



Appendix for CDMA

FCC ID: 2AC88-GLMU19A02

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Appendix A: Effective (Isotropic) Radiated Power Output Data

Test Result

Band	Mode	Radio Configuration (RC)	Service Option (SO)	Ch No.	Freq. (MHz)	Result(dBm)
BC0 (850MHz)	1xRTT	RC1	2 (Loopback)	1013	824.70	23.65
				384	836.52	24.69
				777	848.31	23.19
			55 (Loopback)	1013	824.70	24.87
				384	836.52	23.58
				777	848.31	24.89
		RC2	9 (Loopback)	1013	824.70	23.11
				384	836.52	23.40
				777	848.31	24.43
			55 (Loopback)	1013	824.70	24.01
				384	836.52	24.88
				777	848.31	23.37
		RC3	2 (Loopback)	1013	824.70	24.09
				384	836.52	23.96
				777	848.31	24.40
			55 (Loopback)	1013	824.70	25.00
				384	836.52	24.45
				777	848.31	23.05
			32 (+ F-SCH)	1013	824.70	23.91
				384	836.52	24.79
				777	848.31	24.18
			32 (+ SCH)	1013	824.70	23.21
				384	836.52	24.24
				777	848.31	24.38
		RC4	2 (Loopback)	1013	824.70	24.84
				384	836.52	23.25
				777	848.31	24.11
			55 (Loopback)	1013	824.70	23.03
				384	836.52	24.10
				777	848.31	23.75
			32 (+ F-SCH)	1013	824.70	24.75
				384	836.52	24.72
				777	848.31	24.56

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			32 (+ SCH)	1013	824.70	23.11
				384	836.52	23.47
				777	848.31	23.22
		RC5	9 (Loopback)	1013	824.70	24.46
				384	836.52	23.17
				777	848.31	23.81
			55 (Loopback)	1013	824.70	23.49
				384	836.52	23.57
				777	848.31	23.86
	1xAdvanced	RC11	2 (Loopback)	1013	824.70	24.63
				384	836.52	23.06
				777	848.31	24.90
			75 (Loopback)	1013	824.70	24.75
				384	836.52	23.09
				777	848.31	24.55
			32 (+ F-SCH)	1013	824.70	24.39
				384	836.52	24.55
				777	848.31	23.20
			32 (+ SCH)	1013	824.70	24.29
				384	836.52	23.18
				777	848.31	23.35
	1xEVDO Rel. 0	FTAP Rate: 307.2 kbps(2 slot, QPSK)	RTAP Rate: 153.6 kbps	1013	824.70	24.85
				384	836.52	24.31
				777	848.31	23.36
	1xEVDO Rev. A	FETAP: 307.2k, QPSK/ ACK	RETAP: 4096	1013	824.70	23.55
				384	836.52	24.56
				777	848.31	23.25

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Band	Mode	Radio Configuration (RC)	Service Option (SO)	Ch No.	Freq. (MHz)	Result(dBm)
BC1 (1900MHz)	1xRTT	RC1	2 (Loopback)	25	1851.25	24.84
				600	1880	24.90
				1175	1908.75	23.07
			55 (Loopback)	25	1851.25	24.35
				600	1880	24.47
				1175	1908.75	23.35
		RC2	9 (Loopback)	25	1851.25	23.77
				600	1880	23.41
				1175	1908.75	23.07
			55 (Loopback)	25	1851.25	24.63
				600	1880	23.73
				1175	1908.75	24.17
		RC3	2 (Loopback)	25	1851.25	23.88
				600	1880	24.15
				1175	1908.75	23.53
			55 (Loopback)	25	1851.25	23.37
				600	1880	24.70
				1175	1908.75	23.15
			32 (+ F-SCH)	25	1851.25	24.98
				600	1880	24.46
				1175	1908.75	23.48
			32 (+ SCH)	25	1851.25	24.47
				600	1880	24.66
				1175	1908.75	24.37
		RC4	2 (Loopback)	25	1851.25	24.41
				600	1880	23.31
				1175	1908.75	23.19
			55 (Loopback)	25	1851.25	23.06
				600	1880	23.27
				1175	1908.75	23.84
			32 (+ F-SCH)	25	1851.25	24.88
				600	1880	23.84
				1175	1908.75	23.34
			32 (+ SCH)	25	1851.25	24.53
				600	1880	23.36
				1175	1908.75	24.28

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		RC5	9 (Loopback)	25	1851.25	24.95
				600	1880	24.57
				1175	1908.75	24.93
			55 (Loopback)	25	1851.25	24.49
				600	1880	23.44
				1175	1908.75	23.61
	1xAdvanced	RC11	2 (Loopback)	25	1851.25	24.04
				600	1880	23.26
				1175	1908.75	24.34
			75 (Loopback)	25	1851.25	23.92
				600	1880	24.12
				1175	1908.75	23.81
			32 (+ F-SCH)	25	1851.25	23.97
				600	1880	24.24
				1175	1908.75	23.75
			32 (+ SCH)	25	1851.25	23.67
				600	1880	24.71
				1175	1908.75	24.21
	1xEVDO Rel. 0	FTAP Rate: 307.2 kbps(2 slot, QPSK)	RTAP Rate: 153.6 kbps	25	1851.25	23.19
				600	1880	23.23
				1175	1908.75	24.19
	1xEVDO Rev. A	FETAP: 307.2k, QPSK/ ACK	RETAP: 4096	25	1851.25	23.40
				600	1880	23.22
				1175	1908.75	24.79

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

Test Result

Band	Mode	Channel	Result(dB)	Limit(dB)	Verdict
BC0	1xRTT	1013	4.17	13	PASS
BC0	1xRTT	384	4.23	13	PASS
BC0	1xRTT	777	3.88	13	PASS
BC1	1xRTT	25	3.39	13	PASS
BC1	1xRTT	600	3.57	13	PASS
BC1	1xRTT	1175	4.23	13	PASS

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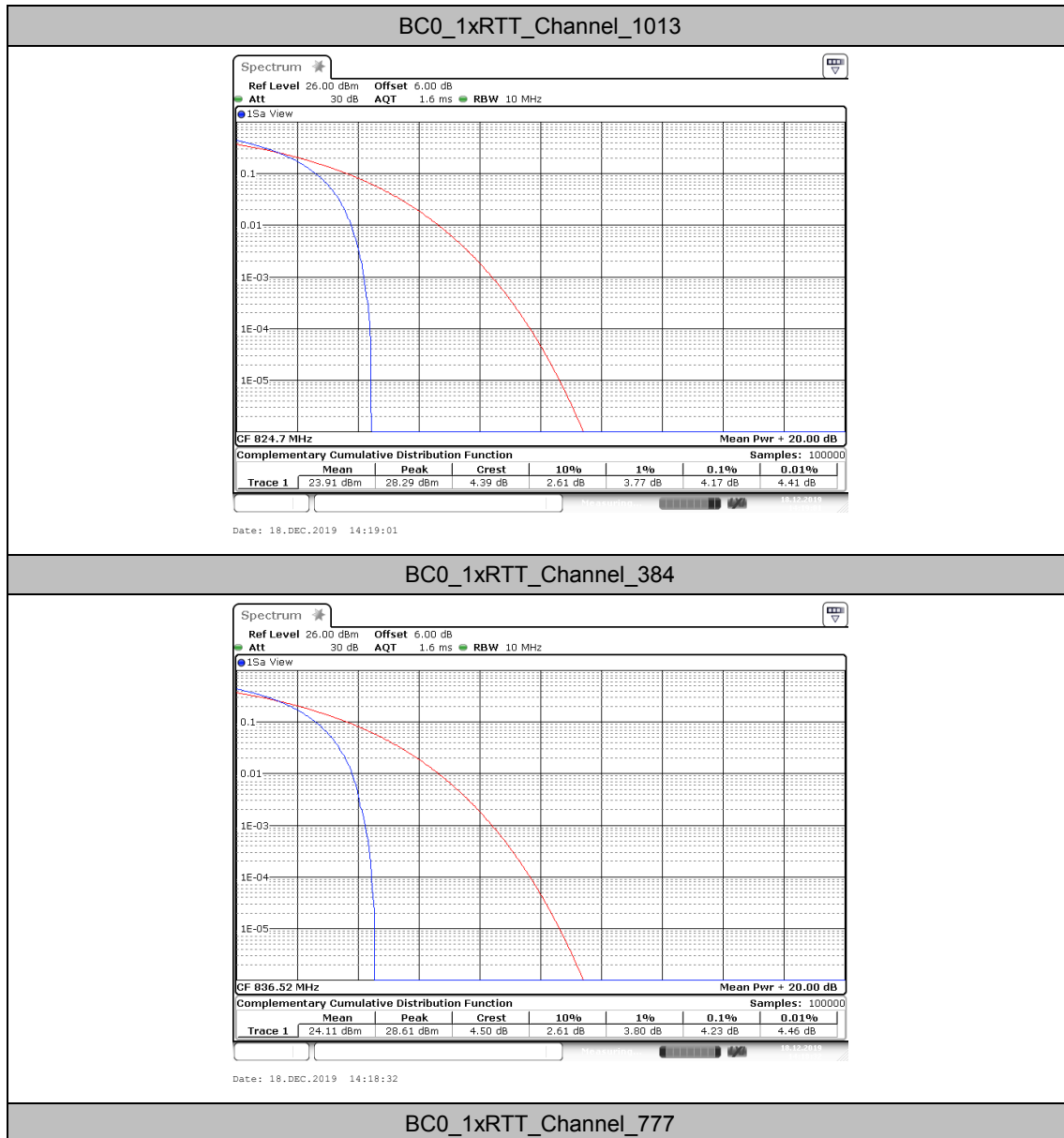
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Test Graphs

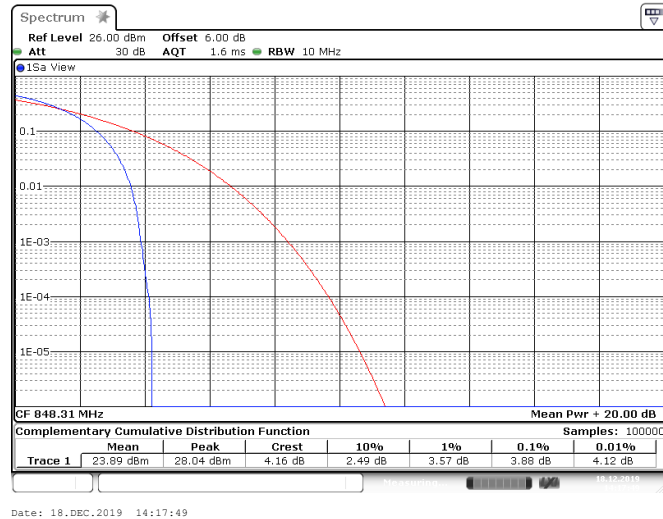


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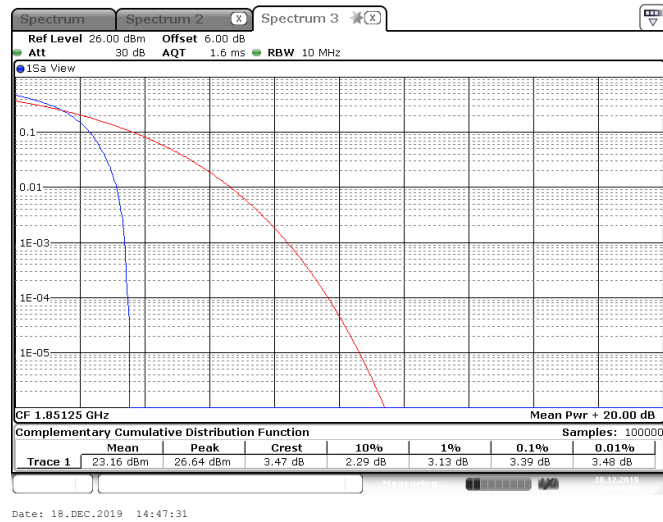
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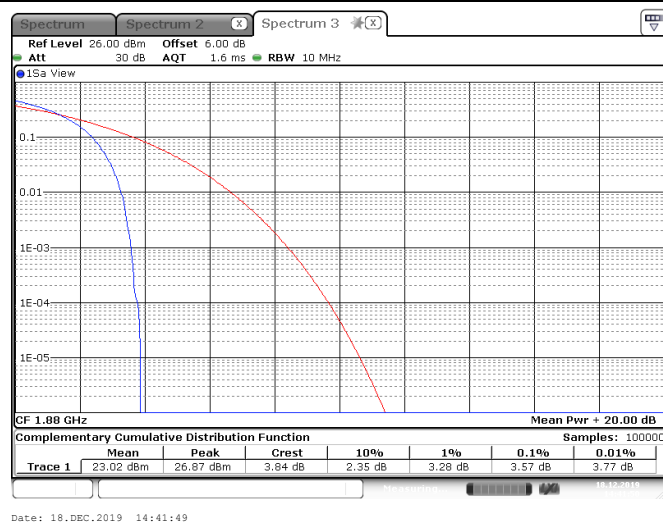
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BC0_1xRTT_Channel_25



BC0_1xRTT_Channel_600



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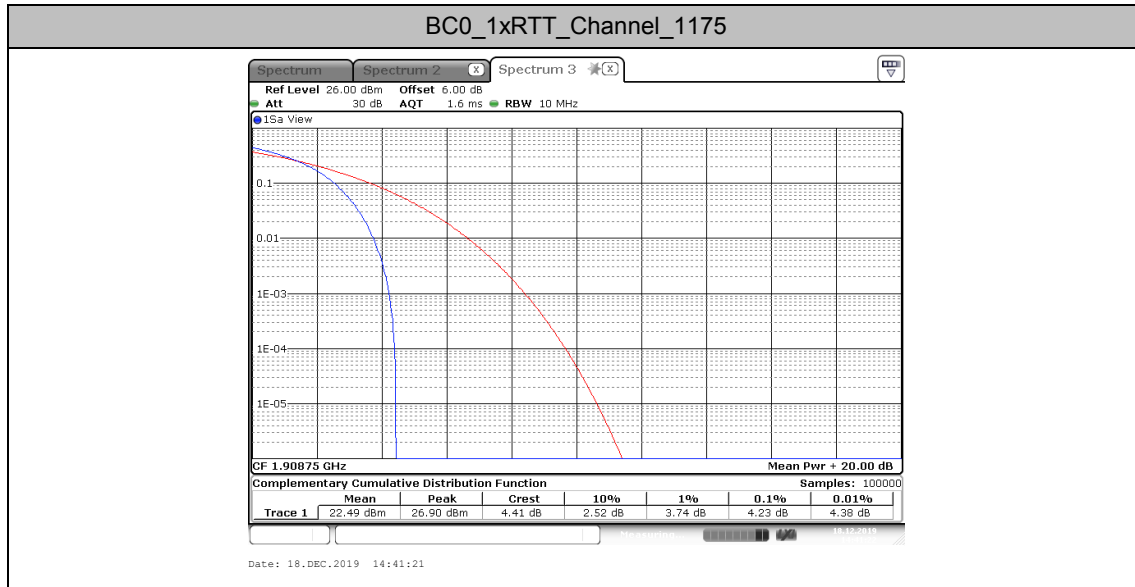
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Appendix C: 26dB Bandwidth and Occupied Bandwidth

Test Result

Band	Mode	Channel	Occupied Bandwidth (MHz)	26dB Bandwidth (MHz)	Verdict
BC0	1xRTT	1013	1.268	1.424	PASS
BC0	1xRTT	384	1.271	1.421	PASS
BC0	1xRTT	777	1.276	1.430	PASS
BC1	1xRTT	25	1.282	1.447	PASS
BC1	1xRTT	600	1.279	1.436	PASS
BC1	1xRTT	1175	1.276	1.433	PASS

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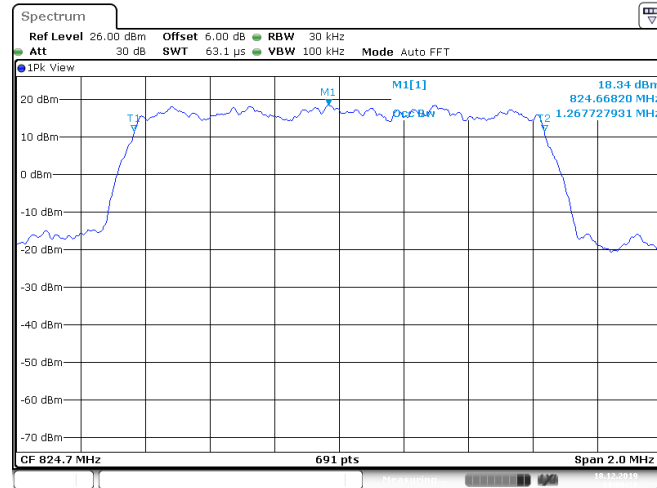
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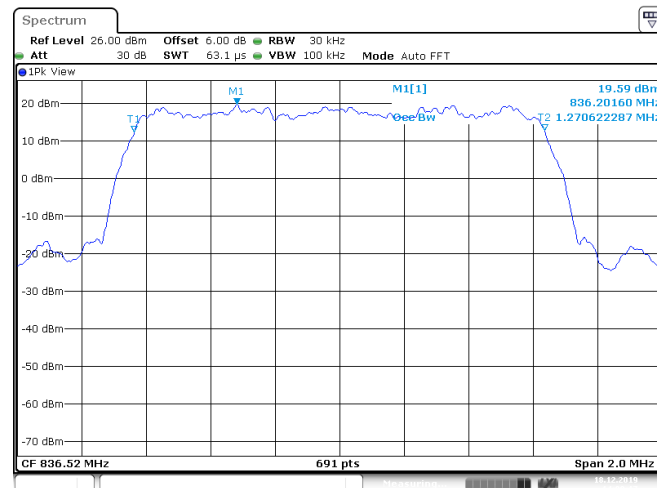
Test Graphs

BC0_1xRTT Channel_1013_Occupied Bandwidth(MHz)



Date: 18.DEC.2019 14:06:37

BC0_1xRTT Channel_384_Occupied Bandwidth(MHz)



Date: 18.DEC.2019 14:08:16

BC0_1xRTT Channel_777_Occupied Bandwidth(MHz)

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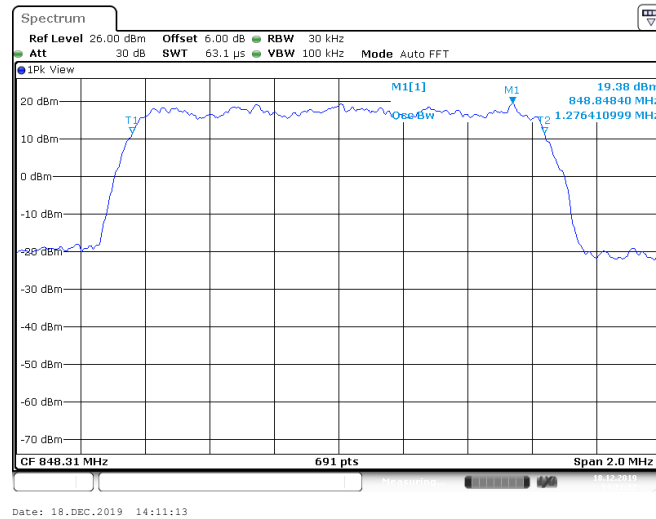
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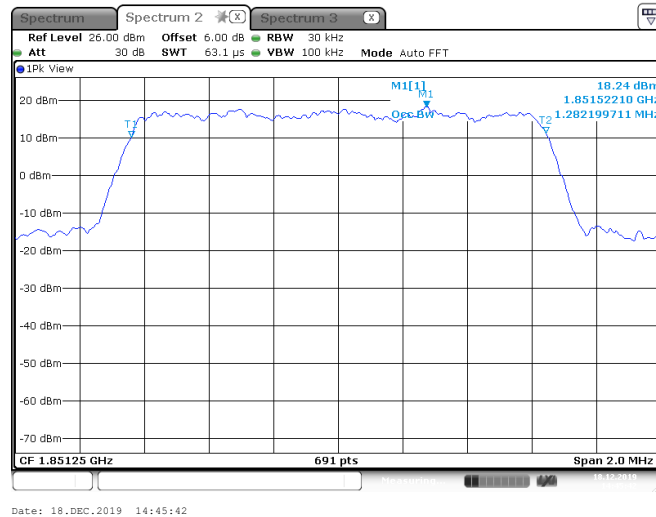
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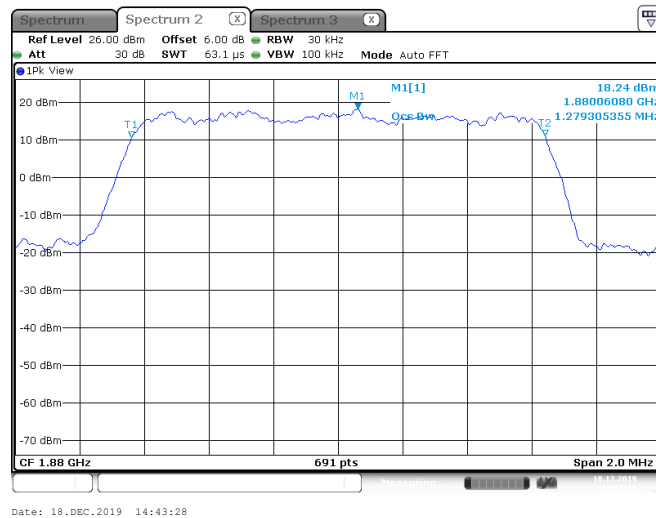
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BC1_1xRTT Channel_25_Occupied Bandwidth(MHz)



BC1_1xRTT Channel_600_Occupied Bandwidth(MHz)



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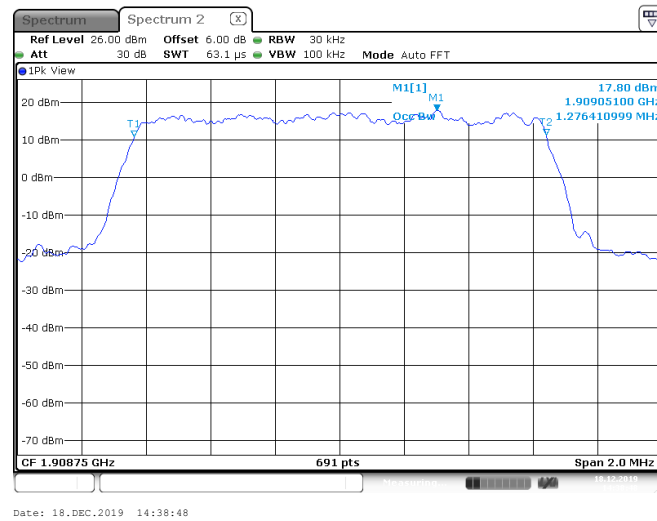
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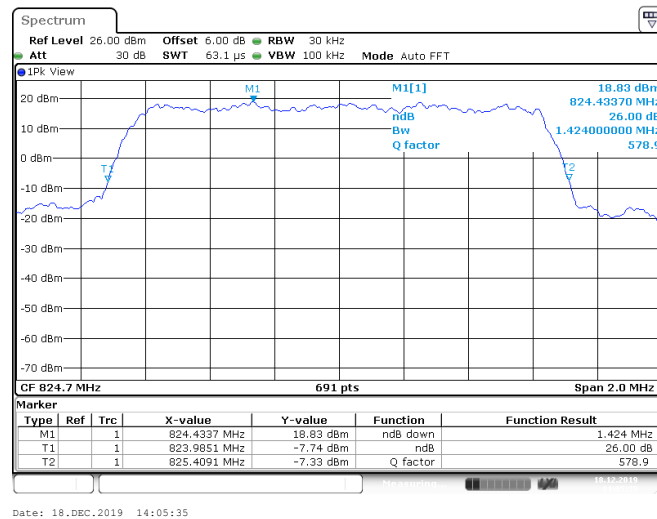


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BC1_1xRTT Channel_1175_Occupied Bandwidth(MHz)



BC0_1xRTT Channel_1013_26dB Bandwidth(MHz)



BC0_1xRTT Channel_384_26dB Bandwidth(MHz)

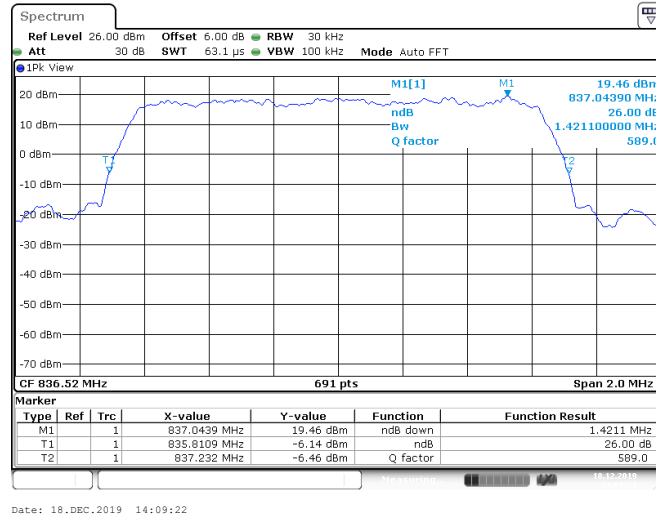
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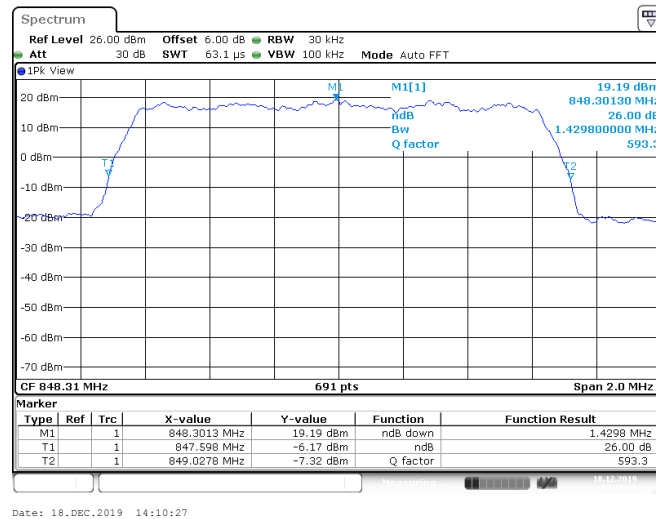
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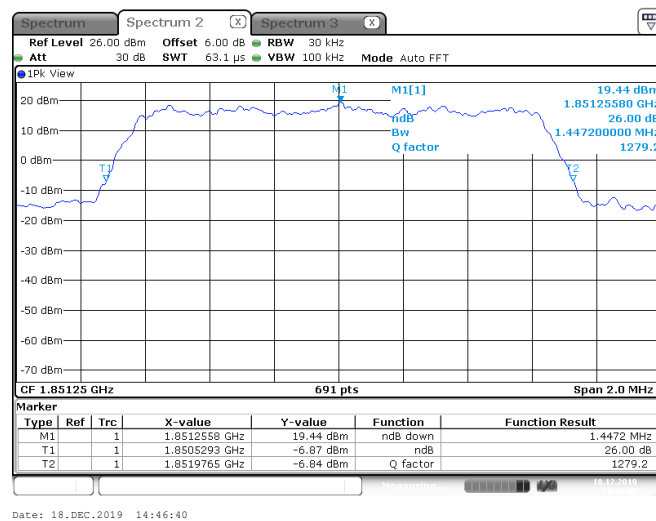

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BC0_1xRTT Channel_777_26dB Bandwidth(MHz)



BC1_1xRTT Channel_25_26dB Bandwidth(MHz)



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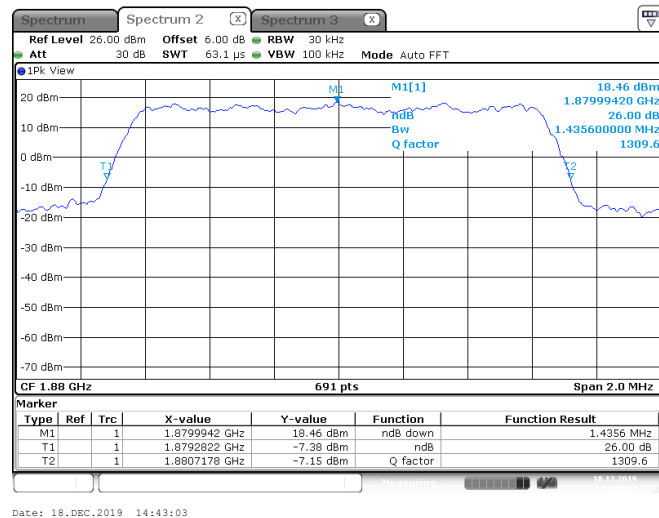
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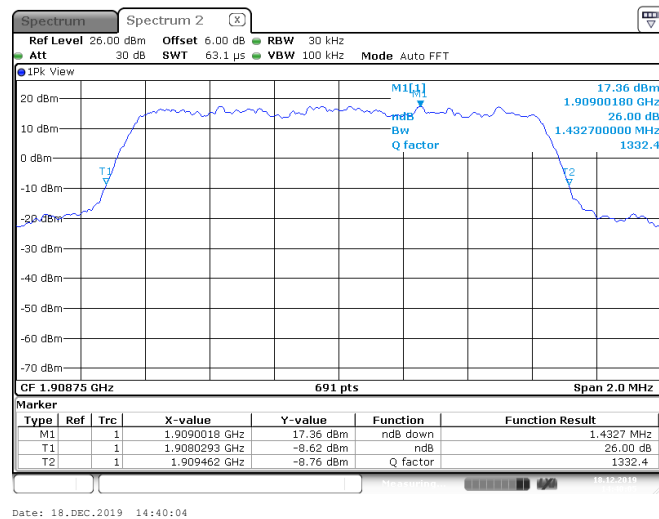
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BC1_1xRTT Channel_600_26dB Bandwidth(MHz)



BC1_1xRTT Channel_1175_26dB Bandwidth(MHz)



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Appendix D: Band Edge

Test Result

Band	Mode	Channel	Result(dBm)	Verdict
BC0	1xRTT	1013	-18.10	PASS
BC0	1xRTT	777	-15.34	PASS
BC1	1xRTT	25	-36.39	PASS
BC1	1xRTT	1175	-38.44	PASS

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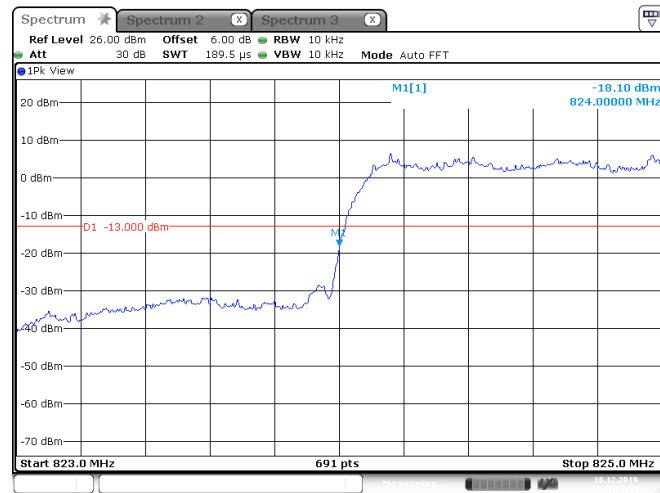
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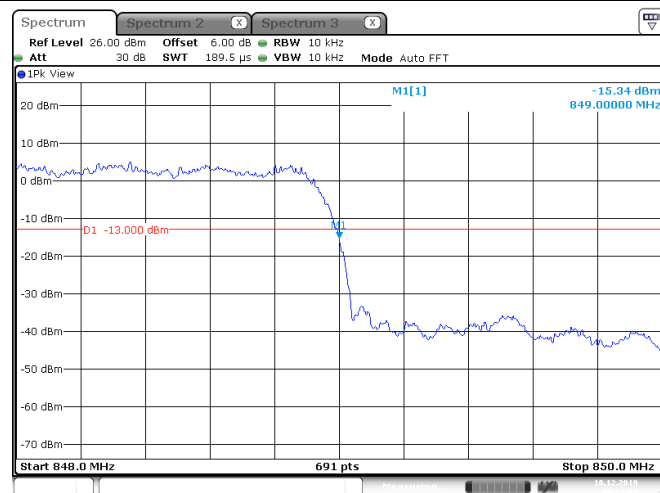
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Test Graphs

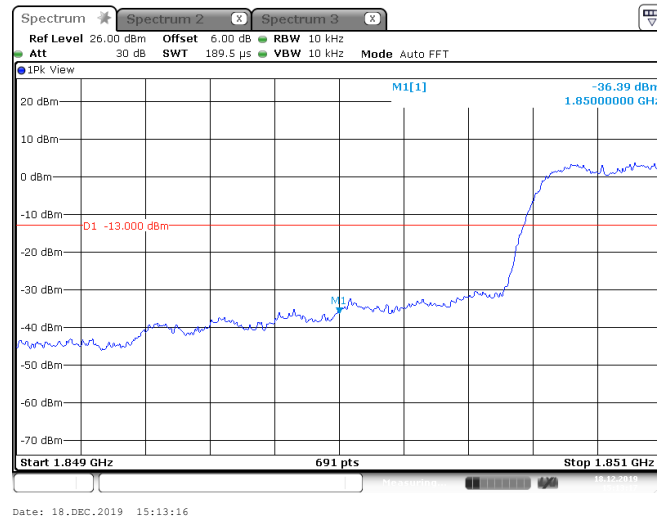
BC0_1xRTT_1013_Band Edge



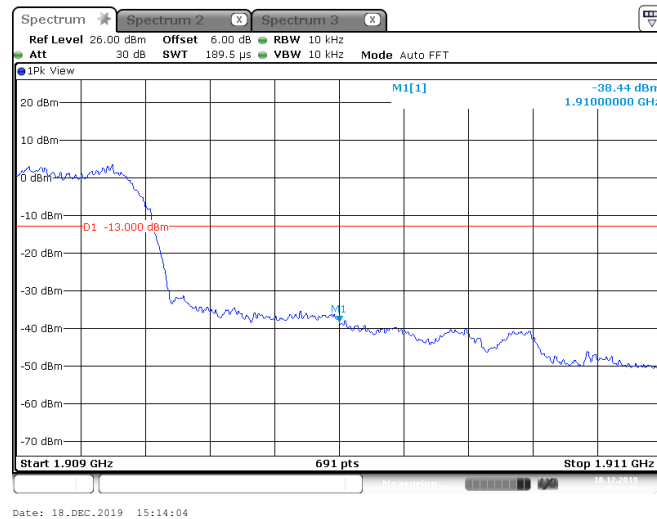
BC0_1xRTT_777_Band Edge



BC1_1xRTT_25_Band Edge



BC1_1xRTT_1175_Band Edge



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Appendix E: Conducted Spurious Emission

Test Result

Band	Mode	Channel	Frequency Range	Result (dBm)	Verdict
BC0	1xRTT	1013	Range:30MHz~10GHz	-31.47	PASS
BC0	1xRTT	384	Range:30MHz~10GHz	-32.43	PASS
BC0	1xRTT	777	Range:30MHz~10GHz	-31.70	PASS
BC1	1xRTT	25	Range:30MHz~20GHz	-32.09	PASS
BC1	1xRTT	600	Range:30MHz~20GHz	-31.87	PASS
BC1	1xRTT	1175	Range:30MHz~20GHz	-31.69	PASS

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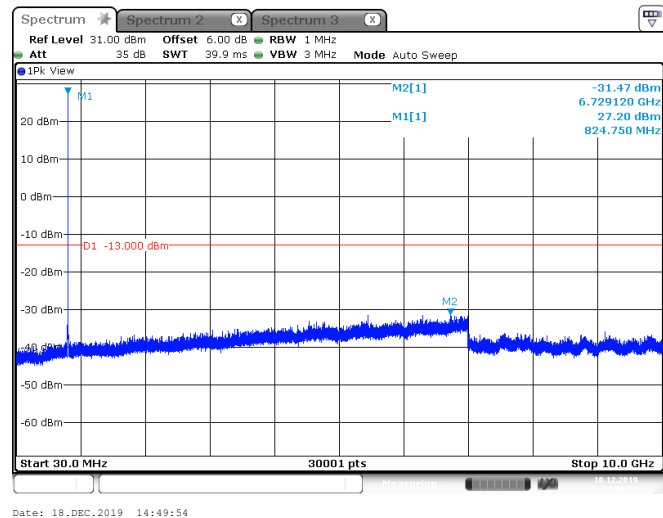
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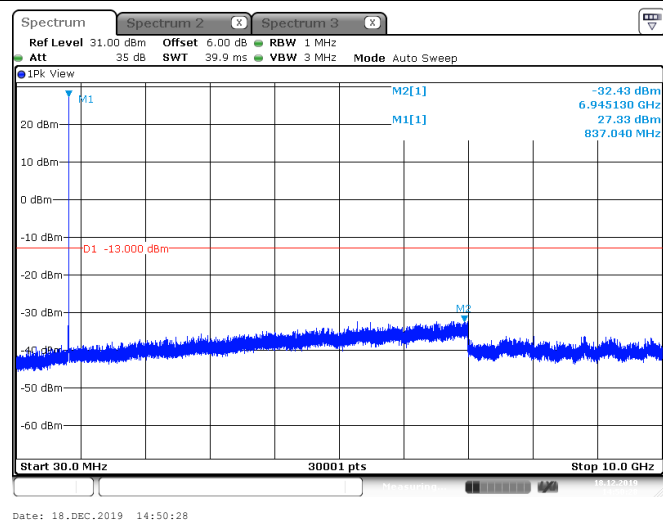
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Test Graphs

BC0_1xRTT_1013_Range:30MHz~10GHz



BC0_1xRTT_384_Range:30MHz~10GHz



BC0_1xRTT_777_Range:30MHz~10GHz

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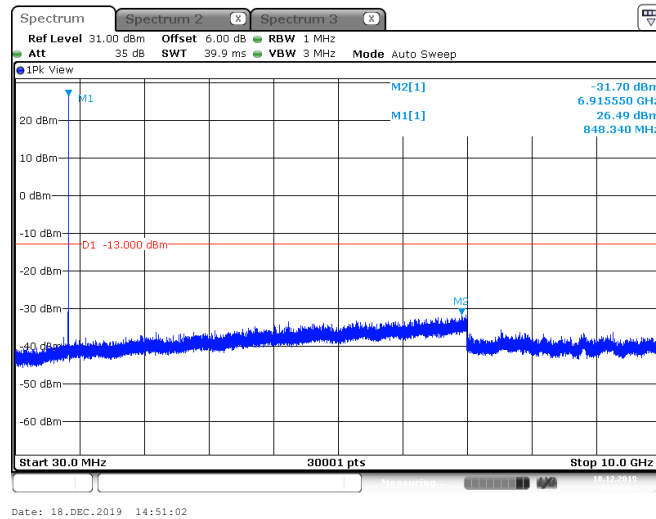
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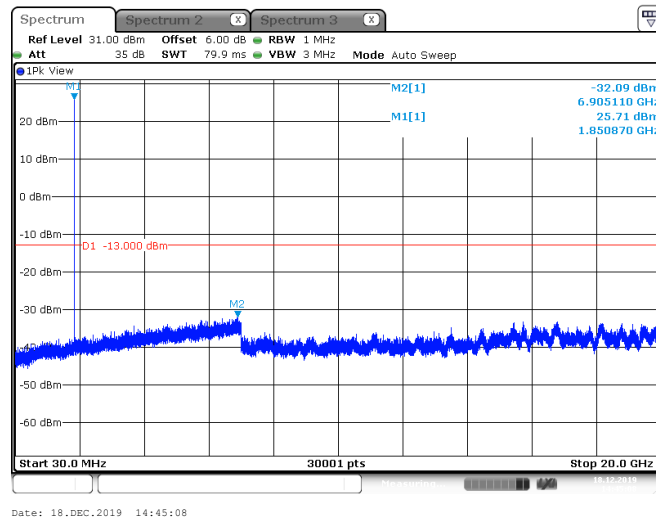
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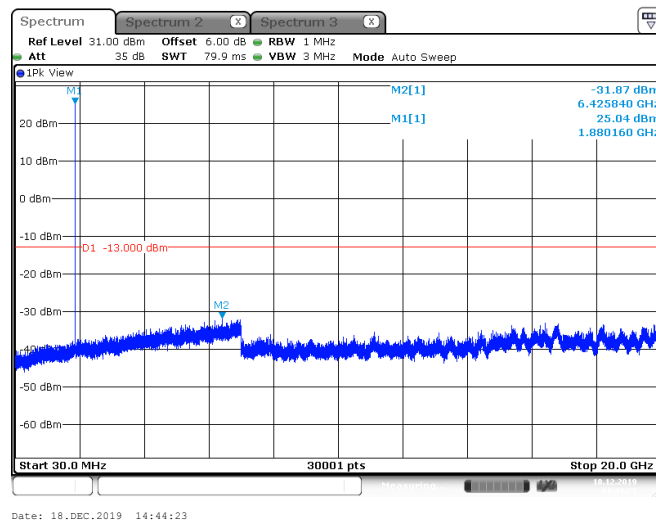
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BC1_1xRTT_25_Range:30MHz~10GHz



BC1_1xRTT_600_Range:30MHz~10GHz



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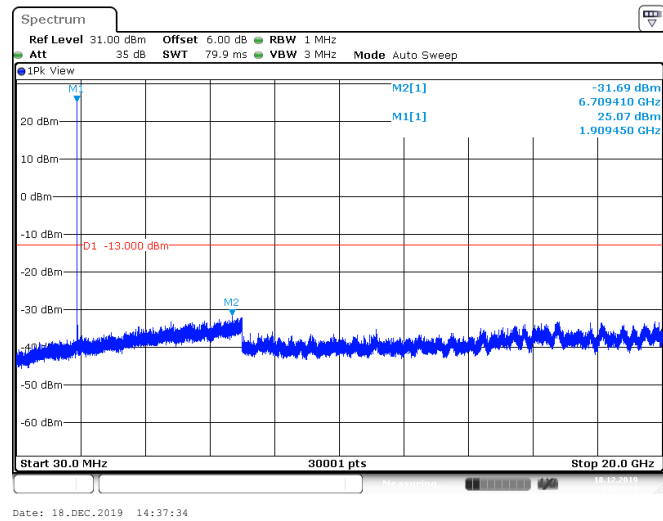
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BC1_1xRTT_1175_Range:30MHz~10GHz



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Appendix F: Frequency Stability

Test Result

Voltage							
Band	Mode	Channel	Voltage [Vdc]	Temperature (°C)	Deviation (ppm)	Limit (ppm)	Verdict
BC0	1xRTT	384	VL	NT	-0.003986	±2.5	PASS
BC0	1xRTT	384	VN	NT	-0.004210	±2.5	PASS
BC0	1xRTT	384	VH	NT	-0.005745	±2.5	PASS
BC1	1xRTT	600	VL	NT	-0.006093	±2.5	PASS
BC1	1xRTT	600	VN	NT	-0.006901	±2.5	PASS
BC1	1xRTT	600	VH	NT	-0.008354	±2.5	PASS

Temperature								
Band	Mode	Channel	Voltage [Vdc]	Temperature (°C)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
BC0	1xRTT	384	NV	-30	-11.43	-0.006041	±2.5	PASS
BC0	1xRTT	384	NV	-20	-9.20	-0.004254	±2.5	PASS
BC0	1xRTT	384	NV	0	-9.04	-0.004698	±2.5	PASS
BC0	1xRTT	384	NV	10	-14.35	-0.006214	±2.5	PASS
BC0	1xRTT	384	NV	20	-7.95	-0.006982	±2.5	PASS
BC1	1xRTT	600	NV	-30	-15.64	-0.002365	±2.5	PASS
BC1	1xRTT	600	NV	-20	-17.34	-0.001203	±2.5	PASS
BC1	1xRTT	600	NV	0	-17.74	-0.001023	±2.5	PASS
BC1	1xRTT	600	NV	10	-18.64	-0.001548	±2.5	PASS
BC1	1xRTT	600	NV	20	-8.81	-0.003659	±2.5	PASS

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