



### Application

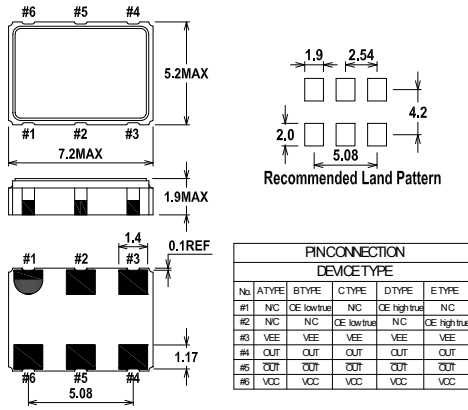
- 1/10 Gigabit Ethernet,
- SONET/SDH linecards.
- 2/4/10G FibreChannel
- Serial Attached SCSI(SAS)
- Passive Optical Network Devices
- HD Vido Systems
- Pb free product

### Options

- TAPE & REEL

Crystal Oscillators

### Dimension(mm)



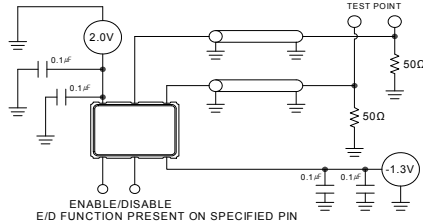
### Standard Specification

(Nominal frequency referenced to frequency at 25 °C ± 2 °C)

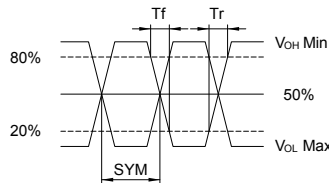
	M375XE	M275XE
Logic Family	LVPECL	LVPECL
Frequency Range	25 ~ 622.08MHz	50 ~ 160.000MHz
Frequency Stability	+/-10ppm, +/-15ppm, +/-25ppm, +/-50ppm, +/-100ppm	
Operating Temp.Range	-20 °C ~ +70 °C, -40 °C ~ +85 °C	
Storage Temp.Range	-55 °C ~ +125 °C	
Input Voltage	+3.3 Vdc ± 10%	+2.5 Vdc ± 5%
Input Current	110mA Max	
High Level ("1")	+0.98 Min	Vcc-1.03 V Min
Low Level ("0")	+0.38 Max	Vcc-1.62 V Max
Rise & Fall Time	0.8 ns Max	0.85 ns Max
Symmetry	45% ~ 55% (@ +50% of waveform)	
Output Load	50 Ω to Vcc-2V	

	M375XL
Logic Family	LVDS
Frequency Range	25 ~ 622.080MHz
Frequency Stability	+/-10ppm, +/-15ppm, +/-25ppm, +/-50ppm, +/-100ppm
Operating Temp.Range	-20 °C ~ +70 °C, -40 °C ~ +85 °C
Storage Temp.Range	-55 °C ~ +125 °C
Input Voltage	+3.3 Vdc ± 10%
Input Current	90mA Max
Amplitude Differential	500 ~ 900mVp-p
Rise & Fall Time	1ns Max
Symmetry	45% ~ 55% (@ +50% of waveform)
Output Load	100 Ω and 5pF LVDS

### Test Circuit



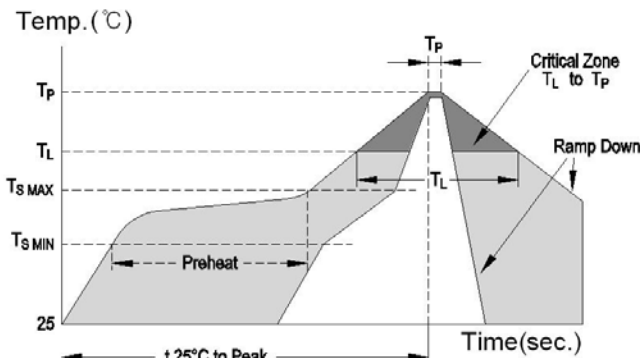
### Output Waveform



### Parts Number Guide

Classification	Description									
Example	M	3	7	5	0	E	C	E	--	25.000000 MHz (Frequency)
Logo	M									MDX-KONY
		3								3.3Volt
		2								2.5Volt
Package size			7	5						7 X 5mm
Temperature Range					0					-20 ~ +70C
					2					-40 ~ +85C
					4					-40 ~ +125C
Logic & Duty						E				LVPECL 45% ~ 55%
						L				LVDS, 5pF LVDS, 45% ~ 55%
Frequency Stability							AA			+/-15ppm
							A			+/-25ppm
							B			+/-50ppm
							C			+/-100ppm
							S			+/-10ppm
Device Type								A		N/C
								B		Pin1 OE low true, Pin2 N/C
								C		Pin1 N/C, Pin2 OE low true
								D		Pin1 OE high true, Pin2 N/C
								E		Pin1 N/C, Pin2 OE high true

### IR/Convection Reflow Profile



Ramp-up rate ( T <sub>SMAX</sub> to T <sub>p</sub> )	3 °C / second MAX
Preheat temperature ( T <sub>SMIN</sub> to T <sub>SMAX</sub> )	150 to 180 °C
Preheat time	60 to 120 seconds
Time above temperature ( T <sub>L</sub> )	217 °C , 60 second
Peak temperature ( T <sub>p</sub> )	260 °C MAX , 10sec MAX
Ramp-down rate	4 °C / sec MAX
Time 25 °C to peak temperature	6 minutes MAX

2009-03a

All specifications are subject to change without notice