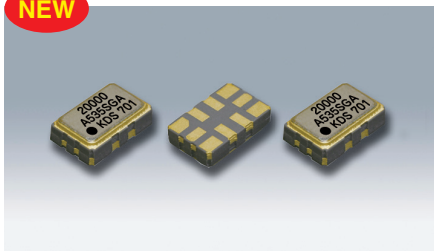


Ultra High-precision SMD VC-TCXO/TCXO

DSA535SGA/DSB535SGA/DSA535SGB for Stratum3/ Femtocell

NEW



Actual size

Features

- 5032 size, 1.35mm height.
- Ultra high precision SMD (VC-) TCXO
- Clipped-sine wave or CMOS level output
- Low phase noise
- Single packaged structure

Applications

- Stratum3, 5G compatible devices, Networking, Base station



Pb-Free



RoHS Compliant

Standard Specification

Item	DSA535SGB (VC-TCXO)	DSA535SGA (VC-TCXO)	DSB535SGA (TCXO)
Output Frequency Range	10 to 52MHz		
Standard Frequency	10MHz/ 19.2MHz/ 20MHz/ 38.88MHz		
Supply Voltage (Range)	+2.3 to +3.63V		
Supply Voltage (Vcc)	+2.8V/ +3.0V/ +3.3V		
Current Consumption	+4.0mA max. (Clipped sine wave)/ +8.0mA max. (CMOS)		
Output Level	0.8Vp-p min. (Clipped sine wave/DC-coupled) '0'level 0.1×Vcc V max./'1'level 0.9×Vcc V min. (CMOS)		
Output Load	10kΩ//10pF (Clipped sine wave)/15pF (CMOS)		
Frequency Stability Tolerance	±1.5×10 ⁻⁶ max. (After 2 reflows)		
vs. Temperature	±0.10×10 ⁻⁶ max. / -40 to +85°C ±0.20×10 ⁻⁶ max. / -40 to +105°C		
vs. Temperature Characteristic Control Voltage Change	±0.1×10 ⁻⁶ max. (Frequency control sensitivity ±5×10 ⁻⁶ , Vcont=+1.5V±1.0V)	—	
vs. Hysteresis	±0.1×10 ⁻⁶ max.		
vs. Supply Voltage	±0.1×10 ⁻⁶ max. (Vcc±5% : Clipped sine wave, CMOS (f≦40))/±0.2×10 ⁻⁶ max. (Vcc±5% : CMOS (40<f))		
vs. Load Variation	±0.20×10 ⁻⁶ max. (10kΩ//10pF±10%/ 15pF ±10%)		
vs. Aging	±1.0×10 ⁻⁶ max./year		
Total Frequency Tolerance	±4.6×10 ⁻⁶ max. (Inclusive of variations over operating temperature, initial tolerance, supply voltage, load variation, aging)		
Frequency Control Control Sensitivity	±3.0 to ±5.0 × 10 ⁻⁶ /Vcont=+1.5±1V		—
Response Slope	Positive		—
Phase Noise Offset 100Hz	20MHz (typ.) -118dBc/Hz		20MHz (typ.) -120dBc/Hz
Offset 1kHz	-139dBc/Hz		-141dBc/Hz
Offset 10kHz	-155dBc/Hz		-155dBc/Hz
Offset 100kHz	-158dBc/Hz		-158dBc/Hz
Packing Unit (1)	1000pcs./reel (φ 180), 4000pcs./reel (φ 330)		

(1) Moisture prevention packing is unnecessary.

Moisture Sensitivity Level: LEVEL 1 (IPC/JEDEC J-STD-033)

Consult our sales representative for other specifications.

DSA535SGA/DSB535SGA/DSA535SGB (4terminals) [mm]

DSA535SGA/DSB535SGA/DSA535SGB (10 terminals) [mm]

Dimensions

Model Code
DSA535SGA→A535SGA
DSB535SGA→B535SGA
DSA535SGB→A535SGB

Pin Connections(4terminals)

Pin No.	Connection
#1	VCONT(VC-TCXO)/ GND(TCXO)
#2	GND
#3	Output
#4	Vcc

Recommended Land Pattern <Top View>

Connect to GND Bypass Capacitance
Connect to Test Circuit DC-cut Capacitance

Dimensions

Model Code
DSA535SGA→A535SGA
DSB535SGA→B535SGA
DSA535SGB→A535SGB

Pin Connections

Pin No.	Connection
#1	Vcont(VC-TCXO)/GND(TCXO)
#2	Do Not Connect
#3	ENABLE/DISABLE
#4	GND
#5	Do Not Connect
#6	Output
#7	Do Not Connect/Vcfilter(Optional)
#8	Do Not Connect
#9	Vcc
#10	GND

() : Internal connection

Recommended Land Pattern <Top View>

Connect to GND Bypass Capacitance
Connect to Test Circuit DC-cut Capacitance