Appendix for LTE Band 5

Product Name: Rugged handheld
Model No: UA60

Appendix A: Average Power Output Data

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dBm)	Verdict
Band5	1.4MHz	QPSK	20407	1RB#0	22.67	PASS
Band5	1.4MHz	QPSK	20407	1RB#2	22.74	PASS
Band5	1.4MHz	QPSK	20407	1RB#5	22.67	PASS
Band5	1.4MHz	QPSK	20407	3RB#0	22.78	PASS
Band5	1.4MHz	QPSK	20407	3RB#1	22.75	PASS
Band5	1.4MHz	QPSK	20407	3RB#3	22.71	PASS
Band5	1.4MHz	QPSK	20407	6RB#0	21.95	PASS
Band5	1.4MHz	16QAM	20407	1RB#0	21.68	PASS
Band5	1.4MHz	16QAM	20407	1RB#2	21.70	PASS
Band5	1.4MHz	16QAM	20407	1RB#5	21.64	PASS
Band5	1.4MHz	16QAM	20407	3RB#0	21.91	PASS
Band5	1.4MHz	16QAM	20407	3RB#1	21.74	PASS
Band5	1.4MHz	16QAM	20407	3RB#3	21.72	PASS
Band5	1.4MHz	16QAM	20407	6RB#0	20.66	PASS
Band5	1.4MHz	QPSK	20525	1RB#0	22.55	PASS
Band5	1.4MHz	QPSK	20525	1RB#2	22.58	PASS
Band5	1.4MHz	QPSK	20525	1RB#5	22.58	PASS
Band5	1.4MHz	QPSK	20525	3RB#0	22.56	PASS
Band5	1.4MHz	QPSK	20525	3RB#1	22.61	PASS
Band5	1.4MHz	QPSK	20525	3RB#3	22.63	PASS
Band5	1.4MHz	QPSK	20525	6RB#0	21.56	PASS
Band5	1.4MHz	16QAM	20525	1RB#0	21.63	PASS
Band5	1.4MHz	16QAM	20525	1RB#2	21.41	PASS
Band5	1.4MHz	16QAM	20525	1RB#5	21.51	PASS
Band5	1.4MHz	16QAM	20525	3RB#0	21.55	PASS
Band5	1.4MHz	16QAM	20525	3RB#1	21.55	PASS
Band5	1.4MHz	16QAM	20525	3RB#3	21.64	PASS
Band5	1.4MHz	16QAM	20525	6RB#0	20.63	PASS
Band5	1.4MHz	QPSK	20643	1RB#0	22.61	PASS
Band5	1.4MHz	QPSK	20643	1RB#2	22.73	PASS
Band5	1.4MHz	QPSK	20643	1RB#5	22.69	PASS
Band5	1.4MHz	QPSK	20643	3RB#0	22.74	PASS
Band5	1.4MHz	QPSK	20643	3RB#1	22.73	PASS
Band5	1.4MHz	QPSK	20643	3RB#3	22.66	PASS
Band5	1.4MHz	QPSK	20643	6RB#0	21.79	PASS

Band5	1.4MHz	16QAM	20643	1RB#0	21.52	PASS
Band5	1.4MHz	16QAM	20643	1RB#2	21.70	PASS
Band5	1.4MHz	16QAM	20643	1RB#5	21.51	PASS
Band5	1.4MHz	16QAM	20643	3RB#0	21.69	PASS
Band5	1.4MHz	16QAM	20643	3RB#1	21.73	PASS
Band5	1.4MHz	16QAM	20643	3RB#3	21.71	PASS
Band5	1.4MHz	16QAM	20643	6RB#0	20.87	PASS
Band5	3MHz	QPSK	20415	1RB#0	22.77	PASS
Band5	3MHz	QPSK	20415	1RB#8	22.76	PASS
Band5	3MHz	QPSK	20415	1RB#14	22.73	PASS
Band5	3MHz	QPSK	20415	8RB#0	21.77	PASS
Band5	3MHz	QPSK	20415	8RB#4	21.76	PASS
Band5	3MHz	QPSK	20415	8RB#7	21.81	PASS
Band5	3MHz	QPSK	20415	15RB#0	21.90	PASS
Band5	3MHz	16QAM	20415	1RB#0	21.78	PASS
Band5	3MHz	16QAM	20415	1RB#8	21.70	PASS
Band5	3MHz	16QAM	20415	1RB#14	21.75	PASS
Band5	3MHz	16QAM	20415	8RB#0	20.79	PASS
Band5	3MHz	16QAM	20415	8RB#4	20.81	PASS
Band5	3MHz	16QAM	20415	8RB#7	20.74	PASS
Band5	3MHz	16QAM	20415	15RB#0	20.85	PASS
Band5	3MHz	QPSK	20525	1RB#0	22.64	PASS
Band5	3MHz	QPSK	20525	1RB#8	22.75	PASS
Band5	3MHz	QPSK	20525	1RB#14	22.62	PASS
Band5	3MHz	QPSK	20525	8RB#0	21.60	PASS
Band5	3MHz	QPSK	20525	8RB#4	21.62	PASS
Band5	3MHz	QPSK	20525	8RB#7	21.67	PASS
Band5	3MHz	QPSK	20525	15RB#0	21.67	PASS
Band5	3MHz	16QAM	20525	1RB#0	21.44	PASS
Band5	3MHz	16QAM	20525	1RB#8	21.64	PASS
Band5	3MHz	16QAM	20525	1RB#14	21.35	PASS
Band5	3MHz	16QAM	20525	8RB#0	20.57	PASS
Band5	3MHz	16QAM	20525	8RB#4	20.54	PASS
Band5	3MHz	16QAM	20525	8RB#7	20.68	PASS
Band5	3MHz	16QAM	20525	15RB#0	20.64	PASS
Band5	3MHz	QPSK	20635	1RB#0	22.66	PASS
Band5	3MHz	QPSK	20635	1RB#8	22.79	PASS
Band5	3MHz	QPSK	20635	1RB#14	22.75	PASS
Band5	3MHz	QPSK	20635	8RB#0	21.81	PASS
Band5	3MHz	QPSK	20635	8RB#4	21.77	PASS
Band5	3MHz	QPSK	20635	8RB#7	21.80	PASS
Band5	3MHz	QPSK	20635	15RB#0	21.85	PASS

Band5	3MHz	16QAM	20635	1RB#0	21.51	PASS
Band5	3MHz	16QAM	20635	1RB#8	21.68	PASS
Band5	3MHz	16QAM	20635	1RB#14	21.62	PASS
Band5	3MHz	16QAM	20635	8RB#0	20.78	PASS
Band5	3MHz	16QAM	20635	8RB#4	20.76	PASS
Band5	3MHz	16QAM	20635	8RB#7	20.69	PASS
Band5	3MHz	16QAM	20635	15RB#0	20.72	PASS
Band5	5MHz	QPSK	20425	1RB#0	22.76	PASS
Band5	5MHz	QPSK	20425	1RB#12	22.77	PASS
Band5	5MHz	QPSK	20425	1RB#24	22.64	PASS
Band5	5MHz	QPSK	20425	12RB#0	21.92	PASS
Band5	5MHz	QPSK	20425	12RB#6	21.93	PASS
Band5	5MHz	QPSK	20425	12RB#13	21.89	PASS
Band5	5MHz	QPSK	20425	25RB#0	22.04	PASS
Band5	5MHz	16QAM	20425	1RB#0	21.69	PASS
Band5	5MHz	16QAM	20425	1RB#12	21.89	PASS
Band5	5MHz	16QAM	20425	1RB#24	21.68	PASS
Band5	5MHz	16QAM	20425	12RB#0	20.97	PASS
Band5	5MHz	16QAM	20425	12RB#6	21.00	PASS
Band5	5MHz	16QAM	20425	12RB#13	20.89	PASS
Band5	5MHz	16QAM	20425	25RB#0	21.23	PASS
Band5	5MHz	QPSK	20525	1RB#0	22.70	PASS
Band5	5MHz	QPSK	20525	1RB#12	22.72	PASS
Band5	5MHz	QPSK	20525	1RB#24	22.72	PASS
Band5	5MHz	QPSK	20525	12RB#0	21.68	PASS
Band5	5MHz	QPSK	20525	12RB#6	21.69	PASS
Band5	5MHz	QPSK	20525	12RB#13	21.77	PASS
Band5	5MHz	QPSK	20525	25RB#0	21.67	PASS
Band5	5MHz	16QAM	20525	1RB#0	21.78	PASS
Band5	5MHz	16QAM	20525	1RB#12	21.80	PASS
Band5	5MHz	16QAM	20525	1RB#24	21.75	PASS
Band5	5MHz	16QAM	20525	12RB#0	20.67	PASS
Band5	5MHz	16QAM	20525	12RB#6	20.62	PASS
Band5	5MHz	16QAM	20525	12RB#13	20.71	PASS
Band5	5MHz	16QAM	20525	25RB#0	20.66	PASS
Band5	5MHz	QPSK	20625	1RB#0	22.68	PASS
Band5	5MHz	QPSK	20625	1RB#12	22.81	PASS
Band5	5MHz	QPSK	20625	1RB#24	22.77	PASS
Band5	5MHz	QPSK	20625	12RB#0	21.85	PASS
Band5	5MHz	QPSK	20625	12RB#6	21.85	PASS
Band5	5MHz	QPSK	20625	12RB#13	21.81	PASS
Band5	5MHz	QPSK	20625	25RB#0	21.89	PASS

Band5	5MHz	16QAM	20625	1RB#0	21.75	PASS
Band5	5MHz	16QAM	20625	1RB#12	21.75	PASS
Band5	5MHz	16QAM	20625	1RB#24	21.63	PASS
Band5	5MHz	16QAM	20625	12RB#0	20.83	PASS
Band5	5MHz	16QAM	20625	12RB#6	20.77	PASS
Band5	5MHz	16QAM	20625	12RB#13	20.78	PASS
Band5	5MHz	16QAM	20625	25RB#0	20.84	PASS
Band5	10MHz	QPSK	20450	1RB#0	22.63	PASS
Band5	10MHz	QPSK	20450	1RB#24	22.62	PASS
Band5	10MHz	QPSK	20450	1RB#49	22.62	PASS
Band5	10MHz	QPSK	20450	25RB#0	21.70	PASS
Band5	10MHz	QPSK	20450	25RB#12	22.12	PASS
Band5	10MHz	QPSK	20450	25RB#25	22.25	PASS
Band5	10MHz	QPSK	20450	50RB#0	21.89	PASS
Band5	10MHz	16QAM	20450	1RB#0	21.91	PASS
Band5	10MHz	16QAM	20450	1RB#24	21.56	PASS
Band5	10MHz	16QAM	20450	1RB#49	21.48	PASS
Band5	10MHz	16QAM	20450	25RB#0	21.08	PASS
Band5	10MHz	16QAM	20450	25RB#12	21.31	PASS
Band5	10MHz	16QAM	20450	25RB#25	20.98	PASS
Band5	10MHz	16QAM	20450	50RB#0	21.25	PASS
Band5	10MHz	QPSK	20525	1RB#0	22.68	PASS
Band5	10MHz	QPSK	20525	1RB#24	22.71	PASS
Band5	10MHz	QPSK	20525	1RB#49	22.56	PASS
Band5	10MHz	QPSK	20525	25RB#0	21.81	PASS
Band5	10MHz	QPSK	20525	25RB#12	21.75	PASS
Band5	10MHz	QPSK	20525	25RB#25	22.46	PASS
Band5	10MHz	QPSK	20525	50RB#0	21.71	PASS
Band5	10MHz	16QAM	20525	1RB#0	21.49	PASS
Band5	10MHz	16QAM	20525	1RB#24	21.50	PASS
Band5	10MHz	16QAM	20525	1RB#49	21.51	PASS
Band5	10MHz	16QAM	20525	25RB#0	20.58	PASS
Band5	10MHz	16QAM	20525	25RB#12	21.00	PASS
Band5	10MHz	16QAM	20525	25RB#25	20.81	PASS
Band5	10MHz	16QAM	20525	50RB#0	20.63	PASS
Band5	10MHz	QPSK	20600	1RB#0	22.57	PASS
Band5	10MHz	QPSK	20600	1RB#24	22.67	PASS
Band5	10MHz	QPSK	20600	1RB#49	22.90	PASS
Band5	10MHz	QPSK	20600	25RB#0	22.13	PASS
Band5	10MHz	QPSK	20600	25RB#12	22.12	PASS
Band5	10MHz	QPSK	20600	25RB#25	21.94	PASS
Band5	10MHz	QPSK	20600	50RB#0	21.47	PASS

Band5	10MHz	16QAM	20600	1RB#0	21.54	PASS
Band5	10MHz	16QAM	20600	1RB#24	21.77	PASS
Band5	10MHz	16QAM	20600	1RB#49	21.68	PASS
Band5	10MHz	16QAM	20600	25RB#0	21.28	PASS
Band5	10MHz	16QAM	20600	25RB#12	21.21	PASS
Band5	10MHz	16QAM	20600	25RB#25	20.84	PASS
Band5	10MHz	16QAM	20600	50RB#0	20.41	PASS

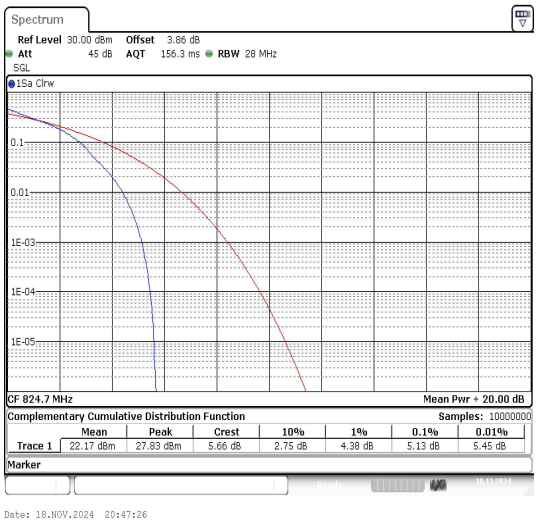
Appendix B: Peak-to-Average Ratio(CCDF)

Test Result

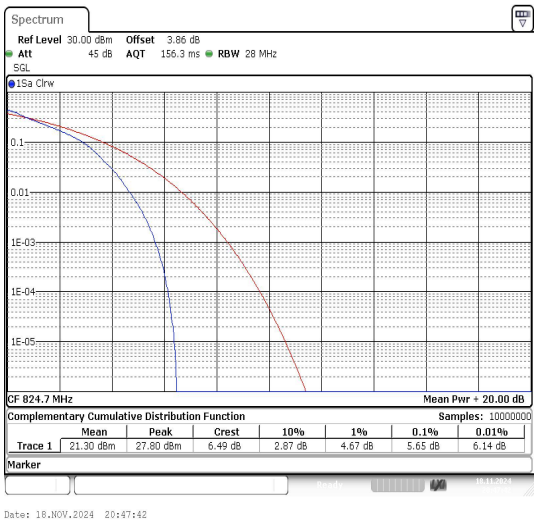
Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dB)	Limit(dB)	Verdict
Band5	1.4MHz	QPSK	20407	1RB#0	5.13	13	PASS
Band5	1.4MHz	QPSK	20407	6RB#0	5.65	13	PASS
Band5	1.4MHz	16QAM	20407	1RB#0	6.06	13	PASS
Band5	1.4MHz	16QAM	20407	6RB#0	6.49	13	PASS
Band5	1.4MHz	QPSK	20525	1RB#0	4.43	13	PASS
Band5	1.4MHz	QPSK	20525	6RB#0	5.10	13	PASS
Band5	1.4MHz	16QAM	20525	1RB#0	5.42	13	PASS
Band5	1.4MHz	16QAM	20525	6RB#0	5.97	13	PASS
Band5	1.4MHz	QPSK	20643	1RB#0	4.72	13	PASS
Band5	1.4MHz	QPSK	20643	6RB#0	5.30	13	PASS
Band5	1.4MHz	16QAM	20643	1RB#0	5.68	13	PASS
Band5	1.4MHz	16QAM	20643	6RB#0	6.14	13	PASS
Band5	3MHz	QPSK	20415	1RB#0	5.25	13	PASS
Band5	3MHz	QPSK	20415	15RB#0	5.68	13	PASS
Band5	3MHz	16QAM	20415	1RB#0	6.06	13	PASS
Band5	3MHz	16QAM	20415	15RB#0	6.49	13	PASS
Band5	3MHz	QPSK	20525	1RB#0	4.49	13	PASS
Band5	3MHz	QPSK	20525	15RB#0	5.16	13	PASS
Band5	3MHz	16QAM	20525	1RB#0	5.45	13	PASS
Band5	3MHz	16QAM	20525	15RB#0	6.00	13	PASS
Band5	3MHz	QPSK	20635	1RB#0	4.93	13	PASS
Band5	3MHz	QPSK	20635	15RB#0	5.36	13	PASS
Band5	3MHz	16QAM	20635	1RB#0	5.83	13	PASS
Band5	3MHz	16QAM	20635	15RB#0	6.17	13	PASS
Band5	5MHz	QPSK	20425	1RB#0	5.16	13	PASS
Band5	5MHz	QPSK	20425	25RB#0	5.57	13	PASS
Band5	5MHz	16QAM	20425	1RB#0	6.12	13	PASS
Band5	5MHz	16QAM	20425	25RB#0	6.46	13	PASS
Band5	5MHz	QPSK	20525	1RB#0	4.49	13	PASS
Band5	5MHz	QPSK	20525	25RB#0	5.16	13	PASS
Band5	5MHz	16QAM	20525	1RB#0	5.42	13	PASS
Band5	5MHz	16QAM	20525	25RB#0	6.00	13	PASS
Band5	5MHz	QPSK	20625	1RB#0	5.33	13	PASS
Band5	5MHz	QPSK	20625	25RB#0	5.36	13	PASS
Band5	5MHz	16QAM	20625	1RB#0	6.17	13	PASS
Band5	5MHz	16QAM	20625	25RB#0	6.26	13	PASS
Band5	10MHz	QPSK	20450	1RB#0	5.19	13	PASS

Band5	10MHz	QPSK	20450	50RB#0	5.39	13	PASS
Band5	10MHz	16QAM	20450	1RB#0	6.14	13	PASS
Band5	10MHz	16QAM	20450	50RB#0	6.38	13	PASS
Band5	10MHz	QPSK	20525	1RB#0	4.90	13	PASS
Band5	10MHz	QPSK	20525	50RB#0	5.33	13	PASS
Band5	10MHz	16QAM	20525	1RB#0	5.80	13	PASS
Band5	10MHz	16QAM	20525	50RB#0	6.29	13	PASS
Band5	10MHz	QPSK	20600	1RB#0	5.16	13	PASS
Band5	10MHz	QPSK	20600	50RB#0	5.48	13	PASS
Band5	10MHz	16QAM	20600	1RB#0	6.06	13	PASS
Band5	10MHz	16QAM	20600	50RB#0	6.35	13	PASS

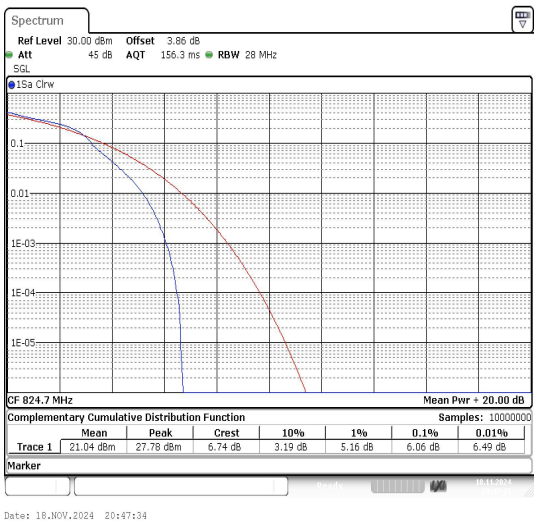
Test Graphs



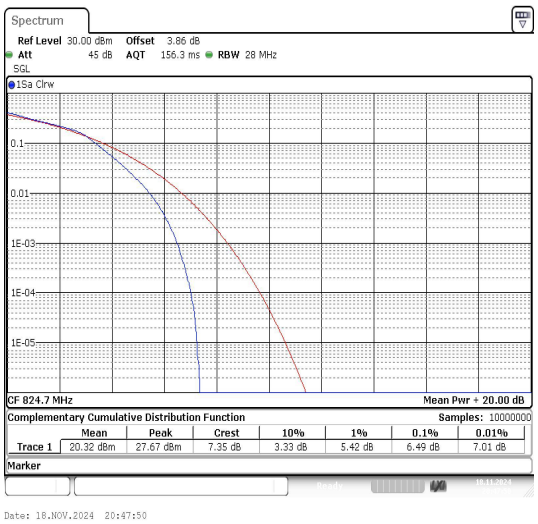
Band5-1.4MHz-QPSK-20407-1RB#0-PASS



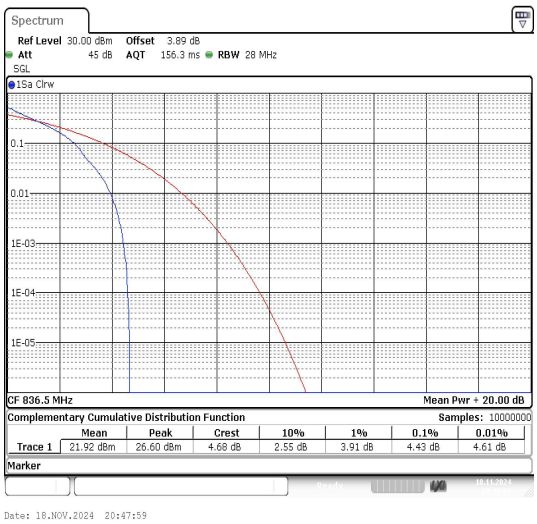
Band5-1.4MHz-QPSK-20407-6RB#0-PASS



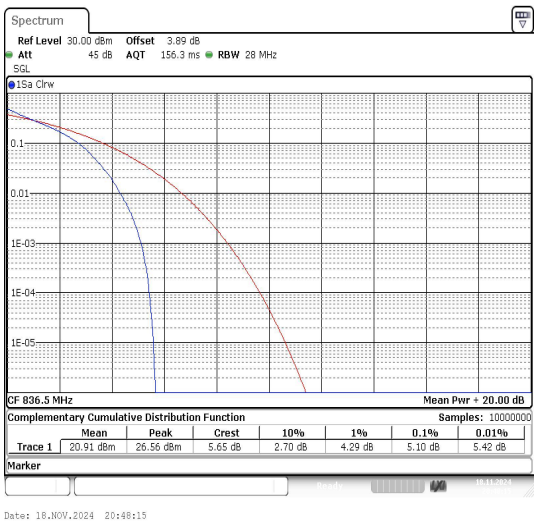
Band5-1.4MHz-16QAM-20407-1RB#0-PASS



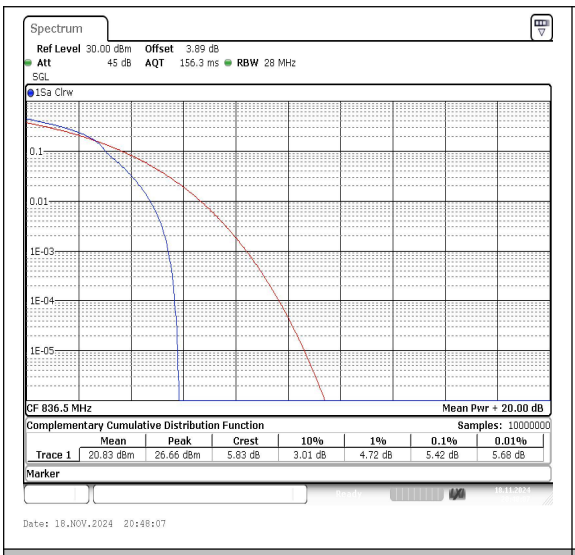
Band5-1.4MHz-16QAM-20407-6RB#0-PASS



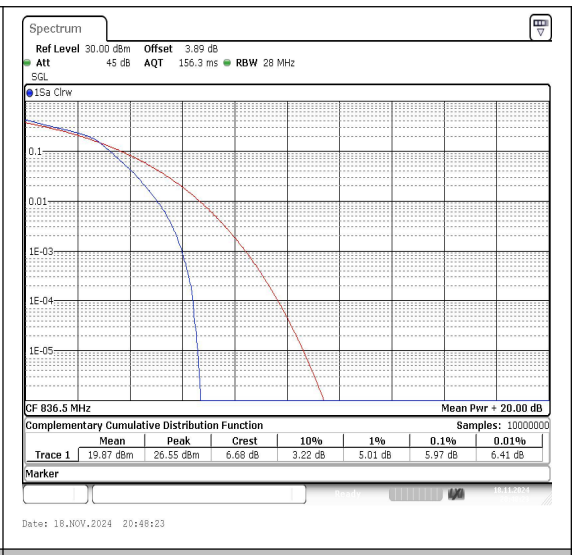
Band5-1.4MHz-QPSK-20525-1RB#0-PASS



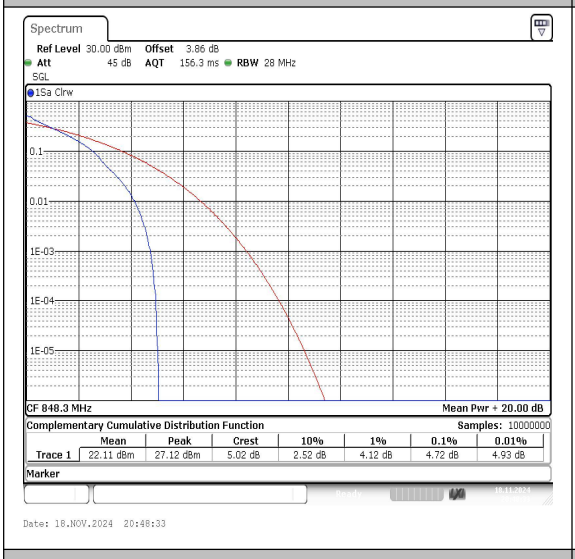
Band5-1.4MHz-QPSK-20525-6RB#0-PASS



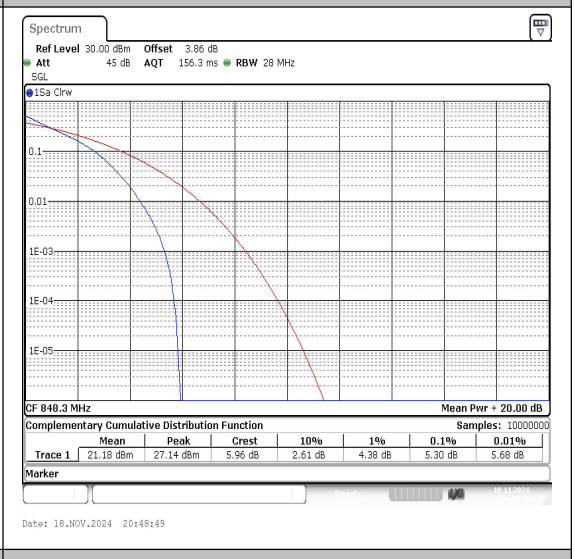
Band5-1.4MHz-16QAM-20525-1RB#0-PASS



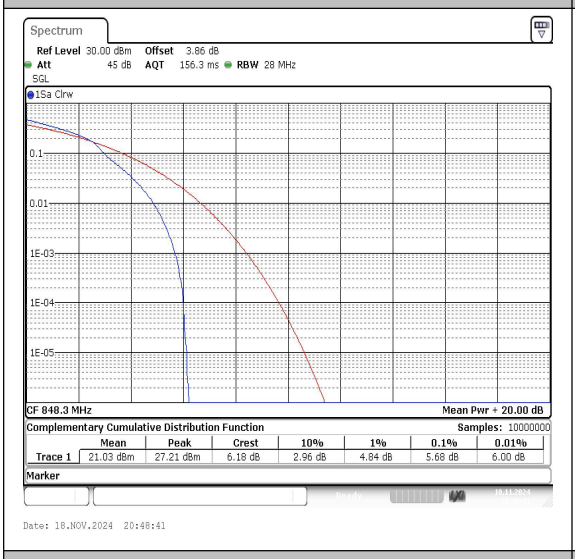
Band5-1.4MHz-16QAM-20525-6RB#0-PASS



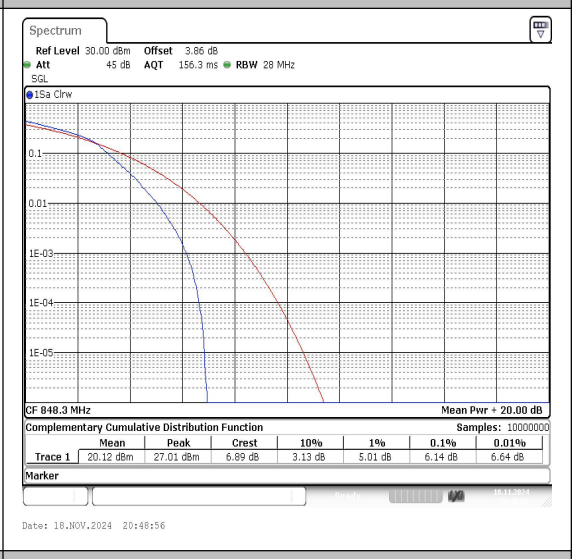
Band5-1.4MHz-QPSK-20643-1RB#0-PASS



Band5-1.4MHz-QPSK-20643-6RB#0-PASS



Band5-1.4MHz-16QAM-20643-1RB#0-PASS



Band5-1.4MHz-16QAM-20643-6RB#0-PASS