



ISSUE 12; August 2012 - RoHS 2011/65/EU



Description

- Standard 7 x 5 crystal oscillators
- Ceramic package with a seam sealed metal lid, hermetically sealed
- Stock parts available
- Fast Make capability: CFPP-72 series programmable oscillators are the nearest equivalent fast make model
- MEMS capability: IQMS-500 series oscillators are the nearest equivalent MEMS model

Frequency Range

- Frequency 0.5 to 100.0 MHz

Supply Voltage

- Voltage 5.0V $\pm 10\%$

Ageing

- Ageing $\pm 3\text{ppm}$ per year max

Output Compatibility & Load

- Output Compatibility HCMOS/TTL

Maximum Capacitive Load	
0.5MHz to 50MHz	50pF max
>50MHz to 80MHz	30pF max
>80MHz to 160MHz	15pF max

Frequency Stabilities

- Frequency Stability $\pm 25\text{ppm}$, $\pm 50\text{ppm}$, $\pm 100\text{ppm}$
(inclusive of supply voltage and output load variations over the operating temperature range)

Operating Temperature Ranges

- 0 to 70°C
- 40 to 85°C

Output Control

- Standby Operation
Logic '1' (>70% VS) to pad 1 enables oscillator output
Logic '0' (<30% VS) to pad 1 disables oscillator output; the oscillator output goes to the high impedance state
No connection to pad 1 enables oscillator output
Standby Current: 10 μ A max

Environmental Parameters

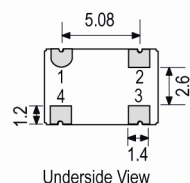
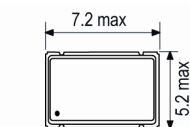
- Shock: MIL-STD-202, Method 213, Condition E
- Vibration: MIL-STD-883, Method 2007, Condition A
- Storage Temperature Range: -55 to 125°C

Packing Details

- Pack Style: **Bulk** Loose in bulk pack
Pack Size 100
- Pack Style: **Reel** Tape and reel in accordance with EIA-481-D
Pack Size 1,000
- Alternative packing options available

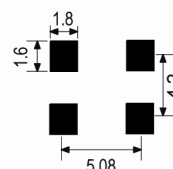


Outline (mm)

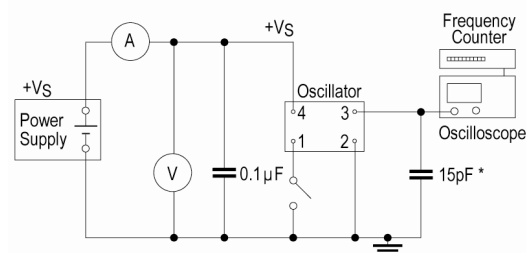


Pad Connections
1. Standby Operation
2. GND
3. Output
4. +VS

Solder Pad Layout



Test Circuit



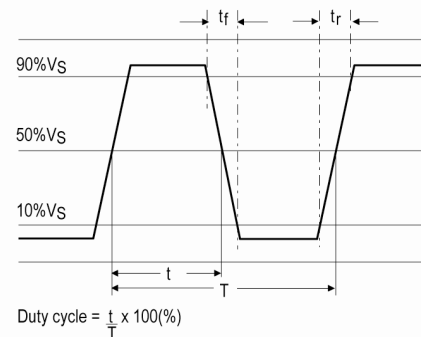
* Inclusive of jigging and equipment capacitance

Sales Office Contact Details:

UK: +44 (0)1460 270200
Germany: +49 (0)7264 9145-0

France: +33 (0)5 34 50 91 18
USA: +1 (0) 650 798 5047

Email: info@iqdfrequencyproducts.com
Web: www.iqdfrequencyproducts.com

**Wave Form****Electrical Specification - maximum limiting values 5.0V ±10%**

Frequency Range	Temp Range	Stability Inclusive		Current Draw	Rise & Fall (10 to 90%)	Duty Cycle %
		Min	Max			
0.5 to 20.0MHz	0 to 70°C	±25ppm	±100ppm	20.0mA	10ns	45/55
	-40 to 85°C	±25ppm	±100ppm	20.0mA	10ns	45/55
20.000001 to 35.0MHz	0 to 70°C	±25ppm	±100ppm	30.0mA	6ns	45/55
	-40 to 85°C	±25ppm	±100ppm	30.0mA	6ns	45/55
35.000001 to 70.0MHz	0 to 70°C	±25ppm	±100ppm	50.0mA	6ns	45/55
	-40 to 85°C	±25ppm	±100ppm	50.0mA	6ns	45/55
70.000001 to 100.0MHz	0 to 70°C	±25ppm	±100ppm	70.0mA	6ns	45/55
	-40 to 85°C	±25ppm	±100ppm	70.0mA	6ns	45/55

This document was correct at the time of printing; please contact your local sales office for the latest version

Sales Office Contact Details:

UK: +44 (0)1460 270200
Germany: +49 (0)7264 9145-0

France: +33 (0)5 34 50 91 18
USA: +1 (0) 650 798 5047

Email: info@iqdfrequencyproducts.com
Web: www.iqdfrequencyproducts.com