People first observed eclipses long ago. They discovered from the shadow cast during a lunar eclipse that Earth is round. We divide the planet into two hemispheres, or halves of a sphere. The equator is an imaginary line around the center of Earth. It divides the two hemispheres. Place locations are between 0 and 90 degrees north or south of the equator. The equator is 0 degrees latitude and the North Pole is 90 degrees north latitude. The South Pole is 90 degrees south latitude. One degree of latitude equals about 69 miles.

North Pole, Alaska, is a small town not far from Fairbanks. It has a population of just over 2,000. The town is at 64 degrees N latitude. Many people think towns in Alaska receive a lot of snow. The part of Alaska where North Pole is located is drier. The average rainfall is only 10 inches, and they receive about 62 inches of snow per year. Anchorage and Nome both get over 10 inches more snow per year than North Pole.

The Arctic Circle is an imaginary line around Earth at 66 degrees N latitude. Above this line, the sun does not set on the longest day of the year. It does not rise on the shortest day of the year. The town of North Pole has 21 hours of daylight on the longest day of the year. It is light only about 3 hours on the shortest day of the year! On a cold winter day, there’s not much daylight to warm the air. Record temperatures in the winter have hit as low as –65°F.

North Pole, Alaska, is not exactly at the North Pole. It is also not the northernmost town in Alaska, but it is still a unique place to live.
Directions: Use page 85 to answer these questions. First, skim the paragraphs to find information that might help you solve the problem. Remember to show your thinking as you do the math!

1. About how many miles is North Pole, Alaska from the Arctic Circle?

2. About how many miles is North Pole, Alaska from the geographic North Pole?

3. Look at a map or another resource to find the latitude for your town. How many degrees south of the North Pole do you live? About how many miles is it from your town to the North Pole?

4. How far is your town from the Arctic Circle?

5. How many feet of snow does the town of North Pole receive in an average year? Does your town receive more or less snow than North Pole?

   Does your town receive more or less rainfall than North Pole?

6. On the back of this page, write what you think it would be like to live in North Pole, Alaska. Include details to support your arguments.
1. Compare North Pole, Alaska, with the geographic North Pole. How are they similar? How are they different?

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2. What did you learn about the climate of the two places? Think in terms of numbers, such as temperatures.

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3. How is the location of each place described geographically?

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