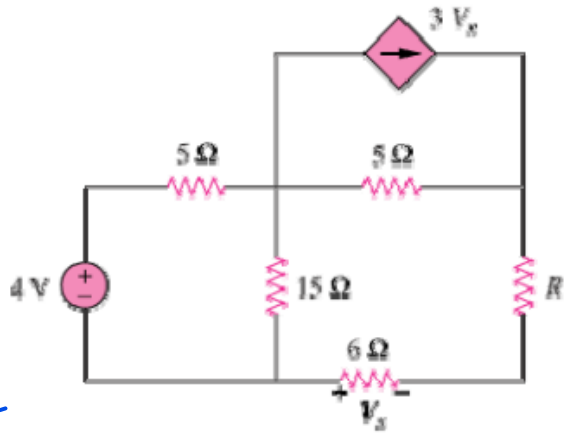
Practice problems on Thevenin's Theorem

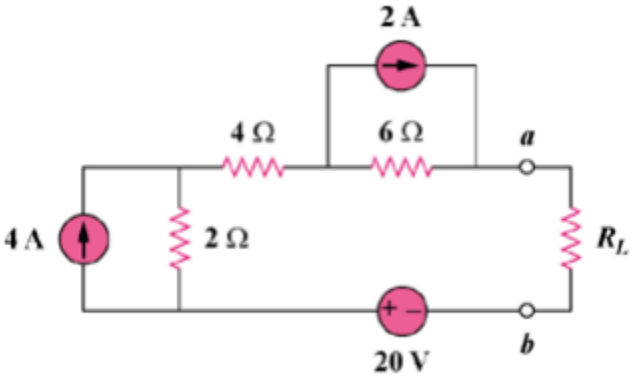
and

Maximum Transfer Theorem

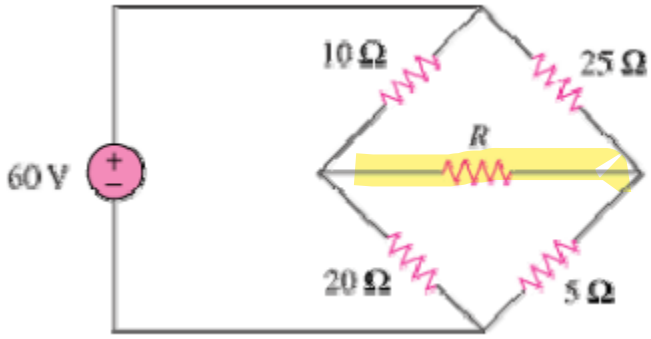
1. Find the value of R for which circuit delivers maximum power to R. Calculate the maximum power. ($V_{th} = 3V, R_{th} = 101.75\ ohm$)



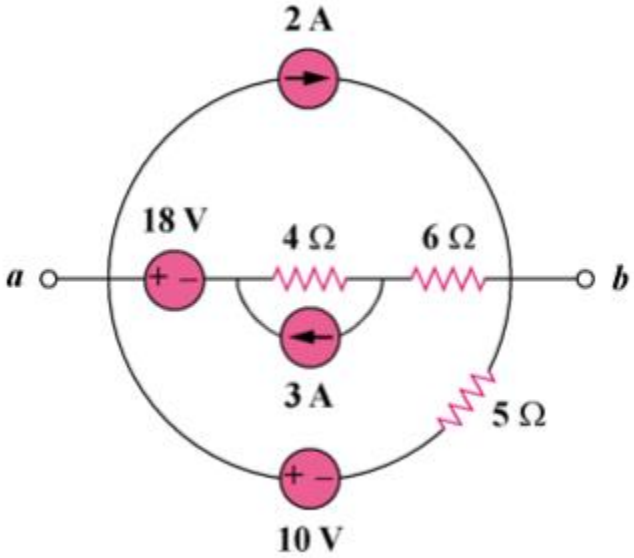
2. Find the value of R_L for which circuit delivers maximum power to R_L. Calculate the maximum power. ($V_{th} = 40V, R_{th} = 12\ ohm$)



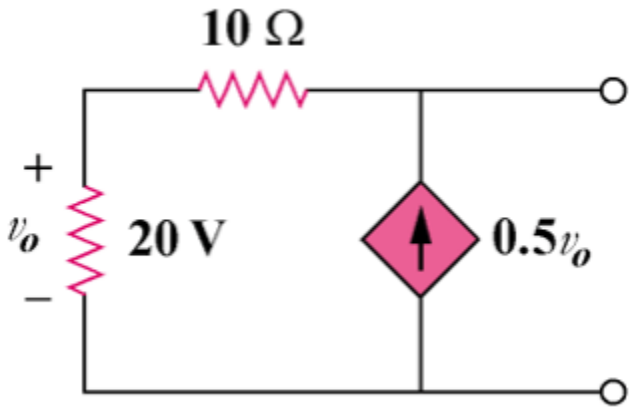
3. Find the value of R for which circuit delivers maximum power to R. Calculate the maximum power. ($V_{th} = 30V, R_{th} = 10.83\ ohm$)



4. Find Thevenin equivalent of the following circuit where the load was removed from the open terminal a-b

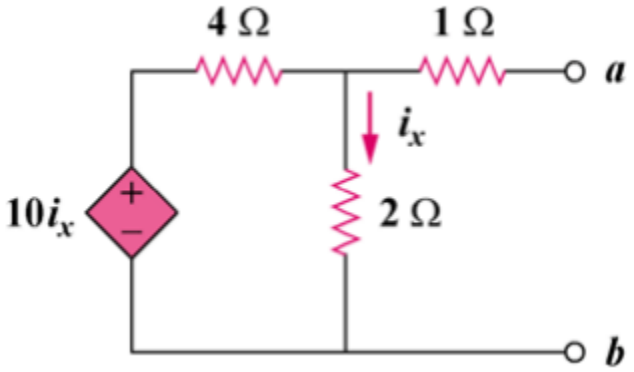


5. Find the Thevenin equivalent of the following circuit.



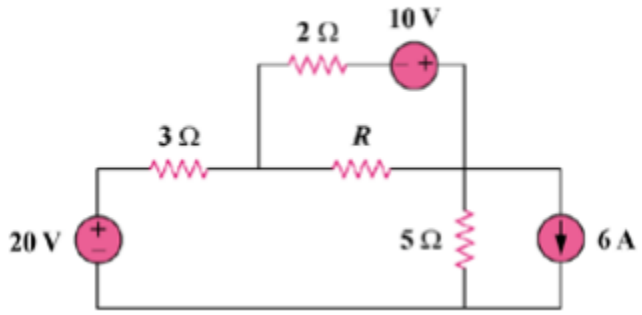
$(V_{th} = 0V, R_{th} = -3.33\ ohm)$

6. Find the Thevenin equivalent of the following circuit.



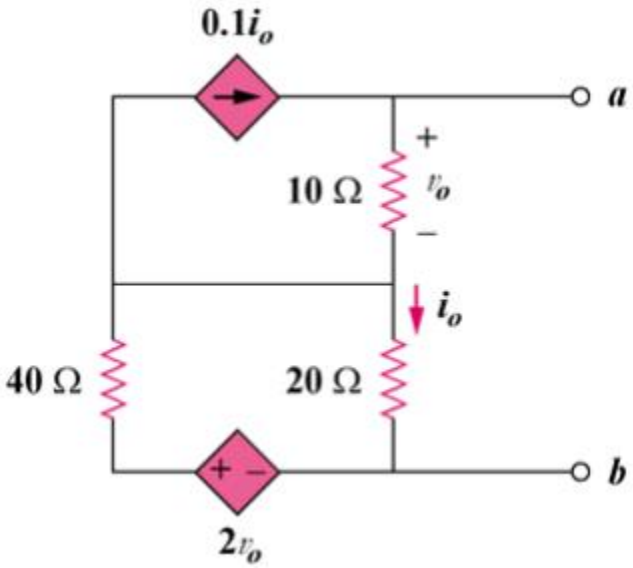
$(V_{th} = 0V, R_{th} = -1\ ohm)$

7. Find the value of R for which circuit delivers maximum power to R. Calculate the maximum power.

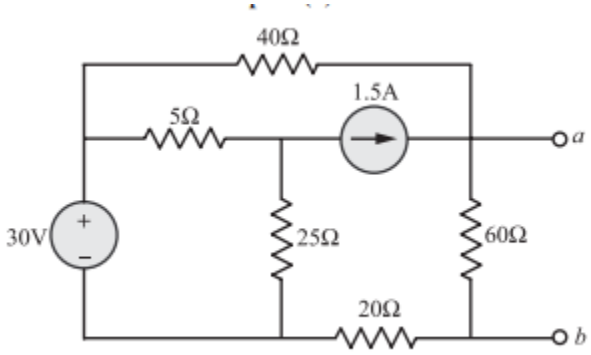


$(V_{th} = 2V, R_{th} = 1.6\ ohm)$

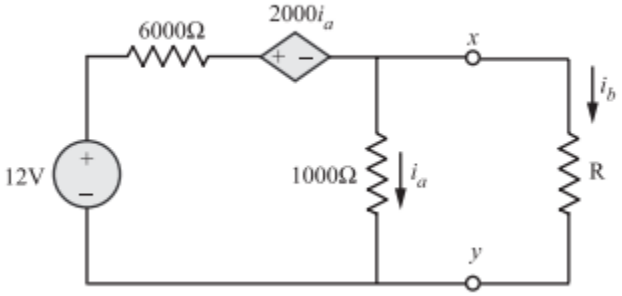
8. Find the Thevenin equivalent of the following circuit.



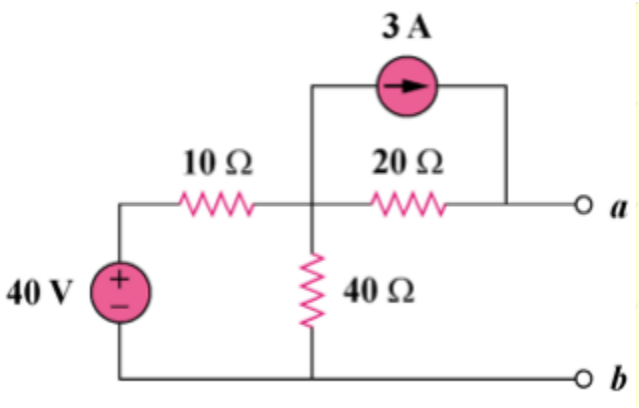
9. Find the Thevenin equivalent of the following circuit and calculate the maximum power.



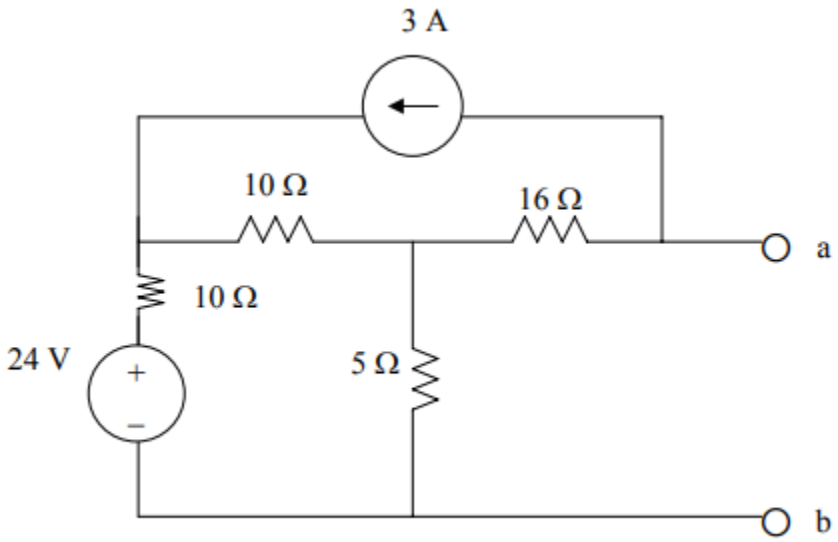
10. Find the value of R for which circuit delivers maximum power to R. Calculate the maximum power.



11. Find the Thevenin equivalent of the following circuit and calculate the maximum power.



12. Find the Thevenin equivalent of the following circuit and calculate the maximum power.



13. Find the Thevenin equivalent of the following circuit and calculate the maximum power.