Three-Level Audio Sensor

**Objective:** build a circuit which detects audio signals above 3 pre-set dB levels. Additionally, allow the device to be turned off. An audio signal above the current dB setting enables an LED to turn on. Once audio drops below the dB setting, the LED deactivates.

**Required Components:**

* Resistors
  + 10k resistor
  + 2 - 22k resistor
  + 100k resistor
  + 3 - 56k resistor
  + 5.6k resistor
  + 560 resistor
  + 2.2k resistor
  + 1k resistor
  + 33k resistor
  + 330 resistor
* Capacitors
  + 100 nF 63V polyester
  + 10 uF 25V Electrolytic
  + 470 uF 25V Electrolytic
  + 47 uF 25V Electrolytic
* Other Components
  + LED
  + LM358 Low Power Dual Op Amp
  + BC327 45V 800mA PNP transistor
  + Miniature electret microphone
  + 2 poles, 4 ways rotary switch
  + Optional - 9 V PP3 Battery and Clip

