

- 7** A rock of mass 0.80 kg is projected horizontally with a speed of 1.2 m s^{-1} from the top of a hill. The rock falls through a vertical distance of 10 m before hitting the ground with a speed of 4.0 m s^{-1} .

What is the energy lost by the rock to the surroundings during its fall?

- A** 5.7 J **B** 39 J **C** 73 J **D** 79 J