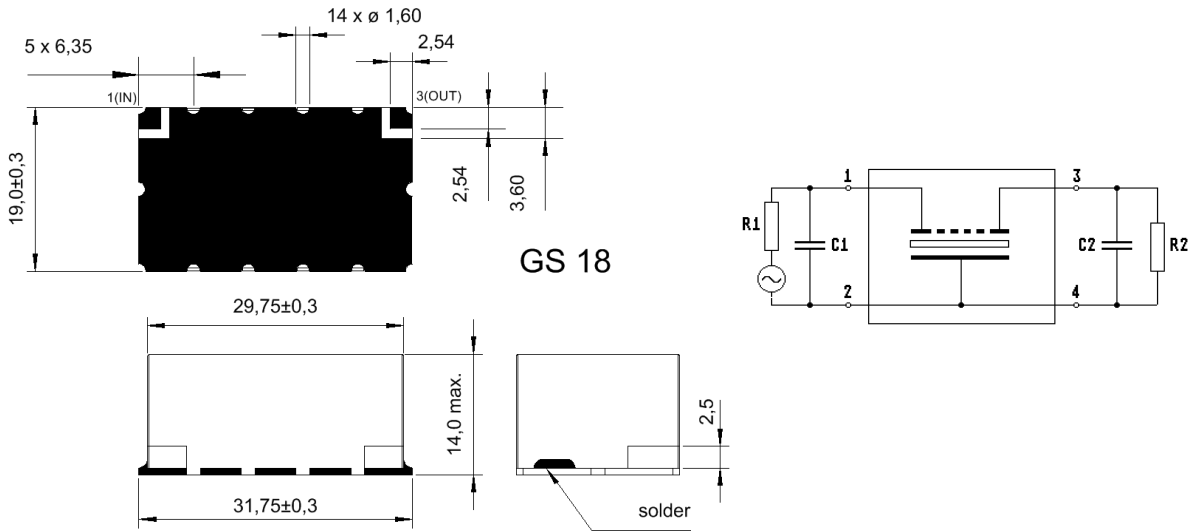


Specification for crystal filter: QF 6.990.....7.010-0280/06

1. General

1.1. Package



- 1.2. Type name: QF 6.990.....7.010-0280/06
- 1.3. Number of poles: 5
- 1.4. Operating temperature range: -30°C to +85°C
- 1.5. Storage temperature range: -45°C to +85°C

2. Electric values

- 2.1. Nominal centre frequency fo [MHz]: 6.990 , 6.992, 6.994, 6.996, 6.998, 7.000, 7.002
7.004, 7.006, 7.008, 7.010
- 2.2. **Pass band**
 - 2.2.1. Centre frequency fc at 25°C . 3°C: fo . 180Hz
 - 2.2.2. Bandwidth between 3 dB - frequencies: > fc , 1.4 kHz
 - 2.2.3. Ripple at fc . 0.8 kHz: < 1.0 dB (< 0.5 dB peak to peak)
 - 2.2.4. Insertion loss: < 3.0 dB
(measured on smallest attenuation in pass band)
- 2.3. **Stop band**
 - 2.3.1. fc . 5.5 kHz > 60 dB
 - 2.3.2. Alternate Attenuation > 70 dB (except spurious)
- 2.4. Nominal input power level +10 dBm
 - 2.4.1. Maximal input power level +25 dBm
- 2.5. Terminating impedance R//C (input and output): 50 . // 0 pF
- 3. Marking (i. e.): manufacturer, date code
QF 6.990-0280/06

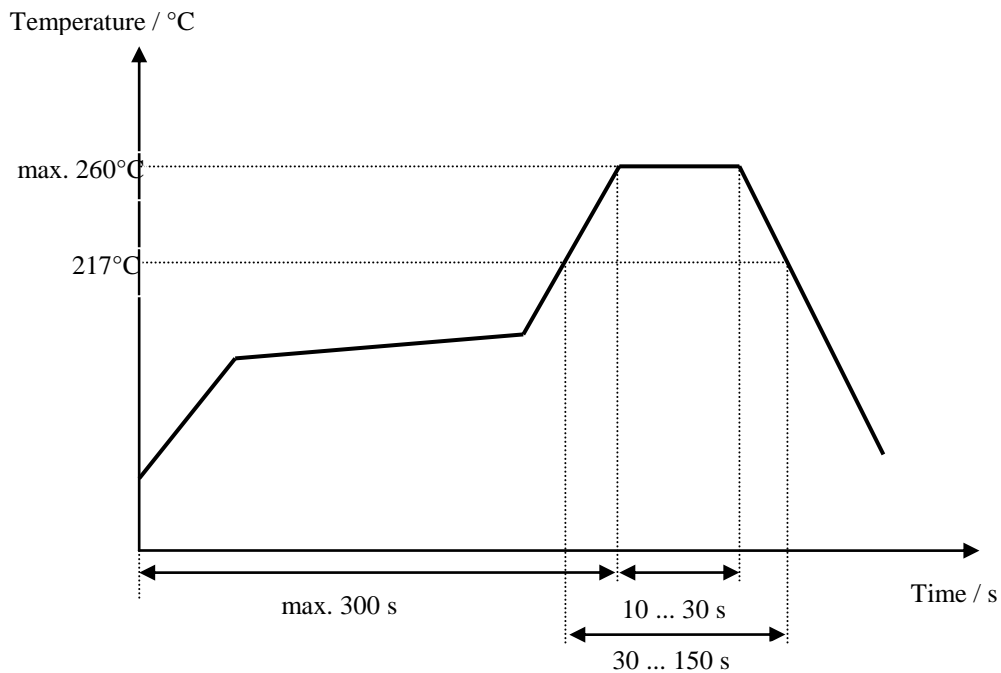
4. Environment conditions:

vibration: 9.8 g, 20-2000 Hz, duration 60 sec. each axis.
 shock: 40g, 11 ms, ½ sine; change of
 temperature: -30.....+70 Deg. C with exposure time rate at 5 Deg. C / min.

5. Air reflow temperature conditions

conditions	Exposure
average ramp-up rate (30°C to 217°C)	less than 3°C/second
> 100°C	between 300 and 600 seconds
> 150°C	between 240 and 500 seconds
> 217°C	between 30 and 150 seconds
peak temperature	max. 260°C
time within 5°C of peak temperature	between 10 and 30 seconds
cool-down rate (starting at peak temperature to 50°C)	less than 6°C / second
time from 30°C to peak temperature	no more than 300 seconds

Chip-mount air reflow profile



Edited by: _____ date: _____ name: _____