Model # TM7122PM

Available as:

TM7122PM, 4 Pin TO-8 (T4)

TN7122PM, 4 Pin 0.450" Sq. Surface-mount (SM3)

BX7122PM, Laser Welded SMA Connectorized Housing (H1L)

Specification Sheet

Features

- Low Phase Noise Performance
- High P1dB Output
- Broad Bandwidth
- Unconditionally Stable

Technical Specifications

Parameter	Typical	Min/Max
Frequency Range	1000 MHz – 2000 MHz	1000 MHz – 2000 MHz
Gain	16 dB	15 dB
Noise Figure	5 dB	6 dB
Output Power @ 1 dB Compression	+27 dBm	+26 dBm
Psat	---	30 dBm Max.
Output 3rd Order Intercept	+40 dBm	---
Output 2nd Order Intercept	+50 dBm	---
Reverse Isolation	30 dB	---
Input VSWR	1.5:1	2.0:1
Output VSWR	1.5:1	2.0:1
Supply Voltage	15 volts	15 volts
Supply Current	265 mA	285 mA

Maximum Ratings

Maximum (No Damage) Ratings	
Storage Temperature	-62°C to +125°C
Operating Temperature	-55°C to +125°C
Case Temperature	+125°C
DC Voltage @ 25°C	+ 18 volts
Continuous RF Input Power	+ 13 dBm
Short Term RF Input Power	50 Milliwatts (1 Minute Max.)
Maximum Peak Power	0.1 Watt (3 µsec Max.)

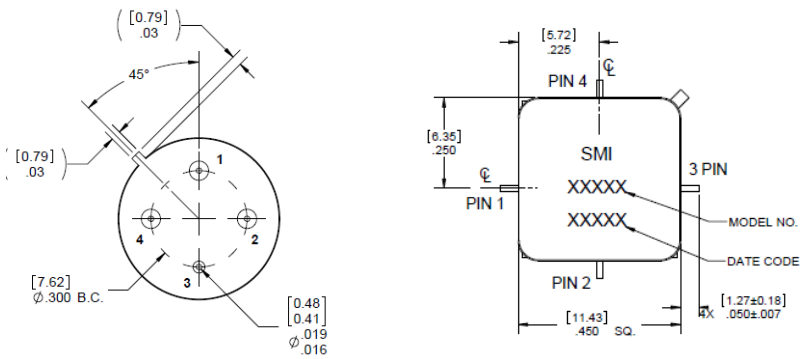
- Typical values are measured at 25°C, but not guaranteed.
- Min/Max values are guaranteed from -0°C to 70°C.

Guaranteed Phase Noise (1200 MHz) Performance (dBc/Hz) at 25C

Frequency (Offset)	Typical	Guaranteed
100 Hz	-145	-140
1 kHz	-150	-145
10 kHz	-160	-155
100 kHz	-165	-160
1 MHz	-165	-160

Outline Drawing

(For reference only)



Instructions

Grounding Instructions	Care should be taken to effectively ground each unit.
Revisions	API reserves the right to make revisions to both product and/or the information contained within their datasheets without advanced notice.
Min./Max. Values	Specifications are guaranteed when tested in a 50 Ω (ohm) system.
Intercept Values	Intercept Values are tested mid-band.
Typical performance graphs and values are measured at 25°C, but not guaranteed.