

APPENDIX REPORT

Project No.	SHT2008085403EW	Radio Specification	Bluetooth BLE
Test sample No.		Model No.	GS-1326
Start test date	2020/8/27	Finish date	2020/8/27
Temperature	25°C	Humidity	50%
Test Engineer	Jiongsheng.Feng	Auditor	Xiaodong Zheo

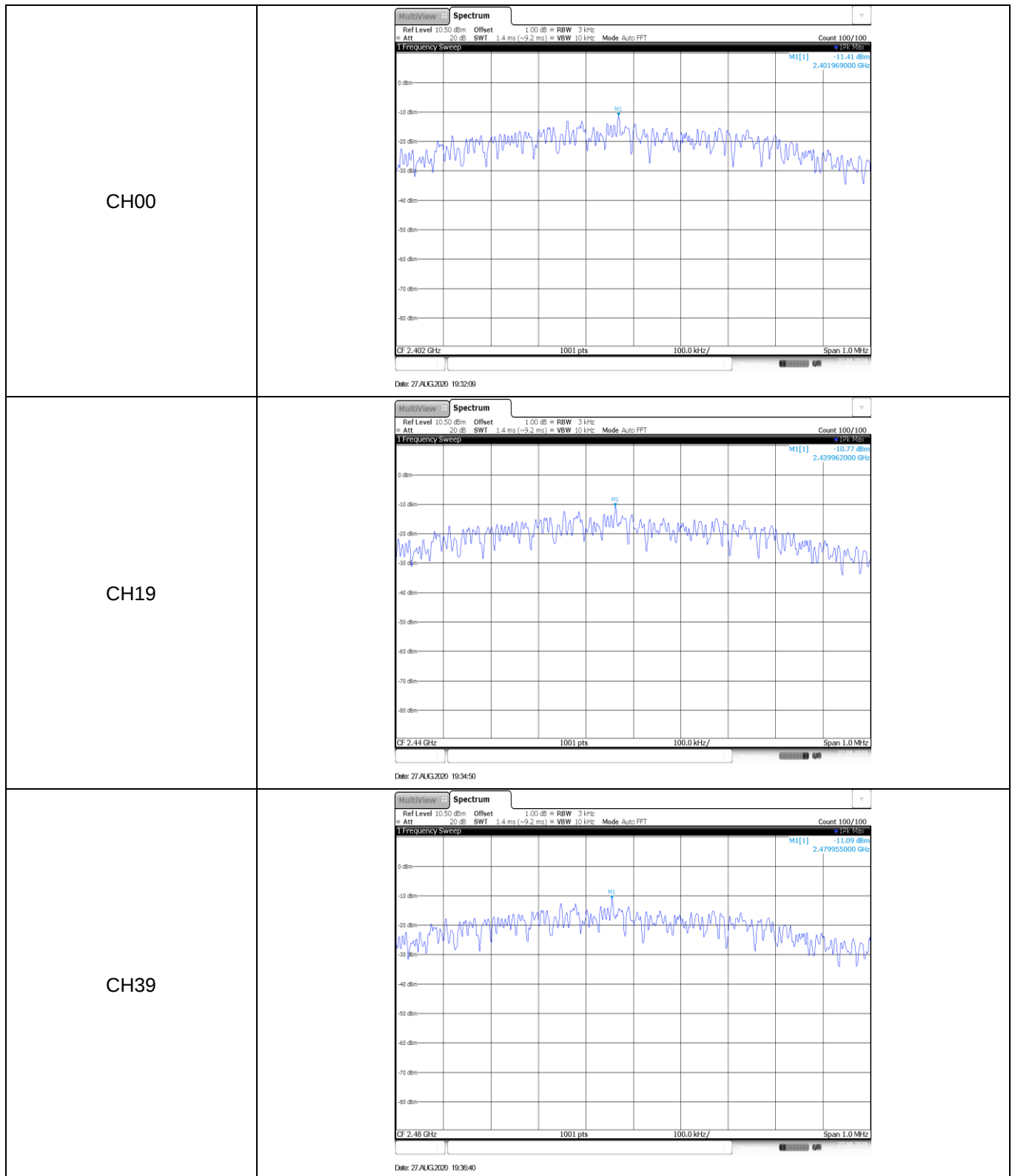
Appendix clause	Test item	Result
A	Peak Output Power	PASS
B	Power Spectral Density	PASS
C	6 dB Bandwidth	PASS
D	99% Occupied Bandwidth	PASS
E	Duty cycle	PASS
F	Band edge and Spurious Emissions (conducted)	PASS

Appendix A: Peak Output Power

Type	Channel	Output power (dBm)	Average Output power (dBm)	Limit (dBm)	Result
BT-BLE	00	2.92	2.90	≤ 30.00	Pass
	19	3.47	3.44		
	39	3.27	3.25		

Appendix B: Power Spectral Density

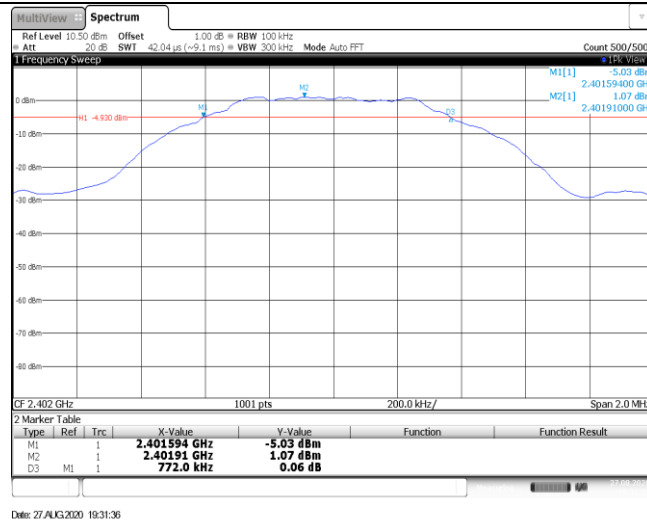
Type	Channel	Power Spectral Density(dBm/3KHz)	Limit (dBm/3KHz)	Result
BT-BLE	00	-11.41	≤8.00	Pass
	19	-10.77		
	39	-11.09		



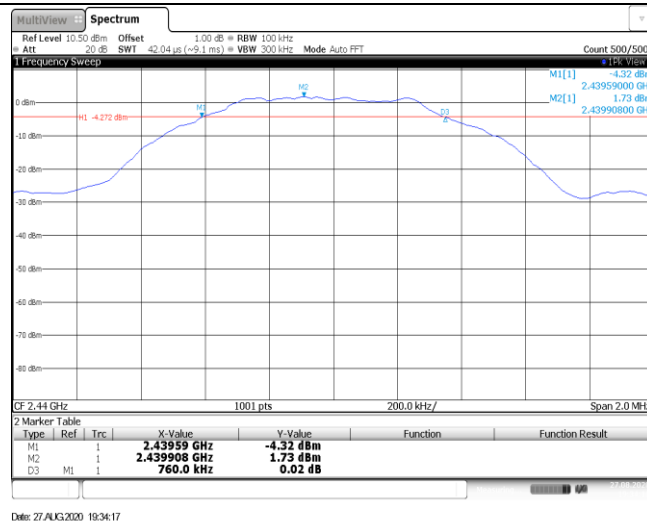
Appendix C: 6dB bandwidth

Type	Channel	6dB Bandwidth(kHz)	Limit (kHz)	Result
BT-BLE	00	772.00	≥500	Pass
	19	760.00		
	39	768.00		

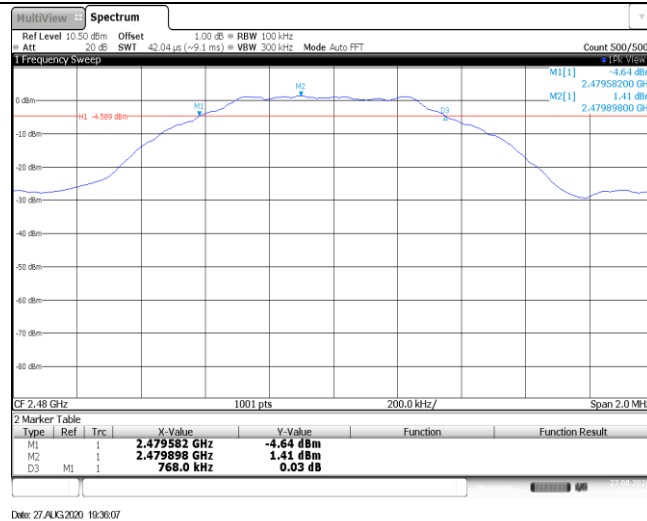
CH00



CH19



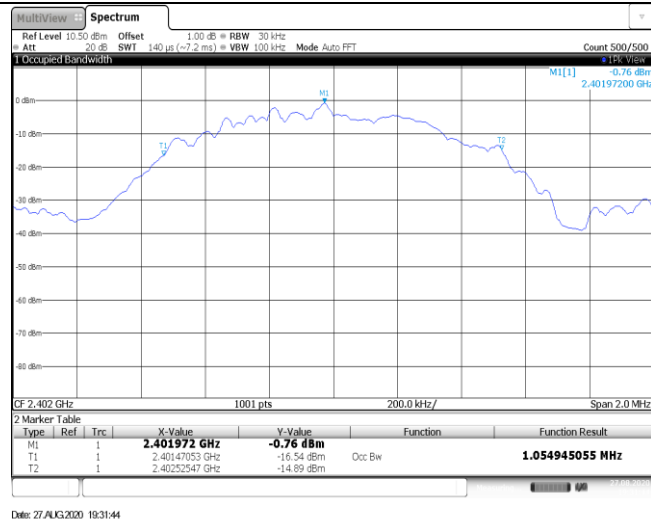
CH39



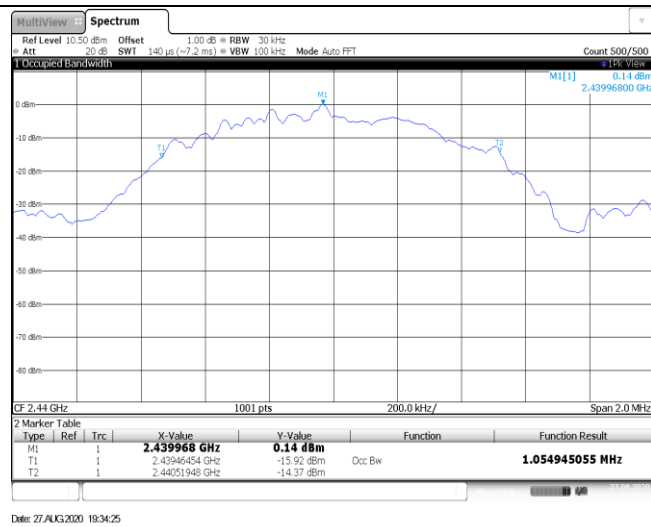
Appendix D: 99% Occupied Bandwidth

Type	Channel	99% Occupied Bandwidth(MHz)	Limit (kHz)	Result
BT-BLE	00	1.05	-	Pass
	19	1.05		
	39	1.05		

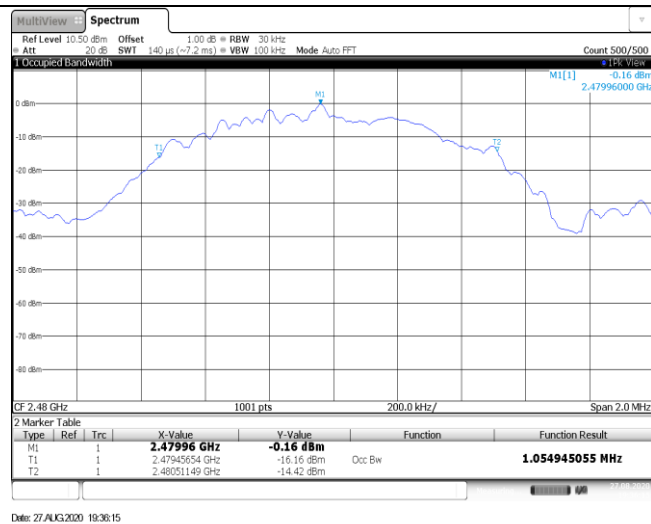
CH00



CH19

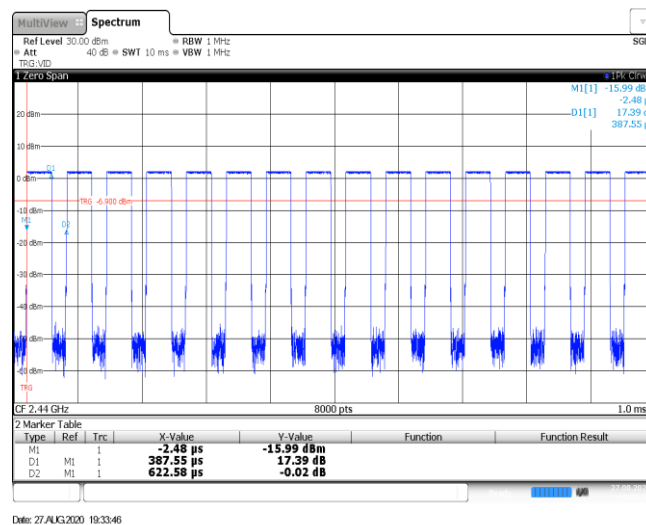


CH39



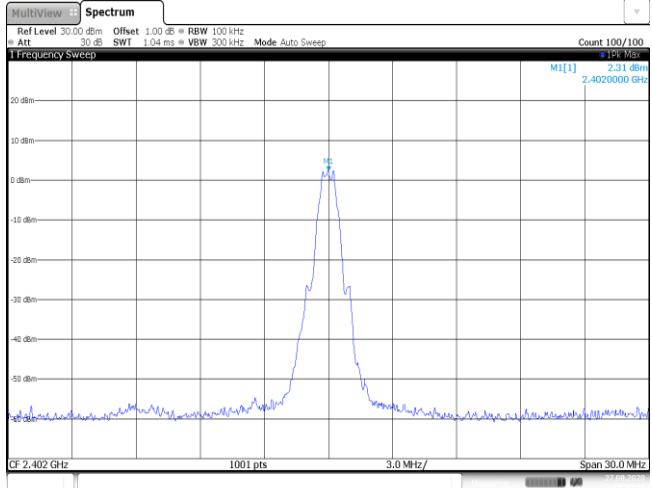
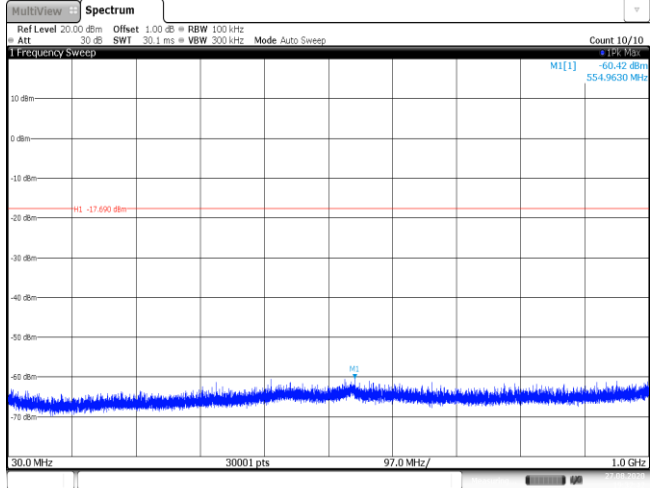
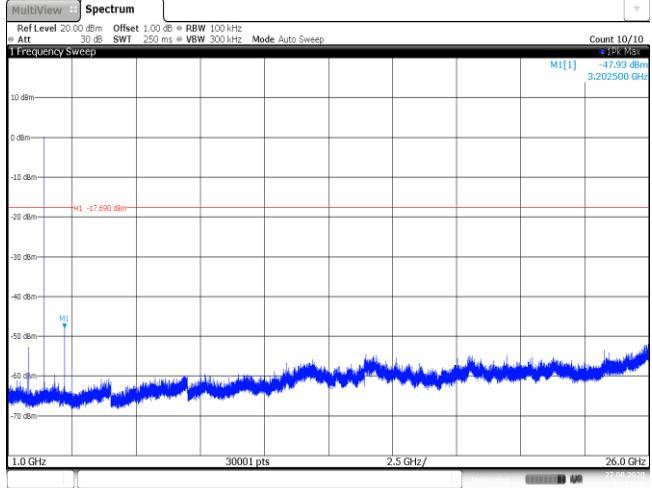
Appendix E: Duty cycle

Test Frequency (MHz)	T _{on} time for single burst (ms)	T _{period} (ms)	Duty cycle	1/T _{on} time (kHz)
2440	0.39	0.62	62.9%	2.6

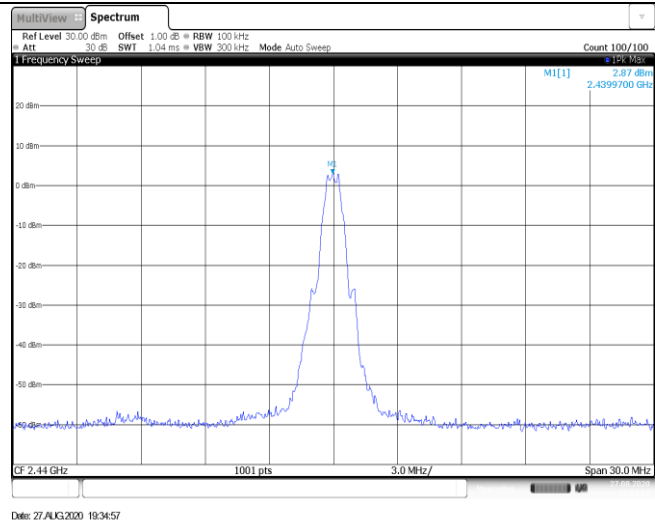


Appendix F: Band edge and Spurious Emissions (conducted)

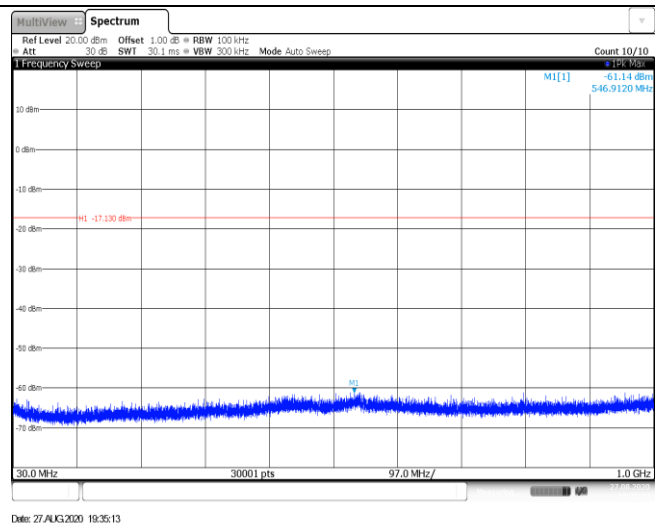
Test Item:	Band edge																																										
CH00	MultiView Spectrum Ref Level 10.50 dBm Offset 1.00 dB BW 100 kHz Att 20 dB SW 1.05 ms VBW 300 kHz Mode Auto Sweep Count 300/300 Frequency Sweep 0 dBm -10 dBm -20 dBm -30 dBm -40 dBm -50 dBm -60 dBm -70 dBm -80 dBm 2.31 GHz 1001 pts 9.5 MHz/ 2.405 GHz M1 -17.890 dBm M1[1] 2.15 dBm M2[1] 2.402010 GHz M2[1] -55.87 dBm M2[1] 2.400000 GHz 2 Marker Table <table><thead><tr><th>Type</th><th>Ref</th><th>Trc</th><th>X-Value</th><th>Y-Value</th><th>Function</th><th>Function Result</th></tr></thead><tbody><tr><td>M1</td><td>1</td><td></td><td>2.40201 GHz</td><td>2.15 dBm</td><td></td><td></td></tr><tr><td>M2</td><td>1</td><td></td><td>2.4 GHz</td><td>-55.87 dBm</td><td></td><td></td></tr><tr><td>M3</td><td>1</td><td></td><td>2.39 GHz</td><td>-70.94 dBm</td><td></td><td></td></tr><tr><td>M4</td><td>1</td><td></td><td>2.31 GHz</td><td>-74.49 dBm</td><td></td><td></td></tr><tr><td>M5</td><td>1</td><td></td><td>2.399965 GHz</td><td>-56.91 dBm</td><td></td><td></td></tr></tbody></table> Date: 27 AUG 2020 19:32:19	Type	Ref	Trc	X-Value	Y-Value	Function	Function Result	M1	1		2.40201 GHz	2.15 dBm			M2	1		2.4 GHz	-55.87 dBm			M3	1		2.39 GHz	-70.94 dBm			M4	1		2.31 GHz	-74.49 dBm			M5	1		2.399965 GHz	-56.91 dBm		
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CH39	MultiView Spectrum Ref Level 10.50 dBm Offset 1.00 dB BW 100 kHz Att 20 dB SW 1.02 ms VBW 300 kHz Mode Auto Sweep Count 100/100 Frequency Sweep 0 dBm -10 dBm -20 dBm -30 dBm -40 dBm -50 dBm -60 dBm -70 dBm -80 dBm 2.478 GHz 1001 pts 2.2 MHz/ 2.5 GHz M1 -17.490 dBm M1[1] 2.51 dBm M2[1] 2.4799670 GHz M2[1] -65.74 dBm M2[1] 2.4835000 GHz 2 Marker Table <table><thead><tr><th>Type</th><th>Ref</th><th>Trc</th><th>X-Value</th><th>Y-Value</th><th>Function</th><th>Function Result</th></tr></thead><tbody><tr><td>M1</td><td>1</td><td></td><td>2.479967 GHz</td><td>2.51 dBm</td><td></td><td></td></tr><tr><td>M2</td><td>1</td><td></td><td>2.4835 GHz</td><td>-65.74 dBm</td><td></td><td></td></tr><tr><td>M3</td><td>1</td><td></td><td>2.5 GHz</td><td>-72.46 dBm</td><td></td><td></td></tr><tr><td>M4</td><td>1</td><td></td><td>2.483654 GHz</td><td>-64.60 dBm</td><td></td><td></td></tr></tbody></table> Date: 27 AUG 2020 19:36:50	Type	Ref	Trc	X-Value	Y-Value	Function	Function Result	M1	1		2.479967 GHz	2.51 dBm			M2	1		2.4835 GHz	-65.74 dBm			M3	1		2.5 GHz	-72.46 dBm			M4	1		2.483654 GHz	-64.60 dBm									
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Test Item:	SE
CH00 Reference level	 Ref Level 30.00 dBm Offset 1.00 dB BW 100 kHz Att 30 dB SWI 1.04 ms VBW 300 kHz Mode Auto Sweep Count 100/100 M1[1] 2.402000 GHz 2.31 dBm 2.402000 GHz 20 dBm 10 dBm 0 dBm -10 dBm -20 dBm -30 dBm -40 dBm -50 dBm -60 dBm CF 2.402 GHz 1001 pts 3.0 MHz/ Span 30.0 MHz Date: 27/AUG/2020 19:32:26
CH00 30MHz~1000MHz	 Ref Level 20.00 dBm Offset 1.00 dB BW 100 kHz Att 30 dB SWI 30.1 ms VBW 300 kHz Mode Auto Sweep Count 10/10 M1[1] 554.9630 MHz -60.42 dBm 20 dBm 10 dBm 0 dBm -10 dBm -20 dBm -30 dBm -40 dBm -50 dBm -60 dBm 30.0 MHz 30001 pts 97.0 MHz/ 1.0 GHz Date: 27/AUG/2020 19:32:42
CH00 1GHz~26GHz	 Ref Level 20.00 dBm Offset 1.00 dB BW 100 kHz Att 30 dB SWI 250 ms VBW 300 kHz Mode Auto Sweep Count 10/10 M1[1] 3.202500 GHz -47.93 dBm 20 dBm 10 dBm 0 dBm -10 dBm -20 dBm -30 dBm -40 dBm -50 dBm -60 dBm 1.0 GHz 30001 pts 2.5 GHz/ 26.0 GHz Date: 27/AUG/2020 19:32:58

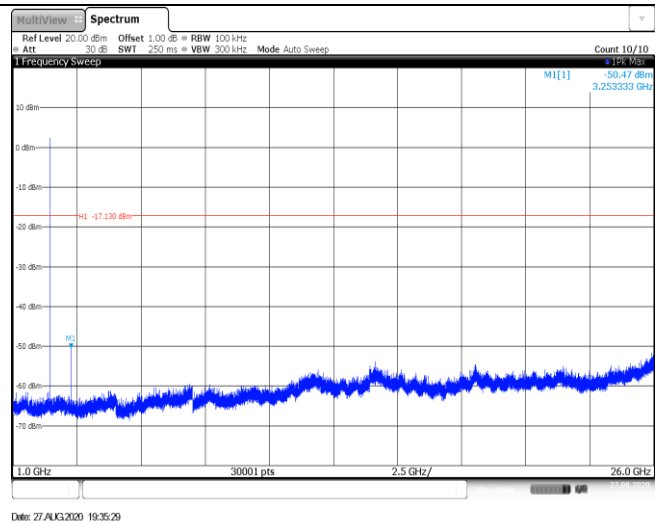
CH19
Reference level

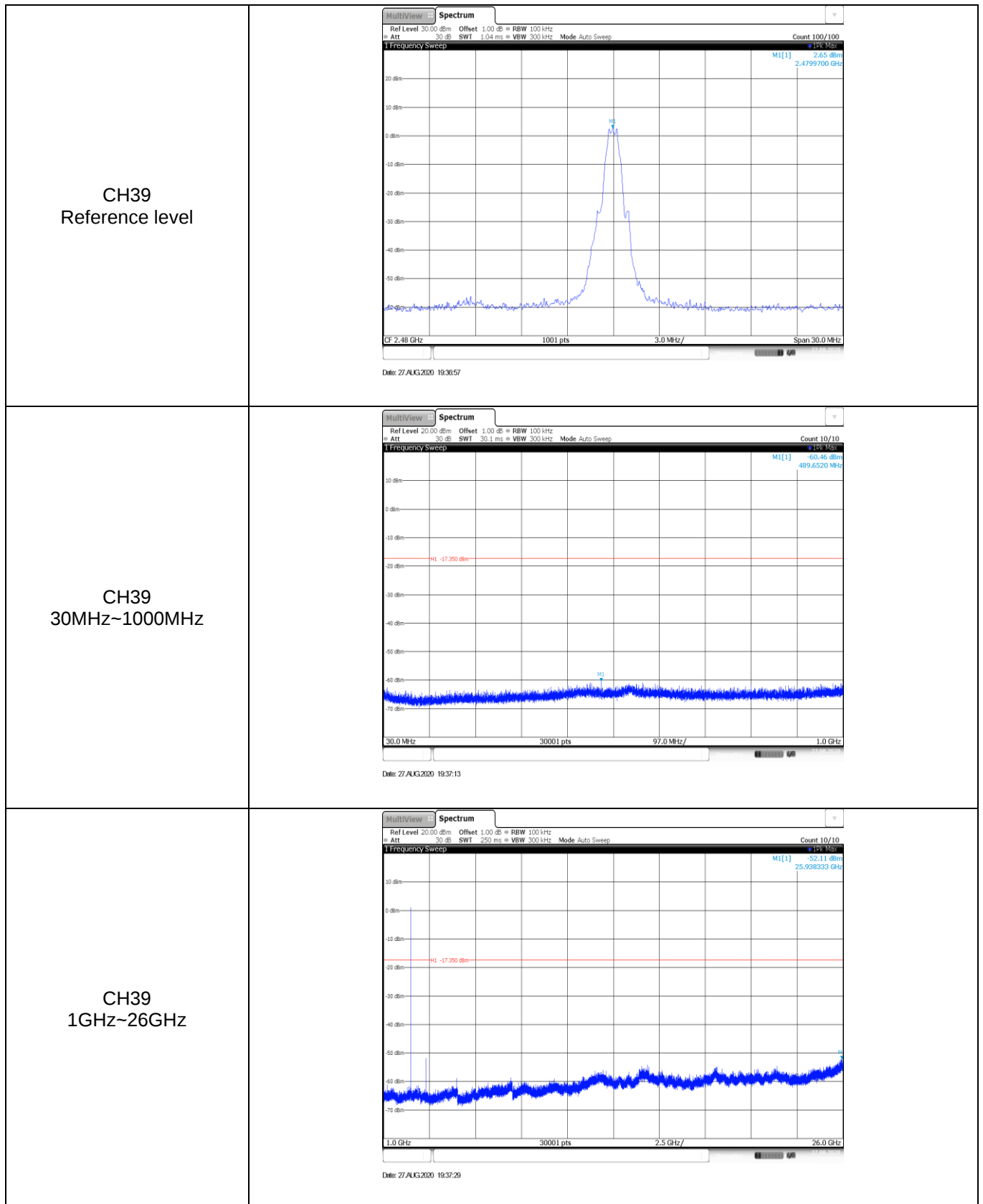


CH19
30MHz~1000MHz



CH19
1GHz~26GHz





-----End of Report-----