

1. Conducted Output Power

Test Result

LTE Band 7 - 5MHz

| Modulation | RB Allocation | | Conducted Power (dBm) | | | Limit (dBm) | Verdict | |
|------------|---------------|--------|-----------------------|-------|-------|-------------|---------|------|
| | Size | Offset | LCH | MCH | HCH | | | |
| QPSK | 1 | 0 | 19.65 | 16.44 | 22.52 | 33.01 | PASS | |
| | | 13 | 21.03 | 16.27 | 22.70 | 33.01 | PASS | |
| | | 24 | 21.75 | 16.10 | 22.51 | 33.01 | PASS | |
| | 12 | 0 | 19.21 | 15.33 | 21.63 | 33.01 | PASS | |
| | | 6 | 19.86 | 15.27 | 21.72 | 33.01 | PASS | |
| | | 13 | 20.39 | 15.17 | 21.59 | 33.01 | PASS | |
| | 25 | 0 | 19.88 | 15.21 | 21.62 | 33.01 | PASS | |
| | 16QAM | 1 | 0 | 18.49 | 15.47 | 21.70 | 33.01 | PASS |
| | | | 13 | 19.88 | 15.33 | 21.89 | 33.01 | PASS |
| 24 | | | 20.57 | 15.16 | 21.70 | 33.01 | PASS | |
| 12 | | 0 | 18.17 | 14.25 | 20.60 | 33.01 | PASS | |
| | | 6 | 18.80 | 14.19 | 20.64 | 33.01 | PASS | |
| | | 13 | 19.35 | 14.09 | 20.51 | 33.01 | PASS | |
| 25 | | 0 | 18.84 | 14.21 | 20.53 | 33.01 | PASS | |

LTE Band 7 - 10MHz

| Modulation | RB Allocation | | Conducted Power (dBm) | | | Limit (dBm) | Verdict | |
|------------|---------------|--------|-----------------------|-------|-------|-------------|---------|------|
| | Size | Offset | LCH | MCH | HCH | | | |
| QPSK | 1 | 0 | 19.88 | 16.92 | 22.12 | 33.01 | PASS | |
| | | 25 | 22.04 | 16.39 | 22.81 | 33.01 | PASS | |
| | | 49 | 22.53 | 16.34 | 22.62 | 33.01 | PASS | |
| | 25 | 0 | 19.98 | 15.54 | 21.38 | 33.01 | PASS | |
| | | 13 | 20.92 | 15.27 | 21.60 | 33.01 | PASS | |
| | | 25 | 21.38 | 15.24 | 21.66 | 33.01 | PASS | |
| | 50 | 0 | 20.74 | 15.36 | 21.46 | 33.01 | PASS | |
| | 16QAM | 1 | 0 | 19.01 | 16.45 | 21.07 | 33.01 | PASS |
| | | | 25 | 21.25 | 15.84 | 21.76 | 33.01 | PASS |
| 49 | | | 21.66 | 15.79 | 21.54 | 33.01 | PASS | |
| 25 | | 0 | 19.00 | 14.59 | 20.39 | 33.01 | PASS | |
| | | 13 | 19.92 | 14.30 | 20.63 | 33.01 | PASS | |
| | | 25 | 20.36 | 14.26 | 20.64 | 33.01 | PASS | |
| 50 | | 0 | 19.75 | 14.37 | 20.44 | 33.01 | PASS | |

LTE Band 7 - 15MHz

| Modulation | RB Allocation | | Conducted Power (dBm) | | | Limit (dBm) | Verdict | |
|------------|---------------|--------|-----------------------|-------|-------|-------------|---------|------|
| | Size | Offset | LCH | MCH | HCH | | | |
| QPSK | 1 | 0 | 20.03 | 17.52 | 21.18 | 33.01 | PASS | |
| | | 38 | 22.59 | 16.25 | 22.39 | 33.01 | PASS | |
| | | 74 | 21.74 | 16.77 | 22.59 | 33.01 | PASS | |
| | 36 | 0 | 20.60 | 15.87 | 20.93 | 33.01 | PASS | |
| | | 18 | 21.40 | 15.43 | 21.36 | 33.01 | PASS | |
| | | 39 | 21.35 | 15.44 | 21.66 | 33.01 | PASS | |
| | 75 | 0 | 20.97 | 15.64 | 21.27 | 33.01 | PASS | |
| | 16QAM | 1 | 0 | 19.11 | 16.99 | 20.52 | 33.01 | PASS |
| | | | 38 | 21.70 | 15.74 | 21.76 | 33.01 | PASS |
| 74 | | | 20.85 | 16.24 | 21.85 | 33.01 | PASS | |
| 36 | | 0 | 19.52 | 14.88 | 19.83 | 33.01 | PASS | |
| | | 18 | 20.31 | 14.43 | 20.28 | 33.01 | PASS | |
| | | 39 | 20.31 | 14.44 | 20.55 | 33.01 | PASS | |

| | | | | | | | |
|--|----|---|-------|-------|-------|-------|------|
| | 75 | 0 | 19.95 | 14.61 | 20.22 | 33.01 | PASS |
|--|----|---|-------|-------|-------|-------|------|

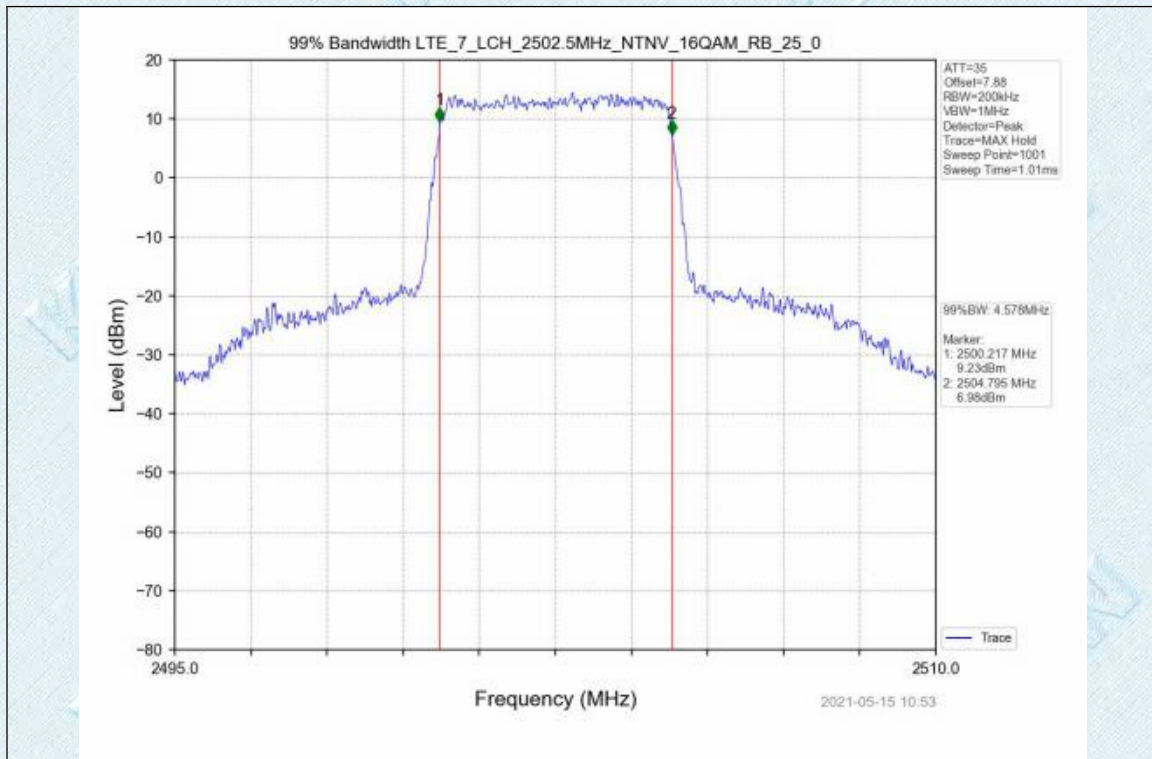
LTE Band 7 - 20MHz

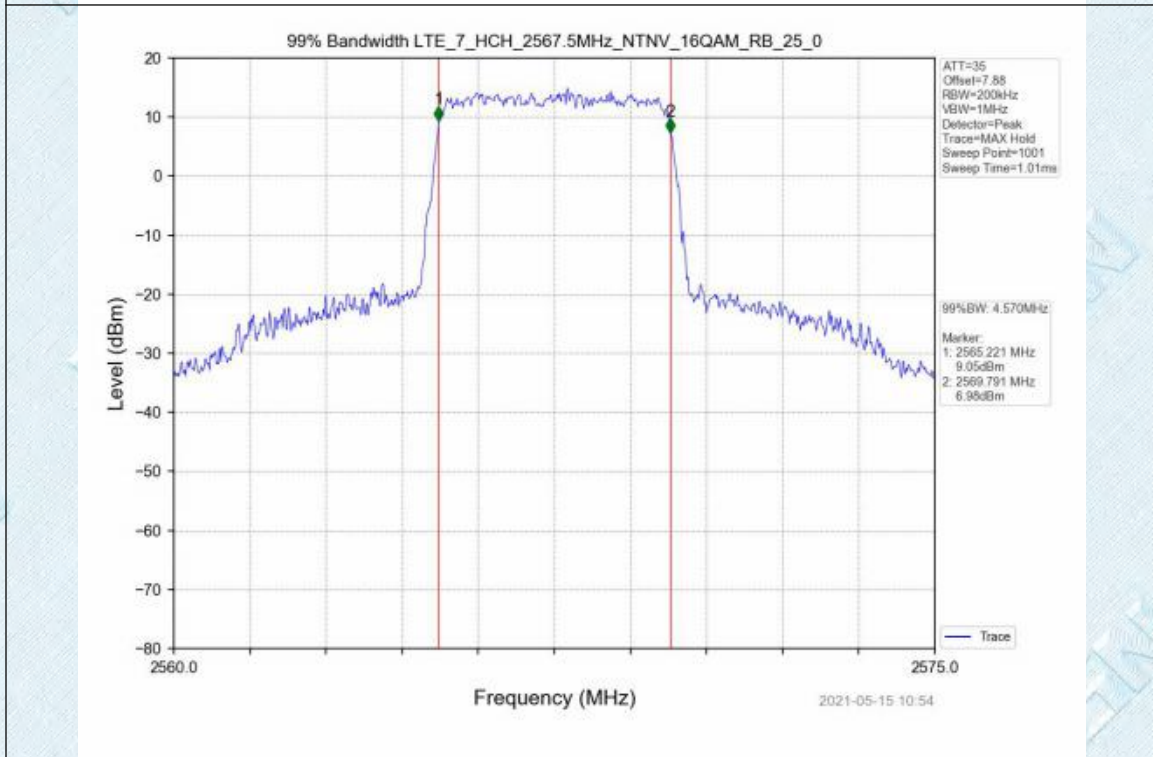
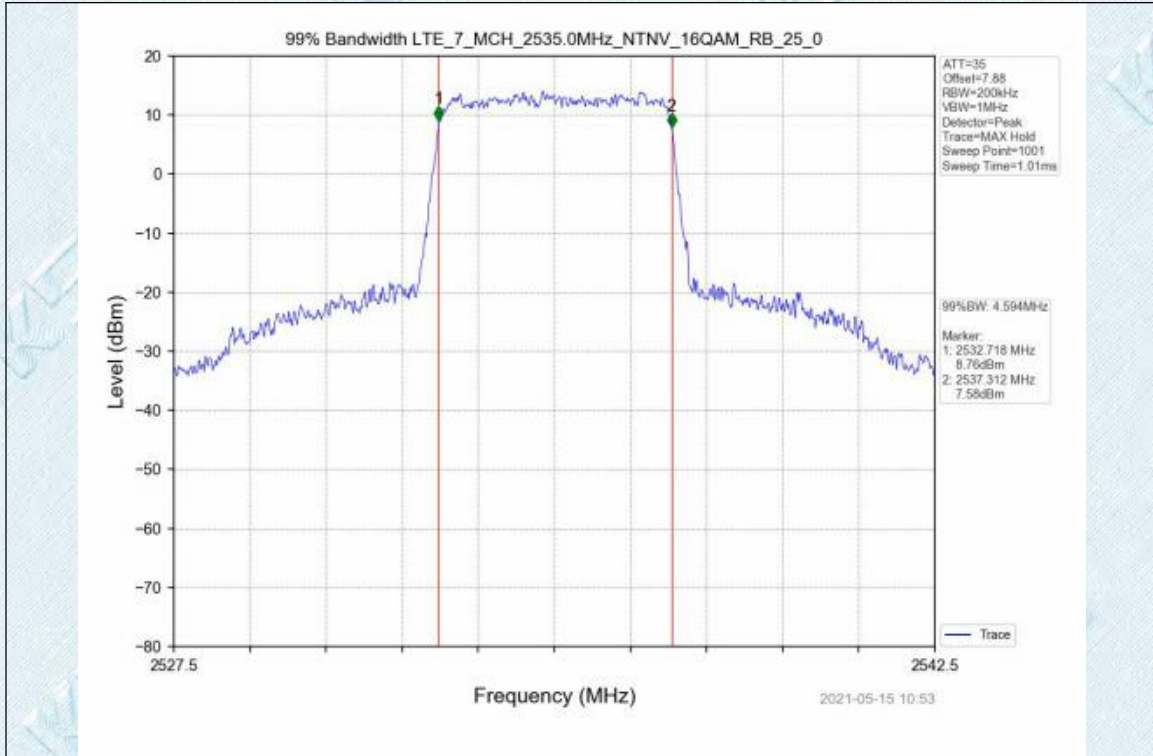
| Modulation | RB Allocation | | Conducted Power (dBm) | | | Limit (dBm) | Verdict |
|------------|---------------|--------|-----------------------|-------|-------|-------------|---------|
| | Size | Offset | LCH | MCH | HCH | | |
| QPSK | 1 | 0 | 20.11 | 18.07 | 19.74 | 33.01 | PASS |
| | | 50 | 22.73 | 16.42 | 22.18 | 33.01 | PASS |
| | | 99 | 20.27 | 17.41 | 22.49 | 33.01 | PASS |
| | 50 | 0 | 20.84 | 16.11 | 20.14 | 33.01 | PASS |
| | | 25 | 21.26 | 15.41 | 20.95 | 33.01 | PASS |
| | | 50 | 20.57 | 15.65 | 21.43 | 33.01 | PASS |
| 100 | 0 | 20.70 | 15.88 | 20.76 | 33.01 | PASS | |
| 16QAM | 1 | 0 | 19.24 | 17.30 | 19.27 | 33.01 | PASS |
| | | 50 | 21.87 | 15.64 | 21.68 | 33.01 | PASS |
| | | 99 | 19.42 | 16.58 | 22.03 | 33.01 | PASS |
| | 50 | 0 | 19.80 | 15.01 | 19.09 | 33.01 | PASS |
| | | 25 | 20.27 | 14.31 | 19.91 | 33.01 | PASS |
| | | 50 | 19.50 | 14.55 | 20.35 | 33.01 | PASS |
| | 100 | 0 | 19.71 | 14.80 | 19.80 | 33.01 | PASS |

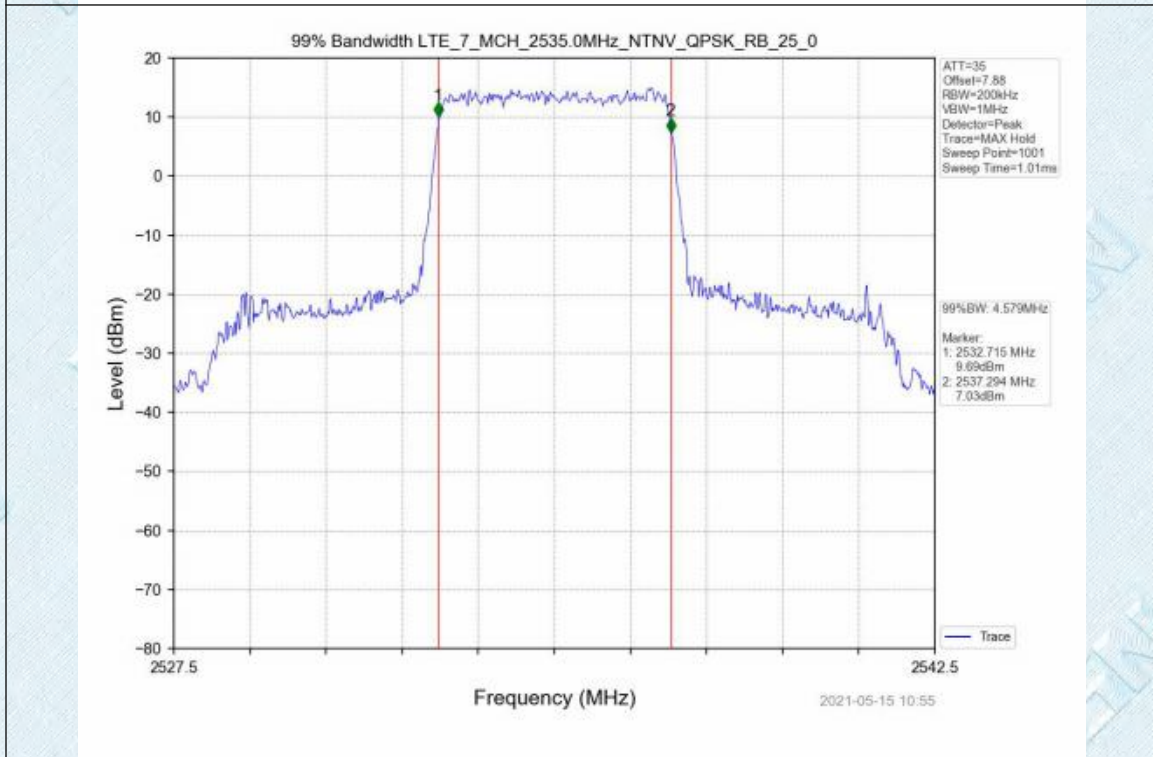
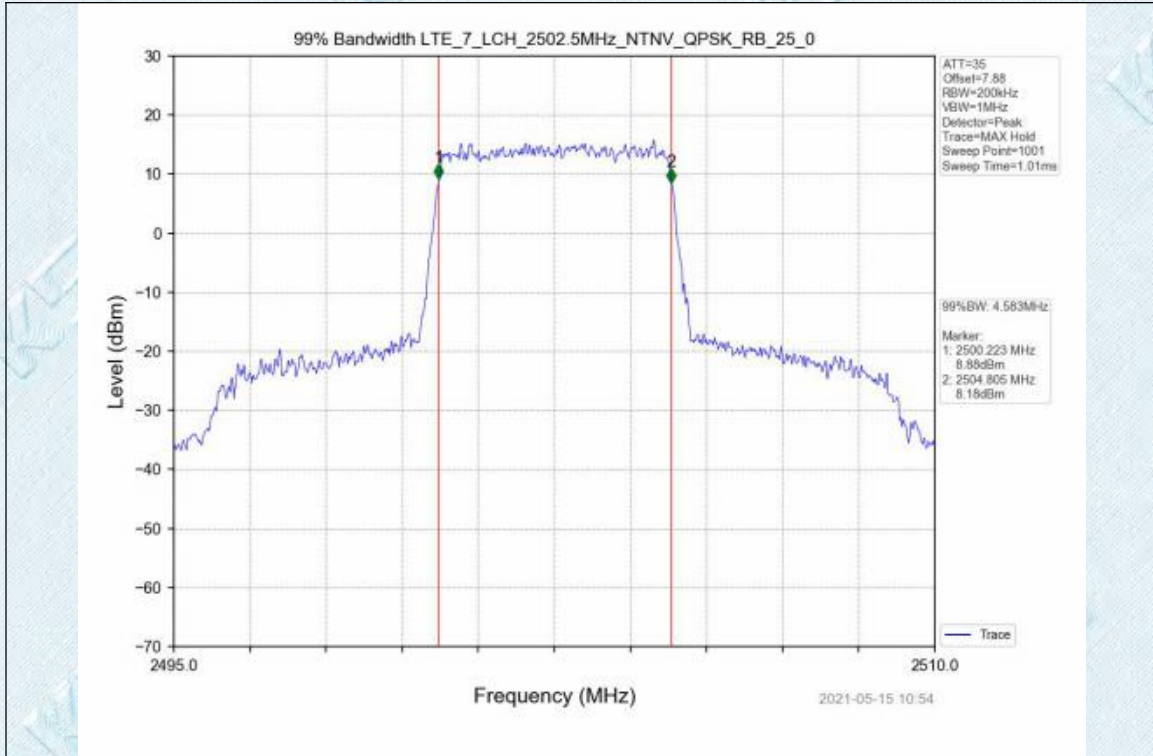
2.99% & 26dB Bandwidth Test Result

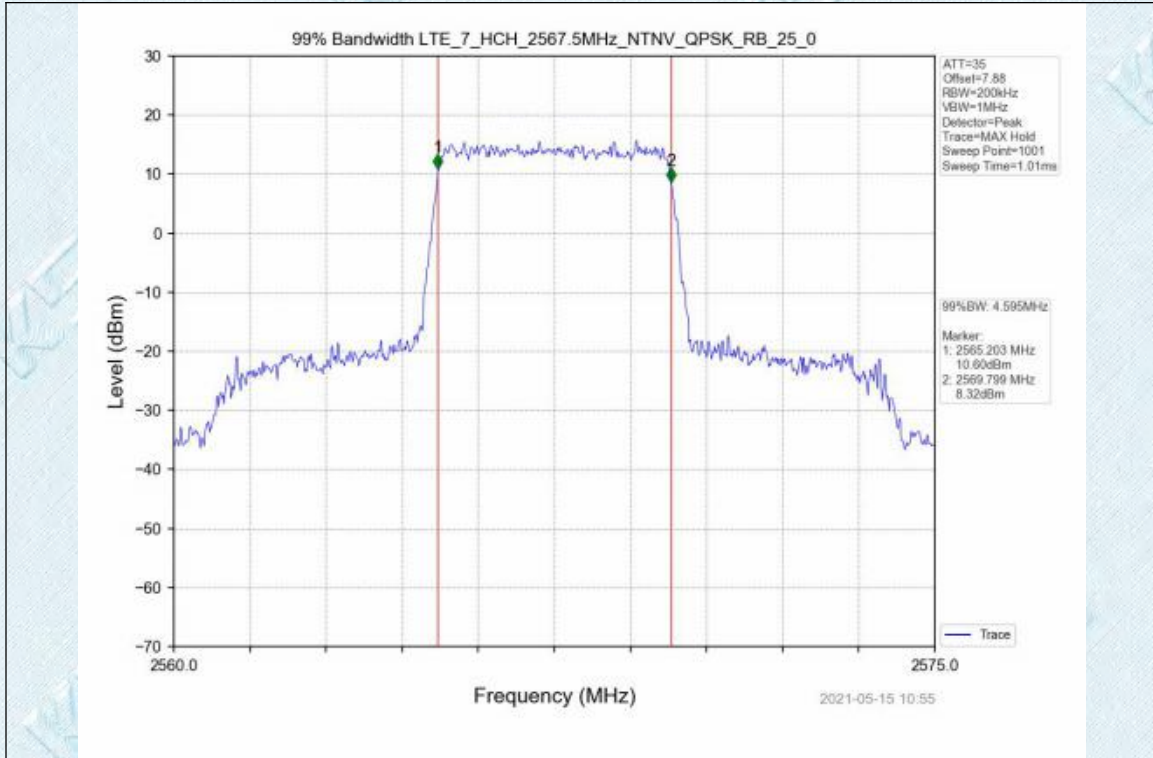
| Test Mode | RB Allocation | | 99% Occupied Bandwidth (MHz) | | | Limit | Verdict |
|-----------|---------------|--------|------------------------------|-------|-------|-------|---------|
| | Size | Offset | LCH | MCH | HCH | | |
| QPSK | 25 | 0 | 4.583 | 4.579 | 4.595 | N/A | PASS |
| 16QAM | 25 | 0 | 4.578 | 4.594 | 4.570 | N/A | PASS |

Test Graph



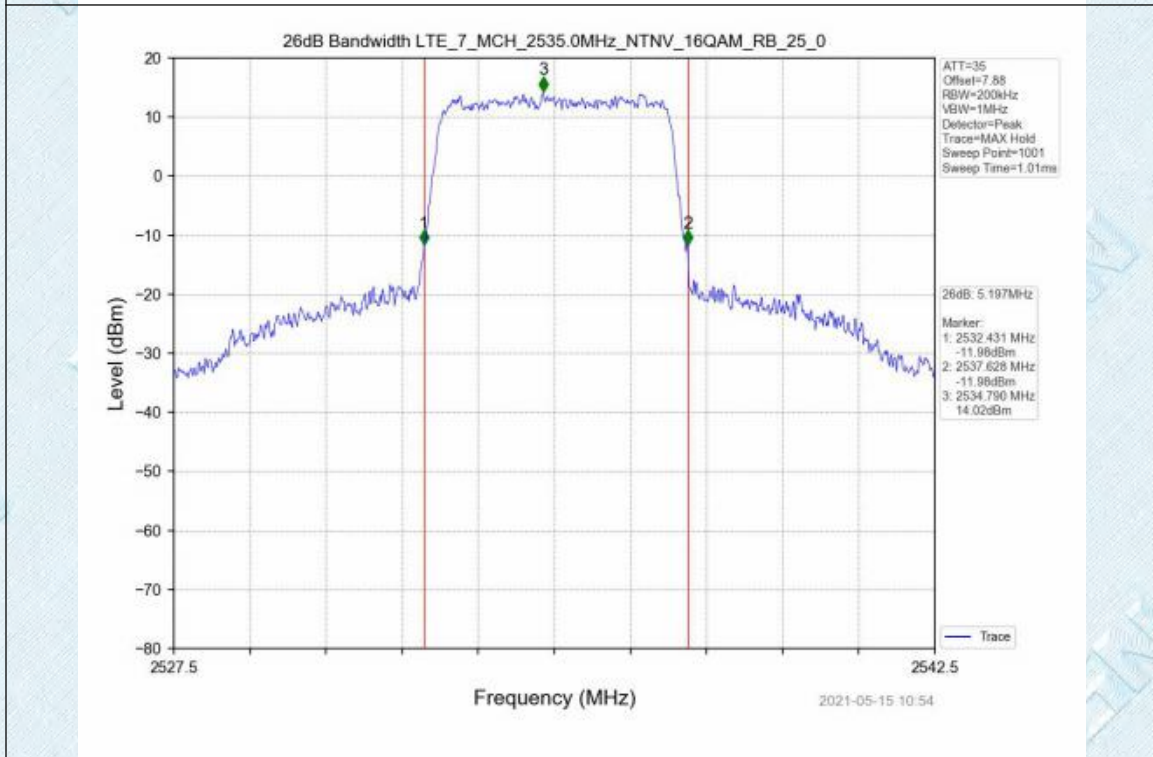
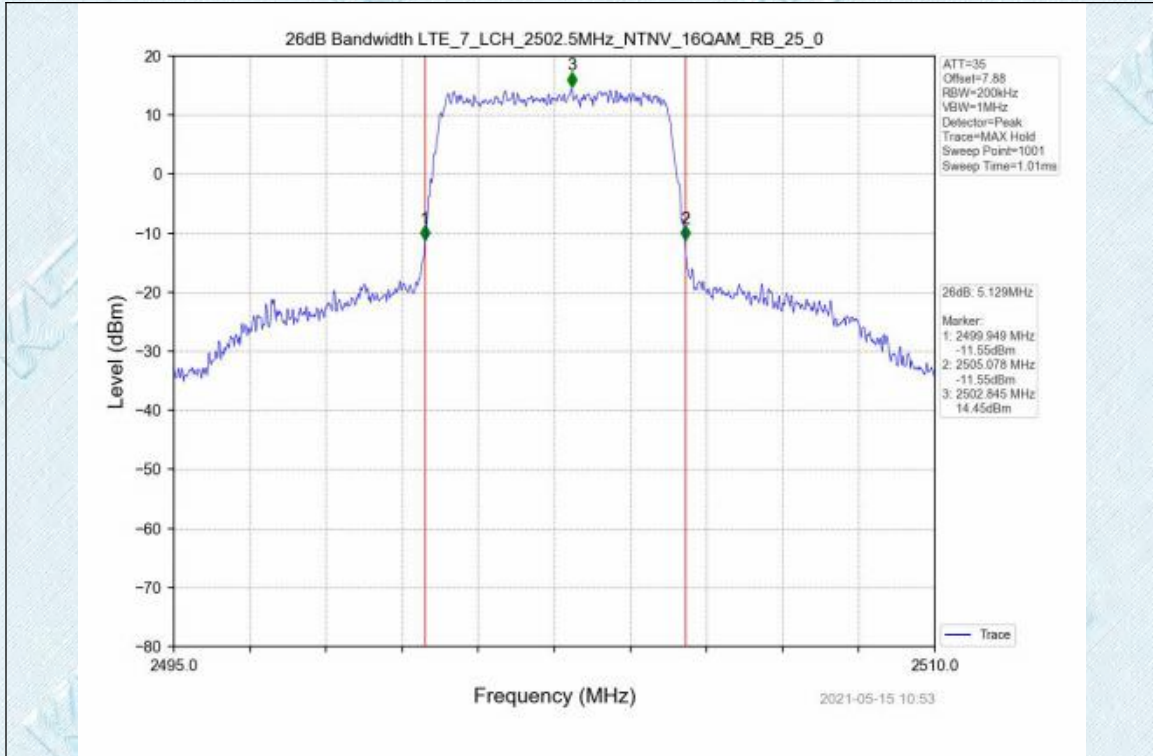


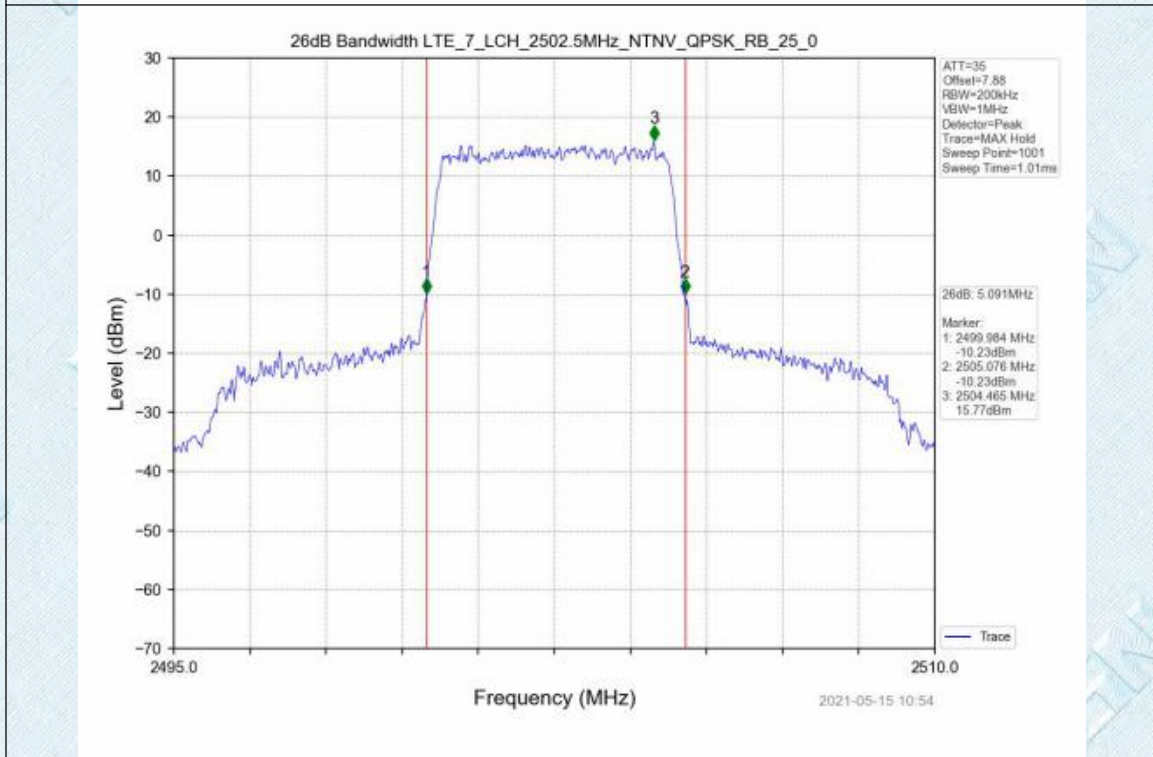
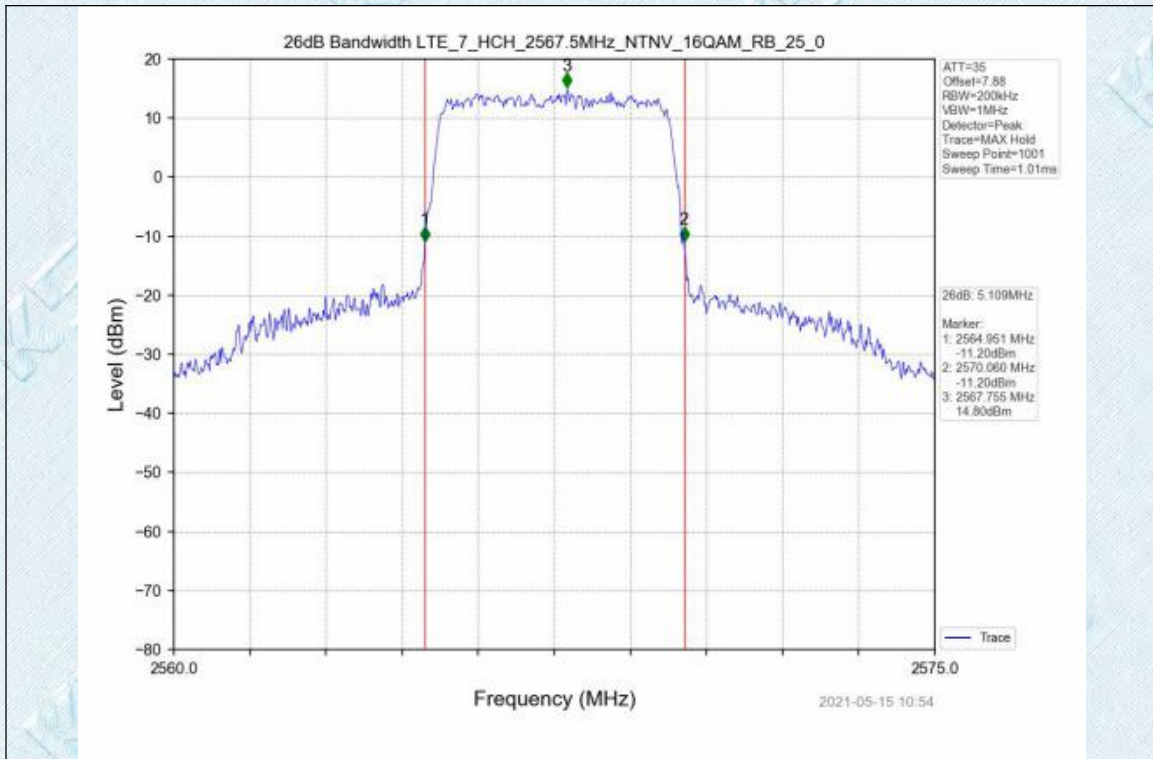


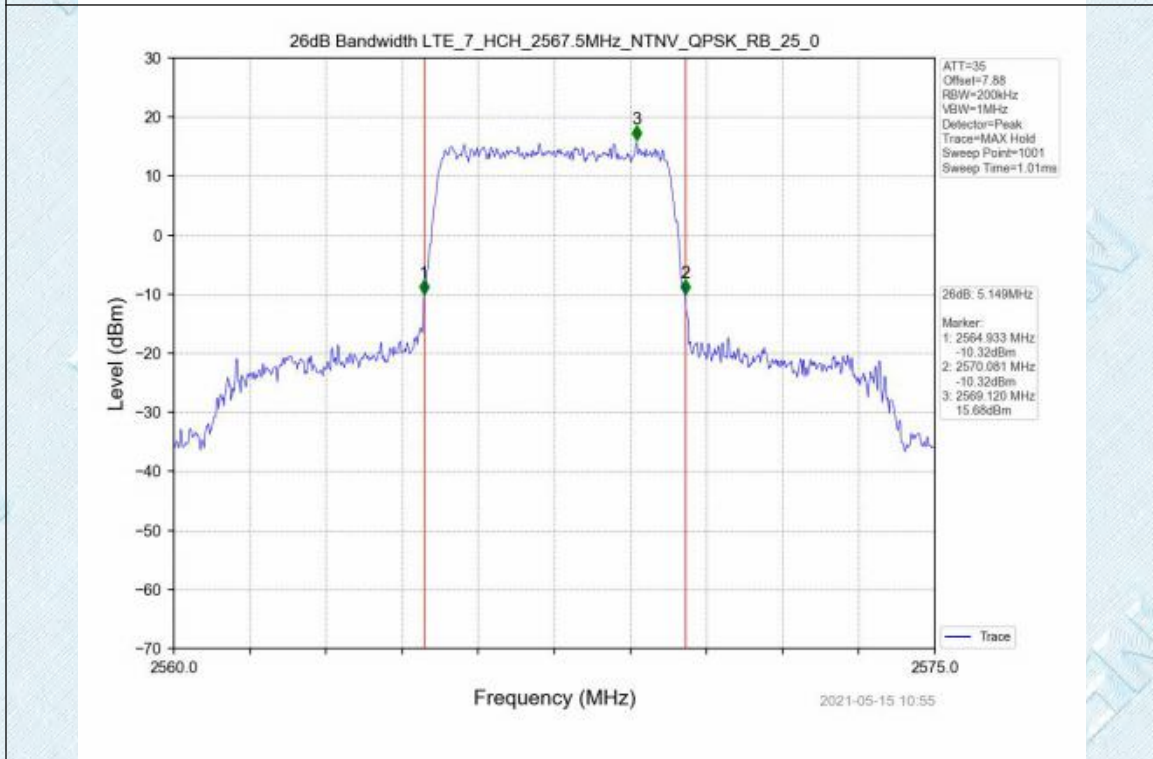
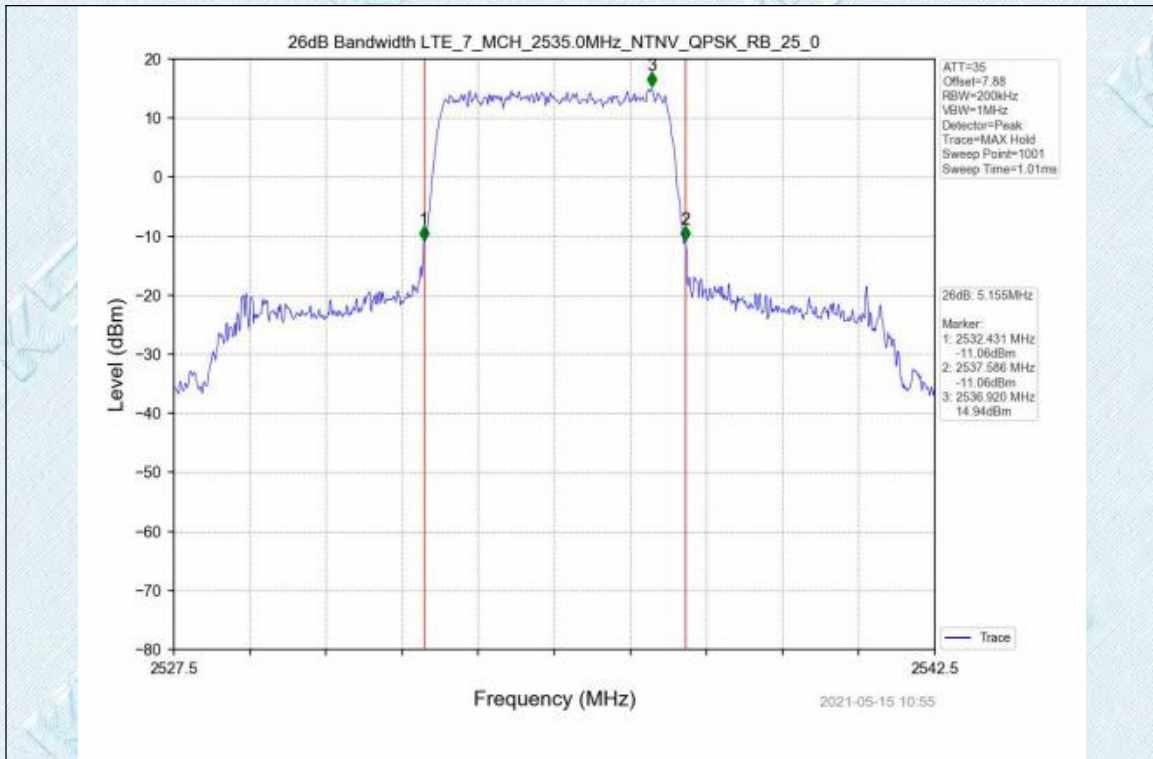


| Test Mode | Test Band: 7_5MHz Bandwidth | | | | | | Limit | Verdict |
|-----------|-----------------------------|--------|----------------------|-------|-------|-----|-------|---------|
| | RB Allocation | | 26dB Bandwidth (MHz) | | | | | |
| | Size | Offset | LCH | MCH | HCH | | | |
| QPSK | 25 | 0 | 5.091 | 5.155 | 5.149 | N/A | PASS | |
| 16QAM | 25 | 0 | 5.129 | 5.197 | 5.109 | N/A | PASS | |

Test Graph

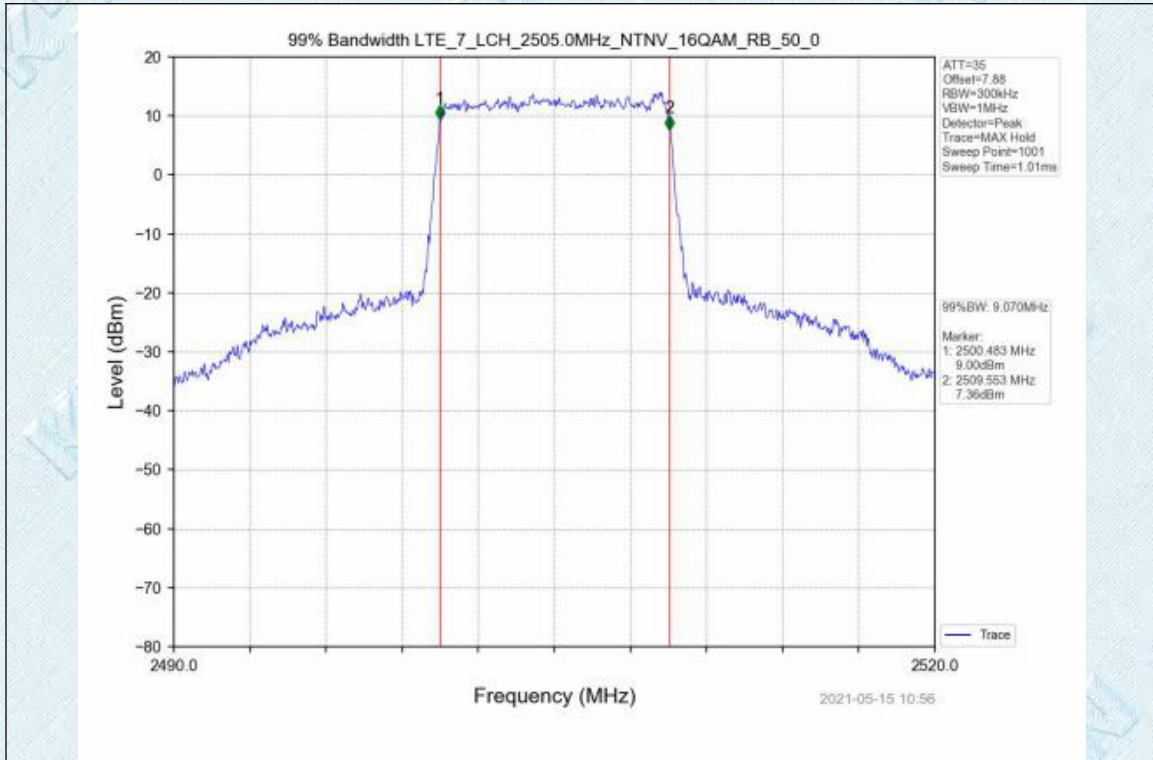


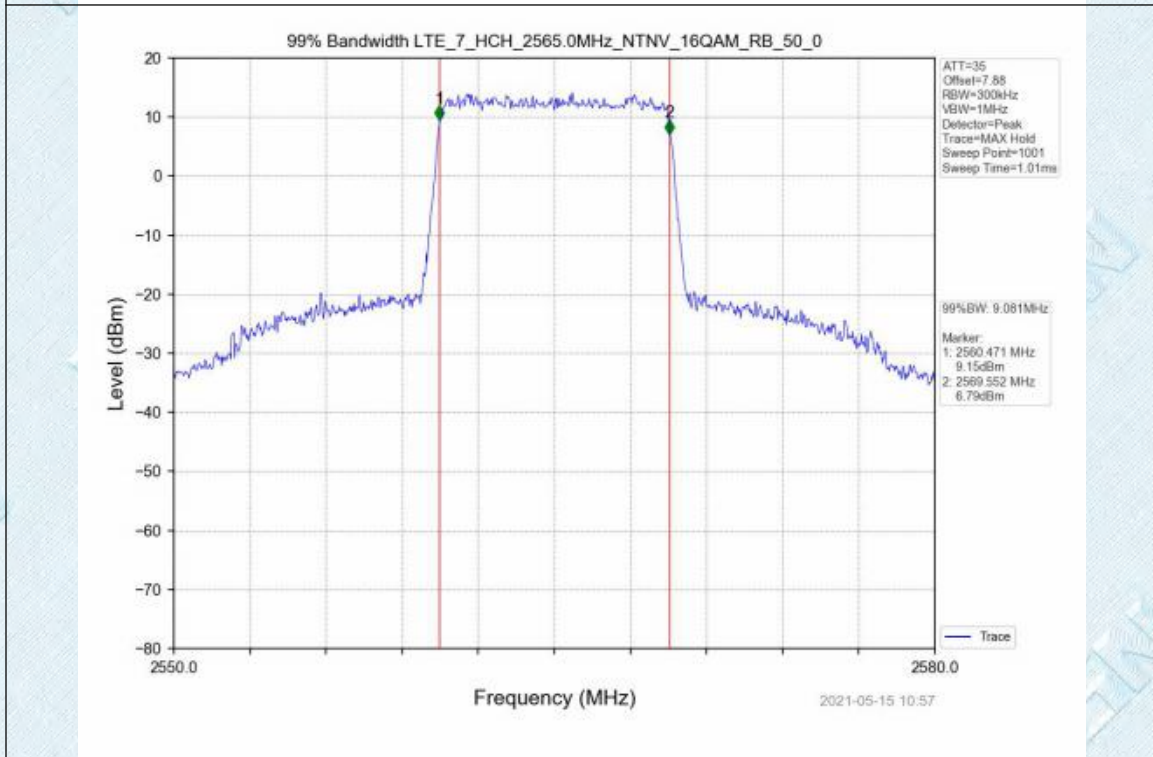
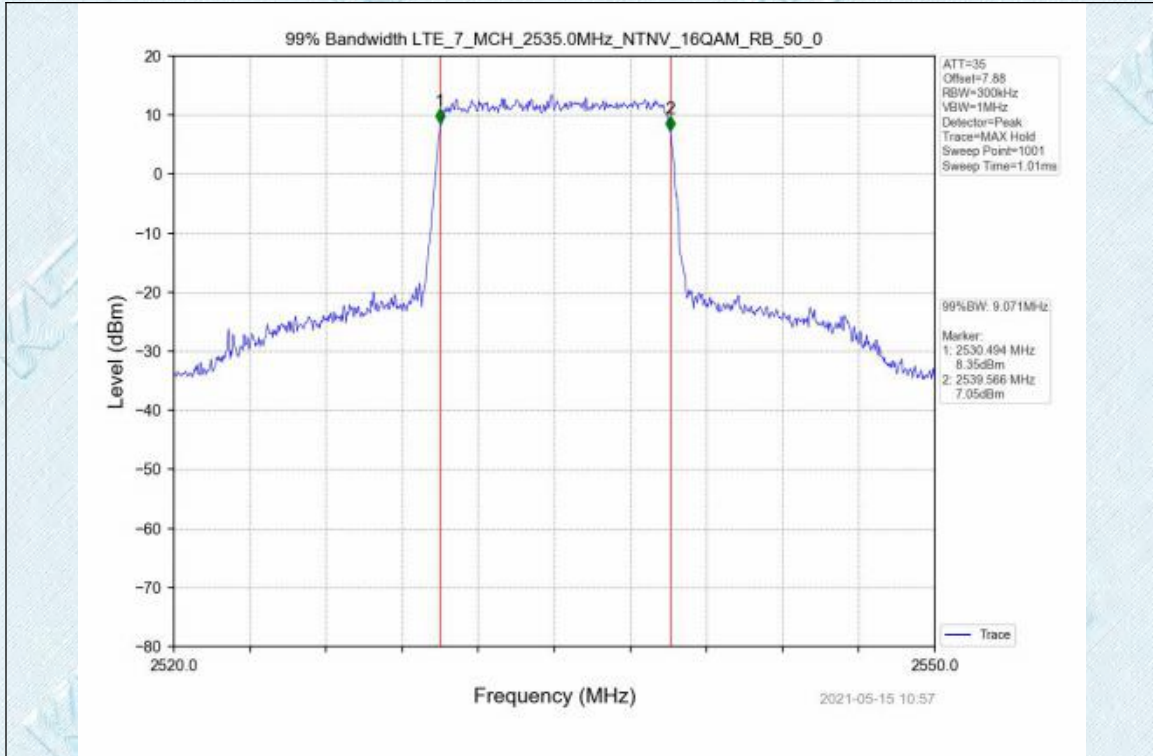


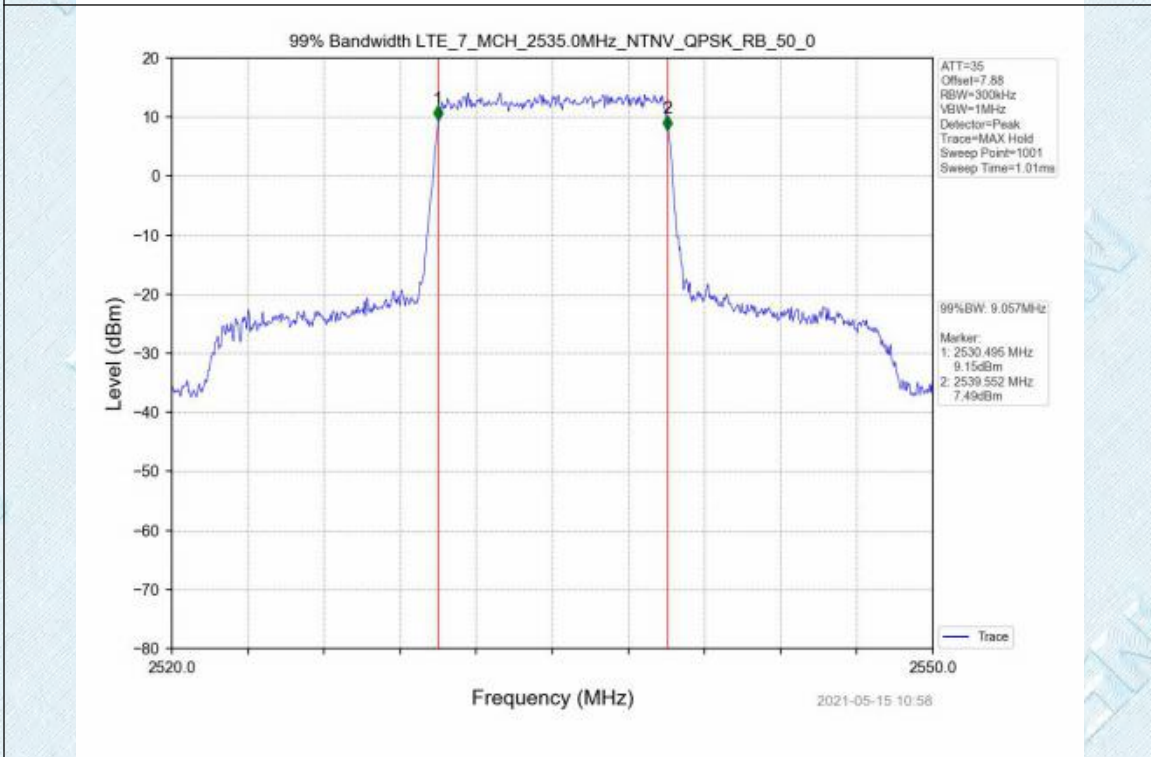
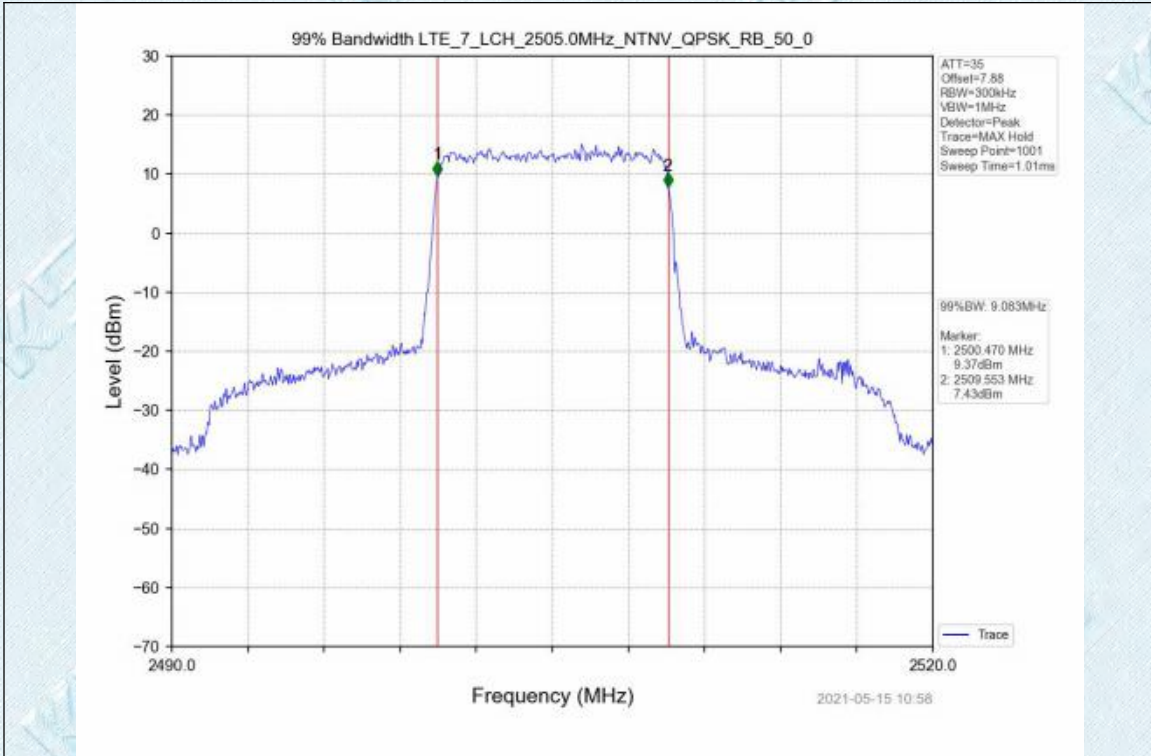


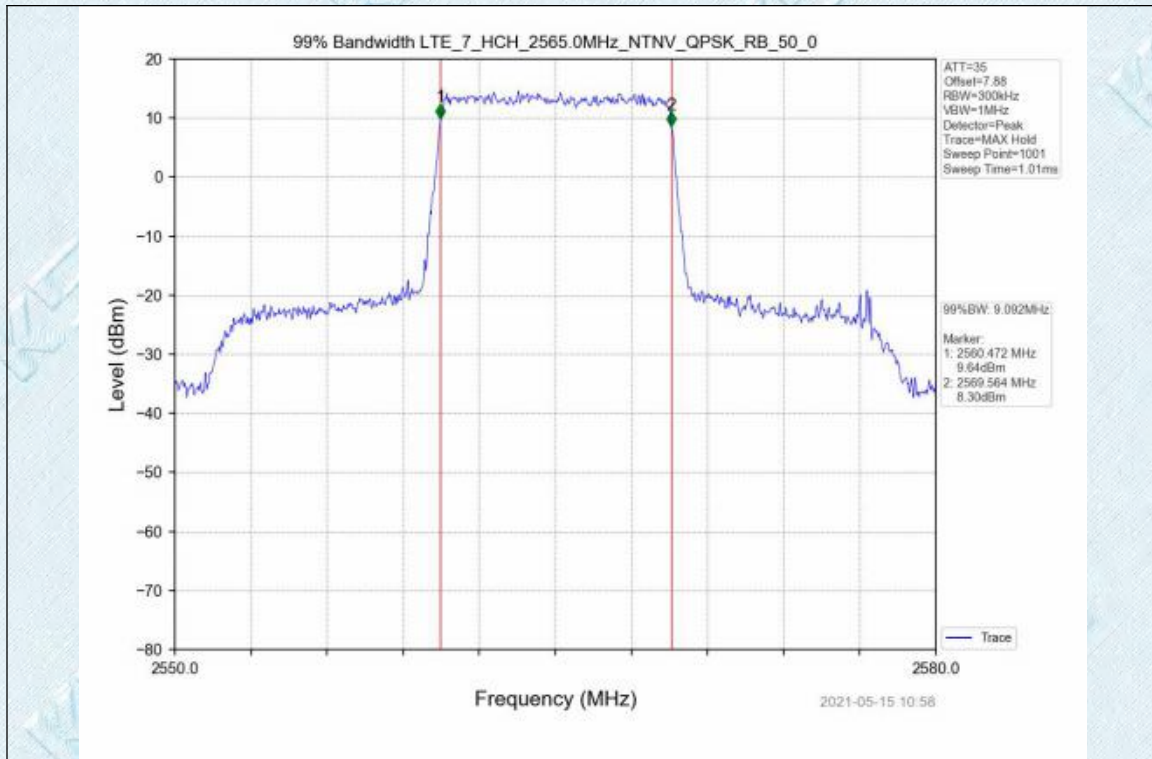
| Test Band: 7 10MHz Bandwidth | | | | | | | |
|------------------------------|---------------|--------|------------------------------|-------|-------|-------|---------|
| Test Mode | RB Allocation | | 99% Occupied Bandwidth (MHz) | | | Limit | Verdict |
| | Size | Offset | LCH | MCH | HCH | | |
| QPSK | 50 | 0 | 9.083 | 9.057 | 9.092 | N/A | PASS |
| 16QAM | 50 | 0 | 9.070 | 9.071 | 9.081 | N/A | PASS |

Test Graph



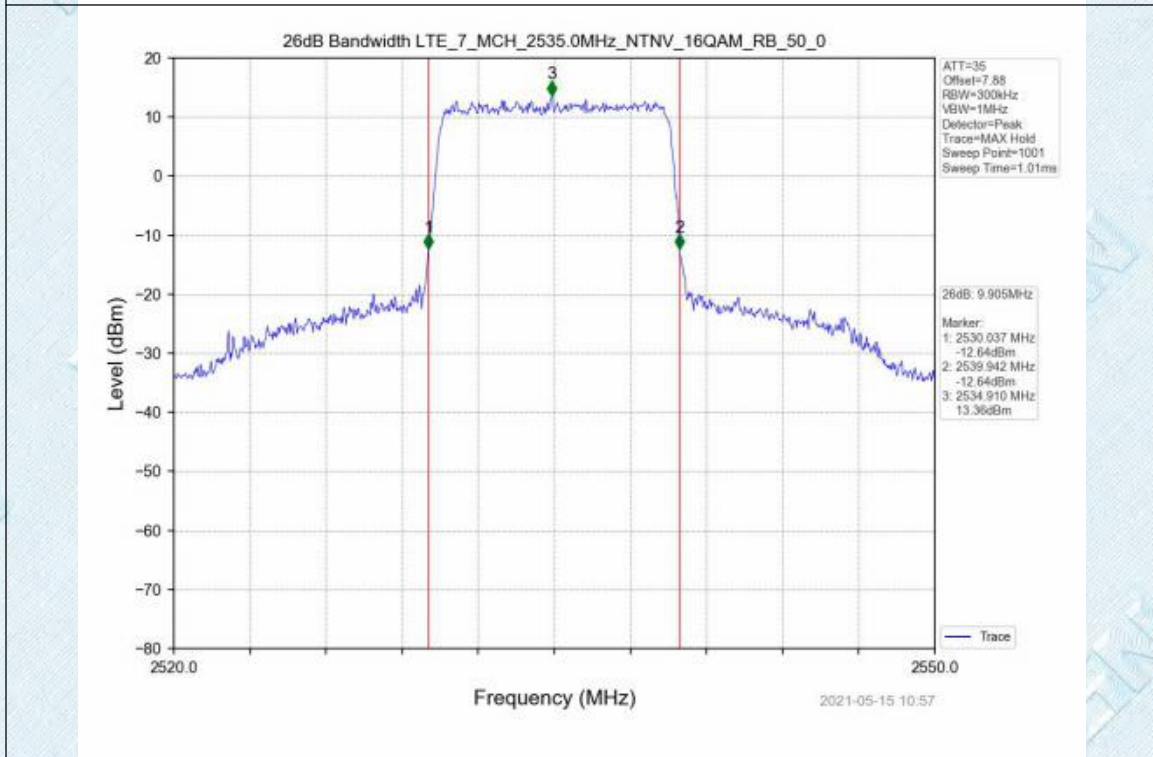
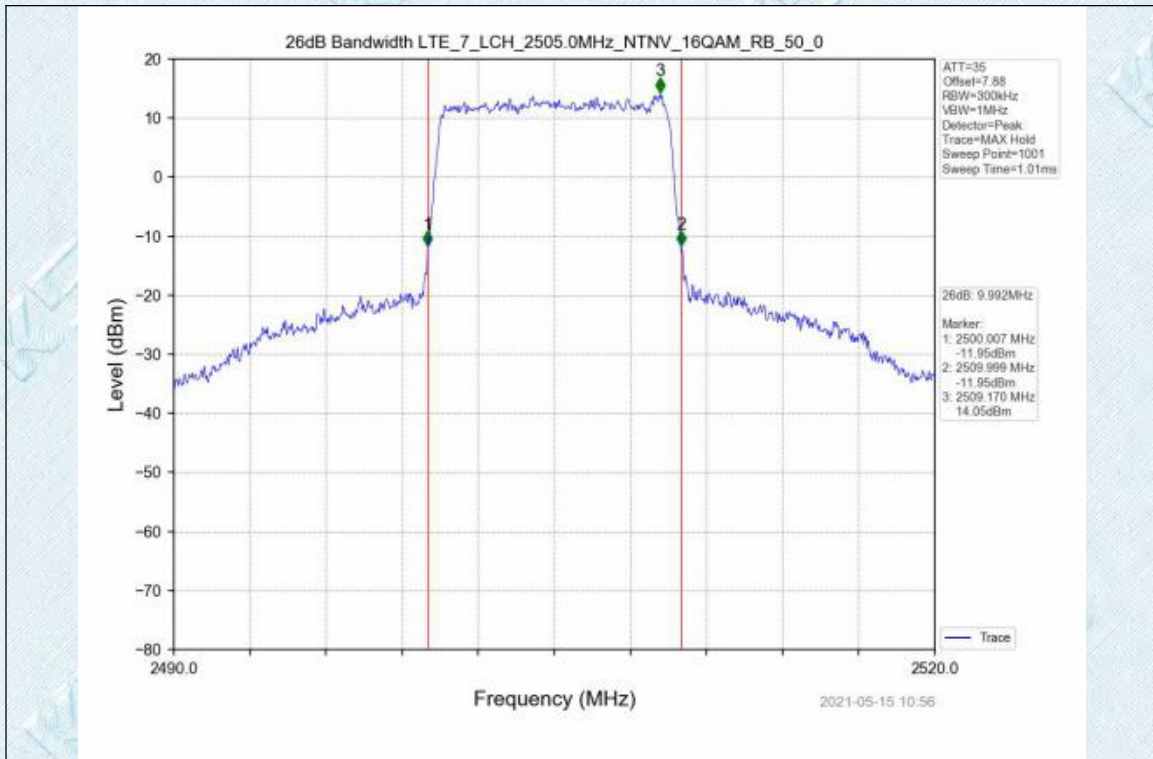


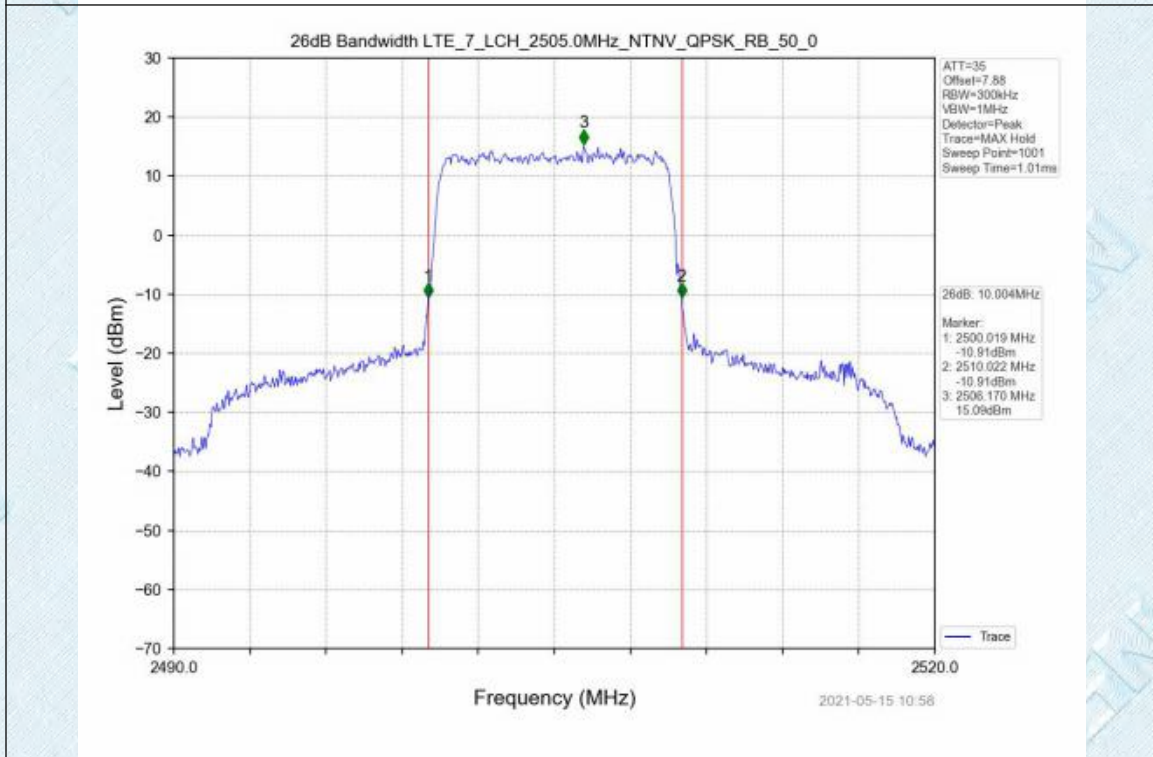
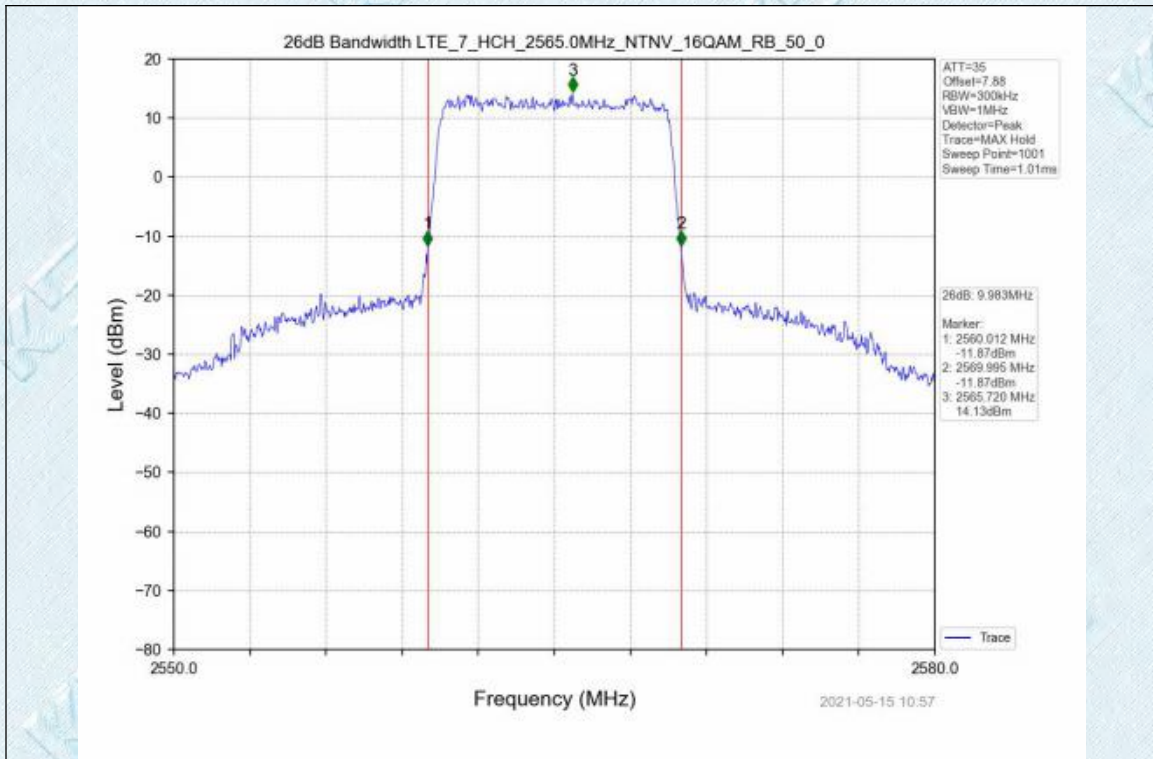


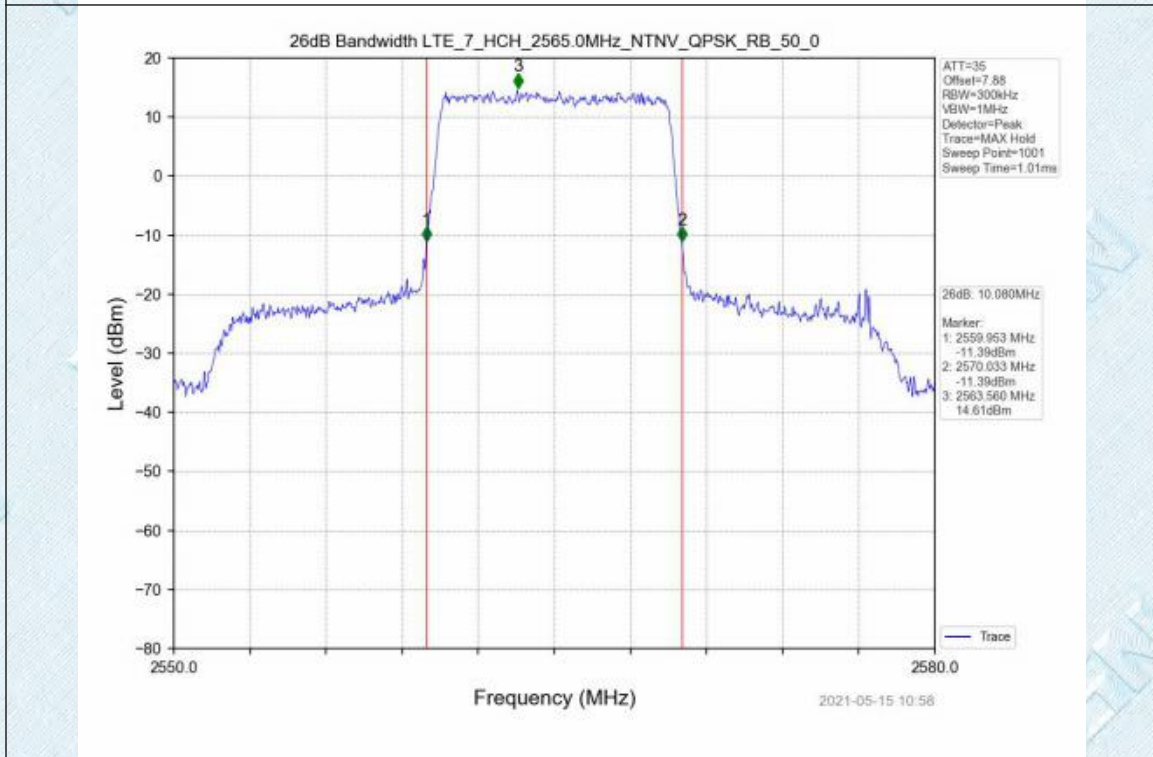
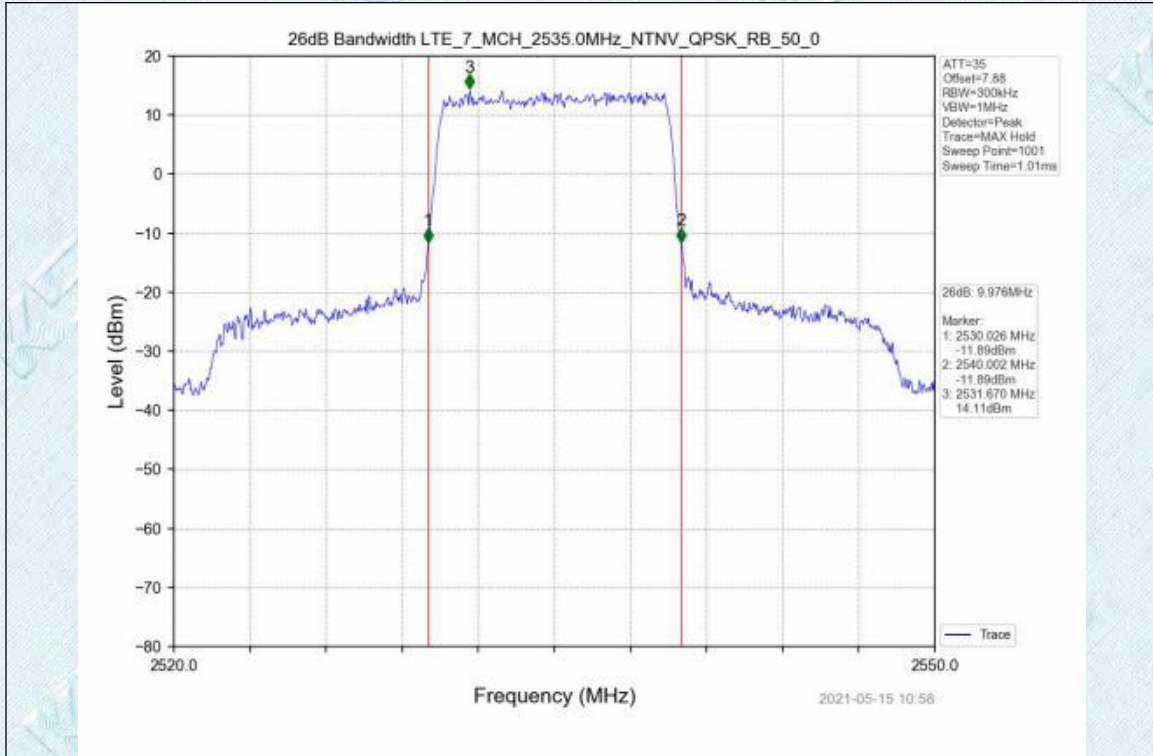


| Test Mode | Test Band: 7 _ 10MHz Bandwidth | | | | | | Limit | Verdict |
|-----------|--------------------------------|--------|----------------------|-------|--------|-----|-------|---------|
| | RB Allocation | | 26dB Bandwidth (MHz) | | | | | |
| | Size | Offset | LCH | MCH | HCH | | | |
| QPSK | 50 | 0 | 10.004 | 9.976 | 10.080 | N/A | PASS | |
| 16QAM | 50 | 0 | 9.992 | 9.905 | 9.983 | N/A | PASS | |

Test Graph

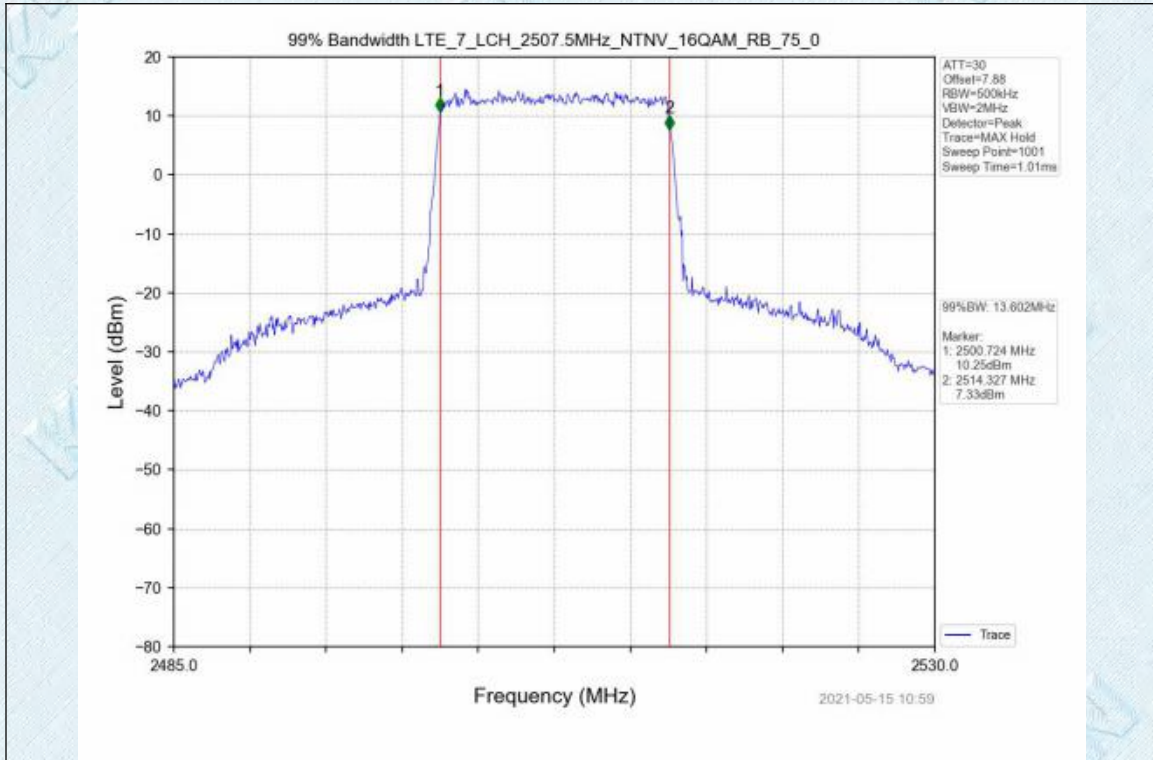


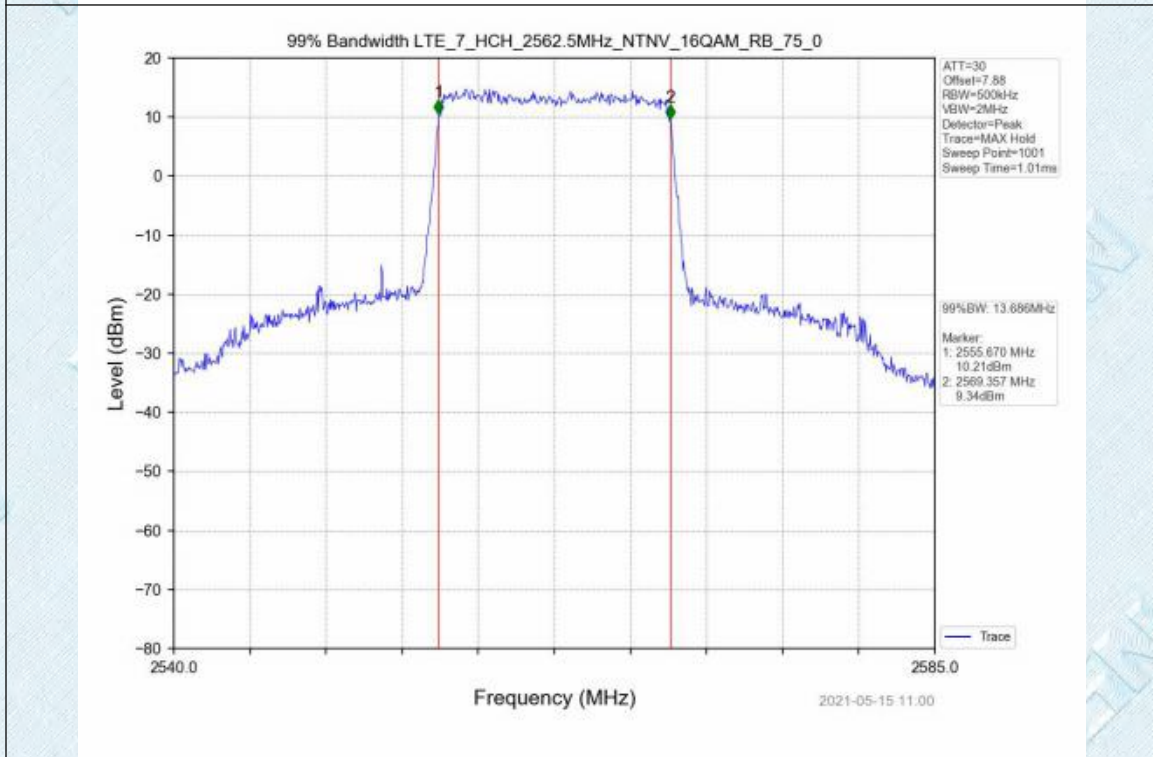
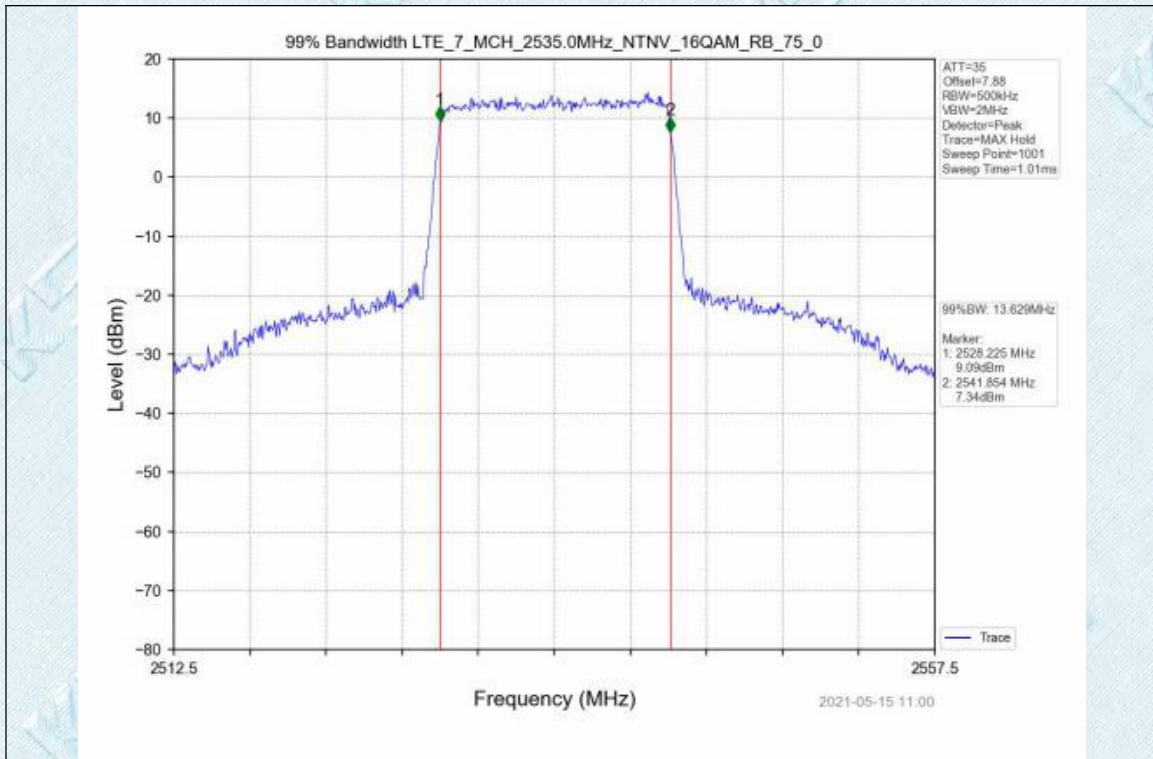


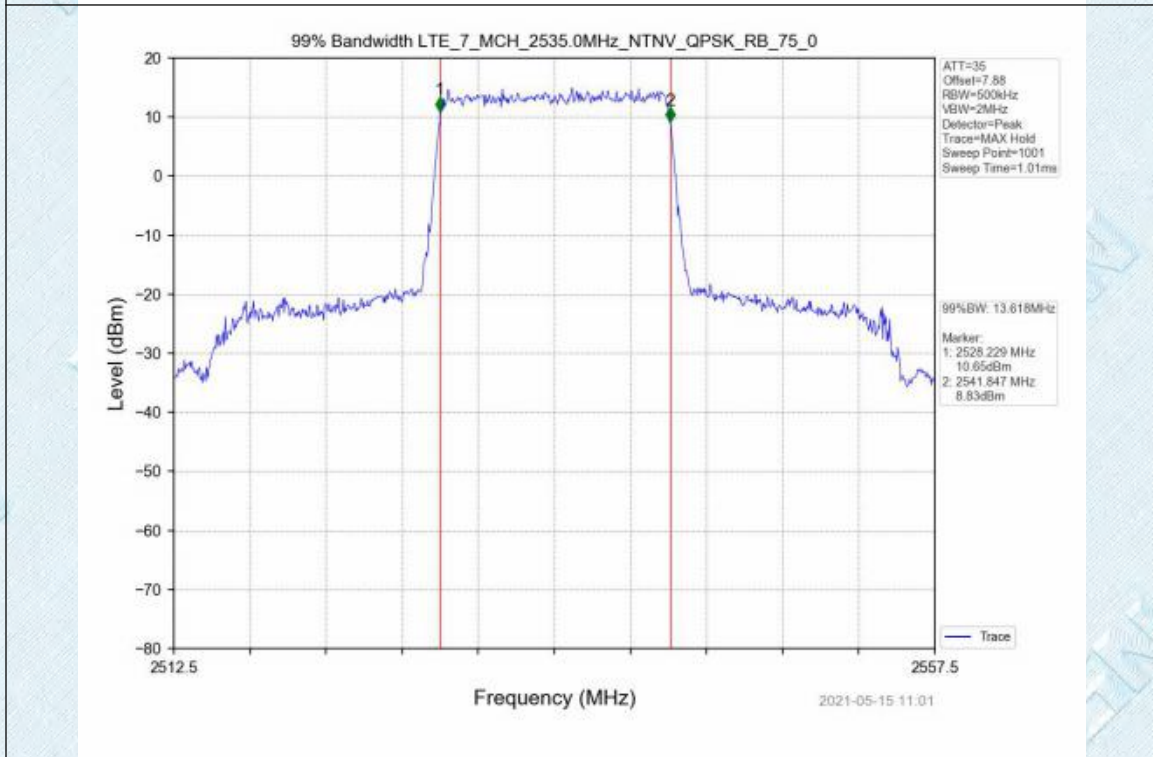
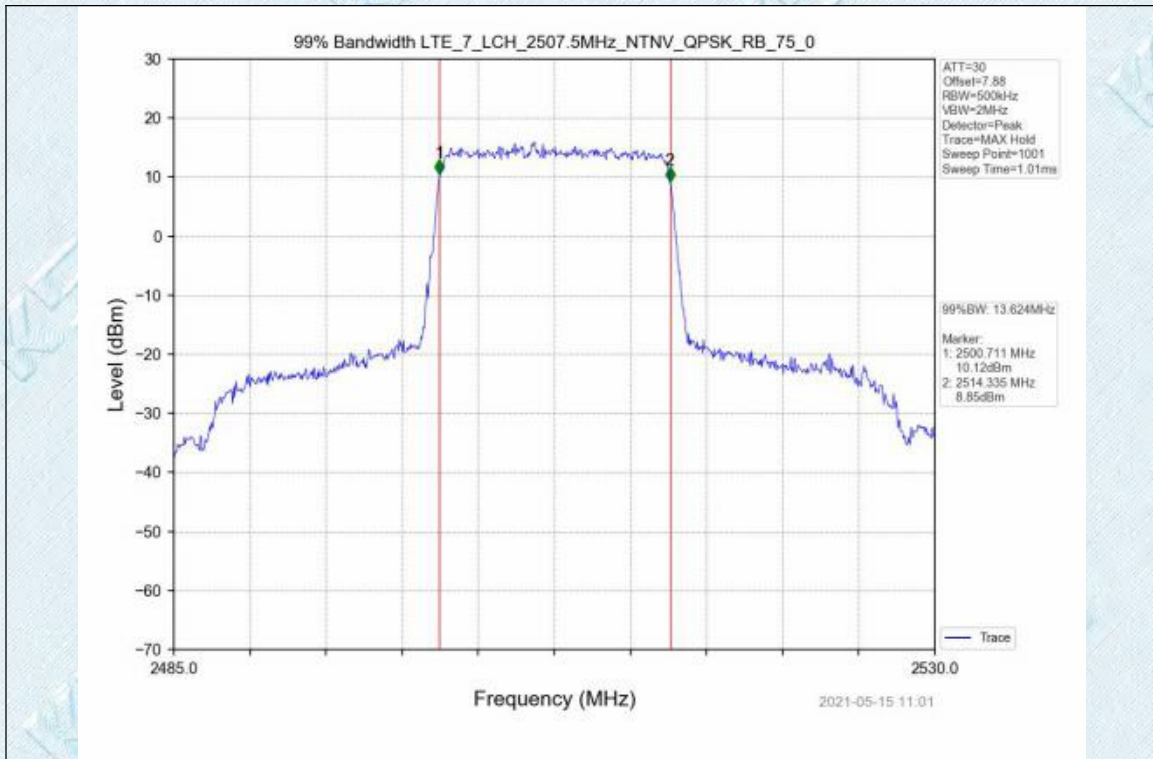


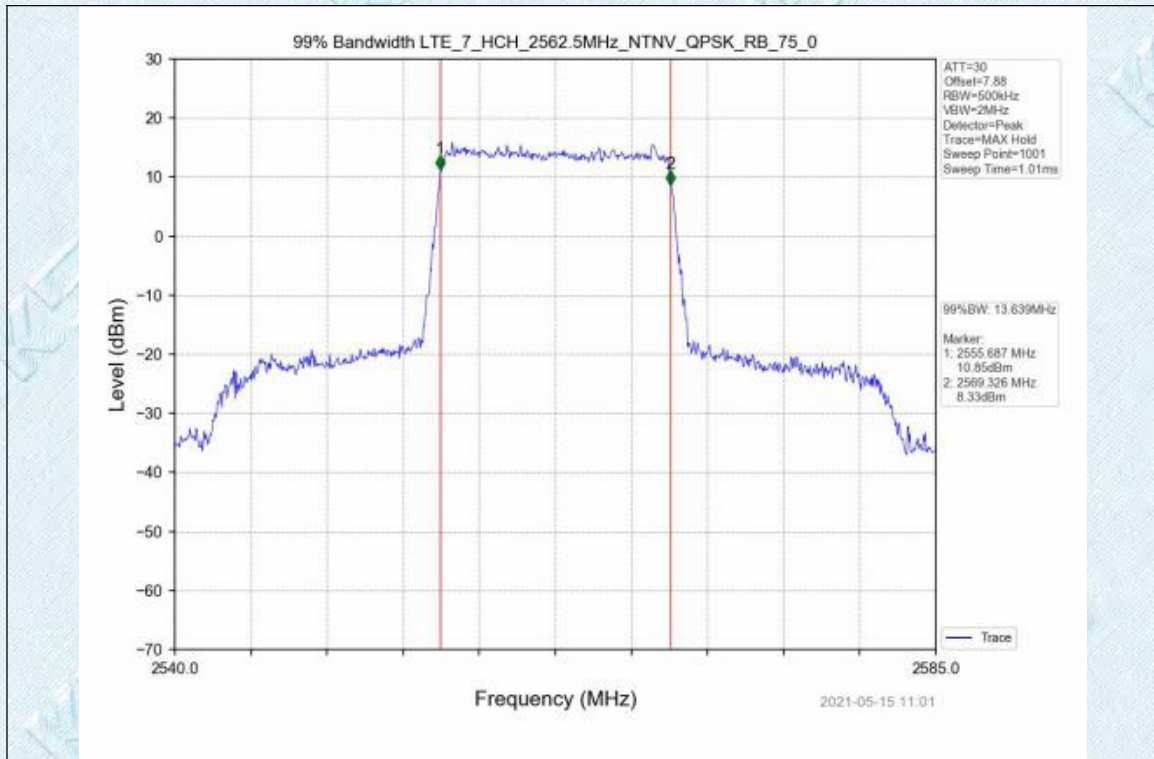
| Test Band: 7 15MHz Bandwidth | | | | | | | |
|------------------------------|---------------|--------|------------------------------|--------|--------|-------|---------|
| Test Mode | RB Allocation | | 99% Occupied Bandwidth (MHz) | | | Limit | Verdict |
| | Size | Offset | LCH | MCH | HCH | | |
| QPSK | 75 | 0 | 13.624 | 13.618 | 13.639 | N/A | PASS |
| 16QAM | 75 | 0 | 13.602 | 13.629 | 13.686 | N/A | PASS |

Test Graph



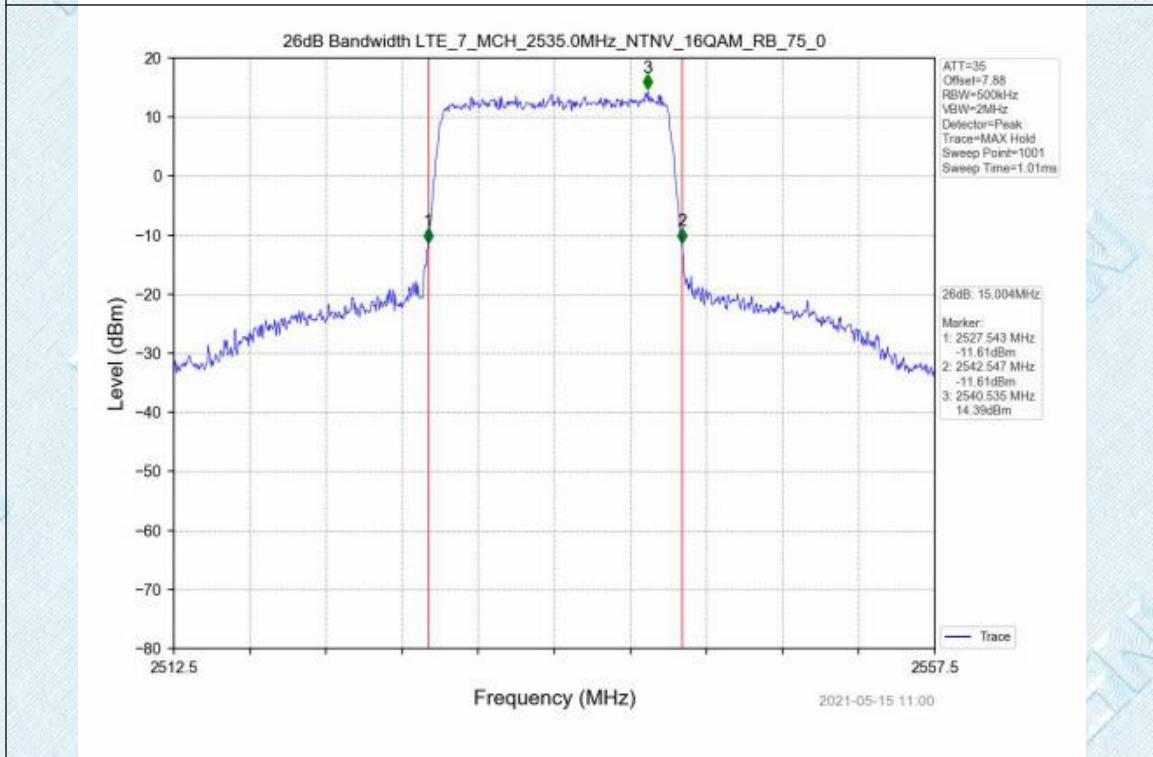
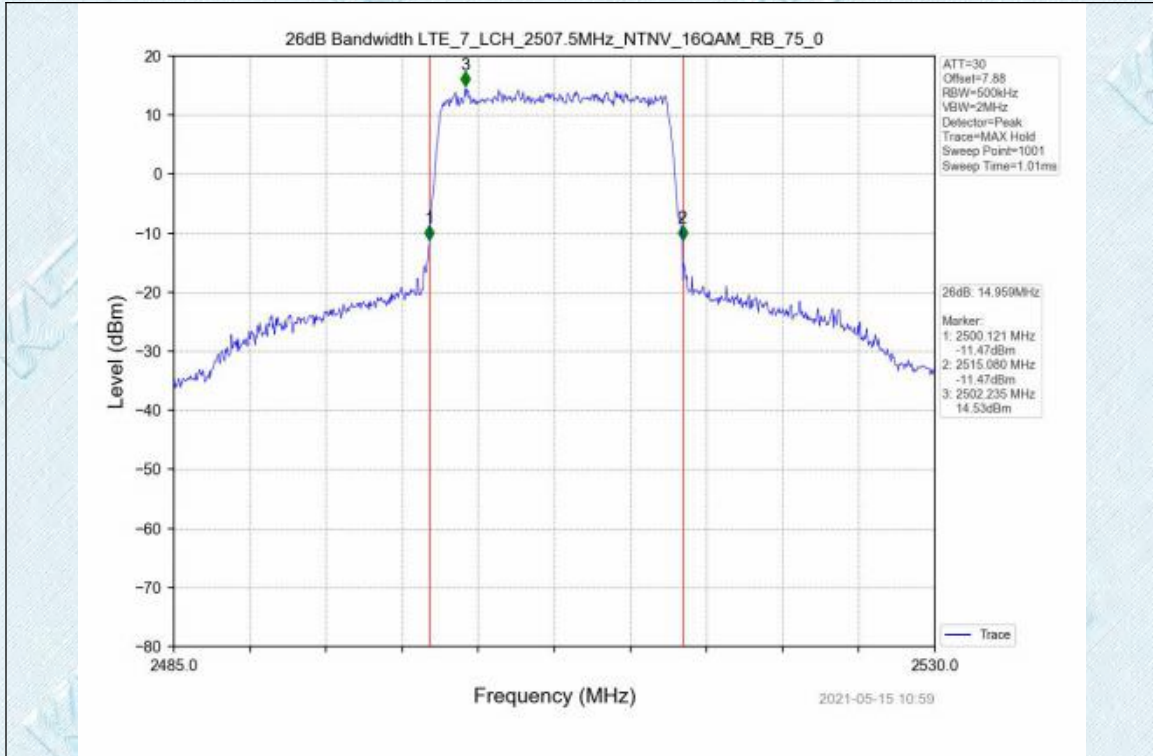


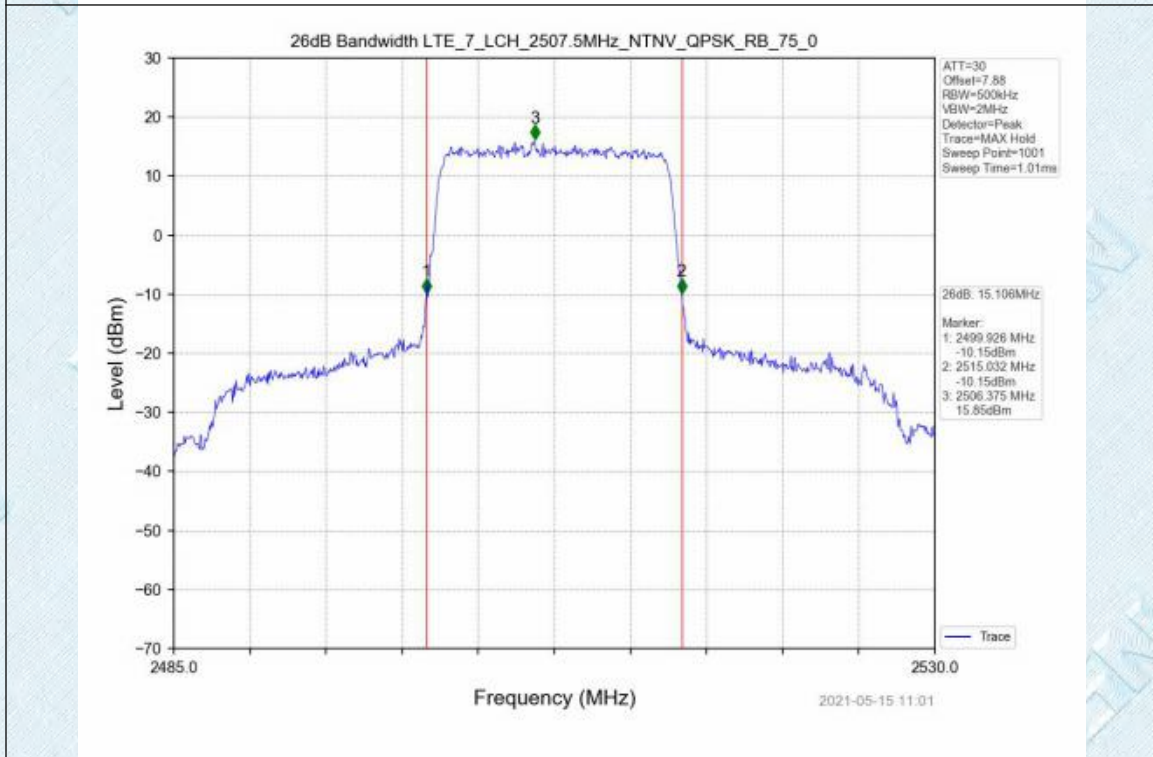
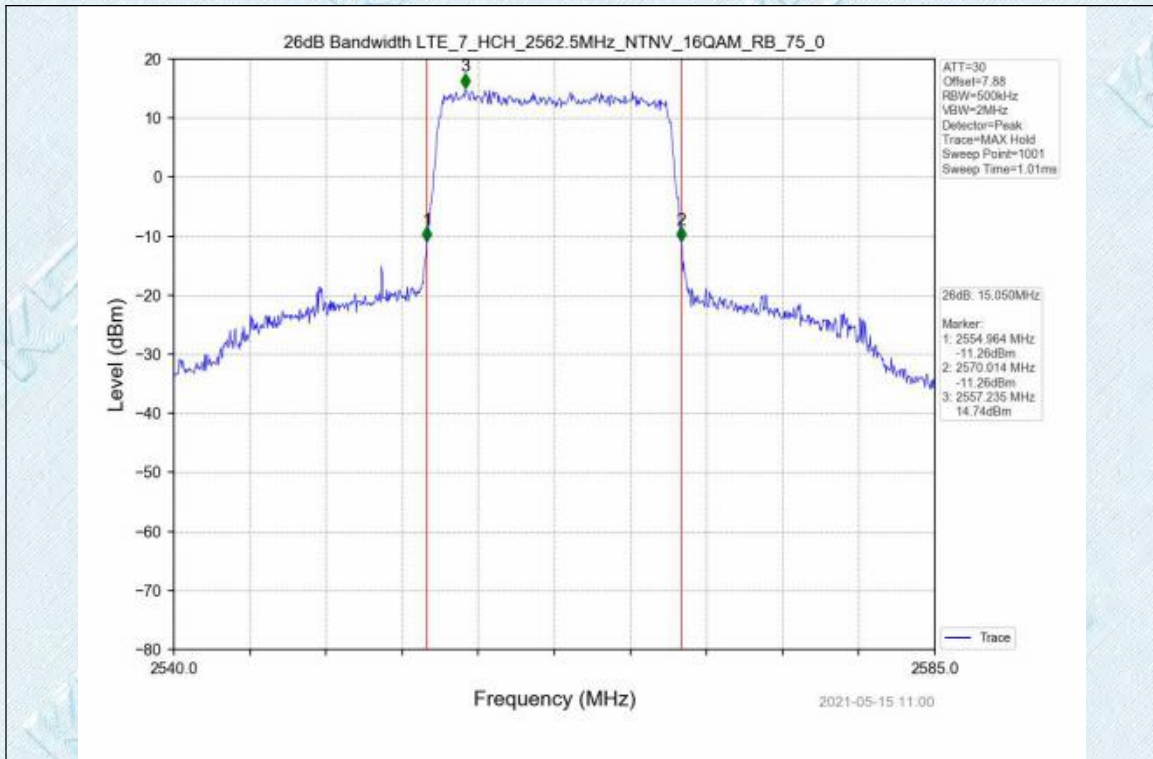


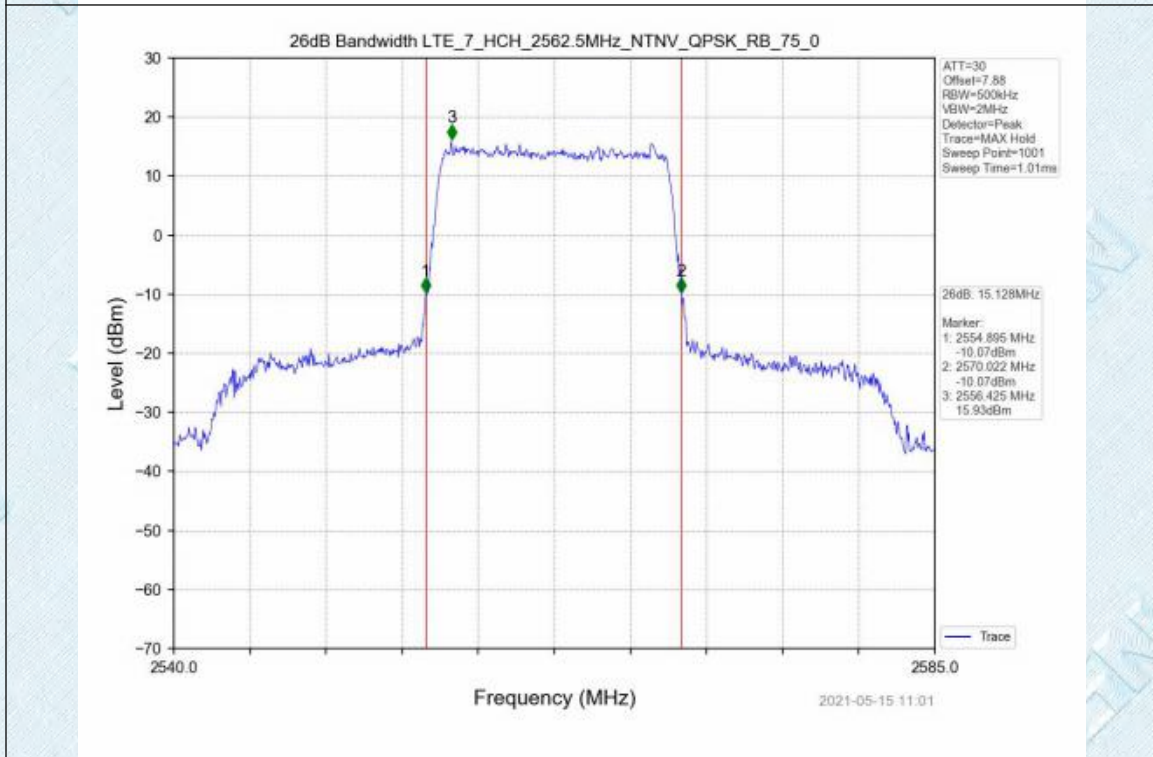
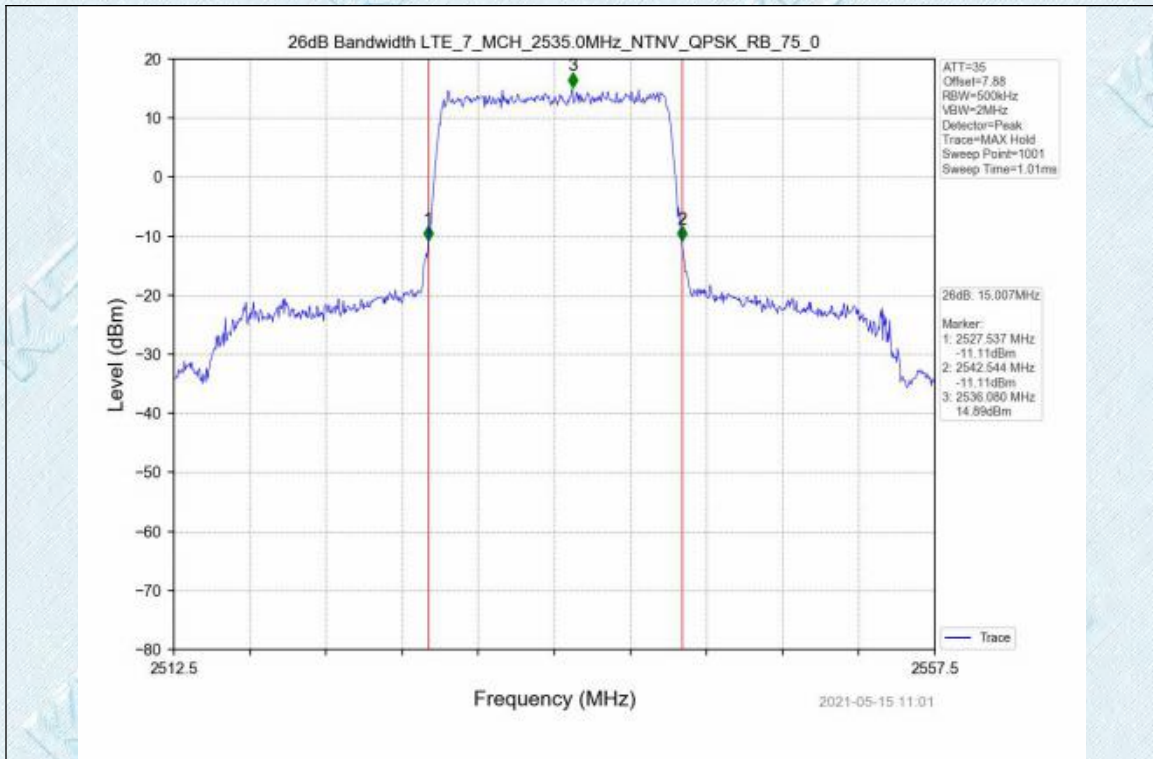


| Test Mode | Test Band: 7 15MHz Bandwidth | | | | | | Limit | Verdict |
|-----------|------------------------------|--------|----------------------|--------|--------|-----|-------|---------|
| | RB Allocation | | 26dB Bandwidth (MHz) | | | | | |
| | Size | Offset | LCH | MCH | HCH | | | |
| QPSK | 75 | 0 | 15.106 | 15.007 | 15.128 | N/A | PASS | |
| 16QAM | 75 | 0 | 14.959 | 15.004 | 15.050 | N/A | PASS | |

Test Graph

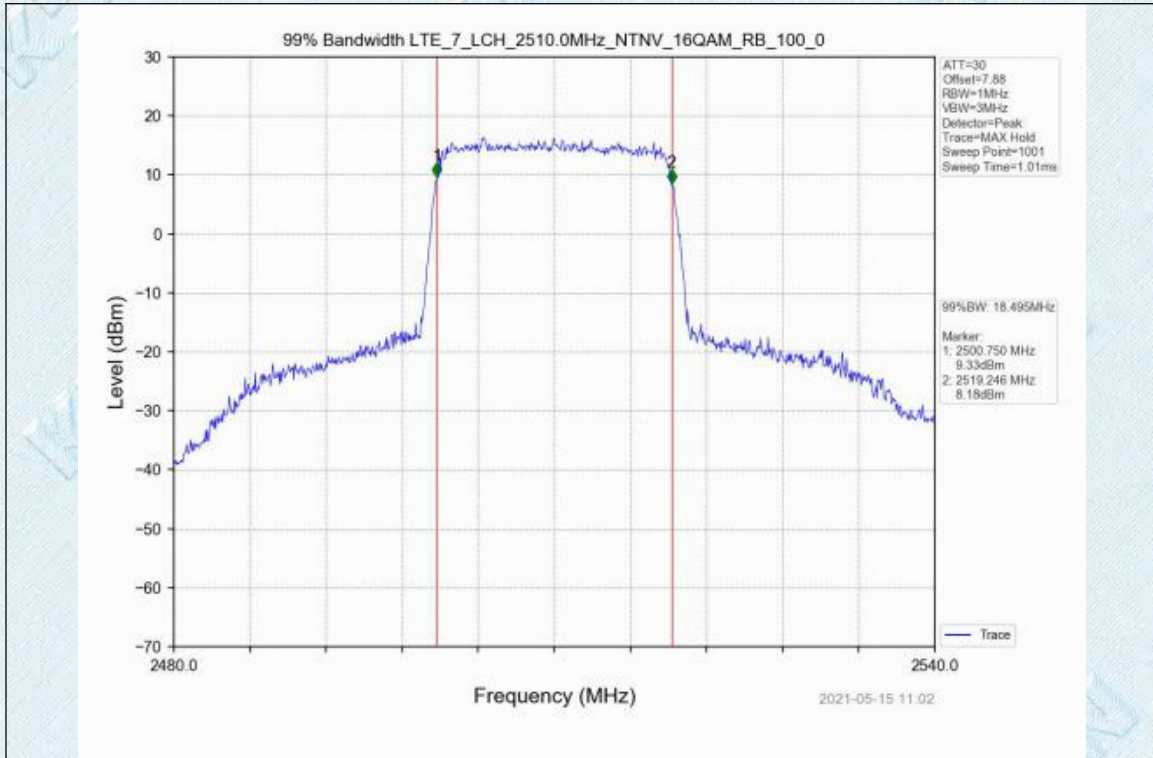


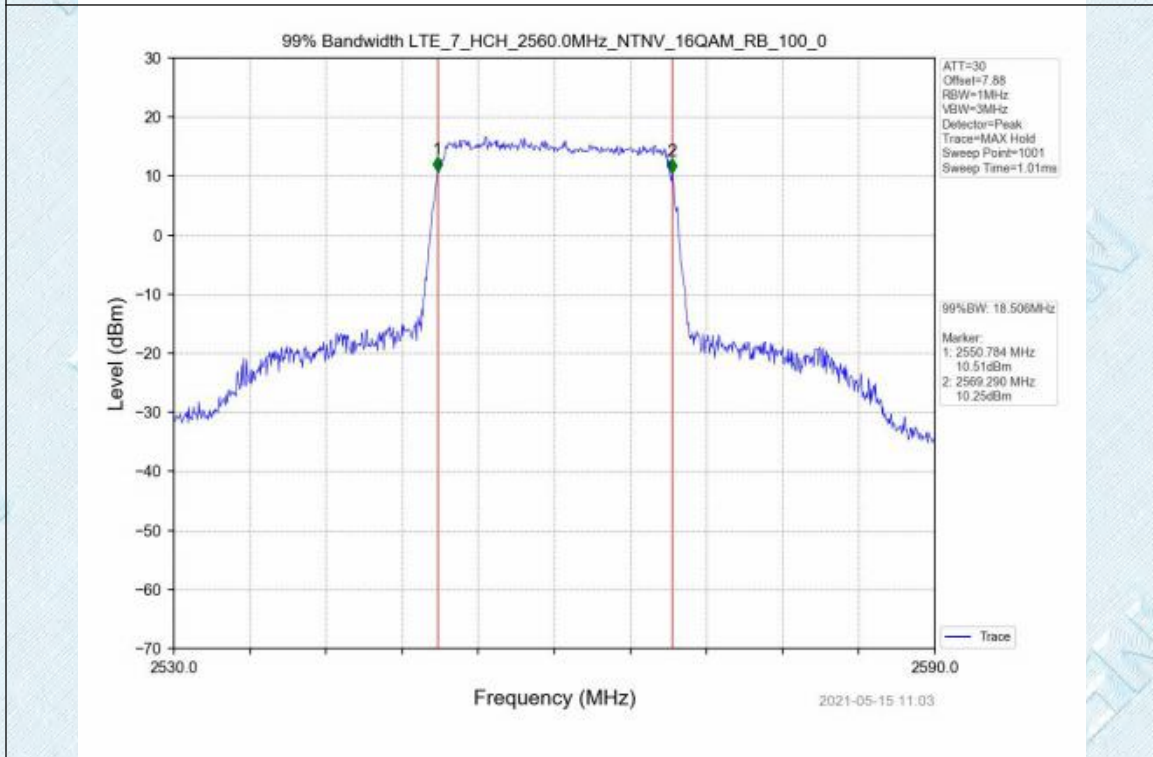
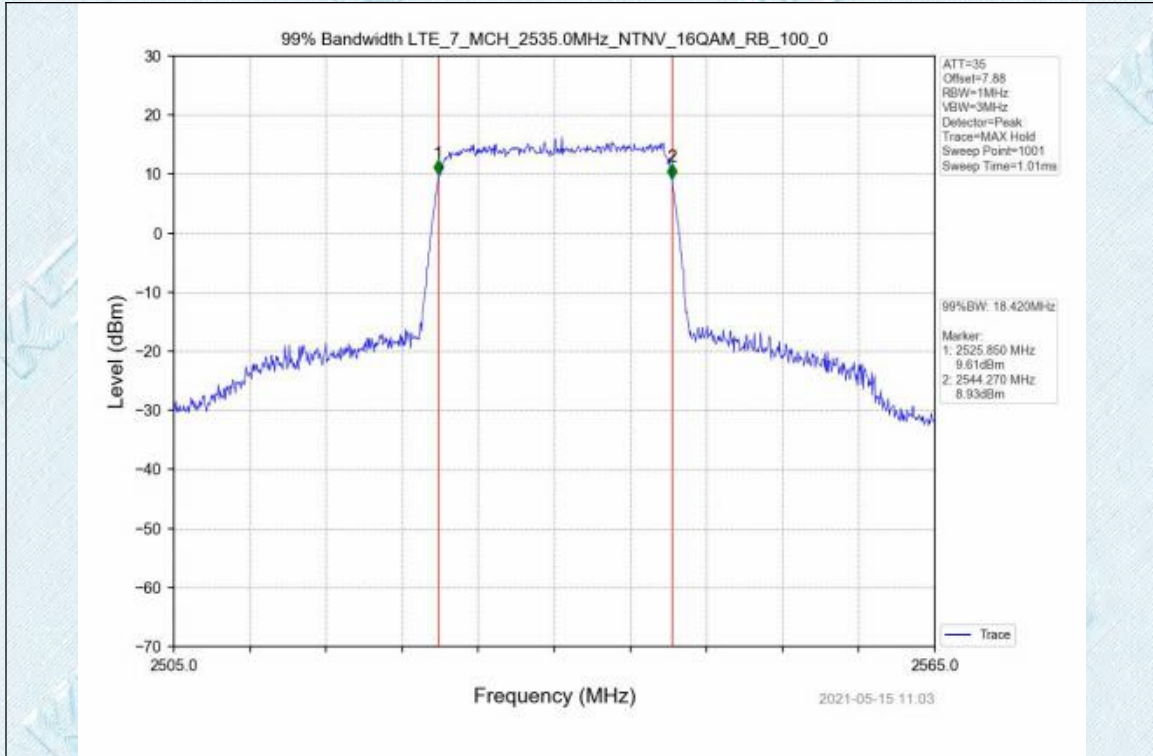


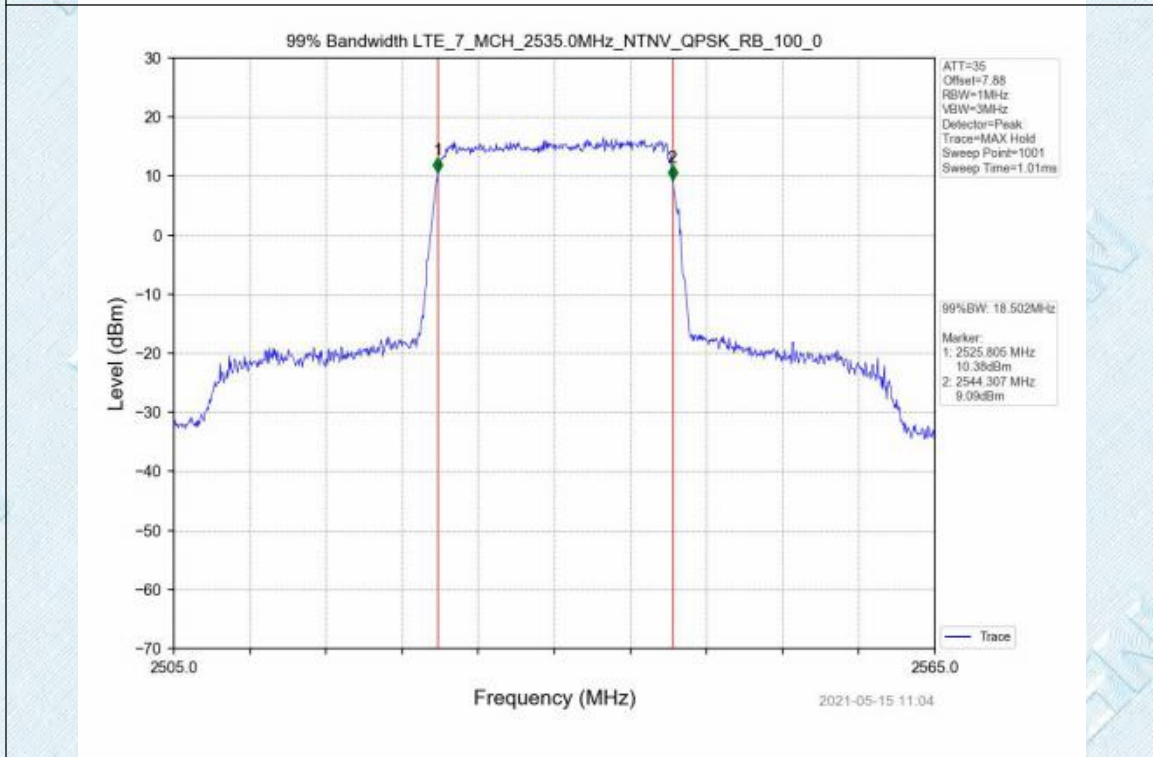
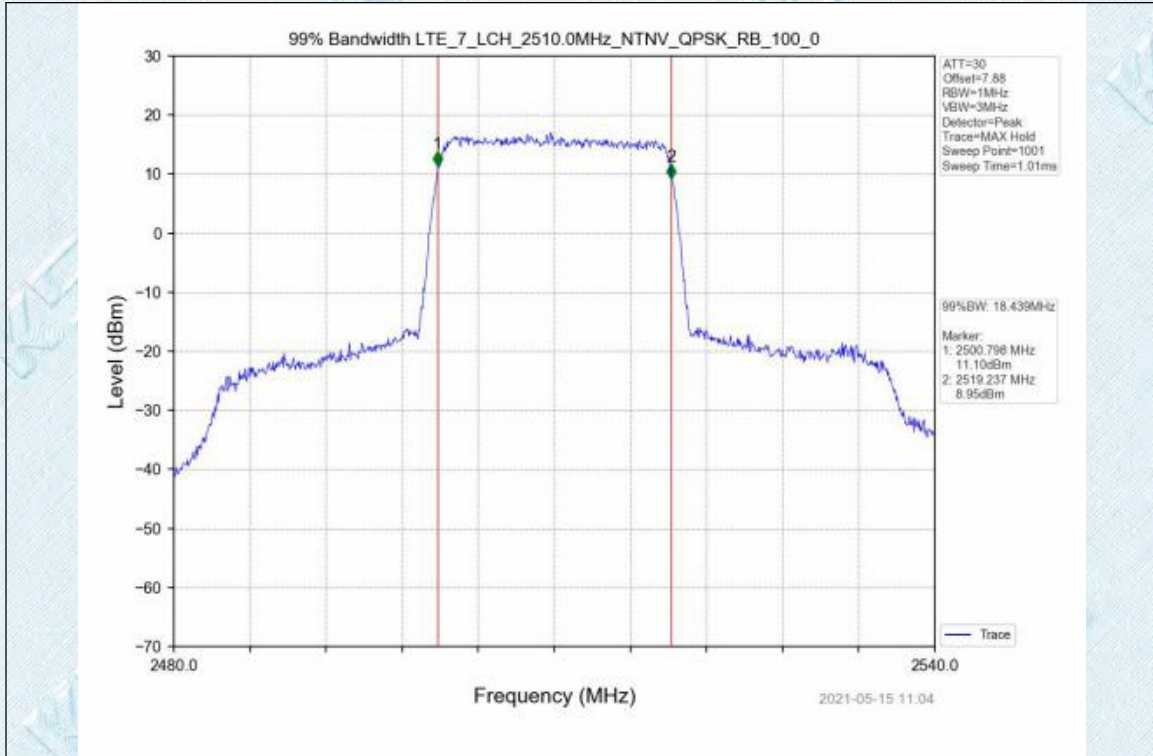


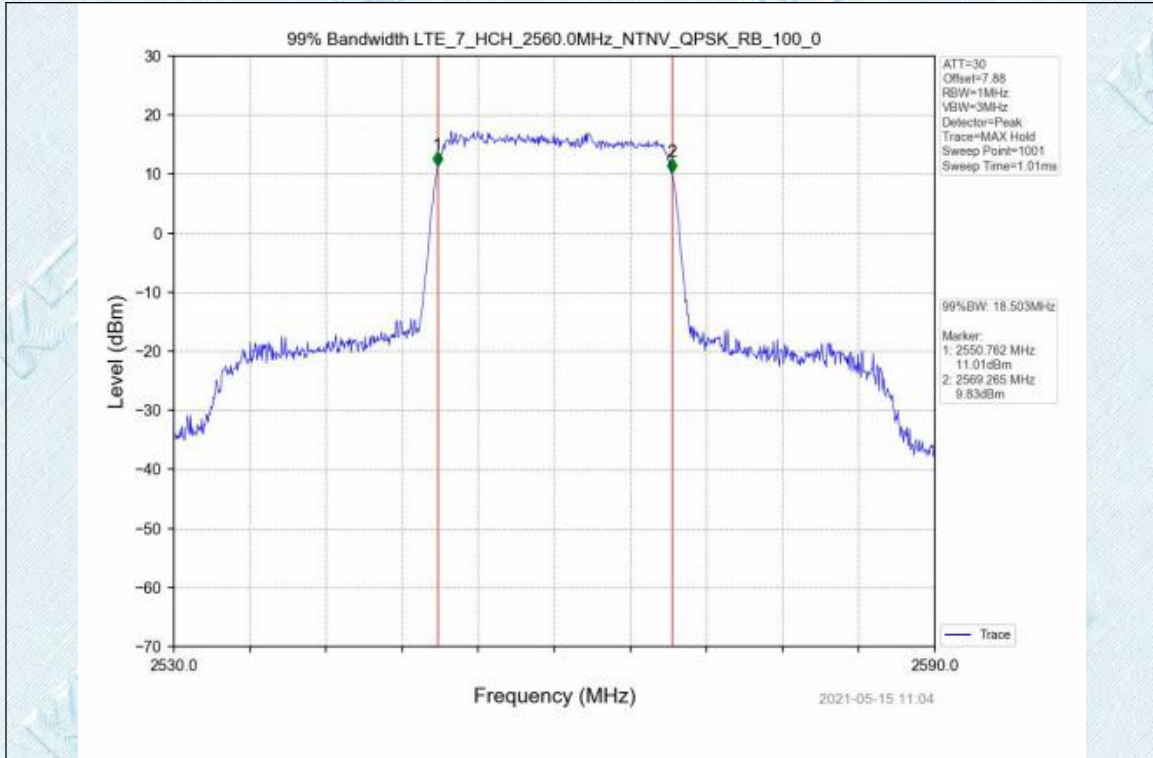
| Test Band: 7 20MHz Bandwidth | | | | | | | |
|------------------------------|---------------|--------|------------------------------|--------|--------|-------|---------|
| Test Mode | RB Allocation | | 99% Occupied Bandwidth (MHz) | | | Limit | Verdict |
| | Size | Offset | LCH | MCH | HCH | | |
| QPSK | 100 | 0 | 18.439 | 18.502 | 18.503 | N/A | PASS |
| 16QAM | 100 | 0 | 18.495 | 18.420 | 18.506 | N/A | PASS |

Test Graph



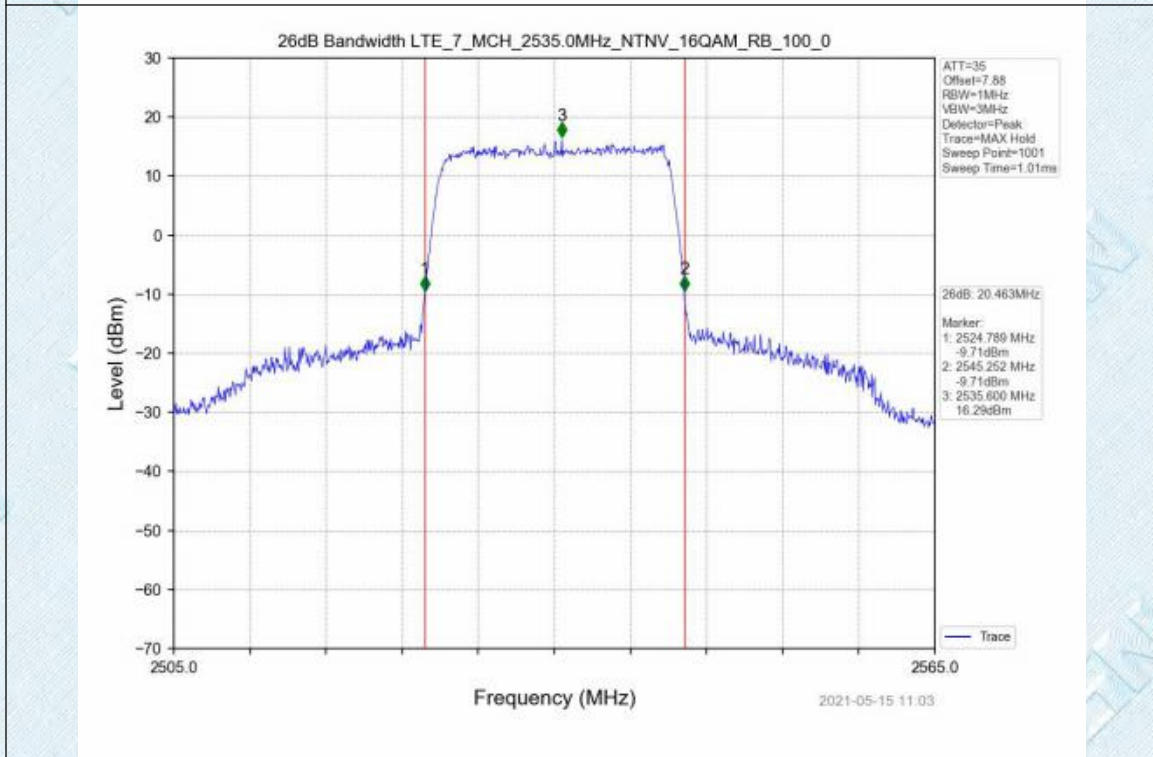
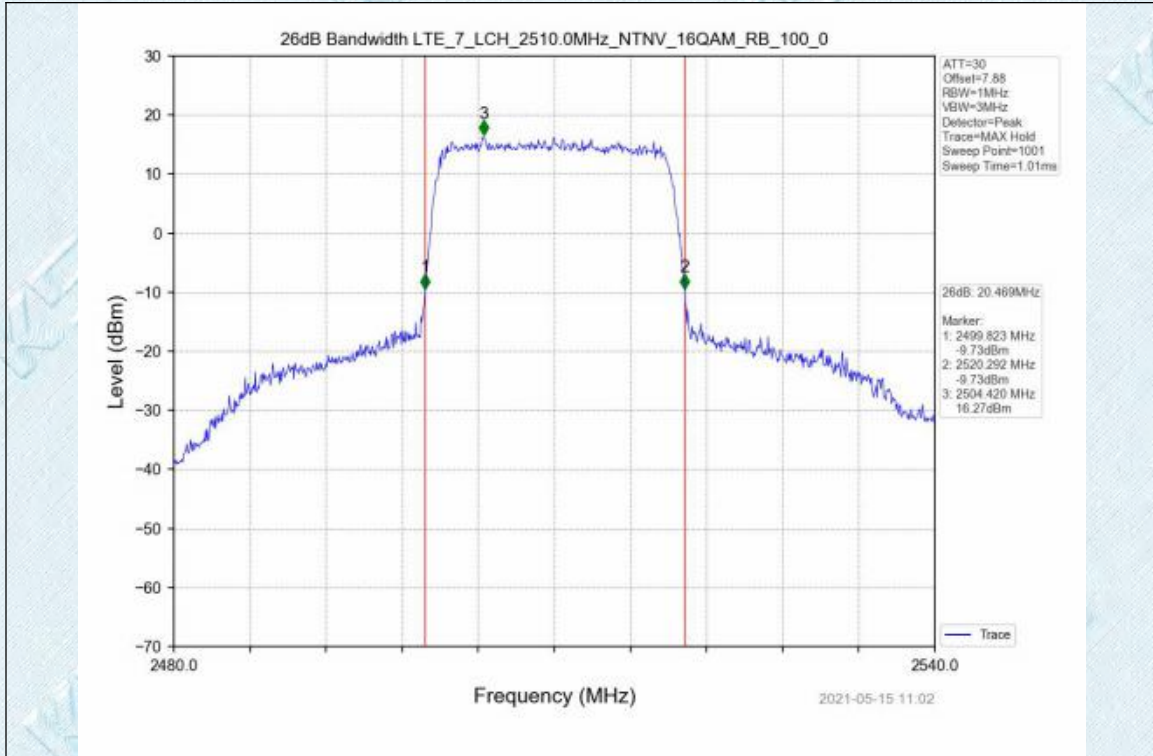


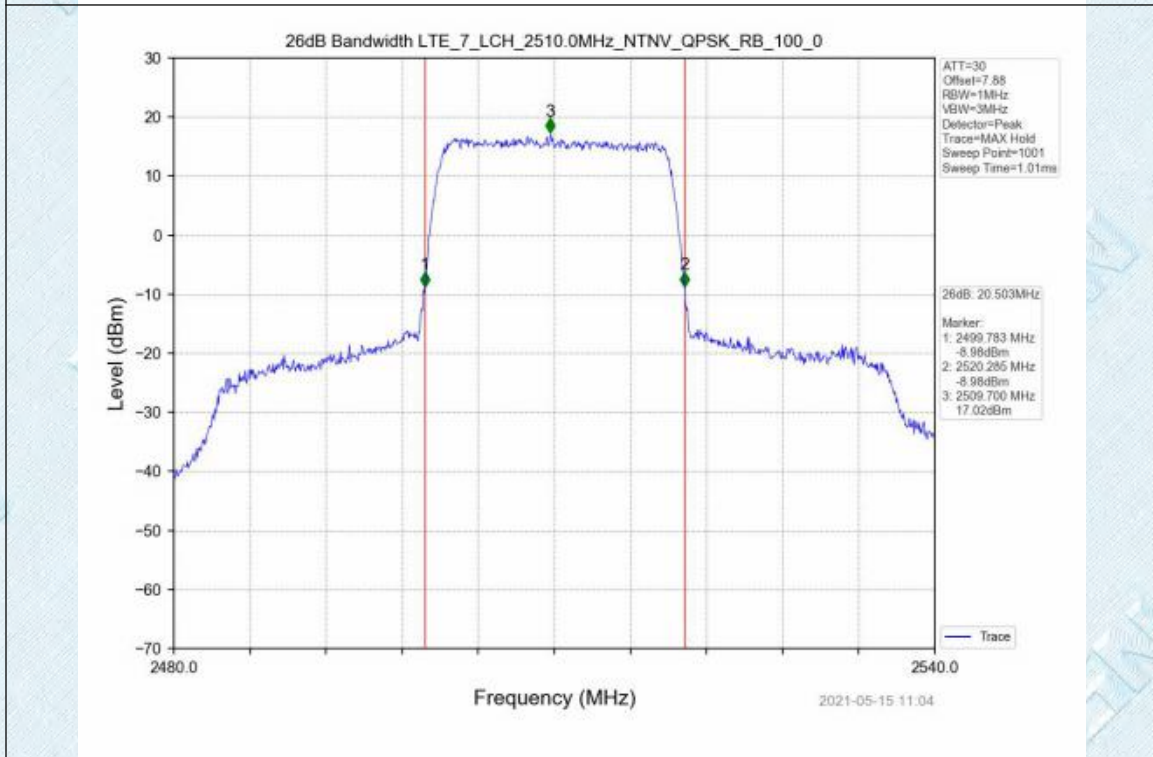
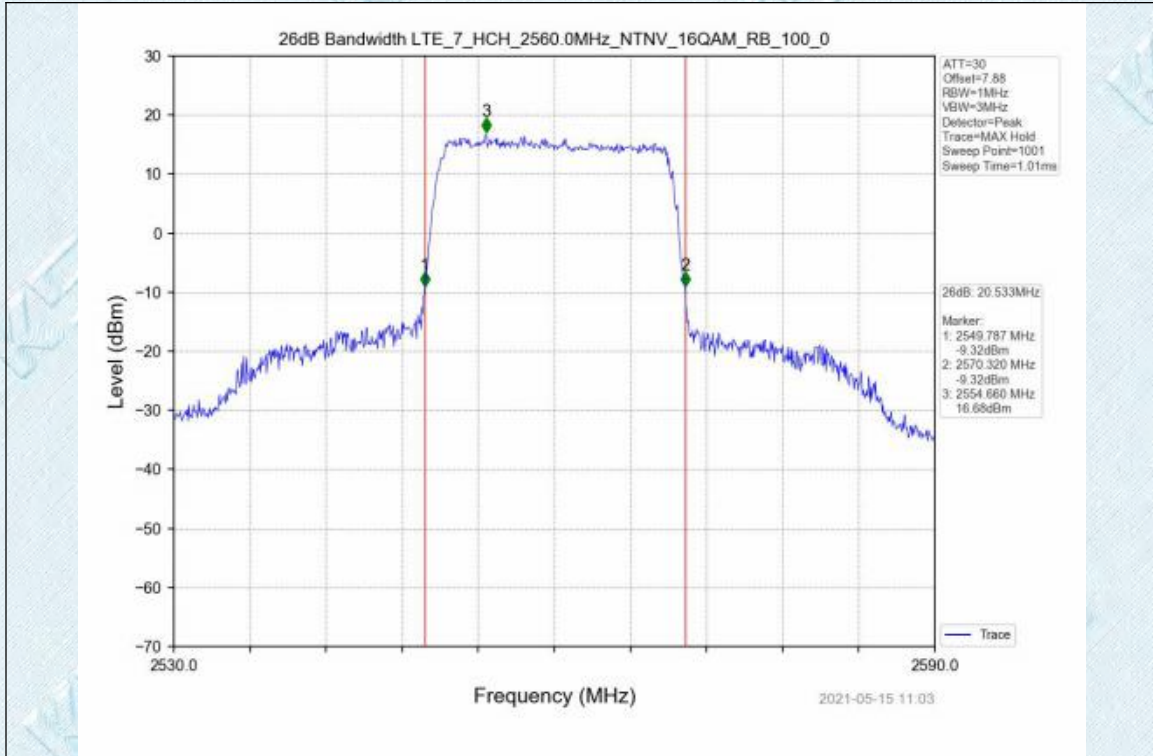


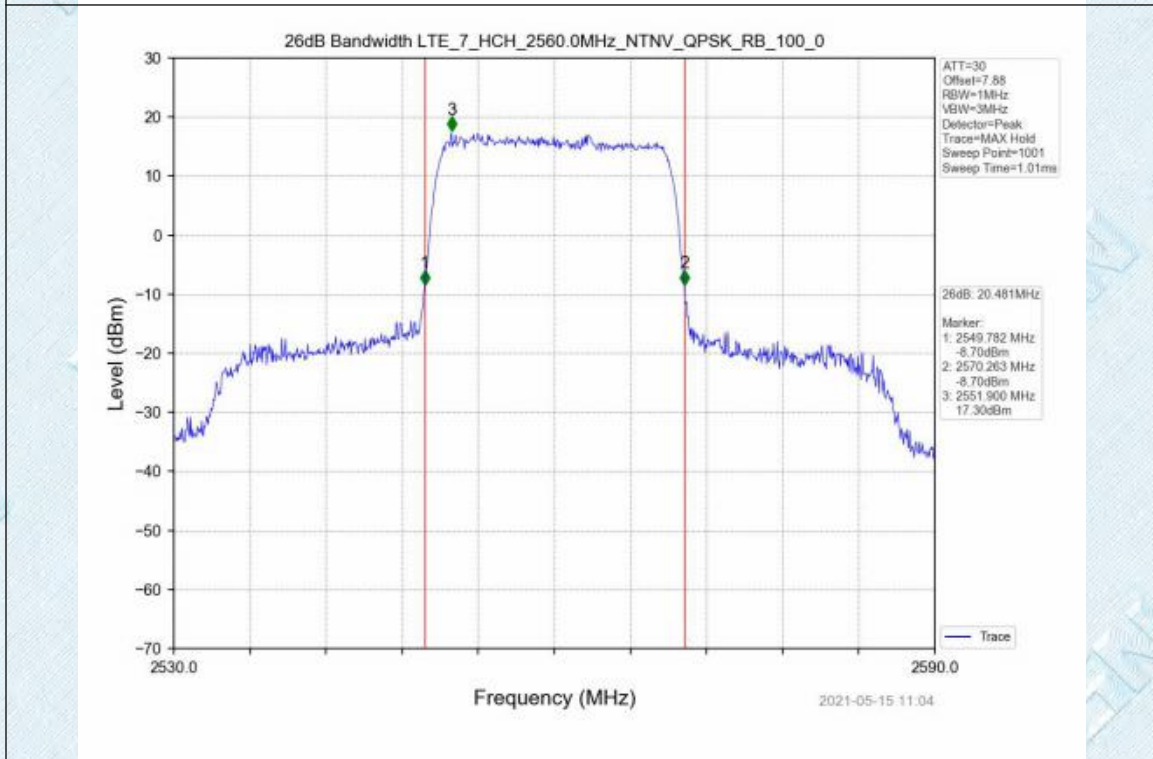
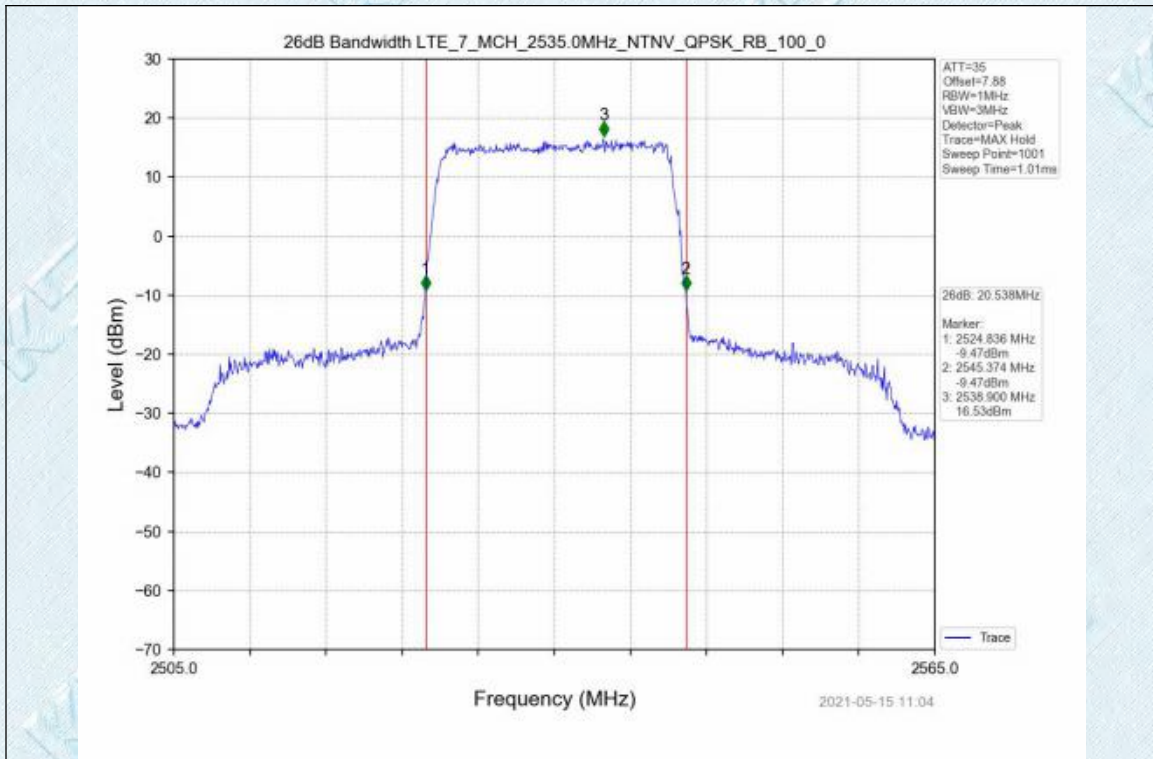


| Test Mode | Test Band: 7 20MHz Bandwidth | | | | | | Limit | Verdict |
|-----------|------------------------------|--------|----------------------|--------|--------|-----|-------|---------|
| | RB Allocation | | 26dB Bandwidth (MHz) | | | | | |
| | Size | Offset | LCH | MCH | HCH | | | |
| QPSK | 100 | 0 | 20.503 | 20.538 | 20.481 | N/A | PASS | |
| 16QAM | 100 | 0 | 20.469 | 20.463 | 20.533 | N/A | PASS | |

Test Graph



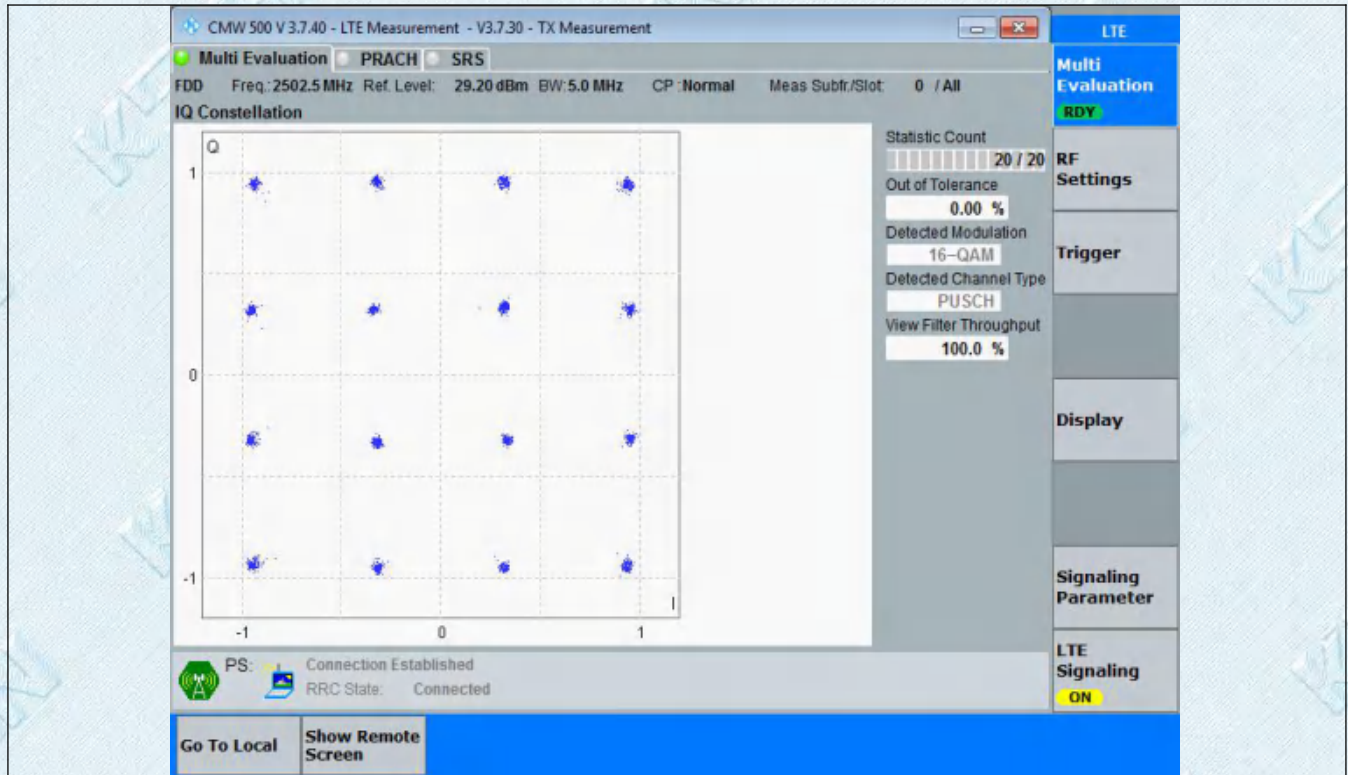




3. Modulation Characteristics

Test LTE Band 7 _ 5MHz Bandwidth

Test Graph

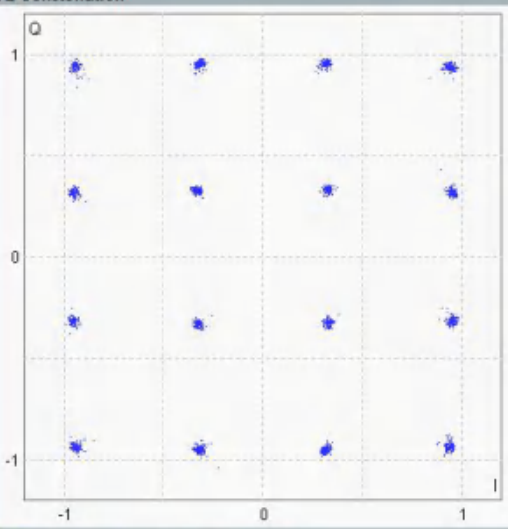


CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2535.0 MHz Ref. Level: 29.90 dBm BW: 5.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation



Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: 16-QAM
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

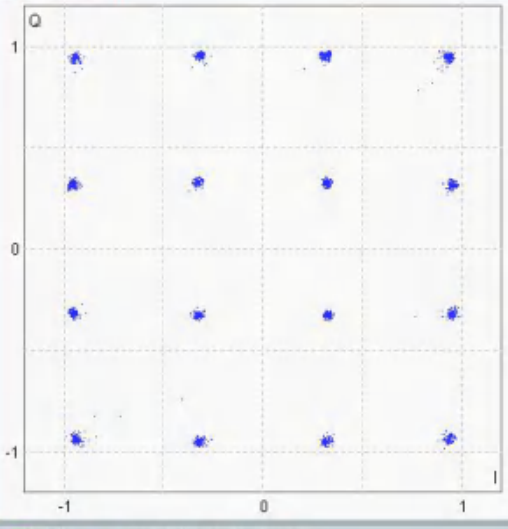
LTE
 Multi Evaluation: RDY
 RF Settings
 Trigger
 Display
 Signaling Parameter
 LTE Signaling: ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2567.5 MHz Ref. Level: 30.40 dBm BW: 5.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation



Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: 16-QAM
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

LTE
 Multi Evaluation: RDY
 RF Settings
 Trigger
 Display
 Signaling Parameter
 LTE Signaling: ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2502.5 MHz Ref. Level: 30.30 dBm BW: 5.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

Statistic Count: 20 / 20

Out of Tolerance: 0.00 %

Detected Modulation: QPSK

Detected Channel Type: PUSCH

View Filter Throughput: 100.0 %

PS: Connection Established RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

RF Settings

Trigger

Display

Signaling Parameter

LTE Signaling ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2535.0 MHz Ref. Level: 31.00 dBm BW: 5.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

Statistic Count: 20 / 20

Out of Tolerance: 0.00 %

Detected Modulation: QPSK

Detected Channel Type: PUSCH

View Filter Throughput: 100.0 %

PS: Connection Established RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

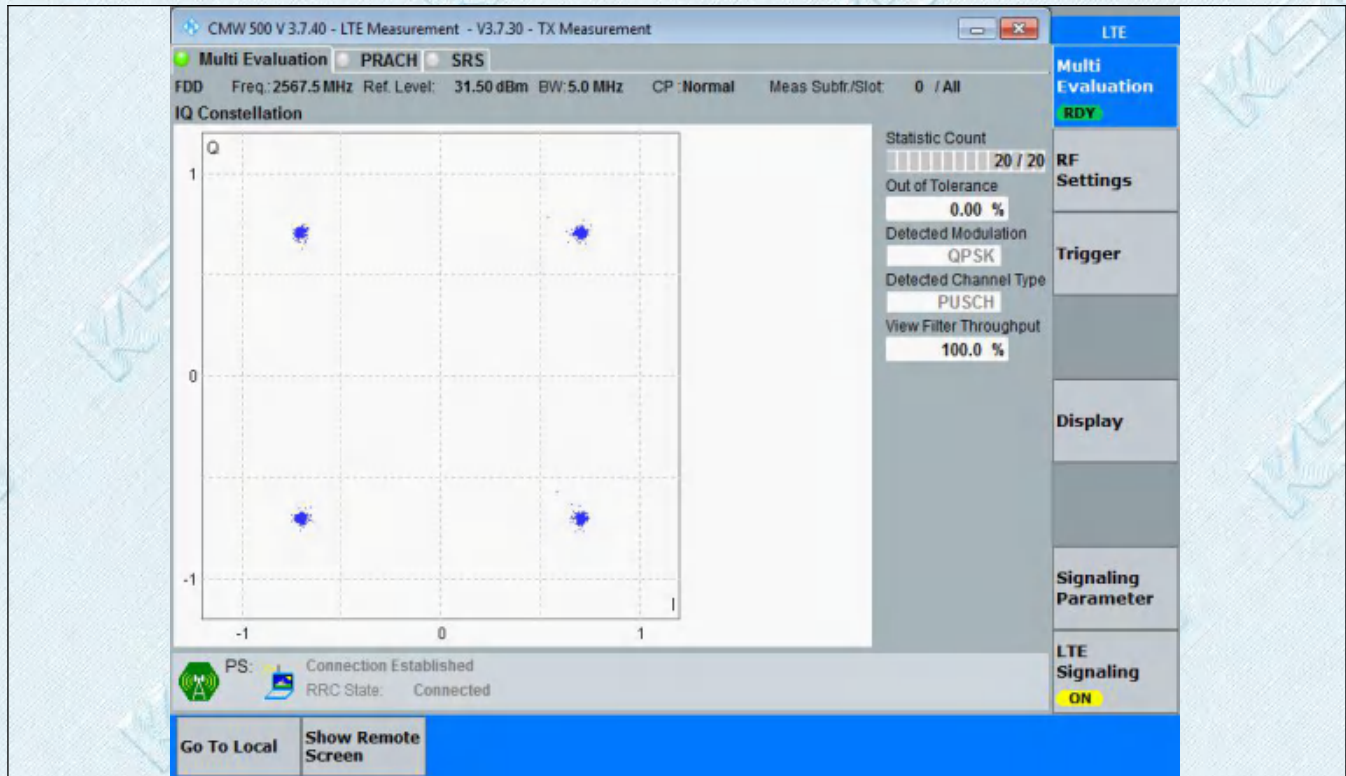
RF Settings

Trigger

Display

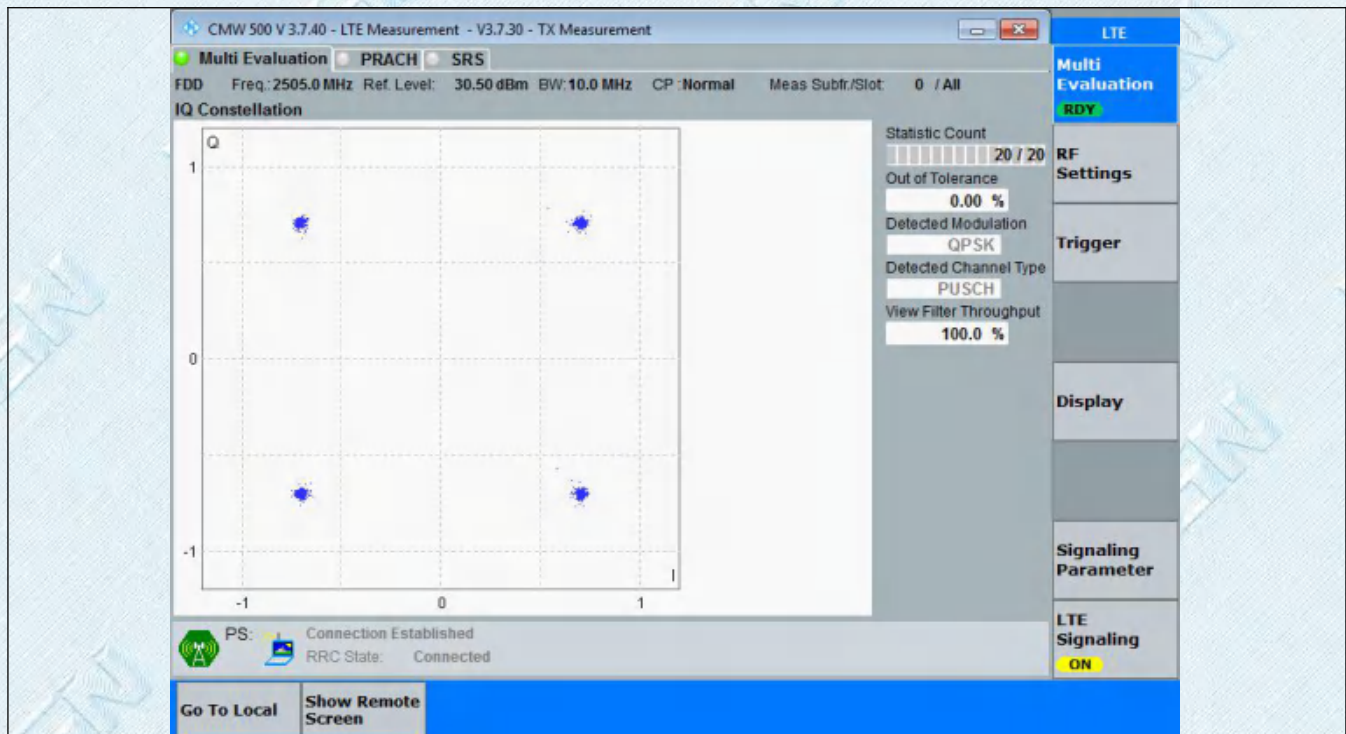
Signaling Parameter

LTE Signaling ON



Test LTE Band 7 _ 10MHz Bandwidth

Test Graph



CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2535.0 MHz Ref. Level: 30.90 dBm BW: 10.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: 16-QAM
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

RF Settings

Trigger

Display

Signaling Parameter

LTE Signaling ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2565.0 MHz Ref. Level: 30.40 dBm BW: 10.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: 16-QAM
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

RF Settings

Trigger

Display

Signaling Parameter

LTE Signaling ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2505.0 MHz Ref. Level: 30.40 dBm BW: 10.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: QPSK
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

RF Settings

Trigger

Display

Signaling Parameter

LTE Signaling ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2535.0 MHz Ref. Level: 30.90 dBm BW: 10.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: QPSK
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

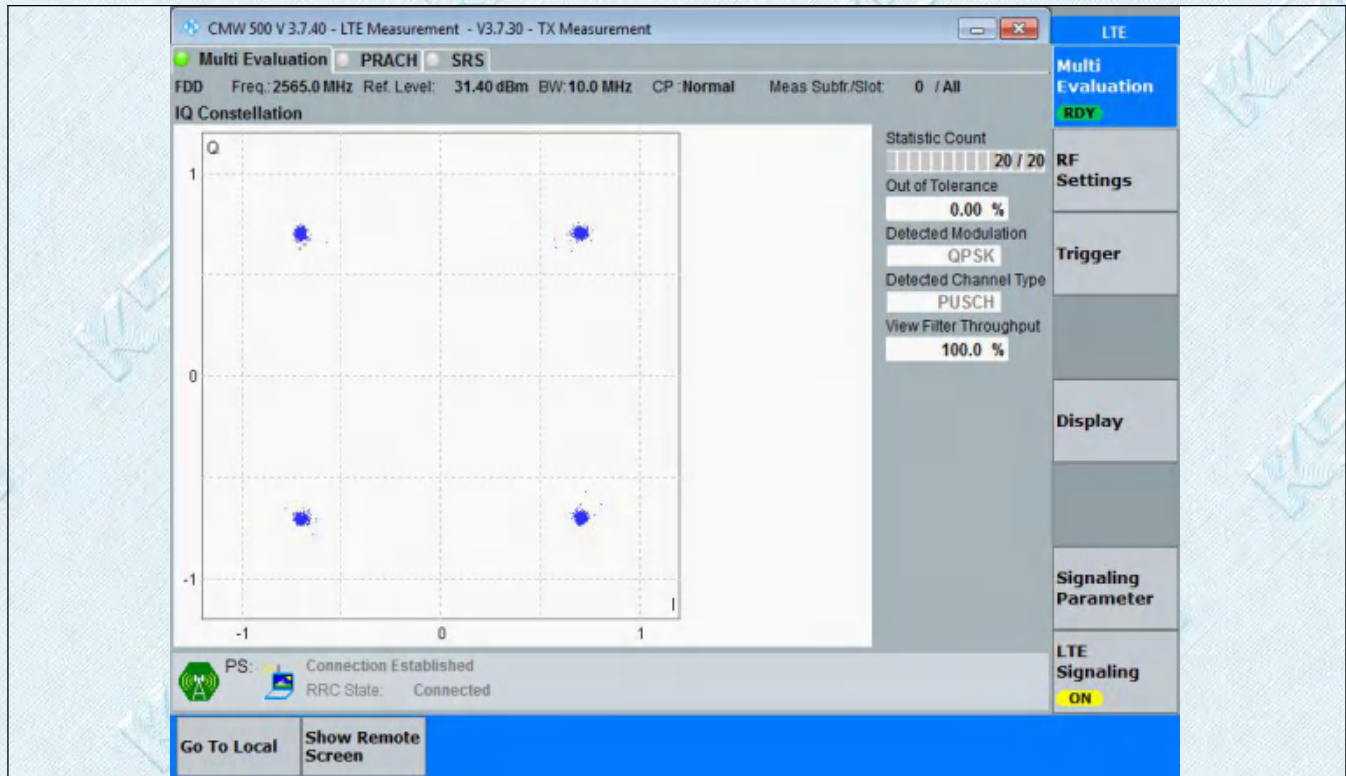
RF Settings

Trigger

Display

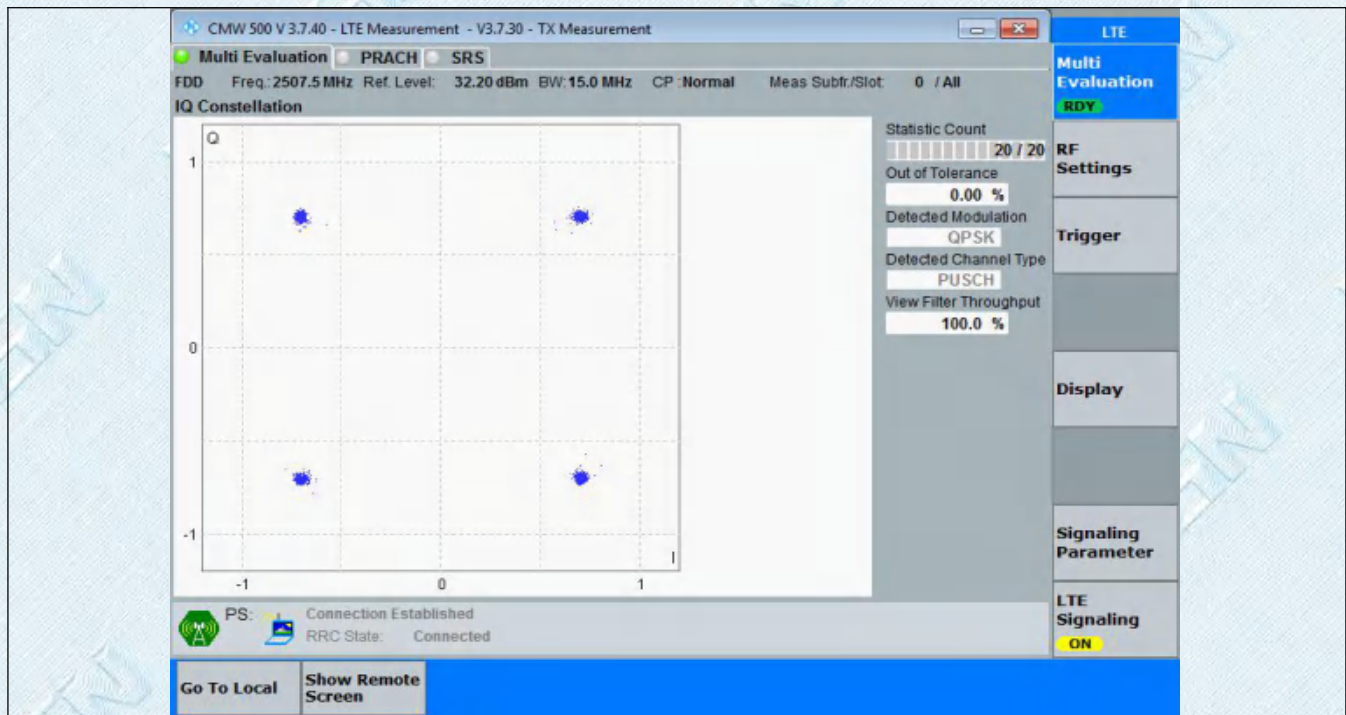
Signaling Parameter

LTE Signaling ON



Test LTE Band 7 _ 15MHz Bandwidth

Test Graph



CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2535.0 MHz Ref. Level: 30.70 dBm BW: 15.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: 16-QAM
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

RF Settings

Trigger

Display

Signaling Parameter

LTE Signaling ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2562.5 MHz Ref. Level: 31.30 dBm BW: 15.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: 16-QAM
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

RF Settings

Trigger

Display

Signaling Parameter

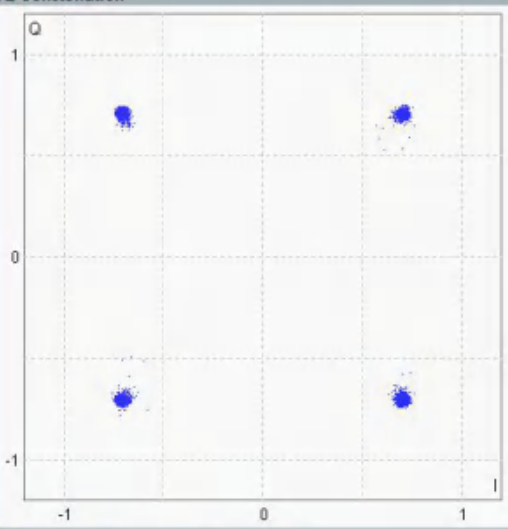
LTE Signaling ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2507.5 MHz Ref. Level: 30.20 dBm BW: 15.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation



Statistic Count: 20 / 20

Out of Tolerance: 0.00 %

Detected Modulation: QPSK

Detected Channel Type: PUSCH

View Filter Throughput: 100.0 %

PS: Connection Established RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

RF Settings

Trigger

Display

Signaling Parameter

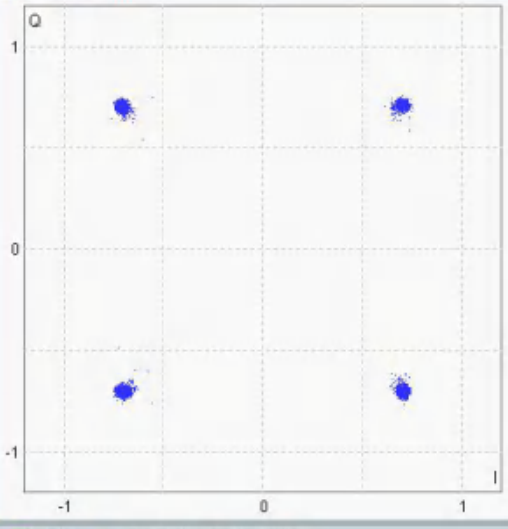
LTE Signaling ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2535.0 MHz Ref. Level: 30.70 dBm BW: 15.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation



Statistic Count: 20 / 20

Out of Tolerance: 0.00 %

Detected Modulation: QPSK

Detected Channel Type: PUSCH

View Filter Throughput: 100.0 %

PS: Connection Established RRC State: Connected

Go To Local Show Remote Screen

LTE Multi Evaluation RDY

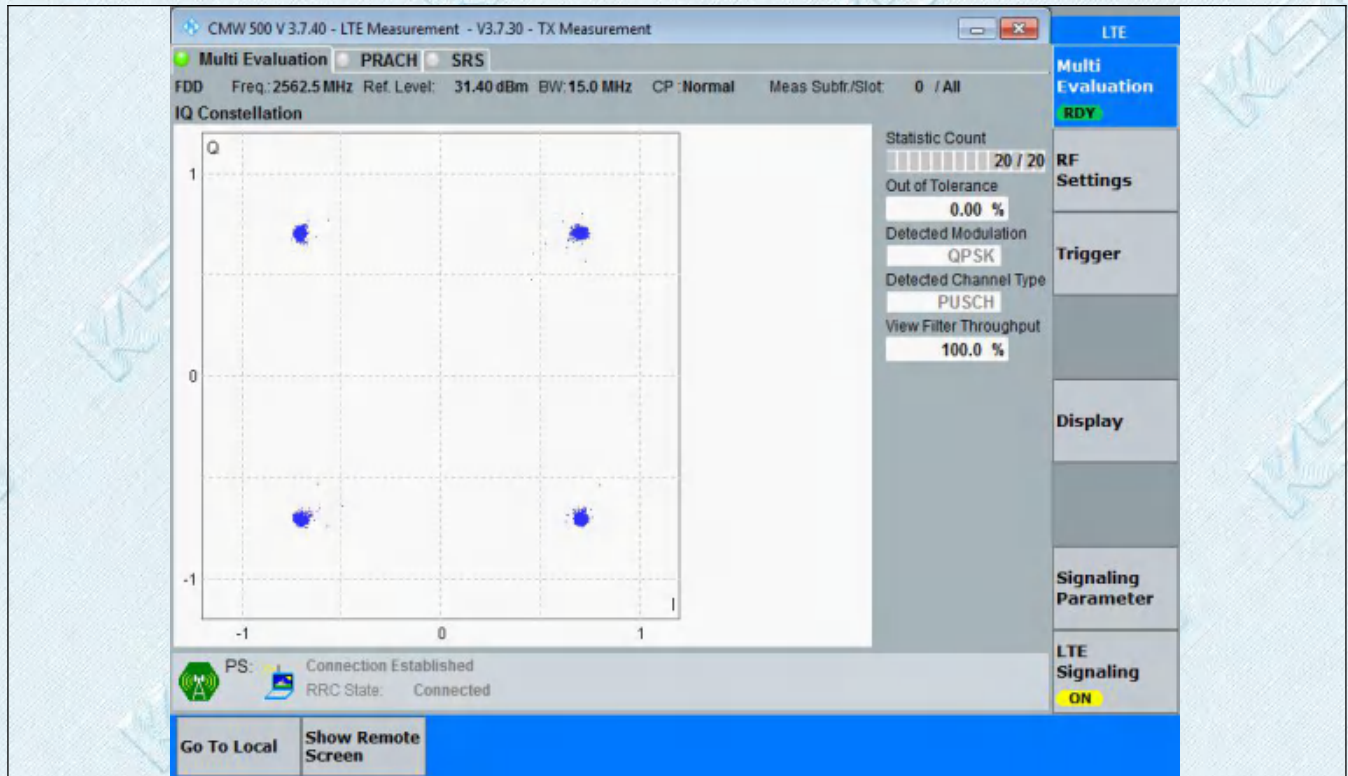
RF Settings

Trigger

Display

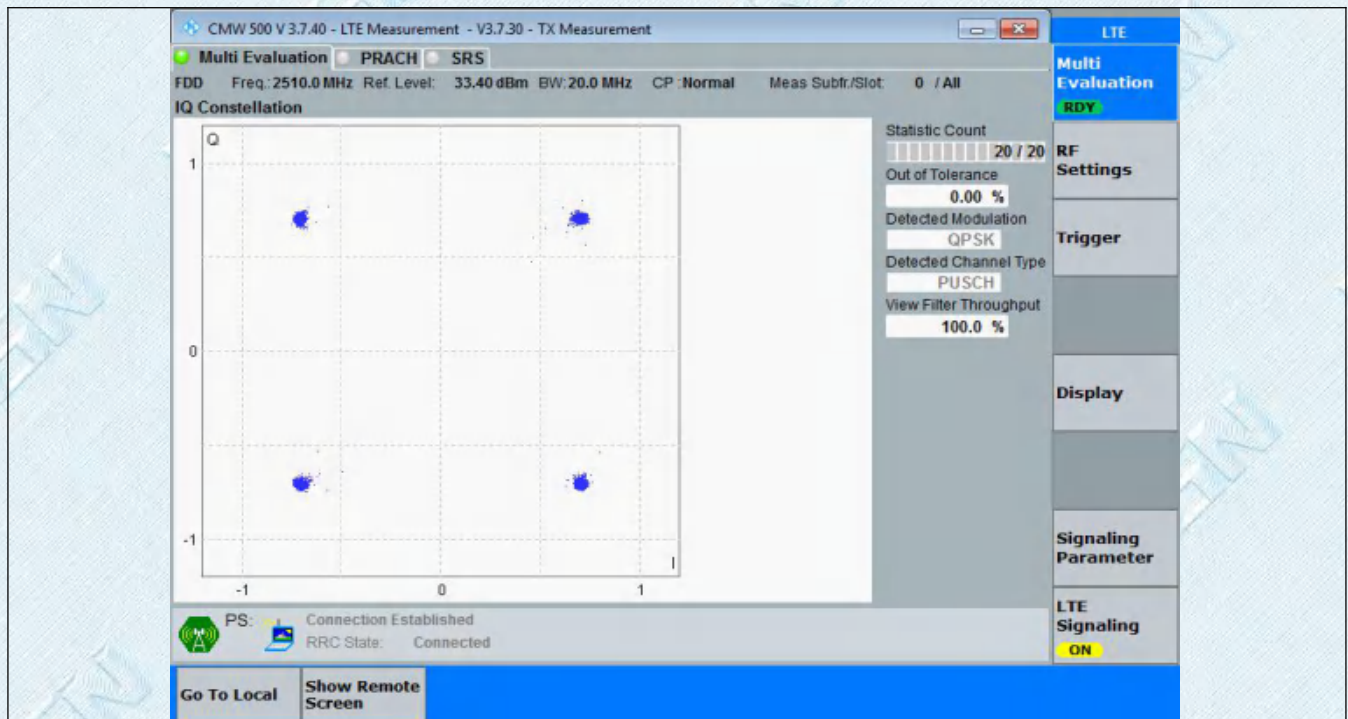
Signaling Parameter

LTE Signaling ON



Test LTE Band 7 _ 20MHz Bandwidth

Test Graph

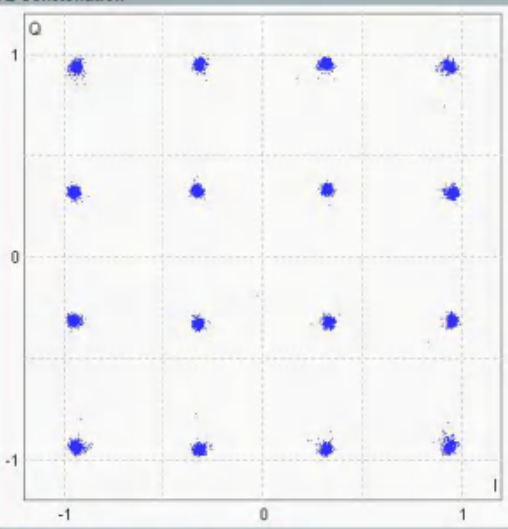


CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2535.0 MHz Ref. Level: 29.80 dBm BW: 20.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation



Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: 16-QAM
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

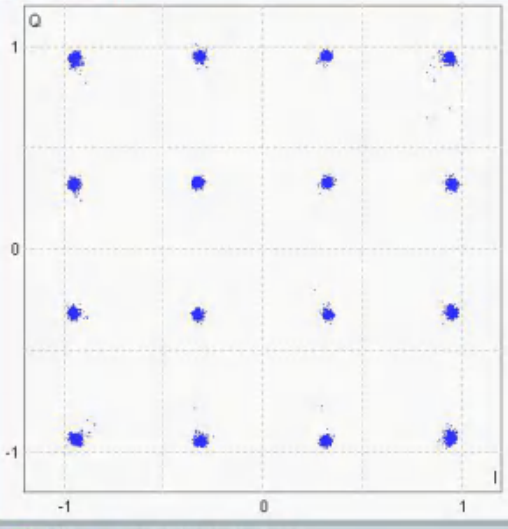
LTE
 Multi Evaluation RDY
 RF Settings
 Trigger
 Display
 Signaling Parameter
 LTE Signaling ON

CMW 500 V 3.7.40 - LTE Measurement - V3.7.30 - TX Measurement

Multi Evaluation PRACH SRS

FDD Freq.: 2560.0 MHz Ref. Level: 31.30 dBm BW: 20.0 MHz CP: Normal Meas Subfr./Slot: 0 / All

IQ Constellation

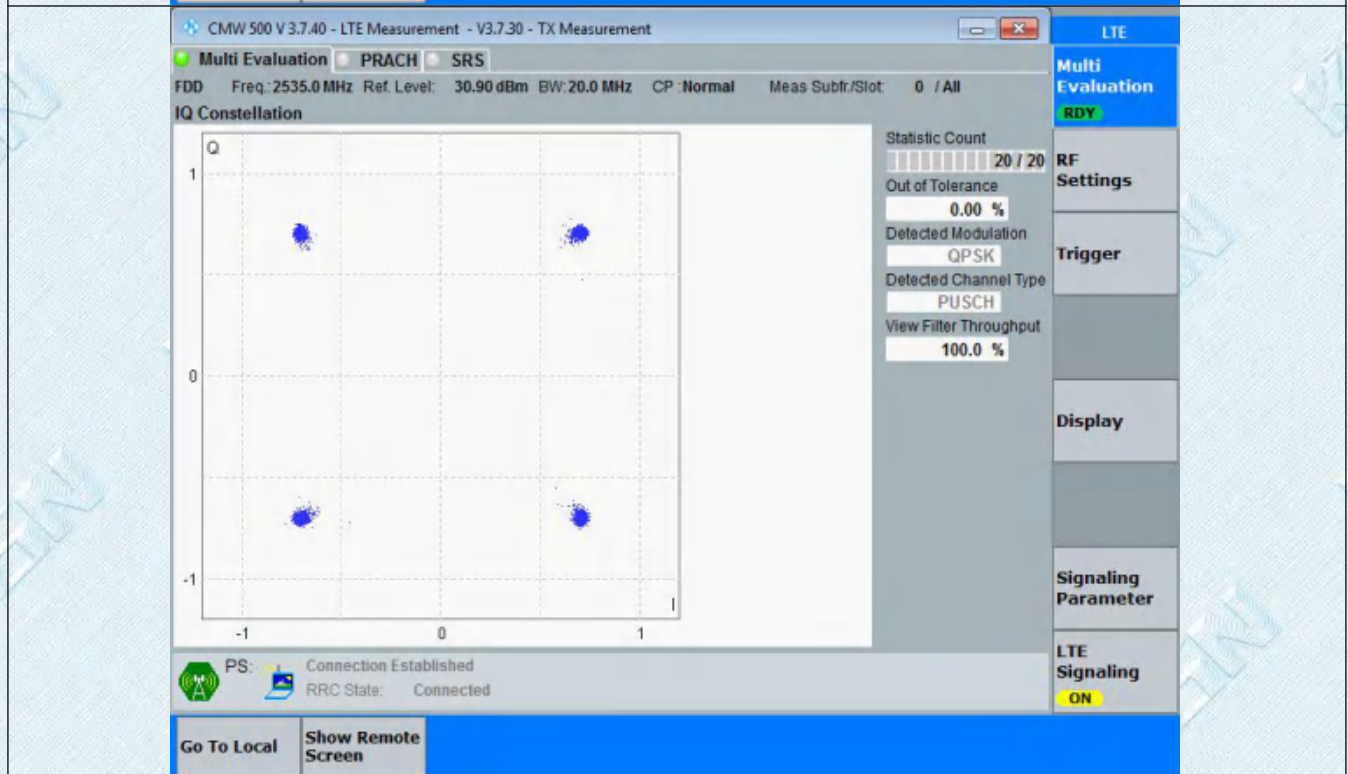
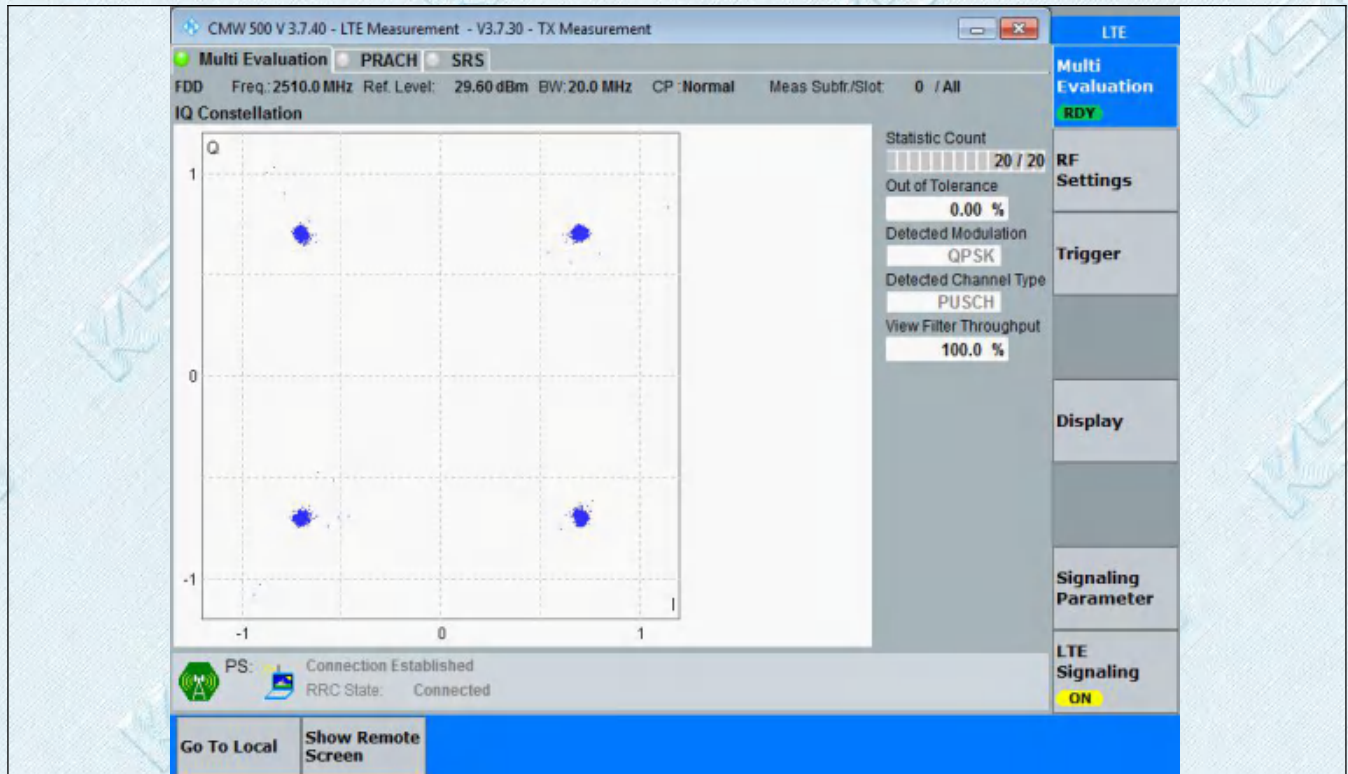


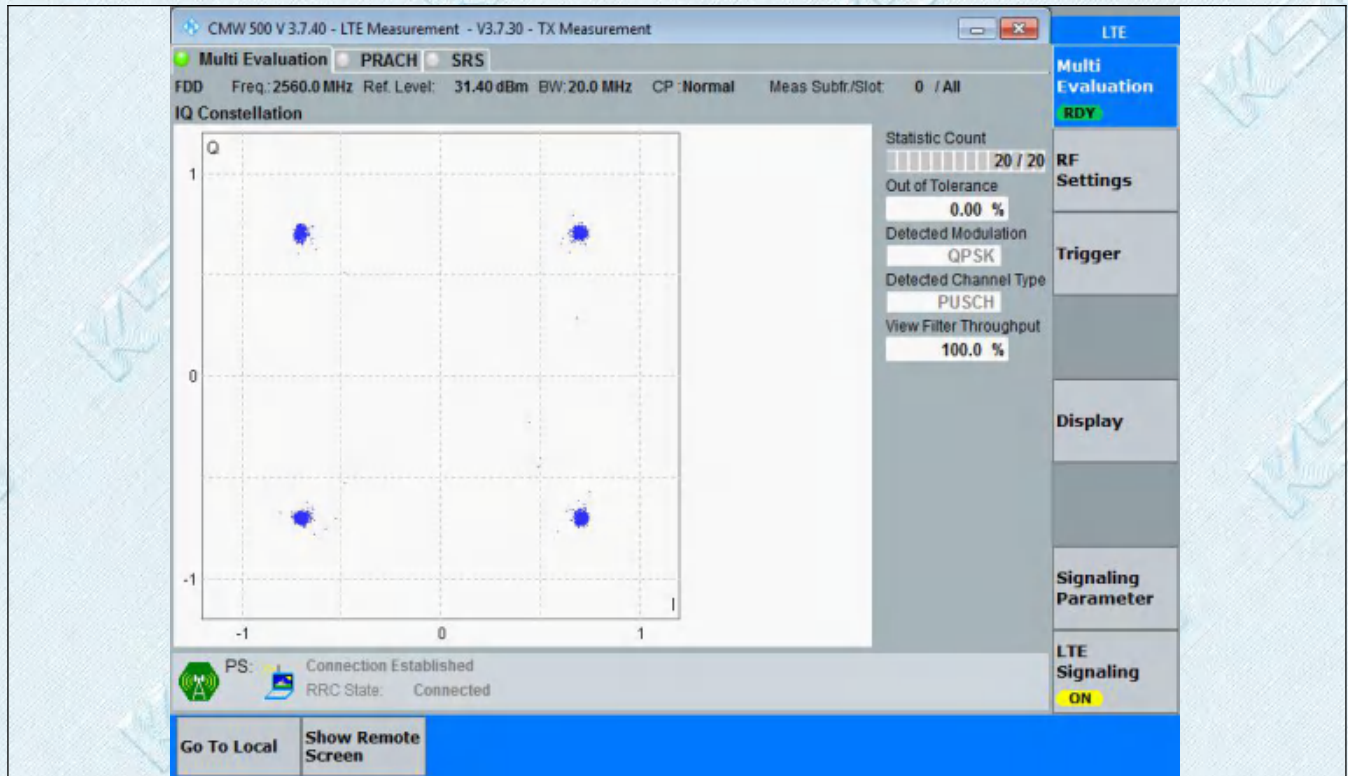
Statistic Count: 20 / 20
 Out of Tolerance: 0.00 %
 Detected Modulation: 16-QAM
 Detected Channel Type: PUSCH
 View Filter Throughput: 100.0 %

PS: Connection Established
 RRC State: Connected

Go To Local Show Remote Screen

LTE
 Multi Evaluation RDY
 RF Settings
 Trigger
 Display
 Signaling Parameter
 LTE Signaling ON

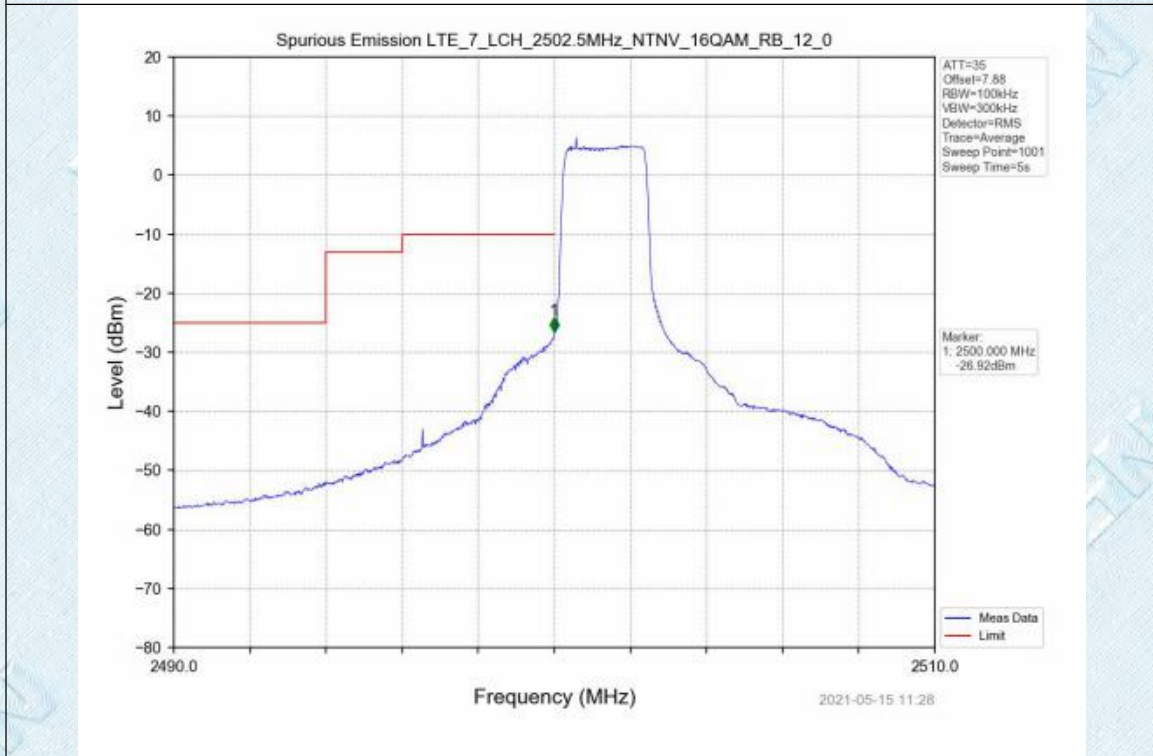
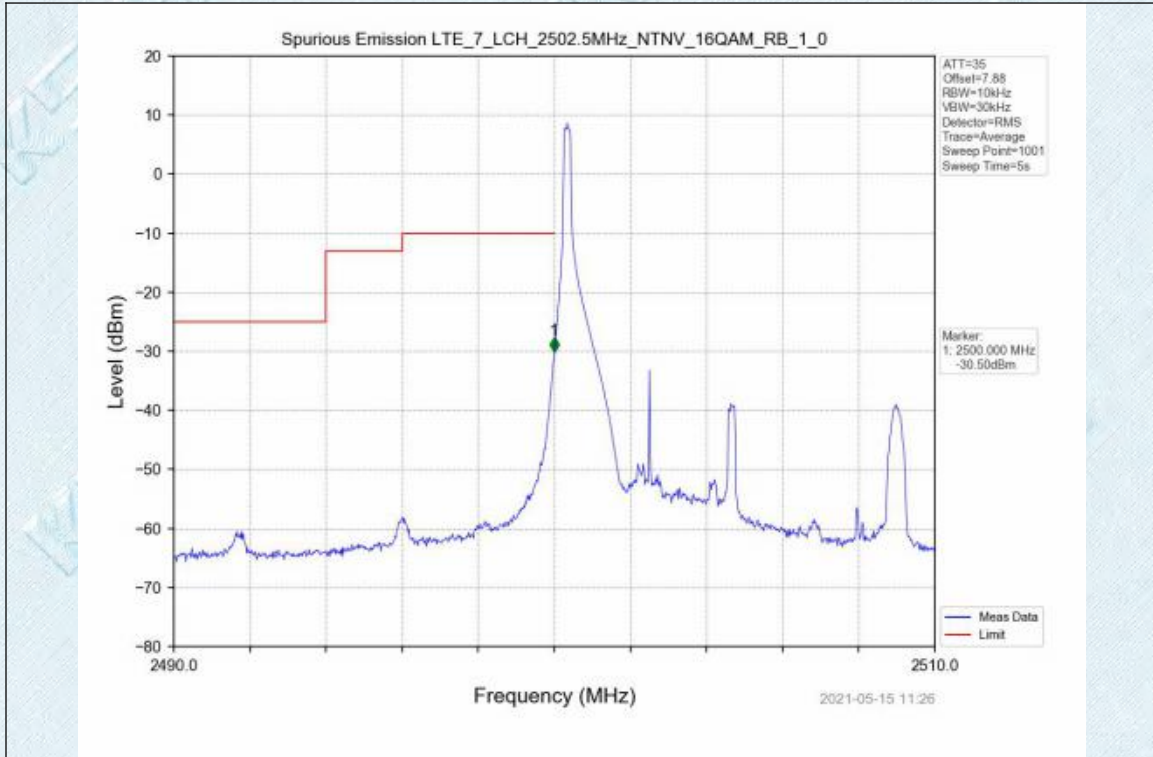


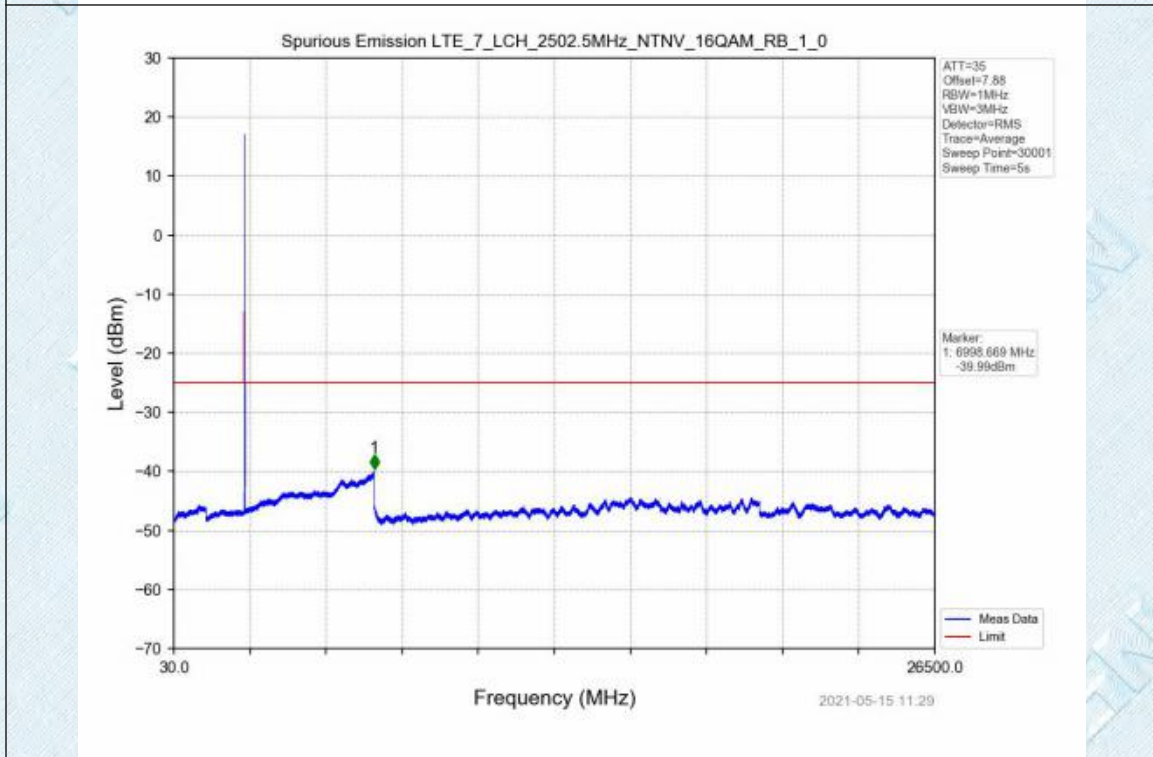
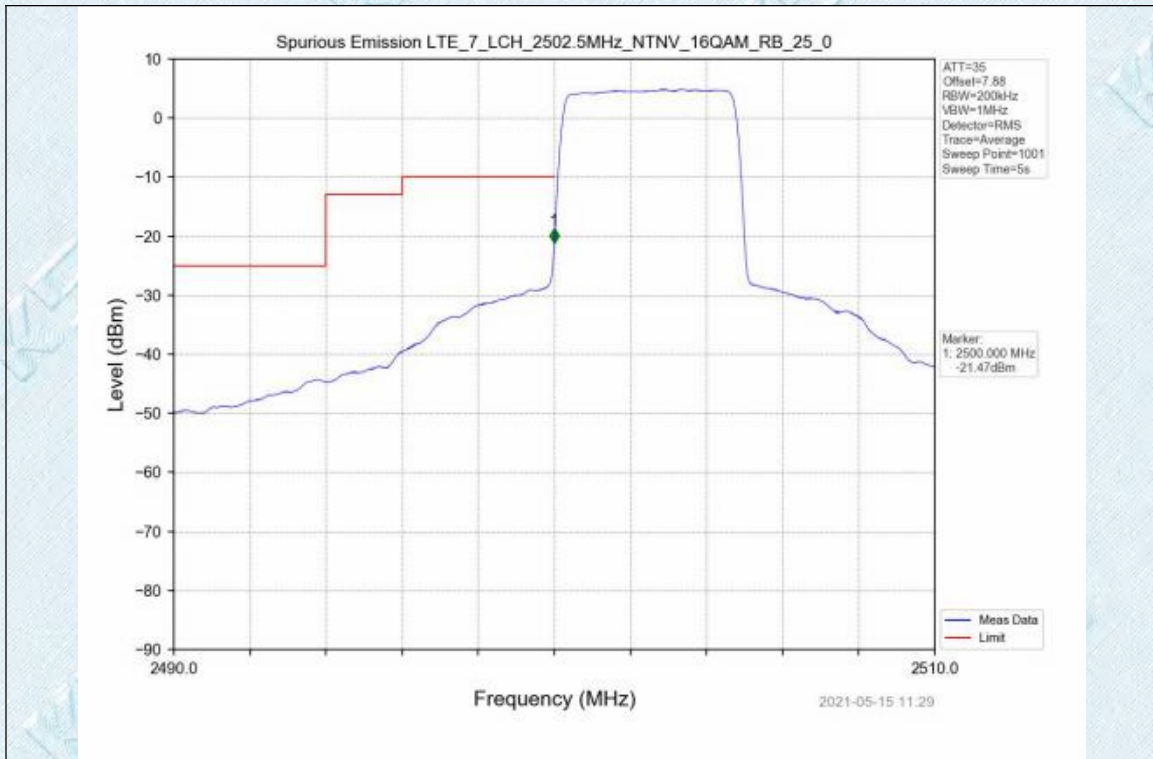


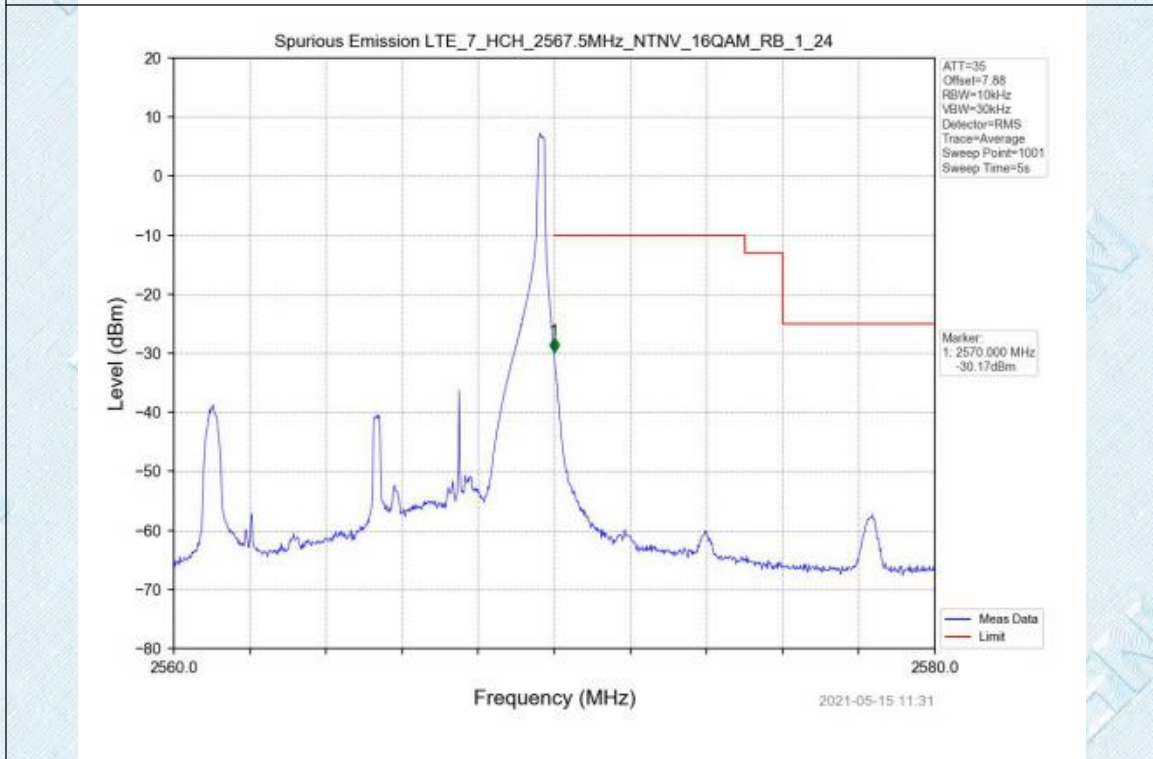
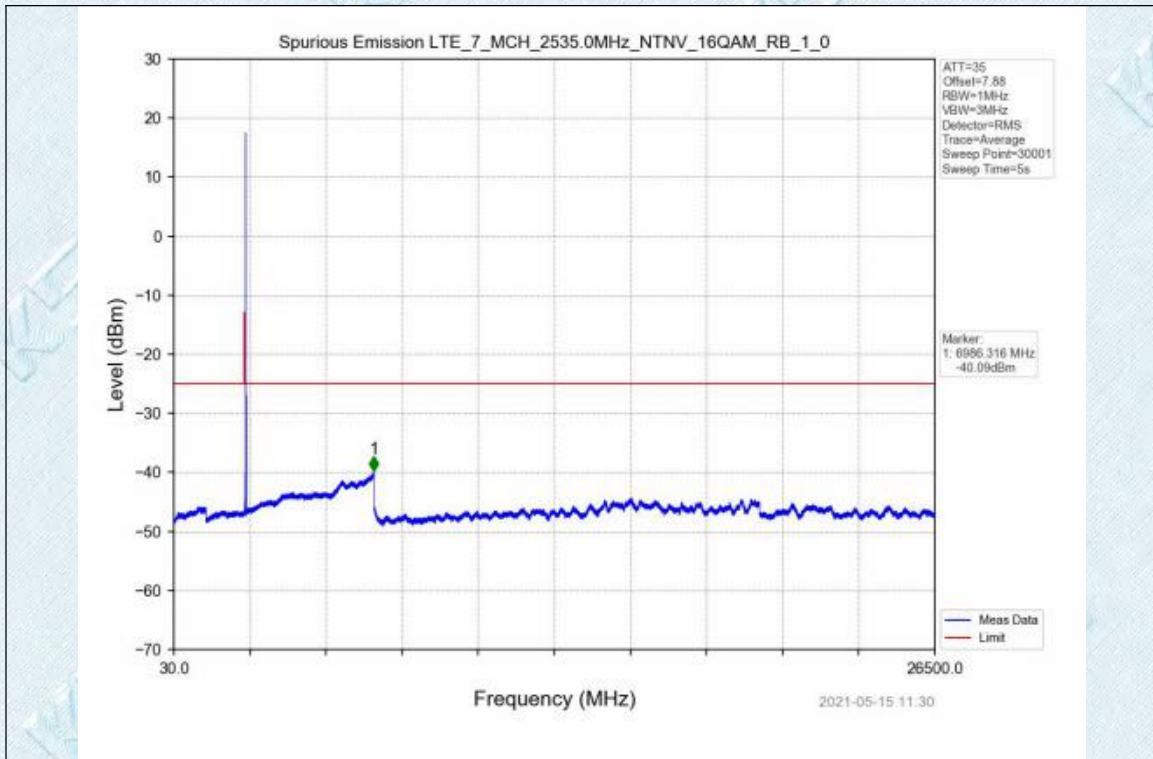
4. Spurious Emission

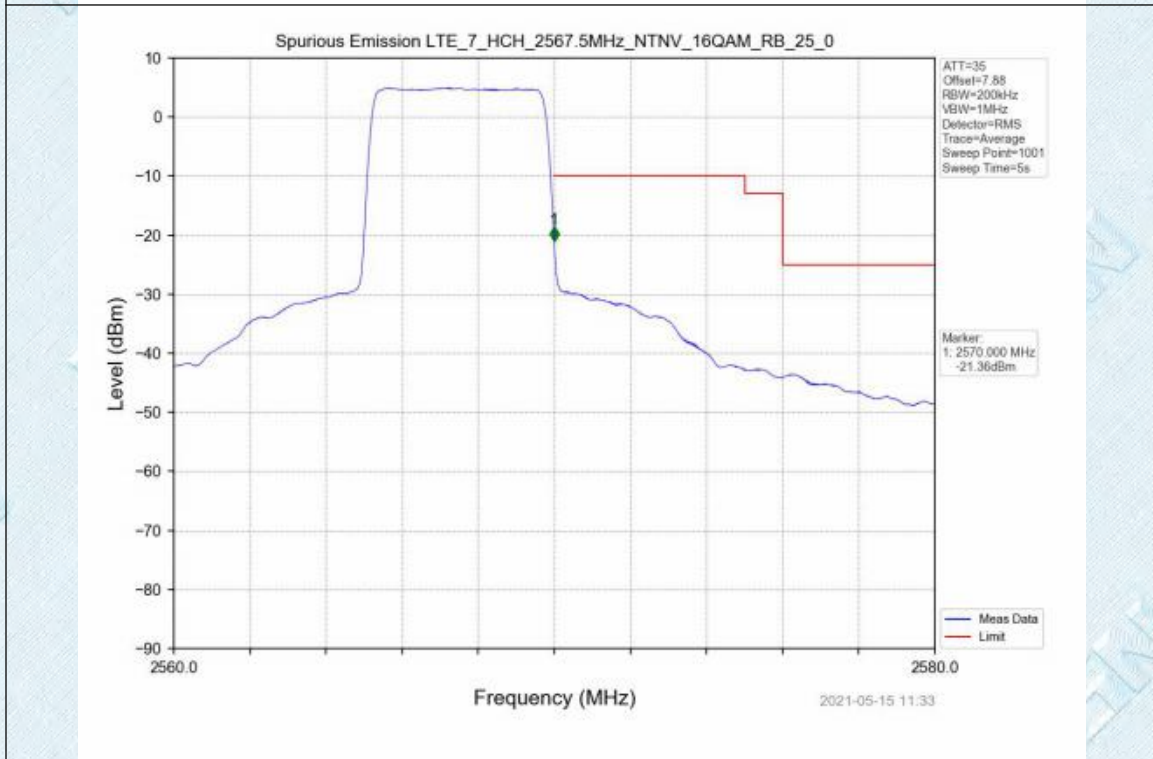
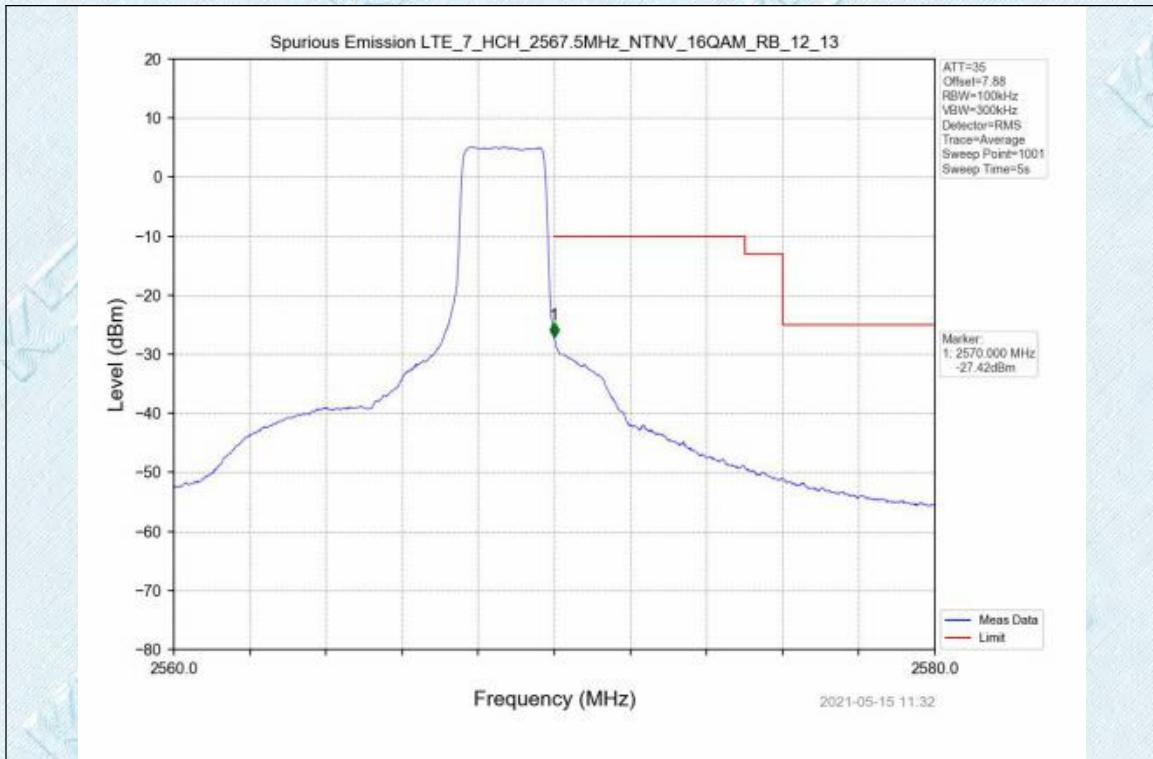
Test LTE Band 7 _ 5MHz Bandwidth

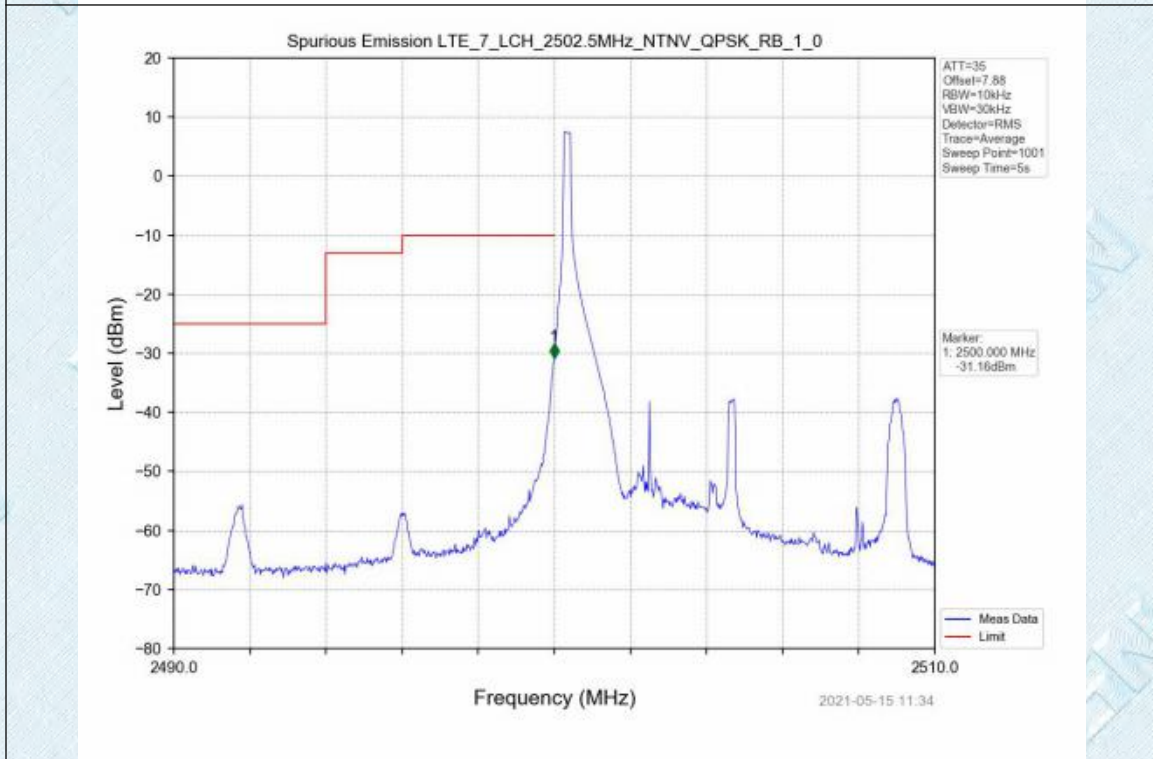
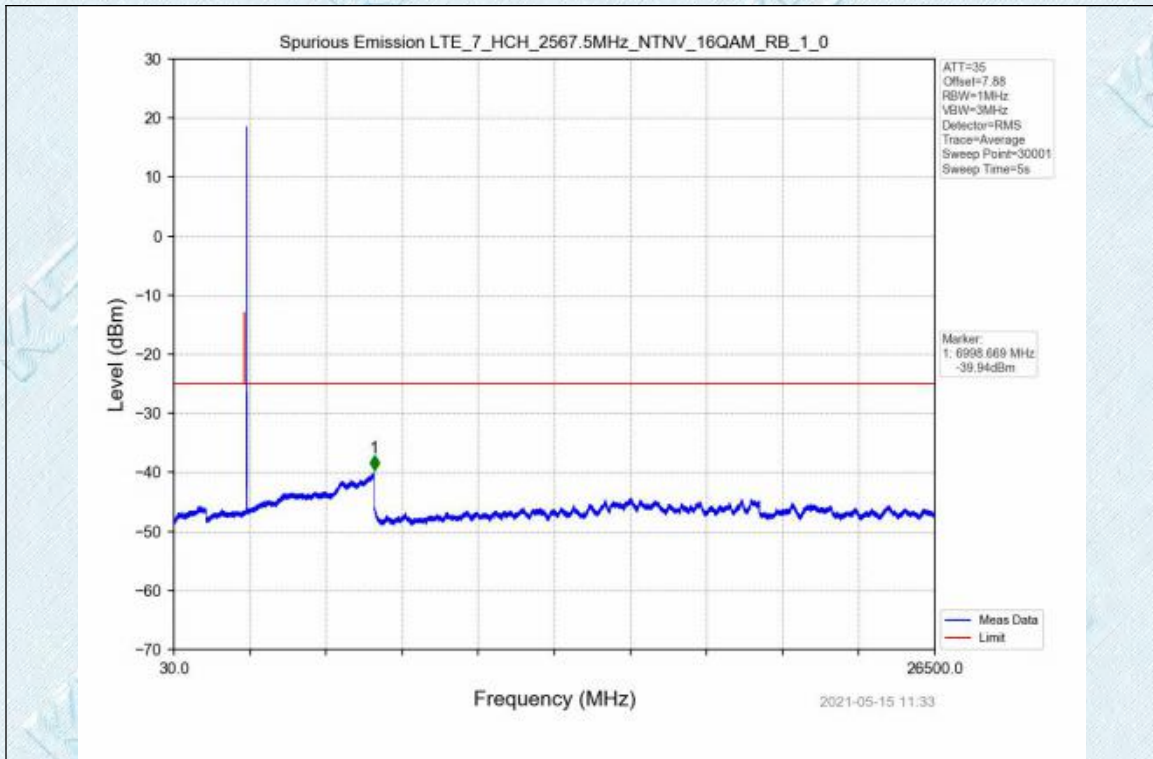
Test Graph

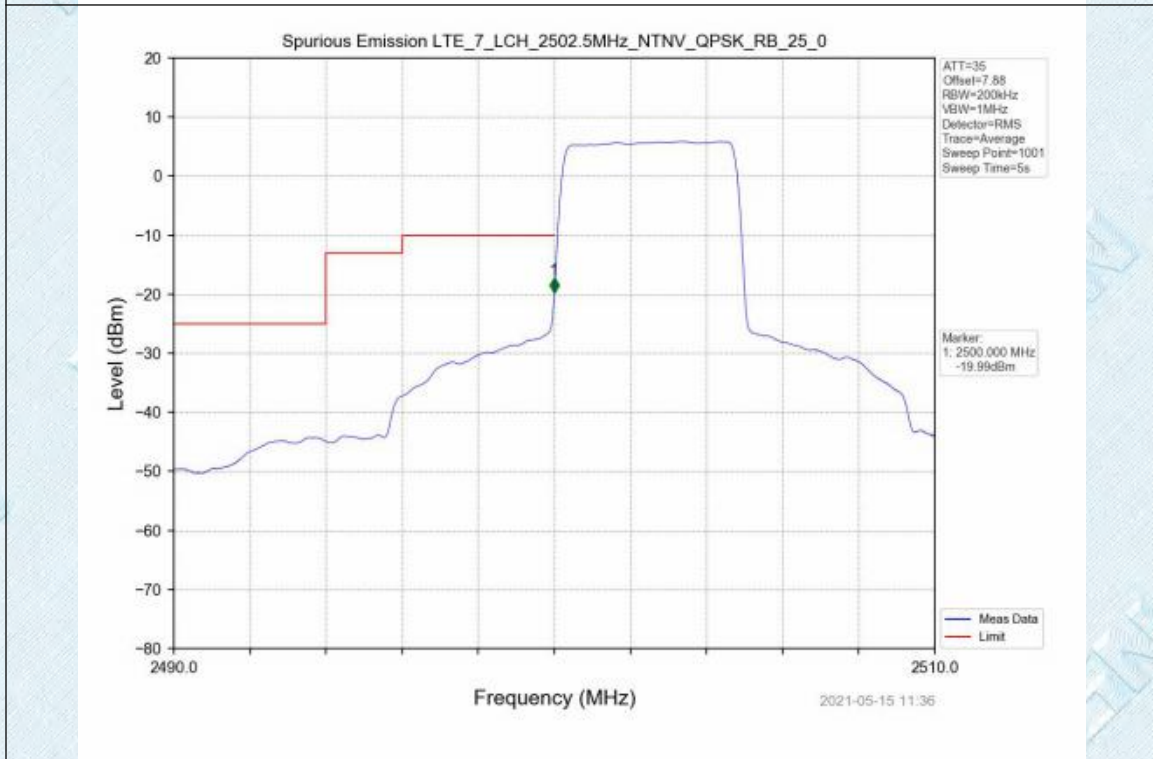
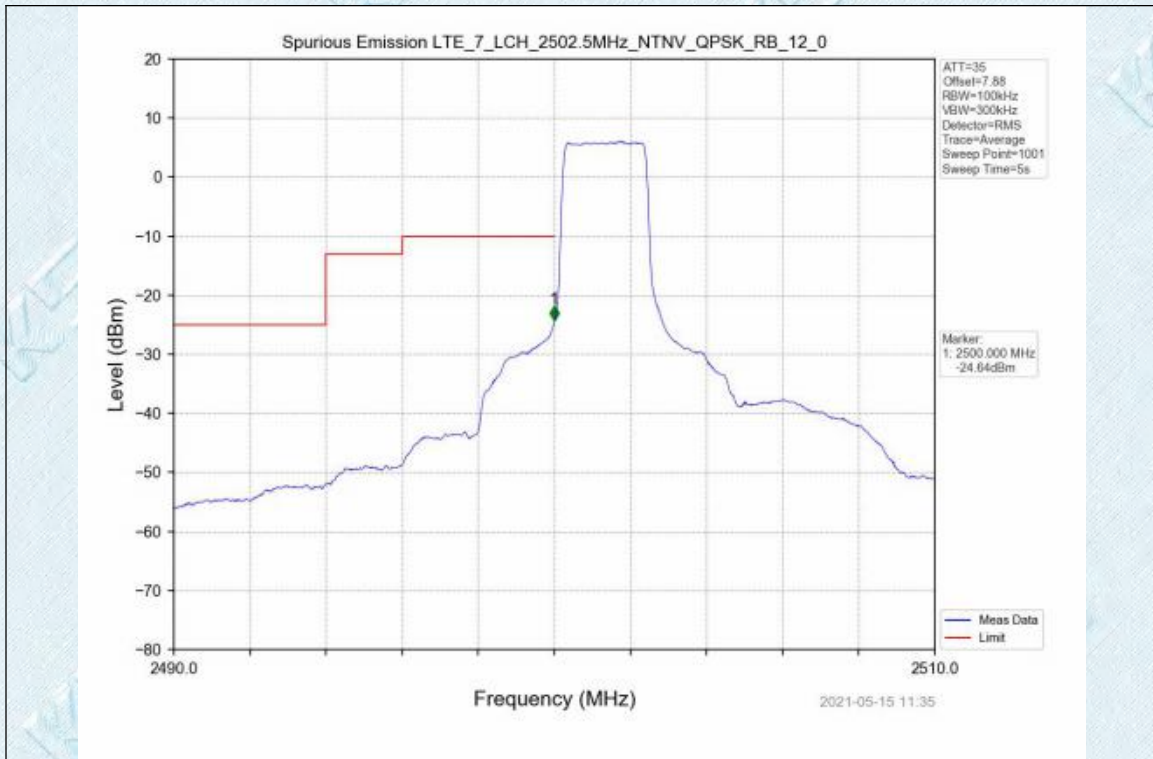


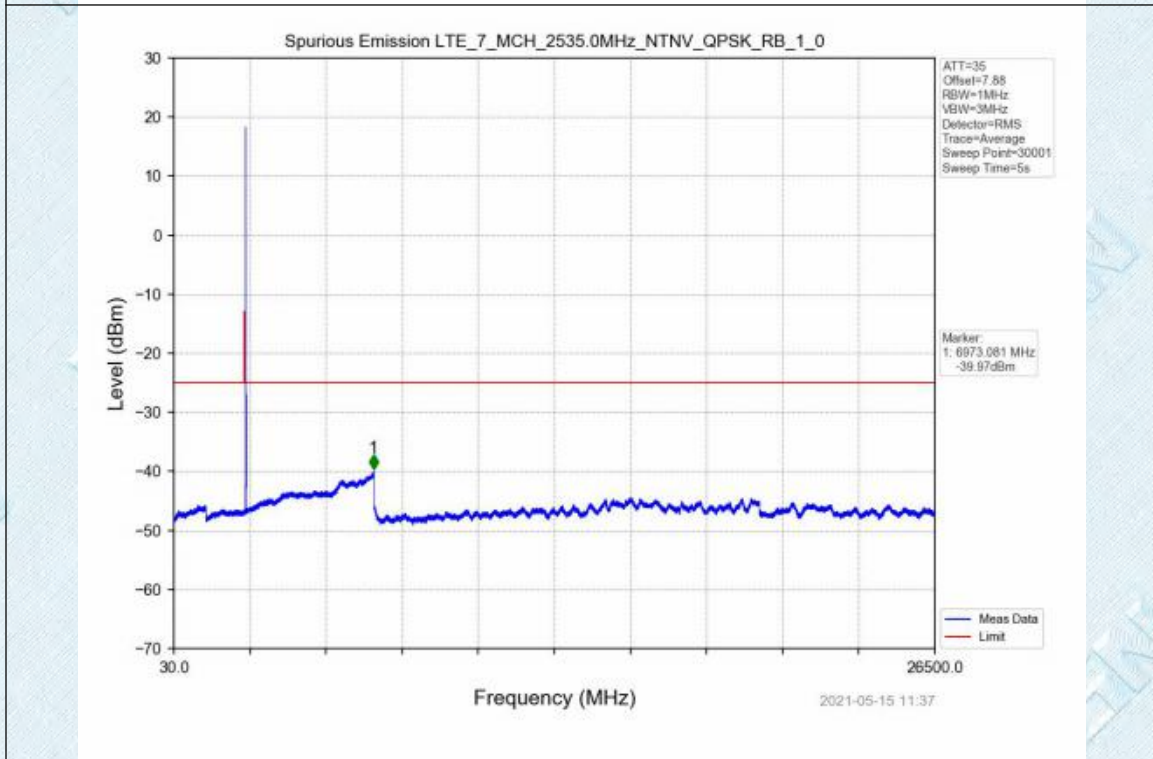
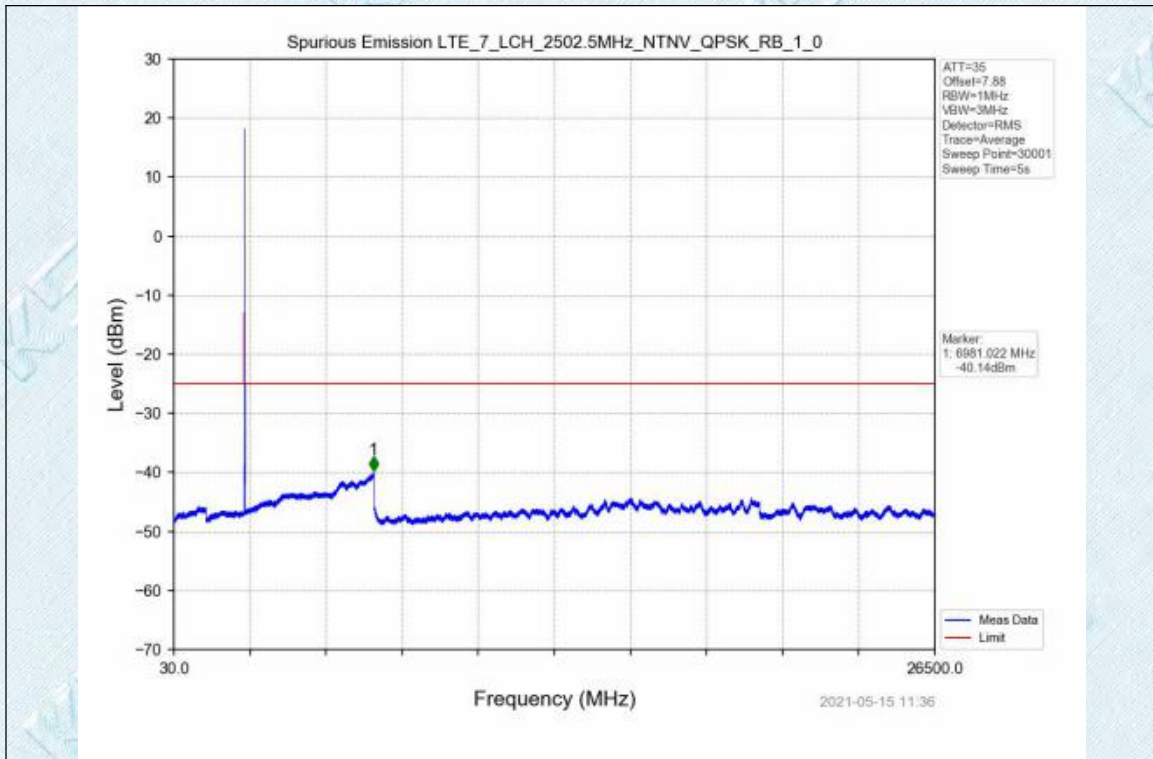


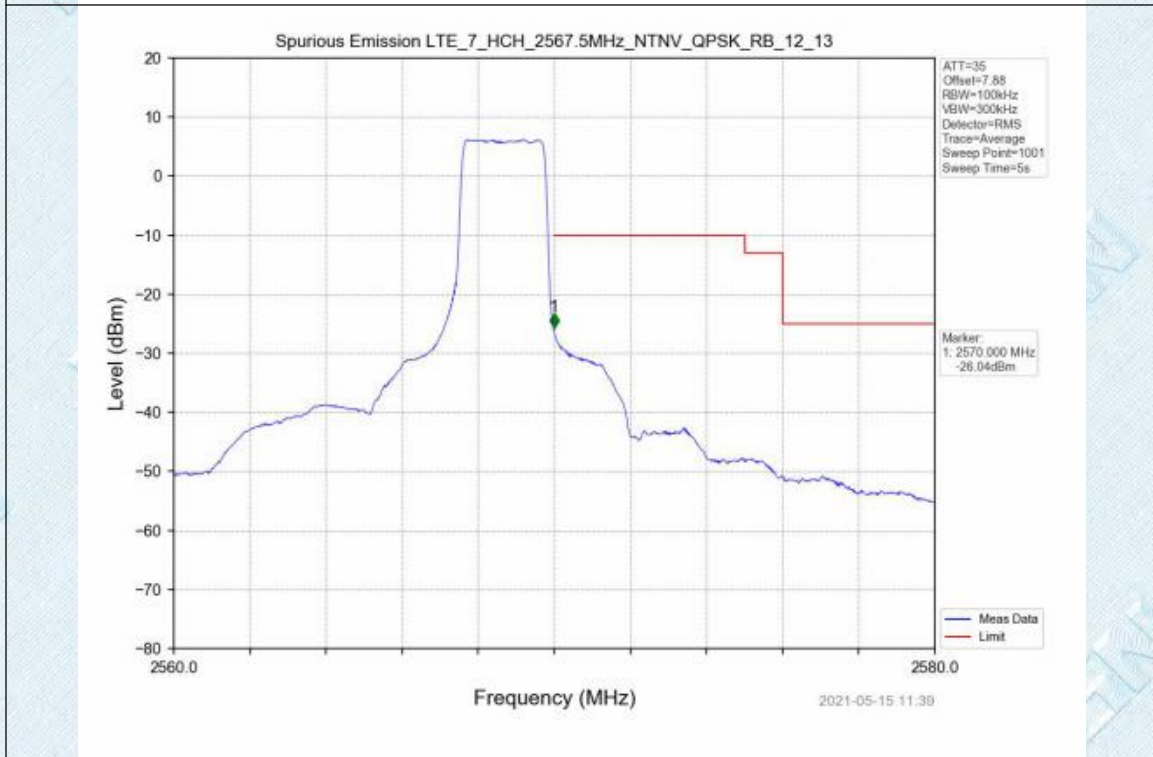
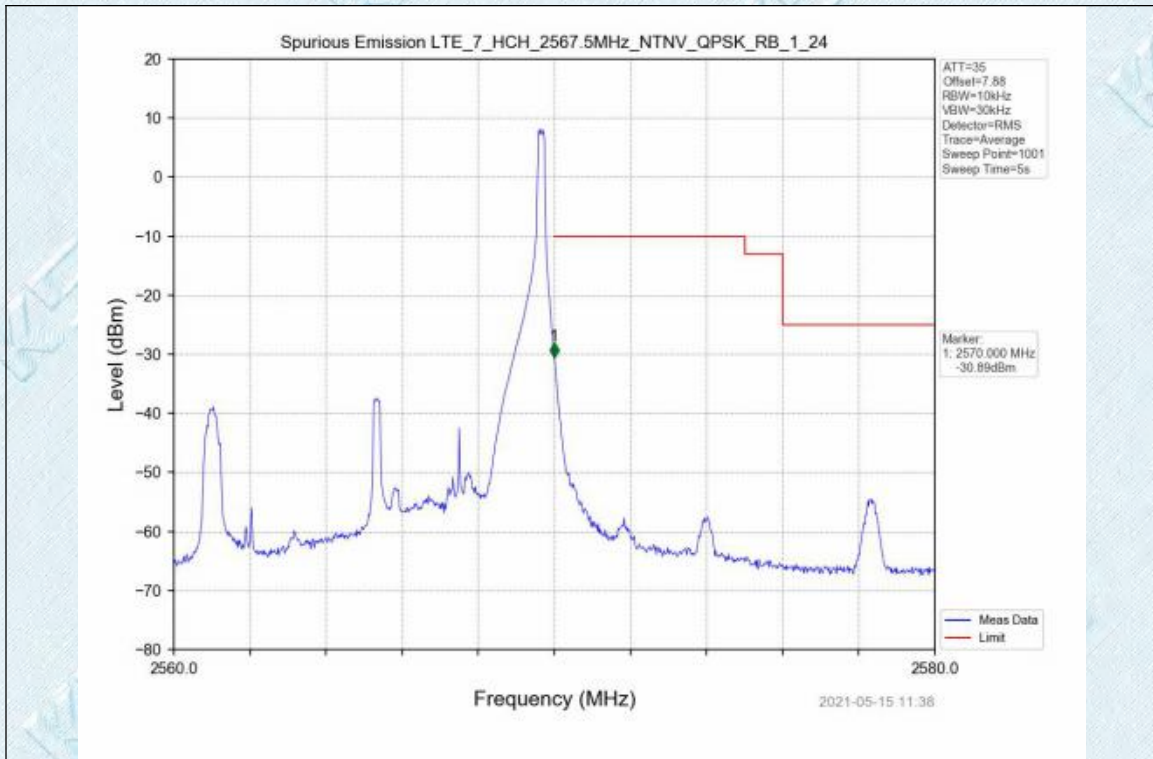


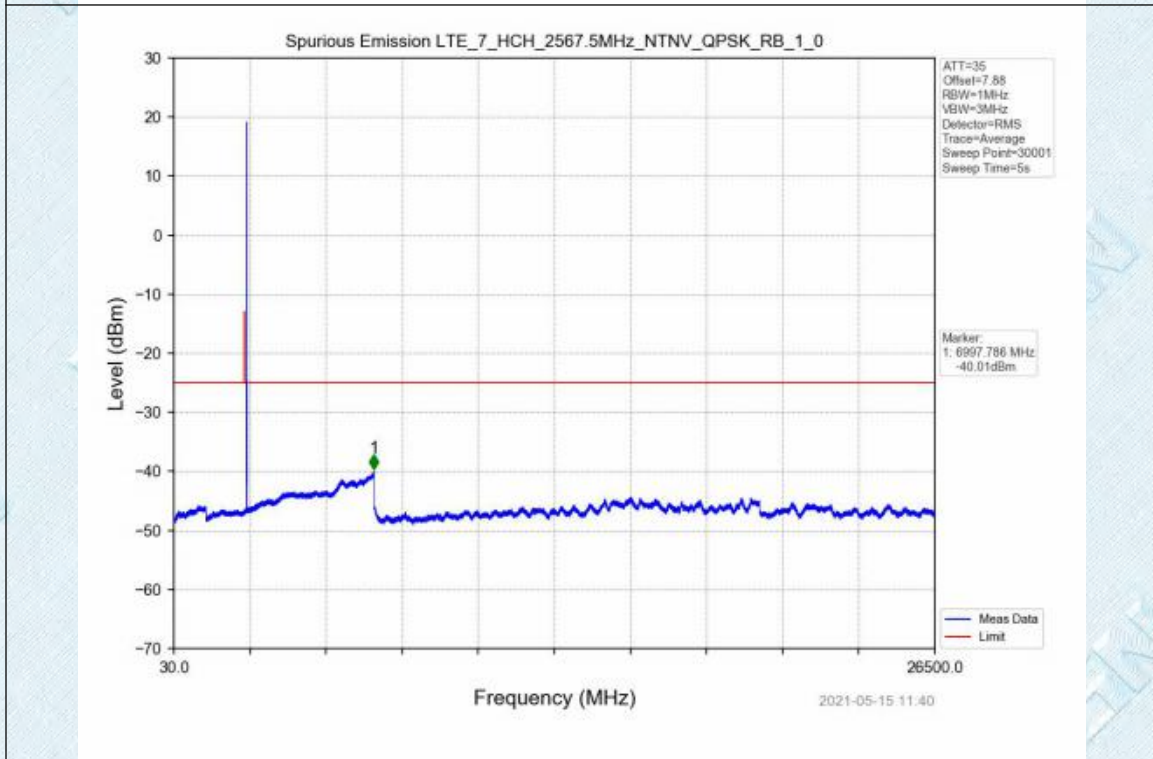
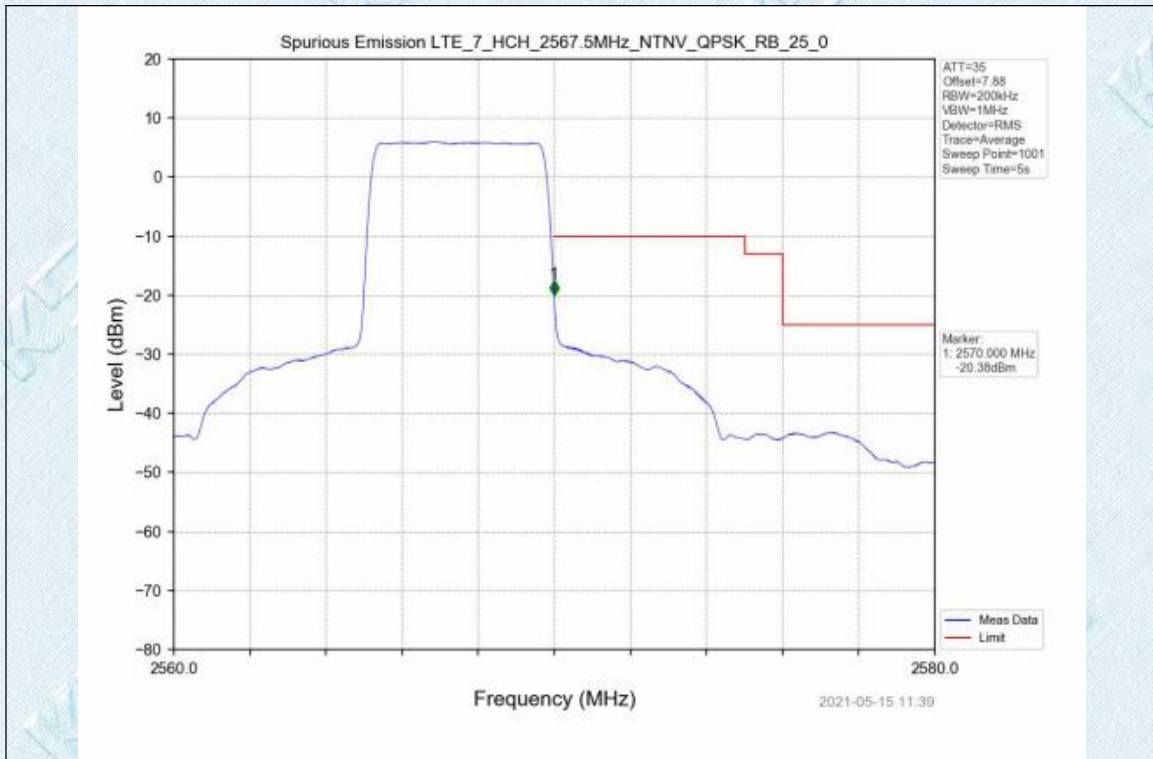






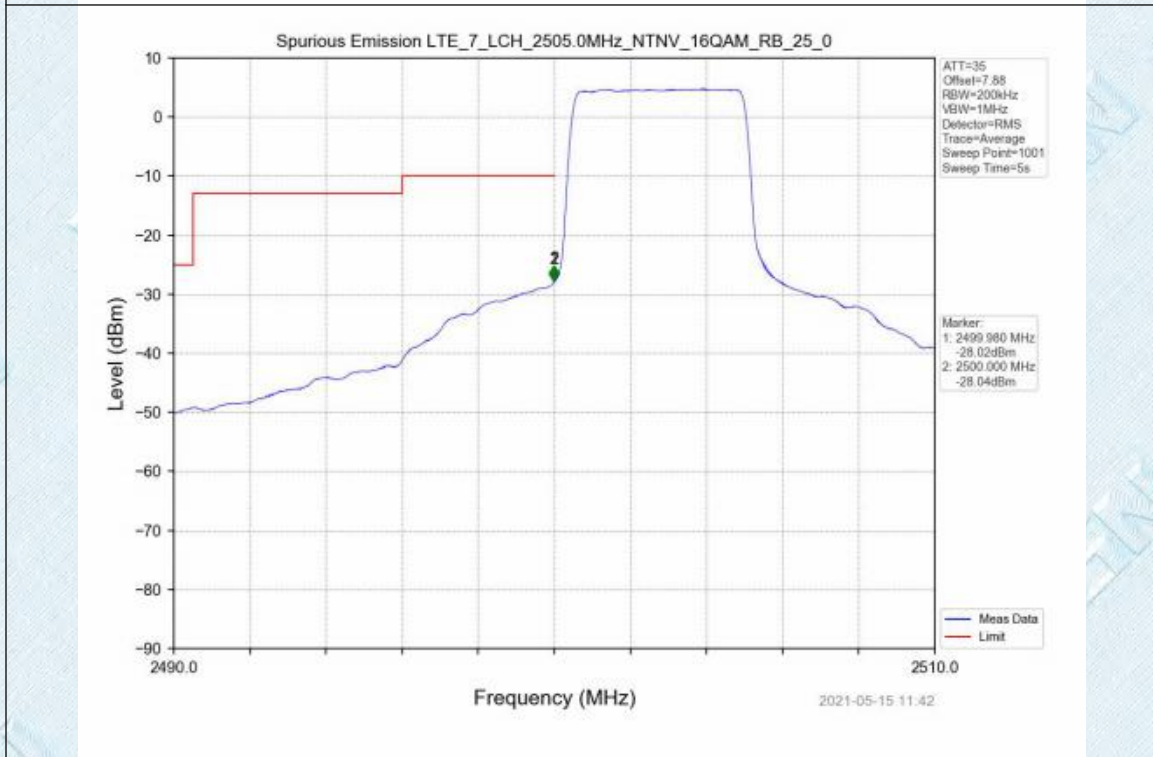
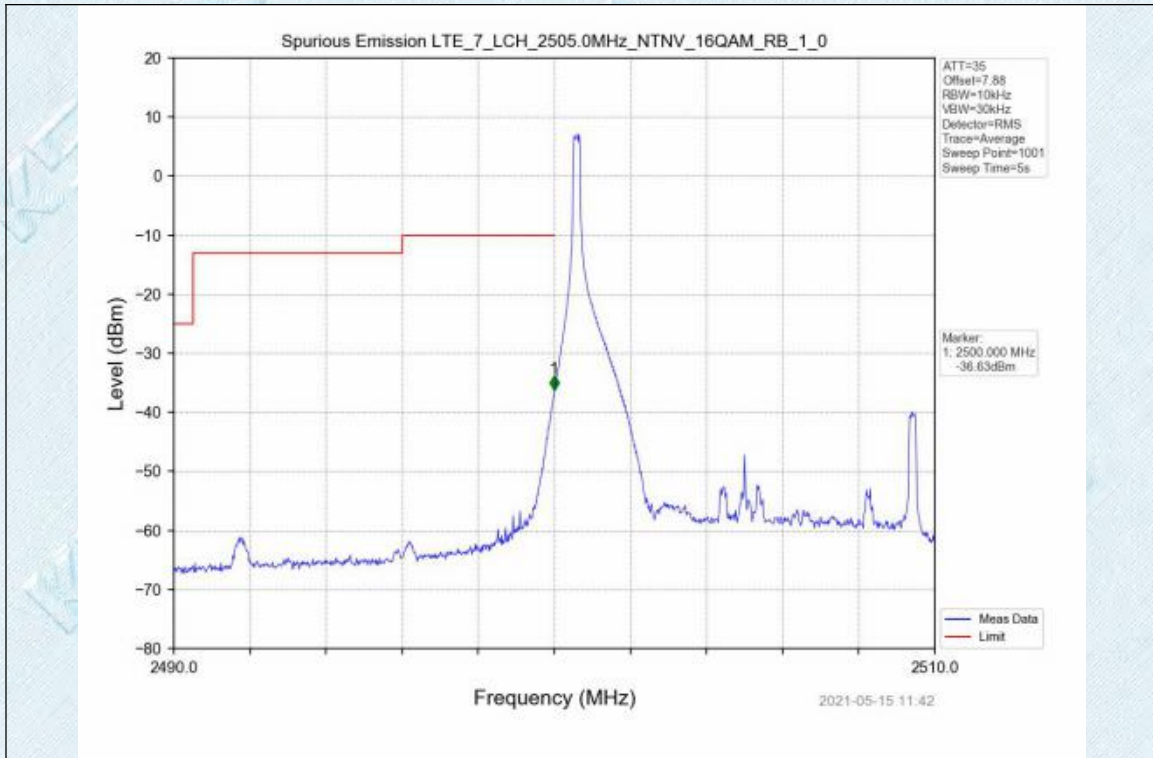


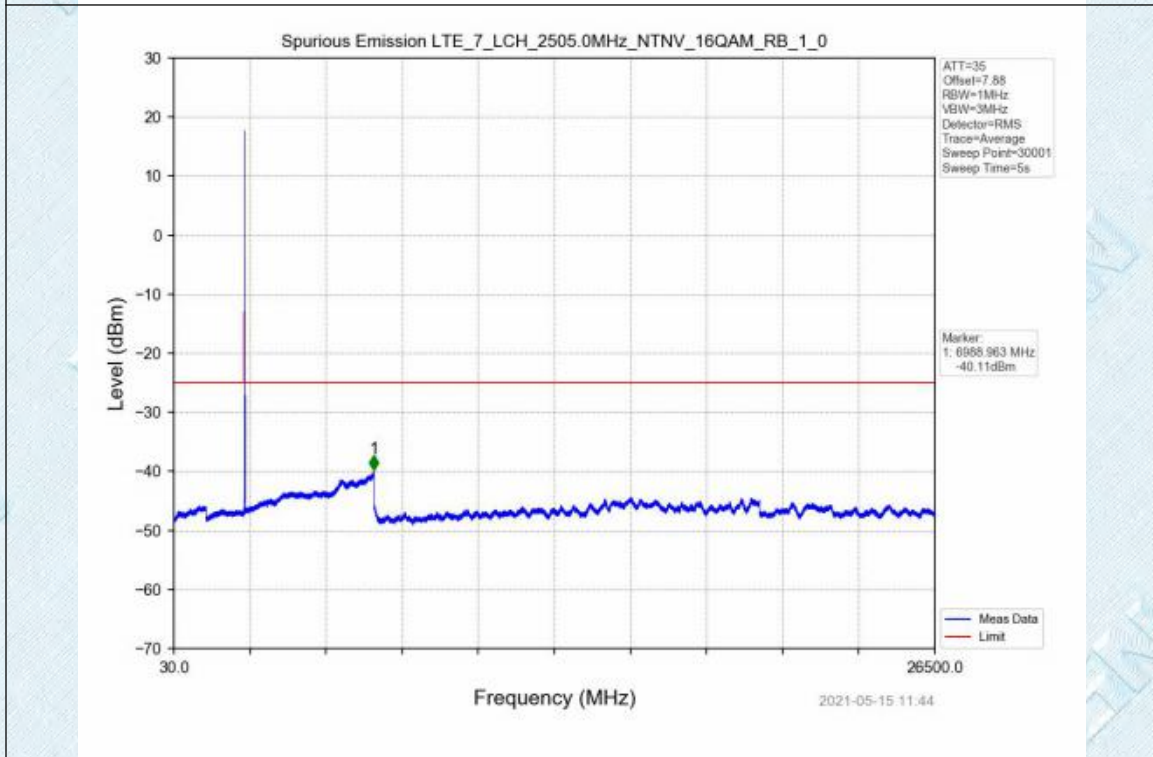
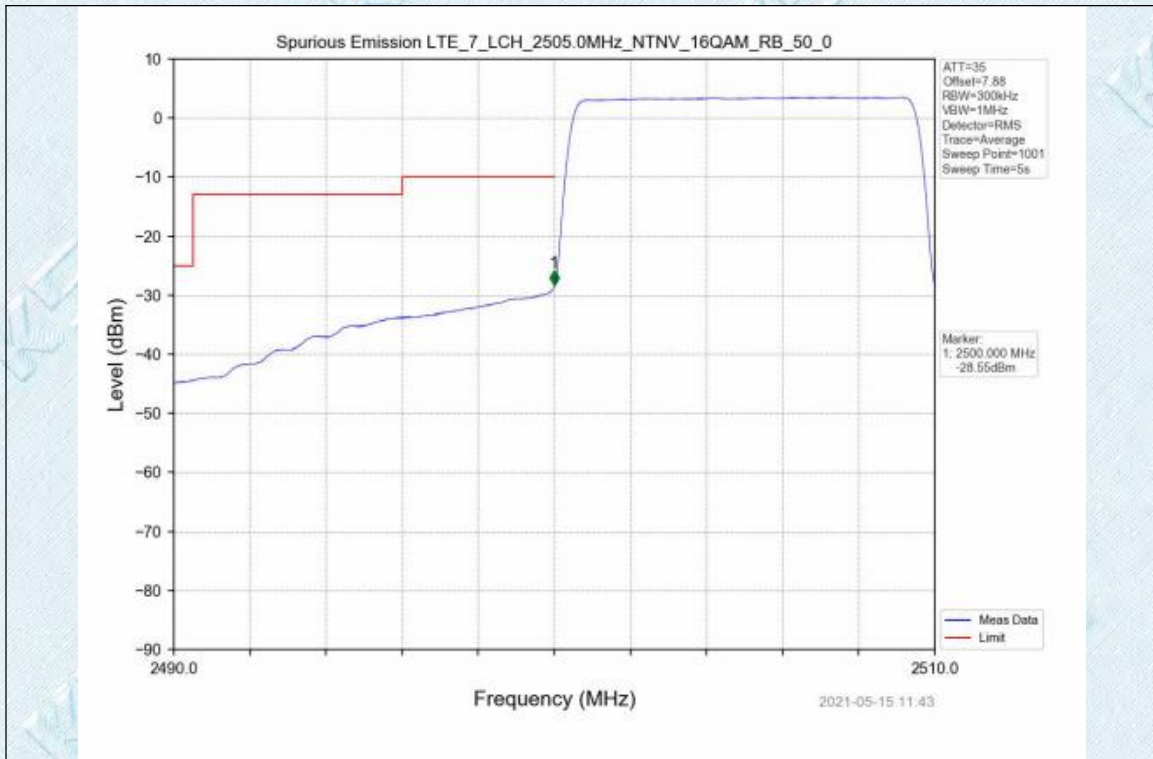


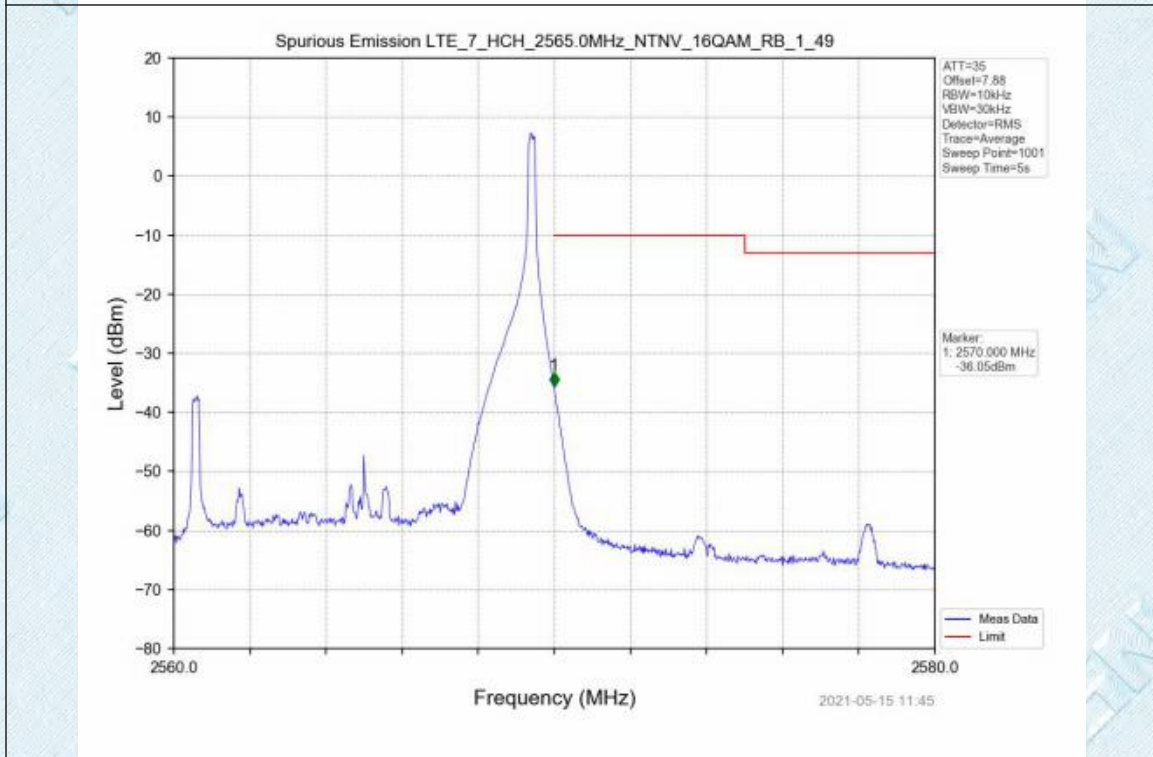
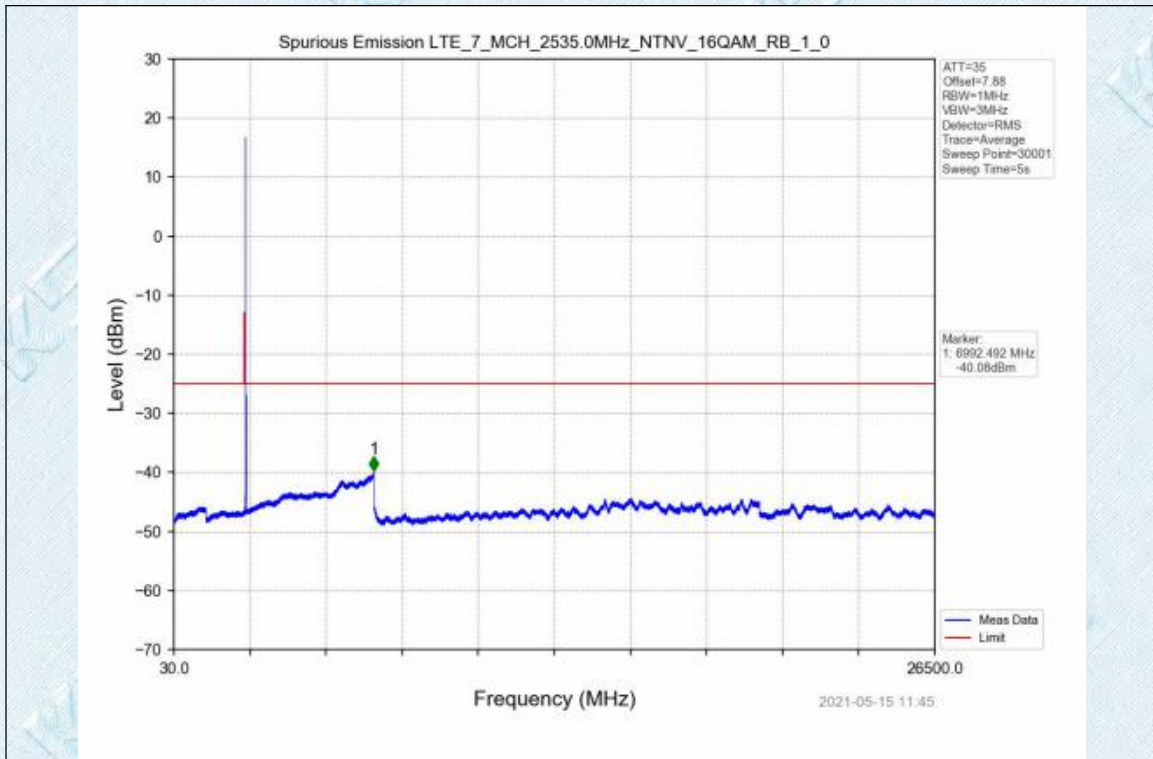


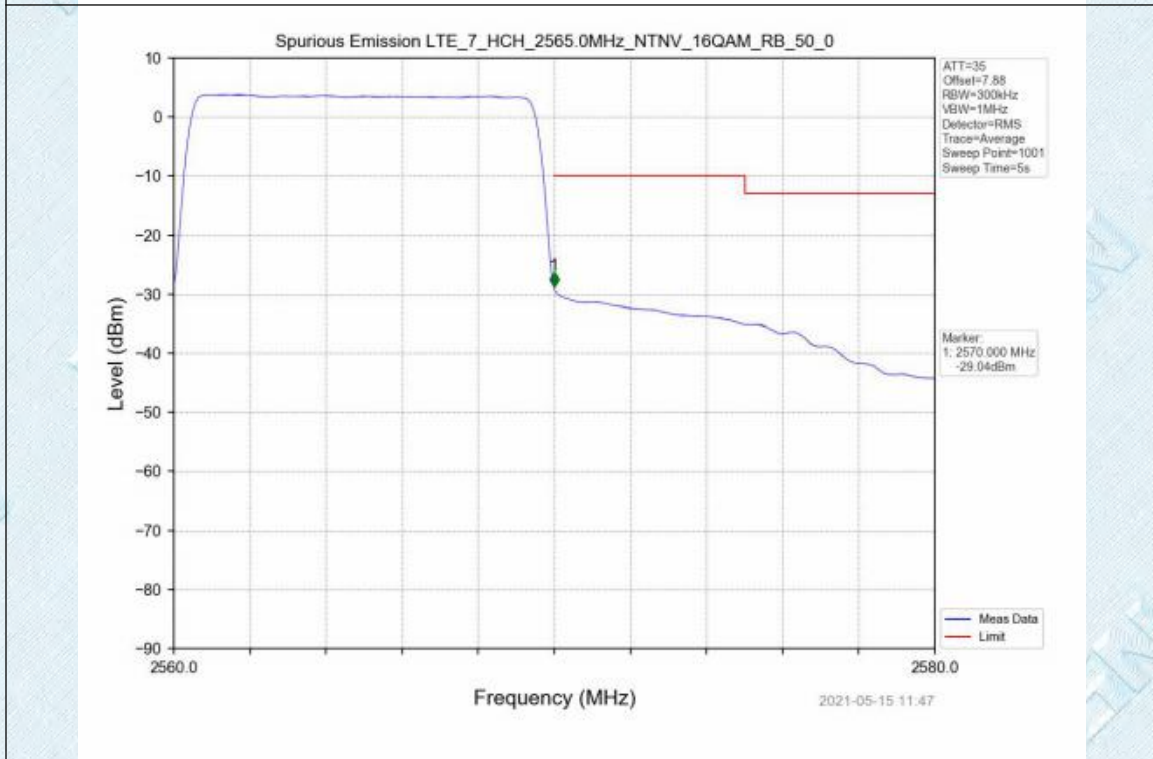
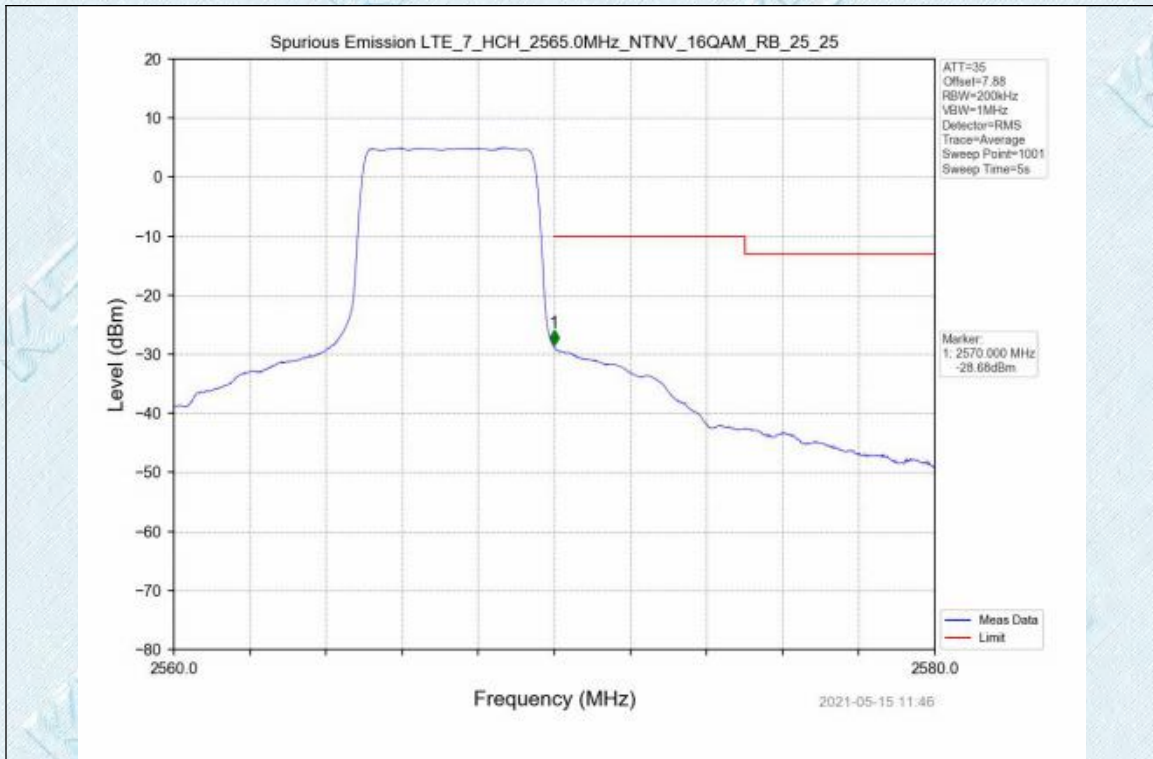
Test LTE Band 7 _ 10MHz Bandwidth

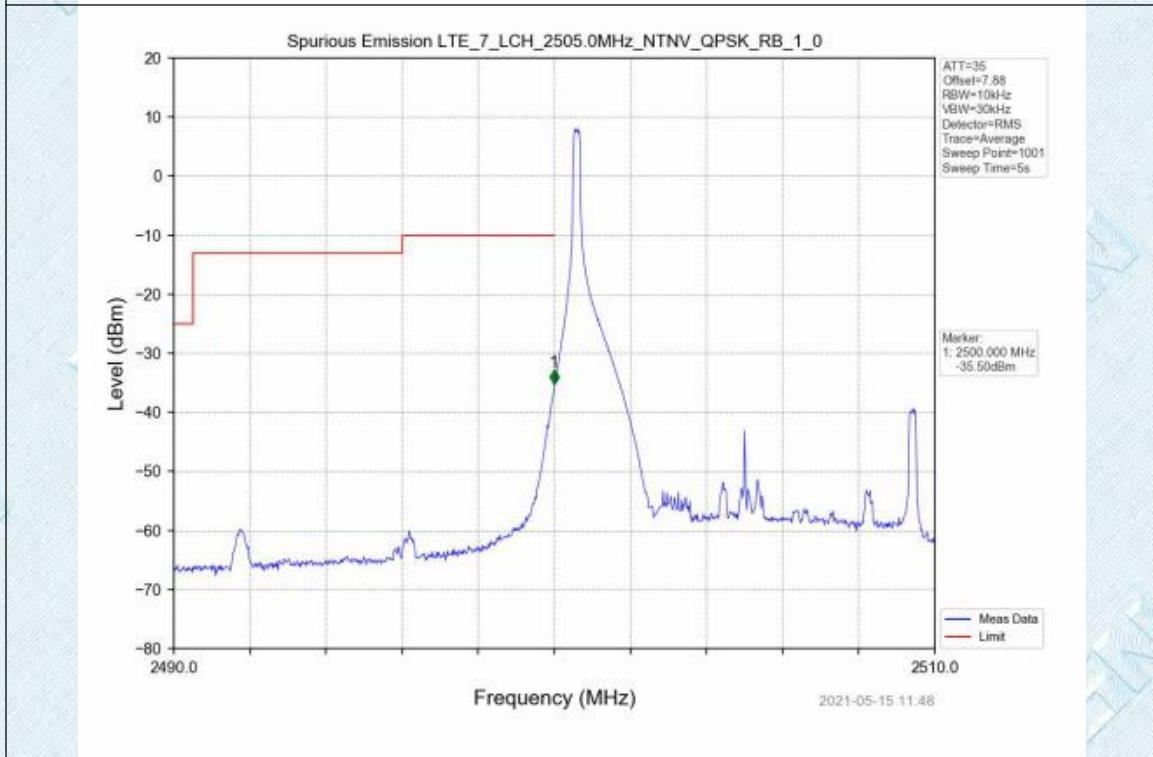
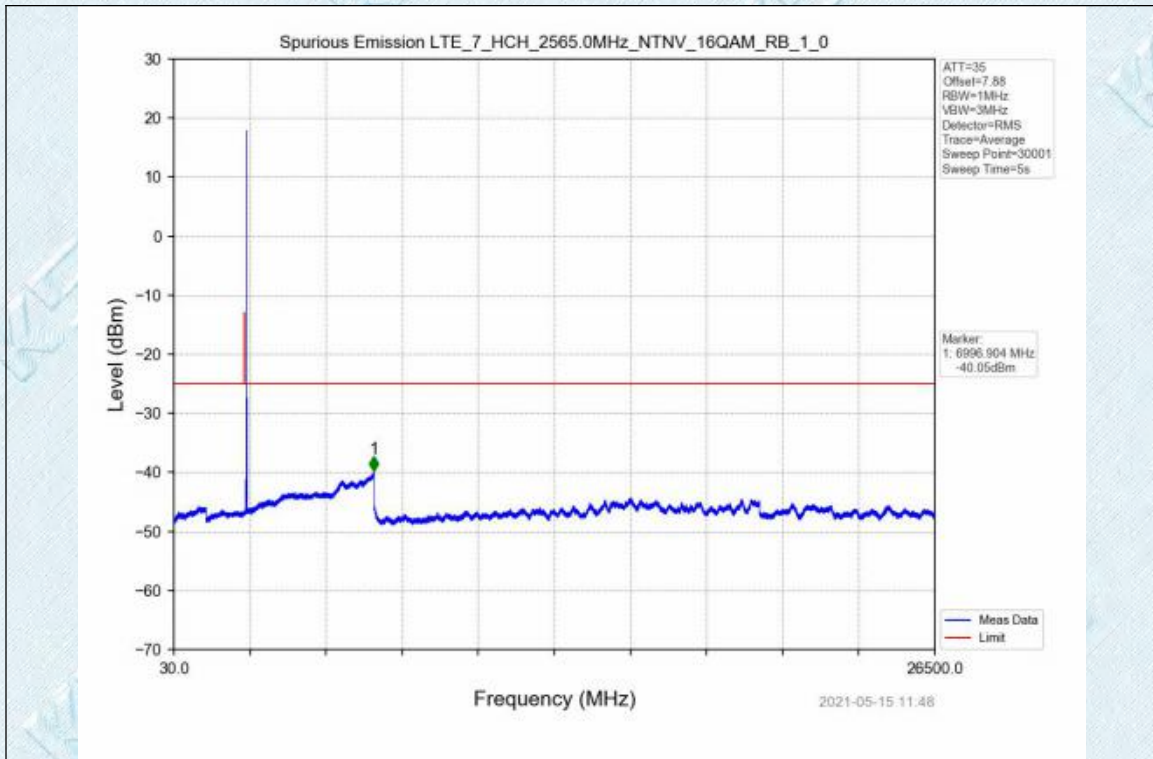
Test Graph

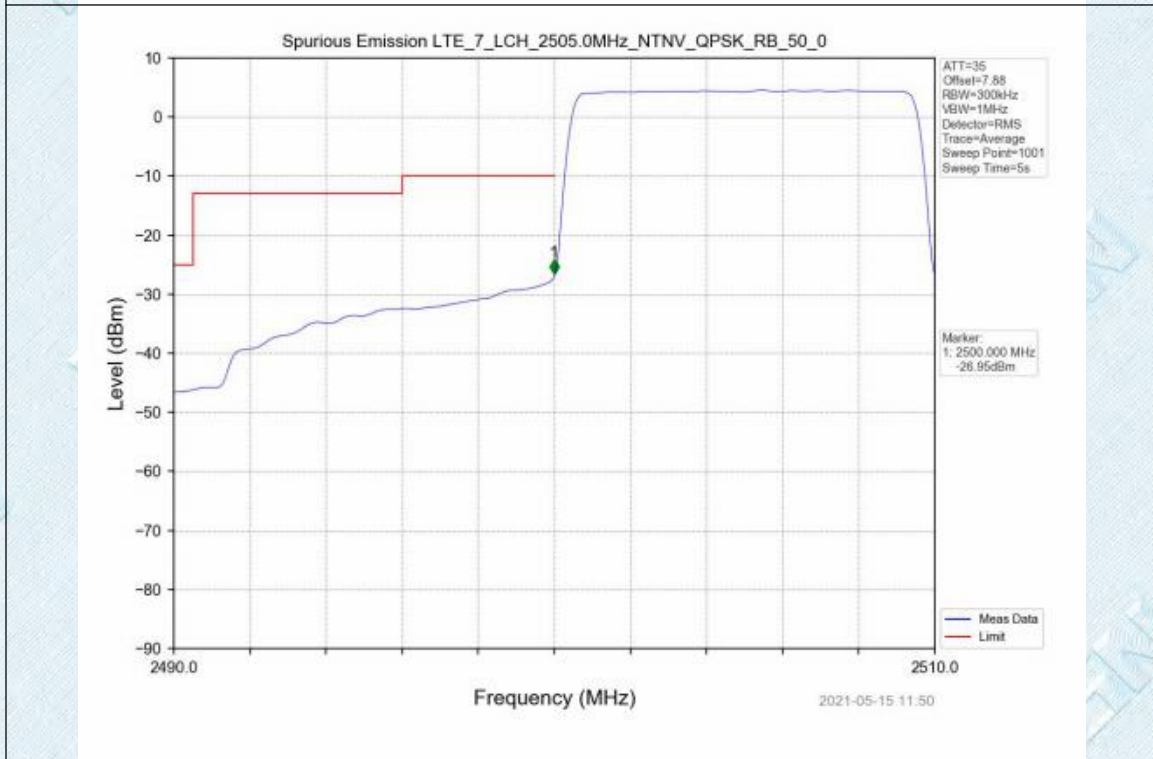
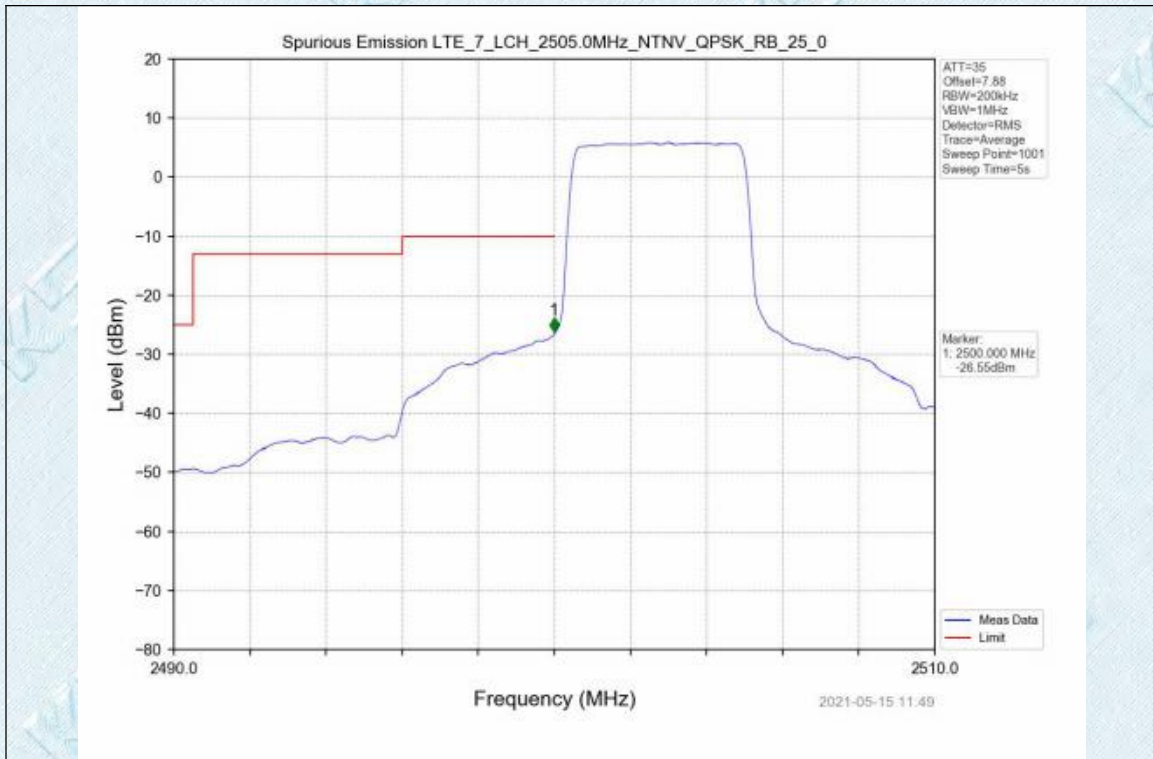


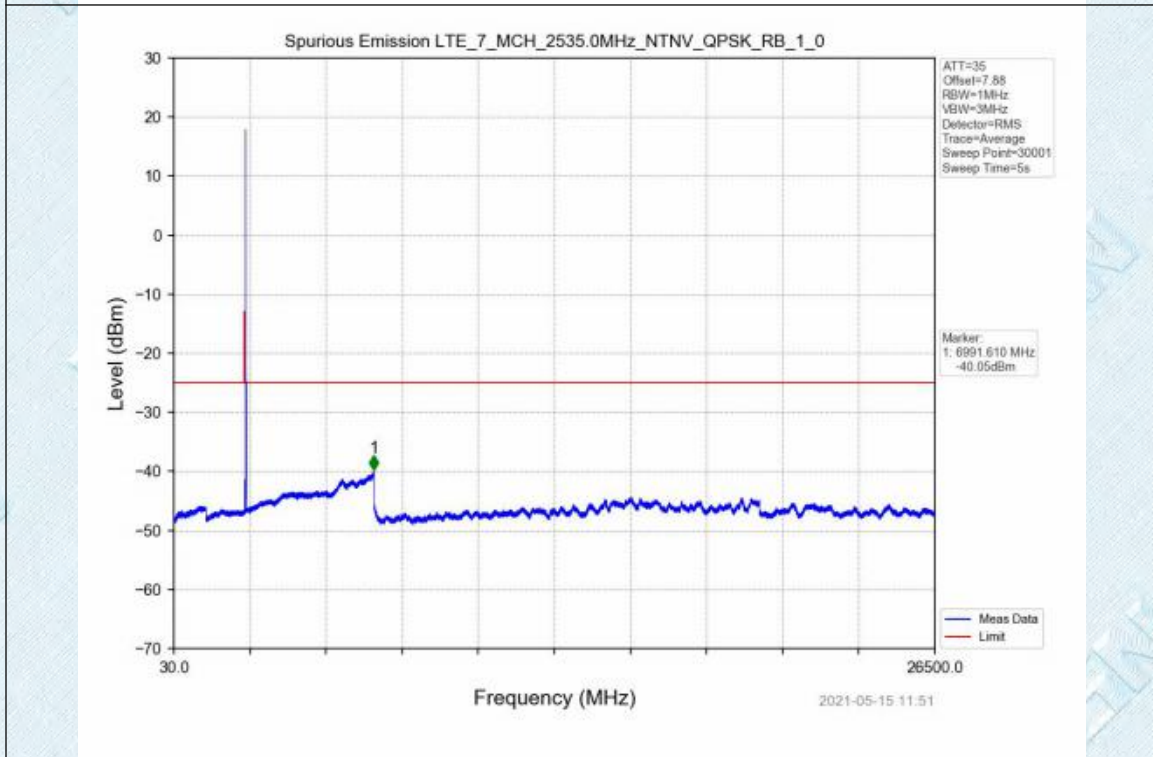
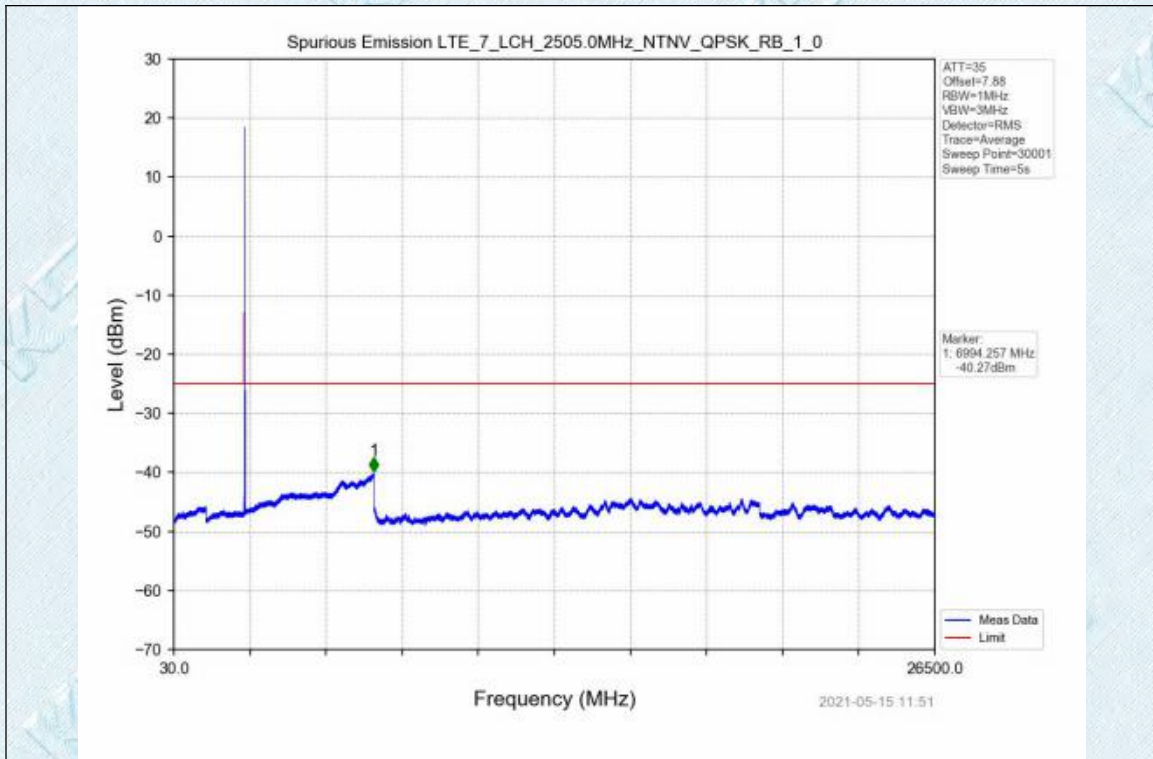


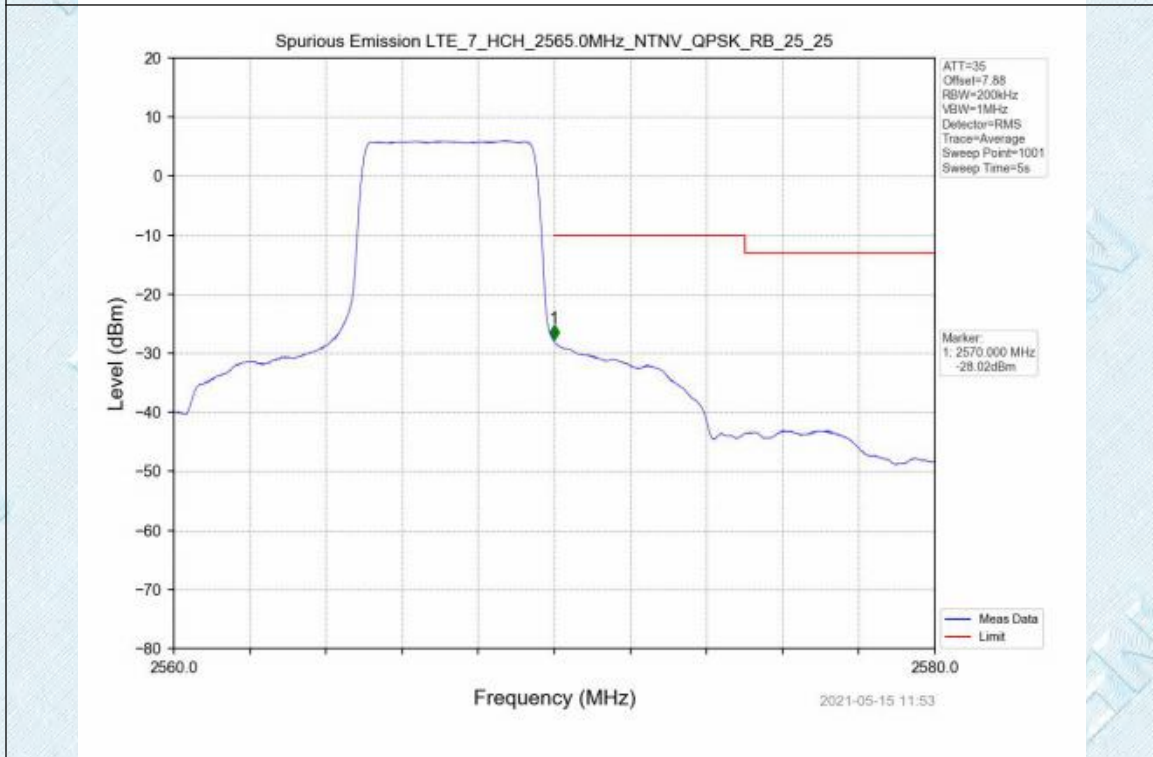
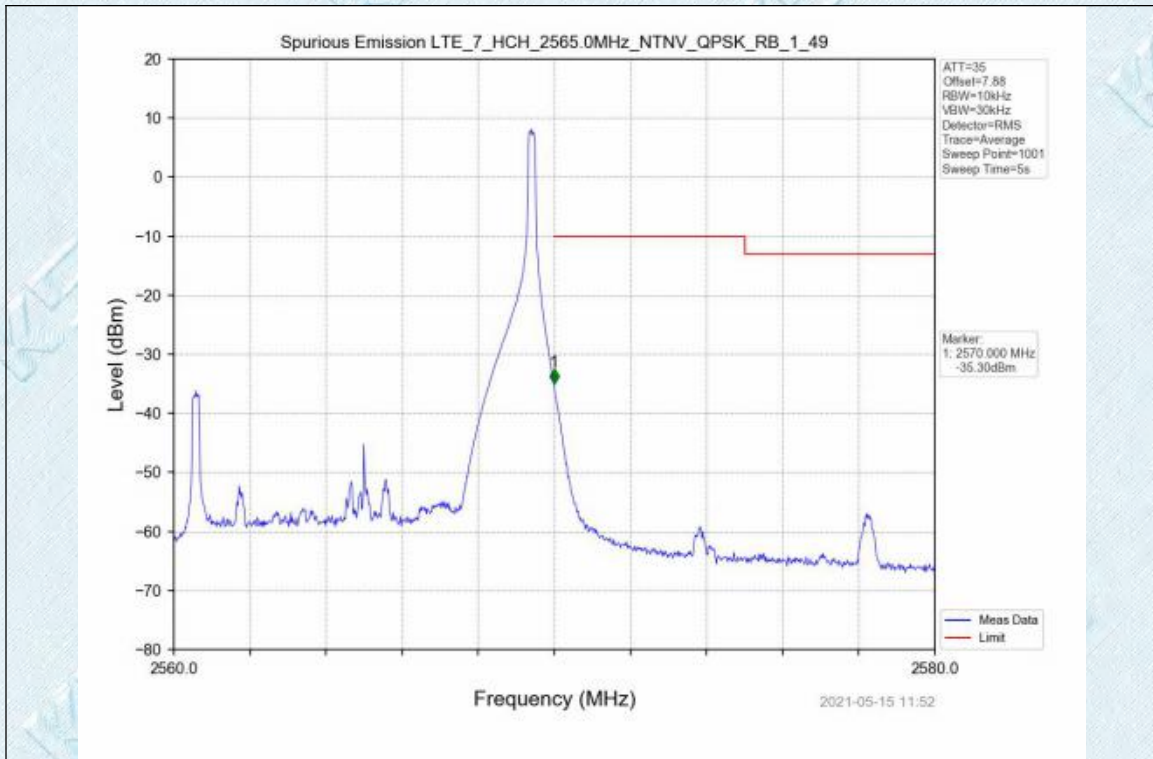


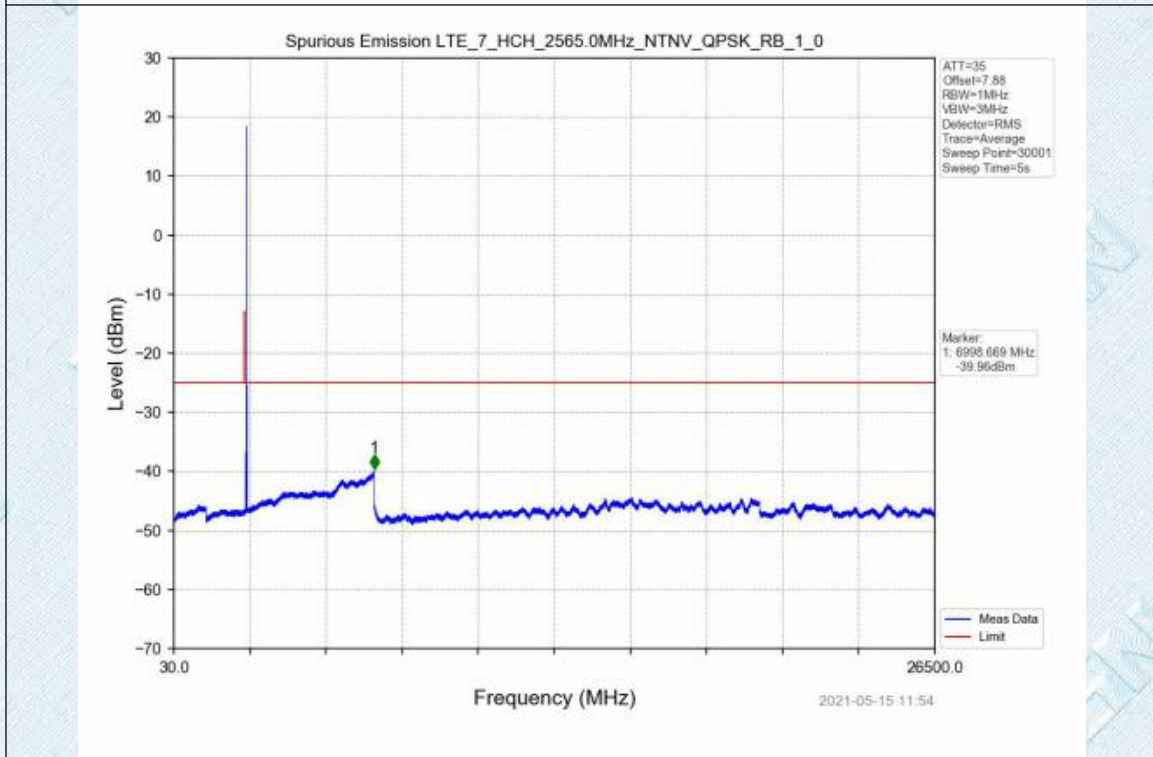
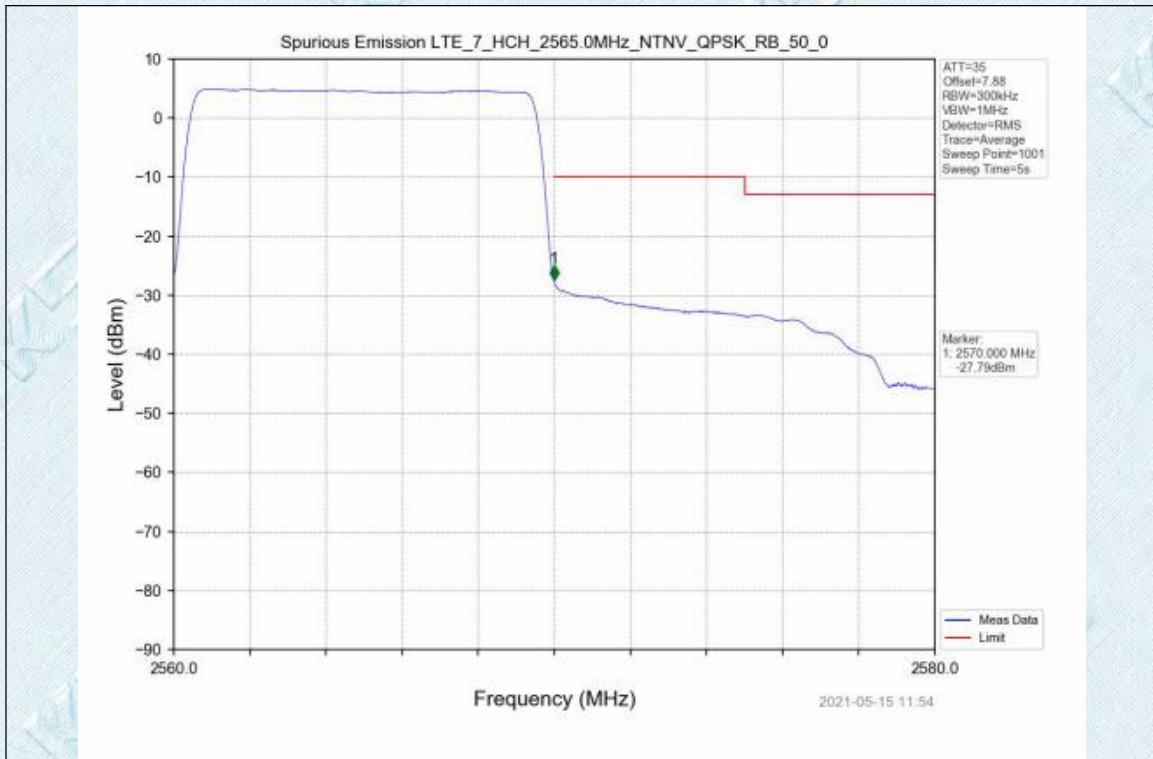






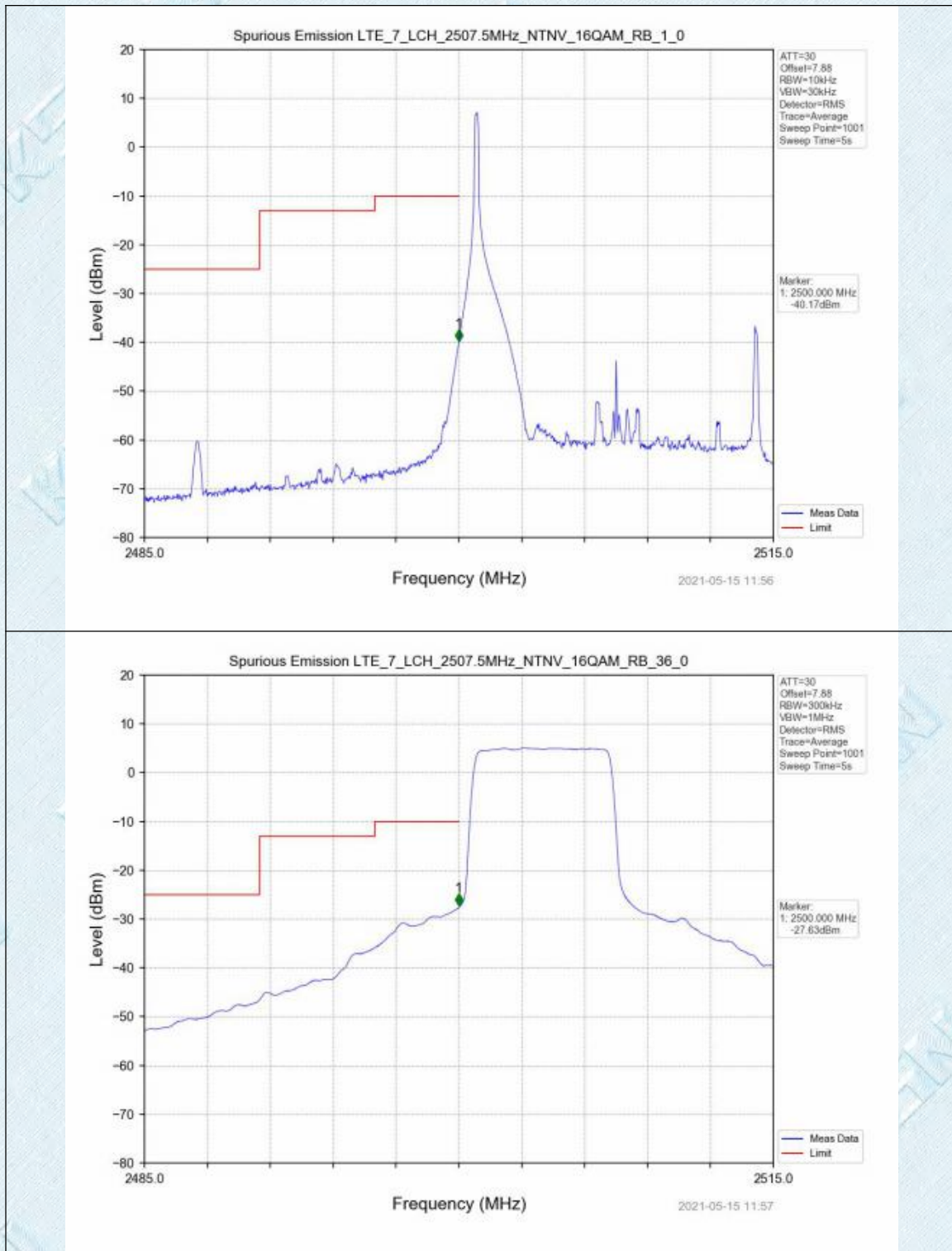


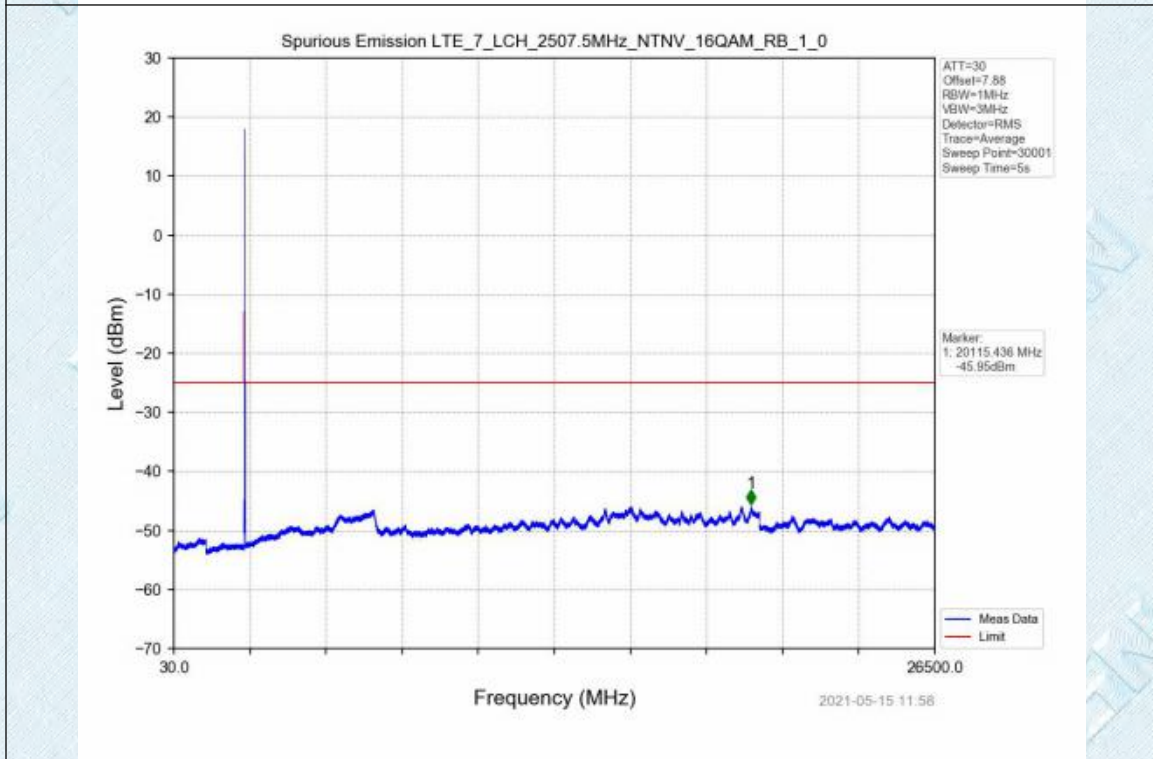
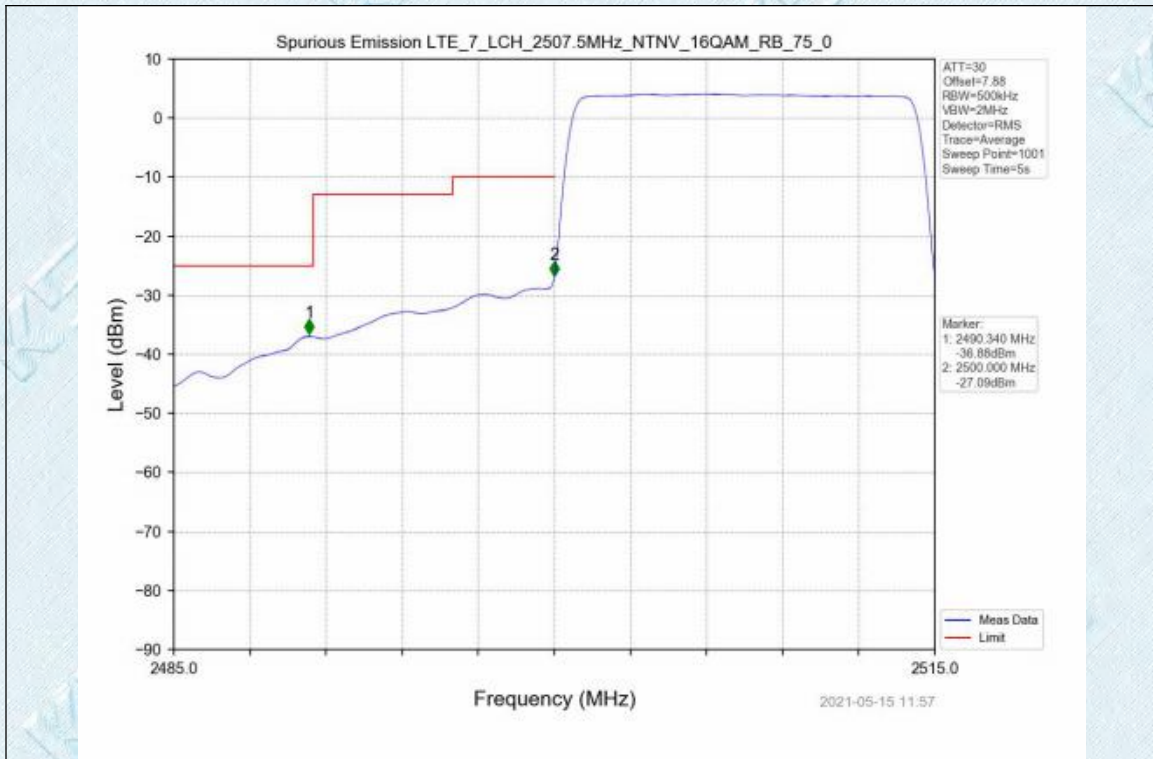


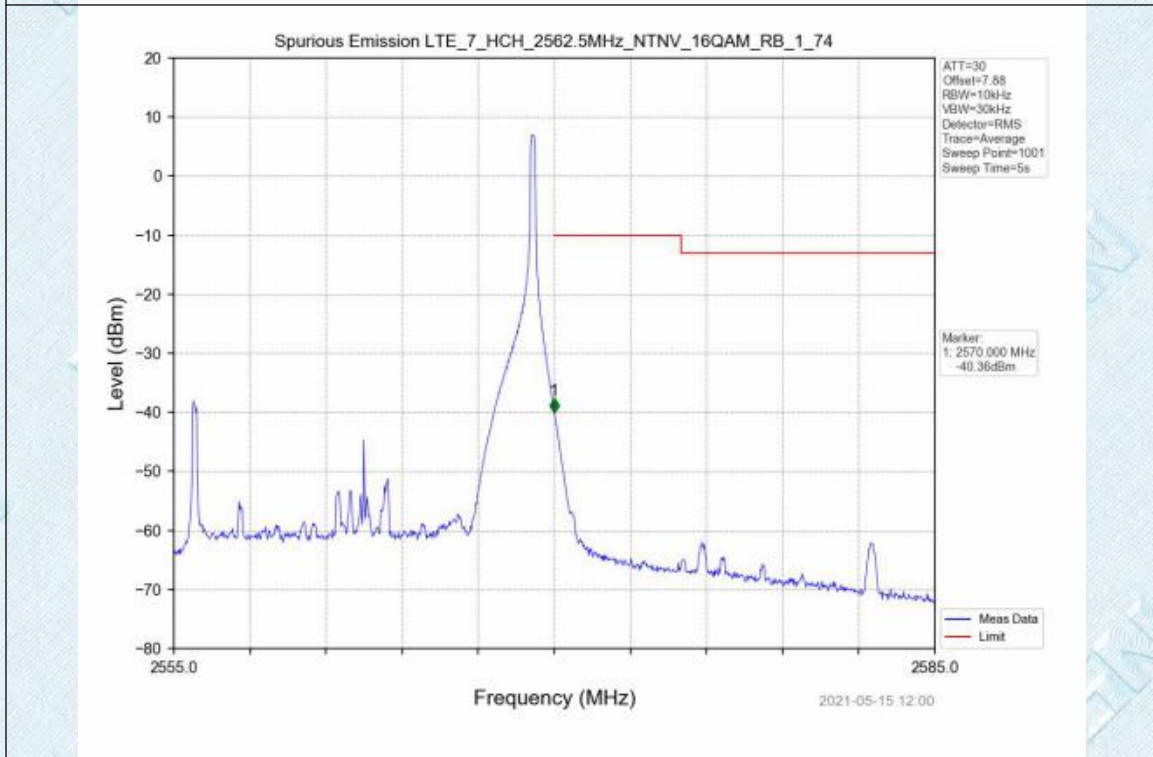
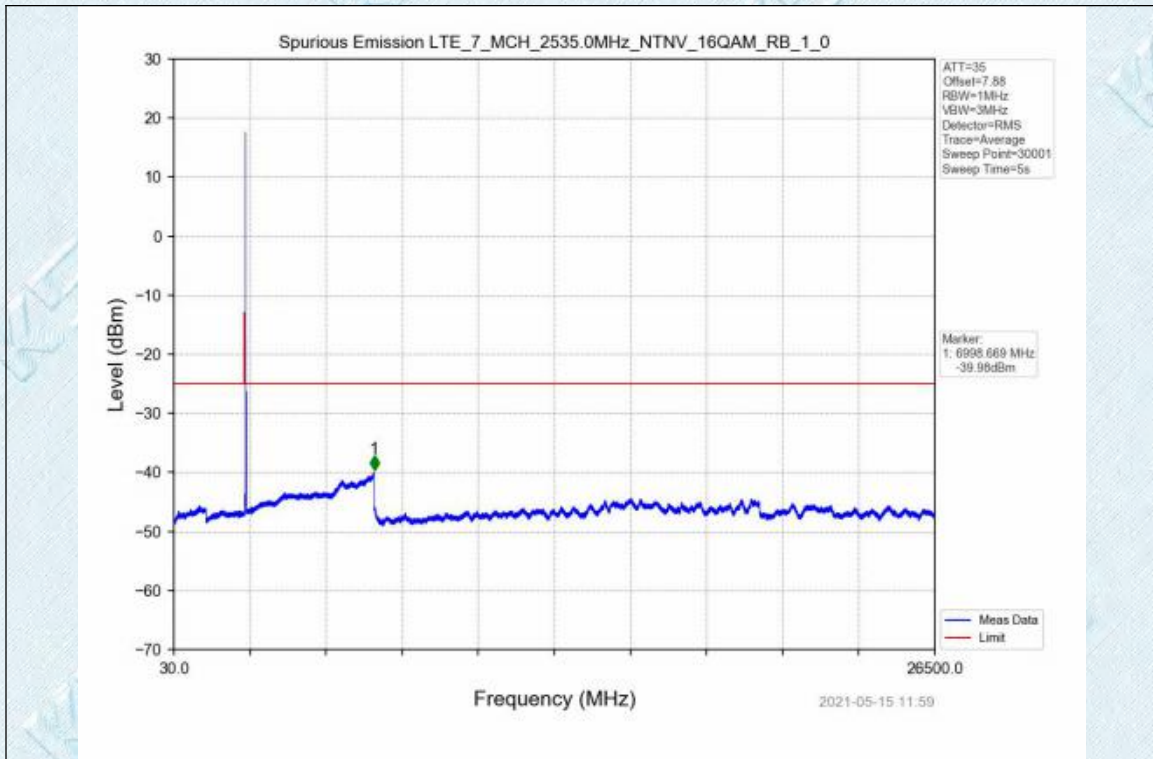


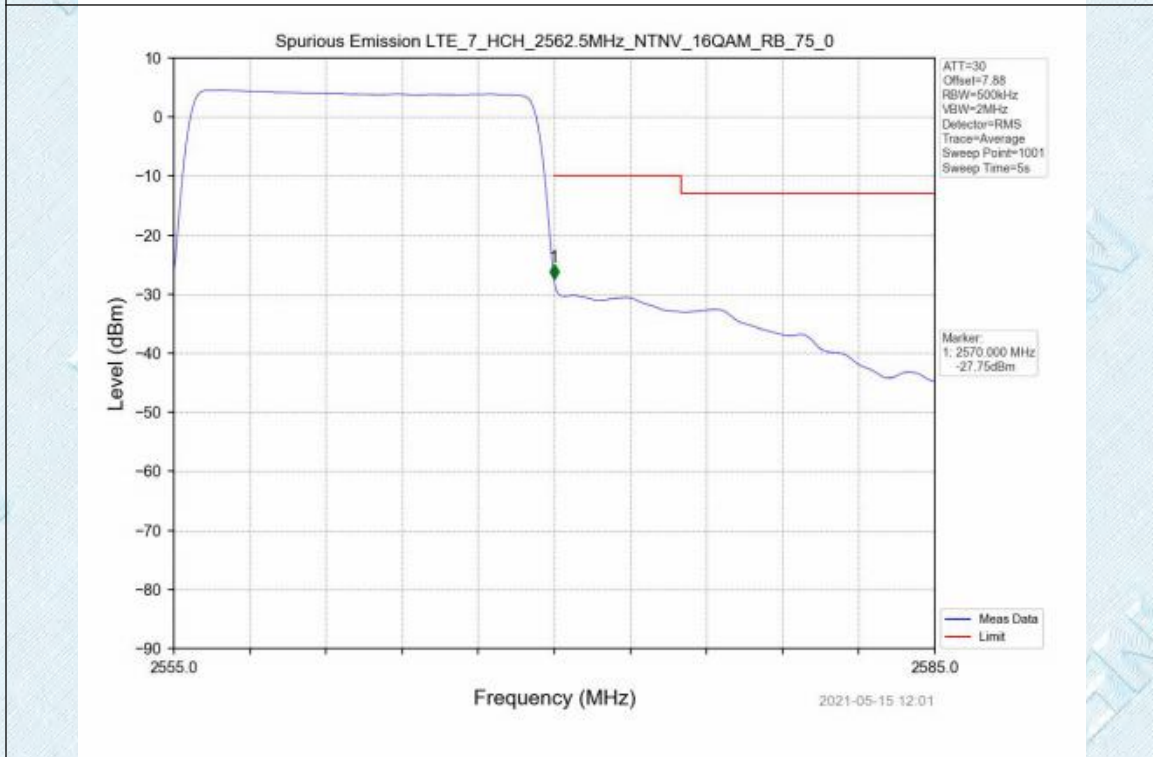
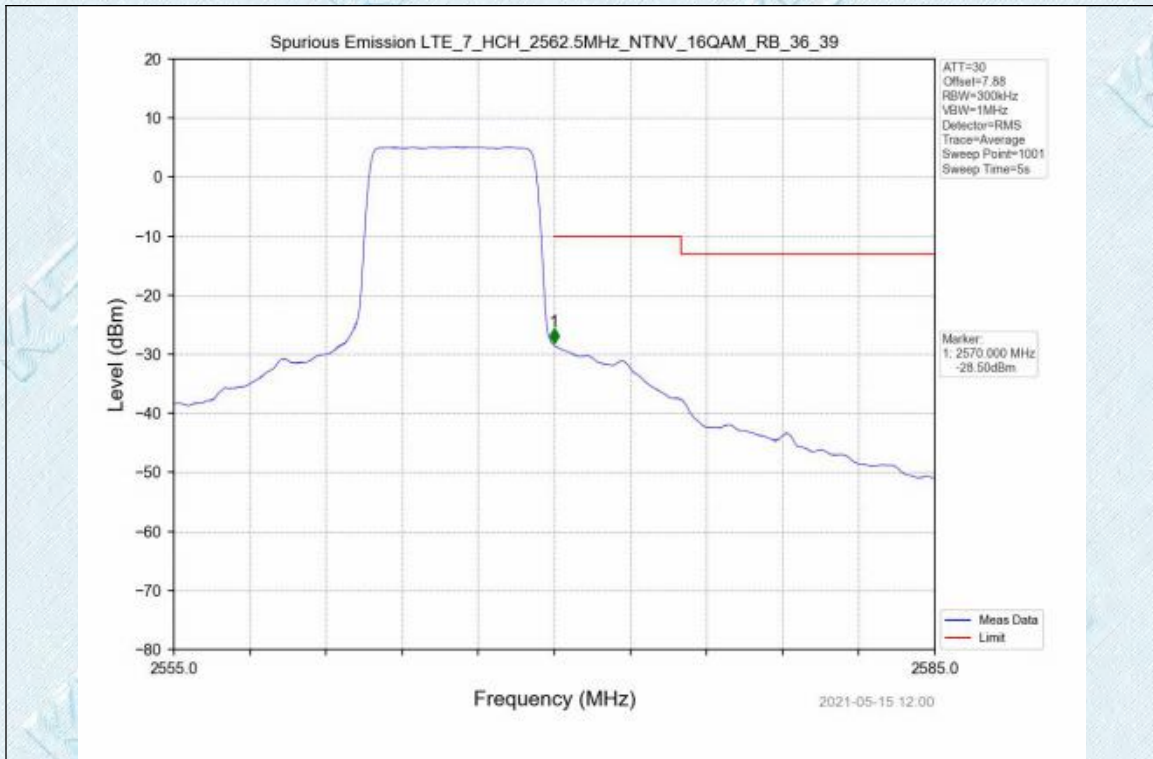
Test LTE Band 7 _ 15MHz Bandwidth

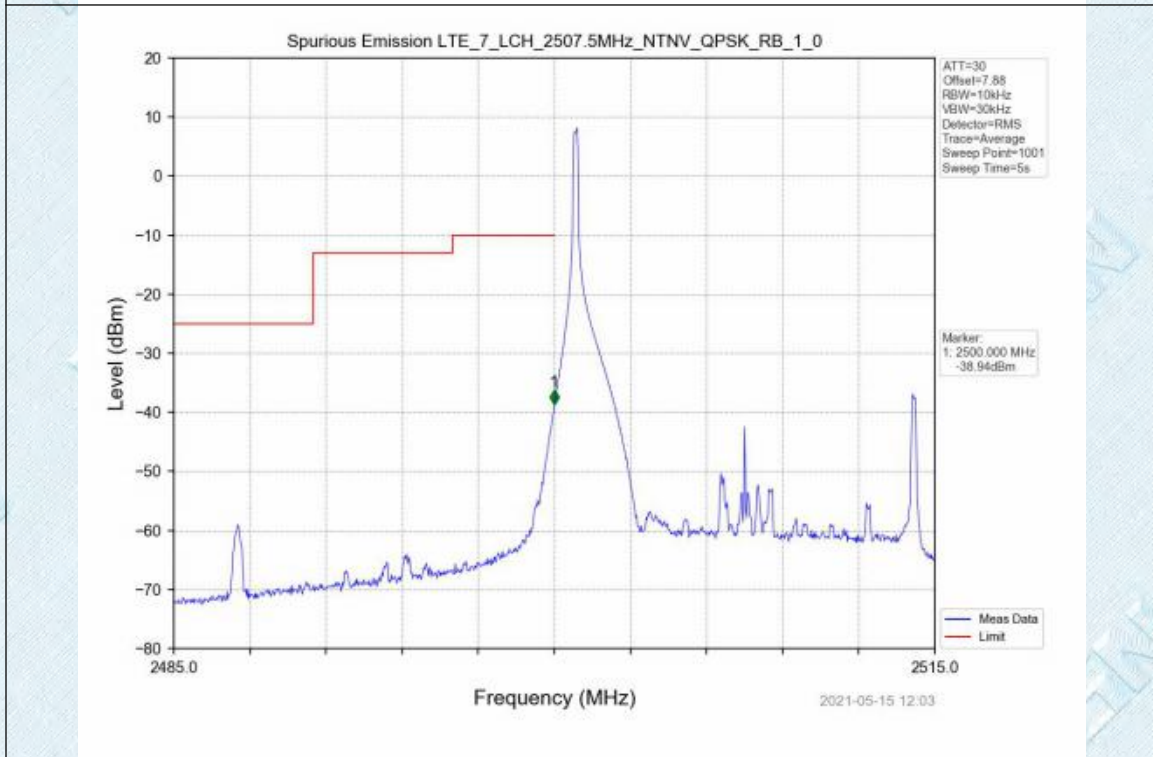
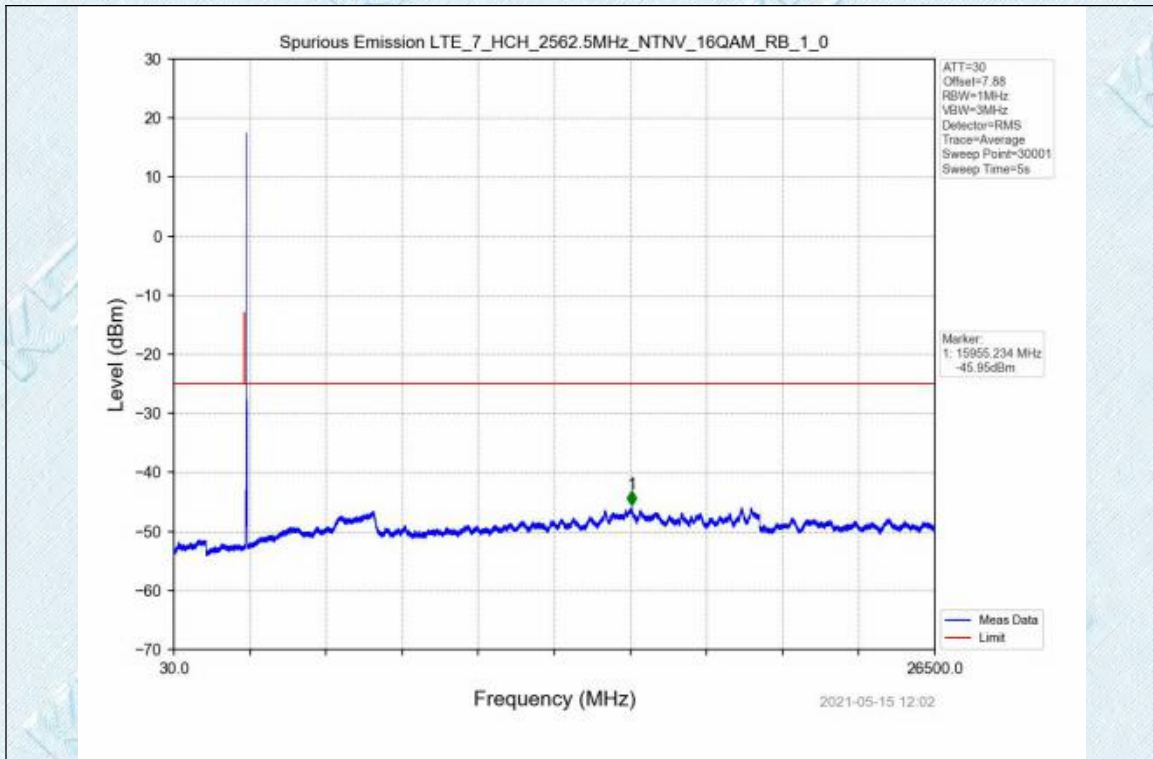
Test Graph

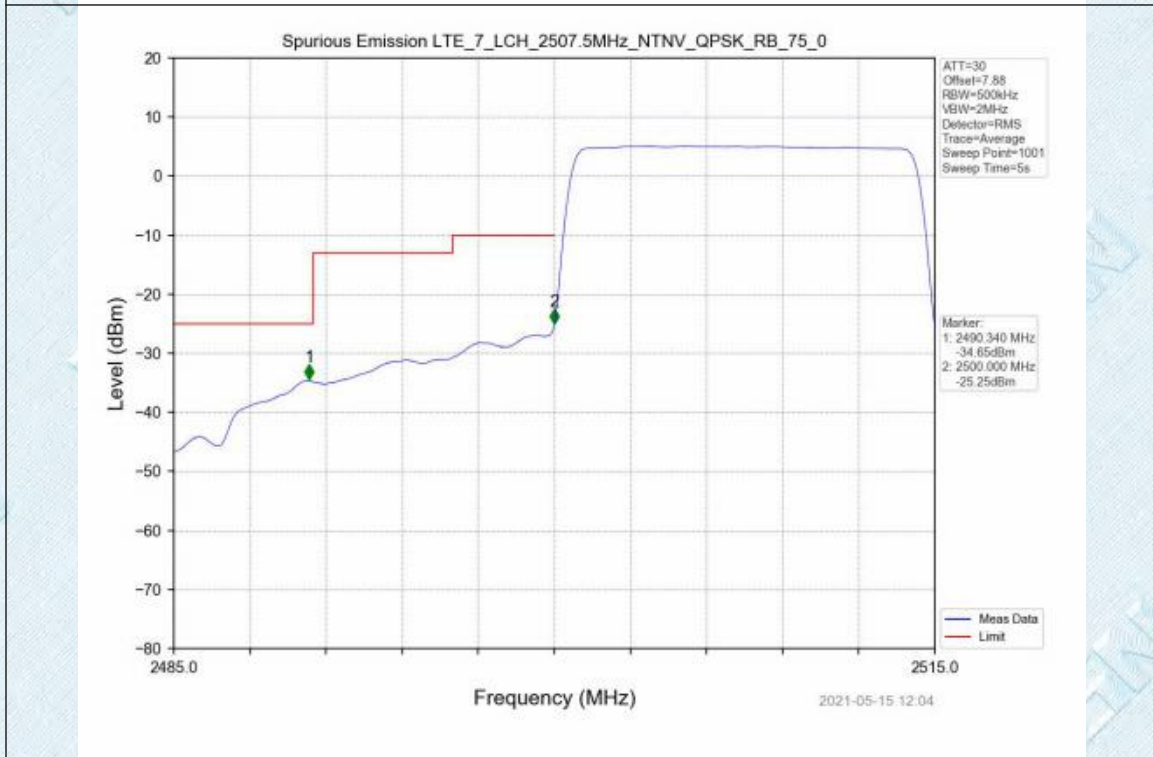
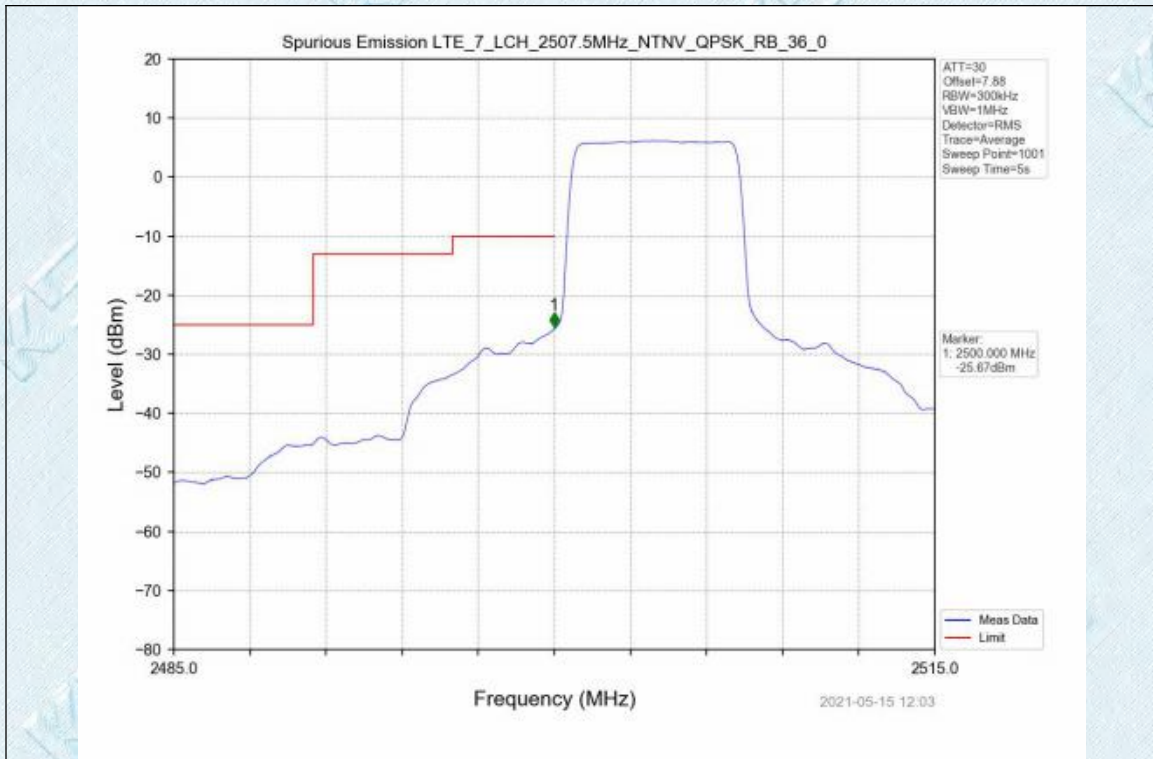


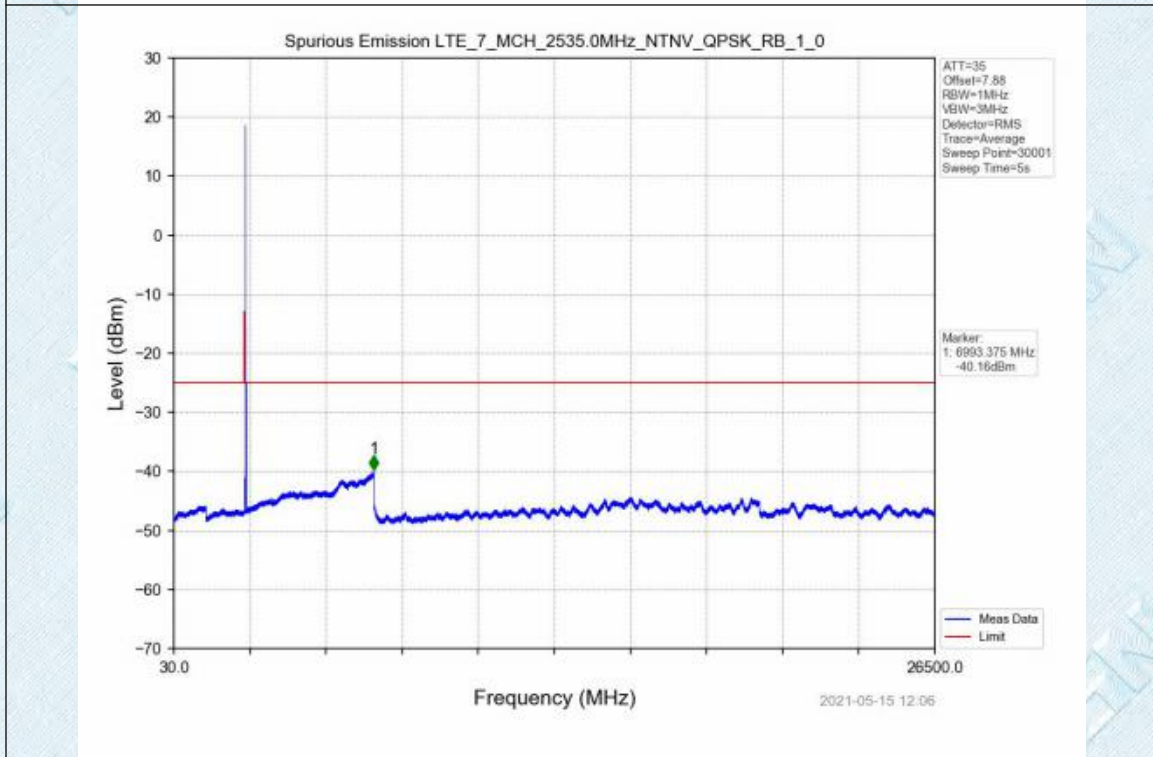
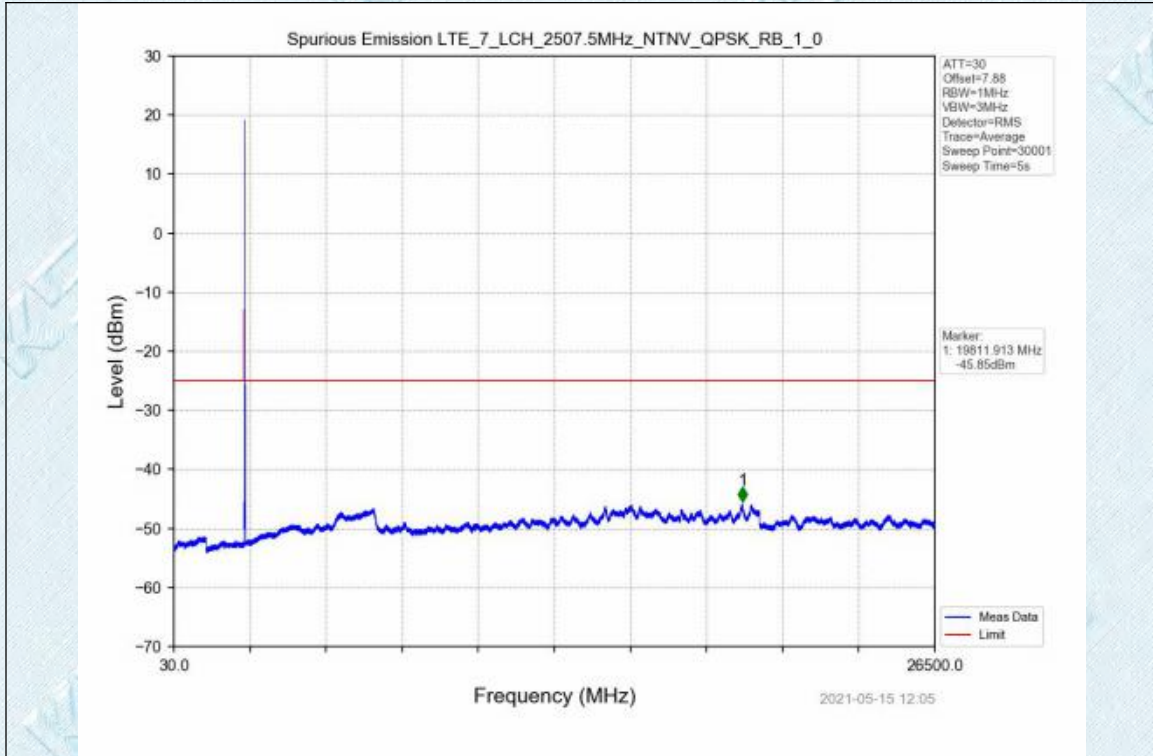


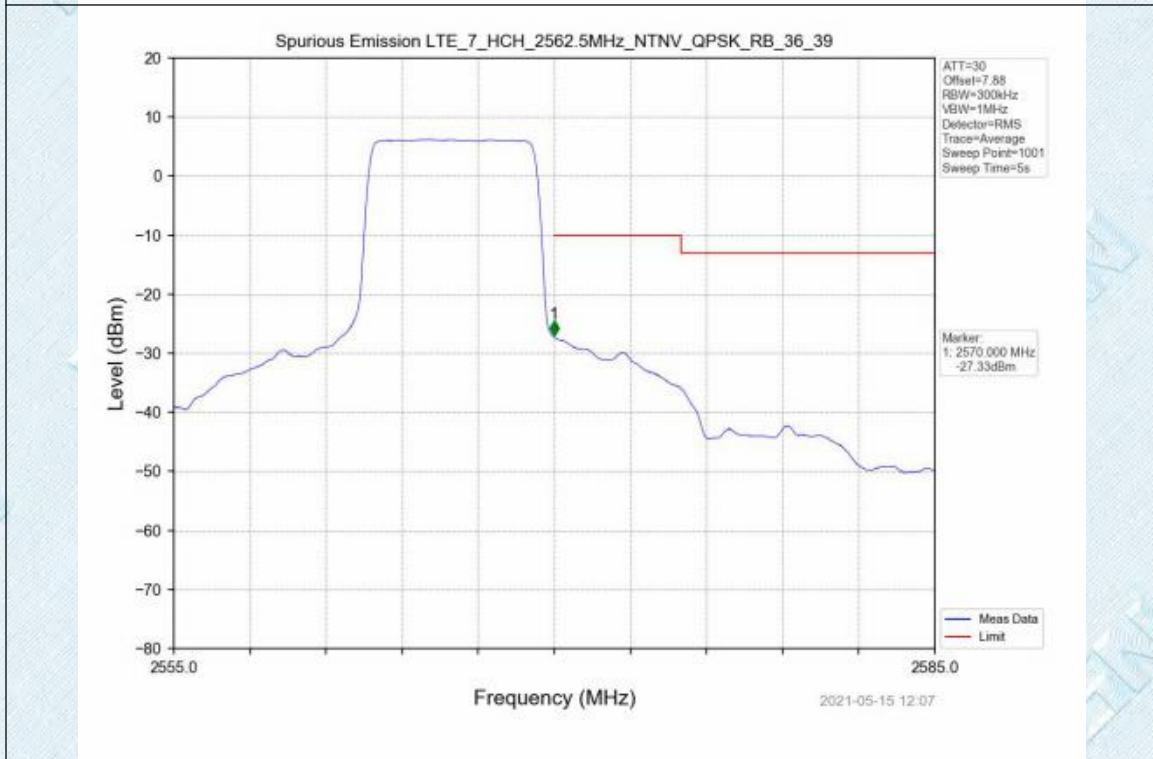
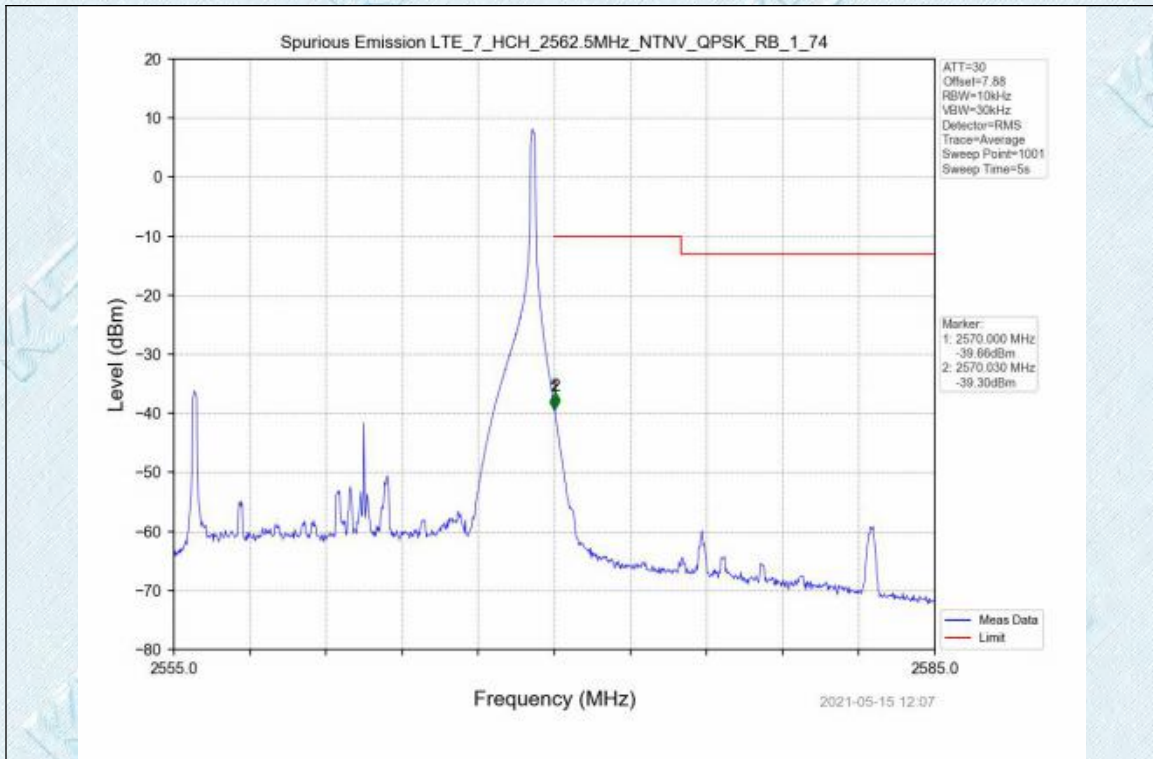


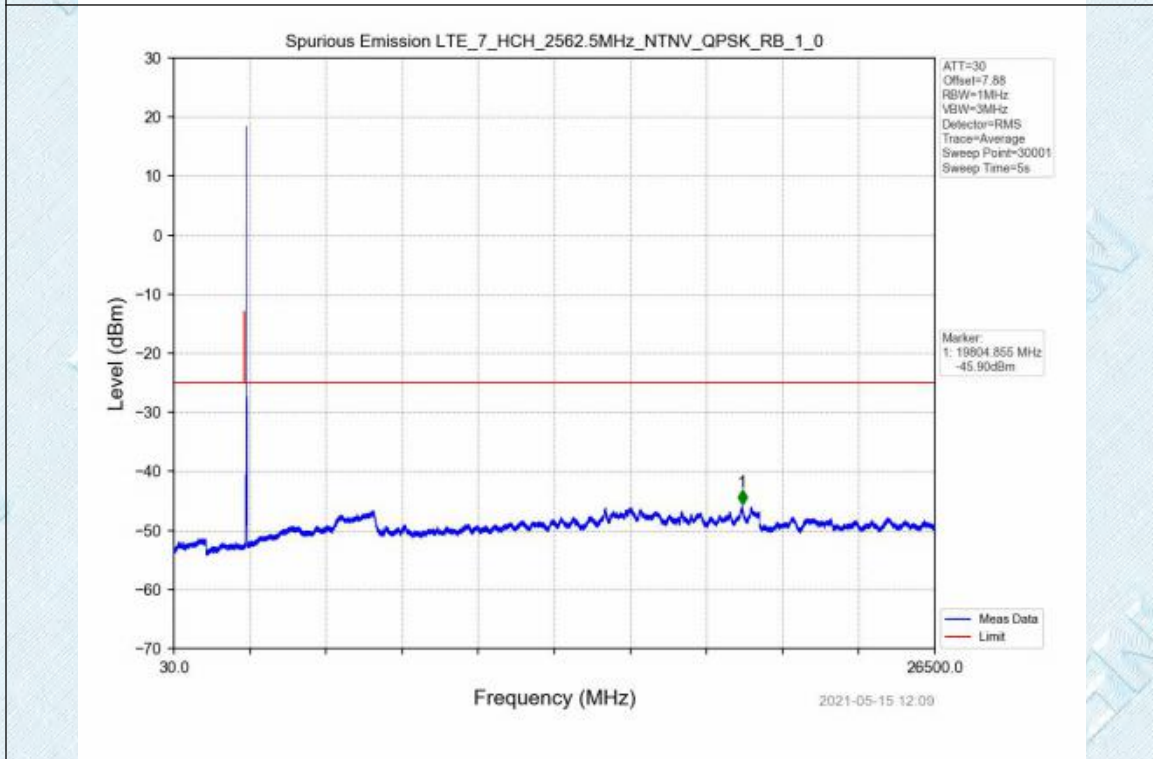
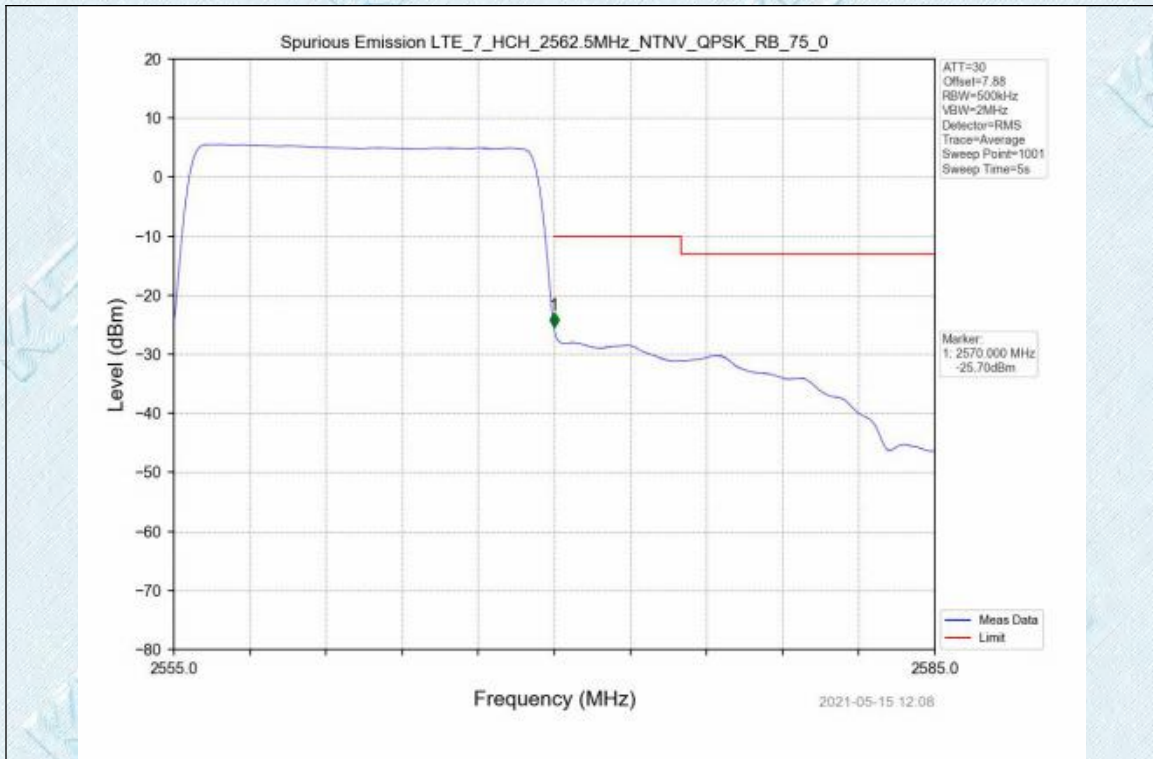






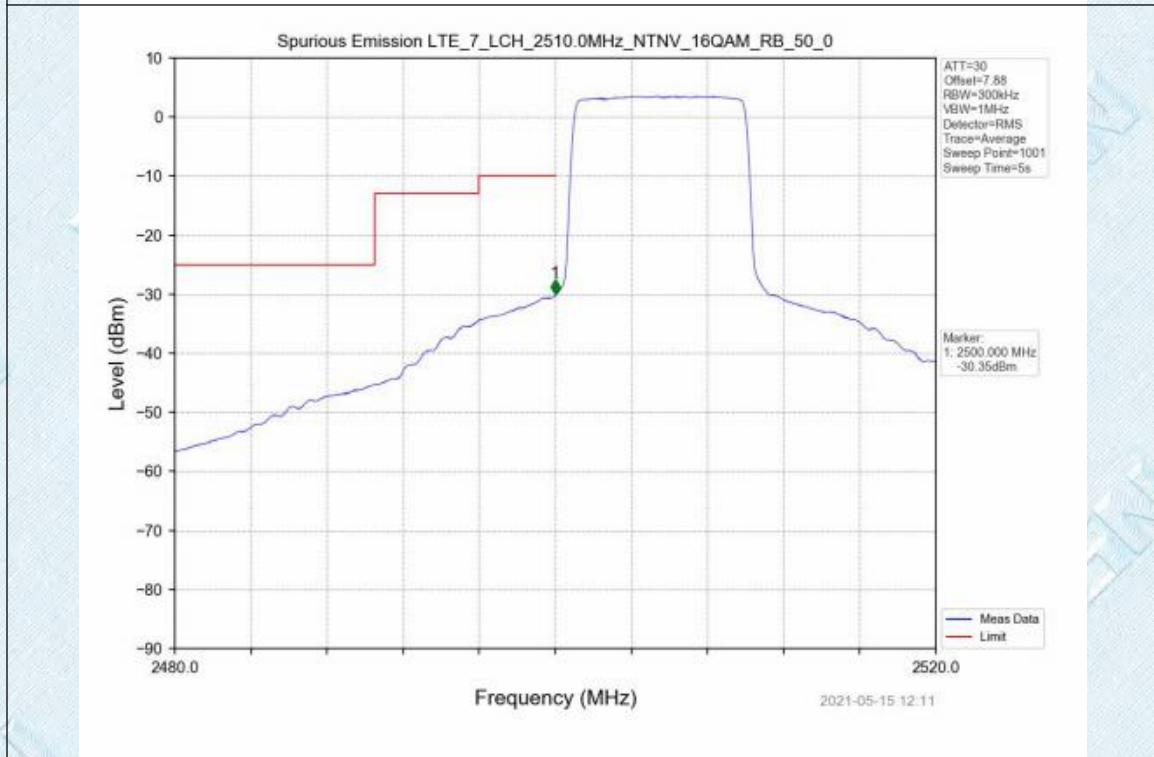
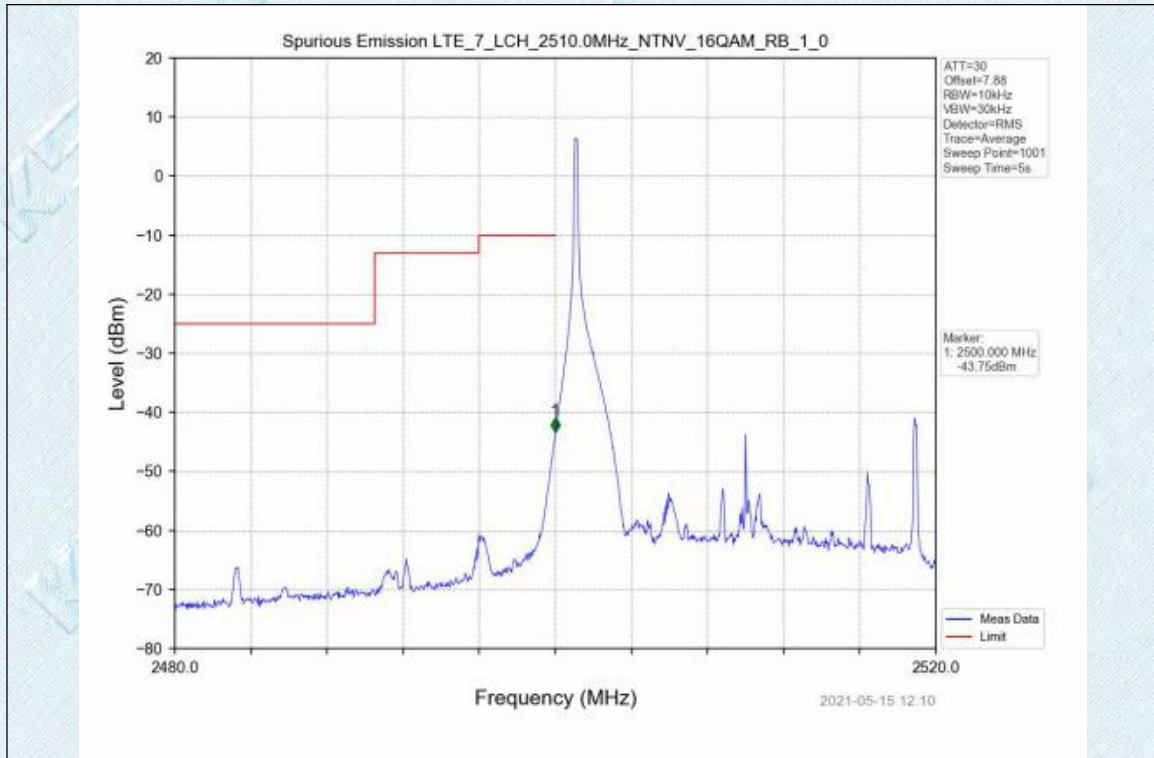


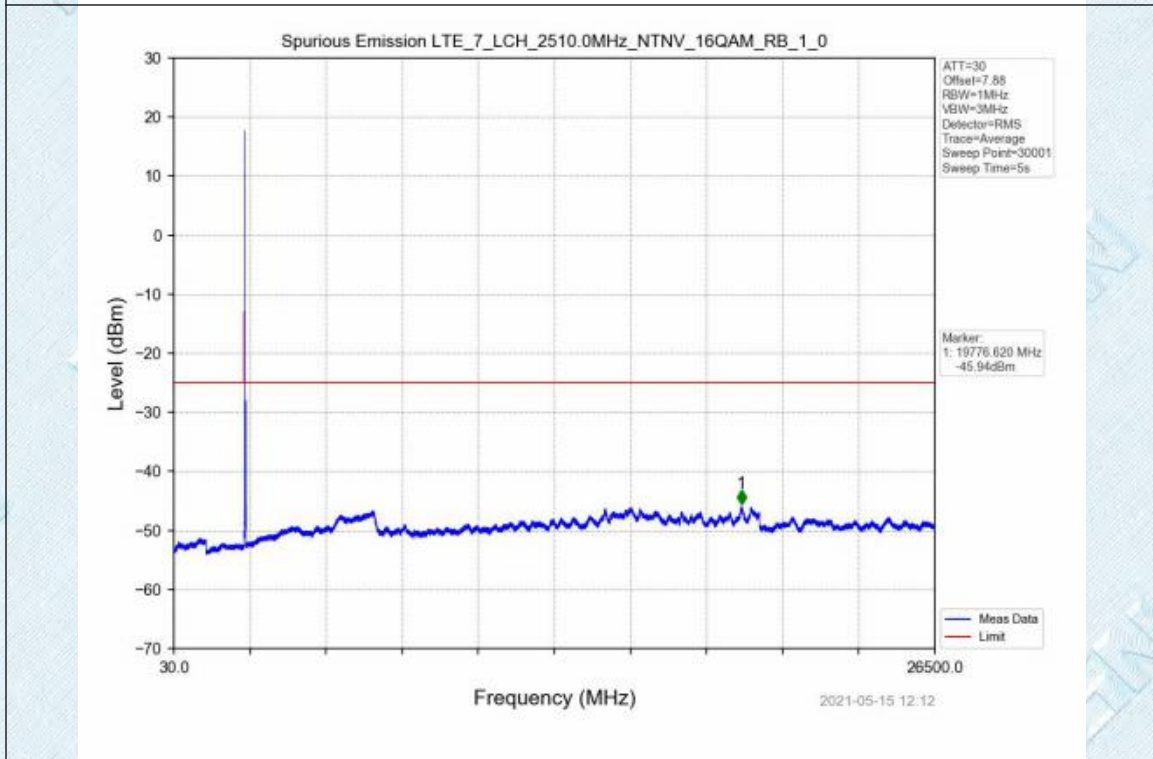
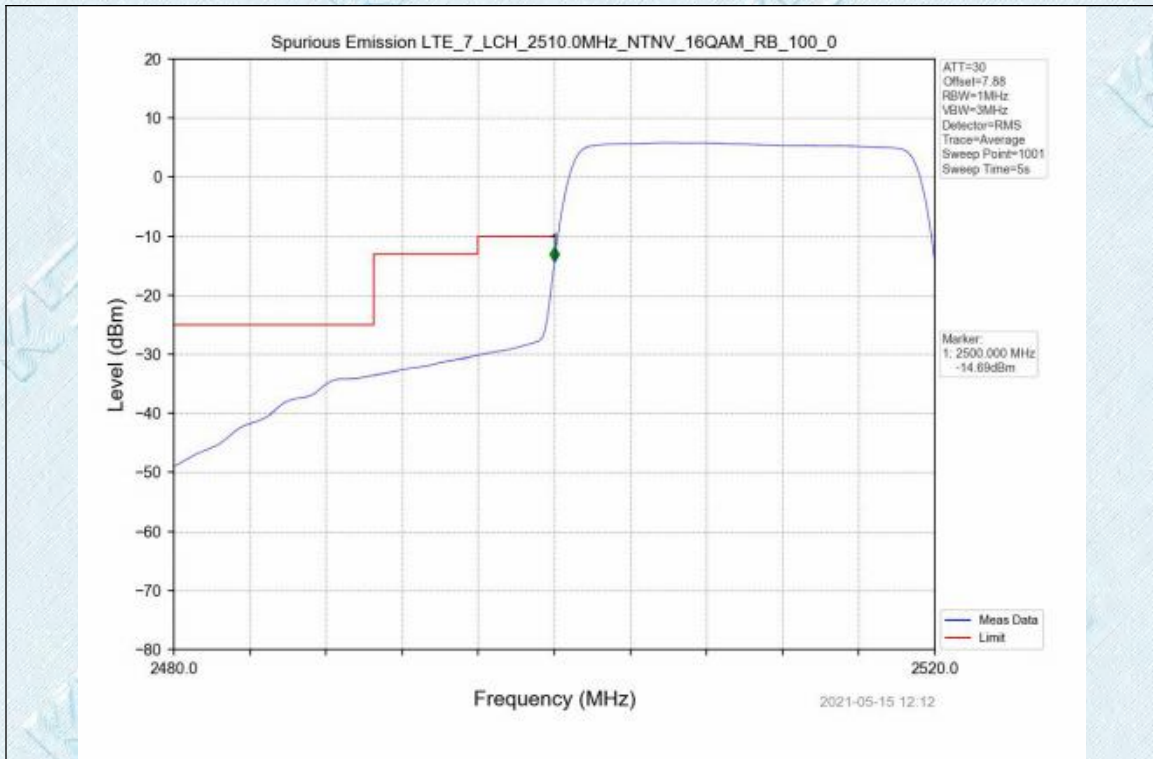


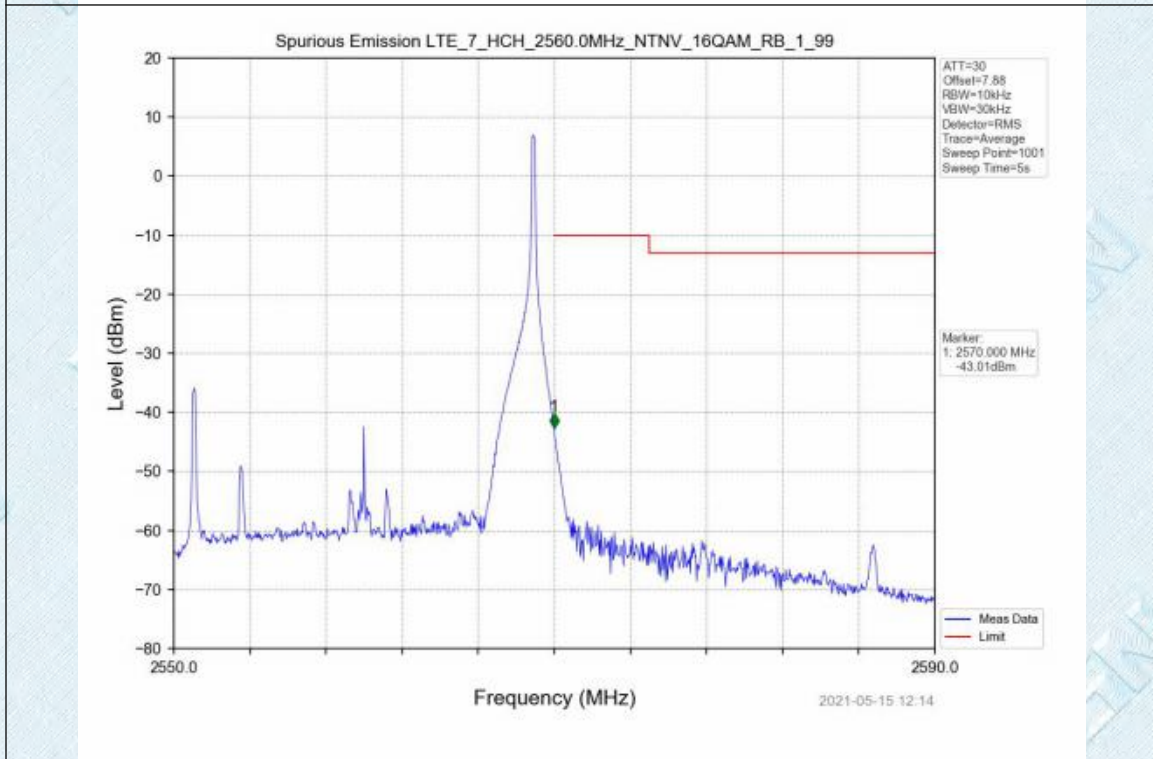
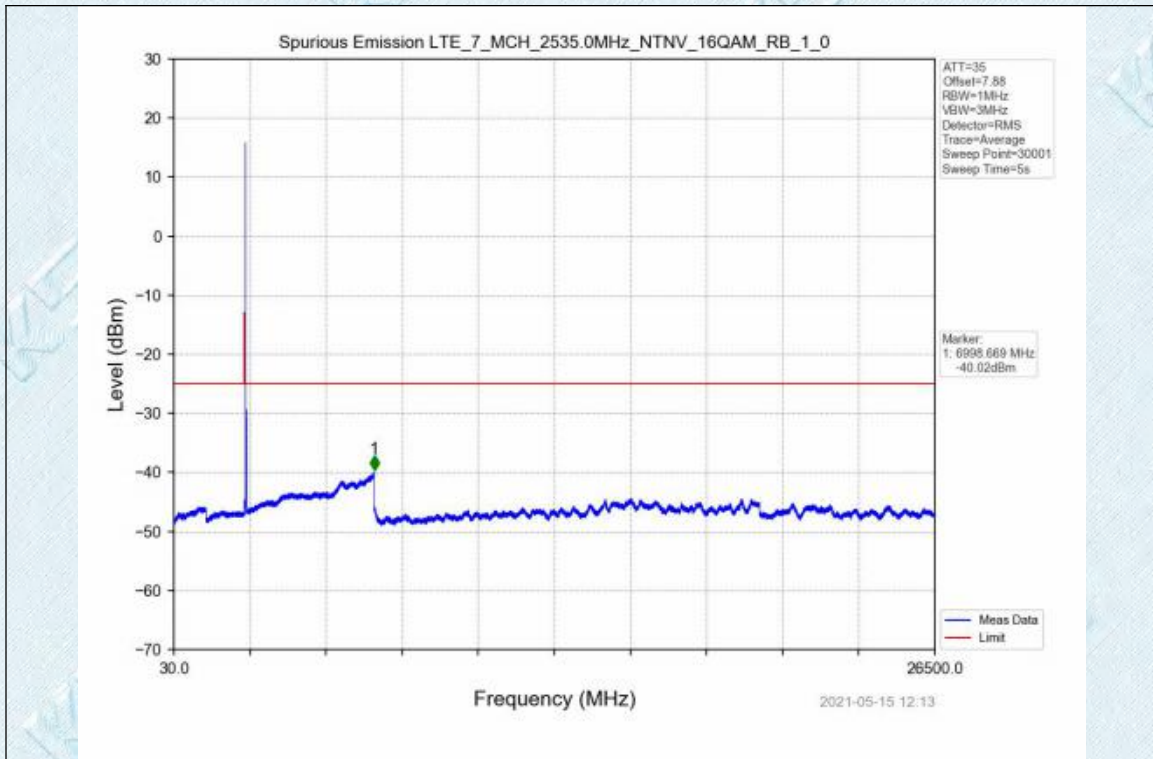


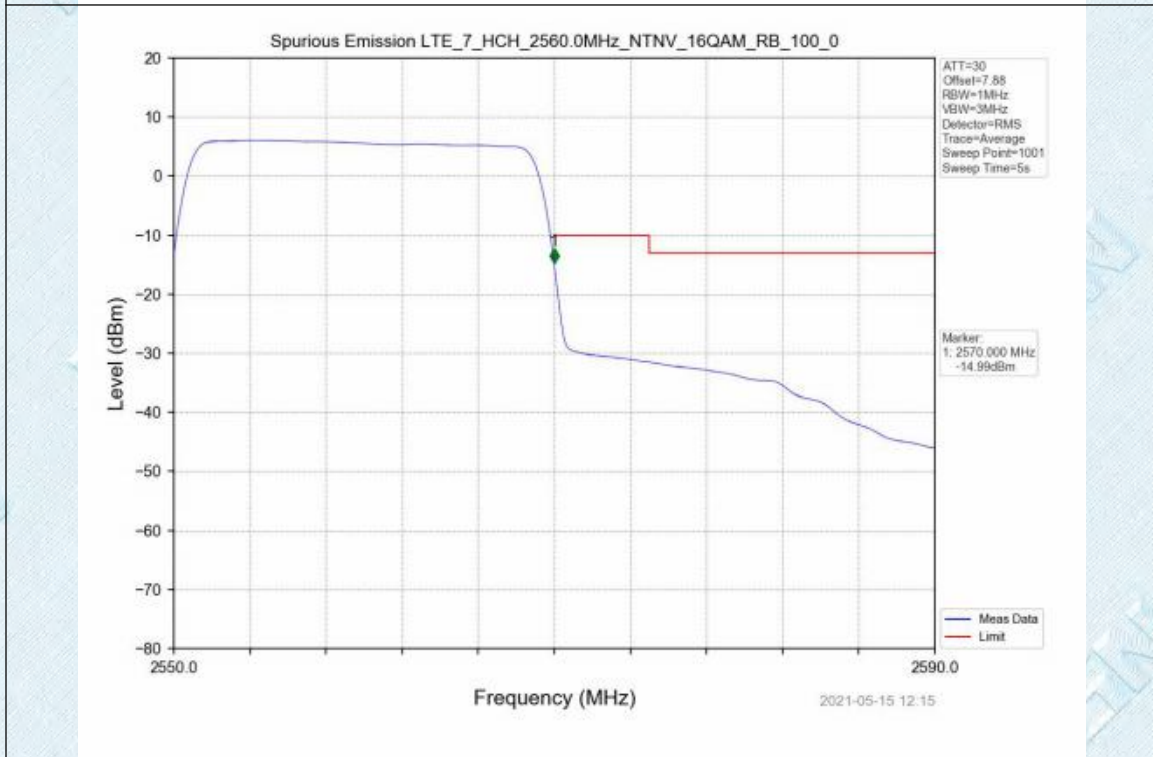
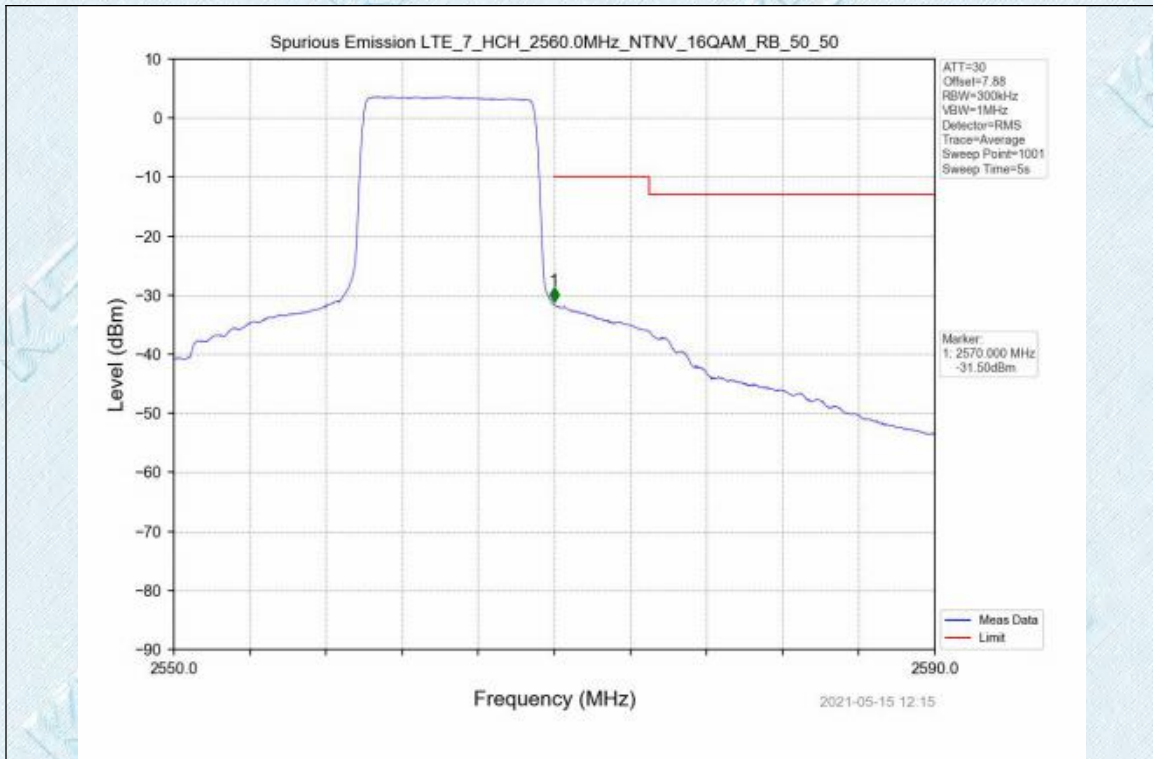
Test LTE Band 7 _ 20MHz Bandwidth

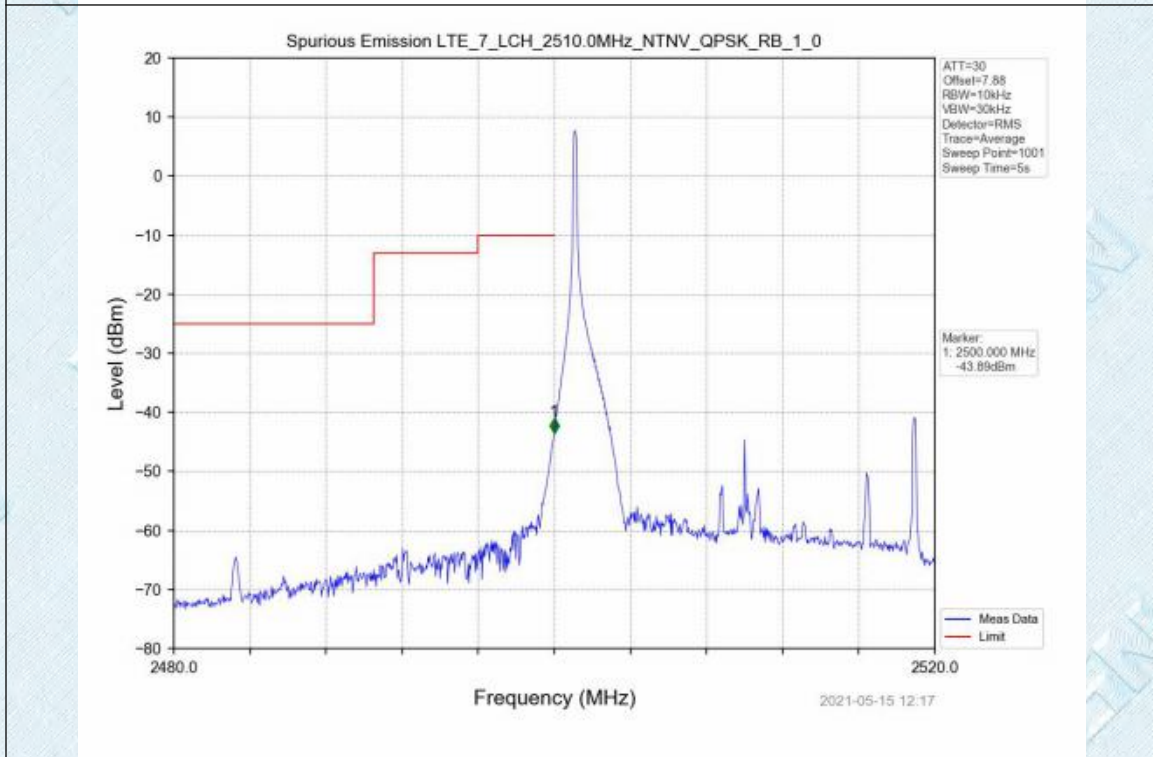
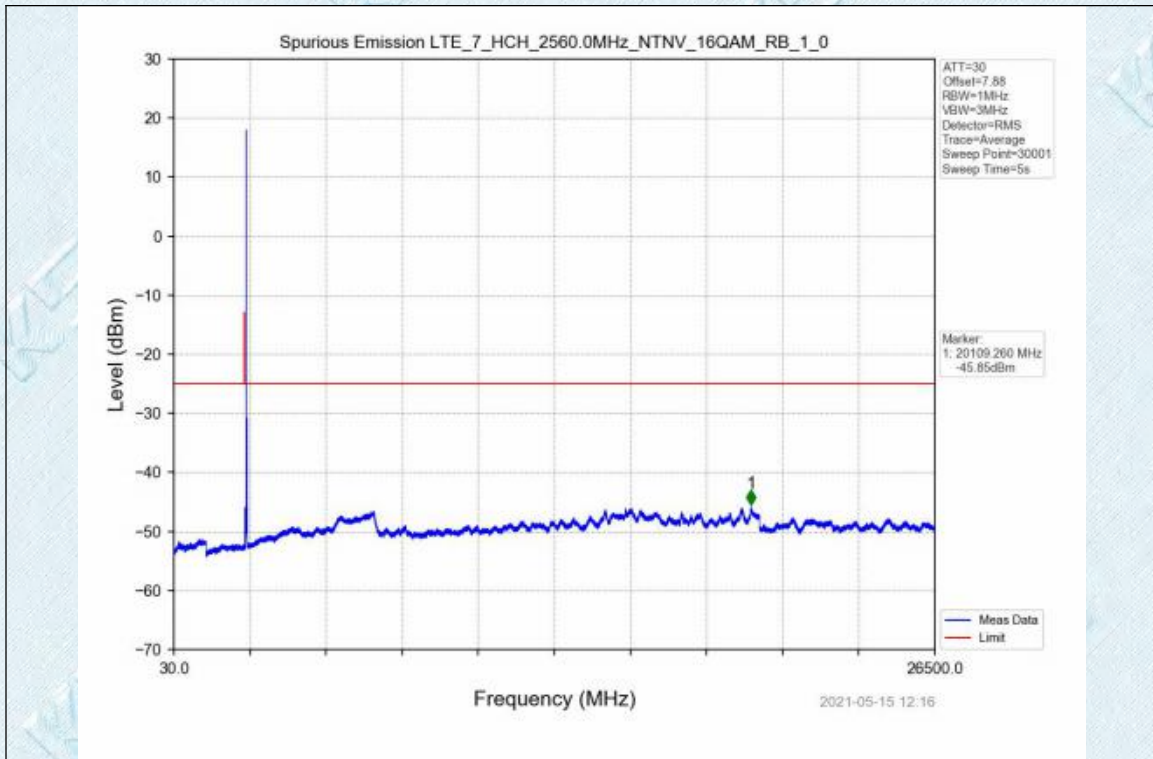
Test Graph

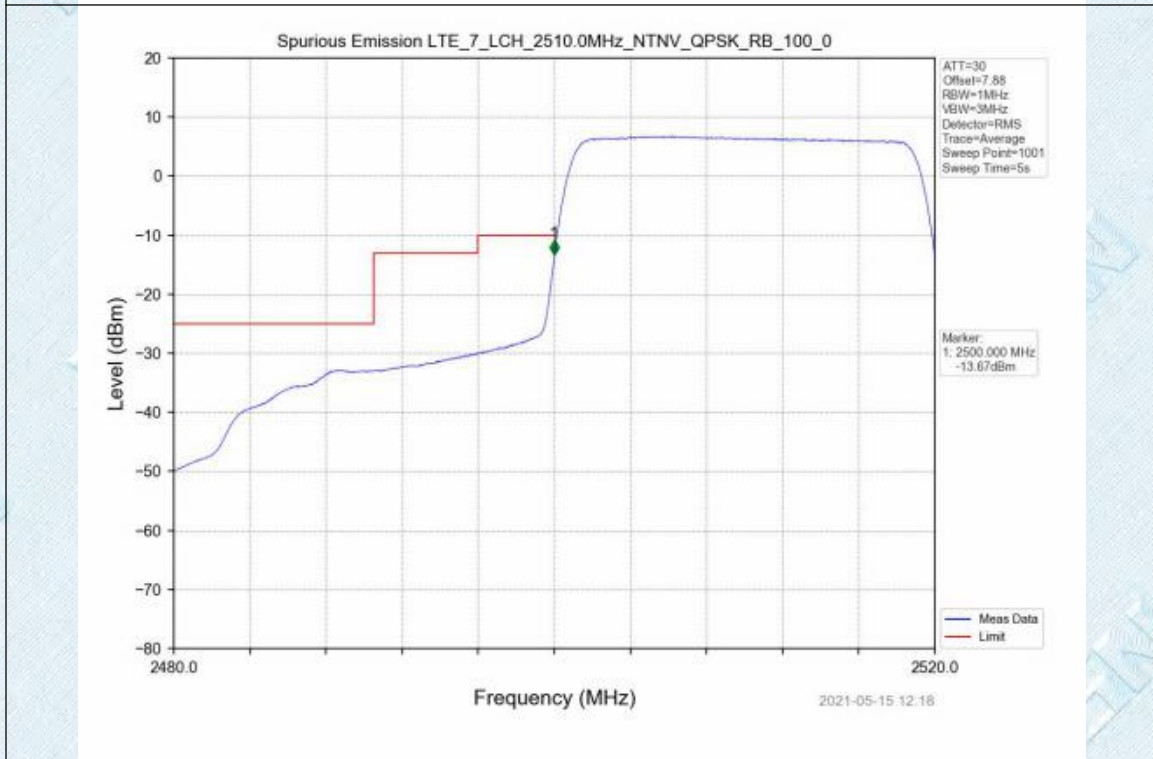
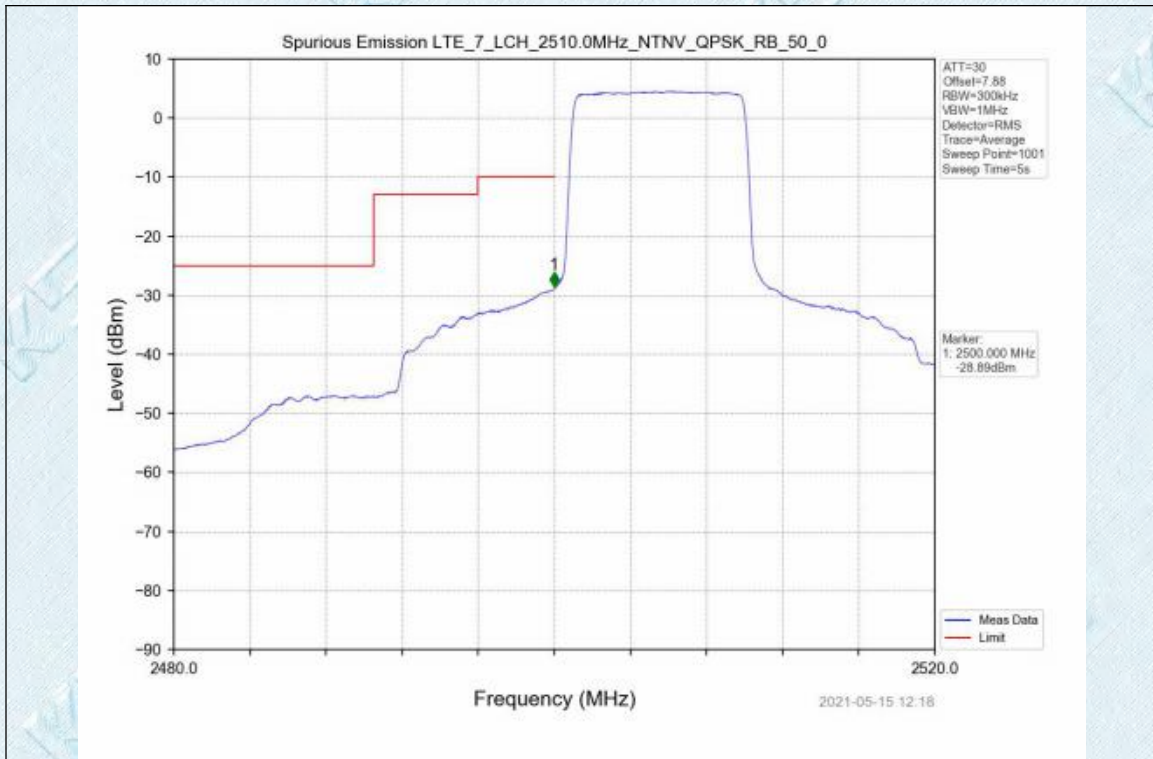


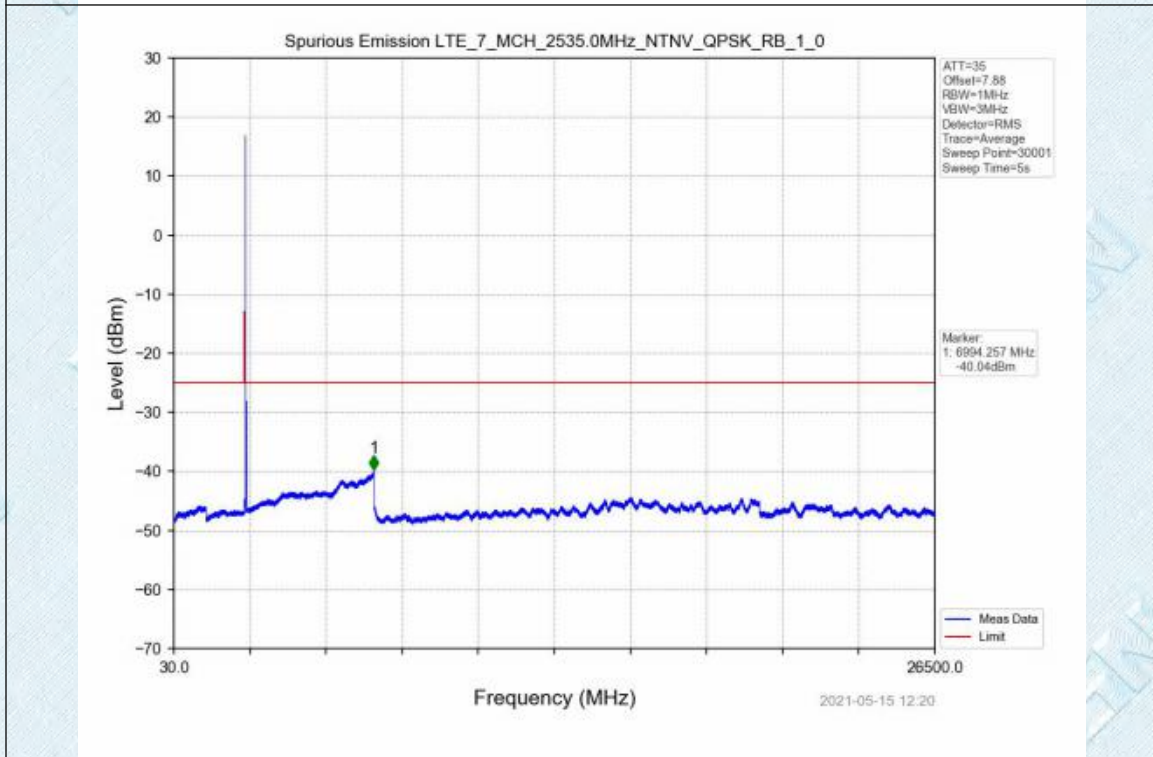
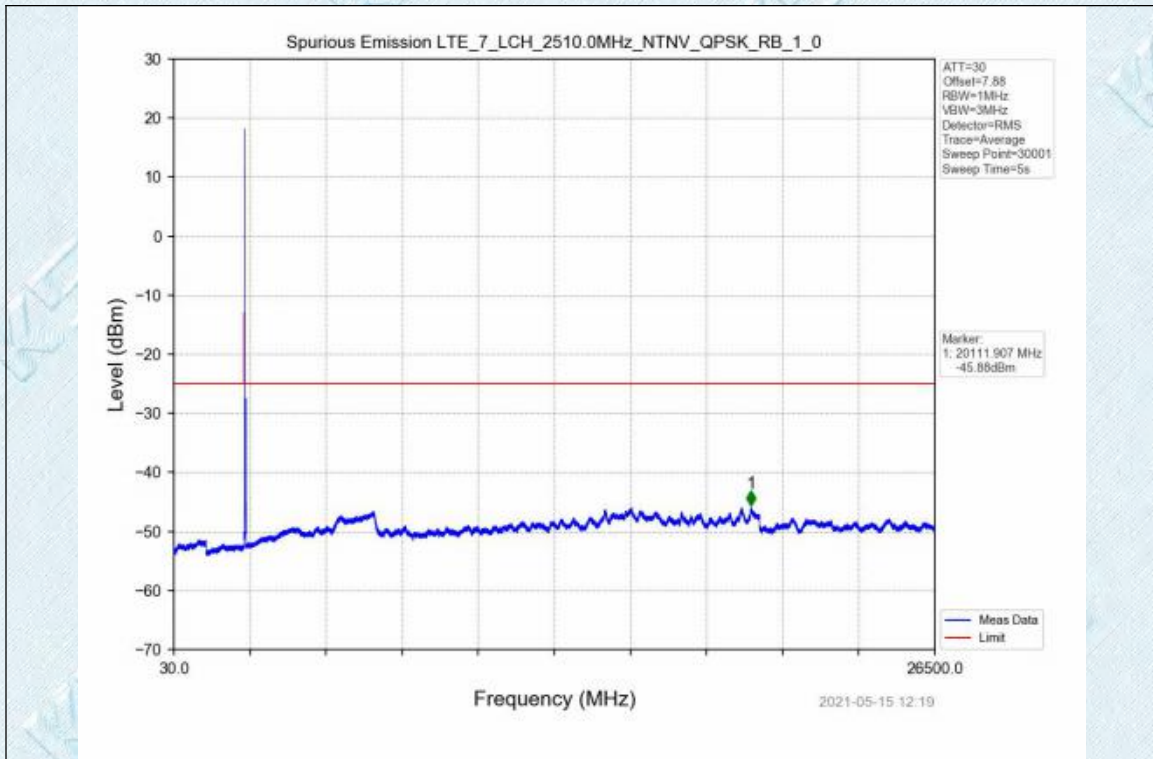


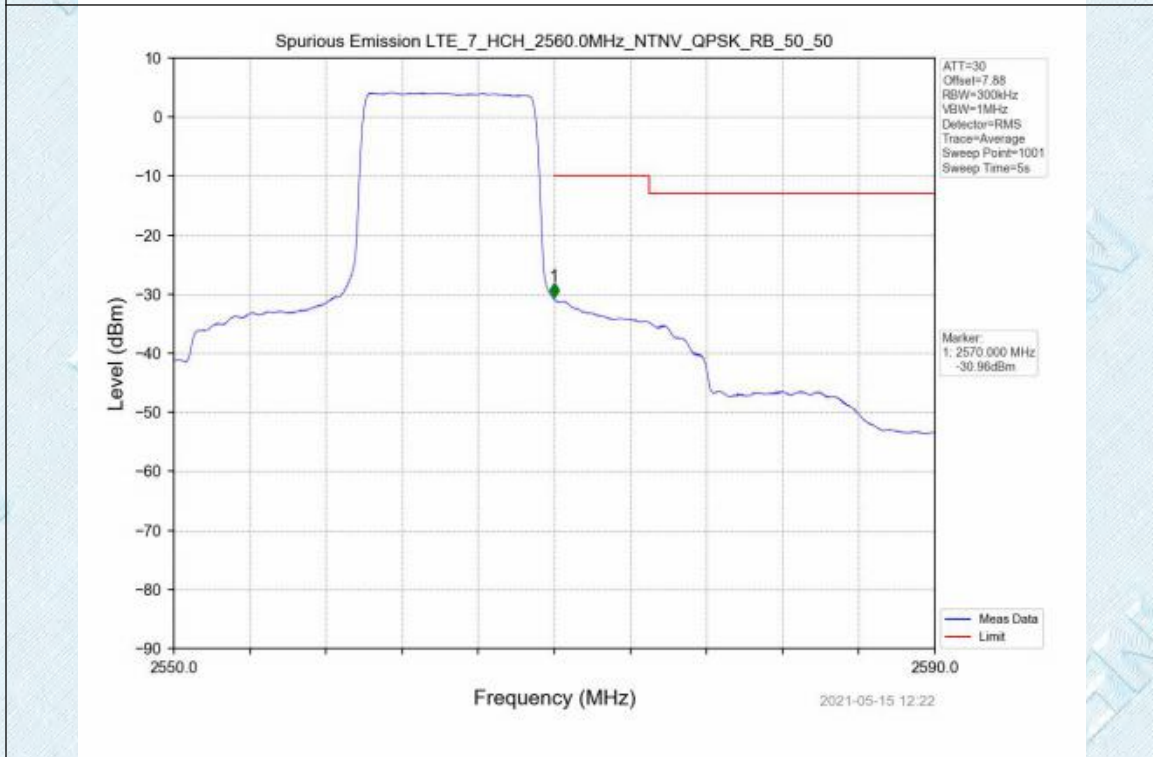
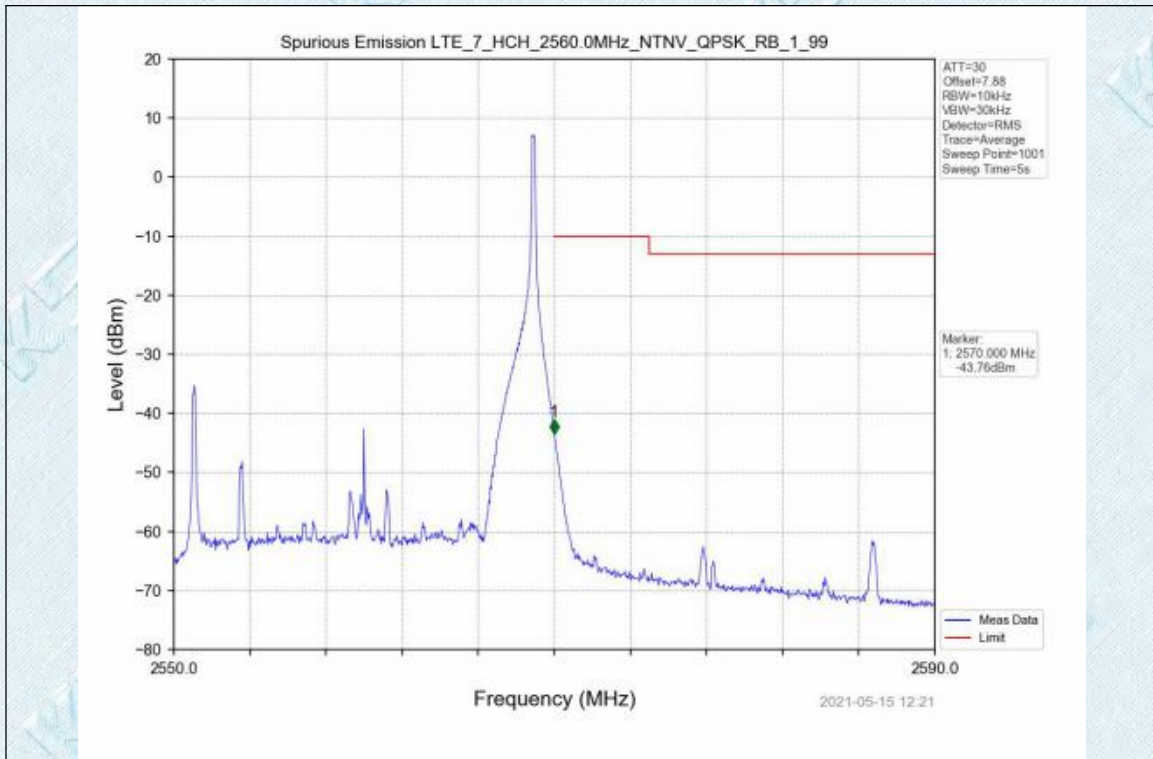


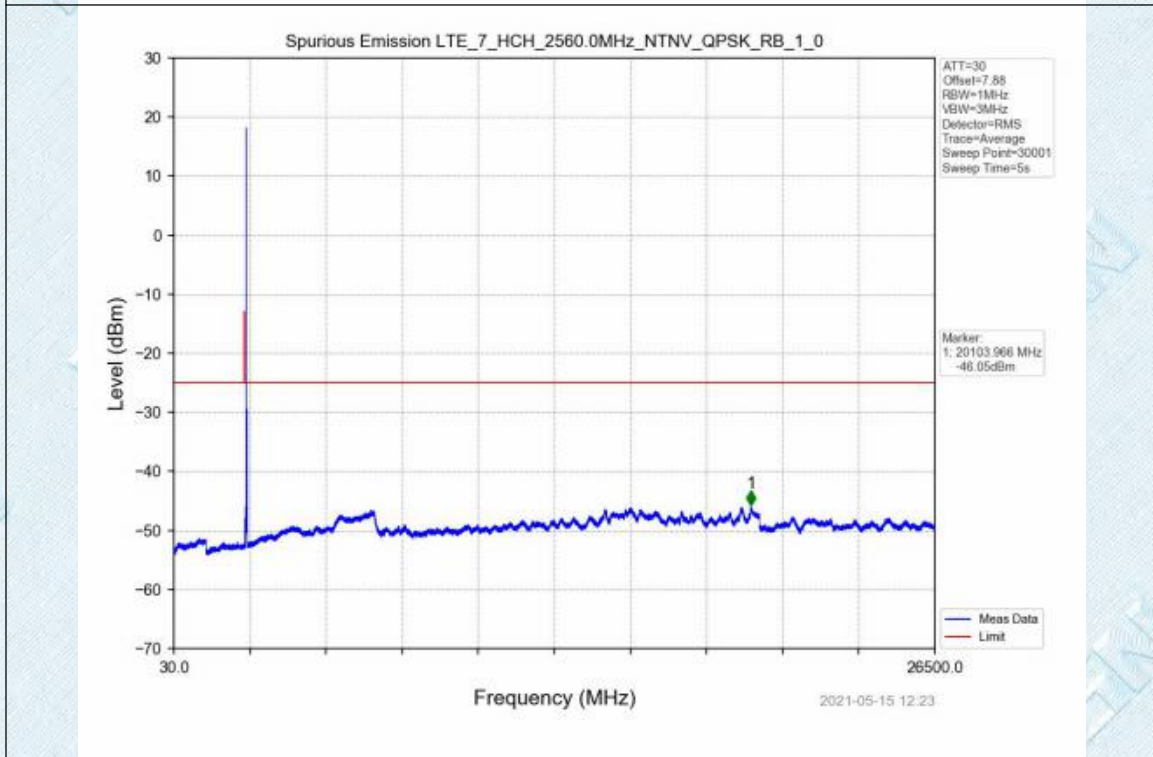
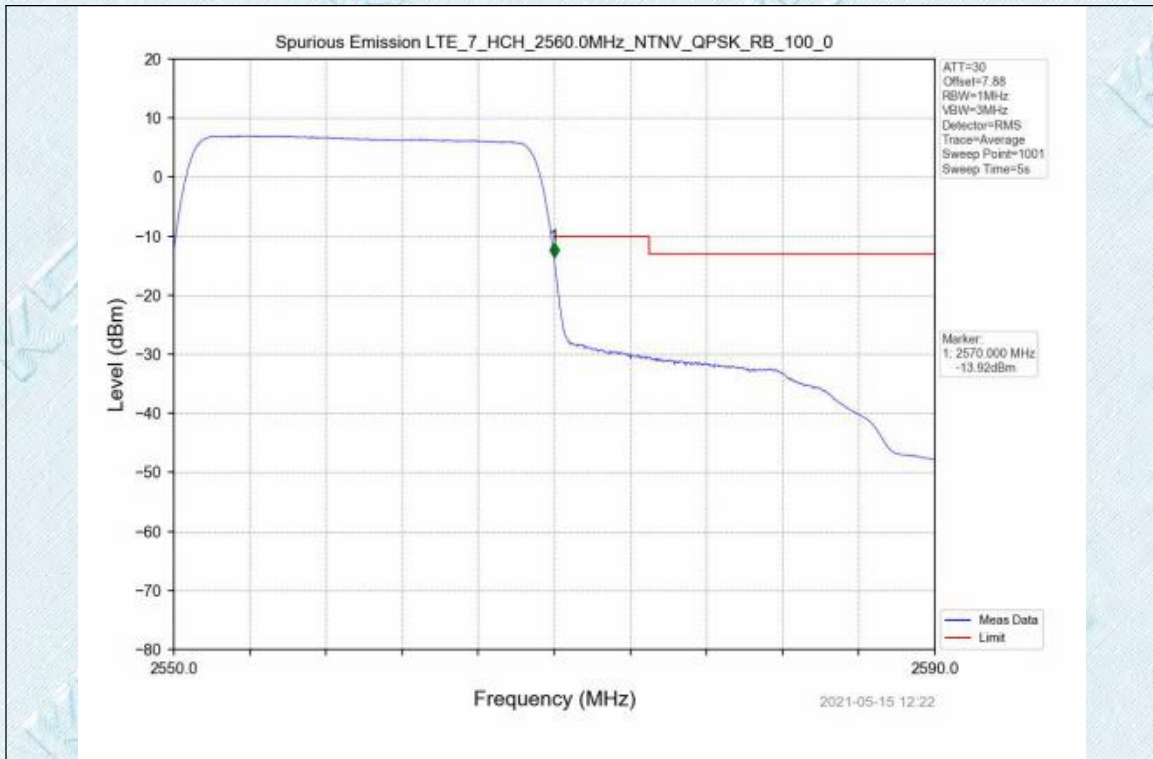












5.Frequency stability

Test Result

| Test Band: 7 _ 5MHz Bandwidth (Frequency Error VS. Voltage) | | | | | | | | | | | | |
|---|---------------|--------|------------|------------|------------------|----------|----------|-----------------------|---------|---------|-------------|---------|
| Test Mode | RB Allocation | | Test Temp. | Test Volt. | Freq. Error (Hz) | | | Freq. vs. rated (ppm) | | | Limit (ppm) | Verdict |
| | Size | Offset | | | LCH | MCH | HCH | LCH | MCH | HCH | | |
| QPSK | 25 | 0 | NT | LV | -10.6001 | -5.5075 | -2.8038 | -0.0042 | -0.0022 | -0.0011 | 2.50 | PASS |
| | | | | NV | -8.1253 | -9.5701 | -2.4891 | -0.0032 | -0.0038 | -0.0010 | 2.50 | PASS |
| | | | | HV | -0.6866 | -2.6751 | -12.3882 | -0.0003 | -0.0011 | -0.0048 | 2.50 | PASS |
| 16QAM | 25 | 0 | NT | LV | -2.0885 | -12.2309 | -6.0797 | -0.0008 | -0.0048 | -0.0024 | 2.50 | PASS |
| | | | | NV | -2.1315 | 1.6737 | -5.2643 | -0.0009 | 0.0007 | -0.0021 | 2.50 | PASS |
| | | | | HV | -1.2732 | -9.7275 | -12.1736 | -0.0005 | -0.0038 | -0.0047 | 2.50 | PASS |

| Test Band: 7 _ 5MHz Bandwidth (Frequency Error VS. Temperature) | | | | | | | | | | | | | |
|---|---------------|--------|------------|------------|------------------|----------|----------|-----------------------|---------|---------|-------------|---------|------|
| Test Mode | RB Allocation | | Test Temp. | Test Volt. | Freq. Error (Hz) | | | Freq. vs. rated (ppm) | | | Limit (ppm) | Verdict | |
| | Size | Offset | | | LCH | MCH | HCH | LCH | MCH | HCH | | | |
| Test Mode | | | | | -20.00 | -2.5749 | 5.6791 | -5.8508 | -0.0010 | 0.0022 | -0.0023 | 2.50 | PASS |
| | | | | | -10.00 | -2.2173 | -3.7193 | 1.1587 | -0.0009 | -0.0015 | 0.0005 | 2.50 | PASS |
| | | | | | 0.00 | -9.6703 | -4.6635 | -13.5326 | -0.0039 | -0.0018 | -0.0053 | 2.50 | PASS |
| | | | | | 10.00 | -5.3787 | -0.5293 | -6.7234 | -0.0021 | -0.0002 | -0.0026 | 2.50 | PASS |
| | | | | | 20.00 | -8.5974 | 1.4305 | -13.0176 | -0.0034 | 0.0006 | -0.0051 | 2.50 | PASS |
| | | | | | 30.00 | 0.3576 | -1.7738 | -7.5388 | 0.0001 | -0.0007 | -0.0029 | 2.50 | PASS |
| | | | | | 40.00 | -2.1744 | 0.6866 | 1.3161 | -0.0009 | 0.0003 | 0.0005 | 2.50 | PASS |
| | | | | | 50.00 | -6.8378 | -9.2268 | -6.6948 | -0.0027 | -0.0036 | -0.0026 | 2.50 | PASS |
| | | | | | -20.00 | -6.6805 | 1.9455 | -7.6818 | -0.0027 | 0.0008 | -0.0030 | 2.50 | PASS |
| | | | | | -10.00 | -4.5919 | -8.9550 | 0.4005 | -0.0018 | -0.0035 | 0.0002 | 2.50 | PASS |
| | | | | | 0.00 | -10.0136 | -2.8181 | -4.4203 | -0.0040 | -0.0011 | -0.0017 | 2.50 | PASS |
| | | | | | 10.00 | -1.8311 | -1.2302 | -4.8208 | -0.0007 | -0.0005 | -0.0019 | 2.50 | PASS |
| | | | | | 20.00 | -4.8494 | -7.1812 | -1.0443 | -0.0019 | -0.0028 | -0.0004 | 2.50 | PASS |
| | | | | | 30.00 | -6.5231 | -11.2152 | -10.3140 | -0.0026 | -0.0044 | -0.0040 | 2.50 | PASS |
| | | | | | 40.00 | -10.7574 | -5.6219 | -3.3188 | -0.0043 | -0.0022 | -0.0013 | 2.50 | PASS |
| | | | | | 50.00 | 1.0443 | -4.1771 | -14.1478 | 0.0004 | -0.0016 | -0.0055 | 2.50 | PASS |

| Test Band: 7 _ 10MHz Bandwidth (Frequency Error VS. Voltage) | | | | | | | | | | | | |
|--|---------------|--------|------------|------------|------------------|---------|---------|-----------------------|---------|---------|-------------|---------|
| Test Mode | RB Allocation | | Test Temp. | Test Volt. | Freq. Error (Hz) | | | Freq. vs. rated (ppm) | | | Limit (ppm) | Verdict |
| | Size | Offset | | | LCH | MCH | HCH | LCH | MCH | HCH | | |
| QPSK | 50 | 0 | NT | LV | -8.5402 | -5.3501 | -5.0497 | -0.0034 | -0.0021 | -0.0020 | 2.50 | PASS |
| | | | | NV | -10.3283 | -3.8910 | -6.3801 | -0.0041 | -0.0015 | -0.0025 | 2.50 | PASS |
| | | | | HV | -5.3930 | -4.2200 | -6.0940 | -0.0022 | -0.0017 | -0.0024 | 2.50 | PASS |
| 16QAM | 50 | 0 | NT | LV | -2.9755 | 0.9012 | -4.9639 | -0.0012 | 0.0004 | -0.0019 | 2.50 | PASS |
| | | | | NV | -9.0408 | -0.3576 | -1.3304 | -0.0036 | -0.0001 | -0.0005 | 2.50 | PASS |
| | | | | HV | -3.4189 | -3.1328 | -3.6478 | -0.0014 | -0.0012 | -0.0014 | 2.50 | PASS |

| Test Band: 7_ 10MHz Bandwidth (Frequency Error VS. Temperature) | | | | | | | | | | | | |
|---|---------------|--------|------------|------------|------------------|---------|---------|-----------------------|---------|--------|-------------|---------|
| Test Mode | RB Allocation | | Test Volt. | Test Temp. | Freq. Error (Hz) | | | Freq. vs. rated (ppm) | | | Limit (ppm) | Verdict |
| | Size | Offset | | | LCH | MCH | HCH | LCH | MCH | HCH | | |
| | | | | | -20.00 | -4.1485 | 0.4292 | -4.7779 | -0.0017 | 0.0002 | -0.0019 | 2.50 |
| | | | -10.00 | -4.9925 | -0.7296 | -3.7479 | -0.0020 | -0.0003 | -0.0015 | 2.50 | PASS | |
| | | | 0.00 | -4.2486 | 3.9625 | -7.3814 | -0.0017 | 0.0016 | -0.0029 | 2.50 | PASS | |
| | | | 10.00 | -7.5817 | -2.9898 | -2.6178 | -0.0030 | -0.0012 | -0.0010 | 2.50 | PASS | |
| | | | 20.00 | -6.8235 | -4.8637 | -1.6308 | -0.0027 | -0.0019 | -0.0006 | 2.50 | PASS | |
| | | | 30.00 | -3.4189 | -5.4789 | 1.1158 | -0.0014 | -0.0022 | 0.0004 | 2.50 | PASS | |
| | | | 40.00 | -1.1587 | -3.8481 | -7.6246 | -0.0005 | -0.0015 | -0.0030 | 2.50 | PASS | |
| | | | 50.00 | -10.3855 | -2.1315 | -1.2159 | -0.0041 | -0.0008 | -0.0005 | 2.50 | PASS | |
| | | | -20.00 | -5.0211 | -4.9639 | 2.0599 | -0.0020 | -0.0020 | 0.0008 | 2.50 | PASS | |
| | | | -10.00 | -1.4734 | -0.7725 | -0.2575 | -0.0006 | -0.0003 | -0.0001 | 2.50 | PASS | |
| | | | 0.00 | -6.0225 | -3.4332 | -2.5320 | -0.0024 | -0.0014 | -0.0010 | 2.50 | PASS | |
| | | | 10.00 | -4.8494 | -3.7336 | 0.0000 | -0.0019 | -0.0015 | 0.0000 | 2.50 | PASS | |
| | | | 20.00 | 1.2588 | -1.0014 | -3.2473 | 0.0005 | -0.0004 | -0.0013 | 2.50 | PASS | |
| | | | 30.00 | -1.1730 | -0.0858 | -0.4721 | -0.0005 | 0.0000 | -0.0002 | 2.50 | PASS | |
| | | | 40.00 | -1.4162 | -3.0470 | -2.2030 | -0.0006 | -0.0012 | -0.0009 | 2.50 | PASS | |
| | | | 50.00 | -7.4673 | -3.3617 | 1.3447 | -0.0030 | -0.0013 | 0.0005 | 2.50 | PASS | |

| Test Band: 7_ 15MHz Bandwidth (Frequency Error VS. Voltage) | | | | | | | | | | | | |
|---|---------------|--------|------------|------------|------------------|---------|---------|-----------------------|---------|---------|-------------|---------|
| Test Mode | RB Allocation | | Test Temp. | Test Volt. | Freq. Error (Hz) | | | Freq. vs. rated (ppm) | | | Limit (ppm) | Verdict |
| | Size | Offset | | | LCH | MCH | HCH | LCH | MCH | HCH | | |
| QPSK | 75 | 0 | NT | LV | -5.5647 | 1.7023 | -1.8024 | -0.0022 | 0.0007 | -0.0007 | 2.50 | PASS |
| | | | | NV | -2.1887 | -3.6049 | -3.4475 | -0.0009 | -0.0014 | -0.0013 | 2.50 | PASS |
| | | | | HV | -4.2200 | -3.6192 | 1.2159 | -0.0017 | -0.0014 | 0.0005 | 2.50 | PASS |
| 16QAM | 75 | 0 | NT | LV | -4.1771 | -4.2343 | -0.6437 | -0.0017 | -0.0017 | -0.0003 | 2.50 | PASS |
| | | | | NV | -1.6737 | 1.1730 | -2.6608 | -0.0007 | 0.0005 | -0.0010 | 2.50 | PASS |
| | | | | HV | -5.9080 | -4.3488 | 0.0000 | -0.0024 | -0.0017 | 0.0000 | 2.50 | PASS |

| Test Band: 7_ 15MHz Bandwidth (Frequency Error VS. Temperature) | | | | | | | | | | | | |
|---|---------------|--------|------------|------------|------------------|---------|---------|-----------------------|---------|---------|-------------|---------|
| Test Mode | RB Allocation | | Test Volt. | Test Temp. | Freq. Error (Hz) | | | Freq. vs. rated (ppm) | | | Limit (ppm) | Verdict |
| | Size | Offset | | | LCH | MCH | HCH | LCH | MCH | HCH | | |
| | | | | | -20.00 | -1.6737 | -6.3086 | -6.9809 | -0.0007 | -0.0025 | -0.0027 | 2.50 |
| | | | -10.00 | -2.1029 | -1.0586 | 4.5204 | -0.0008 | -0.0004 | 0.0018 | 2.50 | PASS | |
| | | | 0.00 | -2.3317 | 1.5020 | 0.8726 | -0.0009 | 0.0006 | 0.0003 | 2.50 | PASS | |
| | | | 10.00 | -6.7806 | -2.6321 | -0.4435 | -0.0027 | -0.0010 | -0.0002 | 2.50 | PASS | |
| | | | 20.00 | -6.8665 | -1.0157 | -7.3099 | -0.0027 | -0.0004 | -0.0029 | 2.50 | PASS | |
| | | | 30.00 | -3.0327 | -3.0756 | -7.5817 | -0.0012 | -0.0012 | -0.0030 | 2.50 | PASS | |
| | | | 40.00 | -2.4748 | 1.4162 | -4.8351 | -0.0010 | 0.0006 | -0.0019 | 2.50 | PASS | |
| | | | 50.00 | -4.0770 | -4.0913 | -6.0081 | -0.0016 | -0.0016 | -0.0023 | 2.50 | PASS | |
| | | | -20.00 | -2.1601 | -5.6791 | 1.5163 | -0.0009 | -0.0022 | 0.0006 | 2.50 | PASS | |
| | | | -10.00 | -3.9053 | -2.5463 | -1.1444 | -0.0016 | -0.0010 | -0.0004 | 2.50 | PASS | |
| | | | 0.00 | -4.5919 | -1.7881 | -5.2643 | -0.0018 | -0.0007 | -0.0021 | 2.50 | PASS | |
| | | | 10.00 | -6.9809 | 0.1860 | -0.4148 | -0.0028 | 0.0001 | -0.0002 | 2.50 | PASS | |
| | | | 20.00 | -3.7622 | -0.7725 | -0.9441 | -0.0015 | -0.0003 | -0.0004 | 2.50 | PASS | |
| | | | 30.00 | -4.6492 | -3.0756 | -0.1860 | -0.0019 | -0.0012 | -0.0001 | 2.50 | PASS | |
| | | | 40.00 | -4.4346 | -2.4891 | -5.8508 | -0.0018 | -0.0010 | -0.0023 | 2.50 | PASS | |
| | | | 50.00 | -8.1968 | -6.7234 | -0.3862 | -0.0033 | -0.0027 | -0.0002 | 2.50 | PASS | |

| Test Band: 7 20MHz Bandwidth (Frequency Error VS. Voltage) | | | | | | | | | | | | |
|--|---------------|--------|------------|------------|------------------|---------|---------|-----------------------|---------|---------|-------------|---------|
| Test Mode | RB Allocation | | Test Temp. | Test Volt. | Freq. Error (Hz) | | | Freq. vs. rated (ppm) | | | Limit (ppm) | Verdict |
| | Size | Offset | | | LCH | MCH | HCH | LCH | MCH | HCH | | |
| QPSK | 100 | 0 | NT | LV | -3.1471 | -4.3631 | -6.4945 | -0.0013 | -0.0017 | -0.0025 | 2.50 | PASS |
| | | | | NV | -4.6778 | -8.5688 | -4.9353 | -0.0019 | -0.0034 | -0.0019 | 2.50 | PASS |
| | | | | HV | -8.1253 | -6.7234 | -4.8208 | -0.0032 | -0.0027 | -0.0019 | 2.50 | PASS |
| 16QAM | 100 | 0 | NT | LV | -6.0654 | 0.5579 | -6.6662 | -0.0024 | 0.0002 | -0.0026 | 2.50 | PASS |
| | | | | NV | -7.2098 | -1.5020 | -8.2111 | -0.0029 | -0.0006 | -0.0032 | 2.50 | PASS |
| | | | | HV | 0.7010 | 0.0143 | -1.2302 | 0.0003 | 0.0000 | -0.0005 | 2.50 | PASS |

| Test Band: 7 20MHz Bandwidth (Frequency Error VS. Temperature) | | | | | | | | | | | | | |
|--|---------------|--------|------------|------------|------------------|---------|----------|-----------------------|---------|---------|-------------|---------|------|
| Test Mode | RB Allocation | | Test Temp. | Test Volt. | Freq. Error (Hz) | | | Freq. vs. rated (ppm) | | | Limit (ppm) | Verdict | |
| | Size | Offset | | | LCH | MCH | HCH | LCH | MCH | HCH | | | |
| Test Mode | | | | | -20.00 | -4.2057 | -7.6675 | -10.1423 | -0.0017 | -0.0030 | -0.0040 | 2.50 | PASS |
| | | | | | -10.00 | -5.4932 | -5.8937 | -9.2554 | -0.0022 | -0.0023 | -0.0036 | 2.50 | PASS |
| | | | | | 0.00 | -3.0184 | -5.1928 | -8.5974 | -0.0012 | -0.0020 | -0.0034 | 2.50 | PASS |
| | | | | | 10.00 | -4.8637 | -4.8637 | -13.2179 | -0.0019 | -0.0019 | -0.0052 | 2.50 | PASS |
| | | | | | 20.00 | -5.3215 | -5.2071 | -10.0994 | -0.0021 | -0.0021 | -0.0039 | 2.50 | PASS |
| | | | | | 30.00 | -7.4100 | -6.9809 | -10.6859 | -0.0030 | -0.0028 | -0.0042 | 2.50 | PASS |
| | | | | | 40.00 | -4.4489 | -10.6287 | -9.8991 | -0.0018 | -0.0042 | -0.0039 | 2.50 | PASS |
| | | | | | 50.00 | -9.4271 | -4.4060 | -9.0981 | -0.0038 | -0.0017 | -0.0036 | 2.50 | PASS |
| | | | | | -20.00 | -5.7936 | -3.8767 | -10.3283 | -0.0023 | -0.0015 | -0.0040 | 2.50 | PASS |
| | | | | | -10.00 | -0.4148 | -2.6608 | -9.8276 | -0.0002 | -0.0010 | -0.0038 | 2.50 | PASS |
| | | | | | 0.00 | -1.2302 | -6.1941 | -3.4761 | -0.0005 | -0.0024 | -0.0014 | 2.50 | PASS |
| | | | | | 10.00 | -1.2445 | -4.1056 | -9.3126 | -0.0005 | -0.0016 | -0.0036 | 2.50 | PASS |
| | | | | | 20.00 | 0.0429 | -2.8038 | -8.2827 | 0.0000 | -0.0011 | -0.0032 | 2.50 | PASS |
| | | | | | 30.00 | -3.6192 | -5.1928 | -8.6546 | -0.0014 | -0.0020 | -0.0034 | 2.50 | PASS |
| | | | | | 40.00 | -2.1887 | -8.2684 | -5.5218 | -0.0009 | -0.0033 | -0.0022 | 2.50 | PASS |
| | | | | | 50.00 | -1.3161 | -2.8610 | -10.4856 | -0.0005 | -0.0011 | -0.0041 | 2.50 | PASS |