- 41. **MULTIPLE REPRESENTATIONS** A baseball pitcher makes 53 pitches in the first four innings of a game and plans to pitch in the next 3 innings.
 - **a. Making a Table** Make a table that gives the total number *t* of pitches made if the pitcher makes an average of p pitches per inning in the next 3 innings. Use the following values for p: 15, 16, 17, 18, 19.
 - **b.** Writing an Inequality The baseball coach assigns a maximum of 105 pitches to the pitcher for the game. Write and solve an inequality to find the possible average numbers of pitches that the pitcher can make in each of the next three innings.
- 42. TAKS REASONING A state imposes a sales tax on items of clothing that cost more than \$175. The tax applies only to the difference of the price of the item and \$175.
 - **a. Calculate** Use the receipt shown to find the tax rate (as a percent). Explain how you got your answer.
 - **b. Apply** A shopper has \$400 to spend on a winter coat. Write and solve an inequality to find the prices *p* of coats that the shopper can afford. Assume that $p \ge 175$.



- c. Compare Another state imposes a 4% sales tax on the entire price of an item of clothing. For which prices would paying the 4% tax be cheaper than paying the tax described above? Your answer should include the following:
 - writing and solving an inequality that describes the situation
 - checking the reasonableness of your answer using one of the solutions of the inequality
- **43. CHALLENGE** Your scores in four bowling league tournaments are 157, 161, 149, and 172. After the next game, you want your average score to be at least 167. What are the possible scores that you can earn in your next tournament in order to meet your goal?

MIXED REVIEW FOR TAKS

TAKS PRACTICE at classzone.com

REVIEW

Lesson 1.3; TAKS Workbook

- 44. TAKS PRACTICE A math class consists of 6 freshmen and 25 sophomores. On a test, the freshmen had an average of x points. The sophomores had an average of y points. Which expression gives the average test score per student for the entire class? TAKS Obj. 2

- (A) $\frac{6x + 25y}{x + y}$ (B) $\frac{6x + 25y}{2}$ (C) $\frac{6x + 25y}{31}$ (D) $\frac{6x + 25y}{150}$
- **REVIEW**

Extension 13.1; TAKS Workbook

- **45.** TAKS PRACTICE Last soccer season Jason made 72% of his attempted shots on goal. In the first game of this season, Jason attempted 8 shots on goal. About how many goals did Jason make if his success rate from last season continued? TAKS Obj. 8
 - **(F)** 3
- **G** 4
- (\mathbf{H}) 6
- \bigcirc 7