

CVP-140 Series

14Pin DIP, 3.3V & 5V, PECL

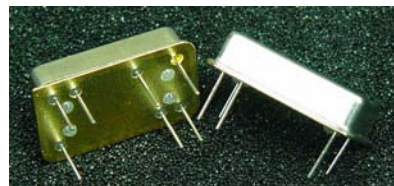
Lead Free
RoHS
Compliant

Frequency Range:	15MHz to 175MHz
Frequency Pulling:	(CVP-140) $\pm 50\text{ppm}$ Min, $\pm 100\text{ppm}$ Max (CVP-141) $\pm 75\text{ppm}$ Min, $\pm 150\text{ppm}$ Max (CVP-142) $\pm 100\text{ppm}$ Min, $\pm 200\text{ppm}$ Max (CVP-143) $\pm 200\text{ppm}$ Min $\pm 20\text{ppm}$ @ 0°C to 70°C
Frequency Stability: (inclusive of all conditions)	
Temperature Range:	0°C to 70°C
Storage:	-55°C to 120°C
Input Voltage:	$5\text{V} \pm 0.5\text{V}$ $3.3\text{V} \pm 0.3\text{V}$
Control Voltage:	$2.5\text{V} \pm 2.0\text{V}$ $1.65\text{V} \pm 1.65\text{V}$
Input Current:	88mA Typical
Output:	Differential PECL
Symmetry:	45/55% Max @ 50% Vdd
Rise/Fall Time:	350ps Max @ 20% to 80% Vdd
Linearity:	$\pm 10\%$ Max
Logic:	Terminated to Vdd-2V into 50 ohms
Logic "0"	"0" = Vcc-1.85V Min, Vcc-1.62V Max
Logic "1"	"1" = Vcc-1.02V Min, Vcc-0.81V Max
Disable Time	200ns Max
Start-up Time	1ms Typ., 2ms Max
Phase Jitter:	12KHz to 80MHz 0.5psec Typ., 1psec RMS Max
Aging:	<3ppm 1st/yr, <1ppm every year thereafter

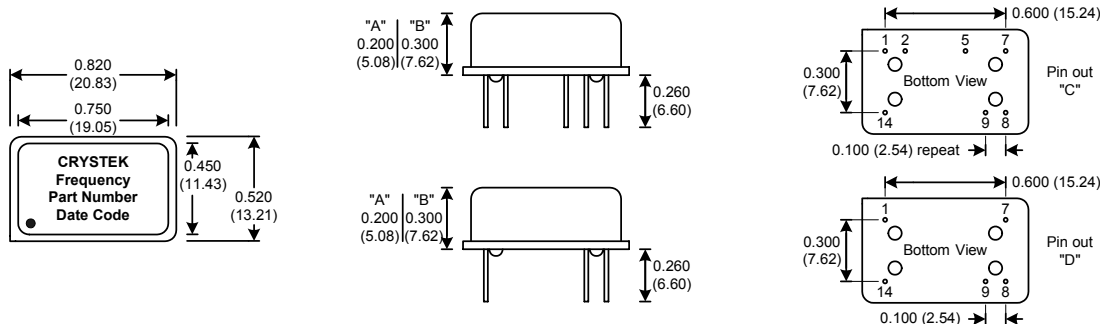
Differential PECL

Voltage Controlled

Crystal Oscillator



Designed to meet drop in replacement requirements for 3.3V & 5V Differential PECL applications. The CVP-140 Series supports three pullability configurations. Available in two 14 Pin DIP configurations. Standard can height is .300" with low profile .200" option available.



Pad	Connection	
1	Volt Cont.	Volt Cont.
2	N/C	
5	N/C	
7	GND	GND
8	OUT	OUT
9	COU	COU
14	Vdd	Vdd
Pin Option:	"C"	"D"

Environmental Specifications:

Shock: 1000 Gs, 0.35 ms, 1/2 sine wave, 3 shocks in each plane
Vibration: 10 ~ 2,000 Hz of 06" d.a or 20 Gs, whichever is less
Humidity: Resistant to 85% R.H. at 85°C

Mechanical Specifications

Leak: In accordance with Mil-Std-883, Method 1014, Cond 1A
Pins: Kovar, with gold over nickel
Bend Test: Will withstand two bends of 90° from reference
Header: Steel with gold over nickel (package "C" only)
Case: Stainless steel
Marking: Epoxy ink or engraved
Resistance to Solvents: MIL-STD 202, Method 215

Crystek Part Number Guide

CVP-14? ? ?-155.520

#1 #2 #3 #4 #5

#1 CVPL=3.3V, CVP=5V
 #2 Pull 14? 0=(50~100), 141=(75~150), 142=(100~200), 142=(200+)
 #3 Package Height (A) or (B) Standard
 #4 Pin out configuration (C) or (D)
 #3 Frequency in MHz: 3 or 6 decimal places

Example:
 CVP-141AC-155.520 = 5V, 45/55, $0/70^\circ\text{C}$, 20ppm, 50~100ppm Pullability
 0.200" Height, 7 pins, 155.520 MHz

Specifications subject to change without notice.

TD-030707 Rev. C



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