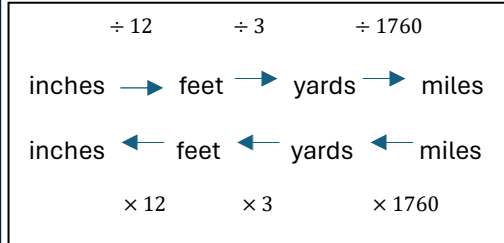
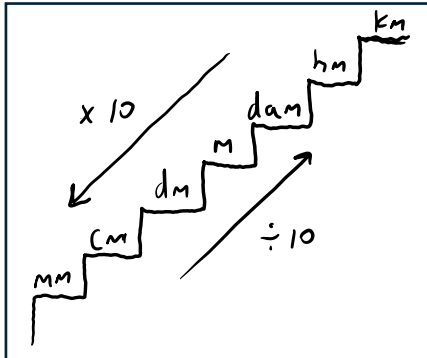


Math 10 Workplace Formula Sheet

UNIT 3








1 inch \approx 2.54 centimetres
1 foot \approx 30.48 centimetres
1 foot \approx 0.3048 metres
1 yard \approx 0.9144 metres
1 mile \approx 1.609 kilometres

	Common Imperial	Imperial and SI	SI
Length	1 mile = 1760 yards 1 mile = 5280 feet 1 yard = 3 feet 1 yard = 36 inches 1 foot = 12 inches	1 mile \approx 1.609 km 1 yard = 0.9144 m 1 foot = 30.48 cm 1 inch = 2.54 cm 1 foot = 0.3048 m	1 km = 1000 m 1 m = 100 cm 1 cm = 10 mm

Geometric Figure	Perimeter	Area
Rectangle 	$P = 2l + 2w$ or $P = 2(l + w)$	$A = lw$
Triangle 	$P = a + b + c$	$A = \frac{bh}{2}$
Circle 	$C = \pi d$ or $C = 2\pi r$	$A = \pi r^2$

Geometric Solid	Surface Area
Cylinder 	$A_{top} = \pi r^2$ $A_{base} = \pi r^2$ $A_{side} = 2\pi rh$ $SA = 2\pi r^2 + 2\pi rh$
Sphere 	$SA = 4\pi r^2$ or $SA = \pi d^2$
Cone 	$A_{side} = \pi rs$ $A_{base} = \pi r^2$ $SA = \pi r^2 + \pi rs$
Square-Based Pyramid 	$A_{triangle} = \frac{1}{2}bs$ (for each triangle) $A_{base} = b^2$ $SA = 2bs + b^2$
Rectangular Prism 	$SA = wh + wh + lw + lw + lh + lh$ or $SA = 2(wh + lw + lh)$

UNIT 4

Geometric Solid	VOLUME
Cylinder 	$V = \pi r^2 h$
Sphere 	$V = \frac{4}{3} \pi r^3$
Cone 	$V = \frac{1}{3} \pi r^2 h$
Square-Based Pyramid 	$V = \frac{1}{3} b^2 h$
Rectangular Prism 	$V = L \times W \times H$

Volume	1 gallon = 4 quarts	1.06 quarts (US) \approx 1 L
	1 gallon (UK) \approx $\frac{6}{5}$ gallons (US)	0.26 gallons (US) \approx 1 L
	32 fluid ounces = 1 quart	3.52 fluid ounces (UK) \approx 100 mL
		3.38 fluid ounces (US) \approx 100 mL

Mass (Weight)	1 ton = 2000 pounds	2.2 pounds \approx 1 kg	1 t = 1000 kg
	1 pound = 16 ounces	1 pound \approx 454 g	1 kg = 1000 g
		1 ounce \approx 28.35 g	

Temperature

$$C = \frac{5}{9}(F - 32)$$

$$F = \frac{9}{5}C + 32$$

Unit 5

Trigonometry

(Put your calculator in Degree Mode)

- Right triangles

Pythagorean Theorem

$$a^2 + b^2 = c^2$$

$$\sin A = \frac{\text{opposite}}{\text{hypotenuse}}$$

$$\cos A = \frac{\text{adjacent}}{\text{hypotenuse}}$$

$$\tan A = \frac{\text{opposite}}{\text{adjacent}}$$

