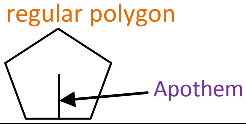
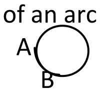
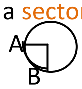
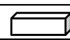
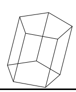
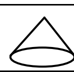
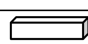
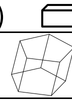
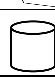
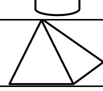
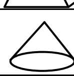
Description	Formula	Notes
Sum of all interior angles of a convex polygon	$(n-2)180°$	n = # of sides
Measure of a single interior angle of a regular polygon	$\frac{(n-2)180°}{n}$	n = # of sides
Sum all of exterior angles of a convex polygon	$360°$	
Measure of a single exterior angle of a regular polygon	$\frac{360°}{n}$	n = # of sides
Area of a triangle	$\frac{1}{2}\cdot b\cdot h$	b =base; h = height
Area of an equilateral triangle	$\frac{1}{4}\cdot\sqrt{3}\cdot s^2$	s = length of 1 side
Area of a parallelogram or rectangle	$b\cdot h$	b =base; h = height
Area of a square	s^2	s = length of 1 side
Area of a trapezoid	$\frac{1}{2}\cdot(b_1+b_2)\cdot h$	b_1 = base 1; b_2 = base 2; h = height
 Area of a kite or rhombus 	$\frac{1}{2}\cdot d_1\cdot d_2$	d_1 = diagonal 1; d_2 = diagonal 2
Area of a regular polygon 	$\frac{1}{2}\cdot a\cdot P$	a = apothem (height of a Δ) $P=n\cdot s$ n = # of sides s = length of 1 side
If the ratio of the perimeters of similar figures is written as $\frac{a}{b}$, the ratios of the areas are $\frac{a^2}{b^2}$ and volumes are $\frac{a^3}{b^3}$.	P: $\frac{a}{b}$; A: $\frac{a^2}{b^2}$; V: $\frac{a^3}{b^3}$	$\frac{a}{b}$ should be in reduced form; Set up a proportion to solve for actual perimeters, areas & volumes
Circumference of a circle	$2\pi r$ (or πd)	r = radius; d = diameter
Area of a circle	πr^2	r = radius
Arc length of an arc $\widehat{AB}$ in a circle 	$\frac{m\widehat{AB}}{360°}\cdot 2\pi r$	$m\widehat{AB}$ = degree measure of arc AB r = radius The answer is not in degrees
Area of a sector of a circle 	$\frac{m\widehat{AB}}{360°}\cdot \pi r^2$	$m\widehat{AB}$ = degree measure of arc AB r = radius The answer is not in degrees
Surface Area of a rectangular prism (box) 	Sum of face areas	Add up the areas of all 6 faces
Surface Area of other prisms 	$2\cdot B+P\cdot h$	B = AREA of the base P = PERIMETER of the base h = height of prism
Surface Area of a cylinder 	$2\cdot\pi\cdot r^2+2\cdot\pi\cdot r\cdot h$	r = radius h = height
Surface Area of a pyramid 	$B+\frac{1}{2}\cdot P\cdot l$	B = AREA of the base P = PERIMETER of the base l = slant height of prism
Surface Area of a cone 	$\pi\cdot r^2+\pi\cdot r\cdot l$	r = radius l = slant height
Surface Area of a sphere	$4\cdot\pi\cdot r^2$	r = radius
Volume of a cube	s^3	s = length of 1 side
Volume of a rectangular prism (box) 	$L\cdot W\cdot H$	L = length, W = width, H = height
Volume of other prisms 	$B\cdot h$	B = AREA of the base h = height of prism
Volume of a cylinder 	$\pi\cdot r^2\cdot h$	r = radius h = slant height
Volume of a pyramid 	$\frac{1}{3}\cdot B\cdot h$	B = AREA of the base h = height of prism
Volume of a cone 	$\frac{1}{3}\cdot\pi\cdot r^2\cdot h$	r = radius h = slant height
Volume of a sphere	$\frac{4}{3}\cdot\pi\cdot r^3$	r = radius

Perimeter, Area, Surface Area, Volume & Angle Measures of 3-D & 2-D Figures