

5.0 mm x 3.2 mm XO

C105B series

Description:

The C105B Crystal Oscillator (XO) Series products provide a wide range of options in temperature stability, operating frequency range, and multiple supply voltages in a 5.0 x 3.2mm ceramic package.



Features:

- Available in frequencies from 1.544 MHz to 156MHz
- Tri-state Enable/Disable
- Hermetically sealed ceramic SMD package
- TTL/HCMOS compatible
- RoHS-6/Leadfree compliant
- Can withstand Solder Reflow temperatures of 260°C.

Frequency Range, Operating Temperature, and Frequency Stability:

Frequency	Operating Temperature	Product Code	Freq. Stability	Product Code
1.544 to 156MHz	-10 to +60C	A	+/- 25 ppm	A
	0 to +70C	B	+/- 50 ppm	B
	-20 to 70C	C	+/- 75 ppm	C
	-40 to 85C	D	+/-100ppm	D

- ***Frequency stability includes 25C tolerance, drift over temperature, change versus voltage and load, 20 year aging, shock and vibration

Aging: (typical at 156MHz after 30 days continuous operation)

Frequency	Timeframe	Aging	Product Code
156 MHz	1st Year	+/- 5.0ppm	N/A

Supply Voltage (Vs):

Power Supply (Vs)	1.8 Vdc +/-10%	2.5 Vdc +/-10%	3.3 Vdc +/-10%	5.0 Vdc +/-10%
Product Code	A	B	C	D

Current Consumption (I_{DD}):

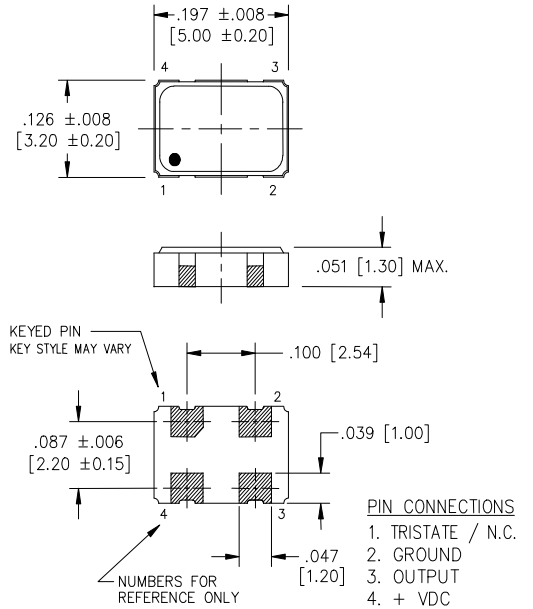
Frequency Range (MHz)	I _{DD} (at 1.8 V)	I _{DD} (at 2.5V)	I _{DD} (at 3.3V)	I _{DD} (at 5.0V)
	mA	mA	mA	mA
1.544 to 9.999	6	7	8	10
10.000 to 34.999	7	8	10	25
35.000 to 49.999	15	20	25	35
50.000 to 125.000	25	30	35	60
125.000 to 156.000	25	30	40	80

Environmental:

Storage Temperature	-55 to +125 °C
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Output Waveform:

		Min	Typical	Max
Output Symmetry	At 50% V _{DD}	45%	50%	55%
Rise Time (nS)	Tr	3	5	10
Fall Time (nS)	Tf	3	5	10
Output Voltage	V _{OH}	90% V _{DD}		
Output Voltage	V _{OL}			10% V _{DD}
HCMOS load (pF)		29.70	30.00	30.30



Start-up Time: 10 mS max.

Tri-state function Pin 1:

Pin 1 = logic high or open ; Output active at Pin 3

Pin 1 = logic low ; high impedance at pin 3 Output disabled

Ordering Options:

Product Family	Operating Temperature	Frequency Stability	Supply Voltage	Operating Frequency
C105B	A	A	A	XXX.XXXX MHz
C105B	B	B	B	XXX.XXXX MHz
C105B	C	C	C	XXX.XXXX MHz
C105B	D	D	D	XXX.XXXX MHz

C105B C A B 10.0000MHz
Part Number Build Example

****Consult Bliley sales if other options required**

**** Not all combinations of operating frequency and supply voltage are available.**

RoHs compliant; -20 to 70C; +/- 25 ppm with a 2.5 volt supply
And 10 MHz nominal operating frequency.