**IMPEDANCE AND ADMITTANCE:**

When the input to a circuit is current, and the response is voltage, then the transfer function is called an **IMPEDANCE**.

$$Z(s) = \frac{V(s)}{I(s)}$$

Also, when input is a voltage, and output a current, the transfer function is called an **ADMITTANCE**.

$$Y(s) = \frac{I(s)}{V(s)}$$

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**EXAMPLE 14.9-1:**

Find the Transfer Function if the input is $i_i(t)$ and response is $v_o(t)$.