RENESAS HCMOS, Ceramic, Seam-Sealed, SMD, Oscillator

DATASHEET

Specifications

Parameters		Ratings/Units	
Frequency		12.800 MHz	
Frequency Stability ¹ :		±10PPM Max	
Temperature Range: Operating (TOPR) Storage (TSTG)		-40°C ~ +85°C -40°C ~ +85°C	
Supply Voltage (VDD)		3.3 V ±5%	
Input Current (IDD)		7 mA Max	
Output Symmetry (@ 50% VDD)		45% / 55%	
Rise Time (10% ~ 90% VDD)	(TR)	5 nS	
Fall Time (90% ~ 10% VDD)	(TF)	5 nS	
Output Voltage (HCMOS)	(VOL) (VOH)	10% VDD Max 90% VDD Max	
Output Current	(IOL) (IOH)	4 mA Min -4 mA Min	
Output Load (HCMOS)		15 pF Max	
Standby Current (VIL ≤ 30%VDD)		10 μA Max	
Startup Time (Ts)		10 mS Max	
Output Disable Time ²		250 nS Max	
Output Enable Time ²		10 mS Max	
Maximum Soldering Temperature / Time		260°C / 10 seconds	
Moisture Sensitivity Level (MSL)		1	
Termination Finish		Au	

Enable/Disable Function ²				
Pin 1	Output (Pin 3)			
Open	Active			
'1' Level VIH ≥ 70%VDD	Active			
'0' Level VIH ≤ 30%VDD	High Z			

 $^{^{1} \ \}text{Inclusive of 25}{}^{\circ}\text{C tolerance, operating temperature range, input voltage change, load change, aging, shock, and vibration.}$

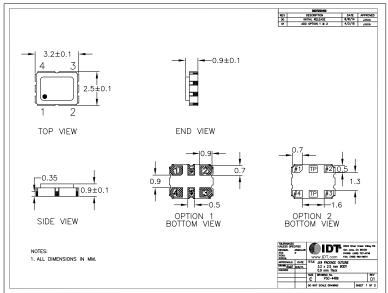
Note: A 0.01µF bypass capacitor should be placed between VDD (Pin 4) and GND (Pin 2) to minimize power supply line noise.

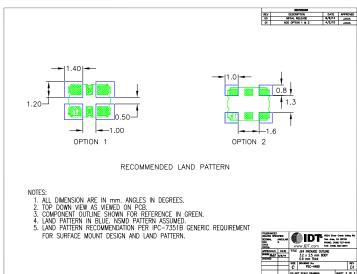
Note: The above specifications, having been carefully prepared and checked, is believed to be accurate at the time of publication; however, no responsibility is assumed by IDT for inaccuracies. Dimensional drawing below is for reference to critical specifications defined by size measurements. Certain non-critical visual attributes, such as side castellations, reference pin shape, etc. may vary. All specifications subject to change without notice.

² internal pullup resistor from pin 1 to pin 4 allows active output if pin 1 is left open.



Package Outline and Dimensions (JX4)





Pin Assignments

Pin Number	Description
1	E/D
2	GND
3	Output
4	Vdd

Ordering Information

Part / Order Number	Shipping Packaging	Package	Temperature
826A-12.8-1JX4I	Cut-Tape	3.2 x 2.5 x 0.9 mm JX4	-40° to +85°
826A-12.8-1JX4I8	Tape and Reel	3.2 x 2.5 x 0.9 mm JX4	-40° to +85°

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