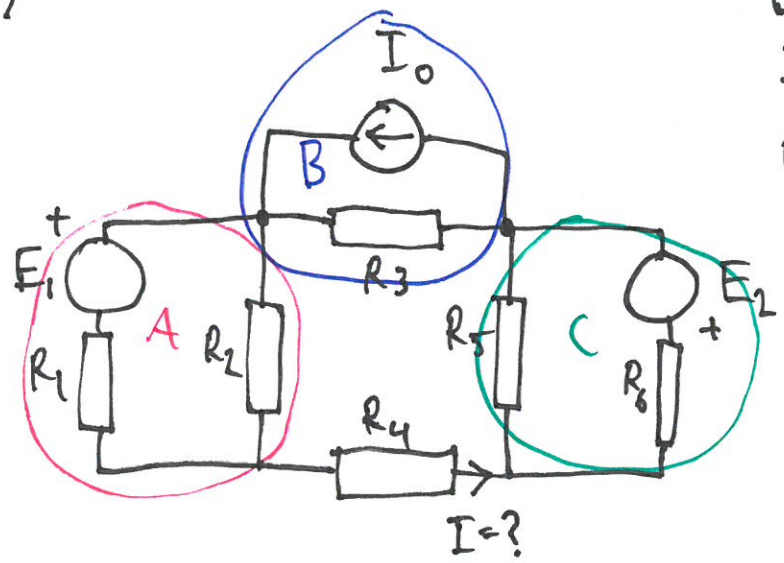
1-25)



$E_1 = 6\ V \quad E_2 = 12\ V$

$I_0 = 1\ A$

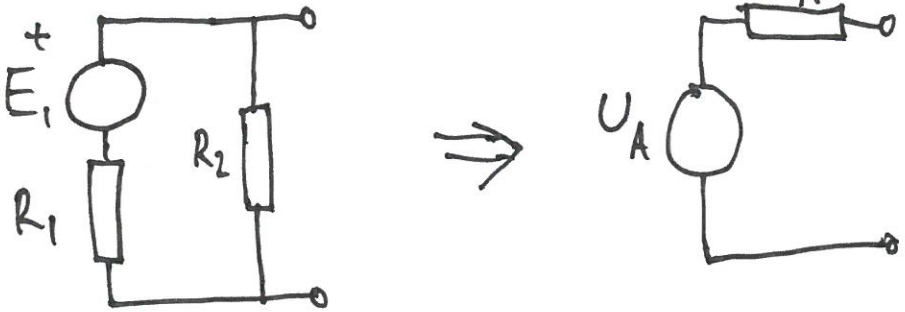
$R_1 = 6\ \Omega, R_2 = 12\ \Omega$

$R_3 = 10\ \Omega, R_4 = 2\ \Omega$

$R_5 = 8\ \Omega, R_6 = 8\ \Omega$

Ersätt A, B och C med deras thévenin ekv:

A:



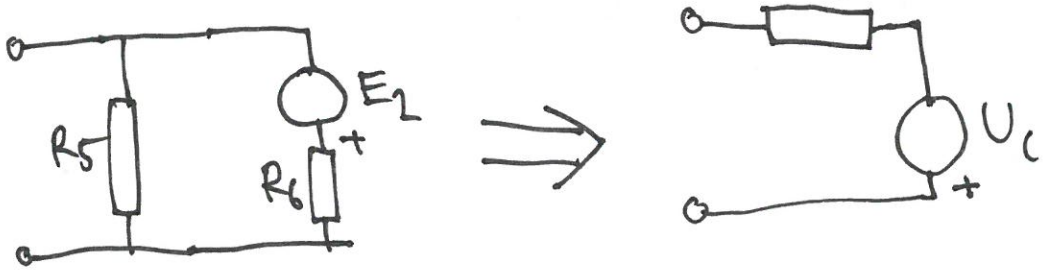
$$U_A = \frac{R_2 \cdot E_1}{R_1 + R_2} = \frac{12 \cdot 6}{6 + 12} = 4\ V \qquad R_A = \frac{R_1 \cdot R_2}{R_1 + R_2} = \frac{12 \cdot 6}{6+12} = 4\ \Omega$$

B:

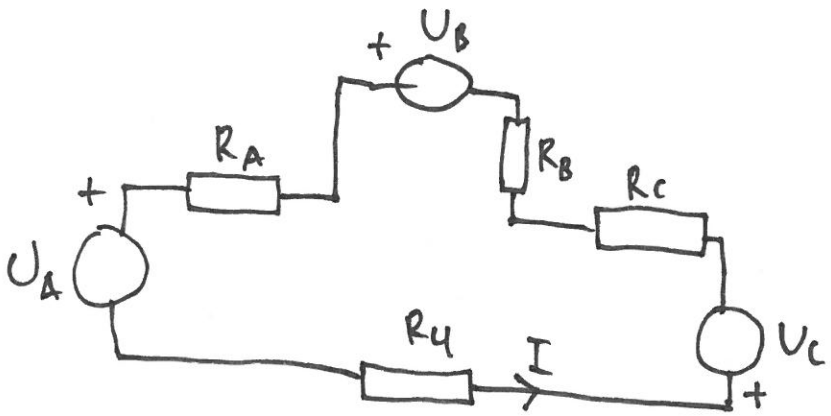
$U_B = I_0 \cdot R_3 = 10\ V$

$R_B = R_3 = 10\ \Omega$

C:



$$R_C = \frac{R_5 \cdot R_6}{R_5 + R_6} = \frac{8 \cdot 8}{8+8} = 4 \qquad U_C = \frac{R_5 \cdot E_2}{R_5 + R_6} = \frac{8 \cdot 12}{8+8} = 6\ V$$



$$U_A - U_B + U_C = 4 - 10 + 6 = 0$$

$$\Rightarrow I = 0\ A$$

$$\boxed{I = 0}$$