

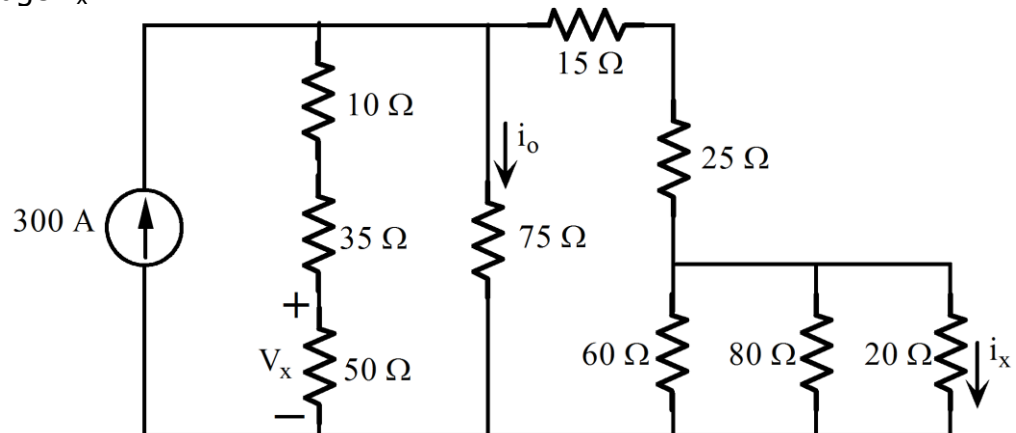
EE 201-HW 2, Due Monday Feb. 27, 2012

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Problem 1:

For the circuit below, use the current division and the voltage division rules to find the following:

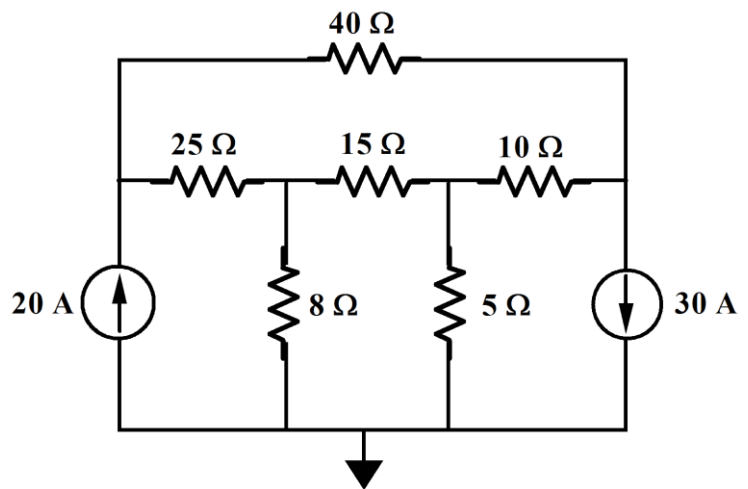
- The current i_o .
- The current i_x .
- The voltage v_x .



Problem 2:

For the circuit below, use the node-voltage method to find the following:

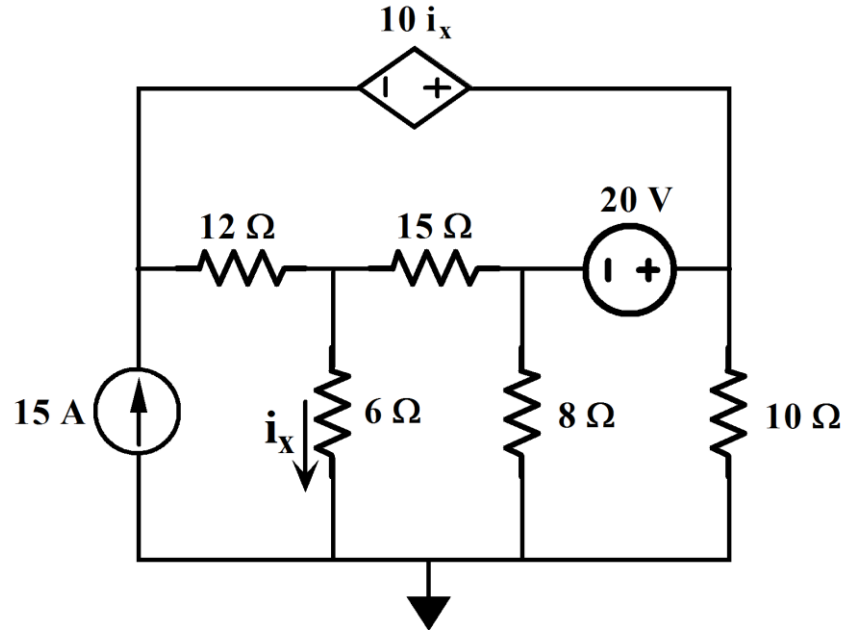
- The node voltages.
- The power associated with the 30 A current source.



Problem 3:

For the circuit below, use the node-voltage method to find the following:

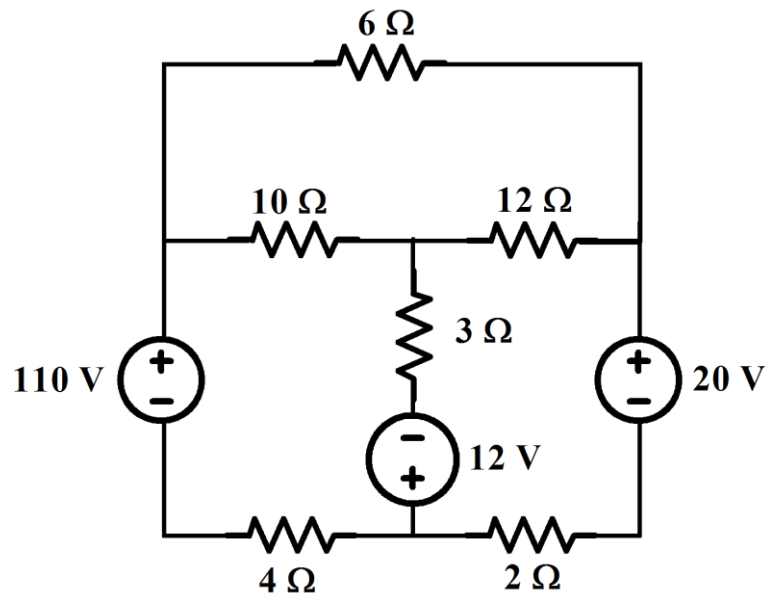
- c) The node voltages.
- a) The power associated with the dependent voltage source ($10 i_x$ voltage source).



Problem 4:

For the circuit below, use the mesh-current method to find the following:

- d) The mesh currents.
- a) The power associated with the 12 V voltage source.
- b) The power associated with the 10 Ω resistor.



Problem 5:

For the circuit below, use the mesh-current method to find the following:

- e) The mesh currents.
- c) The power associated with the 10 A current source.
- d) The power associated with the 40 Ω resistor.

