class. An answer key is provided at the end of the book for quick reference.

This book provides activities that will directly assist students in practicing strategies needed to solve word problems. The activities are grouped in three-page sets that cover each problem-solving strategy. The first activity page of each set includes the subhead "Show Me the Way" because it demonstrates step-by-step for the student how to use the strategy. The remaining pages offer students a chance to practice using the strategy to solve similar problems. Please note that the problems in each section could be solved using multiple strategies.

Use these ready-to-go activities to "recharge" skill review and give students the power to succeed!
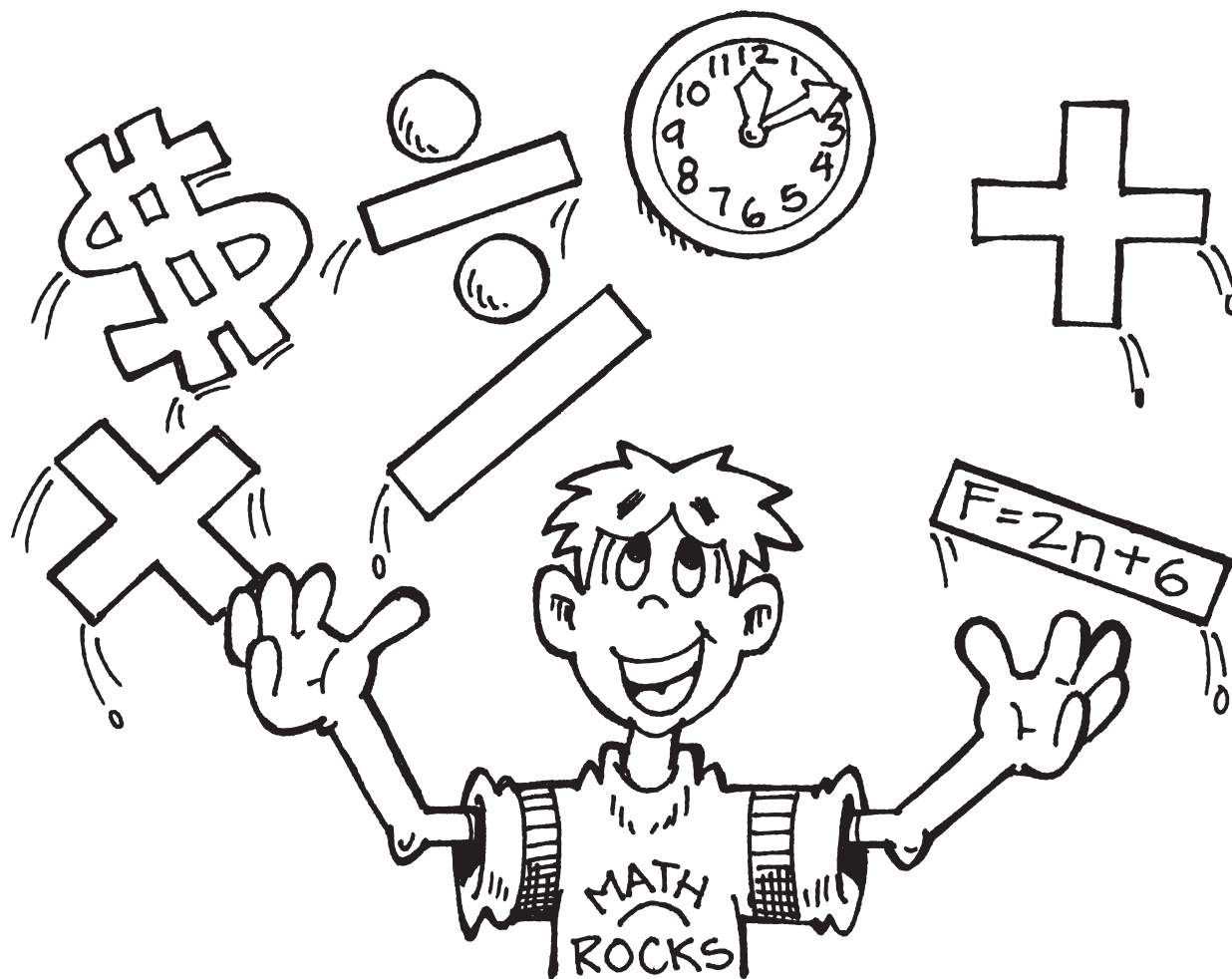
Page Puzzle

Show Me the Way to Work Backwards

Mrs. Ballard told her students she had a puzzle for them to solve. She told them that she was thinking about two pages in their science book whose page numbers add up to 49. The pages were facing each other in the book.
Which pages was Mrs. Ballard talking about? _____

Strategic Steps

1 If the pages face each other, what does that tell you about the page numbers? If you are not sure, open any book and see the page numbers.

2 Since you know the sum of the two numbers, working backwards will help solve this problem. Subtract 1 from 49 to make the number even for Step 3.

49 – 1 = _____

3 Take the answer from Step 2 and divide it by 2.

_____ ÷ 2 = _____

4 The answer is the left-facing page number. Add this to the page number that would come next and see if they equal 49.

_____ + _____ = 49

On Time

A Melissa wants to go to a movie that starts at 7:25 p.m. Before the movie, she has to clear the table and load the dishwasher, which takes 13 minutes; do her math homework for a quarter of an hour; and do her nightly reading, which will take her three times as long as her math homework. It should take her 12 minutes to get to the theater and find a seat. What time does she have to start her chores and homework to be in her seat 5 minutes before the movie starts?
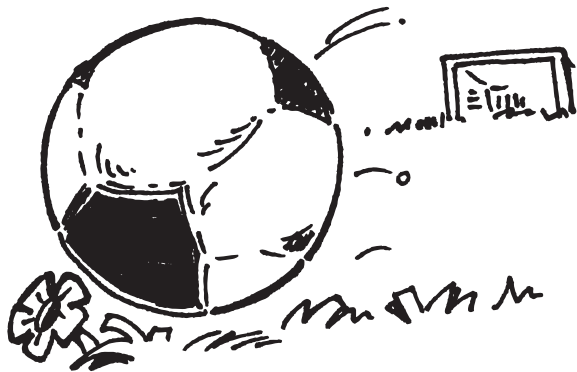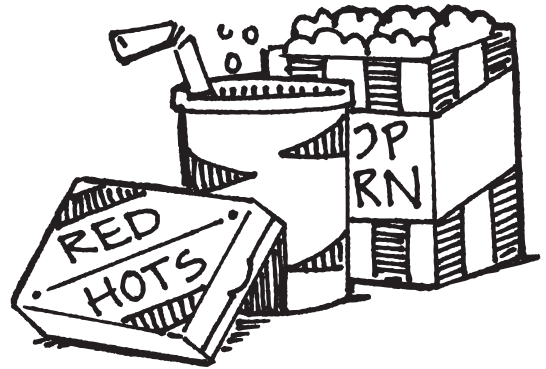
B Saturday morning, Eden has a soccer game that starts at 8:30 a.m. It takes her a third of an hour to get ready, 4 minutes to make her bed, 13 minutes to eat breakfast, and 18 minutes to ride her bicycle to the soccer field. If she has to be to the field 25 minutes before the game starts, what time does she have to get up?

C Hunter had several chores to do before he could go swimming with his friend at 11:20 a.m. Unloading the dishwasher and putting away the dishes takes 12 minutes. Cleaning his room takes twice as long. Then he needs 20 minutes to pick up the sticks in the front yard so his dad can mow the lawn. It takes 34 minutes to walk to his friend's house, but instead he's going to save 20 minutes by riding his bike. What time does Hunter need to start his chores?
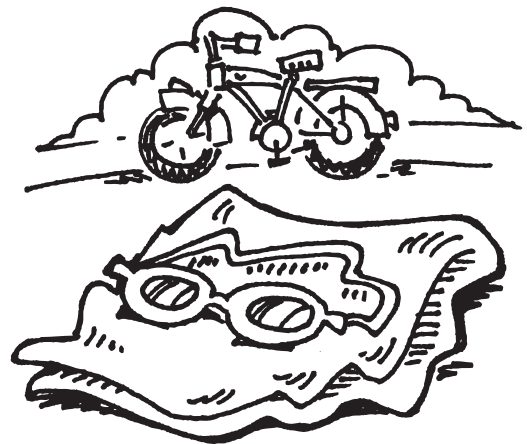
Going Backwards
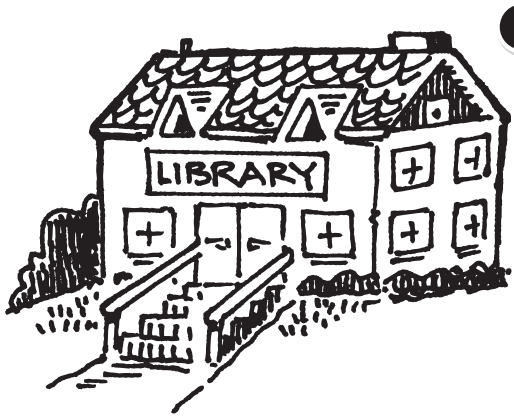
A Janessa rode her bicycle from school to the library, from the library to the park, and then home. She rode a total of 9.7 miles, and it is 3.3 miles from the library to the park and 2.6 miles from the park to her house. The next day she took the same route but did not stop at the library. How far is it from the school to the park?

B Jase made brownie bites to share with his friends. He saved three to give to his brother, and passed around the rest of the brownie bites. Jim took a half dozen, Brynn took a third as many brownie bites as Jim, Rissa took two and a half times more than Brynn, and there were three brownie bites left for Jase. How many brownie bites did Jase make?

C Kim had a lot of party favors left over from her party. She gave Bree half of them. Bree gave Surri half of hers. Surri gave two to each of her three sisters and kept the remaining four for herself. How many party favors did Kim have before she gave some to Bree?

D Mr. Butler had a puzzle for his class to solve. He asked the students to turn to the facing pages in their textbook that add up to 629. What pages are those?

Name _____ Date _____

Ping-Pong Tournament

Show Me the Way to Solve a Simpler Problem

There are 8 players in a Ping-Pong tournament. Each of these players must play each other. How many games will be played? _____

Strategic Steps

1 For this problem, break it into several easier steps. Assign each of the 8 players a letter to make it easier, such as A, B, C, D, E, F, G, and H. Start with player A and pair that player with the seven other players.

Player **A**: A vs. _____ A vs. _____ A vs. _____ A vs. _____ A vs. _____

A vs. _____ A vs. _____

2 Move on to each player and continue listing all the new games each player will play. Remember not to list the same game twice. For example, A vs. B and B vs. A is the same game and should not be repeated.

Player **B**: B vs. _____ B vs. _____ B vs. _____ B vs. _____ B vs. _____ B vs. _____

Player **C**: C vs. _____ C vs. _____ C vs. _____ C vs. _____ C vs. _____

Player **D**: D vs. _____ D vs. _____ D vs. _____ D vs. _____

Player **E**: E vs. _____ E vs. _____ E vs. _____

Player **F**: F vs. _____ F vs. _____

Player **G**: G vs. _____

Player **H**: no new games
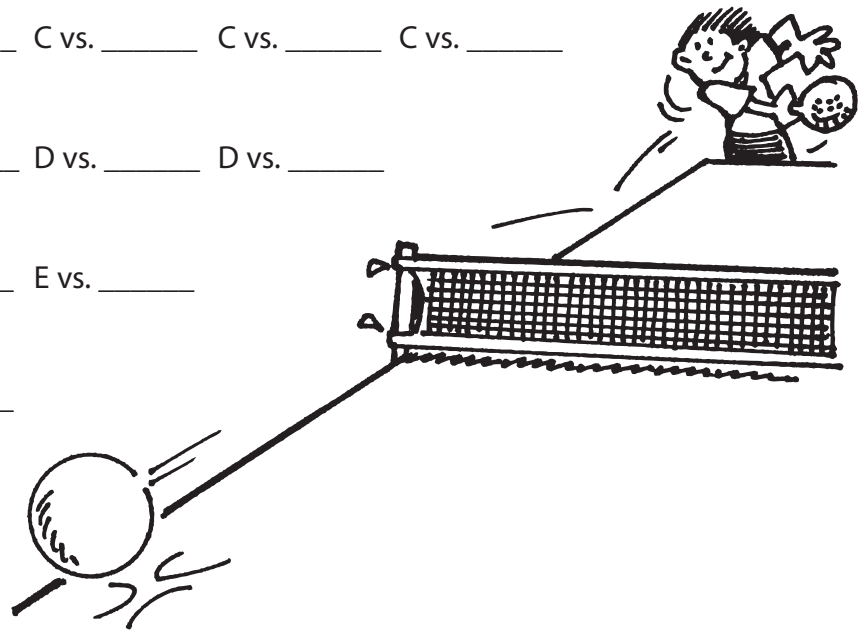
3 Once you have finished, count the number of games to get the total played during the tournament.

Name _____ Date _____

Ice Cream!

After their soccer tournament, some teams went to an ice cream stand. The flavors were strawberry cheesecake, mango, cherry, mixed berry, coconut, hazelnut chocolate, pistachio, mint chip, chocolate, and peanut butter. The stand had a special in which you could get two scoops for the price of one. Each kid got the special with two different flavors. Between all of them, every combination was chosen and nobody had the same combination. Find all the different combinations of flavors to find the number of kids.

How many kids were there? _____

Strawberry
cheesecake:_____

Mango:_____

Cherry:_____

Mixed berry:_____

Coconut:_____

Hazelnut
chocolate:_____

Pistachio:_____

Mint chip:_____

Chocolate:_____

Peanut butter:_____

Game Time

Mrs. Miller's class has an ongoing checkers tournament three times a week after school. There will be 14 students playing in the tournament. Each of these students will be paired with the others to play a game. The games will continue until every student has played each of the other 13 students. How many games will be played in the tournament?

_____

Player **A**: _____

Player **B**: _____

Player **C**: _____

Player **D**: _____

Player **E**: _____

Player **F**: _____

Player **G**: _____   Player **H**: _____

Player **I**: _____   Player **J**: _____

Player **K**: _____   Player **L**: _____

Player **M**: _____   Player **N**: _____
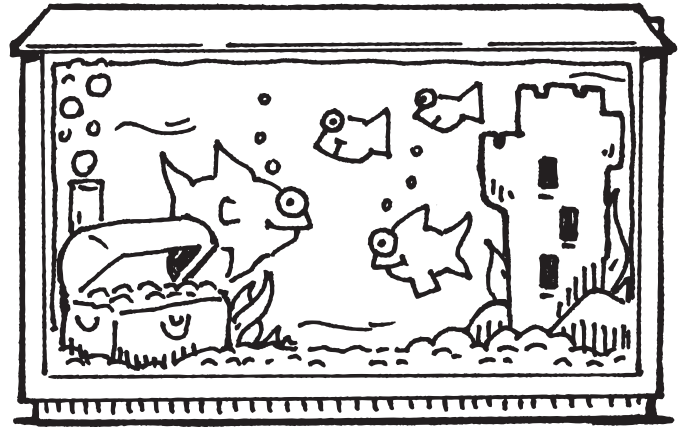
Name _____ Date _____

Aurarium
SHOW ME THE WAY TO SOLVE MULTIPLE-STEP PROBLEMS

Max and Jenna are helping find the things they need for the new 90-gallon aquarium that will be in their school.

A The aquarium needs one pound of gravel for each gallon of water. If the gravel is sold in 5-pound bags and there are 4 bags to a case, how many cases of gravel do they need to buy?

_____

Strategic Steps

1. To find out how many pounds of gravel there are in a case, multiply the weight of each bag by how many bags are in a case.   5 pounds per bag × 4 bags per case = _____ pounds per case

2. Find out how many cases are needed by dividing the total pounds of gravel needed by the number of pounds in a case. If the quotient has a remainder, an extra case must be purchased.   90 pounds ÷ _____ pounds per case = _____ cases

B Max and Jenna have decided to buy 38 fish. Max picked out 9 guppies and Jenna chose twice as many mollies. They also want to buy some tetras. How many tetras can they buy? _____

Strategic Steps

1. Find out how many mollies Jenna would like to buy. She chose twice as many as Max picked out, so multiply how many guppies Max chose by 2.   9 × 2 = _____ mollies

2. Now add that number to the guppies.   _____ guppies + _____ mollies = _____ fish

3. To find out how many tetras they can buy, take the sum from Step 2 and subtract that from the total number of fish they plan to purchase.   38 – _____ = _____ tetras