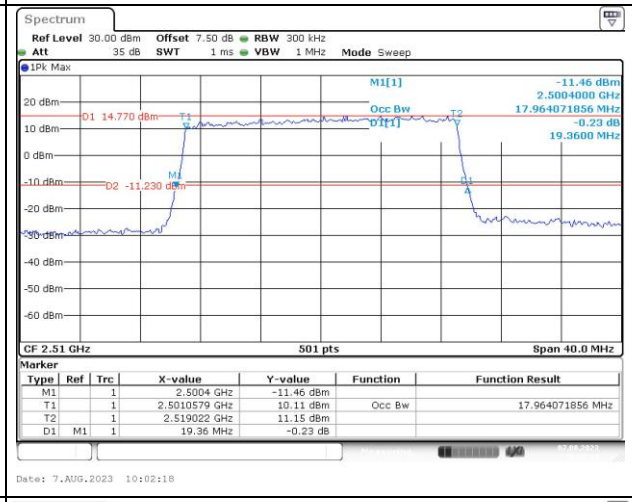
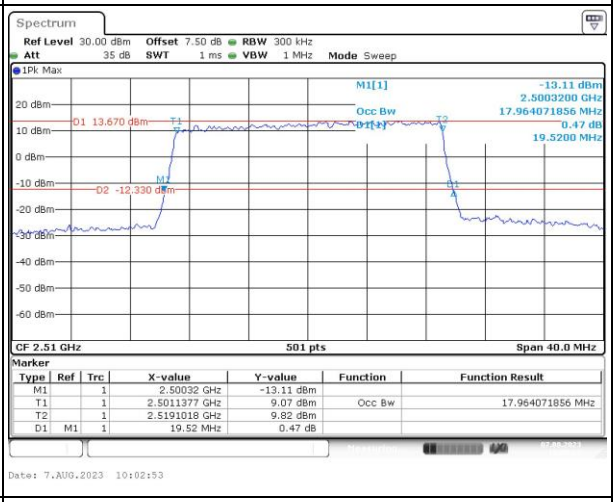
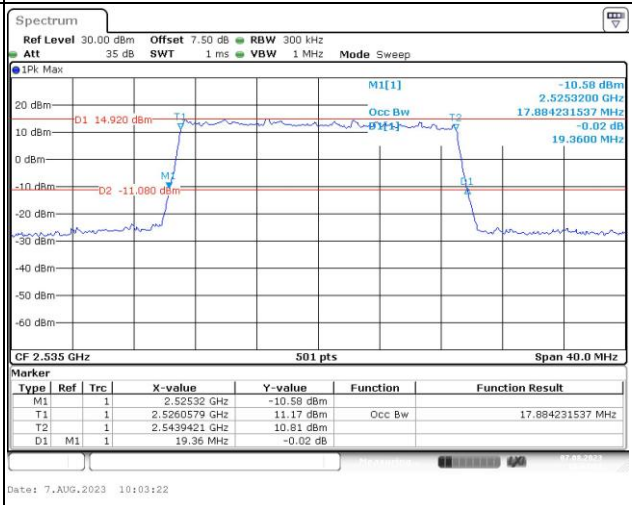
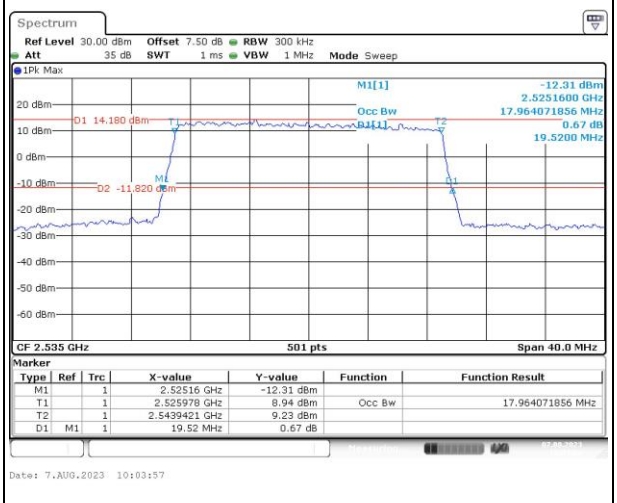
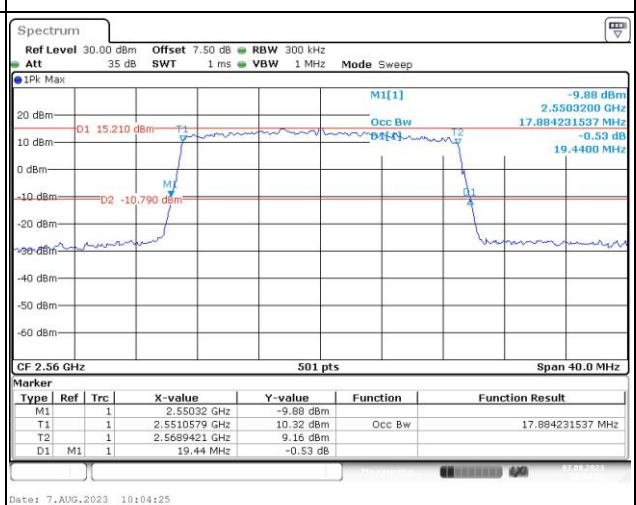
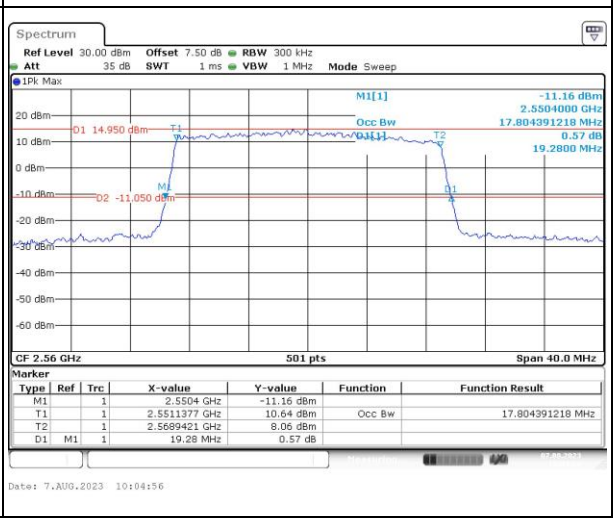
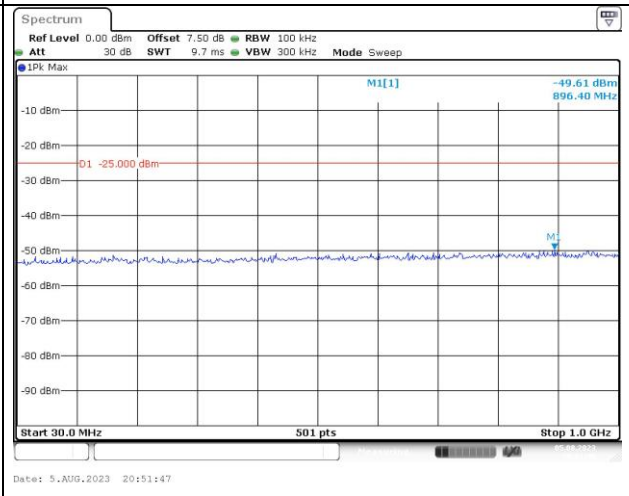
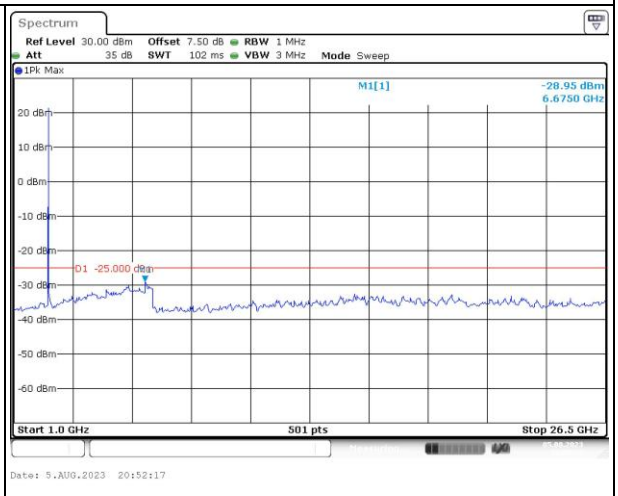
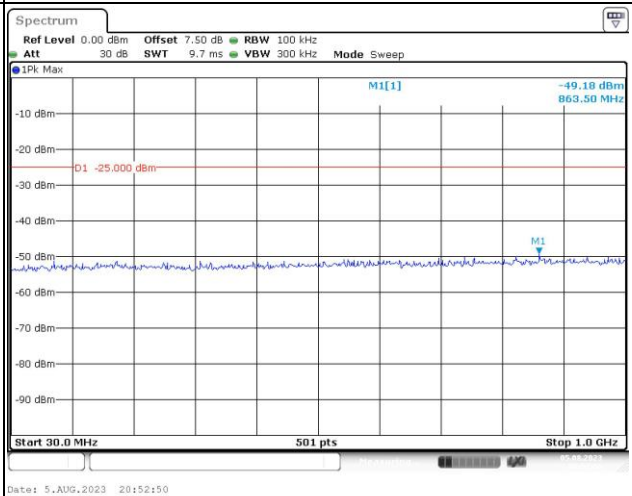
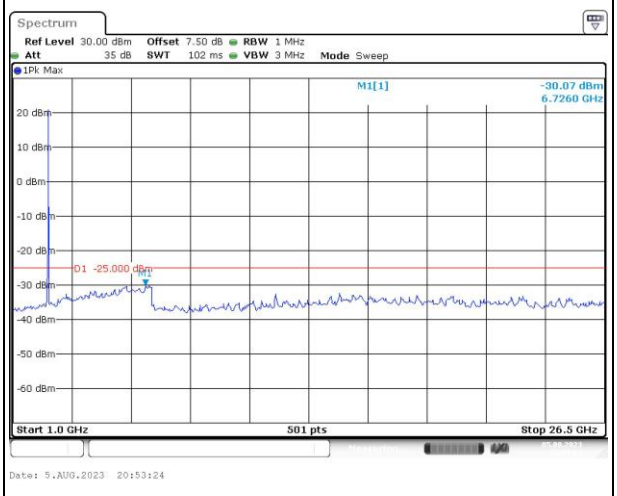
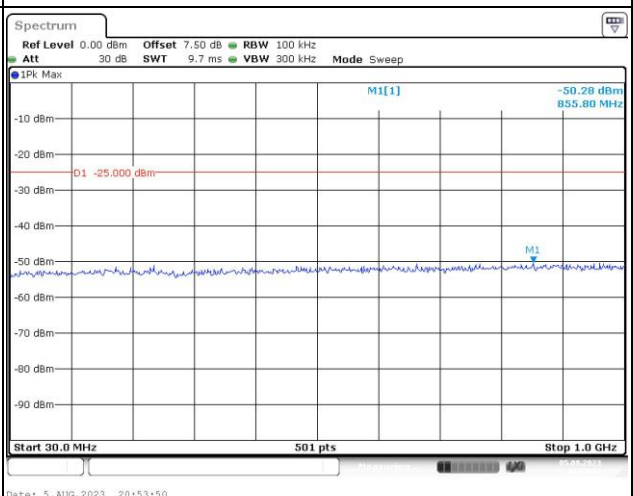
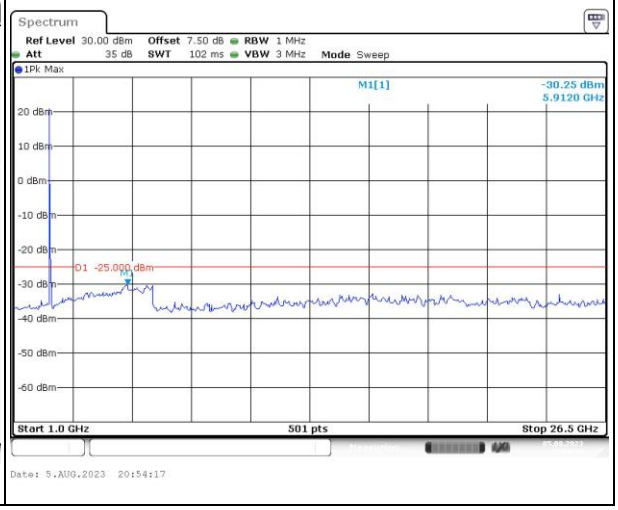
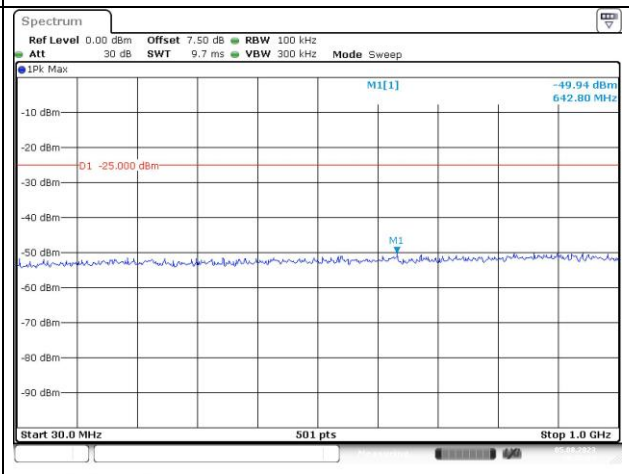
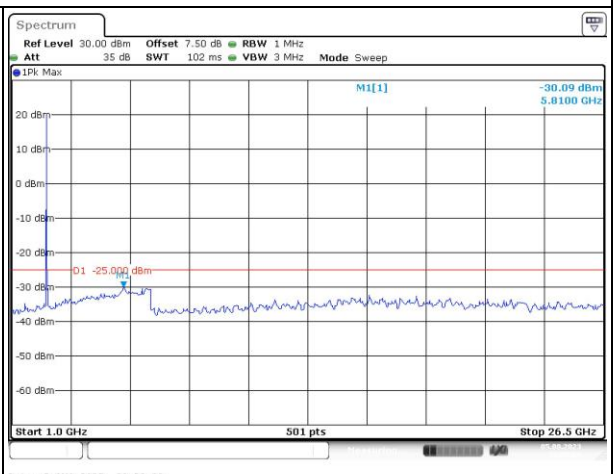
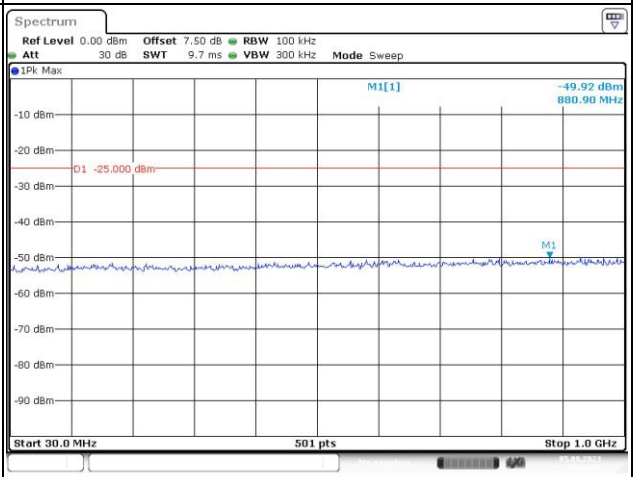
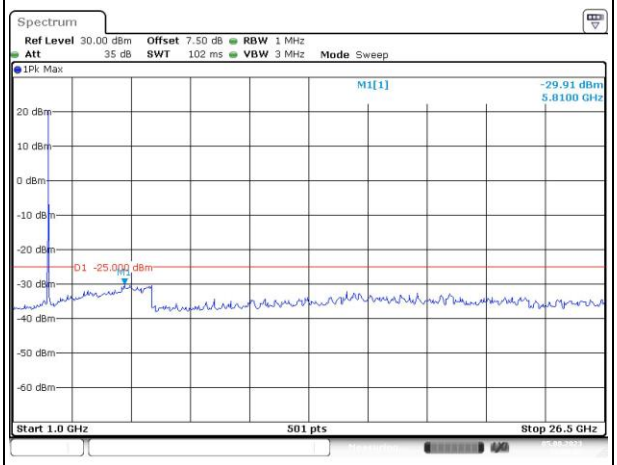
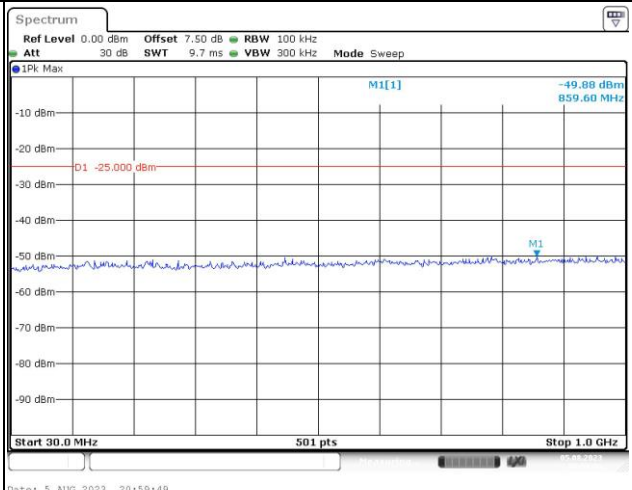
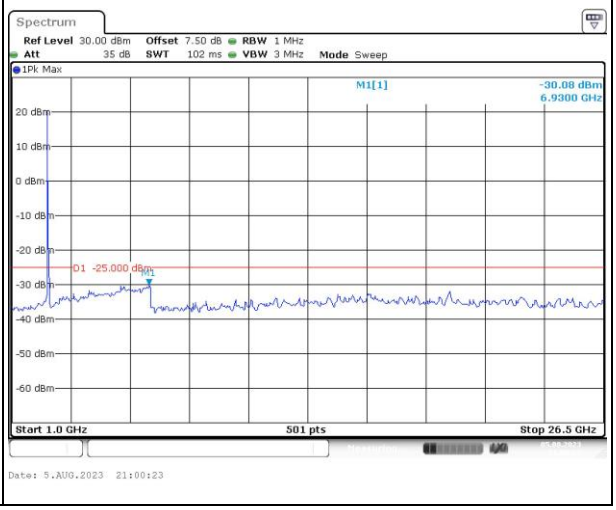
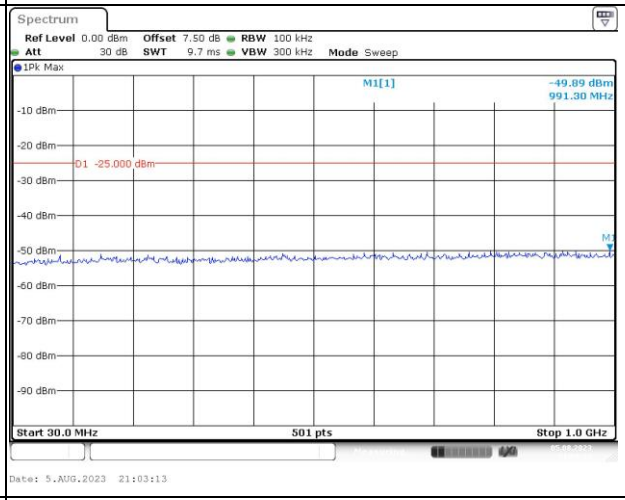
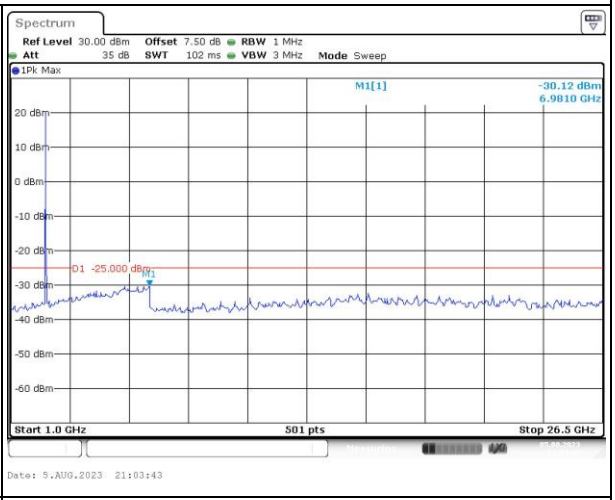
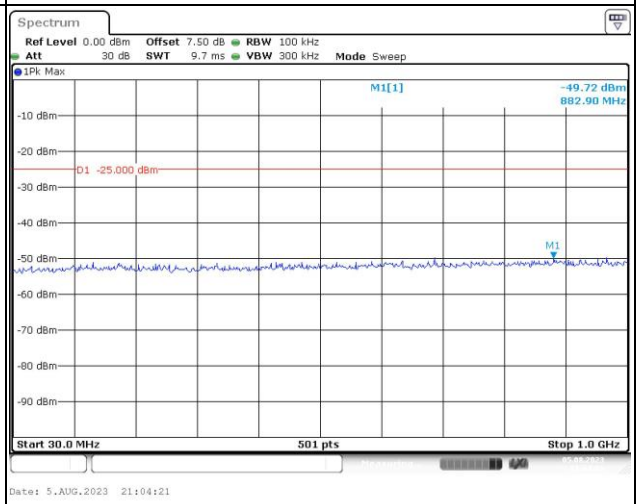
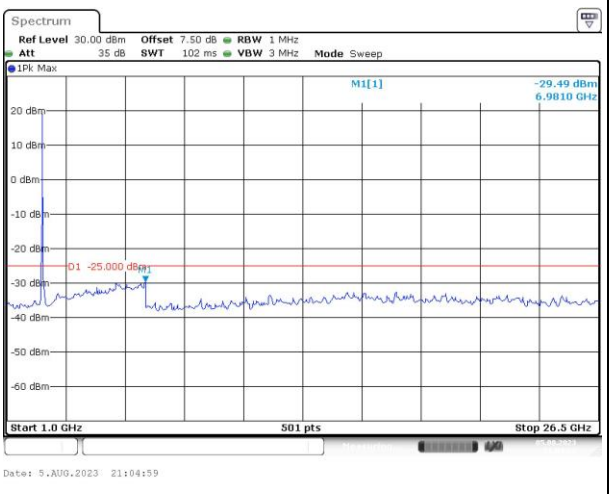
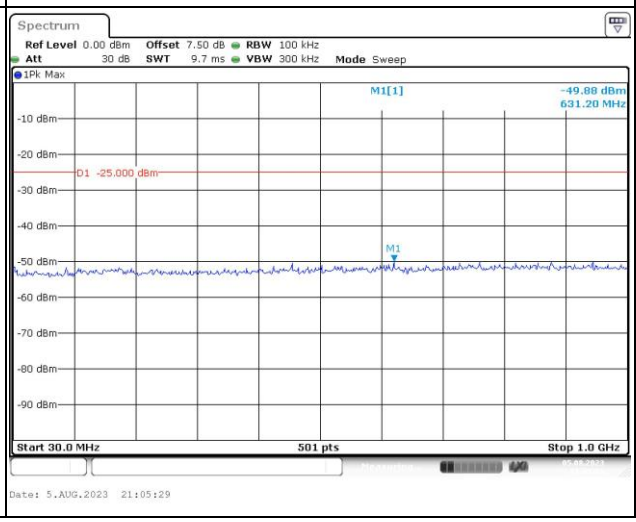
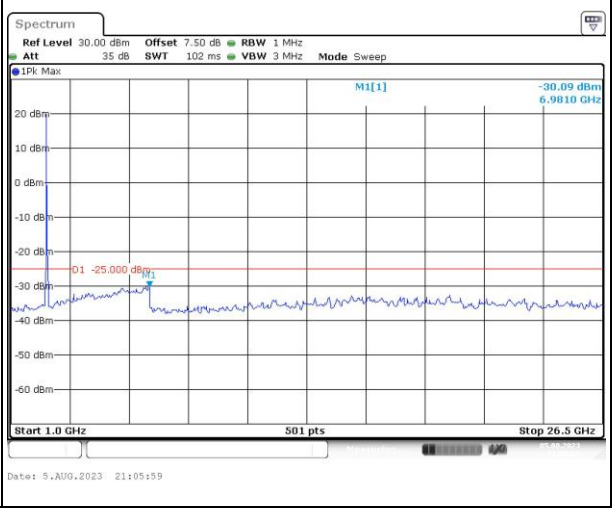
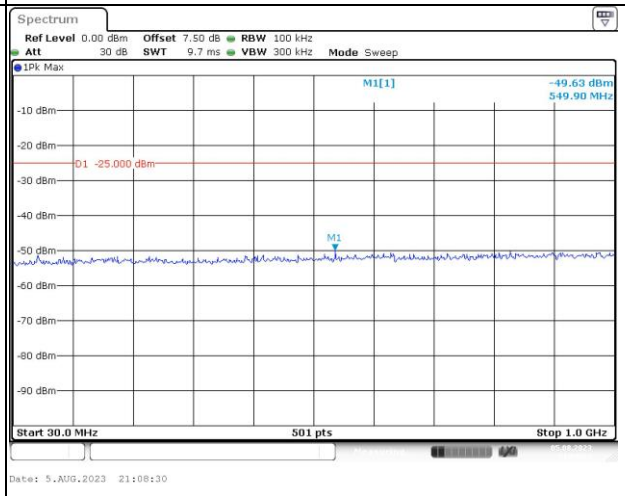
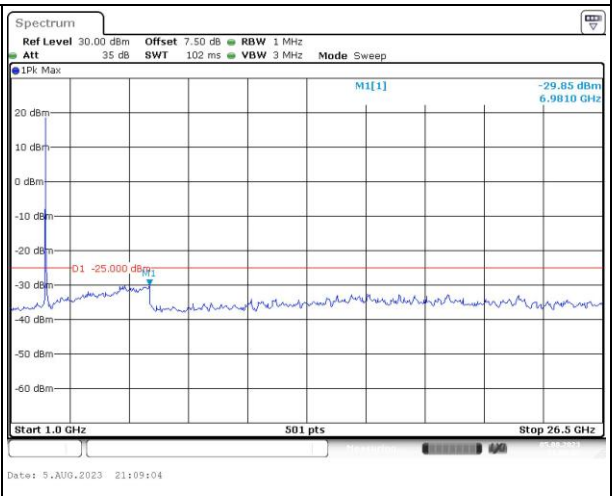
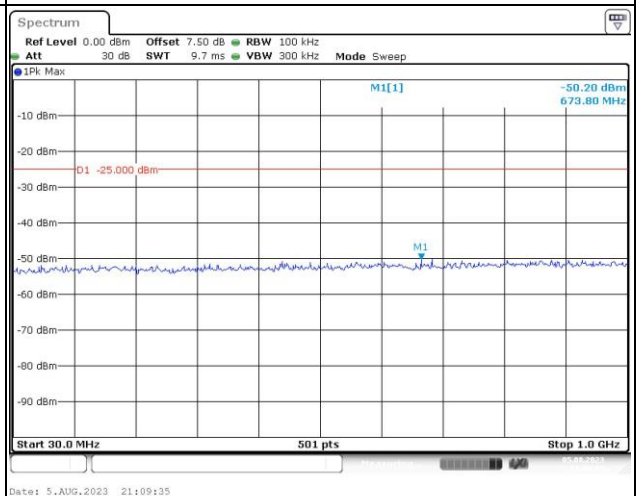
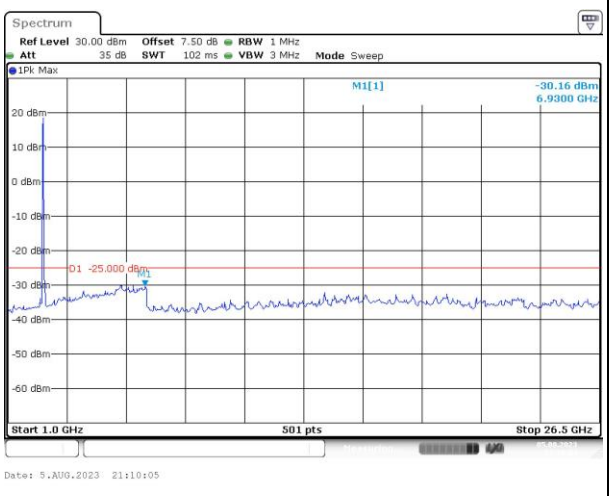
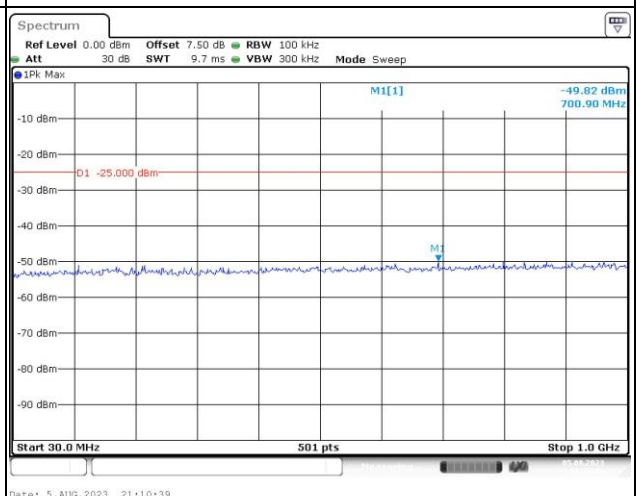
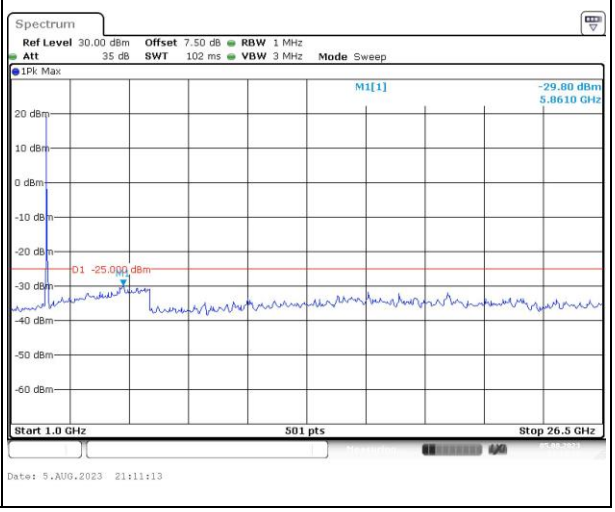
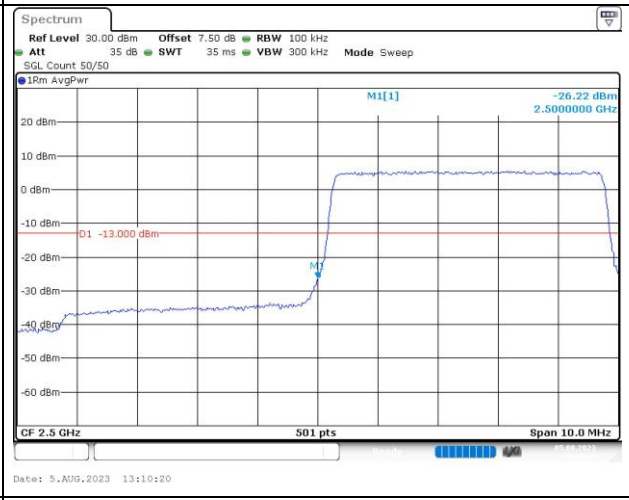
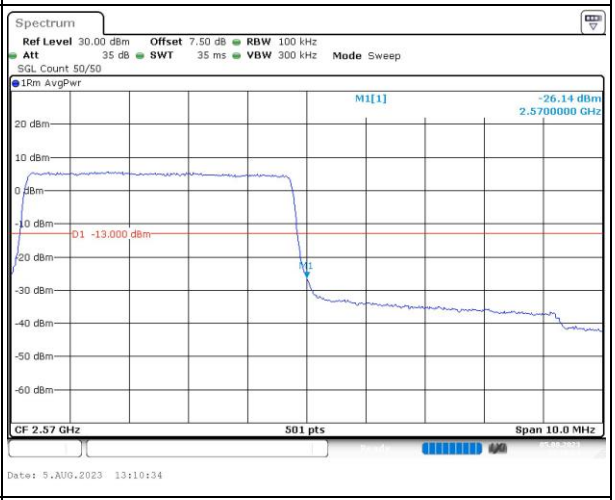
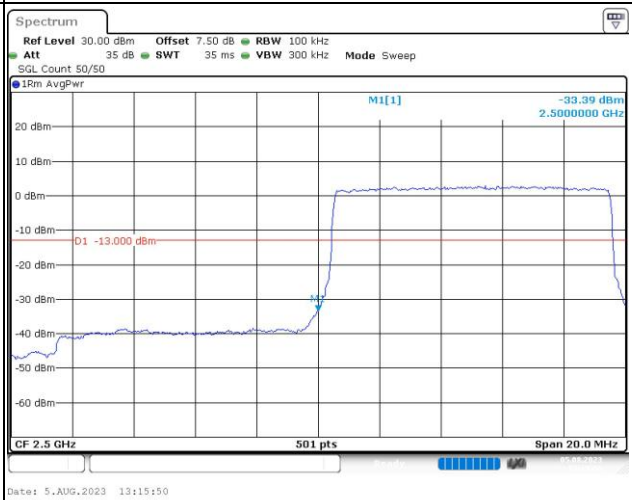
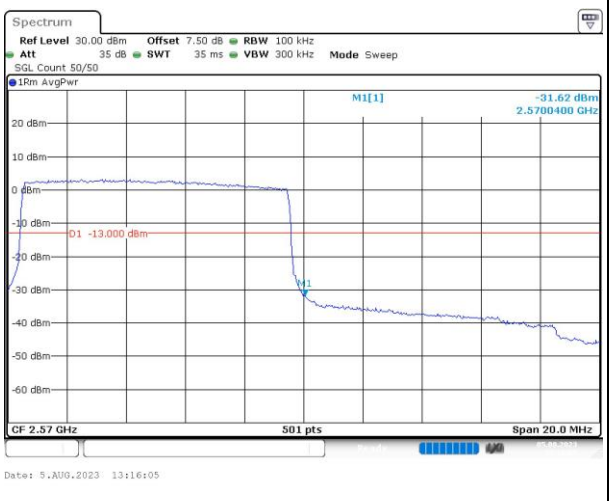
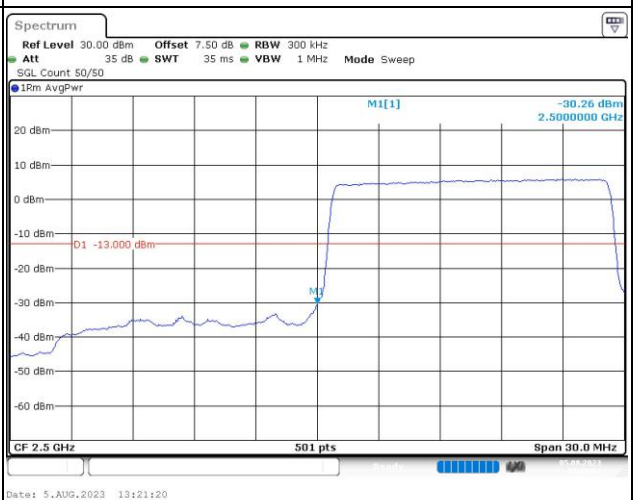
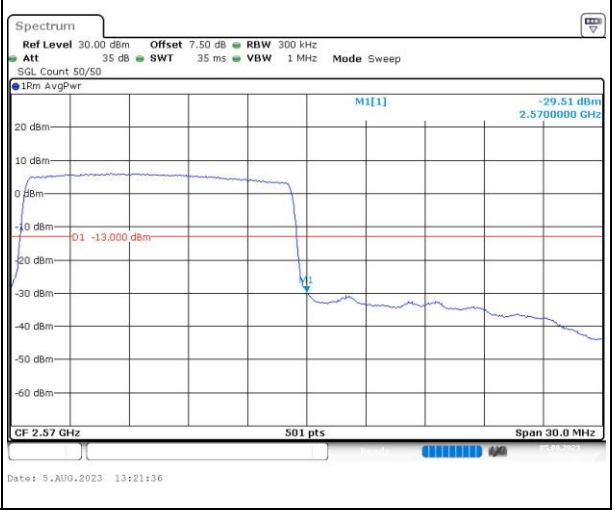
Occupied Bandwidth		
Channel	20MHz Bandwidth QPSK	20MHz Bandwidth 16QAM
Lowest		
Middle		
Highest		

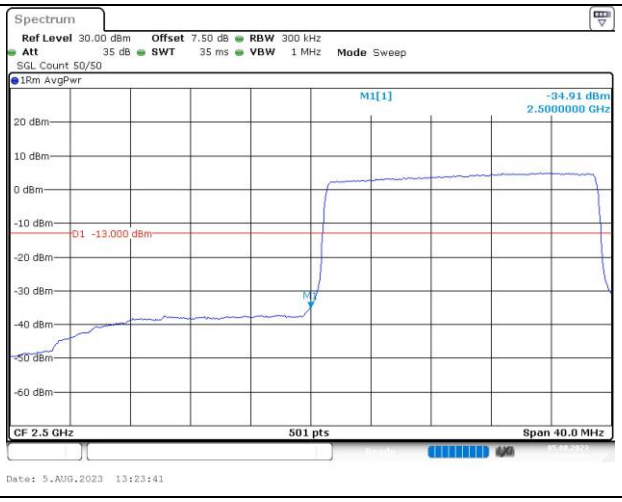
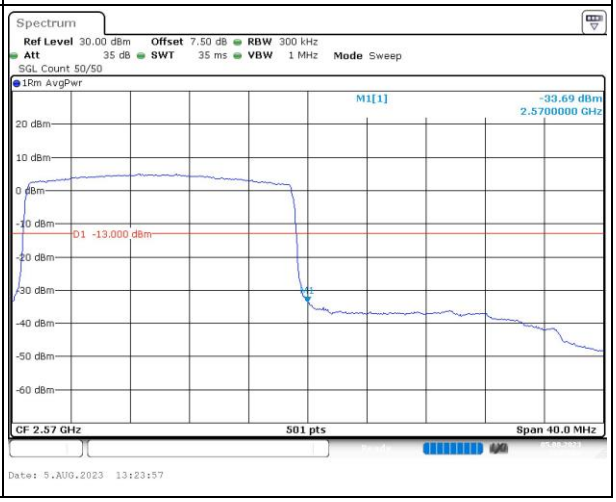
Spurious Emissions at Antenna Terminal		
Channel	**5MHz Bandwidth QPSK**	
Lowest		
Middle		
Highest		

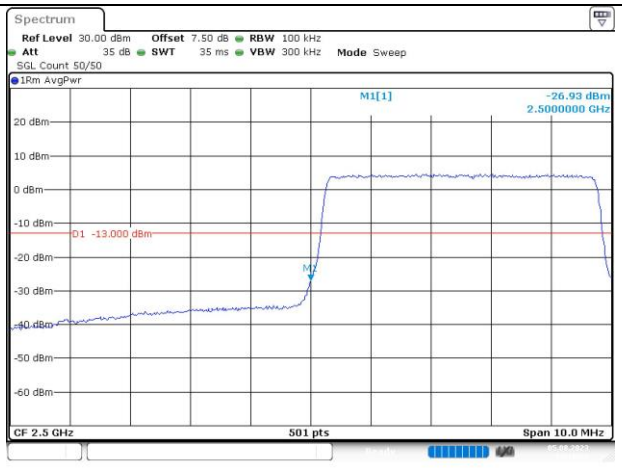
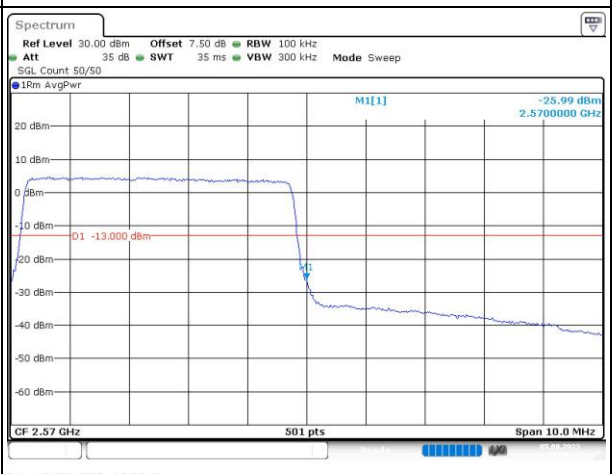
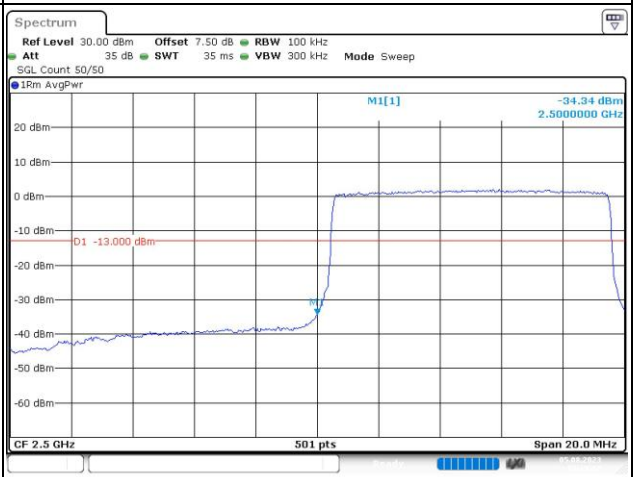
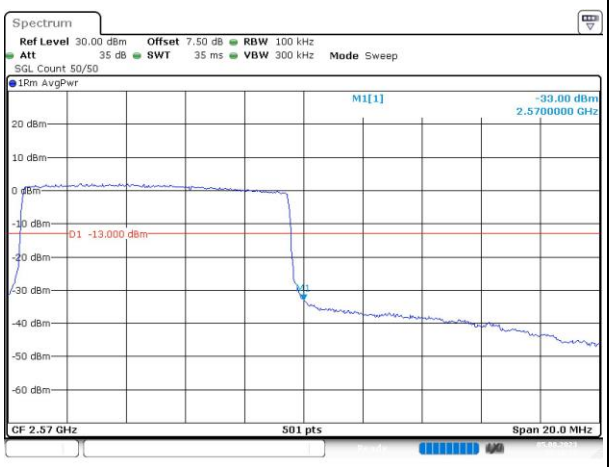
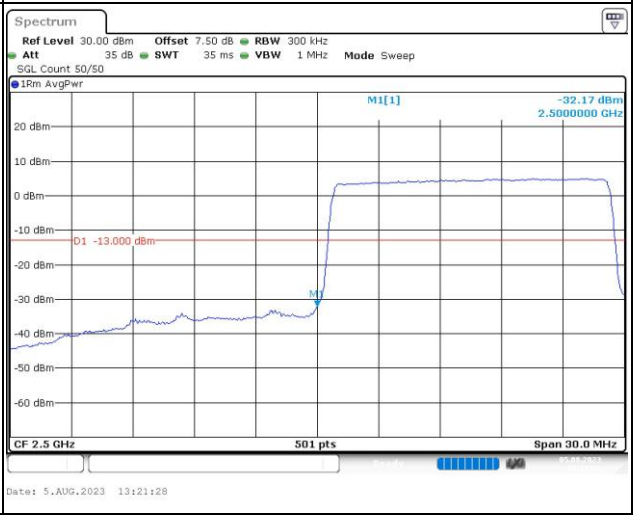
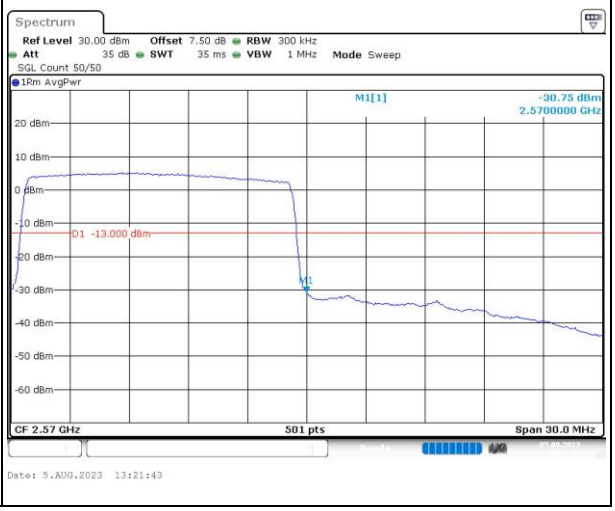
Spurious Emissions at Antenna Terminal		
Channel	**10MHz Bandwidth QPSK**	
Lowest		
Middle		
Highest		

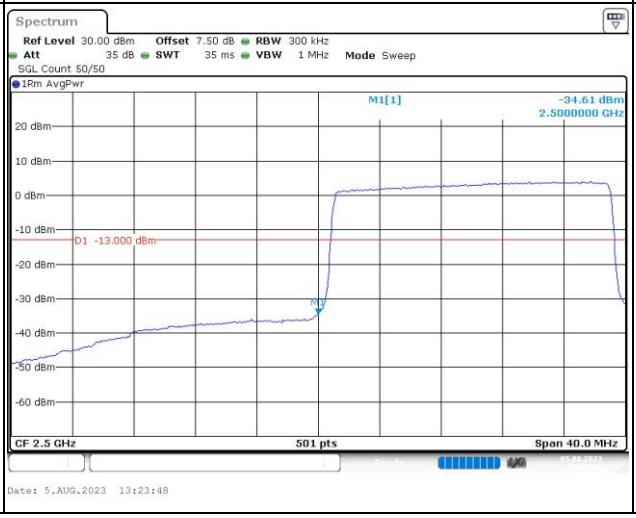
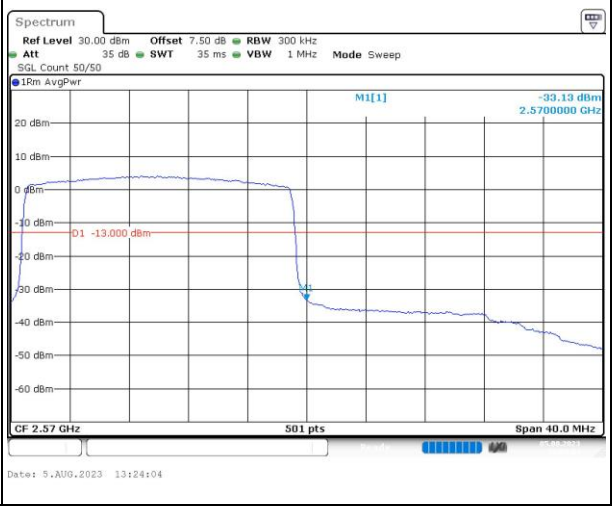
Spurious Emissions at Antenna Terminal		
Channel	**15MHz Bandwidth QPSK**	
Lowest		
Middle		
Highest		

Spurious Emissions at Antenna Terminal		
Channel	**20MHz Bandwidth QPSK**	
Lowest		
Middle		
Highest		

Out of band emission, Band Edge		
Mode	**Lowest**	**Highest**
QPSK 5MHz		
QPSK 10MHz		
QPSK 15MHz		

Out of band emission, Band Edge		
Mode	**Lowest**	**Highest**
QPSK 20MHz		

Out of band emission, Band Edge		
Mode	**Lowest**	**Highest**
16QAM 5MHz		
16QAM 10MHz		
16QAM 15MHz		

Out of band emission, Band Edge		
Mode	**Lowest**	**Highest**
16QAM 20MHz		

4.11 Antenna Port Test Data and Results for LTE Band 40

Serial Number:	291M-2	Test Date:	2023/08/05~2023/08/31
Test Site:	RF	Test Mode:	Transmitting
Tester:	One Luo	Test Result:	**Pass**

Environmental Conditions:					
Temperature: (℃)	24.2~27.9	Relative Humidity: (%)	42~62	ATM Pressure: (kPa)	99.7~102.2

Test Equipment List and Details:

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date
R&S	Spectrum Analyzer	FSV40	101474	2023/07/15	2024/07/14
zhuoxiang	Coaxial Cable	SMA-178	211001	Each time	N/A
YINSAIGE	Coaxial Cable	SS402	SJ0100001	Each time	N/A
Mini-Circuits	DC Block	BLK-18-S+	1554403	Each time	N/A
Weinschel	Power Splitter	1515	RA914	Each time	N/A
R&S	Wideband Radio Communication Tester	CMW500	149218	2023/07/15	2024/07/14
BACL	TEMP&HUMI Test Chamber	BTH-150-40	30174	2022/09/29	2023/09/28
UNI-T	Multimeter	UT39A+	C210582554	2022/9/29	2023/9/28
ZHAOXIN	DC Power Supply	RXN-6010D	21R6010D0912386	N/A	N/A

** Statement of Traceability: China Certification ICT Co., Ltd (Dongguan) attests that all calibrations have been performed, traceable to National Primary Standards and International System of Units (SI).*

Test Frequency For Each Mode:

Operation Band	Operation Bandwidth	Lowest Frequency (MHz)	Middle Frequency (MHz)	Highest Frequency (MHz)
LTE Band 40 Lower 2305-2315MHz	5MHz	2307.5	/	2312.5
	10MHz	/	2310	/
LTE Band 40 Upper	5MHz	2352.5	/	2357.5
	10MHz	/	2355	/

Test Data:

(Note:Uplink Downlink configuration 3 was tested)

FCC §2.1046; § 27.50(a)(3)

LTE Band 40 Lower:

RF Output Power:

Test Bandwidth & Modulation	Resource Block & RB offset	Conducted Average Output Power(dBm)			Maximum EIRP (dBm)	Limit (dBm)
		Lowest Channel	Middle Channel	Highest Channel		
5MHz QPSK	RB1#0	21.8	/	21.91	17.95	24
	RB1#13	21.66	/	21.98		
	RB1#24	21.82	/	22.08		
	RB15#0	20.78	/	20.92		
	RB15#10	20.83	/	21.07		
	RB25#0	20.89	/	21.05		
5MHz 16QAM	RB1#0	20.39	/	21.17	17.04	24
	RB1#13	20.17	/	21.05		
	RB1#24	20.45	/	21.05		
	RB15#0	19.69	/	19.69		
	RB15#10	19.73	/	19.86		
	RB25#0	19.92	/	19.86		
10MHz QPSK	RB1#0	/	21.77	/	18.03	24
	RB1#25	/	21.91	/		
	RB1#49	/	22.16	/		
	RB25#0	/	20.86	/		
	RB25#25	/	21.08	/		
	RB50#0	/	20.74	/		
10MHz 16QAM	RB1#0	/	20.64	/	17.34	24
	RB1#25	/	21.47	/		
	RB1#49	/	21.38	/		
	RB25#0	/	19.82	/		
	RB25#25	/	20.14	/		
	RB50#0	/	19.77	/		

EIRP PSD in 5MHz:

Test Bandwidth & Modulation	Resource Block & RB offset	Conducted PSD(dBm/5MHz)			Maximum EIRP PSD (dBm/5MHz)	Limit (dBm/5MHz)
		Lowest Channel	Middle Channel	Highest Channel		
10MHz QPSK	RB1#0	/	21.63	/	17.77	24
	RB1#25	/	21.89	/		
	RB1#49	/	21.9	/		
	RB25#0	/	20.85	/		
	RB25#25	/	21.01	/		
	RB50#0	/	20.83	/		
10MHz 16QAM	RB1#0	/	21.08	/	17.26	24
	RB1#25	/	21.09	/		
	RB1#49	/	21.39	/		
	RB25#0	/	19.81	/		
	RB25#25	/	19.94	/		
	RB50#0	/	19.92	/		

Note:
For 5MHz mode, the channel power is equal to the test result in dBm/5MHz.
EIRP=Conducted Power(dBm) - L_C(dB) + G_T(dBi)
EIRP PSD=Conducted PSD(dBm/5MHz) - L_C(dB) + G_T(dBi)

LTE Band 40 Upper:

RF Output Power:

Test Bandwidth & Modulation	Resource Block & RB offset	Conducted Average Output Power(dBm)			Maximum EIRP (dBm)	EIRP Limit (dBm)
		Lowest Channel	Middle Channel	Highest Channel		
5MHz QPSK	RB1#0	22.09	/	21.97	18.38	24
	RB1#13	22.06	/	22.15		
	RB1#24	22.13	/	22.34		
	RB15#0	21.33	/	21.3		
	RB15#10	21.24	/	21.29		
	RB25#0	21.34	/	21.38		
5MHz 16QAM	RB1#0	20.75	/	21.46	17.8	24
	RB1#13	20.88	/	21.48		
	RB1#24	20.83	/	21.76		
	RB15#0	20.05	/	20.28		
	RB15#10	20.07	/	20.33		
	RB25#0	20.28	/	20.22		
10MHz QPSK	RB1#0	/	22.13	/	18.56	24
	RB1#25	/	22.34	/		
	RB1#49	/	22.52	/		
	RB25#0	/	21.21	/		
	RB25#25	/	21.39	/		
	RB50#0	/	21.35	/		

10MHz 16QAM	RB1#0	/	21.54	/	18.01	24
	RB1#25	/	21.97	/		
	RB1#49	/	21.91	/		
	RB25#0	/	20.33	/		
	RB25#25	/	20.31	/		
	RB50#0	/	20.25	/		

EIRP PSD in 5MHz:

Test Bandwidth & Modulation	Resource Block & RB offset	Conducted PSD(dBm/5MHz)			Maximum EIRP PSD (dBm/5MHz)	Limit (dBm/5MHz)
		Lowest Channel	Middle Channel	Highest Channel		
10MHz QPSK	RB1#0	/	21.92	/	17.97	24
	RB1#25	/	21.91	/		
	RB1#49	/	21.93	/		
	RB25#0	/	21.17	/		
	RB25#25	/	21.36	/		
	RB50#0	/	21.2	/		
10MHz 16QAM	RB1#0	/	21.44	/	17.79	24
	RB1#25	/	21.59	/		
	RB1#49	/	21.75	/		
	RB25#0	/	20.27	/		
	RB25#25	/	20.23	/		
	RB50#0	/	20.36	/		

Note:
For 5MHz mode, the channel power is equal to the test result in dBm/5MHz.
EIRP=Conducted Power(dBm) - L_C(dB) + G_T(dBi)
EIRP PSD=Conducted PSD(dBm/5MHz) - L_C(dB) + G_T(dBi)

Result:	**Pass**

Duty Cycle

Operation Band	Modulation	Bandwidth	Ton (ms)	Ton+off (ms)	Duty Cycle (%)	Limit (%)
LTE Band 40 Lower	QPSK	5M	3.15	10.01	31.47	38
		10M	3.15	10.01	31.47	38
	16QAM	5M	3.15	10.01	31.47	38
		10M	3.15	10.01	31.47	38
LTE Band 40 Upper	QPSK	5M	3.15	10.01	31.47	38
		10M	3.22	10.15	31.72	38
	16QAM	5M	3.15	10.01	31.47	38
		10M	3.15	10.01	31.47	38
					Result:	**Pass**

FCC §2.1049, §27.53:Occupied Bandwidth						
LTE Band 40 Lower:						
Operation Mode	99% Occupied Bandwidth (MHz)			26 dB Occupied Bandwidth (MHz)		
	Low Channel	Middle channel	High Channel	Low Channel	Middle channel	High Channel
5MHz QPSK	4.511	/	4.491	5.04	/	4.96
5MHz 16QAM	4.511	/	4.491	5.02	/	5
10MHz QPSK	/	8.942	/	/	9.8	/
10MHz 16QAM	/	8.942	/	/	9.64	/
LTE Band 40 Upper:						
Operation Mode	99% Occupied Bandwidth (MHz)			26 dB Occupied Bandwidth (MHz)		
	Low Channel	Middle channel	High Channel	Low Channel	Middle channel	High Channel
5MHz QPSK	4.511	/	4.491	5.02	/	4.98
5MHz 16QAM	4.511	/	4.511	5.02	/	5.04
10MHz QPSK	/	8.942	/	/	9.8	/
10MHz 16QAM	/	8.942	/	/	9.64	/
Note: The test plots please refer to the Plots of Occupied Bandwidth						

FCC §2.1051, §27.53:Spurious Emissions at Antenna Terminal	
Result:	**Pass, Please refer to the test plots of Spurious Emissions at Antenna Terminal.**

FCC §2.1051, §27.53:Out of band emission, Band Edge	
Result:	**Pass, Please refer to the test plots of Out of band emission, Band Edge.**

FCC §2.1055, §27.54: Frequency Stability

LTE Band 40 Lower:

Test Mode:	10M QPSK	Test Channel: Lowest for Lower Edge,Highest for Upper Edge				
Test Item	Temperature (℃)	Voltage (V_{DC})	Lower Edge (MHz)		Upper Edge (MHz)	
			Result	Limit	Result	Limit
Frequency Stability vs. Temperature	-30	3.8	2305.542	2305.000	2314.441	2315.000
	-20	3.8	2305.513	2305.000	2314.407	2315.000
	-10	3.8	2305.579	2305.000	2314.420	2315.000
	0	3.8	2305.590	2305.000	2314.400	2315.000
	10	3.8	2305.539	2305.000	2314.490	2315.000
	20	3.8	2305.529	2305.000	2314.471	2315.000
	30	3.8	2305.580	2305.000	2314.453	2315.000
	40	3.8	2305.581	2305.000	2314.498	2315.000
	50	3.8	2305.501	2305.000	2314.429	2315.000
Frequency Stability vs. Voltage	20	3.55	2305.590	2305.000	2314.441	2315.000
	20	4.35	2305.600	2305.000	2314.481	2315.000
					Result:	**Pass**

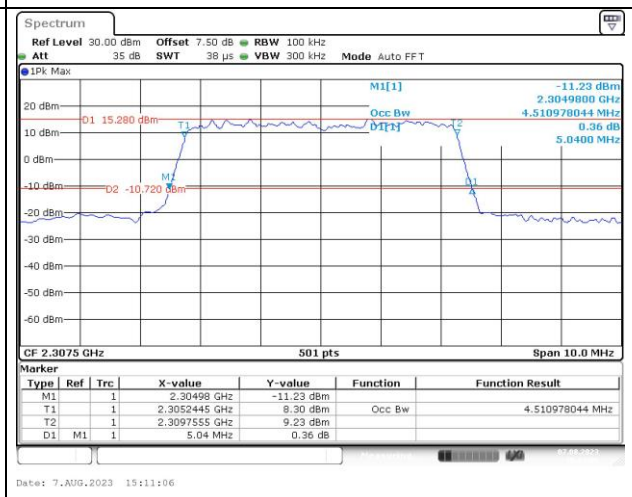
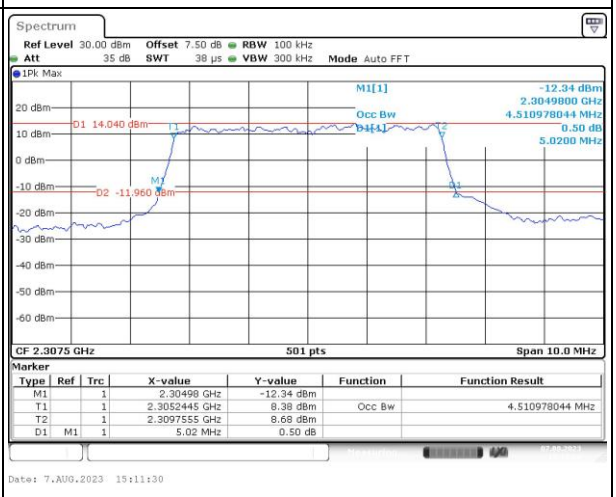
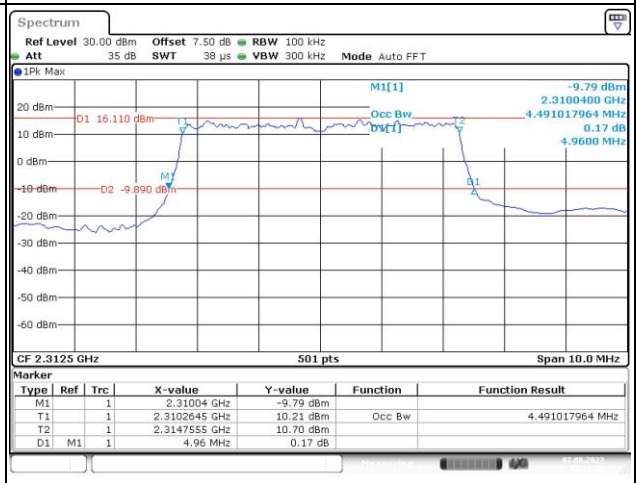
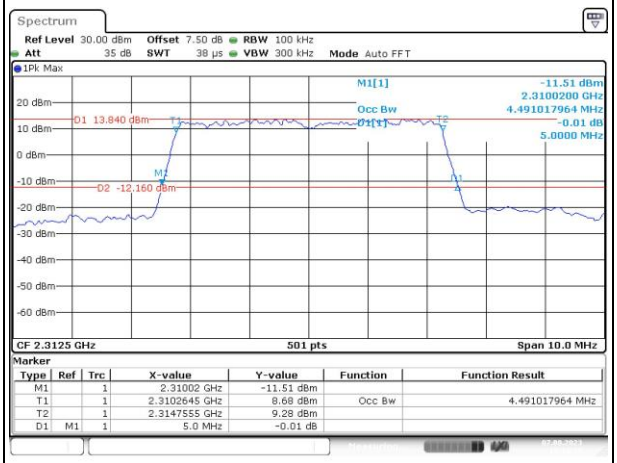
Test Mode:	10M 16QAM	Test Channel: Lowest for Lower Edge,Highest for Upper Edge				
Test Item	Temperature (℃)	Voltage (V_{DC})	Lower Edge (MHz)		Upper Edge (MHz)	
			Result	Limit	Result	Limit
Frequency Stability vs. Temperature	-30	3.8	2305.589	2305.000	2314.474	2315.000
	-20	3.8	2305.594	2305.000	2314.445	2315.000
	-10	3.8	2305.504	2305.000	2314.421	2315.000
	0	3.8	2305.583	2305.000	2314.466	2315.000
	10	3.8	2305.574	2305.000	2314.459	2315.000
	20	3.8	2305.529	2305.000	2314.471	2315.000
	30	3.8	2305.586	2305.000	2314.453	2315.000
	40	3.8	2305.543	2305.000	2314.469	2315.000
	50	3.8	2305.505	2305.000	2314.478	2315.000
Frequency Stability vs. Voltage	20	3.55	2305.548	2305.000	2314.411	2315.000
	20	4.35	2305.557	2305.000	2314.446	2315.000
					Result:	**Pass**

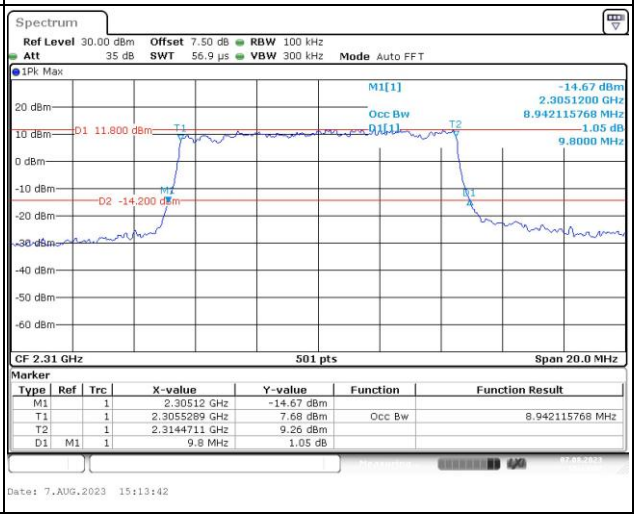
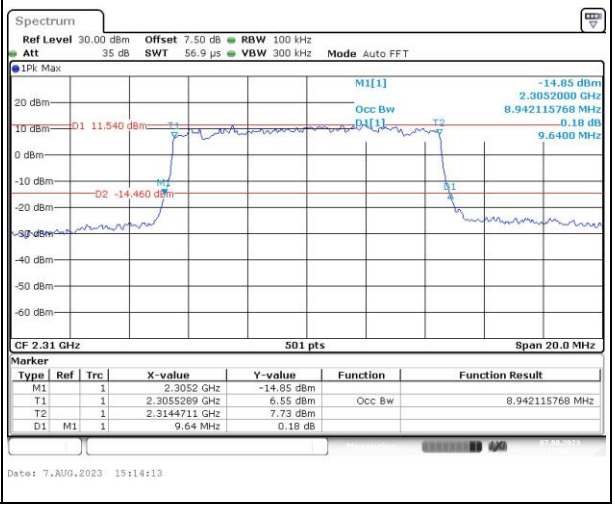
LTE Band 40 Upper:						
Test Mode:	10M QPSK	Test Channel: Lowest for Lower Edge,Highest for Upper Edge				
Test Item	Temperature (℃)	Voltage (V_{DC})	Lower Edge (MHz)		Upper Edge (MHz)	
			Result	Limit	Result	Limit
Frequency Stability vs. Temperature	-30	3.8	2350.570	2350.000	2359.415	2360.000
	-20	3.8	2350.521	2350.000	2359.497	2360.000
	-10	3.8	2350.514	2350.000	2359.450	2360.000
	0	3.8	2350.564	2350.000	2359.441	2360.000
	10	3.8	2350.586	2350.000	2359.403	2360.000
	20	3.8	2350.529	2350.000	2359.471	2360.000
	30	3.8	2350.591	2350.000	2359.464	2360.000
	40	3.8	2350.510	2350.000	2359.458	2360.000
	50	3.8	2350.564	2350.000	2359.422	2360.000
Frequency Stability vs. Voltage	20	3.55	2350.521	2350.000	2359.499	2360.000
	20	4.35	2350.544	2350.000	2359.483	2360.000
					Result:	**Pass**

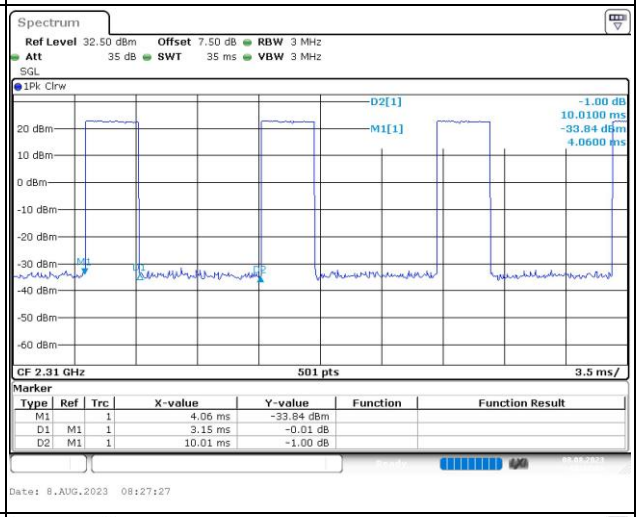
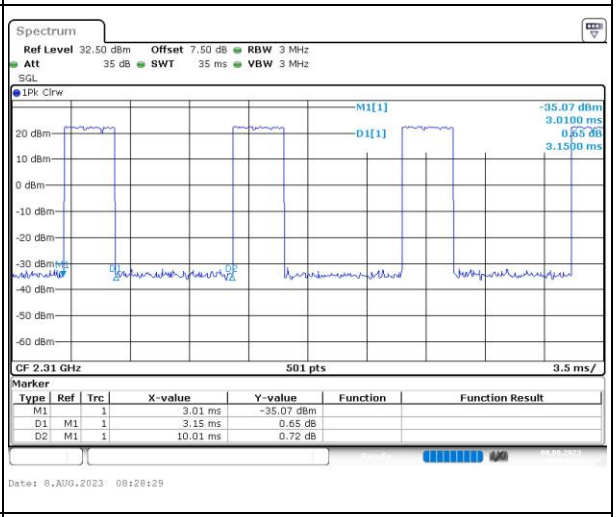
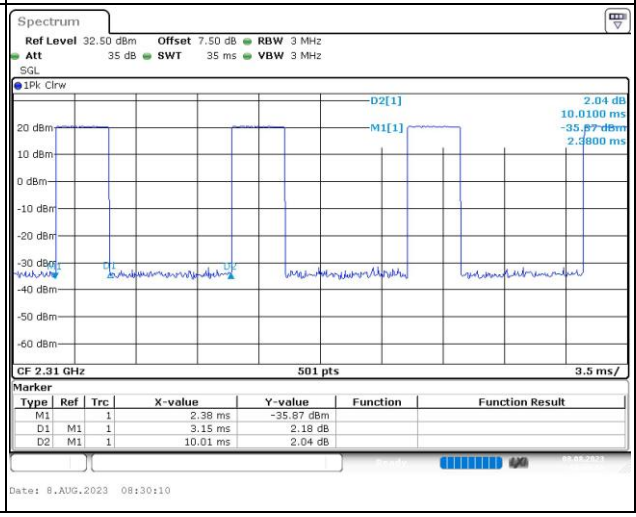
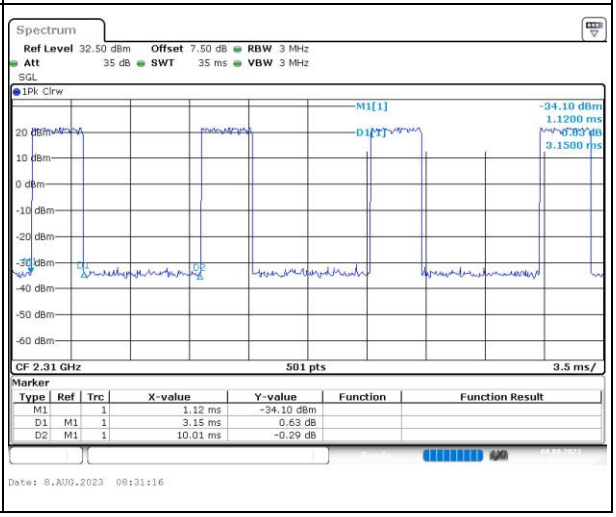
Test Mode:	10M 16QAM	Test Channel: Lowest for Lower Edge,Highest for Upper Edge				
Test Item	Temperature (℃)	Voltage (V_{DC})	Lower Edge (MHz)		Upper Edge (MHz)	
			Result	Limit	Result	Limit
Frequency Stability vs. Temperature	-30	3.8	2350.582	2350.000	2359.445	2360.000
	-20	3.8	2350.556	2350.000	2359.464	2360.000
	-10	3.8	2350.515	2350.000	2359.412	2360.000
	0	3.8	2350.540	2350.000	2359.452	2360.000
	10	3.8	2350.524	2350.000	2359.500	2360.000
	20	3.8	2350.529	2350.000	2359.471	2360.000
	30	3.8	2350.562	2350.000	2359.483	2360.000
	40	3.8	2350.570	2350.000	2359.444	2360.000
	50	3.8	2350.583	2350.000	2359.435	2360.000
Frequency Stability vs. Voltage	20	3.55	2350.547	2350.000	2359.457	2360.000
	20	4.35	2350.576	2350.000	2359.485	2360.000
					Result:	**Pass**

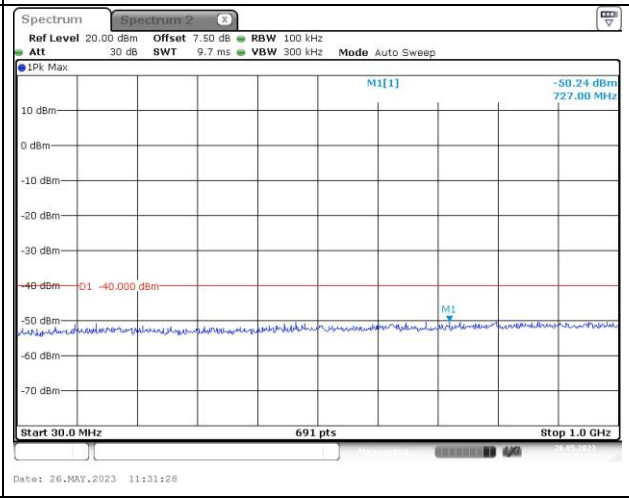
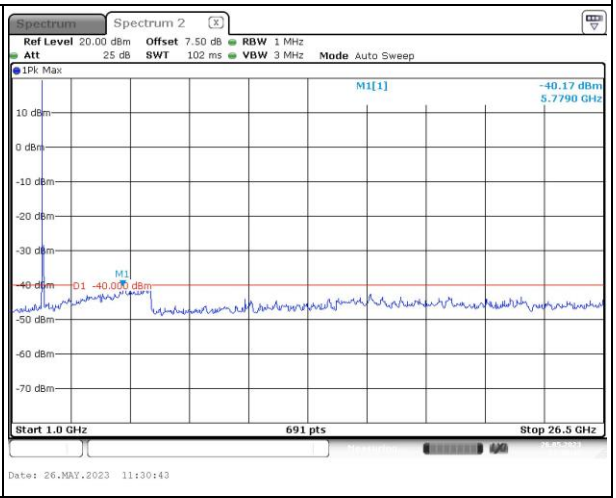
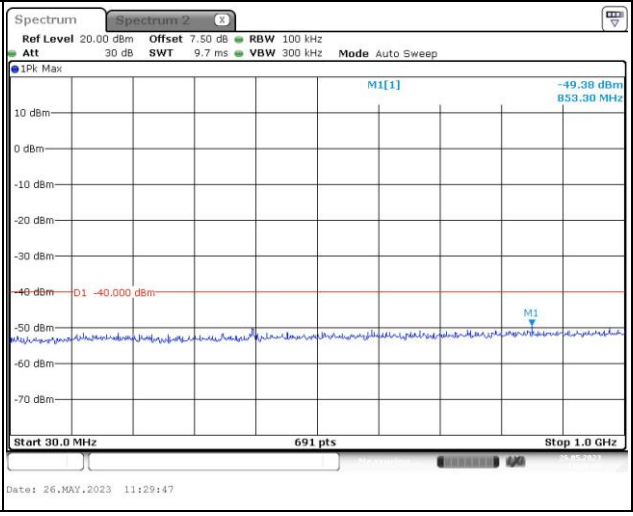
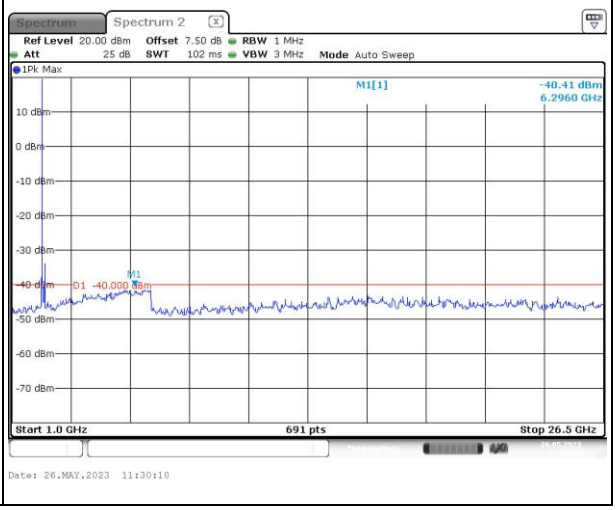
Test Plots(Note: The 7.5dB is the Insertion loss of the RF cable, Coaxial tee connector and DC Block, which was offset into the Spectrum Analyzer)**:**

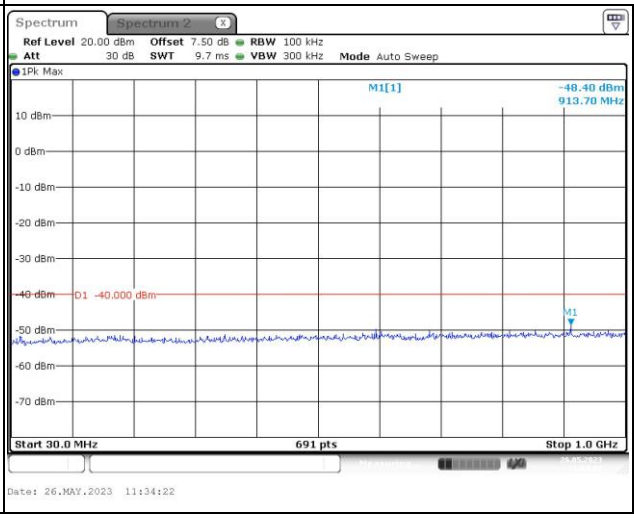
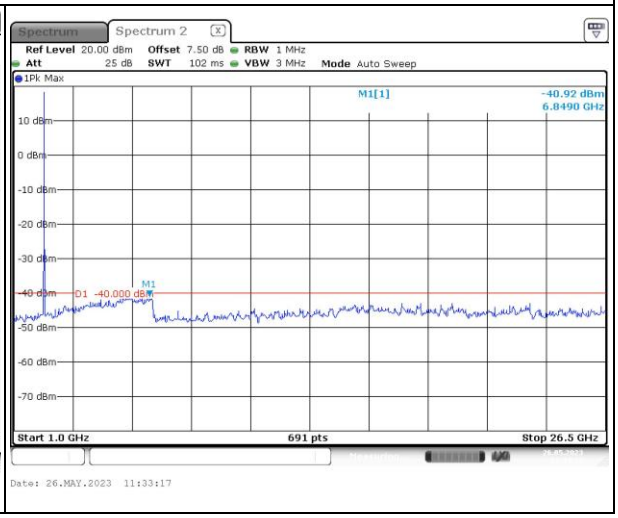
LTE Band 40 Lower

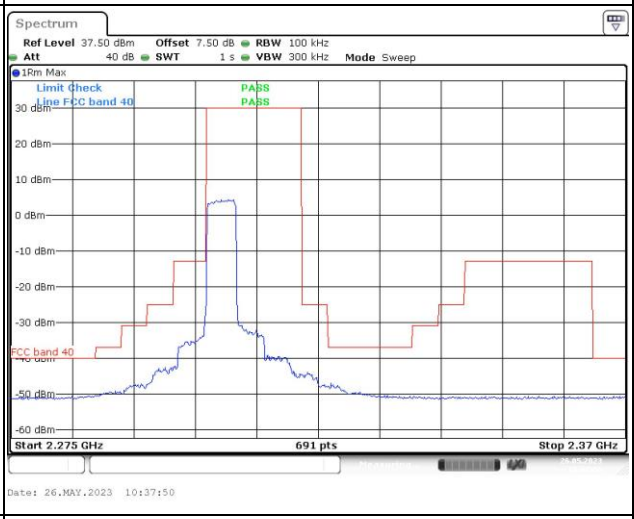
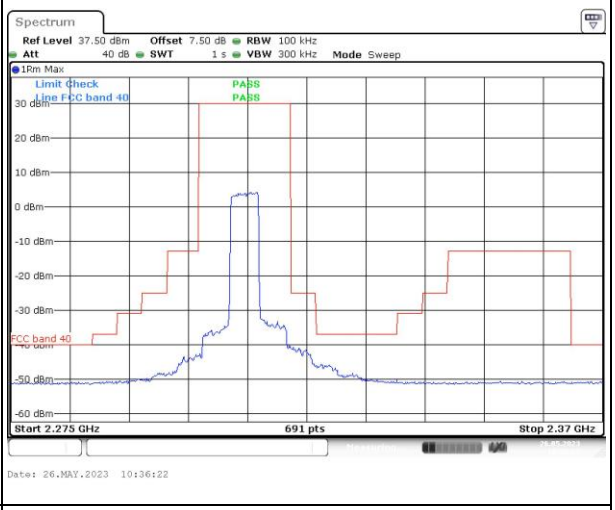
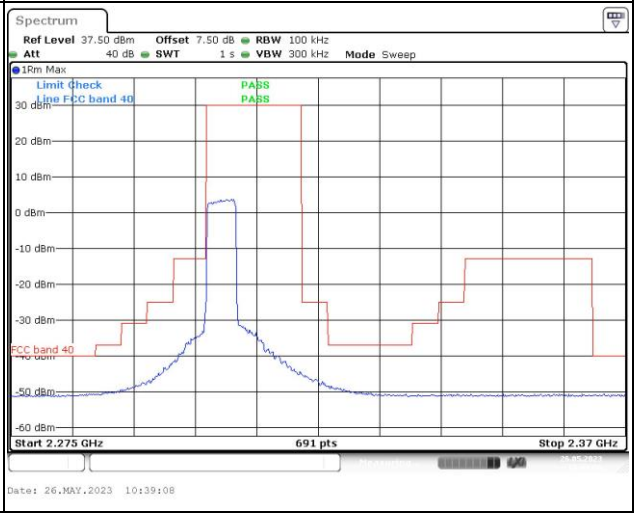
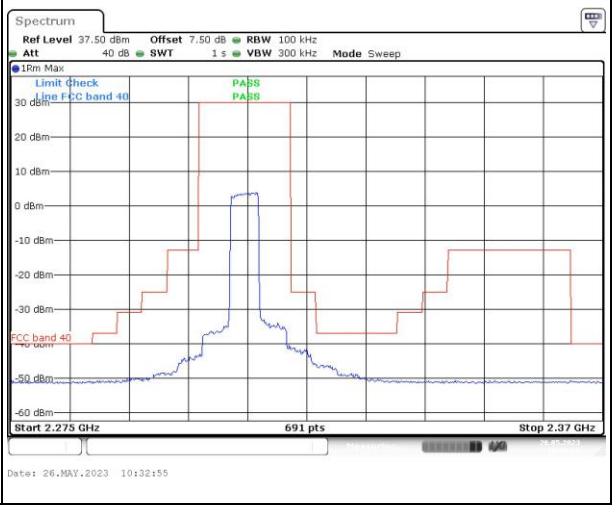
Occupied Bandwidth		
Channel	5MHz Bandwidth QPSK	5MHz Bandwidth 16QAM
Lowest		
Highest		

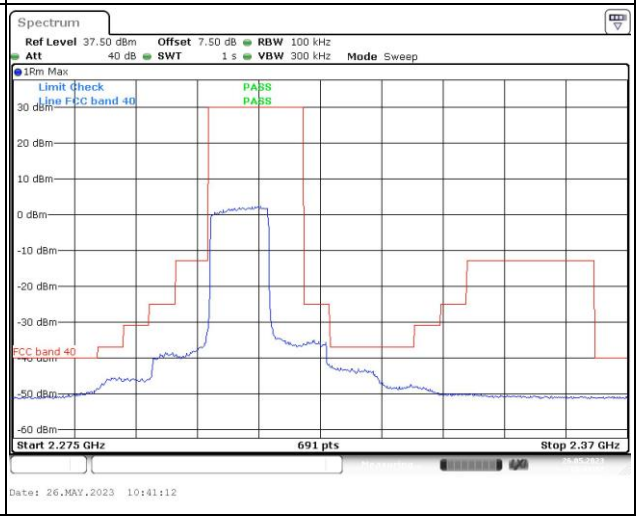
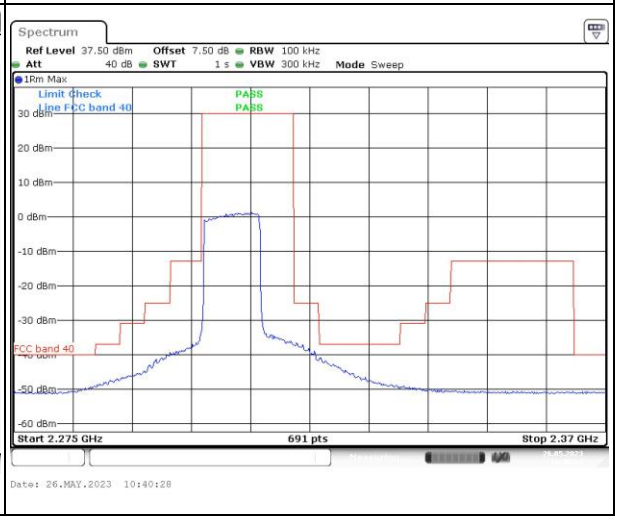
Occupied Bandwidth		
Channel	10MHz Bandwidth QPSK	10MHz Bandwidth 16QAM
Middle		

Duty Cycle		
Channel	QPSK	16QAM
5MHz		
10MHz		

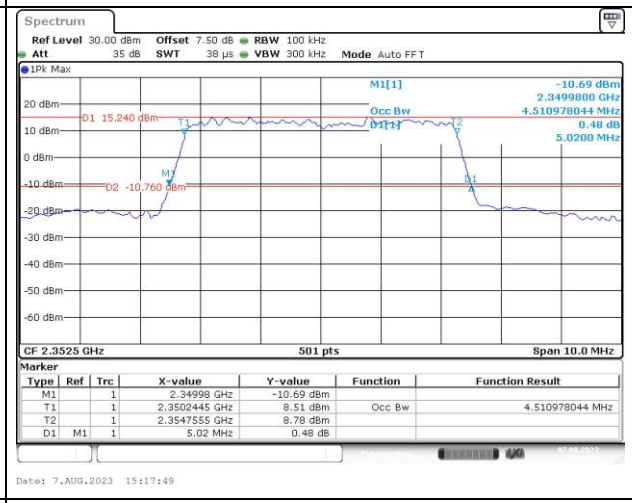
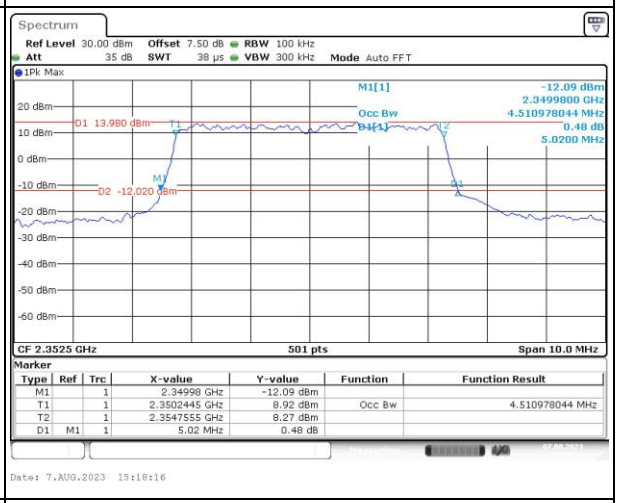
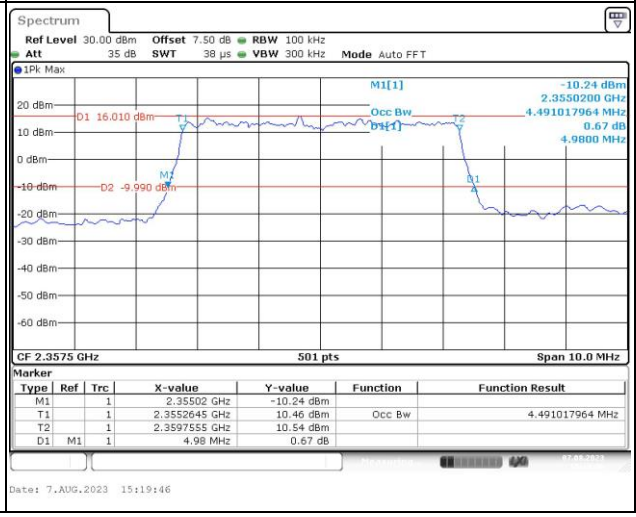
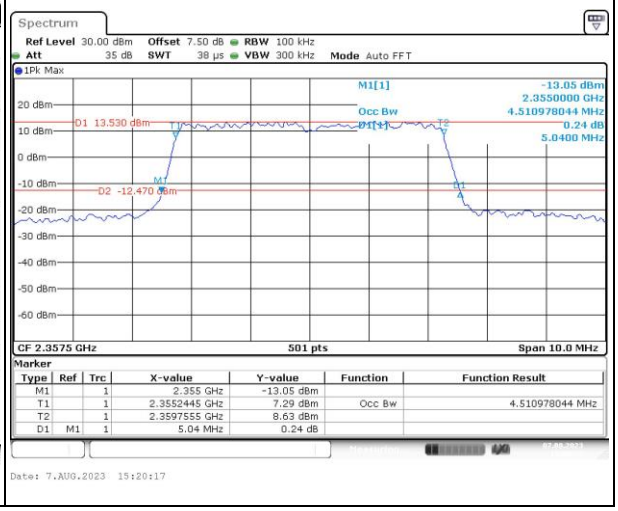
Spurious Emissions at Antenna Terminal		
Channel	5MHz Bandwidth QPSK	
Lowest		
Highest		

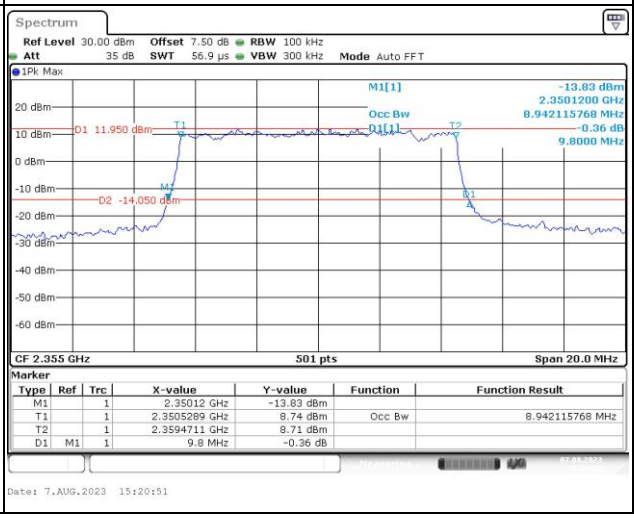
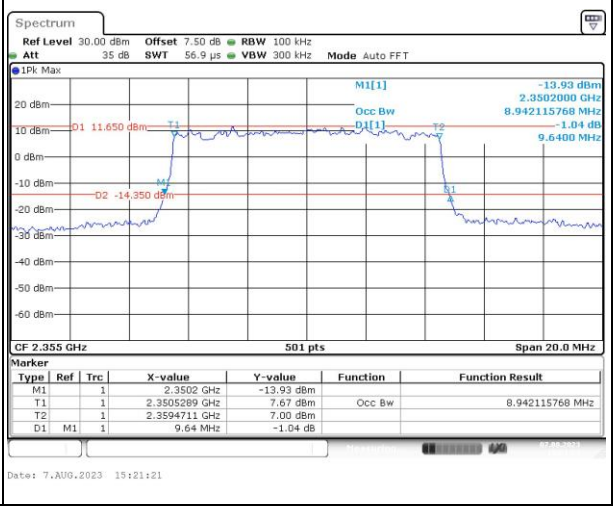
Spurious Emissions at Antenna Terminal		
Channel	10MHz Bandwidth QPSK	
Middle		

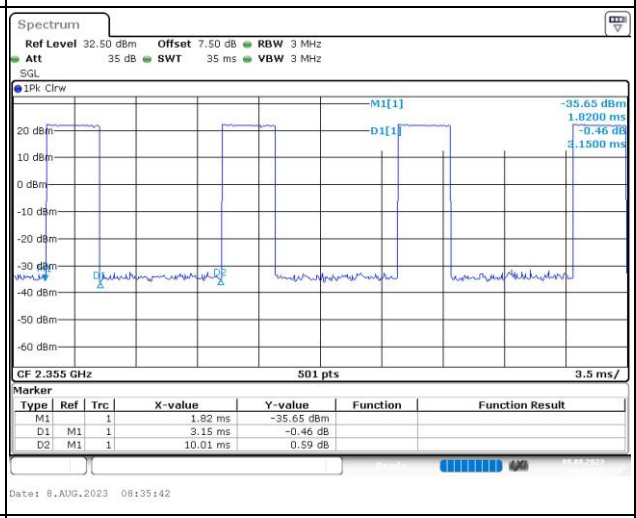
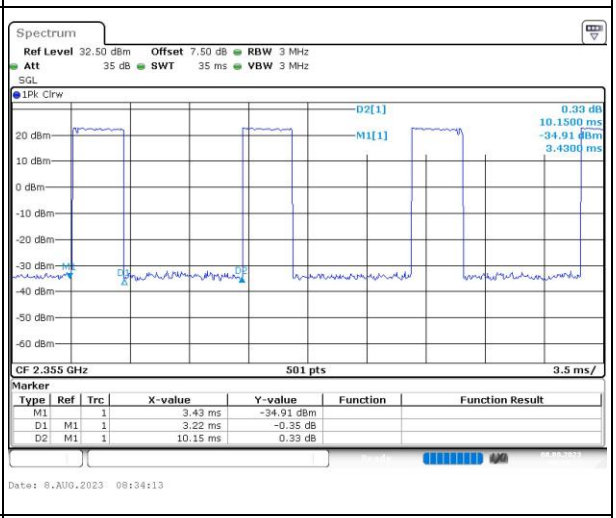
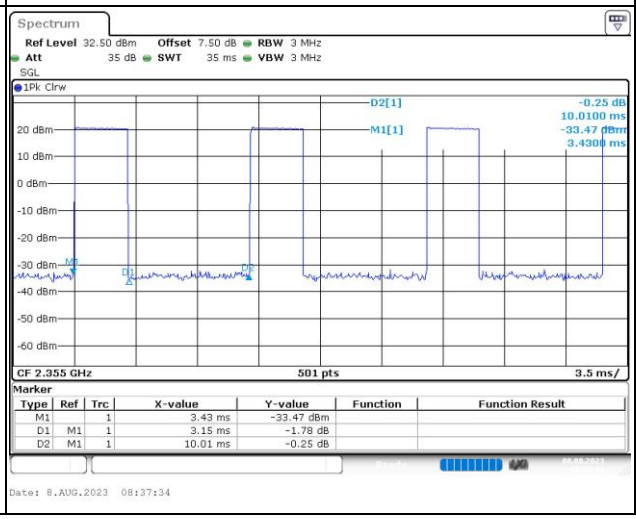
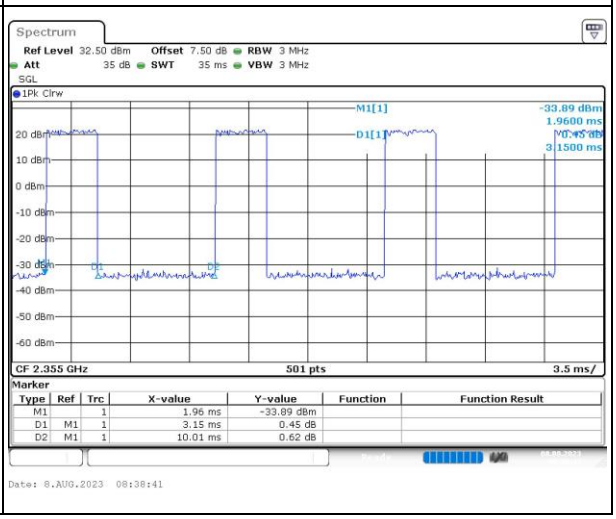
Out of band emission, Band Edge		
Mode	**Lowest**	**Highest**
QPSK 5MHz		
16QAM 5MHz		

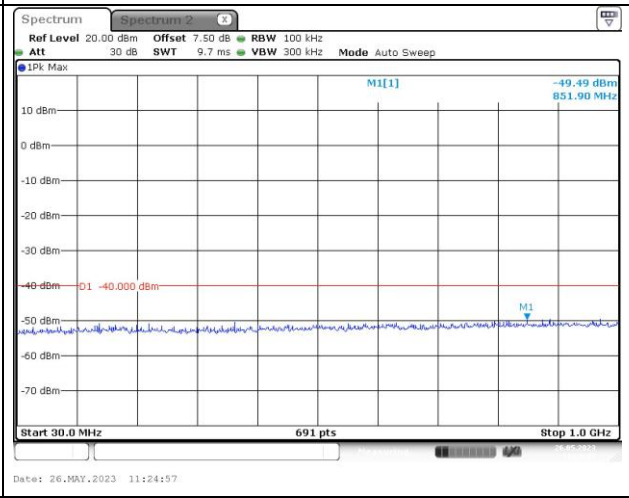
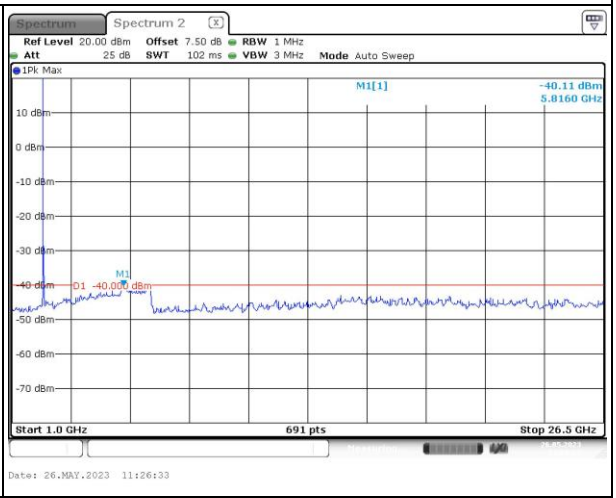
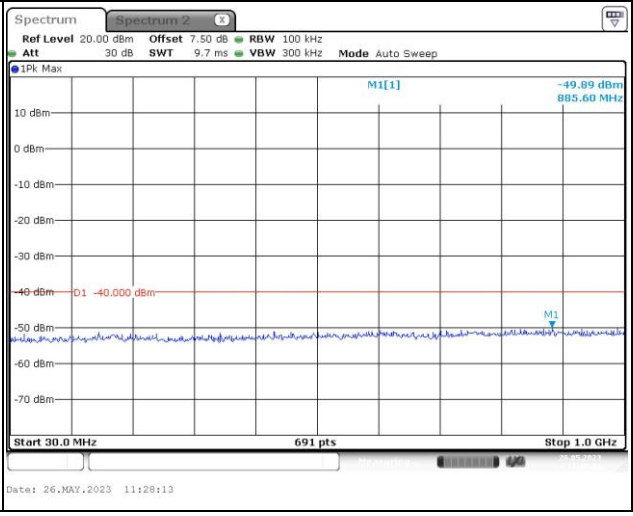
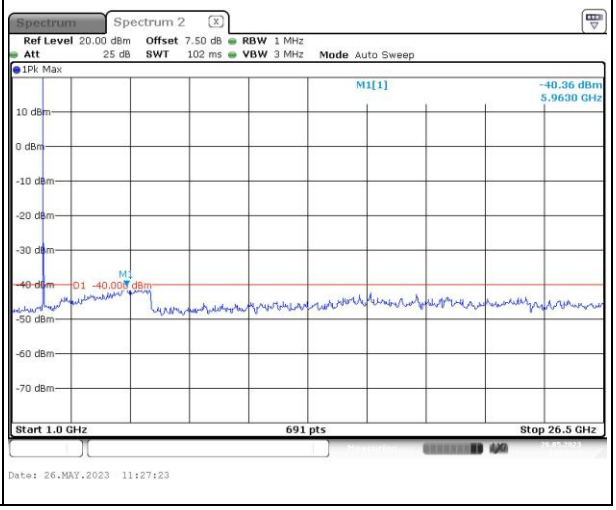
Out of band emission, Band Edge		
Mode	QPSK	16QAM
10MHz		

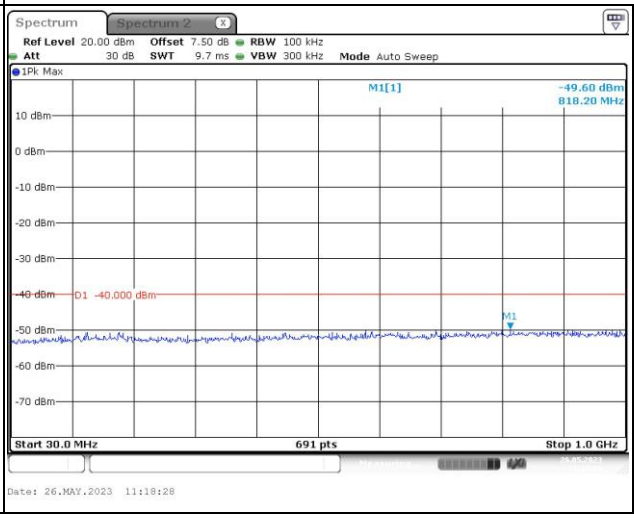
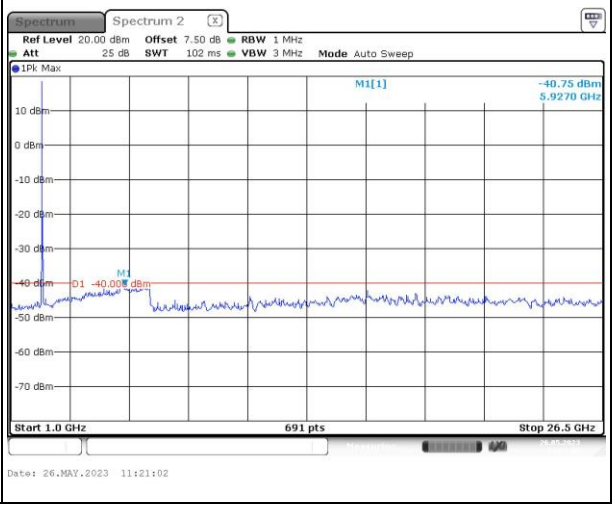
LTE Band 40 Upper:

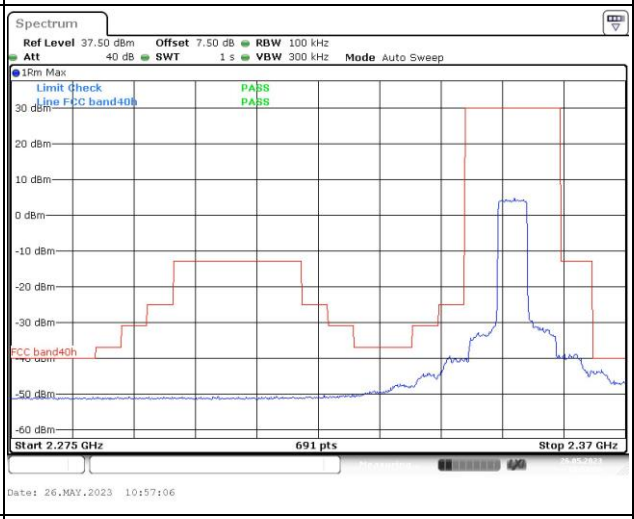
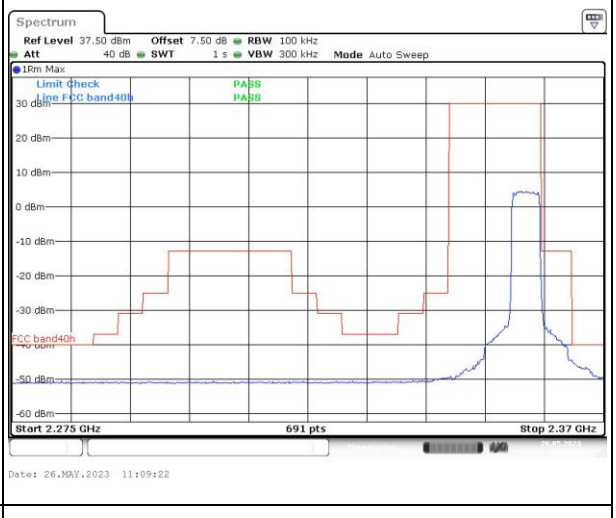
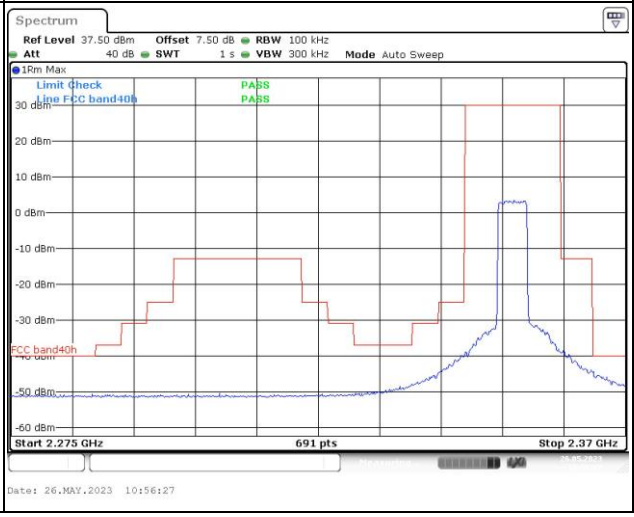
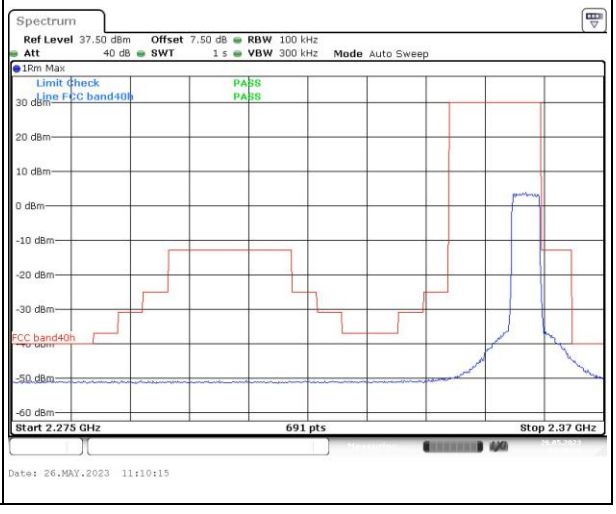
Occupied Bandwidth		
Channel	5MHz Bandwidth QPSK	5MHz Bandwidth 16QAM
Lowest		
Highest		

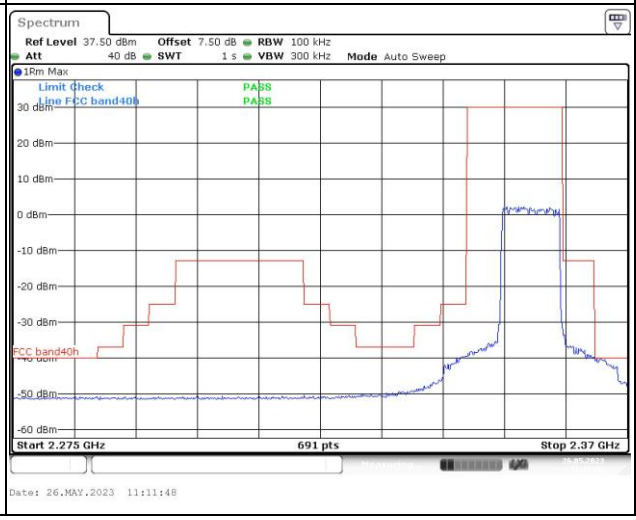
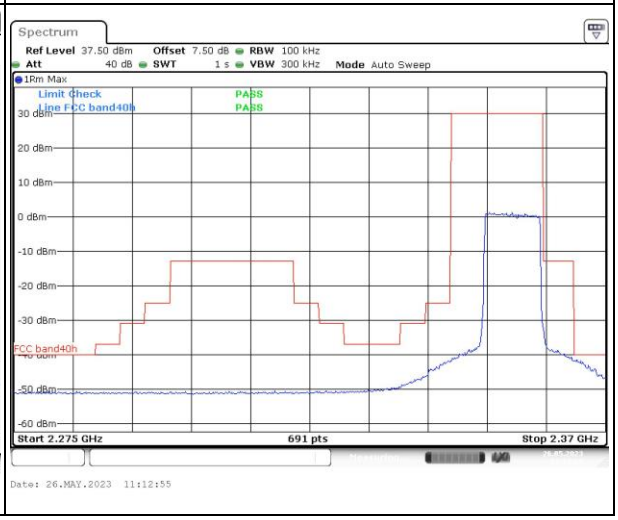
Occupied Bandwidth		
Channel	10MHz Bandwidth QPSK	10MHz Bandwidth 16QAM
Middle		

Duty Cycle		
Channel	QPSK	16QAM
5MHz		
10MHz		

Spurious Emissions at Antenna Terminal		
Channel	**5MHz Bandwidth QPSK**	
Lowest		
Highest		

Spurious Emissions at Antenna Terminal		
Channel	**10MHz Bandwidth QPSK**	
Middle		

Out of band emission, Band Edge		
Mode	**Lowest**	**Highest**
QPSK 5MHz		
16QAM 5MHz		

Out of band emission, Band Edge		
Mode	QPSK	16QAM
10MHz		

4.11 Radiated Spurious Emissions

Serial Number:	291M-1	Test Date:	2023/08/14~2023/08/24
Test Site:	966-1/966-2	Test Mode:	Transmitting
Tester:	Vic Du, Mack Huang	Test Result:	Pass

Environmental Conditions:					
Temperature: (℃)	25.1~27.3	Relative Humidity: (%)	50~66	ATM Pressure: (kPa)	99.9~100.1

Test Equipment List and Details:

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date
Sunol Sciences	Antenna	JB6	A082520-5	2020/10/19	2023/10/18
R&S	EMI Test Receiver	ESR3	102724	2023/03/31	2024/03/30
TIMES MICROWAVE	Coaxial Cable	LMR-600-UltraFlex	C-0470-02	2023/07/16	2024/07/15
TIMES MICROWAVE	Coaxial Cable	LMR-600-UltraFlex	C-0780-01	2023/07/16	2024/07/15
Sonoma	Amplifier	310N	186165	2023/07/16	2024/07/15
EMCO	Adjustable Dipole Antenna	3121C	9109-756	N/A	N/A
MICRO-COAX	Coaxial Cable	UFA210B-0-0720-300300	99G1448	2022/07/16	2024/07/15
Agilent	Signal Generator	E8247C	MY43321352	2022/11/18	2023/11/17
ETS-Lindgren	Horn Antenna	3115	9912-5985	2020/10/13	2023/10/12
R&S	Spectrum Analyzer	FSV40	101591	2023/03/31	2024/03/30
MICRO-COAX	Coaxial Cable	UFA210A-1-1200-70U300	217423-008	2023/08/06	2024/08/05
MICRO-COAX	Coaxial Cable	UFA210A-1-2362-300300	235780-001	2023/08/06	2024/08/05
Mini	Pre-amplifier	ZVA-183-S+	5969001149	2022/11/09	2023/11/08
AH	Double Ridge Guide Horn Antenna	SAS-571	1396	2021/10/18	2024/10/17
PASTERNACK	Horn Antenna	PE9852/2F-20	112002	2021/02/05	2024/02/04
PASTERNACK	Horn Antenna	PE9852/2F-20	112001	2021/02/05	2024/02/04
Quinstar	Preamplifier	QLW-18405536-JO	15964001005	2022/09/16	2023/09/15
PASTERNACK	Horn Antenna	PE9850/2F-20	072001	2021/02/05	2024/02/04
PASTERNACK	Horn Antenna	PE9850/2F-20	072002	2021/02/05	2024/02/04
MICRO-COAX	Coaxial Cable	UFB142A-1-2362-200200	235772-001	2023/08/06	2024/08/05

**** Statement of Traceability:*** *China Certification ICT Co., Ltd (Dongguan) attests that all calibrations have been performed, traceable to National Primary Standards and International System of Units (SI).*

Test Data:

Please refer to the below table and plots.

After pre-scan in the X, Y and Z axes of orientation, the worst case is below:

Cellular Band (PART 22H)

30 MHz-10 GHz:

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
GPRS 850 Frequency:824.2MHz								
872.13	H	21.43	-48.05	0.00	0.59	-48.64	-13.00	35.64
625.08	V	36.03	-35.25	0.00	0.48	-35.73	-13.00	22.73
1648.400	H	47.86	-56.47	8.68	0.80	-48.59	-13.00	35.59
1648.400	V	49.57	-54.84	8.68	0.80	-46.96	-13.00	33.96
2472.600	H	42.16	-58.62	9.38	1.00	-50.24	-13.00	37.24
2472.600	V	39.54	-61.19	9.38	1.00	-52.81	-13.00	39.81
3296.800	H	37.86	-58.82	10.32	1.15	-49.65	-13.00	36.65
3296.800	V	38.49	-57.95	10.32	1.15	-48.78	-13.00	35.78
GPRS 850 Frequency:836.6MHz								
640.61	H	27.18	-46.46	0.00	0.52	-46.98	-13.00	33.98
755.39	V	32.14	-36.57	0.00	0.52	-37.09	-13.00	24.09
1673.200	H	49.67	-54.64	8.71	0.85	-46.78	-13.00	33.78
1673.200	V	48.35	-56.06	8.71	0.85	-48.20	-13.00	35.20
2509.800	H	42.16	-58.45	9.42	1.01	-50.04	-13.00	37.04
2509.800	V	40.23	-60.39	9.42	1.01	-51.98	-13.00	38.98
3346.400	H	38.61	-58.56	10.34	1.16	-49.38	-13.00	36.38
3346.400	V	37.82	-59.21	10.34	1.16	-50.03	-13.00	37.03
GPRS 850 Frequency:848.8MHz								
716.78	H	20.91	-52.07	0.00	0.50	-52.57	-13.00	39.57
640.61	V	37.13	-33.86	0.00	0.52	-34.38	-13.00	21.38
1697.600	H	50.23	-54.06	8.74	0.90	-46.22	-13.00	33.22
1697.600	V	48.64	-55.78	8.74	0.90	-47.94	-13.00	34.94
2546.400	H	40.55	-59.78	9.47	1.01	-51.32	-13.00	38.32
2546.400	V	41.67	-58.61	9.47	1.01	-50.15	-13.00	37.15
3395.200	H	38.59	-59.10	10.36	1.19	-49.93	-13.00	36.93
3395.200	V	39.42	-58.24	10.36	1.19	-49.07	-13.00	36.07

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
WCDMA Band 5 Frequency:826.4 MHz								
839.18	H	21.58	-48.73	0.00	0.61	-49.34	-13.00	36.34
719.20	V	20.46	-49.04	0.00	0.49	-49.53	-13.00	36.53
1652.800	H	56.34	-47.99	8.68	0.81	-40.12	-13.00	27.12
1652.800	V	55.46	-48.95	8.68	0.81	-41.08	-13.00	28.08
2479.200	H	51.34	-49.42	9.39	1.01	-41.04	-13.00	28.04
2479.200	V	45.67	-55.06	9.39	1.01	-46.68	-13.00	33.68
3305.600	H	38.12	-58.61	10.32	1.15	-49.44	-13.00	36.44
3305.600	V	40.12	-56.38	10.32	1.15	-47.21	-13.00	34.21
WCDMA Band 5 Frequency:836.6MHz								
887.61	H	22.19	-46.89	0.00	0.62	-47.51	-13.00	34.51
702.00	V	20.31	-49.57	0.00	0.55	-50.12	-13.00	37.12
1673.200	H	56.43	-47.88	8.71	0.85	-40.02	-13.00	27.02
1673.200	V	55.84	-48.57	8.71	0.85	-40.71	-13.00	27.71
2509.800	H	50.46	-50.15	9.42	1.01	-41.74	-13.00	28.74
2509.800	V	46.75	-53.87	9.42	1.01	-45.46	-13.00	32.46
3346.400	H	37.56	-59.61	10.34	1.16	-50.43	-13.00	37.43
3346.400	V	38.49	-58.54	10.34	1.16	-49.36	-13.00	36.36
WCDMA Band 5 Frequency:846.6MHz								
694.42	H	21.19	-52.16	0.00	0.55	-52.71	-13.00	39.71
793.40	V	20.64	-47.24	0.00	0.61	-47.85	-13.00	34.85
1693.200	H	55.87	-48.43	8.73	0.89	-40.59	-13.00	27.59
1693.200	V	56.13	-48.29	8.73	0.89	-40.45	-13.00	27.45
2539.800	H	48.49	-51.89	9.46	1.01	-43.44	-13.00	30.44
2539.800	V	48.67	-51.67	9.46	1.01	-43.22	-13.00	30.22
3386.400	H	38.79	-58.80	10.35	1.18	-49.63	-13.00	36.63
3386.400	V	37.46	-60.08	10.35	1.18	-50.91	-13.00	37.91

PCS Band (PART 24E)

30 MHz-20 GHz:

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
GPRS 1900 Frequency:1850.2MHz								
350.48	H	49.20	-60.76	0.00	0.36	-61.12	-13.00	48.12
550.95	V	47.16	-56.05	0.00	0.47	-56.52	-13.00	43.52
3700.400	H	35.46	-61.86	10.60	1.25	-52.51	-13.00	39.51
3700.400	V	35.28	-62.02	10.60	1.25	-52.67	-13.00	39.67
5550.600	H	34.97	-58.29	11.44	1.49	-48.34	-13.00	35.34
5550.600	V	35.16	-57.94	11.44	1.49	-47.99	-13.00	34.99
GPRS 1900 Frequency:1880MHz								
350.48	H	48.76	-61.20	0.00	0.36	-61.56	-13.00	48.56
550.95	V	47.34	-55.87	0.00	0.47	-56.34	-13.00	43.34
3760.000	H	35.62	-60.79	10.66	1.24	-51.37	-13.00	38.37
3760.000	V	34.81	-61.48	10.66	1.24	-52.06	-13.00	39.06
5640.000	H	34.65	-58.80	11.33	1.54	-49.01	-13.00	36.01
5640.000	V	34.85	-58.48	11.33	1.54	-48.69	-13.00	35.69
GPRS 1900 Frequency:1909.8MHz								
350.48	H	49.88	-60.08	0.00	0.36	-60.44	-13.00	47.44
113.32	V	46.90	-59.26	0.00	0.20	-59.46	-13.00	46.46
3819.600	H	35.79	-60.07	10.72	1.29	-50.64	-13.00	37.64
3819.600	V	36.13	-59.59	10.72	1.29	-50.16	-13.00	37.16
5729.400	H	34.56	-58.92	11.22	1.59	-49.29	-13.00	36.29
5729.400	V	35.17	-58.19	11.22	1.59	-48.56	-13.00	35.56

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
WCDMA Band 2, Frequency:1852.4 MHz								
189.07	H	37.96	-74.71	0.00	0.26	-74.97	-13.00	61.97
117.77	V	44.20	-61.67	0.00	0.20	-61.87	-13.00	48.87
3704.800	H	37.52	-59.74	10.60	1.25	-50.39	-13.00	37.39
3704.800	V	36.54	-60.69	10.60	1.25	-51.34	-13.00	38.34
5557.200	H	33.97	-59.31	11.43	1.49	-49.37	-13.00	36.37
5557.200	V	4.16	-88.97	11.43	1.49	-79.03	-13.00	66.03
WCDMA Band 2, Frequency:1880 MHz								
350.48	H	38.39	-71.57	0.00	0.36	-71.93	-13.00	58.93
119.43	V	43.82	-61.95	0.00	0.20	-62.15	-13.00	49.15
3760.000	H	35.76	-60.65	10.66	1.24	-51.23	-13.00	38.23
3760.000	V	34.98	-61.31	10.66	1.24	-51.89	-13.00	38.89
5640.000	H	35.11	-58.34	11.33	1.54	-48.55	-13.00	35.55
5640.000	V	34.25	-59.08	11.33	1.54	-49.29	-13.00	36.29
WCDMA Band 2, Frequency:1907.6MHz								
545.18	H	39.23	-66.70	0.00	0.47	-67.17	-13.00	54.17
123.70	V	42.48	-63.67	0.00	0.21	-63.88	-13.00	50.88
3815.200	H	37.46	-58.39	10.72	1.29	-48.96	-13.00	35.96
3815.200	V	36.78	-58.91	10.72	1.29	-49.48	-13.00	36.48
5722.800	H	35.49	-58.00	11.23	1.58	-48.35	-13.00	35.35
5722.800	V	34.63	-58.72	11.23	1.58	-49.07	-13.00	36.07

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
WCDMA Band 4, Frequency:1712.4 MHz								
350.48	H	37.02	-72.94	0.00	0.36	-73.30	-13.00	60.30
122.83	V	42.13	-63.92	0.00	0.20	-64.12	-13.00	51.12
3424.800	H	36.42	-61.35	10.37	1.17	-52.15	-13.00	39.15
3424.800	V	35.19	-62.55	10.37	1.17	-53.35	-13.00	40.35
5137.200	H	34.52	-59.10	11.28	1.46	-49.28	-13.00	36.28
5137.200	V	35.15	-58.35	11.28	1.46	-48.53	-13.00	35.53
WCDMA Band 4, Frequency:1732.6MHz								
350.48	H	36.68	-73.28	0.00	0.36	-73.64	-13.00	60.64
120.68	V	43.79	-62.02	0.00	0.20	-62.22	-13.00	49.22
3465.200	H	35.64	-62.17	10.39	1.15	-52.93	-13.00	39.93
3465.200	V	35.47	-62.30	10.39	1.15	-53.06	-13.00	40.06
5197.800	H	34.52	-59.61	11.32	1.44	-49.73	-13.00	36.73
5197.800	V	33.97	-60.01	11.32	1.44	-50.13	-13.00	37.13
WCDMA Band 4, Frequency:1752.6MHz								
121.98	H	37.92	-74.19	0.00	0.20	-74.39	-13.00	61.39
116.94	V	44.34	-61.59	0.00	0.20	-61.79	-13.00	48.79
3505.200	H	35.46	-62.37	10.41	1.18	-53.14	-13.00	40.14
3505.200	V	34.79	-62.98	10.41	1.18	-53.75	-13.00	40.75
5257.800	H	34.63	-59.10	11.35	1.47	-49.22	-13.00	36.22
5257.800	V	34.75	-58.76	11.35	1.47	-48.88	-13.00	35.88

LTE Bands:
(The Worst modulation and bandwidth was below)

LTE Band 2 (30MHz-20GHz):

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
QPSK,Frequency:1850.7 MHz								
73.10	H	31.46	-74.18	-3.45	0.16	-77.79	-13.00	64.79
66.27	V	36.16	-67.72	-6.98	0.15	-74.85	-13.00	61.85
3701.400	H	39.05	-58.26	10.60	1.25	-48.91	-13.00	35.91
3701.400	V	38.42	-58.87	10.60	1.25	-49.52	-13.00	36.52
5552.100	H	36.43	-56.84	11.44	1.49	-46.89	-13.00	33.89
5552.100	V	36.10	-57.00	11.44	1.49	-47.05	-13.00	34.05
QPSK,Frequency:1880 MHz								
70.09	H	31.53	-72.30	-4.96	0.15	-77.41	-13.00	64.41
66.27	V	35.37	-68.51	-6.98	0.15	-75.64	-13.00	62.64
3760.000	H	36.45	-59.96	10.66	1.24	-50.54	-13.00	37.54
3760.000	V	36.11	-60.18	10.66	1.24	-50.76	-13.00	37.76
5640.000	H	35.74	-57.71	11.33	1.54	-47.92	-13.00	34.92
5640.000	V	35.69	-57.64	11.33	1.54	-47.85	-13.00	34.85
QPSK,Frequency:1909.3 MHz								
70.33	H	30.38	-73.60	-4.83	0.15	-78.58	-13.00	65.58
45.23	V	34.97	-61.56	-19.57	0.12	-81.25	-13.00	68.25
3818.600	H	39.31	-56.55	10.72	1.29	-47.12	-13.00	34.12
3818.600	V	38.85	-56.86	10.72	1.29	-47.43	-13.00	34.43
5727.900	H	35.44	-58.04	11.23	1.59	-48.40	-13.00	35.40
5727.900	V	37.13	-56.23	11.23	1.59	-46.59	-13.00	33.59

LTE Band 4 (30MHz-20GHz):

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
QPSK,Frequency:1710.7 MHz								
35.33	H	31.07	-46.75	-24.16	0.11	-71.02	-13.00	58.02
70.09	V	35.41	-67.25	-4.96	0.15	-72.36	-13.00	59.36
3421.400	H	39.34	-58.42	10.37	1.17	-49.22	-13.00	36.22
3421.400	V	38.84	-58.89	10.37	1.17	-49.69	-13.00	36.69
5132.100	H	36.56	-57.01	11.28	1.47	-47.20	-13.00	34.20
5132.100	V	36.23	-57.23	11.28	1.47	-47.42	-13.00	34.42
QPSK,Frequency:1732.5 MHz								
70.33	H	30.85	-73.13	-4.84	0.15	-78.12	-13.00	65.12
70.09	V	36.15	-66.51	-4.96	0.15	-71.62	-13.00	58.62
3465.000	H	39.40	-58.41	10.39	1.15	-49.17	-13.00	36.17
3465.000	V	36.78	-60.99	10.39	1.15	-51.75	-13.00	38.75
5197.500	H	36.55	-57.58	11.32	1.44	-47.70	-13.00	34.70
5197.500	V	37.01	-56.97	11.32	1.44	-47.09	-13.00	34.09
QPSK,Frequency:1754.3MHz								
70.34	H	30.97	-73.01	-4.83	0.15	-77.99	-13.00	64.99
66.27	V	35.85	-68.03	-6.98	0.15	-75.16	-13.00	62.16
3508.600	H	40.90	-56.92	10.41	1.19	-47.70	-13.00	34.70
3508.600	V	39.49	-58.27	10.41	1.19	-49.05	-13.00	36.05
5262.900	H	35.41	-58.29	11.36	1.47	-48.40	-13.00	35.40
5262.900	V	36.78	-56.69	11.36	1.47	-46.80	-13.00	33.80

LTE Band 5(30MHz-10GHz):

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
QPSK, Frequency: 824.7 MHz								
870.67	H	21.25	-48.26	0.00	0.58	-48.84	-13.00	35.84
751.51	V	20.24	-48.56	0.00	0.53	-49.09	-13.00	36.09
1649.400	H	61.08	-43.25	8.68	0.80	-35.37	-13.00	22.37
1649.400	V	55.12	-49.29	8.68	0.80	-41.41	-13.00	28.41
2474.100	H	55.64	-45.14	9.38	1.00	-36.76	-13.00	23.76
2474.100	V	51.21	-49.52	9.38	1.00	-41.14	-13.00	28.14
3298.800	H	38.44	-58.24	10.32	1.15	-49.07	-13.00	36.07
3298.800	V	40.87	-55.57	10.32	1.15	-46.40	-13.00	33.40
QPSK, Frequency: 836.5 MHz								
645.14	H	21.43	-52.19	0.00	0.52	-52.71	-13.00	39.71
705.96	V	20.57	-49.22	0.00	0.54	-49.76	-13.00	36.76
1673.000	H	59.03	-45.28	8.71	0.85	-37.42	-13.00	24.42
1673.000	V	57.04	-47.37	8.71	0.85	-39.51	-13.00	26.51
2509.500	H	56.14	-44.47	9.42	1.01	-36.06	-13.00	23.06
2509.500	V	53.04	-47.58	9.42	1.01	-39.17	-13.00	26.17
3346.000	H	41.73	-55.43	10.34	1.16	-46.25	-13.00	33.25
3346.000	V	42.45	-54.57	10.34	1.16	-45.39	-13.00	32.39
QPSK, Frequency: 848.3 MHz								
690.77	H	21.38	-51.99	0.00	0.54	-52.53	-13.00	39.53
792.50	V	20.48	-47.42	0.00	0.61	-48.03	-13.00	35.03
1696.600	H	60.88	-43.41	8.74	0.89	-35.56	-13.00	22.56
1696.600	V	56.14	-48.28	8.74	0.89	-40.43	-13.00	27.43
2544.900	H	56.34	-44.00	9.47	1.01	-35.54	-13.00	22.54
2544.900	V	52.78	-47.52	9.47	1.01	-39.06	-13.00	26.06
3393.200	H	40.64	-57.03	10.36	1.19	-47.86	-13.00	34.86
3393.200	V	41.48	-56.15	10.36	1.19	-46.98	-13.00	33.98

LTE Band 7 (30MHz-26.5GHz):

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
QPSK, Frequency: 2502.5 MHz								
70.83	H	30.66	-73.62	-4.58	0.15	-78.35	-25.00	53.35
69.60	V	35.44	-67.31	-5.21	0.15	-72.67	-25.00	47.67
5005.000	H	36.97	-55.99	11.20	1.47	-46.26	-25.00	21.26
5005.000	V	35.12	-57.70	11.20	1.47	-47.97	-25.00	22.97
7507.500	H	36.45	-53.34	10.90	1.95	-44.39	-25.00	19.39
7507.500	V	34.75	-55.54	10.90	1.95	-46.59	-25.00	21.59
QPSK, Frequency:2535 MHz								
70.33	H	31.54	-72.44	-4.84	0.15	-77.43	-25.00	52.43
45.69	V	36.31	-60.67	-19.12	0.12	-79.91	-25.00	54.91
5070.000	H	36.44	-56.75	11.24	1.47	-46.98	-25.00	21.98
5070.000	V	37.01	-56.08	11.24	1.47	-46.31	-25.00	21.31
7605.000	H	35.89	-53.58	10.88	2.01	-44.71	-25.00	19.71
7605.000	V	36.23	-53.96	10.88	2.01	-45.09	-25.00	20.09
QPSK, Frequency: 2567.5 MHz								
70.34	H	31.56	-72.42	-4.83	0.15	-77.40	-25.00	52.40
66.27	V	36.54	-67.34	-6.98	0.15	-74.47	-25.00	49.47
5135.000	H	35.43	-58.17	11.28	1.47	-48.36	-25.00	23.36
5135.000	V	34.78	-58.71	11.28	1.47	-48.90	-25.00	23.90
7702.500	H	36.01	-53.51	10.86	1.97	-44.62	-25.00	19.62
7702.500	V	35.55	-54.63	10.86	1.97	-45.74	-25.00	20.74

LTE Band 40(30MHz-26.5GHz):
LTE Band 40 Lower:

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
QPSK, Frequency: 2307.5MHz								
120.70	H	35.86	-76.24	0.00	0.20	-76.44	-40.00	36.44
121.12	V	42.59	-63.27	0.00	0.20	-63.47	-40.00	23.47
4615.000	H	37.56	-57.80	10.74	1.41	-48.47	-40.00	8.47
4615.000	V	38.42	-56.80	10.74	1.41	-47.47	-40.00	7.47
6922.500	H	35.42	-55.60	11.22	1.88	-46.26	-40.00	6.26
6922.500	V	33.98	-56.91	11.22	1.88	-47.57	-40.00	7.57
QPSK, Frequency:2312.5 MHz								
350.48	H	38.39	-71.57	0.00	0.36	-71.93	-40.00	31.93
43.66	V	41.99	-52.57	-21.57	0.12	-74.26	-40.00	34.26
4625.000	H	37.45	-57.84	10.75	1.41	-48.50	-40.00	8.50
4625.000	V	37.94	-57.23	10.75	1.41	-47.89	-40.00	7.89
6937.500	H	34.52	-56.46	11.21	1.90	-47.15	-40.00	7.15
6937.500	V	34.71	-56.13	11.21	1.90	-46.82	-40.00	6.82

LTE Band 40 Upper:

Frequency (MHz)	Polar (H/V)	Receiver Reading (dBμV)	Substituted Method			Absolute Level (dBm)	Limit (dBm)	Margin (dB)
			Substituted Level (dBm)	Antenna Gain (dBd/dBi)	Cable Loss (dB)			
QPSK, Frequency: 2352.5MHz								
131.30	H	35.86	-76.35	0.00	0.21	-76.56	-40.00	36.56
121.55	V	42.49	-63.41	0.00	0.20	-63.61	-40.00	23.61
4705.000	H	36.98	-57.80	10.85	1.41	-48.36	-40.00	8.36
4705.000	V	37.65	-57.15	10.85	1.41	-47.71	-40.00	7.71
7057.500	H	34.75	-55.26	11.17	1.92	-46.01	-40.00	6.01
7057.500	V	34.82	-55.08	11.17	1.92	-45.83	-40.00	5.83
QPSK, Frequency:2357.5 MHz								
550.95	H	39.93	-65.89	0.00	0.47	-66.36	-40.00	26.36
118.19	V	42.89	-62.96	0.00	0.20	-63.16	-40.00	23.16
4715.000	H	37.64	-57.07	10.86	1.41	-47.62	-40.00	7.62
4715.000	V	35.89	-58.82	10.86	1.41	-49.37	-40.00	9.37
7072.500	H	34.16	-55.64	11.16	1.91	-46.39	-40.00	6.39
7072.500	V	34.08	-55.63	11.16	1.91	-46.38	-40.00	6.38

Note:
1) The unit of Antenna Gain is dBd for frequency below 1GHz, and the unit of Antenna Gain is dBi for frequency above 1GHz.
2) Absolute Level = Substituted Level - Cable loss + Antenna Gain
3) Margin = Limit-Absolute Level

5. EUT PHOTOGRAPHS

Please refer to the attachment CR230743871-EXP EUT EXTERNAL PHOTOGRAPHS and CR230743871-INP EUT INTERNAL PHOTOGRAPHS

6. TEST SETUP PHOTOGRAPHS

Please refer to the attachment CR230743871-00E-TSP TEST SETUP PHOTOGRAPHS.

==== END OF REPORT =====