



Appendix B

E-UTRA Band 4



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1. Effective (Isotropic) Radiated Power

1.1. Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Conducted Power(dBm)	EIRP (dBm)	Limit (dBm)	Verdict
Band4	1.4MHz	QPSK	19957	1RB#0	23.06	22.06	30.00	PASS
Band4	1.4MHz	QPSK	19957	1RB#2	23.21	22.21	30.00	PASS
Band4	1.4MHz	QPSK	19957	1RB#5	23.10	22.10	30.00	PASS
Band4	1.4MHz	QPSK	19957	3RB#0	23.20	22.20	30.00	PASS
Band4	1.4MHz	QPSK	19957	3RB#1	23.25	22.25	30.00	PASS
Band4	1.4MHz	QPSK	19957	3RB#3	23.21	22.21	30.00	PASS
Band4	1.4MHz	QPSK	19957	6RB#0	22.23	21.23	30.00	PASS
Band4	1.4MHz	QPSK	20175	1RB#0	22.96	21.96	30.00	PASS
Band4	1.4MHz	QPSK	20175	1RB#2	23.13	22.13	30.00	PASS
Band4	1.4MHz	QPSK	20175	1RB#5	22.94	21.94	30.00	PASS
Band4	1.4MHz	QPSK	20175	3RB#0	23.08	22.08	30.00	PASS
Band4	1.4MHz	QPSK	20175	3RB#1	23.13	22.13	30.00	PASS
Band4	1.4MHz	QPSK	20175	3RB#3	23.09	22.09	30.00	PASS
Band4	1.4MHz	QPSK	20175	6RB#0	22.10	21.10	30.00	PASS
Band4	1.4MHz	QPSK	20393	1RB#0	23.10	22.10	30.00	PASS
Band4	1.4MHz	QPSK	20393	1RB#2	23.30	22.30	30.00	PASS
Band4	1.4MHz	QPSK	20393	1RB#5	23.13	22.13	30.00	PASS
Band4	1.4MHz	QPSK	20393	3RB#0	23.24	22.24	30.00	PASS
Band4	1.4MHz	QPSK	20393	3RB#1	23.30	22.30	30.00	PASS
Band4	1.4MHz	QPSK	20393	3RB#3	23.25	22.25	30.00	PASS
Band4	1.4MHz	QPSK	20393	6RB#0	22.27	21.27	30.00	PASS
Band4	1.4MHz	16QAM	19957	1RB#0	22.38	21.38	30.00	PASS
Band4	1.4MHz	16QAM	19957	1RB#2	22.54	21.54	30.00	PASS
Band4	1.4MHz	16QAM	19957	1RB#5	22.37	21.37	30.00	PASS
Band4	1.4MHz	16QAM	19957	3RB#0	22.32	21.32	30.00	PASS
Band4	1.4MHz	16QAM	19957	3RB#1	22.35	21.35	30.00	PASS
Band4	1.4MHz	16QAM	19957	3RB#3	22.33	21.33	30.00	PASS
Band4	1.4MHz	16QAM	19957	6RB#0	21.36	20.36	30.00	PASS
Band4	1.4MHz	16QAM	20175	1RB#0	22.28	21.28	30.00	PASS
Band4	1.4MHz	16QAM	20175	1RB#2	22.37	21.37	30.00	PASS
Band4	1.4MHz	16QAM	20175	1RB#5	22.23	21.23	30.00	PASS
Band4	1.4MHz	16QAM	20175	3RB#0	22.13	21.13	30.00	PASS



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Band4	1.4MHz	16QAM	20175	3RB#1	22.21	21.21	30.00	PASS
Band4	1.4MHz	16QAM	20175	3RB#3	22.14	21.14	30.00	PASS
Band4	1.4MHz	16QAM	20175	6RB#0	21.19	20.19	30.00	PASS
Band4	1.4MHz	16QAM	20393	1RB#0	22.44	21.44	30.00	PASS
Band4	1.4MHz	16QAM	20393	1RB#2	22.45	21.45	30.00	PASS
Band4	1.4MHz	16QAM	20393	1RB#5	22.32	21.32	30.00	PASS
Band4	1.4MHz	16QAM	20393	3RB#0	22.32	21.32	30.00	PASS
Band4	1.4MHz	16QAM	20393	3RB#1	22.34	21.34	30.00	PASS
Band4	1.4MHz	16QAM	20393	3RB#3	22.31	21.31	30.00	PASS
Band4	1.4MHz	16QAM	20393	6RB#0	21.33	20.33	30.00	PASS
Band4	3MHz	QPSK	19965	1RB#0	23.18	22.18	30.00	PASS
Band4	3MHz	QPSK	19965	1RB#8	23.14	22.14	30.00	PASS
Band4	3MHz	QPSK	19965	1RB#14	23.10	22.10	30.00	PASS
Band4	3MHz	QPSK	19965	8RB#0	22.17	21.17	30.00	PASS
Band4	3MHz	QPSK	19965	8RB#4	22.20	21.20	30.00	PASS
Band4	3MHz	QPSK	19965	8RB#7	22.17	21.17	30.00	PASS
Band4	3MHz	QPSK	19965	15RB#0	22.18	21.18	30.00	PASS
Band4	3MHz	QPSK	20175	1RB#0	23.04	22.04	30.00	PASS
Band4	3MHz	QPSK	20175	1RB#8	23.06	22.06	30.00	PASS
Band4	3MHz	QPSK	20175	1RB#14	23.02	22.02	30.00	PASS
Band4	3MHz	QPSK	20175	8RB#0	22.08	21.08	30.00	PASS
Band4	3MHz	QPSK	20175	8RB#4	22.12	21.12	30.00	PASS
Band4	3MHz	QPSK	20175	8RB#7	22.07	21.07	30.00	PASS
Band4	3MHz	QPSK	20175	15RB#0	22.08	21.08	30.00	PASS
Band4	3MHz	QPSK	20385	1RB#0	23.17	22.17	30.00	PASS
Band4	3MHz	QPSK	20385	1RB#8	23.21	22.21	30.00	PASS
Band4	3MHz	QPSK	20385	1RB#14	23.20	22.20	30.00	PASS
Band4	3MHz	QPSK	20385	8RB#0	22.26	21.26	30.00	PASS
Band4	3MHz	QPSK	20385	8RB#4	22.28	21.28	30.00	PASS
Band4	3MHz	QPSK	20385	8RB#7	22.24	21.24	30.00	PASS
Band4	3MHz	QPSK	20385	15RB#0	22.26	21.26	30.00	PASS
Band4	3MHz	16QAM	19965	1RB#0	22.36	21.36	30.00	PASS
Band4	3MHz	16QAM	19965	1RB#8	22.39	21.39	30.00	PASS
Band4	3MHz	16QAM	19965	1RB#14	22.37	21.37	30.00	PASS
Band4	3MHz	16QAM	19965	8RB#0	21.29	20.29	30.00	PASS
Band4	3MHz	16QAM	19965	8RB#4	21.30	20.30	30.00	PASS
Band4	3MHz	16QAM	19965	8RB#7	21.29	20.29	30.00	PASS
Band4	3MHz	16QAM	19965	15RB#0	21.21	20.21	30.00	PASS



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Band4	3MHz	16QAM	20175	1RB#0	22.20	21.20	30.00	PASS
Band4	3MHz	16QAM	20175	1RB#8	22.32	21.32	30.00	PASS
Band4	3MHz	16QAM	20175	1RB#14	22.33	21.33	30.00	PASS
Band4	3MHz	16QAM	20175	8RB#0	21.20	20.20	30.00	PASS
Band4	3MHz	16QAM	20175	8RB#4	21.20	20.20	30.00	PASS
Band4	3MHz	16QAM	20175	8RB#7	21.14	20.14	30.00	PASS
Band4	3MHz	16QAM	20175	15RB#0	21.12	20.12	30.00	PASS
Band4	3MHz	16QAM	20385	1RB#0	22.52	21.52	30.00	PASS
Band4	3MHz	16QAM	20385	1RB#8	22.53	21.53	30.00	PASS
Band4	3MHz	16QAM	20385	1RB#14	22.39	21.39	30.00	PASS
Band4	3MHz	16QAM	20385	8RB#0	21.29	20.29	30.00	PASS
Band4	3MHz	16QAM	20385	8RB#4	21.35	20.35	30.00	PASS
Band4	3MHz	16QAM	20385	8RB#7	21.29	20.29	30.00	PASS
Band4	3MHz	16QAM	20385	15RB#0	21.25	20.25	30.00	PASS
Band4	5MHz	QPSK	19975	1RB#0	23.06	22.06	30.00	PASS
Band4	5MHz	QPSK	19975	1RB#12	23.29	22.29	30.00	PASS
Band4	5MHz	QPSK	19975	1RB#24	23.01	22.01	30.00	PASS
Band4	5MHz	QPSK	19975	12RB#0	22.14	21.14	30.00	PASS
Band4	5MHz	QPSK	19975	12RB#6	22.24	21.24	30.00	PASS
Band4	5MHz	QPSK	19975	12RB#13	22.21	21.21	30.00	PASS
Band4	5MHz	QPSK	19975	25RB#0	22.18	21.18	30.00	PASS
Band4	5MHz	QPSK	20175	1RB#0	22.93	21.93	30.00	PASS
Band4	5MHz	QPSK	20175	1RB#12	23.24	22.24	30.00	PASS
Band4	5MHz	QPSK	20175	1RB#24	22.94	21.94	30.00	PASS
Band4	5MHz	QPSK	20175	12RB#0	22.11	21.11	30.00	PASS
Band4	5MHz	QPSK	20175	12RB#6	22.15	21.15	30.00	PASS
Band4	5MHz	QPSK	20175	12RB#13	22.13	21.13	30.00	PASS
Band4	5MHz	QPSK	20175	25RB#0	22.12	21.12	30.00	PASS
Band4	5MHz	QPSK	20375	1RB#0	23.11	22.11	30.00	PASS
Band4	5MHz	QPSK	20375	1RB#12	23.39	22.39	30.00	PASS
Band4	5MHz	QPSK	20375	1RB#24	23.09	22.09	30.00	PASS
Band4	5MHz	QPSK	20375	12RB#0	22.27	21.27	30.00	PASS
Band4	5MHz	QPSK	20375	12RB#6	22.32	21.32	30.00	PASS
Band4	5MHz	QPSK	20375	12RB#13	22.23	21.23	30.00	PASS
Band4	5MHz	QPSK	20375	25RB#0	22.27	21.27	30.00	PASS
Band4	5MHz	16QAM	19975	1RB#0	22.38	21.38	30.00	PASS
Band4	5MHz	16QAM	19975	1RB#12	22.59	21.59	30.00	PASS
Band4	5MHz	16QAM	19975	1RB#24	22.19	21.19	30.00	PASS



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Band4	5MHz	16QAM	19975	12RB#0	21.20	20.20	30.00	PASS
Band4	5MHz	16QAM	19975	12RB#6	21.27	20.27	30.00	PASS
Band4	5MHz	16QAM	19975	12RB#13	21.27	20.27	30.00	PASS
Band4	5MHz	16QAM	19975	25RB#0	21.25	20.25	30.00	PASS
Band4	5MHz	16QAM	20175	1RB#0	22.24	21.24	30.00	PASS
Band4	5MHz	16QAM	20175	1RB#12	22.48	21.48	30.00	PASS
Band4	5MHz	16QAM	20175	1RB#24	22.25	21.25	30.00	PASS
Band4	5MHz	16QAM	20175	12RB#0	21.15	20.15	30.00	PASS
Band4	5MHz	16QAM	20175	12RB#6	21.19	20.19	30.00	PASS
Band4	5MHz	16QAM	20175	12RB#13	21.18	20.18	30.00	PASS
Band4	5MHz	16QAM	20175	25RB#0	21.15	20.15	30.00	PASS
Band4	5MHz	16QAM	20375	1RB#0	22.33	21.33	30.00	PASS
Band4	5MHz	16QAM	20375	1RB#12	22.59	21.59	30.00	PASS
Band4	5MHz	16QAM	20375	1RB#24	22.39	21.39	30.00	PASS
Band4	5MHz	16QAM	20375	12RB#0	21.29	20.29	30.00	PASS
Band4	5MHz	16QAM	20375	12RB#6	21.36	20.36	30.00	PASS
Band4	5MHz	16QAM	20375	12RB#13	21.29	20.29	30.00	PASS
Band4	5MHz	16QAM	20375	25RB#0	21.28	20.28	30.00	PASS
Band4	10MHz	QPSK	20000	1RB#0	23.18	22.18	30.00	PASS
Band4	10MHz	QPSK	20000	1RB#24	23.21	22.21	30.00	PASS
Band4	10MHz	QPSK	20000	1RB#49	23.07	22.07	30.00	PASS
Band4	10MHz	QPSK	20000	25RB#0	22.16	21.16	30.00	PASS
Band4	10MHz	QPSK	20000	25RB#12	22.23	21.23	30.00	PASS
Band4	10MHz	QPSK	20000	25RB#25	22.23	21.23	30.00	PASS
Band4	10MHz	QPSK	20000	50RB#0	22.22	21.22	30.00	PASS
Band4	10MHz	QPSK	20175	1RB#0	23.04	22.04	30.00	PASS
Band4	10MHz	QPSK	20175	1RB#24	23.16	22.16	30.00	PASS
Band4	10MHz	QPSK	20175	1RB#49	23.03	22.03	30.00	PASS
Band4	10MHz	QPSK	20175	25RB#0	22.19	21.19	30.00	PASS
Band4	10MHz	QPSK	20175	25RB#12	22.15	21.15	30.00	PASS
Band4	10MHz	QPSK	20175	25RB#25	22.18	21.18	30.00	PASS
Band4	10MHz	QPSK	20175	50RB#0	22.18	21.18	30.00	PASS
Band4	10MHz	QPSK	20350	1RB#0	23.14	22.14	30.00	PASS
Band4	10MHz	QPSK	20350	1RB#24	23.26	22.26	30.00	PASS
Band4	10MHz	QPSK	20350	1RB#49	23.18	22.18	30.00	PASS
Band4	10MHz	QPSK	20350	25RB#0	22.24	21.24	30.00	PASS
Band4	10MHz	QPSK	20350	25RB#12	22.28	21.28	30.00	PASS
Band4	10MHz	QPSK	20350	25RB#25	22.30	21.30	30.00	PASS



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Band4	10MHz	QPSK	20350	50RB#0	22.29	21.29	30.00	PASS
Band4	10MHz	16QAM	20000	1RB#0	22.36	21.36	30.00	PASS
Band4	10MHz	16QAM	20000	1RB#24	22.51	21.51	30.00	PASS
Band4	10MHz	16QAM	20000	1RB#49	22.28	21.28	30.00	PASS
Band4	10MHz	16QAM	20000	25RB#0	21.19	20.19	30.00	PASS
Band4	10MHz	16QAM	20000	25RB#12	21.23	20.23	30.00	PASS
Band4	10MHz	16QAM	20000	25RB#25	21.24	20.24	30.00	PASS
Band4	10MHz	16QAM	20000	50RB#0	21.22	20.22	30.00	PASS
Band4	10MHz	16QAM	20175	1RB#0	22.33	21.33	30.00	PASS
Band4	10MHz	16QAM	20175	1RB#24	22.40	21.40	30.00	PASS
Band4	10MHz	16QAM	20175	1RB#49	22.34	21.34	30.00	PASS
Band4	10MHz	16QAM	20175	25RB#0	21.20	20.20	30.00	PASS
Band4	10MHz	16QAM	20175	25RB#12	21.16	20.16	30.00	PASS
Band4	10MHz	16QAM	20175	25RB#25	21.18	20.18	30.00	PASS
Band4	10MHz	16QAM	20175	50RB#0	21.19	20.19	30.00	PASS
Band4	10MHz	16QAM	20350	1RB#0	22.41	21.41	30.00	PASS
Band4	10MHz	16QAM	20350	1RB#24	22.51	21.51	30.00	PASS
Band4	10MHz	16QAM	20350	1RB#49	22.40	21.40	30.00	PASS
Band4	10MHz	16QAM	20350	25RB#0	21.22	20.22	30.00	PASS
Band4	10MHz	16QAM	20350	25RB#12	21.30	20.30	30.00	PASS
Band4	10MHz	16QAM	20350	25RB#25	21.32	20.32	30.00	PASS
Band4	10MHz	16QAM	20350	50RB#0	21.29	20.29	30.00	PASS
Band4	15MHz	QPSK	20025	1RB#0	23.09	22.09	30.00	PASS
Band4	15MHz	QPSK	20025	1RB#38	23.10	22.10	30.00	PASS
Band4	15MHz	QPSK	20025	1RB#74	23.01	22.01	30.00	PASS
Band4	15MHz	QPSK	20025	36RB#0	22.16	21.16	30.00	PASS
Band4	15MHz	QPSK	20025	36RB#18	22.21	21.21	30.00	PASS
Band4	15MHz	QPSK	20025	36RB#39	22.16	21.16	30.00	PASS
Band4	15MHz	QPSK	20025	75RB#0	22.15	21.15	30.00	PASS
Band4	15MHz	QPSK	20175	1RB#0	23.02	22.02	30.00	PASS
Band4	15MHz	QPSK	20175	1RB#38	23.06	22.06	30.00	PASS
Band4	15MHz	QPSK	20175	1RB#74	22.99	21.99	30.00	PASS
Band4	15MHz	QPSK	20175	36RB#0	22.17	21.17	30.00	PASS
Band4	15MHz	QPSK	20175	36RB#18	22.16	21.16	30.00	PASS
Band4	15MHz	QPSK	20175	36RB#39	22.18	21.18	30.00	PASS
Band4	15MHz	QPSK	20175	75RB#0	22.18	21.18	30.00	PASS
Band4	15MHz	QPSK	20325	1RB#0	23.01	22.01	30.00	PASS
Band4	15MHz	QPSK	20325	1RB#38	23.23	22.23	30.00	PASS



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Band4	15MHz	QPSK	20325	1RB#74	23.14	22.14	30.00	PASS
Band4	15MHz	QPSK	20325	36RB#0	22.22	21.22	30.00	PASS
Band4	15MHz	QPSK	20325	36RB#18	22.25	21.25	30.00	PASS
Band4	15MHz	QPSK	20325	36RB#39	22.26	21.26	30.00	PASS
Band4	15MHz	QPSK	20325	75RB#0	22.25	21.25	30.00	PASS
Band4	15MHz	16QAM	20025	1RB#0	22.45	21.45	30.00	PASS
Band4	15MHz	16QAM	20025	1RB#38	22.36	21.36	30.00	PASS
Band4	15MHz	16QAM	20025	1RB#74	22.27	21.27	30.00	PASS
Band4	15MHz	16QAM	20025	36RB#0	21.18	20.18	30.00	PASS
Band4	15MHz	16QAM	20025	36RB#18	21.18	20.18	30.00	PASS
Band4	15MHz	16QAM	20025	36RB#39	21.15	20.15	30.00	PASS
Band4	15MHz	16QAM	20025	75RB#0	21.17	20.17	30.00	PASS
Band4	15MHz	16QAM	20175	1RB#0	22.23	21.23	30.00	PASS
Band4	15MHz	16QAM	20175	1RB#38	22.28	21.28	30.00	PASS
Band4	15MHz	16QAM	20175	1RB#74	22.23	21.23	30.00	PASS
Band4	15MHz	16QAM	20175	36RB#0	21.18	20.18	30.00	PASS
Band4	15MHz	16QAM	20175	36RB#18	21.15	20.15	30.00	PASS
Band4	15MHz	16QAM	20175	36RB#39	21.20	20.20	30.00	PASS
Band4	15MHz	16QAM	20175	75RB#0	21.19	20.19	30.00	PASS
Band4	15MHz	16QAM	20325	1RB#0	22.23	21.23	30.00	PASS
Band4	15MHz	16QAM	20325	1RB#38	22.53	21.53	30.00	PASS
Band4	15MHz	16QAM	20325	1RB#74	22.40	21.40	30.00	PASS
Band4	15MHz	16QAM	20325	36RB#0	21.22	20.22	30.00	PASS
Band4	15MHz	16QAM	20325	36RB#18	21.27	20.27	30.00	PASS
Band4	15MHz	16QAM	20325	36RB#39	21.25	20.25	30.00	PASS
Band4	15MHz	16QAM	20325	75RB#0	21.24	20.24	30.00	PASS
Band4	20MHz	QPSK	20050	1RB#0	23.03	22.03	30.00	PASS
Band4	20MHz	QPSK	20050	1RB#49	23.18	22.18	30.00	PASS
Band4	20MHz	QPSK	20050	1RB#99	22.95	21.95	30.00	PASS
Band4	20MHz	QPSK	20050	50RB#0	22.14	21.14	30.00	PASS
Band4	20MHz	QPSK	20050	50RB#25	22.22	21.22	30.00	PASS
Band4	20MHz	QPSK	20050	50RB#50	22.14	21.14	30.00	PASS
Band4	20MHz	QPSK	20050	100RB#0	22.11	21.11	30.00	PASS
Band4	20MHz	QPSK	20175	1RB#0	22.97	21.97	30.00	PASS
Band4	20MHz	QPSK	20175	1RB#49	23.14	22.14	30.00	PASS
Band4	20MHz	QPSK	20175	1RB#99	23.00	22.00	30.00	PASS
Band4	20MHz	QPSK	20175	50RB#0	22.19	21.19	30.00	PASS
Band4	20MHz	QPSK	20175	50RB#25	22.16	21.16	30.00	PASS



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Band4	20MHz	QPSK	20175	50RB#50	22.17	21.17	30.00	PASS
Band4	20MHz	QPSK	20175	100RB#0	22.17	21.17	30.00	PASS
Band4	20MHz	QPSK	20300	1RB#0	22.94	21.94	30.00	PASS
Band4	20MHz	QPSK	20300	1RB#49	23.21	22.21	30.00	PASS
Band4	20MHz	QPSK	20300	1RB#99	23.07	22.07	30.00	PASS
Band4	20MHz	QPSK	20300	50RB#0	22.13	21.13	30.00	PASS
Band4	20MHz	QPSK	20300	50RB#25	22.23	21.23	30.00	PASS
Band4	20MHz	QPSK	20300	50RB#50	22.22	21.22	30.00	PASS
Band4	20MHz	QPSK	20300	100RB#0	22.17	21.17	30.00	PASS
Band4	20MHz	16QAM	20050	1RB#0	22.27	21.27	30.00	PASS
Band4	20MHz	16QAM	20050	1RB#49	22.34	21.34	30.00	PASS
Band4	20MHz	16QAM	20050	1RB#99	22.19	21.19	30.00	PASS
Band4	20MHz	16QAM	20050	50RB#0	21.14	20.14	30.00	PASS
Band4	20MHz	16QAM	20050	50RB#25	21.22	20.22	30.00	PASS
Band4	20MHz	16QAM	20050	50RB#50	21.15	20.15	30.00	PASS
Band4	20MHz	16QAM	20050	100RB#0	21.13	20.13	30.00	PASS
Band4	20MHz	16QAM	20175	1RB#0	22.17	21.17	30.00	PASS
Band4	20MHz	16QAM	20175	1RB#49	22.33	21.33	30.00	PASS
Band4	20MHz	16QAM	20175	1RB#99	22.24	21.24	30.00	PASS
Band4	20MHz	16QAM	20175	50RB#0	21.21	20.21	30.00	PASS
Band4	20MHz	16QAM	20175	50RB#25	21.18	20.18	30.00	PASS
Band4	20MHz	16QAM	20175	50RB#50	21.20	20.20	30.00	PASS
Band4	20MHz	16QAM	20175	100RB#0	21.19	20.19	30.00	PASS
Band4	20MHz	16QAM	20300	1RB#0	22.14	21.14	30.00	PASS
Band4	20MHz	16QAM	20300	1RB#49	22.49	21.49	30.00	PASS
Band4	20MHz	16QAM	20300	1RB#99	22.37	21.37	30.00	PASS
Band4	20MHz	16QAM	20300	50RB#0	21.14	20.14	30.00	PASS
Band4	20MHz	16QAM	20300	50RB#25	21.23	20.23	30.00	PASS
Band4	20MHz	16QAM	20300	50RB#50	21.21	20.21	30.00	PASS
Band4	20MHz	16QAM	20300	100RB#0	21.18	20.18	30.00	PASS

Remark:

a: For getting the EIRP (Efficient Isotropic Radiated Power), the following formula should be taken to calculate it,

ERP [dBm] = Conducted Power [dBm] + Gain [dBi]

EIRP [dBm] = Conducted Power [dBm] + Gain [dBi]



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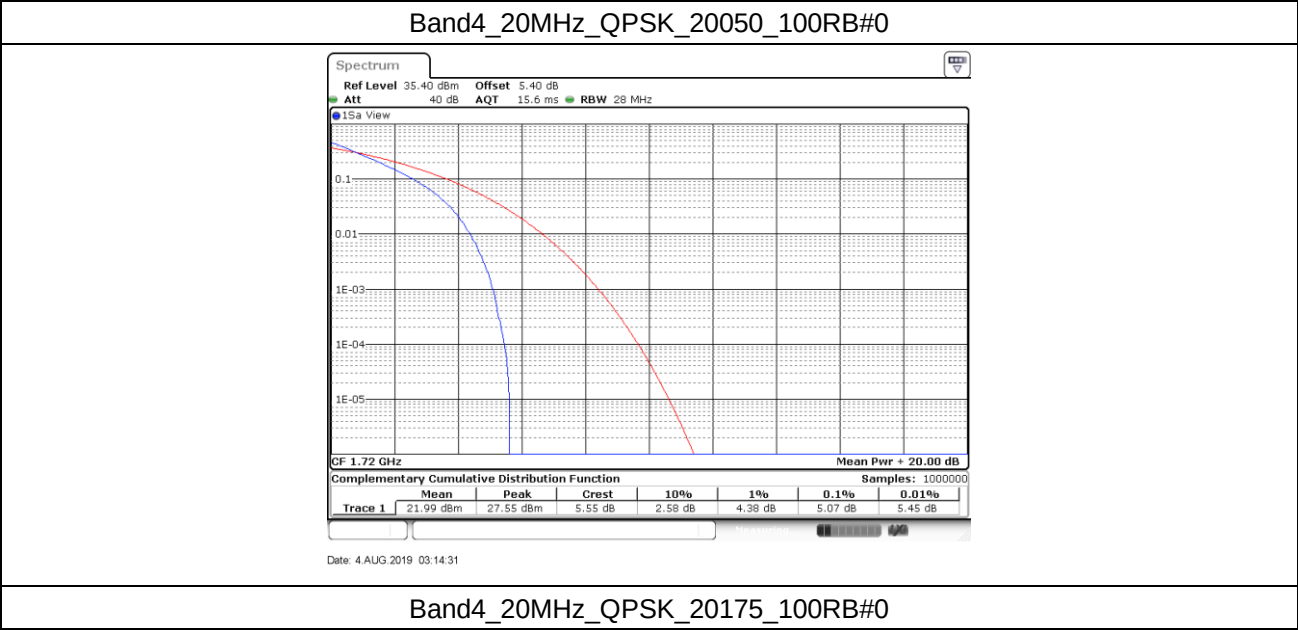
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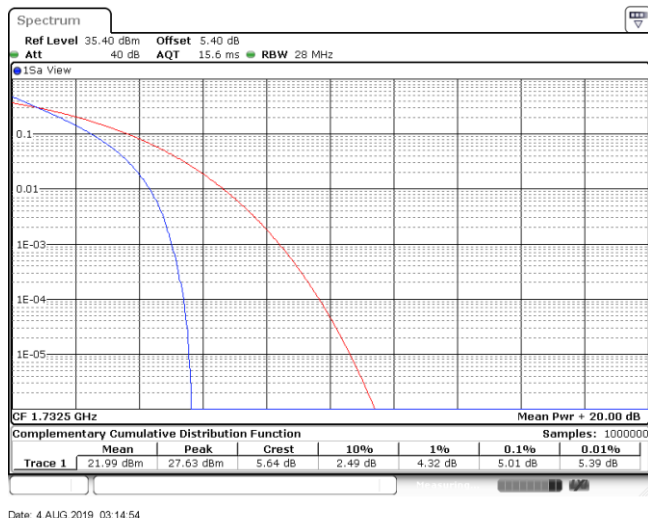
2. Peak-to-Average Ratio(CCDF)

2.1. Test Result

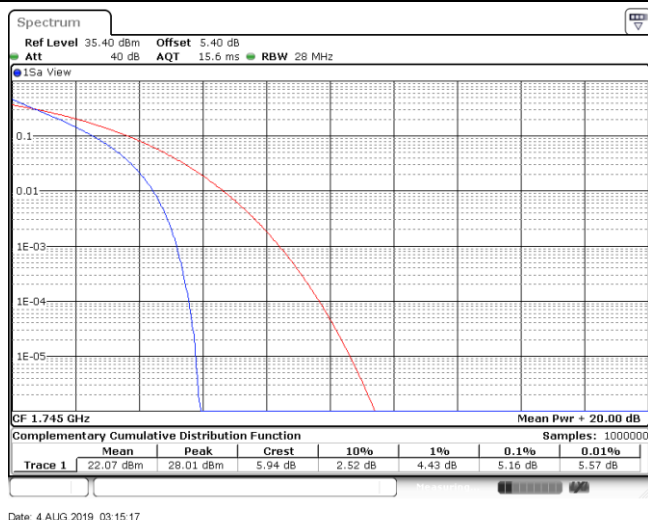
Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dB)	Limit(dB)	Verdict
Band4	20MHz	QPSK	20050	100RB#0	5.07	13	PASS
Band4	20MHz	QPSK	20175	100RB#0	5.01	13	PASS
Band4	20MHz	QPSK	20300	100RB#0	5.16	13	PASS
Band4	20MHz	16QAM	20050	100RB#0	5.91	13	PASS
Band4	20MHz	16QAM	20175	100RB#0	5.88	13	PASS
Band4	20MHz	16QAM	20300	100RB#0	6.03	13	PASS

2.2. Test Plots





Band4_20MHz_QPSK_20300_100RB#0

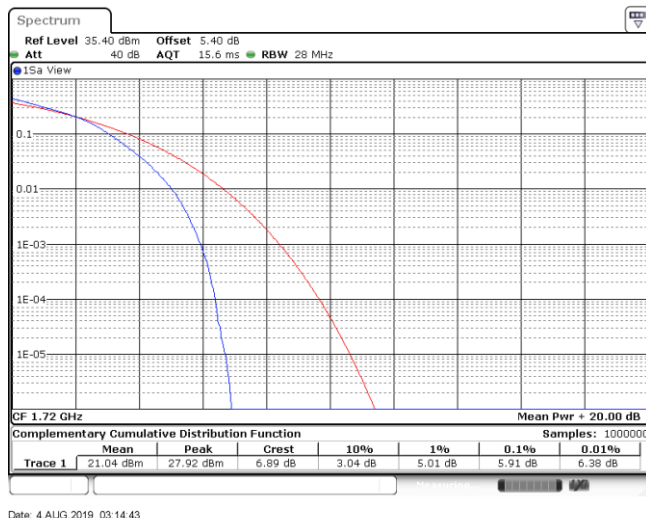


Band4_20MHz_16QAM_20050_100RB#0

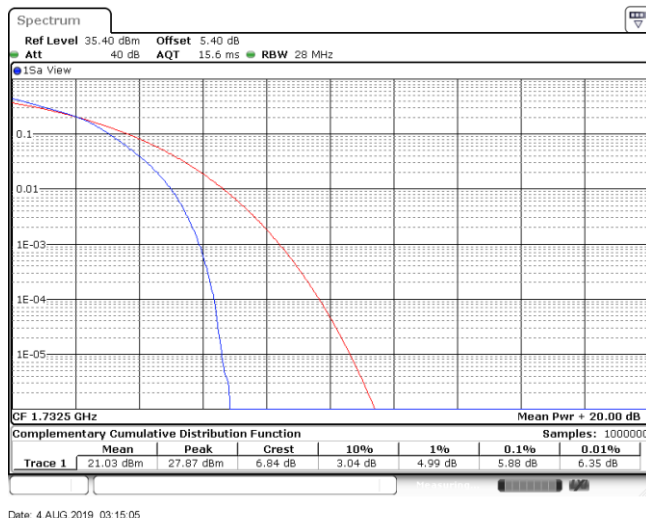


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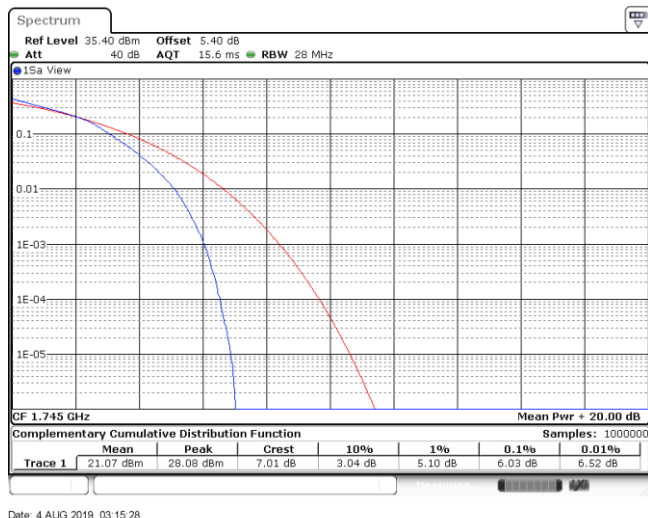


Band4_20MHz_16QAM_20175_100RB#0



Band4_20MHz_16QAM_20300_100RB#0





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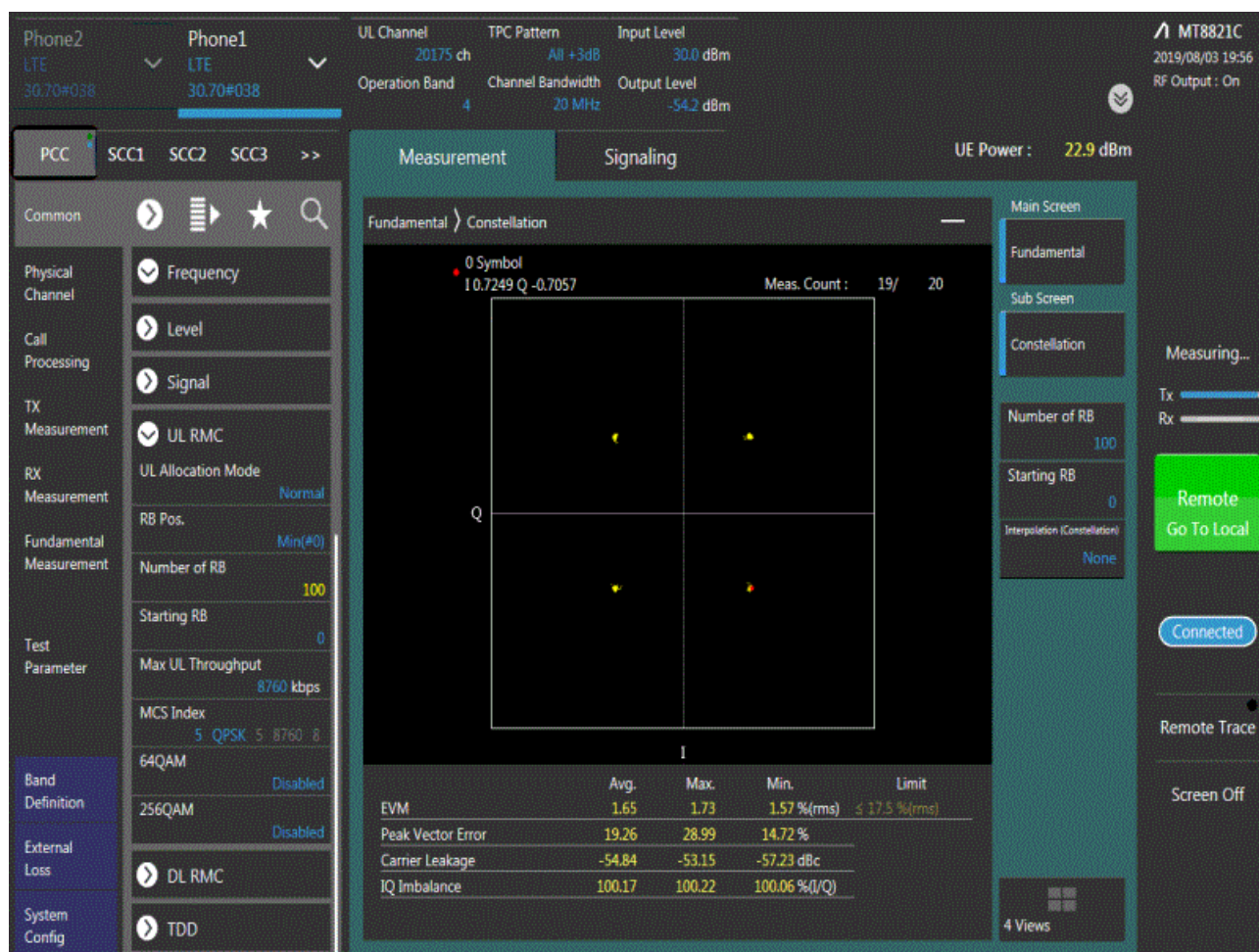
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3. Modulation Characteristics

3.1. Test Band = LTE Band 4

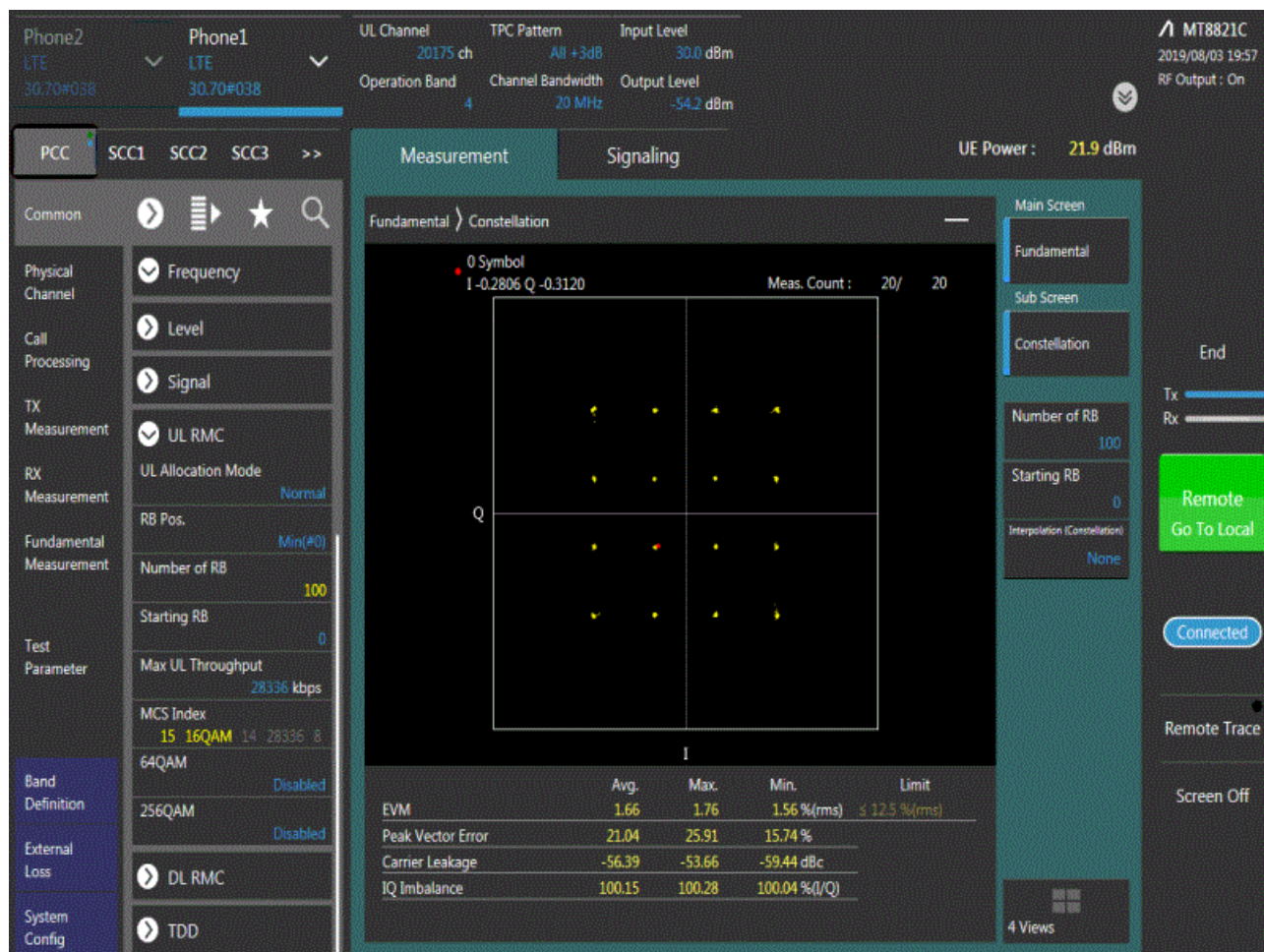
3.2. Test Mode = LTE /TM1 20MHz

3.2.1. Test Channel = MCH



3.3. Test Mode = LTE /TM2 20MHz

3.3.1. Test Channel = MCH





4. 26dB Bandwidth and Occupied Bandwidth

4.1. Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Occupied Bandwidth (MHz)	26dB Bandwidth (MHz)	Verdict
Band4	1.4MHz	QPSK	19957	6RB#0	1.088	1.281	PASS
Band4	1.4MHz	QPSK	20175	6RB#0	1.091	1.281	PASS
Band4	1.4MHz	QPSK	20393	6RB#0	1.088	1.272	PASS
Band4	1.4MHz	16QAM	19957	6RB#0	1.091	1.284	PASS
Band4	1.4MHz	16QAM	20175	6RB#0	1.094	1.278	PASS
Band4	1.4MHz	16QAM	20393	6RB#0	1.091	1.281	PASS
Band4	3MHz	QPSK	19965	15RB#0	2.691	2.922	PASS
Band4	3MHz	QPSK	20175	15RB#0	2.691	2.922	PASS
Band4	3MHz	QPSK	20385	15RB#0	2.685	2.928	PASS
Band4	3MHz	16QAM	19965	15RB#0	2.673	2.892	PASS
Band4	3MHz	16QAM	20175	15RB#0	2.673	2.898	PASS
Band4	3MHz	16QAM	20385	15RB#0	2.673	2.892	PASS
Band4	5MHz	QPSK	19975	25RB#0	4.466	4.830	PASS
Band4	5MHz	QPSK	20175	25RB#0	4.466	4.830	PASS
Band4	5MHz	QPSK	20375	25RB#0	4.476	4.800	PASS
Band4	5MHz	16QAM	19975	25RB#0	4.476	4.850	PASS
Band4	5MHz	16QAM	20175	25RB#0	4.486	4.870	PASS
Band4	5MHz	16QAM	20375	25RB#0	4.476	4.840	PASS
Band4	10MHz	QPSK	20000	50RB#0	8.931	9.600	PASS
Band4	10MHz	QPSK	20175	50RB#0	8.931	9.640	PASS
Band4	10MHz	QPSK	20350	50RB#0	8.931	9.600	PASS
Band4	10MHz	16QAM	20000	50RB#0	8.931	9.640	PASS
Band4	10MHz	16QAM	20175	50RB#0	8.911	9.640	PASS
Band4	10MHz	16QAM	20350	50RB#0	8.931	9.600	PASS
Band4	15MHz	QPSK	20025	75RB#0	13.457	14.640	PASS
Band4	15MHz	QPSK	20175	75RB#0	13.487	19.020	PASS
Band4	15MHz	QPSK	20325	75RB#0	13.457	14.700	PASS
Band4	15MHz	16QAM	20025	75RB#0	13.457	14.640	PASS
Band4	15MHz	16QAM	20175	75RB#0	13.457	15.630	PASS
Band4	15MHz	16QAM	20325	75RB#0	13.457	14.640	PASS
Band4	20MHz	QPSK	20050	100RB#0	17.862	19.240	PASS



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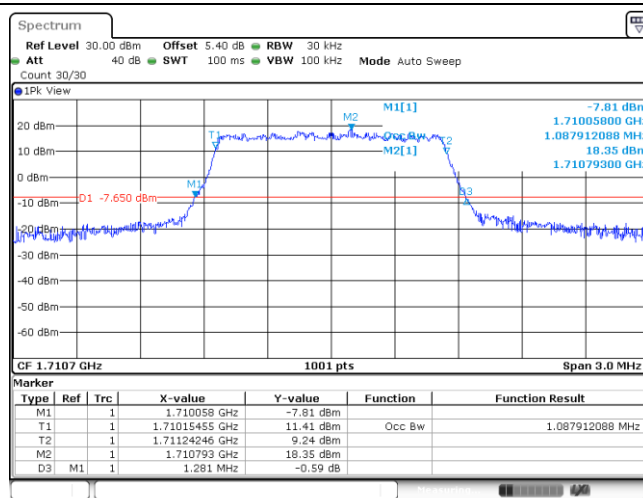
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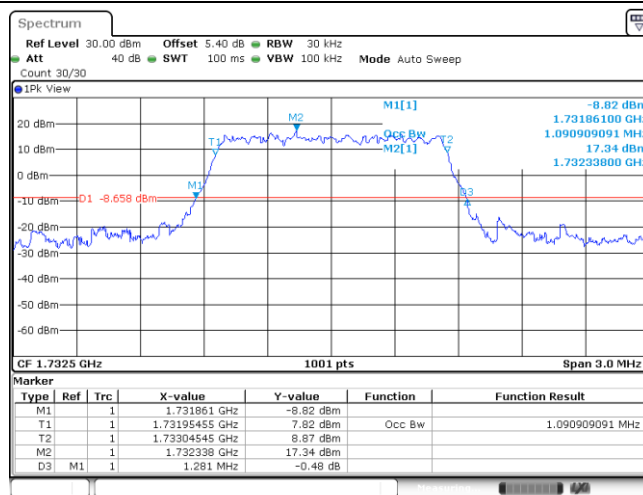
Band4	20MHz	QPSK	20175	100RB#0	17.902	19.280	PASS
Band4	20MHz	QPSK	20300	100RB#0	17.902	19.320	PASS
Band4	20MHz	16QAM	20050	100RB#0	17.902	19.320	PASS
Band4	20MHz	16QAM	20175	100RB#0	17.862	19.360	PASS
Band4	20MHz	16QAM	20300	100RB#0	17.902	19.360	PASS

4.2. Test Plots

Band4_1.4MHz_QPSK_19957_6RB#0



Band4_1.4MHz_QPSK_20175_6RB#0

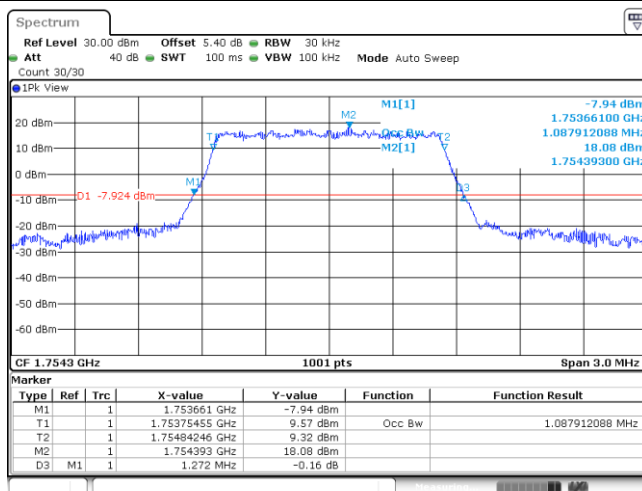


Band4_1.4MHz_QPSK_20393_6RB#0



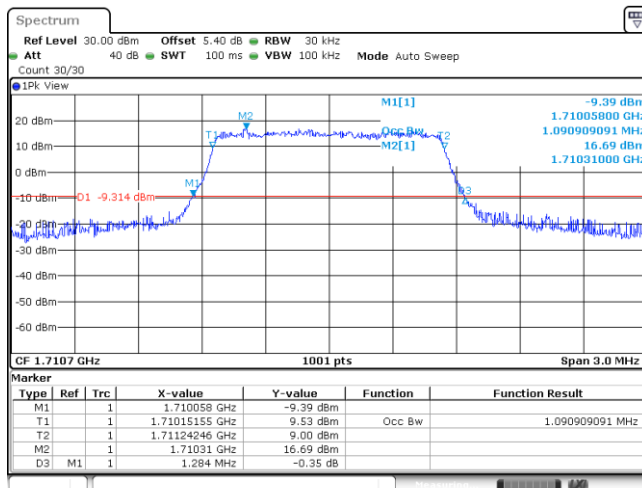
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Date: 4 AUG. 2019 02:46:18

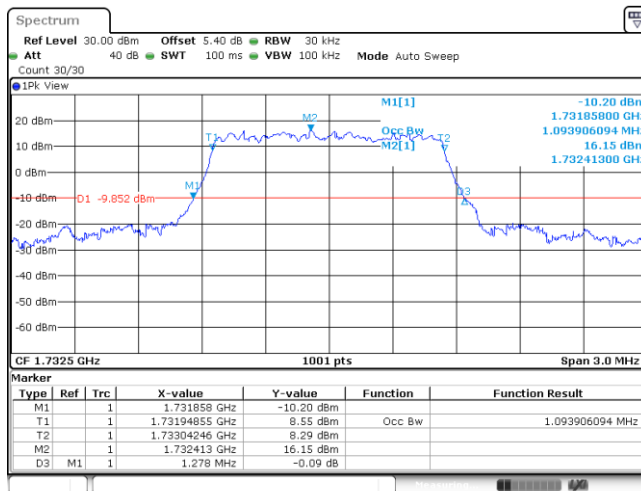
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Date: 4 AUG. 2019 03:59:55

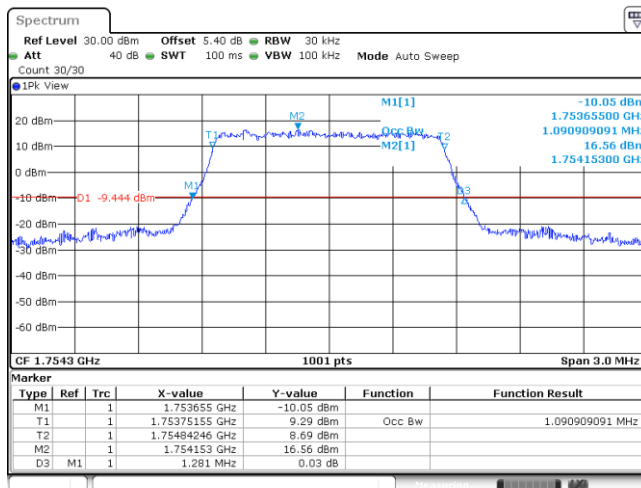
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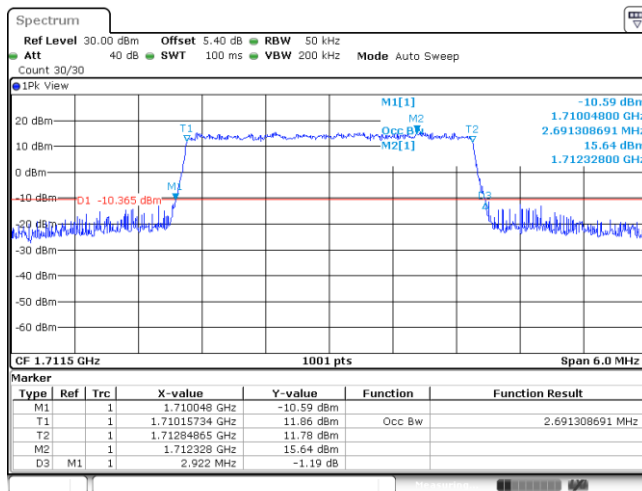
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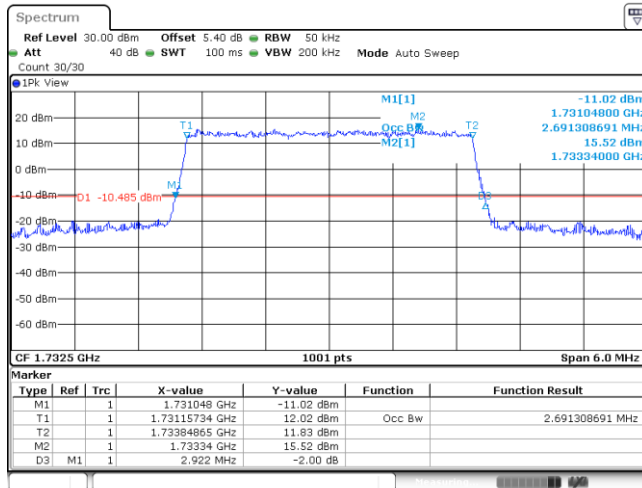
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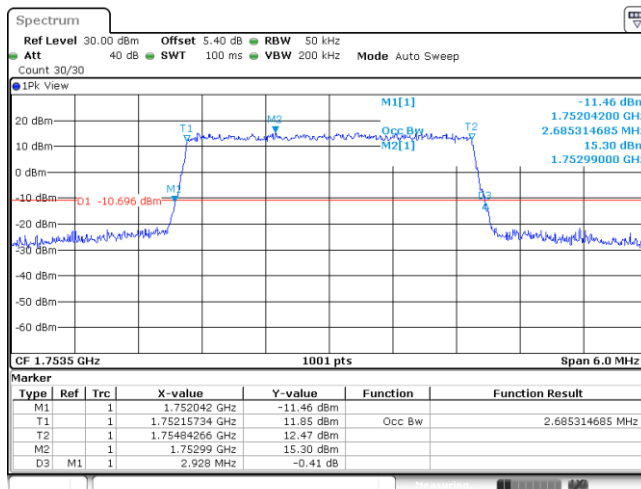
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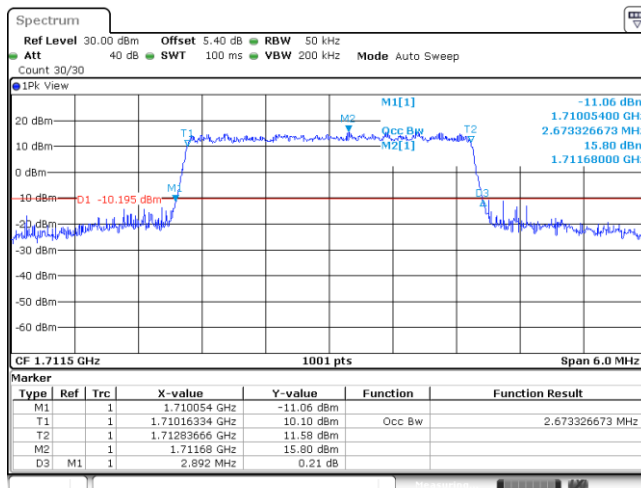
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Date: 4 AUG.2019 02:47:40

Band4_3MHz_16QAM_19965_15RB#0



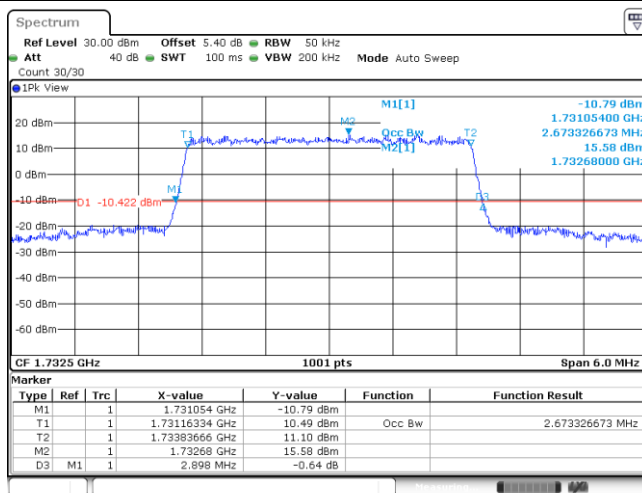
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Band4_3MHz_16QAM_20175_15RB#0



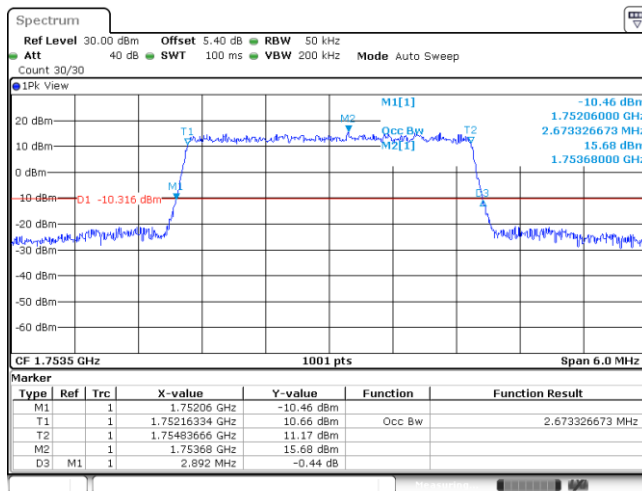
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Date: 4 AUG.2019 02:47:28

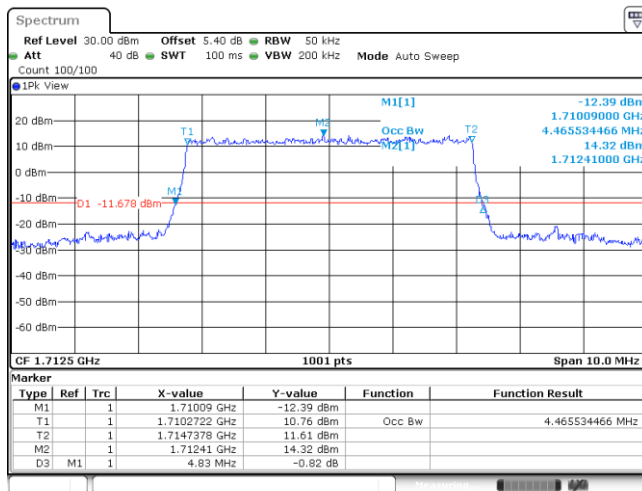
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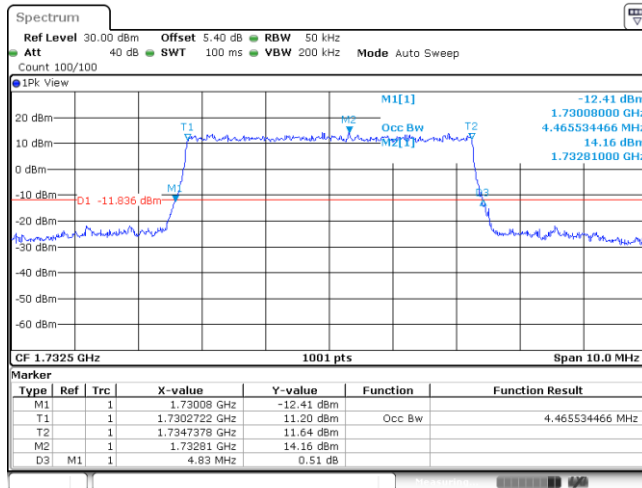
Band4_5MHz_QPSK_19975_25RB#0





Date: 4 AUG. 2019 02:48:19

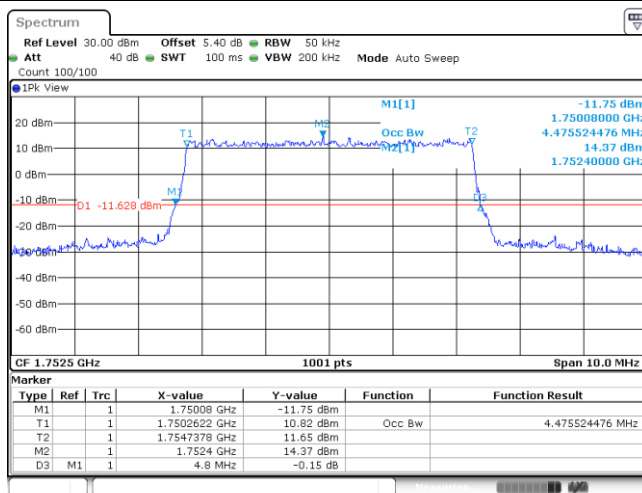
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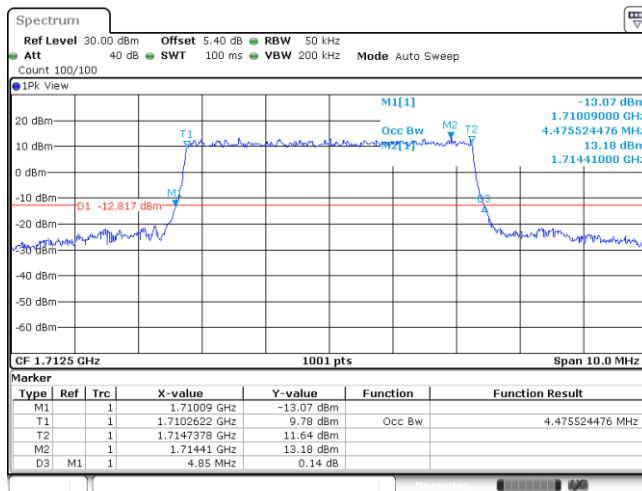
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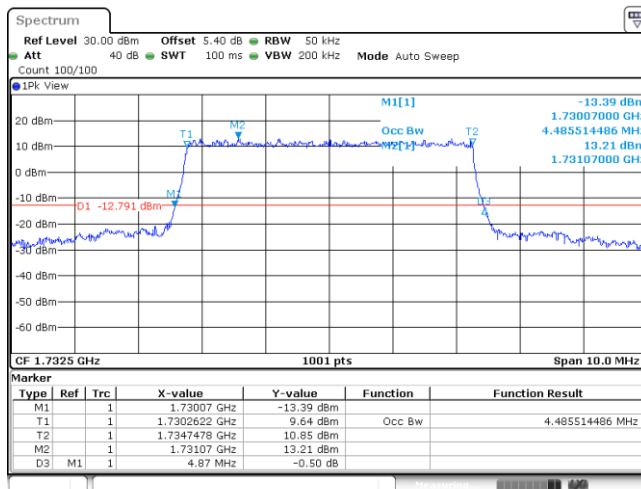
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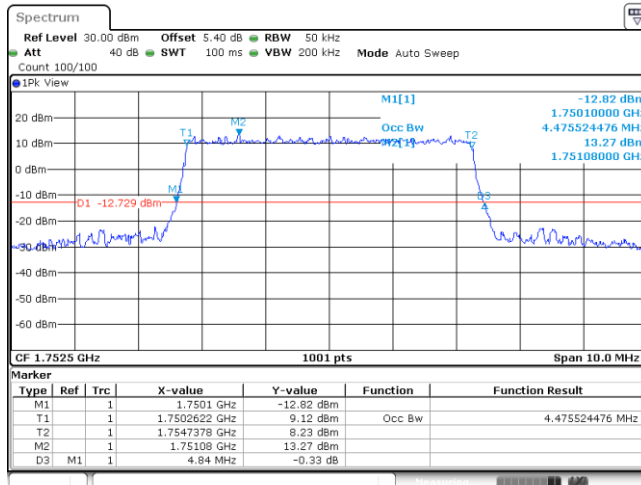
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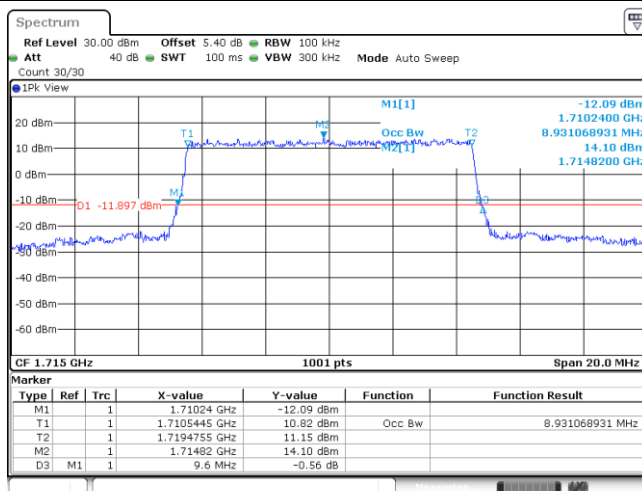
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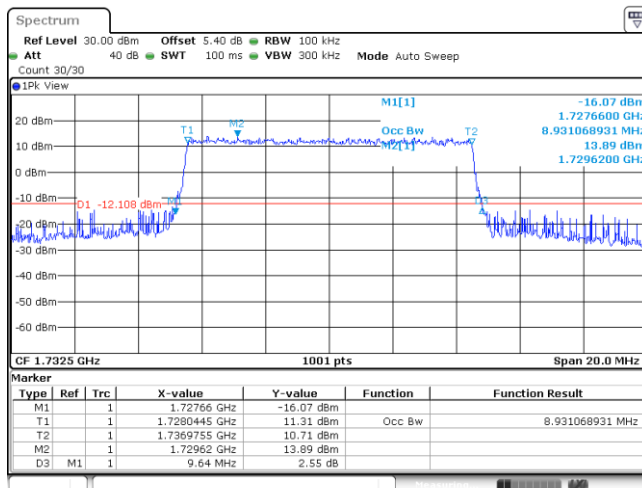
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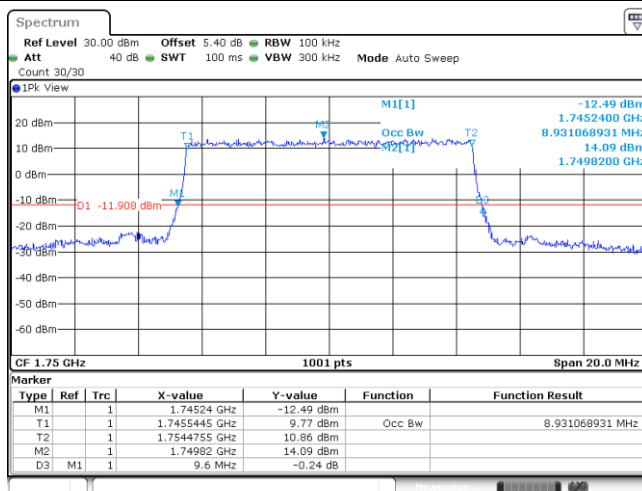
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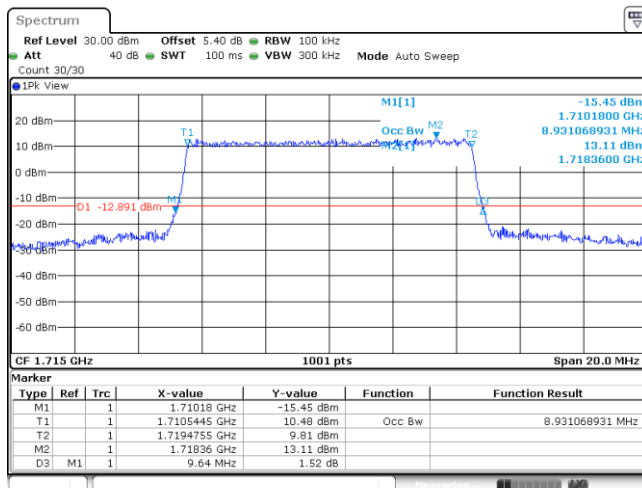
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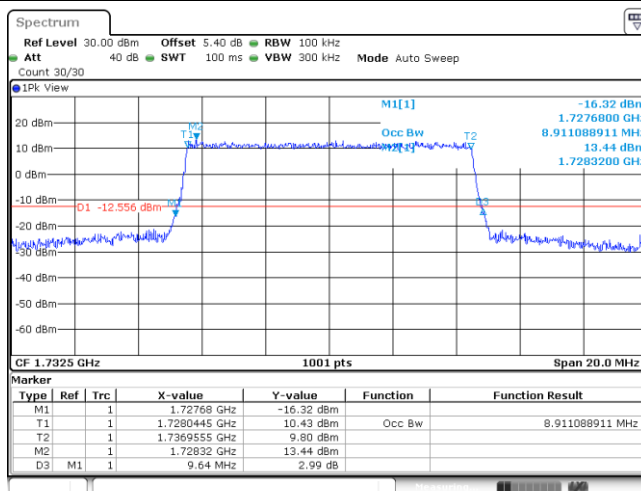
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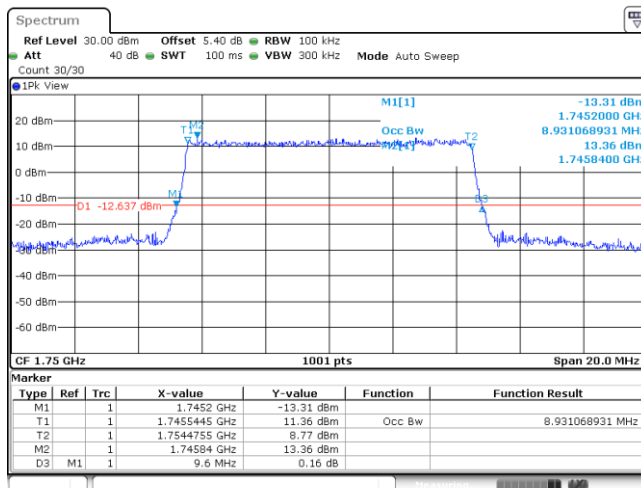
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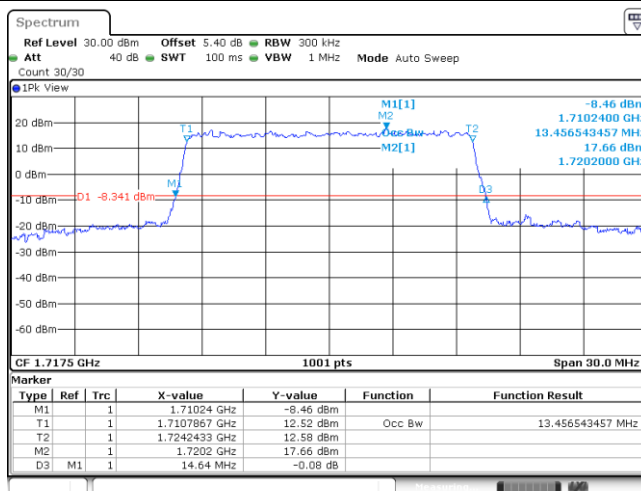
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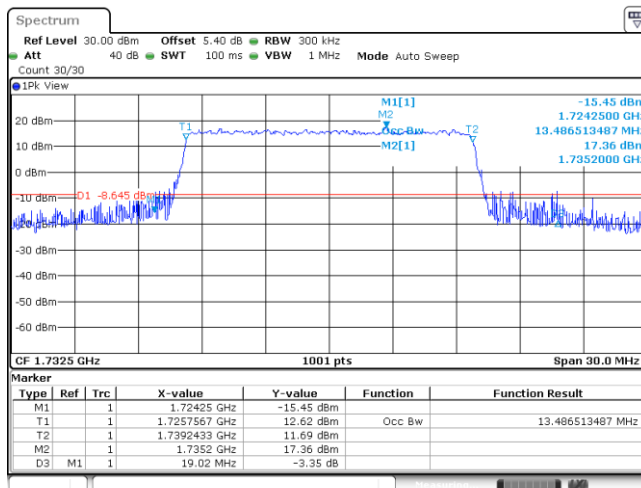
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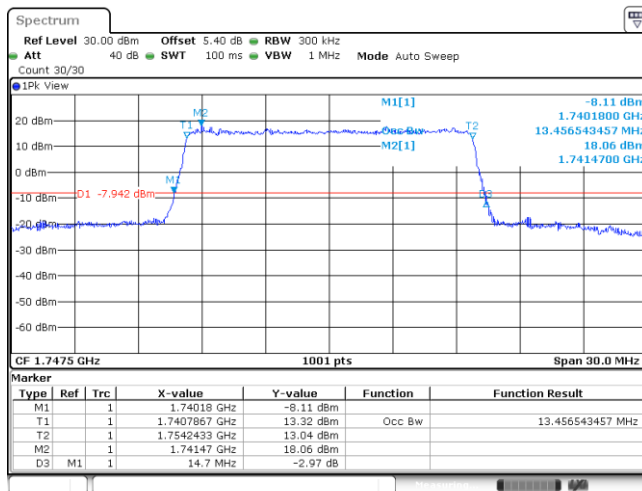
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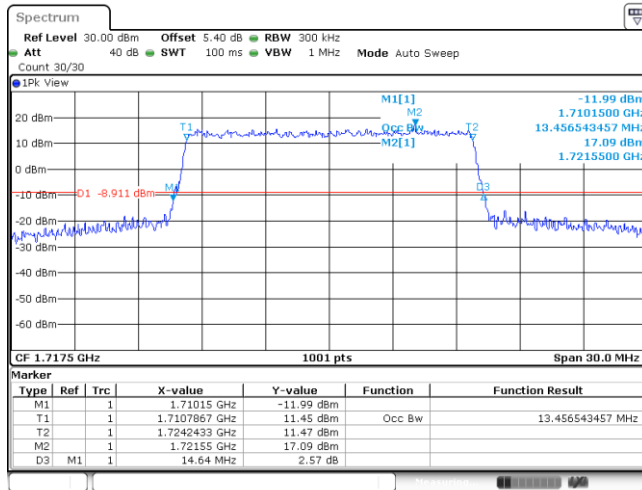
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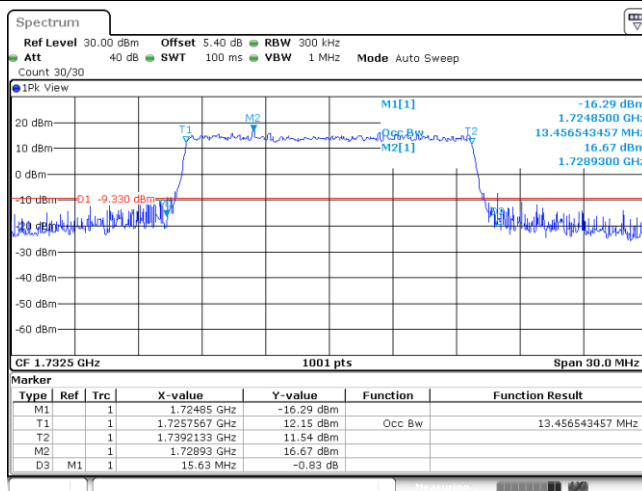
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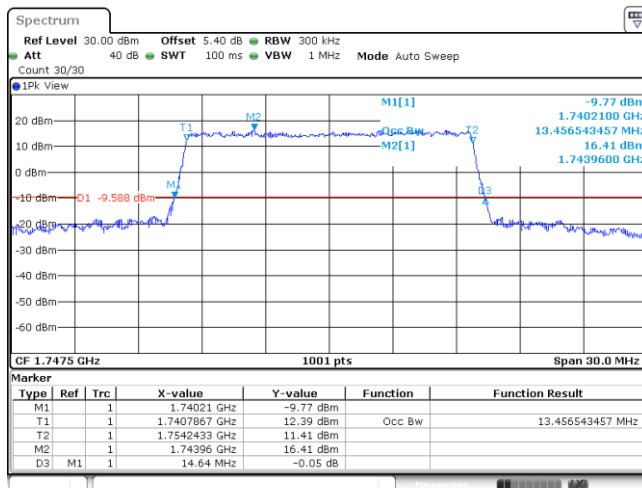
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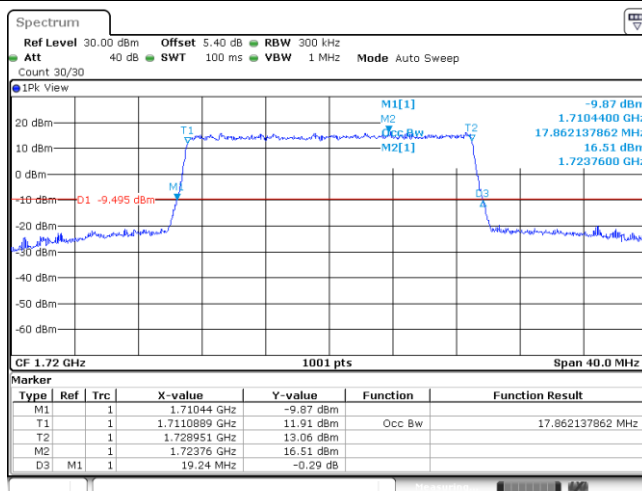
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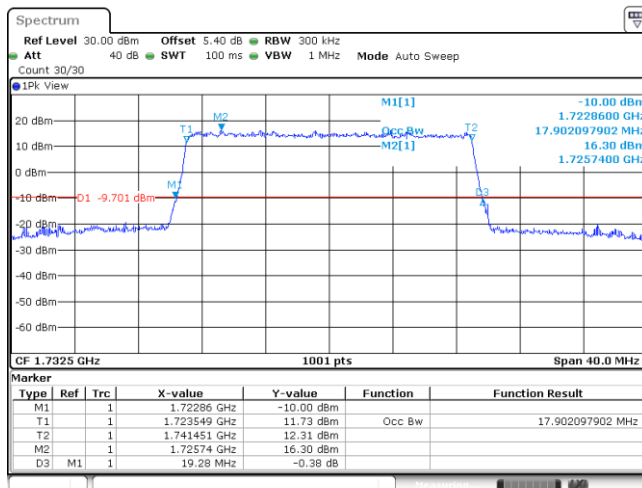
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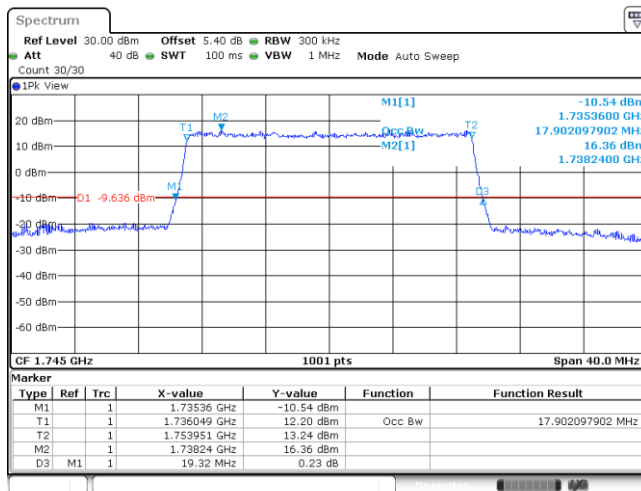
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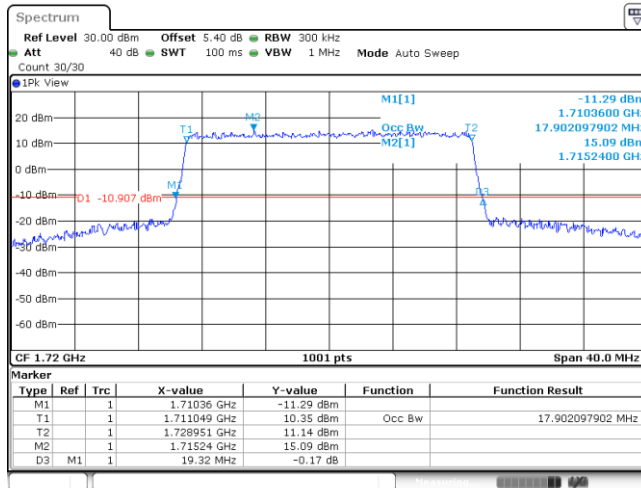
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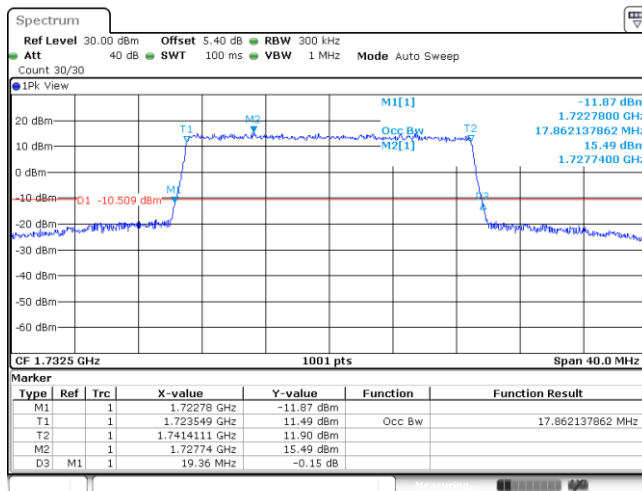
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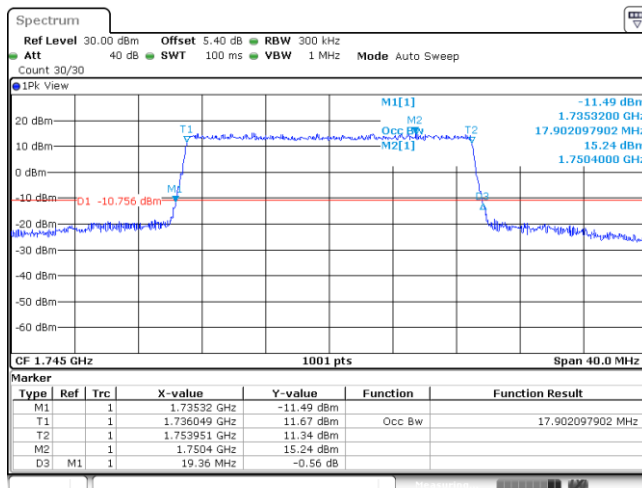
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Date: 4 AUG 2019 02:53:38

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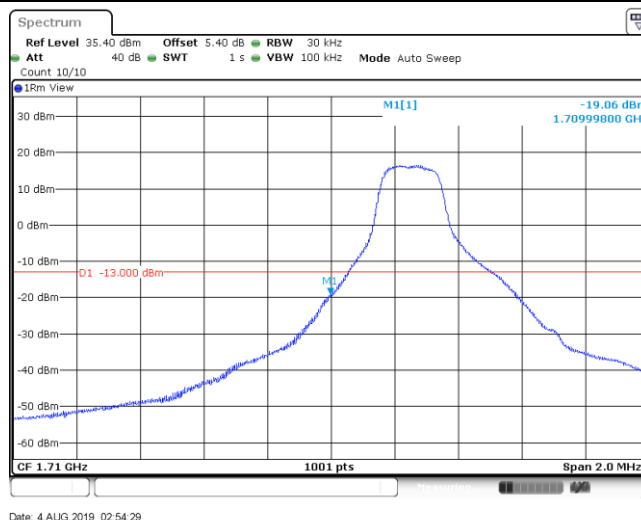
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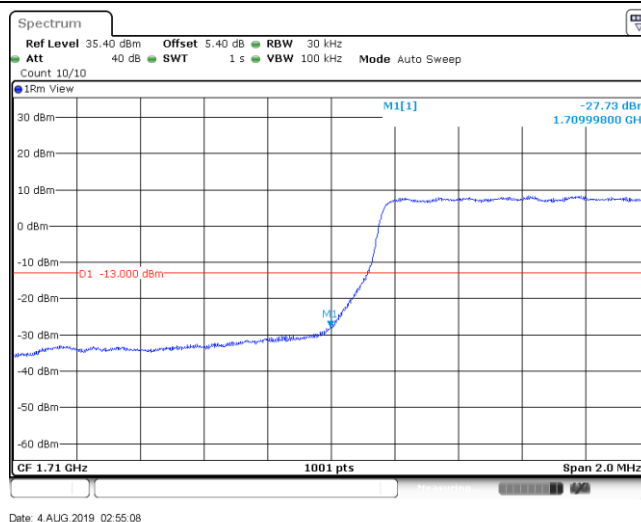
5. Band Edge Compliance

5.1. Test Plots

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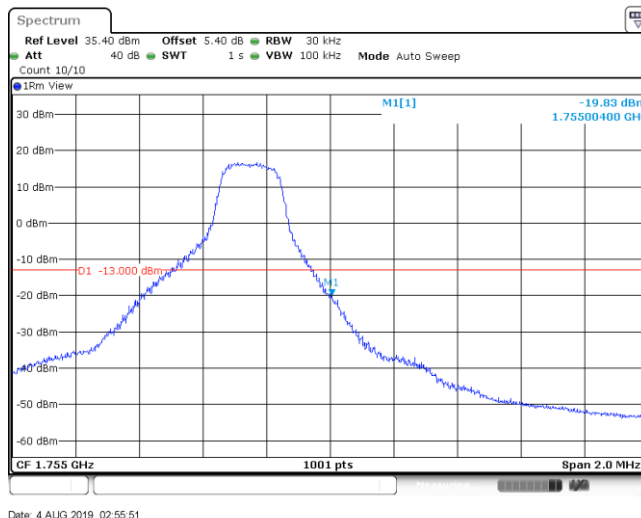


Band4_1.4MHz_QPSK_19957_6RB#0



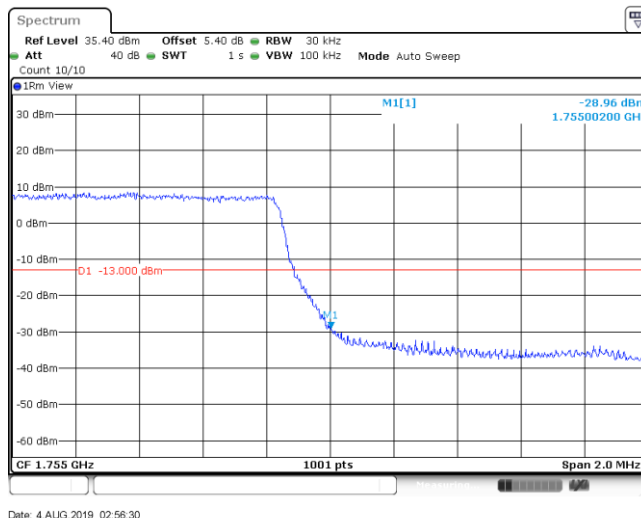
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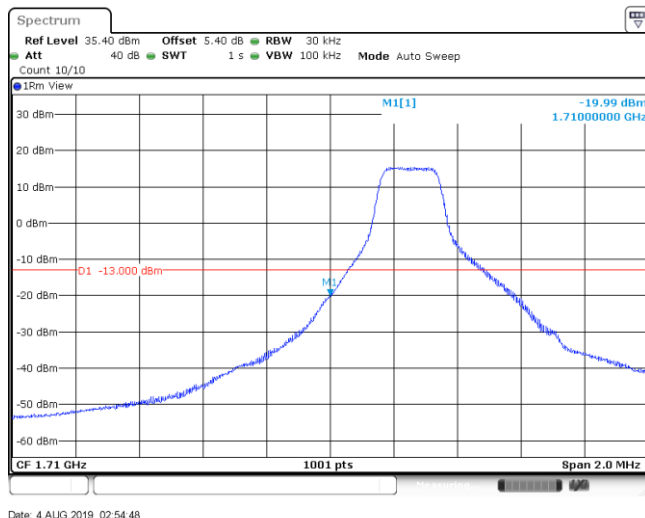
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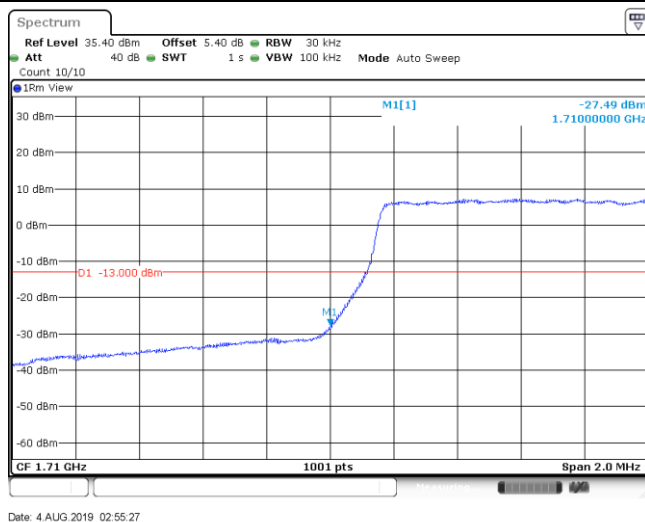
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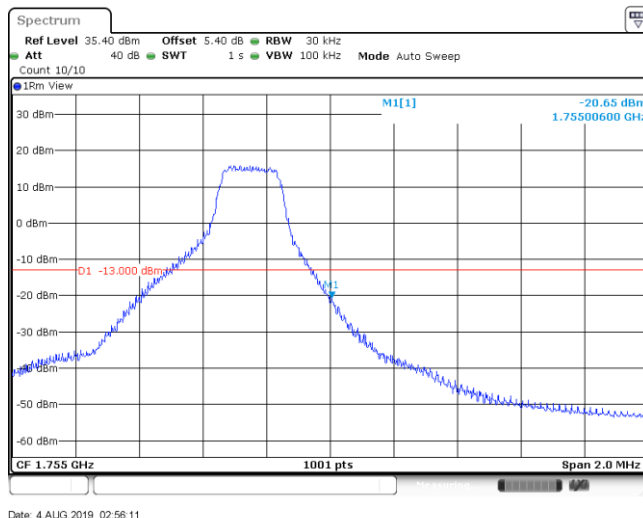


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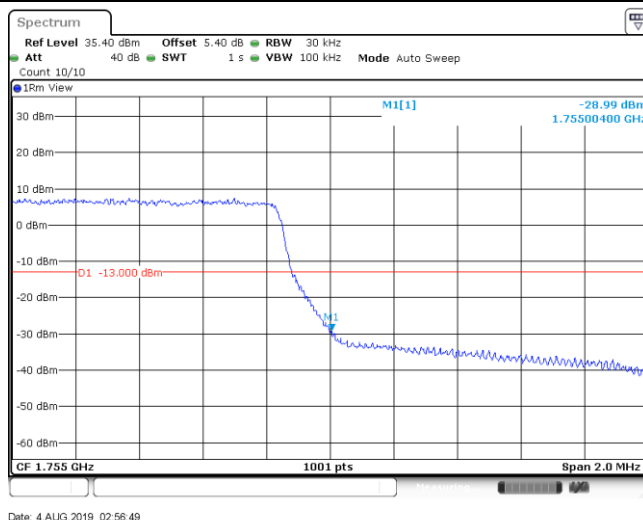


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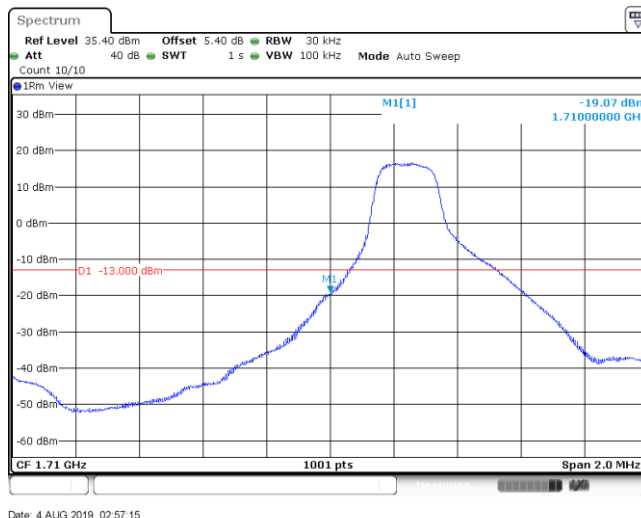


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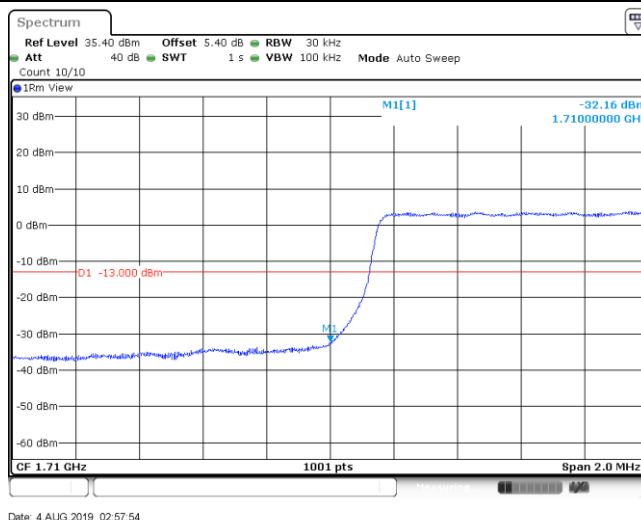


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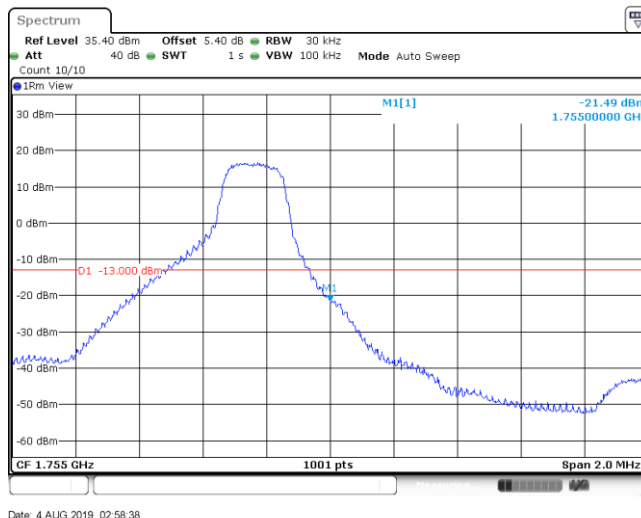


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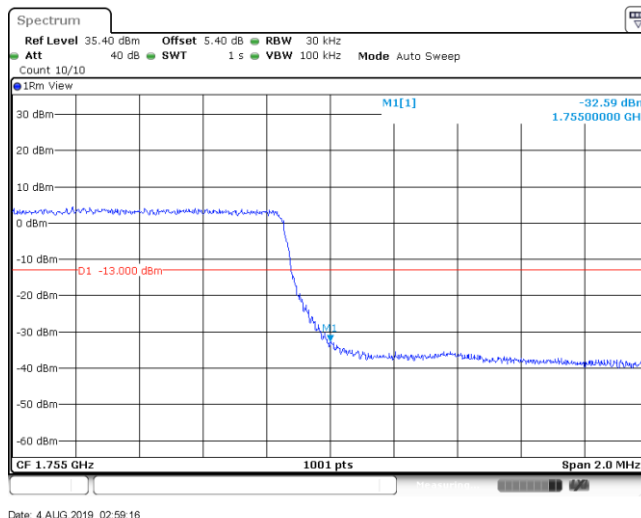


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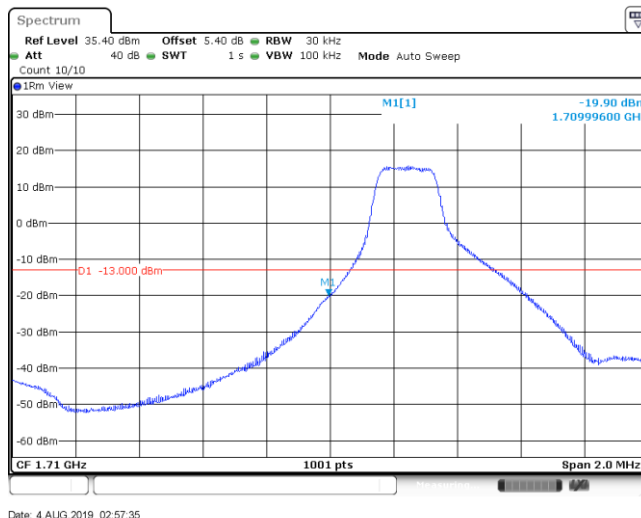


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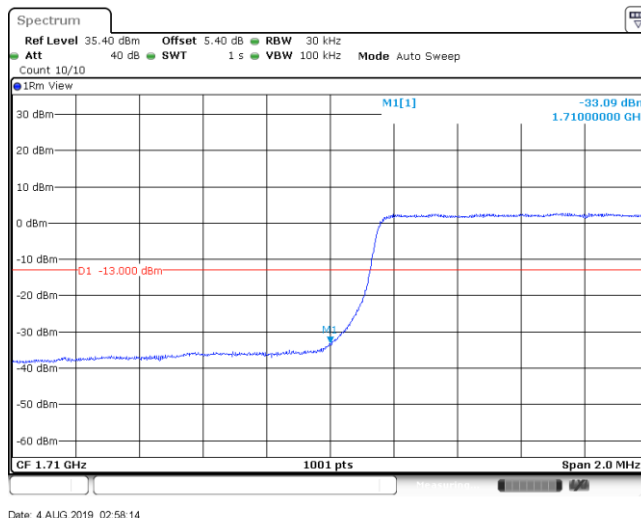
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Date: 4 AUG 2019 02:57:35

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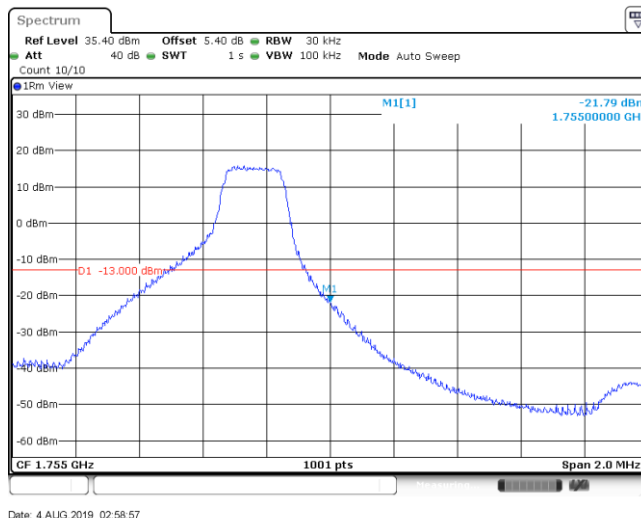
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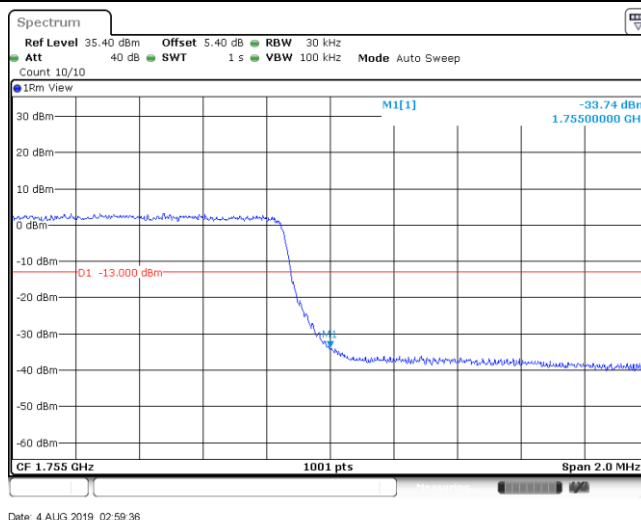


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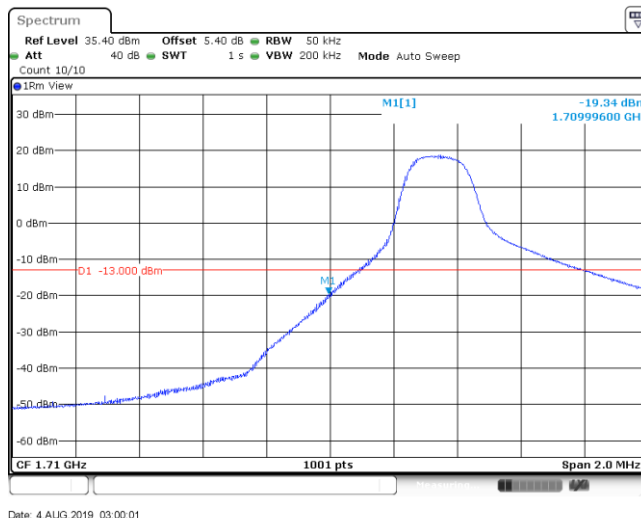


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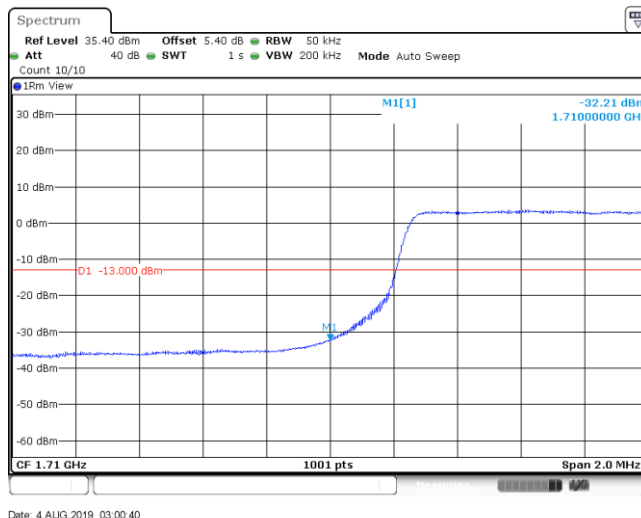
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Date: 4 AUG 2019 03:00:01

Band4_5MHz_QPSK_19975_25RB#0



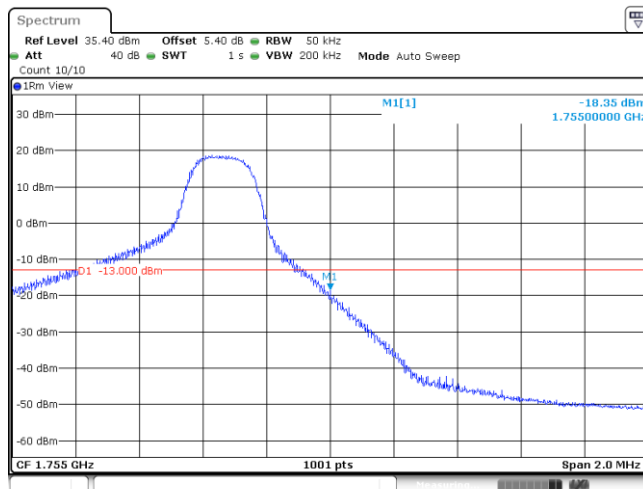
Date: 4 AUG 2019 03:00:40

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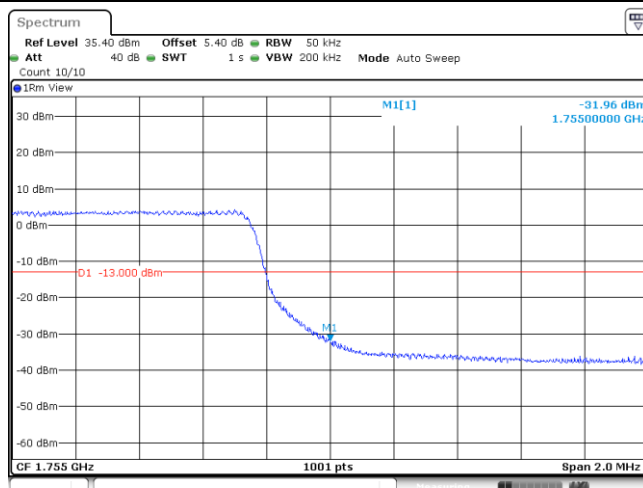
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Date: 4 AUG 2019 03:01:24

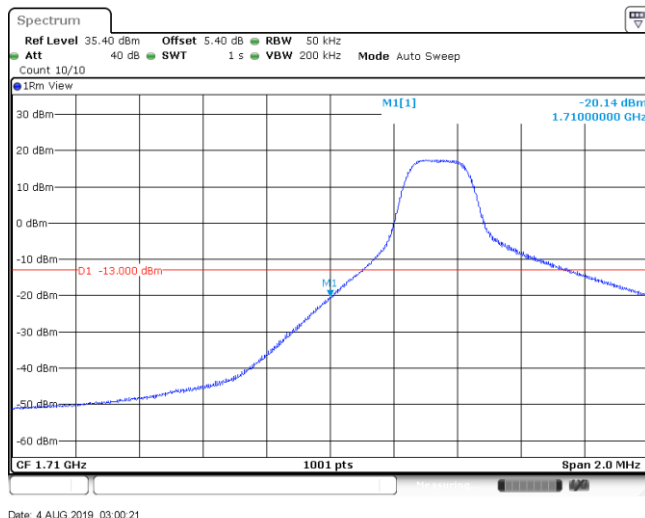
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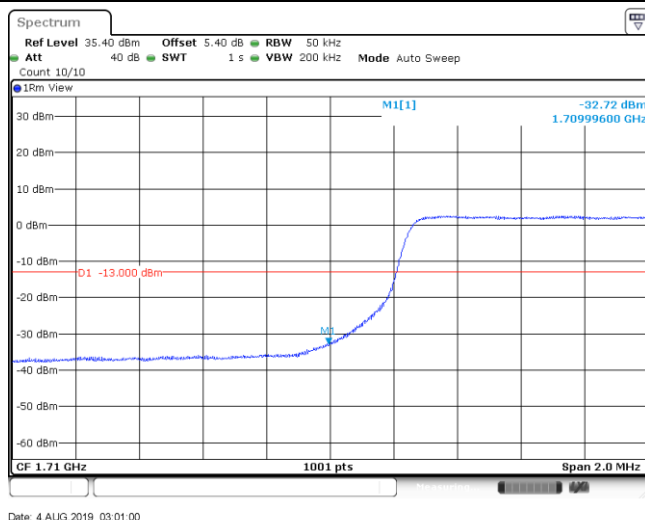
Date: 4 AUG 2019 03:02:03

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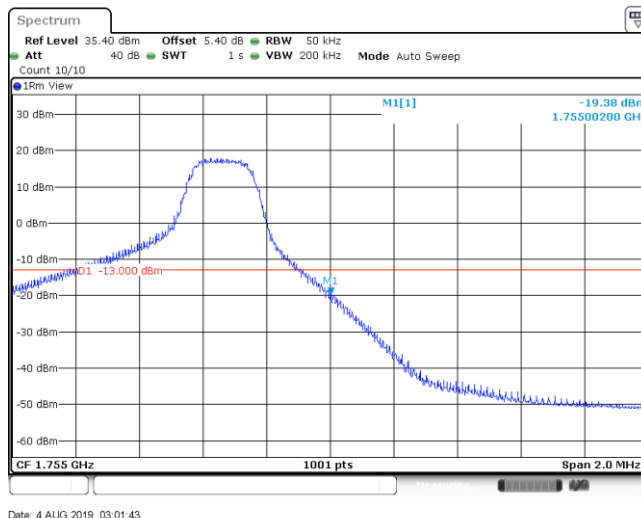


Band4_5MHz_16QAM_19975_25RB#0

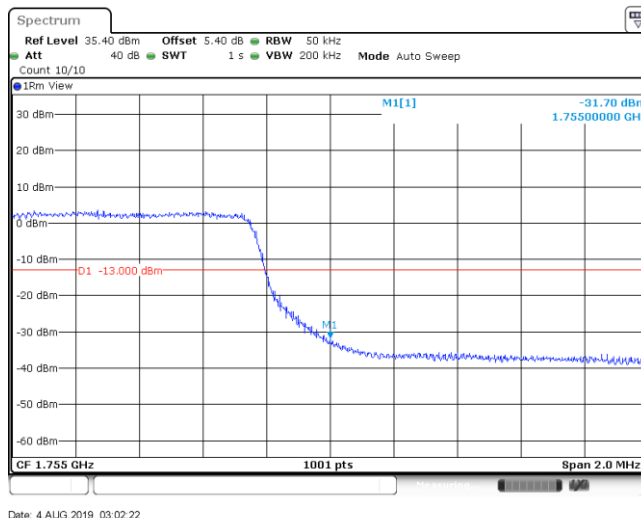


Band4_5MHz_16QAM_20375_1RB#24





Band4_5MHz_16QAM_20375_25RB#0



Band4_10MHz_QPSK_20000_1RB#0

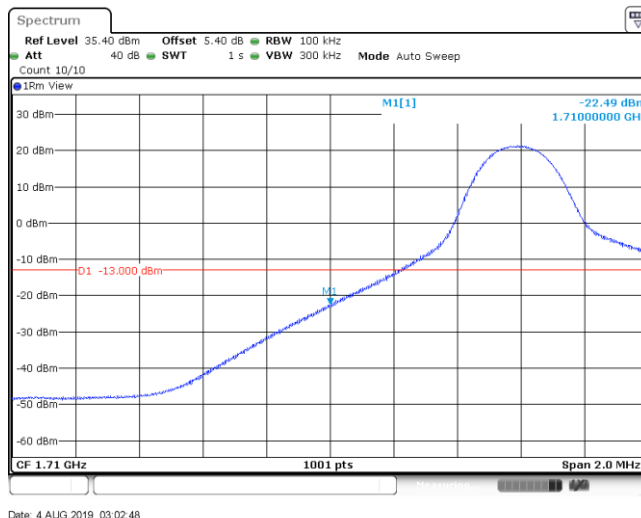


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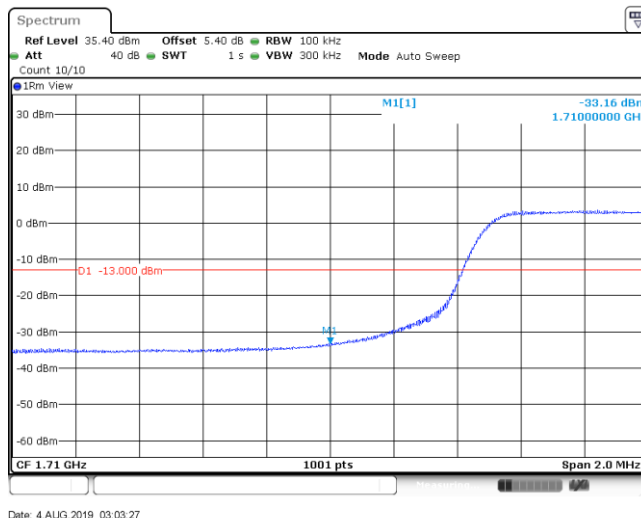
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Band4_10MHz_QPSK_20000_50RB#0



Band4_10MHz_QPSK_20350_1RB#49

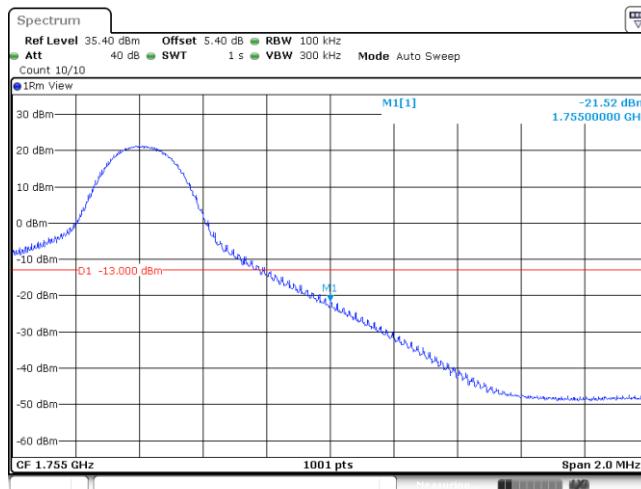


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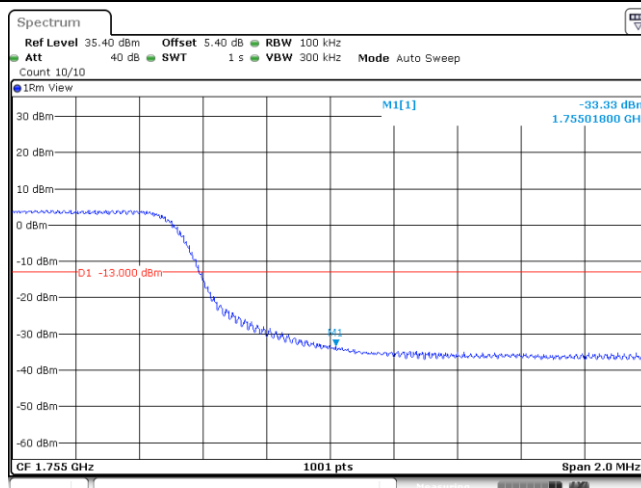
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Date: 4 AUG 2019 03:04:10

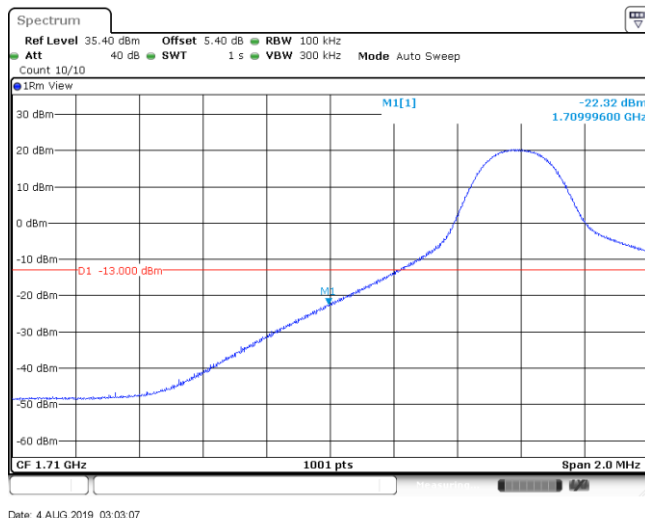
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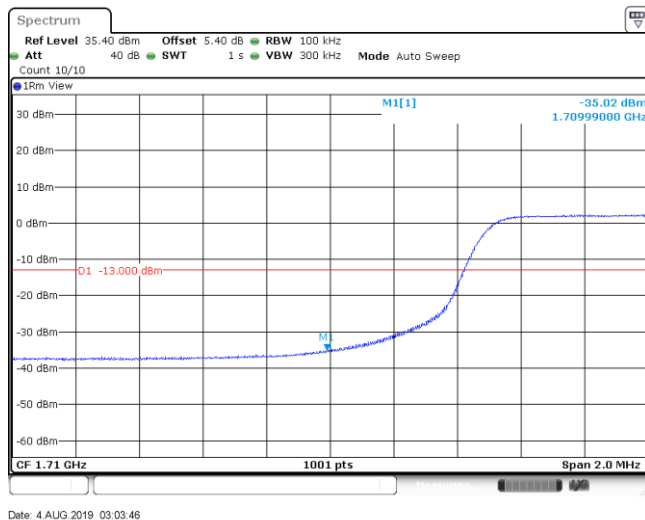
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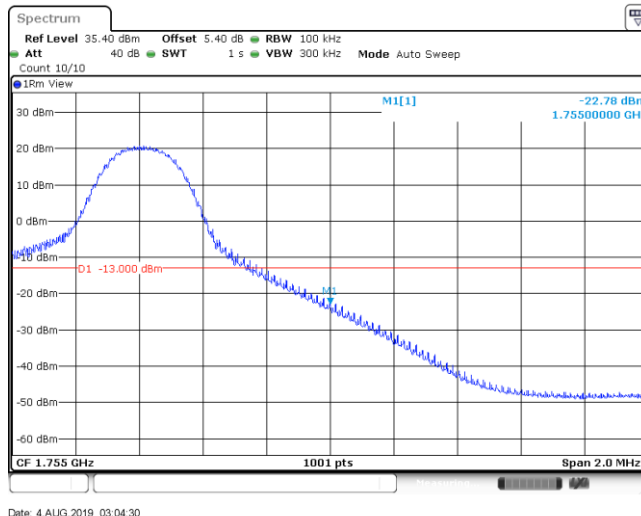


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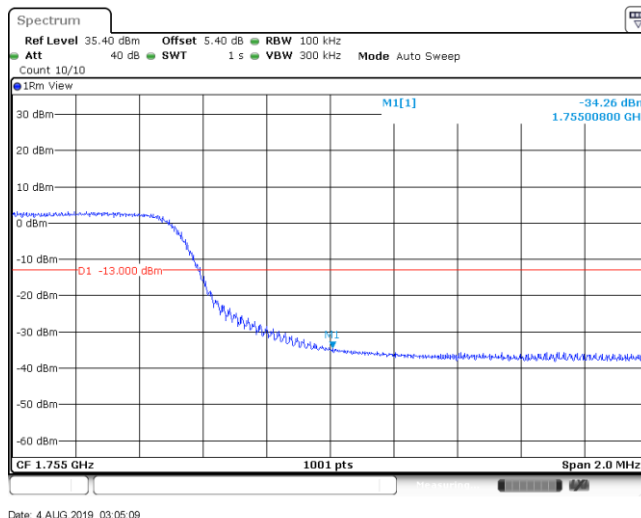


Band4_10MHz_16QAM_20350_1RB#49





Band4_10MHz_16QAM_20350_50RB#0



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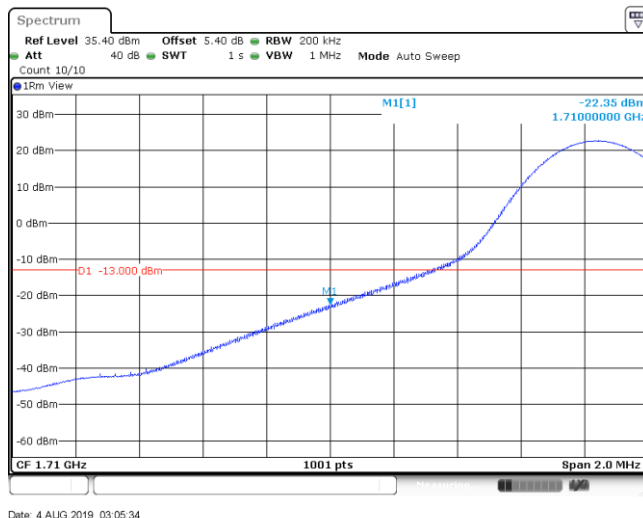


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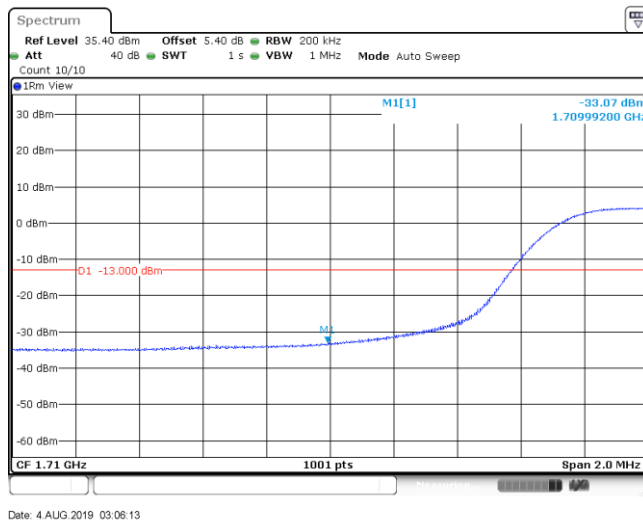
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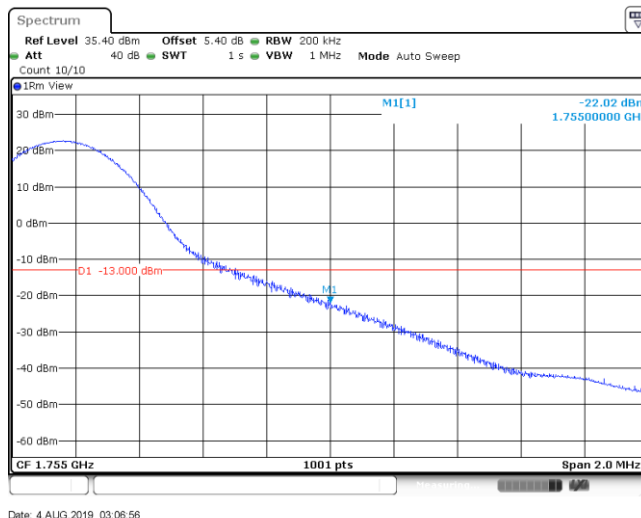


Band4_15MHz_QPSK_20025_75RB#0

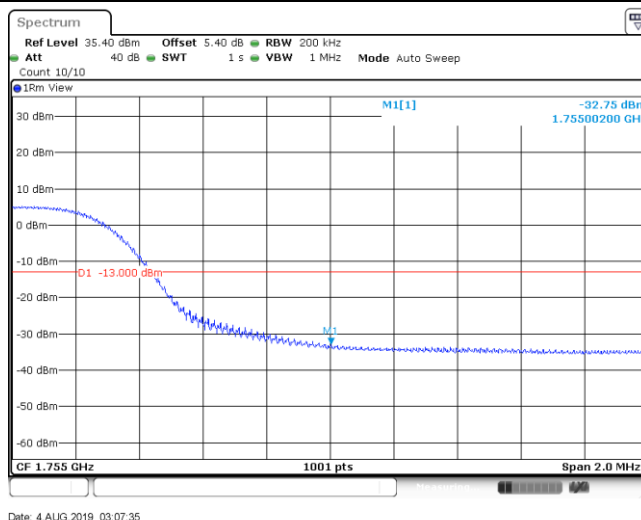


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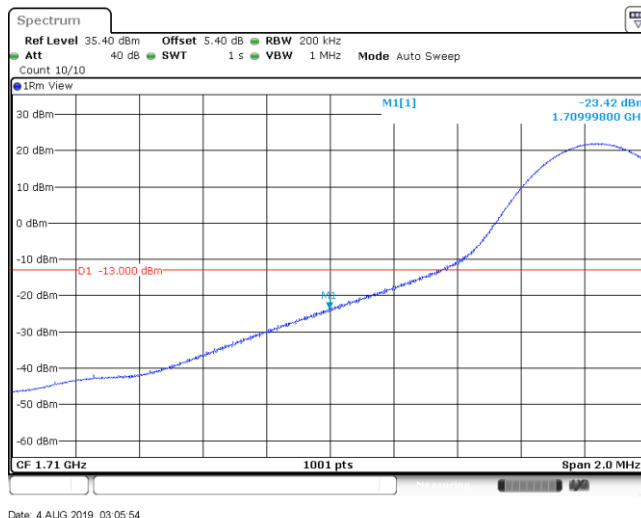


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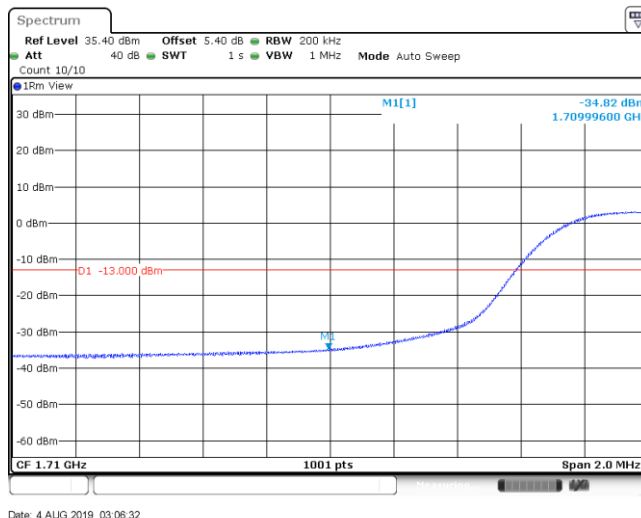


Band4_15MHz_16QAM_20025_1RB#0





Band4_15MHz_16QAM_20025_75RB#0



Band4_15MHz_16QAM_20325_1RB#74

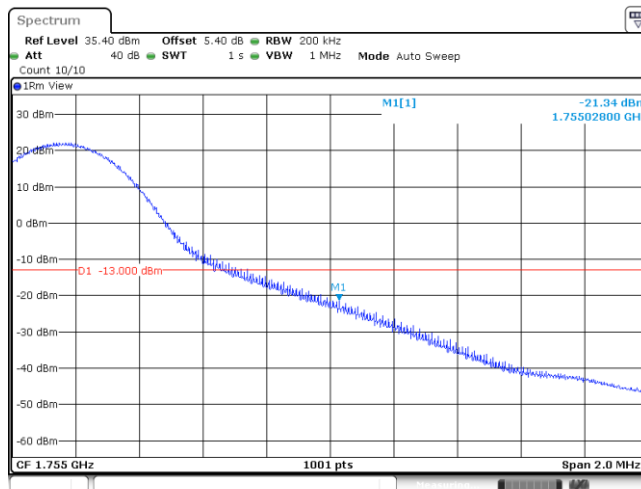


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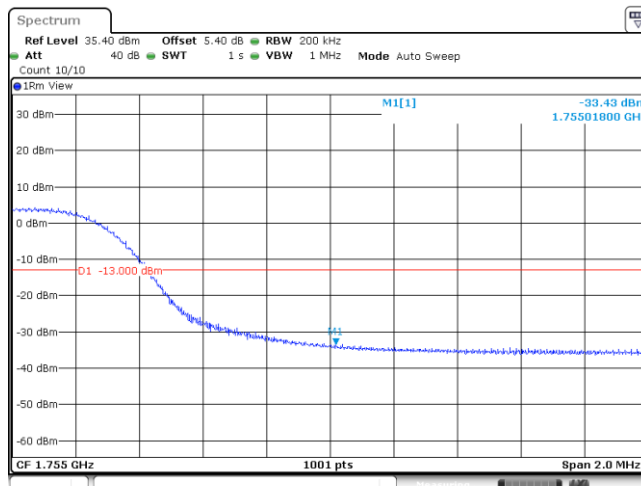
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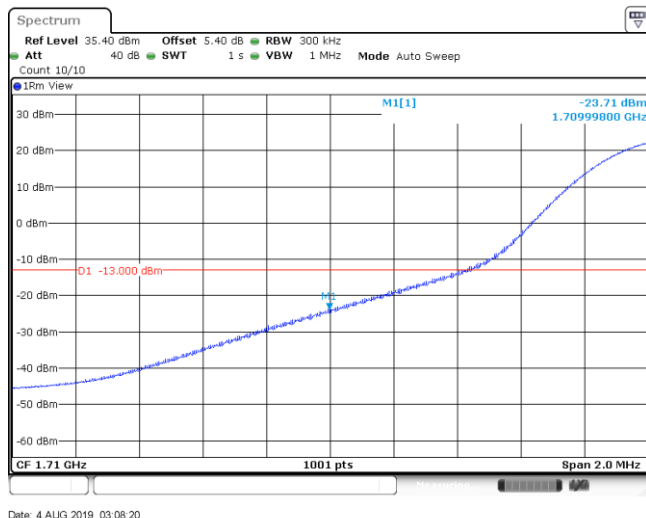
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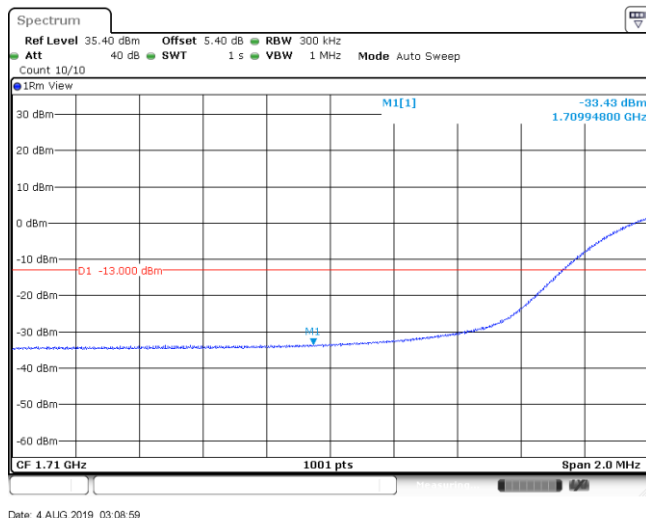
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Band4_20MHz_QPSK_20050_1RB#0





Band4_20MHz_QPSK_20050_100RB#0

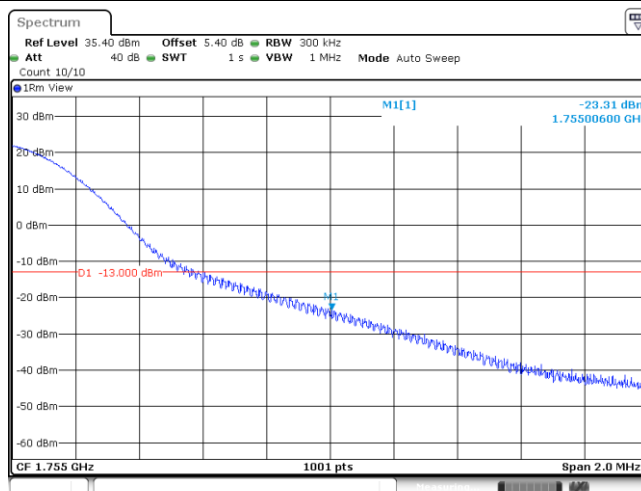


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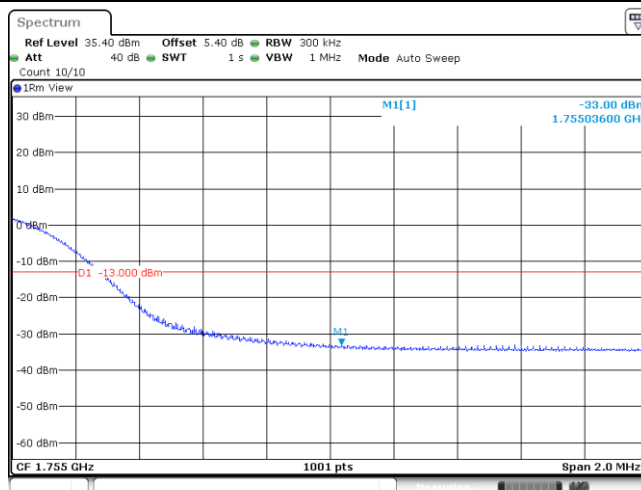
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Date: 4 AUG 2019 03:09:42

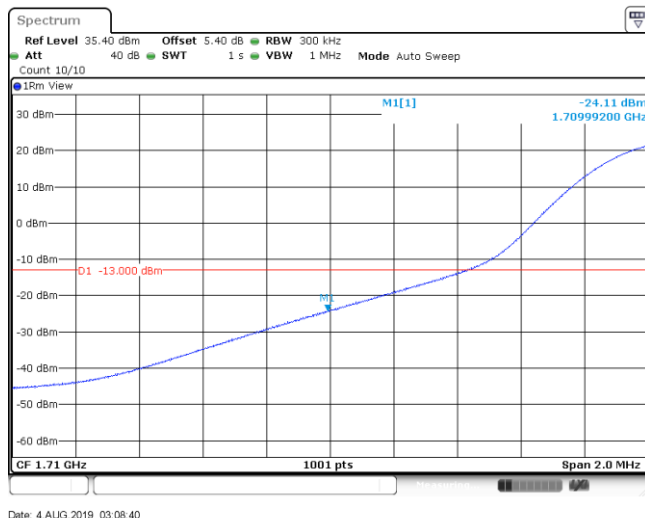
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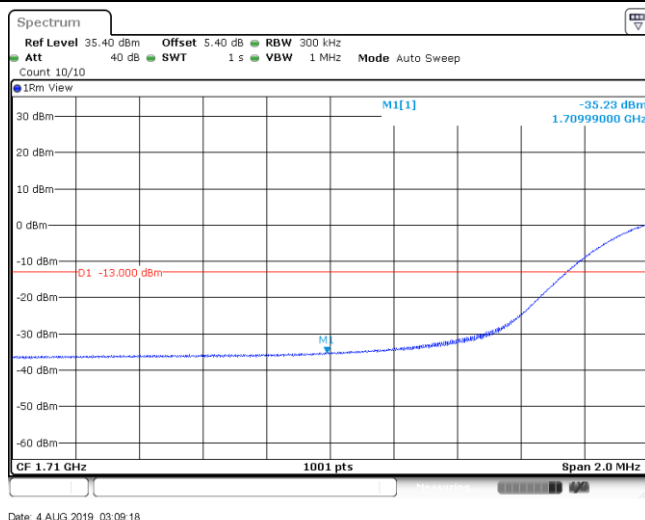
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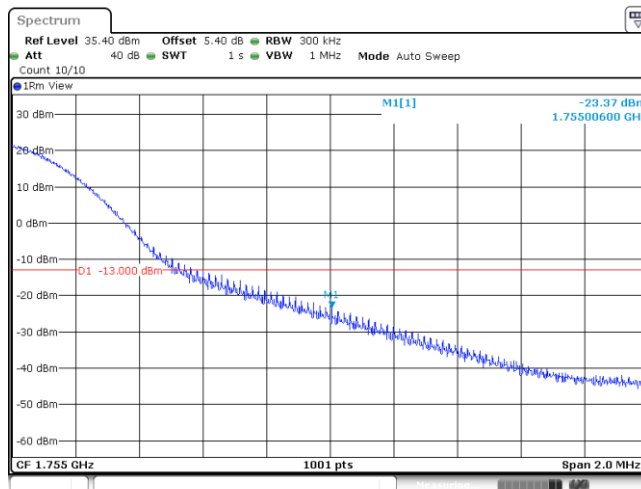


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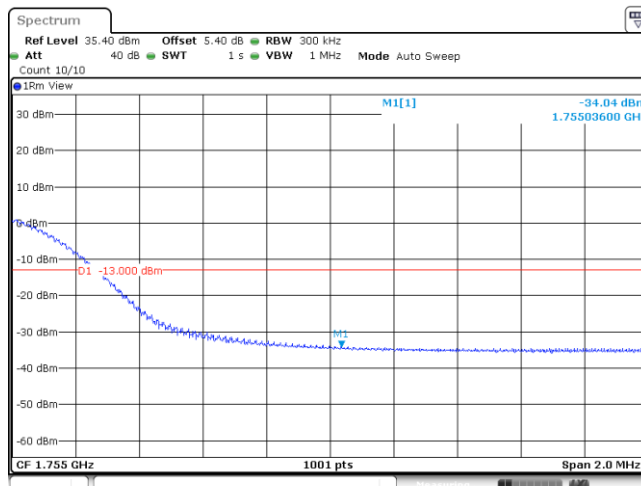
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Band4_20MHz_16QAM_20300_100RB#0



Date: 4 AUG 2019 03:10:41



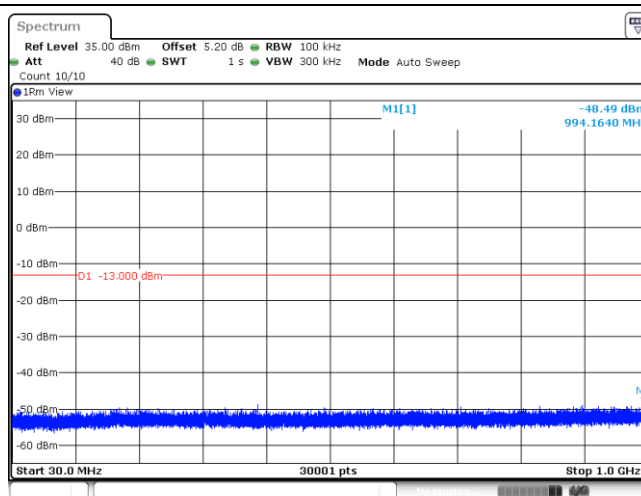
6. Spurious Emission at Antenna Terminal

Remark1: For the averaged unwanted emissions measurements, the measurement points in each sweep is greater than twice the Span/RBW in order to ensure bin-to-bin spacing of $< RBW/2$ so that narrowband signals are not lost between frequency bins. As to the present test item, the "Measurement Points = $k * (\text{Span} / RBW)$ " with k between 4 and 5, which results in an acceptable level error of less than 0.5 dB.

Remark2: only the worst case data displayed in this report.

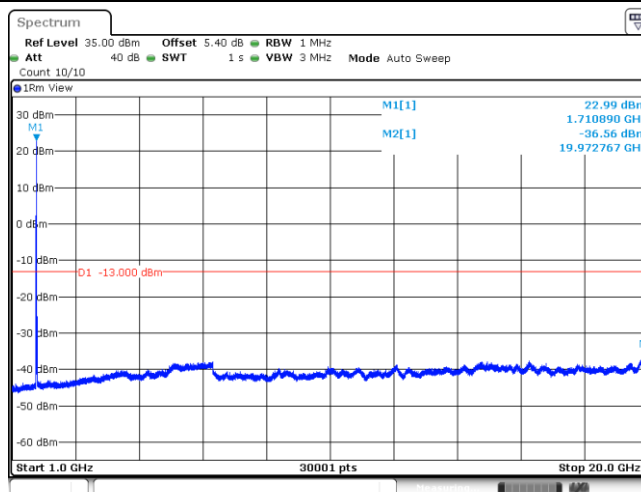
6.1. Test Plots

Band4_20MHz_QPSK_20050_1RB#0



Date: 4 AUG 2019 03:11:04

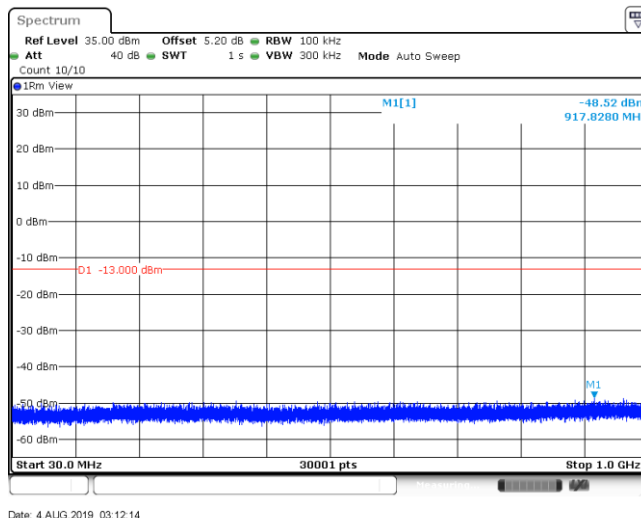
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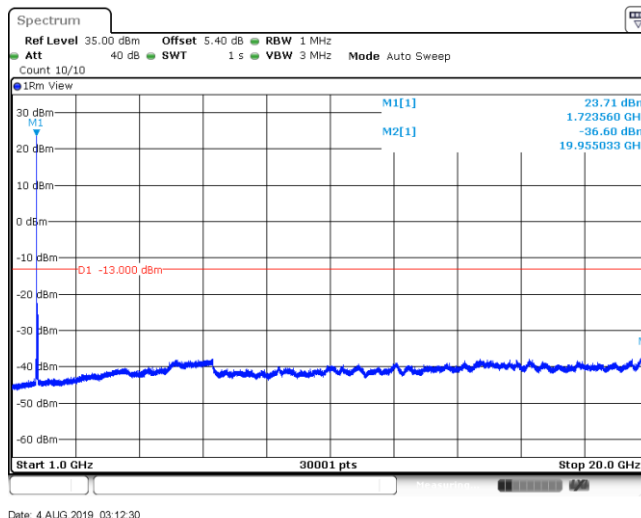
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Band4_20MHz_QPSK_20175_1RB#0





Band4_20MHz_QPSK_20175_1RB#0

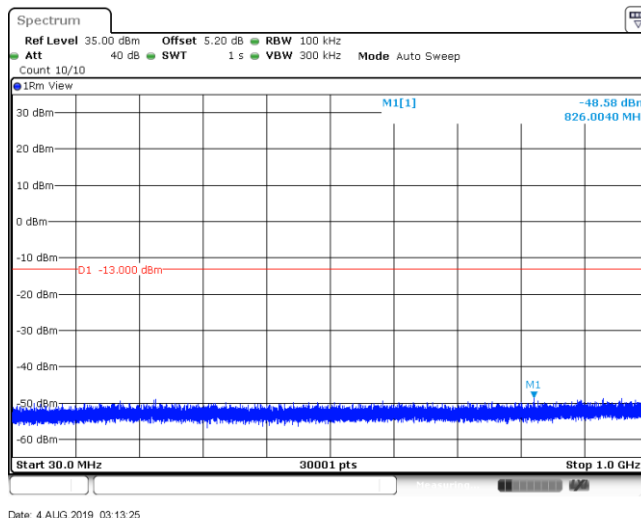


Band4_20MHz_QPSK_20300_1RB#0

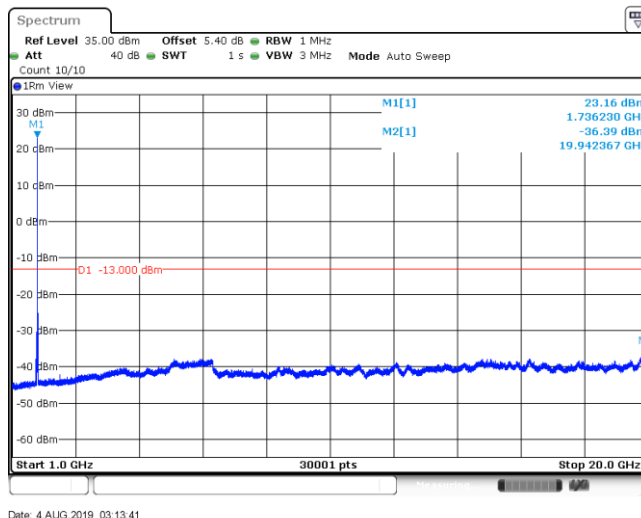


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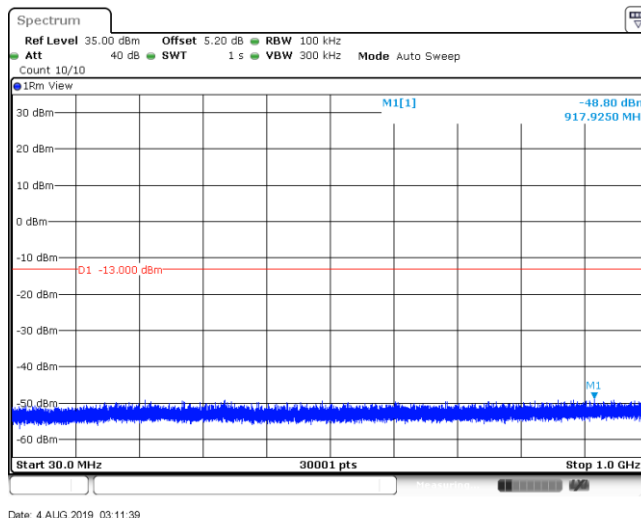


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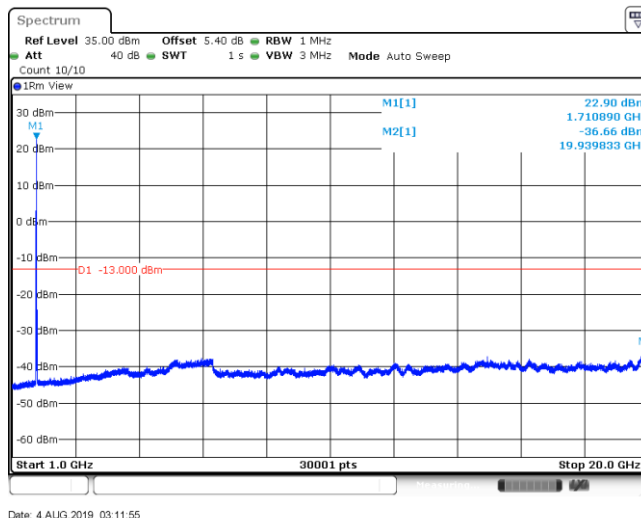


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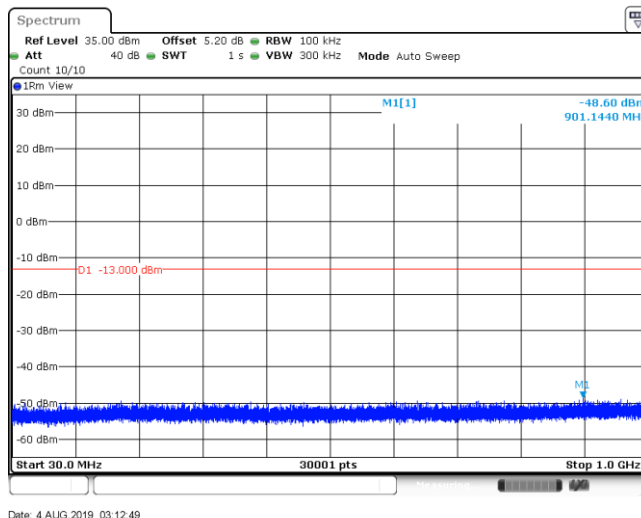


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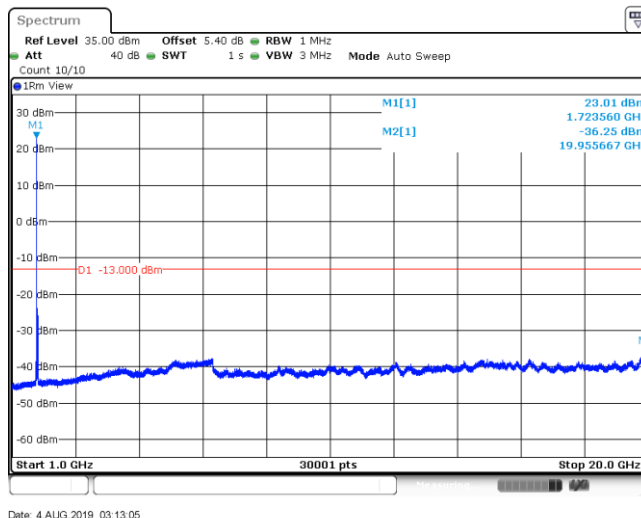


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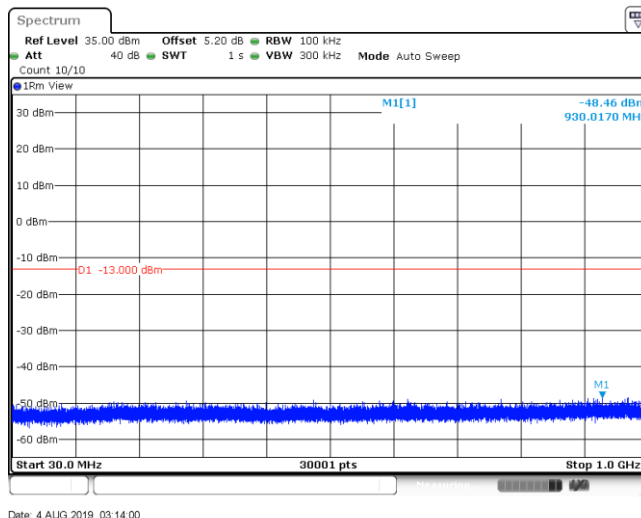


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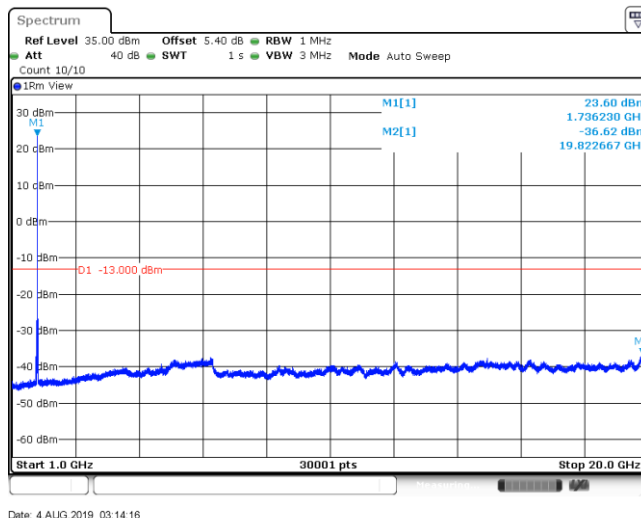


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7. Field Strength of Spurious Radiation

7.1. Test Band = LTE Band 4

7.1.1. Test Mode = LTE/TM1

7.1.1.1. Test Channel = LCH

Frequency (MHz)	Level (dBm)	Limit Line (dBm)	Margin (dB)	Polarization
110.1260	-64.73	-13.00	51.73	Vertical
876.2703	-61.41	-13.00	48.41	Vertical
2699.9400	-37.52	-13.00	24.52	Vertical
8062.1687	-52.18	-13.00	39.18	Vertical
14724.3908	-42.03	-13.00	29.03	Vertical
17981.9994	-32.15	-13.00	19.15	Vertical
39.8460	-64.13	-13.00	51.13	Horizontal
794.0587	-62.21	-13.00	49.21	Horizontal
2703.5407	-36.28	-13.00	23.28	Horizontal
7480.1493	-53.09	-13.00	40.09	Horizontal
16396.4465	-37.84	-13.00	24.84	Horizontal
17993.9998	-37.11	-13.00	24.11	Horizontal

7.1.1.2. Test Channel = MCH

Frequency (MHz)	Level (dBm)	Limit Line (dBm)	Margin (dB)	Polarization
108.8164	-64.94	-13.00	51.94	Vertical
780.5750	-62.47	-13.00	49.47	Vertical
2701.1402	-37.54	-13.00	24.54	Vertical
5784.5928	-55.51	-13.00	42.51	Vertical
14675.3892	-42.17	-13.00	29.17	Vertical
17988.4996	-32.42	-13.00	19.42	Vertical
44.6477	-64.04	-13.00	51.04	Horizontal
865.2118	-60.87	-13.00	47.87	Horizontal
2700.7401	-36.22	-13.00	23.22	Horizontal
8025.1675	-52.72	-13.00	39.72	Horizontal
16187.9396	-40.21	-13.00	27.21	Horizontal
17960.9987	-37.10	-13.00	24.10	Horizontal



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7.1.1.3. Test Channel = HCH

Frequency (MHz)	Level (dBm)	Limit Line (dBm)	Margin (dB)	Polarization
108.3314	-64.03	-13.00	51.03	Vertical
742.5976	-61.77	-13.00	48.77	Vertical
2705.5411	-37.42	-13.00	24.42	Vertical
7372.1457	-52.98	-13.00	39.98	Vertical
14498.3833	-42.89	-13.00	29.89	Vertical
17989.4997	-32.31	-13.00	19.31	Vertical
42.4651	-63.83	-13.00	50.83	Horizontal
607.6639	-62.62	-13.00	49.62	Horizontal
2699.9400	-36.22	-13.00	23.22	Horizontal
8517.1839	-51.84	-13.00	38.84	Horizontal
16386.9462	-38.22	-13.00	25.22	Horizontal
17989.4997	-36.87	-13.00	23.87	Horizontal

Remark:

- 1 According to 971168 D01 Power Meas License Digital Systems, The amplitudes of unwanted emissions that are attenuated more than 20 dB below the applicable limit are not required to be reported.
- 2 The disturbance below 30MHz was very low, and the above harmonics were the highest point could be found when testing, so only the worst case data had been displayed.





8. Frequency Stability

8.1. Frequency Vs Voltage

Voltage										
Band	Bandwidth	Modulation	Channel	RB Configure	Voltage [Vdc]	Temperature (°C)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
Band4	20MHz	QPSK	20050	100RB#0	VL	NT	-6.90	-0.004012	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	VN	NT	-7.00	-0.004070	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	VH	NT	-5.50	-0.003198	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	VL	NT	-4.20	-0.002424	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	VN	NT	-2.90	-0.001674	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	VH	NT	-5.70	-0.003290	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	VL	NT	-3.10	-0.001777	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	VN	NT	-2.50	-0.001433	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	VH	NT	1.10	0.000630	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	VL	NT	-9.20	-0.005349	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	VN	NT	-1.10	-0.000640	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	VH	NT	-5.20	-0.003023	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	VL	NT	-9.10	-0.005253	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	VN	NT	0.40	0.000231	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	VH	NT	-5.70	-0.003290	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	VL	NT	0.90	0.000516	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	VN	NT	-1.10	-0.000630	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	VH	NT	-4.00	-0.002292	±2.5	PASS

8.2. Frequency Vs Temperature

Temperature										
Band	Bandwidth	Modulation	Channel	RB Configure	Voltage [Vdc]	Temperature (°C)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
Band4	20MHz	QPSK	20050	100RB#0	NV	-30	-3.20	-0.001860	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	NV	-20	-2.70	-0.001570	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	NV	0	-9.20	-0.005349	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	NV	10	-3.10	-0.001802	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	NV	20	-1.50	-0.000872	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	NV	30	-0.40	-0.000233	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	NV	40	-3.70	-0.002151	±2.5	PASS
Band4	20MHz	QPSK	20050	100RB#0	NV	50	-3.40	-0.001977	±2.5	PASS



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Band4	20MHz	QPSK	20175	100RB#0	NV	-30	-9.20	-0.005310	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	NV	-20	-11.50	-0.006638	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	NV	0	-5.80	-0.003348	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	NV	10	-7.10	-0.004098	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	NV	20	-5.90	-0.003405	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	NV	30	-5.60	-0.003232	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	NV	40	-7.90	-0.004560	±2.5	PASS
Band4	20MHz	QPSK	20175	100RB#0	NV	50	-5.20	-0.003001	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	NV	-30	-1.10	-0.000630	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	NV	-20	1.30	0.000745	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	NV	0	1.10	0.000630	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	NV	10	-0.90	-0.000516	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	NV	20	2.20	0.001261	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	NV	30	-3.80	-0.002178	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	NV	40	-5.40	-0.003095	±2.5	PASS
Band4	20MHz	QPSK	20300	100RB#0	NV	50	-3.10	-0.001777	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	NV	-30	-3.70	-0.002151	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	NV	-20	-6.80	-0.003953	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	NV	0	-0.20	-0.000116	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	NV	10	-4.20	-0.002442	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	NV	20	-1.10	-0.000640	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	NV	30	-4.40	-0.002558	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	NV	40	-6.90	-0.004012	±2.5	PASS
Band4	20MHz	16QAM	20050	100RB#0	NV	50	-2.20	-0.001279	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	NV	-30	-0.20	-0.000115	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	NV	-20	-3.60	-0.002078	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	NV	0	-2.30	-0.001328	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	NV	10	-0.30	-0.000173	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	NV	20	-5.90	-0.003405	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	NV	30	-6.30	-0.003636	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	NV	40	-3.00	-0.001732	±2.5	PASS
Band4	20MHz	16QAM	20175	100RB#0	NV	50	-10.10	-0.005830	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	NV	-30	-0.20	-0.000115	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	NV	-20	-3.30	-0.001891	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	NV	0	-5.20	-0.002980	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	NV	10	0.10	0.000057	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	NV	20	-5.70	-0.003266	±2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	NV	30	-0.70	-0.000401	±2.5	PASS



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Band4	20MHz	16QAM	20300	100RB#0	NV	40	-0.20	-0.000115	± 2.5	PASS
Band4	20MHz	16QAM	20300	100RB#0	NV	50	-2.70	-0.001547	± 2.5	PASS

The End

