Name: Weiheng Qi

Class: ET-821

**SERIES DC RESISTIVE CIRCUITS**

**OBJECTIVE: To investigate the characteristics of a series DC resistive circuit.**

**EQUIPMENT:**

**Resistors 1-330Ω**

**2-220Ω**

**1-470Ω**

**1-100Ω**

**Instruments 1- DMM or VOM**

**1- dc Power Supply**

**RESUME OF THEORY**

**In a series circuit, the current is the same through all of the circuit element. The total resistance, R, of a series is the sum of the individual resistance’s. By Ohm’s laws, the circuit current is equal to the voltage divided by the resistance.**

****

|  |  |
| --- | --- |
| **VOLTAGE (V)** | **CURRENT(mA)** |
| **0** | **0** |
| **10** | **7.5** |
| **20** | **14.9** |
| **40** | **29.9** |
| **50** | **37.3** |