

3 Solutions, concentration, and separation – Part 2 — Answers

Answers

Work through these after you have tried the questions yourself.

2.1 $M = \frac{0.20}{0.50} = 0.40 \text{ M}.$

2.2 $V_2 = \frac{M_1 V_1}{M_2} = \frac{3.0 \times 100}{1.0} = 300 \text{ mL}.$

2.3 (a) filtration; (b) distillation.

2.4 oil is non-polar and water is polar; “like dissolves like”, so the two do not mix and the oil stays separate.

2.5 the number of moles of solute (only the volume and concentration change).