Spurious Connector 1_1

Date: 23.OCT.2019 02:45:59

Spurious Connector 1_2

```
Spectrum                                                              �▼

   Ref Level 0.00 dBm              ● RBW 100 kHz
● Att         30 dB    SWT 236 ms  ● VBW 300 kHz    Mode Auto Sweep
   SGL Count 3/3
● 1Pk Max

  -10 dBm

  -20 dBm

  -30 dBm

  -40 dBm

  -50 dBm

  -70 dBm

  -80 dBm

  -90 dBm

  CF 14.24175 GHz            2353 pts              Span 23.5165 GHz
```
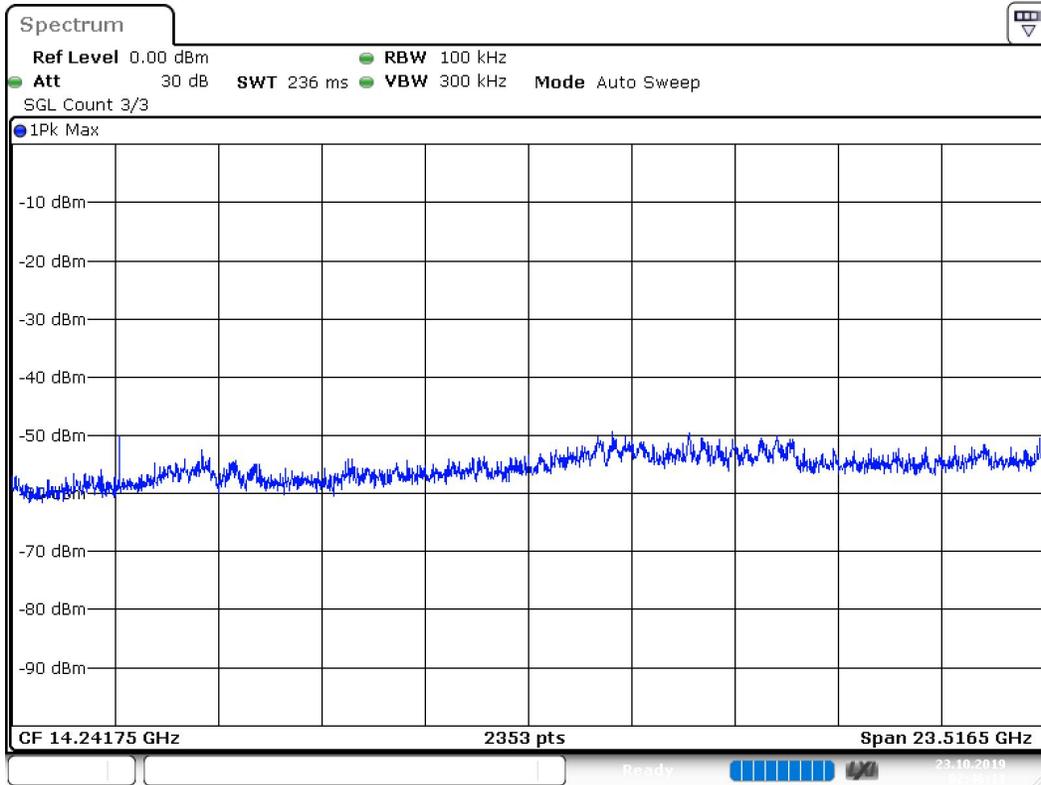
Date: 23.OCT.2019 02:46:11

Pre Measurement 1

Setting	Instrument Value	Target Value
RBW	100.000 kHz	<= 100.000 kHz
VBW	300.000 kHz	>= 300.000 kHz
SweepPoints	238	~ 238
Sweeptime	23.700 ms	AUTO
Reference Level	-10.000 dBm	-30.000 dBm
Attenuation	20.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	3	3
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off

Emissions in restricted frequency bands (Average) (2462 MHz; 20 MHz)

Customized settings.

Test according to FCC title 47 part 15 §15.247(d), KDB 558074 D01 DTS Meas Guidance v05 8.6 and ANSI C63.10-2013 11.12.2.6

Measurement uncertainty calculated in accordance with ETSI TR 100 028-1.
Expanded Uncertainty (K=2) < 1.8 dB

Result

| DUT Frequency (MHz)	Result
2462.000000	PASS

Final measurements

Frequency (MHz)	Level Pre Measurement (dBm)	level (dBm)	Limit (dBm)	Margin (dB)	Result
---	---	---	---	---	---

Pre Measurements

Frequency (MHz)	Level (dBm)	Margin (dB)	Limit (dBm)
2486.750000	-46.1	4.9	-41.2
2483.750000	-46.1	4.9	-41.2
2489.750000	-47.3	6.1	-41.2
2489.250000	-47.5	6.3	-41.2
2753.250000	-47.8	6.6	-41.2
2753.750000	-48.0	6.8	-41.2
2483.500000	-48.1	6.9	-41.2
2498.750000	-48.2	7.0	-41.2
2488.250000	-48.3	7.1	-41.2
2729.250000	-48.5	7.3	-41.2
2728.750000	-48.5	7.3	-41.2
2705.750000	-48.6	7.4	-41.2
2706.250000	-48.6	7.4	-41.2
2799.750000	-49.4	8.2	-41.2
2703.250000	-49.5	8.3	-41.2

Measurement Settings

Start Frequency (MHz)	Stop Frequency (MHz)	Pre Measurement	Final Measurement
0.009000	0.090000	2	2
0.090000	0.110000	2	2
0.110000	0.150000	2	2
0.150000	0.490000	2	2
0.490000	30.000000	2	2
30.000000	1000.000000	2	2
1000.000000	2400.000000	1	1
2400.000000	2483.500000	1	1
2483.500000	5470.000000	1	1
5470.000000	7000.000000	1	1
7000.000000	16000.000000	1	1
16000.000000	26000.000000	1	1
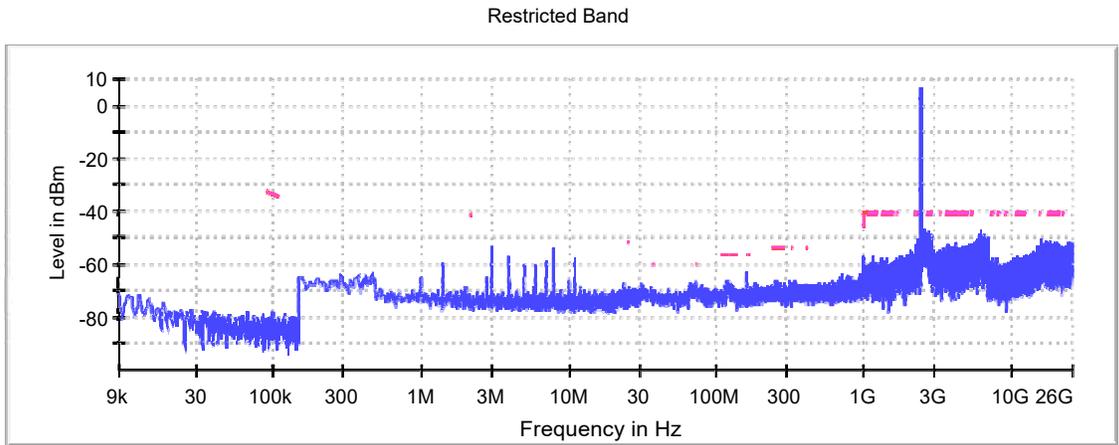
Restricted Band

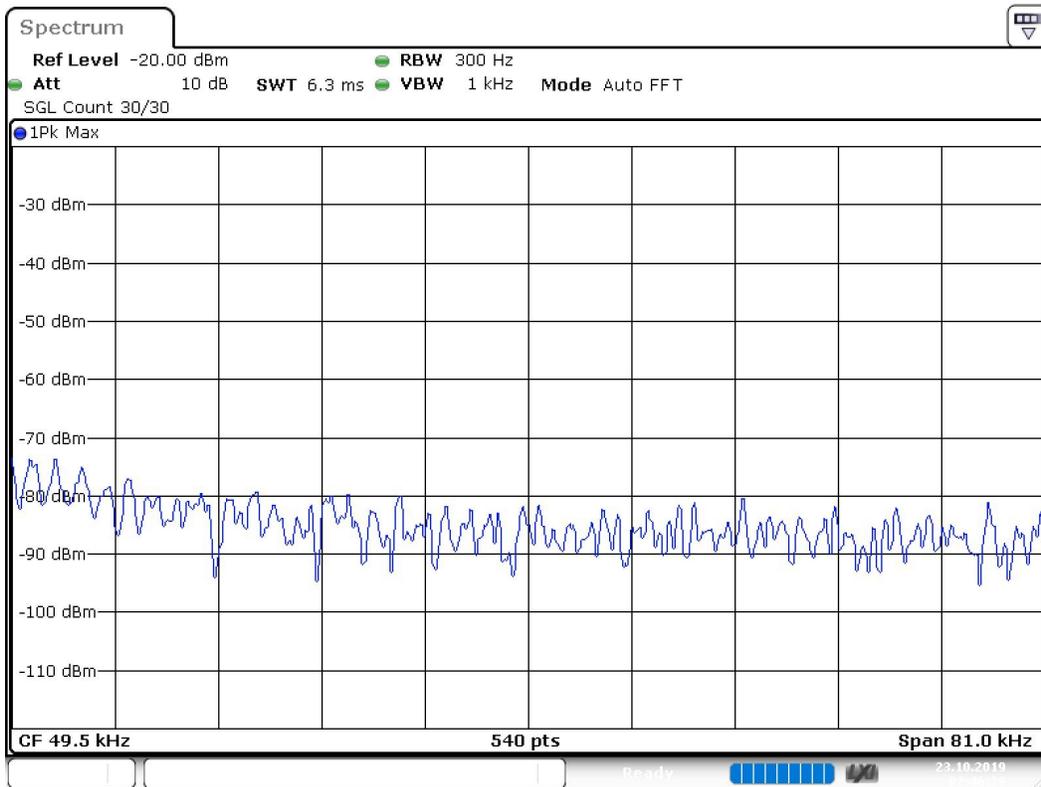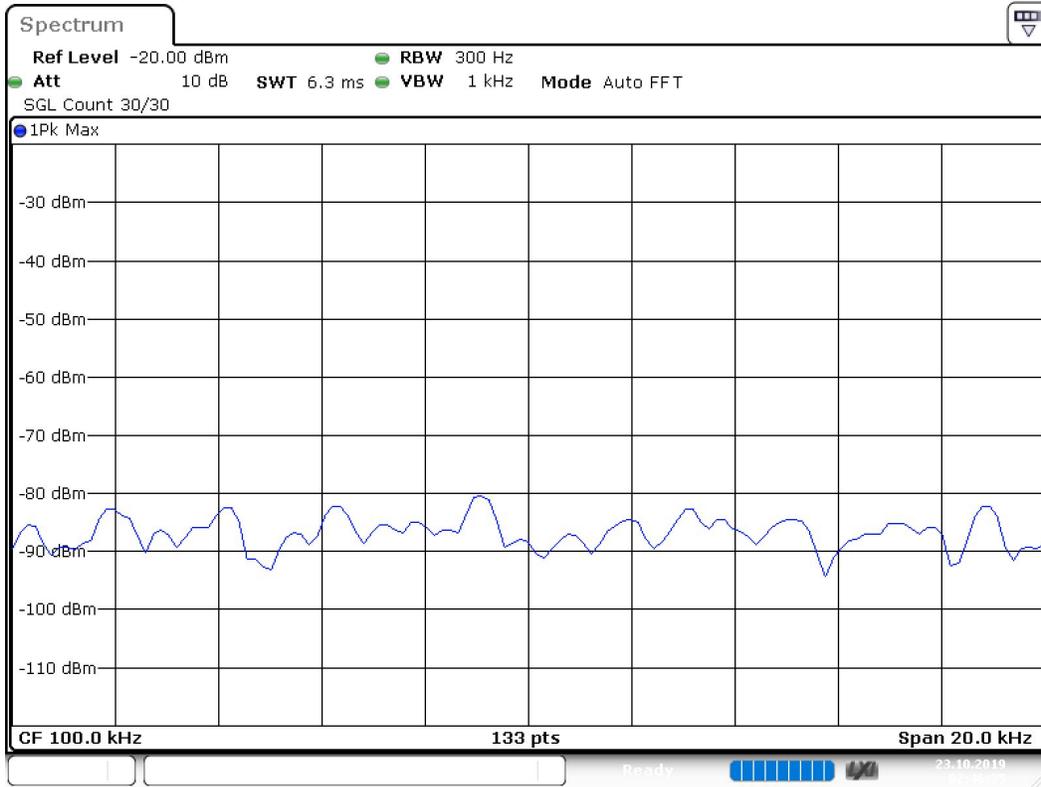| Limit | Threshold | ✕ Critical | Sum Level | ✕ Final Critical |

Gain

—— Connector1

Attenuation
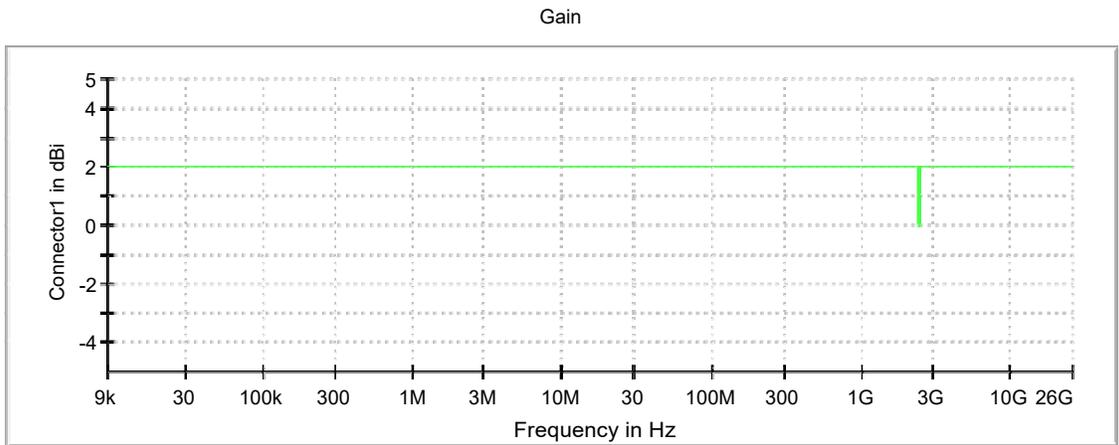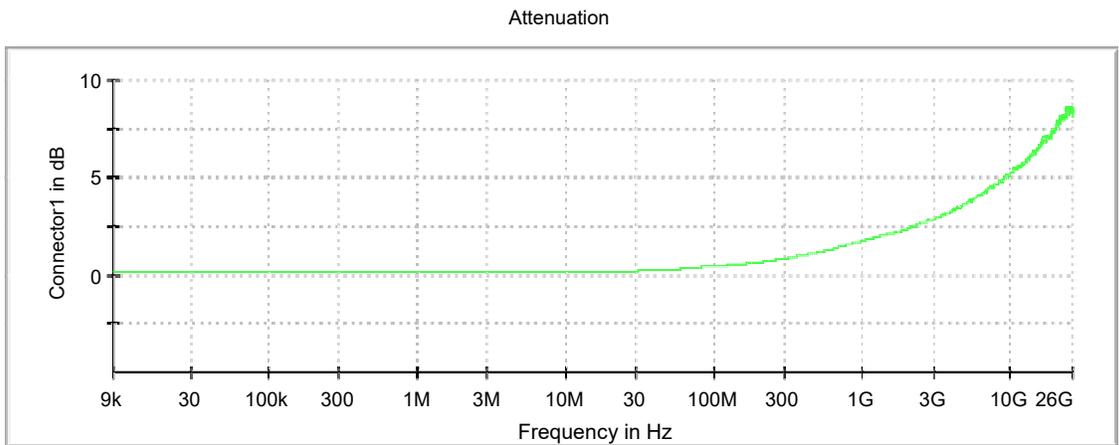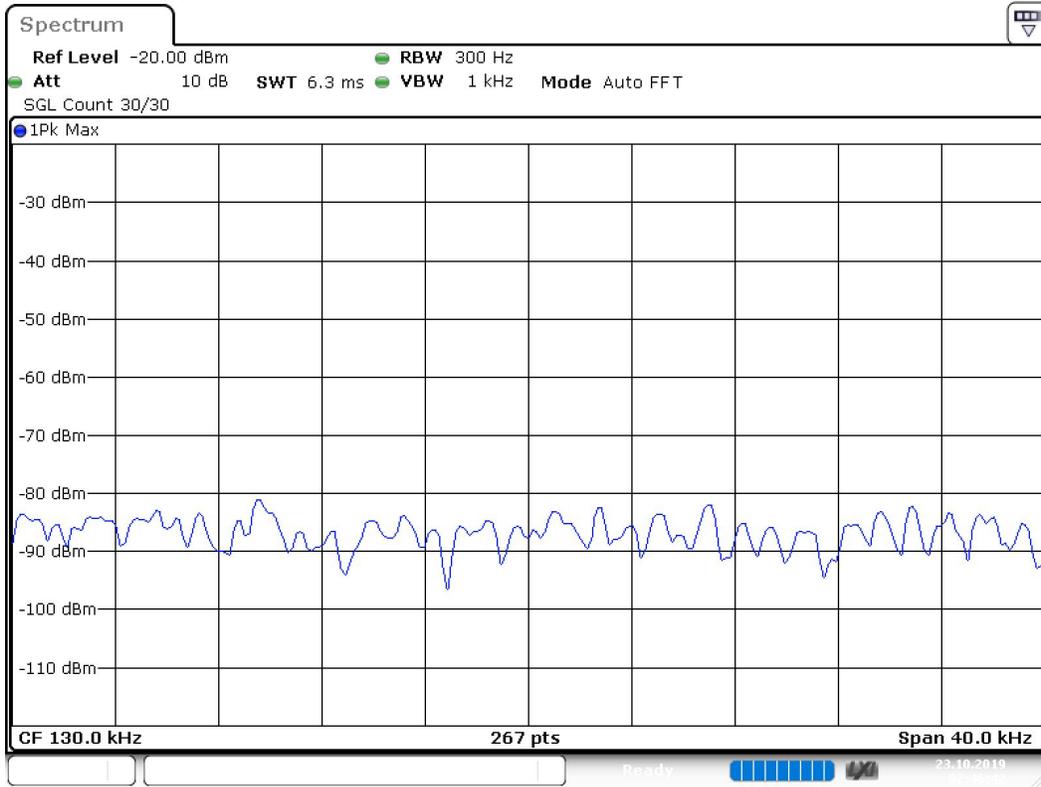

—— Connector1

Restricted Band Connector 1_0

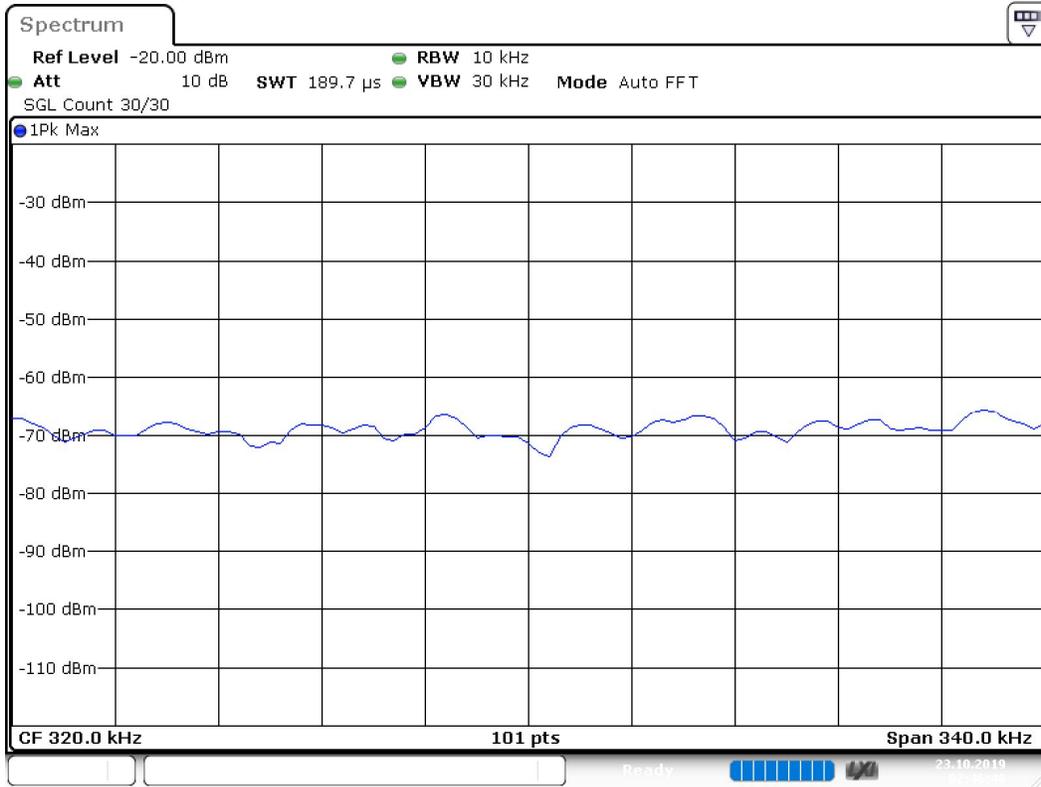Date: 23.OCT.2019 02:46:30

Restricted Band Connector 1_1

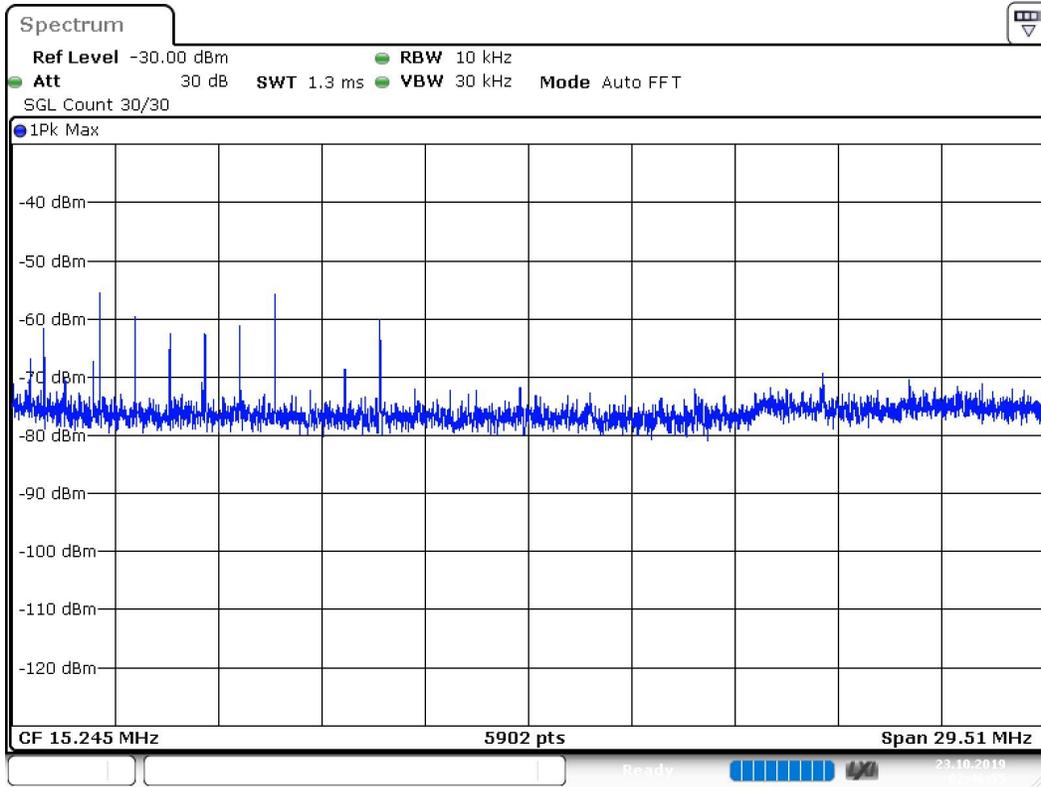Date: 23.OCT.2019 02:46:36

Restricted Band Connector 1_2

Date: 23.OCT.2019 02:46:42

Restricted Band Connector 1_3

Date: 23.OCT.2019 02:46:49

Restricted Band Connector 1_4

Date: 23.OCT.2019 02:46:56

Restricted Band Connector 1_5

Restricted Band Connector 1_6

Spectrum

Ref Level -10.00 dBm   ● RBW 1 MHz
● Att   20 dB   SWT 2.8 ms   ● VBW 3 MHz   Mode Auto Sweep
SGL Count 1/1

● 1Pk Max
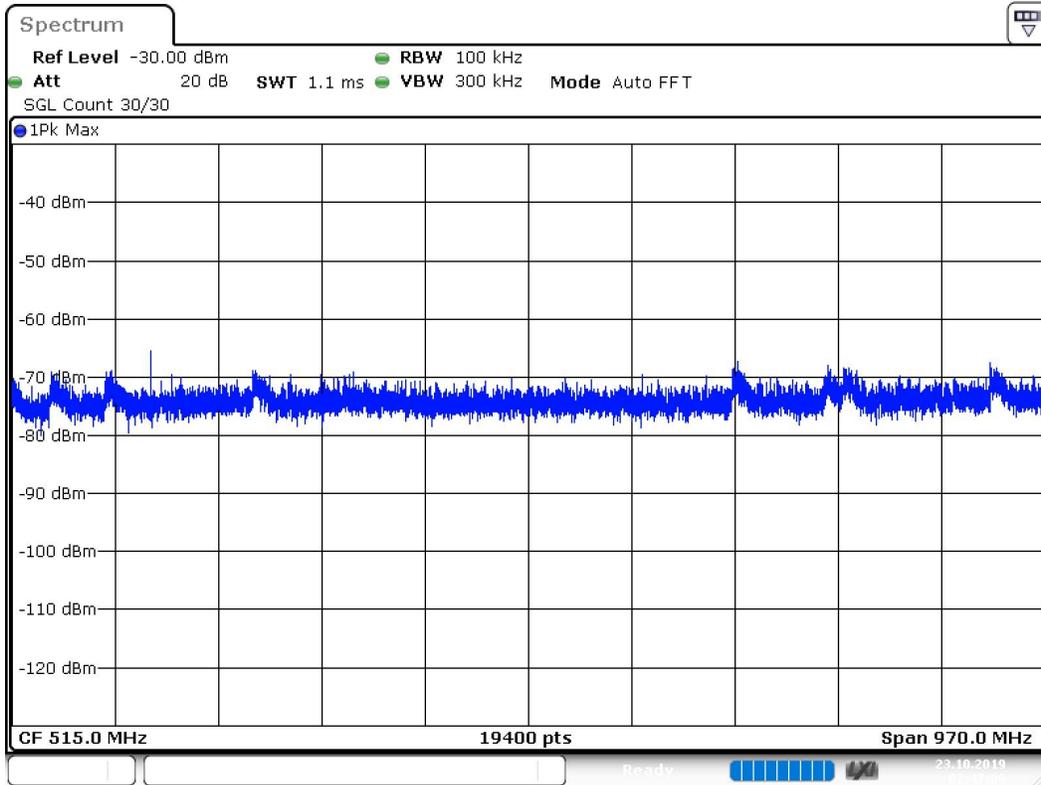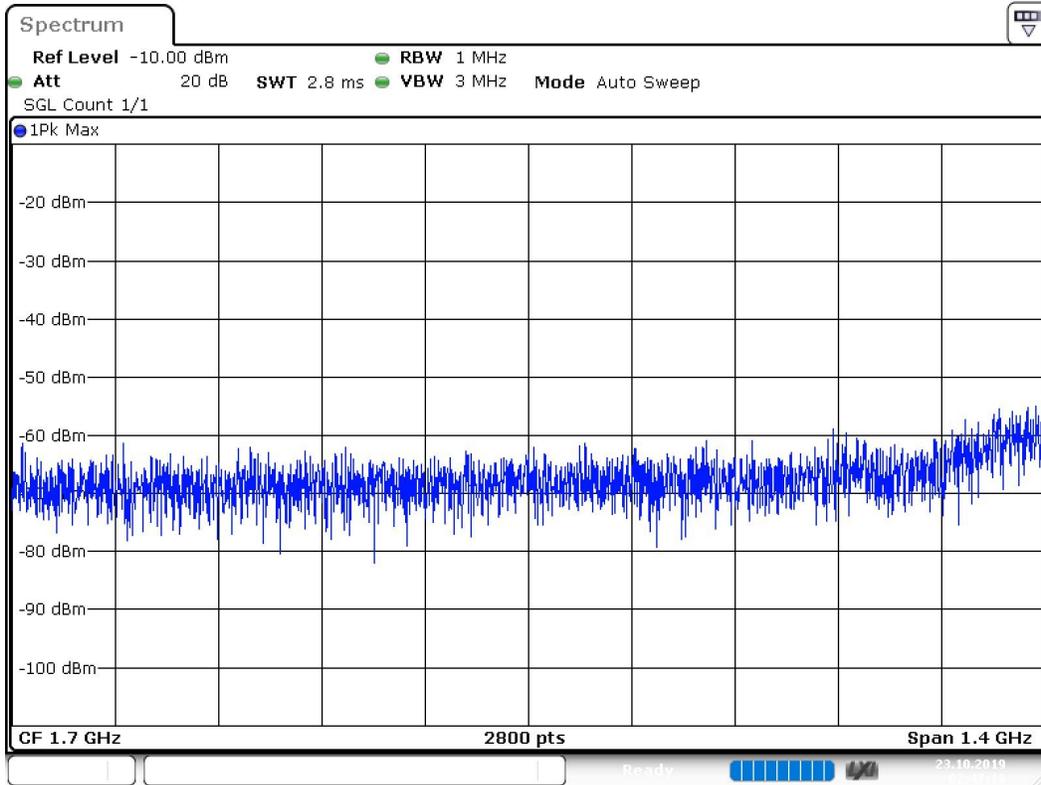
CF 1.7 GHz   2800 pts   Span 1.4 GHz

Ready

Date: 23.OCT.2019 02:47:19

Restricted Band Connector 1_7
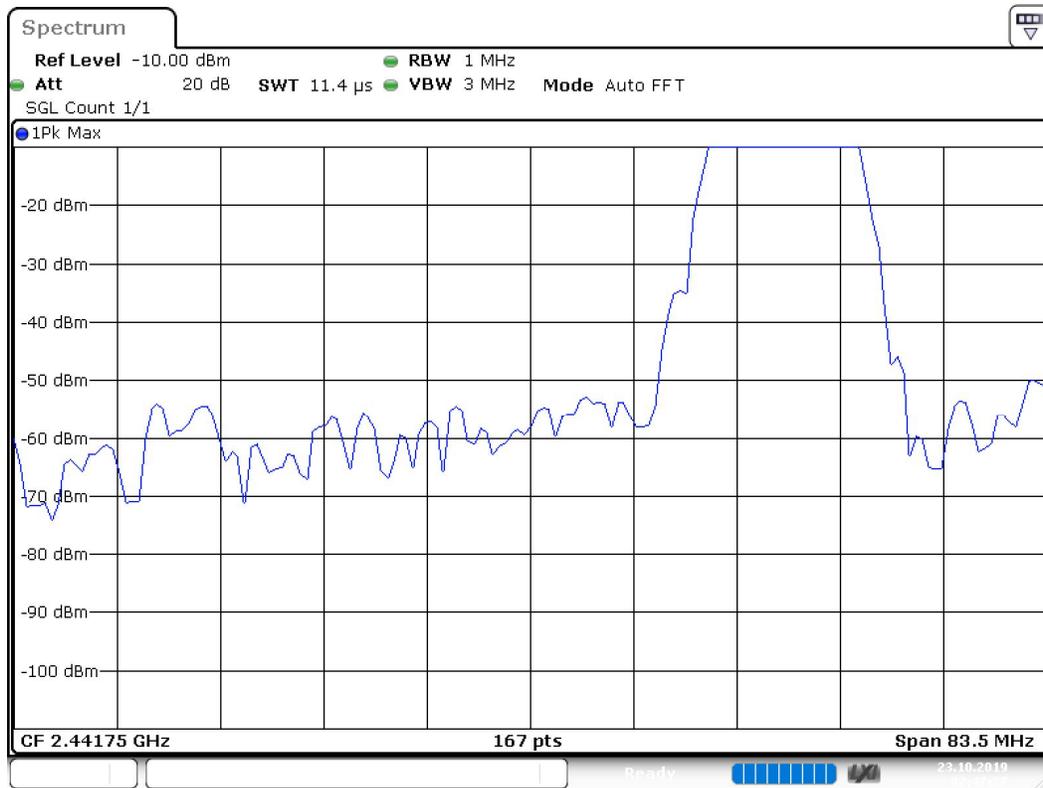
Date: 23.OCT.2019 02:47:27

Restricted Band Connector 1_8
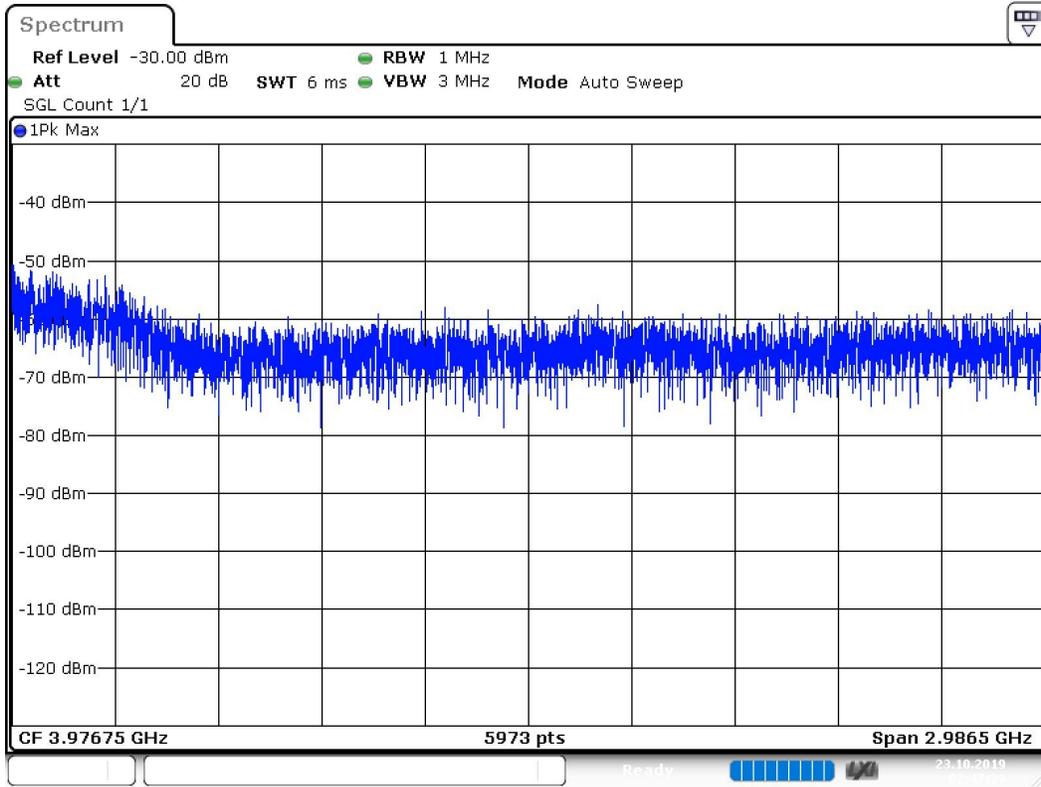
Date: 23.OCT.2019 02:47:34

Restricted Band Connector 1_9

Restricted Band Connector 1_10

Spectrum

Ref Level -30.00 dBm ● RBW 1 MHz
● Att 10 dB SWT 36 ms ● VBW 3 MHz Mode Auto Sweep
SGL Count 1/1
●1Pk Max

-40 dBm
-50 dBm
-60 dBm
-80 dBm
-90 dBm
-100 dBm
-110 dBm
-120 dBm

CF 11.5 GHz 18000 pts Span 9.0 GHz

Ready 23.10.2019
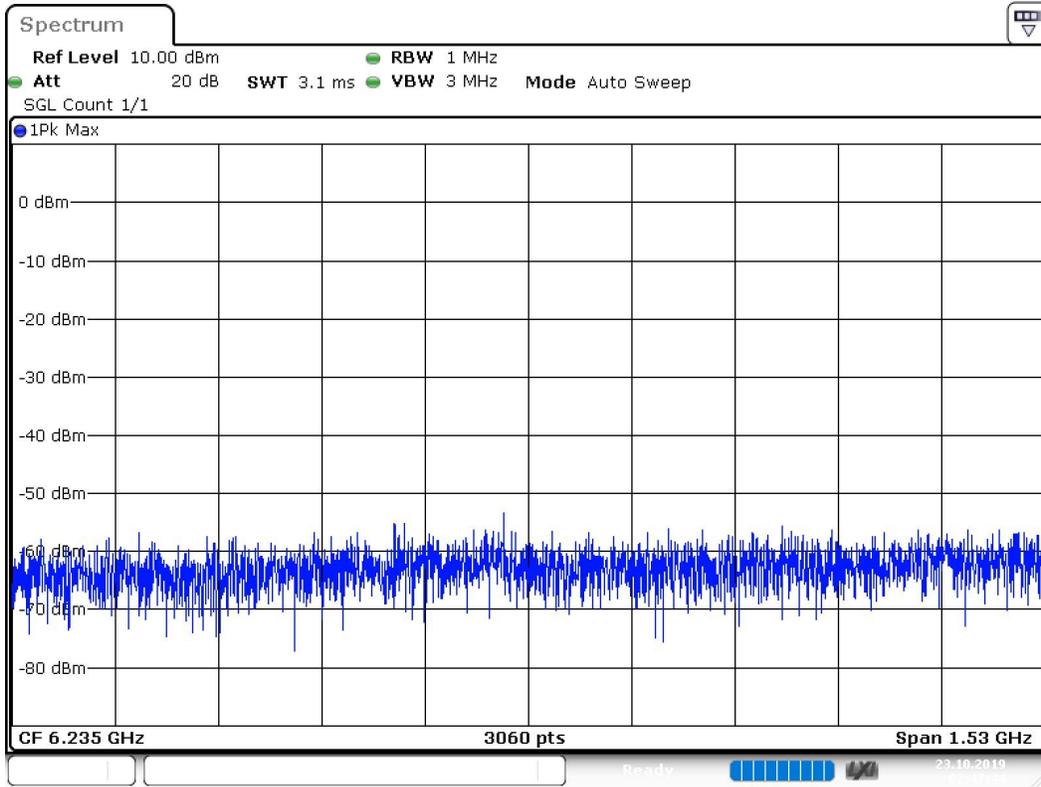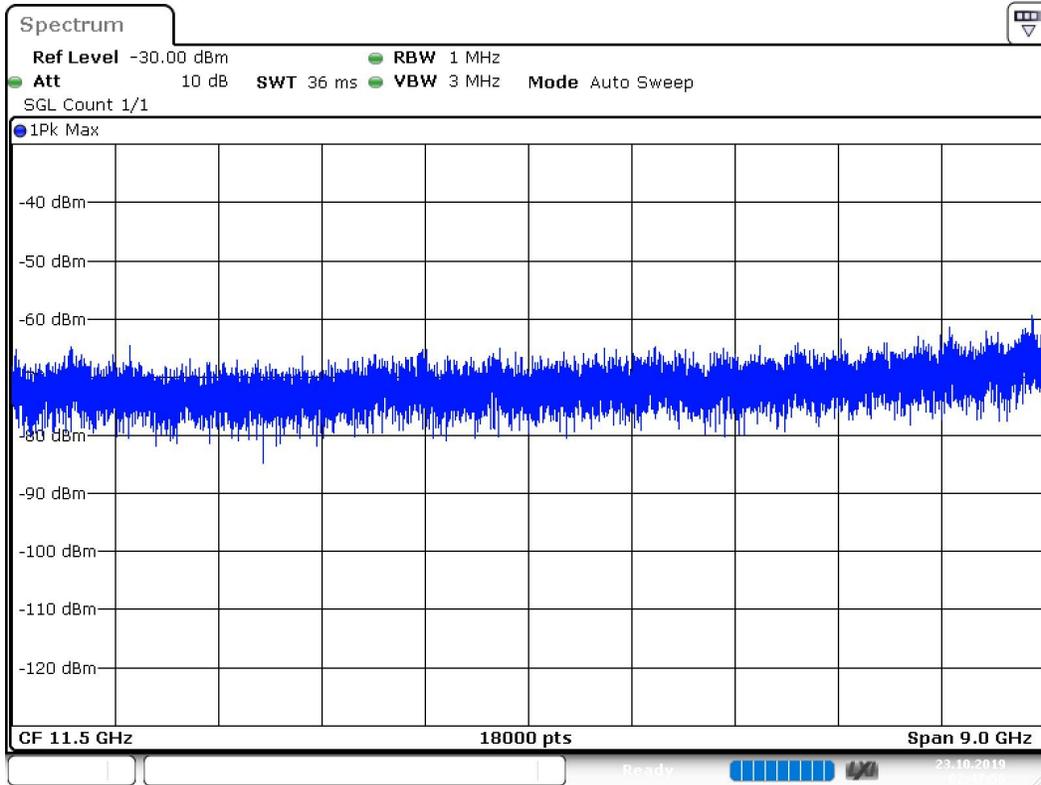
Date: 23.OCT.2019 02:47:57

Restricted Band Connector 1_11
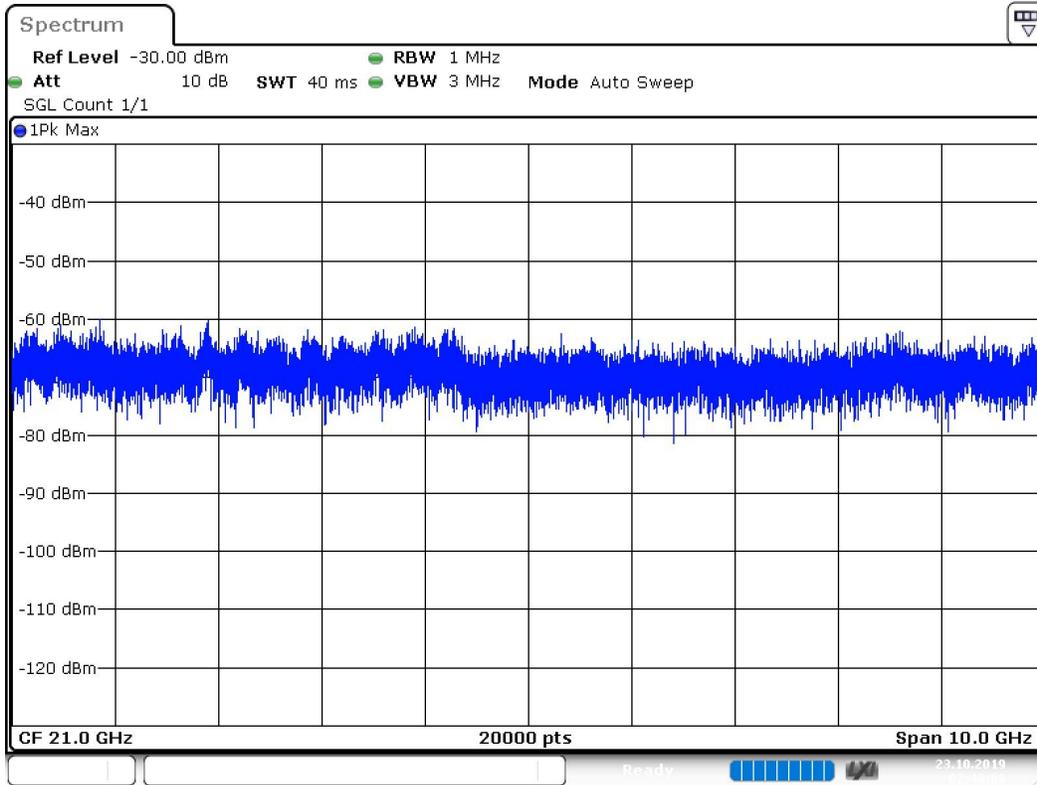
Date: 23.OCT.2019 02:48:09

Pre Measurement 1

Setting	Instrument Value	Target Value
RBW	1.000 MHz	<= 1.000 MHz
VBW	3.000 MHz	>= 3.000 MHz
SweepPoints	2800	~ 2800
Sweeptime	2.800 ms	AUTO
Reference Level	-10.000 dBm	-30.000 dBm
Attenuation	20.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	1	1
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off

Pre Measurement 2

Setting	Instrument Value	Target Value
RBW	300.000 Hz	<= 300.000 Hz
VBW	1.000 kHz	>= 900.000 Hz
SweepPoints	540	~ 540
Sweeptime	6.322 ms	AUTO
Reference Level	-20.000 dBm	-30.000 dBm
Attenuation	10.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	30	30
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	FFT	AUTO

Setting	Instrument Value	Target Value
Preamp	off	off

Summary
802.11g

Test	Frequency (MHz)	Nominal Power (dBm)	Nominal Bandwidth (MHz)	Result
RF output power	**2412.000**	**20.0**	**20.000000**	**PASS**
Minimum Emission Bandwidth 6 dB	**2412.000**	**20.0**	**20.000000**	**PASS**
Peak Power Spectral Density	**2412.000**	**20.0**	**20.000000**	**PASS**
Occupied Channel Bandwidth 99%	**2412.000**	**20.0**	**20.000000**	**PASS**
Band Edge low	**2412.000**	**20.0**	**20.000000**	**PASS**
Tx Spurious Emission	**2412.000**	**20.0**	**20.000000**	**PASS**
Emissions in restricted frequency bands (Average)	**2412.000**	**20.0**	**20.000000**	**PASS**
RF output power	**2442.000**	**20.0**	**20.000000**	**PASS**
Minimum Emission Bandwidth 6 dB	**2442.000**	**20.0**	**20.000000**	**PASS**
Peak Power Spectral Density	**2442.000**	**20.0**	**20.000000**	**PASS**
Occupied Channel Bandwidth 99%	**2442.000**	**20.0**	**20.000000**	**PASS**
Tx Spurious Emission	**2442.000**	**20.0**	**20.000000**	**PASS**
Emissions in restricted frequency bands (Average)	**2442.000**	**20.0**	**20.000000**	**PASS**
RF output power	**2462.000**	**20.0**	**20.000000**	**PASS**
Minimum Emission Bandwidth 6 dB	**2462.000**	**20.0**	**20.000000**	**PASS**
Peak Power Spectral Density	**2462.000**	**20.0**	**20.000000**	**PASS**
Occupied Channel Bandwidth 99%	**2462.000**	**20.0**	**20.000000**	**PASS**
Band Edge high	**2462.000**	**20.0**	**20.000000**	**PASS**
Tx Spurious Emission	**2462.000**	**20.0**	**20.000000**	**PASS**
Emissions in restricted frequency bands (Average)	**2462.000**	**20.0**	**20.000000**	**PASS**

RF output power (2412 MHz; 20 MHz)
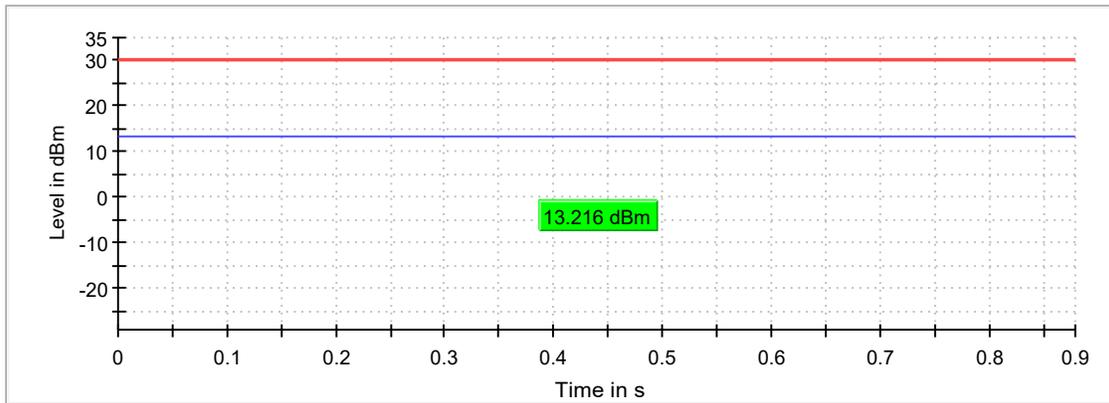
Customized settings.

Test according to FCC title 47 part 15 §15.247(b), KDB 558074 D01 DTS Meas Guidance v05 and ANSI C63.10-2013 11.9.2.3.2

Measurement uncertainty calculated in accordance with ETSI TR 100 028-1.
Expanded Combined Uncertainty of absolute Level Measurement (K=2) < 1 dB

Result

DUT Frequency (MHz)	Gated RMS (dBm)	Limit Max (dBm)	Gated EIRP (dBm)	DutyCycle (%)	Result
2412.000000	13.2	30.0	13.2	87.918	PASS

Gated Trace

Minimum Emission Bandwidth 6 dB (2412 MHz; 20 MHz)

Customized settings.

Test according to FCC title 47 part 15 §15.247(a), KDB 558074 D01 DTS Meas Guidance v05 and ANSI C63.10-2013 11.8.1

Measurement uncertainty calculated in accordance with ETSI TR 100 028-1.
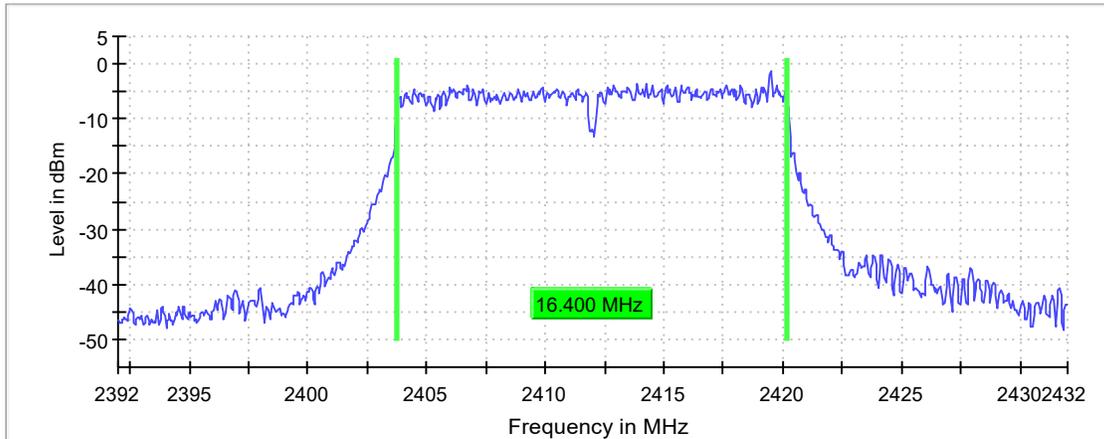Expanded Uncertainty (K=2) < 2%

6 dB Bandwidth

DUT Frequency (MHz)	Bandwidth (MHz)	Limit Min (MHz)	Limit Max (MHz)	Band Edge Left (MHz)	Band Edge Right (MHz)
2412.000000	16.400000	0.500000	---	2403.775000	2420.175000

(continuation of the "6 dB Bandwidth" table from column 6 ...)

DUT Frequency (MHz)	Max Level (dBm)	Result
2412.000000	-1.1	PASS

6 dB Bandwidth

Bandwidth
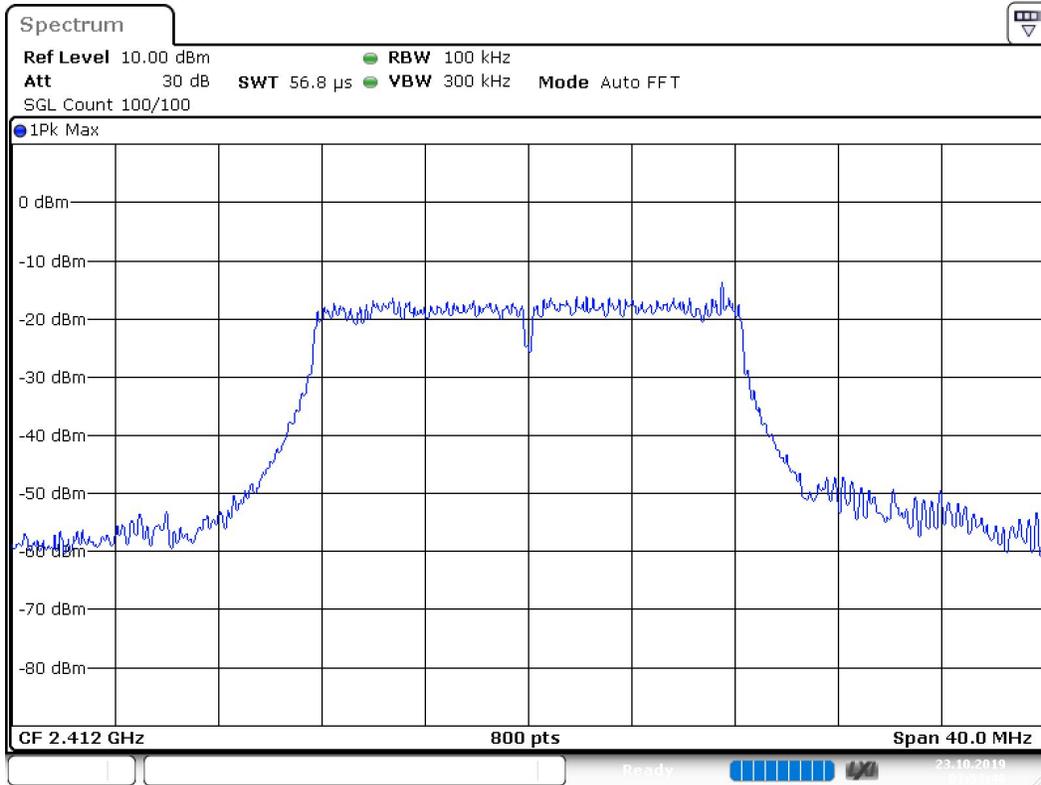
Date: 23.OCT.2019 03:53:48

Measurement

Setting	Instrument Value	Target Value
Start Frequency	2.39200 GHz	2.39200 GHz
Stop Frequency	2.43200 GHz	2.43200 GHz
Span	40.000 MHz	40.000 MHz
RBW	100.000 kHz	~ 100.000 kHz
VBW	300.000 kHz	~ 300.000 kHz
SweepPoints	800	~ 800
Sweeptime	56.836 µs	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	30.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	FFT	AUTO
Preamp	off	off

# Peak Power Spectral Density (2412 MHz; 20 MHz)

Customized settings.

Test according to FCC title 47 part 15 §15.247(a),(e), KDB 558074 D01 DTS Meas Guidance v05 F and ANSI C63.10-2013

Measurement uncertainty calculated in accordance with ETSI TR 100 028-1.
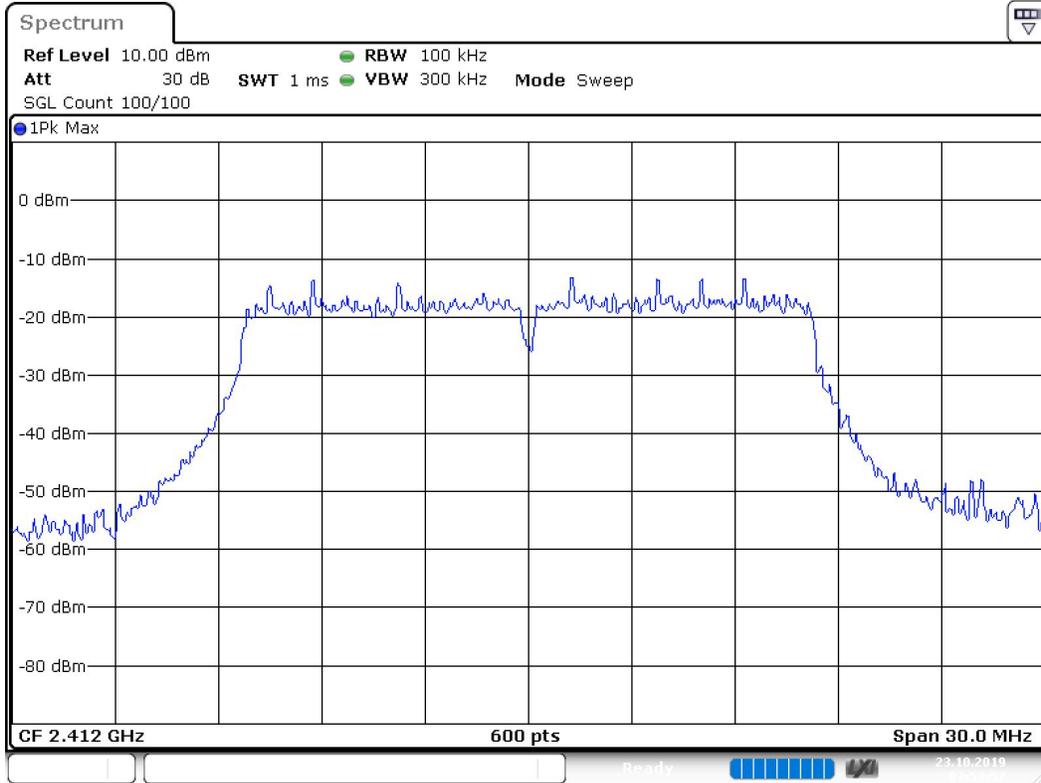Expanded Uncertainty (K=2) < 1.3 dB

Result

DUT Frequency (MHz)	Frequency (MHz)	PSD (dBm)	Limit Max (dBm)	Result
2412.000000	2413.225000	-0.774	8.0	PASS

Peak Power Spectral Density
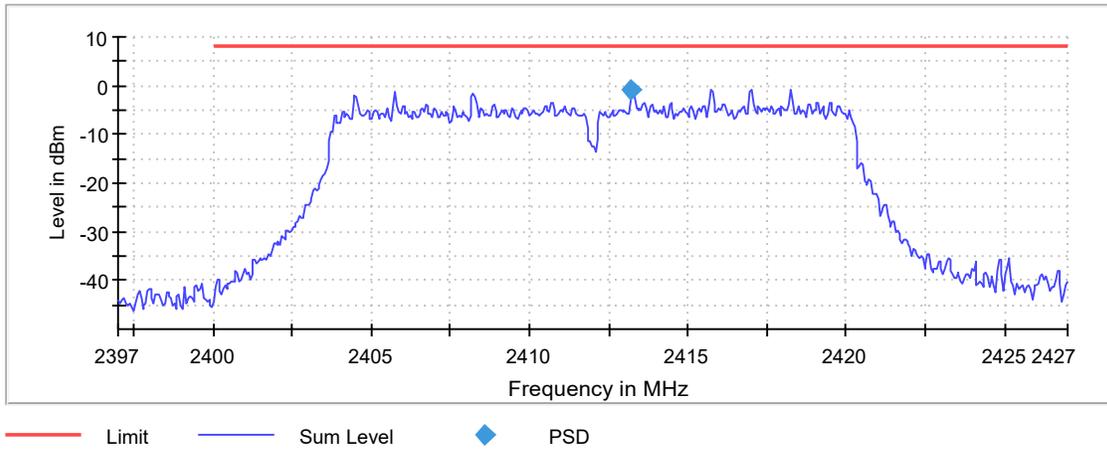
PSD Connector 1

Date: 23.OCT.2019   03:53:57

Measurement

Setting	Instrument Value	Target Value
Start Frequency	2.39700 GHz	2.39700 GHz
Stop Frequency	2.42700 GHz	2.42700 GHz
Span	30.000 MHz	30.000 MHz
RBW	100.000 kHz	<= 100.000 kHz
VBW	300.000 kHz	>= 300.000 kHz
SweepPoints	600	~ 600
Sweeptime	1.040 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	30.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	Sweep
Preamp	off	off

Occupied Channel Bandwidth 99% (2412 MHz; 20 MHz)

Customized settings.

Test according to FCC title 47 part 15 §15.247(a), KDB 558074 D01 DTS Meas Guidance v05 and ANSI C63.10-2013 11.8.1
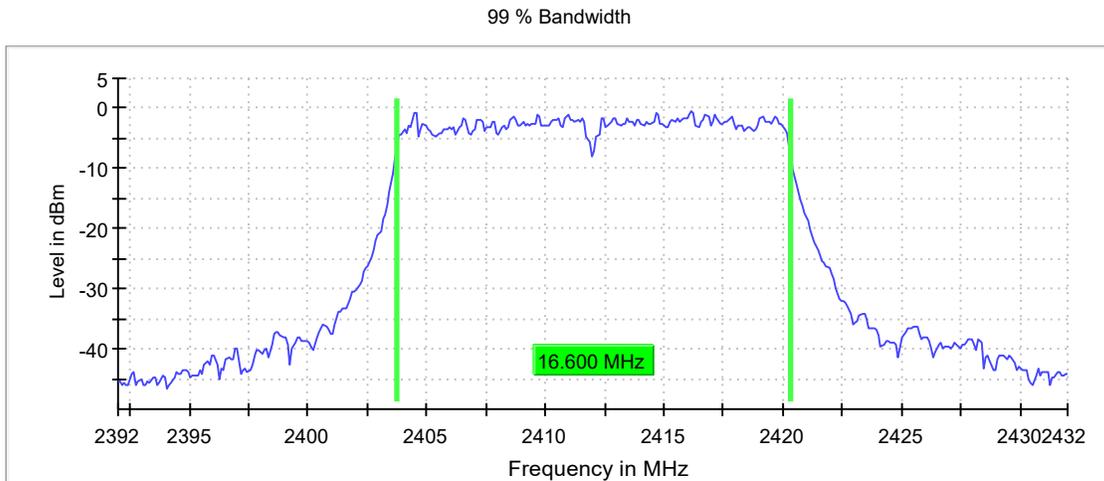
Measurement uncertainty calculated in accordance with ETSI TR 100 028-1.
Expanded Uncertainty (K=2) < 2%

99 % Bandwidth

DUT Frequency (MHz)	Bandwidth (MHz)	Limit Min (MHz)	Limit Max (MHz)	Band Edge Left (MHz)	Band Edge Right (MHz)
2412.000000	16.600000	---	---	2403.750000	2420.350000

(continuation of the "99 % Bandwidth" table from column 6 ...)

DUT Frequency (MHz)	Result
2412.000000	PASS

99 % Bandwidth

Bandwidth