

Full Size Clock Oscillators TTL Compatible



The XO-53 series oscillator is TTL compatible and features fast rise/fall times with high reliability at low cost. The metal package with pin#7 case ground acts as shielding to minimize EMI radiation.

FEATURES

- 10TTL output load
- 14 pin fill size
- Industry standard
- Wide frequency range
- Low cost
- Resistance weld package
- Lead (Pb)-free terminations and RoHS compliant

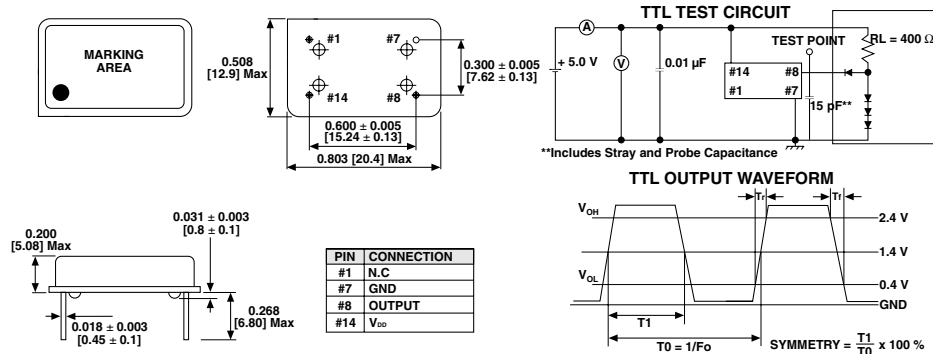


STANDARD ELECTRICAL SPECIFICATIONS

PARAMETER	SYMBOL	CONDITION	XO-53
Frequency Range	F _O		1.0 MHz ~ 100.00 MHz
Frequency Stability*		All Condition*	± 25 ppm, ± 50 ppm, ± 100 ppm
Operating Temperature Range	T _{OPR}		0 °C ~ 70 °C (- 40 °C ~ + 85 °C option)
Storage Temperature Range	T _{STG}		- 55 °C ~ + 125 °C
Power Supply Voltage	V _{DD}		5.0 V ± 10 %
Aging (First Year)		25 °C ± 3 °C	± 5 ppm
Supply Current	I _{DD}	1.0 MHz to 23.999 MHz	15 mA Max
		24.000 MHz to 69.999 MHz	30 mA Max
		70.000 MHz to 100.000 MHz	60 mA Max
Output Symmetry	Sym	At 1.4 V	40/60 % (45/55 % Option)
Rise Time	T _r	0.4 V ~ 2.4 V	5 ns Max
Fall Time	T _f	2.4 V ~ 0.4 V	5 ns Max
Output Voltage	V _{OH}		2.4 V Min
	V _{OL}		0.4 V Max
Output Load	TTL Load		1 ~ 10 TTL
Start-up Time		T _s	10 ms Max

* Include: 25 °C tolerance, operating temperature range, input voltage change, aging, load change, shock and vibration.

DIMENSIONS in inches [millimeters]



ORDERING INFORMATION

XO-53
MODEL

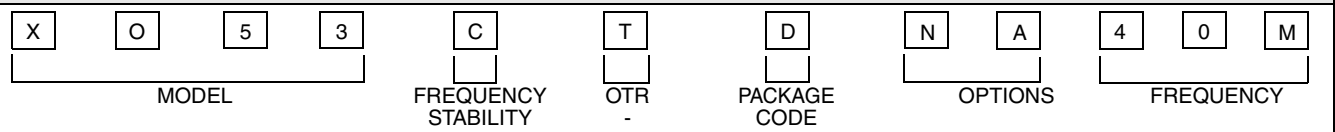
B
FREQUENCY STABILITY
AA = 0.0025 % (25 ppm)
A = 0.005 % (50 ppm)
B = 0.01 % (100 ppm)
Standard

R
OTR
Blank = 0 °C to + 70 °C
R = - 40 °C to + 85 °C

40 M
FREQUENCY/MHz

e2
JEDEC LEAD (Pb)-FREE
STANDARD

GLOBAL PART NUMBER





GLOBAL PART NUMBERING

X	O	5	2	C	T	E	L	N	A	4	0	M
MODEL NUMBER				FREQUENCY STABILITY	OPERATING TEMPERATURE (OTR)	ENABLE/DISABLE	PACKAGE CODE	OPTIONS		FREQUENCY		
XO53 = XO-53 XO54 = XO-54 XO34 = XO-543 XO52 = XO-52 XO32 = XO-523 XO56 = XO-56 XOVC = XOVC-23 XO5M = XOSM-52 XO63 = XOSM-533 XO62 = XOSM-532 XO61 = XOSM-531 XO57 = XOSM-57 XO37 = XOSM-573 XO27 = XOSM-572 XO17 = XOSM-571 XO55 = XOSM-55 XO35 = XOSM-553				C = 0.01 % (100 ppm) D = 0.005 % (50 ppm) E = 0.0025 % (25 ppm)	T = 0 °C to + 70 °C R = - 40 °C to + 85 °C	F = Pin 1 Open E = Disable to Tristate	TAPE AND REEL H = RF7 BULK A = B04 (XO63, XO62, XO61) C = D06 (XO57, XO37, XO27, XO17) D = D07 (XO53, XO54, XO34, XO56, XOVC, XO55, XO35) L = D08 (XO52, XO32, XO5M)	NA = No Additional Options 60 = 45/55 Symmetry Contact factory for all other options	4M = 4 MHz 40M = 40 MHz 100M = 100 MHz 12M288 = 12.288 MHz M is used as decimal place holder in frequency			

Example: XO52CTELNA40M



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