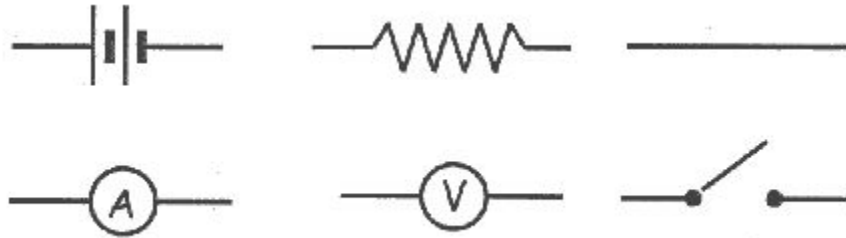


Week 21 - Circuits

Read Page 241 (Electrical Circuits)

TQ1. Label each one of the circuit symbols below.



Read Page 244 (Voltmeters and Ammeters)

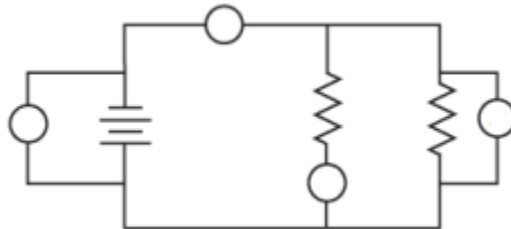
TQ2. Voltmeters, which measure potential difference or voltage, need to be connected in _____.

TQ3. Due to your answer in TQ32, _____ must stay the same when connected in _____.

TQ4. Ammeters, which measure the current in a circuit, need to be connected in _____.

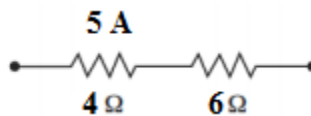
TQ5. Due to your answer in TQ34, the _____ must stay the same when connected in _____.

CQ6. Fill in the circles below with either a V for Voltmeter or an A for Ammeter.



Read Page 246 (Series Circuits)

Refer to CQ7 – QQ9 for the following circuit diagram



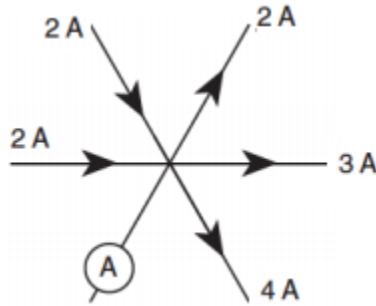
CQ7. A $4.0\ \Omega$ resistor and a $6.0\ \Omega$ resistor are connected in series in a circuit as shown above. The current through the $4.0\ \Omega$ resistor is $5.0\ \text{A}$, what is the current running through the $6.0\ \Omega$ resistor?

QQ8. What is the equivalent resistance of the circuit?

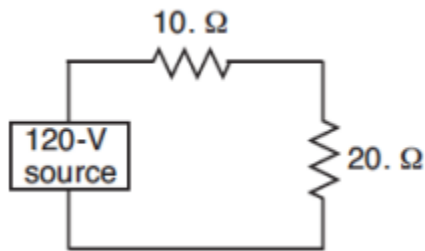
QQ9. What is the voltage or potential difference of the circuit?

Week 21 - Circuits

CQ10. What is the reading on Ammeter A shown below?



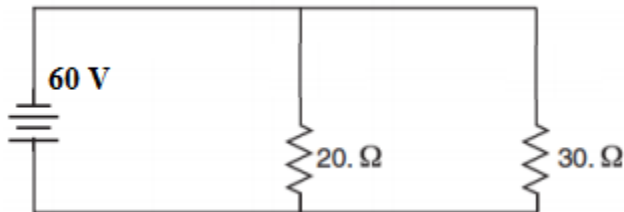
QQ11. Fill out the VIRP table for the following circuit.



	V	I	R	P
R₁			10 Ω	
R₂			20 Ω	
Total	120 V			

Read Page 252 (Parallel Circuits)

Refer to CQ12 – QQ13 for the following circuit diagram

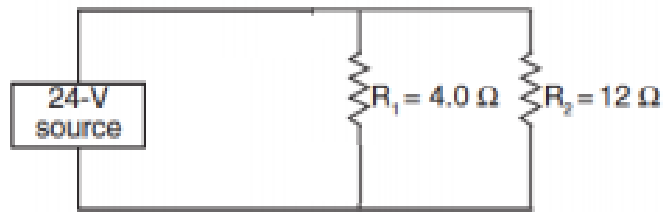


CQ12. If the voltage in the battery is 60 V, what is the voltage for the 20 Ω resistor and the 30 Ω resistor connected in parallel?

QQ13. What is the current of the 20 Ω resistor and the 30 Ω resistor given the voltage on each in CQ42?

Week 21 - Circuits

QQ14. Fill out the VIRP table for the following circuit.



	V	I	R	P
R₁			4 Ω	
R₂			12 Ω	
Total	24 V			