## **Problem HH 4.4**

Use an op-amp and a 1mA (full scale) meter to construct a "perfect" ammeter (i.e. one with zero input impedance) with 5mA full scale. Design the circuit so that the meter will never be driven more than  $\pm$  150% full scale. Assume that the op-amp output can swing to  $\pm$  13 volts ( $\pm$  15V supplies) and that the meter has 500 ohms internal resistance.