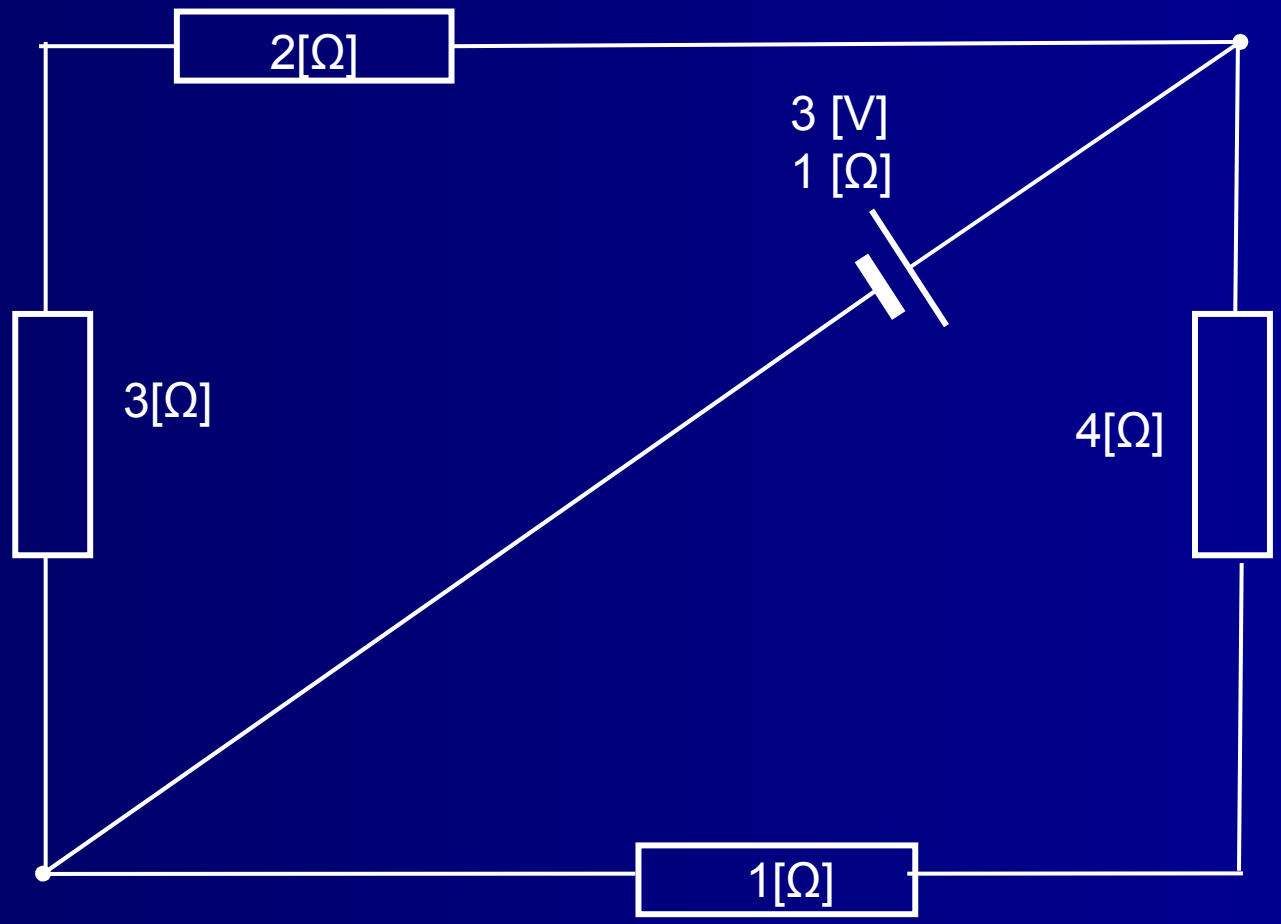
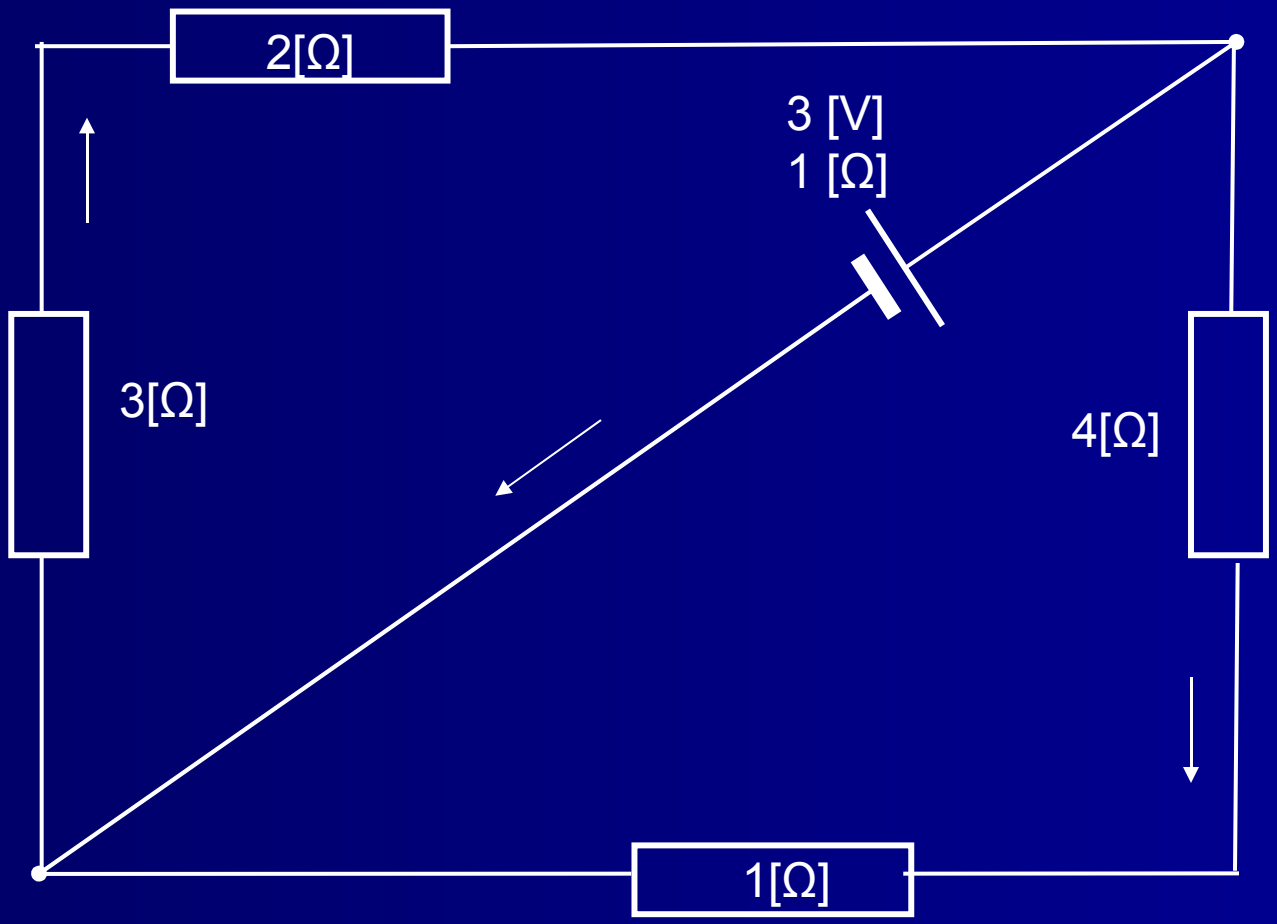
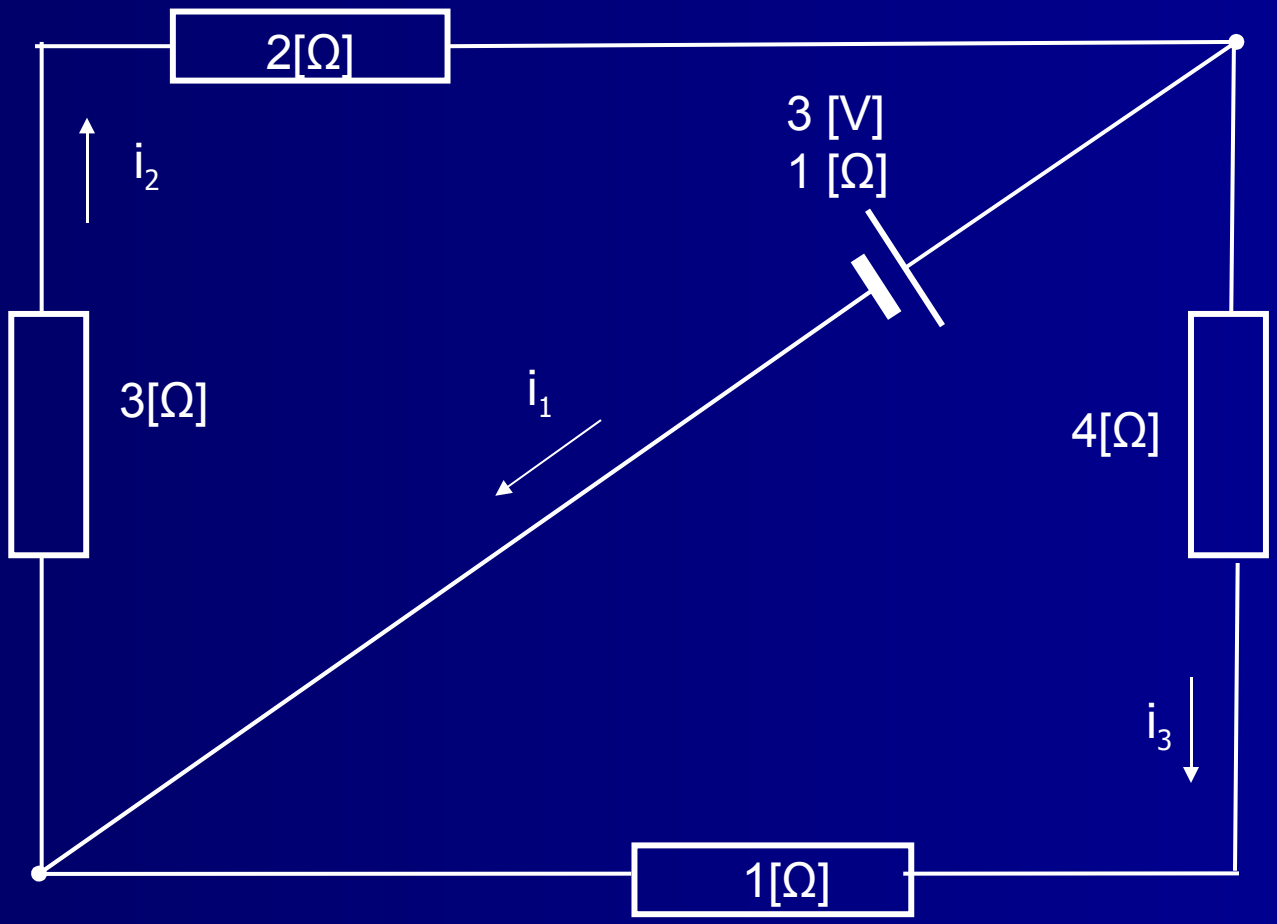
Ćwiczenie 5



Ćwiczenie 5



Ćwiczenie 5



Ćwiczenie 5

$R_{z2}=2[\Omega]+3[\Omega]=5[\Omega]$

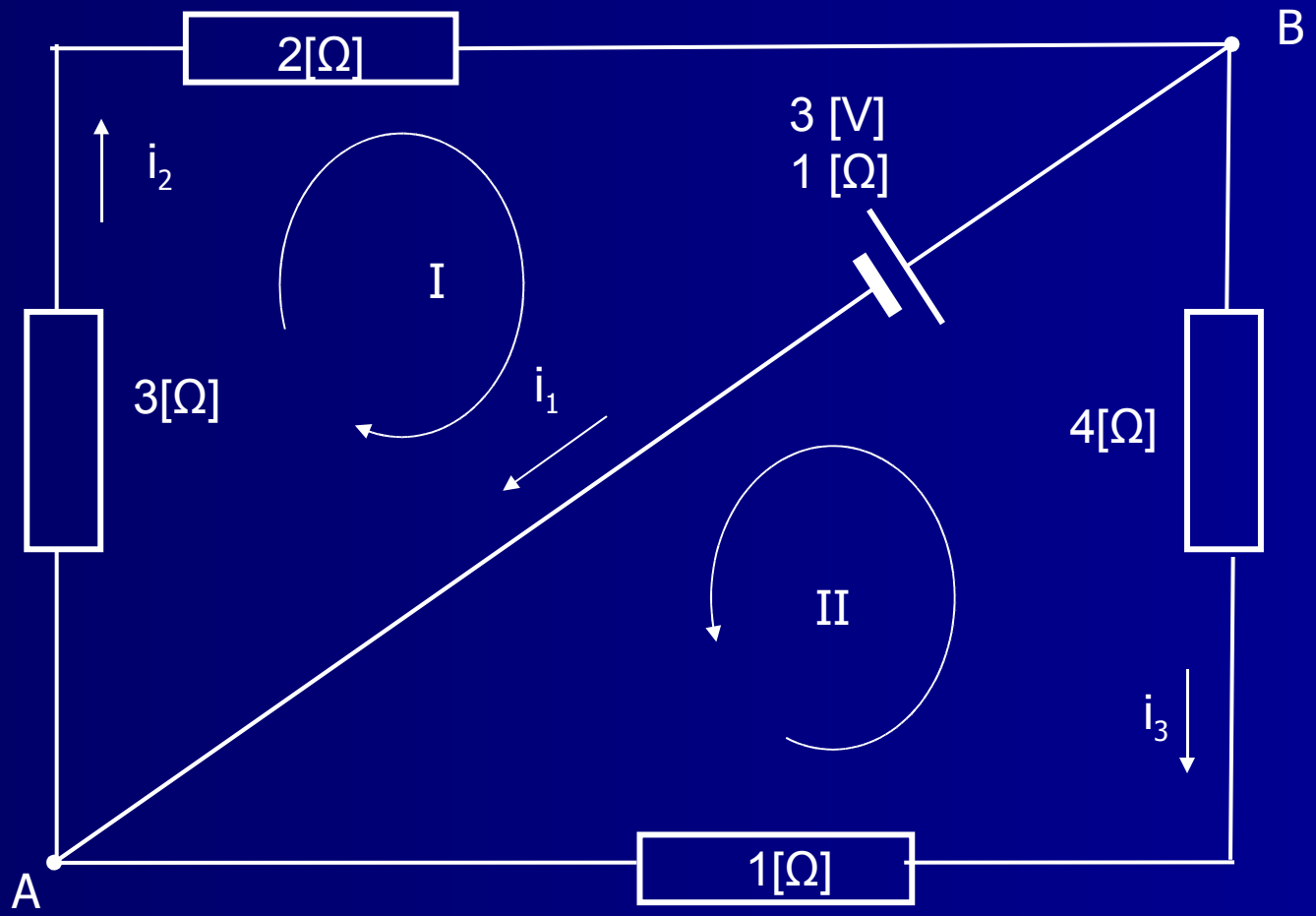
$R_{z3}=1[\Omega]+4[\Omega]=5[\Omega]$

$R=R_{w1}=1[\Omega]$

$5R=R_{z2}=R_{z3}$

$\varepsilon=3[V]$

Ćwiczenie 5



Ćwiczenie 5

$$(A/B) \qquad i_2 = i_1 + i_3$$

$$(I) \qquad \varepsilon = Ri_1 + 5Ri_2$$

$$(II) \qquad \varepsilon = Ri_1 - 5Ri_3$$

Ćwiczenie 5

$$\frac{\varepsilon}{R} = i_1 + 5i_1 + 5i_3 = 6i_1 + 5i_3$$

$$\frac{\varepsilon}{R} = i_1 - 5i_3$$

Ćwiczenie 5

$$i_1 = \frac{\varepsilon}{R} + 5i_3$$

$$\frac{\varepsilon}{R} = 6\frac{\varepsilon}{R} + 30i_3 + 5i_3$$

$$i_3 = -\frac{5\varepsilon}{35R} = -\frac{\varepsilon}{7R}$$

$$i_3 = -\frac{3[V]}{7[\Omega]} = -0{,}43[A]$$

Ćwiczenie 5

$$i_1 = \frac{3[V]}{1[\Omega]} + 5 \bullet \left(-\ 0{,}43[A]\right) = 0{,}86[A]$$

$$i_2 = 0{,}86[A] - 0{,}43[A] = 0{,}43[A]$$

Ćwiczenie 5

$$\frac{3[V]}{1[\Omega]} = 3[A] \qquad 0{,}86[A] + 5 \cdot 0{,}43[A] = 3[A]$$

$$\frac{3[V]}{1[\Omega]} = 3[A] \qquad 0{,}86[A] - 5 \cdot \left(-\,0{,}43[A]\right) = 3[A]$$

Ćwiczenie 5