

ECET341 Homework 2

- (1) Find the steady state expression for $i(t)$ in the circuit of Fig. 1 if $v = 20 \cos(1000t)$ (V).

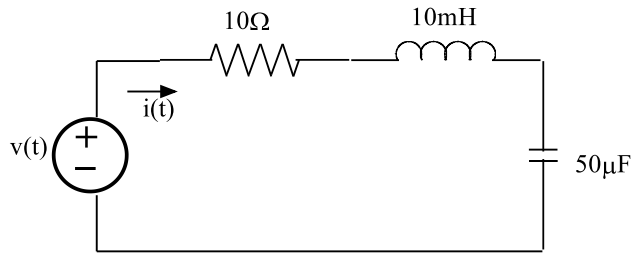


Fig.1

- (2) Find the steady state expression for $v(t)$ in the circuit in Fig. 2 if $i = 10 \cos(1000t)$ (A).

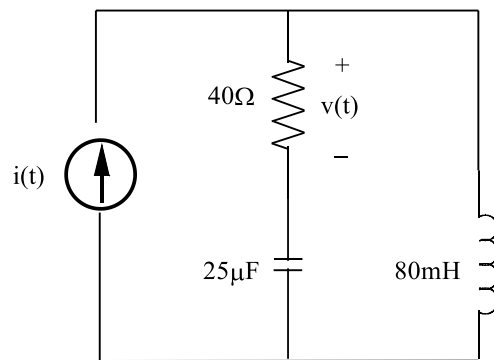


Fig.2

- (3) Find the steady state expression for $i(t)$ in the circuit in Fig. 3 if $v(t) = 12 \cos(1000t)$ (V).

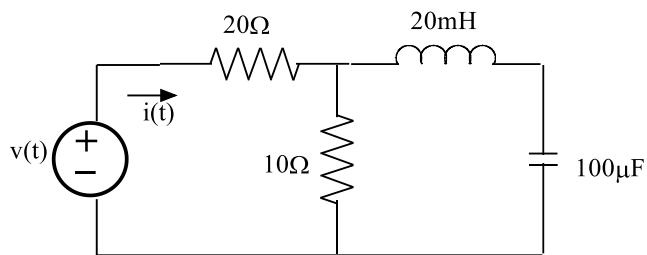


Fig.3