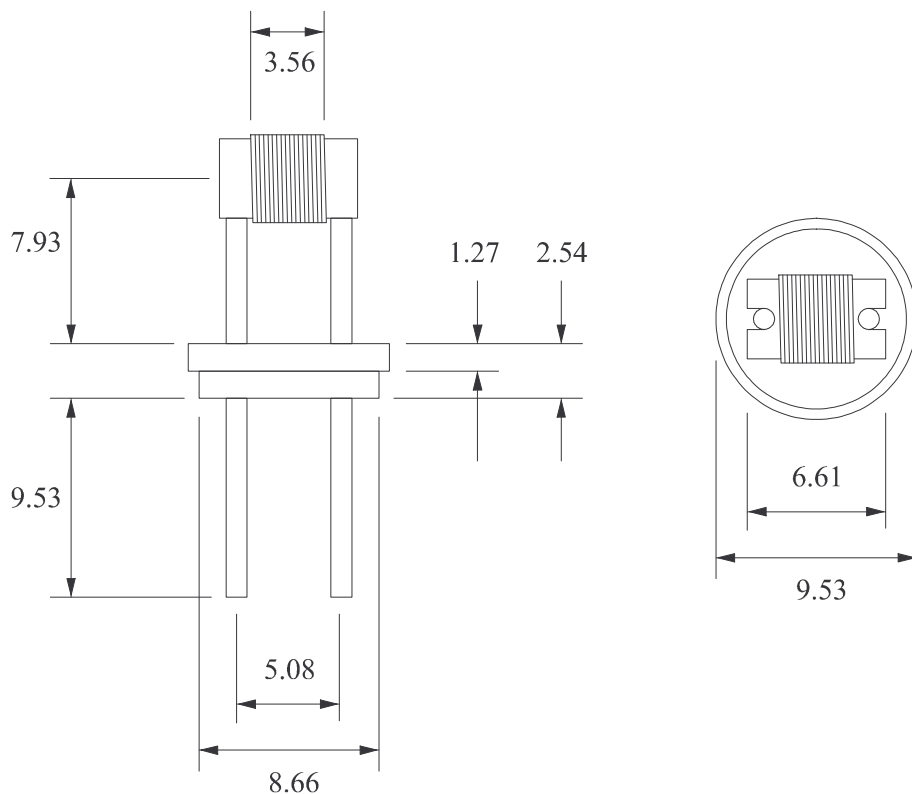


SERIES 12

8 & 11 WATT INFRA-RED EMITTERS

This IR source is a thermal emitter with emissivity of approximately 80%. It is appropriate for use in lab or field instrumentation due to its long life and stable properties. Modulated versions are under development.



The standard IR-12 coiled resistance wire filament operates at 800°C (1073K) when powered with 4.5 volts @ 1.8 amps (8 watts). The radiating element is a coil of resistance wire which has a high emissivity in the infra-red spectral region. The coil is wound on a grooved cylindrical alumina substrate, resulting in the windings being electrically insulated from each other. This contributes to a more uniform radiating source.

Operation in a controlled or sealed atmosphere is not required.

The emitter support pins also are the power leads and are sealed in an 8.7 mm dia. glass base.

The IR-12K uses a different wire to make the element. This means it can operate at 975°C but has a lower stability than the standard part.

The Series 12 is offered as follows:

Part #	Description
IR-12	Standard. High Stability
IR-12K	High Temperature – Lower Stability

Operating Specifications:

Part	IR-12	IR-12K
Temperature	800°C (1073K)	975°C (1248K)
Voltage	4.5 volts RMS (AC or DC)	6.0 volts RMS (AC or DC)
Current	1.8 Amps	1.8 Amps
Active Area	3.5 x 3.5 mm	
Emissivity	~ 80%	
Lifetime	3+ years typical	



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