

Appendix B

RF Test Data for BT V4.0 (BT LE) (Conducted Measurement)

Product Name: Non-Subscription 7 inch Tablet

Trade Mark: N/A

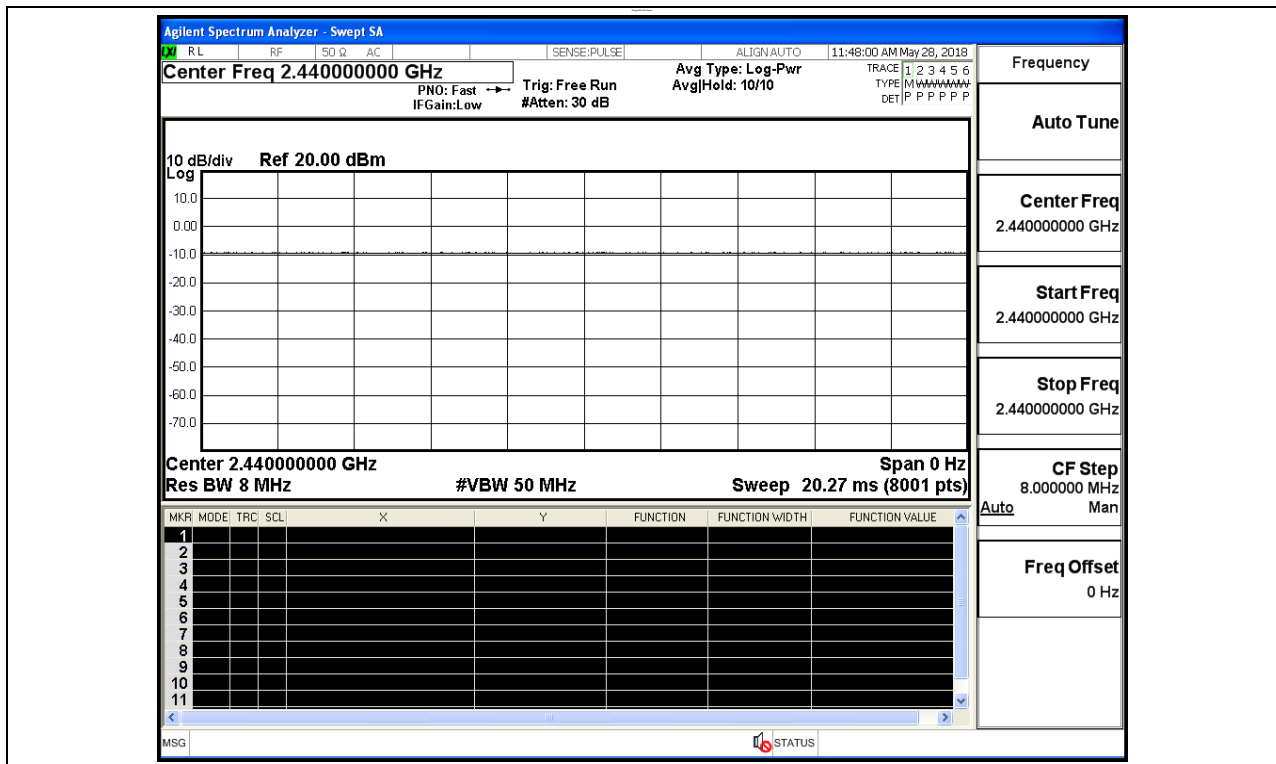
Test Model: TAB-T103A

Environmental Conditions

| | |
|--------------------|-------------|
| Temperature: | 24.3°C |
| Relative Humidity: | 53.6% |
| ATM Pressure: | 100.0 kPa |
| Test Engineer: | Wilson Hong |
| Supervised by: | Jayden.Zhuo |

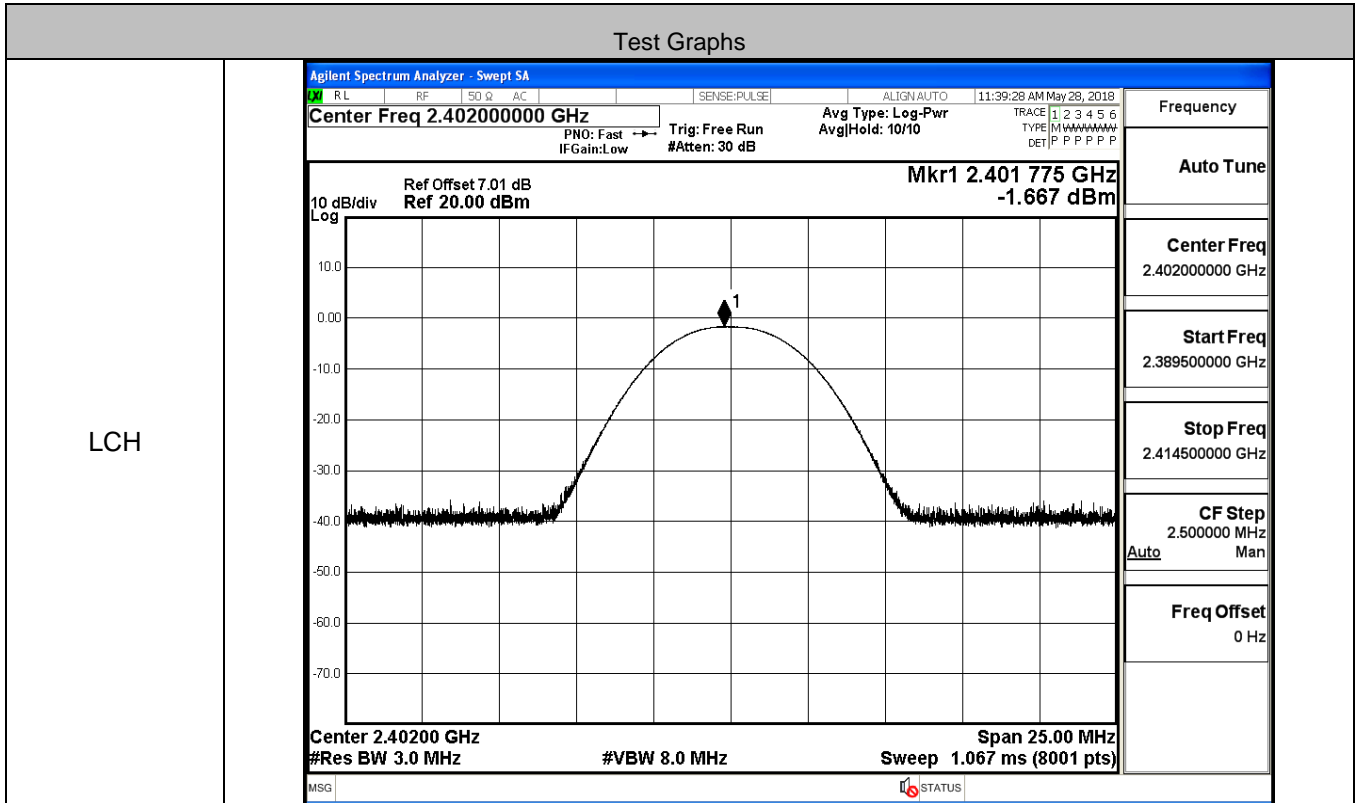
B.1 Duty Cycle

| Test Mode | Test Channel | Ant | Duty Cycle[%] | Verdict |
|-----------|--------------|------|---------------|---------|
| BT LE | 2440 | Ant1 | 100 | PASS |

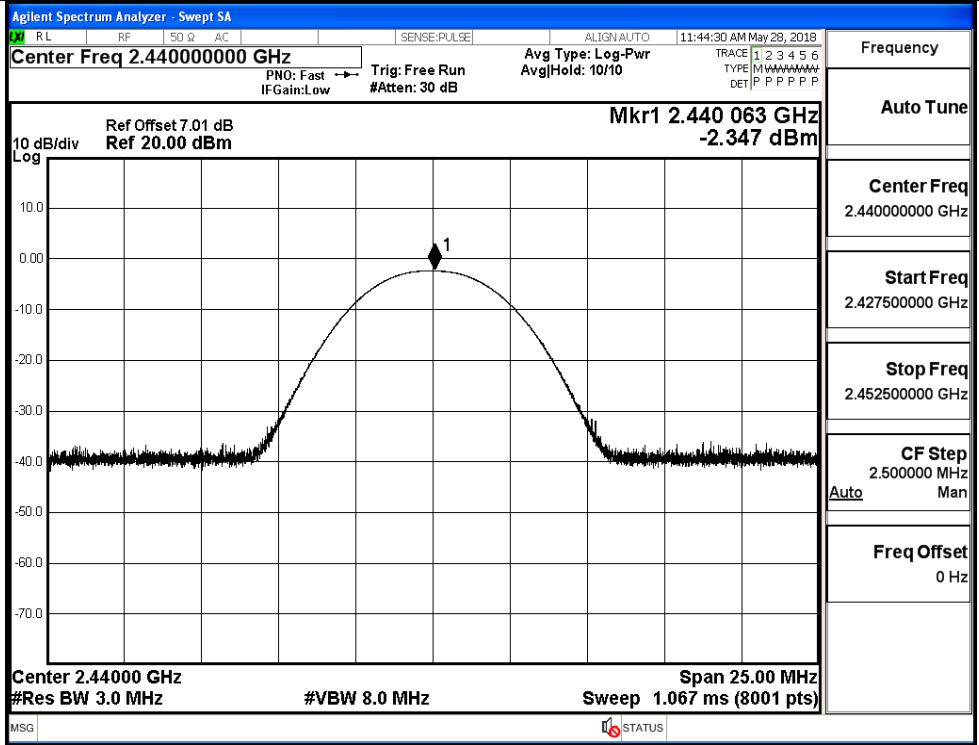


B.2 Maximum Conducted Peak Output Power

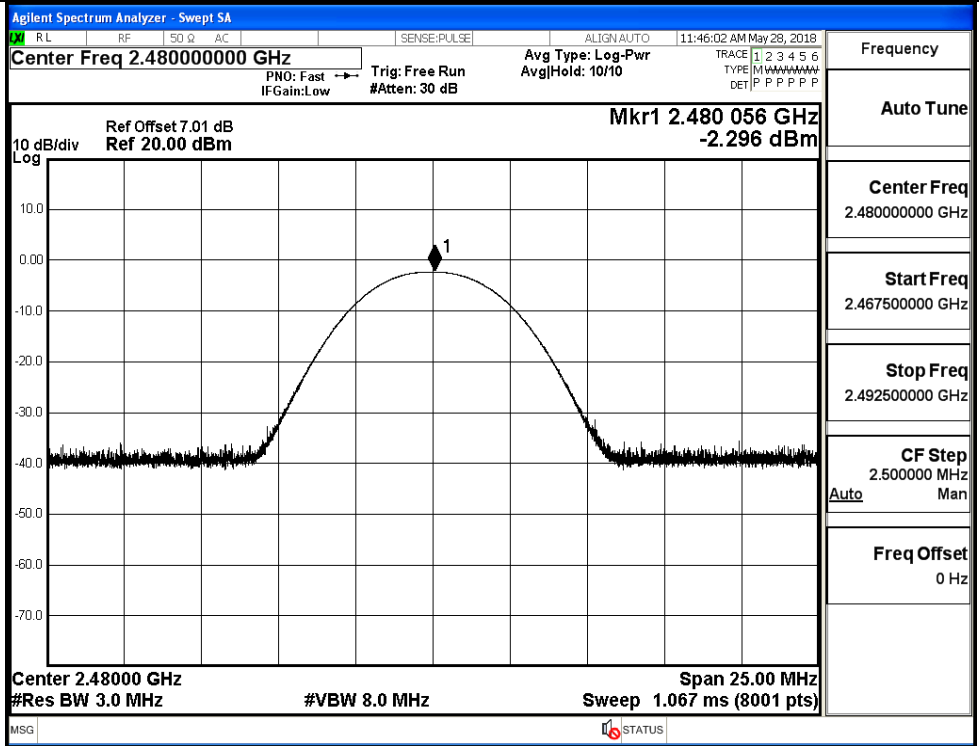
| Mode | Channel | Conduct Peak Power [dBm] | Conducted Average Power [dBm] | Limit [dBm] | Verdict |
|-------|---------|--------------------------|-------------------------------|-------------|---------|
| BT LE | LCH | -1.667 | -2.167 | 30 | PASS |
| BT LE | MCH | -2.347 | -2.847 | 30 | PASS |
| BT LE | HCH | -2.296 | -2.696 | 30 | PASS |



MCH



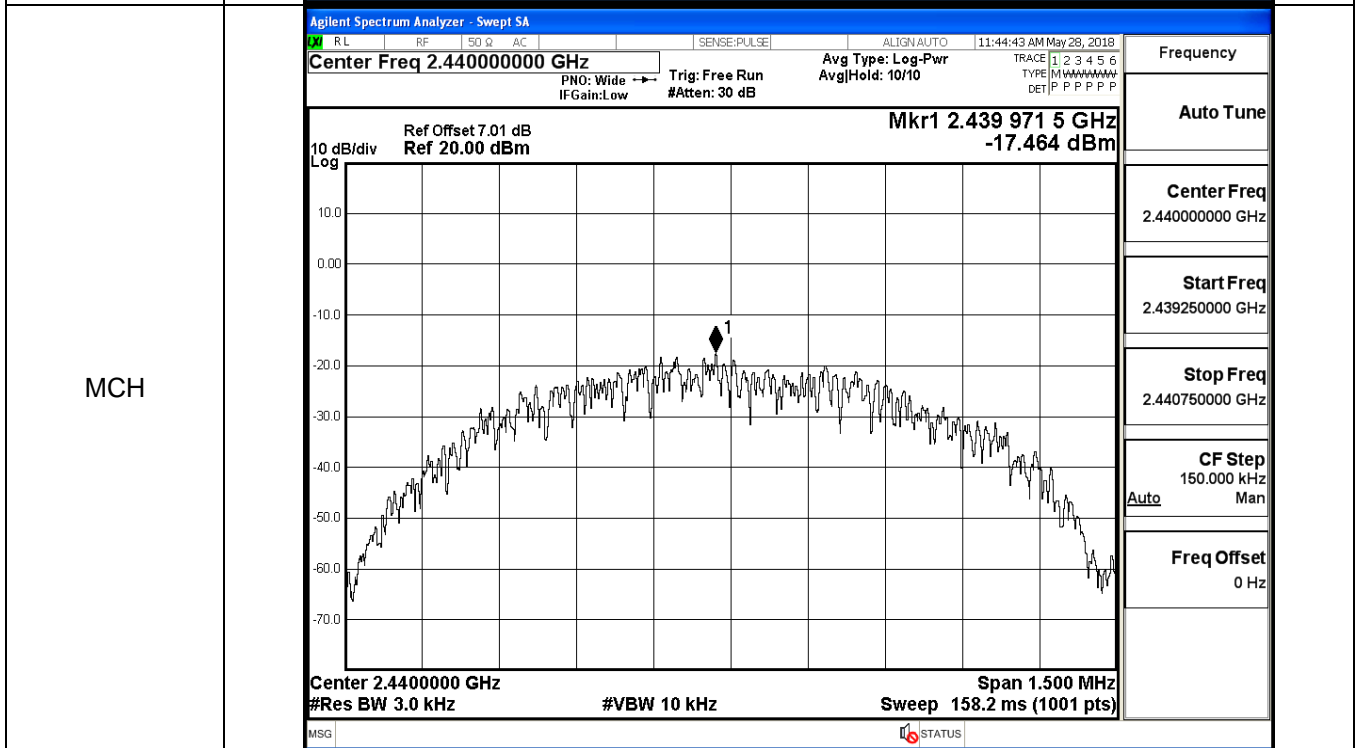
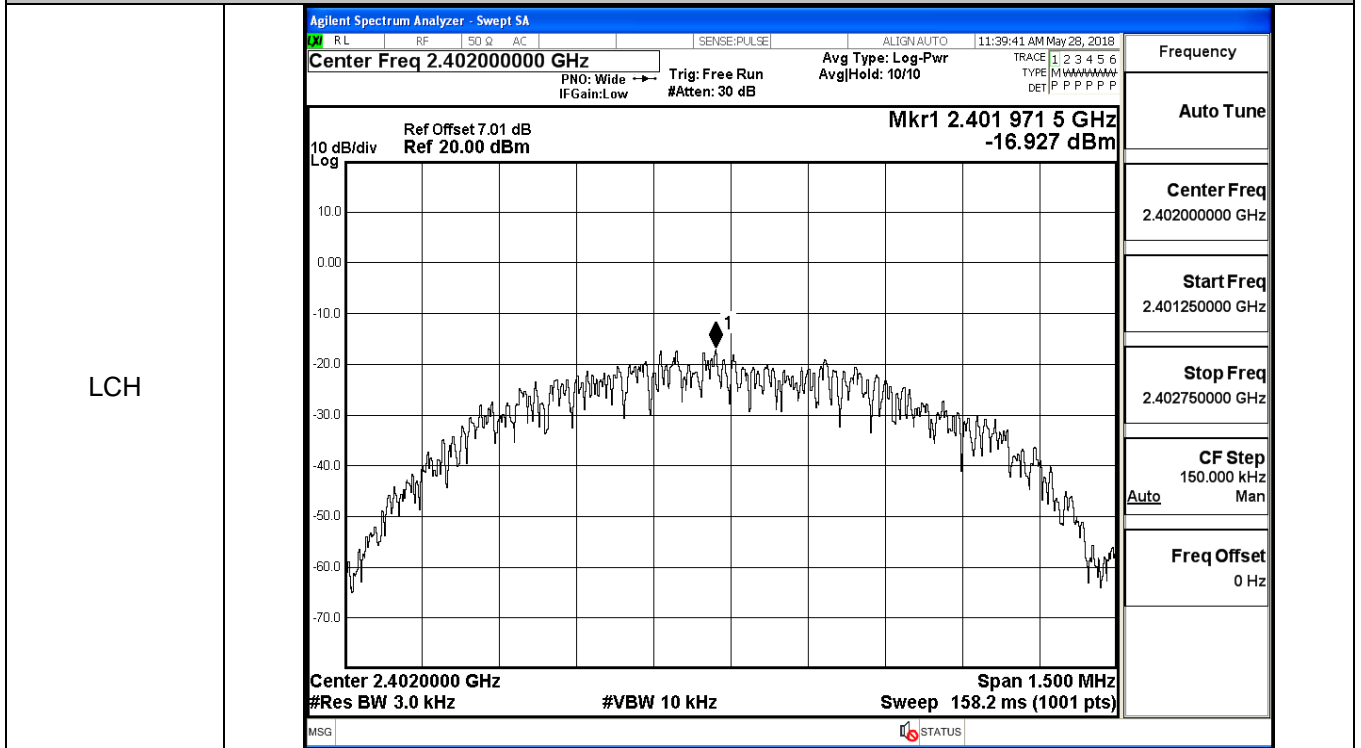
HCH

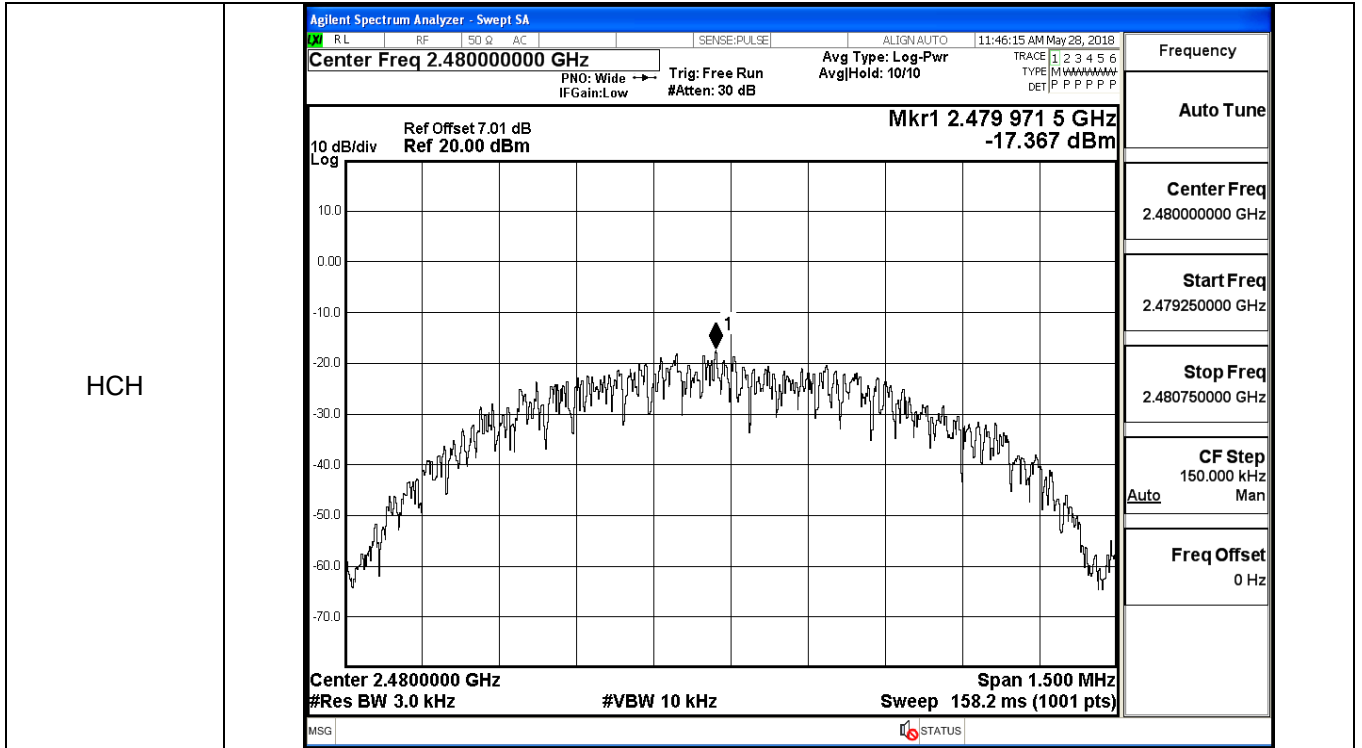


B.3 Maximum Power Spectral Density

| Mode | Channel | PSD [dBm/3KHz] | Limit [dBm/3KHz] | Verdict |
|-------|---------|----------------|------------------|---------|
| BT LE | LCH | -16.927 | 8 | PASS |
| BT LE | MCH | -17.464 | 8 | PASS |
| BT LE | HCH | -17.367 | 8 | PASS |

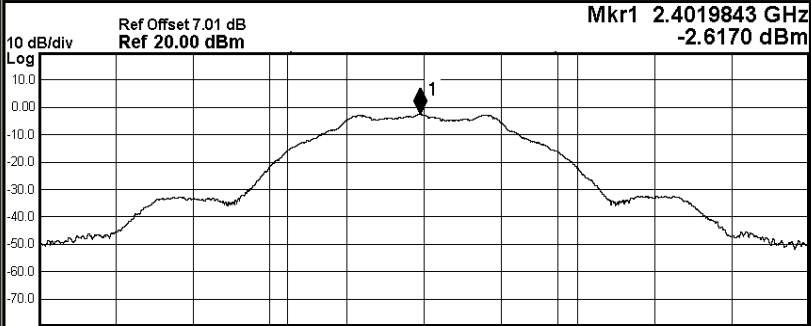
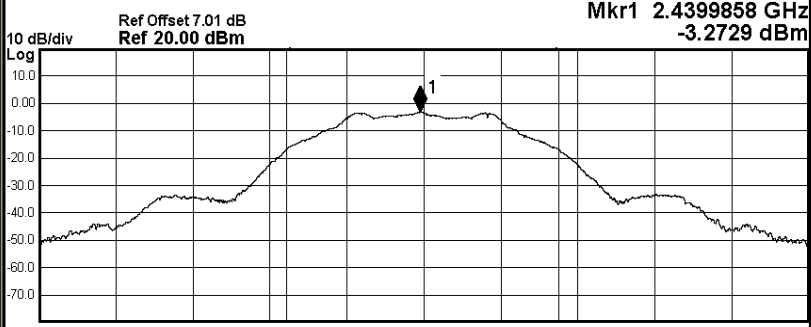
Test Graphs

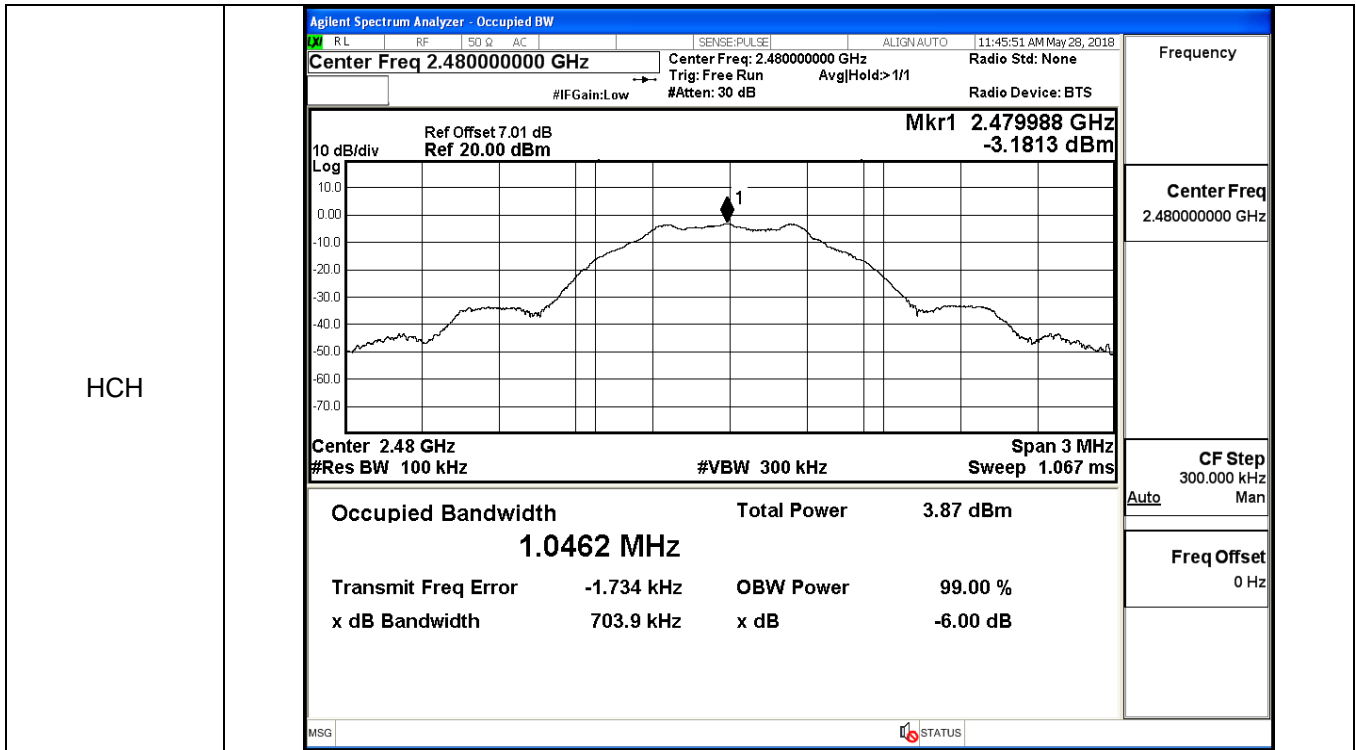




B.4 6dB Bandwidth

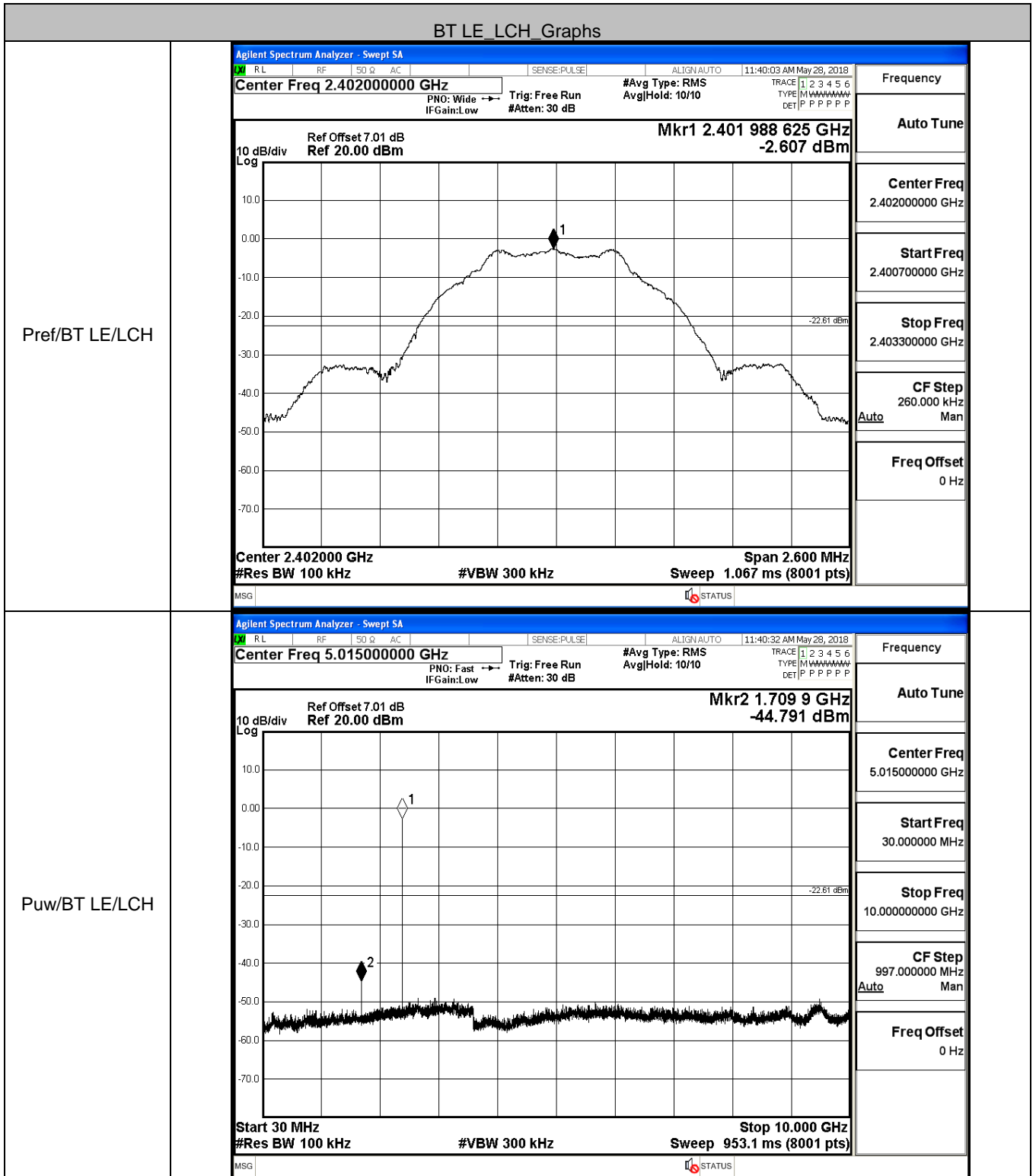
| Mode | Channel | 6dB Bandwidth [MHz] | Limit [MHz] | Verdict |
|-------|---------|---------------------|-------------|---------|
| BT LE | LCH | 0.7061 | ≥0.5 | PASS |
| BT LE | MCH | 0.7082 | ≥0.5 | PASS |
| BT LE | HCH | 0.7039 | ≥0.5 | PASS |

| Test Graphs | | | | | | | | | | | | | |
|---------------------|---|--------------------|-------------|----------|-------------------|--|--|---------------------|-----------|---------|----------------|------|----------|
| LCH | <div style="border: 1px solid black; padding: 5px;"> <p style="text-align: center; margin: 0;">Agilent Spectrum Analyzer - Occupied BW</p> <p style="font-size: small; margin: 0;">RL RF 50 Ω AC SENSE:PULSE ALIGN:AUTO 11:39:17 AM May 28, 2018</p> <p style="margin: 0;">Center Freq 2.402000000 GHz Center Freq: 2.402000000 GHz Radio Std: None</p> <p style="margin: 0;">Trig: Free Run AvgHold: >1/1</p> <p style="margin: 0;">#IFGain:Low #Atten: 30 dB Radio Device: BTS</p> <div style="border: 1px solid black; padding: 2px; margin: 5px 0;"> <p style="font-size: x-small; margin: 0;">10 dB/div Ref Offset 7.01 dB Mkr1 2.4019843 GHz</p> <p style="font-size: x-small; margin: 0;">Log Ref 20.00 dBm -2.6170 dBm</p>  </div> <p style="font-size: x-small; margin: 0;">Center 2.402 GHz Span 3 MHz</p> <p style="font-size: x-small; margin: 0;">#Res BW 100 kHz #VBW 300 kHz Sweep 1.067 ms</p> <table style="width: 100%; font-size: x-small; border-collapse: collapse;"> <tr> <td style="width: 33%;">Occupied Bandwidth</td> <td style="width: 33%;">Total Power</td> <td style="width: 33%;">4.47 dBm</td> </tr> <tr> <td style="text-align: center;">1.0485 MHz</td> <td></td> <td></td> </tr> <tr> <td>Transmit Freq Error</td> <td>OBW Power</td> <td>99.00 %</td> </tr> <tr> <td>x dB Bandwidth</td> <td>x dB</td> <td>-6.00 dB</td> </tr> </table> <p style="font-size: x-small; margin: 0;">MSG STATUS</p> </div> | Occupied Bandwidth | Total Power | 4.47 dBm | 1.0485 MHz | | | Transmit Freq Error | OBW Power | 99.00 % | x dB Bandwidth | x dB | -6.00 dB |
| Occupied Bandwidth | Total Power | 4.47 dBm | | | | | | | | | | | |
| 1.0485 MHz | | | | | | | | | | | | | |
| Transmit Freq Error | OBW Power | 99.00 % | | | | | | | | | | | |
| x dB Bandwidth | x dB | -6.00 dB | | | | | | | | | | | |
| MCH | <div style="border: 1px solid black; padding: 5px;"> <p style="text-align: center; margin: 0;">Agilent Spectrum Analyzer - Occupied BW</p> <p style="font-size: small; margin: 0;">RL RF 50 Ω AC SENSE:PULSE ALIGN:AUTO 11:44:19 AM May 28, 2018</p> <p style="margin: 0;">Center Freq 2.440000000 GHz Center Freq: 2.440000000 GHz Radio Std: None</p> <p style="margin: 0;">Trig: Free Run AvgHold: 1/1</p> <p style="margin: 0;">#IFGain:Low #Atten: 30 dB Radio Device: BTS</p> <div style="border: 1px solid black; padding: 2px; margin: 5px 0;"> <p style="font-size: x-small; margin: 0;">10 dB/div Ref Offset 7.01 dB Mkr1 2.4399858 GHz</p> <p style="font-size: x-small; margin: 0;">Log Ref 20.00 dBm -3.2729 dBm</p>  </div> <p style="font-size: x-small; margin: 0;">Center 2.44 GHz Span 3 MHz</p> <p style="font-size: x-small; margin: 0;">#Res BW 100 kHz #VBW 300 kHz Sweep 1.067 ms</p> <table style="width: 100%; font-size: x-small; border-collapse: collapse;"> <tr> <td style="width: 33%;">Occupied Bandwidth</td> <td style="width: 33%;">Total Power</td> <td style="width: 33%;">3.82 dBm</td> </tr> <tr> <td style="text-align: center;">1.0520 MHz</td> <td></td> <td></td> </tr> <tr> <td>Transmit Freq Error</td> <td>OBW Power</td> <td>99.00 %</td> </tr> <tr> <td>x dB Bandwidth</td> <td>x dB</td> <td>-6.00 dB</td> </tr> </table> <p style="font-size: x-small; margin: 0;">MSG STATUS</p> </div> | Occupied Bandwidth | Total Power | 3.82 dBm | 1.0520 MHz | | | Transmit Freq Error | OBW Power | 99.00 % | x dB Bandwidth | x dB | -6.00 dB |
| Occupied Bandwidth | Total Power | 3.82 dBm | | | | | | | | | | | |
| 1.0520 MHz | | | | | | | | | | | | | |
| Transmit Freq Error | OBW Power | 99.00 % | | | | | | | | | | | |
| x dB Bandwidth | x dB | -6.00 dB | | | | | | | | | | | |



B.5 RF Conducted Spurious Emissions

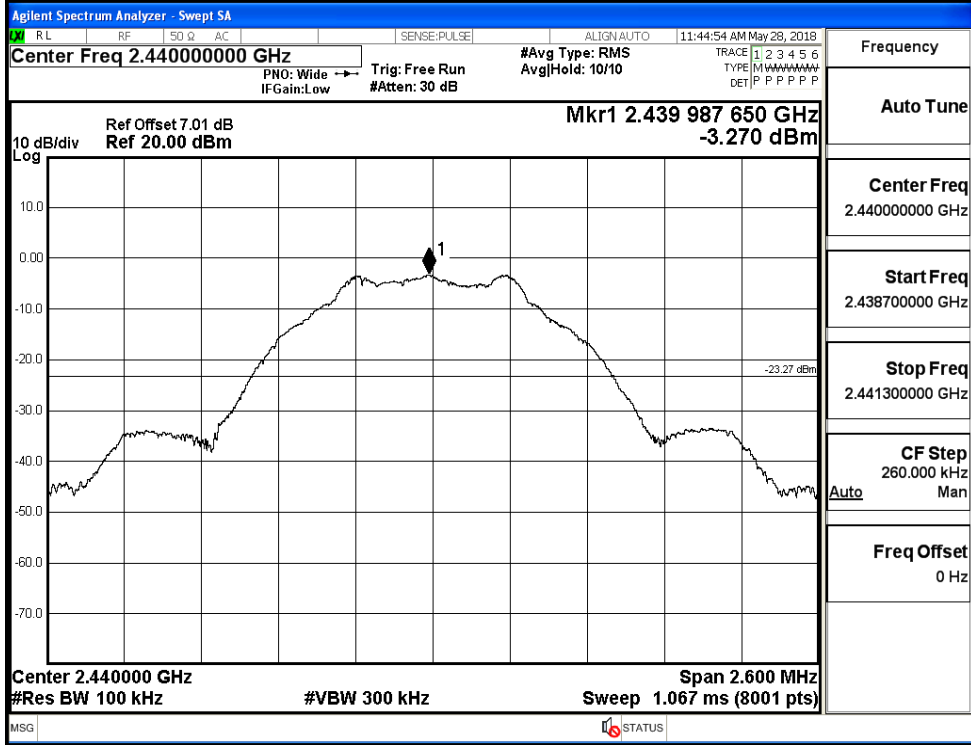
| Mode | Channel | Pref [dBm] | Max. Level [dBm] | Limit [dBm] | Verdict |
|-------|---------|------------|------------------|-------------|---------|
| BT LE | LCH | -2.607 | -44.791 | -22.607 | PASS |
| BT LE | MCH | -3.27 | -44.266 | -23.270 | PASS |
| BT LE | HCH | -3.225 | -43.216 | -23.225 | PASS |



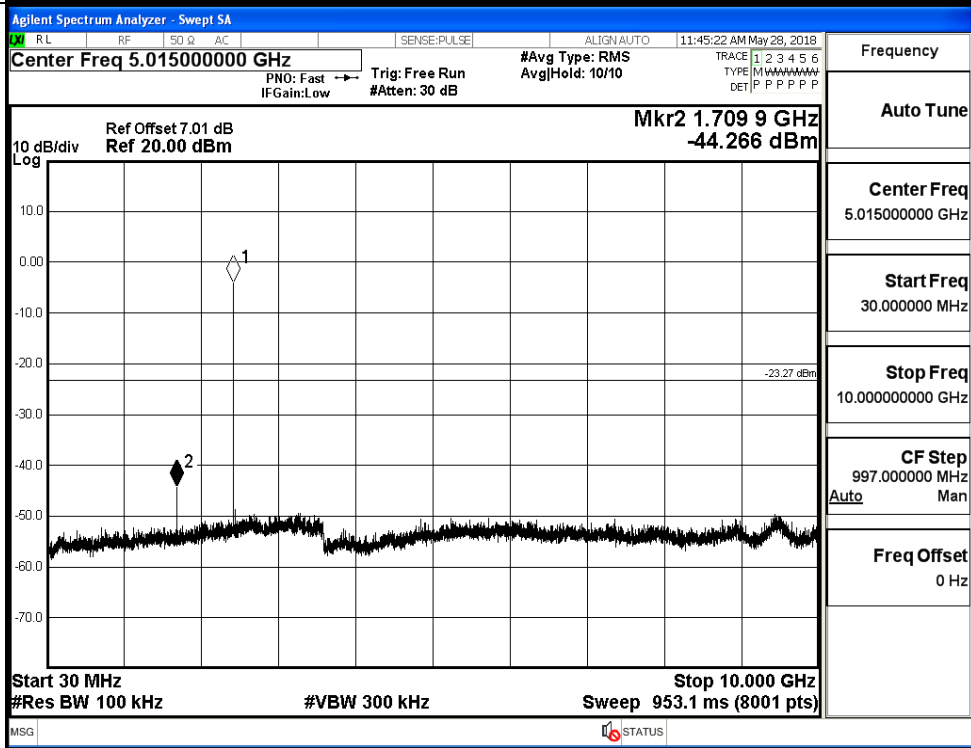
| | |
|--|--|
| | |
|--|--|

BT LE_MCH_Graphs

Pref/BT LE/MCH

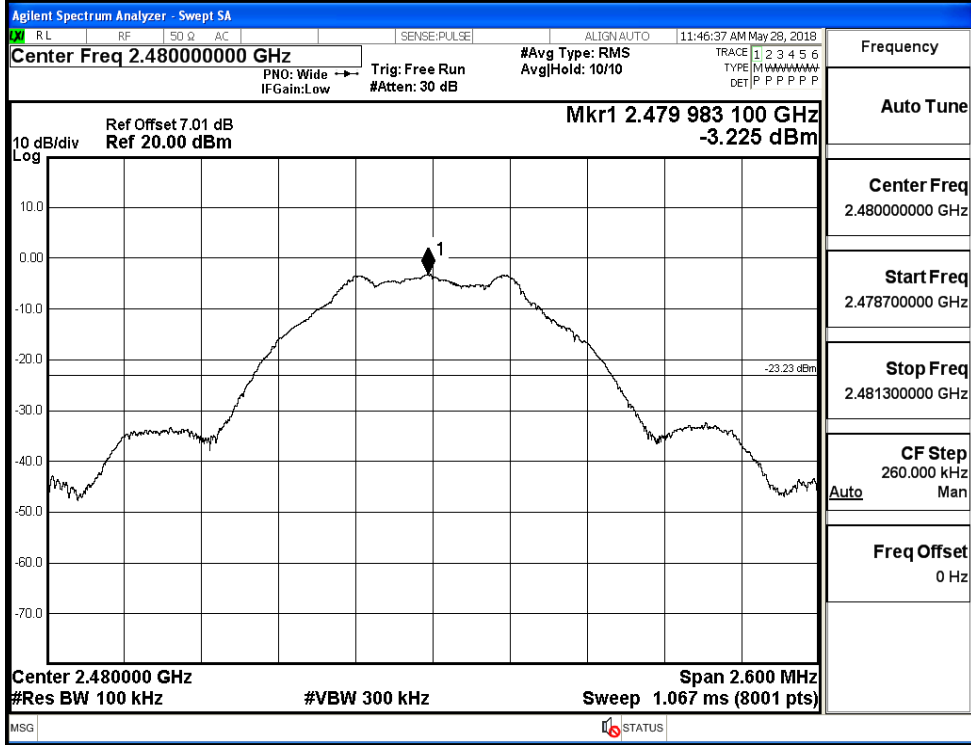


Puw/BT LE/MCH

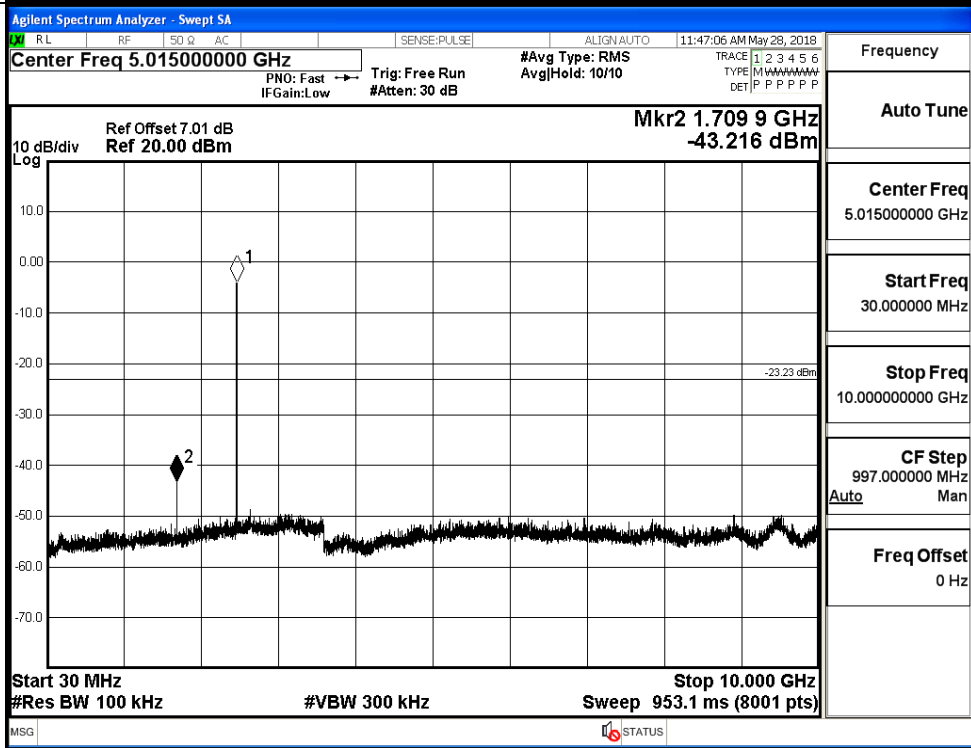


BT LE_HCH_Graphs

Pref/BT LE/HCH



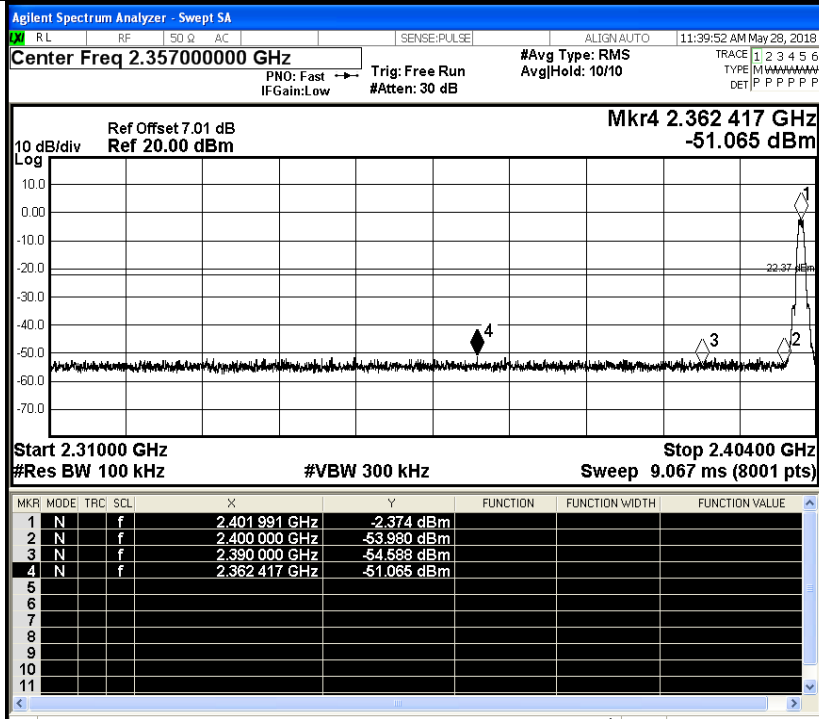
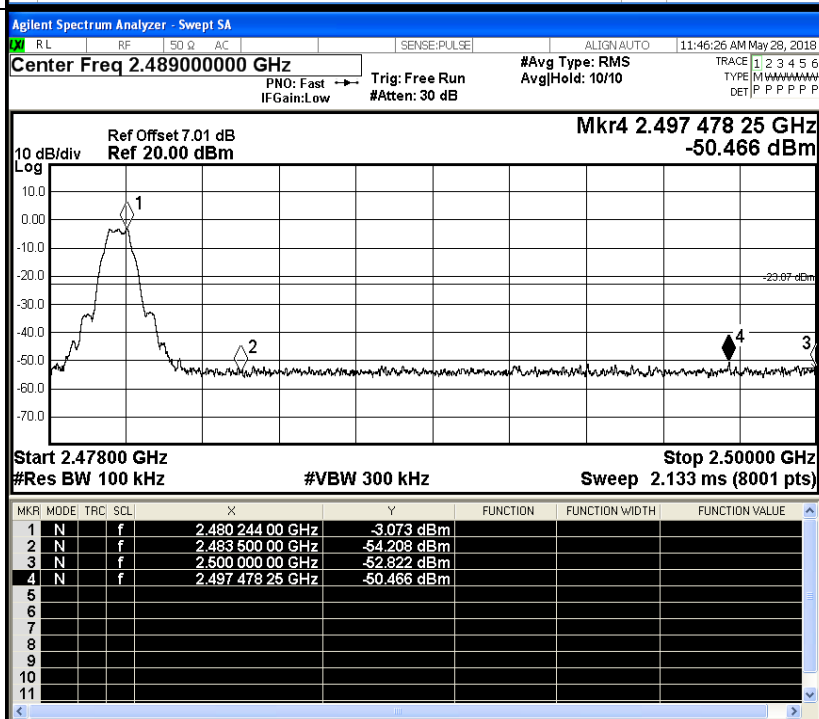
Puw/BT LE/HCH



B.6 Band-edge for RF Conducted Emissions

| Mode | Channel | Carrier Power[dBm] | Max.Spurious Level [dBm] | Limit [dBm] | Verdict |
|-------|---------|--------------------|--------------------------|-------------|---------|
| BT LE | LCH | -2.374 | -51.065 | -22.37 | PASS |
| BT LE | HCH | -3.073 | -50.466 | -23.07 | PASS |

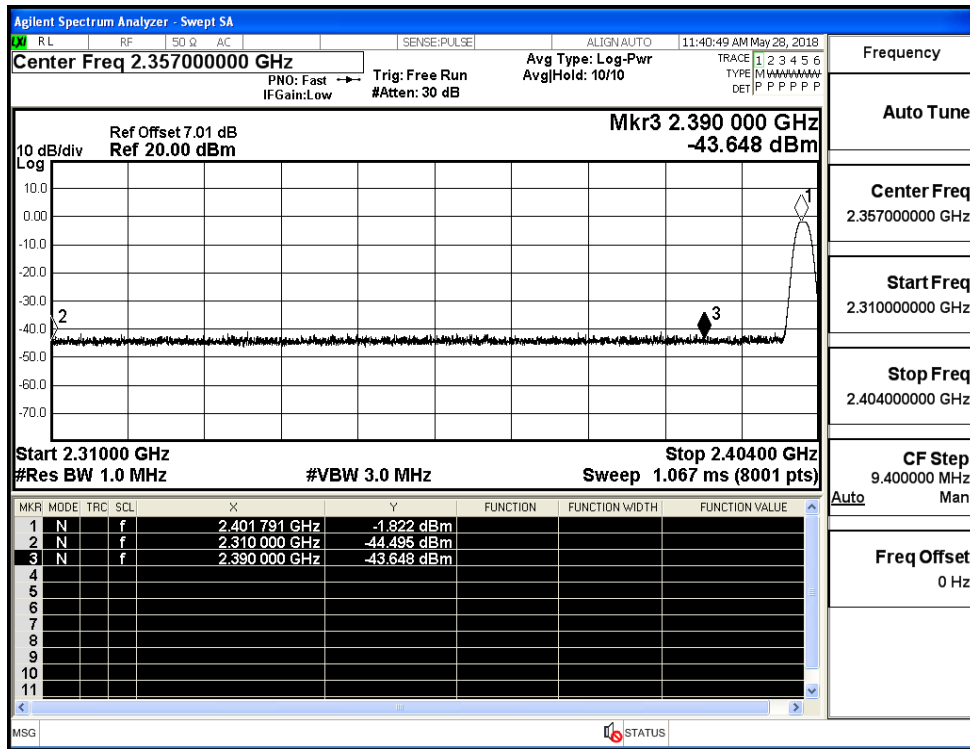
Test Graphs

| | | |
|-----|--|--|
| LCH |  | <p>Frequency</p> <p>Auto Tune</p> <p>Center Freq 2.35700000 GHz</p> <p>Start Freq 2.31000000 GHz</p> <p>Stop Freq 2.40400000 GHz</p> <p>CF Step 9.400000 MHz</p> <p>Freq Offset 0 Hz</p> |
| HCH |  | <p>Frequency</p> <p>Auto Tune</p> <p>Center Freq 2.48900000 GHz</p> <p>Start Freq 2.47800000 GHz</p> <p>Stop Freq 2.50000000 GHz</p> <p>CF Step 2.200000 MHz</p> <p>Freq Offset 0 Hz</p> |

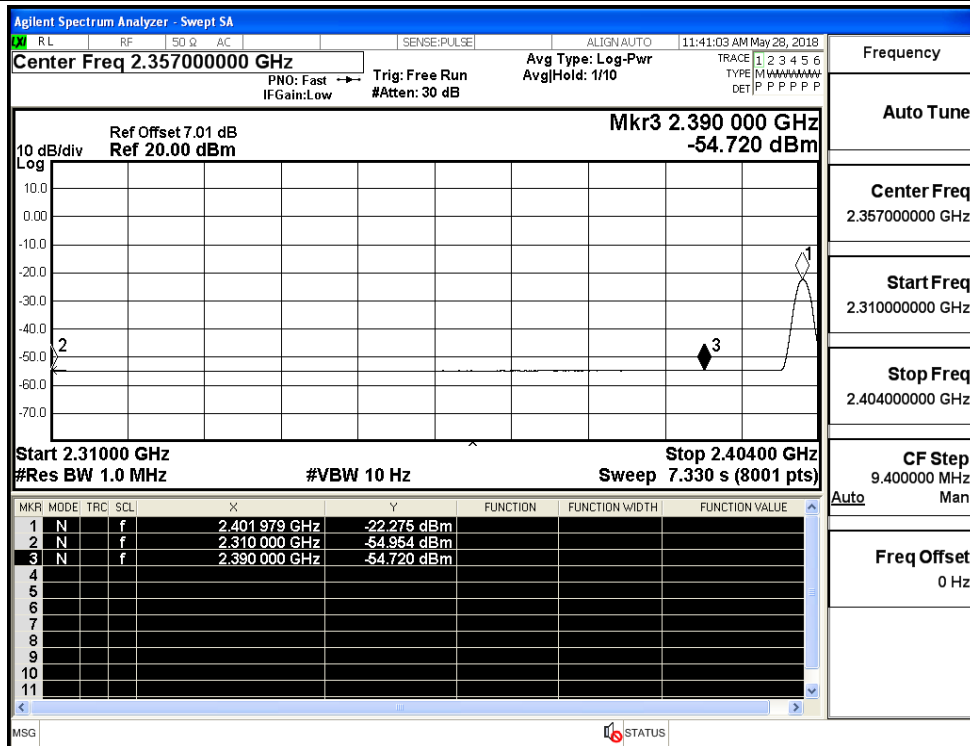
B.7 Restrict-band band-edge measurements

| Test Mode | Test Channel | Ant | Freq. | Power [dBm] | Gain | Ground Factor | E [dBuV/m] | Detector | Limit [dBuV/m] | Verdi |
|-----------|--------------|------|--------|-------------|------|---------------|------------|----------|----------------|-------|
| BT LE | 2402 | Ant1 | 2310.0 | -44.50 | 2.0 | 0 | 52.76 | PEAK | 74 | PASS |
| | | Ant1 | 2310.0 | -54.95 | 2.0 | 0 | 42.30 | AV | 54 | PASS |
| | | Ant1 | 2390.0 | -43.65 | 2.0 | 0 | 53.61 | PEAK | 74 | PASS |
| | | Ant1 | 2390.0 | -54.72 | 2.0 | 0 | 42.54 | AV | 54 | PASS |
| | 2480 | Ant1 | 2483.5 | -44.93 | 2.0 | 0 | 52.33 | PEAK | 74 | PASS |
| | | Ant1 | 2483.5 | -54.49 | 2.0 | 0 | 42.77 | AV | 54 | PASS |
| | | Ant1 | 2500.0 | -43.83 | 2.0 | 0 | 53.42 | PEAK | 74 | PASS |
| | | Ant1 | 2500.0 | -54.36 | 2.0 | 0 | 42.90 | AV | 54 | PASS |

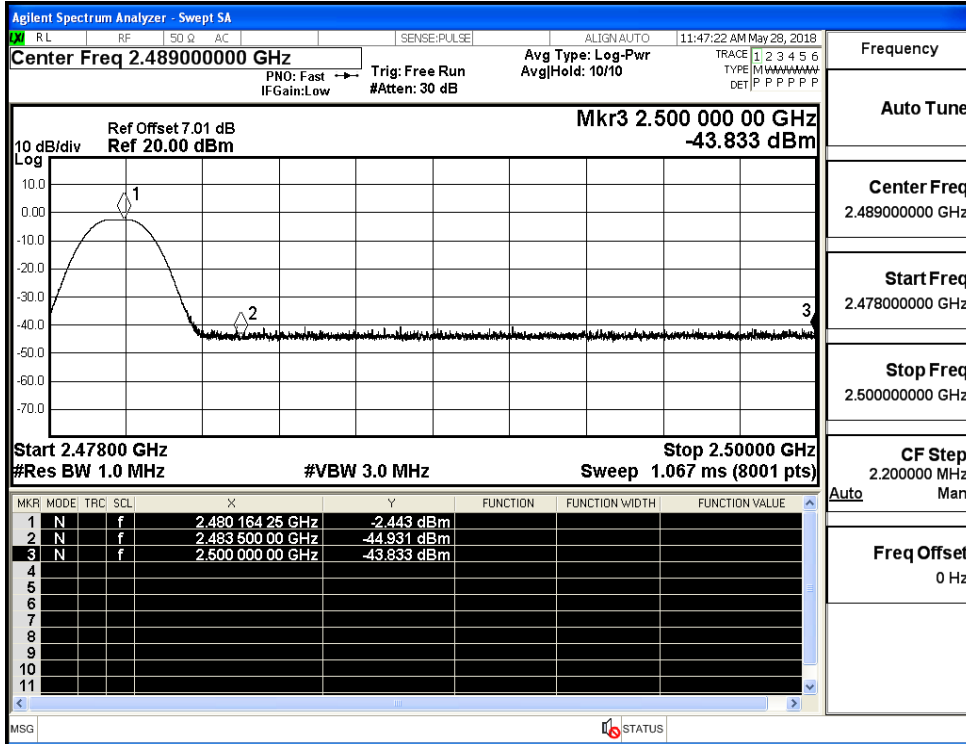
Restrict-band band-edge measurements_BT LE_2402_Ant1_PEAK



Restrict-band band-edge measurements_BT LE_2402_Ant1_AV



Restrict-band band-edge measurements_BT LE_2480_Ant1_PEAK



Restrict-band band-edge measurements_BT LE_2480_Ant1_AV

