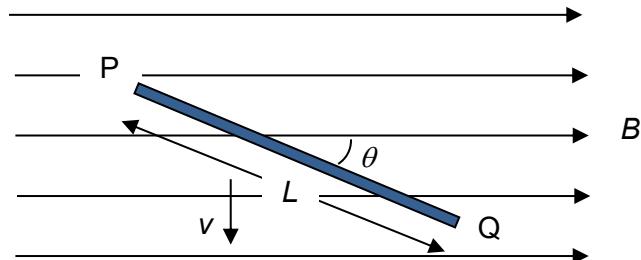


- 21** A thin metallic rod PQ with length L is released in a uniform and horizontal magnetic field B . It is accelerating vertically downwards with a velocity v . Its length is at an angle of θ to the horizontal as shown. Its velocity, its length and the magnetic field are all in the same plane.



side view

What is the magnitude of the induced e.m.f. between the ends of this rod?

A 0

B BLv

C $BLvcos\theta$

D $BLvsin\theta$