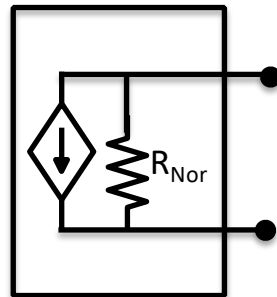
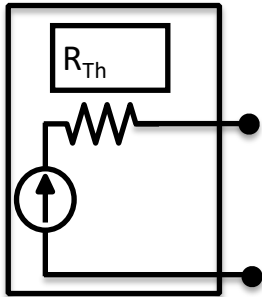
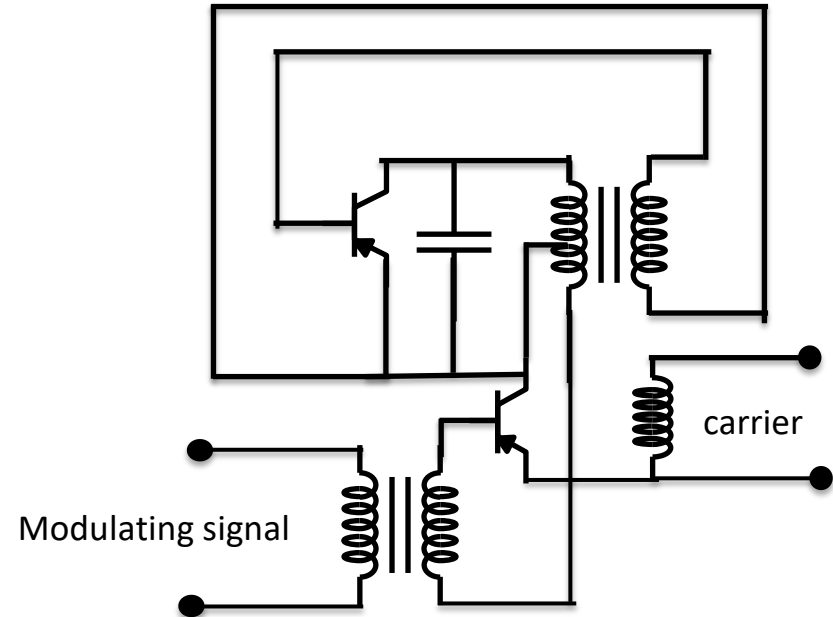


Thevenin, Norton and two port models

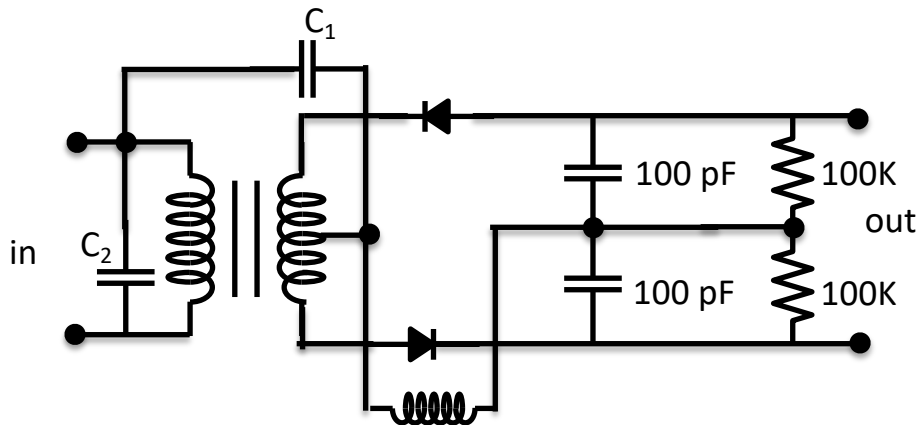


- Two port model
- $\begin{pmatrix} i_1 \\ i_2 \end{pmatrix} = \begin{bmatrix} y_{11} & y_{12} \\ y_{21} & y_{22} \end{bmatrix} \begin{pmatrix} V_1 \\ V_2 \end{pmatrix}$

FM Ratio Modulator



FM Ratio Detector



$$f_c = \frac{1}{2\pi\sqrt{L_1 C_2}}$$

L_1 is the transformer input inductance

C_1 is a DC block