Series and parallel circuits application questions

1. Draw a series circuit with a battery and two bulbs. Label these A and B.
2. The resistance of bulb A is 3 Ω and the resistance of bulb B is 9 Ω. What is the total resistance of the in the circuit. 3 + 9 = 12 Ω
3. The current through bulb A is 0.5 A. What is the current through bulb B? 0.5 A
4. The potential difference across the battery is 6 V. what is the potential difference across bulb A? And bulb B? V = IR so V = 0.5 x 3 = 1.5 Ω for bulb A.
5. Draw a parallel circuit with a battery and two resistors. Label these A and B.
6. The resistance of resistor A is 3 Ω and the resistance of resistor B is 9 Ω. What must the total resistance of the in the circuit be smaller than? The resistance of the smallest value resistor.
7. The potential difference across the battery is 6 V. what is the potential difference across resistor A? And resistor B? 6 V
8. What is the current through resistor A? And resistor B? Use the V = IR equation.