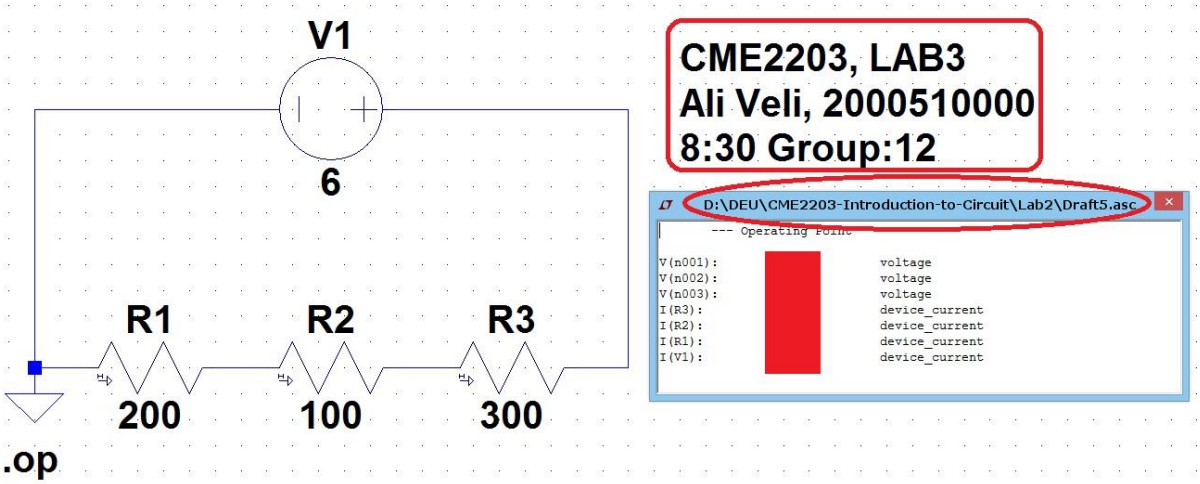
CME2203 Lab1 Preliminary Assignment

Deadline: Monday, October 7, 2019, 12:30

☞ Prelab must be prepared INDIVIDUALLY and uploaded to Google Classroom course page.

A) Draw the following circuit. Place a text label that shows the course code, lab number, name, student number, and group number. Simulate and observe the voltages. Your directory path must also be visible on the simulation.



Note that you must check the nodes to find the voltages on the resistors. For example in my schematic, to find the voltage V3 on R3: node001 is 6v and node003 is 3V, so we have V(node001)-V(node003)=6-3=3V on R1.

The order on my schematic is R1, node002, R2, node003, R3, node001 from left to right.

Similarly;

V1 = node002=2V

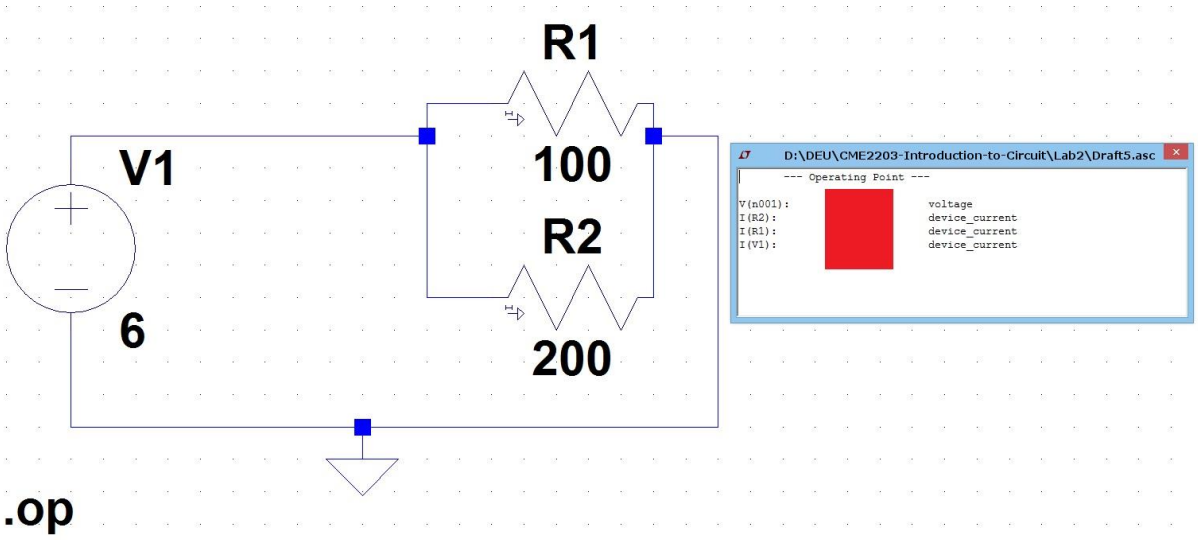
V2 = V(node003)-V(node002)=3-2=1V

V3 = V(node001)-V(node003)=6-3=3V

Then, calculate all powers generated and absorbed in the circuit.

(Continued on the next page)

B) Draw the circuit shown below. You must also include the text label as before even though it's not seen on this example. Simulate it and observe the results.



Please note the currents going into the junction of R1 and R2 from left to right, and currents on R1 and R2. How are they related?

Similarly, calculate all powers generated and absorbed in the circuit.

Upload **ONLY!! one PDF** file including two screenshots of A and B and your calculations. That's all for the Lab1prelab.

Thank you and Good Luck