

Lesson 9-2 • Group 2

Reinforce Understanding

9.2 Small Group • Group 2

I can use a table and a graph to determine and analyze the relationship between two variable quantities, explain what each part stands for, and build one for a situation I have not seen before.

Worked model

A rental site charges \$7 per movie. Make a table for 1, 2, and 3 movies, then list the points to plot.

1. Independent: number of movies (x). Dependent: total cost (y).
2. Multiply each x by the rate: $1 \rightarrow 7 \cdot 2 \rightarrow 14 \cdot 3 \rightarrow 21$
3. Write each row as an ordered pair (x, y): (1, 7), (2, 14), (3, 21).
4. Plot each pair: move right along the x-axis first, then up to the y value.

Answer: Points to plot: (1, 7), (2, 14), and (3, 21). They rise in a straight path.

Practice

Complete each exercise. Show the reasoning that supports your answer.

1. Plot the ticket-cost relationship: one point for each number of tickets.

Plot and label each point on the grid.

Show your thinking

2. The ticket table and ticket graph are two representations. Which statement about them is true?

Circle the letter of the best answer. Show how you know.

- A. The graph shows a different relationship than the table
- B. Only the table can show that cost increases with tickets
- C. Only the graph is a real mathematical representation
- D. Both show the same relationship — the table with numerical values, the graph in a more visual way

Show your work

3. After 10 minutes, the Sandia Peak tram has traveled 12,000 feet. The whole ascent is 18,000 feet. How much farther must it travel to reach the top?

Circle the letter of the best answer. Show how you know.

- A. 1,200 feet
- B. 5,000 feet
- C. 6,000 feet
- D. 12,000 feet

Show your work