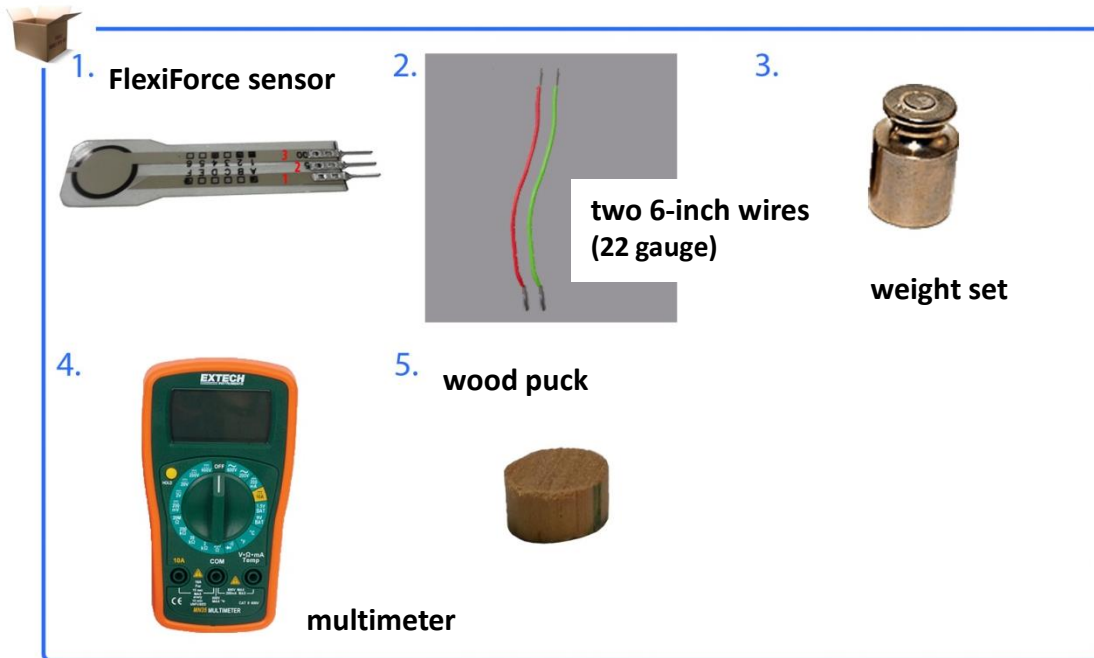


Calibrating the Force Sensor: Determining Relationships between Applied Force and Sensor Resistance/Conductance

INSTRUCTIONS

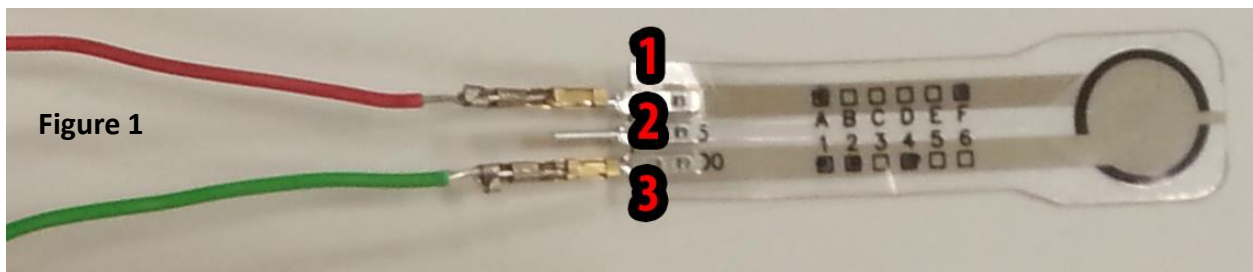
Use this instruction manual to help you connect the force sensor to the multimeter. Place a wooden puck and weights on top of the sensor to obtain a sensor reading. The goal is to determine the relationships between the applied force and sensor output. Make sure you have the following items:



NOTE: Record all calibration data on the *Calibrating the Force Sensor Data Collection Sheet*.

Instructions

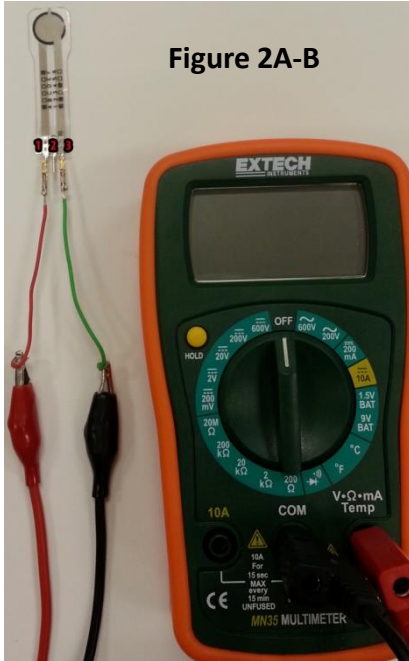
1. FlexiForce Sensor Pins



- A. The middle pin is non-active.
- B. Connect wires at FlexiForce sensor pin 1 and pin 3.
Make sure that pin 1 DOES NOT TOUCH pin 3.
- C. To do this, use tape, solder or a pin connector.

2. Breadboard Connection

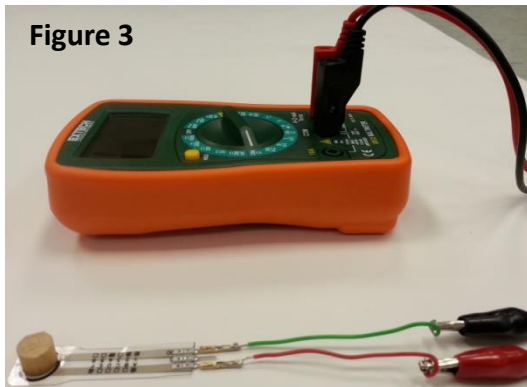
- A. Connect sensor pin 3 to ground (black) on the multimeter.
- B. Connect sensor pin 1 to resistance (red) on the multimeter.
- C. Set your multimeter to 20M ohms.



3. Puck

Place a wooden puck on the center of your sensor.

- A puck is an object that has the same diameter as your sensing area.
- A puck is used when the force area being applied is greater than your sensing area.



4. Weights

Place a weight on the center of your sensor. Make sure the weight is within your sensor weight max.

- A. Record the force and resistance values on the *Calibrating the Force Sensor Data Collection Sheet*.
- B. Repeat with different weight values.

