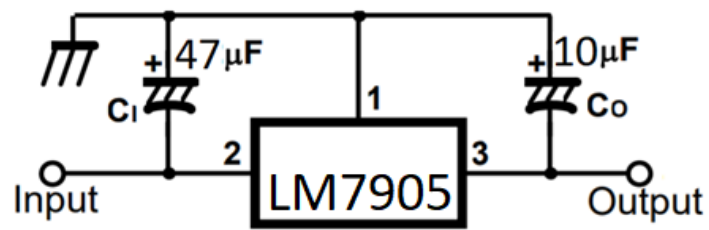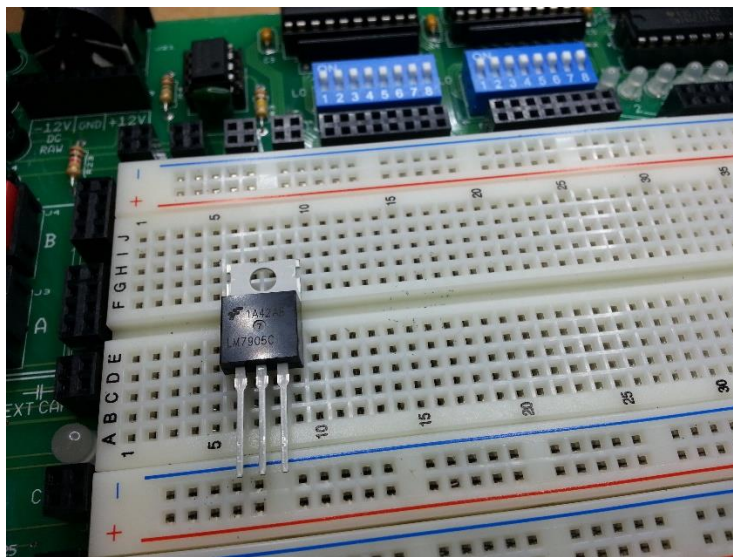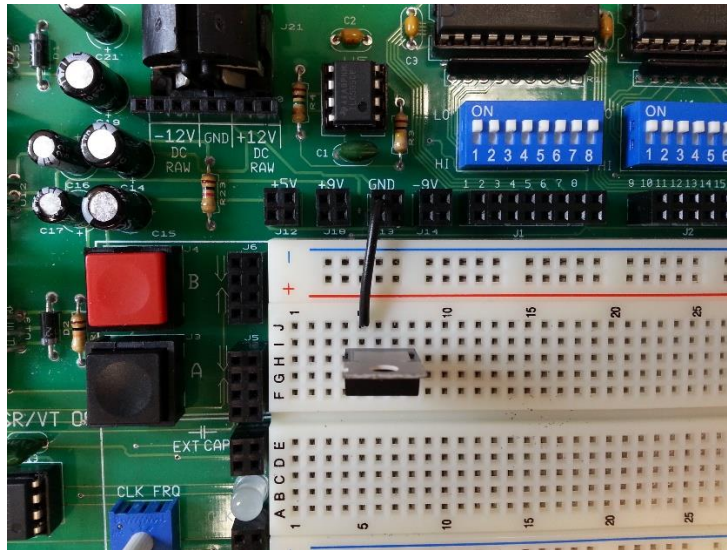How to create a -5V source with your ANDY board?

This is the schematic diagram for you to create a -5V source from -9V.
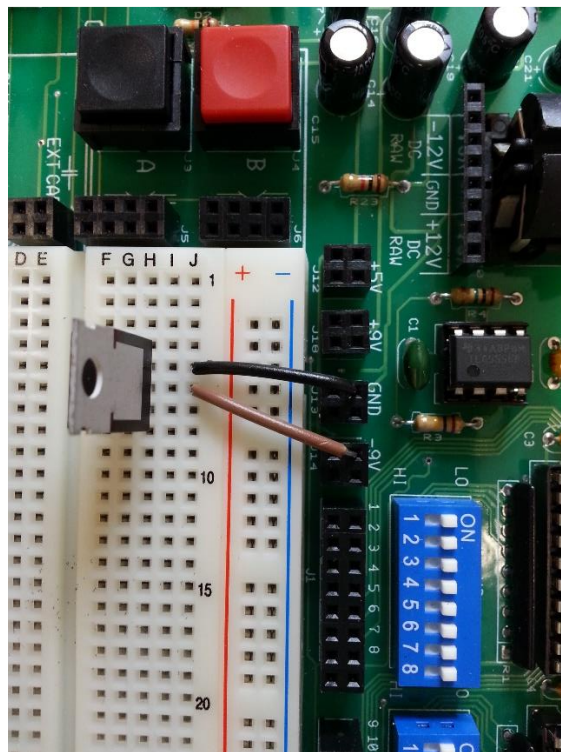

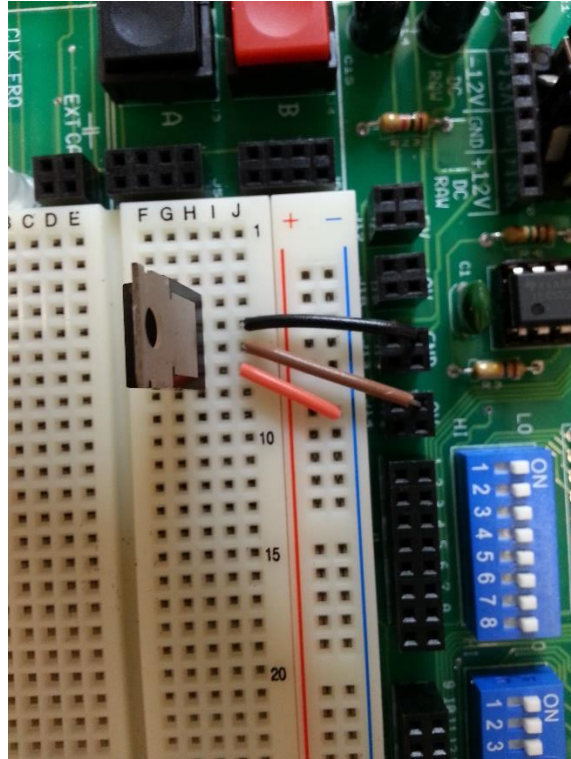(1). Obtain a 7905 voltage regulator, such as LM7905C from an OpEL TA.

(2). Insert the 7905 to the protoboard. Face downwards as shown. Connect ground to its pin 1.

(3). Connect -9V (brown wire) to the pin 2 of the 7905.

(4). Use an orange wire to connect the pin 3 to the upper rail row as shown. This will be the -5V output.

(5). Place and connect a 47uF electrolytic capacitor to the ground and the pin 1 of 7905. Use caution! Place the positive side of the capacitor to the ground, and the negative side of the capacitor to the -9V (pin 1). This capacitor will help reduce any oscillation from the source.
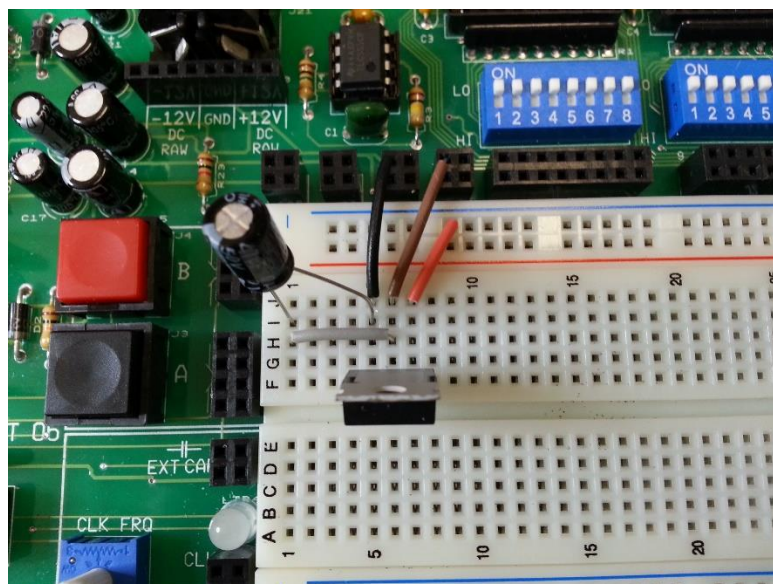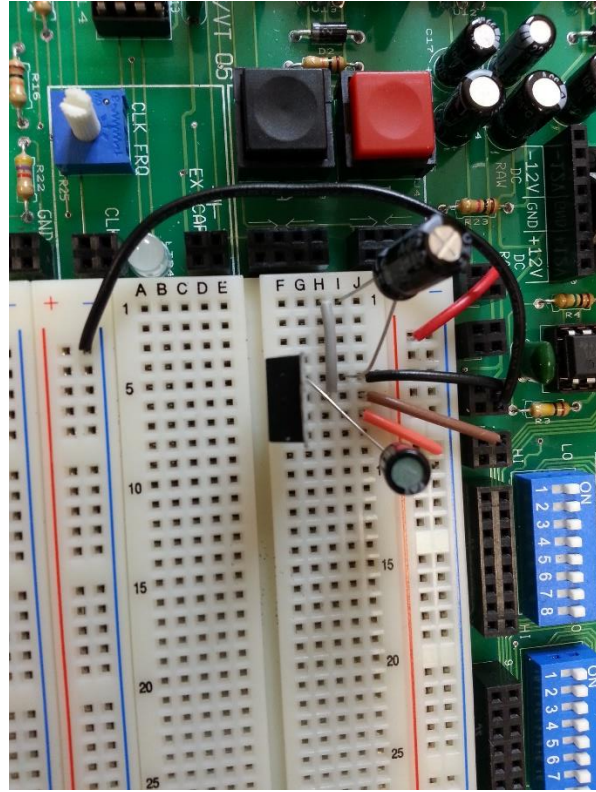
(6). Connect a 10uF electrolytic capacitor to the ground and the pin 3 of the 7905. Place and connect the positive side of the capacitor to the ground, and the negative side of the capacitor to the -5V (pin 3). This capacitor will help improve the transient response of the -5V.
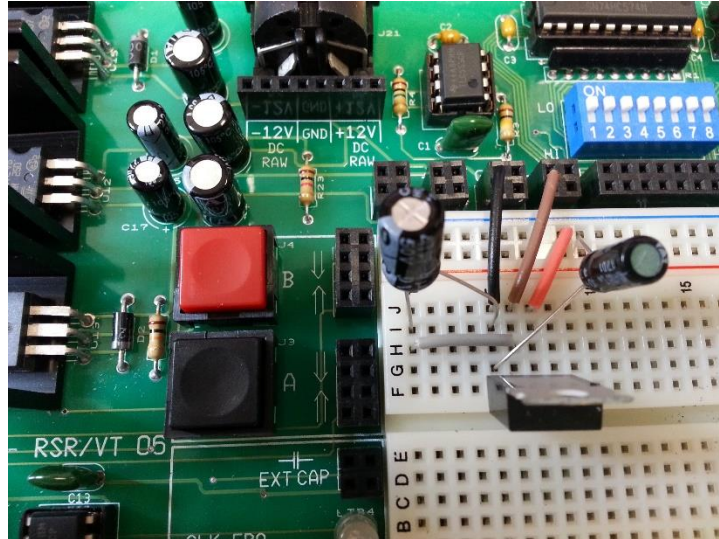
(7). Add the +5V (red wire) to the lower upper-rail row to make it compatible with the USB power supply.
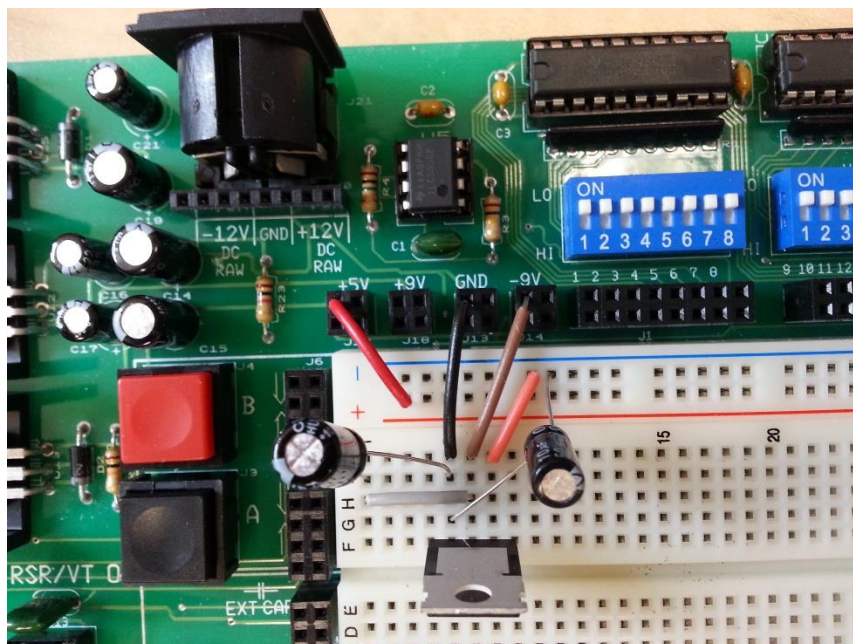
(8). Connect the ground to the rail at the bottom to make it compatible with the USB power supply.

(9) Test it with your DMM.