CFPS-39

SURFACE MOUNT SPXOs

ISSUE 1; 19 OCTOBER 2004

Delivery Options
- Please contact our sales office for current leadtimes

Description
- The CFPS-39 is a 3.3V, ultra minature surface mount oscillator with a HCMOS output

Output Compatibility
- Tri-state HCMOS
- Drive Capability 15pF max

Package Outline
- 3.2 x 2.5mm SMD Package

Frequency Range
- 1.80 to 50.0MHz

Frequency Stabilities
- ±25ppm, ±50ppm, ±100ppm (inclusive of supply voltage & output load variations over the operating temperature range)

Operating Temperature Ranges
- -10 to 70°C (CFPS-39)
- -40 to 85°C (CFPS-39I)

Storage Temperature Range
- -55 to 125°C

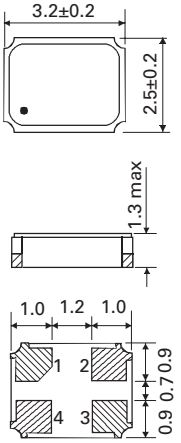
Tri-state Operation
- Logic '1' to pad 1 enables oscillator output (≥70% Vs)
- Logic '0' to pad 1 disables oscillator output; when disabled the oscillator output goes to the high impedance state (≤30% Vs)
- No connection to pad 1 enables oscillator output

Solder Conditions
- For typical soldering conditions, please see the relevant pages in Applications Notes

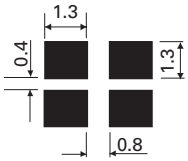
Marking
- Frequency

Minimum Order Information Required
- Frequency + Model Number + Operating Temperature Code (if applicable) + Frequency Stability

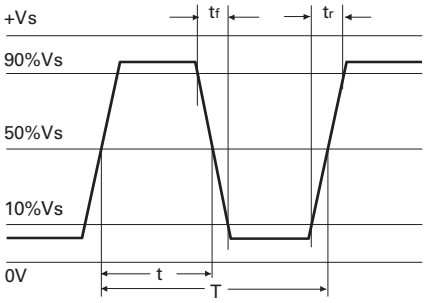
Outline in mm



Pad Connections
1. Enable/Disable
2. GND
3. Output
4. +Vs

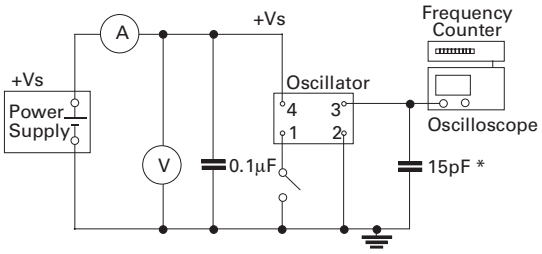


Output Waveform



Duty cycle = $\frac{t}{T}$ x 100(%)

Test Circuit - HCMOS



* Inclusive of jigging & equipment capacitance

Europe Tel: +44 (0)1460 270200 Fax: +44 (0)1460 72578
Americas Tel: +1 919 941 9333 Fax: +1 919 941 9371
Asia Tel: +86 755 8826 5991 Fax: +86 755 8826 5990

Website: www.cmac.com

Electrical Specification - maximum limiting values when measured in HCMOS test circuit

Frequency Range	Frequency Stability	Supply Voltage	Supply Current	Rise Time (tr)	Fall Time (tf)	Duty Cycle	Model Number
1.80 to 50.0MHz	±25ppm*, ±50ppm, ±100ppm	3.3V±10%	20mA	6ns	6ns	45/55%	CFPS-39 CFPS-39I

Ordering Example 24.0MHz CFPS-39 I C

Frequency

Model No

Operating Temperature Code: I = -40 to 85°C: Not applicable for -10 to 70°C

Frequency Stability: A = ±25ppm, B = ±50ppm, C = ±100ppm

*Note - Code IA, ±25ppm over -40 to 85°C is not available

Please note that the rise and fall times listed are the maximum values we specify to cover various frequency breaks. In practise the actual values are generally lower depending upon the spot frequency chosen. For typical values please contact our sales office.

Europe Tel: +44 (0)1460 270200 Fax: +44 (0)1460 72578
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Website: www.cmac.com