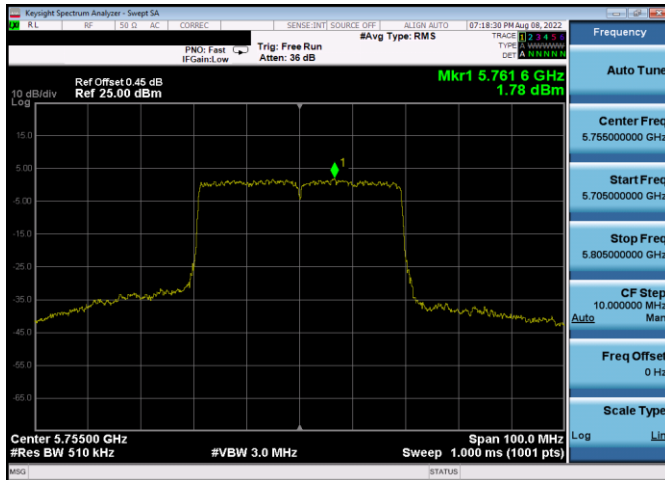
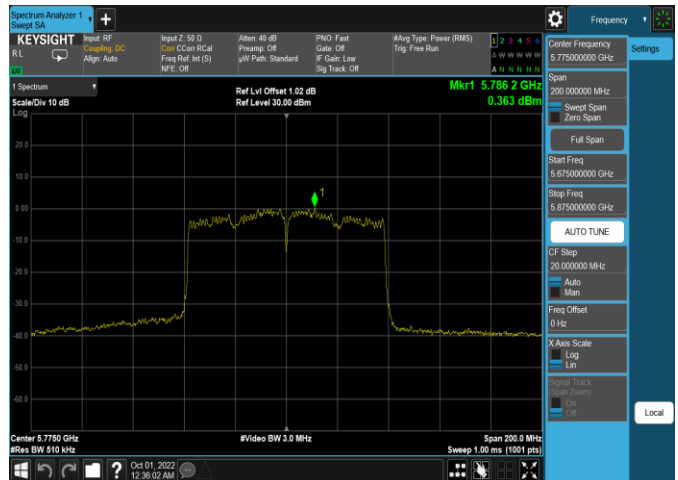
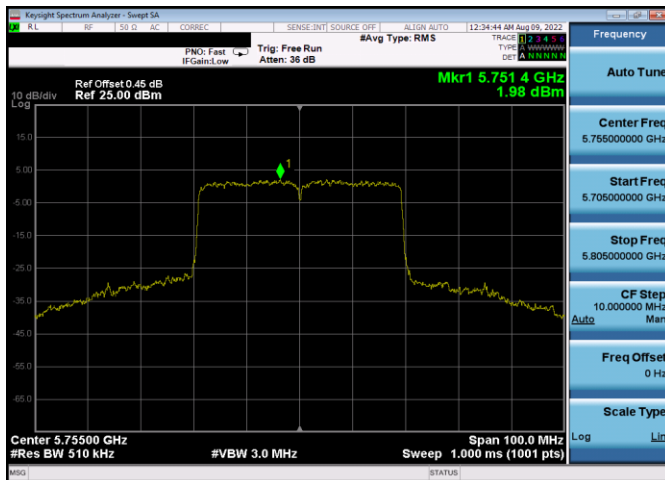




Plot 7-535. PSD CDD Antenna 5b (40MHz BW 802.11ax(SU) – Ch. 151, MCS4)



Plot 7-538. PSD CDD Antenna 4a (80MHz BW 802.11ac – Ch. 155, MCS12)



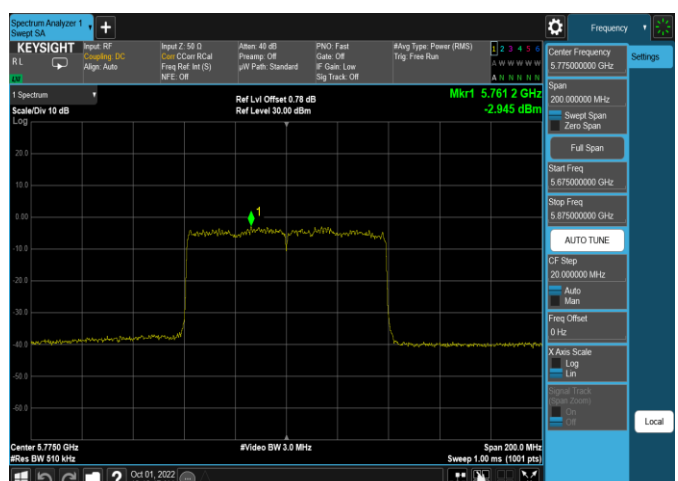
Plot 7-536. PSD CDD Antenna 4a (40MHz BW 802.11ax(SU) – Ch. 151, MCS4)



Plot 7-539. PSD CDD Antenna 5b (80MHz BW 802.11ax(SU) – Ch. 155, MCS4)

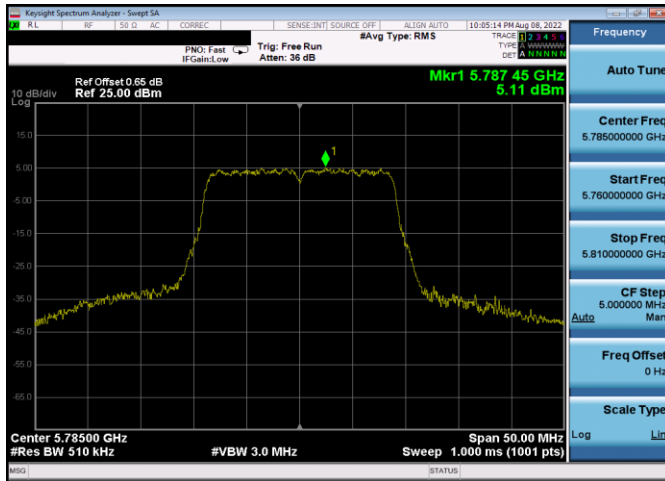


Plot 7-537. PSD CDD Antenna 5b (80MHz BW 802.11ac – Ch. 155, MCS12)

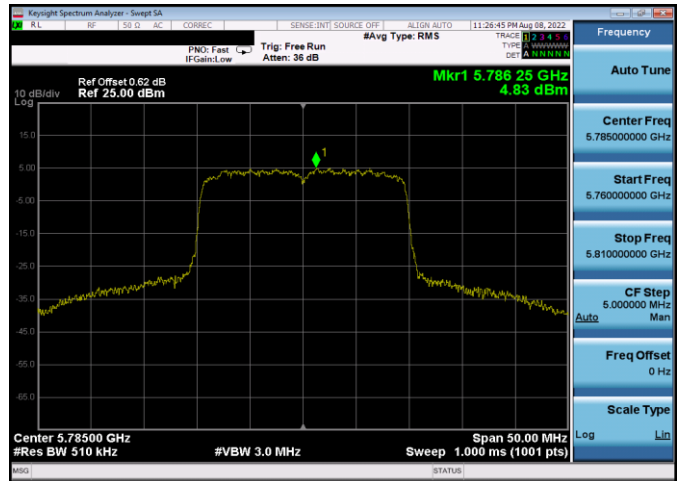


Plot 7-540. PSD CDD Antenna 4a (80MHz BW 802.11ax(SU) – Ch. 155, MCS4)

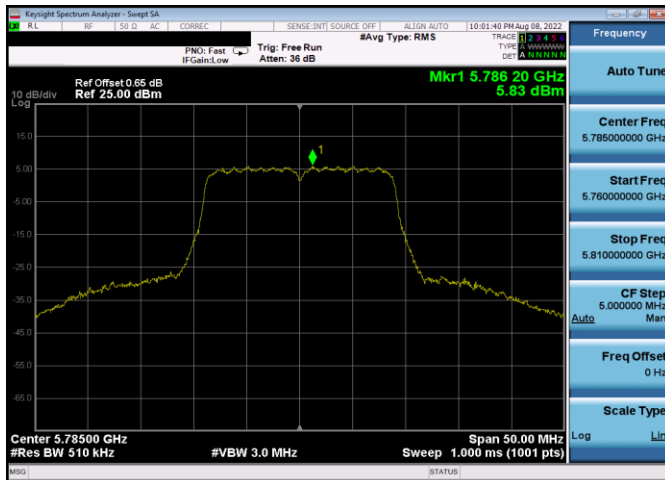
FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 183 of 365



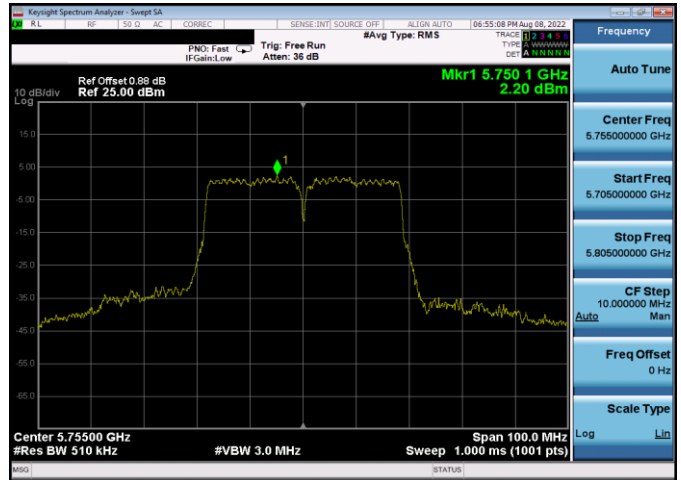
Plot 7-541. PSD CDD Antenna 5b (20MHz BW 802.11n - Ch. 157, MCS15)



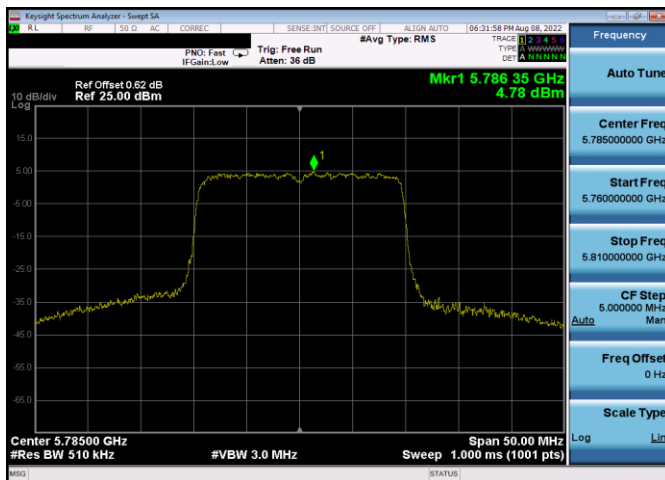
Plot 7-544. PSD CDD Antenna 4a (20MHz BW 802.11ax(SU) - Ch. 157, MCS11)



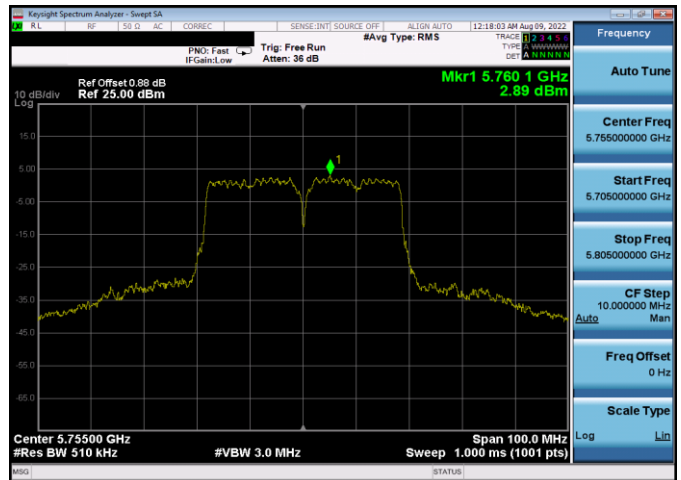
Plot 7-542. PSD CDD Antenna 4a (20MHz BW 802.11n - Ch. 157, MCS15)



Plot 7-545. PSD CDD Antenna 5b (40MHz BW 802.11n - Ch. 151, MCS15)

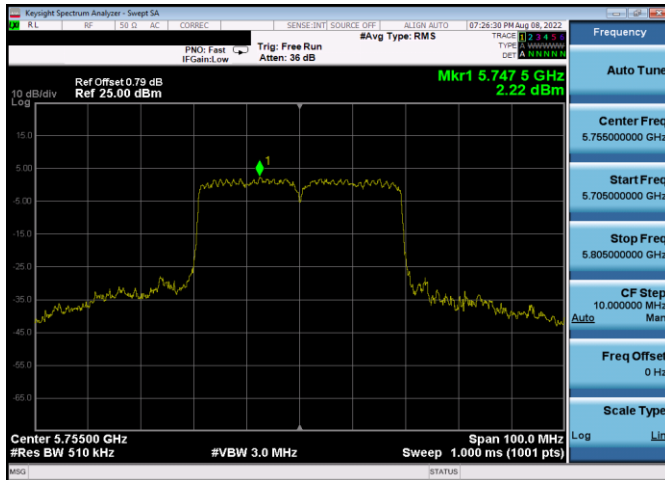


Plot 7-543. PSD CDD Antenna 5b (20MHz BW 802.11ax(SU) - Ch. 157, MCS11)

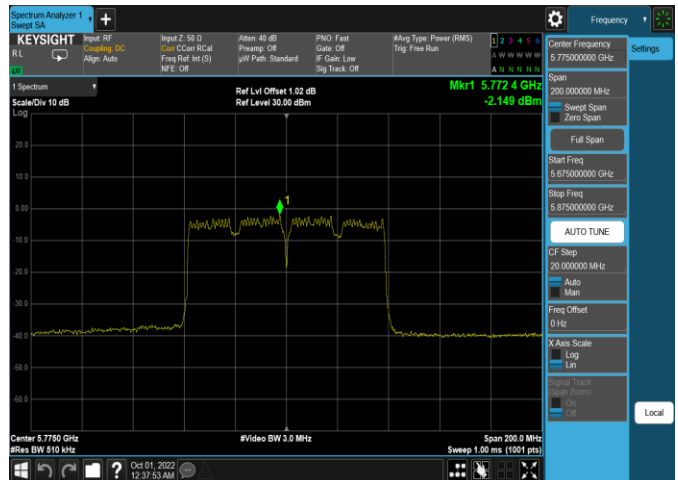


Plot 7-546. PSD CDD Antenna 4a (40MHz BW 802.11n - Ch. 151, MCS15)

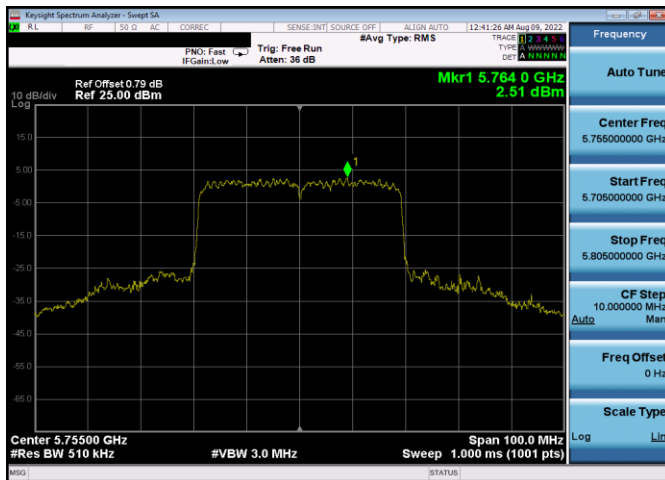
FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 184 of 365



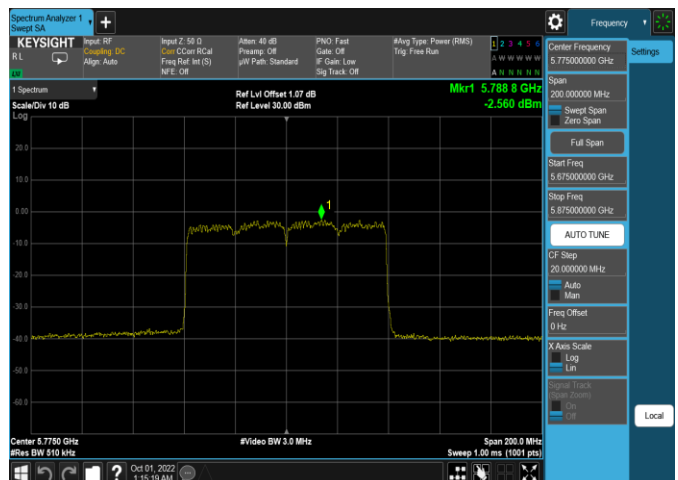
Plot 7-547. PSD CDD Antenna 5b (40MHz BW 802.11ax(SU) - Ch. 151, MCS11)



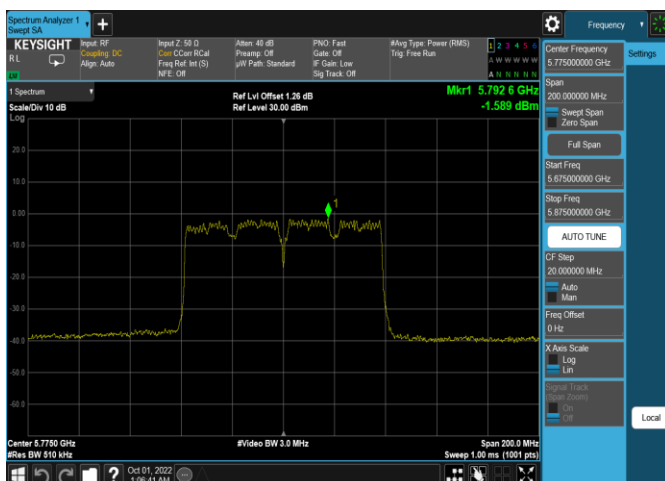
Plot 7-550. PSD CDD Antenna 4a (80MHz BW 802.11ac - Ch. 155, MCS9)



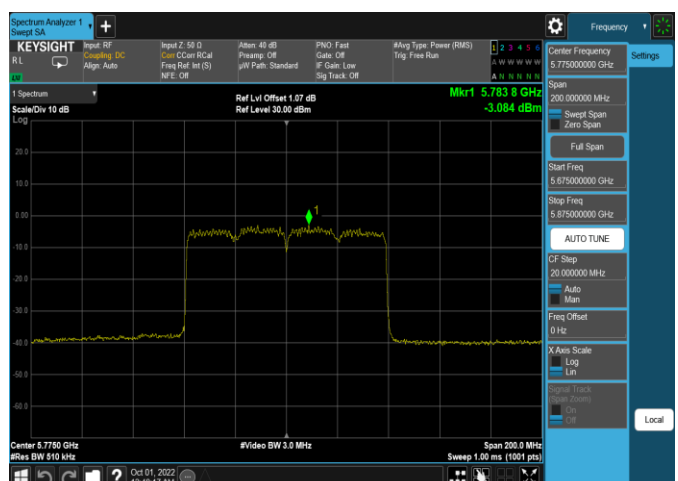
Plot 7-548. PSD CDD Antenna 4a (40MHz BW 802.11ax(SU) - Ch. 151, MCS11)



Plot 7-551. PSD CDD Antenna 5b (80MHz BW 802.11ax(SU) - Ch. 155, MCS11)



Plot 7-549. PSD CDD Antenna 5b (80MHz BW 802.11ac - Ch. 155, MCS9)



Plot 7-552. PSD CDD Antenna 4a (80MHz BW 802.11ax(SU) - Ch. 155, MCS11)

FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 185 of 365

	Frequency [MHz]	Channel No.	802.11 Mode	Mode	Data Rate [Mbps]	Antenna 5b Power Density [dBm/MHz]	Antenna 4a Power Density [dBm/MHz]	Summed Power Density [dBm/MHz]	Directional Antenna Gain [dBi]	e.i.r.p. Power Density [dBm/MHz]	ISED Max e.i.r.p. Power Density	Margin [dB]
Band 1	5180	36	n (20MHz)	SDM	39/43.3 (MCS10)	5.68	5.15	8.43	0.93	9.36	10.0	-0.64
	5200	40	n (20MHz)	SDM	39/43.3 (MCS10)	5.72	4.88	8.33	0.93	9.26	10.0	-0.74
	5240	48	n (20MHz)	SDM	39/43.3 (MCS10)	5.24	4.92	8.09	0.93	9.02	10.0	-0.98
	5180	36	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	4.37	3.66	7.04	0.93	7.97	10.0	-2.03
	5200	40	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	4.13	3.82	6.99	0.93	7.92	10.0	-2.08
	5240	48	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	3.90	3.33	6.63	0.93	7.56	10.0	-2.44
	5190	38	n (40MHz)	CDD	81/90 (MCS10)	1.84	1.27	4.57	3.92	8.50	10.0	-1.50
	5230	46	n (40MHz)	SDM	81/90 (MCS10)	5.15	4.41	7.80	0.93	8.73	10.0	-1.27
	5190	38	ax (SU) (40MHz)	CDD	98/103.2 (MCS2)	-0.04	-0.91	2.56	3.92	6.49	10.0	-3.51
	5230	46	ax (SU) (40MHz)	SDM	98/103.2 (MCS2)	4.01	3.37	6.72	0.93	7.64	10.0	-2.36
	5210	42	ac (80MHz)	CDD	175.5/195 (MCS2)	-2.69	-3.47	-0.05	3.92	3.87	10.0	-6.13
	5210	42	ax (SU) (80MHz)	CDD	204/216.2 (MCS2)	-4.65	-5.29	-1.94	3.92	1.98	10.0	-8.02
Band 1/2	5250	50	ac (160MHz)	CDD	351/390 (MCS2)	-9.97	-10.31	-7.13	3.92	-3.21	10.0	-13.21
	5250	50	ax (SU) (160MHz)	CDD	408.3/432.4 (MCS2)	-11.20	-11.38	-8.28	3.92	-4.36	10.0	-14.36

Table 7-140. ISED Band 1 e.i.r.p. Power Spectral Density Measurements CDD/SDM (Low Data Rate)

	Frequency [MHz]	Channel No.	802.11 Mode	Mode	Data Rate [Mbps]	Antenna 5b Power Density [dBm/MHz]	Antenna 4a Power Density [dBm/MHz]	Summed Power Density [dBm/MHz]	Directional Antenna Gain [dBi]	e.i.r.p. Power Density [dBm/MHz]	ISED Max e.i.r.p. Power Density	Margin [dB]
Band 1	5180	36	n (20MHz)	SDM	39/43.3 (MCS10)	5.85	5.43	8.65	0.93	9.58	10.0	-0.42
	5200	40	n (20MHz)	SDM	39/43.3 (MCS10)	5.64	5.41	8.53	0.93	9.46	10.0	-0.54
	5240	48	n (20MHz)	SDM	39/43.3 (MCS10)	5.06	5.48	8.29	0.93	9.22	10.0	-0.78
	5180	36	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	4.20	3.90	7.06	0.93	7.99	10.0	-2.01
	5200	40	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	4.85	3.86	7.40	0.93	8.33	10.0	-1.67
	5240	48	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	3.90	3.67	6.80	0.93	7.72	10.0	-2.28
	5190	38	n (40MHz)	CDD	81/90 (MCS10)	1.59	1.07	4.34	3.92	8.27	10.0	-1.73
	5230	46	n (40MHz)	SDM	81/90 (MCS10)	5.13	4.65	7.90	0.93	8.83	10.0	-1.17
	5190	38	ax (SU) (40MHz)	CDD	98/103.2 (MCS2)	0.12	-0.78	2.70	3.92	6.63	10.0	-3.37
	5230	46	ax (SU) (40MHz)	SDM	98/103.2 (MCS2)	4.33	3.78	7.08	0.93	8.00	10.0	-2.00
	5210	42	ac (80MHz)	CDD	175.5/195 (MCS2)	-3.74	-4.24	-0.97	3.92	2.96	10.0	-7.04
	5210	42	ax (SU) (80MHz)	CDD	204/216.2 (MCS2)	-5.06	-5.39	-2.21	3.92	1.71	10.0	-8.29
Band 1/2	5250	50	ac (160MHz)	CDD	702/780 (MCS4)	-9.48	-10.07	-6.75	3.92	-2.83	11.0	-13.83
	5250	50	ax (SU) (160MHz)	CDD	816.7/864.7 (MCS4)	-10.86	-11.09	-7.96	3.92	-4.04	12.0	-16.04

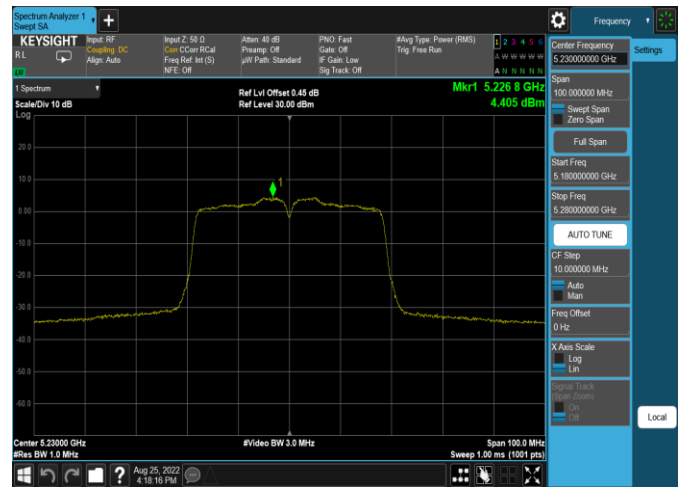
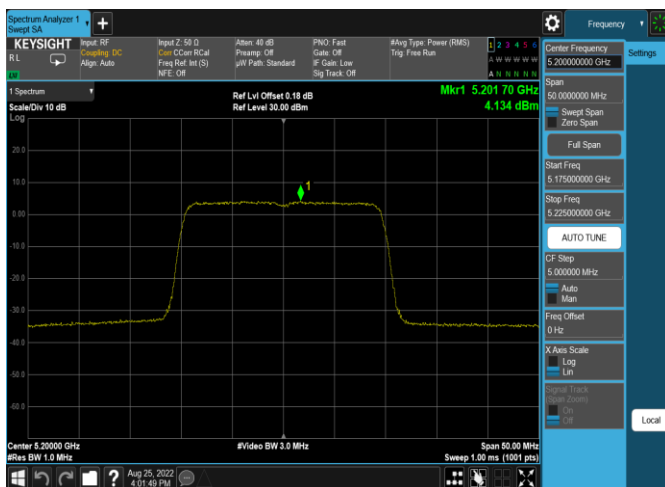
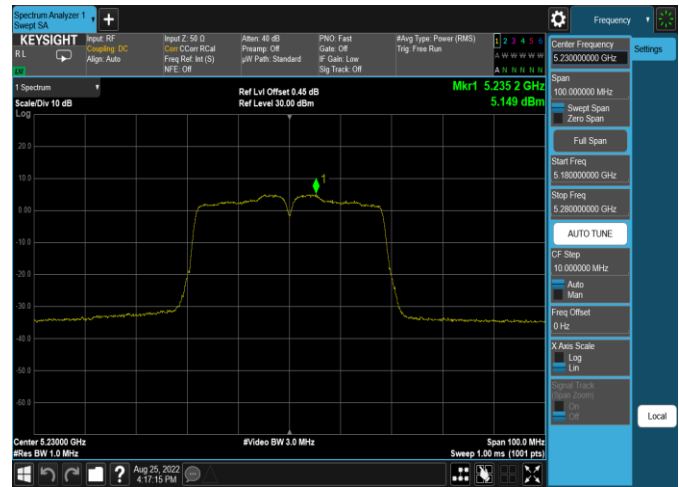
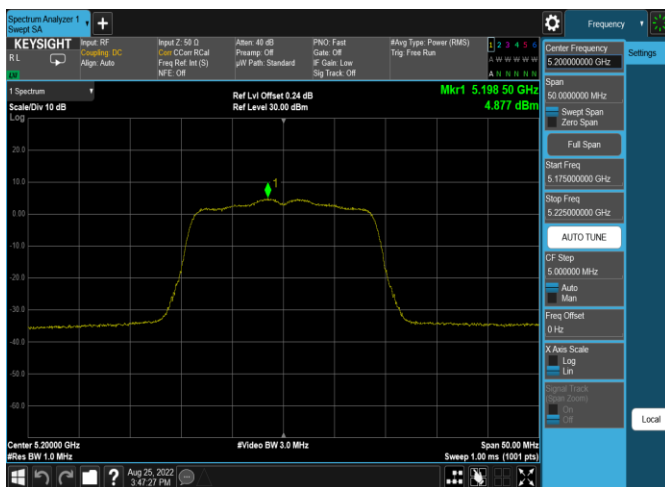
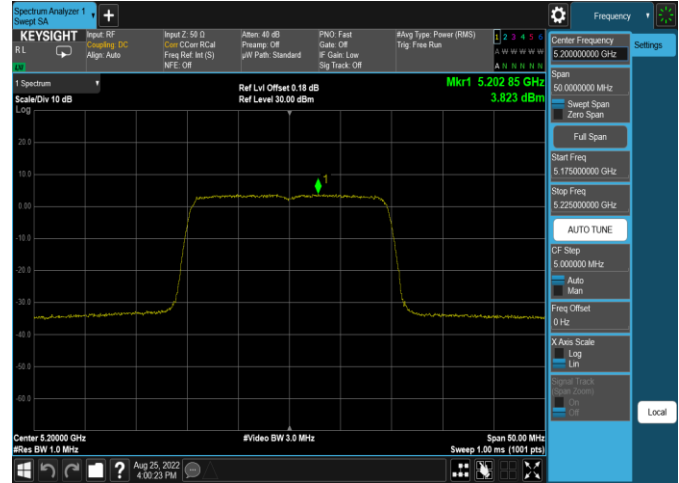
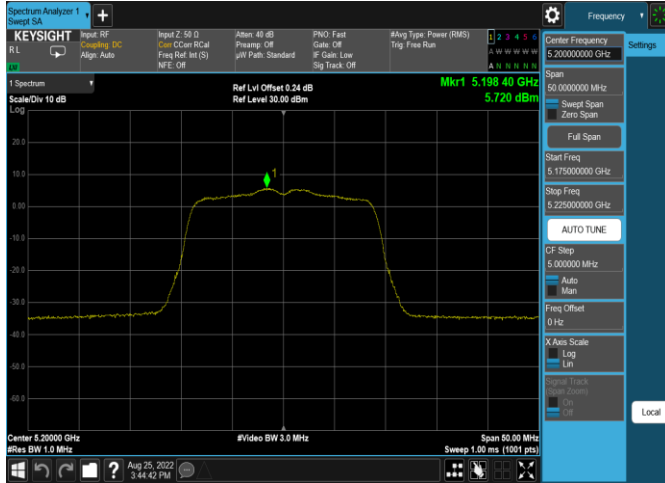
Table 7-141. ISED Band 1 e.i.r.p. Power Spectral Density Measurements CDD/SDM (Mid Data Rate)

	Frequency [MHz]	Channel No.	802.11 Mode	Mode	Data Rate [Mbps]	Antenna 5b Power Density [dBm/MHz]	Antenna 4a Power Density [dBm/MHz]	Summed Power Density [dBm/MHz]	Directional Antenna Gain [dBi]	e.i.r.p. Power Density [dBm/MHz]	ISED Max e.i.r.p. Power Density	Margin [dB]
Band 1	5180	36	n (20MHz)	SDM	39/43.3 (MCS10)	4.98	4.16	7.60	0.93	8.53	10.0	-1.47
	5200	40	n (20MHz)	SDM	39/43.3 (MCS10)	4.61	4.43	7.53	0.93	8.46	10.0	-1.54
	5240	48	n (20MHz)	SDM	39/43.3 (MCS10)	4.24	3.61	6.95	0.93	7.88	10.0	-2.12
	5180	36	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	5.18	5.27	8.24	0.93	9.16	10.0	-0.84
	5200	40	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	5.37	5.45	8.42	0.93	9.35	10.0	-0.65
	5240	48	ax (SU) (20MHz)	SDM	48/51.6 (MCS2)	5.26	5.16	8.22	0.93	9.15	10.0	-0.85
	5190	38	n (40MHz)	CDD	81/90 (MCS10)	-0.23	-0.88	2.46	3.92	6.39	10.0	-3.61
	5230	46	n (40MHz)	SDM	81/90 (MCS10)	-0.51	-0.82	2.35	0.93	3.28	10.0	-6.72
	5190	38	ax (SU) (40MHz)	CDD	98/103.2 (MCS2)	0.06	-0.92	2.61	3.92	6.54	10.0	-3.46
	5230	46	ax (SU) (40MHz)	SDM	98/103.2 (MCS2)	4.15	3.47	6.83	0.93	7.76	10.0	-2.24
	5210	42	ac (80MHz)	CDD	175.5/195 (MCS2)	-5.42	-5.79	-2.59	3.92	1.33	10.0	-8.67
	5210	42	ax (SU) (80MHz)	CDD	204/216.2 (MCS2)	-6.08	-7.03	-3.52	3.92	0.41	10.0	-9.59
Band 1/2	5250	50	ac (160MHz)	CDD	1560/1733.3 (MCS9)	-11.38	-11.74	-8.54	3.92	-4.62	11.0	-15.62
	5250	50	ax (SU) (160MHz)	CDD	2268.5/2402 (MCS11)	-10.94	-11.90	-8.38	3.92	-4.46	12.0	-16.46

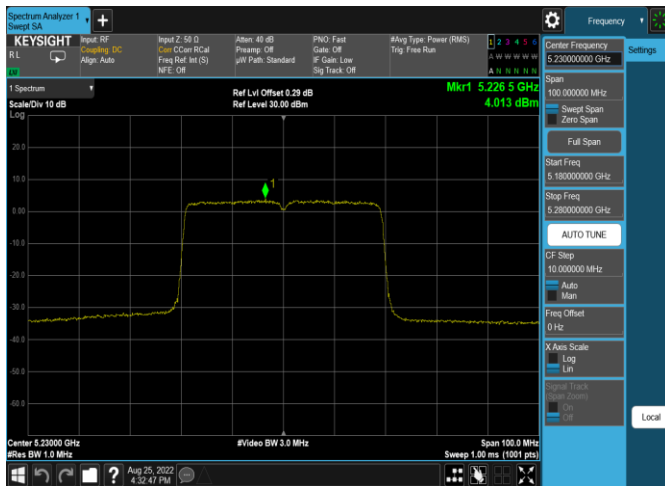
Table 7-142. ISED Band 1 e.i.r.p. Power Spectral Density Measurements CDD/SDM (High Data Rate)

FCC ID: BCGA2764 IC: 579C-A2764	 MEASUREMENT REPORT (CERTIFICATION)		Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 186 of 365

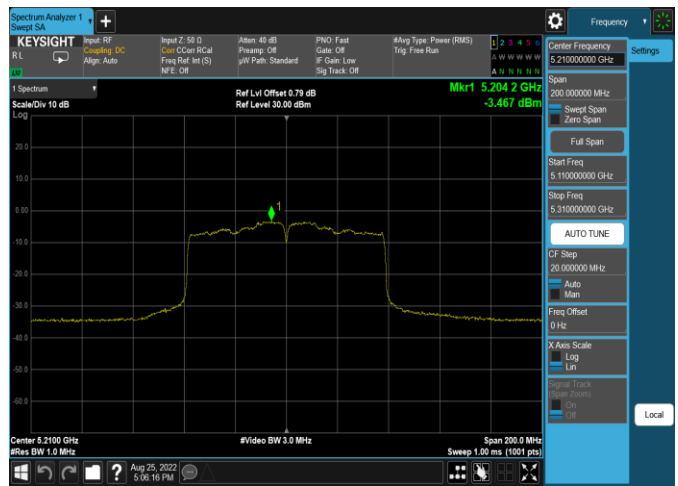
Low Data Rate



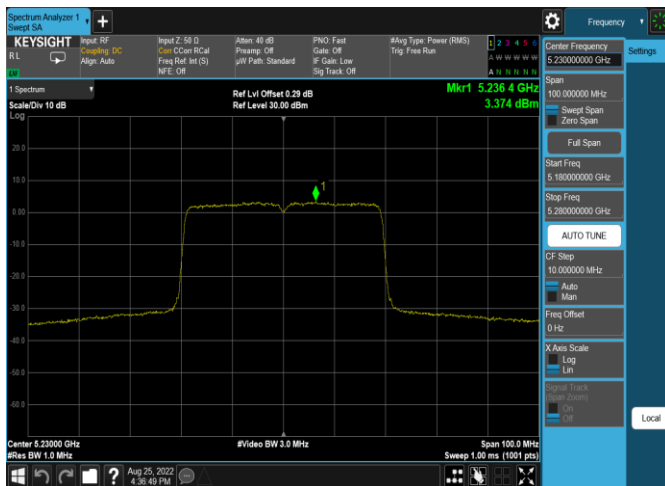
FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)		Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device		Page 187 of 365



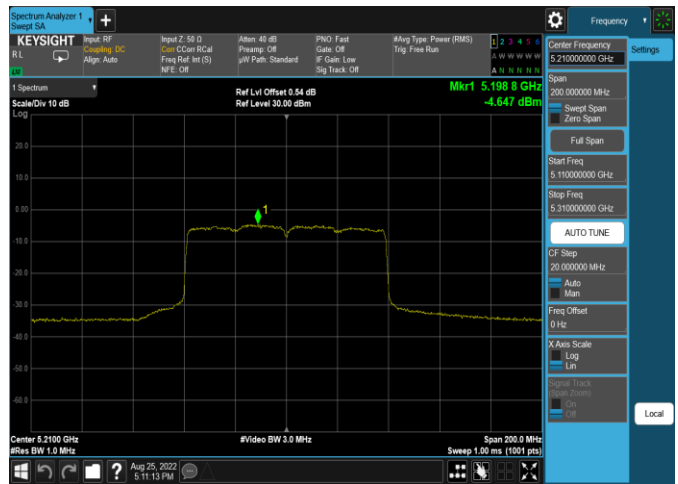
Plot 7-559. ISED PSD SDM Antenna 5b (40MHz BW 11ax(SU) – Ch.46, MCS2)



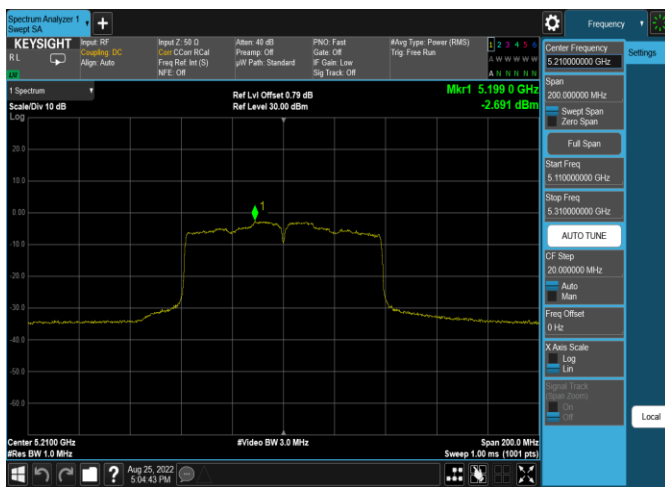
Plot 7-562. ISED PSD CDD Antenna 4a (80MHz BW 11ac – Ch.42, MCS2)



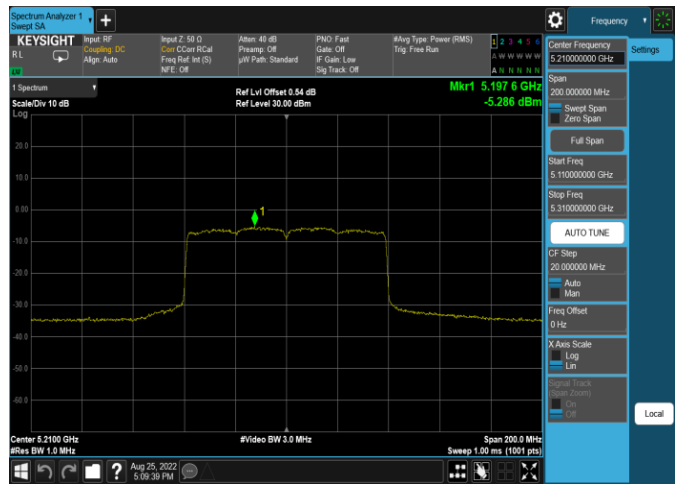
Plot 7-560. ISED SDM PSD Antenna 4a (40MHz BW 11ax(SU) – Ch.46, MCS2)



Plot 7-563. ISED PSD CDD Antenna 5b (80MHz BW 11ax (SU) – Ch.42, MCS2)



Plot 7-561. ISED PSD CDD Antenna 5b (80MHz BW 11ac – Ch.42, MCS2)

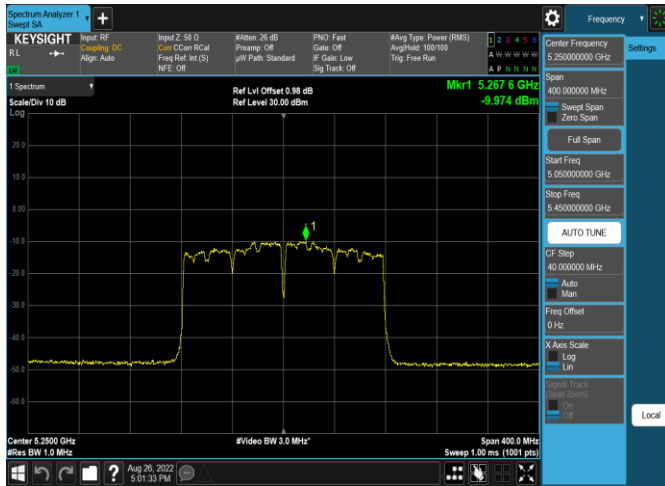


Plot 7-564. ISED PSD CDD Antenna 4a (80MHz BW 11ax (SU) – Ch.42, MCS2)

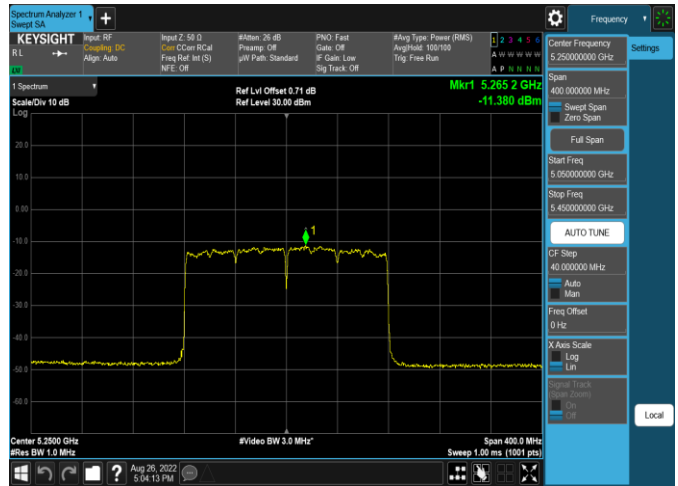
FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 188 of 365

V 10.5 12/15/2021

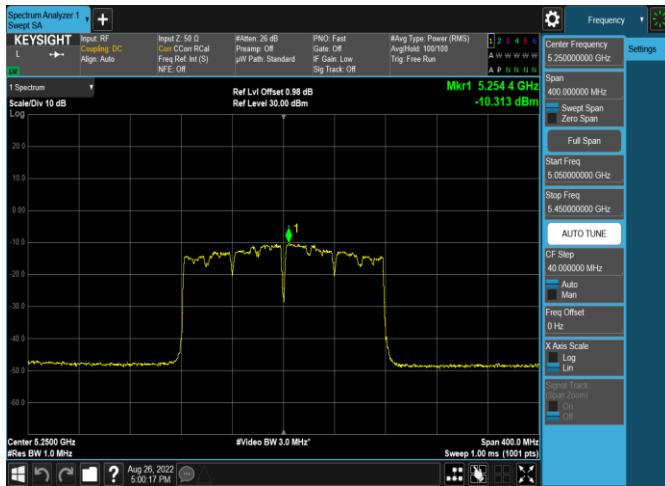
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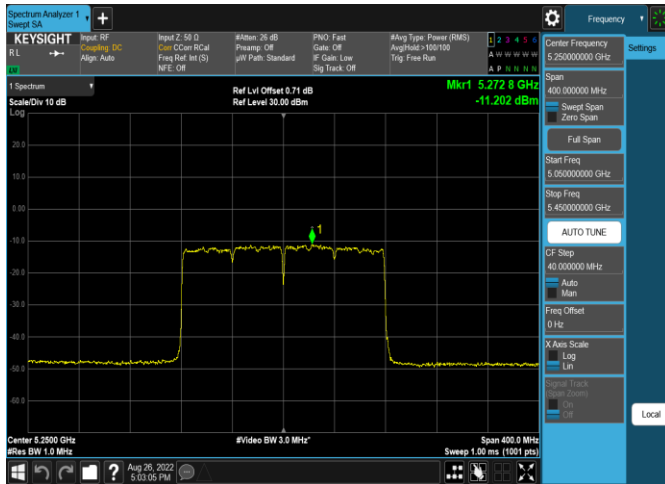
Plot 7-565. ISSED PSD CDD Antenna 5b (160MHz BW 11ac – Ch.50, MCS2)



Plot 7-568. ISSED PSD CDD Antenna 4a (160MHz BW 11ax (SU) – Ch.50, MCS2)



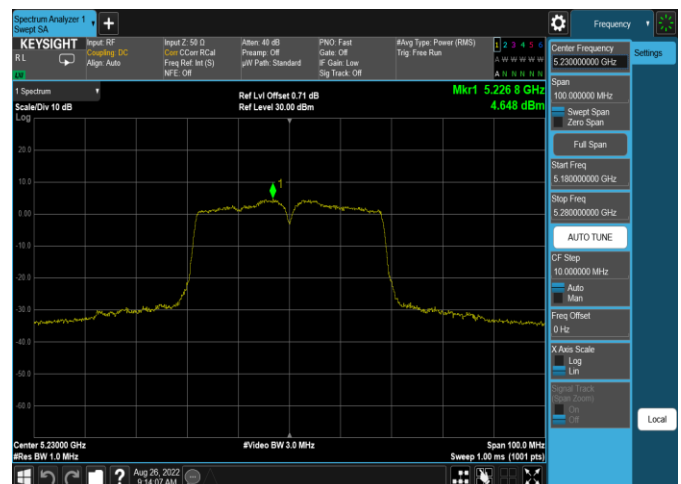
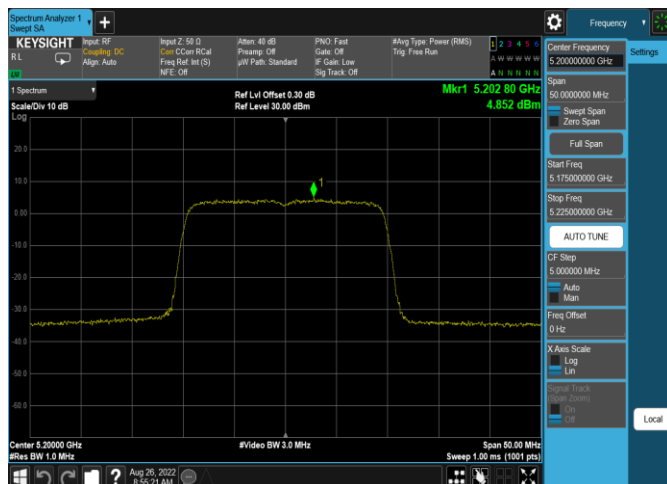
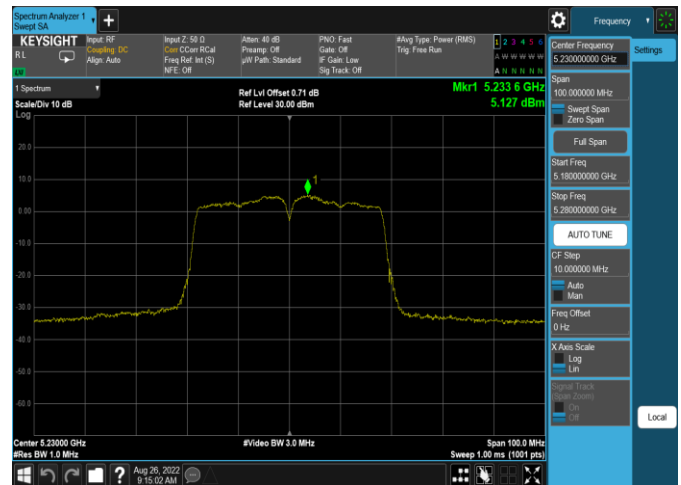
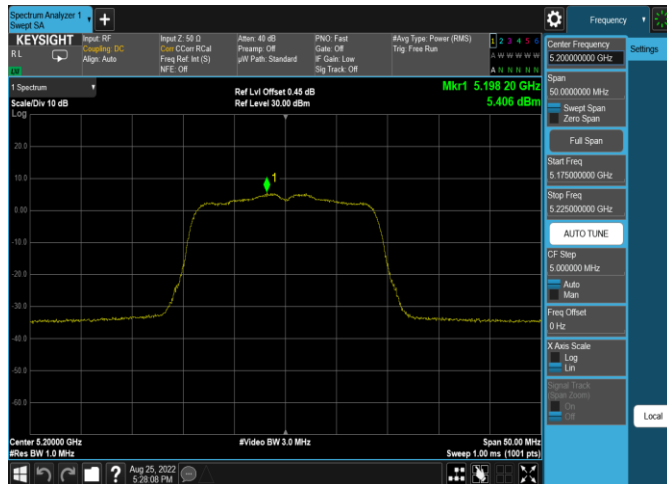
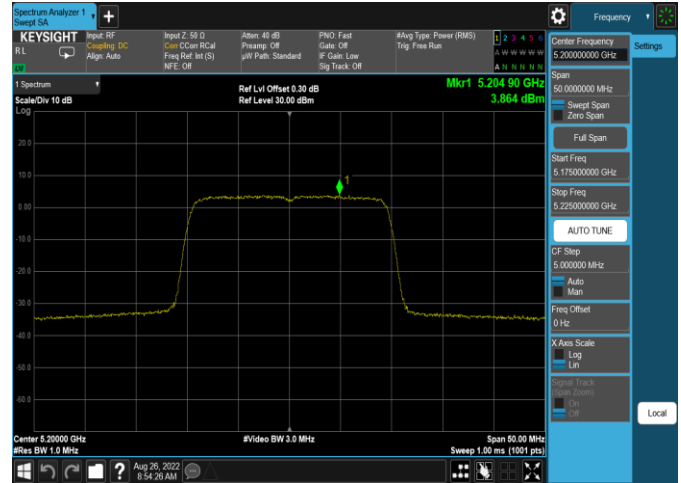
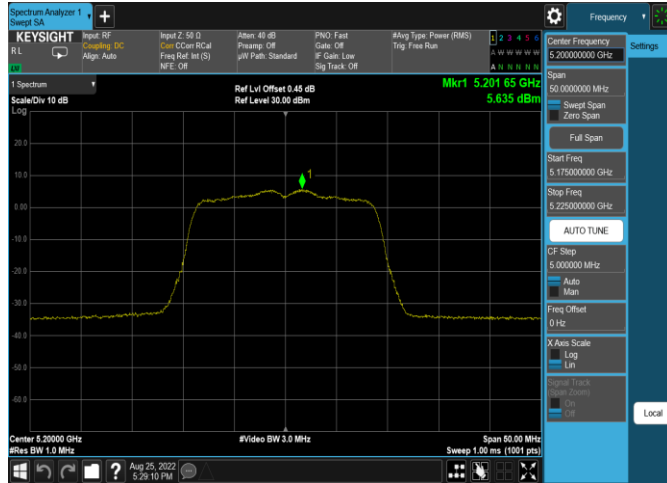
Plot 7-566. ISSED PSD CDD Antenna 4a (160MHz BW 11ac – Ch.50, MCS2)



Plot 7-567. ISSED PSD CDD Antenna 5b (160MHz BW 11ax (SU) – Ch.50, MCS2)

FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 189 of 365

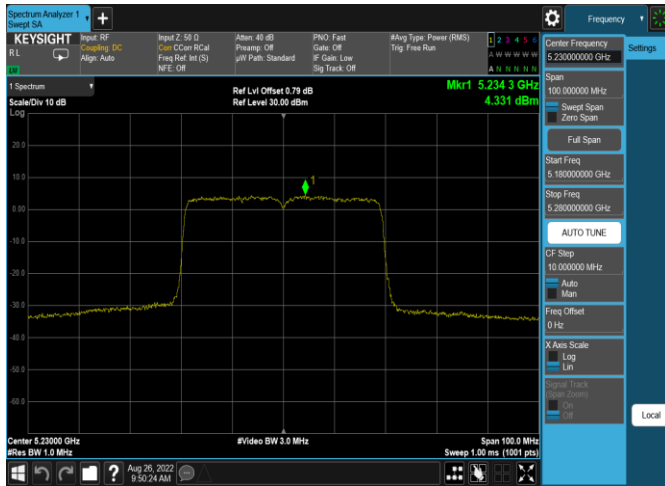
Mid Data Rate



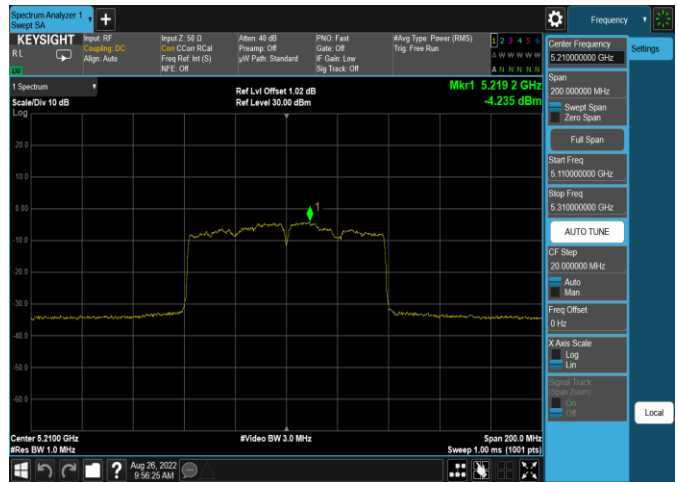
FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 190 of 365

V 10.5 12/15/2021

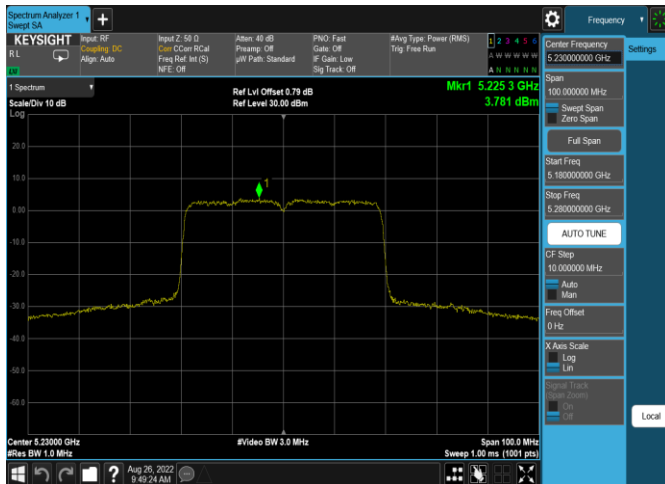
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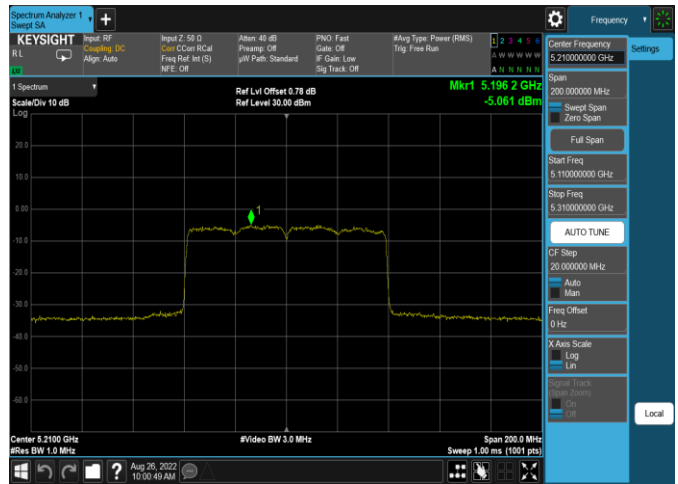
Plot 7-575. ISSED PSD SDM Antenna 5b (40MHz BW 11ax(SU) – Ch.46, MCS4)



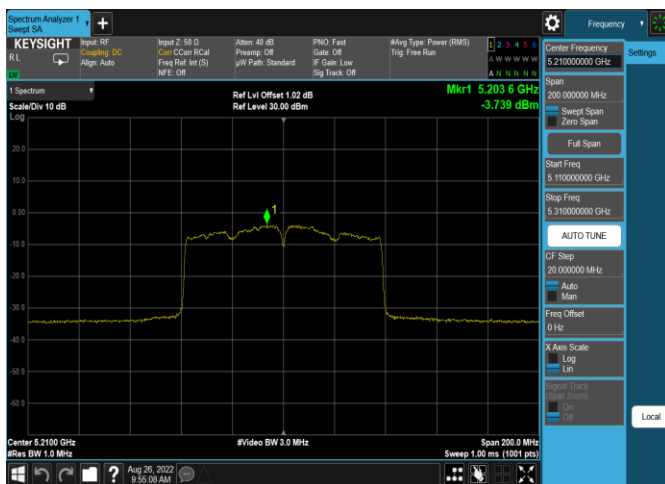
Plot 7-578. ISSED PSD Antenna 4a (80MHz BW 11ac – Ch.42, MCS4)



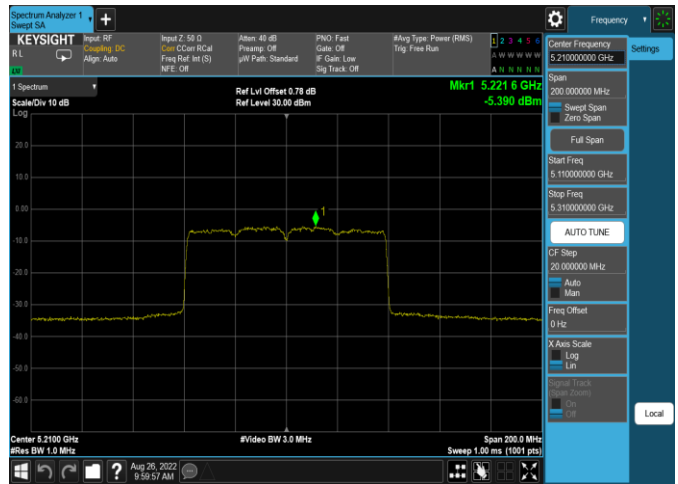
Plot 7-576. ISSED PSD SDM Antenna 4a (40MHz BW 11ax(SU) – Ch.46, MCS4)



Plot 7-579. ISSED PSD CDD Antenna 5b (80MHz BW 11ax (SU) – Ch.42, MCS4)

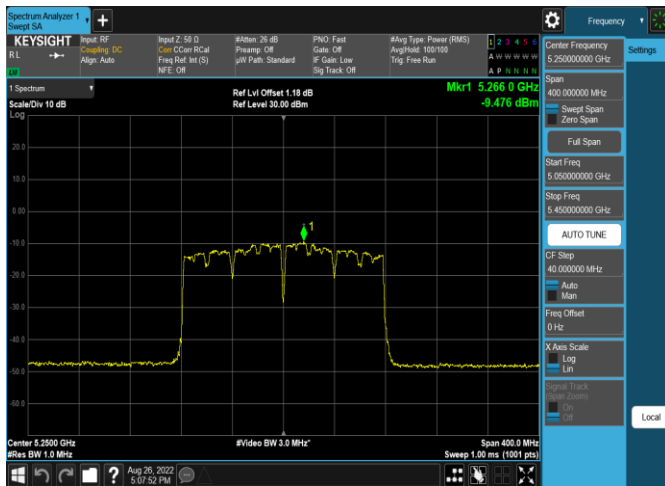


Plot 7-577. ISSED PSD CDD Antenna 5b (80MHz BW 11ac – Ch.42, MCS4)

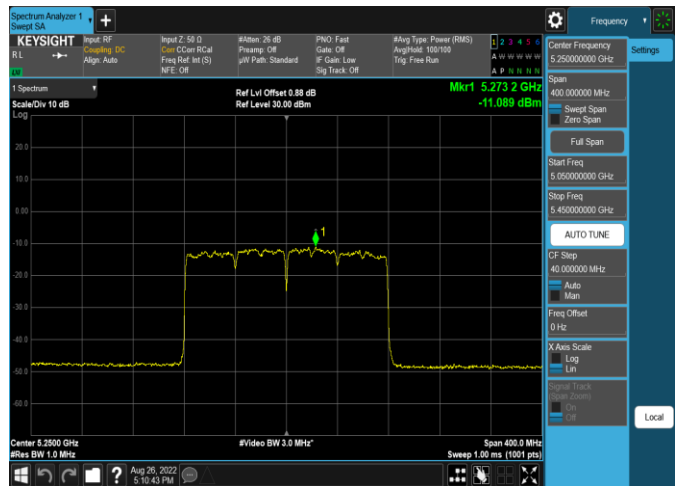


Plot 7-580. ISSED PSD CDD Antenna 4a (80MHz BW 11ax (SU) – Ch.42, MCS4)

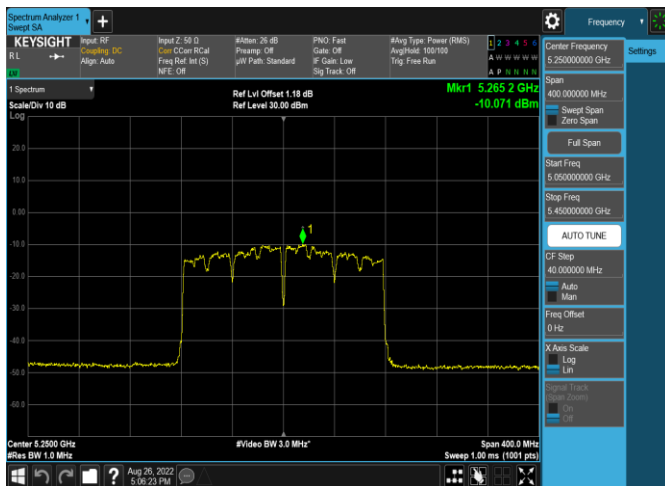
FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 191 of 365



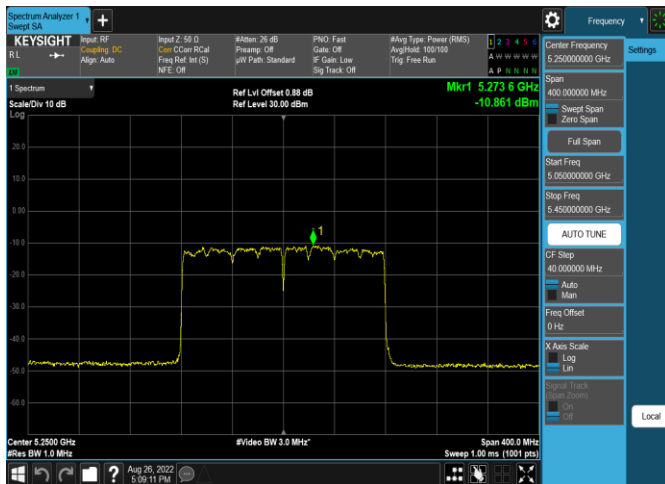
Plot 7-581. ISD PSD CDD Antenna 5b (160MHz BW 11ac – Ch.50, MCS4)



Plot 7-584. ISD PSD CDD Antenna 4a (160MHz BW 11ax (SU) – Ch.50, MCS4)



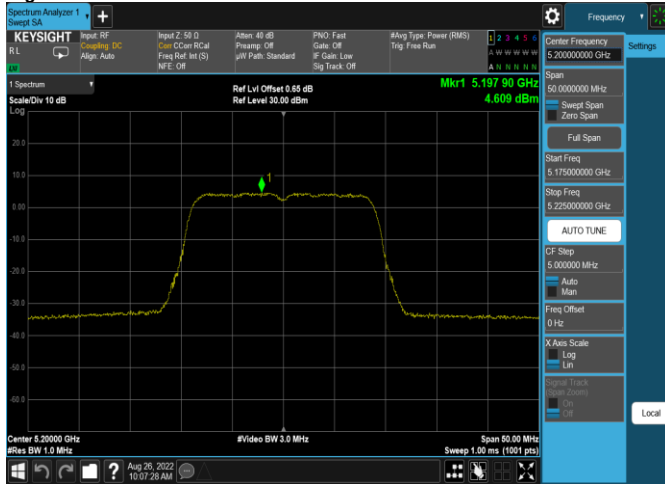
Plot 7-582. ISD PSD CDD Antenna 4a (160MHz BW 11ac – Ch.50, MCS4)



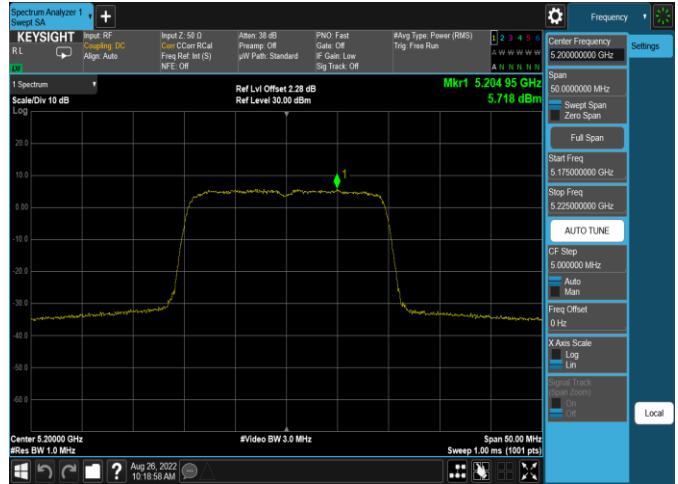
Plot 7-583. ISD PSD CDD Antenna 5b (160MHz BW 11ax (SU) – Ch.50, MCS4)

FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 192 of 365

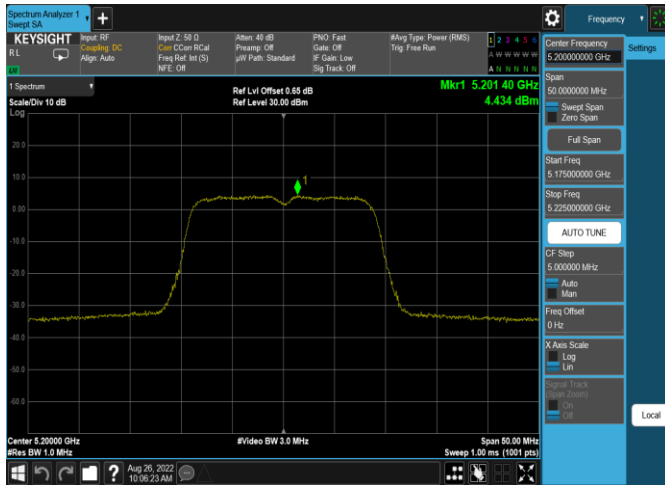
High Data Rate



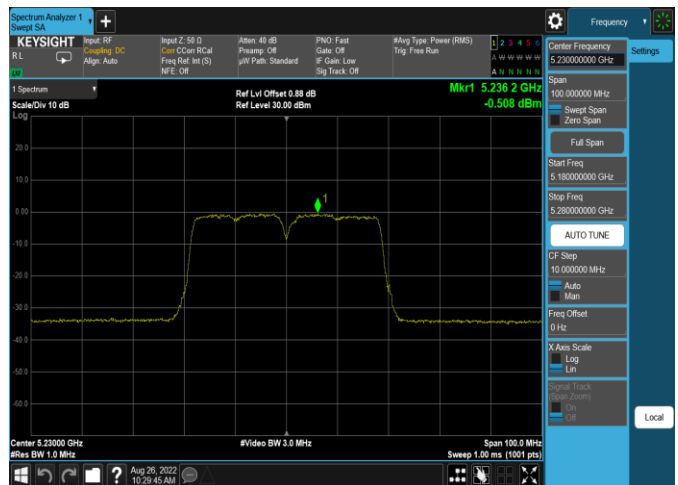
Plot 7-585. ISED PSD SDM Antenna 5b (20MHz BW 11n - Ch.40, MCS15)



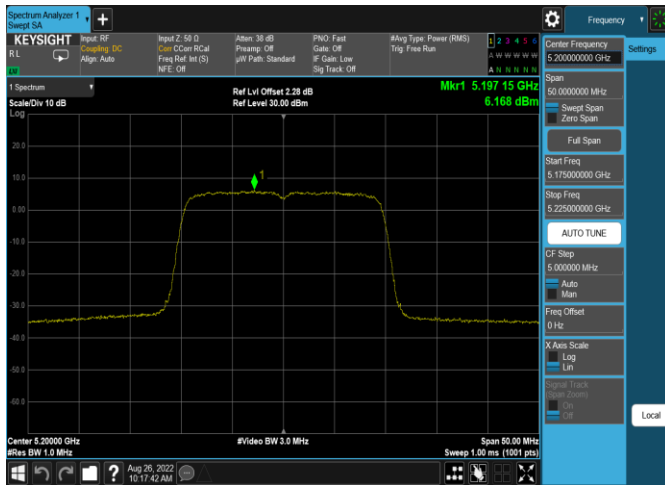
Plot 7-588. ISED PSD SDM Antenna 4a (20MHz BW 11ax(SU) - Ch.40, MCS11)



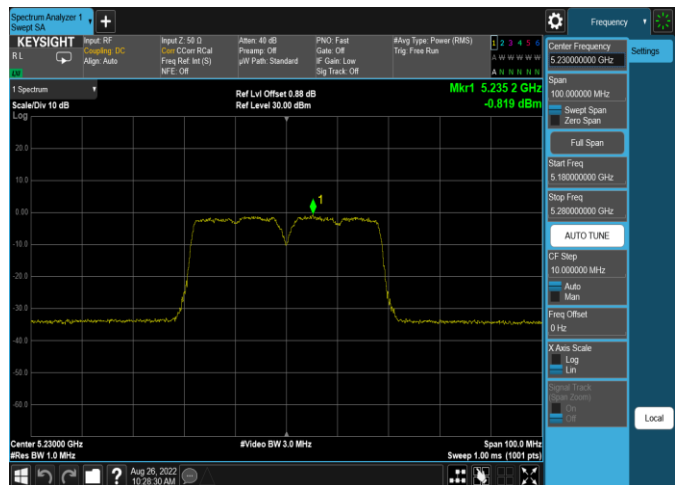
Plot 7-586. ISED PSD SDM Antenna 4a (20MHz BW 11n - Ch.40, MCS15)



Plot 7-589. ISED PSD SDM Antenna 5b (40MHz BW 11n - Ch.46, MCS15)



Plot 7-587. ISED PSD SDM Antenna 5b (20MHz BW 11ax(SU) - Ch.40, MCS11)



Plot 7-590. ISED PSD SDM Antenna 4a (40MHz BW 11n - Ch.46, MCS15)

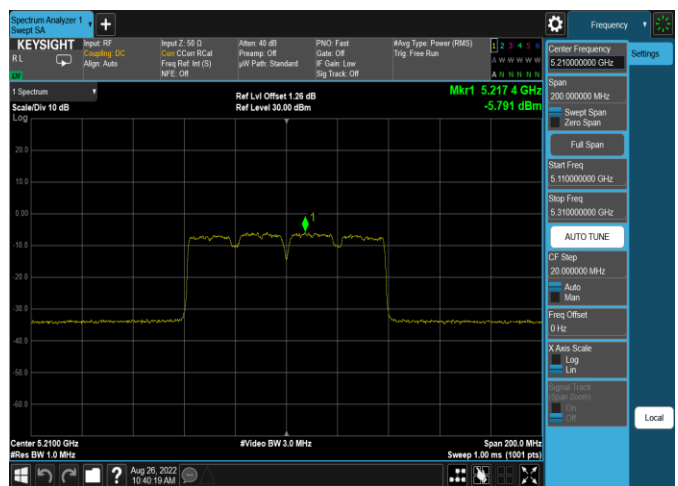
FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 193 of 365

V 10.5 12/15/2021

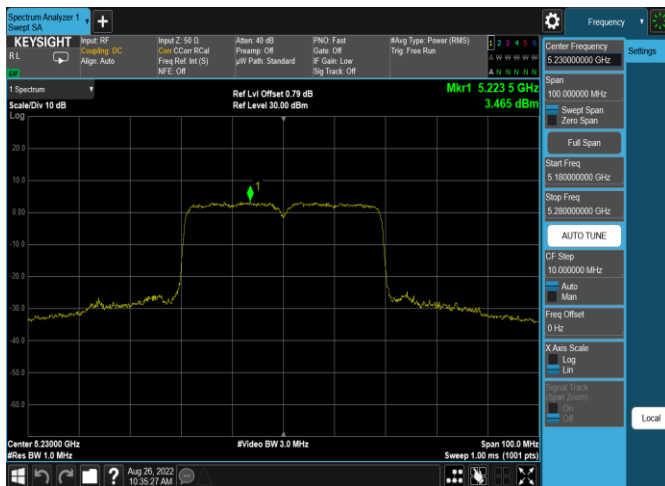
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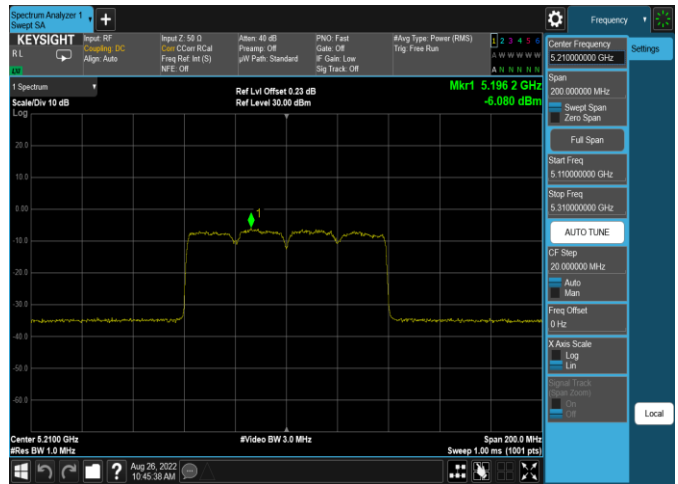
Plot 7-591. ISED PSD SDM Antenna 5b (40MHz BW 11ax(SU) - Ch.46, MCS11)



Plot 7-594. ISED PSD CDD Antenna 4a (80MHz BW 11ac - Ch.42, MCS9)



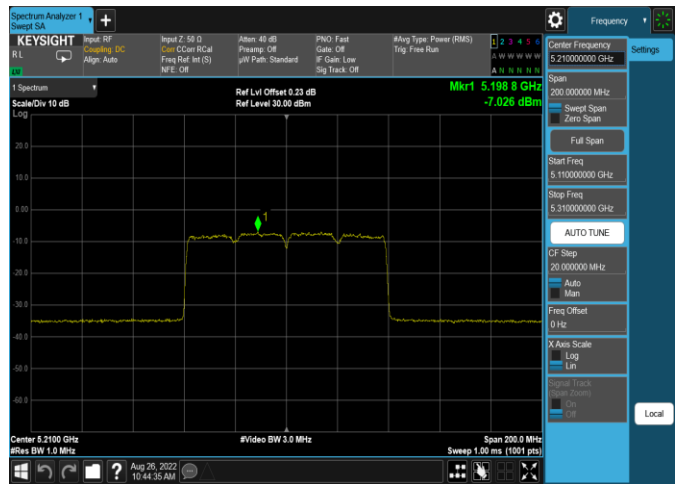
Plot 7-592. ISED PSD SDM Antenna 4a (40MHz BW 11ax(SU) - Ch.46, MCS11)



Plot 7-595. ISED PSD CDD Antenna 5b (80MHz BW 11ax(SU) - Ch.42, MCS11)

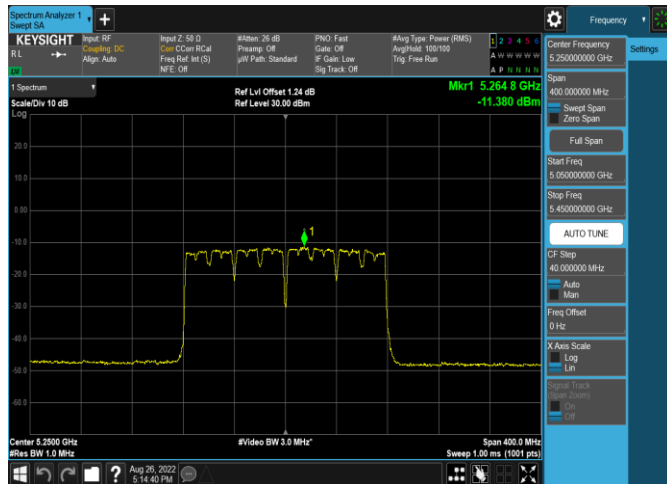


Plot 7-593. ISED PSD CDD Antenna 5b (80MHz BW 11ac - Ch.42, MCS9)

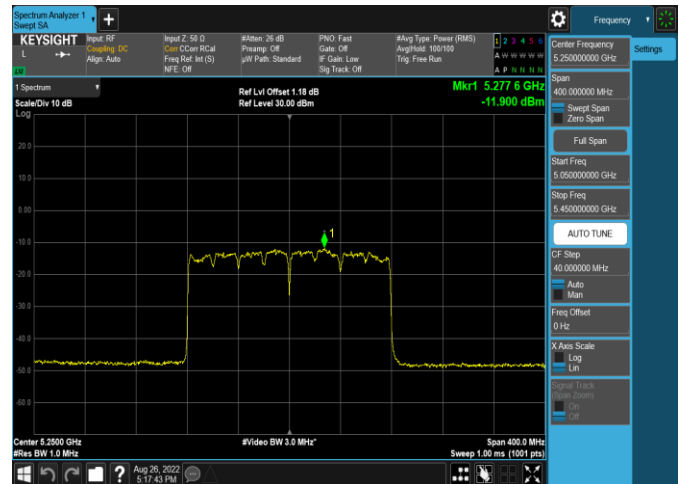


Plot 7-596. ISED PSD CDD Antenna 5b (80MHz BW 11ax(SU) - Ch.42, MCS11)

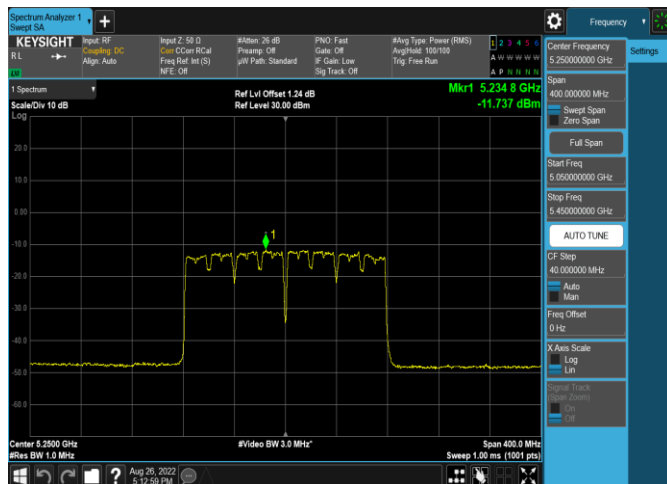
FCC ID: BCGA2764 IC: 579C-A2764			MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 194 of 365	



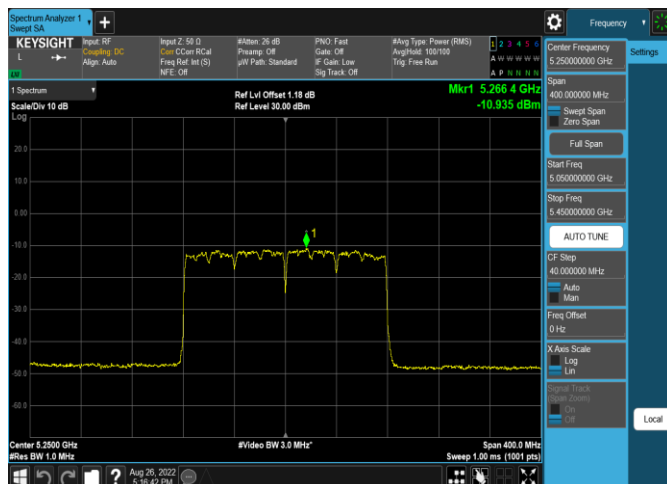
Plot 7-597. ISED PSD CDD Antenna 5b (160MHz BW 11ac – Ch.50, MCS9)



Plot 7-600. ISED PSD CDD Antenna 4a (160MHz BW 11ax (SU) – Ch.50, MCS11)



Plot 7-598. ISED PSD CDD Antenna 4a (160MHz BW 11ac – Ch.50, MCS9)



Plot 7-599. ISED PSD CDD Antenna 5b (160MHz BW 11ax (SU) – Ch.50, MCS11)

FCC ID: BCGA2764 IC: 579C-A2764	 MEASUREMENT REPORT (CERTIFICATION)		Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 195 of 365

V 10.5 12/15/2021

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Note:

Per ANSI C63.10-2013 Section 14.3.2.2 and KDB 662911 v02r01 Section E)2), the power spectral density at Antenna 5b and Antenna 4a were first measured separately as shown in the section above. The measured values were then summed in linear power units then converted back to dBm.

Sample Directional Gain Calculation:

For correlated signals, assuming the antenna gain is 4.7 dBi for Antenna 5b and 0.6 dBi for Antenna 4a.

$$\begin{aligned}\text{Directional gain} &= 10 \log[(10^{G_1/20} + 10^{G_2/20} + \dots + 10^{G_N/20})^2 / N_{\text{ANT}}] \text{ dBi} \\ &= 10 \log[(10^{4.7/20} + 10^{0.6/20} / 2] \text{ dBi} \\ &= 5.90 \text{ dBi}\end{aligned}$$

For uncorrelated signals, assuming the antenna gain is 4.7 dBi for Antenna 5b and 0.6 dBi for Antenna 4a.

$$\begin{aligned}\text{Directional gain} &= 10 \log[(10^{G_1/10} + 10^{G_2/10} + \dots + 10^{G_N/10}) / N_{\text{ANT}}] \text{ dBi} \\ &= 10 \log[(10^{4.7/10} + 10^{0.6/10} / 2] \text{ dBi} \\ &= 3.12 \text{ dBi}\end{aligned}$$

Sample CDD/SDM Calculation:

At 5180MHz in 802.11n (20MHz BW) mode, the average conducted power spectral density was measured to be 6.29 dBm for Antenna 4a and 6.93 dBm for Antenna 4a.

$$\text{Antenna 5b} + \text{Antenna 4a} = \text{CDD/SDM}$$

$$(6.29 \text{ dBm} + 6.93 \text{ dBm}) = (4.25 \text{ mW} + 4.93 \text{ mW}) = 9.18 \text{ mW} = 9.63 \text{ dBm}$$

Sample e.i.r.p Power Spectral Density Calculation:

At 5180MHz in 802.11n (20MHz BW) mode, the average CDD/SDM power density was calculated to be 9.63 dBm with directional gain of 0.93 dBi.

$$\text{e.i.r.p. Power Spectral Density(dBm)} = \text{Power Spectral Density (dBm)} + \text{Ant gain (dBi)}$$

$$9.63 \text{ dBm} + 0.93 \text{ dBi} = 17.16 \text{ dBm}$$

FCC ID: BCGA2764 IC: 579C-A2764	 MEASUREMENT REPORT (CERTIFICATION)		Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 196 of 365

V 10.5 12/15/2021

7.6 Radiated Spurious Emissions – Above 1GHz

§15.407(b) §15.205 §15.209; RSS-Gen [8.9]

Test Overview and Limit

All out of band radiated spurious emissions are measured with a spectrum analyzer connected to a receive antenna while the EUT is operating at its maximum duty cycle, at its maximum power control level, as defined in ANSI C63.10-2013 and KDB 789033 D02 v02r01, and at the appropriate frequencies. All channels, modes (e.g. 802.11a, 802.11n, 802.11ax(SU) (20MHz BW), 802.11n, 802.11ax(SU) (40MHz BW), and 802.11ac, 802.11ax(SU) (80MHz/160MHz BW), and modulations/data rates were investigated among all UNII bands. Only the radiated emissions of the configuration that produced the worst case emissions are reported in this section.

For transmitters operating in the 5.15-5.25 GHz and 5.25-5.35 GHz band: All emissions outside of the 5.15-5.35 GHz band shall not exceed an EIRP of -27 dBm/MHz.

For transmitters operating in the 5.47-5.725 GHz band: All emissions outside of the 5.47-5.725 GHz band shall not exceed an EIRP of -27 dBm/MHz.

For transmitters operating in the 5.725-5.85 GHz band: All emissions shall be limited to a level of -27 dBm/MHz at 75 MHz or more above or below the band edge increasing linearly to 10 dBm/MHz at 25 MHz above or below the band edge, and from 25 MHz above or below the band edge increasing linearly to a level of 15.6 dBm/MHz at 5 MHz above or below the band edge, and from 5 MHz above or below the band edge increasing linearly to a level of 27 dBm/MHz at the band edge.

All out of band emissions appearing in a restricted band as specified in Section 15.205 of the Title 47 CFR and Table 7 of RSS-Gen (8.10) must not exceed the limits shown in Table 7-143 per Section 15.209 and RSS-Gen (8.9).

Frequency	Field Strength [μ V/m]	Measured Distance [Meters]
Above 960.0 MHz	500	3

Table 7-143. Radiated Limits

Test Procedures Used

ANSI C63.10-2013 – Sections 12.7.7.2, 12.7.6, 12.7.5
KDB 789033 D02 v02r01 – Section G

Test Settings

Average Field Strength Measurements

1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = 1MHz
3. VBW = 3MHz
4. Detector = power average (RMS)
5. Number of measurement points = 1001 (Number of points must be $\geq 2 \times \text{span/RBW}$)
6. Averaging type = power (RMS)
7. Sweep time = auto couple
8. Trace was averaged over 100 sweeps

FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 197 of 365

V 10.5 12/15/2021

Peak Field Strength Measurements

1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = 1MHz
3. VBW = 3MHz
4. Detector = peak
5. Sweep time = auto couple
6. Trace mode = max hold
7. Trace was allowed to stabilize

Test Setup

The EUT and measurement equipment were set up as shown in the diagram below.

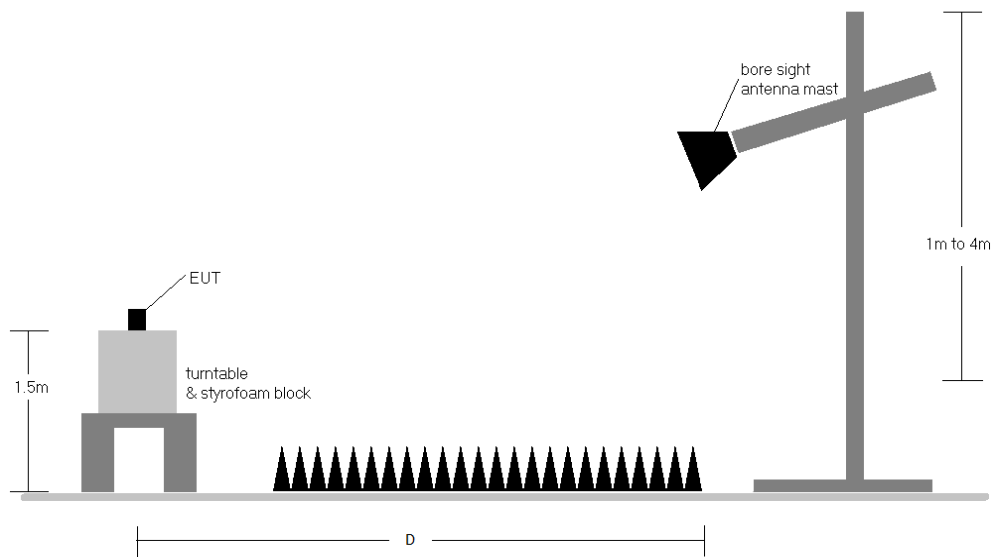


Figure 7-5. Test Instrument & Measurement Setup

FCC ID: BCGA2764 IC: 579C-A2764			MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 198 of 365	

V 10.5 12/15/2021

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Test Notes

1. All emissions that lie in the restricted bands (denoted by a * next to the frequency) specified in §15.205 and Section 8.10 of RSS-Gen are below the limit shown in Table 7-143.
2. All spurious emissions lying in restricted bands specified in §15.205 and Section 8.10 of RSS-Gen are below the limit shown in Table 7-143. All spurious emissions that do not lie in a restricted band are subject to a peak limit of -27dBm/MHz. At a distance of 3 meters, the field strength limit in dBμV/m can be determined by adding a “conversion” factor of 95.2dB to the EIRP limit of -27dBm/MHz to obtain the limit for out of band spurious emissions of 68.2dBμV/m.
3. The antenna is manipulated through typical positions, polarity and length during the tests. The EUT is manipulated through three orthogonal planes.
4. This unit was tested with its standard battery.
5. The spectrum is measured from 9kHz to the 10th harmonic of the fundamental frequency of the transmitter using CISPR quasi peak detector below 1GHz. Above 1 GHz, average and peak measurements were taken using linearly polarized horn antennas.
6. D is the measurement test distance and emissions 1-18GHz were measured at a 3 meters test distance while emissions above 18GHz were measured at a 1 meter test distance with the application of a distance correction factor.
7. The wide spectrum spurious emissions plots shown on the following pages are used only for the purpose of emission identification. Any emissions found to be within 20dB of the limit are fully investigated and the results are shown in this section.
8. All data rates were investigated and only the worse case is reported
9. The unit was tested with all possible modes and only the highest emission is reported.
10. The "-" shown in the following RSE tables are used to denote a noise floor measurement.
11. Per RSS-247 Section 6.2.3, transmission on channels which overlap the 5600-5650 MHz is prohibited. This device operates under these frequencies only under the control of a certified master device and does not support active scanning on these channels. This device does not transmit any beacons or initiate any transmissions in UNII Bands 2A or 2C.

Sample Calculations

Determining Spurious Emissions Levels

- Field Strength Level $[\text{dB}\mu\text{V/m}] = \text{Analyzer Level} [\text{dBm}] + 107 + \text{AFCL} [\text{dB/m}]$
- $\text{AFCL} [\text{dB/m}] = \text{Antenna Factor} [\text{dB/m}] + \text{Cable Loss} [\text{dB}] - \text{Preamplifier Gain} [\text{dB}]$
- $\text{Margin} [\text{dB}] = \text{Field Strength Level} [\text{dB}\mu\text{V/m}] - \text{Limit} [\text{dB}\mu\text{V/m}]$

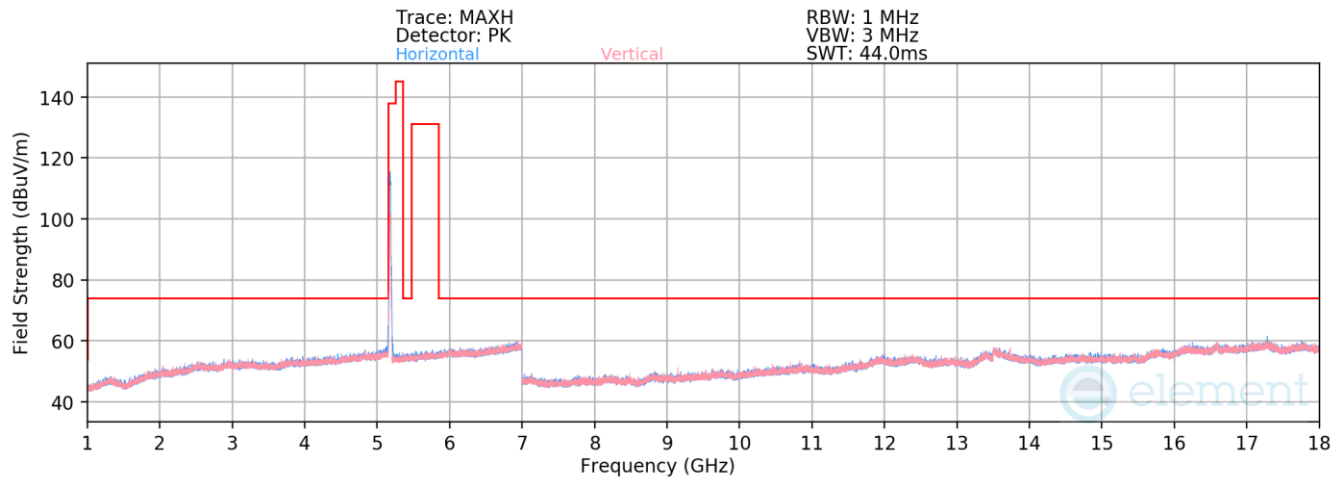
Radiated Band Edge Measurement Offset

- The amplitude offset shown in the radiated restricted band edge plots in Section 7.6 was calculated using the formula:
Offset (dB) = (Antenna Factor + Cable Loss + Attenuator) – Preamplifier Gain

FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 199 of 365

V 10.5 12/15/2021

7.6.1 Antenna 5b Radiated Spurious Emission



Plot 7-601. Radiated Spurious Emissions above 1GHz Antenna 5b (802.11n – Ch. 36)

Mode: 802.11n
Data Rate: MCS0
Distance of Measurements: 3 Meters
Operating Frequency: 5180MHz
Channel: 36

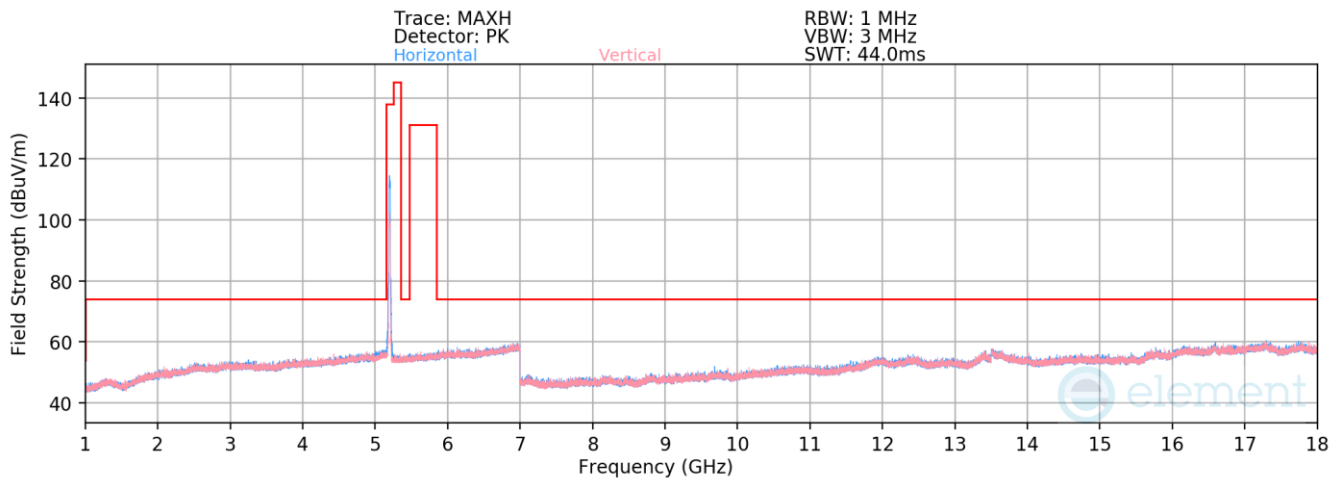
Frequency [MHz]	Detector	Ant. Pol. [H/V]	Antenna Height [cm]	Turntable Azimuth [degree]	Analyzer Level [dBm]	AFCL [dB/m]	Field Strength [dBμV/m]	Limit [dBμV/m]	Margin [dB]
10360.00	Peak	H	-	-	-73.65	18.13	51.48	68.20	-16.72
* 15540.00	Average	H	-	-	-85.01	23.07	45.06	53.98	-8.92
* 15540.00	Peak	H	-	-	-74.15	23.07	55.92	73.98	-18.06

Table 7-144. Radiated Measurements Antenna 5b

FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 200 of 365

V 10.5 12/15/2021

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Plot 7-602. Radiated Spurious Emissions above 1GHz Antenna 5b (802.11n – Ch. 40)

Mode: 802.11n
Data Rate: MCS0
Distance of Measurements: 3 Meters
Operating Frequency: 5200MHz
Channel: 40

*

*

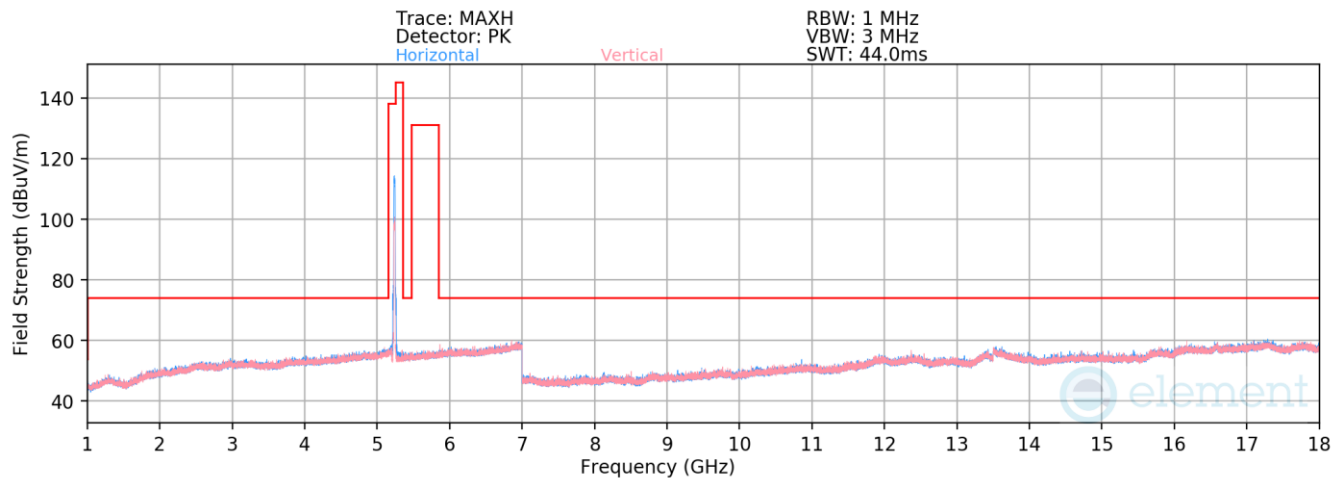
Frequency [MHz]	Detector	Ant. Pol. [H/V]	Antenna Height [cm]	Turntable Azimuth [degree]	Analyzer Level [dBm]	AFCL [dB/m]	Field Strength [dBμV/m]	Limit [dBμV/m]	Margin [dB]
10400.00	Peak	H	-	-	-73.86	17.92	51.06	68.20	-17.14
15600.00	Average	H	-	-	-85.08	23.15	45.07	53.98	-8.91
15600.00	Peak	H	-	-	-74.41	23.15	55.74	73.98	-18.24

Table 7-145. Radiated Measurements Antenna 5b

FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 201 of 365

V 10.5 12/15/2021

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Plot 7-603. Radiated Spurious Emissions above 1GHz Antenna 5b (802.11n – Ch. 48)

Mode: 802.11n
Data Rate: MCS0
Distance of Measurements: 3 Meters
Operating Frequency: 5240MHz
Channel: 48

Frequency [MHz]	Detector	Ant. Pol. [H/V]	Antenna Height [cm]	Turntable Azimuth [degree]	Analyzer Level [dBm]	AFCL [dB/m]	Field Strength [dBμV/m]	Limit [dBμV/m]	Margin [dB]
10480.00	Peak	H	-	-	-74.11	18.33	51.22	68.20	-16.98
* 15720.00	Average	H	-	-	-85.47	24.43	45.96	53.98	-8.02
* 15720.00	Peak	H	-	-	-74.00	24.43	57.43	73.98	-16.55

Table 7-146. Radiated Measurements Antenna 5b

FCC ID: BCGA2764 IC: 579C-A2764		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2205090028-19.BCG	Test Dates: 05/30/2022-09/30/2022	EUT Type: Tablet Device	Page 202 of 365

V 10.5 12/15/2021

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