

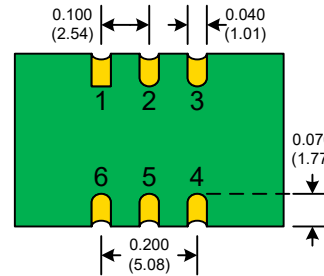
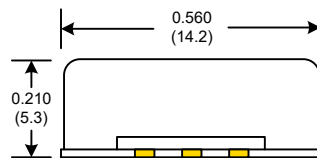
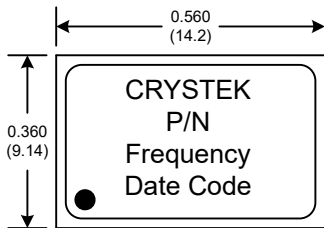
Differential LVPECL Clock Oscillator



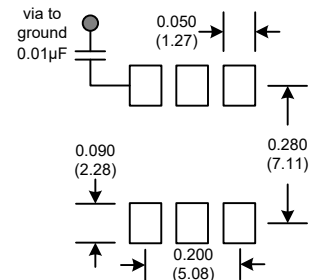
CCPD-920 Model 9x14 mm SMD, 3.3V, LVPECL

Frequency Range:	50 MHz to 150 MHz
Frequency Stability:	±20, ±25, ±50ppm (0°C to 70°C) ±25, ±50ppm (-40°C to 85°C)
Temperature Range:	0°C to 70°C (Option X) -40°C to 85°C
Storage:	-45°C to 90°C
Input Voltage:	3.3V ± 0.3V
Input Current:	88mA Max
Output:	Differential LVPECL
Symmetry:	45/55% Max @ zero crossing point
Rise/Fall Time:	1ns Max (20% to 80%)
Linearity:	± 10% Max
Logic:	Terminated to Vdd-2V Logic "0" Logic "1"
Disable Time	200ns Max
Start-up Time	1ms Typical, 2ms Max
Phase Jitter:	12kHz to 80MHz 0.5ps Typical, 1psec RMS Max
Phase Noise:	10Hz -65 dBc/Hz Typical 100Hz -98 dBc/Hz Typical 1kHz -125 dBc/Hz Typical 10kHz -140 dBc/Hz Typical 100kHz - 100MHz -145 dBc/Hz Typical
Aging:	<3ppm 1 st year, <1ppm every year thereafter

Designed to meet today's requirements for 3.3V Differential LVPECL applications. The CCPD-920 is produced using our cost saving FR5 PCB and UM-1 overtone crystal technology. This design offers considerable cost savings over other HFF XO's products. Also available in 14 pin dip fully hermetic package.



SUGGESTED PAD LAYOUT



PAD FINISH: Immersion Gold (ENIG); 5 micro inches maximum

RECOMMENDED REFLOW SOLDERING PROFILE 900034 (See App Note listed on website)

<http://www.crystek.com/specification/reflow/900034.pdf>

PIN	Function
1	NC
2	E/D
3	GND
4	OUT
5	COU
6	Vdd

Tri-State Function	
Function pin 2	Output pin
Open	Active
"0" level Vcc-1.620V Max	Active
"1" level Vcc-1.025V Min	High Z
Disabled State:	
Pin 4 will assume a fixed level of logic "0"	
Pin 5 will assume a fixed level of logic "1"	

Crystek Part Number Guide

CCPD-920 X - 25 - 100.000

#1 #2 #3 #4 #5

#1 Crystek 9x14 SMD PECL OSC
#2 Model 920
#3 Temp. Range: Blank = 0/70°C, X=-40/85°C
#4 Stability: (see Table 1)
#5 Frequency in MHz: 3 or 6 decimal places

Stability Indicator

20 = 0/70°C (±20ppm)
25 = 0/70°C (±25ppm)
50 = 0/70°C (±50ppm)
25 = -40/85°C (±25ppm)
50 = -40/85°C (±50ppm)

Example:
CCPD-920X-25-100.000 = 3.3V, 45/55, -40/85°C, 25ppm, 100.000 MHz

Table 1

Specifications subject to change without notice.

Rev: H

Date: 20-Sep-2017

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