

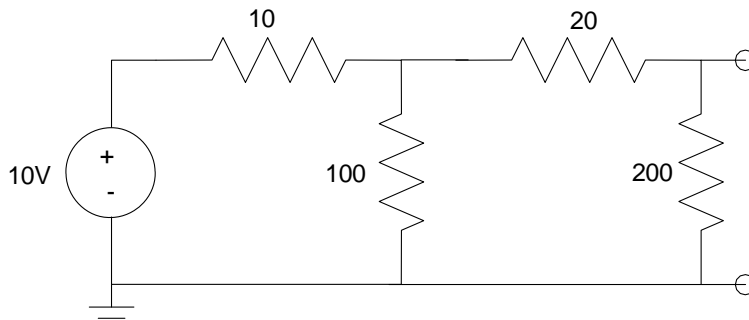
EE 206: Homework #5

Thevenin Equivalents, Maximum Power Transfer. Due Wednesday, February 26th

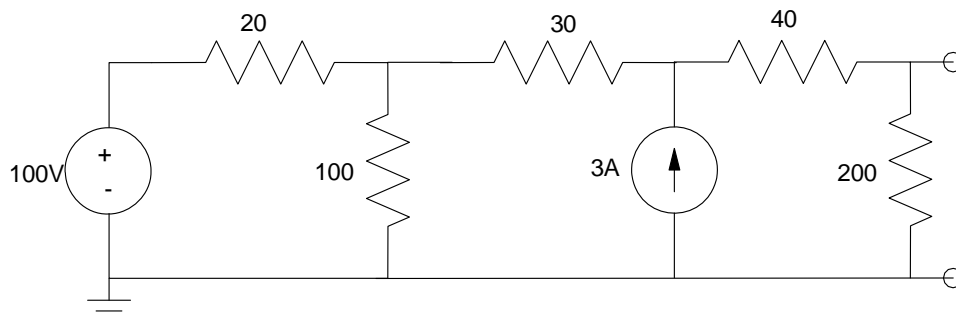
Please make the subject "EE 206 HW#5" if submitting homework electronically to Jacob_Glower@yahoo.com (or on blackboard)

Thevenin Equivalents

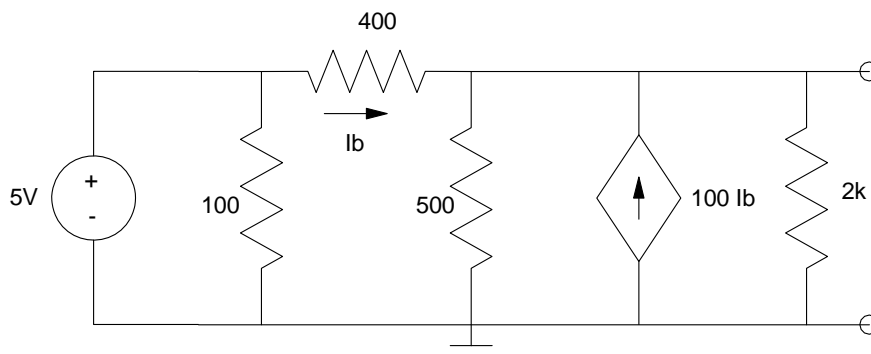
1) Find the Thevenin equivalent for the following circuit by transforming between Thevenin and Norton equivalents:



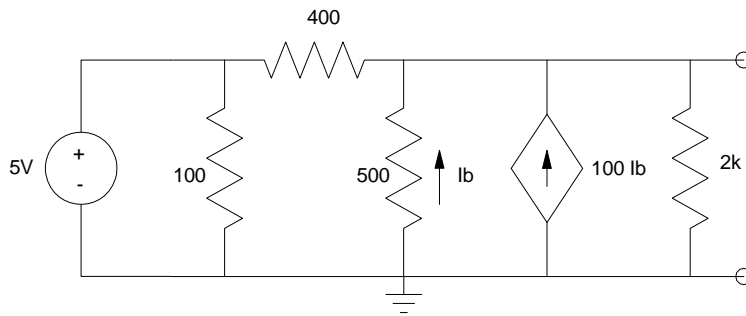
2) Find the Thevenin equivalent for the following circuit by transforming between Thevenin and Norton equivalents:



3) Find the Thevenin equivalent for the following circuit:

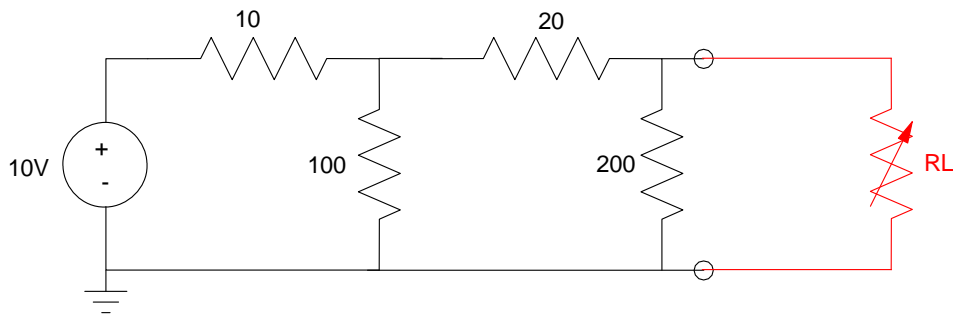


4) Find the Thevenin equivalent for the following circuit:



Maximum Power Transfer

5) Determine R_L so that the maximum power is delivered to the load (R_L)



PartSim

6) Simulate the circuit of problem 5. Determine the voltage and current at the load for

	V	I	Power
R = 0			
R = 10			
R = max power			
R = 50			
R = 100			
R = infinite			

7) Plot V vs. I on a graph and draw a line between these points. How does this line relate to the Thevenin equivalent for circuit #5?