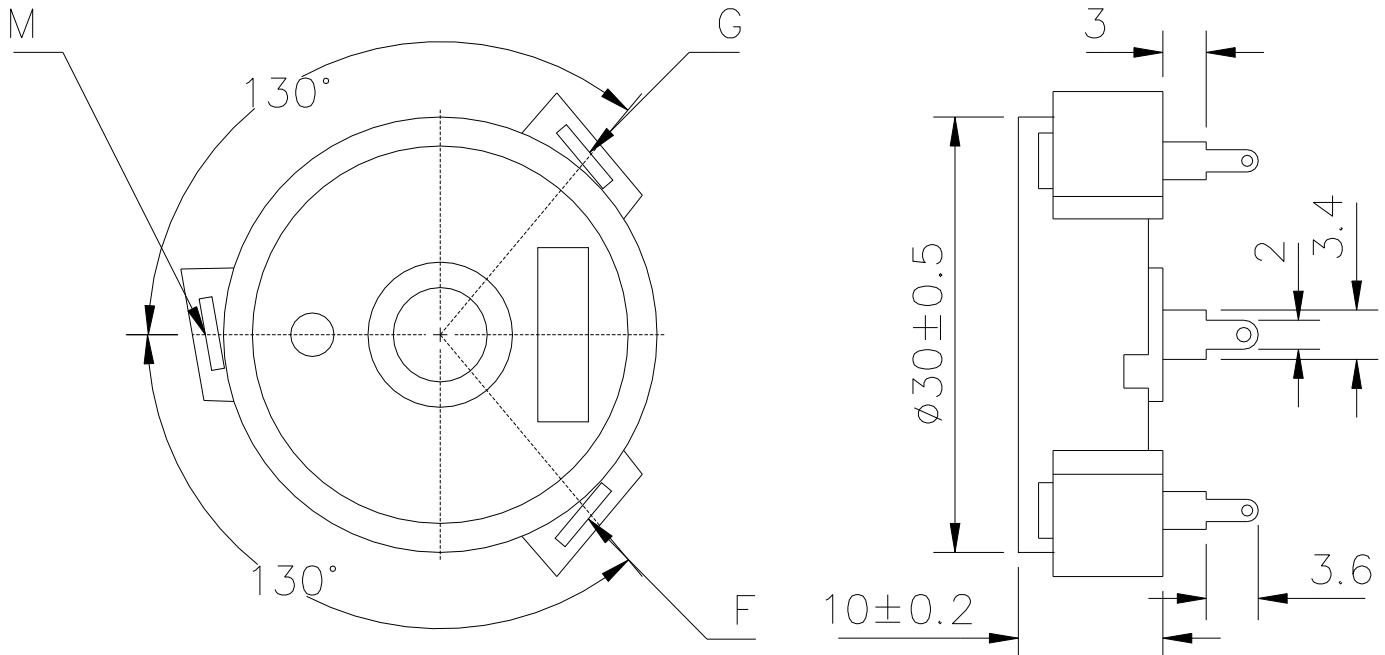


Specifications:

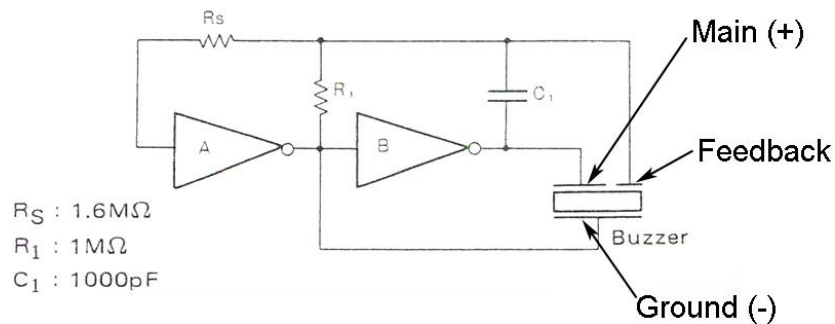
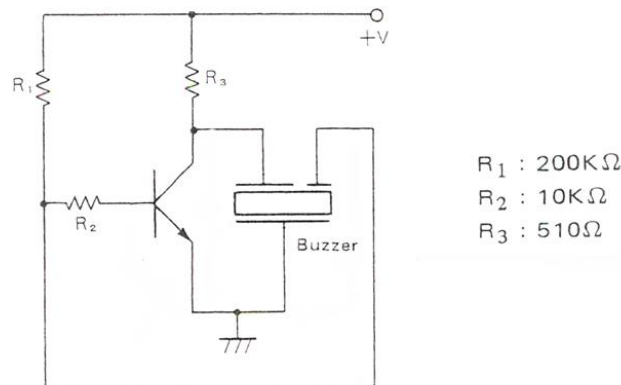
Resonant Frequency (Hz)	3500 ± 500
Operating Voltage (VDC)	3 ~ 28
Rated Voltage (VDC)	12
Current Consumption Max. (mA)	10 at Rated Voltage
Sound Pressure Level Min. (dB)	88 at 30cm at Rated Voltage
Operating Temperature (°C)	-20 ~ +90
Storage Temperature (°C)	-30 ~ +100
Housing	ABS 777D UL94HB plastic resin (Color: Black)
Leading Pin	Tin Plated Brass M = Main (Ceramic); F = Feedback; G = Ground (Metal)
Weight (Grams)	4.0
Condition by wave soldering (°C)	245 ± 5 / 3 ± 0.5 sec
Condition by hand soldering (°C)	350 ± 20 / within 5 sec
Options	For other options contact factory

Dimensions: (units: mm)**ROHS Compliant**

Self Drive Piezoelectric Transducer Operation:

Self-drive piezoelectric transducers do not have any DC circuitry included. They do have an additional third terminal that is connected to a feed-back portion on the piezoelectric transducer. By using a circuit which utilizes this feedback signal, the device will self-tune itself to its optimum resonant frequency which guarantees maximum sound level from each part.

Typical Drive Circuits:



Notes:

- These circuits are only initial suggestions. Values of the resistors may need to be adjusted depending on the particular transducer model used.
- Square-wave type signals result in more sound level than sine-wave type signals.
- The more peak-to-peak voltage applied to the transducer, the louder the sound level. However, applying more than 35 V_{pp} to the transducer is not recommended.
- The final circuit should be tested over the entire operating temperature range and voltage range of the equipment in which it is installed to verify adequate sound level will be produced.