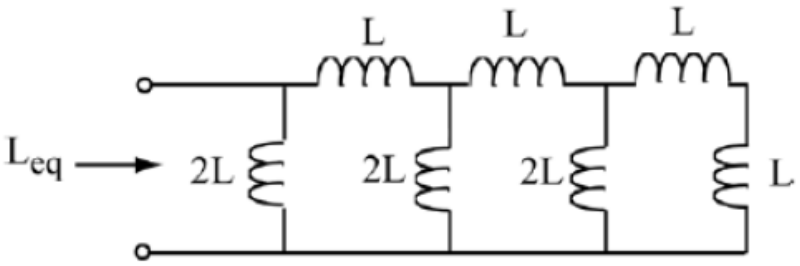
King Fahd University of Petroleum and Minerals
Electrical Engineering Department
EE 202 (131)
HW#5
Due Date: Nov. 10, 2013

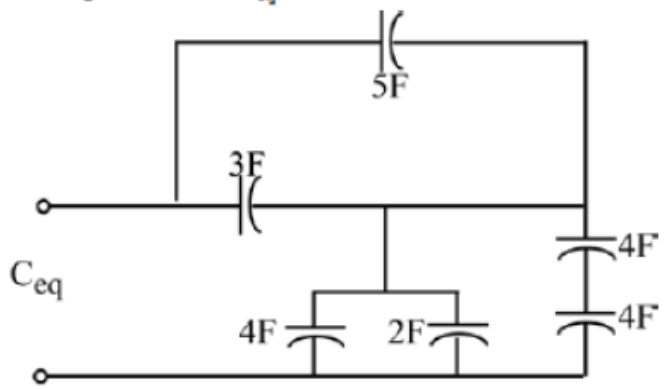
Q1.a)

Determine the equivalent inductance L_{eq}.



Q1.b)

Determine the equivalent capacitance C_{eq}.



Q2)

For the circuit shown in Fig. 1, find $i(t)$, $t > 0$.

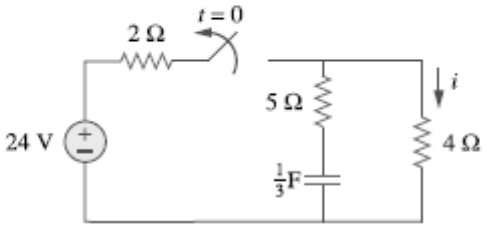
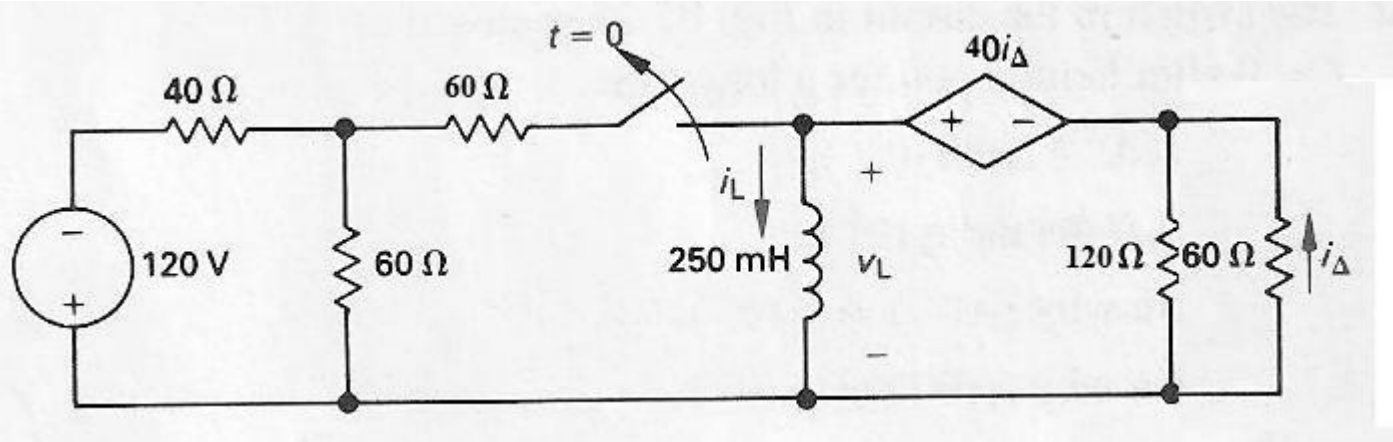
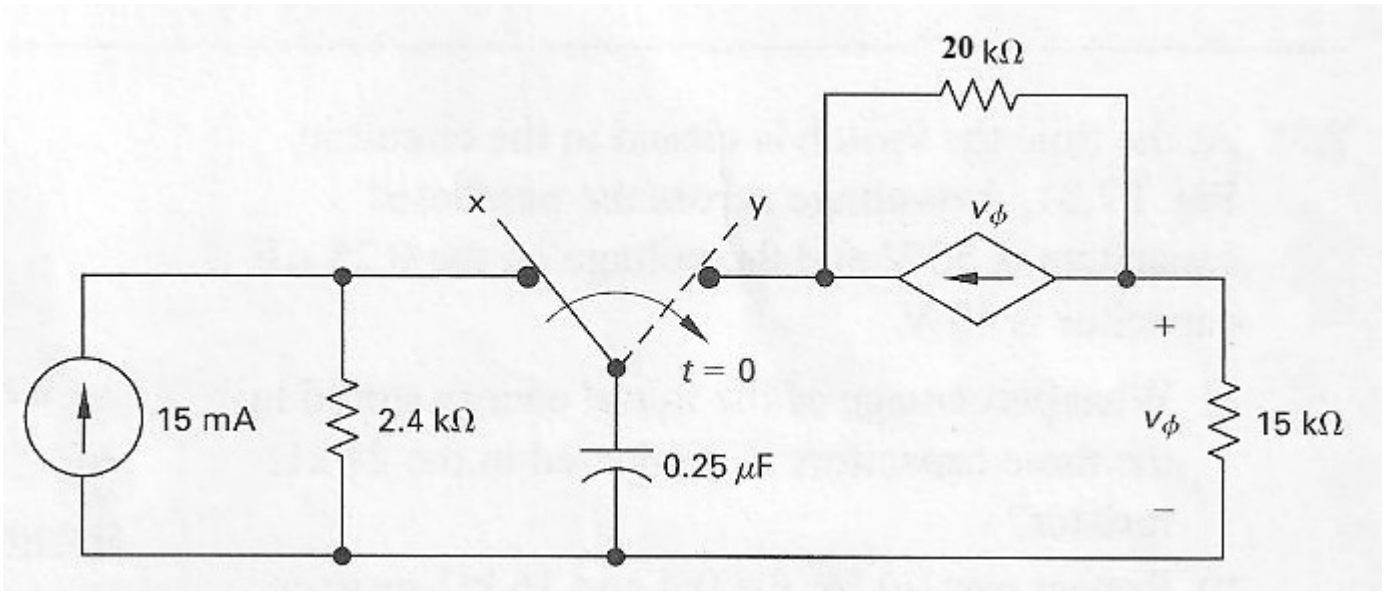


Fig. 1

Q3) The switch in the circuit shown has been closed for a long time before opening at $t = 0$. Find $i_L(t)$, $v_L(t)$, and $i_\Delta(t)$ for $t \geq 0^+$.



Q4) The switch in the circuit shown has been in position x for a long time before moving to position y at $t = 0$. Find $v_\phi(t)$ for $t \geq 0^+$.



Q5) The switch in the circuit shown has been closed a long time. At $t = 0$ it is opened. Find $v_o(t)$ *for* $t \geq 0^+$.