

6 A ball is thrown horizontally with a speed of 10.0 ms^{-1} above horizontal ground. The ball hits the ground after a time of 3.0 s.

Air resistance is negligible.

What is the speed of the ball just before it hits the ground?

A 10 ms^{-1}

B 29 ms^{-1}

C 31 ms^{-1}

D 39 ms^{-1}