Chapter 9, Solution 18.

(a)
$$v_1(t) = 60 \cos(t + 15^\circ)$$

(b)
$$V_2 = 6 + j8 = 10 \angle 53.13^\circ$$

 $V_2(t) = 10 \cos(40t + 53.13^\circ)$

(c)
$$i_1(t) = 2.8 \cos(377t - \pi/3)$$

(d)
$$I_2 = -0.5 - j1.2 = 1.3 \angle 247.4^\circ$$

 $i_2(t) = 1.3 \cos(10^3 t + 247.4^\circ)$