Chapter 7, Problem 6.

The switch in Fig. 7.85 has been closed for a long time, and it opens at $t = 0$. Find $v(t)$ for $t \geq 0$.

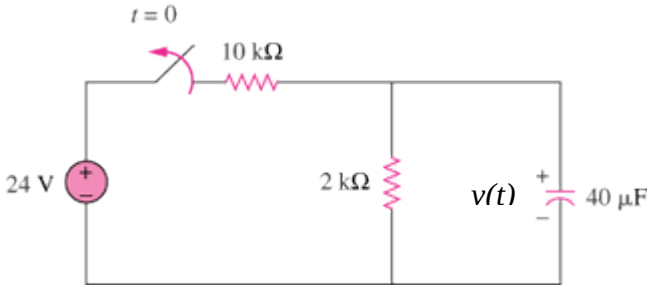


Figure 7.85

Chapter 7, Problem 7.

Assuming that the switch in Fig. 7.87 has been in position A for a long time and is moved to position B at t=0, find $v_o(t)$ for $t \geq 0$.

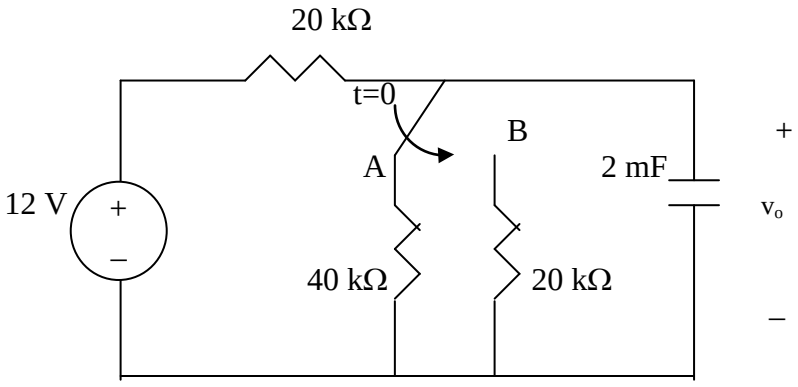


Figure 7.87 For Prob. 7.7.

Chapter 7, Problem 10.

For the circuit in Fig. 7.90, find $v_o(t)$ for t >0. Determine the time necessary for the capacitor voltage to decay to one-third of its value at t=0.

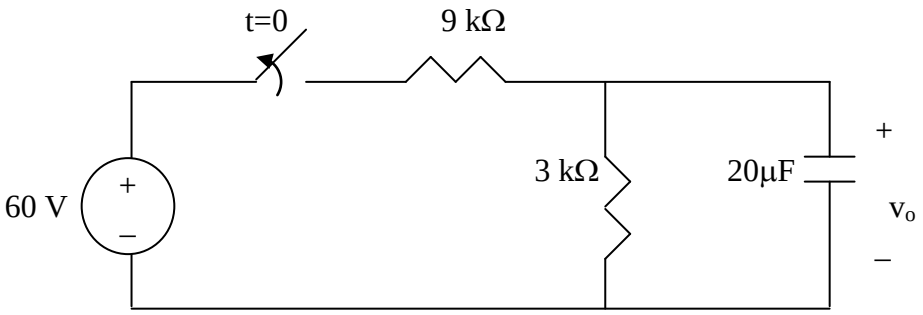


Figure 7.90 For Prob. 7.10.

Chapter 7, Problem 11.

For the circuit in Fig. 7.91, find i_o for t >0.

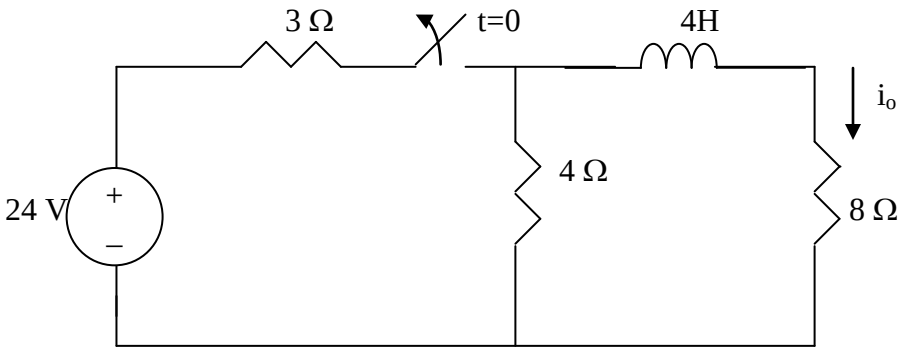


Figure 7.91 For Prob. 7.11.

Chapter 7, Problem 16.

Determine the time constant for each of the circuits in Fig. 7.96.

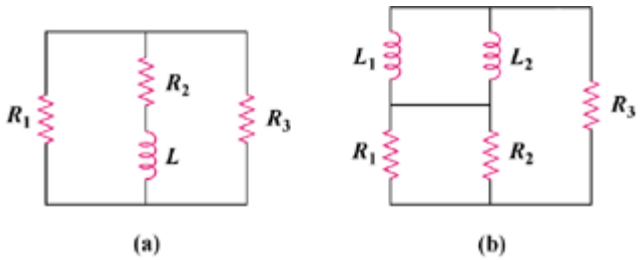


Figure 7.96

Chapter 7, Problem 22.

Find $i(t)$ and $v(t)$ for $t > 0$ in the circuit of Fig. 7.102 if $i(0) = 20$ A.

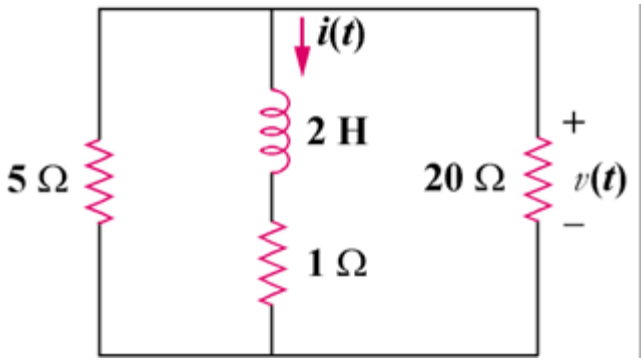


Figure 7.102

Chapter 7, Problem 40.

Find the capacitor voltage for $t < 0$ and $t > 0$ for each of the circuits in Fig. 7.107.

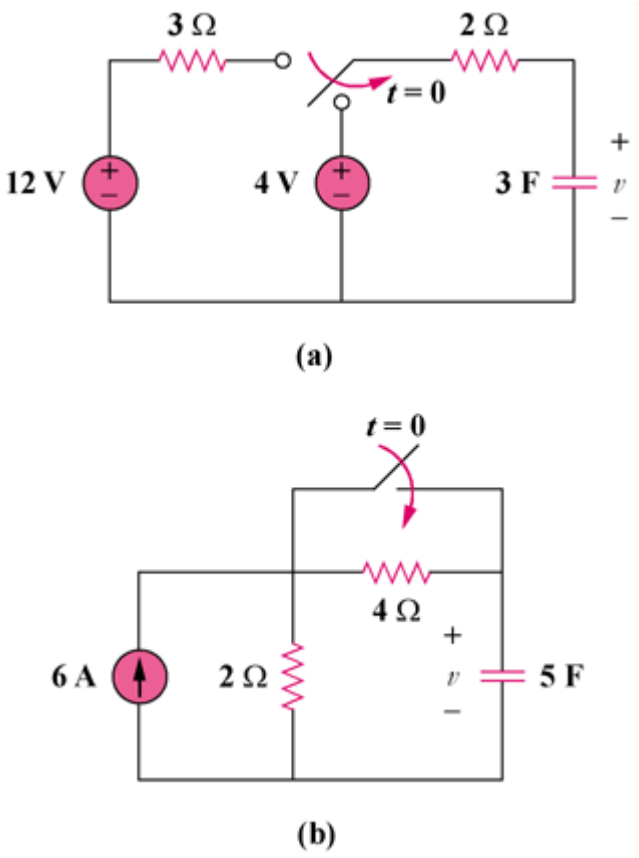
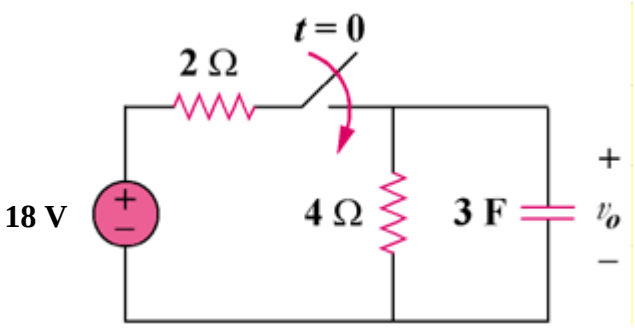


Figure 7.107

Chapter 7, Problem 42.

(a) If the switch in Fig. 7.109 has been open for a long time and is closed at $t = 0$, find $v_o(t)$.

(b) Suppose that the switch has been closed for a long time and is opened at $t = 0$. Find $v_o(t)$.



Chapter 7, Problem 44.

The switch in Fig. 7.111 has been in position *a* for a long time. At $t = 0$, it moves to position *b*. Calculate $i(t)$ for all $t > 0$.

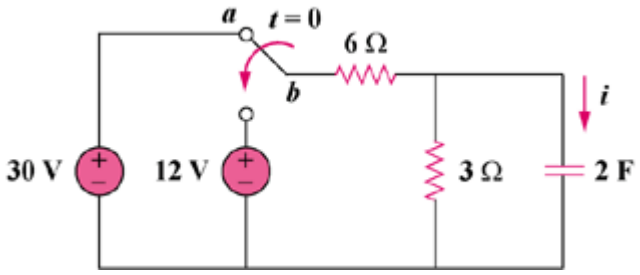


Figure 7.111