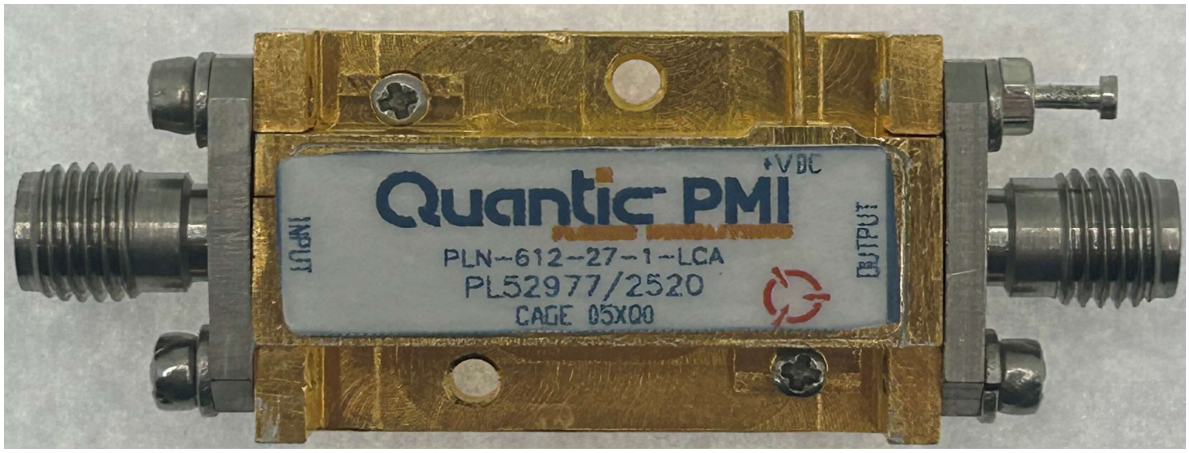
Typical Characteristics ON PLN-612-27-1-LCA

PMI MODEL NUMBER PLN-612-27-1-LCA IS A 6 TO 12 GHz AMPLIFIER. THIS AMPLIFIER IS SUPPLIED IN OUR STANDARD PE2 HOUSING THAT CAN BE USED AS A SMA CONNECTORIZED OR SURFACE MOUNT COMPONENT.



DATE
May 12, 2025

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Typical Characteristics ON PLN-612-27-1-LCA

Outline Drawing

DESCRIPTION:
PMI MODEL NUMBER PLN-612-27-1-LCA IS A 6 TO 12 GHz AMPLIFIER. THIS AMPLIFIER IS SUPPLIED IN OUR STANDARD PE2 HOUSING THAT CAN BE USED AS A SMA CONNECTORIZED OR A SURFACE MOUNT COMPONENT.

SPECIFICATIONS:

- FREQUENCY RANGE: ..... 6 TO 12 GHz
- GAIN: ..... 23 dB MIN
- GAIN FLATNESS: ..... ±1.25 dB MAX
- NOISE FIGURE: ..... 2 dB MAX
- OP1dB: ..... 9 dBm MIN
- VSWR (INPUT/OUTPUT): ..... 2:1 MAX
- DC VOLTAGE SUPPLY: ..... +12 to +15 VDC
- DC CURRENT DRAW: ..... 40 mA MAX
- CONNECTORS: ..... SMA FEMALE
- FINISH: ..... GOLD PLATED

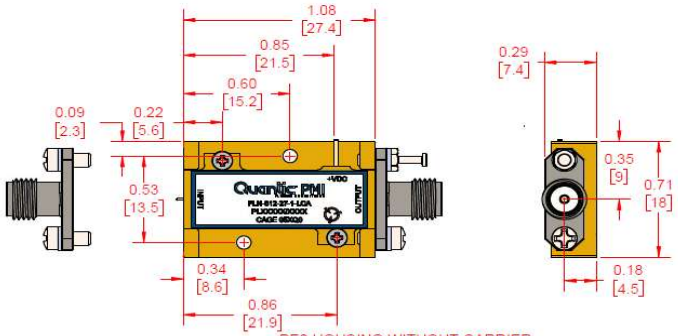
ENVIRONMENTAL RATINGS:

- TEMPERATURE: ..... -55°C TO +85°C (OPERATING)
  -65°C TO +125°C (STORAGE)
- HUMIDITY: ..... MIL-STD-202, METHOD 103B COND. B
- SHOCK: ..... MIL-STD-202, METHOD 213B COND. B
- ALTITUDE: ..... MIL-STD-202, METHOD 105C COND. B
- TEMPERATURE CYCLE: ..... MIL-STD-202, METHOD 107D COND. A

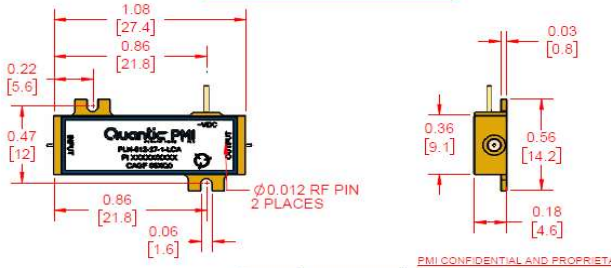
NOTE: SPECIFICATIONS WILL VARY OVER TEMPERATURE
NOTE: THE ABOVE SPECIFICATIONS ARE SUBJECT TO CHANGE OR REVISION

ZONE	REV.	DESCRIPTION	DATE	APPROVED
	A1	ORIGINAL RELEASE	12/17/2006	

PE2 HOUSING WITH CARRIER



PE2 HOUSING WITHOUT CARRIER



PMI CONFIDENTIAL AND PROPRIETARY

APPROVALS	DATE
DRAWN: R. SIRK	12/17/2006
REDRAWN	
ISSUED	

TITLE: OUTLINE
PLN-612-27-1-LCA
SIZE: B | FSCM NO: 05XQ0 | DWG NO: 27050620 | REV: A1
SCALE 2:1 | SHEET 1 OF 1

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Typical Characteristics ON PLN-612-27-1-LCA

Technical Specifications

TEST ITEM NO.	PARAMETERS	SPECIFIED VALUE	Test Results		
			+25°C	-55°C	+85°C
1	Frequency Range:	6 TO 12 GHz	**6 TO 12 GHz**	**6 TO 12 GHz**	**6 TO 12 GHz**
2	Gain:	23 dB MIN	**+24.6 dB Min. +26.39 dB Max. See Graph**	**+25.25 dB Min. +26.94 dB Max. See Graph**	**+23.9 dB Min. +25.88 dB Max. See Graph**
3	Gain Flatness:	±1.25 dB MAX	**+0.9 dB -0.9 dB See Graph**	**+0.85 dB -0.85 dB See Graph**	**+0.99 dB -0.99 dB See Graph**
4	Noise Figure:	2 dB MAX	**1.65 dB See Graph**	**1.06 dB See Graph**	**1.87 dB See Graph**
5	OP1dB:	9 dBm MIN	**+9.5 dBm See Graph**	**+9.55 dBm See Graph**	**+9.61 dBm See Graph**
6	VSWR In/Out:	2:1 MAX	**Input: 1.54 :1 Output: 1.58 :1 See Graph**	**Input: 1.69 :1 Output: 1.68 :1 See Graph**	**Input: 1.42 :1 Output: 1.52 :1 See Graph**
7	DC Supply:	+12 to +15 VDC @ 40 mA MAX	**+12 to +15 VDC @ 32 mA**	**+12 to +15 VDC @ 32 mA**	**+12 to +15 VDC @ 32 mA**

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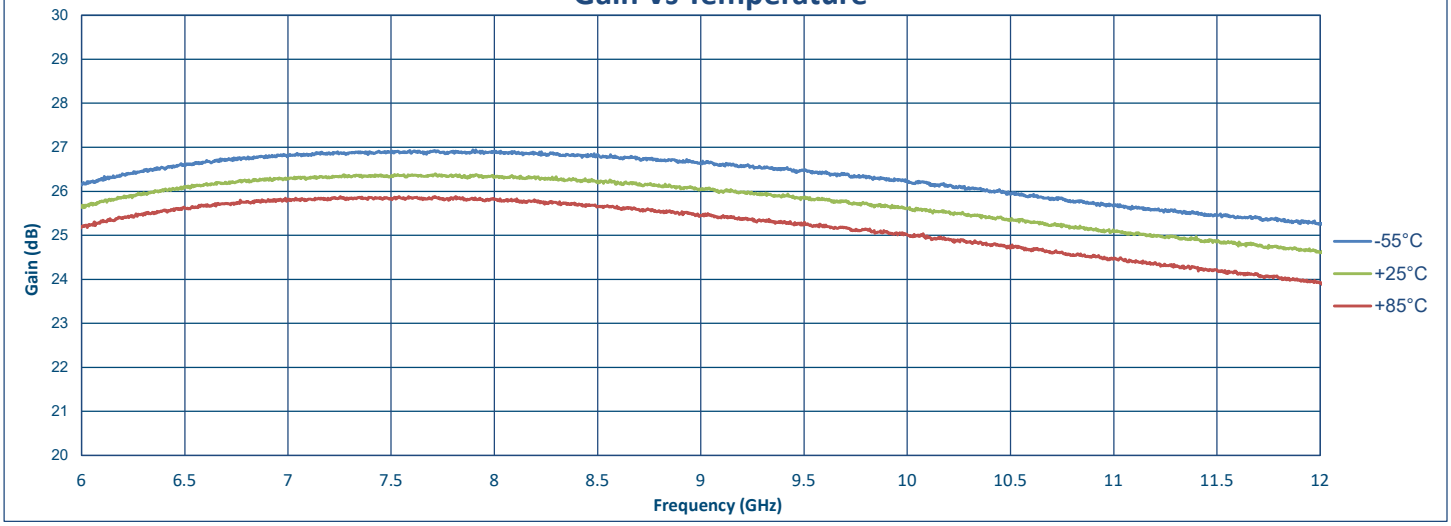
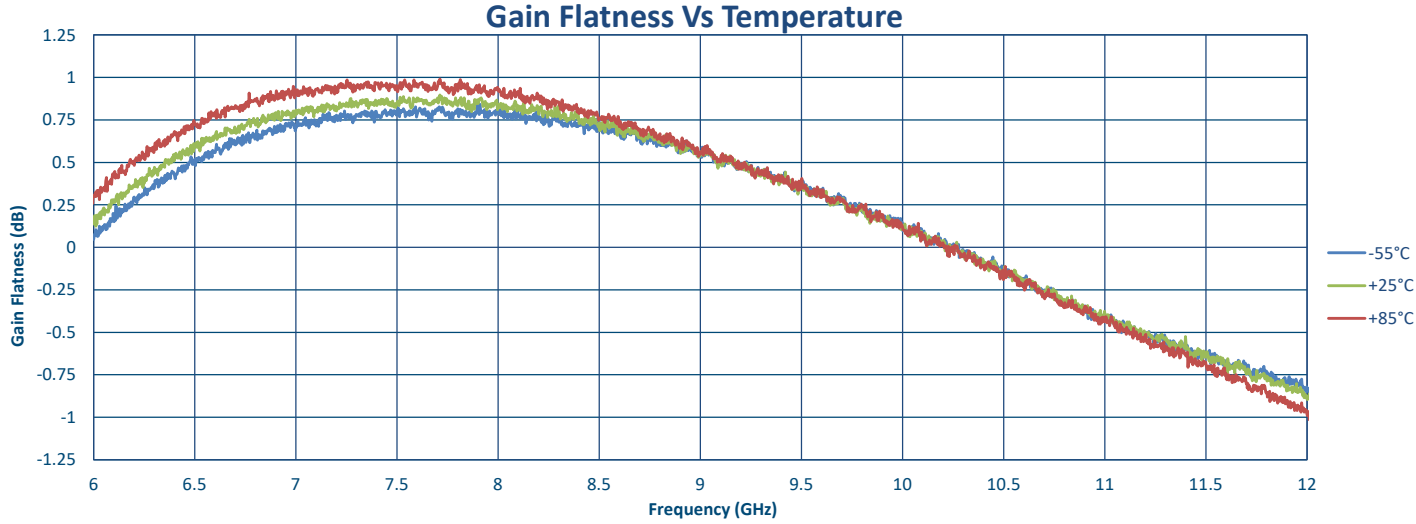
Typical Characteristics ON PLN-612-27-1-LCA

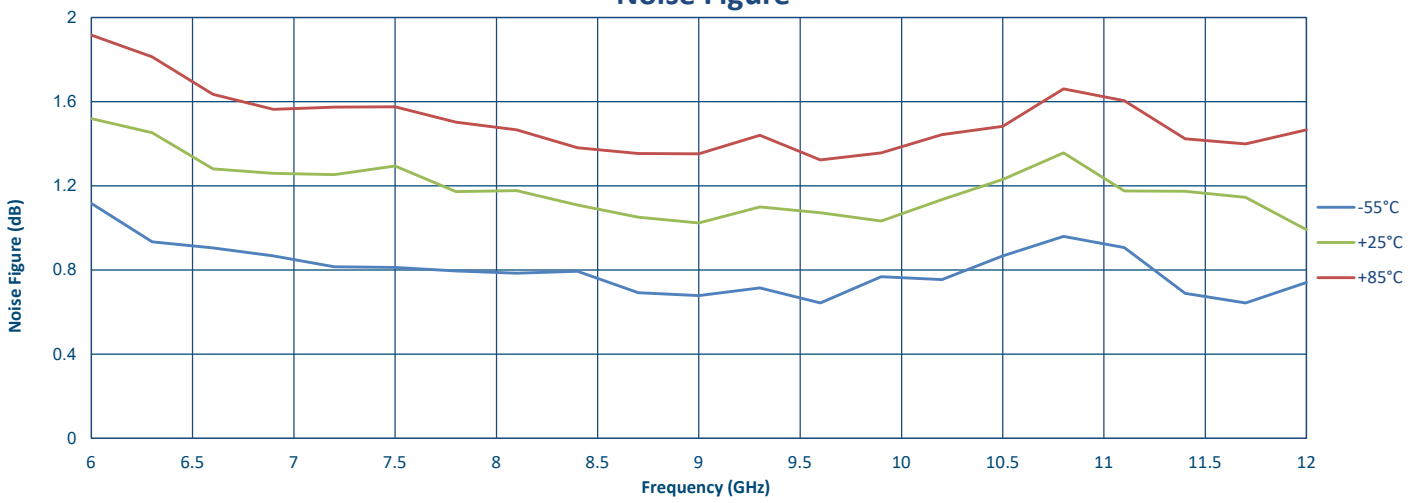
Gain Vs Temperature



Gain Flatness Vs Temperature



Noise Figure



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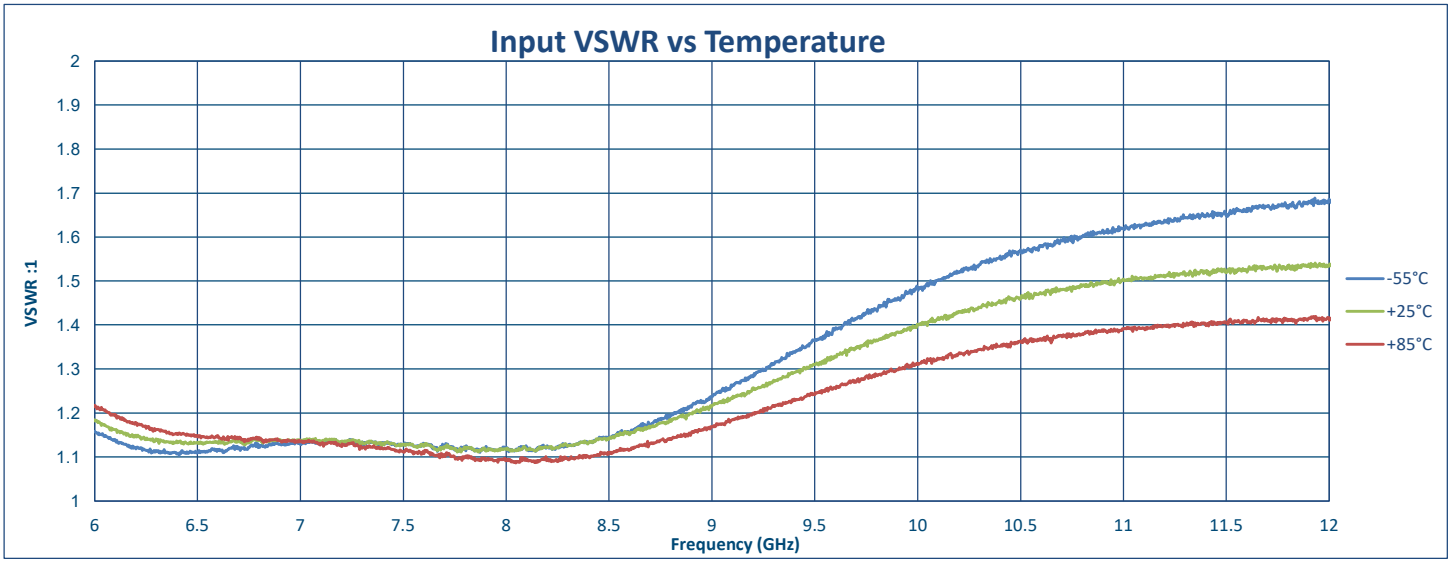

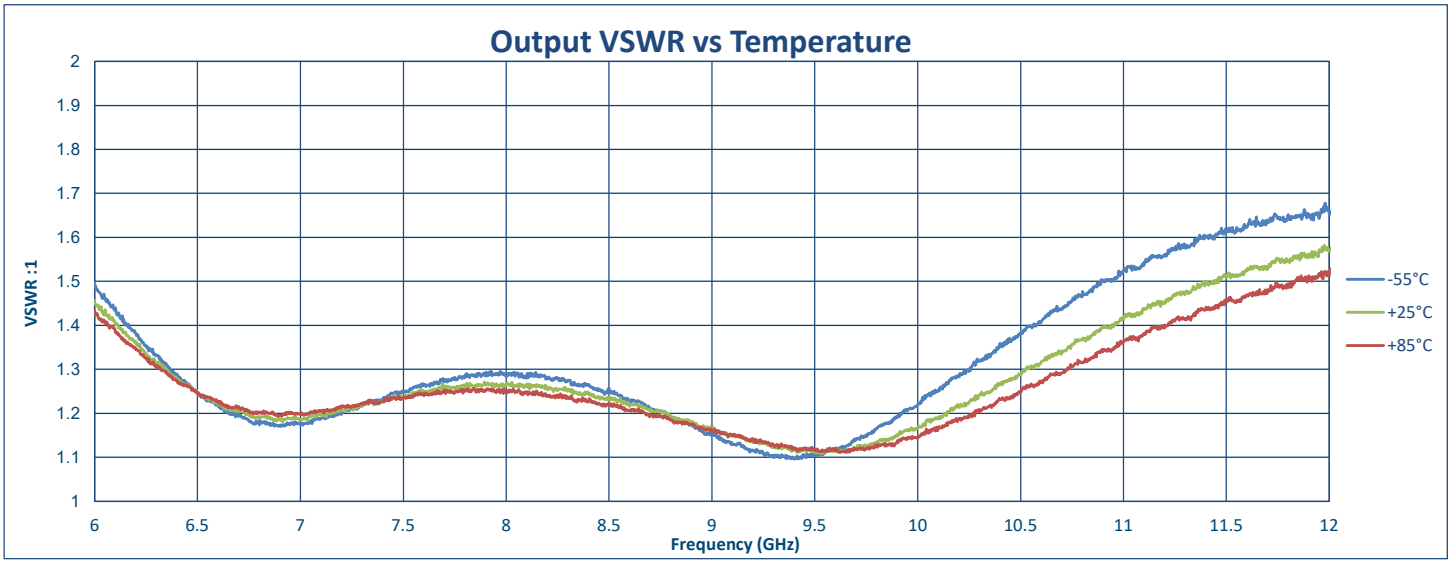

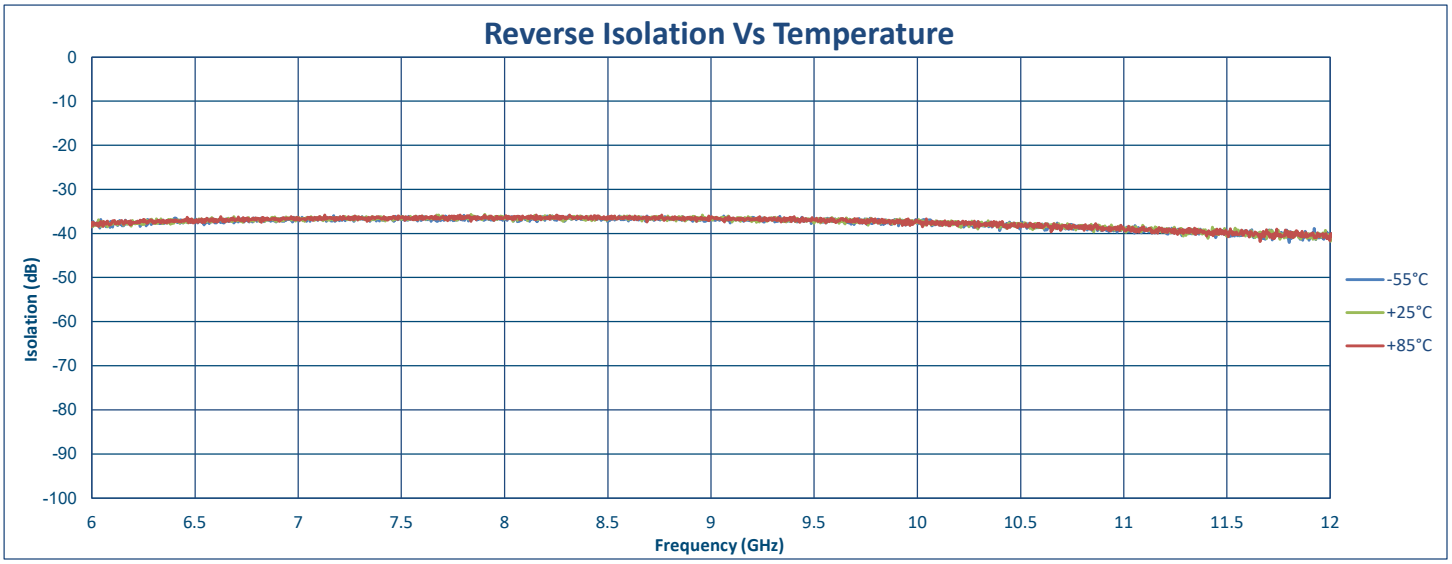

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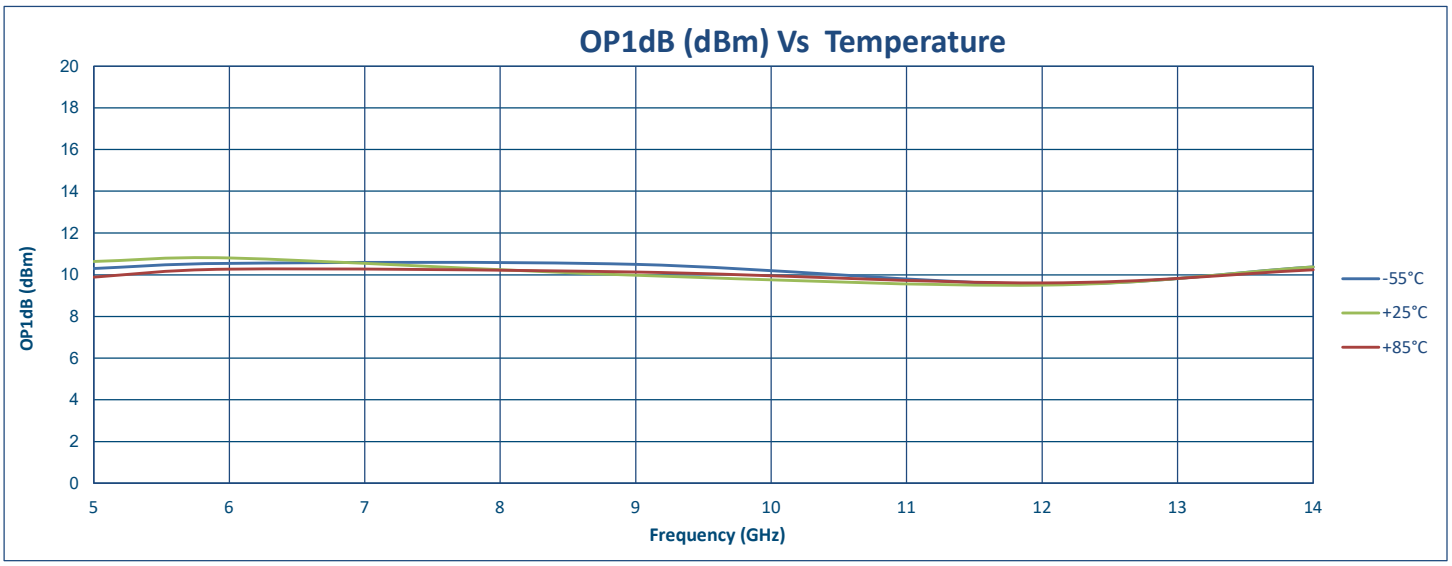

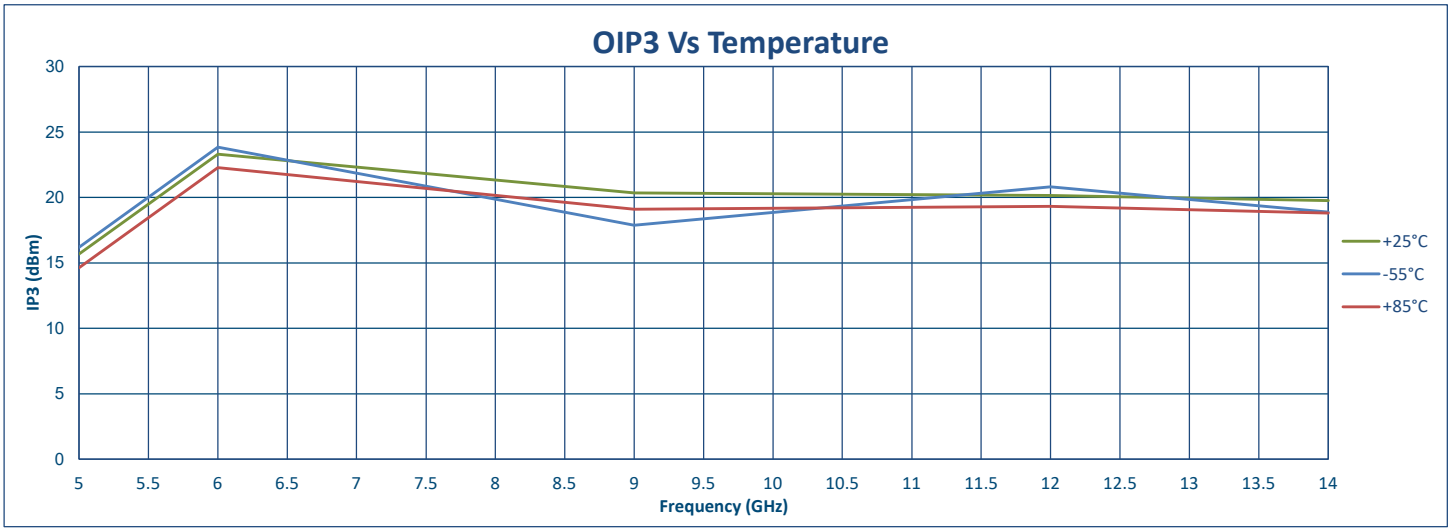

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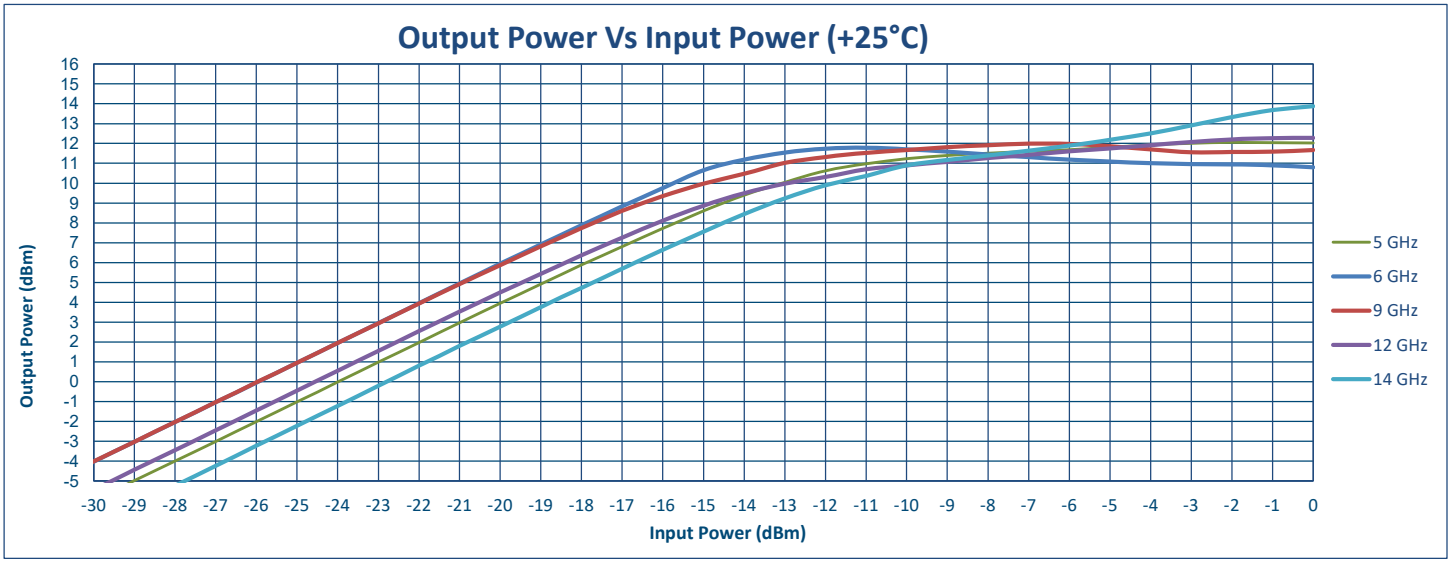

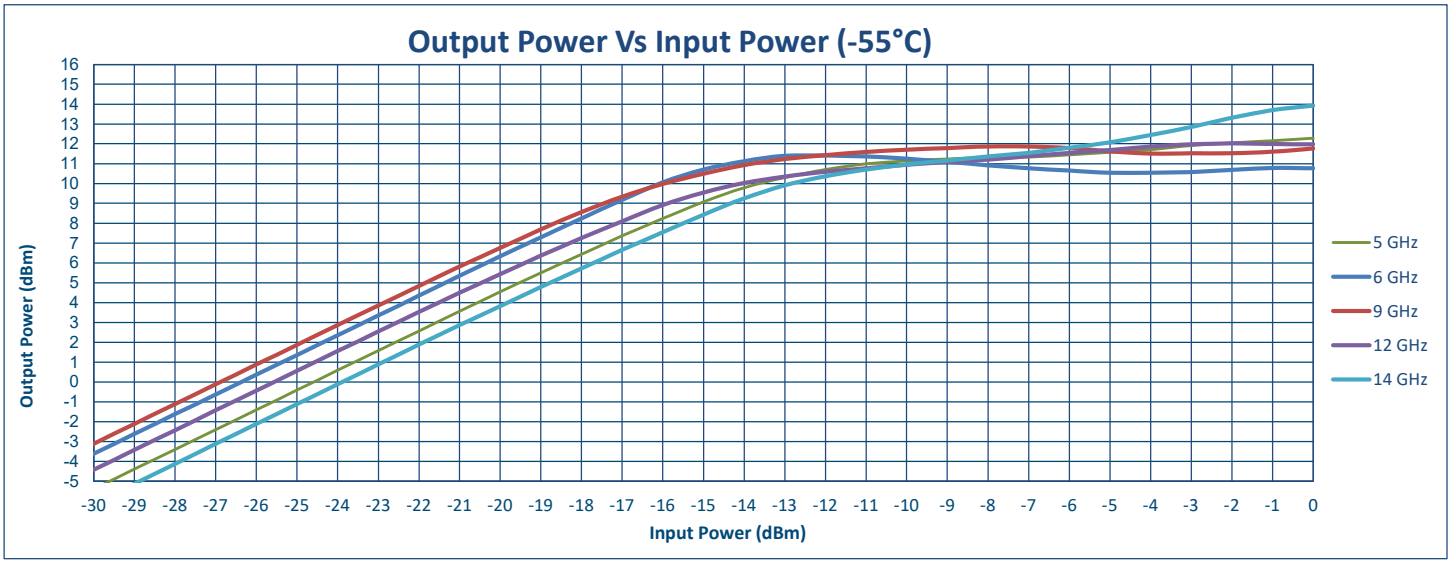

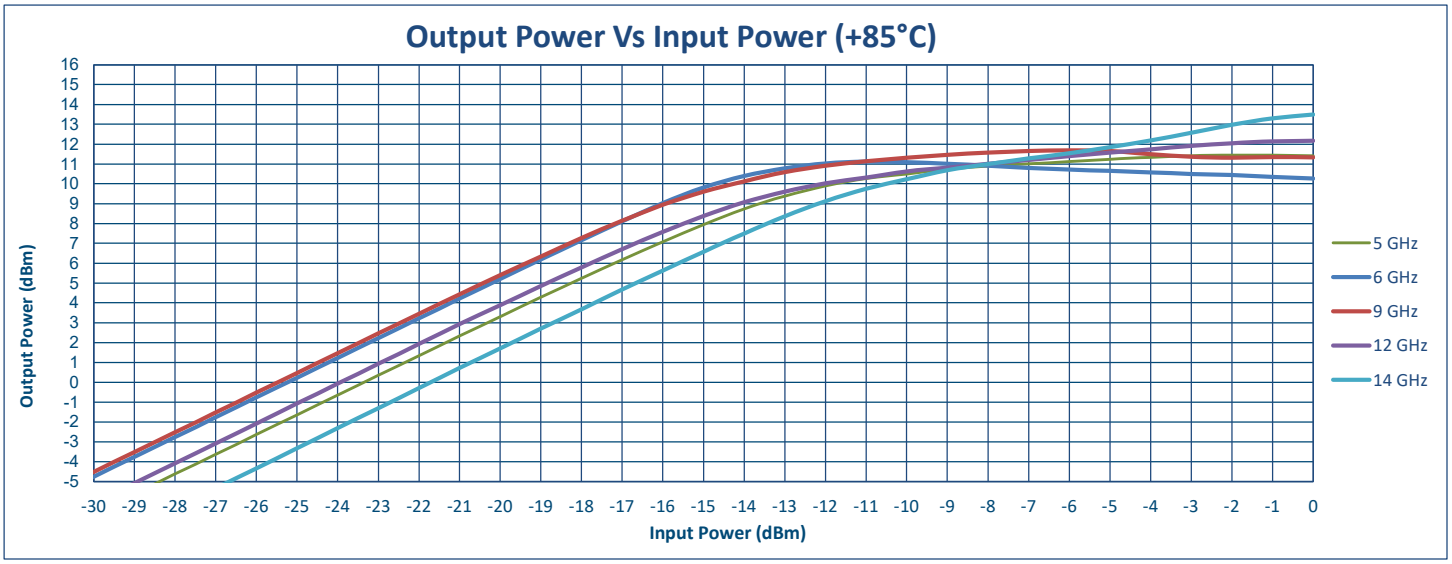

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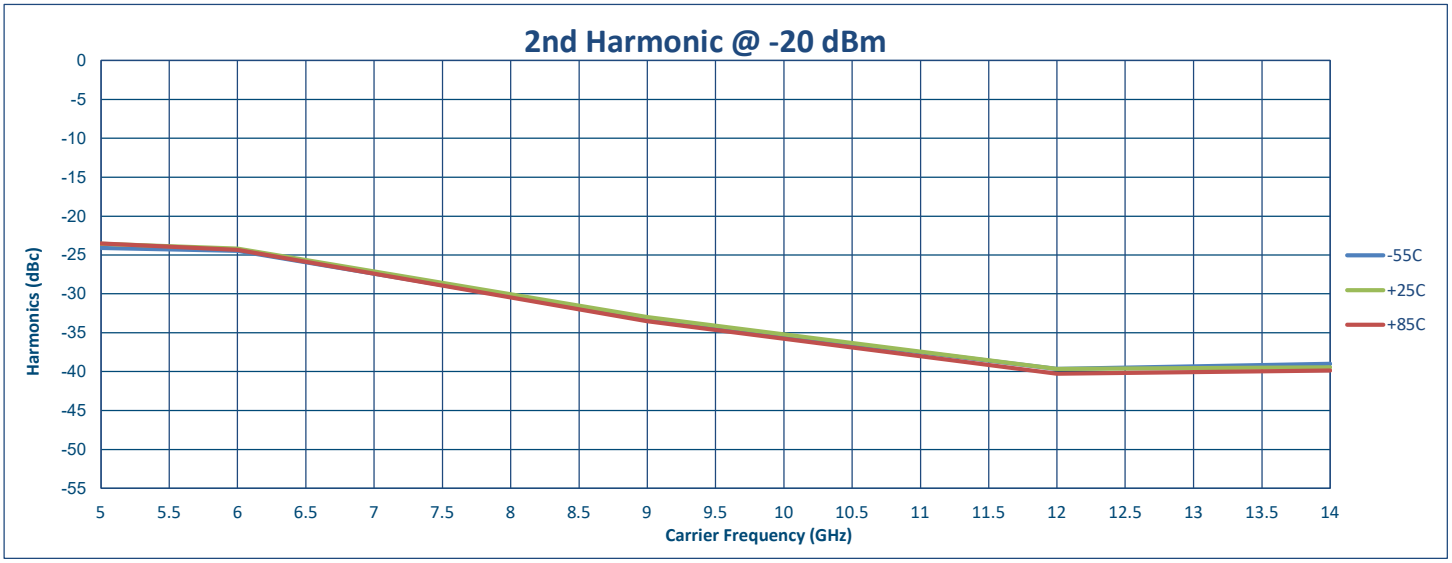

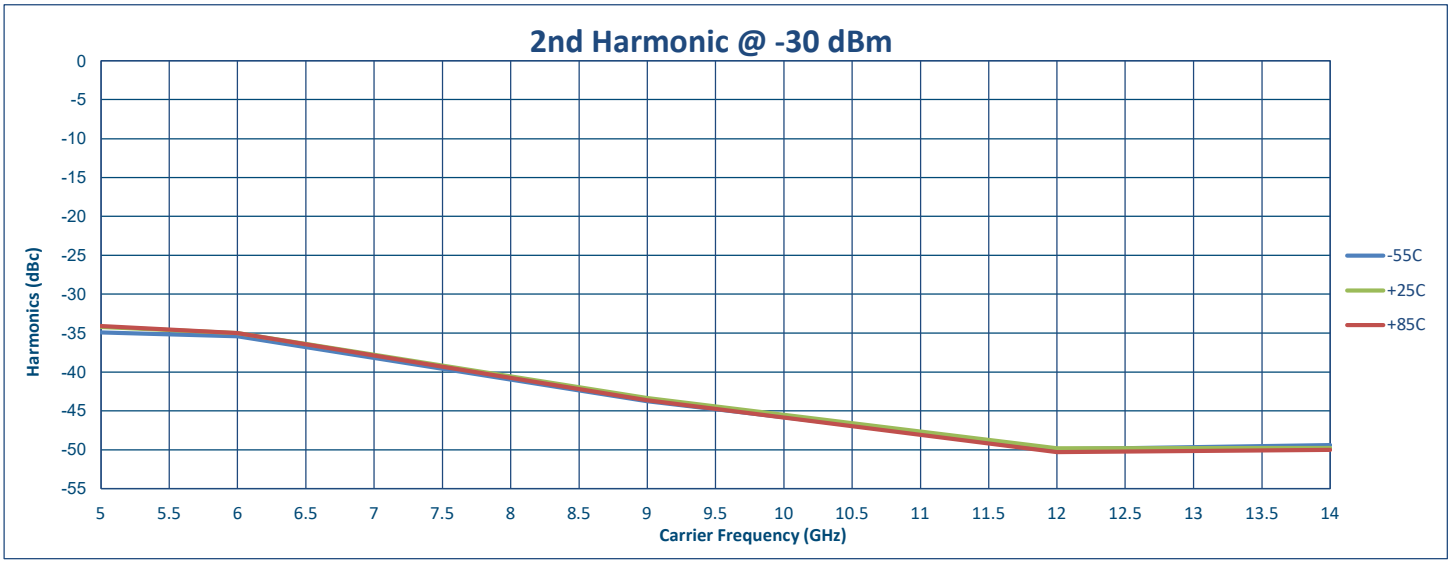

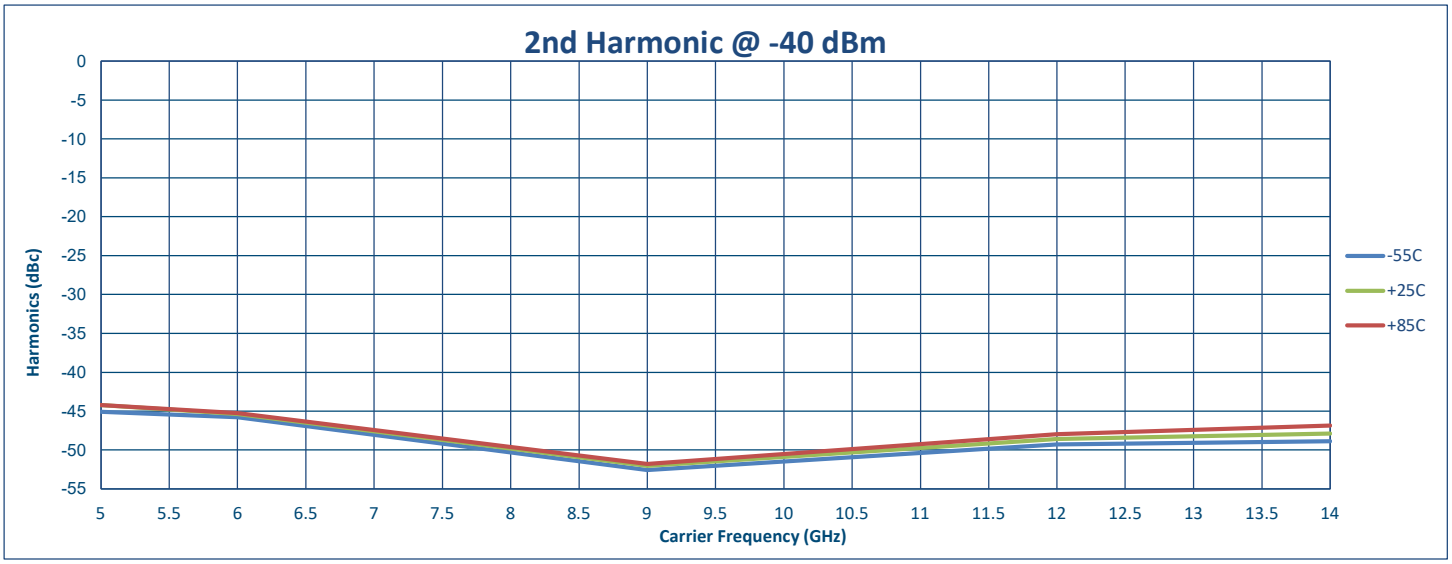

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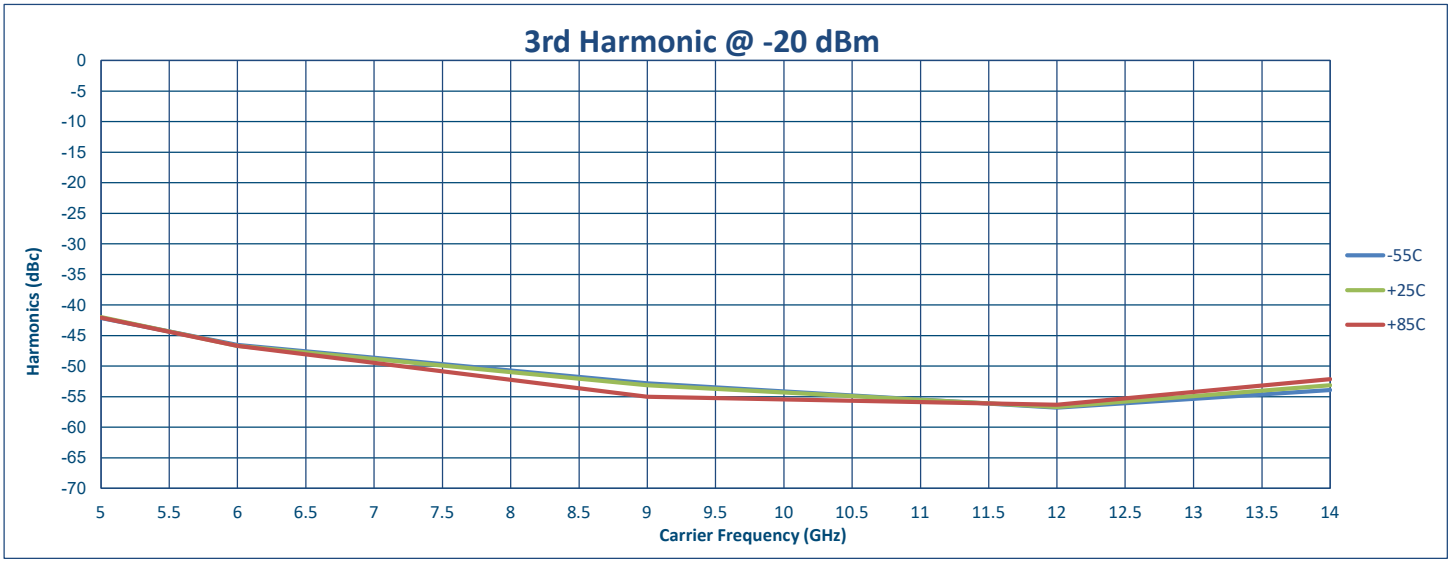
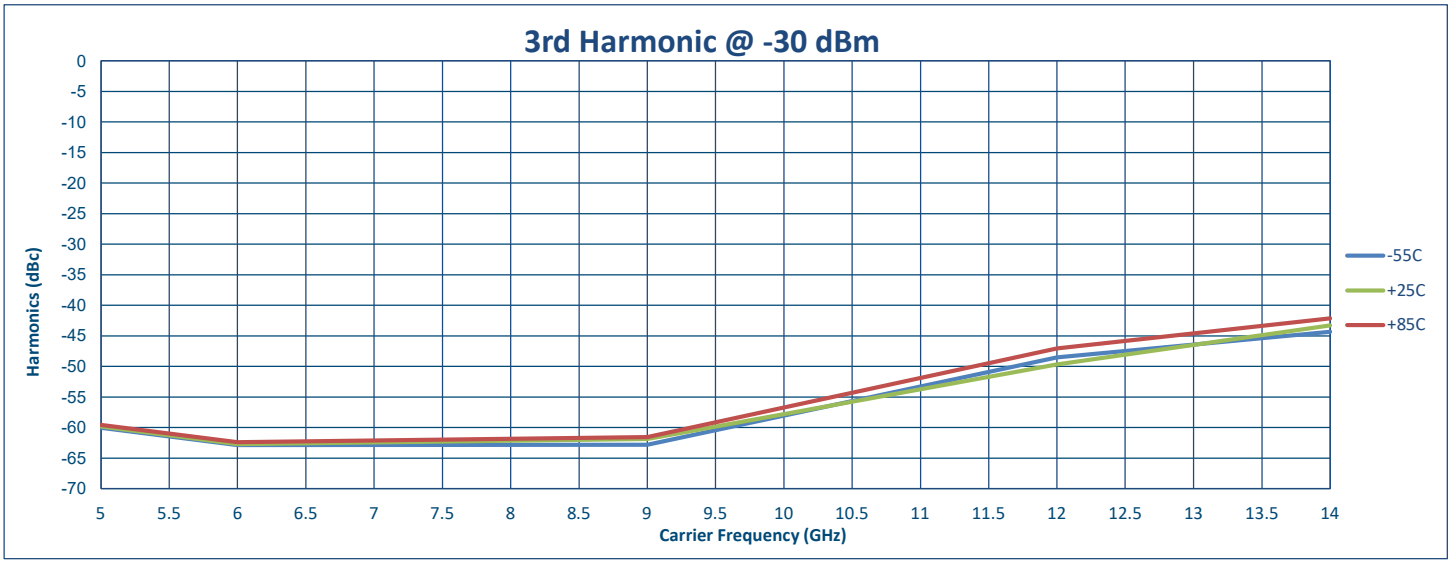
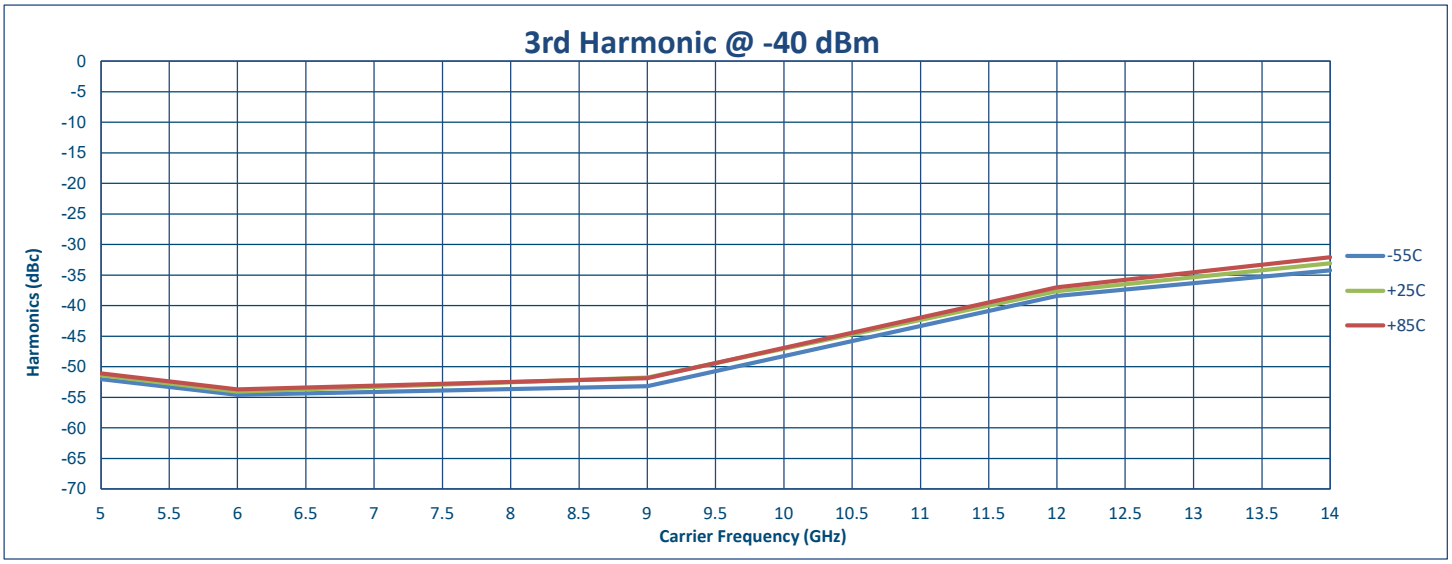
ON
PLN-612-27-1-LCA







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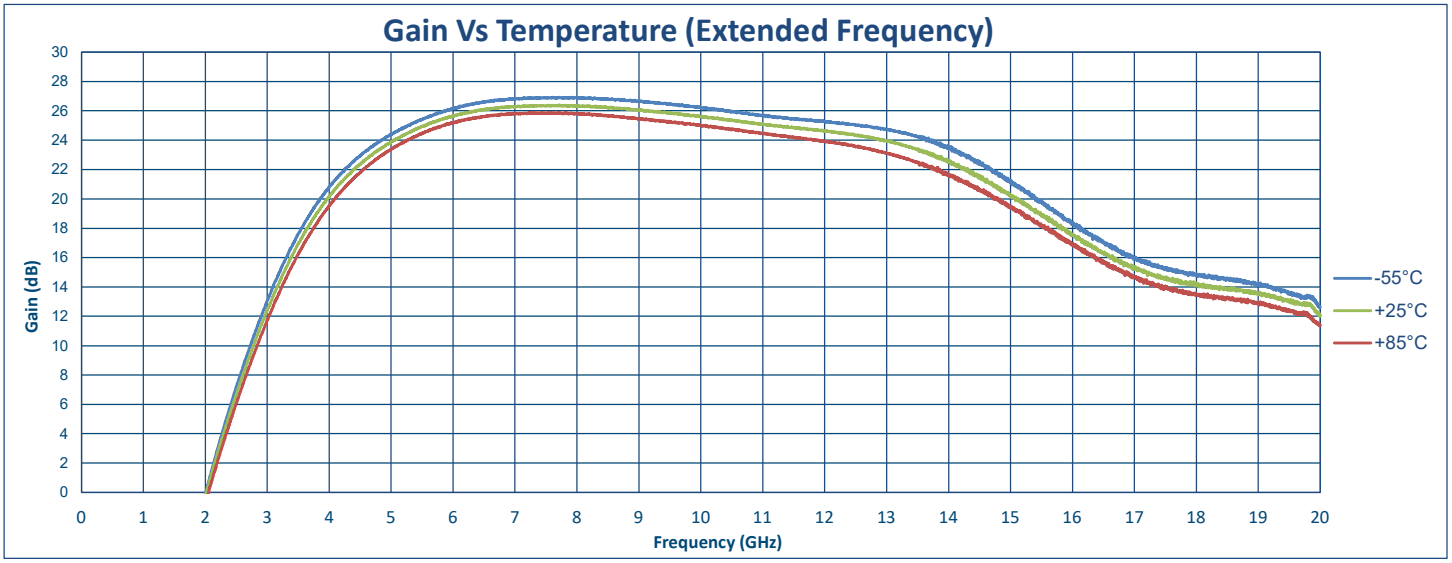

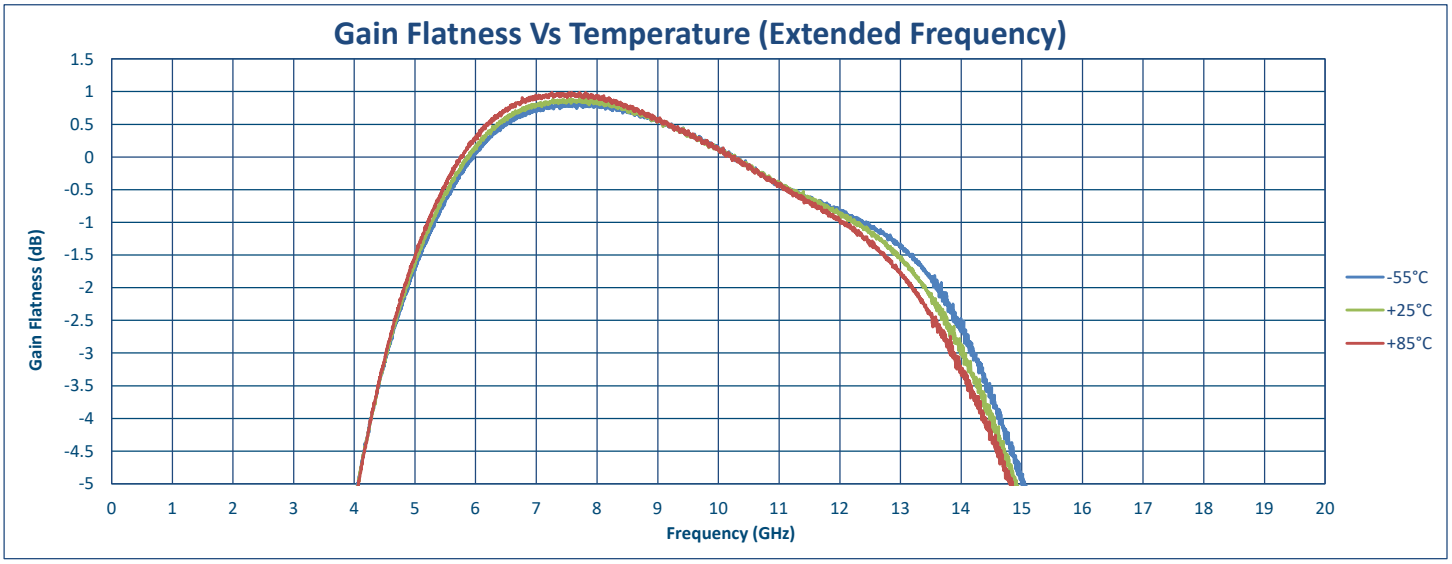

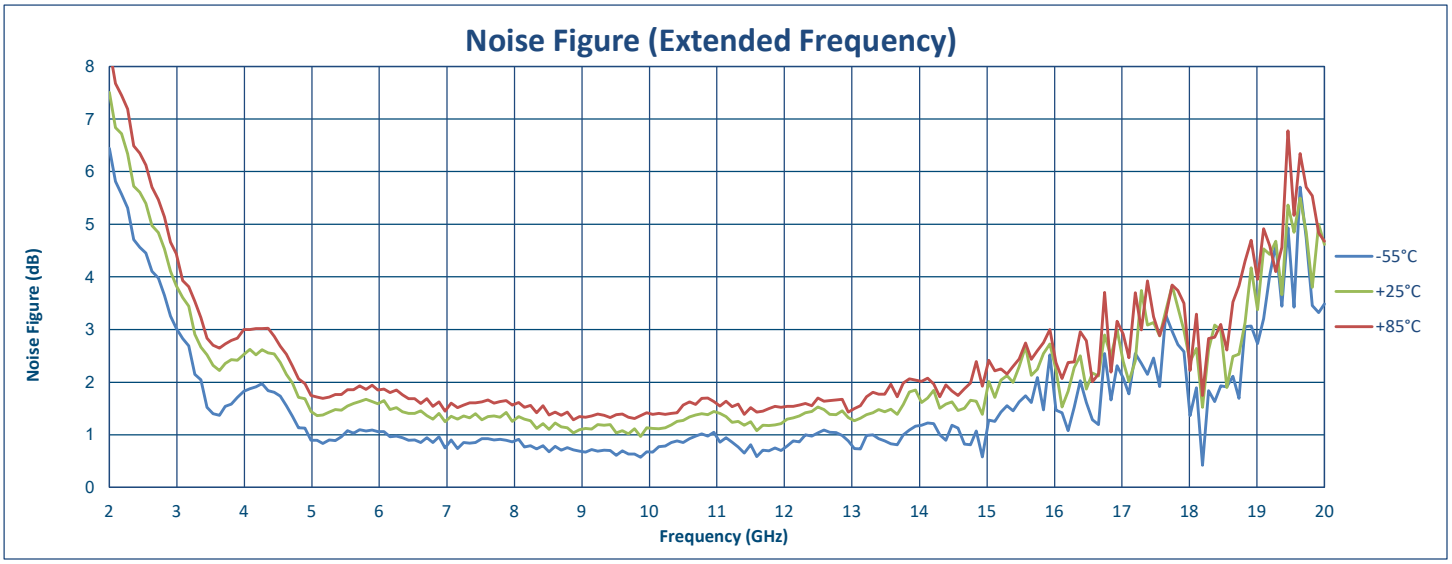

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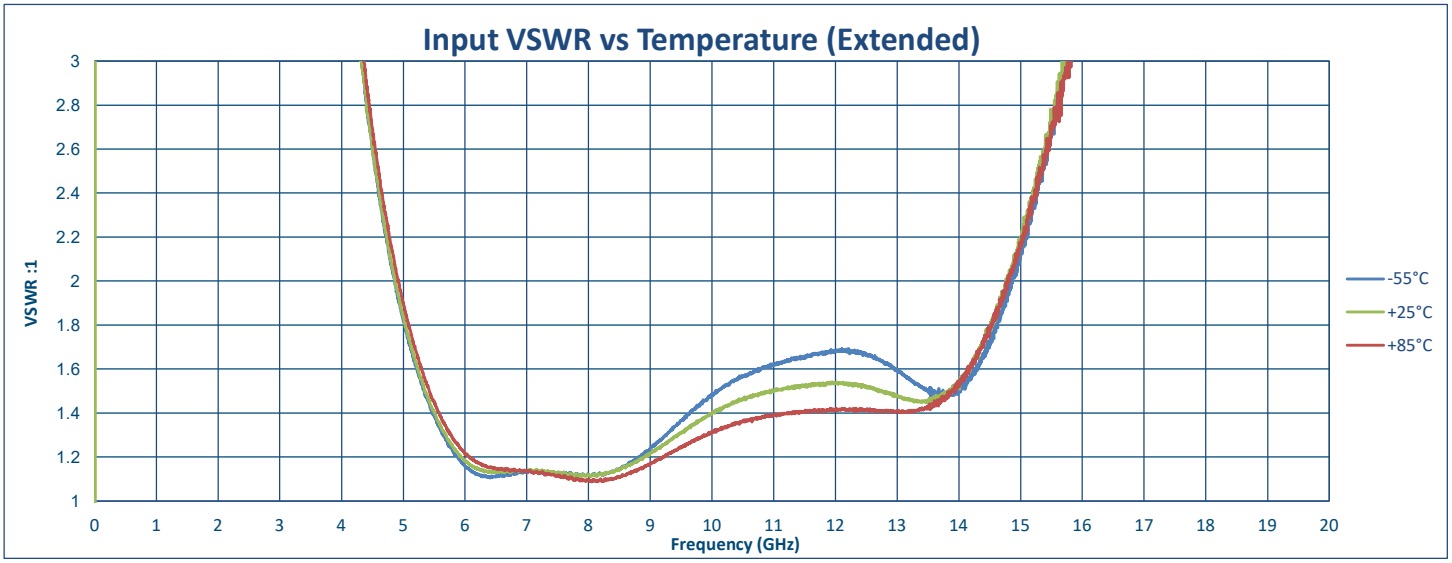

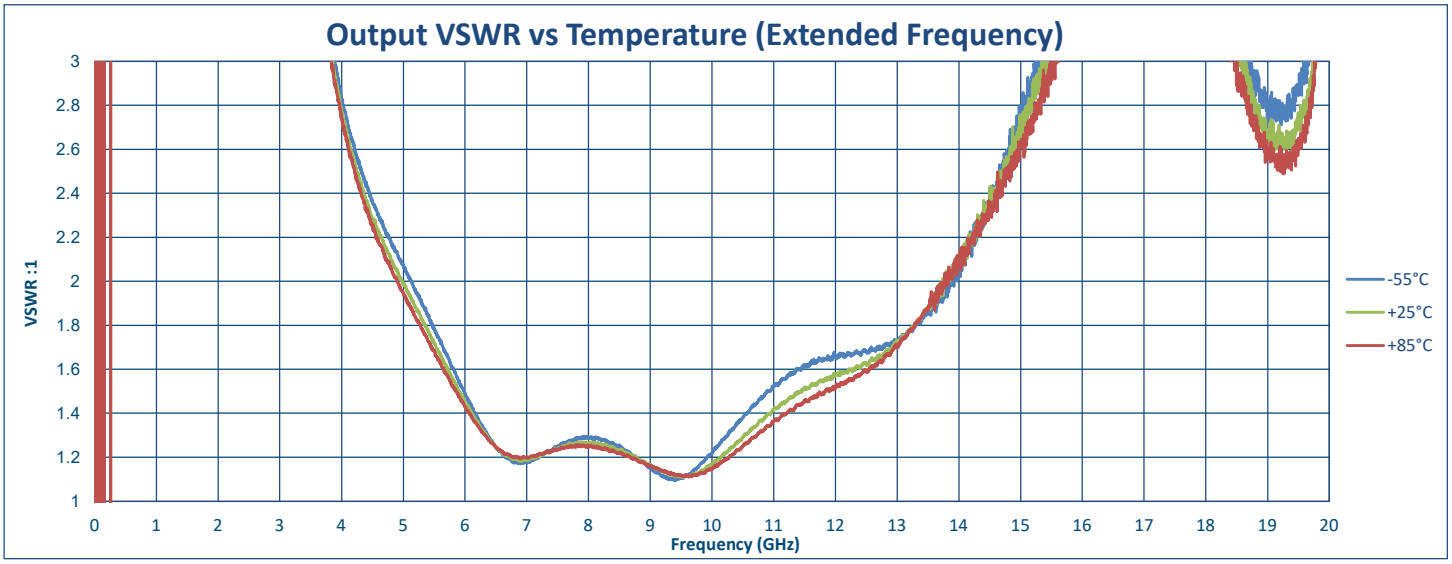

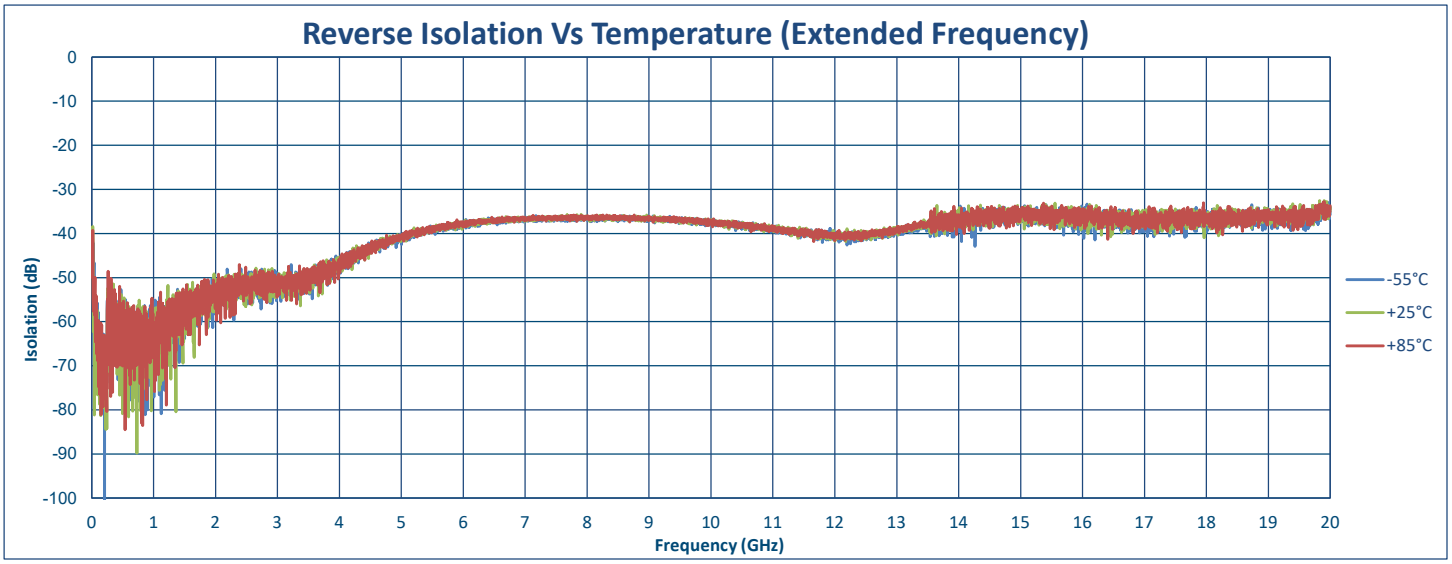

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