Basic Driver Circuits to Power Piezo Ceramic Benders

Basic Driver Circuits

The following circuits illustrate a few low cost examples of basic driver circuits. Utilizing simple electronic components, you can create circuits that will drive the Piezo Ceramic Benders when mounted on either the edge or nodal points. All of the units are compatible with either CMOS or TTL integrated circuits.

Op AMP or Comparator Drive

Often a simple amplifier circuit can be put to use driving a piezo transducer. For maximum sound, the output of the device should be driven at resonance or the frequency can be swept through the resonant point of the Piezo Ceramic Bender device.

CMOS Logic Oscillator Drive

The effective drive to the transducer can be doubled by driving each side of the bender with an inverted signal of opposite polarity.
Transistor Oscillator Drive

The feedback voltage developed forces oscillation at the resonant frequency of the device and its acoustic enclosure.

Low Cost Pulsing Circuit

Designed for minimum part count, this pulsing circuit will oscillate at resonance. The sound produced is more suitable for an alarm application and the rate of pulsing can be varied by charging the RC time constant.