

Fil-Tech's has developed a Stress Relieving Alloy® crystal to facilitate the difficult process of deposition of dielectric and high stress materials. The Stress Relieving Alloy crystals are fabricated from the same raw crystal material used for our gold and silver crystals. Fil-Tech Stress Relieving Alloy crystals are identical to our gold and silver except for the electrode coating. The following are the specifications for Stress Relieving Alloy crystals:

A) Physical Characteristics	Fil-Tech QI8008
1) Sensor material	Single crystal Alpha Quartz
2) Angle of Cut ¹	35° 15' (AT)
3) Contour	3 +/-0.5 diopter Plano-Convex
4) Surface Roughness	10 micron
5) Diameter	0.550" (13.97 mm)
6) Electrode	Silver Aluminum Alloy/Chromium
B) Electrical Characteristics ²	
1) Resonant Frequency (MHz)	5.975-5.993
2) Resistance at Resonance	<15 Ohms
3) Contact Resistance	<15 Ohms

1. The true angle of cut varies as a function of the contour. The true angle for this configuration crystal is actually 35 degrees 16 minutes.
2. Fil-Tech values are actual quality assurance specifications. Fil-Tech 100% inspects all crystals using 10 electrical parameters and cosmetic criteria. A detailed histogram of Fil-Tech lot measurements is also available upon request.

Note: Fil-Tech believes that high-level inspections are required to maintain the high quality crystal production demanded by our end users. In addition to the electrical and physical parameters listed above, Fil-Tech also measures motional capacitance and inductance, spurious resonance separation, and static capacitance to help track subtle changes in incoming quartz quality and in the production process.

Specifications for Fil-Tech QI8008 Stress Relieving Alloy Quartz Crystals

Fil-Tech_{inc.}

6 Pinckney Street, Boston, MA 02114
www.filtech.com
paula@filtech.com
Call: 800-743-1743
Tel: 617-227-1133
Fax: 617-742-0686