Appendix for LTE Band 12

Product Name: Rugged handheld
Model No: UA60

Appendix A: Average Power Output Data

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dBm)	Verdict
Band12	1.4MHz	QPSK	23017	1RB#0	22.81	PASS
Band12	1.4MHz	QPSK	23017	1RB#2	22.84	PASS
Band12	1.4MHz	QPSK	23017	1RB#5	22.81	PASS
Band12	1.4MHz	QPSK	23017	3RB#0	22.83	PASS
Band12	1.4MHz	QPSK	23017	3RB#1	22.80	PASS
Band12	1.4MHz	QPSK	23017	3RB#3	22.84	PASS
Band12	1.4MHz	QPSK	23017	6RB#0	21.82	PASS
Band12	1.4MHz	16QAM	23017	1RB#0	21.77	PASS
Band12	1.4MHz	16QAM	23017	1RB#2	21.64	PASS
Band12	1.4MHz	16QAM	23017	1RB#5	21.75	PASS
Band12	1.4MHz	16QAM	23017	3RB#0	21.78	PASS
Band12	1.4MHz	16QAM	23017	3RB#1	21.84	PASS
Band12	1.4MHz	16QAM	23017	3RB#3	21.81	PASS
Band12	1.4MHz	16QAM	23017	6RB#0	20.82	PASS
Band12	1.4MHz	QPSK	23095	1RB#0	22.71	PASS
Band12	1.4MHz	QPSK	23095	1RB#2	22.79	PASS
Band12	1.4MHz	QPSK	23095	1RB#5	22.74	PASS
Band12	1.4MHz	QPSK	23095	3RB#0	22.77	PASS
Band12	1.4MHz	QPSK	23095	3RB#1	22.77	PASS
Band12	1.4MHz	QPSK	23095	3RB#3	22.80	PASS
Band12	1.4MHz	QPSK	23095	6RB#0	21.71	PASS
Band12	1.4MHz	16QAM	23095	1RB#0	21.61	PASS
Band12	1.4MHz	16QAM	23095	1RB#2	21.73	PASS
Band12	1.4MHz	16QAM	23095	1RB#5	21.66	PASS
Band12	1.4MHz	16QAM	23095	3RB#0	21.72	PASS
Band12	1.4MHz	16QAM	23095	3RB#1	21.78	PASS
Band12	1.4MHz	16QAM	23095	3RB#3	21.80	PASS
Band12	1.4MHz	16QAM	23095	6RB#0	20.76	PASS
Band12	1.4MHz	QPSK	23173	1RB#0	22.71	PASS
Band12	1.4MHz	QPSK	23173	1RB#2	22.79	PASS
Band12	1.4MHz	QPSK	23173	1RB#5	22.66	PASS
Band12	1.4MHz	QPSK	23173	3RB#0	22.71	PASS
Band12	1.4MHz	QPSK	23173	3RB#1	22.74	PASS
Band12	1.4MHz	QPSK	23173	3RB#3	22.71	PASS
Band12	1.4MHz	QPSK	23173	6RB#0	21.73	PASS
Band12	1.4MHz	16QAM	23173	1RB#0	21.43	PASS

Band12	1.4MHz	16QAM	23173	1RB#2	21.57	PASS
Band12	1.4MHz	16QAM	23173	1RB#5	21.47	PASS
Band12	1.4MHz	16QAM	23173	3RB#0	21.68	PASS
Band12	1.4MHz	16QAM	23173	3RB#1	21.62	PASS
Band12	1.4MHz	16QAM	23173	3RB#3	21.66	PASS
Band12	1.4MHz	16QAM	23173	6RB#0	20.65	PASS
Band12	3MHz	QPSK	23025	1RB#0	22.81	PASS
Band12	3MHz	QPSK	23025	1RB#8	22.83	PASS
Band12	3MHz	QPSK	23025	1RB#14	22.80	PASS
Band12	3MHz	QPSK	23025	8RB#0	21.85	PASS
Band12	3MHz	QPSK	23025	8RB#4	21.86	PASS
Band12	3MHz	QPSK	23025	8RB#7	21.85	PASS
Band12	3MHz	QPSK	23025	15RB#0	21.87	PASS
Band12	3MHz	16QAM	23025	1RB#0	21.77	PASS
Band12	3MHz	16QAM	23025	1RB#8	21.87	PASS
Band12	3MHz	16QAM	23025	1RB#14	21.86	PASS
Band12	3MHz	16QAM	23025	8RB#0	20.78	PASS
Band12	3MHz	16QAM	23025	8RB#4	20.77	PASS
Band12	3MHz	16QAM	23025	8RB#7	20.83	PASS
Band12	3MHz	16QAM	23025	15RB#0	20.80	PASS
Band12	3MHz	QPSK	23095	1RB#0	22.72	PASS
Band12	3MHz	QPSK	23095	1RB#8	22.84	PASS
Band12	3MHz	QPSK	23095	1RB#14	22.72	PASS
Band12	3MHz	QPSK	23095	8RB#0	21.75	PASS
Band12	3MHz	QPSK	23095	8RB#4	21.77	PASS
Band12	3MHz	QPSK	23095	8RB#7	21.78	PASS
Band12	3MHz	QPSK	23095	15RB#0	21.72	PASS
Band12	3MHz	16QAM	23095	1RB#0	21.60	PASS
Band12	3MHz	16QAM	23095	1RB#8	21.88	PASS
Band12	3MHz	16QAM	23095	1RB#14	21.64	PASS
Band12	3MHz	16QAM	23095	8RB#0	20.77	PASS
Band12	3MHz	16QAM	23095	8RB#4	20.69	PASS
Band12	3MHz	16QAM	23095	8RB#7	20.81	PASS
Band12	3MHz	16QAM	23095	15RB#0	20.70	PASS
Band12	3MHz	QPSK	23165	1RB#0	22.76	PASS
Band12	3MHz	QPSK	23165	1RB#8	22.77	PASS
Band12	3MHz	QPSK	23165	1RB#14	22.73	PASS
Band12	3MHz	QPSK	23165	8RB#0	21.82	PASS
Band12	3MHz	QPSK	23165	8RB#4	21.78	PASS
Band12	3MHz	QPSK	23165	8RB#7	21.81	PASS
Band12	3MHz	QPSK	23165	15RB#0	21.78	PASS
Band12	3MHz	16QAM	23165	1RB#0	21.76	PASS

Band12	3MHz	16QAM	23165	1RB#8	21.93	PASS
Band12	3MHz	16QAM	23165	1RB#14	21.60	PASS
Band12	3MHz	16QAM	23165	8RB#0	20.82	PASS
Band12	3MHz	16QAM	23165	8RB#4	20.77	PASS
Band12	3MHz	16QAM	23165	8RB#7	20.72	PASS
Band12	3MHz	16QAM	23165	15RB#0	20.78	PASS
Band12	5MHz	QPSK	23035	1RB#0	22.83	PASS
Band12	5MHz	QPSK	23035	1RB#12	22.88	PASS
Band12	5MHz	QPSK	23035	1RB#24	22.76	PASS
Band12	5MHz	QPSK	23035	12RB#0	21.85	PASS
Band12	5MHz	QPSK	23035	12RB#6	21.84	PASS
Band12	5MHz	QPSK	23035	12RB#13	21.81	PASS
Band12	5MHz	QPSK	23035	25RB#0	21.87	PASS
Band12	5MHz	16QAM	23035	1RB#0	21.71	PASS
Band12	5MHz	16QAM	23035	1RB#12	21.85	PASS
Band12	5MHz	16QAM	23035	1RB#24	21.61	PASS
Band12	5MHz	16QAM	23035	12RB#0	20.87	PASS
Band12	5MHz	16QAM	23035	12RB#6	20.93	PASS
Band12	5MHz	16QAM	23035	12RB#13	20.79	PASS
Band12	5MHz	16QAM	23035	25RB#0	20.87	PASS
Band12	5MHz	QPSK	23095	1RB#0	22.83	PASS
Band12	5MHz	QPSK	23095	1RB#12	22.86	PASS
Band12	5MHz	QPSK	23095	1RB#24	22.78	PASS
Band12	5MHz	QPSK	23095	12RB#0	21.78	PASS
Band12	5MHz	QPSK	23095	12RB#6	21.74	PASS
Band12	5MHz	QPSK	23095	12RB#13	21.84	PASS
Band12	5MHz	QPSK	23095	25RB#0	21.77	PASS
Band12	5MHz	16QAM	23095	1RB#0	21.93	PASS
Band12	5MHz	16QAM	23095	1RB#12	21.94	PASS
Band12	5MHz	16QAM	23095	1RB#24	21.82	PASS
Band12	5MHz	16QAM	23095	12RB#0	20.73	PASS
Band12	5MHz	16QAM	23095	12RB#6	20.72	PASS
Band12	5MHz	16QAM	23095	12RB#13	20.85	PASS
Band12	5MHz	16QAM	23095	25RB#0	20.78	PASS
Band12	5MHz	QPSK	23155	1RB#0	22.77	PASS
Band12	5MHz	QPSK	23155	1RB#12	22.81	PASS
Band12	5MHz	QPSK	23155	1RB#24	22.82	PASS
Band12	5MHz	QPSK	23155	12RB#0	21.82	PASS
Band12	5MHz	QPSK	23155	12RB#6	21.80	PASS
Band12	5MHz	QPSK	23155	12RB#13	21.78	PASS
Band12	5MHz	QPSK	23155	25RB#0	21.81	PASS
Band12	5MHz	16QAM	23155	1RB#0	21.80	PASS

Band12	5MHz	16QAM	23155	1RB#12	21.79	PASS
Band12	5MHz	16QAM	23155	1RB#24	21.73	PASS
Band12	5MHz	16QAM	23155	12RB#0	20.89	PASS
Band12	5MHz	16QAM	23155	12RB#6	20.91	PASS
Band12	5MHz	16QAM	23155	12RB#13	20.78	PASS
Band12	5MHz	16QAM	23155	25RB#0	20.84	PASS
Band12	10MHz	QPSK	23060	1RB#0	22.89	PASS
Band12	10MHz	QPSK	23060	1RB#24	22.76	PASS
Band12	10MHz	QPSK	23060	1RB#49	22.78	PASS
Band12	10MHz	QPSK	23060	25RB#0	21.85	PASS
Band12	10MHz	QPSK	23060	25RB#12	21.84	PASS
Band12	10MHz	QPSK	23060	25RB#25	21.81	PASS
Band12	10MHz	QPSK	23060	50RB#0	21.83	PASS
Band12	10MHz	16QAM	23060	1RB#0	21.94	PASS
Band12	10MHz	16QAM	23060	1RB#24	21.83	PASS
Band12	10MHz	16QAM	23060	1RB#49	21.87	PASS
Band12	10MHz	16QAM	23060	25RB#0	20.84	PASS
Band12	10MHz	16QAM	23060	25RB#12	20.84	PASS
Band12	10MHz	16QAM	23060	25RB#25	20.79	PASS
Band12	10MHz	16QAM	23060	50RB#0	20.82	PASS
Band12	10MHz	QPSK	23095	1RB#0	22.83	PASS
Band12	10MHz	QPSK	23095	1RB#24	22.89	PASS
Band12	10MHz	QPSK	23095	1RB#49	22.76	PASS
Band12	10MHz	QPSK	23095	25RB#0	21.80	PASS
Band12	10MHz	QPSK	23095	25RB#12	21.82	PASS
Band12	10MHz	QPSK	23095	25RB#25	21.82	PASS
Band12	10MHz	QPSK	23095	50RB#0	21.76	PASS
Band12	10MHz	16QAM	23095	1RB#0	21.81	PASS
Band12	10MHz	16QAM	23095	1RB#24	21.86	PASS
Band12	10MHz	16QAM	23095	1RB#49	21.68	PASS
Band12	10MHz	16QAM	23095	25RB#0	20.82	PASS
Band12	10MHz	16QAM	23095	25RB#12	20.80	PASS
Band12	10MHz	16QAM	23095	25RB#25	20.85	PASS
Band12	10MHz	16QAM	23095	50RB#0	20.76	PASS
Band12	10MHz	QPSK	23130	1RB#0	22.83	PASS
Band12	10MHz	QPSK	23130	1RB#24	22.89	PASS
Band12	10MHz	QPSK	23130	1RB#49	22.72	PASS
Band12	10MHz	QPSK	23130	25RB#0	21.82	PASS
Band12	10MHz	QPSK	23130	25RB#12	21.77	PASS
Band12	10MHz	QPSK	23130	25RB#25	21.84	PASS
Band12	10MHz	QPSK	23130	50RB#0	21.79	PASS
Band12	10MHz	16QAM	23130	1RB#0	21.86	PASS

Band12	10MHz	16QAM	23130	1RB#24	21.78	PASS
Band12	10MHz	16QAM	23130	1RB#49	21.74	PASS
Band12	10MHz	16QAM	23130	25RB#0	20.86	PASS
Band12	10MHz	16QAM	23130	25RB#12	20.83	PASS
Band12	10MHz	16QAM	23130	25RB#25	20.88	PASS
Band12	10MHz	16QAM	23130	50RB#0	20.82	PASS

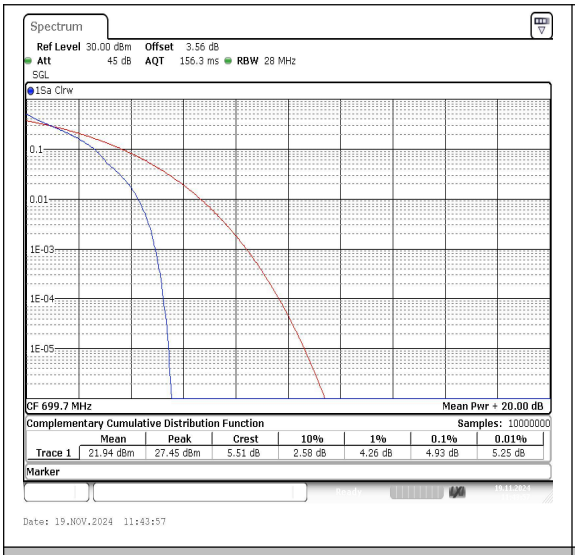
Appendix B: Peak-to-Average Ratio(CCDF)

Test Result

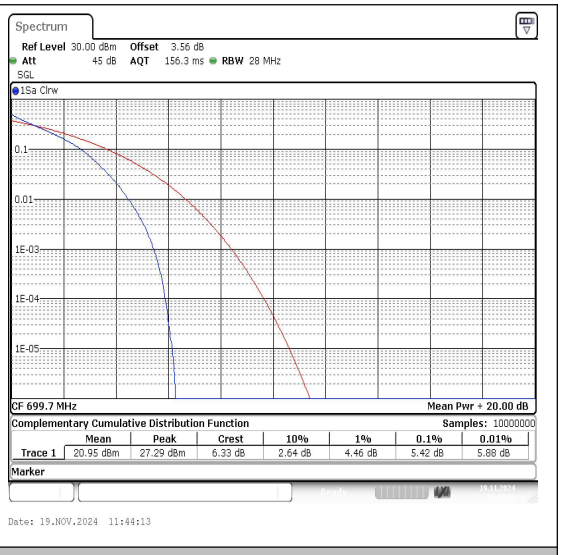
Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dB)	Limit(dB)	Verdict
Band12	1.4MHz	QPSK	23017	1RB#0	4.93	13	PASS
Band12	1.4MHz	QPSK	23017	6RB#0	5.42	13	PASS
Band12	1.4MHz	16QAM	23017	1RB#0	5.88	13	PASS
Band12	1.4MHz	16QAM	23017	6RB#0	6.26	13	PASS
Band12	1.4MHz	QPSK	23095	1RB#0	4.75	13	PASS
Band12	1.4MHz	QPSK	23095	6RB#0	5.30	13	PASS
Band12	1.4MHz	16QAM	23095	1RB#0	5.68	13	PASS
Band12	1.4MHz	16QAM	23095	6RB#0	6.14	13	PASS
Band12	1.4MHz	QPSK	23173	1RB#0	4.26	13	PASS
Band12	1.4MHz	QPSK	23173	6RB#0	4.81	13	PASS
Band12	1.4MHz	16QAM	23173	1RB#0	5.22	13	PASS
Band12	1.4MHz	16QAM	23173	6RB#0	5.68	13	PASS
Band12	3MHz	QPSK	23025	1RB#0	4.93	13	PASS
Band12	3MHz	QPSK	23025	15RB#0	5.39	13	PASS
Band12	3MHz	16QAM	23025	1RB#0	5.80	13	PASS
Band12	3MHz	16QAM	23025	15RB#0	6.20	13	PASS
Band12	3MHz	QPSK	23095	1RB#0	4.67	13	PASS
Band12	3MHz	QPSK	23095	15RB#0	5.30	13	PASS
Band12	3MHz	16QAM	23095	1RB#0	5.65	13	PASS
Band12	3MHz	16QAM	23095	15RB#0	6.12	13	PASS
Band12	3MHz	QPSK	23165	1RB#0	4.46	13	PASS
Band12	3MHz	QPSK	23165	15RB#0	4.93	13	PASS
Band12	3MHz	16QAM	23165	1RB#0	5.39	13	PASS
Band12	3MHz	16QAM	23165	15RB#0	5.77	13	PASS
Band12	5MHz	QPSK	23035	1RB#0	4.90	13	PASS
Band12	5MHz	QPSK	23035	25RB#0	5.36	13	PASS
Band12	5MHz	16QAM	23035	1RB#0	5.83	13	PASS
Band12	5MHz	16QAM	23035	25RB#0	6.14	13	PASS
Band12	5MHz	QPSK	23095	1RB#0	4.61	13	PASS
Band12	5MHz	QPSK	23095	25RB#0	5.28	13	PASS
Band12	5MHz	16QAM	23095	1RB#0	5.48	13	PASS
Band12	5MHz	16QAM	23095	25RB#0	6.09	13	PASS
Band12	5MHz	QPSK	23155	1RB#0	4.72	13	PASS
Band12	5MHz	QPSK	23155	25RB#0	5.04	13	PASS
Band12	5MHz	16QAM	23155	1RB#0	5.57	13	PASS
Band12	5MHz	16QAM	23155	25RB#0	5.88	13	PASS
Band12	10MHz	QPSK	23060	1RB#0	4.87	13	PASS

Band12	10MHz	QPSK	23060	50RB#0	5.33	13	PASS
Band12	10MHz	16QAM	23060	1RB#0	5.77	13	PASS
Band12	10MHz	16QAM	23060	50RB#0	6.14	13	PASS
Band12	10MHz	QPSK	23095	1RB#0	4.64	13	PASS
Band12	10MHz	QPSK	23095	50RB#0	5.25	13	PASS
Band12	10MHz	16QAM	23095	1RB#0	5.51	13	PASS
Band12	10MHz	16QAM	23095	50RB#0	6.09	13	PASS
Band12	10MHz	QPSK	23130	1RB#0	4.70	13	PASS
Band12	10MHz	QPSK	23130	50RB#0	5.19	13	PASS
Band12	10MHz	16QAM	23130	1RB#0	5.57	13	PASS
Band12	10MHz	16QAM	23130	50RB#0	6.00	13	PASS

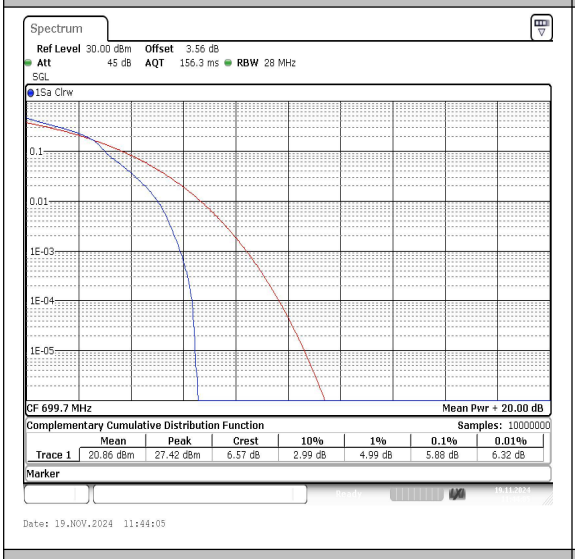
Test Graphs



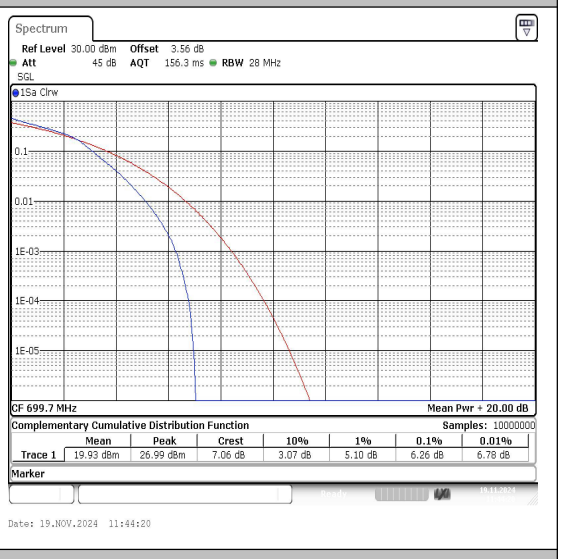
Band12-1.4MHz-QPSK-23017-1RB#0-PASS



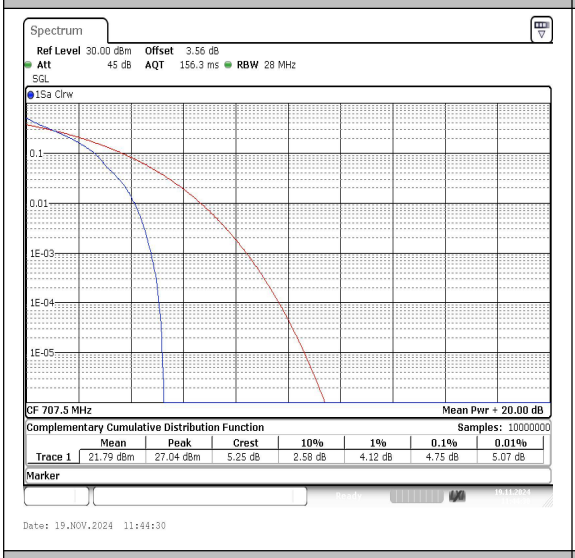
Band12-1.4MHz-QPSK-23017-6RB#0-PASS



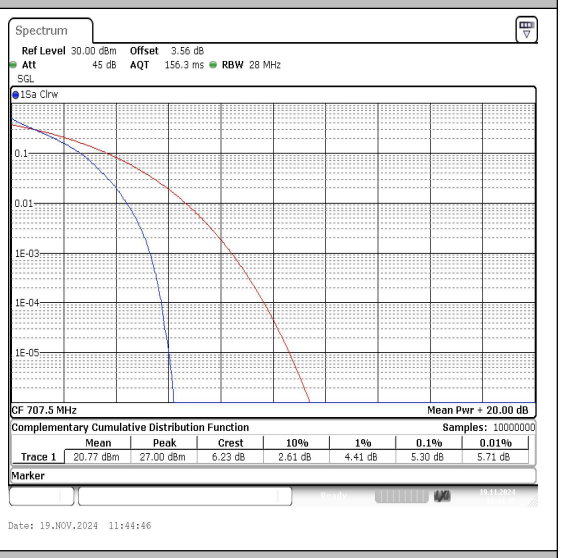
Band12-1.4MHz-16QAM-23017-1RB#0-PASS



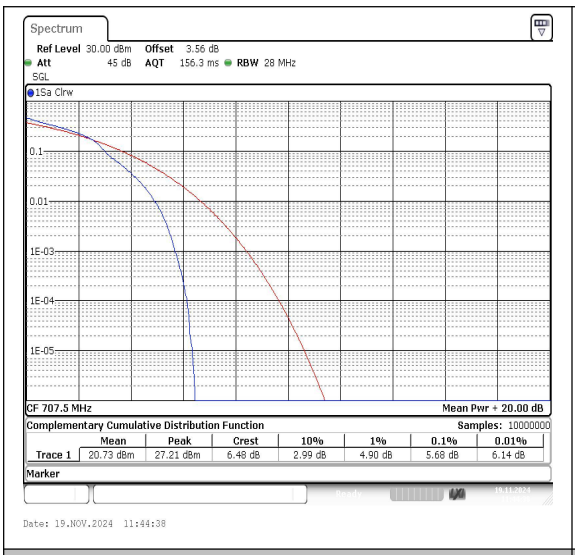
Band12-1.4MHz-16QAM-23017-6RB#0-PASS



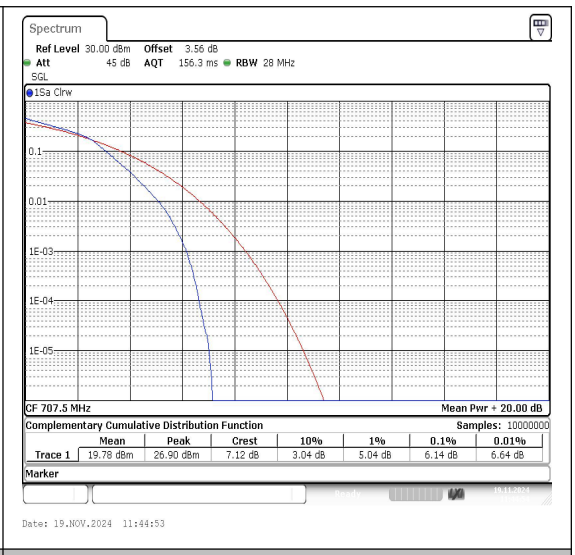
Band12-1.4MHz-QPSK-23095-1RB#0-PASS



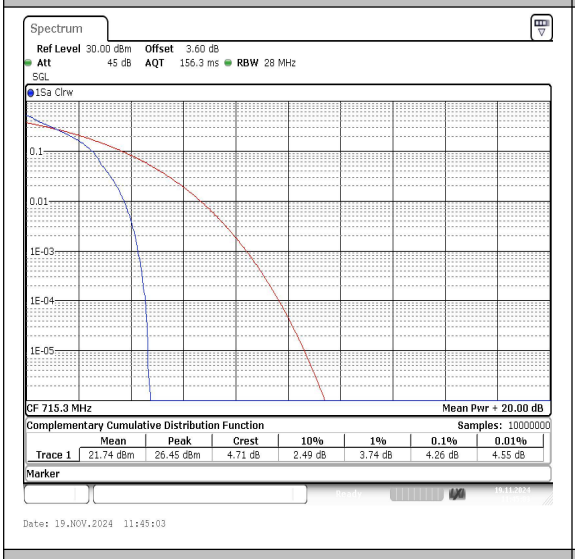
Band12-1.4MHz-QPSK-23095-6RB#0-PASS



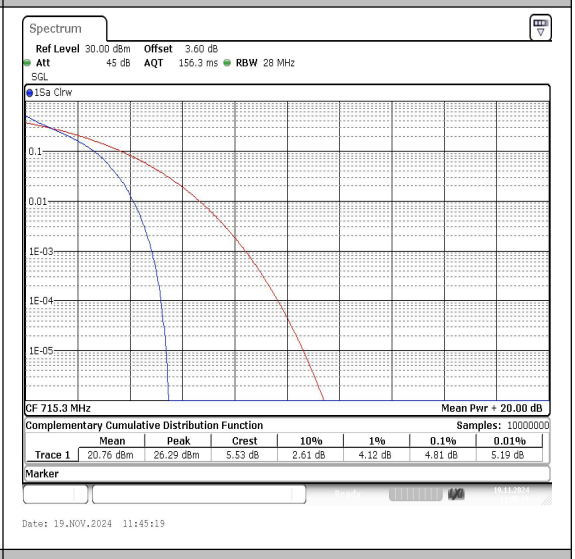
Band12-1.4MHz-16QAM-23095-1RB#0-PASS



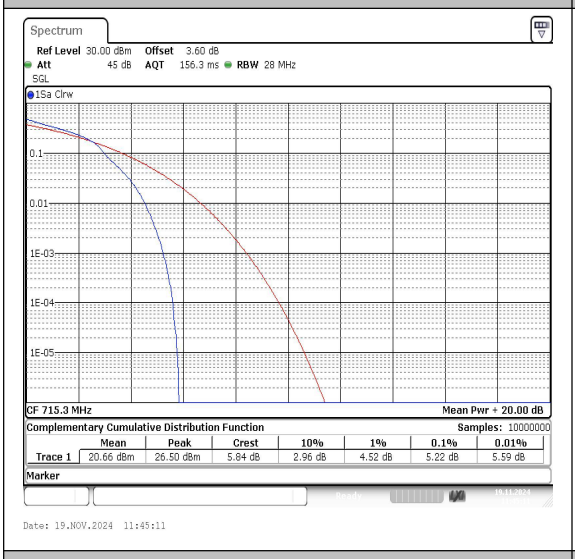
Band12-1.4MHz-16QAM-23095-6RB#0-PASS



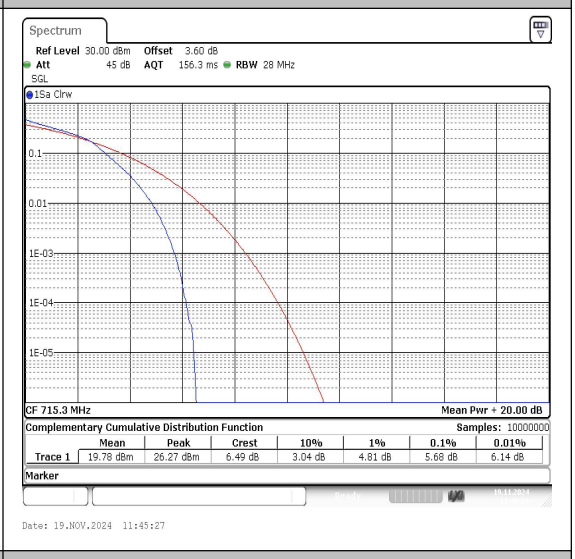
Band12-1.4MHz-QPSK-23173-1RB#0-PASS



Band12-1.4MHz-QPSK-23173-6RB#0-PASS



Band12-1.4MHz-16QAM-23173-1RB#0-PASS



Band12-1.4MHz-16QAM-23173-6RB#0-PASS