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<p>Appendix B: 802.11ax Test Plot</p>	<p>FCC ID A3LSMM546B</p>
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REVISION HISTORY

The revision history for this document is shown in table.

Revision No.	Date of Issue	Description
0	January 12, 2023	Initial Release

Note:

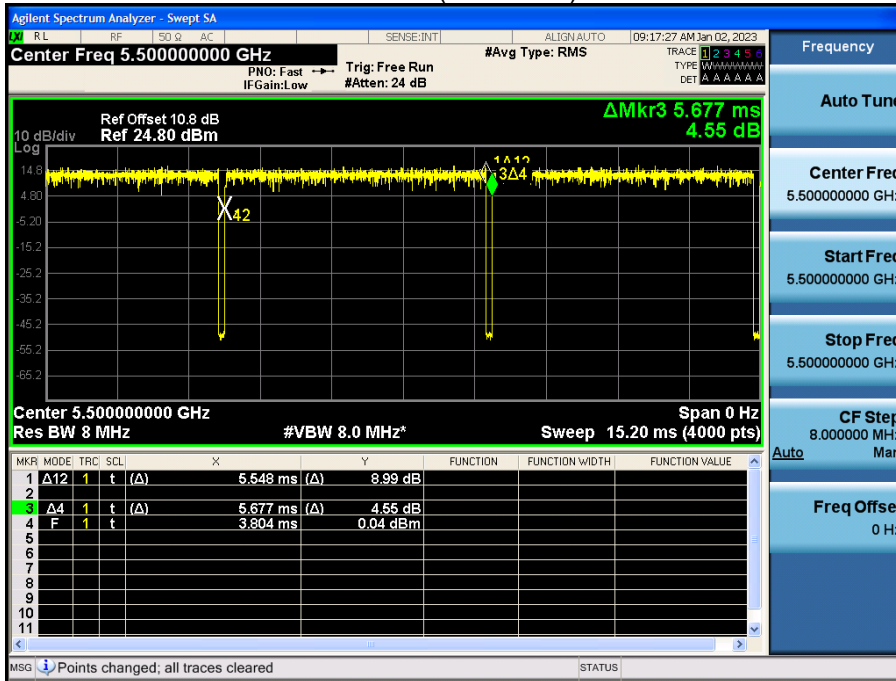
In order to simplify the report, attached plots were only the most lowest datarate.

1. Duty Cycle

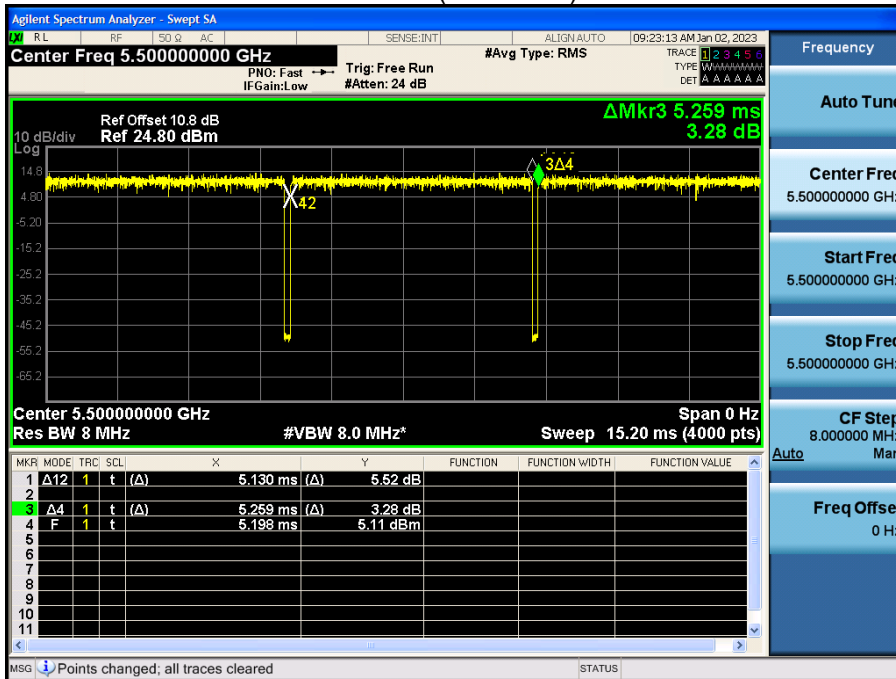
Note :

1. Duty Cycle Factor = $10 \cdot \log(1/\text{Duty Cycle})$. where, $\text{Duty Cycle} = T_{\text{on}} / T_{\text{total}}$
2. In order to simplify the report, attached plots were only the most lowest datarate. [SISO]

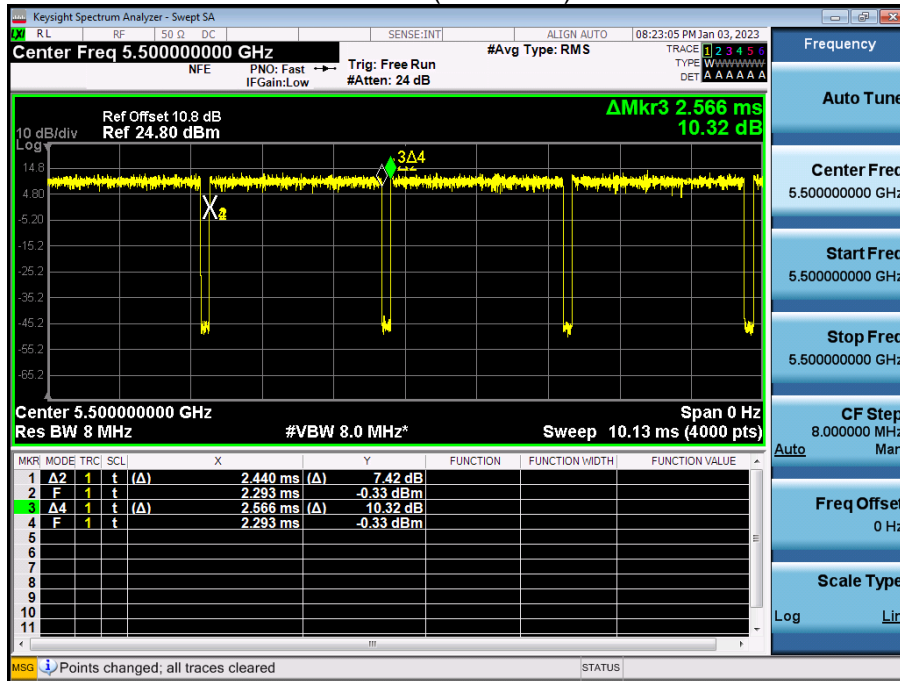
Bandwidth 20M Ch.100(5500 MHz) 26Tone MCS0



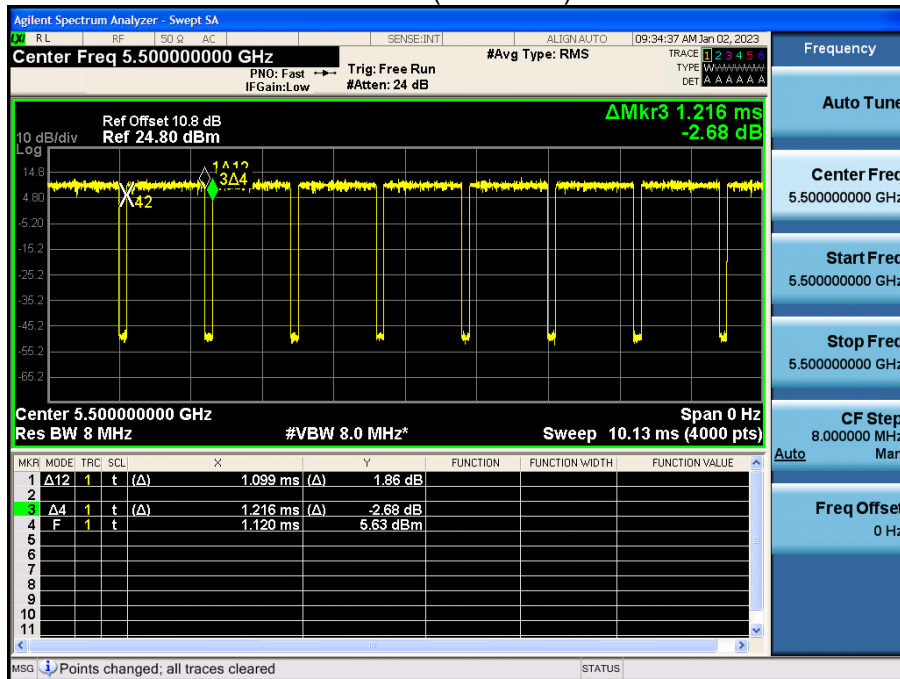
Bandwidth 20M Ch.100(5500 MHz) 52Tone MCS0



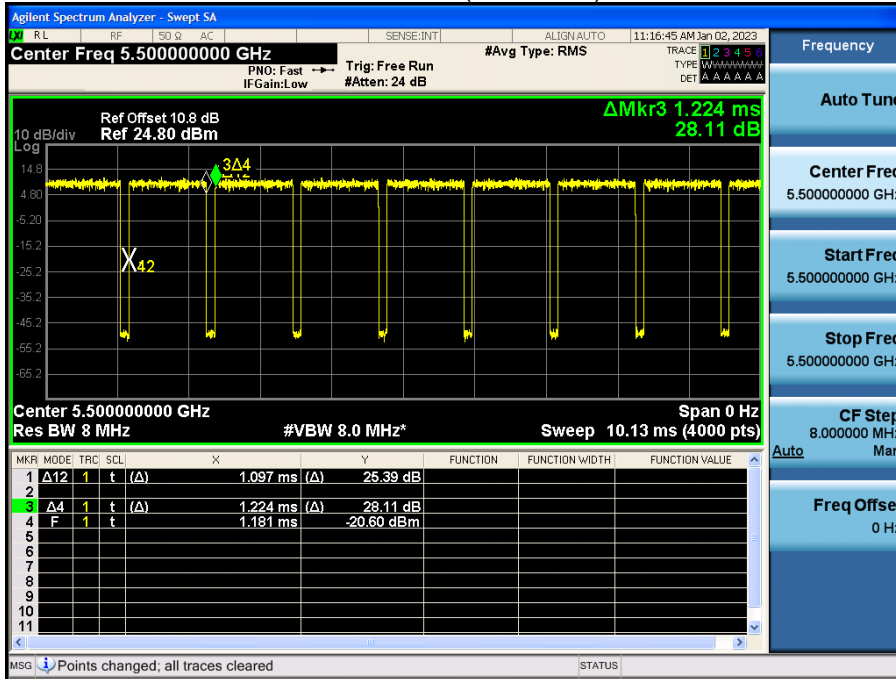
Bandwidth 20M Ch.100(5500 MHz) 106Tone MCS0



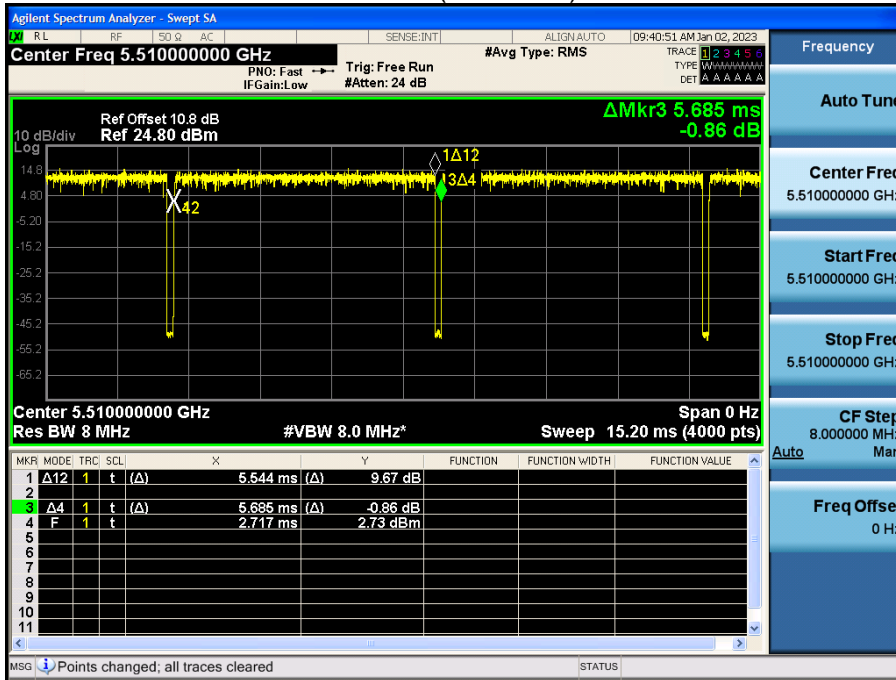
Bandwidth 20M Ch.100(5500 MHz) 242Tone MCS0



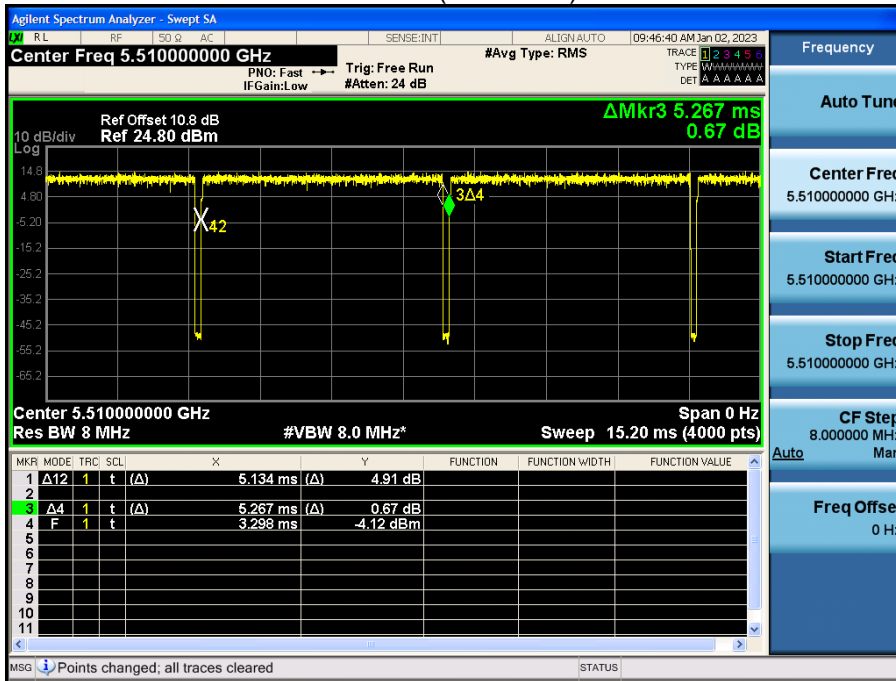
Bandwidth 20M Ch.100(5500 MHz) SU MCS0



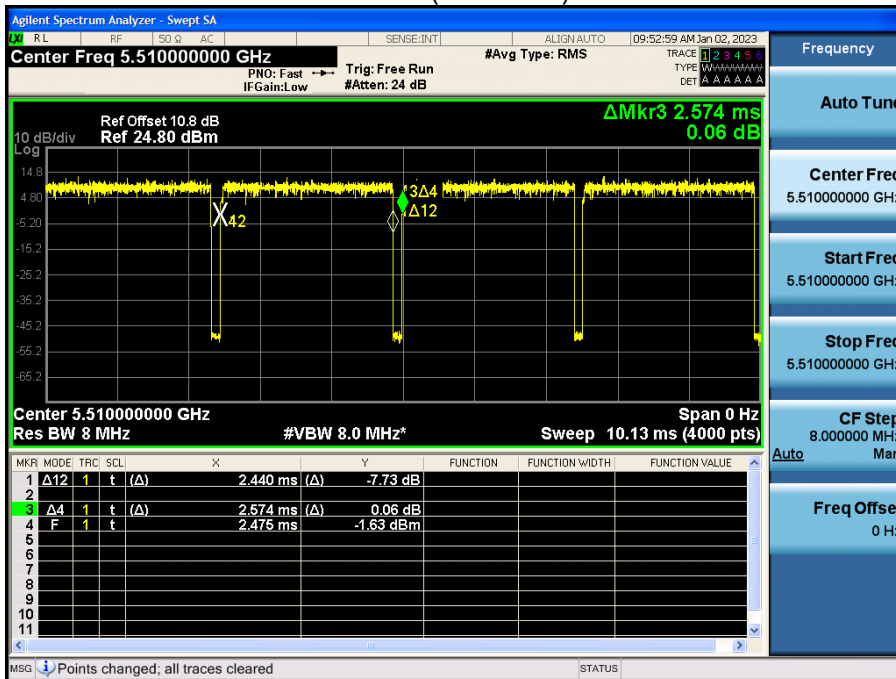
Bandwidth 40M Ch.102(5510 MHz) 26Tone MCS0



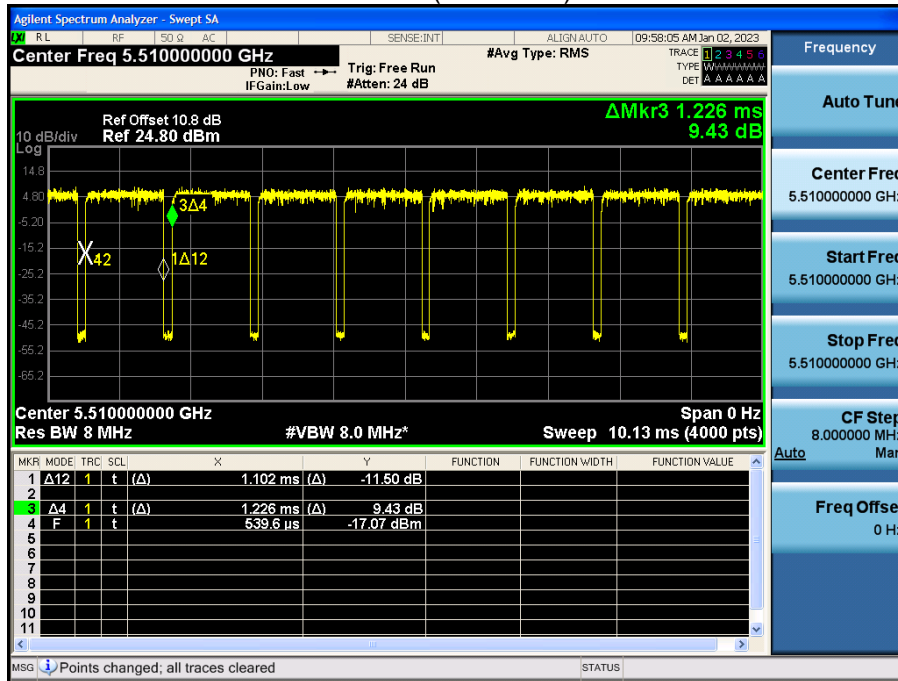
Bandwidth 40M Ch.102(5510 MHz) 52Tone MCS0



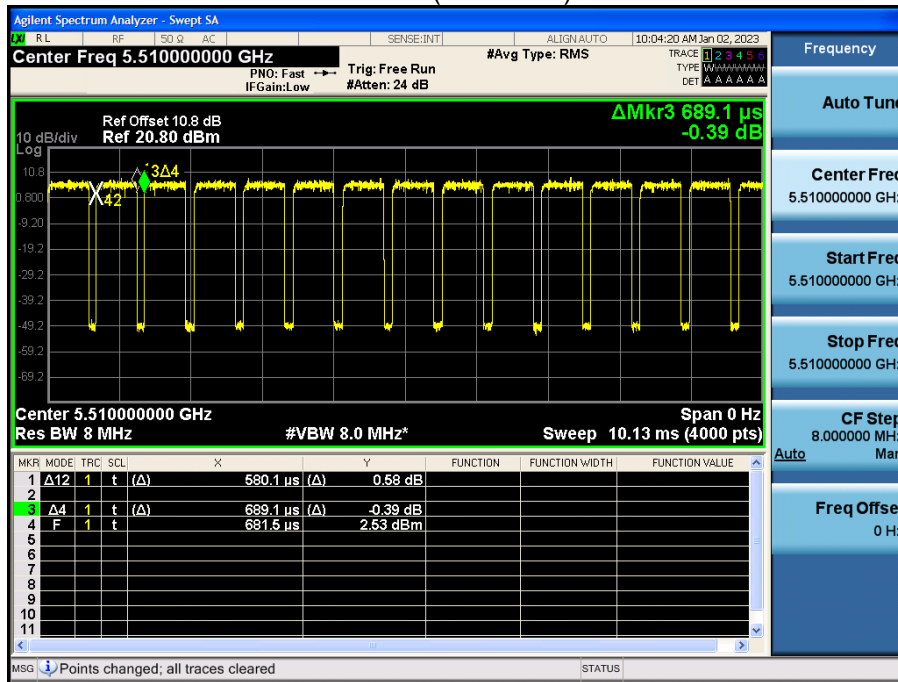
Bandwidth 40M Ch.102(5510 MHz) 106Tone MCS0



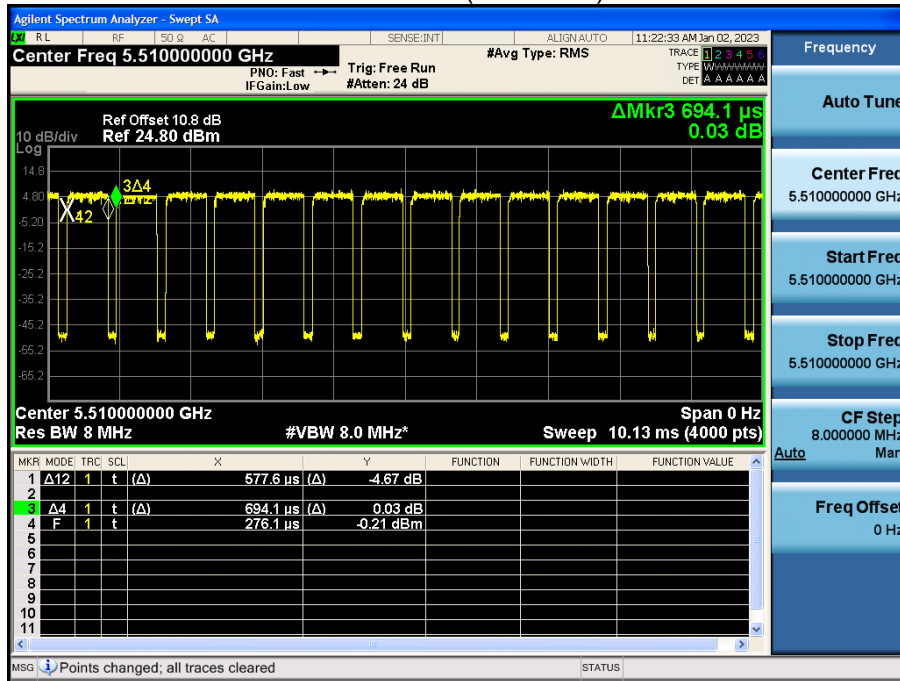
Bandwidth 40M Ch.102(5510 MHz) 242Tone MCS0



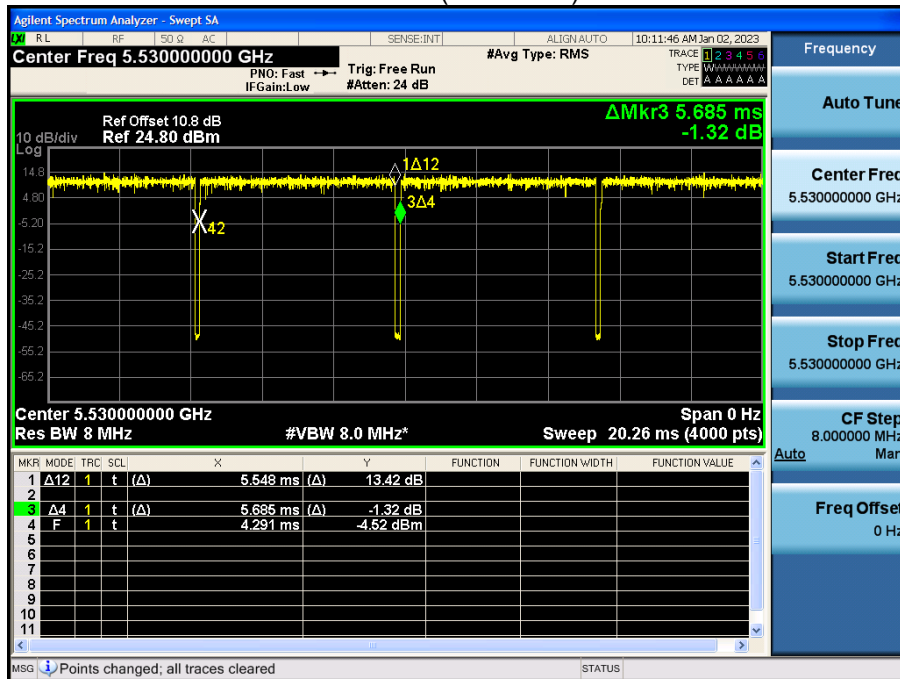
Bandwidth 40M Ch.102(5510 MHz) 484Tone MCS0



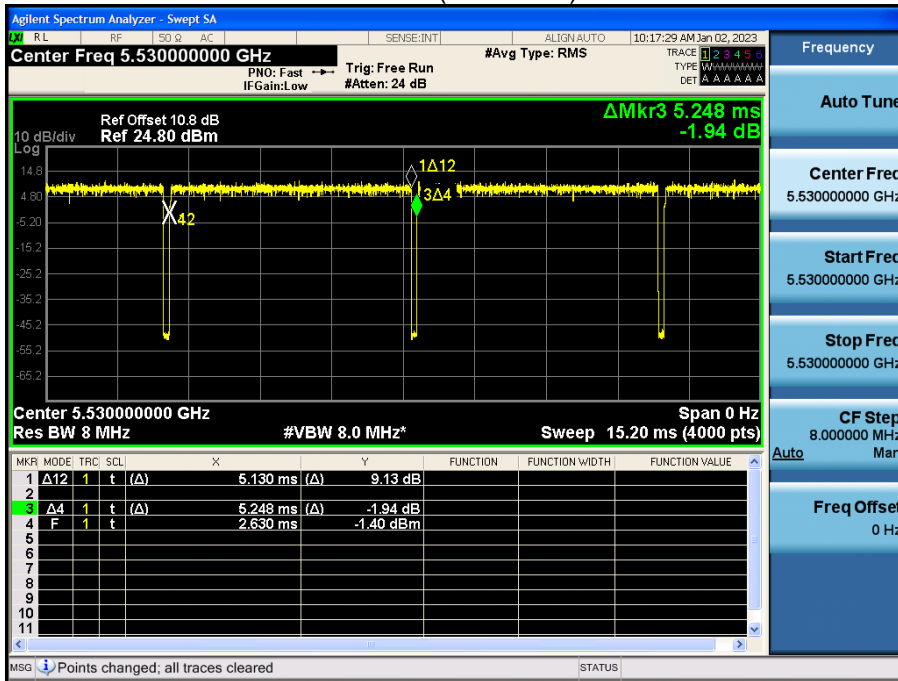
Bandwidth 40M Ch.102(5510 MHz) SU MCS0



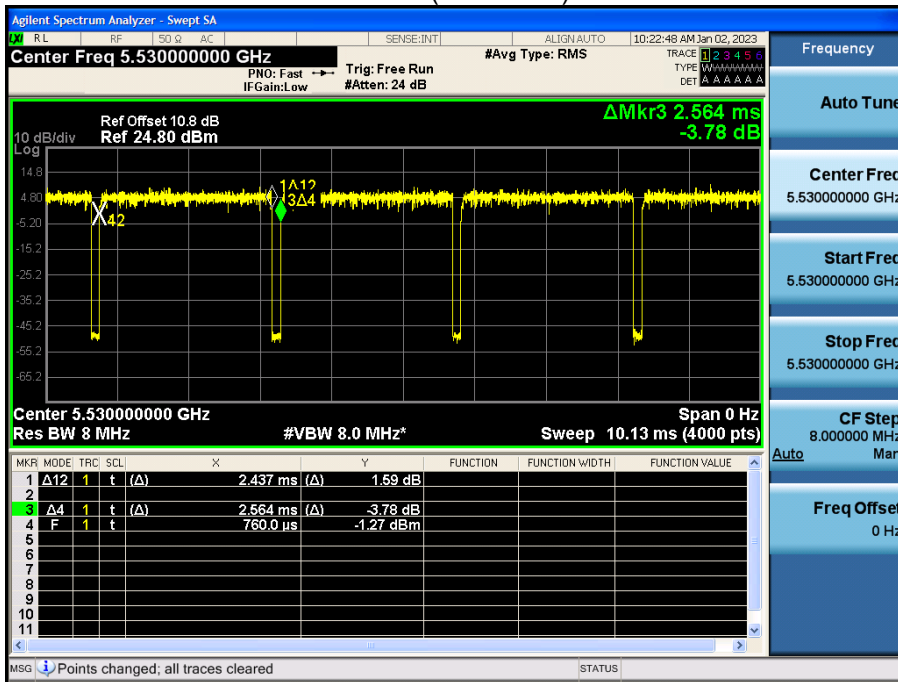
Bandwidth 80M Ch.106(5530 MHz) 26Tone MCS0



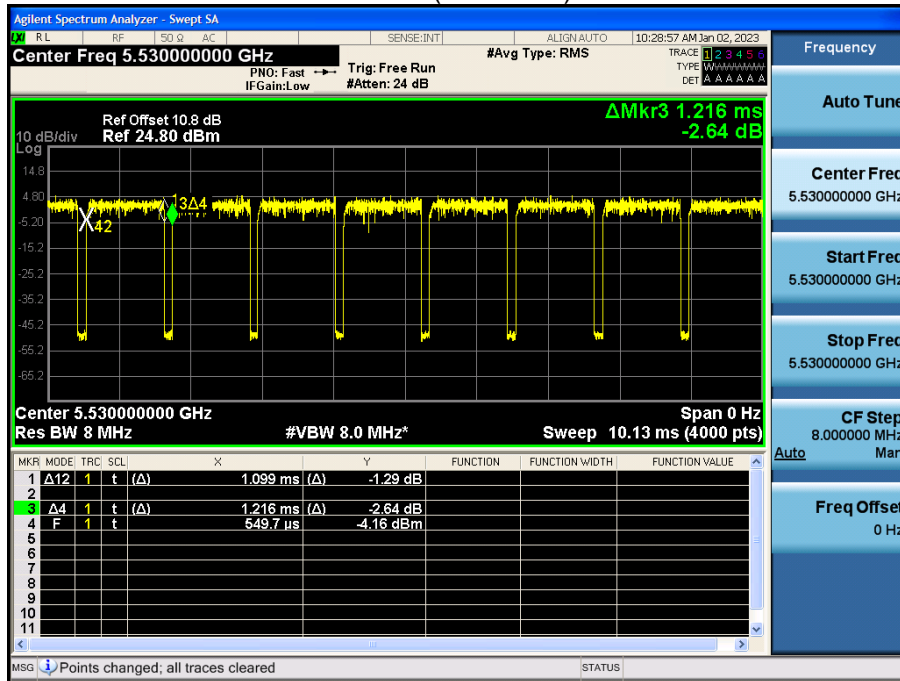
Bandwidth 80M Ch.106(5530 MHz) 52Tone MCS0



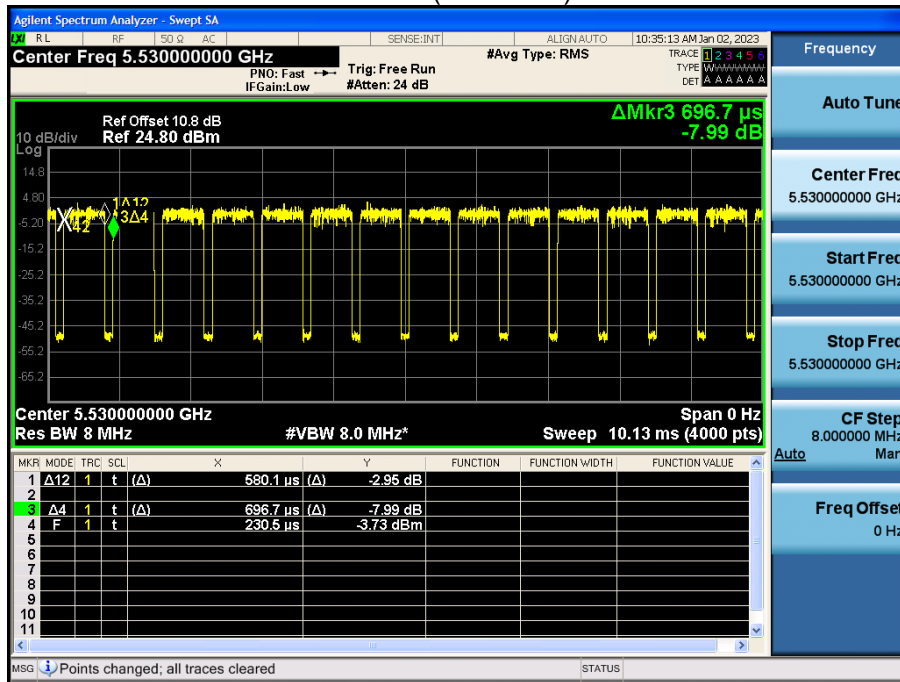
Bandwidth 80M Ch.106(5530 MHz) 106Tone MCS0



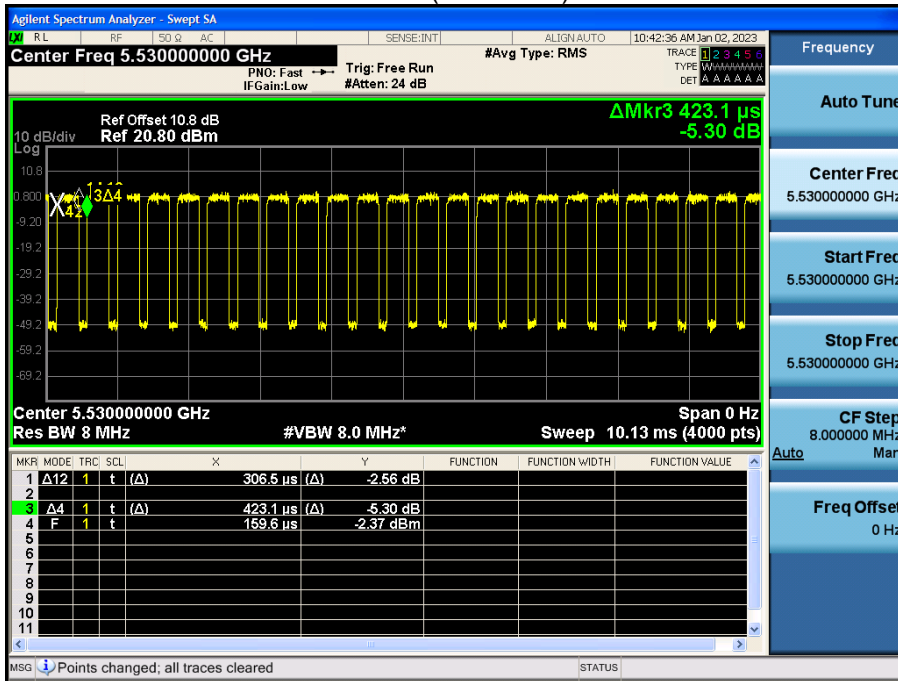
Bandwidth 80M Ch.106(5530 MHz) 242Tone MCS0



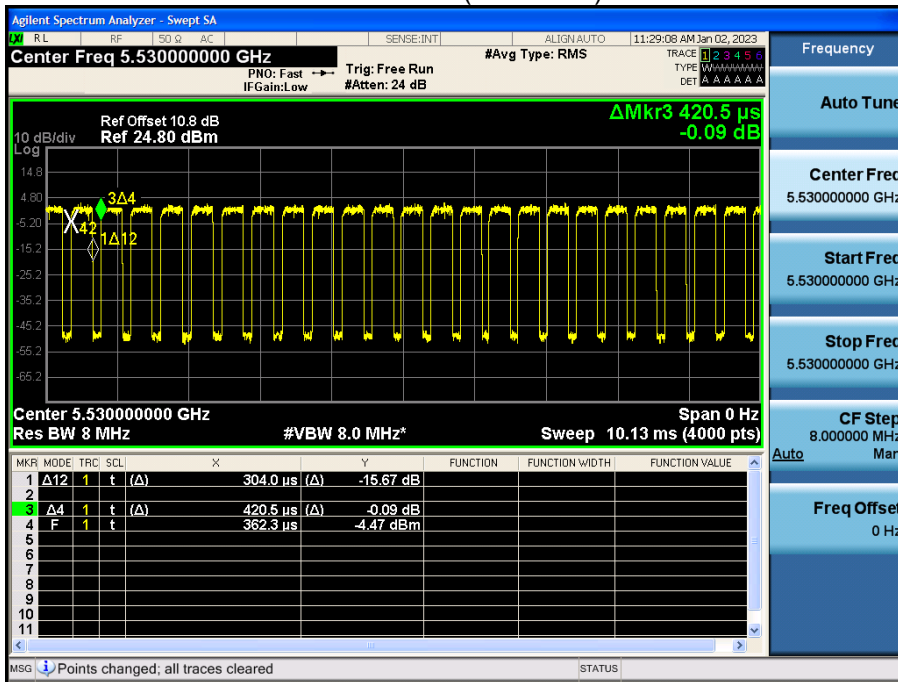
Bandwidth 80M Ch.106(5530 MHz) 484Tone MCS0



Bandwidth 80M Ch.106(5530 MHz) 996Tone MCS0

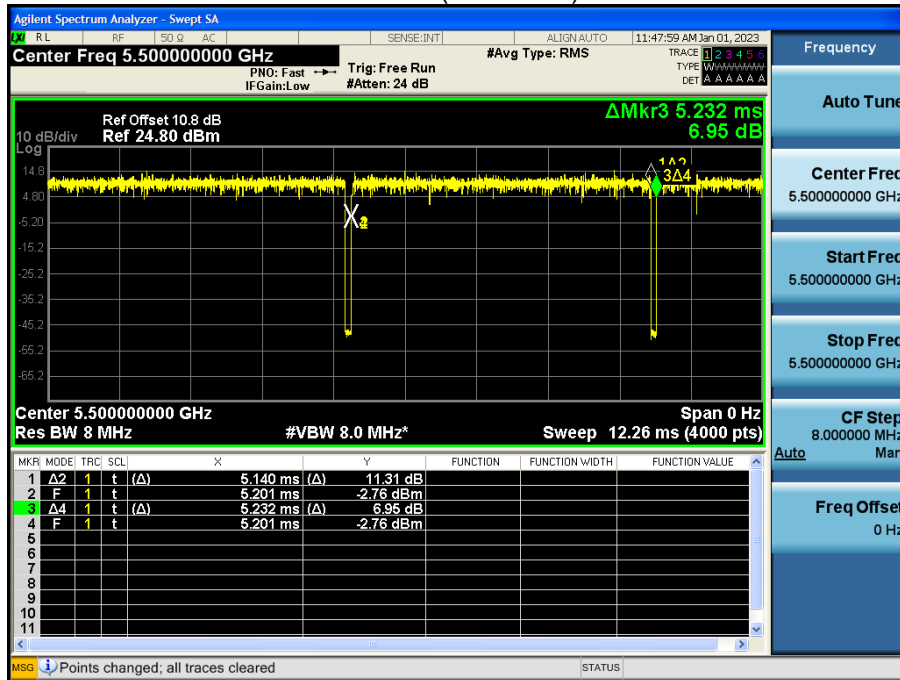


Bandwidth 80M Ch.106(5530 MHz) SU MCS0

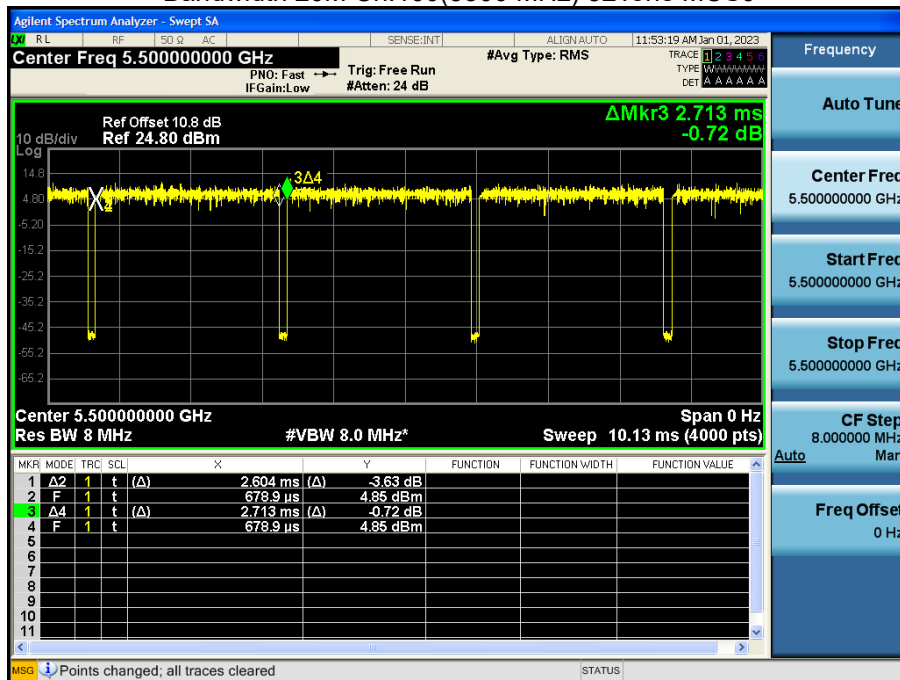


[MIMO]

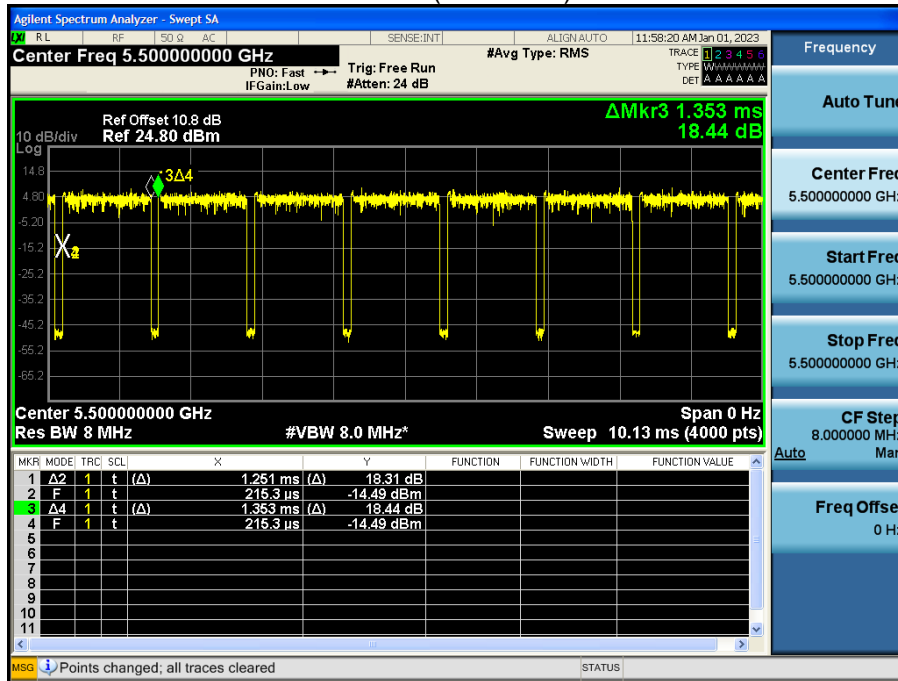
Bandwidth 20M Ch.100(5500 MHz) 26Tone MCS0



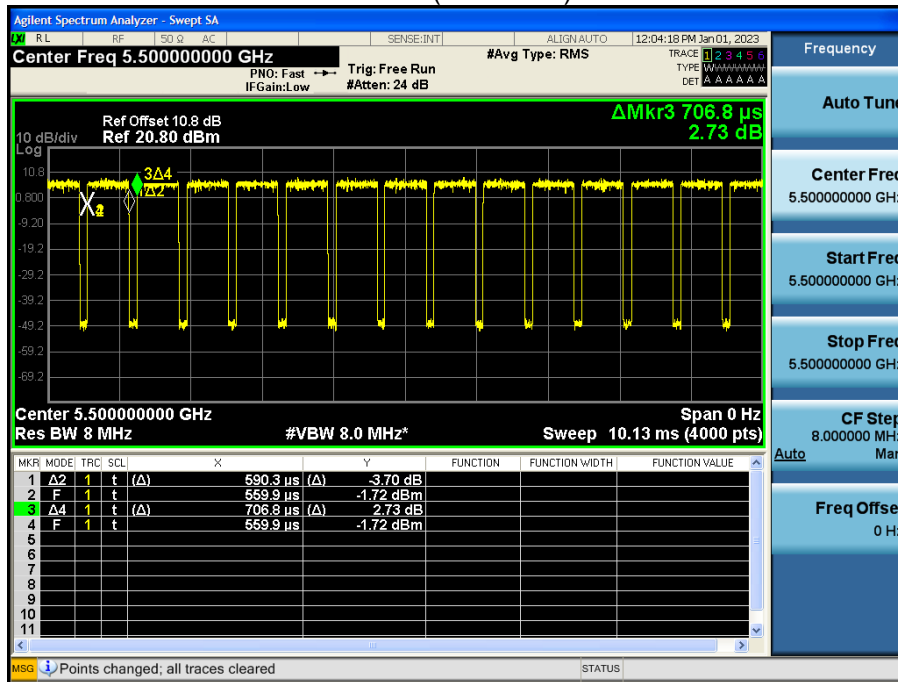
Bandwidth 20M Ch.100(5500 MHz) 52Tone MCS0



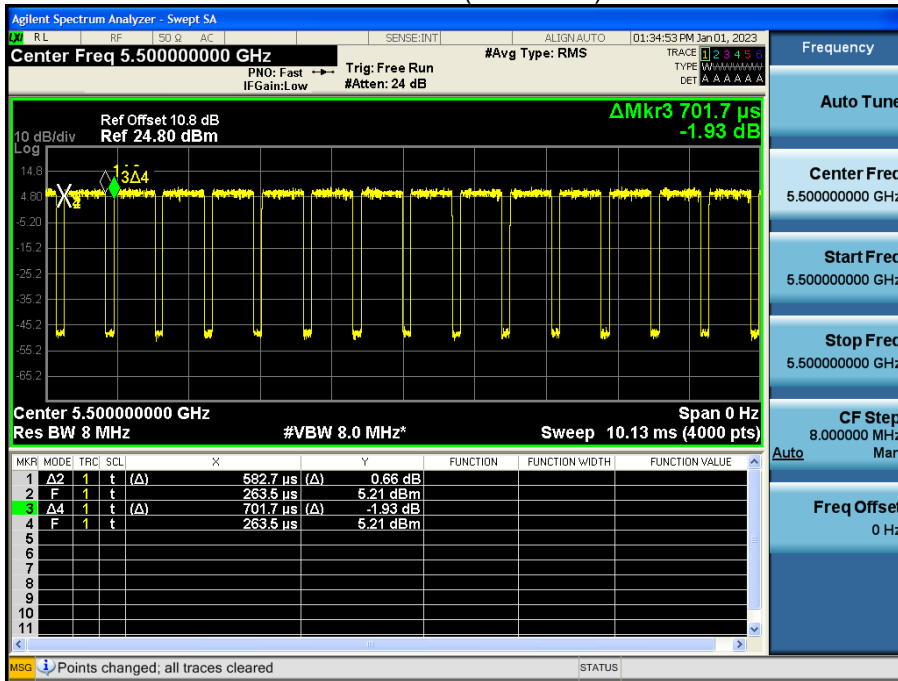
Bandwidth 20M Ch.100(5500 MHz) 106Tone MCS0



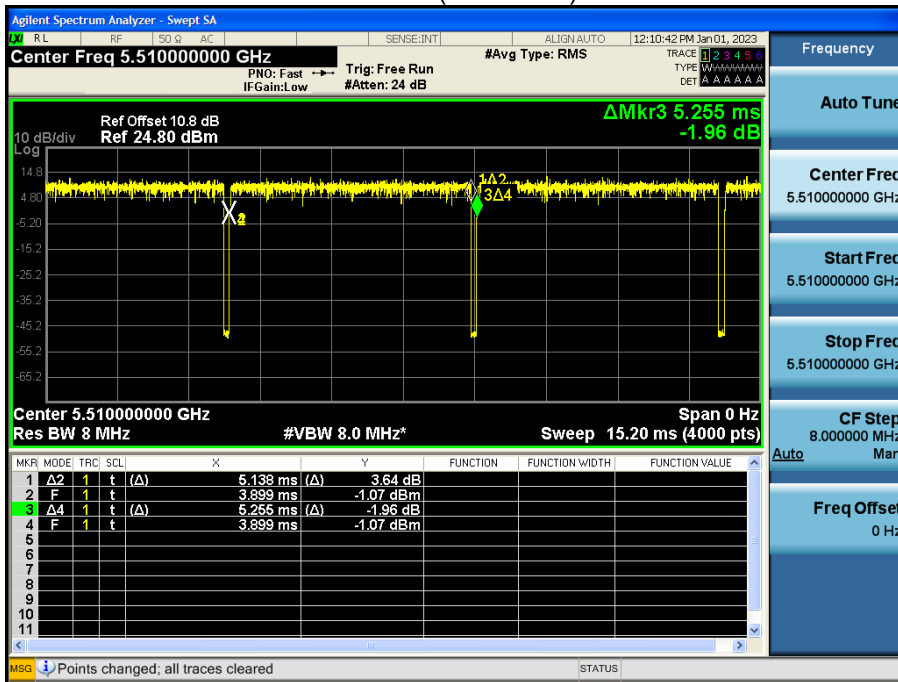
Bandwidth 20M Ch.100(5500 MHz) 242Tone MCS0



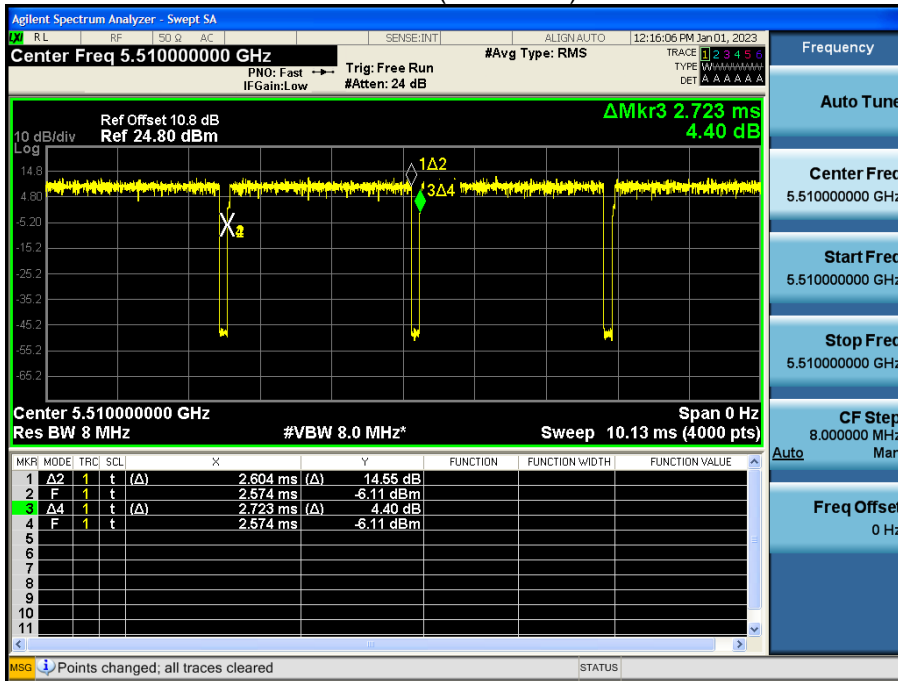
Bandwidth 20M Ch.100(5500 MHz) SU MCS0



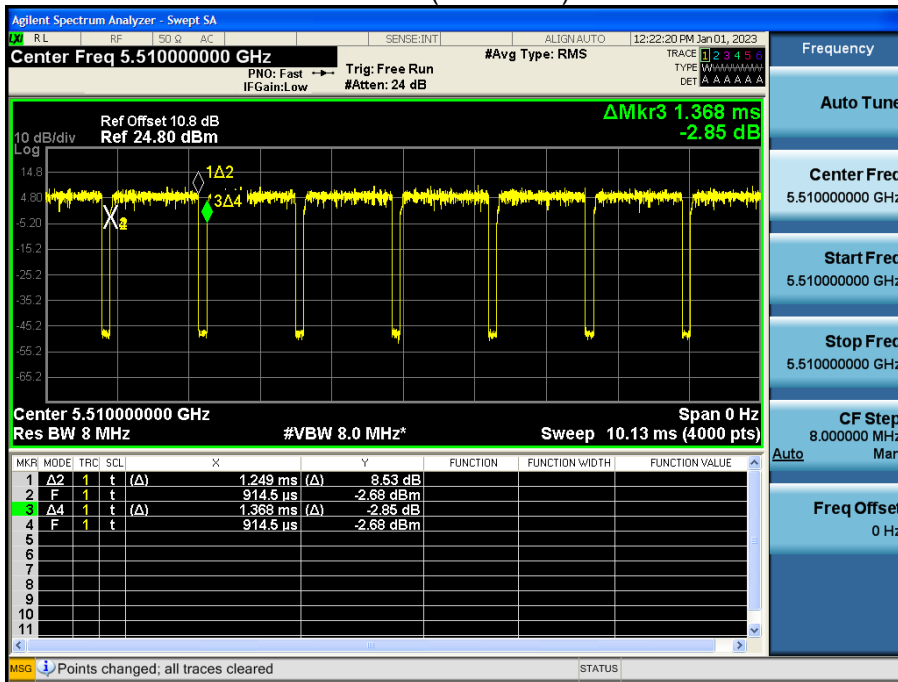
Bandwidth 40M Ch.102(5510 MHz) 26Tone MCS0



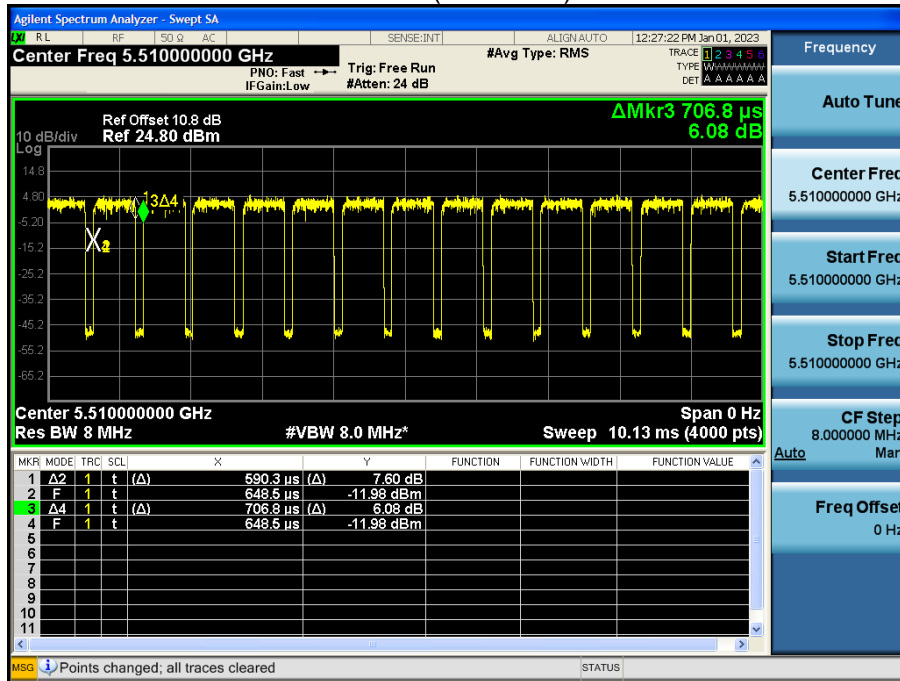
Bandwidth 40M Ch.102(5510 MHz) 52Tone MCS0



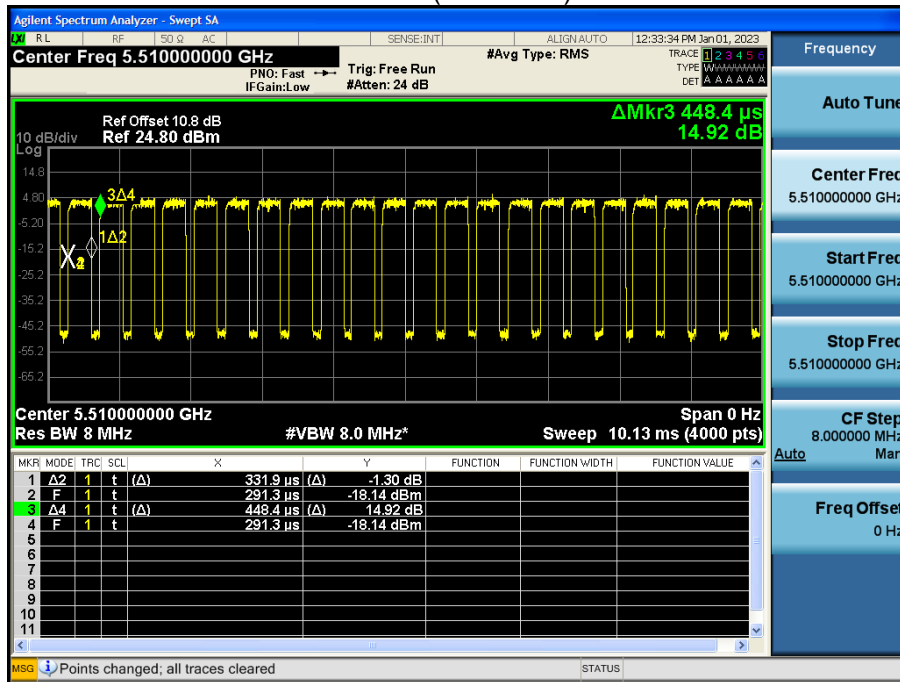
Bandwidth 40M Ch.102(5510 MHz) 106Tone MCS0



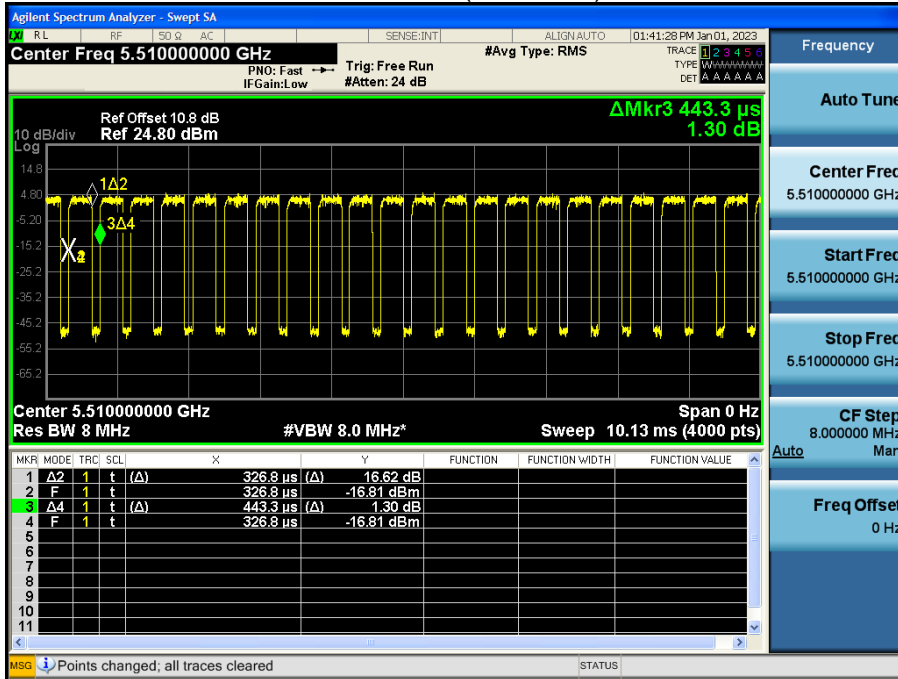
Bandwidth 40M Ch.102(5510 MHz) 242Tone MCS0



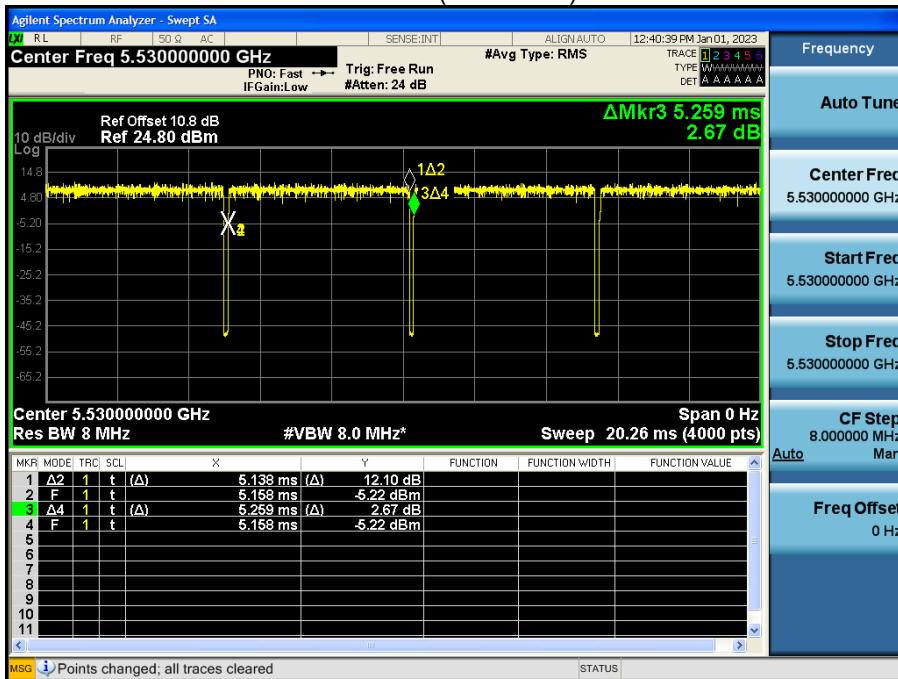
Bandwidth 40M Ch.102(5510 MHz) 484Tone MCS0



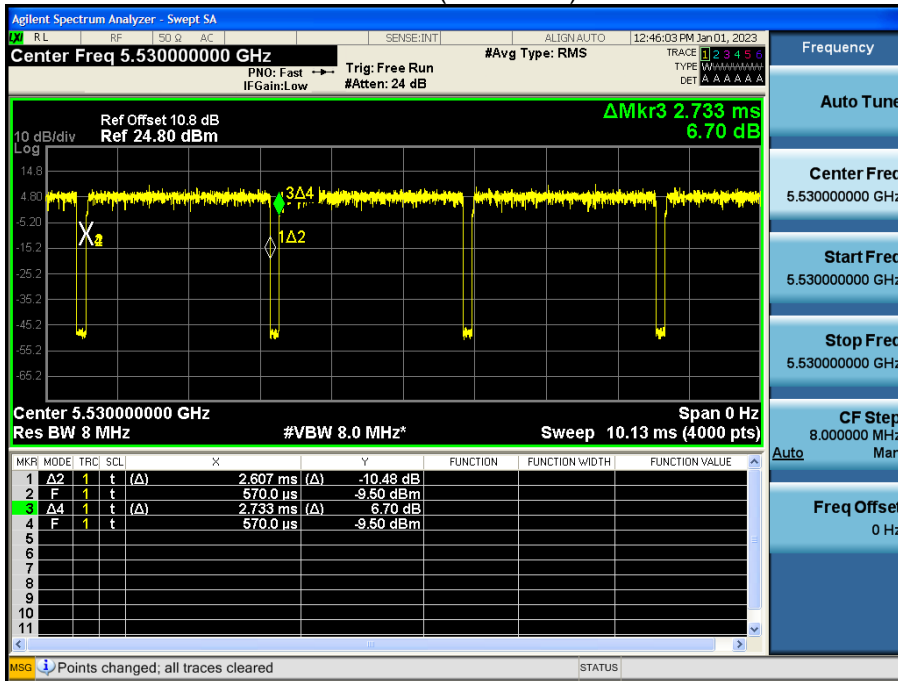
Bandwidth 40M Ch.102(5510 MHz) SU MCS0



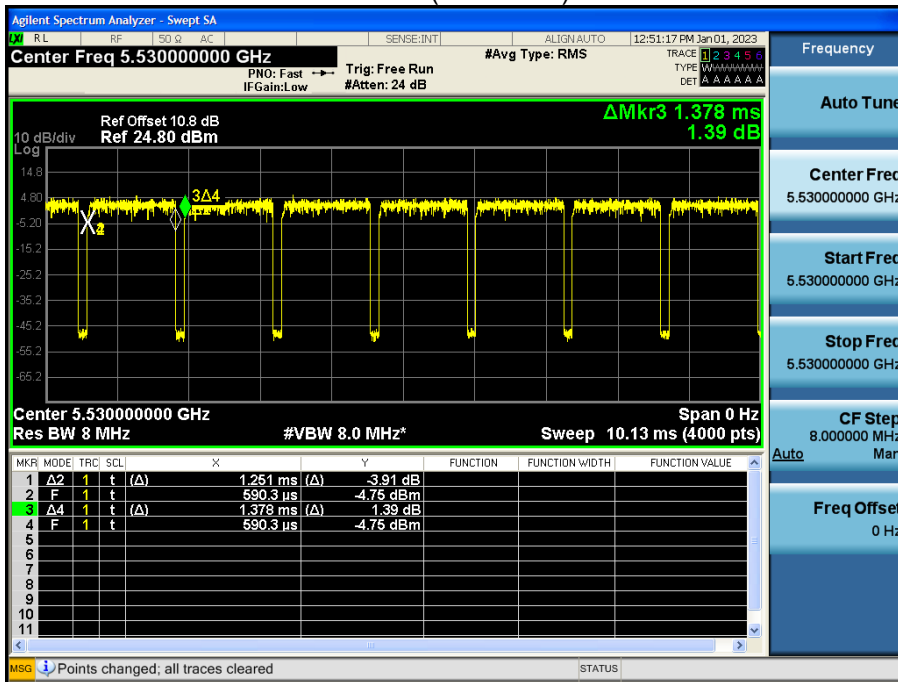
Bandwidth 80M Ch.106(5530 MHz) 26Tone MCS0



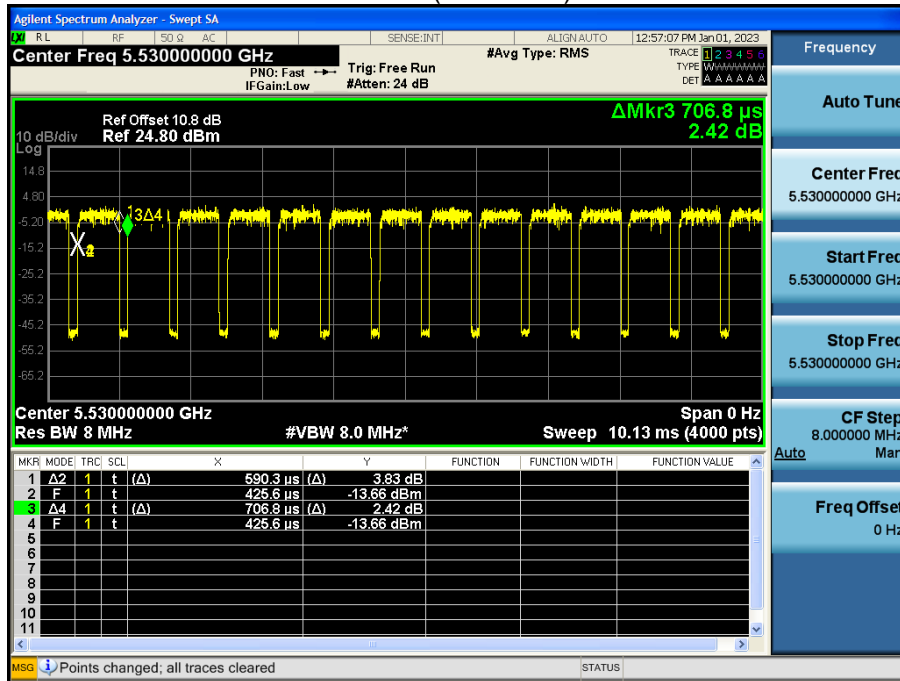
Bandwidth 80M Ch.106(5530 MHz) 52Tone MCS0



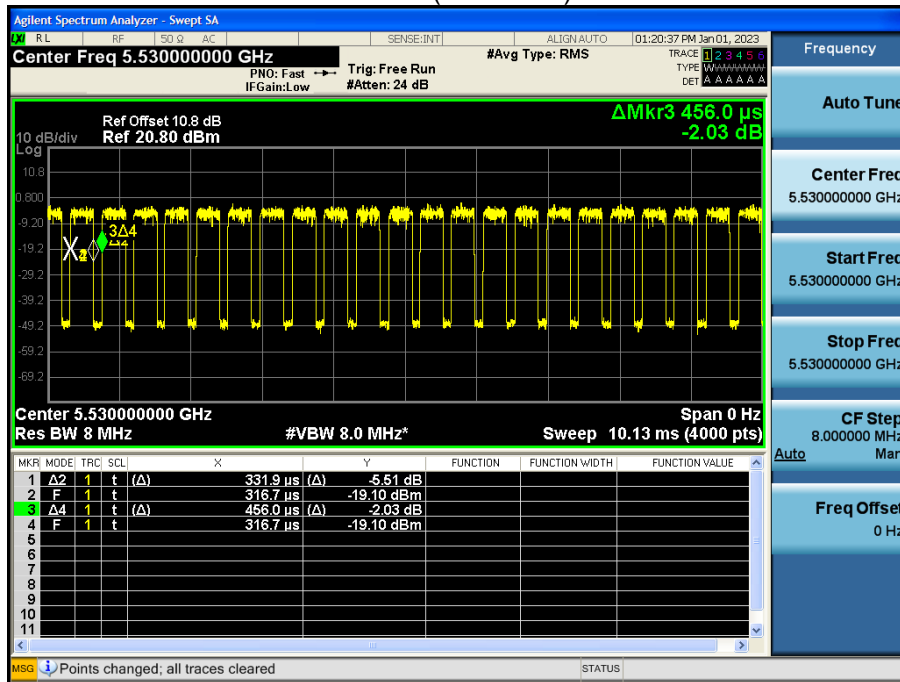
Bandwidth 80M Ch.106(5530 MHz) 106Tone MCS0



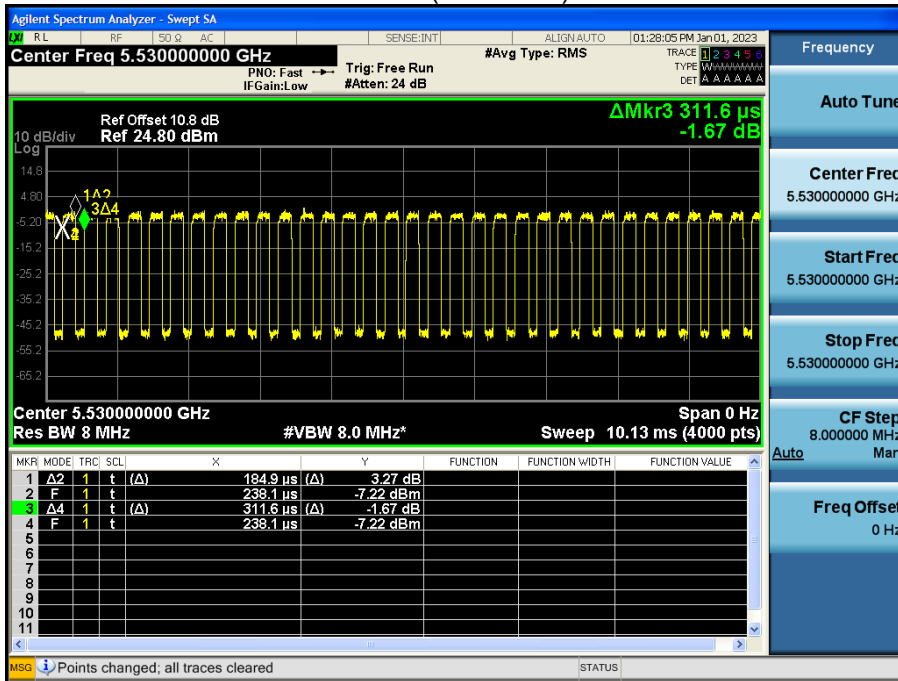
Bandwidth 80M Ch.106(5530 MHz) 242Tone MCS0



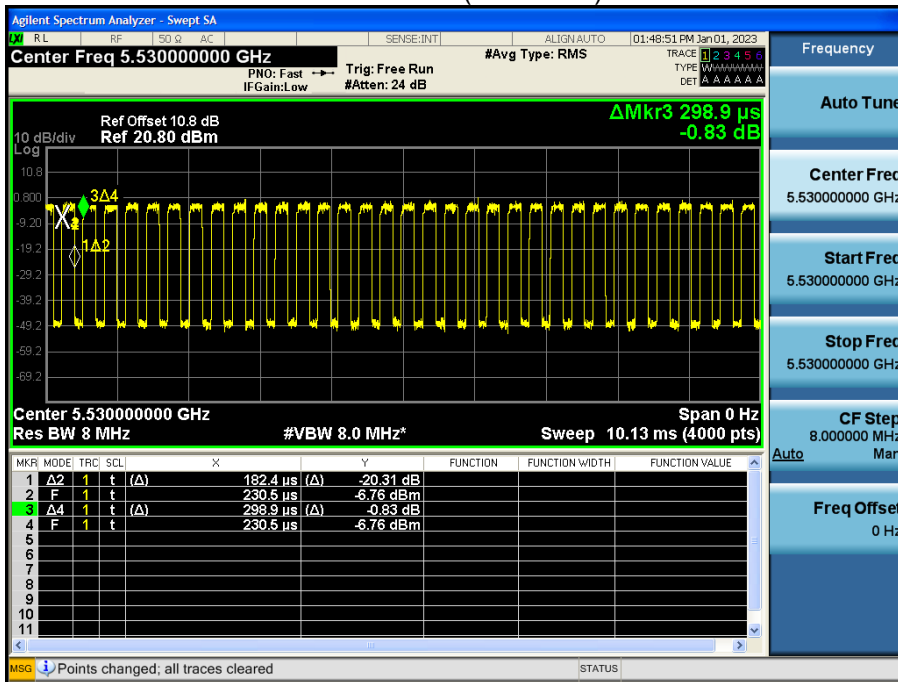
Bandwidth 80M Ch.106(5530 MHz) 484Tone MCS0



Bandwidth 80M Ch.106(5530 MHz) 996Tone MCS0



Bandwidth 80M Ch.106(5530 MHz) SU MCS0

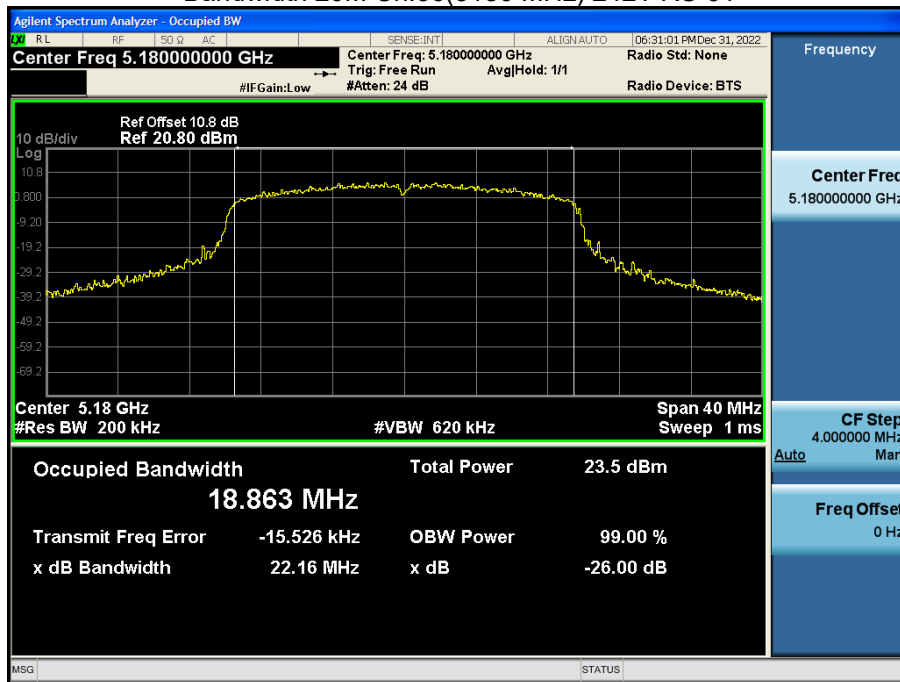


2. 26dB Bandwidth

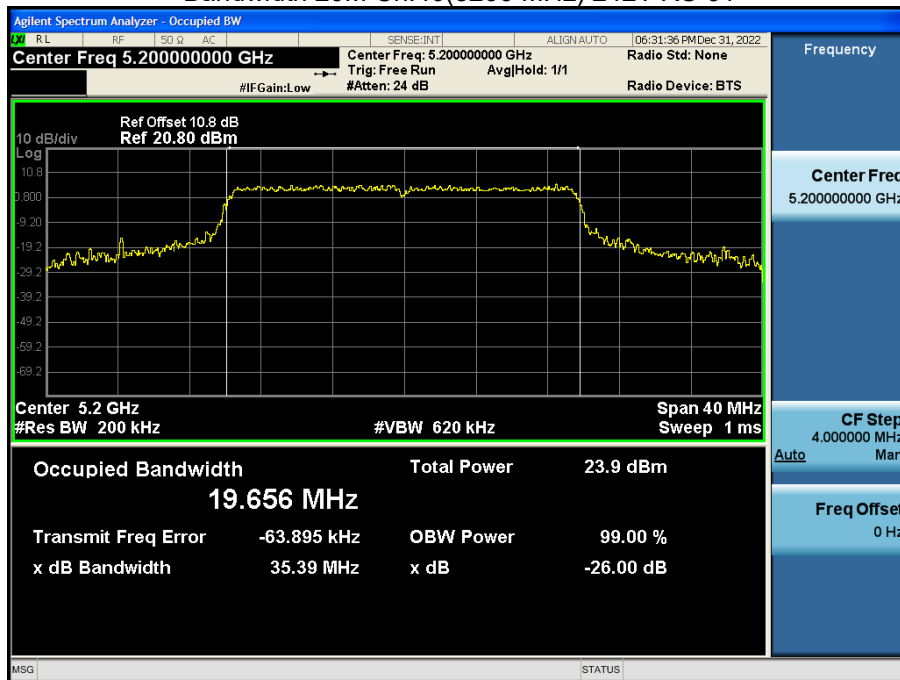
Note:

1. In order to simplify the report, attached plots were only SISO Ant.2(Worst Case: SISO Ant.2).
2. In order to simplify the report, attached plots were only the most wide channel.

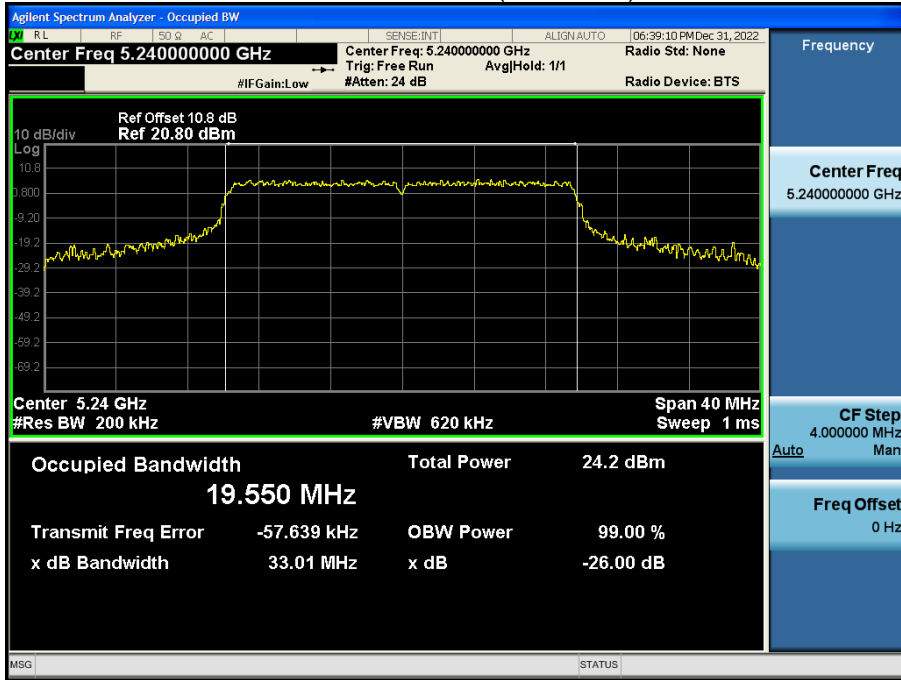
Bandwidth 20M Ch.36(5180 MHz) 242T RU 61



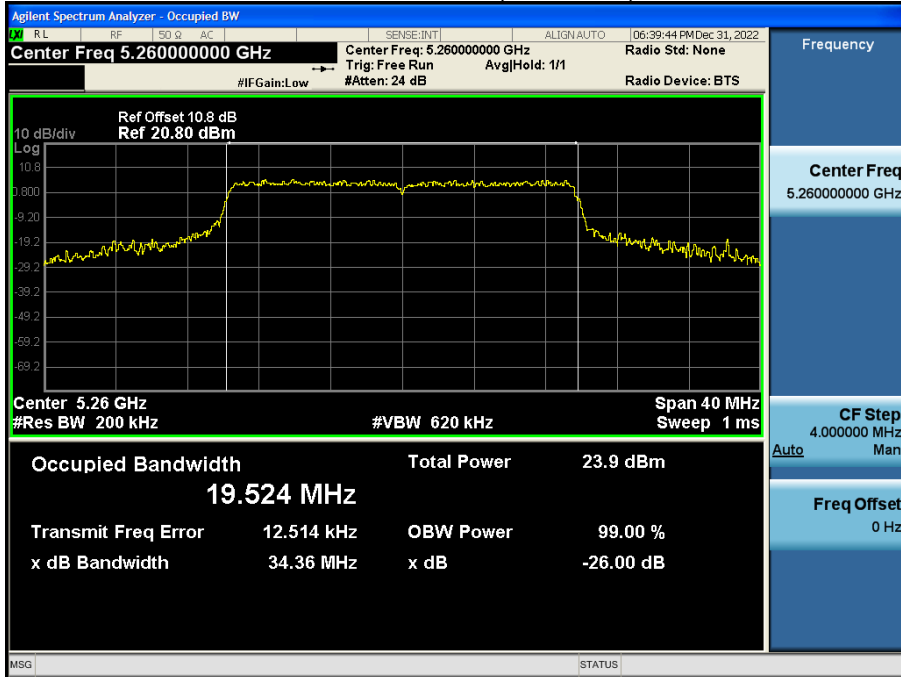
Bandwidth 20M Ch.40(5200 MHz) 242T RU 61



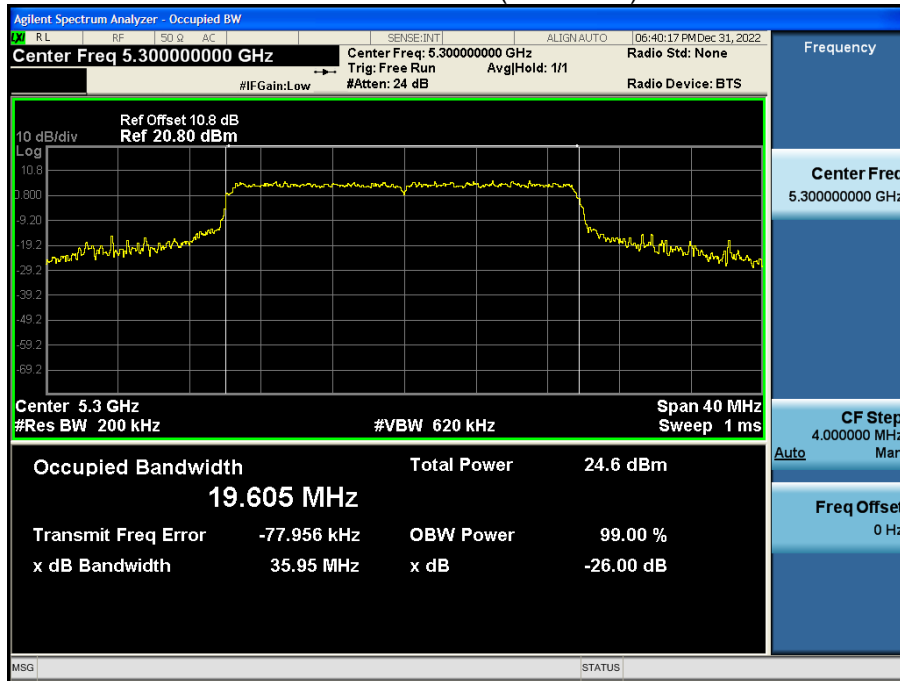
Bandwidth 20M Ch.48(5240 MHz) SU



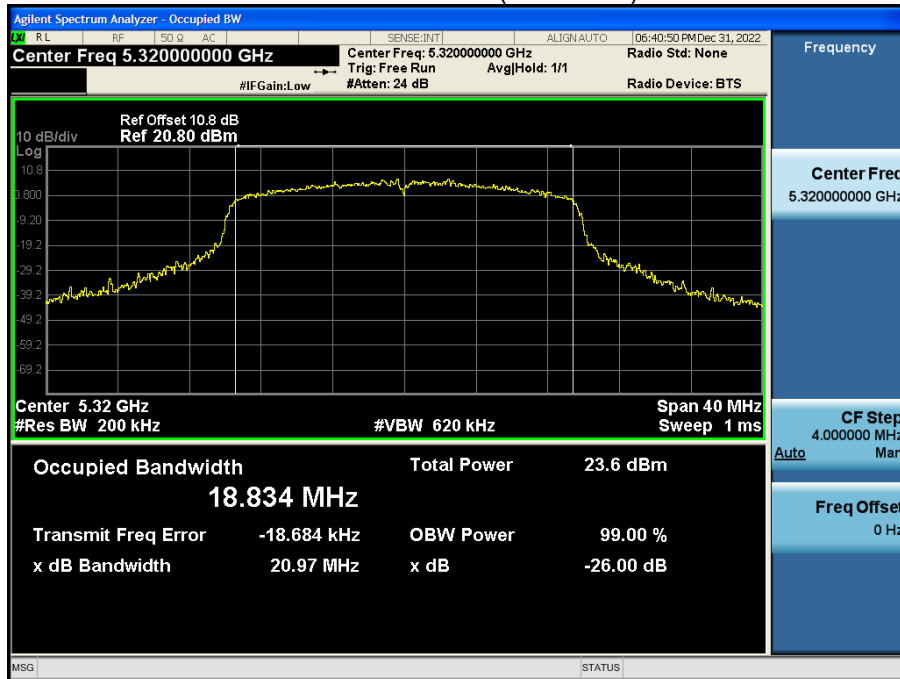
Bandwidth 20M Ch.52(5260 MHz) SU



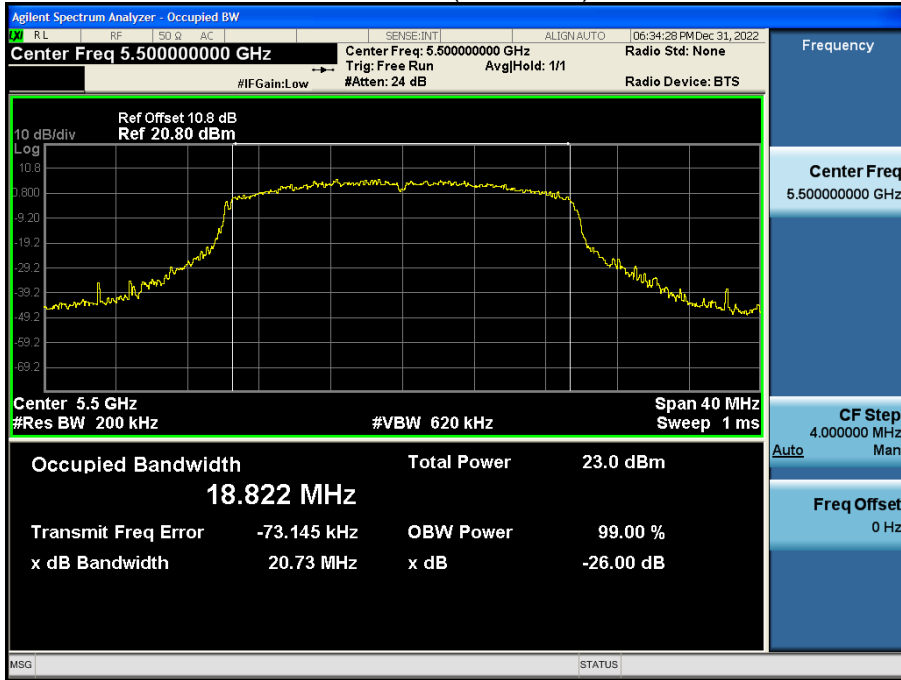
Bandwidth 20M Ch.60(5300 MHz) SU



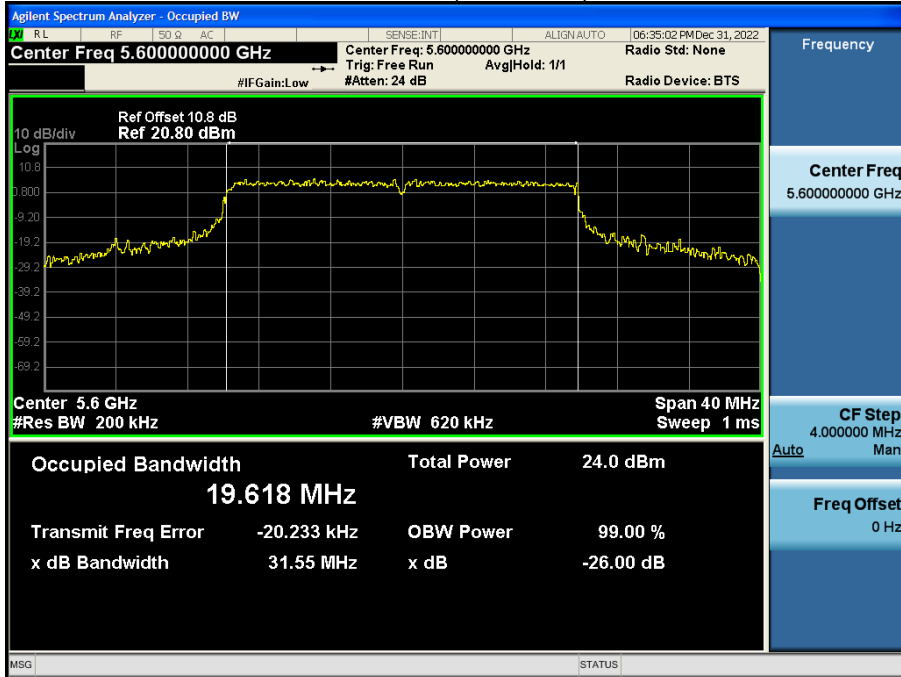
Bandwidth 20M Ch.64(5320 MHz) SU



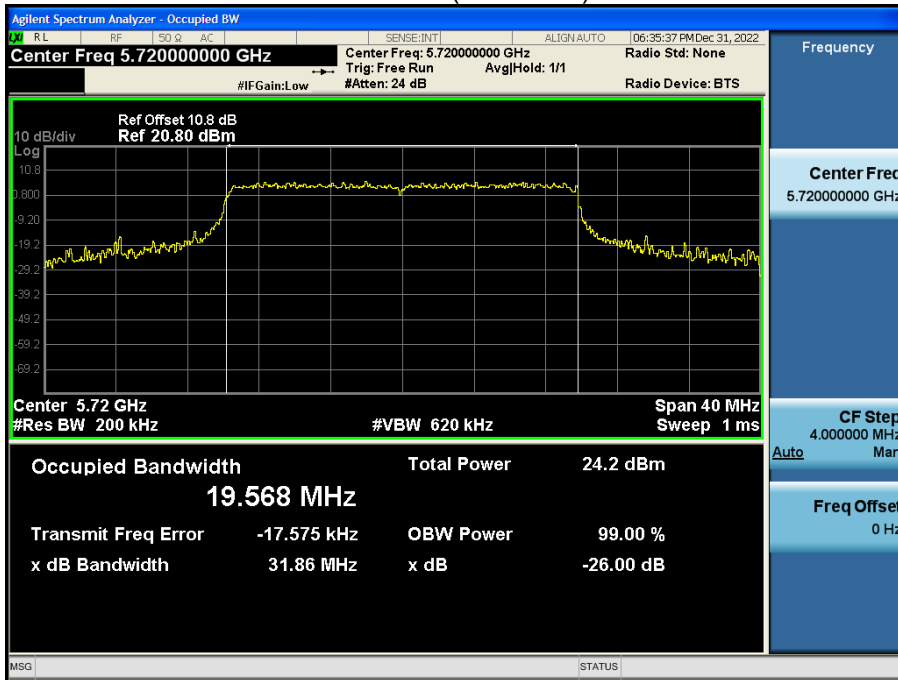
Bandwidth 20M Ch.100(5500 MHz) 242T RU 61



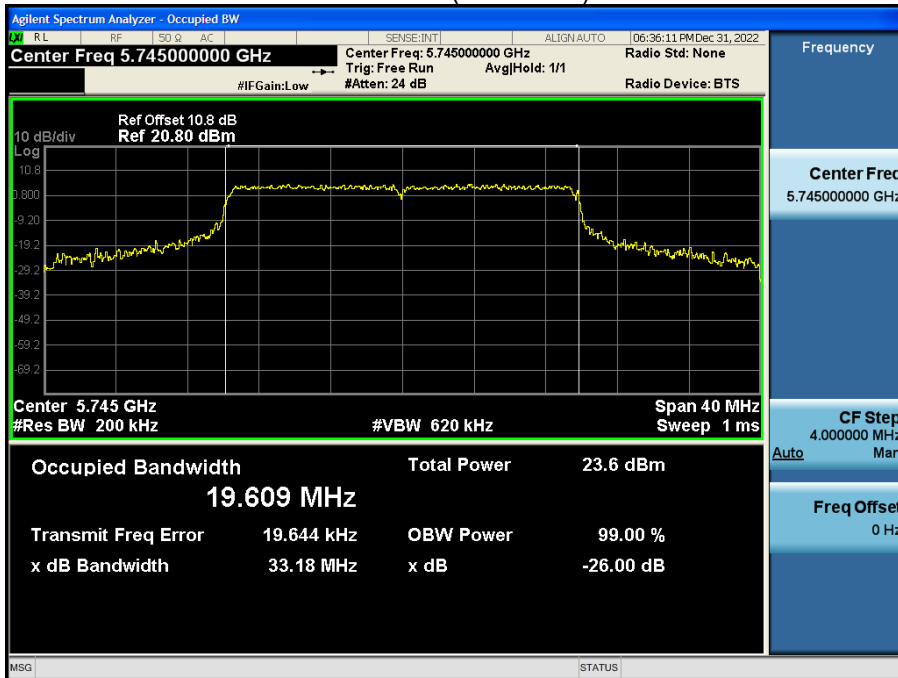
Bandwidth 20M Ch.120(5600 MHz) 242T RU 61



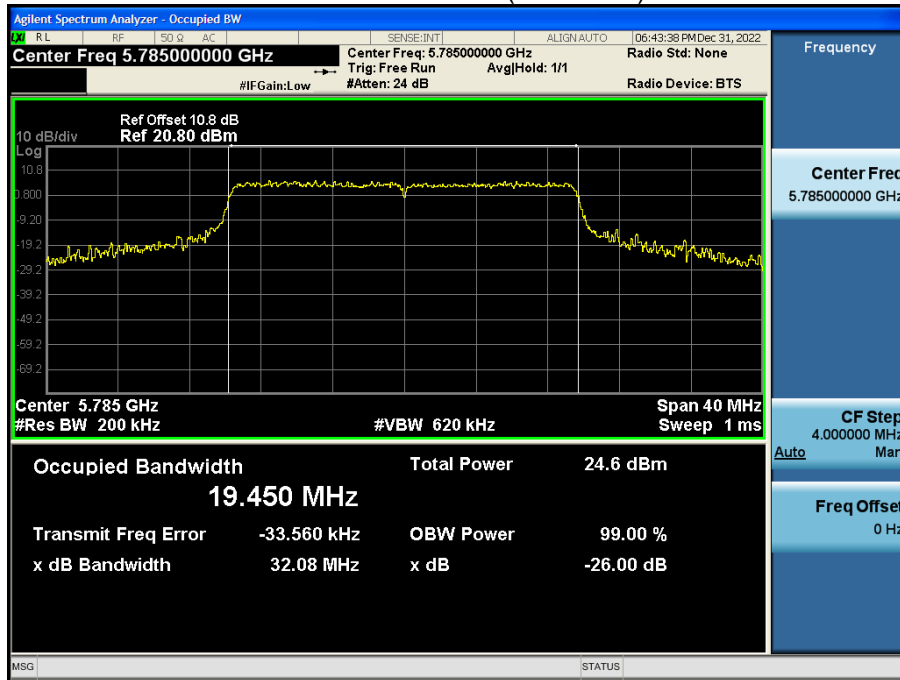
Bandwidth 20M Ch.144(5720 MHz) 242T RU 61



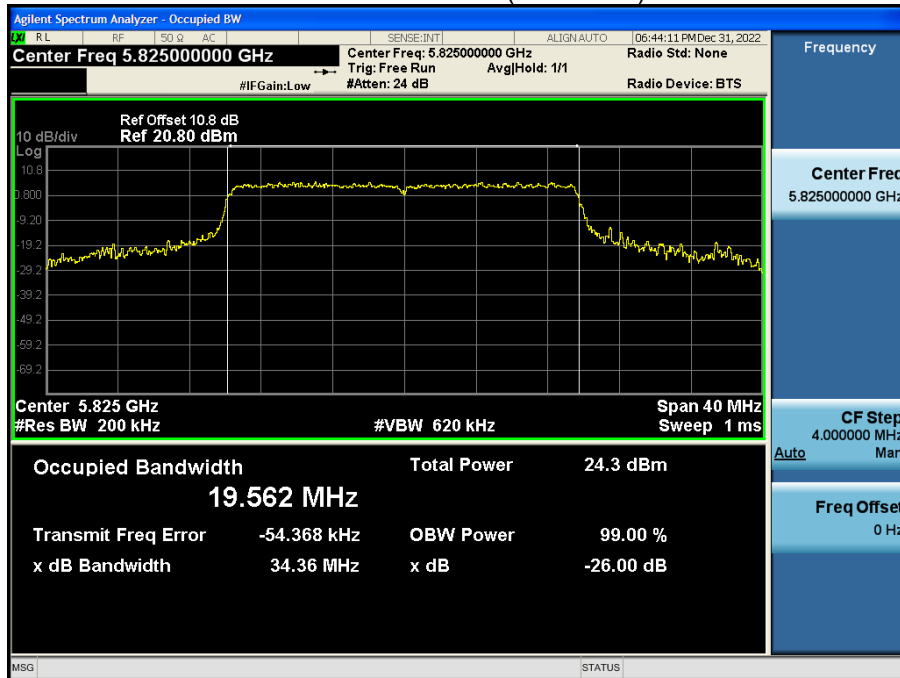
Bandwidth 20M Ch.149(5745 MHz) 242T RU 61



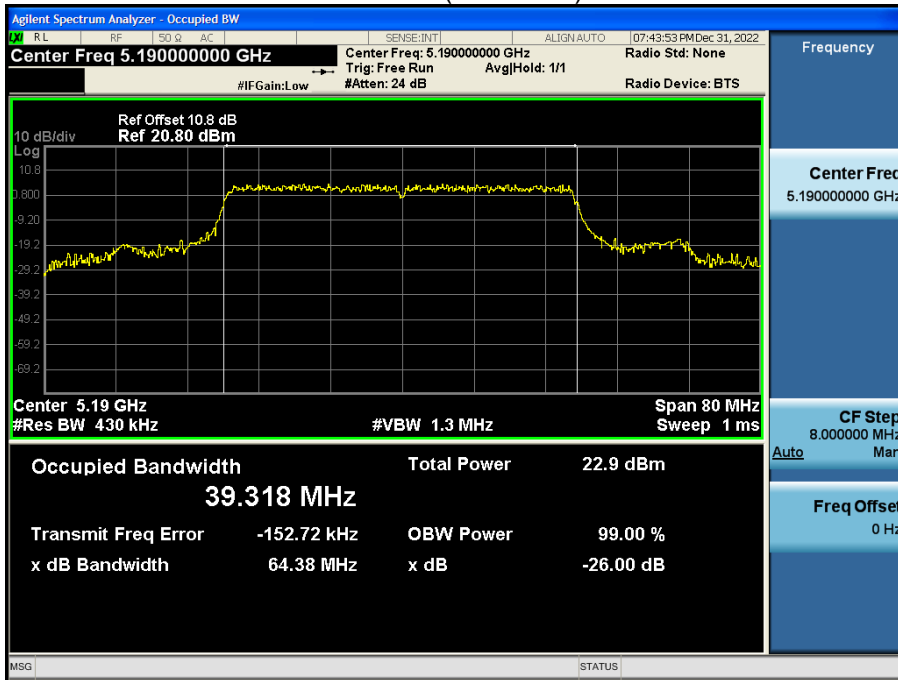
Bandwidth 20M Ch.157(5785 MHz) SU



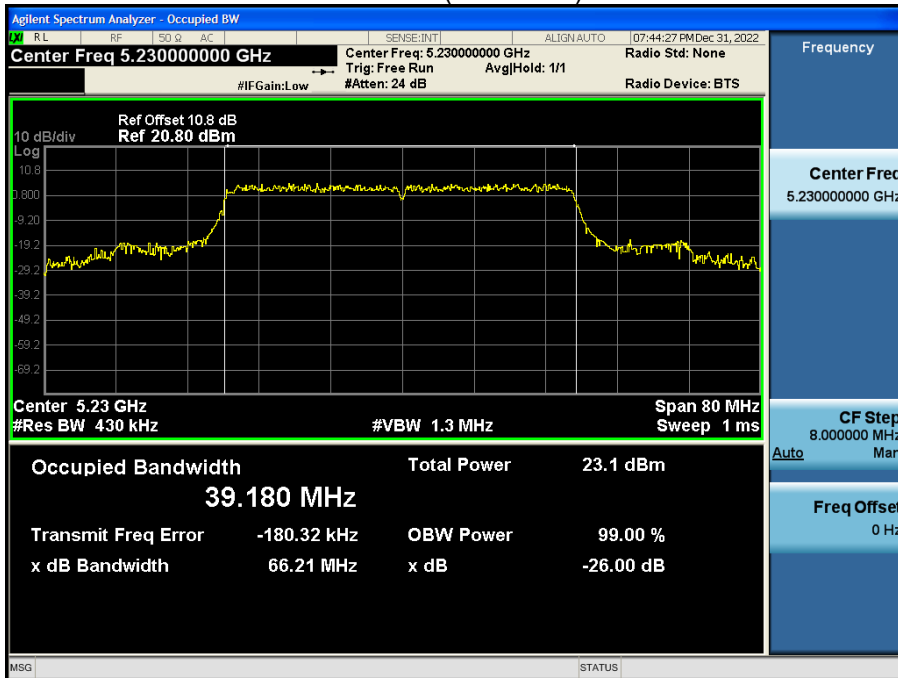
Bandwidth 20M Ch.165(5825 MHz) SU



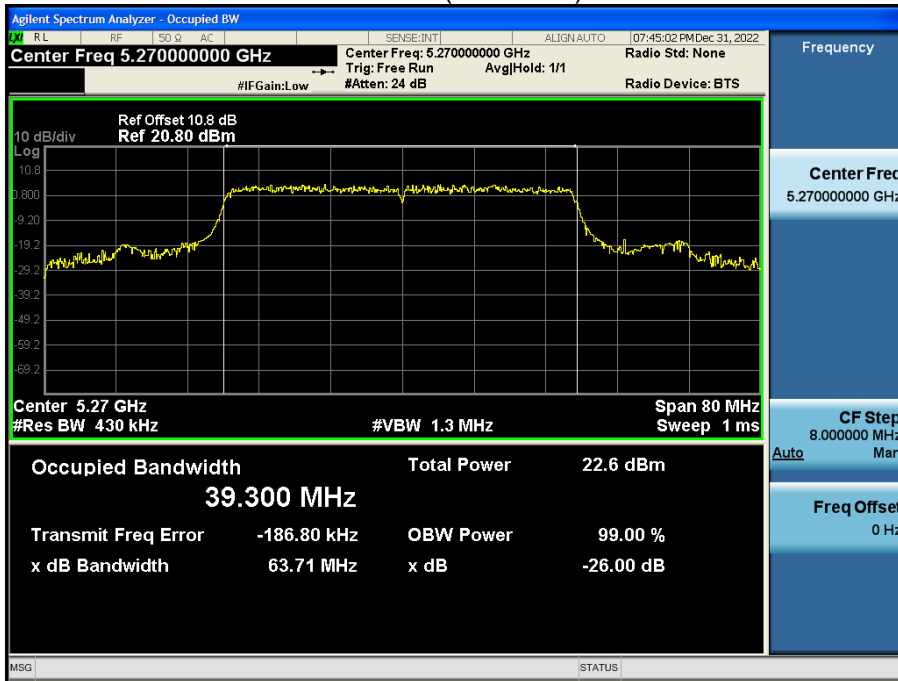
Bandwidth 40M Ch.38(5190 MHz) 484T RU 65



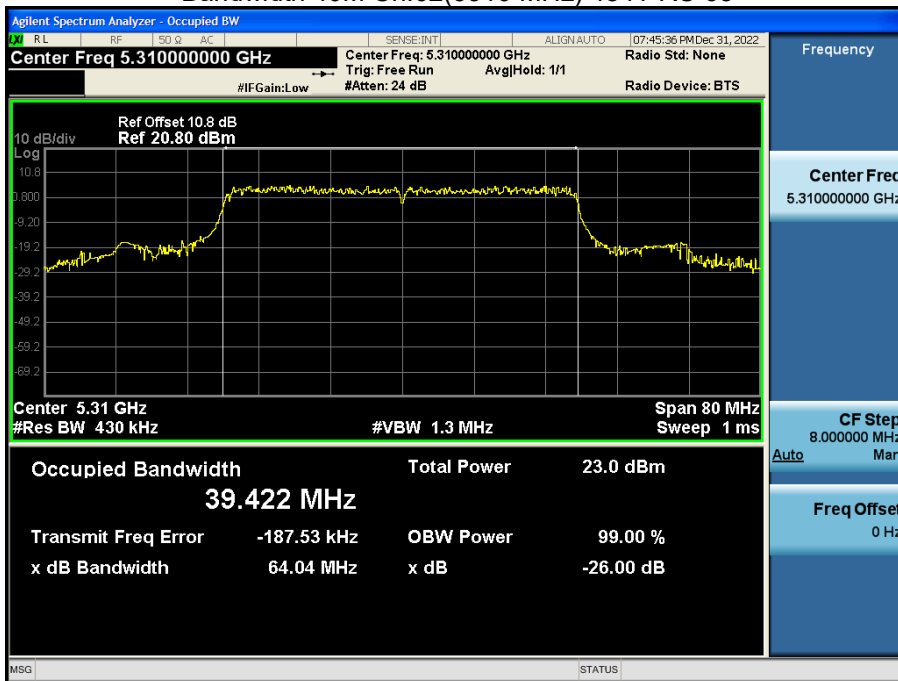
Bandwidth 40M Ch.46(5230 MHz) 484T RU 65



Bandwidth 40M Ch.54(5270 MHz) 484T RU 65



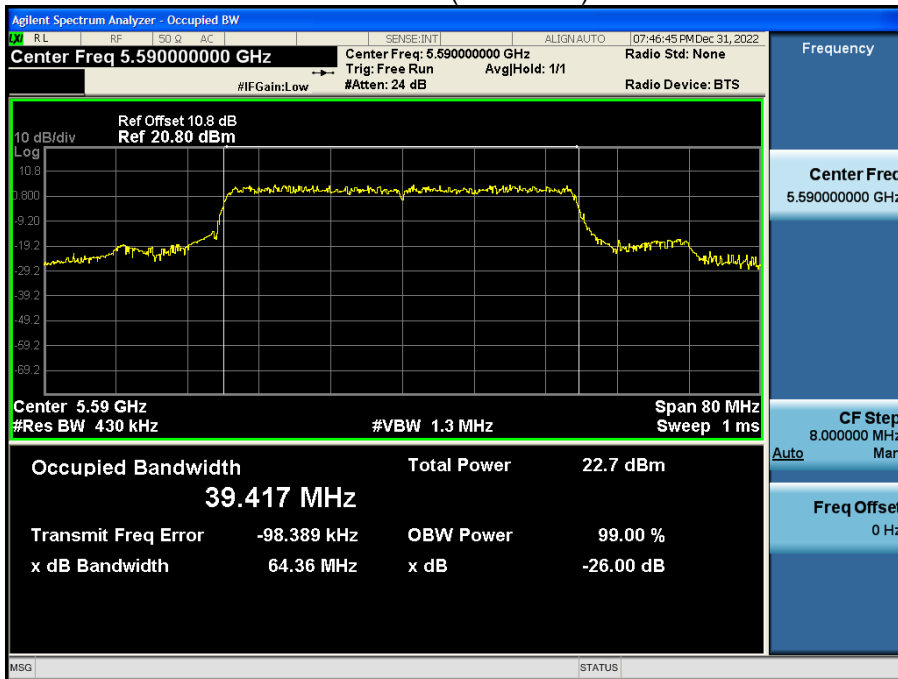
Bandwidth 40M Ch.62(5310 MHz) 484T RU 65



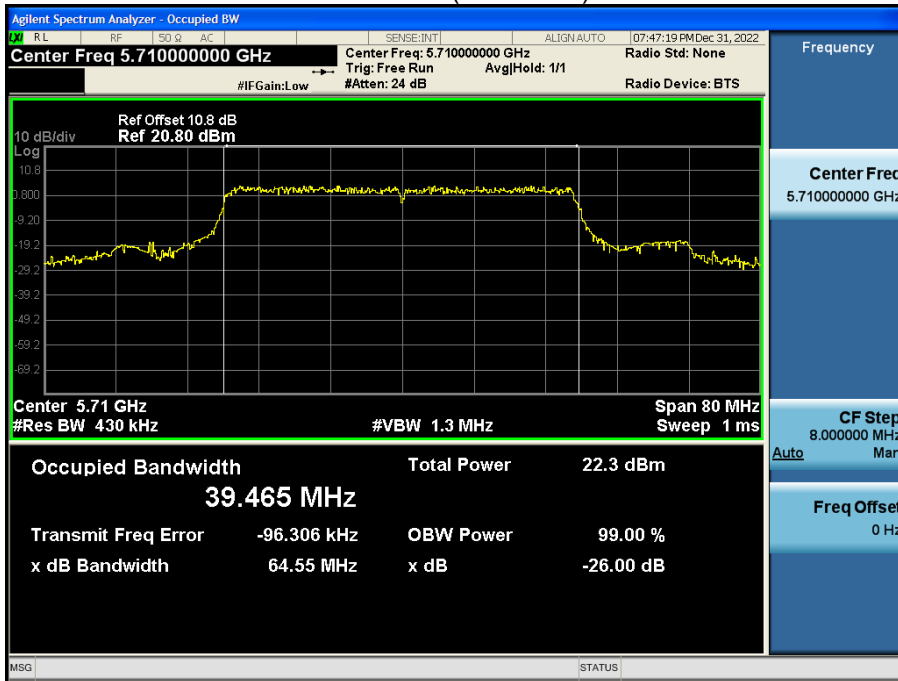
Bandwidth 40M Ch.102(5510 MHz) 484T RU 65



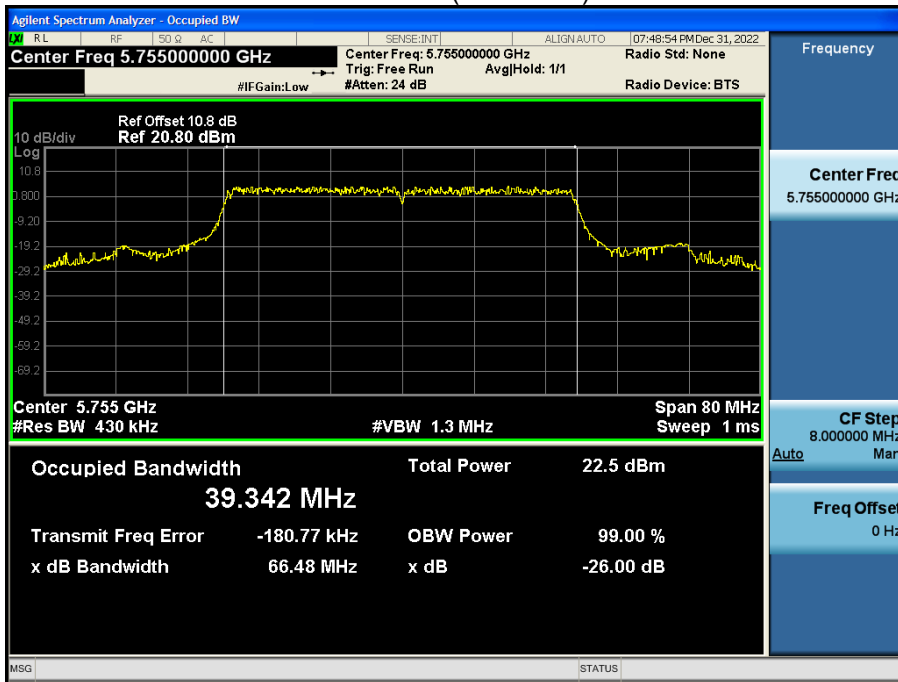
Bandwidth 40M Ch.118(5590 MHz) 484T RU 65



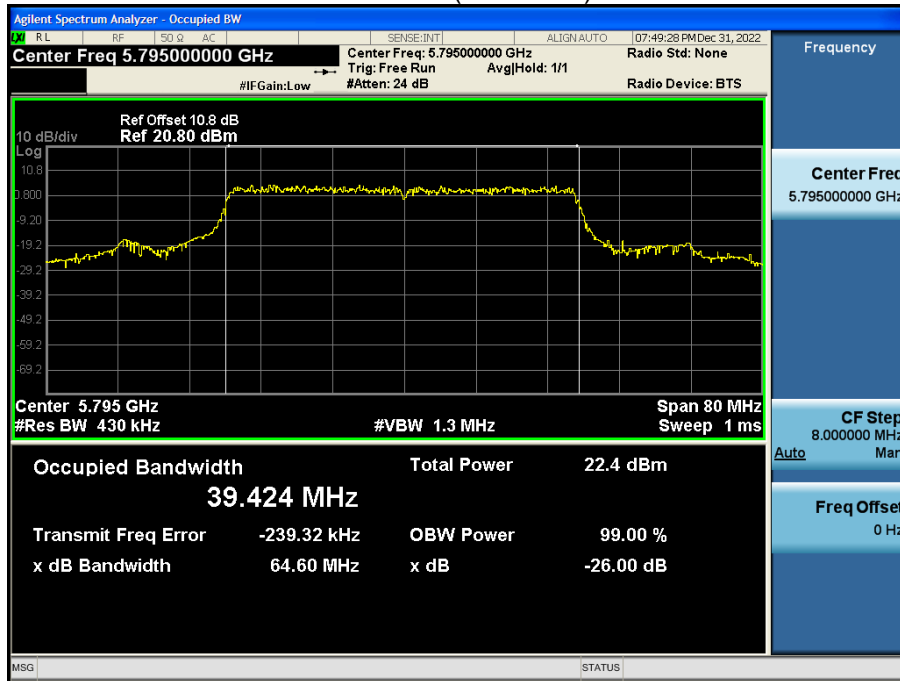
Bandwidth 40M Ch.142(5710 MHz) 484T RU 65



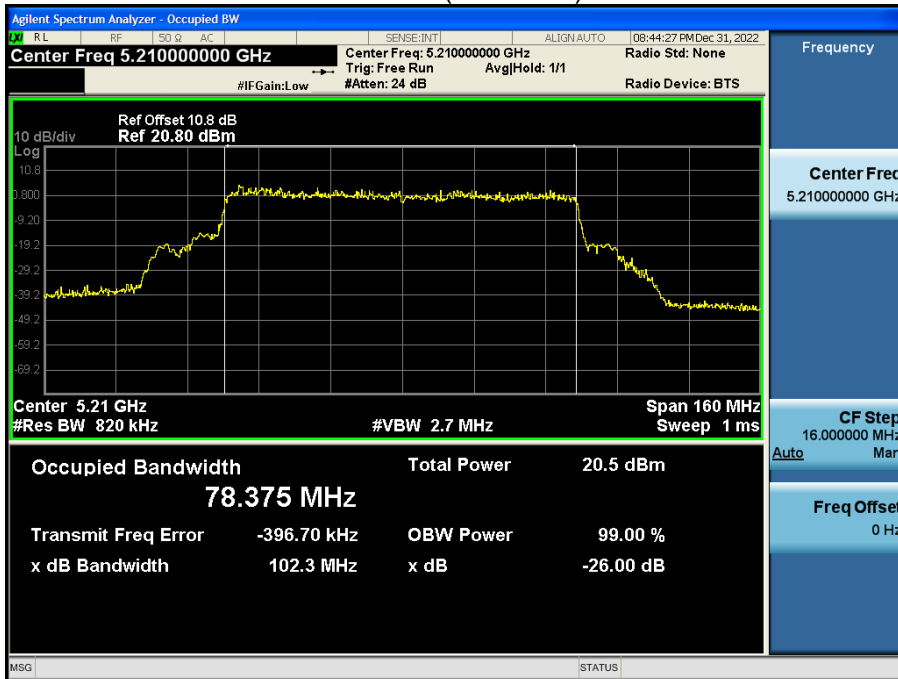
Bandwidth 40M Ch.151(5755 MHz) 484T RU 65



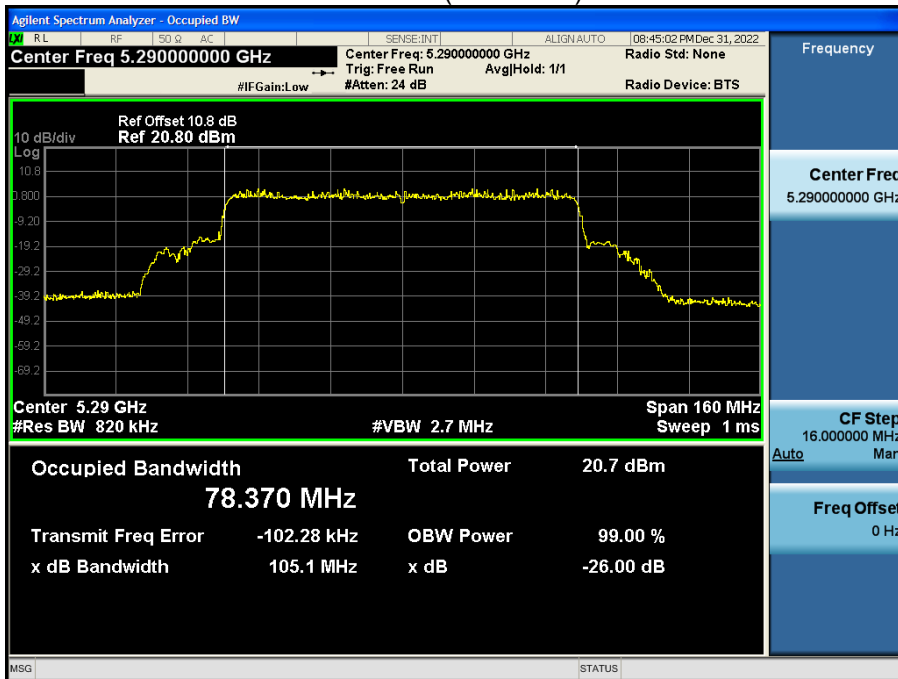
Bandwidth 40M Ch.159(5795 MHz) 484T RU 65



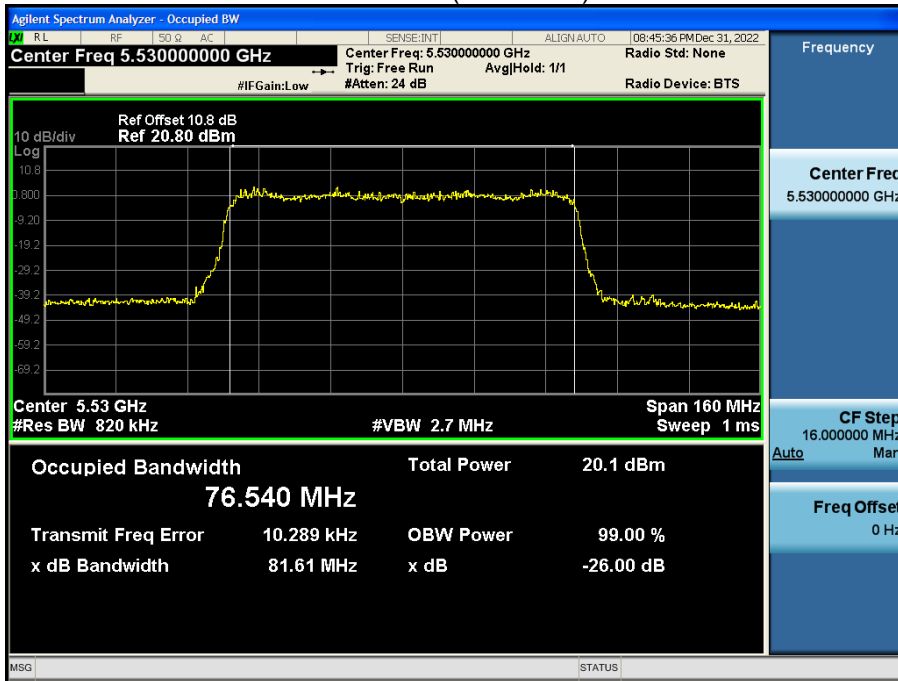
Bandwidth 80M Ch.42(5210 MHz) 996T RU 67



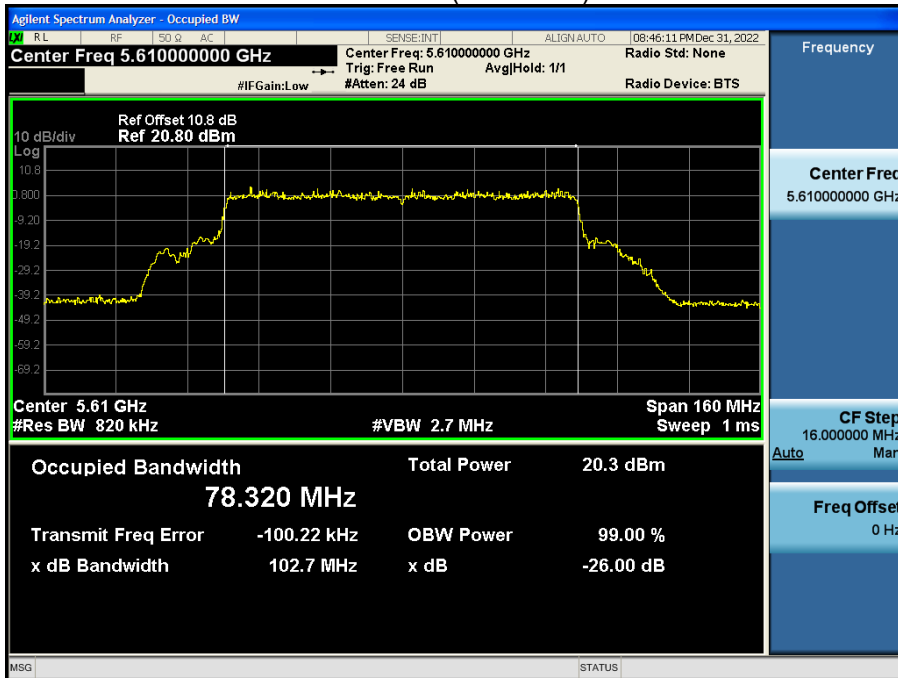
Bandwidth 80M Ch.58(5290 MHz) 996T RU 67



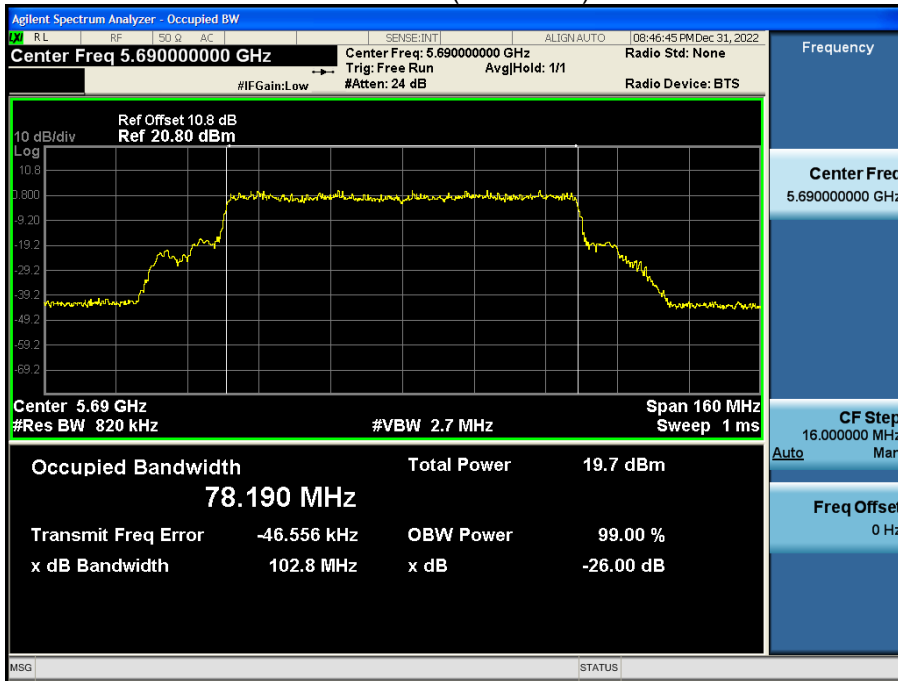
Bandwidth 80M Ch.106(5530 MHz) 996T RU 67



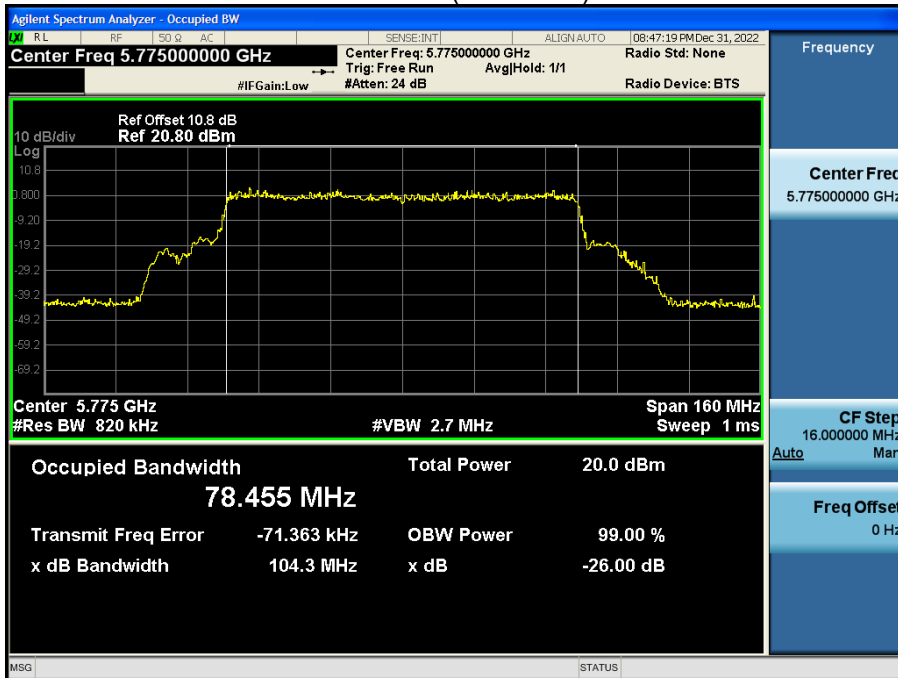
Bandwidth 80M Ch.122(5610 MHz) 996T RU 67



Bandwidth 80M Ch.138(5690 MHz) 996T RU 67



Bandwidth 80M Ch.155(5775 MHz) 996T RU 67



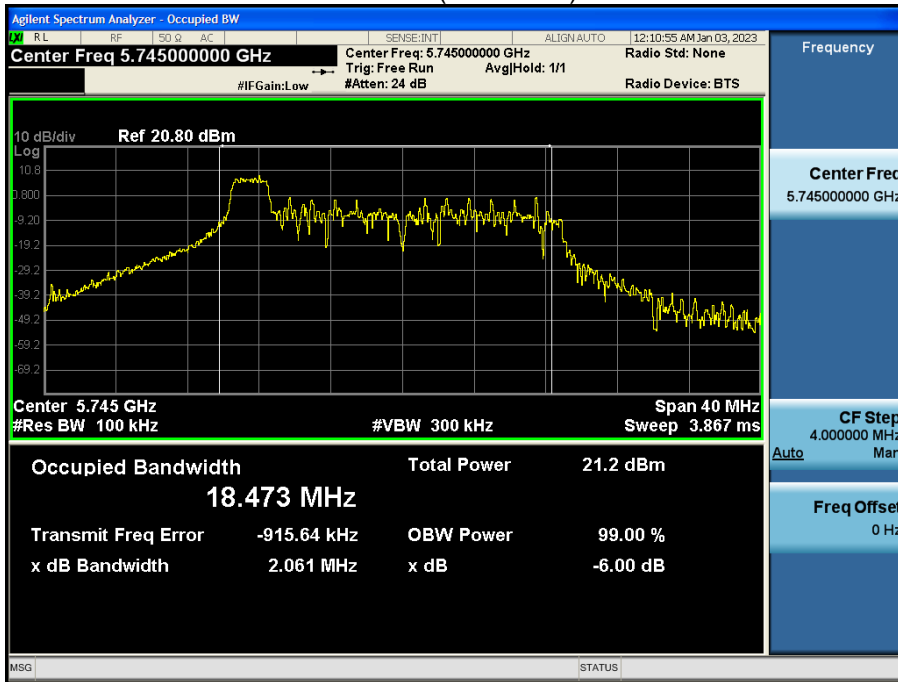
3. 6dB Bandwidth

Note:

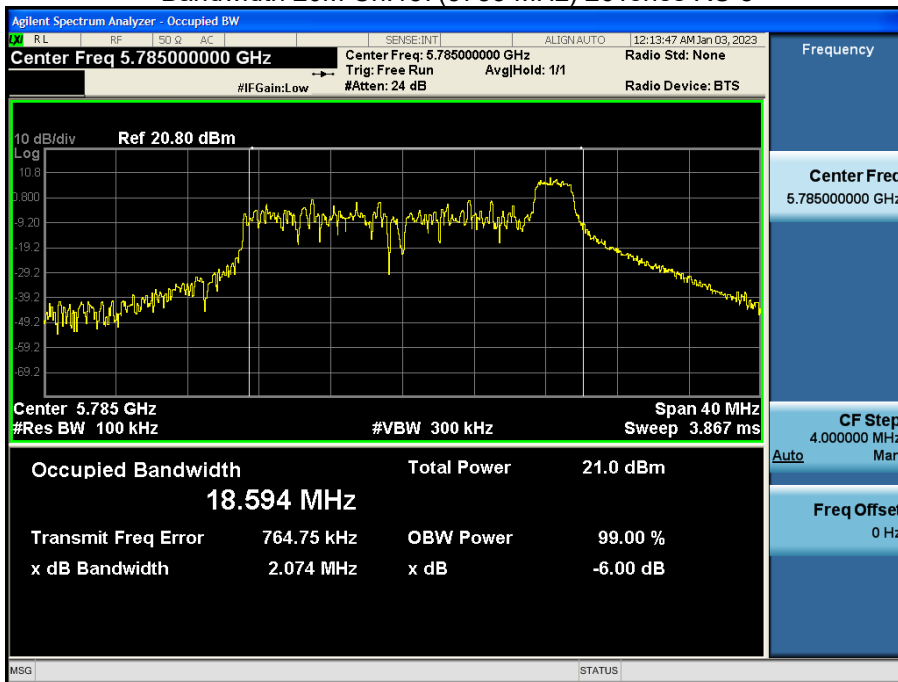
1. In order to simplify the report, attached plots were only the most narrow channel.

3.1 SISO Ant.2

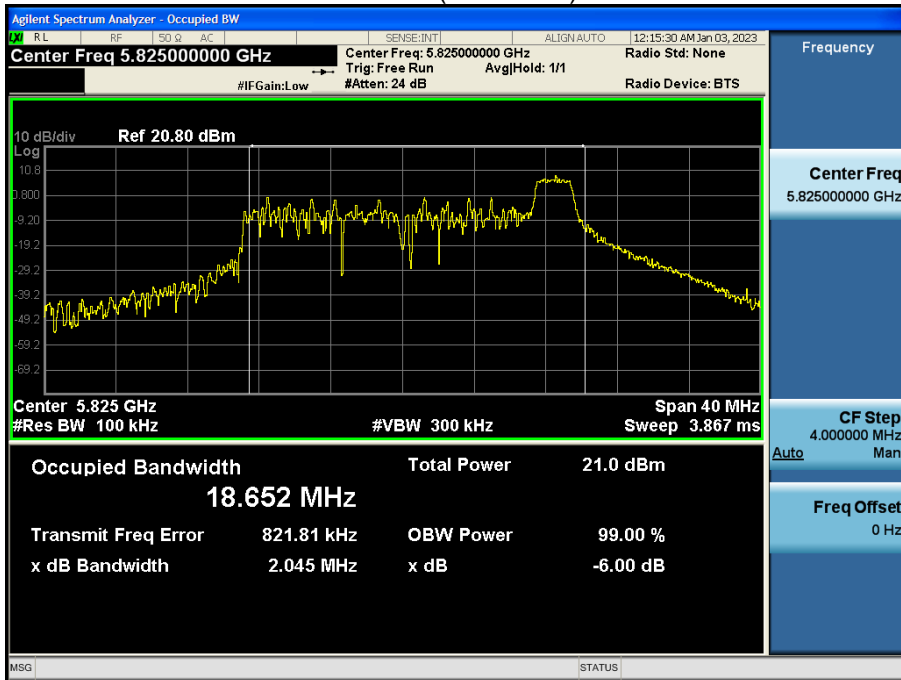
Bandwidth 20M Ch.149(5745 MHz) 26Tones RU 0



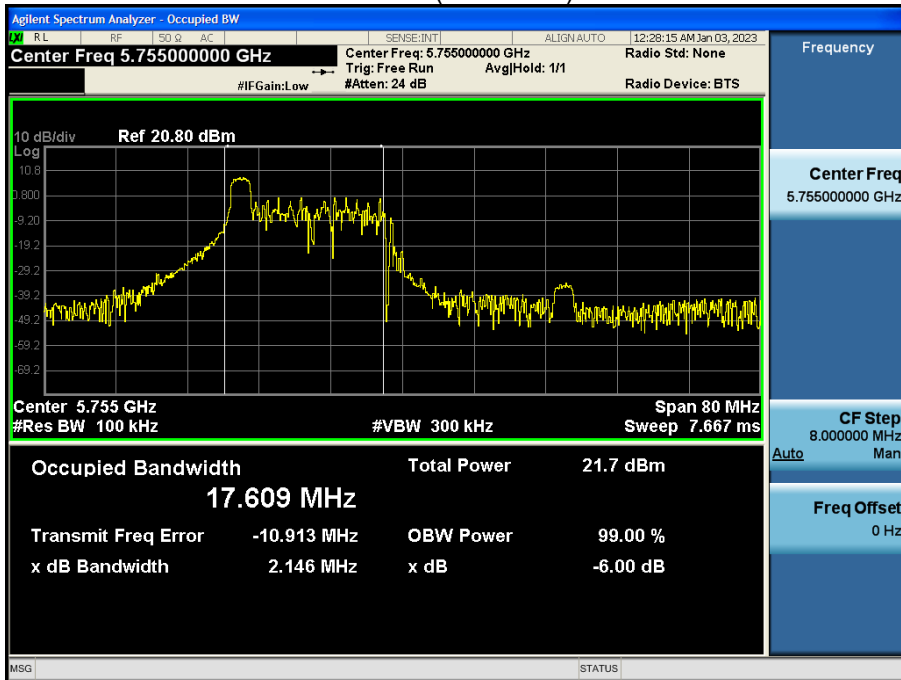
Bandwidth 20M Ch.157(5785 MHz) 26Tones RU 8



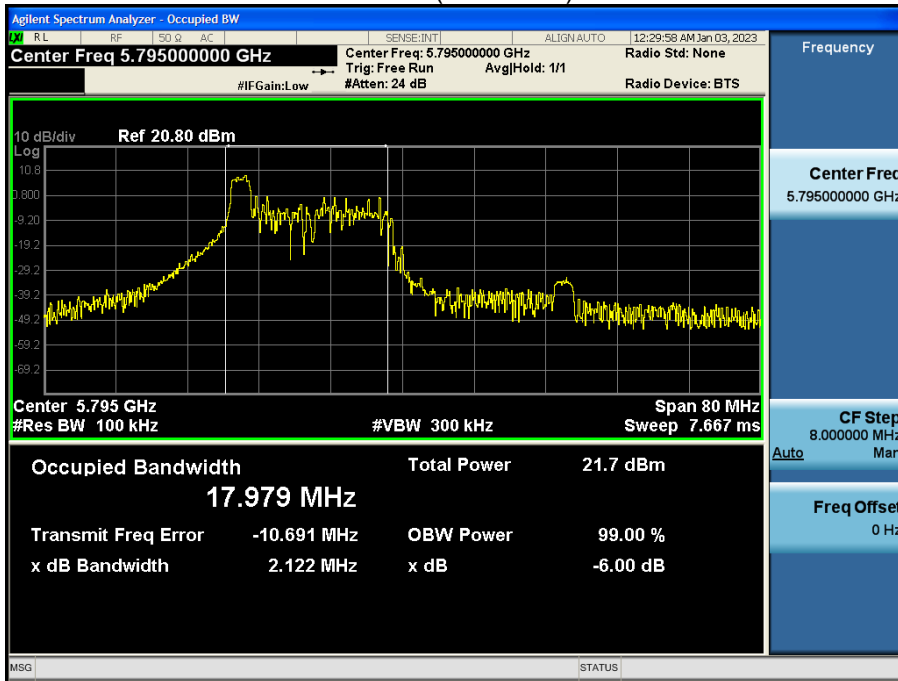
Bandwidth 20M Ch.165(5825 MHz) 26Tones RU 8



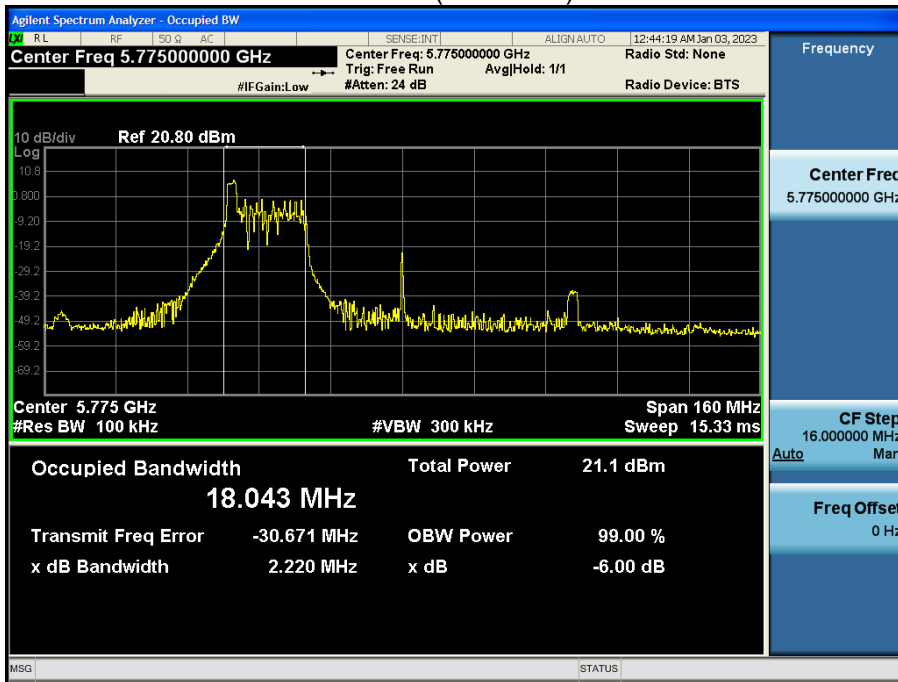
Bandwidth 40M Ch.151(5755 MHz) 26 Tones RU 0



Bandwidth 40M Ch.159(5795 MHz) 26 Tones RU 0

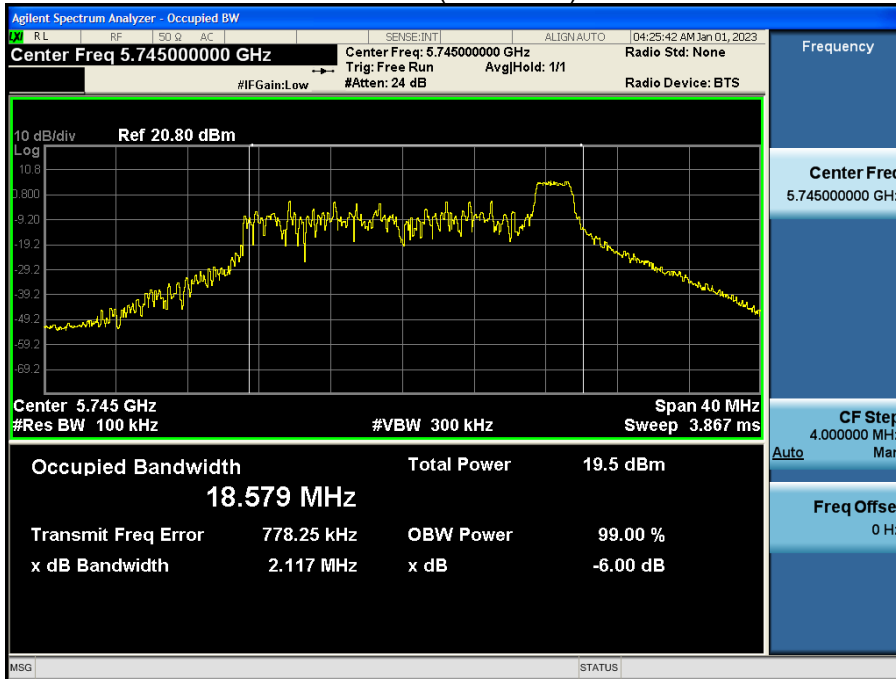


Bandwidth 80M Ch.155(5775 MHz) 26 Tones RU 0



3.2 MIMO Ant.1

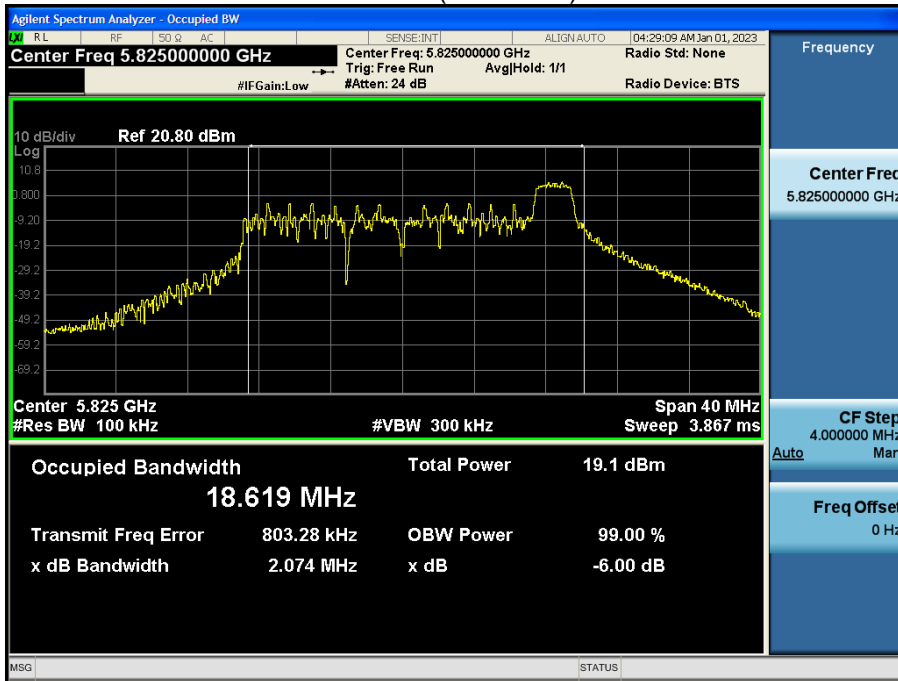
Bandwidth 20M Ch.149(5745 MHz) 26Tones RU 8



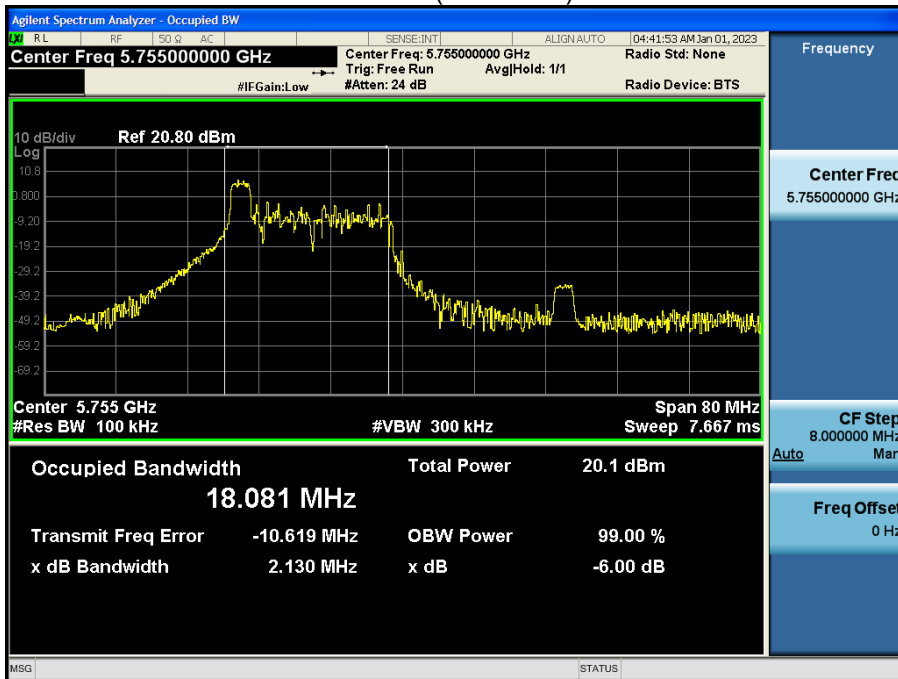
Bandwidth 20M Ch.157(5785 MHz) 26Tones RU 0



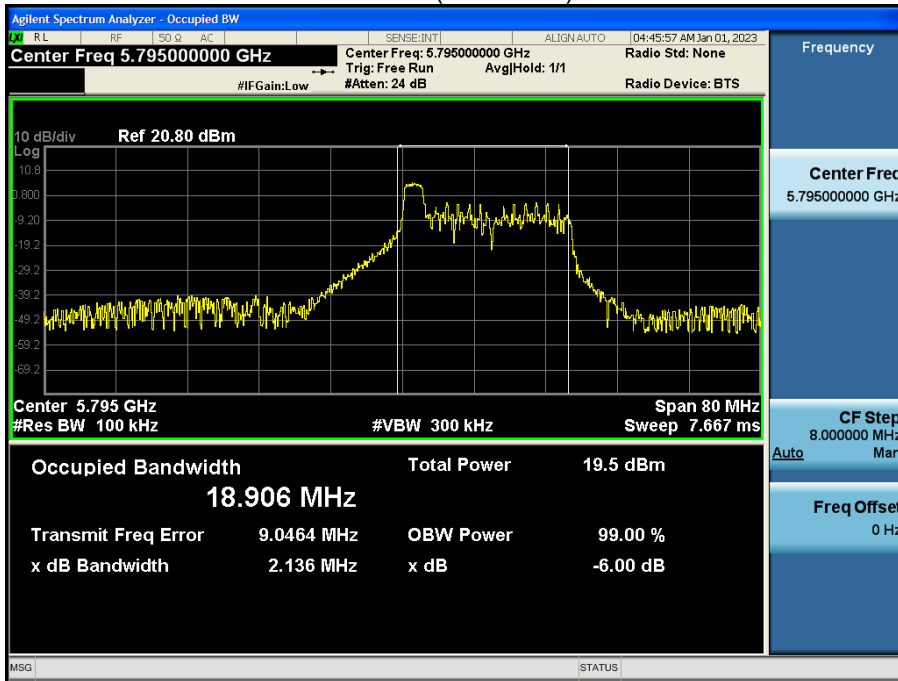
Bandwidth 20M Ch.165(5825 MHz) 26Tones RU 8



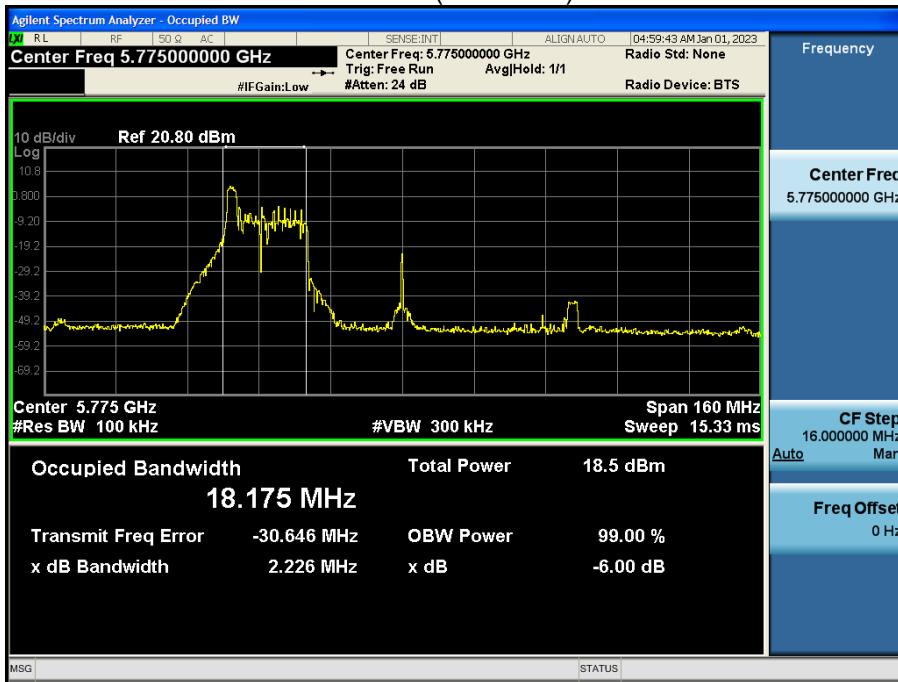
Bandwidth 40M Ch.151(5755 MHz) 26 Tones RU 0



Bandwidth 40M Ch.159(5795 MHz) 26 Tones RU 9

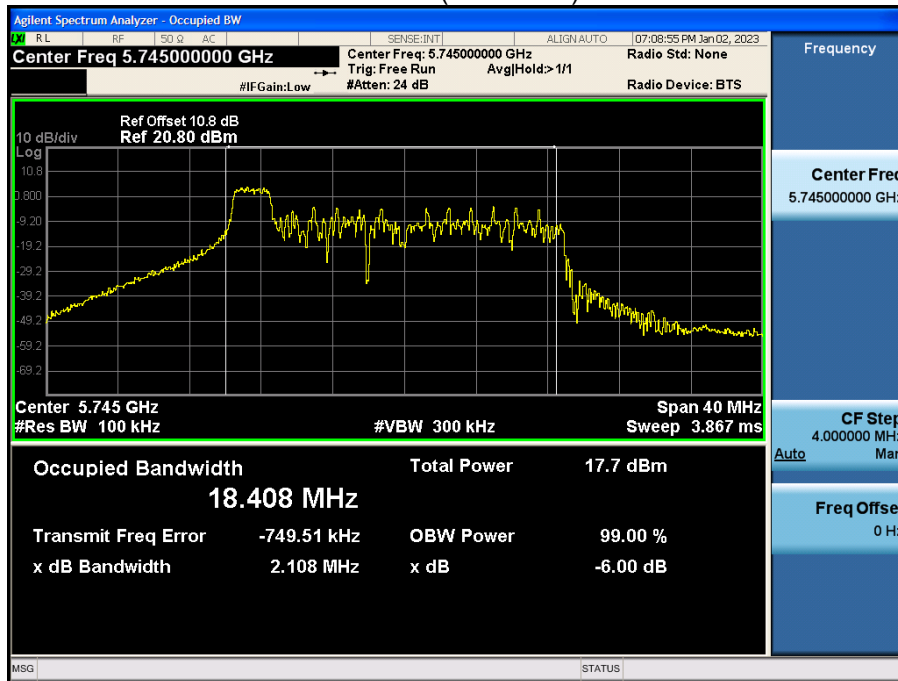


Bandwidth 80M Ch.155(5775 MHz) 26 Tones RU 0

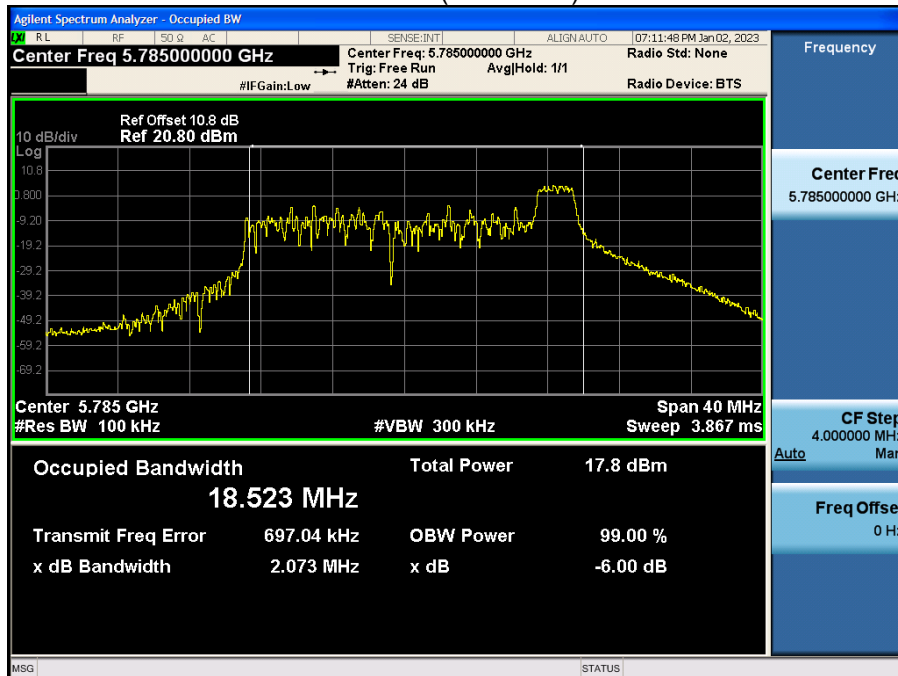


3.3 MIMO Ant.2

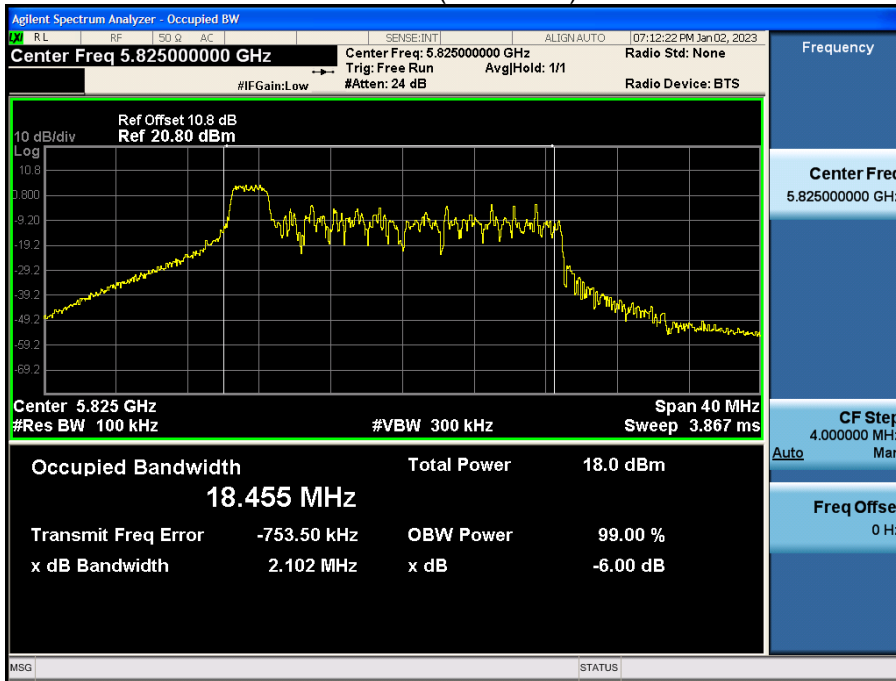
Bandwidth 20M Ch.149(5745 MHz) 26Tones RU 0



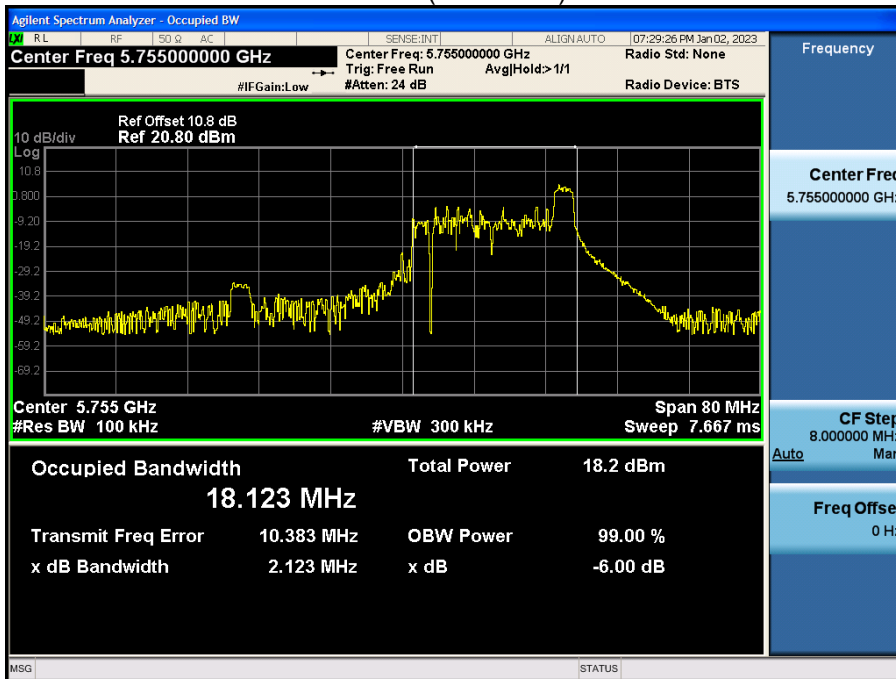
Bandwidth 20M Ch.157(5785 MHz) 26Tones RU 8



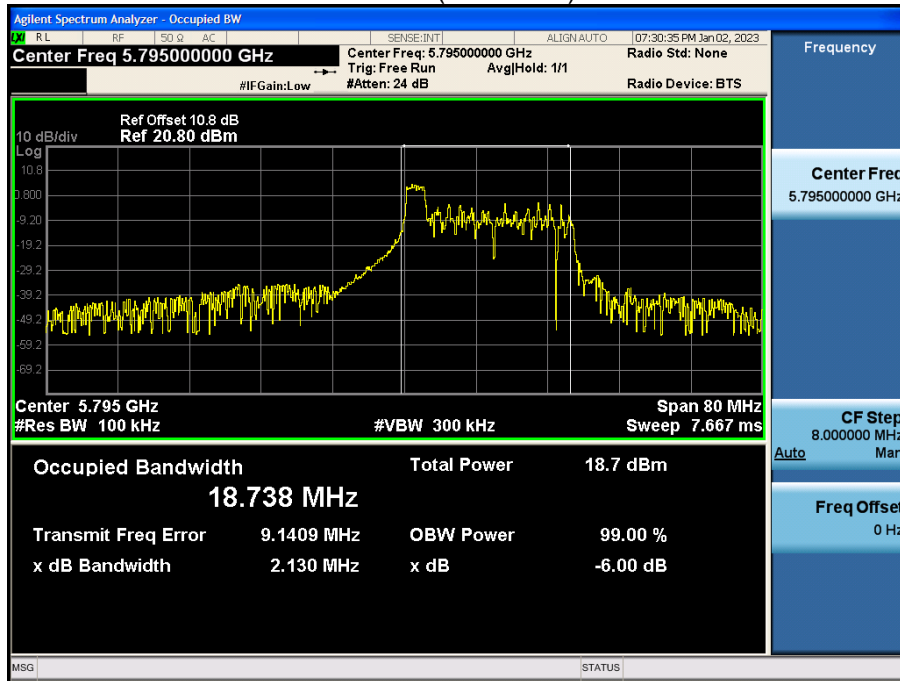
Bandwidth 20M Ch.165(5825 MHz) 26Tones RU 0



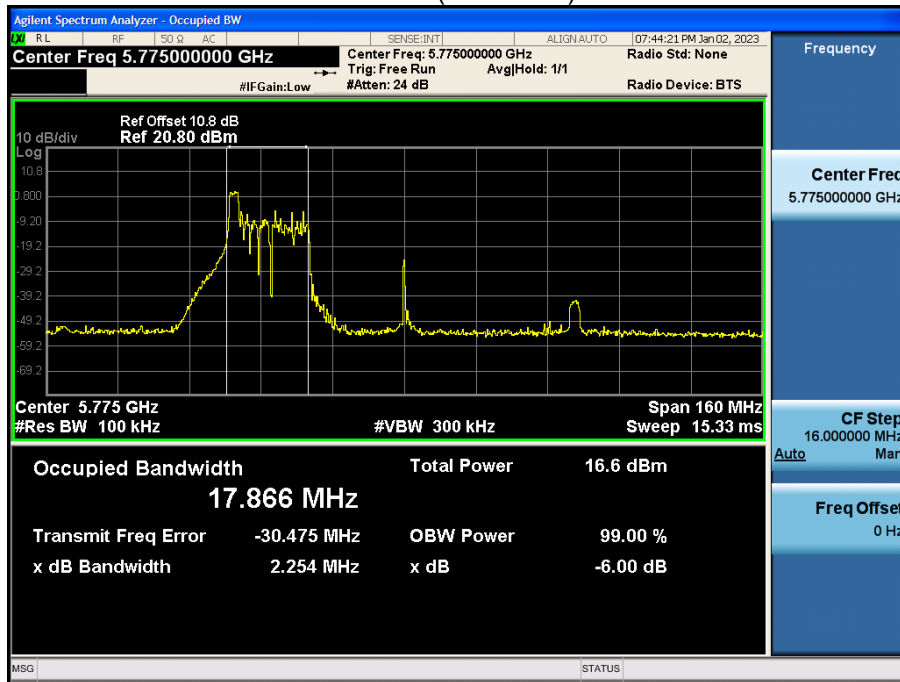
Bandwidth 40M Ch.151(5755 MHz) 26 Tones RU 17



Bandwidth 40M Ch.159(5795 MHz) 26 Tones RU 9



Bandwidth 80M Ch.155(5775 MHz) 26 Tones RU 0



4. Power Spectral Density

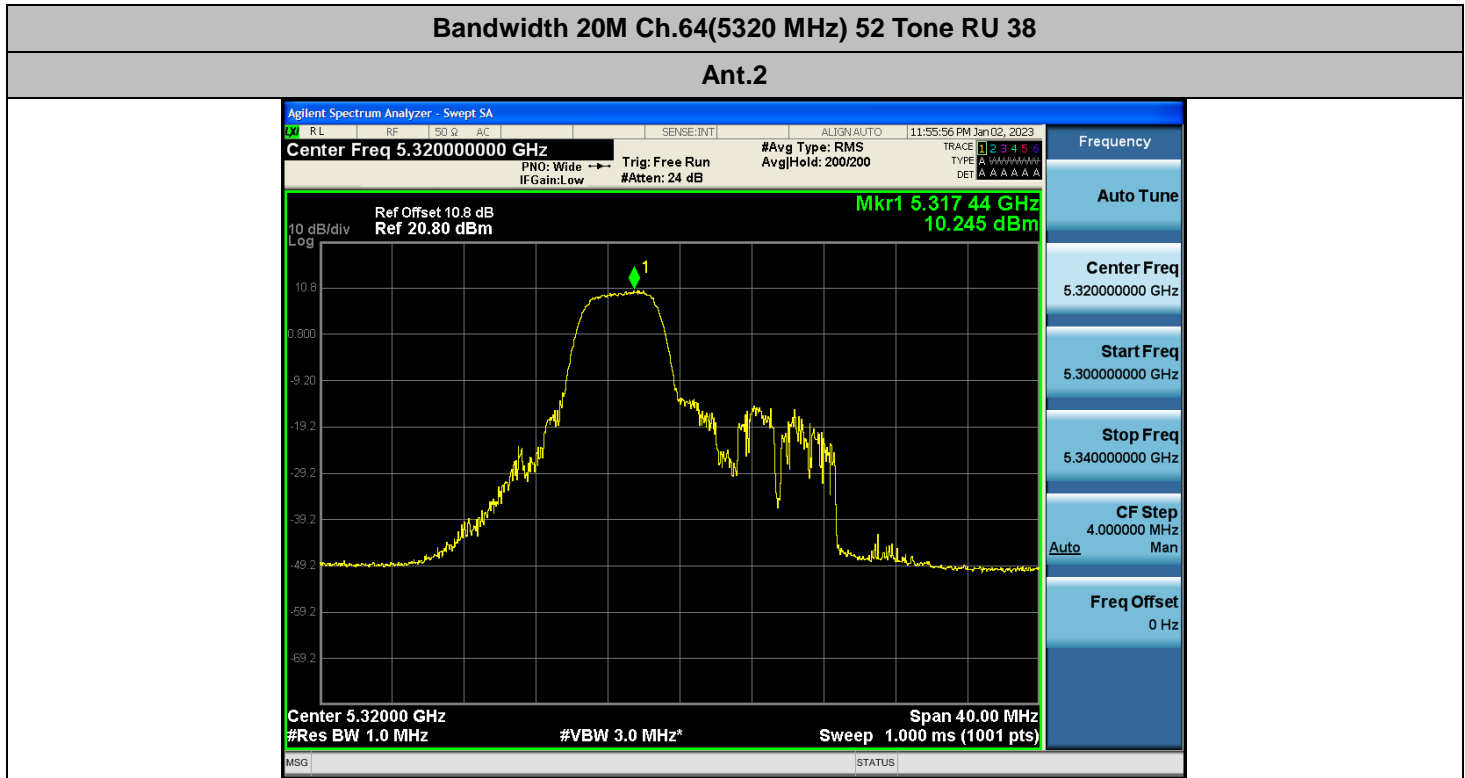
Note:

1. In order to simplify the report, attached plots were only channel of highest PSD.

4.1 SISO Ant.2

Bandwidth 20M Ch.64(5320 MHz) 52 Tone RU 38

Ant.2



PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
10.245	0.108	10.353

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 20M Ch.157 (5785 MHz) 26 Tone RU 0

Ant.2



PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
6.710	0.100	6.810

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 40M Ch.118 (5590 MHz) 26Tone RU 0

Ant.2



PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
9.734	0.109	9.843

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 40M Ch.151 (5755 MHz) 26Tone RU 0

Ant.2



PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
6.640	0.109	6.749

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 80M Ch.42 (5210 MHz) 26Tone RU 0

Ant.2



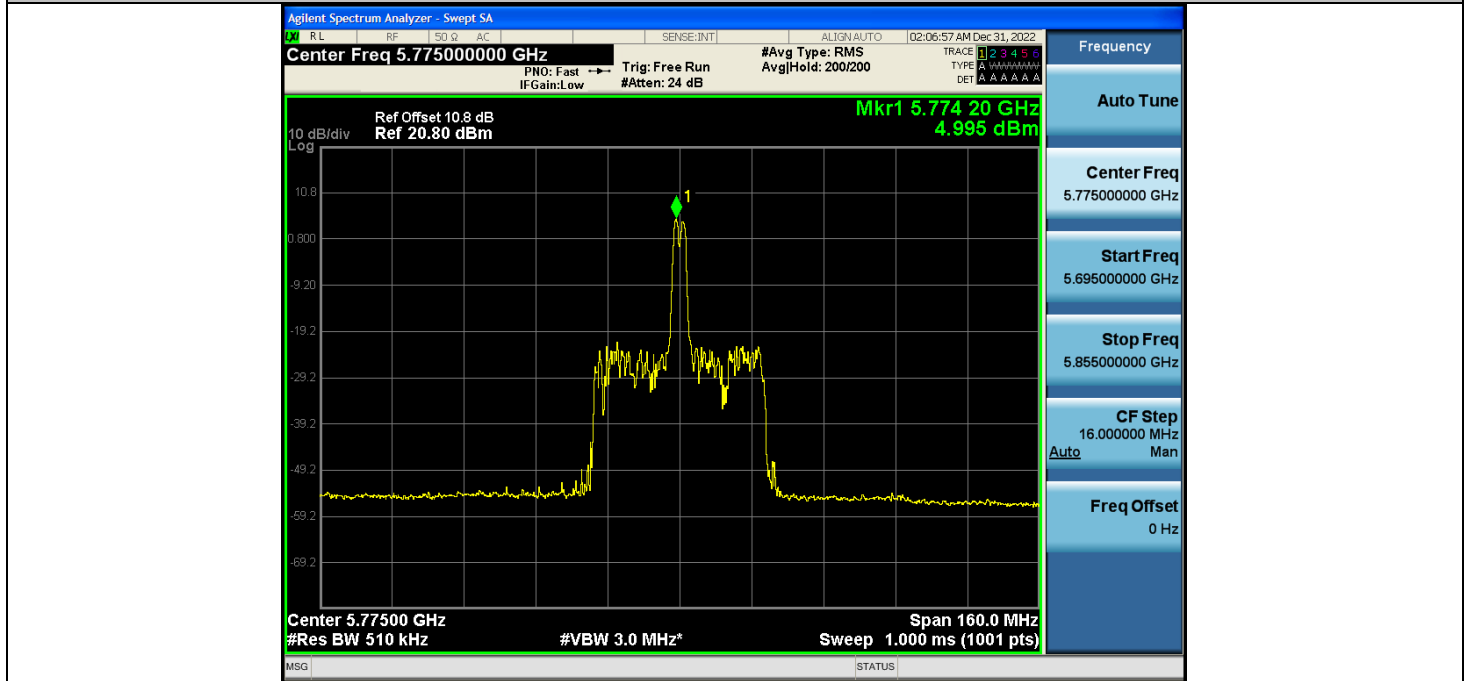
PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
9.173	0.106	9.279

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 80M Ch.155 (5775 MHz) 26Tone RU 18

Ant.2



PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
4.995	0.106	5.101

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

4.2 SUM (MIMO Ant.1 + MIMO Ant.2)

Bandwidth 20M Ch.64(5320 MHz) 52 Tone RU 38

Ant.1



Ant.2



SUM PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
9.585	0.178	9.763

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 20M Ch.149 (5745 MHz) 26 Tone RU 0

Ant.1



Ant.2



SUM PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
6.566	0.077	6.643

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 40M Ch.46 (5230 MHz) 26Tone RU 0

Ant.1



Ant.2



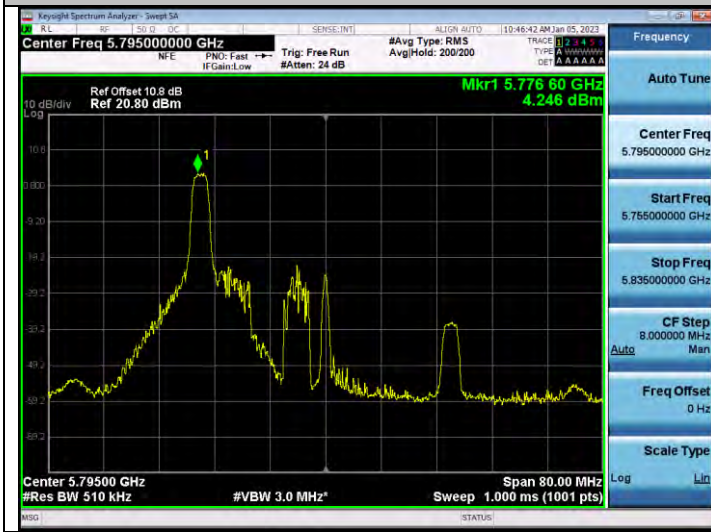
SUM PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
9.760	0.098	9.858

Note:

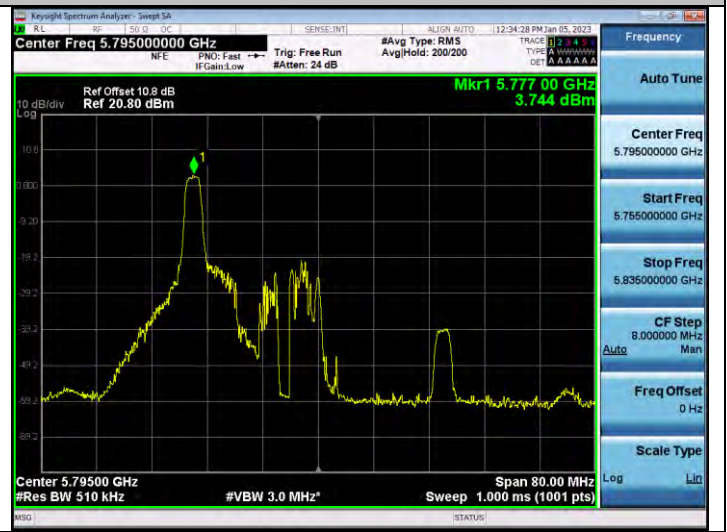
Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 40M Ch.159 (5795 MHz) 26Tone RU 0

Ant.1



Ant.2



SUM PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
7.013	0.098	7.111

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 80M Ch.58 (5290 MHz) 26Tone RU 0

Ant.1



Ant.2



SUM PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
8.709	0.102	8.811

Note:

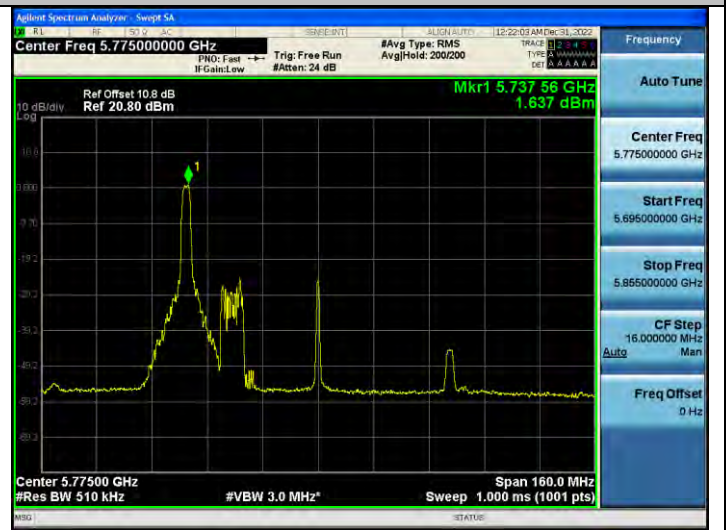
Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

Bandwidth 80M Ch.155 (5775 MHz) 26Tone RU 0

Ant.1



Ant.2



SUM PSD (dBm)	Duty Cycle Factor (dB)	Total PSD (dBm)
5.090	0.102	5.192

Note:

Total PSD (dBm) = Measured Value (dBm) + Duty Cycle Factor (dB)

5. Straddle Channel

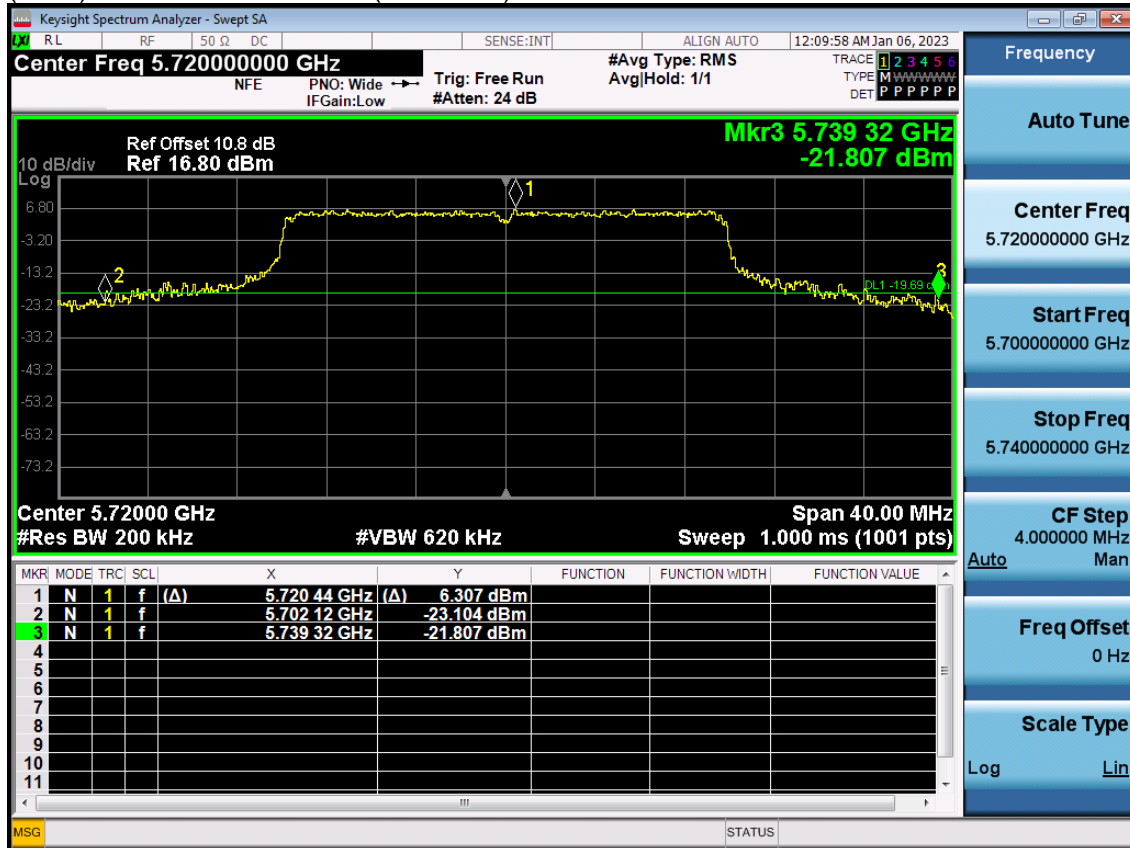
5.1 26dB Bandwidth

Note:

1. In order to simplify the report, attached plots were only the most wide channel. (UNII1~3)

5.1.1 SISO Ant.2

(26dB) Bandwidth 20M Ch.144(5720 MHz) 242 Tones RU 61

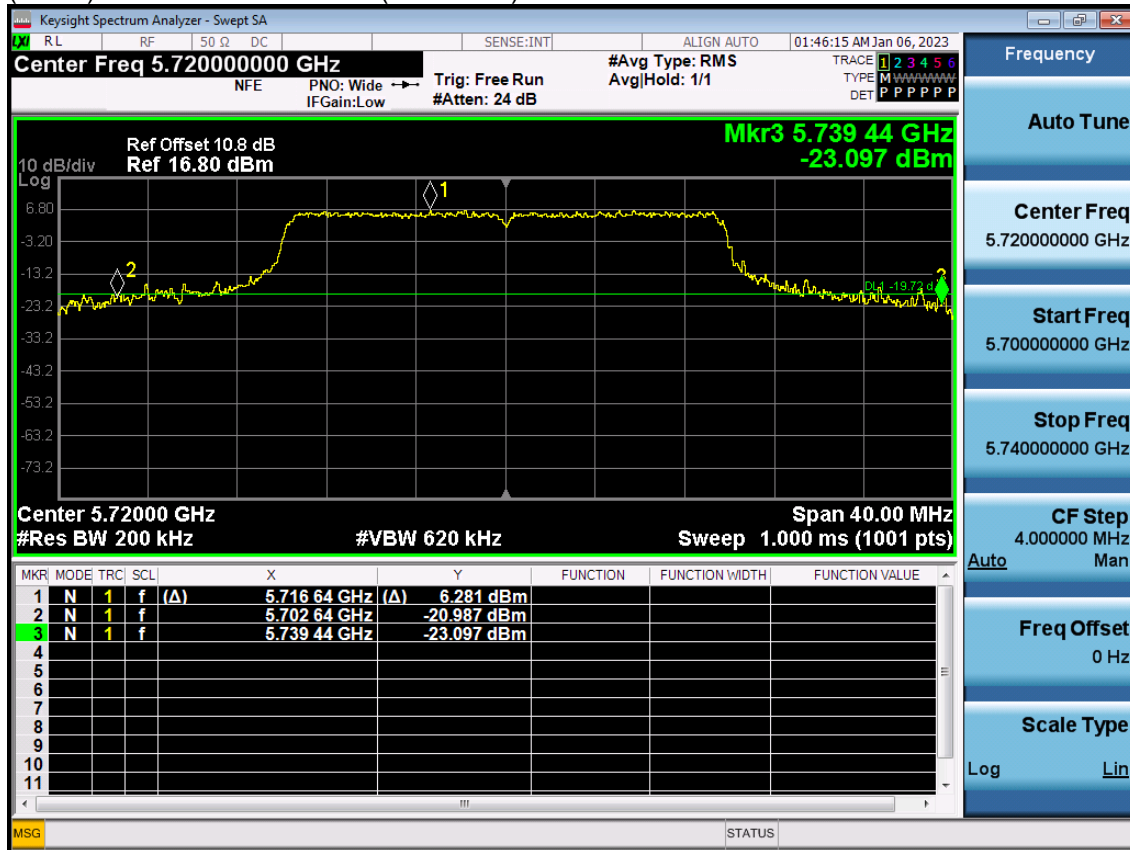


UNII 2C	Straddle Frequency [MHz]	Measured Frequency [MHz]	26dB Bandwidth [MHz]
	5725	5702.12	22.88

Note:

1. [UNII 2C] 26 dB Bandwidth = 5725 MHz - Measured Frequency[MHz]

(26 dB) Bandwidth 20M Ch.144(5720 MHz) SU

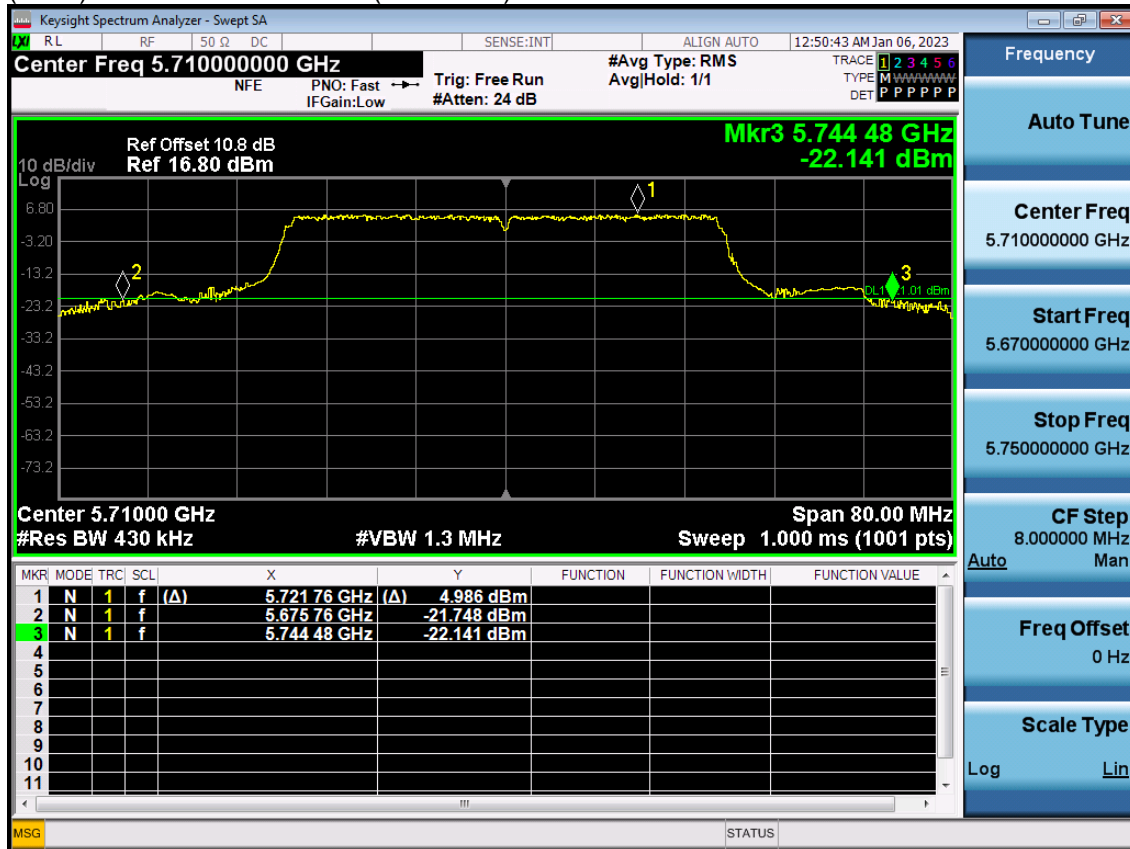


UNII 3	Measured Frequency [MHz]	Straddle Frequency [MHz]	26dB Bandwidth [MHz]
	5739.44	5725	14.44

Note:

1. [UNII 3] 26 dB Bandwidth = Measured Frequency[MHz] -5725 MHz

(26dB) Bandwidth 40M Ch.142(5710 MHz) 484 Tones RU 65



UNII 2C	Straddle Frequency [MHz]	Measured Frequency [MHz]	26dB Bandwidth [MHz]
	5725	5675.76	49.24
UNII 3	Measured Frequency [MHz]	Straddle Frequency [MHz]	26dB Bandwidth [MHz]
	5744.48	5725	19.48

Note:

1. [UNII 2C] 26 dB Bandwidth = 5725 MHz - Measured Frequency[MHz]
2. [UNII 3] 26 dB Bandwidth = Measured Frequency[MHz] -5725 MHz

(26dB) Bandwidth 80M Ch.138(5690 MHz) 996 Tones RU 67



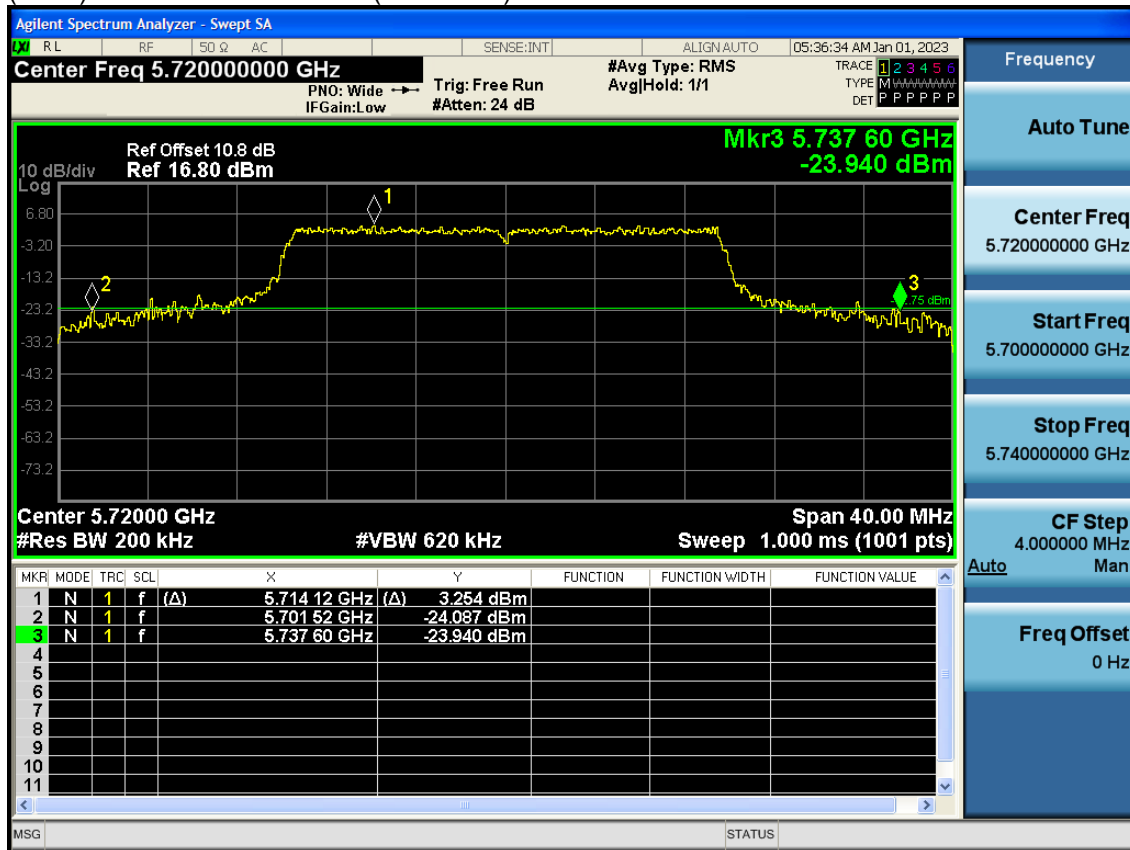
UNII 2C	Straddle Frequency [MHz]	Measured Frequency [MHz]	26dB Bandwidth [MHz]
	5725	5635.6	89.40
UNII 3	Measured Frequency [MHz]	Straddle Frequency [MHz]	26dB Bandwidth [MHz]
	5741.04	5725	16.04

Note:

1. [UNII 2C] 26 dB Bandwidth = 5725 MHz - Measured Frequency[MHz]
2. [UNII 3] 26 dB Bandwidth = Measured Frequency[MHz] -5725 MHz

5.1.2 MIMO Ant.1

(26dB) Bandwidth 20M Ch.144(5720 MHz) 242 Tones RU 61

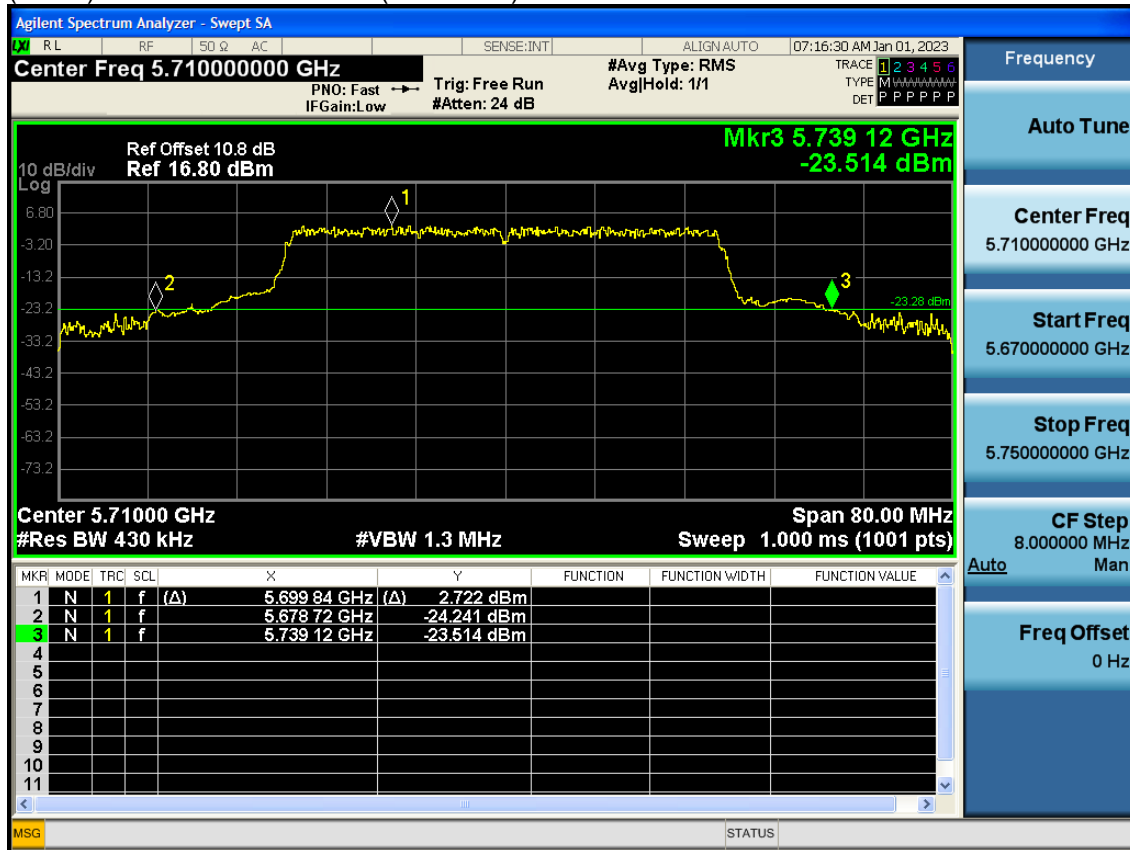


UNII 2C	Straddle Frequency [MHz]	Measured Frequency [MHz]	26dB Bandwidth [MHz]
	5725	5701.52	23.48
UNII 3	Measured Frequency [MHz]	Straddle Frequency [MHz]	26dB Bandwidth [MHz]
	5737.6	5725	12.60

Note:

- [UNII 2C] 26 dB Bandwidth = 5725 MHz - Measured Frequency[MHz]
- [UNII 3] 26 dB Bandwidth = Measured Frequency[MHz] -5725 MHz

(26 dB) Bandwidth 40M Ch.142(5710 MHz) SU

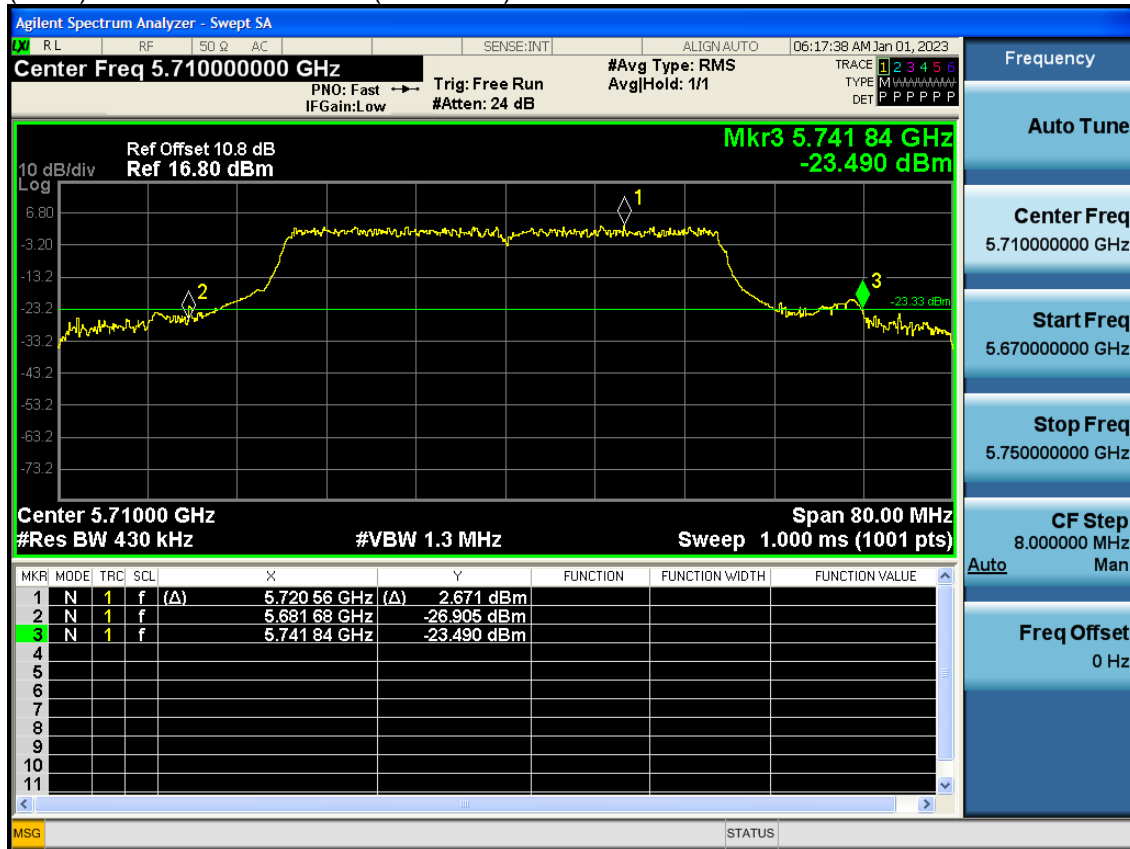


UNII 2C	Straddle Frequency [MHz]	Measured Frequency [MHz]	26dB Bandwidth [MHz]
	5725	5678.72	46.28

Note:

1. [UNII 2C] 26 dB Bandwidth = 5725 MHz - Measured Frequency[MHz]

(26dB) Bandwidth 40M Ch.142(5710 MHz) 484 Tones RU 65



UNII 3	Measured Frequency [MHz]	Straddle Frequency [MHz]	26dB Bandwidth [MHz]
	5741.84	5725	16.84

Note:

1. [UNII 3] 26 dB Bandwidth = Measured Frequency[MHz] -5725 MHz

(26dB) Bandwidth 80M Ch.138(5690 MHz) SU



UNII 2C	Straddle Frequency	Measured Frequency	26dB Bandwidth
	[MHz]	[MHz]	[MHz]
	5725	5639.44	85.56

Note:

- [UNII 2C] 26dB Bandwidth = 5725 MHz - Measured Frequency[MHz]

(26dB) Bandwidth 80M Ch.138(5690 MHz) 996 Tones RU 67



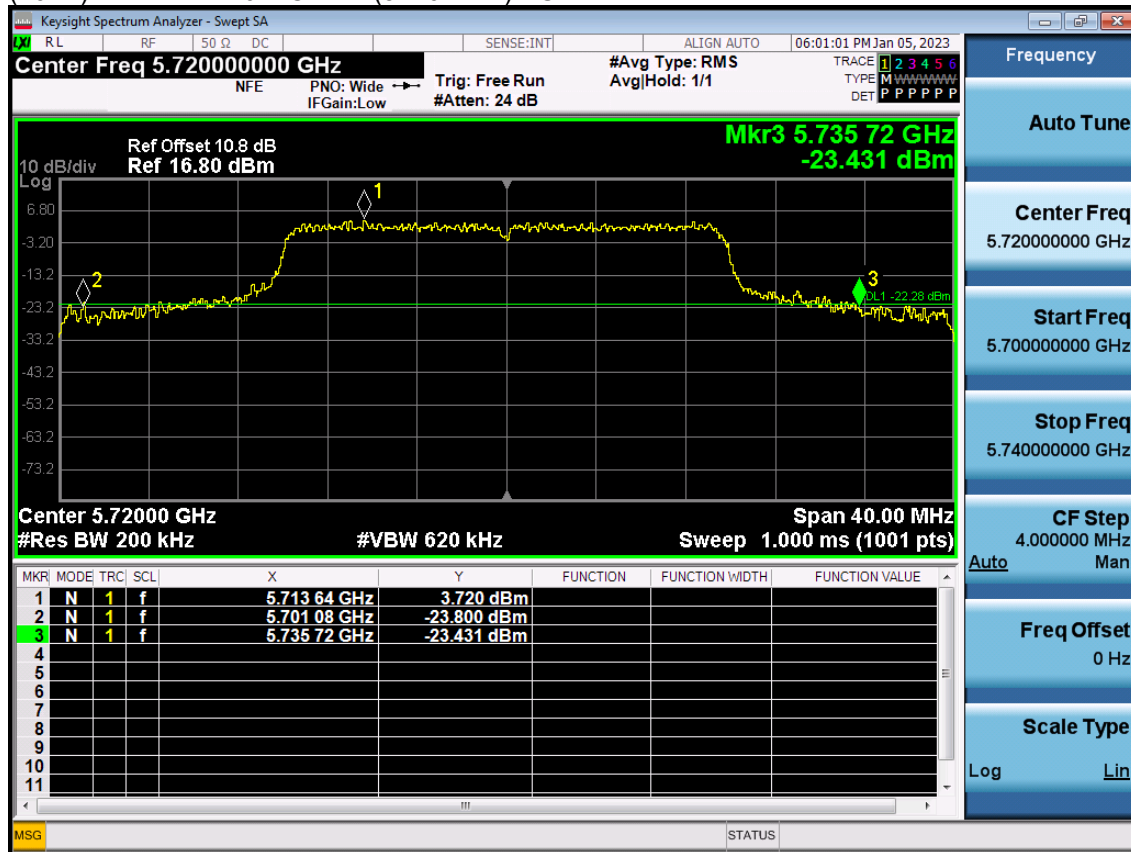
UNII 3	Measured Frequency [MHz]	Straddle Frequency [MHz]	26dB Bandwidth [MHz]
		5739.92	5725

Note:

1. [UNII 3] 26 dB Bandwidth = Measured Frequency[MHz] -5725 MHz

5.1.3 MIMO Ant.2

(26dB) Bandwidth 20M Ch.144(5720 MHz) SU

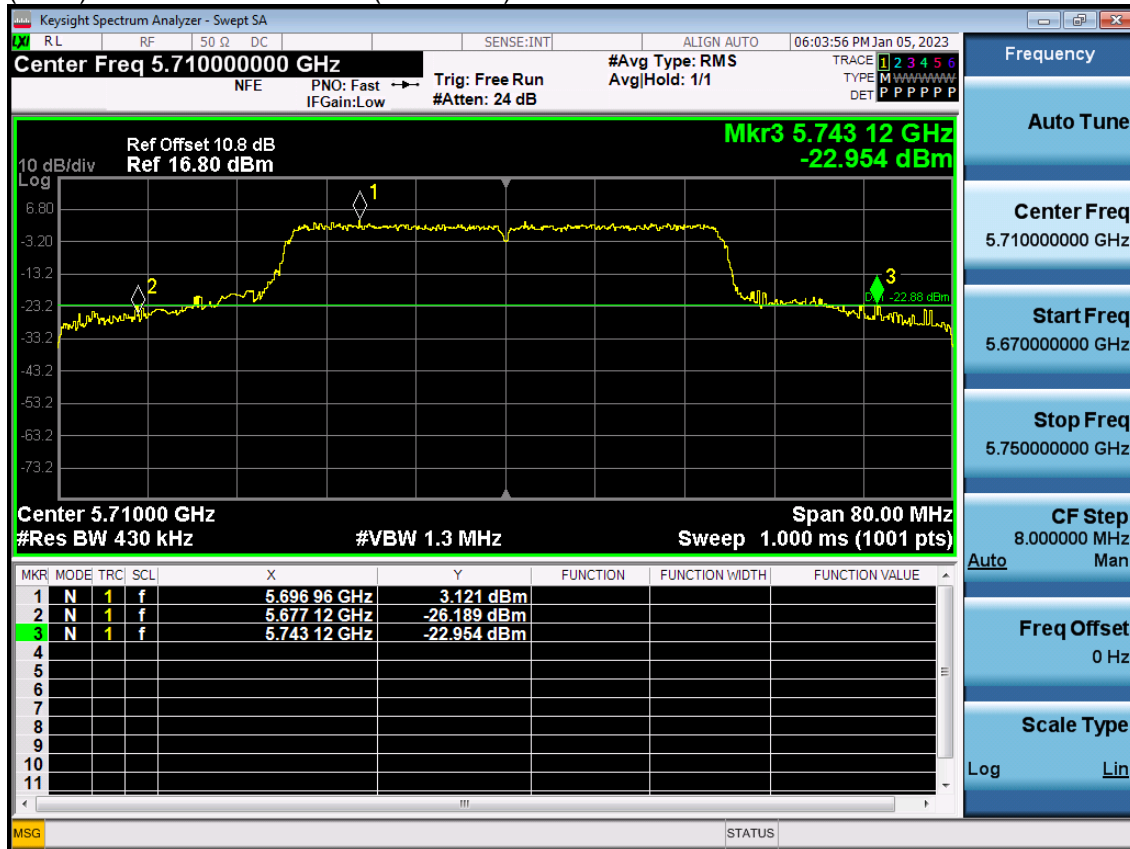


UNII 2C	Straddle Frequency [MHz]	Measured Frequency [MHz]	26dB Bandwidth [MHz]
	5725	5701.08	23.92
UNII 3	Measured Frequency [MHz]	Straddle Frequency [MHz]	26dB Bandwidth [MHz]
	5735.72	5725	10.72

Note:

- [UNII 2C] 26 dB Bandwidth = 5725 MHz - Measured Frequency[MHz]
- [UNII 3] 26 dB Bandwidth = Measured Frequency[MHz] -5725 MHz

(26dB) Bandwidth 40M Ch.142(5710 MHz) SU



UNII 2C	Straddle Frequency [MHz]	Measured Frequency [MHz]	26dB Bandwidth [MHz]
	5725	5677.12	47.88
UNII 3	Measured Frequency [MHz]	Straddle Frequency [MHz]	26dB Bandwidth [MHz]
	5743.12	5725	18.12

Note:

1. [UNII 2C] 26 dB Bandwidth = 5725 MHz - Measured Frequency[MHz]
2. [UNII 3] 26 dB Bandwidth = Measured Frequency[MHz] -5725 MHz