

## It's Baseball Season!

*Use ratios and proportions to solve these problems.*

- 1) The average life of a baseball used in a Major League game is 3 pitches. If there are 30 pitches total in one inning, how many baseballs are used in that inning?
- 2) If the same ratio holds true for the whole game, 9 innings, how many baseballs would be used?
- 3) On an average day, there are 15 games. How many baseballs would be used in one day?
- 4) Keeping the same ratio per day, how many baseballs is that in one week? (7 days)
- 5) A baseball regular season is approximately 25 weeks long. About how many baseballs are used in one season?

**BONUS:** Major League baseball knows that some games go into extra innings. Therefore, they order 10% more from the baseball manufacturer than the total in question 5. How many more baseballs do they order?

## Answer Key

$$1) \quad \frac{1 \text{ ball}}{3 \text{ pitches}} = \frac{10 \text{ balls}}{30 \text{ pitches}}$$

$$2) \quad \frac{10 \text{ balls}}{1 \text{ inning}} = \frac{90 \text{ balls}}{9 \text{ innings}}$$

$$3) \quad \frac{90 \text{ balls}}{1 \text{ game}} = \frac{1350 \text{ balls}}{15 \text{ games}}$$

$$4) \quad \frac{1350 \text{ balls}}{1 \text{ Day}} = \frac{9450 \text{ Balls}}{7 \text{ days}}$$

$$5) \quad \frac{9450 \text{ Balls}}{1 \text{ week}} = \frac{236,250 \text{ Balls}}{25 \text{ weeks}}$$

BONUS:  $236,250 \times 0.10 = 23,625$  additional baseballs

