

Ohm's Law - Notes 6

$$\text{Voltage} = \frac{\text{PE}}{\text{\# of charges}}$$

[potential difference]

What	Unit	Symbol
Voltage	volt (v)	V
Current	ampere (A)	I
Resistance	ohm (Ω)	R

Ohm's Law

$$\boxed{V = IR} \text{ or } \frac{V}{R} = I$$

$$\text{or } \frac{V}{I} = R$$

Example: Current in circuit = 1.5A
Potential difference = 12V

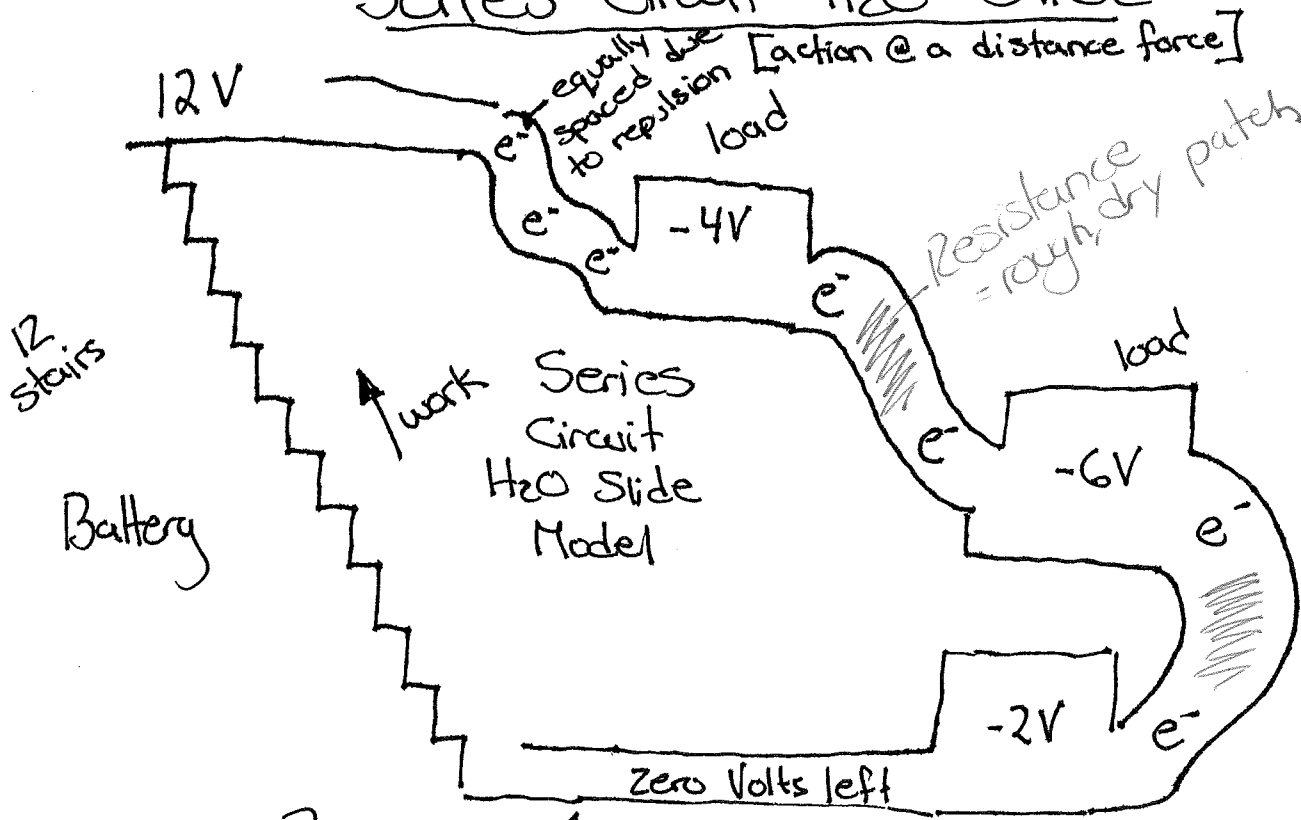
What is the Resistance

$$R = \frac{V}{I} = \frac{12V}{1.5A} = 8 \Omega$$

~~from~~

Series Circuit H₂O Slide

* Series *
only 1 path for e⁻ to flow



Resistance in Series \downarrow current
Current is constant in Series
Voltage \downarrow over the course of the circuit,
as it is transformed by each load.