

SE: Energy and Power Activity

Energy: $E(J) = P(W) \times t(s)$ joules = watts \times seconds	Power: Watts = Amps \times Volts 1000mA = 1amp
Watt Hours (Energy): $Wh = P(W) \times t(h)$	

1. Using the kilowatt meter measure the volts, amps and watts.

How to use the Kilowatt Meter:

http://www.youtube.com/watch?v=1l_mo1jwh8Y

Choose 2 items in or near the shops to measure:

Item one: _____
Voltage _____
Current _____
(Power)Watts _____
Calculate Energy for 1 min of use (Joules) _____
Calculate Watt Hours for 1 min of use (Wh) _____

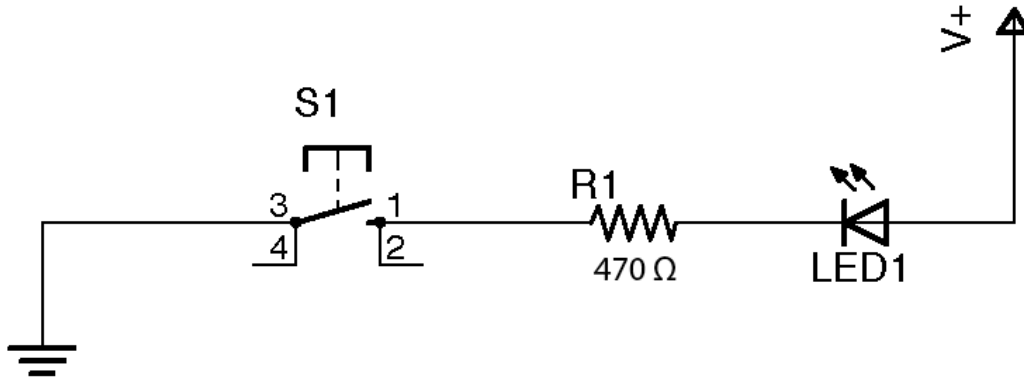
Item two: _____
Voltage _____
Current _____
(Power)Watts _____
Calculate Energy for 1 min of use (Joules) _____
Calculate Watt Hours for 1 min of use (Wh) _____

(over)

2. Build the following circuit, take measurements, and answer the questions.

How to use the Multimeter:

<http://sites.lwhs.org/techarts/2013/08/01/multimeter/>



Voltage _____

Current _____

(Power)Watts _____

Calculate Energy for 1 min of use (Joules) _____

Calculate Watt Hours for 1 min of use (Wh) _____

Extra Time? Build another circuit, using many lights, and take the same measurements.