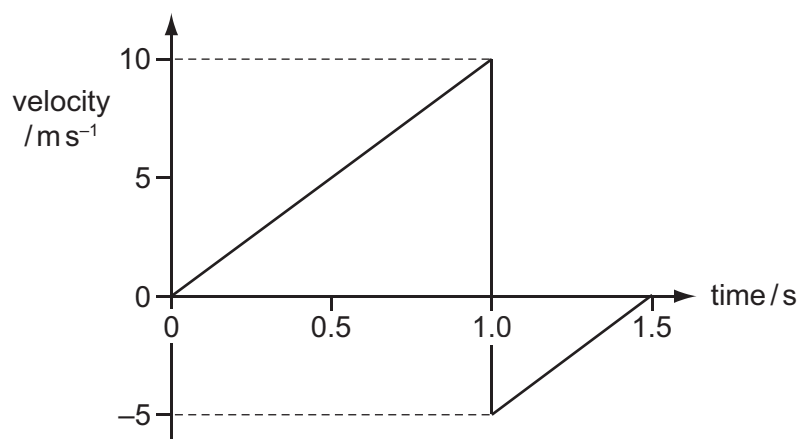


- 8 A ball is released from rest at time zero. After 1.0 s it bounces inelastically from a horizontal surface and rebounds, reaching the top of its first bounce after 1.5 s.



What is the total displacement of the ball from its original position after 1.5 s?

- A** 1.25 m **B** 3.75 m **C** 5.00 m **D** 6.25 m
- 9 A molecule of mass m travelling horizontally with velocity u hits a vertical wall at right-angles to its velocity. It then rebounds horizontally with the same speed.

What is its change in momentum?

- A** zero **B** mu **C** $-mu$ **D** $-2mu$

Space for working