Solutions

Each answer shows the steps, then the **result**.

2.1

- $\tau = RC = 2000 \times 50 \times 10^{-6} = 0.10$ s

2.2

- zero (the capacitor is fully charged)

2.3

- it slows down (a larger $\tau = RC$)

3.1 B

3.2 B

3.3

(a)

- $\tau = RC = (10 \times 10^{3})(100 \times 10^{-6}) = 1.0$ s

(b)

- 9.0 V (the supply voltage)