

# ACIDS PRACTICE

In each of the following cases work out the pH of the solution.

- 1 A  $0.0100 \text{ mol dm}^{-3}$  solution of HA ( $\text{pK}_a=4$ )
- 2 A  $1.00 \times 10^{-3} \text{ mol dm}^{-3}$  solution of HCl.
- 3 A  $0.100 \text{ mol dm}^{-3}$  solution of the weak base, B, which has  $\text{pK}_b=7$ .
- 4 A  $0.0100 \text{ mol dm}^{-3}$  solution of ethanoic acid ( $\text{pK}_a=4.76$ )
- 5 A  $1.00 \times 10^{-4} \text{ mol dm}^{-3}$  solution of NaOH
- 6 A  $1.00 \times 10^{-3} \text{ mol dm}^{-3}$  solution of weak base, B, which has  $\text{pK}_b=5.40$
- 7 A  $0.100 \text{ mol dm}^{-3}$  solution of ammonia ( $\text{pK}_b=4.75$ )
- 8 A  $0.0100 \text{ mol dm}^{-3}$  solution of HA ( $\text{K}_a=1.00 \times 10^{-4}$ )

**DO NOT USE A  
CALCULATOR**