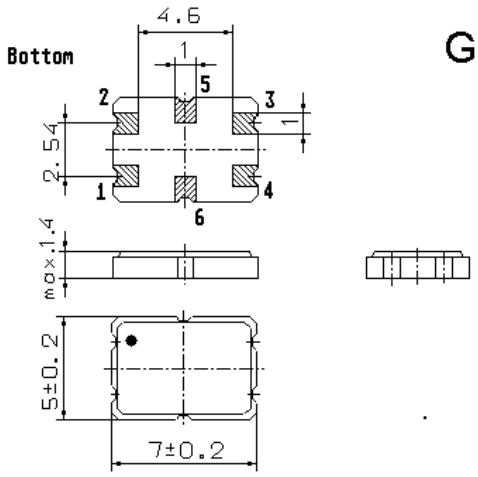
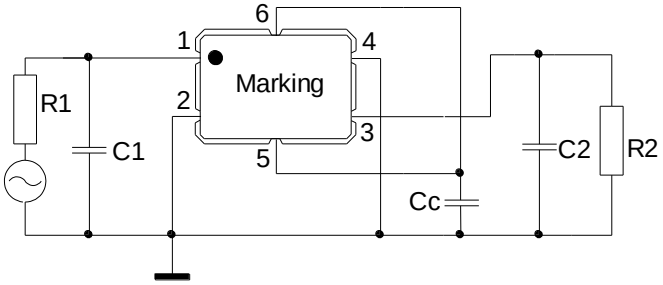
Specification for monolithic crystal filter: **M Q F 9 0 . 0 - 5 0 0 0 / 0 2**

1. General

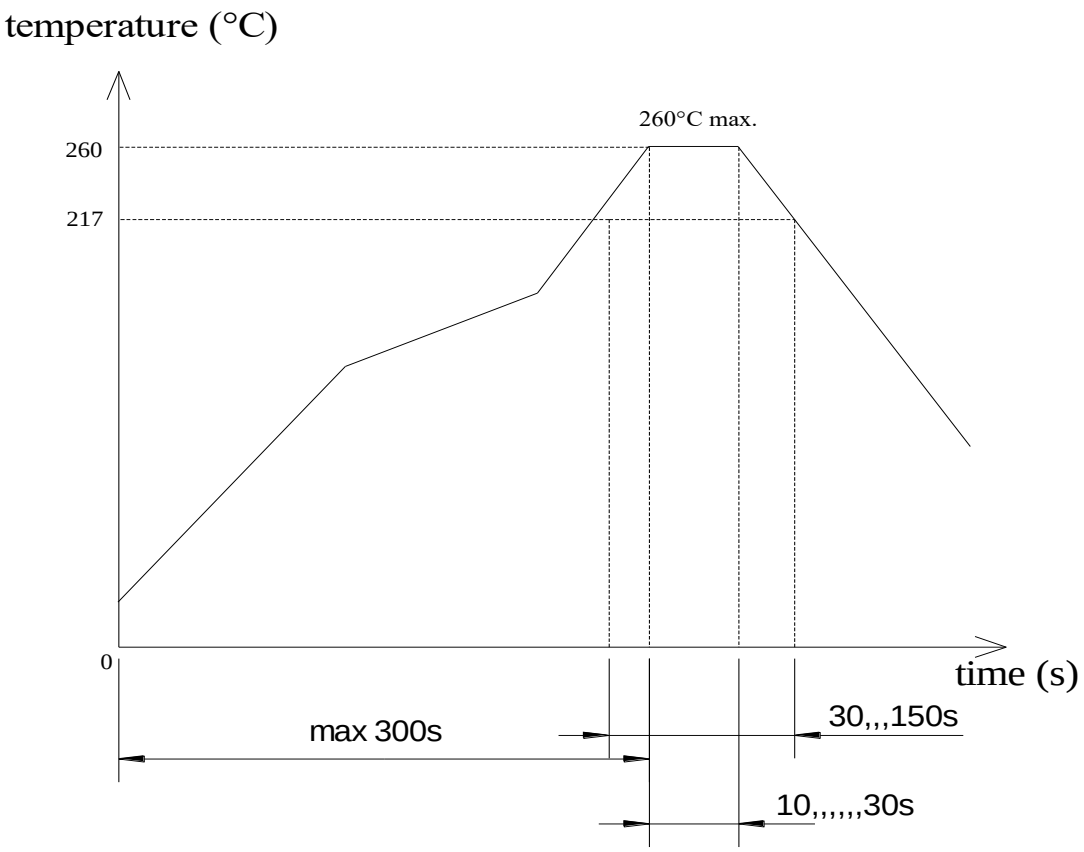
1.1. Package:



GS 2



pin1	INPUT
pin2,4	GND
pin3	OUTPUT
pin5,6	Coupling capacitance Cc



Reflow soldering: three times max.

1.2.	Type name:	MQF 90.0-5000/02
1.3.	Number of poles:	4
1.4.	Operating temperature range:	-40°C to +85°C
1.5.	Storage temperature range:	-55°C to +125°C

2. Electric values

2.1.	Nominal centre frequency fo:	90.0 MHz

2.2. **Pass band**

2.2.1.	Bandwidth between 3 dB - frequencies:	> fo ± 25 kHz
2.2.2.	Ripple:	< 1.0 dB at fo ± 16.0 kHz
2.2.3.	Insertion loss: (measured on smallest attenuation in passband)	< 5.0 dB
2.2.4.	Group delay distortion:	< 10 µs at fo ± 16.0 kHz

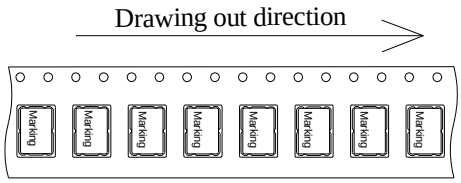
2.3. **Stop band**

2.3.1.	fo ± 50kHz	> 15 dB
2.3.2.	fo ± 100 kHz	> 35 dB
2.3.3.	fo ± 500 kHz…….1000 kHz	> 50 dB
2.3.4.	Guaranteed attenuation	> 70 dB (except spurious)
2.3.5.	Spurious response + 500 kHz…...1000 kHz	> 40 dB

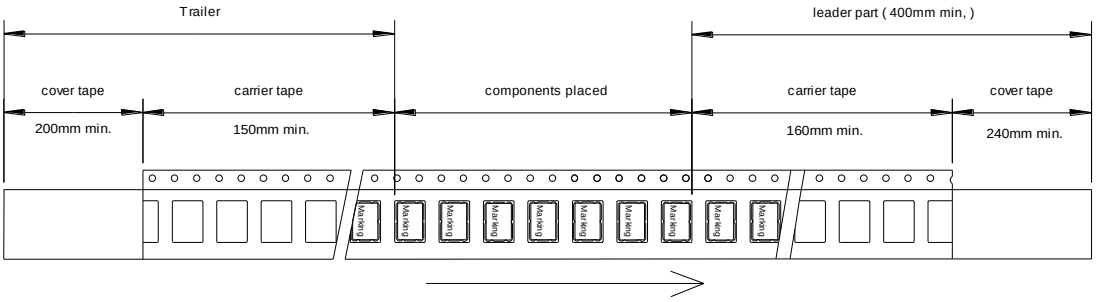
2.4.	Terminating impedance (input and output):	770 Ω // 0.7 pF
2.4.1.	Coupling capacitance Cc:	3.3 pF
2.5.	Input power level for reference measurement:	-10 dBm
2.5.1.	Maximum input power level without destruction:	0 dBm
3.	Marking:	M90A3 yyww
4.	Environment conditions:	Corresponding to MCHP general test procedure MCF-Com

5. Packing

maximum 1000 pcs. / reel

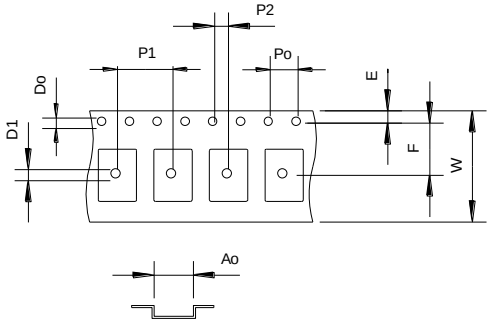


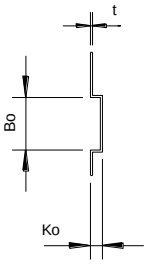
Tape dimension (mm)



Tape (all dimensions in mm)

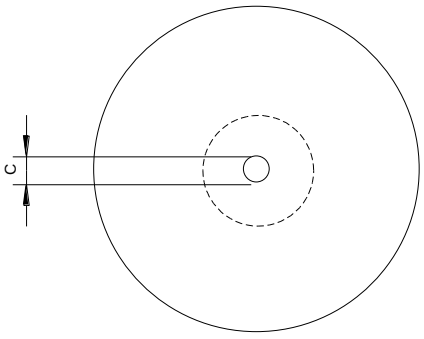
W: 16.0 ± 0.1
Po: 4.0 ± 0.1
P1: 8.0 ± 0.1
P2: 2.0 ± 0.1
Do: 1.5 +0.1 / -0
D1: 1.6 +0.1 / -0
E: 1.75 ± 0.1
F: 7.5 ± 0.1
Ko: 1.7 ± 0.1
Ao: 5.6 ± 0.1
Bo: 7.6 ± 0.1
t: 0.3 ± 0.05

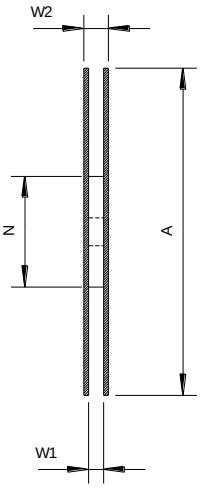




Reel (all dimension in mm)

A: ø 178 ± 2
C: ø 13 ± 0.5
N: ø 60 ± 1
W1: 17.5 ± 1.5
W2: 21.5 ± 1.5





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