# Geometry Vocabulary

**acute angle**-an angle measuring less than 90 degrees



**angle**-the turn or bend between two intersecting lines, line segments, rays, or planes



angle bisector-an angle bisector is a ray that cuts an angle exactly in half, making two equal angles



attribute- a characteristic of an object, such as color, shape, or size

**base**-a face or surface (3-D object) or a side (2-D objects) considered as the bottom part, or foundation of a geometric figure; used for the purpose of measurement



**circle**-the set of all points in a plane that are a given distance from a given point



**circumference**-the distance around the edge of a circle.

closed figure-the boundary of a simple two-dimensional region, including shapes with straight and curved sides



**cone**- threedimensional figure with a curved surface, a circular base and one apex (point)



**congruent-** geometric figures having the same size and shape; all corresponding parts of congruent figures have the same measure



## coordinate plane-the

grid system in which the x-axis and y-axis provide reference points

**cube**-a threedimensional object with 6 square faces



**cylinder-** threedimensional figure with a curved surface and two circular bases



**degree**-a unit of measure of angles; there are 360 degrees in a circle

**diagonal-** for a polygon in the plane, any line segment joining non-adjacent vertices.



**diameter**-the distance across the widest part of a circle; twice the radius; also defined as a chord that passes through the center of a circle



**dilation**- shrinking or stretching the figure



edge- a line segment at the intersection of two faces of a polyhedron



equiangular triangle- a triangle which all angles are congruent



equilateral trianglea triangle which all the sides are congruent.



**face**- a polygonal region of a three-dimensional figure



**heptagon-** a polygon with seven sides



**hexagon-** A polygon with six sides



intersecting lineslines that meet or cross



**isosceles triangle**-a triangle having two sides, called the legs, of equal length



**kite**-a quadrilateral with two pairs of adjacent sides with equal lengths.



**line-**one of the three undefined figures in geometry, a line has no thickness, is perfectly straight, and goes on forever in both directions; two points determine a unique line



**line of symmetry-**a line over which a figure can be reflected, resulting in a figure that looks exactly like the original



**line segment**-a finite portion of a line, often denoted by its end points

**net-** a blueprint, or pattern, for a three dimensional model.



**obtuse angle-**an angle measuring between 90 and 180 degrees



**octagon-** a polygon with eight sides



**one-dimensional**- a figure that has length but no width or height.

**parallel lines**- Lines that lie in the same plane and never meet. Also, planes lying in space that never meet.



**parallelogram**-a quadrilateral with both pairs of opposite sides parallel.



**pentagon-** a polygon with five sides



**perpendicular lines**lines in the same plane which intersect to form a right angle.



**plane**-one of the three undefined figures in geometry, a plane is a flat expanse, like a sheet of paper, that goes on forever

**plane figure-**any two dimensional figure

**point**-one of the three undefined figures in geometry, a point is a location with no length, width, and height.

**polygon**-a twodimensional closed figure made up of straight line segments.



**polyhedron-**a threedimensional closed figure made up of faces that are all polygons

**prism-** a threedimensional figure with parallelogram faces and two parallel, congruent bases



**pyramid-** a geometric solid with a base that is a polygon and all other faces are triangles with a common vertex



**quadrilateral-**a polygon with four sides



**radius-**the distance from the center of a circle to any point on its edge; half a diameter



**ray**-a portion of a line extending in one direction from a point



quadrilateral in which all the angles have the same measure (90 degrees)

# rectangular prism- a

three-dimensional figure with parallelogram faces and two parallel, congruent rectangular bases.



rectangular pyramid- a geometric solid with a base that is a rectangle and all other faces are triangles with a common vertex



**reflection** (flip)-a transformation which produces the mirror image of a figure (i.e., flipping a figure across a line)



regular polygon- a polygon in which all angle and all sides are congruent; examplesequilateral triangle, square, regular octagon



#### rhombus- a

quadrilateral in which all sides have the same length



**right angle-** an angle measuring 90 degrees



**rotation** (turn)- a transformation obtained by rotating a figure around a fixed point (i.e., turning a figure about a point).



**scalene-** a polygon is scalene if its sides are all different lengths



**side-** a line segment at the boundary of a polygon



**similar**-two or more figures having the same shape but not necessarily the same size



slide- see translation

**solid figure-** a closed, three dimensional figure

**sphere-**the set of all points in threedimensional space that are located at a given distance from the center



**square-** a regular quadrilateral (all sides and angles are congruent)

**symmetry**- a figure has symmetry if there exists some line or point through which all points of the figure can be reflected to generate another point on the figure



**tessellation-** covering of the plane, sometimes referred to as a tiling, referring to the way that tiles cover a floor



**three-dimensional**an object that has length, width, and height

**transformation-** a rule for moving every point in a plane figure to a new location

**translation** (slide)- a transformation that slides a figure a given distance in a given direction



**trapezoid** (inclusive) - a quadrilateral with at least one set of parallel sides.



**triangle-** a polygon with three sides



## triangular prism- a

three-dimensional figure with parallelogram faces and two parallel, congruent triangular bases



**triangular pyramid** a geometric solid with a base that is a triangle and all other faces are triangles with a common vertex



turn- see rotation

**two-dimensional**- a figure that has length and width but not height (i.e., a plane figure such as a rectangle or circle)

**vertex** (vertices)- the points where two line segments come together (corner

