## Crystal Clock Oscillator Specification

### IQD Part No. + Packaging: LFSPX0071920RL3K

### Wurth Part No. 830207192009

### Description
- Surface mount 3.2 x 2.5mm crystal oscillator in a hermetically sealed ceramic package with a seam sealed metal lid.
- Model: CFPS-39
- Model Issue number: 5

### Frequency Parameters
- Frequency: 8.0MHz
- Frequency Stability: ±25.00ppm
- Operating Temperature Range: -40.00 to 85.00°C
- Ageing: ±3ppm max per year @ 25°C

### Electrical Parameters
- Supply Voltage: 3.3V ±10%
- Current Draw: 7.000mA

### Output Details
- Output Compatibility: CMOS
- Drive Capability: 15pF max
- Rise and Fall Time: 5.0ns max
- Duty Cycle: 45/55%

### Output Control
- Standby Operation:
  - Logic ‘1’ (>70% VS) to pad 1 enables oscillator output
  - Logic ‘0’ (<30% VS) to pad 1 disables oscillator output; when disabled the oscillator output goes to the high impedance state
- No connection to pad 1 enables oscillator output
- Standby Current: 10μA max
- Start-Up Time: 10ms max

### Environmental Parameters
- Storage Temperature Range: –55 to 125°C
- Shock: MIL-STD-202F, Method 213B: 1000G, 0.5ms, 1/2 sine wave
- Vibration: MIL-STD-202F, Method 204D, Test Condition D: 20G (10Hz-2000Hz), 4hrs in 3 mutually perpendicular planes (total 12hrs)

### Manufacturing Details
- Maximum Process Temperature: 260°C (10secs max)
- RoHS Terminations: Ni/Au
- RoHS Reflow Temp: 260degC 10s

### Compliance
- RoHS Status (2011/65/EU): Compliant
- REACh Status: Compliant
- MSL Rating (JDEC-STD-033): Not Applicable

### Packaging Details
- Pack Style: RL3K
- Tape & reel in accordance with EIA-481-D
- Pack Size: 3,000

### Contact Information:
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**Outline (mm)**

![Outline Diagram](attachment:image.png)

**Pad Connections**
- 1: Enable/Disable
- 2: GND
- 3: Output
- 4: +Vs

**Solder Pad Layout**

**Underside View**

**Test Circuit**

![Test Circuit Diagram](attachment:image.png)

**Inclusive of jigging & equipment capacitance**

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Alternative packing option available

USEFUL LINKS

Toolbox:
www.we-online.com/toolbox

Product Catalog:
www.we-online.com/products

Wave Form

![Wave Form Diagram](image-url)