

CMOS/TTL COMPATIBLE VOLTAGE CONTROLLED CRYSTAL OSCILLATOR



7.0 x 5.0 x 1.6 mm

ASVV



**RoHS
Compliant**

FEATURES:

- Low profile (1.6) SMD VCXO
- Tristate functions
- Seam sealed package assures high reliability
- CMOS/TTL output
- Suitable for RoHS compliant reflow process

APPLICATIONS:

- Phase locked loops (PLLs)
- Synthesizers
- Clock Recover, Digital Transmission device
- Digital set-up box
- Computers; Test Equipment

STANDARD SPECIFICATIONS:

Parameters		Minimum	Typical	Maximum	Units	Notes
Frequency Range:		1.0	-----	200	MHz	
Operating Temperature:		0	-----	+70	°C	See options
Storage Temperature:		-45	-----	+90	°C	
Overall Frequency Stability*:		-50	-----	+50	ppm	See options
Supply Voltage (Vdd):		3.135	3.3	3.465	V	3.3V±5%
Control Voltage (Vc):		0.15	1.65	3.15	V	
Supply Current (I _{dd}):		-----	1.1 ~ 2.0	5.0	mA	1.000~11.999 MHz
		-----	1.4 ~ 4.0	8.0		12.000~26.999 MHz
		-----	1.8 ~ 5.0	10.0		27.000~39.999 MHz
		-----	3.4 ~ 8.0	15.0		40.000~57.999 MHz
		-----	5.9 ~ 20.0	35.0		58.000~99.999 MHz
		-----	20.0 ~ 30.0	40.0		100.000~200.000 MHz
Linearity:		-10	-----	10	%	
Output Load		-----	-----	15	pF	
		-----	-----	5	TTL	
Output Voltage:	V _{OH}	0.9*Vdd	-----	-----	V	
	V _{OL}	-----	-----	0.1*Vdd	V	
Pullability:		±80	-----	-----	ppm	See options
Tri-state function (Stand-by) :		"1" (VIH≥2.2V) or Open: Oscillation "0" (VIH<0.8V) : Hi Z				
Aging:		-3.0	-----	+3.0	ppm	@+25°C First year
Symmetry:		40	-----	60	%	
Start-up Time :		-----	1.1 ~ 2.0	5	ms	@1/2Vdd (See options)
Rise/Fall Time (Tr/Tf):		-----	1.6 ~ 4.0	8.0	ns	1.000~11.999 MHz
		-----	1.0 ~ 3.0	6.0		12.000~26.999 MHz
		-----	1.4 ~ 2.5	5.0		27.000~39.999 MHz
		-----	1.1 ~ 2.0	4.0		40.000~57.999 MHz
		-----	0.7 ~ 2.0	3.0		58.000~99.999 MHz
		-----	0.9 ~ 1.5	3.0		100.000~200.000 MHz
Period jitter RMS :		-----	2.0	3.5	ps	1.000~11.999 MHz
		-----	2.0	3.5		12.000~26.999 MHz
		-----	2.0	3.5		27.000~39.999 MHz
		-----	2.0	3.5		40.000~57.999 MHz
		-----	5.0	8.0		58.000~99.999 MHz
		-----	7.0	10.0		100.000~200.000 MHz
Phase jitter RMS (12kHz to 20MHz):		-----	0.5	1.0	ps	1.000~11.999 MHz
		-----	0.5	1.0		12.000~26.999 MHz
		-----	0.5	1.0		27.000~39.999 MHz
		-----	0.5	1.0		40.000~57.999 MHz
		-----	4.5	5.5		58.000~99.999 MHz
		-----	5.0	6.0		100.000~200.000 MHz

ABRACON IS
ISO9001:2008
CERTIFIED



**ABRACON
CORPORATION**

Visit www.abracon.com for Terms & Conditions of Sale **Revised 04.04.11**
30332 Esperanza, Rancho Santa Margarita, California 92688
tel 949-546-8000 | fax 949-546-8001 | www.abracon.com

CMOS/TTL COMPATIBLE VOLTAGE CONTROLLED CRYSTAL OSCILLATOR



7.0 x 5.0 x 1.6 mm

ASVV



RoHS
Compliant

STANDARD SPECIFICATIONS - continued:

Phase Noise (Typical value):	Offset	1kHz	10kHz	100kHz	dBc
	10.000MHz Carrier	-137.8	-148.4	-148.3	
	12.288MHz Carrier	-130.0	-145.0	-148.0	
	16.384 MHz Carrier	-136.1	-147.9	-152.2	
	19.440 MHz Carrier	-133.4	-147.3	-151.6	
	25.000 MHz Carrier	-134.3	-149.4	-152.1	
	32.768 MHz Carrier	-130.6	-144.6	-149.7	
	35.328 MHz Carrier	-120.0	-143.0	-150.0	
	44.736 MHz Carrier	-125.8	-142.4	-151.4	
	55.296 MHz Carrier	-130.4	-146.0	-149.0	
	57.142 MHz Carrier	-105.0	-130.0	-117.0	
	60.000 MHz Carrier	-123.4	-134.3	-147.4	
	100.000 MHz Carrier	-115.0	-125.0	-117.0	
	120.000 MHz Carrier	-108.0	-123.0	-116.0	
125.000 MHz Carrier	-112.6	-127.1	-122.3		
155.250 MHz Carrier	-108.0	-120.0	-113.0		

OPTIONS & PART IDENTIFICATION:

(Left blank if standard)

ASVV - MHz - - - -

Frequency in MHz
Please specify the frequency in MHz.
e.g. 14.31818MHz

Packaging
Blank: Bulk
T: Tape & Reel

Pullability
Blank: ±80ppm
N102: ±100ppm
N122: ±120ppm
N152: ±150ppm

Symmetry
Blank: 40/60% @ 1/2Vdd
S: 45/55% @ 1/2Vdd

Operating Temperature	Frequency stability (ppm)			
	±20 ppm	±25 ppm	±30 ppm	±50 ppm
0°C to 50°C	I20	I25	I30	I50
0°C to 60°C	B20	B25	B30	B50
-10°C to 60°C	D20	D25	D30	D50
0°C to 70°C	C20	C25	C30	STD (Left blank)
-10°C to 70°C	F20	F25	F30	F50
-20°C to 70°C	E20	E25	E30	E50
-40°C to 85°C	-----	L25	L30	L50



CMOS/TTL COMPATIBLE VOLTAGE CONTROLLED CRYSTAL OSCILLATOR



7.0 x 5.0 x 1.6 mm

ASVV



RoHS
Compliant

OUTLINE DRAWING:



PIN #	Name
1	V _c
2	Tri-state
3	GND
4	Output
5	NC
6	V _{dd}

Note 1: Due to the material availability, the chamfer on pin 1 may have different outline.

Note 2: Recommend using an approximately 0.01 μF bypass capacitor between PIN 3 and 6.

Dimensions: inches (mm)

TAPE & REEL: T= Tape and reel (1,000pcs/reel)

REFLOW PROFILE:



Dimensions: mm



ATTENTION: Abracon Corporation's products are COTS – Commercial-Off-The-Shelf products; suitable for Commercial, Industrial and, where designated, Automotive Applications. Abracon's products are not specifically designed for Military, Aviation, Aerospace, Life-dependant Medical applications or any application requiring high reliability where component failure could result in loss of life and/or property. For applications requiring high reliability and/or presenting an extreme operating environment, written consent and authorization from Abracon Corporation is required. Please contact Abracon Corporation for more information.

ABRACON IS
ISO9001:2008
CERTIFIED



ABRACON
CORPORATION

Visit www.abracon.com for Terms & Conditions of Sale **Revised 04.04.11**

30332 Esperanza, Rancho Santa Margarita, California 92688

tel 949-546-8000 | fax 949-546-8001 | www.abracon.com

X-ON Electronics

Largest Supplier of Electrical and Electronic Components

Click to view similar products for [VCXO Oscillators](#) category:

Click to view products by [ABRACON](#) manufacturer:

Other Similar products are found below :

[KD-VA9501](#) [ASG-P-V-A-491.520MHz](#) [SIT3808AI-CF-33EM-50.000000X](#) [EQVA23C1C1H-50.000M](#) [603281](#) [YNETHE125](#) [FRSONT019](#)
[SiT3701AC-43-33C-10.00000X](#) [SiT3808AI-2F-25NM-4.915200X](#) [315LB3I1250T](#) [VG-4231CE](#) [27.0000M-PSCM3](#) [CVSS-945-125.000](#)
[ASVV-4.096 MHz-L50-N152-T](#) [565DFA45M1500ABG](#) [565CFA45M1584ABG](#) [569DABA001908BBG](#) [569BAAA001478ABG](#)
[565AAA1000M00BBG](#) [565CAA11M0592BBG](#) [565BAA100M000ABG](#) [CVHD-950-122.880](#) [CVHD-950-70.000](#) [CVHD-950-80.000](#) [CVHD-](#)
[950X-100.000](#) [CVHD-950X-122.88](#) [CVHD950X-54.000](#) [CVPD-920-100.000](#) [515CAA000256AAG](#) [550AE100M000DG](#) [MK3722GLFTR](#)
[CVHD-950X-50.000](#) [ABLJO-V-122.880MHZ-T2](#) [PL500-37TI](#) [KV7050B27.0000C3GD00](#) [VCS25AXT-270](#) [27.000MHZ](#) [357LB3I032M7680](#)
[357LB3I040M0000](#) [KV7050B25.0000C3GD00](#) [357LB3I016M3840](#) [CVHD-950-76.800](#) [CVSS-945-50.000](#) [KV7050B40.0000C3GD00](#)
[EV32C6A3A1-24.576M-TR](#) [LFVCXO067516Bulk](#) [ECXV-L37C2N-148.500](#) [LFVCXO067414Bulk](#) [LFVCXO067507Bulk](#) [VS-501-0074-](#)
[1000M0](#) [LFVCXO067538Bulk](#) [515CDA5M00000AAG](#)