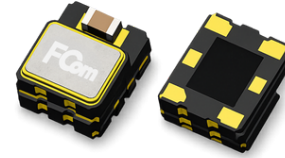


FCom TCXO

Series FVT-3S-LJ

Low Jitter TCXO 3.2×2.5 mm



Feature

- Low power supply voltage: 3.3V and 2.5V options
- Low Phase Jitter typical 0.6 pS RMS at 12kHz to 20MHz frequency offsets
- Differential output frequency support from 10MHz to 1.5GHz

Application

- High-Speed Gigabit Ethernet, SONET
- Fiber Channel, Storages Area Network
- Enterprise Server, SAS/SATA, Smart Grid
- Microprocessors/DSP/FPGA, Broadband Access

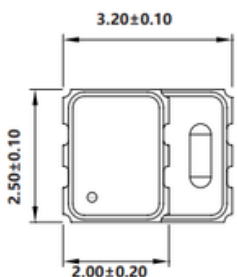
ELECTRICAL SPECIFICATIONS

Parameters		Symbol	LVPECL		LVDS		CMOS		Units	Notes
			Min.	Max.	Min.	Max.	Min.	Max.		
Supply Voltage Variation		Vdd	2.5	3.3	2.5	3.3	2.5	3.3	V	
Frequency Range		F	10~1500				10~250		MHz	
Supply Current		Icc	-	54	-	45	-	40	mA	
Tri-State Mode (Input to Pin 2)		VIH	70% Vdd	-	70% Vdd	-	70% Vdd	-	V	Enable
		VIL	-	30% Vdd	-	30% Vdd	-	30% Vdd		Disable
Output Level		VoH	VDD-1.03	VDD-0.6	-	1.6	90% Vdd	-	V	Output Hight
		VoL	VDD-1.85	VDD-1.6	0.9	-	-	10% Vdd		Output Low
Transition Time	Rise Time	Tr	-	0.5 (20% - 80%)	-	1.0 (20% - 80%)	-	3.0 (10% - 90%)	nSec	
	Fall Time	Tf								
Stand by Current		Icc(ST)	-	20	-	20	-	20	mA	
Output Loading		RL	50Ω into VDD-2V		100 Ω		-	15pF		
Phase Noise			Typ.	Max.	Typ.	Max.	Typ.	Max.	dBc/Hz	At VDD=3.3V, fout=250MHz
1 kHz			-107	-	-107	-	-107	-		
10 kHz			-111	-	-111	-	-111	-		
100 kHz			-114	-	-114	-	-114	-		
1 MHz			-125	-	-125	-	-125	-		
20 MHz			-147	-	-147	-	-147	-		
RMS Phase Jitter	Fractional Mode		0.8	1.5	0.8	1.5	0.8	1.5	pSec	12kHz~20 MHz
	Integer Mode		0.6	1.2	0.6	1.2	0.6	1.2		
Duty Cycle			45	55	45	55	45	55	%	
Start-up Time		Tosc	-	5	-	5	-	5	mSec	

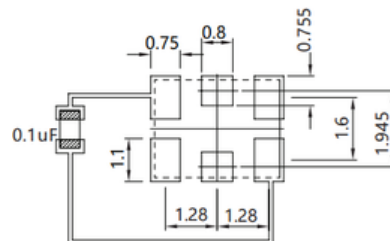
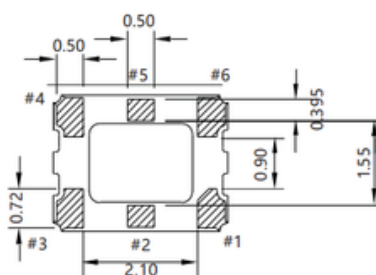
! Note : The table shows common spec. if you have special spec. requirement , please feel free to contact our salesperson.

DIMENSION(mm)

TOP VIEW



BOTTOM VIEW



To ensure optimal oscillator performance, place a by-pass capacitor of 0.1μF as close to the part as possible between Vdd and GND pads.

SIDE VIEW



Type	CMOS	Differential
Pad	Function	Function
1	No Connection	No Connection
2	Tri-State	Tri-State
3	GND	
4	Output	Output
5	No Connection	Comp. Output
6	Supply Voltage(VDD)	

FREQ. STABILITY vs. TEMP. RANGE

Temp.(°C)	ppm	± 1.0	± 2.0	± 2.5
@-30~85°C		○	○	○
@-40~85°C		△	○	○

○: Available △: Conditional ×: Not available
Inclusive of calibration @25°C, operating temperature range, input voltage variation, load variation, aging (1st year), shock, and vibration.