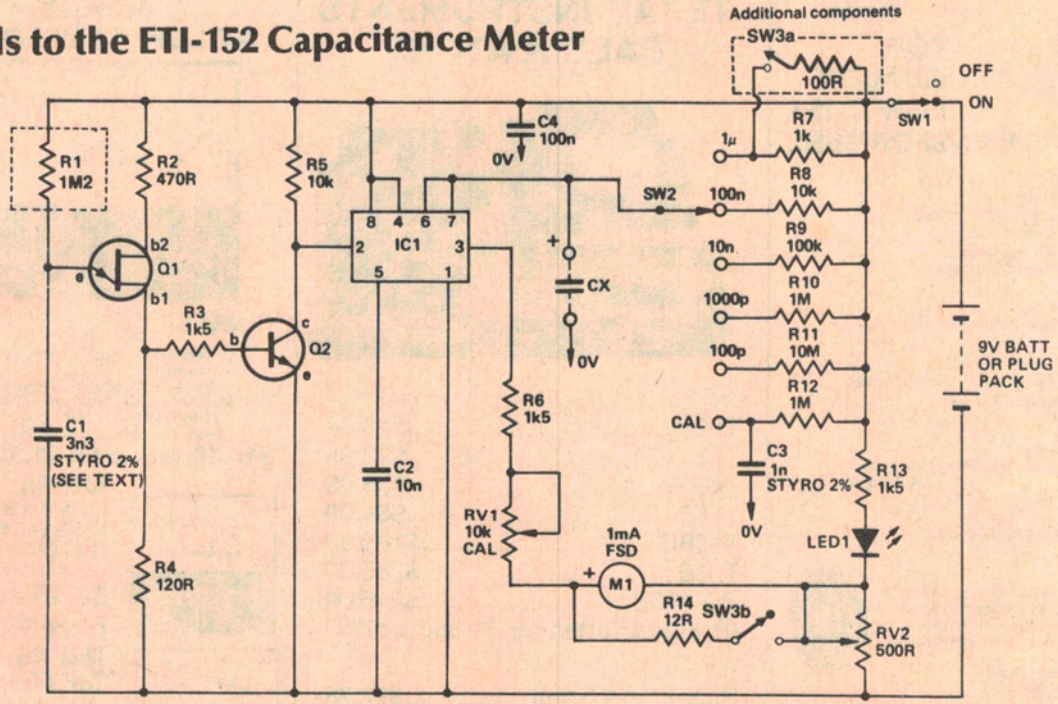
Mods to the ETI-152 Capacitance Meter



This project appeared in the February 1980 issue and was part of a short series of look-alike test instruments. Several readers pointed out that the unit did not work properly in the 1µ/x10 mode (i.e: 10µ full scale) as the integration time was not long enough. This problem is cured by a simple modification.

Firstly, SW3 should be changed to a double-pole, single-throw (DPST) type. Secondly, change R1 to 1M2, as shown in the new circuit diagram here. Add a 100 ohm resistor, switched across R7 by the other pole of SW3, as shown in the circuit diagram.

That should correct the problem.

Apart from that, some constructors found that RV2 (zero set control) was very close to one end of its range and difficult to adjust. This is probably brought about by LED1 having a fairly high voltage drop. To cure the problem, reduce R13 to 820 or 680 ohms.