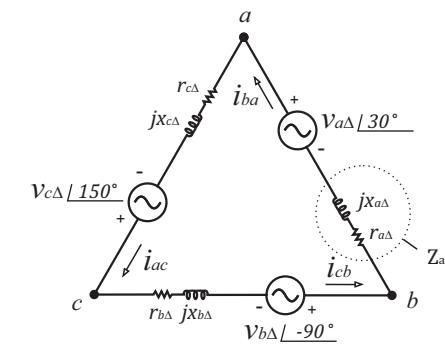
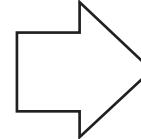
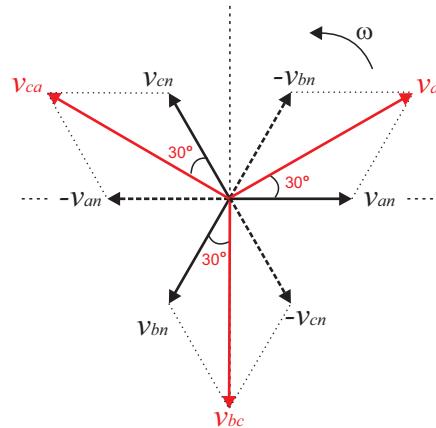
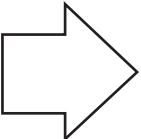
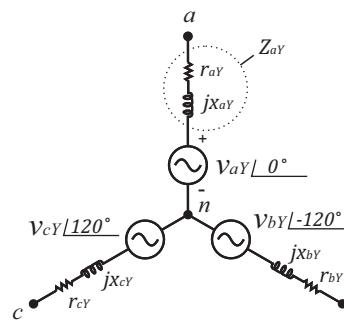


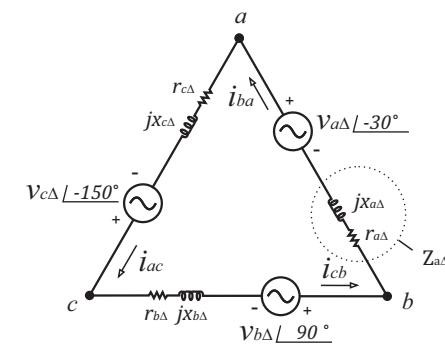
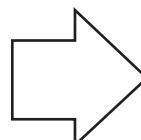
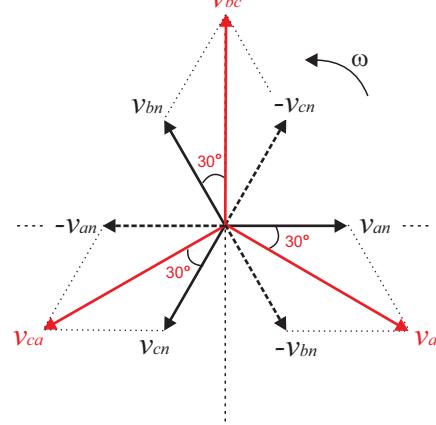
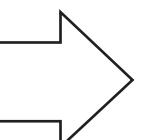
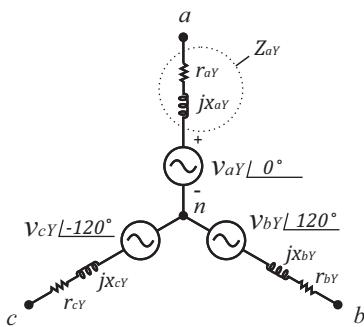
Fonte com Impedância Interna Transformação Y- Δ

Sequência Direta



$$\begin{aligned} v_{aY} &= v_{bY} = v_{cY} = v \\ v_{a\Delta} &= v_{b\Delta} = v_{c\Delta} = \sqrt{3}v \\ Z_{aY} &= Z_{bY} = Z_{cY} = Z \\ Z_{a\Delta} &= Z_{b\Delta} = Z_{c\Delta} = 3Z \end{aligned}$$

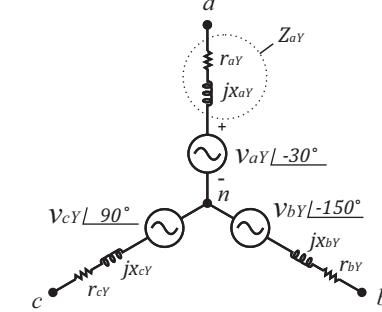
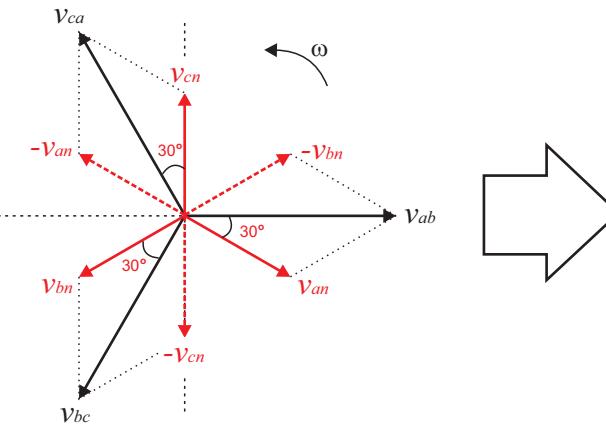
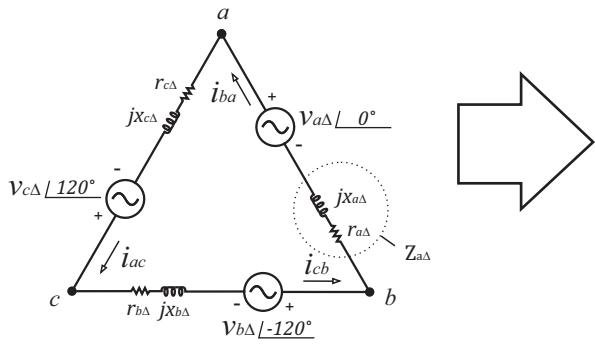
Sequência Indireta



$$\begin{aligned} v_{aY} &= v_{bY} = v_{cY} = v \\ v_{a\Delta} &= v_{b\Delta} = v_{c\Delta} = \sqrt{3}v \\ Z_{aY} &= Z_{bY} = Z_{cY} = Z \\ Z_{a\Delta} &= Z_{b\Delta} = Z_{c\Delta} = 3Z \end{aligned}$$

Fonte com Impedância Interna Transformação Δ - Y

Sequência Direta



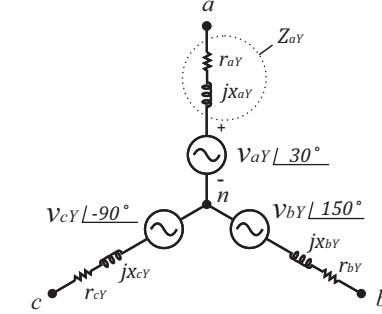
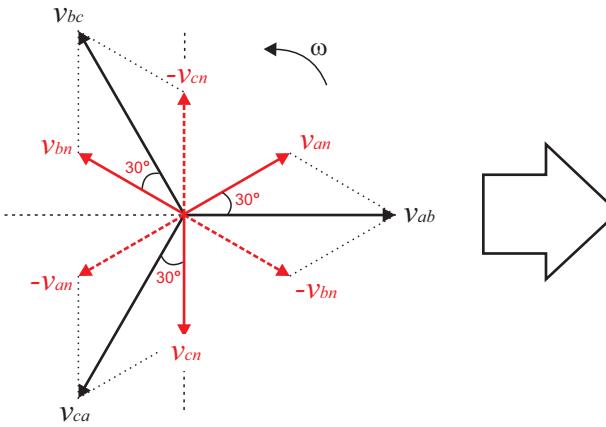
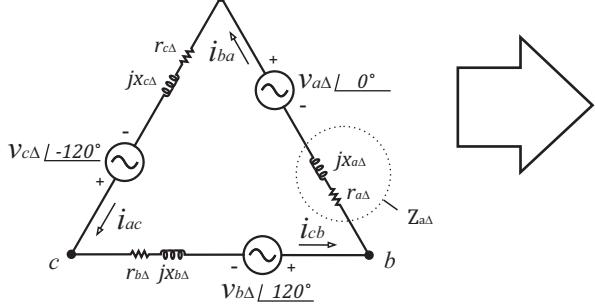
$$v_{a\Delta} = v_{b\Delta} = v_{c\Delta} = v$$

$$v_{aY} = v_{bY} = v_{cY} = \frac{v}{\sqrt{3}}$$

$$Z_{a\Delta} = Z_{b\Delta} = Z_{c\Delta} = Z$$

$$Z_{aY} = Z_{bY} = Z_{cY} = \frac{Z}{3}$$

Sequência Inversa



$$v_{a\Delta} = v_{b\Delta} = v_{c\Delta} = v$$

$$v_{aY} = v_{bY} = v_{cY} = \frac{v}{\sqrt{3}}$$

$$Z_{a\Delta} = Z_{b\Delta} = Z_{c\Delta} = Z$$

$$Z_{aY} = Z_{bY} = Z_{cY} = \frac{Z}{3}$$