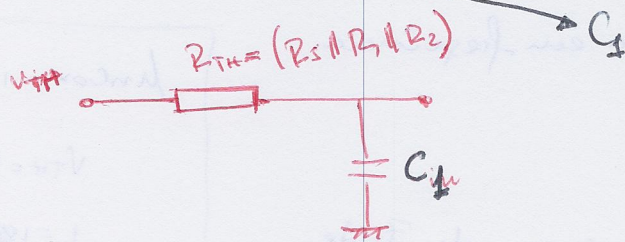


→ Agora precisamos avaliar os polos:

Polo entrada

$$f_{in} = \frac{1}{2\pi (R_s \parallel R_1 \parallel R_2) \cdot 10 \times 10^{-12}} \approx 320 \text{ MHz}$$



$$f_{out} = \frac{1}{2\pi (10^4 \cdot 100 \times 10^{-12})} \approx 160 \text{ KHz}$$

$\swarrow \quad \searrow$   
 $R_D \quad C_2$

$$\frac{V_{gate}}{V_{in}} \approx \frac{1}{1 + j2\pi f \cdot 50 \times 10^{-12}}$$

$(R_s \parallel R_1 \parallel R_2)$

$$\frac{V_{out}}{V_{gate}} = \frac{-g_m \times 10K}{1 + j2\pi f \cdot 10K \cdot 100pF}$$

$R_D \quad C_2$

$$\frac{V_{out}}{V_{in}} \approx \frac{-g_m \times 10K}{(1 + j2\pi f \cdot 50 \times 10 \times 10^{-12})(1 + j2\pi f \cdot 10 \times 10^3 \times 100 \times 10^{-12})}$$