



Faraday's Law of Induction:

“induced EMF” = rate of change of magnetic flux

$$\varepsilon = -\frac{\Delta\Phi}{\Delta t} = -\frac{\Phi_f - \Phi_i}{t_f - t_i}$$

Since $\Phi = B A \cos(\phi)$, 3 things can change Φ

1. Area of loop
2. Magnetic field B
3. Angle ϕ between normal and B