



$$U = 12V$$

$$I_c = 10mA$$

$$R_E = \frac{12V}{0,01A} = 1200\Omega$$

$$U_e = 1,2V$$

$$U_b = 1,2 + 0,7 = 1,9V$$

$$U_c = \frac{12}{2} = 6V$$

$$I_b = \frac{10mA}{200} = 50\mu A$$

$$R_{b2} = \frac{1,9V}{500 \cdot 10^{-6}} = 3800\Omega$$

$$U_{Rb1} = 12 - 1,9 = 10,1V$$

$$R_{b1} = \frac{10,1}{500\mu A + 50\mu A} = 18,364\Omega$$

$$R_c = \frac{12V}{2} \times \frac{1}{10mA} = 600\Omega$$