

1. Effective (Isotropic) Radiated Power Output Data

1.1 GSM850_ERP

1.1.1 Test Result

Band: GSM850								
ENV	Mode		Frequency (MHz)	Conducted Power (dBm)	Gain (dbi)	ERP (dBm)		Verdict
	Network	Subset				Result	Limit	
NTNV	GPRS	1 TX Slot	824.2	33.08	0.50	31.43	<=38.45	Pass
		2 TX Slots	824.2	32.38	0.50	30.73	<=38.45	Pass
		3 TX Slots	824.2	29.36	0.50	27.71	<=38.45	Pass
		4 TX Slots	824.2	29.07	0.50	27.42	<=38.45	Pass
		1 TX Slot	836.6	33.10	0.50	31.45	<=38.45	Pass
		2 TX Slots	836.6	31.68	0.50	30.03	<=38.45	Pass
		3 TX Slots	836.6	29.51	0.50	27.86	<=38.45	Pass
		4 TX Slots	836.6	29.24	0.50	27.59	<=38.45	Pass
		1 TX Slot	848.8	33.26	0.50	31.61	<=38.45	Pass
		2 TX Slots	848.8	31.85	0.50	30.20	<=38.45	Pass
		3 TX Slots	848.8	29.69	0.50	28.04	<=38.45	Pass
		4 TX Slots	848.8	29.45	0.50	27.80	<=38.45	Pass
	EGPRS	1 TX Slot	824.2	27.29	0.50	25.64	<=38.45	Pass
		2 TX Slots	824.2	25.89	0.50	24.24	<=38.45	Pass
		3 TX Slots	824.2	24.62	0.50	22.97	<=38.45	Pass
		4 TX Slots	824.2	22.60	0.50	20.95	<=38.45	Pass
		1 TX Slot	836.6	27.22	0.50	25.57	<=38.45	Pass
		2 TX Slots	836.6	25.67	0.50	24.02	<=38.45	Pass
		3 TX Slots	836.6	23.12	0.50	21.47	<=38.45	Pass
		4 TX Slots	836.6	22.51	0.50	20.86	<=38.45	Pass
		1 TX Slot	848.8	27.22	0.50	25.57	<=38.45	Pass
		2 TX Slots	848.8	25.79	0.50	24.14	<=38.45	Pass
		3 TX Slots	848.8	23.17	0.50	21.52	<=38.45	Pass
		4 TX Slots	848.8	22.54	0.50	20.89	<=38.45	Pass

Note1: ERP=Conducted Power+Antenna Gain-2.15

2. Frequency Stability

2.1 GSM850

2.1.1 Test Result

Band: GSM850							
Network	Frequency (MHz)	Temp. (°C)	Voltage (VDC)	Freq. Error (Hz)	Freq. vs. Rated (ppm)		Verdict
					Result	Limit	
GPRS	824.2	20	5.4	12.40	0.01	-2.5 to 2.5	Pass
			6.0	11.85	0.01	-2.5 to 2.5	Pass
			6.6	10.46	0.01	-2.5 to 2.5	Pass
		-30	6.0	15.85	0.02	-2.5 to 2.5	Pass
		-20	6.0	13.82	0.02	-2.5 to 2.5	Pass
		-10	6.0	20.50	0.02	-2.5 to 2.5	Pass
		0	6.0	21.47	0.03	-2.5 to 2.5	Pass
		10	6.0	24.31	0.03	-2.5 to 2.5	Pass
		30	6.0	19.31	0.02	-2.5 to 2.5	Pass

		40	6.0	19.37	0.02	-2.5 to 2.5	Pass
		50	6.0	21.86	0.03	-2.5 to 2.5	Pass
	836.6	20	5.4	12.98	0.02	-2.5 to 2.5	Pass
			6.0	15.79	0.02	-2.5 to 2.5	Pass
			6.6	16.18	0.02	-2.5 to 2.5	Pass
		-30	6.0	18.31	0.02	-2.5 to 2.5	Pass
		-20	6.0	18.82	0.02	-2.5 to 2.5	Pass
		-10	6.0	23.05	0.03	-2.5 to 2.5	Pass
		0	6.0	25.57	0.03	-2.5 to 2.5	Pass
		10	6.0	23.76	0.03	-2.5 to 2.5	Pass
		30	6.0	22.50	0.03	-2.5 to 2.5	Pass
		40	6.0	21.66	0.03	-2.5 to 2.5	Pass
	50	6.0	22.41	0.03	-2.5 to 2.5	Pass	
	848.8	20	5.4	19.31	0.02	-2.5 to 2.5	Pass
			6.0	25.15	0.03	-2.5 to 2.5	Pass
			6.6	17.76	0.02	-2.5 to 2.5	Pass
		-30	6.0	20.47	0.02	-2.5 to 2.5	Pass
		-20	6.0	18.98	0.02	-2.5 to 2.5	Pass
		-10	6.0	23.34	0.03	-2.5 to 2.5	Pass
		0	6.0	20.31	0.02	-2.5 to 2.5	Pass
10		6.0	21.73	0.03	-2.5 to 2.5	Pass	
30		6.0	22.28	0.03	-2.5 to 2.5	Pass	
40		6.0	23.83	0.03	-2.5 to 2.5	Pass	
50	6.0	18.53	0.02	-2.5 to 2.5	Pass		
EGPRS	824.2	20	5.4	7.43	0.01	-2.5 to 2.5	Pass
			6.0	16.11	0.02	-2.5 to 2.5	Pass
			6.6	18.31	0.02	-2.5 to 2.5	Pass
		-30	6.0	15.08	0.02	-2.5 to 2.5	Pass
		-20	6.0	15.40	0.02	-2.5 to 2.5	Pass
		-10	6.0	17.14	0.02	-2.5 to 2.5	Pass
		0	6.0	14.01	0.02	-2.5 to 2.5	Pass
		10	6.0	17.76	0.02	-2.5 to 2.5	Pass
		30	6.0	12.62	0.02	-2.5 to 2.5	Pass
		40	6.0	21.63	0.03	-2.5 to 2.5	Pass
	50	6.0	21.76	0.03	-2.5 to 2.5	Pass	
	836.6	20	5.4	18.21	0.02	-2.5 to 2.5	Pass
			6.0	19.50	0.02	-2.5 to 2.5	Pass
			6.6	21.34	0.03	-2.5 to 2.5	Pass
		-30	6.0	20.34	0.02	-2.5 to 2.5	Pass
		-20	6.0	18.98	0.02	-2.5 to 2.5	Pass
		-10	6.0	20.99	0.03	-2.5 to 2.5	Pass
		0	6.0	21.70	0.03	-2.5 to 2.5	Pass
		10	6.0	21.50	0.03	-2.5 to 2.5	Pass
		30	6.0	21.15	0.03	-2.5 to 2.5	Pass
40		6.0	22.21	0.03	-2.5 to 2.5	Pass	
50	6.0	22.79	0.03	-2.5 to 2.5	Pass		
848.8	20	5.4	23.44	0.03	-2.5 to 2.5	Pass	
		6.0	18.76	0.02	-2.5 to 2.5	Pass	
		6.6	21.02	0.02	-2.5 to 2.5	Pass	
	-30	6.0	23.25	0.03	-2.5 to 2.5	Pass	
	-20	6.0	16.69	0.02	-2.5 to 2.5	Pass	
	-10	6.0	18.14	0.02	-2.5 to 2.5	Pass	
	0	6.0	22.37	0.03	-2.5 to 2.5	Pass	
	10	6.0	16.98	0.02	-2.5 to 2.5	Pass	
	30	6.0	16.69	0.02	-2.5 to 2.5	Pass	
	40	6.0	19.76	0.02	-2.5 to 2.5	Pass	
50	6.0	21.76	0.03	-2.5 to 2.5	Pass		

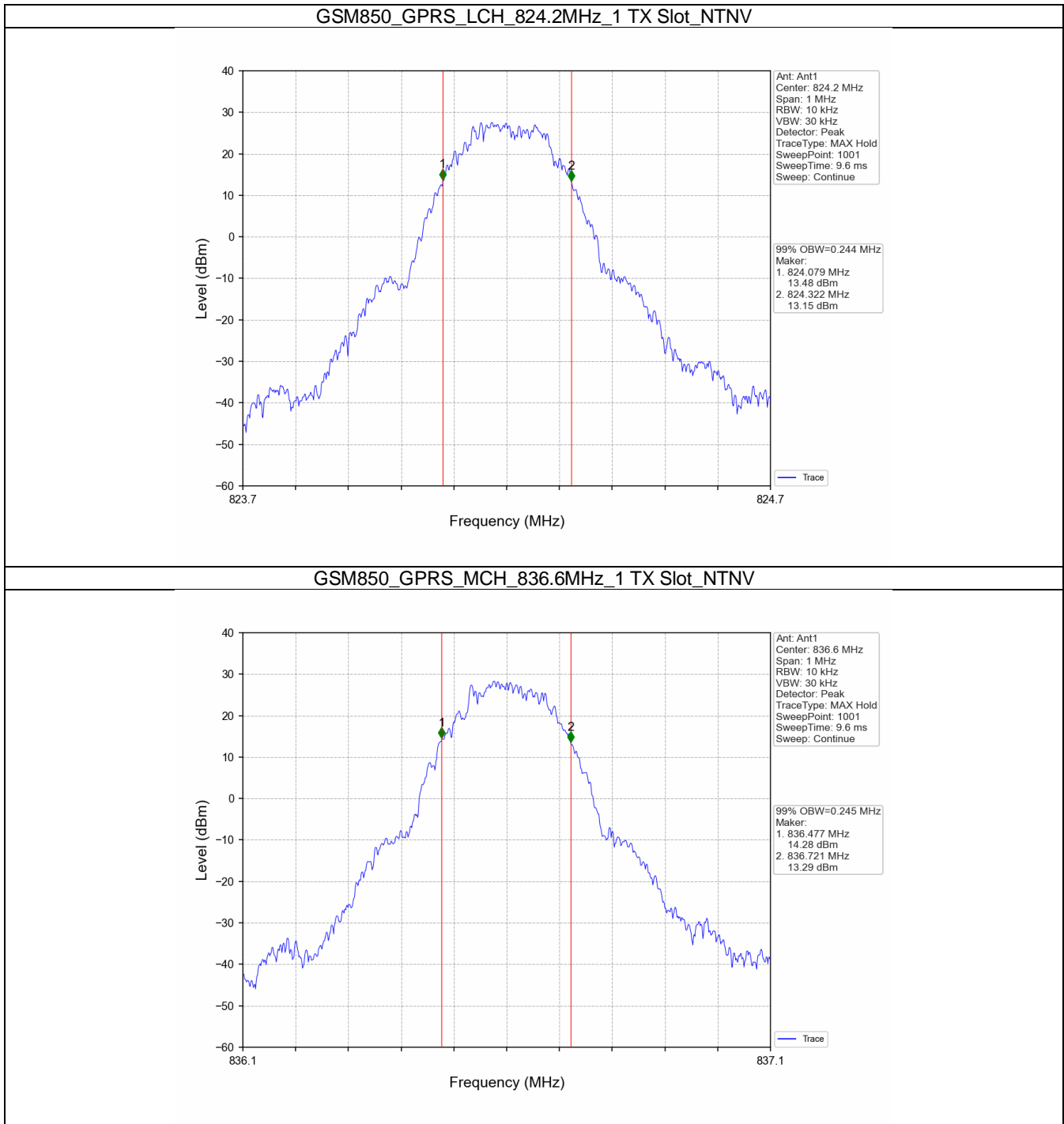
3. 99% & 26dB Bandwidth

3.1 GSM850_OBW

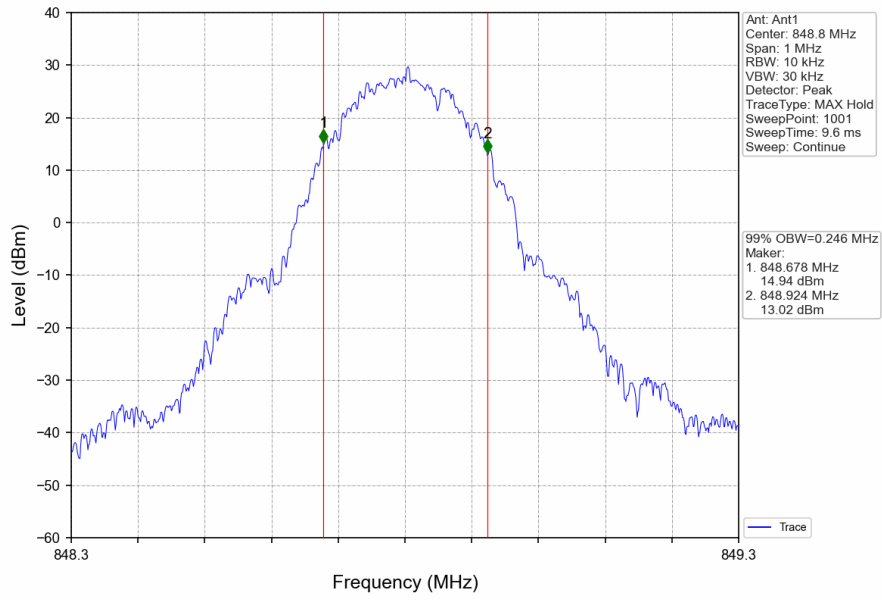
3.1.1 Test Result

Band: GSM850					
ENV	Mode		Frequency (MHz)	99% Occupied Bandwidth (MHz)	Verdict
	Network	Subset		Result	
NTNV	GPRS	1 TX Slot	824.2	0.244	Pass
			836.6	0.245	Pass
			848.8	0.246	Pass
	EGPRS	1 TX Slot	824.2	0.242	Pass
			836.6	0.242	Pass
			848.8	0.246	Pass

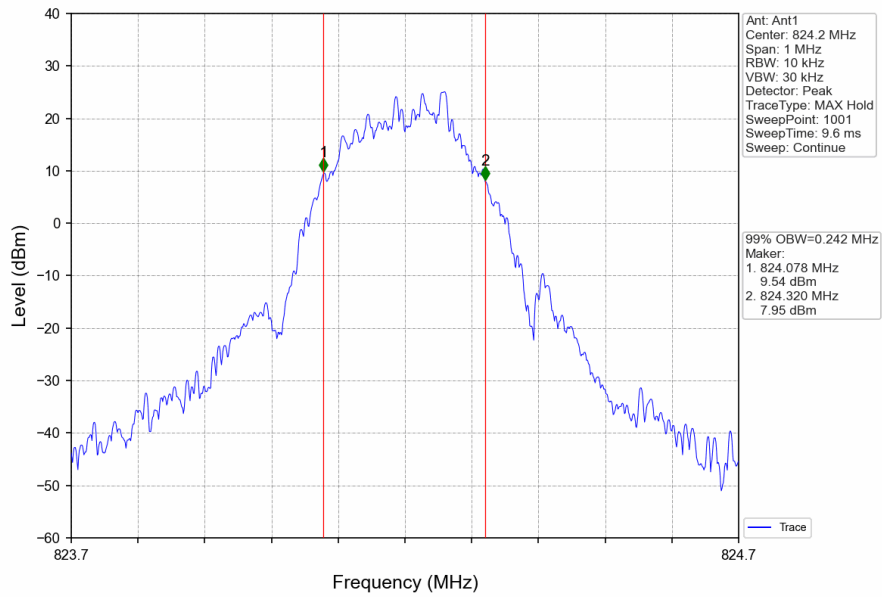
3.1.2 Test Graph



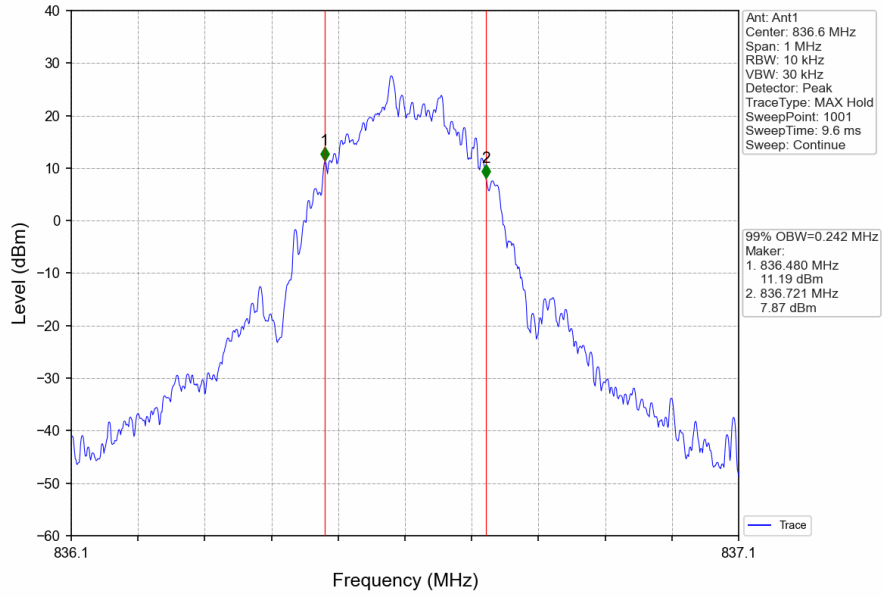
GSM850_GPRS_HCH_848.8MHz_1 TX Slot_NTNV



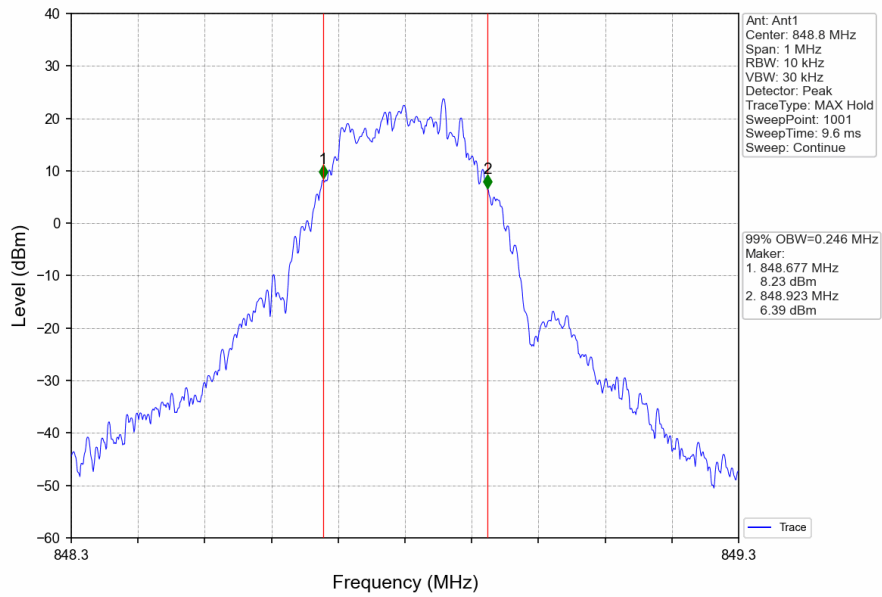
GSM850_EGPRS_LCH_824.2MHz_1 TX Slot_NTNV



GSM850_EGPRS_MCH_836.6MHz_1 TX Slot_NTNV



GSM850_EGPRS_HCH_848.8MHz_1 TX Slot_NTNV

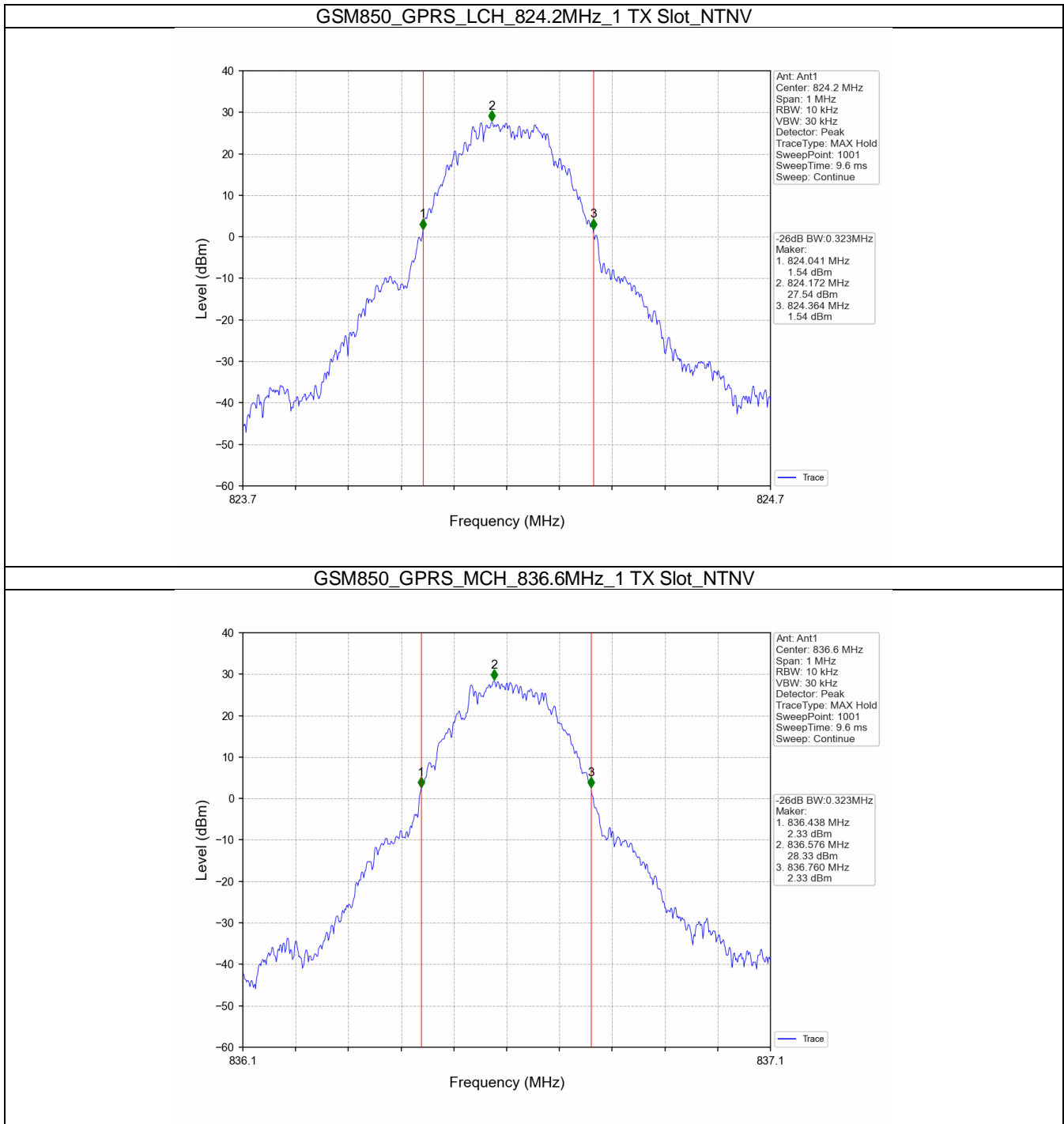


3.2 GSM850_XDB

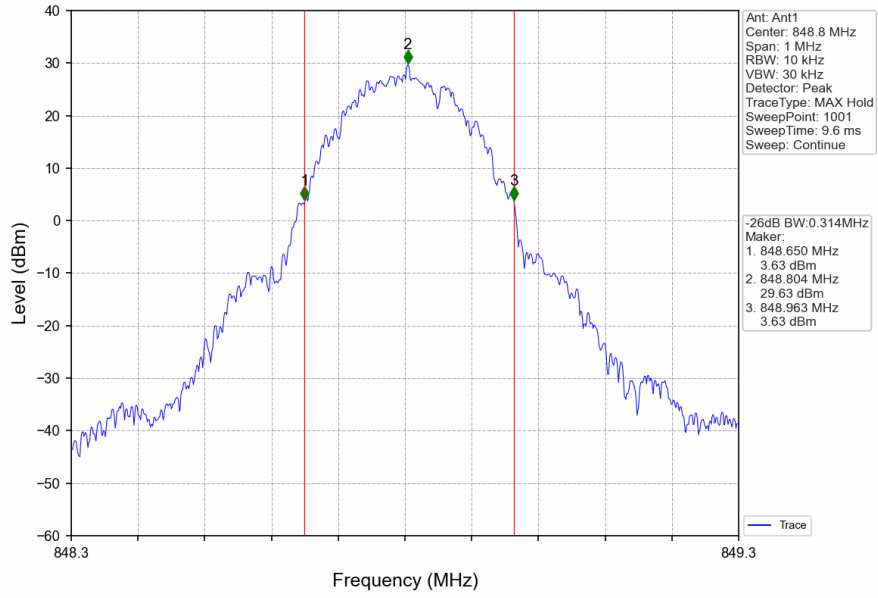
3.2.1 Test Result

Band: GSM850					
ENV	Mode		Frequency (MHz)	26dB Bandwidth (MHz)	Verdict
	Network	Subset		Result	
NTNV	GPRS	1 TX Slot	824.2	0.323	Pass
			836.6	0.323	Pass
			848.8	0.314	Pass
	EGPRS	1 TX Slot	824.2	0.306	Pass
			836.6	0.292	Pass
			848.8	0.314	Pass

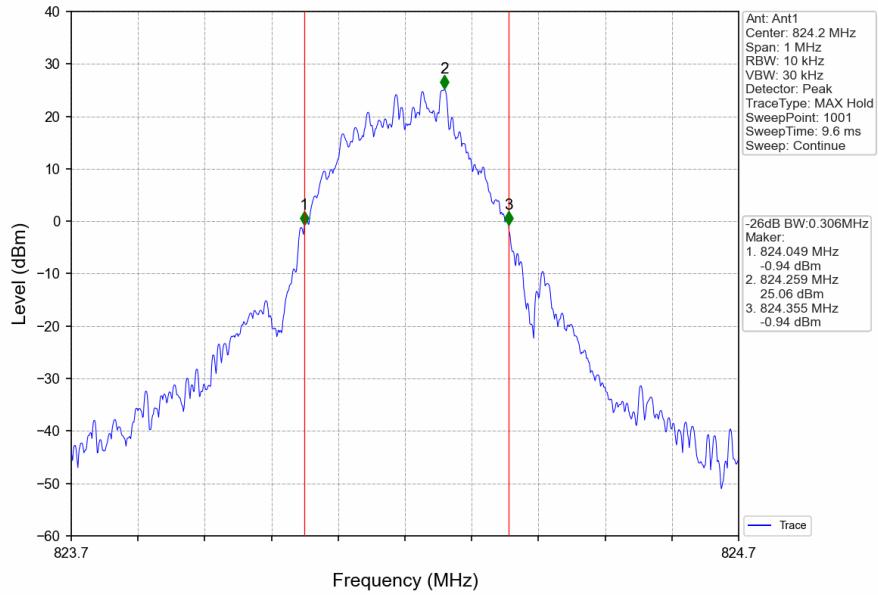
3.2.2 Test Graph



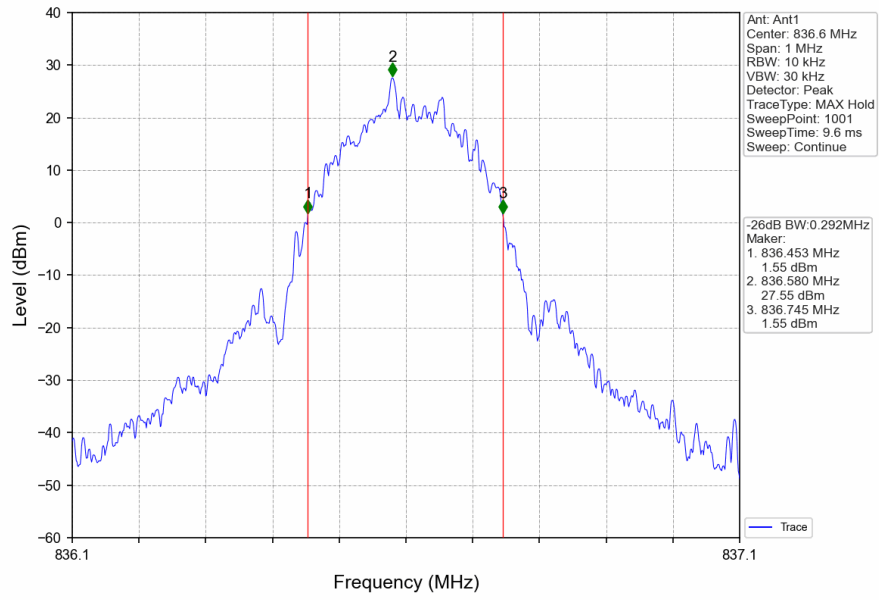
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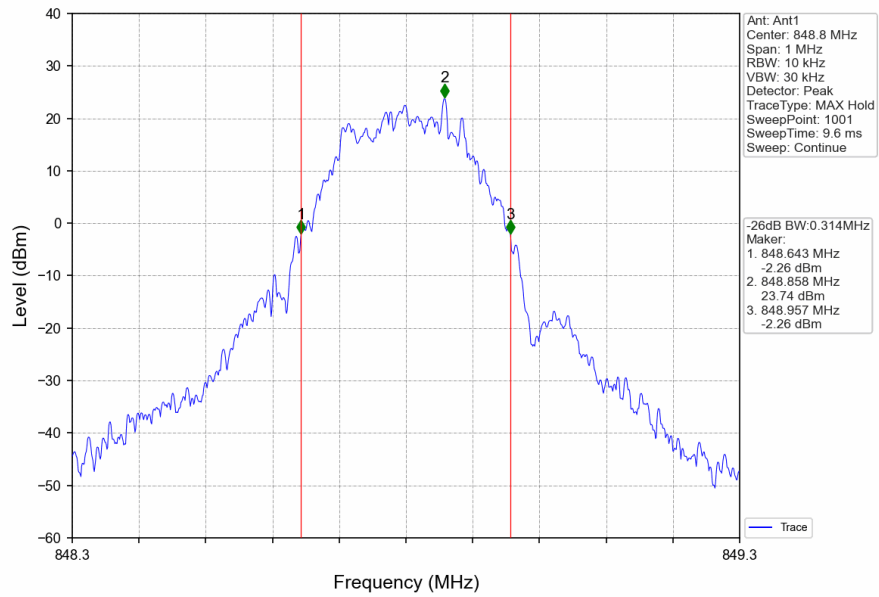
GSM850_EGPRS_LCH_824.2MHz_1 TX Slot_NTNV



GSM850_EGPRS_MCH_836.6MHz_1 TX Slot_NTNV



GSM850_EGPRS_HCH_848.8MHz_1 TX Slot_NTNV



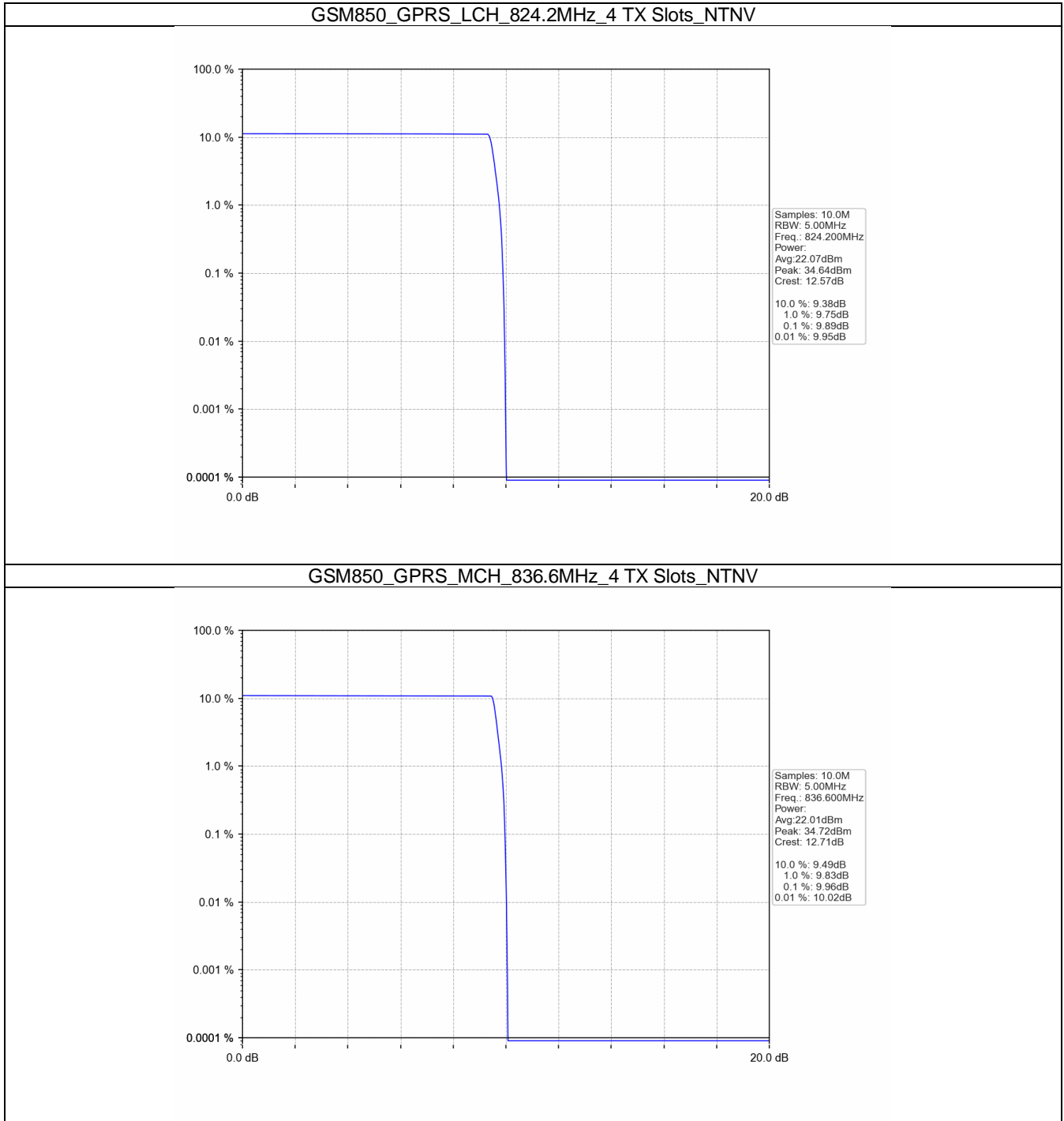
4. Peak-Average Ratio

4.1 GSM850

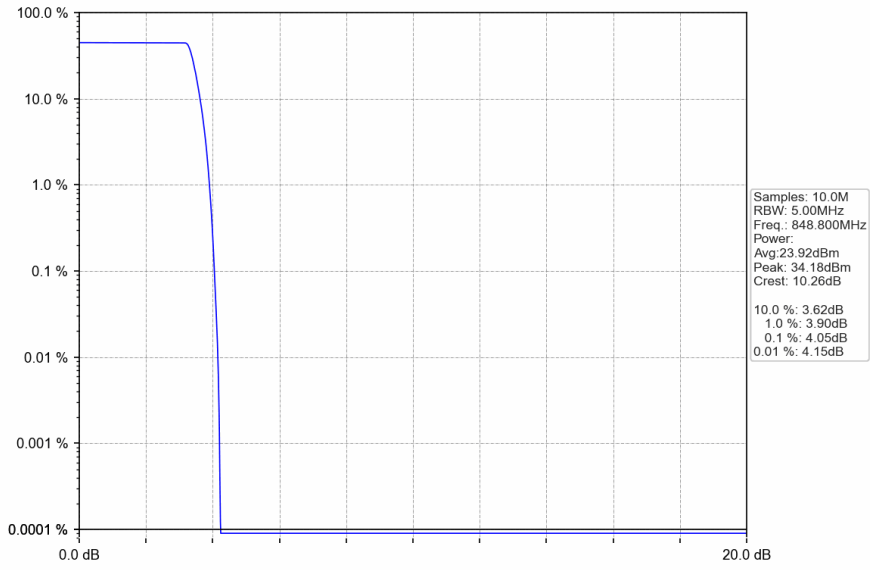
4.1.1 Test Result

Band: GSM850						
ENV	Mode		Frequency (MHz)	Peak-Average Ratio (dB)		Verdict
	Network	Subset		Result	Limit	
NTNV	GPRS	4 TX Slots	824.2	9.89	<=13	Pass
			836.6	9.96	<=13	Pass
			848.8	4.05	<=13	Pass
	EGPRS	4 TX Slots	824.2	9.52	<=13	Pass
			836.6	10.58	<=13	Pass
			848.8	10.76	<=13	Pass

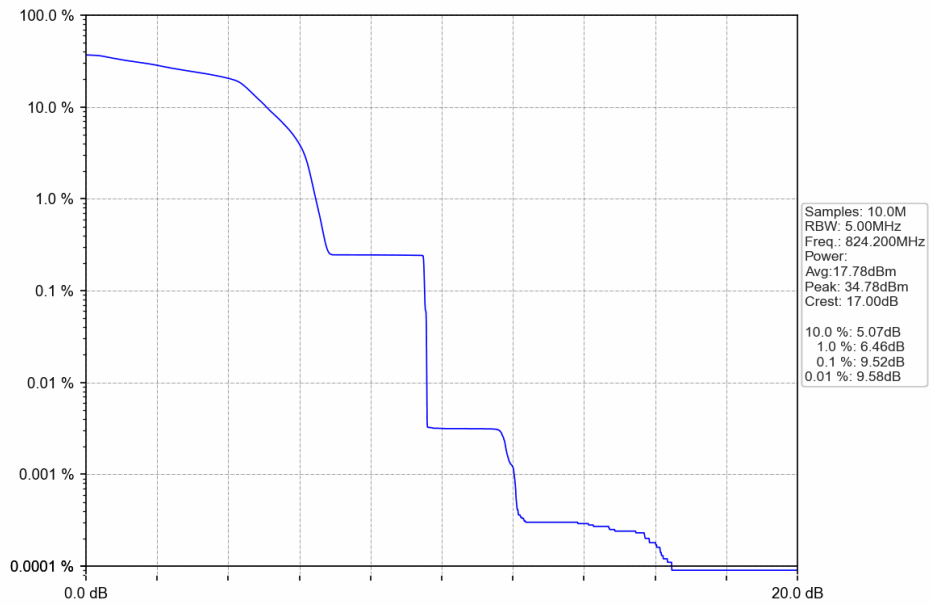
4.1.2 Test Graph



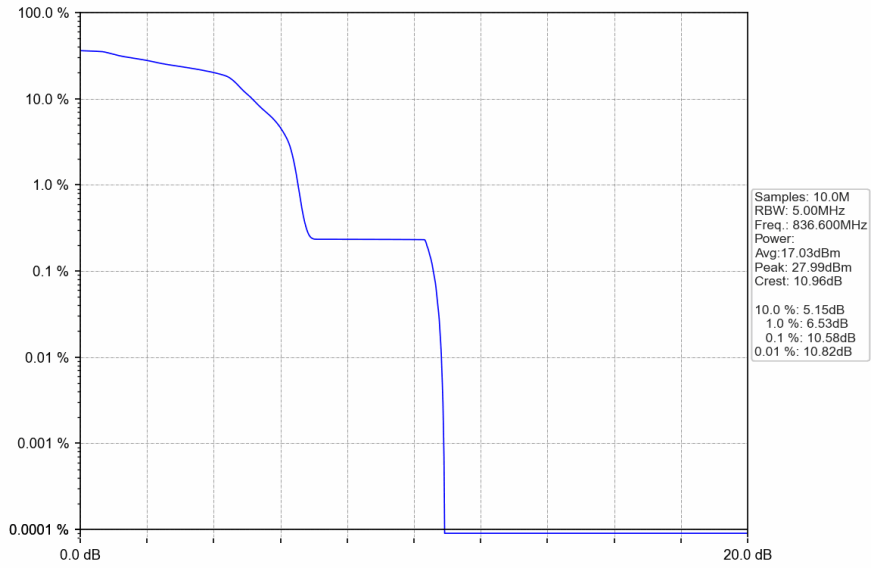
GSM850_GPRS_HCH_848.8MHz_4 TX Slots_NTNV



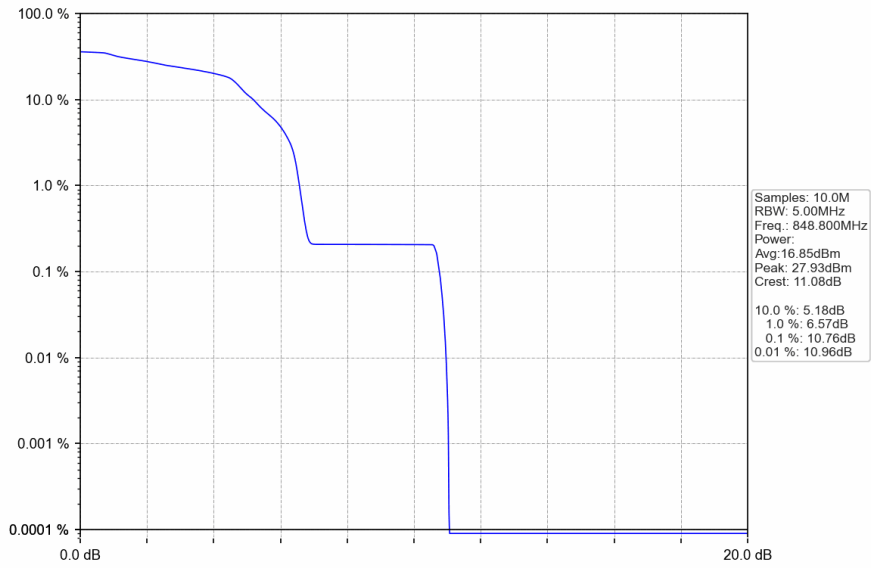
GSM850_EGPRS_LCH_824.2MHz_4 TX Slots_NTNV



GSM850_EGPRS_MCH_836.6MHz_4 TX Slots_NTNV



GSM850_EGPRS_HCH_848.8MHz_4 TX Slots_NTNV



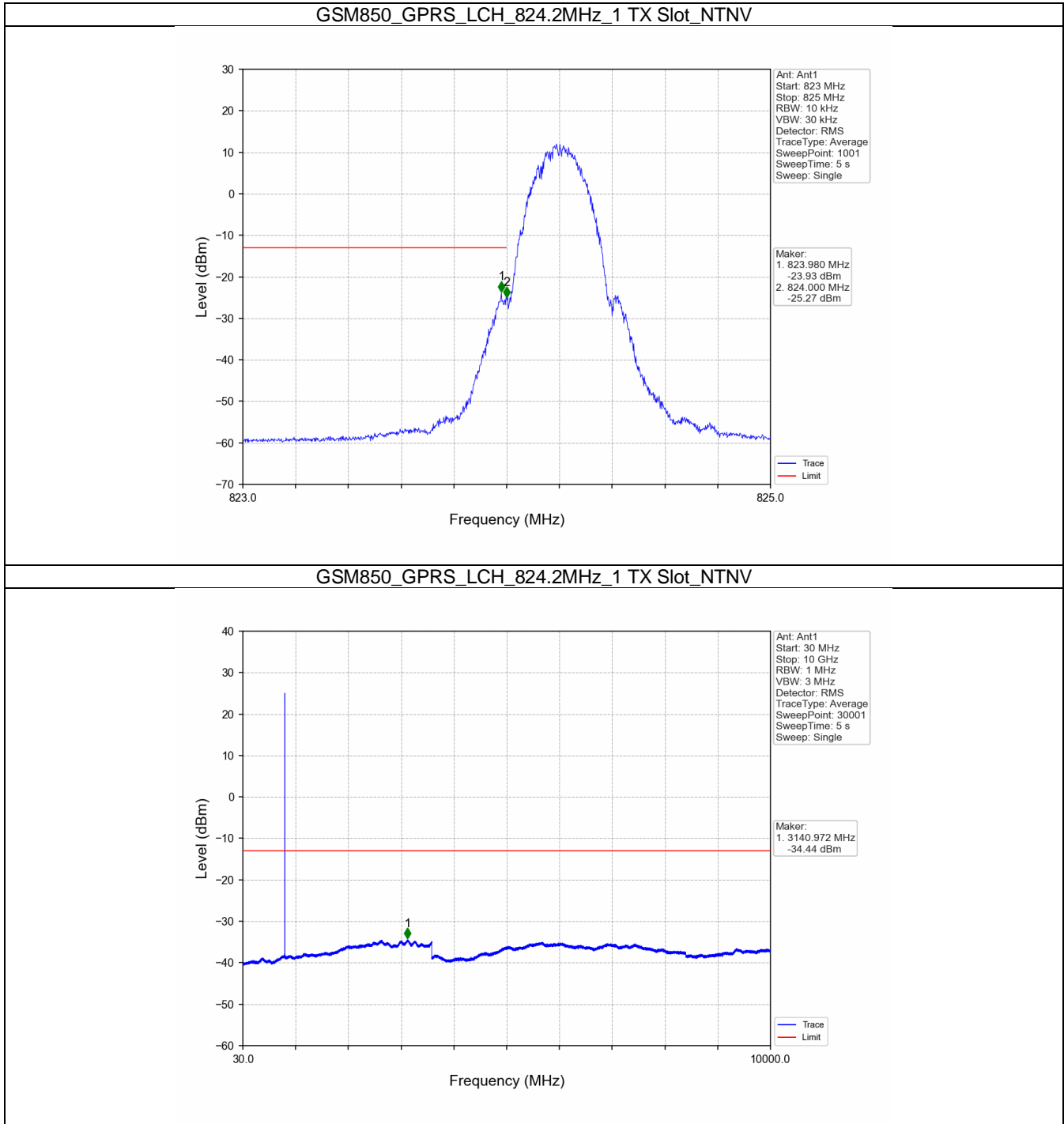
6. Spurious Emission

6.1 GSM850

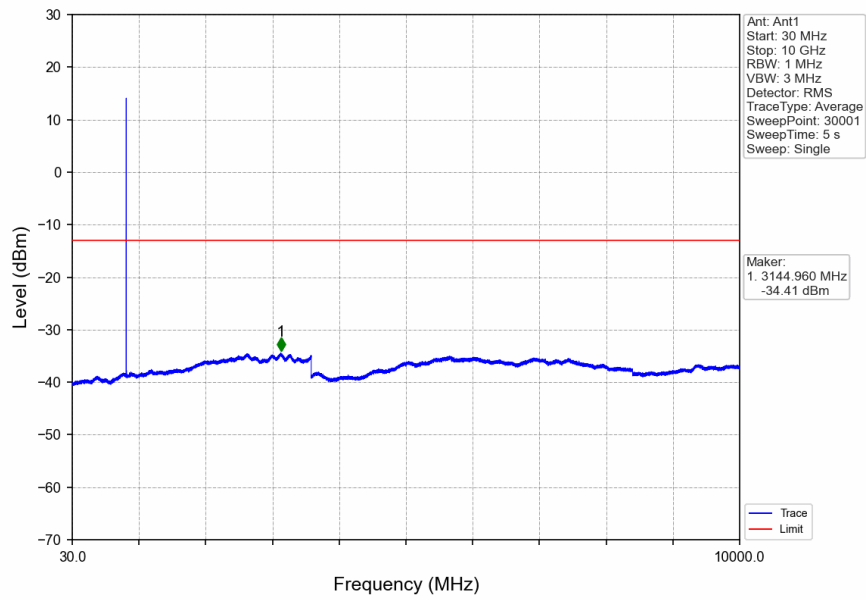
6.1.1 Test Result

Band: GSM850						
ENV	Mode		Frequency (MHz)	Spurious Emission		Verdict
	Network	Subset		Result	Limit	
NTNV	GPRS	1 TX Slot	824.2	Refer To Test Graph	Pass	
			836.6	Refer To Test Graph	Pass	
			848.8	Refer To Test Graph	Pass	
	EGPRS	1 TX Slot	824.2	Refer To Test Graph	Pass	
			836.6	Refer To Test Graph	Pass	
			848.8	Refer To Test Graph	Pass	

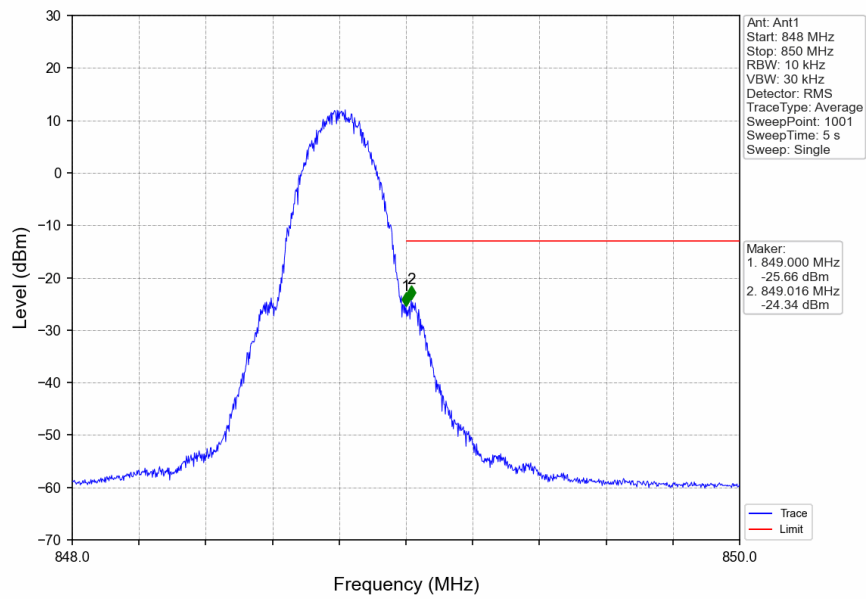
6.1.2 Test Graph



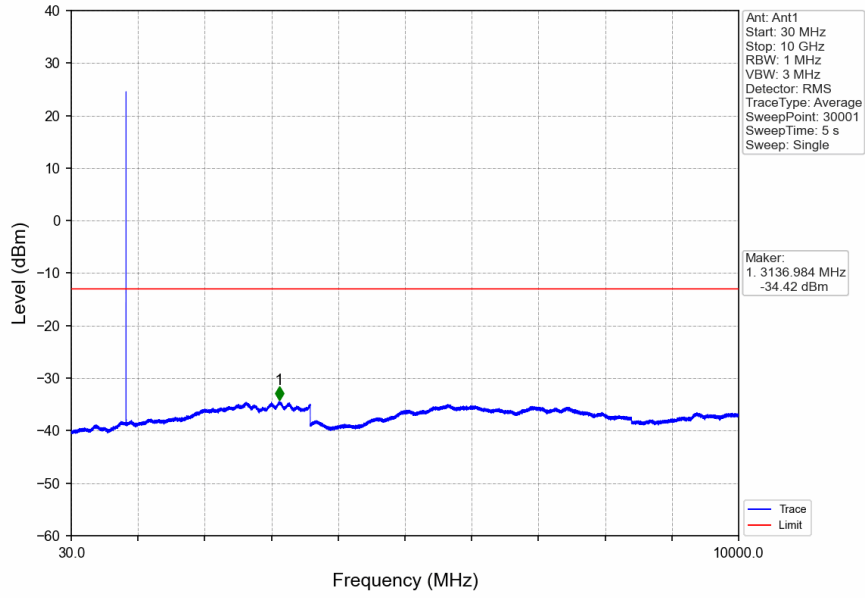
GSM850_GPRS_MCH_836.6MHz_1 TX Slot_NTNV



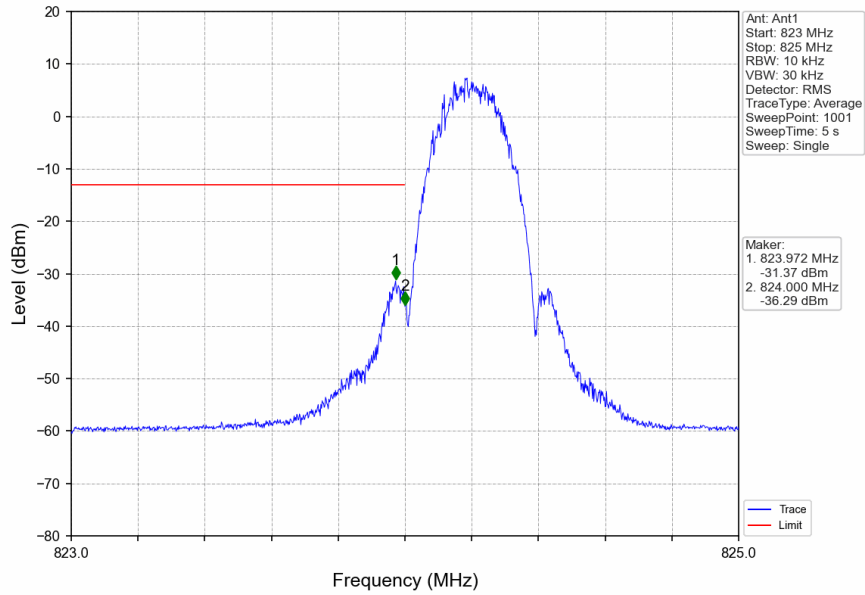
GSM850_GPRS_HCH_848.8MHz_1 TX Slot_NTNV



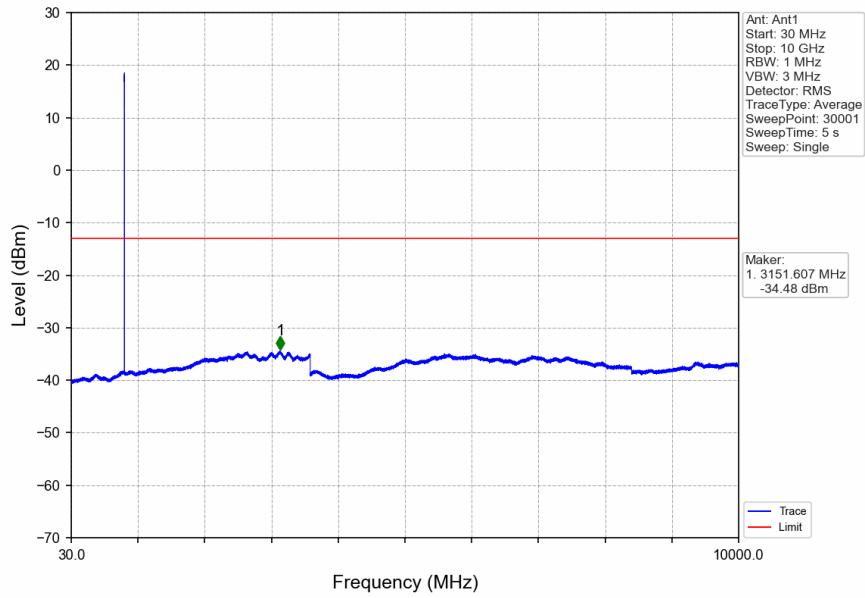
GSM850_GPRS_HCH_848.8MHz_1 TX Slot_NTNV



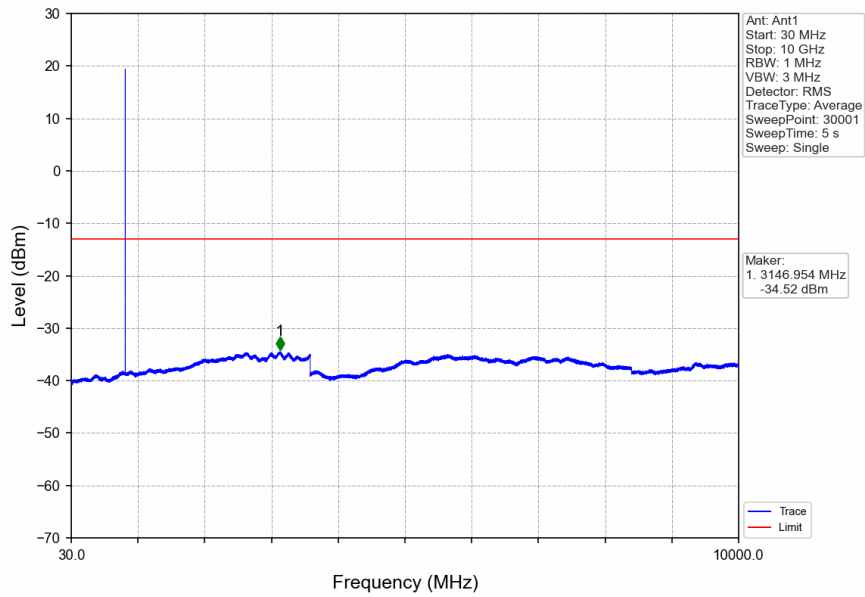
GSM850_EGPRS_LCH_824.2MHz_1 TX Slot_NTNV



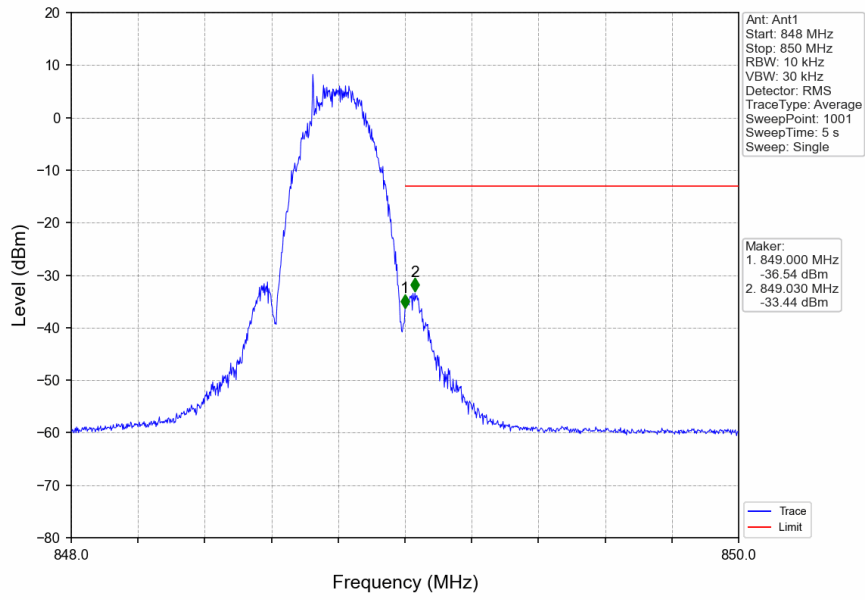
GSM850_EGPRS_LCH_824.2MHz_1 TX Slot_NTNV



GSM850_EGPRS_MCH_836.6MHz_1 TX Slot_NTNV



GSM850_EGPRS_HCH_848.8MHz_1 TX Slot_NTNV



GSM850_EGPRS_HCH_848.8MHz_1 TX Slot_NTNV

