

深圳市晶科鑫实业有限公司



样品承认书

| | |
|-----------|---|
| 客户代码: | |
| 物料名称: | 贴片钟振 |
| 规格型号: | SMD2016 8.192MHz 3.3V ±30PPM总频差 -40~85℃ |
| P N/ SJK: | 1N08192G33YC |
| 环保属性: | <input checked="" type="checkbox"/> RoHS <input checked="" type="checkbox"/> REACH <input checked="" type="checkbox"/> HF <input type="checkbox"/> PAHS <input type="checkbox"/> 其它 |
| 版 次: | A1 2025-7-29 初版 最小包装: 3000pcs/real |
| 湿敏等级: | 一级 |

| 承 认 签 章 | | | | | |
|-----------|-----|-----|---|-----|-----|
| 供 应 商 承 认 | | | () 公 司 承 认 | | |
| 制 定 | 审 核 | 核 准 | 工 程 师 | 审 核 | 批 准 |
| 贺丹斌 | 李相同 | 刘惠光 | | | |
| SJK 支持 | | | 盖 章 签 署 | | |
| FAE_EMAIL | | | 日 期 | | |
| 日 期 | | | 批 示: <input type="checkbox"/> 接受 <input type="checkbox"/> 有条件接受 | | |
| 备注: | | | | | |

FEATURE

- Ultra Small SMD seam sealed clock crystal oscillator units.
- For applications in WLAN, Bluetooth,DSC, DSL and other IT product.
- Tri-state function available.
- RoHS Compliant / Pb Free.

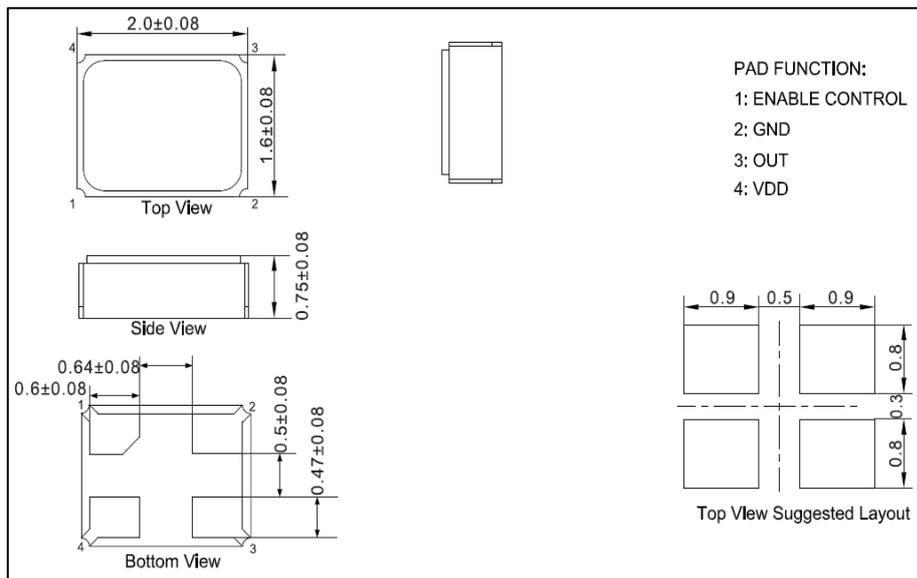
ELECTRICAL SPECIFICATIONS

| Parmeters | Condition\Model | 1N |
|-----------------------|----------------------------------|----------------------------|
| Fan Out Type | | CMOS |
| Supply Voltage | | 3.3V±10% |
| Frequency | | 8.192MHz |
| Operating Temperature | | -40°C to +85°C |
| Current | | 5mA max |
| Frequency Stability | AT 25°C | ±10ppm |
| | Over Operating Temperature range | ±20ppm |
| Output Voltage | Vol(max) | 10%VDD |
| | VoH(min) | 90%VDD |
| Rise/Fall Time | AT 0.1VDD~0.9VDD | 5ns max |
| Load Capacitance | | 15pF |
| Duty Cycle | | 50±10% |
| Storge Temperature | | -55~+125°C |
| Start-upTime | | 5ms max |
| Aging | | ±3ppm (first year at 25°C) |
| Tri-State | Output Active | 0.7VDD Min Pin 1 Tri-state |
| | Output in High-Impedance state | 0.3VDD Max |
| PAD Connection | PIN#1 Tri-State/NC | PIN#3 OUT |
| | PIN#2 GND | PIN#4 Vdd |

Crystal oscillator SMD CMOS Output 2.0×1.6×0.75mm 1N Series



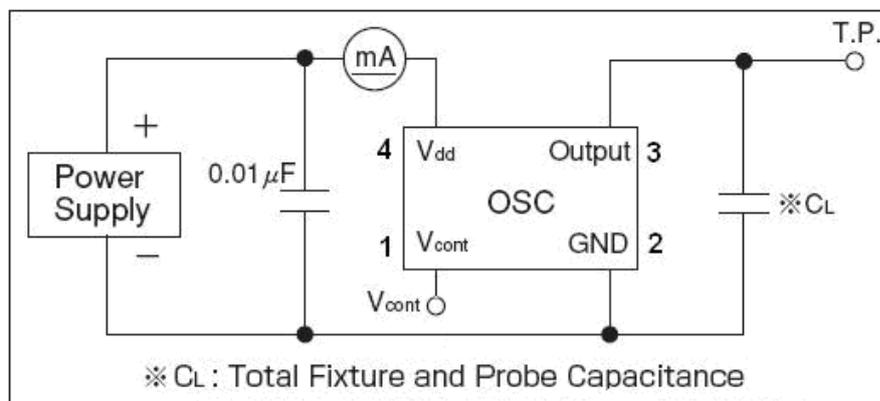
DIMENSION (Unit: mm)



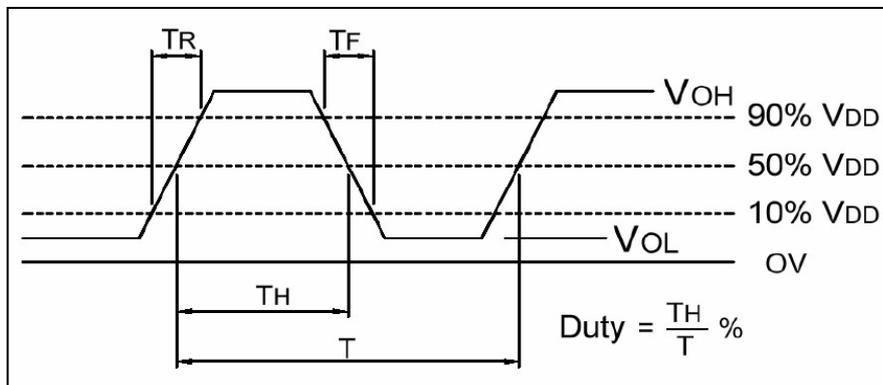
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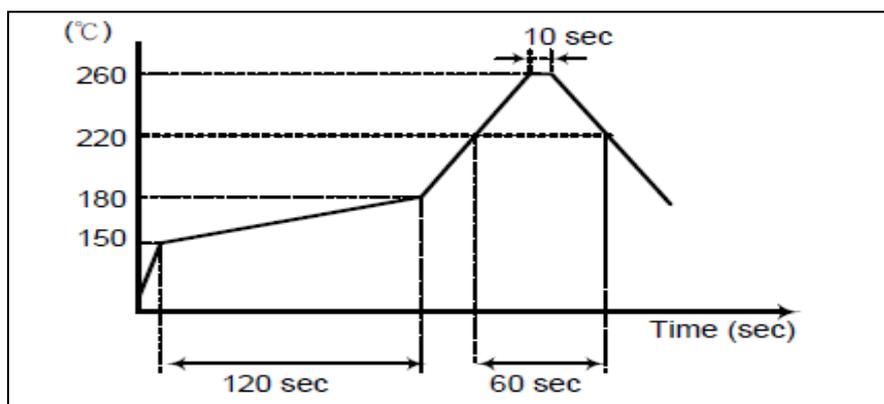
MEASUREMENT CIRCUIT



WAVEFORM CONDITIONS



REFLOW CONDITION

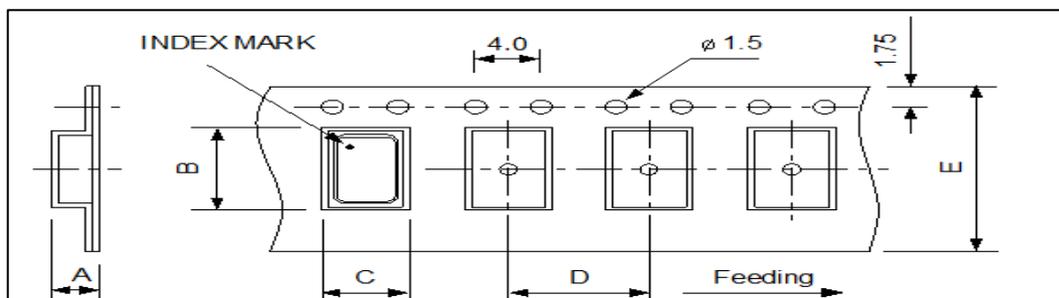


The reflow temperature profile may vary depending on the product model, specifications and frequency range. Refer to the individual product specifications for details

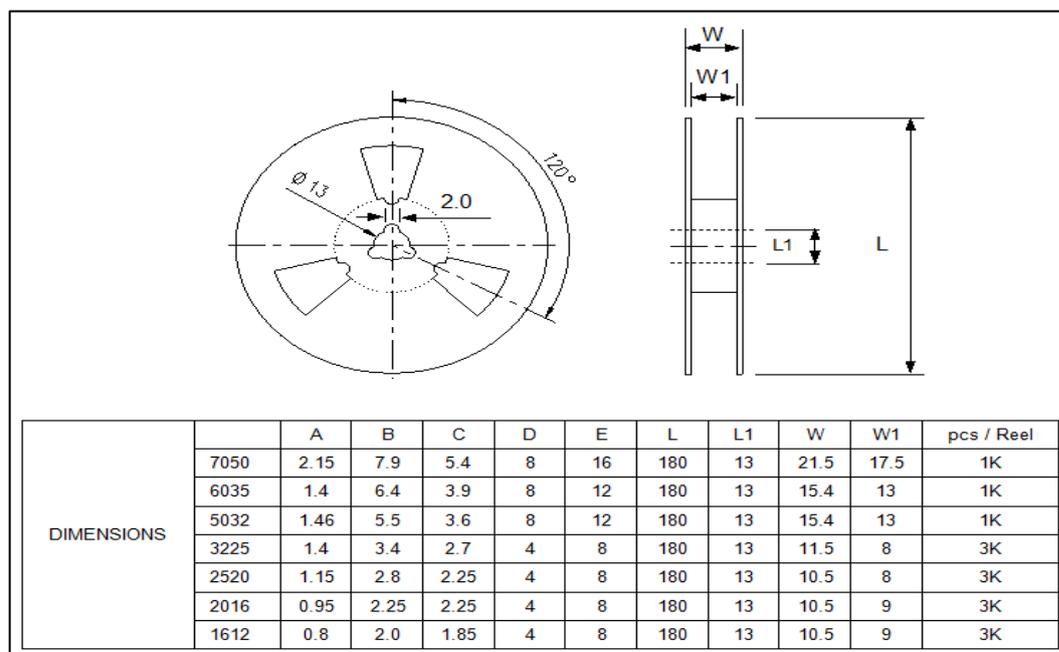
Note

1. General cleaning solutions or ultrasonic cleaning method may be used to clean our products. However, under certain circumstances, ultrasonic cleaning machine could generate resonance at the oscillation frequency of our products and thus deteriorate the electrical characteristics in devices, and even damage the overall structure of devices. Therefore, verification test is recommended before cleaning.
2. Avoid mounting and processing by Ultrasonic welding this method has a possibility of an excessive vibration spreading inside the crystal products and becoming the cause of characteristic deterioration and not oscillating.

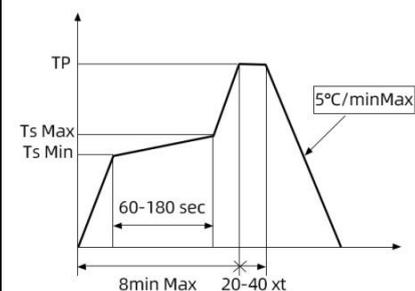
CARRIER TYPE



REEL



RELIABILITY TEST SPECIFICATIONS

| Test item | Equipment | Condition | Specification |
|--|--|---|--------------------------------|
| 1.SOLDERABILITY TEST | SJK-REL001、RC-328A | TP:260℃ TsMax: 200℃ TsMin: 150℃ 2 time  | MIL-STD-883E Method 2003.7 |
| 2. HERMETICITY TEST | HELIOT-306S | Pressurized 0.4~0.5Mpa ethanol sealed tank for 10 minutes | MIL-STD-883E Method 1014.10 |
| 3. VIBRATION TEST | HG-V4、S&A 250B | Enable Crystal(10g) from 10-55-10Hz,X、Y、Z horizontal,1 Minute vibration/time, 1time/ 2 hours. | MIL-STD-883E Method 2007.3 |
| 4. MECHANICAL SHOCK | HPC-200、S&A 250B | Enable Crystal 50G(490m/s ²) time=11 ms speed=3.4 m/s half sine wave oscillation | JIS C6701 |
| 5. DROP TEST | HARD BOARD.S&A250B | 75cm High,3 times on hard board | MIL-STD-202F Method 213B |
| 6. HIGH&LOW TEMP STORAGE TEST(Static test) | H-PTH-80CK & HM101-3ABN, S&A 350B/250B | High temperature: 125℃±2℃,1000hr; Low temperature:-40℃±3℃,1000hrs | MIL-STD883C, METHOD 1011.8 |
| 7. TEMP &HUM CYCLING TEST | H-PTH-80CK CHAMBE, S&A 350B/250B | Temperature:-10℃±2℃~65℃±2℃,Humidity:93±3%,1 cycle need 24 hrs. 5cycles. | MIL-STD-883E Method 1005.8 |
| 8. HIGH TEM. & HUM.STORAGE TEST | H-PTH-80CK CHAMBE, S&A350B/250B | Temperature:85℃±2, Humidity:85+3,-2%,Store 96 hrs | JIS C6701 |
| 9. AGING TEST | H-PTH-80CK CHAMBE, S&A350B/250 | Temperature:85℃±2, Store 1000 hrs | JIS C5023 |