Park Map Math

Use a map scale to find real distances.

SS24.3.1c "Use the map scale to calculate the distance between two locations."

NAME _____ DATE _____

1 READ AND MARK

Read it twice

YOUR JOB Underline the Pine Creek Park map's scale in the passage. Circle the map lengths in the table that you will use to answer the questions.

A Day at Pine Creek Park

1. Pine Creek Park has a paper map that helps visitors plan a day outside. The map's scale says that 1 centimeter on the paper stands for 4 kilometers on the ground. A ruler measures the straight space between two places on the map. That number is not the real distance yet.

2. To find a real distance, multiply the map length by the number of kilometers in 1 centimeter. On a different map, 1 centimeter stands for 2 kilometers. A path measuring 3 centimeters on that map stands for 6 kilometers. The table gives ruler measurements from the Pine Creek Park map.

RULER MEASUREMENTS ON THE PINE CREEK PARK MAP

Places	Map length
Gate to Pond	2 centimeters
Pond to Bridge	3 centimeters
Bridge to Grove	4 centimeters
Gate to Grove	5 centimeters

3. The table lists pairs of places, not roads to follow. If a trip has two parts, find the real distance of each part and add them. A straight line between the first and last places can be shorter than a trip with stops. Keep centimeters for paper distances and kilometers for real distances.

2 ANSWER WITH EVIDENCE

Use the passage

1. How many kilometers apart are the Gate and the Pond? Show your calculation.

2. How many kilometers apart are the Pond and the Bridge? Show your calculation.

3. A ranger goes from the Bridge to the Grove and back along the same straight route. How far does the ranger go in all?

4. Compare a direct trip from the Gate to the Grove with a trip that stops at the Pond and the Bridge. Which is shorter, and by how many kilometers?

3 YOUR TURN

Your own words

Imagine a new stop called Lookout. Choose a whole-number map length greater than 5 centimeters from the Gate to Lookout, then write its real distance and show how you used the scale.

ANSWER KEY

Park Map Math

GRADE 3 · SS24.3.1c

PART 1 · READ AND MARK

Underline the Pine Creek Park map's scale in the passage. Circle the map lengths in the table that you will use to answer the questions. Accept any marking that follows this job and points at the right text.

PART 2 · ANSWERS

#	QUESTION	ANSWER
1	How many kilometers apart are the Gate and the Pond? Show your calculation.	**2 × 4 = 8 kilometers.**
2	How many kilometers apart are the Pond and the Bridge? Show your calculation.	**3 × 4 = 12 kilometers.**
3	A ranger goes from the Bridge to the Grove and back along the same straight route. How far does the ranger go in all?	**4 × 4 = 16 kilometers each way; 16 + 16 = 32 kilometers in all.**
4	Compare a direct trip from the Gate to the Grove with a trip that stops at the Pond and the Bridge. Which is shorter, and by how many kilometers?	**The direct trip is 5 × 4 = 20 kilometers. The trip with stops is (2 + 3 + 4) × 4 = 36 kilometers. The direct trip is 16 kilometers shorter.**

PART 3 · YOUR TURN (SAMPLE ANSWER)

I chose 6 centimeters from the Gate to Lookout on the map. Since 1 centimeter stands for 4 kilometers, the real distance is 6 × 4 = 24 kilometers.

Accept any whole-number map length greater than 5 centimeters for Lookout if the student multiplies it by 4 and labels the result in kilometers. For question 4, accept calculations done in centimeters first if both trip distances and the difference are correct.