

1. 50000 nL = _____ L
2. 0.0000015 km = _____ μm
3. 400 Mg = _____ Gg
4. 500 mV = _____ μV
5. 40 yards = _____ in (1 yard = 3 feet)
6. 30 m = _____ yards (1 inch = 2.54 cm)
7. 5 cm/s = _____ m/s
8. 777 m/s = _____ km/h
9. 50 km/h = _____ cm/min
10. 88 $\mu\text{m}/\text{h}$ = _____ feet/week

1. $50000 \text{ nL} = \underline{0.00005} \text{ L} = 5 \times 10^{-5} \text{ L}$
2. $0.0000015 \text{ km} = \underline{1500} \text{ } \mu\text{m}$
3. $400 \text{ Mg} = \underline{0.4} \text{ Gg}$
4. $500 \text{ mV} = \underline{500\ 000} \text{ } \mu\text{V} = 5 \times 10^5 \text{ } \mu\text{V}$
5. $40 \text{ yards} = \underline{1440} \text{ in}$ (1 yard = 3 feet)
6. $30 \text{ m} = \underline{32.8} \text{ yards}$ (1 inch = 2.54 cm)
7. $5 \text{ cm/s} = \underline{0.05} \text{ m/s}$
8. $777 \text{ m/s} = \underline{2797.2} \text{ km/h}$
9. $50 \text{ km/h} = \underline{83\ 333} \text{ cm/min}$
10. $88 \text{ } \mu\text{m/h} = \underline{0.0485} \text{ feet/week}$

$$1. 50000 \cancel{\mu\text{L}} \times \frac{10^{-9} \text{ L}}{1 \cancel{\mu\text{L}}} = 0.00005 \text{ L} = 5 \times 10^{-5} \text{ L}$$

$$2. 0.0000015 \cancel{\text{km}} \times \frac{10^9 \text{ mm}}{1 \cancel{\text{km}}} = 1500 \text{ mm}$$

$$3. 400 \cancel{\text{Mg}} \times \frac{1 \text{ Gg}}{10^3 \cancel{\text{Mg}}} = 0.4 \text{ Gg}$$

$$4. 500 \cancel{\text{mV}} \times \frac{10^3 \text{ } \mu\text{V}}{1 \cancel{\text{mV}}} = 500000 \text{ } \mu\text{V} = 5 \times 10^5 \text{ } \mu\text{V}$$

$$5. 40 \cancel{\text{yards}} \times \frac{3 \cancel{\text{ft}}}{1 \cancel{\text{yard}}} \times \frac{12 \text{ in}}{1 \cancel{\text{ft}}} = 1440 \text{ in}$$

$$6. 30 \cancel{\text{m}} \times \frac{100 \cancel{\text{cm}}}{1 \cancel{\text{m}}} \times \frac{1 \cancel{\text{in}}}{2.54 \cancel{\text{cm}}} \times \frac{1 \cancel{\text{ft}}}{12 \cancel{\text{in}}} \times \frac{1 \text{ yard}}{3 \cancel{\text{ft}}} = 32.8 \text{ yards}$$

$$7. \frac{5 \cancel{\text{cm}}}{\text{s}} \times \frac{1 \text{ m}}{100 \cancel{\text{cm}}} = 0.05 \frac{\text{m}}{\text{s}}$$

$$8. \frac{777 \cancel{\text{m}}}{\cancel{\text{s}}} \times \frac{1 \text{ km}}{1000 \cancel{\text{m}}} \times \frac{60 \cancel{\text{s}}}{1 \cancel{\text{min}}} \times \frac{60 \cancel{\text{min}}}{1 \text{ h}} = 2797.2 \frac{\text{km}}{\text{h}}$$

$$9. \frac{50 \cancel{\text{km}}}{\cancel{\text{h}}} \times \frac{10^5 \text{ cm}}{1 \cancel{\text{km}}} \times \frac{1 \cancel{\text{h}}}{60 \text{ min}} = 83333 \frac{\text{cm}}{\text{min}}$$

$$10. \frac{88 \cancel{\text{mm}}}{\cancel{\text{h}}} \times \frac{1 \cancel{\text{cm}}}{10^4 \cancel{\text{mm}}} \times \frac{1 \cancel{\text{in}}}{2.54 \cancel{\text{cm}}} \times \frac{1 \text{ ft}}{12 \cancel{\text{in}}} \times \frac{24 \cancel{\text{h}}}{1 \cancel{\text{day}}} \times \frac{7 \text{ days}}{1 \text{ week}} = 0.0485 \frac{\text{ft}}{\text{week}}$$