Lesson Maker Pro

Shape Attribute Lab

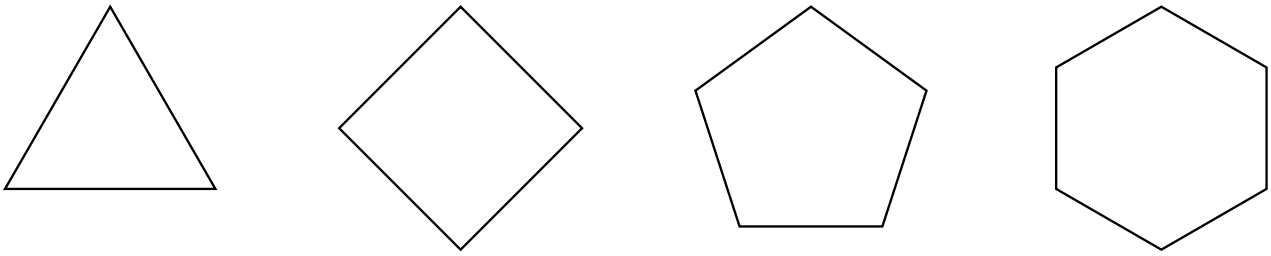
Recognize shapes, explain attributes and make your own examples.

CCSS.Math.Content.2.G.A.1 Recognize and draw shapes having specified attributes, such as a given number of angles or a given number of equal faces. Identify triangles, quadrilaterals, pentagons, hexagons, and cubes.

NAME _____ **DATE** _____

Name and count

Name each shape. Count its sides and angles.



A B C D

Shape	Name	Sides	Angles
A	_____	____	____
B	_____	____	____
C	_____	____	____
D	_____	____	____

Draw a different triangle and a different quadrilateral. Turn one so it does not sit on a flat bottom. Explain why the name stays the same.

Draw to match the clues

Draw a closed shape with five straight sides. Then draw one with six angles. Name each.

Use a real cube, such as a number cube. Trace one face. Count its equal square faces and vertices. How does the whole cube differ from the flat shape you traced?

A student says any shape with four sides must be a square. Draw a counterexample and explain.

Teacher Key

A triangle 3 sides/3 angles; B quadrilateral(square)4/4; C pentagon 5/5; D hexagon 6/6. Rotation and side length differences do not change the side/angle counts. New examples must be closed polygons with the specified counts.

Five sides=pentagon; six angles=hexagon. Cube:6 equal square faces,8 vertices; one traced face is a flat square, while the cube is a solid with multiple faces. Nonsquare rectangle or other quadrilateral disproves the four-sides-always-square claim. Supply a physical cube; a printed square alone cannot demonstrate all its faces.