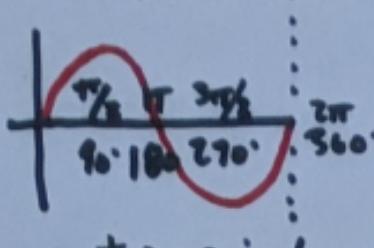


ALTERNATING CURRENT



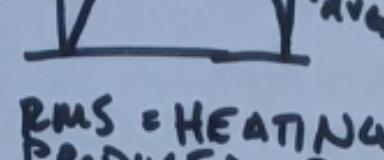
$T = \text{period}$

$$V_{\text{AVG}} = .637 \cdot V_p$$

$$I_{\text{AVG}} = .637 \cdot I$$

$$V_{\text{RMS}} = .707 \cdot V_p$$

$$I_{\text{RMS}} = .707 \cdot I$$

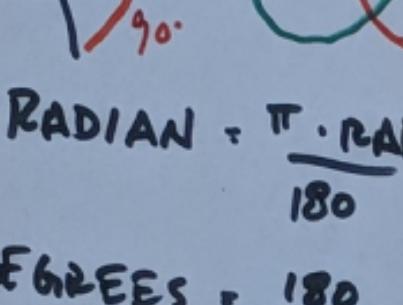


RMS = HEATING PRODUCED EQUIV. TO DC CIRCUIT

FREQUENCY

$$F = \frac{1}{T} \quad + = \frac{1}{F}$$

PHASE → ANGLE



$$\text{RADIAN} = \frac{\pi \cdot \text{RAD}}{180} \cdot \text{DEG}$$

$$\text{DEGREES} = \frac{180}{\pi \cdot \text{RAD} \cdot \text{RAD}}$$

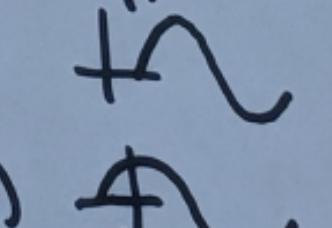
$$Y = A \sin \theta$$

$$V = V_p \sin \theta$$

$$i = I \sin \theta$$

$$\text{LAG} = \phi$$

$$Y = A \sin(\theta - \phi)$$



OHM'S LAW

$$V = IR \quad R_T = R_1 + R_2 + R_3 + \dots + R_N$$

$$\sqrt{s}(\text{RMS}) = I_{\text{RMS}} \cdot R_T$$

KIRCHHOFF'S LAW

$$\underline{V_{\text{RMS}}} = V_{1 \text{ RMS}} - V_{2 \text{ RMS}}$$

SUPERPOSITION

$$V_{\text{DC}} + V_{\text{AC}}$$

