

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:	2520 温度补偿晶振TCXO	
规格型号:	2520 32.000MHZ 3.3V ±1PPM -30~85°C	
P N/ SJK:	7Q32000I33ZF	
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 2017-6-10 初版	最小包装 3K/盒
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:					

Crystal oscillator



SMD TCXO Module 2.5×2.0×0.8 7Q eries

FEATURE

- Temperature Stability: ± 0.5 ppm ~ ± 2.0ppm.
- Operating Temperature Range: - 40 ~ 85 °C
- Supply Voltage: 1.8 V ~ 3.3 V.
- Voltage Control Function Available.
- Applications: GPS, WiMAX, Cellular and Wireless Communications.
- RoHS Compliant / Pb Free.

ELECTRICAL SPECIFICATIONS (电气参数)

Parameters	Condition	Electrical Specifications			
		MIN	TYP	MAX	UNITS
Nominal Frequency		32.000			MHZ
Operating Temperature Range		-30		85	°C
Supply Voltage		3.135	3.3	3.465	V
Current Drain				2	MA
Output Level		0.8		2	Vp-p
Output Type		Clipped sine wave			
Output Load	Resistance		10		kΩ
	Capacitance		10		Pf
Frequency Tolerance	After 2times reflow			±1.5	ppm
Frequency Stability	vs:Temperature	-40 ~ 85 °C		±1.0	ppm
	vs:Load	10kΩ/10pF ±10%		±0.2	ppm
	vs:Supply Voltage	2.8V±5%		±0.2	ppm
Storage Temperature		-55		125	°C
Start-up Time	vs:Frequency	Within ± 1 ppm		2.0	ms
	vs:Output Level	To 90% of Vp-p		2.0	ms
Linearity				10	%
Aging				±1.0	ppm/5year

Add: 12F, Bldg. 3C, TianAn Cloud Park Phase 1, Bantian, Longgang, Shenzhen, China

Tel: (86) 755 82507042

Fax: (86) 755 88353718

E-mail: sjk@q-crystal.com

HTTP://www.q-crystal.com

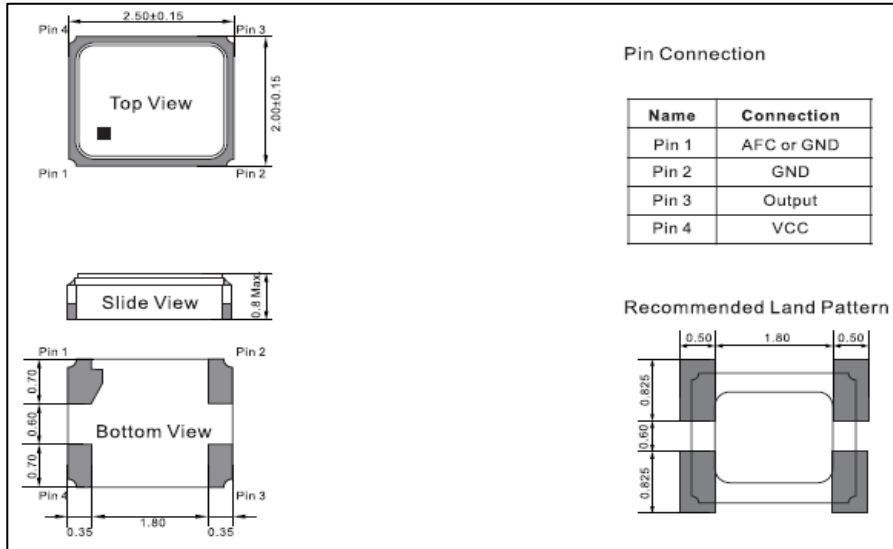
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Crystal oscillator



SMD TCXO Module 2.5×2.0×0.8 7Q Series

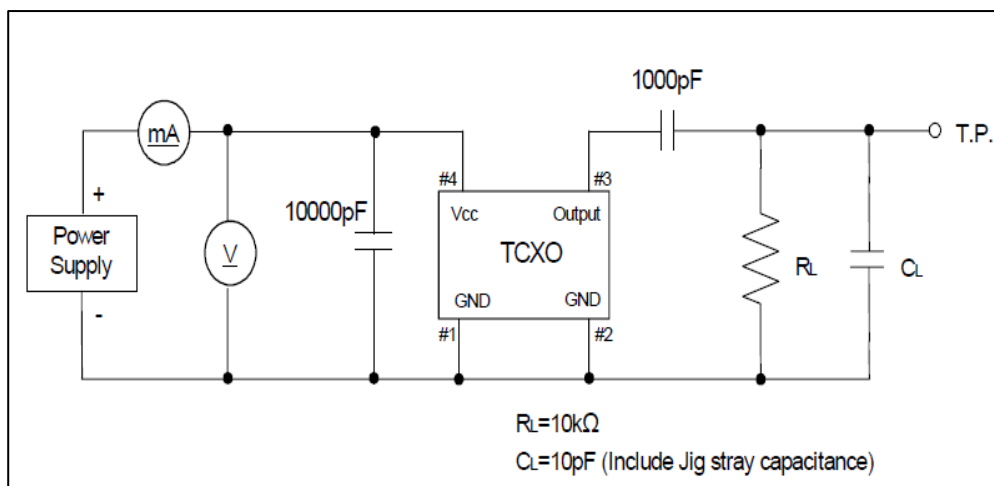
Dimension (尺寸) (Unit: mm)



MARK (印字)



MEASUREMENT CIRCUIT (电路)

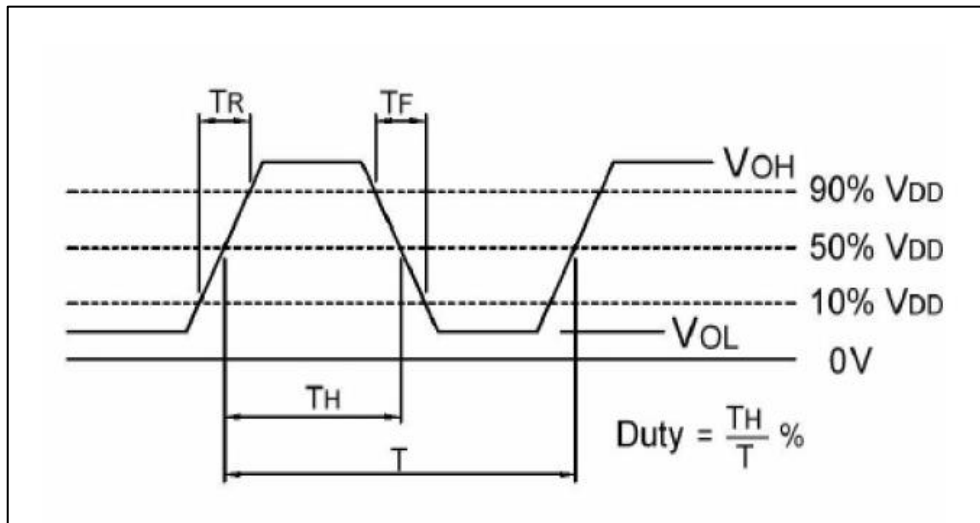


Crystal oscillator

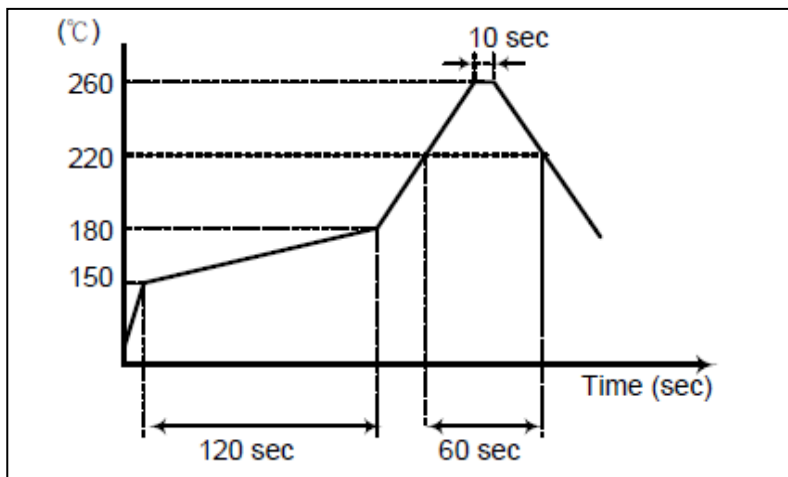


SMD TCXO Module 2.5×2.0×0.8 7Q eries

WAVEFORM CONDITIONS (波形)



REFLOW CONDITION (回流焊)



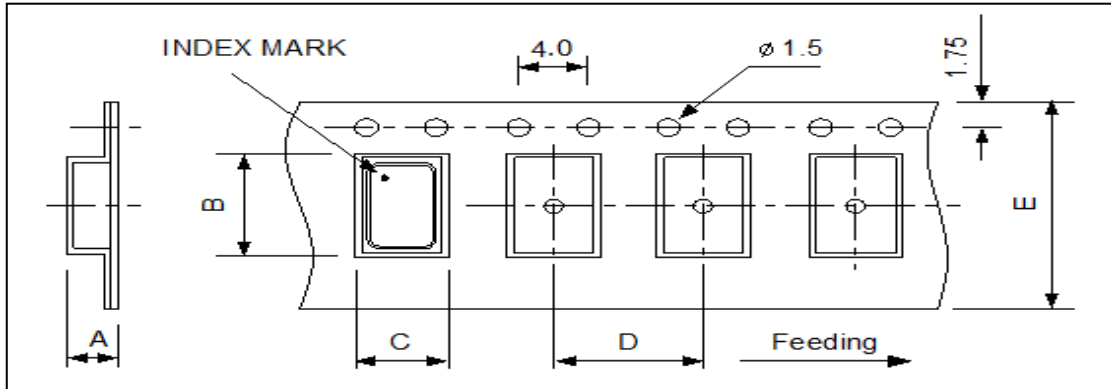
The reflow temperature profile may vary depending on the product model, specifications and frequency range. Refer to the individual product specifications for details

Crystal oscillator

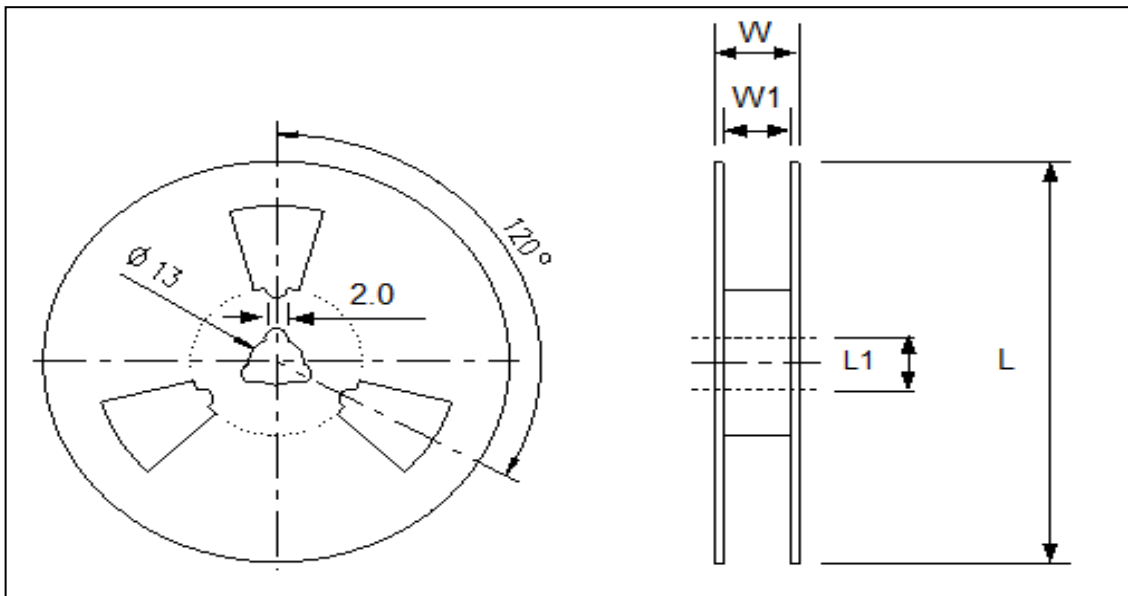


SMD TCXO Module 2.5×2.0×0.8 7Q Series

CARRIER TYPE (载带)



REEL (卷盘)



DIMENSIONS		A	B	C	D	E	L	L1	W	W1	pcs / Reel
	7050	2.15	7.9	5.4	8	16	180	13	21.5	17.5	1K
	6035	1.4	6.4	3.9	8	12	180	13	15.4	13	1K
	5032	1.46	5.5	3.6	8	12	180	13	15.4	13	1K
	3225	1.4	3.4	2.7	4	8	180	13	11.5	8	3K
	2520	1.15	2.8	2.25	4	8	180	13	10.5	8	3K
	2016	0.95	2.25	2.25	4	8	180	13	10.5	9	3K
	1612	0.8	2.0	1.85	4	8	180	13	10.5	9	3K

Crystal oscillator



SMD TCXO Module 2.5×2.0×0.8 7Q eries

RELIABILITY TEST SPECIFICATIONS (可靠性测试标准)

Test item	Equipment	Condition	Specification
1.SOLDERABILITY TEST	SJK-REL001、RC-328A	1.Solderability:235±5℃, 5±0.5S 2.Heat resistance:260±5℃,10±1S restoration of 1 hour	MIL-STD-883E Method 2003.7
2. HERMETICITY TEST	HELIOT-306S	FC-84 FLUOROCARBON,BUBBLE MACHINE	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:40℃±2, Humidity:85+3,-2%,Store 96 hrs	JIS C6701
9.AGING TEST	H-PTH-80CK CHAMBE, S&A350B/250	Temperature:40℃±2, Humidity:85+3,-2%,Store 96 hrs	JIS C5023