

ΕΝΔΕΙΚΤΙΚΕΣ ΑΠΑΝΤΗΣΕΙΣ

Θέμα 4^ο

4.1 $R_{o\lambda} = R_1 + R_2 \Rightarrow R_{o\lambda} = 2\Omega + 8\Omega \Rightarrow R_{o\lambda} = 10\Omega$

4.2 $I = \frac{E}{R_{o\lambda}} \Rightarrow I = \frac{40V}{10\Omega} \Rightarrow I = 4A$

4.3

$$U_{R_1} = \frac{R_1}{R_1 + R_2} \cdot E \Rightarrow U_{R_1} = \frac{2\Omega}{2\Omega + 8\Omega} \cdot 40V \Rightarrow U_{R_1} = \frac{2\Omega}{10\Omega} \cdot 40V \Rightarrow U_{R_1} = 8V$$

4.4

$$U_{R_2} = \frac{R_2}{R_1 + R_2} \cdot E \Rightarrow U_{R_2} = \frac{8\Omega}{2\Omega + 8\Omega} \cdot 40V \Rightarrow U_{R_2} = \frac{8\Omega}{10\Omega} \cdot 40V \Rightarrow U_{R_2} = 32V$$