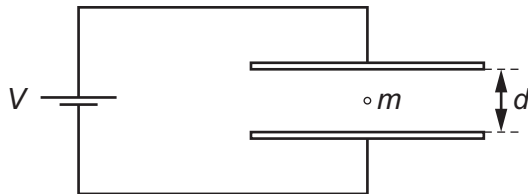


- 30** A charged oil drop of mass m , with n excess electrons, is held stationary in the uniform electric field between two horizontal plates separated by a distance d .



The voltage between the plates is V , the elementary charge is e and the acceleration of free fall is g .

What is the value of n ?

- A** $\frac{eV}{mgd}$ **B** $\frac{mgd}{eV}$ **C** $\frac{meV}{gd}$ **D** $\frac{gd}{meV}$