



ISSUE 3; August 2014 - RoHS 2011/65/EU

Description

- 5.0 x 3.2mm surface mount voltage controlled crystal oscillators (VCXOs) in a hermetically sealed ceramic package



Frequency Parameters

- Frequency 2.0MHz to 52.0MHz
- Frequency Stability $\pm 25.00\text{ppm}$ to $\pm 100.00\text{ppm}$
- Modulation Bandwidth: $>20\text{kHz}$
- Linearity $\leq \pm 10\%$ Positive

Electrical Parameters

- Supply Voltage 3.3V $\pm 5\%$

Frequency Adjustment

- Pulling $\pm 100\text{ppm min}$
- Control Voltage 1.65V $\pm 1.5\text{V}$
- Input Impedance 100k Ω typ

Operating Temperature Ranges

- 10 to 70°C

Output Details

- Output Compatibility HCMOS
- Drive Capability 15pF Max
- Logic '1' ($>70\%V_s$) to pad 6 enables oscillator output
Logic '0' ($<30\%V_s$) to pad 6 disables oscillator output; when disabled the oscillator output goes into high impedance state
No connection to pad 6 enables oscillator output

Noise Parameters

- Phase Noise (max):
-65dBc/Hz @ 10Hz
-98dBc/Hz @ 100Hz
-125dBc/Hz @ 1kHz
-135dBc/Hz @ 10kHz
-145dBc/Hz @ 100kHz

Environmental Parameters

- Storage Temperature Range: -40 to 85°C

Ordering Information

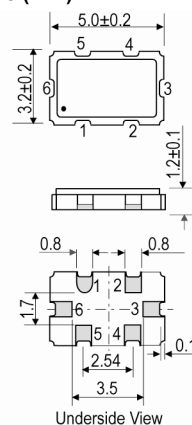
- Frequency*
- Model*
- Output
- Frequency Stability (over operating temperature range)*
- Operating Temperature
- Supply Voltage
- Pullability
- Example
3.0MHz CFPV-59
HCMOS $\pm 100\text{ppm}$ -10 to 70C 3.3V $\pm 100\text{ppm min}$

Compliance

- RoHS Status Compliant
- REACH Status Compliant
- MSL Rating (JDEC-STD-033): Not Applicable

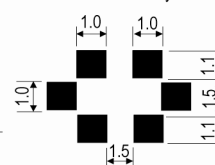


Outline (mm)



- Pad Connections
1. Voltage Control
 2. GND
 3. GND or N/C
 4. Output
 5. +Vs
 6. Enable/Disable

Solder Pad Layout



Sales Office Contact Details:

UK: +44 (0)1460 270200
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France: +33 (0)5 34 50 91 18
USA: +1 408.273.4530

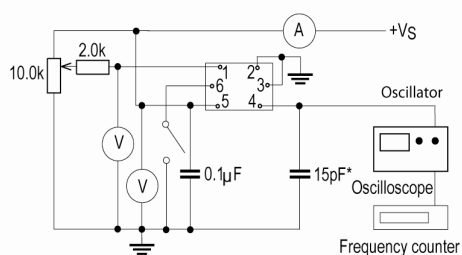
Email: info@iqdfrequencyproducts.com
Web: www.iqdfrequencyproducts.com



Packaging Details

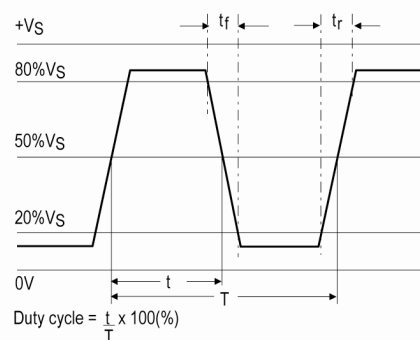
- Pack Style: Reel Tape & reel in accordance with EIA-481-D
Pack Size: 1,000
- Pack Style: Bulk Loose in bulk pack
Pack Size: 100
- Pack Style: Cutt In tape cut from a reel
Pack Size: 1

Test Circuit



*Inclusive of jigging and equipment capacitance

Wave Form



Electrical Specification - maximum limiting values 3.3V $\pm$ 5%

Frequency Min	Frequency Max	Temperature Range	Stability (min)	Current Draw	Rise and Fall Time	Duty Cycle
		°C	ppm	mA	ns	%
2.0MHz	30.0MHz	-10 to 70	$\pm$ 25.0	15	5	40/60
30.000001MHz	52.0MHz	-10 to 70	$\pm$ 25.0	25	5	40/60

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