MATH IN OUR LIVES: GEOMETRIC FORMS STUDY GUIDE

VOCABULARY

Parallel Lines Lines that run side by side and will never

intersect.

Perpendicular Lines Lines that intersect at a right angle.

Right Angle An angle measuring exactly 90 degrees.

Acute Angle An angle measuring less than 90 degrees.

Obtuse Angle An angle measuring more than 90 degrees.

Polygon A closed shape made of straight line

segments.

Quadrilateral A polygon with 4 sides and 4 angles.

Radius The distance from a circle's center to its edge.

Diameter The distance across a circle, through its

center point – two times the radius.

COMPREHENSION QUESTIONS

What is the difference between a line and a line segment?

How do artists use geometry to create depth and dimension in a picture?

Name five kinds of quadrilaterals. How is each shape different from the others?

What is the sum of interior angles for all quadrilaterals?

How can a square wheel roll?

How are triangles classified? What are the names of different triangles?

What is the sum of interior angles for all triangles?

Who was Frank Lloyd Wright? How did he use geometry?

FOLLOW UP ACTIVITIES

Students can find more examples of geometry in the world around them. They can document shapes they see, and then explore how shapes are designed to do particular jobs. For example, how is geometry helpful in designing airplanes so that they stay in the air?

Students can research individual architects and explore how geometry plays a role in their designs and their constructions.