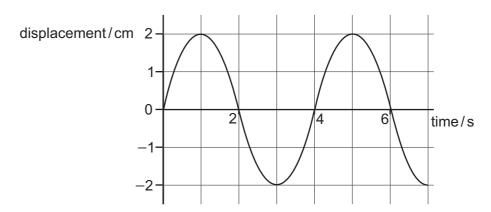
- Which electromagnetic wave would cause the most significant diffraction effect for an atomic lattice of spacing around 10^{-10} m?
 - A infra-red
 - **B** microwave
 - **C** ultraviolet
 - **D** X-ray
- 27 The graph shows how the displacement of a particle in a wave varies with time.



Which statement is correct?

- A The wave has an amplitude of 2 cm and could be either transverse or longitudinal.
- **B** The wave has an amplitude of 2 cm and must be transverse.
- **C** The wave has an amplitude of 4 cm and could be either transverse or longitudinal.
- **D** The wave has an amplitude of 4 cm and must be transverse.

Space for working