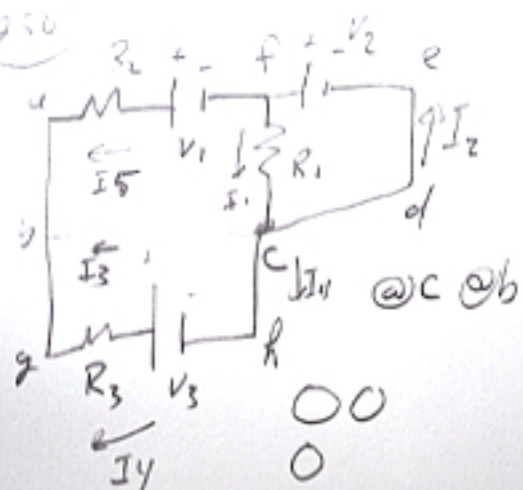


250



$$(abcfa) + I_1 R_1 + V_1 - I_5 R_2 = 0$$

$$(cdefc) + V_2 - I_1 R_1 = 0$$

$$(ghcbg) + I_4 R_3 - V_3 = 0$$

$$\textcircled{c}: I_1 - I_2 - I_4 - I_3 = 0$$

$$\textcircled{b}: I_5 + I_3 + I_4 = 0$$

$$(abcfa) + I_1 R_1 + V_1 - I_5 R_2 = 0$$

$$(cdefc) + V_2 - I_1 R_1 = 0$$

$$(ghcbg) + I_4 R_3 - V_3 = 0$$

$$\textcircled{c}: I_1 - I_2 - I_4 - I_3 = 0$$

$$\textcircled{b}: I_5 + I_3 + I_4 = 0$$

$$P = I_1^2 R_1 + I_5^2 R_2 + I_4^2 R_3$$

$$I_1 = 20A, I_2 = 32.5A$$

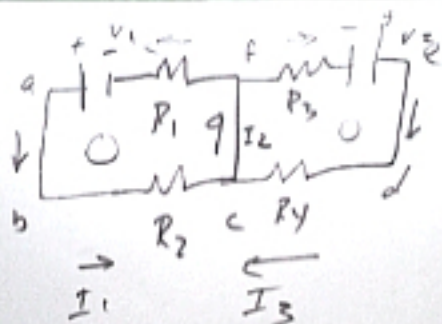
$$I_5 = 12.5 \quad I_4 = 8.3$$

$$P = (20)^2 \cdot 1 + (12.5)^2 \cdot 2 + (8.3)^2 \cdot 3$$

$$w \quad P = I^2 R$$

$$I_3 = (-)12.5/6$$

$$I \rightarrow I_3$$



$$(abcfa): -I_1 R_2 - I_1 R_1 + V_1 = 0$$

$$* (edcfe): -V_2 + I_3 R_3 + I_3 R_4 = 0$$

$$@c: I_1 - I_2 + I_3 = 0$$

$$I_1 = \frac{V_1}{R_1 + R_2} \quad I_3 = \frac{V_2}{R_3 + R_4}$$

