

## Peak reading r.f. probe

This peak-reading r.f. probe has no d.c. offset adjustments, does not suffer from temperature instability, and is capable of measuring r.f. levels from 1mV to about 4V. It is designed to be an add-on circuit, for a multirange meter, and measures frequencies in excess of 100MHz. A CA3046 is arranged as two symmetrical d.c. Darlington pairs, and the maximum output offset was found to be  $700\mu\text{V}$ . The temperature coefficient is (according to the CA3046 data)  $1.1\mu\text{V}/\text{deg C}$ , and the input impedance is  $50\text{k}\Omega$  in parallel with  $3\text{pF}$ . To maintain this low capacitance the circuit must be constructed in a small screened case with a short probe tip and no i.c. socket. Current consumption is under 1mA.

