Prüfbericht-Nr.: *Test report No.:*	**50055846 004**	**Auftrags-Nr.:** *Order No.:*	164069063	Seite 1 von 25 *Page 1 of 25*
Kunden-Referenz-Nr.: *Client reference No.:*	N/A	**Auftragsdatum:** *Order date.:*	14.07.2016	
Auftraggeber: *Client:*	**ContextMedia LLC** 330 N. Wabash Ave STE 2500, Chicago, Illinois United States.			
Prüfgegenstand: *Test item:*	13.3" Tablet			
Bezeichnung / Typ-Nr.: *Identification / Type No.:*	P-TAB-104-ELC-XX (XX equals to 00, 01, 02, 03...99) (ContextMedia Health)			
Auftrags-Inhalt: *Order content:*	FCC and IC approval			
Prüfgrundlage: *Test specification:*	CFR47 FCC Part 15: Subpart C Section 15.407 CFR47 FCC Part 15: Subpart C Section 15.207 CFR47 FCC Part 15: Subpart C Section 15.209 RSS-247 Issue 1 May 2015 RSS-Gen Issue 4 November 2014			
Wareneingangsdatum: *Date of receipt:*	21.07.2016	Please refer to photo documents		
Prüfmuster-Nr.: *Test sample No.:*	A000399543-002			
Prüfzeitraum: *Testing period:*	29.07.2016 - 09.09.2016			
Ort der Prüfung: *Place of testing:*	Accurate Technology Co., Ltd. Shenzhen Academy of Metrology& Quality Inspection			
Prüflaboratorium: *Testing laboratory:*	TÜV Rheinland (Shenzhen) Co., Ltd.			
Prüfergebnis*: *Test result*:*	Pass			

geprüft von / *tested by:*			**kontrolliert von** / *reviewed by:*		
18.09.2016	Andy Yan / Project Manager		18.09.2016	Owen Tian / Technical Certifier	
Datum *Date*	**Name/Stellung** *Name/Position*	**Unterschrift** *Signature*	**Datum** *Date*	**Name/Stellung** *Name/Position*	**Unterschrift** *Signature*

Sonstiges / *Other:*

FCC ID: 2AI6X-PTABELC

IC: 21722-PTABELC HVIN: P-TAB-104-ELC-01, P-TAB-104-ELC-02, P-TAB-104-ELC-03

All the Identification no. are identical in the hardware and electronic aspects with each other.

All the HVIN no. are identical in the hardware and electronic aspects with each other, the difference is only color apperance.

Zustand des Prüfgegenstandes bei Anlieferung: *Condition of the test item at delivery:*	Prüfmuster vollständig und unbeschädigt *Test item complete and undamaged:*

* Legende:	1 = sehr gut	2 = gut	3 = befriedigend	4 = ausreichend	5 = mangelhalt
	P(ass) = entspricht o.g. Prüfgrundlage(n)		F(ail) = entspricht nicht o.g. Prüfgrundlage(n)	N/A = nicht anwendbar	N/T = nicht getestet
Legend:	1 = very good	2 = good	3 = satisfactory	4 = sufficient	5 = poor
	P(ass) = passed a.m. test specifications(s)		F(ail) = failed a.m. test specifications(s)	N/A = not applicable	N/T = not tested

TEST SUMMARY

5.1.1 ANTENNA REQUIREMENT
RESULT: Pass

5.1.2 PEAK OUTPUT POWER
RESULT: Pass

5.1.3 26DB BANDWIDTH
RESULT: Pass

5.1.4 99% BANDWIDTH
RESULT: Pass

5.1.5 6DB BANDWIDTH
RESULT: Pass

5.1.6 POWER SPECTRAL DENSITY
RESULT: Pass

5.1.7 SPURIOUS EMISSION
RESULT: Pass

5.1.8 CONDUCTED EMISSIONS
RESULT: Pass

CONTENTS

1. General Remarks

1.1 Complementary Materials

All attachments are integral parts of this test report. This applies especially to the following appendix:

Appendix F: Test Results of Wi-Fi 802.11a/n/ac of Conducted Testing

Appendix G: Test Results of Wi-Fi 802.11a/n/ac of AC Conducted and Radiated Emission

2. Test Sites

2.1 Test Facilities

Accurate Technology Co., Ltd.

F1, Bldg. A, Changyuan New Material Port Keyuan Rd., Science & Industry Park, Nanshan Shenzhen, 518057, P.R. China

FCC Registration No.: 752051

Test site Industry Canada No.: 5077A-2

Shenzhen Academy of Metrology& Quality Inspection

No.4 Tongfa Rd, Xili, Shenzhen,Guangdong,china

FCC Registration Number is 806614

The tests at the test sites have been conducted under the supervision of a TÜV engineer.

2.2 List of Test and Measurement Instruments

Table 1: List of Test and Measurement Equipment

Radio Spectrum Test (Accurate Technology Co., Ltd.)				
Equipment	**Manufacturer**	**Model No.**	**Serial No.**	**Cal. Until**
Spectrum Analyzer	R&S	ESPI3	100396/003	09.01.2017
Spectrum Analyzer	Agilent	E7405A	MY45115511	09.01.2017
Temp.& Humid.Chamber	Gongwen	HSD-500	0109	09.01.2017
Spurious Emission (Accurate Technology Co., Ltd.)				
Equipment	**Manufacturer**	**Model No.**	**Serial No.**	**Cal. Until**
Spectrum Analyzer	R&S	FSV40	101495	09.01.2017
Test Receiver	R&S	ESCS30	100307	09.01.2017
Bilog Antenna	Schwarzbeck	VULB9163	9163-323	14.01.2017
Loop Antenna	Schwarzbeck	FMZB1516	1516131	14.01.2017
Horn Antenna	Schwarzbeck	BBHA9120D	9120D-655	14.01.2017
Horn Antenna	Schwarzbeck	BBHA9170	9170-359	14.01.2017
RF Switching Unit+PreAMP	Compliance Direction	RSU-M2	38322	09.01.2017
Pre-Amplifier	R&S	CBLU11835 40-01	3791	09.01.2017
50 Coaxial Switch	Anritsu Corp	MP59B	6200506474	09.01.2017
RF Coaxial Cable	SUHNER	N-3m	No.8	09.01.2017
RF Coaxial Cable	RESENBERGER	N-3.5m	No.9	09.01.2017
RF Coaxial Cable	SUHNER	N-6m	No.10	09.01.2017
RF Coaxial Cable	RESENBERGER	N-12m	No.11	09.01.2017
50_ Coaxial Switch	Anritsu Corp	MP59B	6200283933	09.01.2017
Conducted Emission on AC Mains (Accurate Technology Co., Ltd.)				
Equipment	**Manufacturer**	**Model No.**	**Serial No.**	**Cal. Until**
Test Receiver	R&S	ESCS30	100307	09.01.2017
L.I.S.N.	R&S	NLSK8126	8126431	09.01.2017
50Ω Coaxial Switch	Anritsu	MP59B	6200283933	09.01.2017
Spurious Emissions (Shenzhen Academy of Metrology& Quality Inspection) (for 26.5 - 40GHz)				
EMI Receiver	Rohde & Schwarz	ESCI3	SB9058/05	2017-05-02
EMI Receiver	Rohde & Schwarz	ESU40	SB8501/09	2017-05-14
Horn Antenna	Rohde & Schwarz	3160-10	SB8501/12	2017-05-14

2.3 Traceability

All measurement equipment calibrations are traceable to NIM (National Institute of Metrology) or where calibration is performed in other countries, to equivalent nationally recognized standards organizations.

2.4 Calibration

Equipment requiring calibration is calibrated periodically by the manufacturer or according to manufacturer's specifications. Additionally all equipment is verified for proper performance on a regular basics using in house standards or comparisons.

2.5 Measurement Uncertainty

Table 2: Measurement Uncertainty

Item		Extended Uncertainty
Conducted Emission		± 3.0 dB
Radiated Emission (9kHz-30MHz)	Field strength (dBµV/m)	U=3.08dB, k=2, σ=95%
Radiated Emission (30-1000MHz)	Field strength (dBµV/m)	U=4.42dB, k=2, σ=95%
Radiated Emission (above 1000MHz)	Field strength (dBµV/m)	U=4.06dB, k=2, σ=95%
Occupied Channel Bandwidth		±5.0 %
RF Output Power, Conducted		±1.5 dB
Power Spectral Density, Conducted		±3.0 dB
Unwanted Emission, Conducted		±3.0 dB
Radio Frequency		±1x10^-5
Duty Cycle		±5.0 %

2.6 Location of Original Data

The original copies of all test data taken during actual testing were retained in the TÜV Rheinland (Shenzhen) file for certification follow-up purposes.

2.7 Status of Facility Used for Testing

The Accurate Technology Co., Ltd. Test facility located at F1, Bldg. A, Changyuan New Material Port Keyuan Rd., Science & Industry Park, Nanshan Shenzhen, 518057, P.R. China and Shenzhen Academy of Metrology& Quality Inspection Test facility located at No.4 Tongfa Rd, Xili, Shenzhen,Guangdong,china are listed on the US Federal Communications Commission list of facilities approved to perform measurements.

3. General Product Information

3.1 Product Function and Intended Use

The EUT is a 13.3" Tablet which supports Bluetooth (dual mode) and Wi-Fi 802.11 a/b/g/n/ac wireless technology. This NII report is only for 5GHz band 802.11a/n/ac technology. Other functions with different technologies are reported in the related reports.

3.2 Ratings and System Details

Table 3: Technical Specification of EUT

Technical Specification	Value
Kind of Equipment	13.3" Tablet
Type Designation	P-TAB-104-ELC-XX (XX equals to 00, 01, 02, 03...99)
FCC ID	2AI6X-PTABELC
IC / HVIN	21722-PTABELC / P-TAB-104-ELC-01, P-TAB-104-ELC-02, P-TAB-104-ELC-03
Equipment Type	Client Device (Indoor)
Operating Frequency band	5150-5250MHz; 5725-5850MHz
Extreme Temperature Range	0~+40℃
Operating Voltage	DC 5.0 V from AC/DC Adapter
Testing Voltage	DC 5.0 V from AC/DC Adapter with input 120V/60Hz
Antenna Type	Integral Antenna
Antenna Gain	4.5dBi

Table 4: Technical Specification of 5GHz, 802.11a/n

Operating mode(s) / WiFi:	IEEE 802.11a	IEEE 802.11n HT20	IEEE 802.11n HT40
Test modulation	OFDM (BPSK, QPSK, 16-QAM, 64-QAM)	OFDM (BPSK, QPSK, 16-QAM, 64-QAM)	OFDM (BPSK, QPSK, 16-QAM, 64-QAM)
Transmit Frequency Range (MHz):	5180 - 5240 5845 - 5825	5180 - 5240 5845 - 5825	5180 - 5240 5845 - 5825
Channel Number	9	9	4
Data Rate (Mbps) used for testing	6, 9, 12, 18, 24, 36, 48, 54	MCS0 ~ MCS7	MCS0 ~ MCS7
Maximum tune-up average output power (dBm):	15.5	15.0	15.0
Reported Max. Power data rate(Mbps)	6	MCS0	MCS0

Table 5: Technical Specification of 5GHz, 802.11ac

Operating mode(s) / WiFi:	IEEE 802.11ac VHT20	IEEE 802.11ac VHT40	IEEE 802.11ac VHT80
Test modulation	OFDM (BPSK, QPSK, 16-QAM, 64-QAM, 256-QAM)	OFDM (BPSK, QPSK, 16-QAM, 64-QAM, 256-QAM)	OFDM (BPSK, QPSK, 16-QAM, 64-QAM, 256-QAM)
Transmit Frequency Range (MHz):	5180 - 5240 5845 - 5825	5180 - 5240 5845 - 5825	5180 - 5240 5845 - 5825
Channel Number	9	4	2
Data Rate (Mbps) used for testing	MCS0 ~ MCS8	MCS0 ~ MCS9	MCS0 ~ MCS9
Maximum tune-up average output power (dBm):	15.0	15.0	15.0
Reported Max. Power data rate(Mbps)	MCS0	MCS0	MCS0

Table 6: List of WLAN Channel of 5GHz 802.11a/n

802.11a		802.11n HT20		802.11n HT40	
Channel Number	Frequency (MHz)	Channel Number	Frequency (MHz)	Channel Number	Frequency (MHz)
36	5180	36	5180	38	5190
40	5200	40	5200	46	5230
44	5220	44	5220	151	5755
48	5240	48	5240	159	5795
149	5745	149	5745		
153	5765	153	5765		
157	5785	157	5785		
161	5805	161	5805		
165	5825	165	5825		

Table 7: List of WLAN Channel of 5GHz 802.11ac

802.11ac VHT20		802.11ac VHT40		802.11ac VHT80	
Channel Number	Frequency (MHz)	Channel Number	Frequency (MHz)	Channel Number	Frequency (MHz)
36	5180	38	5190	42	5210
40	5200	46	5230	155	5775
44	5220	151	5755		
48	5240	159	5795		
149	5745				
153	5765				
157	5785				
161	5805				
165	5825				

3.3 Independent Operation Modes

The basic operation modes are:

A. On, Wi-Fi mode (Band U-NII-1)
   1. Transmitting
      a. Low Channel
      b. Middle Channel
      c. High Channel

B. On, Wi-Fi mode (Band U-NII-3)
   1. Transmitting
      a. Low Channel
      b. Middle Channel
      c. High Channel

C. Normal Operation (WiFi Link within 5GHz band)

3.4 Noise Generating and Noise Suppressing Parts

Refer to the Circuit Diagram.

3.5 Submitted Documents

- Application Form
- Block Diagram
- Schematics
- Technical Description
- FCC/IC Label and Location Info
- Photo Document
- User Manual

4. Test Set-up and Operation Modes

4.1 Principle of Configuration Selection

The equipment under test (EUT) was configured to measure its maximum power level. The test modes were adapted accordingly in reference to the instructions for use.

4.2 Test Operation and Test Software

Test operation refers to test setup in chapter 5. All testing were performed according to the procedures in ANSI C63.10: 2013.

4.3 Special Accessories and Auxiliary Equipment

List of Accessories and Auxiliary Equipment

Description	Manufacturer	Model	S/N	Rating
Adapter	Mass Power	NBS18C050250 VU	N/A	Input: 100-240V~, 50/60Hz, 0.6A Output: DC 5.0V, 2.5A
Notebook PC	Lenovo	ThinkPad X240	N/A	N/A
Printer	HP	HP laserjet 1015	CNFG030424	N/A

4.4 Countermeasures to Achieve ERM Compliance

The test sample which has been tested contained the noise suppression parts as described in the Technical Construction File (TCF). No additional measures were employed to achieve compliance.

4.5 Test Setup Diagram

Diagram of Measurement Configuration for Radiation Test of below 1GHz

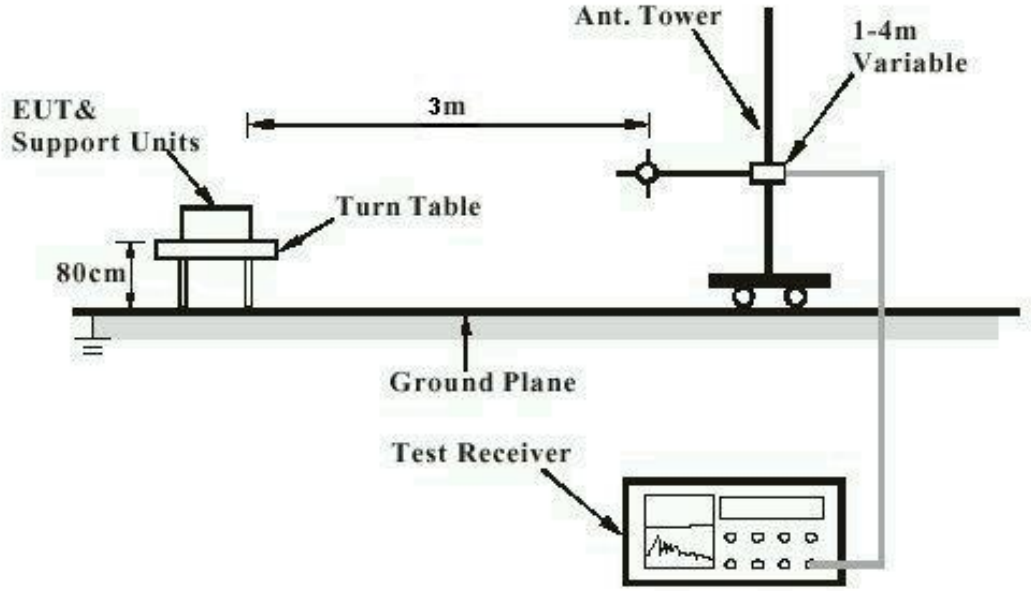


Diagram of Measurement Configuration for Radiation Test of above 1GHz

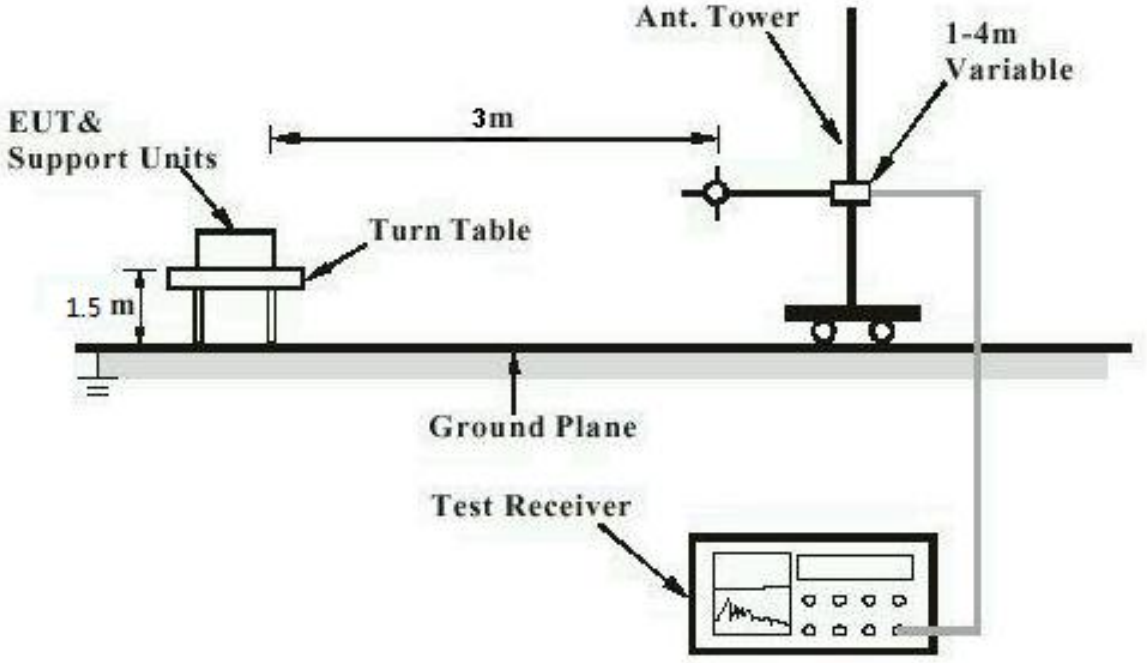


Diagram of Measurement Equipment Configuration for Conduction Measurement

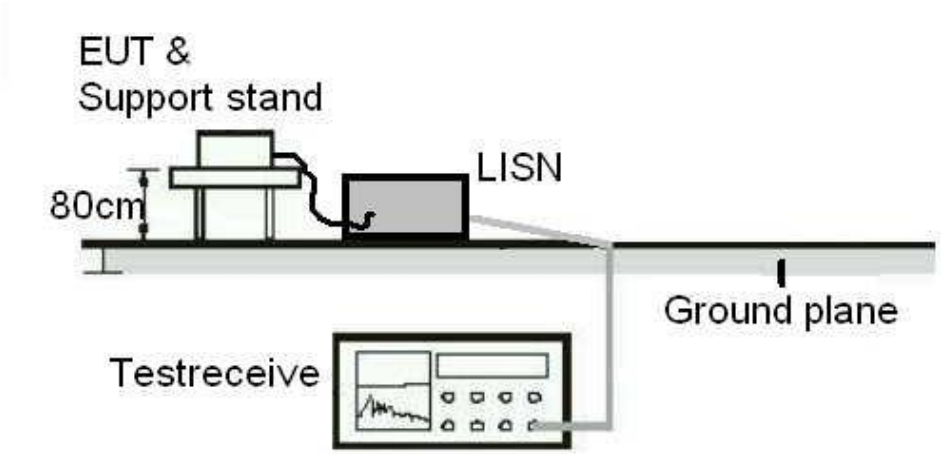
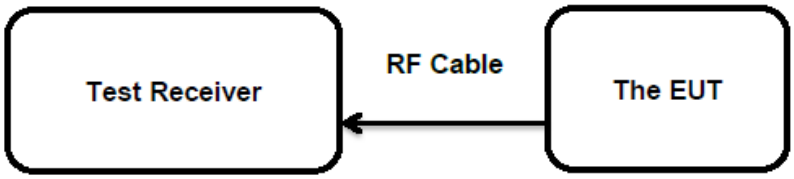


Diagram of Measurement Equipment Configuration for Transmitter Measurement



5. Test Results

5.1 Transmitter Requirement & Test Suites

5.1.1 Antenna Requirement

RESULT: **Pass**

Test standard	:	FCC Part 15.203 RSS-Gen Clause 8.3
Limit		The use of antennas with directional gains that do not exceed 6dBi

According to the manufacturer declared, the EUT has an internal antenna, the directional gain of antenna is 4.5dBi, and the antenna connector is designed with permanent attachment and no consideration of replacement. Therefore the EUT is considered sufficient to comply with the provision.

5.1.2 Peak Output Power

RESULT: **Pass**

Test date	:	2016-07-31
Test standard	:	FCC Part 15.407(a)(1)(iv) FCC Part 15.407(a)(3) RSS-247 clause 6.2.1(1) RSS-247 clause 6.2.4(1)
Basic standard	:	ANSI C63.10: 2013
Limit	:	24dBm for FCC, 23dBm or 10 + 10 $\log_{10}$B, dBm, whichever power is less for IC (Band U-NII-1) 30dBm (Band U-NII-3)
Kind of test site	:	Shielded room

Test setup

Test Channel	:	All channel
Operation Mode	:	A.1, B.1
Ambient temperature	:	25℃
Relative humidity	:	56%
Atmospheric pressure	:	101kPa

Table 8: Test result of Peak Output Power of Band U-NII-1

Mode	Channel Frequency (MHz)	Max. Conducted output power (dBm)	Limit (dBm)
802.11a	5180	14.49	22.2
	5200	14.85	22.2
	5240	15.10	22.2
802.11n HT20	5180	14.13	22.5
	5200	14.10	22.5
	5240	14.36	22.5
802.11n HT40	5190	13.04	23
	5230	13.49	23
802.11ac VHT20	5180	12.94	22.5
	5200	13.60	22.5
	5240	13.63	22.5
802.11ac VHT40	5190	12.93	23
	5230	13.60	23
802.11ac VHT80	5210	13.23	23

Note: Antenna Gain = 4.5dBi
Max_EIRP = Max. Conducted TX Power + Antenna Gain = 15.1+ 4.5 = 19.6dBm Less than 22.2dBm (10 + 10 log10B).

Table 9: Test result of Peak Output Power of Band U-NII-3

Mode	Channel Frequency (MHz)	Conducted output power (dBm)	Limit (dBm)
802.11a	5745	14.43	30
	5785	14.07	30
	5825	15.06	30
802.11n HT20	5745	12.85	30
	5785	13.57	30
	5825	14.27	30
802.11n HT40	5755	12.68	30
	5795	13.60	30
802.11ac VHT20	5745	12.11	30
	5785	12.54	30
	5825	12.35	30
802.11ac VHT40	5755	12.00	30
	5795	12.03	30
802.11ac VHT80	5775	11.46	30

Note: Antenna Gain = 4.5dBi
Max_EIRP = Max. Conducted TX Power + Ant. Gain = 15.06+ 4.5 = 19.6dBm < 36dBm.

5.1.3 26dB Bandwidth

RESULT: **Pass**

Date of testing	:	2016-07-31~2016-08-17
Test standard	:	FCC Part 15.407(a)(5)
Basic standard	:	ANSI C63.10: 2013
Kind of test site	:	Shielded room

Test setup

Test Channel	:	All channel
Operation Mode	:	A.1, B.1
Ambient temperature	:	25℃
Relative humidity	:	56%
Atmospheric pressure	:	101kPa

Table 10: Test result of 26dB Bandwidth Band U-NII-1

Mode	Channel Frequency (MHz)	26dB Bandwidth (MHz)	Limit (MHz)
802.11a	5180	21.472	--
	5200	21.447	
	5240	21.491	
802.11n HT20	5180	21.960	
	5200	21.752	
	5240	21.881	
802.11n HT40	5190	40.640	
	5230	40.750	
802.11ac VHT20	5180	21.940	
	5200	21.766	
	5240	21.882	
802.11ac VHT40	5190	40.810	
	5230	40.637	
802.11ac VHT80	5210	82.830	

Note: 99% Occupied Bandwidth within the U-NII-1 band and 26dB Emission Bandwidth for reference.

For details refer to the test plots in Appendix F.

5.1.4 99% Bandwidth

RESULT: **Pass**

Date of testing	:	2016-07-31 ~ 2016-09-02
Test standard	:	RSS-Gen clause 6.6
Basic standard	:	ANSI C63.10: 2013
Kind of test site	:	Shielded room

Test setup

Test Channel	:	All channel
Operation Mode	:	A.1, B.1
Ambient temperature	:	25℃
Relative humidity	:	56%
Atmospheric pressure	:	101kPa

Table 11: Test result of 99% Bandwidth Band U-NII-1

Mode	Channel Frequency (MHz)	99% Bandwidth (MHz)	Limit (MHz)
802.11a	5180	16.802	Within the Frequency band 5150-5250MHz
	5200	16.758	
	5240	16.758	
802.11n HT20	5180	17.818	
	5200	17.974	
	5240	17.896	
802.11n HT40	5190	36.932	
	5230	36.932	
802.11ac VHT20	5180	17.829	
	5200	18.003	
	5240	17.829	
802.11ac VHT40	5190	36.903	
	5230	36.903	
802.11ac VHT80	5210	75.890	

Note: The frequency stability of 99% emission bandwidth is maintained within the U-NII-1 band of operation under all conditions (0~+40℃) of normal operation.

Table 12: Test result of 99% Bandwidth of Band U-NII-3

Mode	Channel Frequency (MHz)	99% Bandwidth (MHz)	Limit (MHz)
802.11a	5745	16.758	Within the frequency band 5725-5850MHz
	5785	16.802	
	5825	16.802	
802.11n HT20	5745	17.844	
	5785	17.974	
	5825	17.931	
802.11n HT40	5755	37.077	
	5795	37.077	
802.11ac VHT20	5745	17.887	
	5785	17.887	
	5825	17.887	
802.11ac VHT40	5755	36.903	
	5795	36.903	
802.11ac VHT80	5775	76.064	

Note: The frequency stability of 99% emission bandwidth is maintained within the U-NII-3 band of operation under all conditions (0~+40℃) of normal operation.

For details refer to the test plots in Appendix F.

5.1.5 6dB Bandwidth

RESULT: **Pass**

Date of testing	:	2016-08-17 ~ 2016-09-02
Test standard	:	FCC Part 15.407(e) RSS-247 clause 6.2.4(1)
Basic standard	:	ANSI C63.10: 2013
Limit	:	500kHz for 6dB bandwidth
Kind of test site	:	Shielded room

Test setup

Test Channel	:	All channel
Operation Mode	:	A.1, B.1
Ambient temperature	:	25℃
Relative humidity	:	56%
Atmospheric pressure	:	101kPa

Table 13: Test result of 6dB Bandwidth of Band U-NII-3

Mode	Channel Frequency (MHz)	6dB Bandwidth (MHz)	Limit (MHz)
802.11a	5745	16.411	≥0.5
	5785	16.455	≥0.5
	5825	16.455	≥0.5
802.11n HT20	5745	17.670	≥0.5
	5785	17.670	≥0.5
	5825	17.671	≥0.5
802.11n HT40	5755	36.295	≥0.5
	5795	36.469	≥0.5
802.11ac VHT20	5745	17.670	≥0.5
	5785	17.671	≥0.5
	5825	17.670	≥0.5
802.11ac VHT40	5755	36.556	≥0.5
	5795	36.469	≥0.5
802.11ac VHT80	5775	76.060	≥0.5

For details refer to the test plots in Appendix F.

5.1.6 Power spectral density

RESULT: **Pass**

Date of testing	:	2016-07-31 ~ 2016-09-02
Test standard	:	FCC Part 15.407(a)(1)(iv) FCC Part 15.407(a)(3) RSS-247 clause 6.2.1(1) RSS-247 clause 6.2.4(1)
Basic standard	:	ANSI C63.10: 2013
Limit	:	11dBm/MHz for FCC, 10dBm/MHz for IC (Band U-NII-1) 30dBm/500kHz (Band U-NII-3)
Kind of test site	:	Shield room

Test setup

Test Channel	:	All channel
Operation mode	:	A.1, B.1
Ambient temperature	:	23.6℃
Relative humidity	:	53.4%
Atmospheric pressure	:	102.8kPa

Table 14: Test result of power spectral density of Band U-NII-1

Mode	Channel Frequency (MHz)	Result (dBm/MHz)		Limit (dBm/MHz)
		Conducted power spectral density	e.i.r.p. spectral density	
802.11a	5180	3.57	8.07	10
	5200	3.93	8.43	10
	5240	4.07	8.57	10
802.11n HT20	5180	3.34	7.84	10
	5200	3.88	8.38	10
	5240	3.60	8.10	10
802.11n HT40	5190	-1.85	2.65	10
	5230	-1.88	2.62	10
802.11ac VHT20	5180	0.67	5.17	10
	5200	1.29	5.79	10
	5240	1.41	5.91	10
802.11ac VHT40	5190	-1.61	2.89	10
	5230	-1.76	2.74	10
802.11ac VHT80	5210	-6.30	-1.80	10

Note: Antenna Gain = 4.5dBi

Table 15: Test result of power spectral density of Band U-NII-3

Mode	Channel Frequency (MHz)	Result (dBm/500kHz)	Limit (dBm/500kHz)
802.11a	5745	2.26	30
	5785	3.26	30
	5825	3.54	30
802.11n HT20	5745	0.90	30
	5785	1.74	30
	5825	2.76	30
802.11n HT40	5755	-1.92	30
	5795	-1.06	30
802.11ac VHT20	5745	-0.13	30
	5785	0.08	30
	5825	1.71	30
802.11ac VHT40	5755	-3.98	30
	5795	-3.58	30
802.11ac VHT80	5775	-5.14	30

For details refer to the test plots in Appendix F.

5.1.7 Spurious Emission

RESULT: **Pass**

Date of testing	:	2016-07-29 ~ 2016-09-09
Test standard	:	FCC part 15.407(b) RSS-247 clause 6.2.1(2) RSS-247 clause 6.2.4(2)
Basic standard	:	ANSI C63.10: 2013
Limits	:	FCC part 15.209(a)
Kind of test site	:	3m Semi-Anechoic Chamber & Anechoic Chamber

Test setup

Test Channel	:	All channel
Operation mode	:	A.1, B.1
Ambient temperature	:	23.0℃
Relative humidity	:	48.0%
Atmospheric pressure	:	101.6kPa

The frequency range of testing is 9KHz to 40GHz, and no any emissions were found from 9KHz to 30MHz and 18GHz to 40GHz, hence the radiated emission from 9KHz to 30MHz and 18GHz to 40GHz were not reported. All the out of band e.i.r.p. emission for 5150-5350MHz and 5725-5850MHz are below the limit.

For details refer to the test plots in Appendix G.

5.1.8 Conducted emissions

RESULT: **Pass**

Date of testing	:	2016-08-28
Test standard	:	FCC Part 15.207 FCC part 15.407(b)(6) RSS-Gen Clause 8.8
Basic standard	:	ANSI C63.10: 2013
Frequency range	:	0.15 – 30MHz
Limits	:	FCC Part 15.207
Kind of test site	:	Shield room

Test setup

Input Voltage	:	AC 120V, 60Hz
Operation Mode	:	A.1, B.1
Earthing	:	Not Connected
Ambient temperature	:	23.0℃
Relative humidity	:	48.0%
Atmospheric pressure	:	101.6kPa

For details refer to the test plots in Appendix G.

6. Photographs of the Test Set-Up

Photograph 1: Set-up for Spurious Emissions for 9KHz - 30MHz

Please refer to TÜV Rheinland report 50055846 002 for more details.

Photograph 2: Set-up for Spurious Emissions for 30 - 1000MHz

Please refer to TÜV Rheinland report 50055846 002 for more details.

Photograph 3: Set-up for Spurious Emissions for 1 - 18GHz

Please refer to TÜV Rheinland report 50055846 002 for more details.

Photograph 4: Set-up for Spurious Emissions above 18GHz

Please refer to TÜV Rheinland report 50055846 002 for more details.

Photograph 5: Set-up for Conducted Emission on AC Mains

Please refer to TÜV Rheinland report 50055846 002 for more details.

7. List of Tables

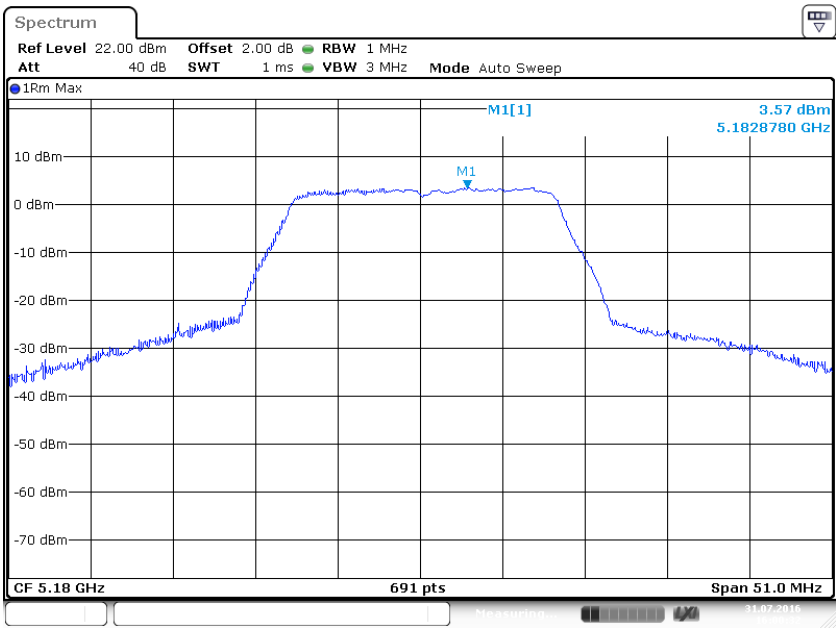
8. List of Photographs

Appendix F

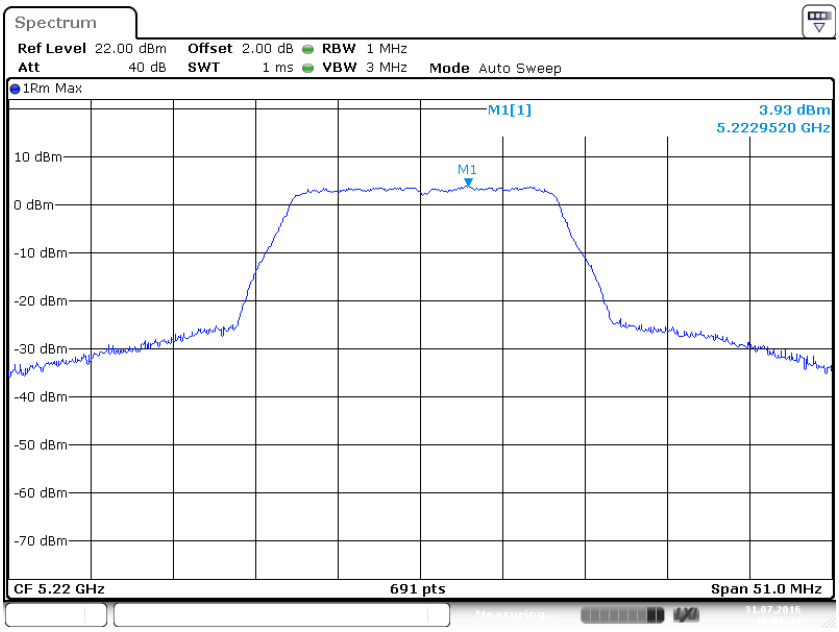
Test Results of Wi-Fi 802.11a/n/ac of Conducted Testing

Appendix F.1: Conducted Power Spectral Density

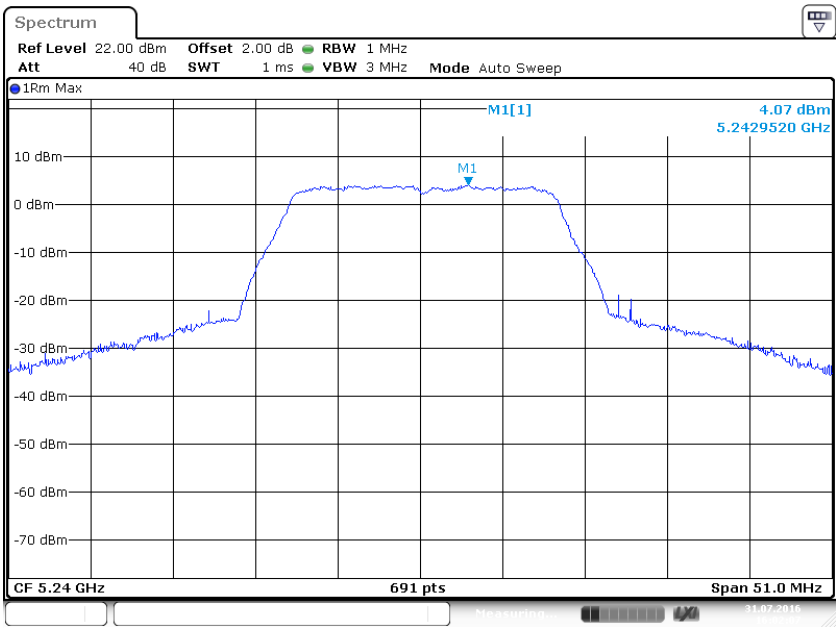
Wi-Fi 802.11 a mode



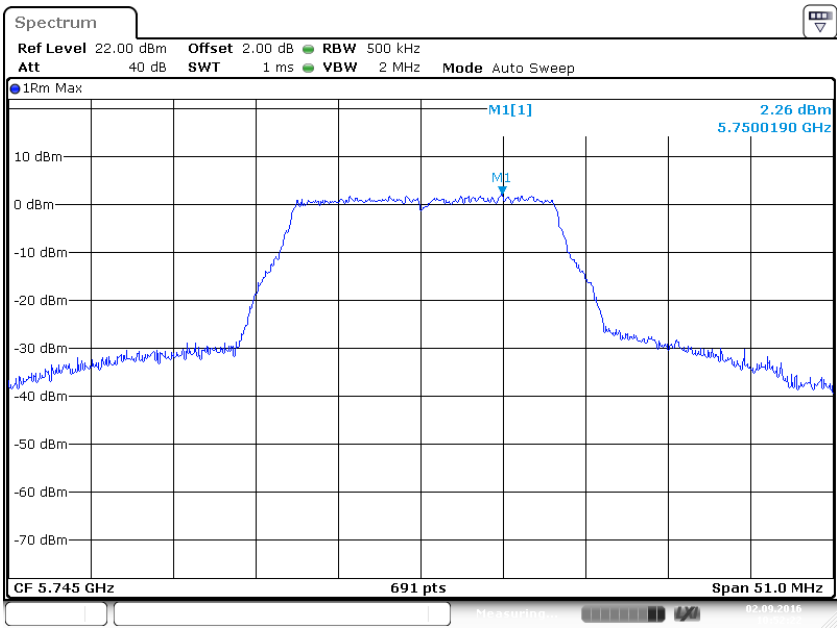
Date: 31.JUL.2016 16:00:33



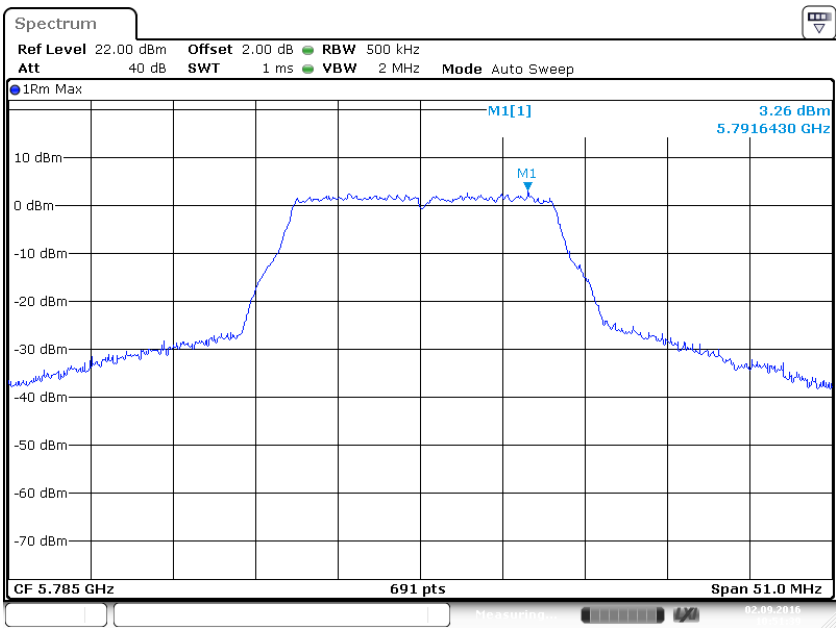
Date: 31.JUL.2016 16:01:24



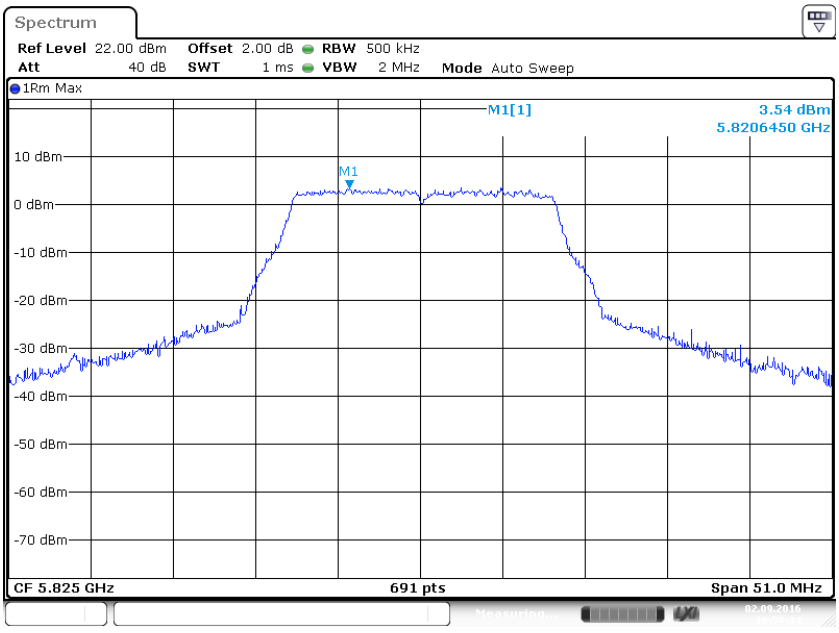
Date: 31.JUL.2016 16:02:07



Date: 2.SEP.2016 10:52:22

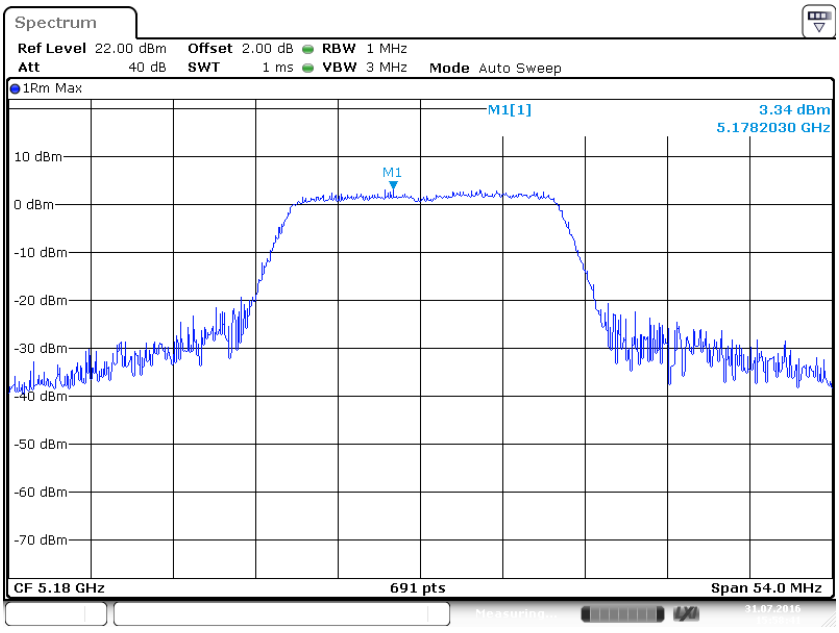


Date: 2.SEP.2016 10:51:39

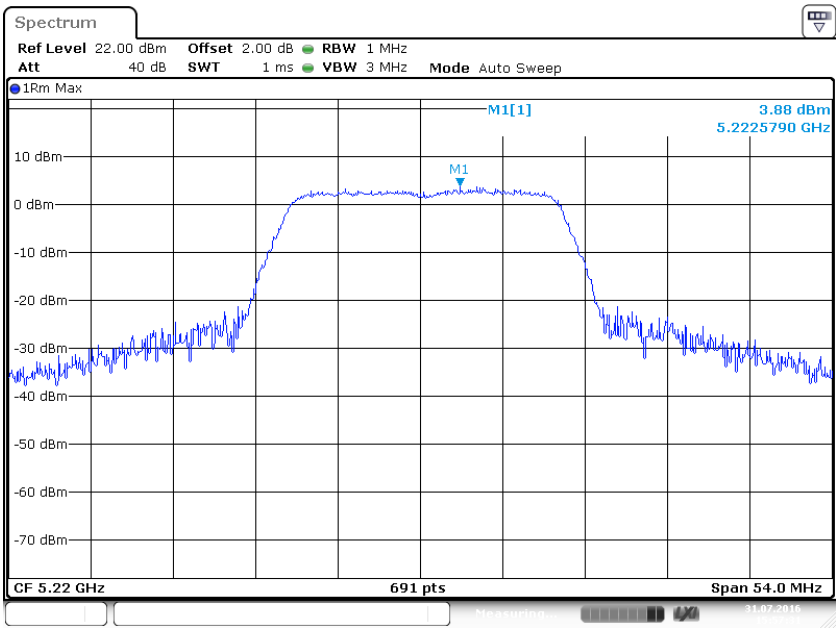


Date: 2.SEP.2016 10:50:34

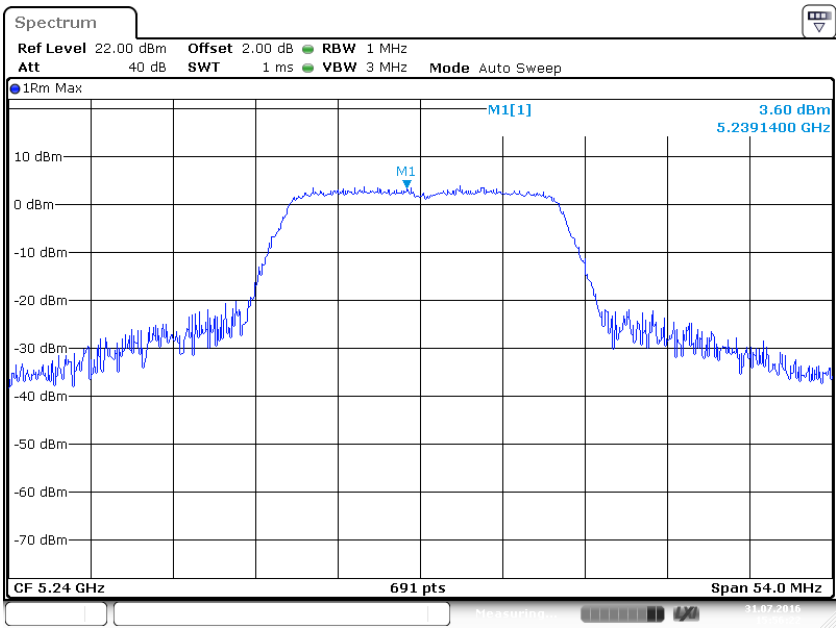
Wi-Fi 802.11 n (HT20)



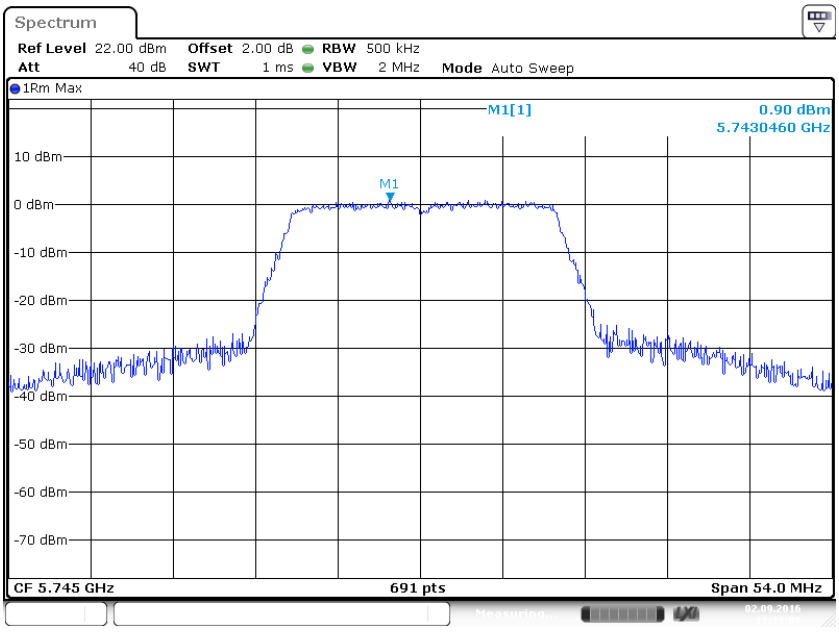
Date: 31.JUL.2016 15:58:41



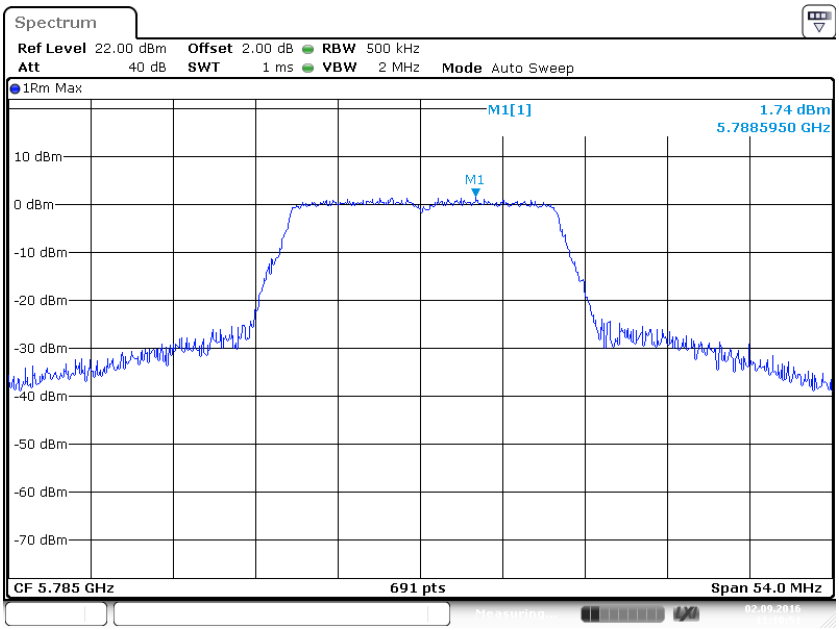
Date: 31.JUL.2016 15:57:31



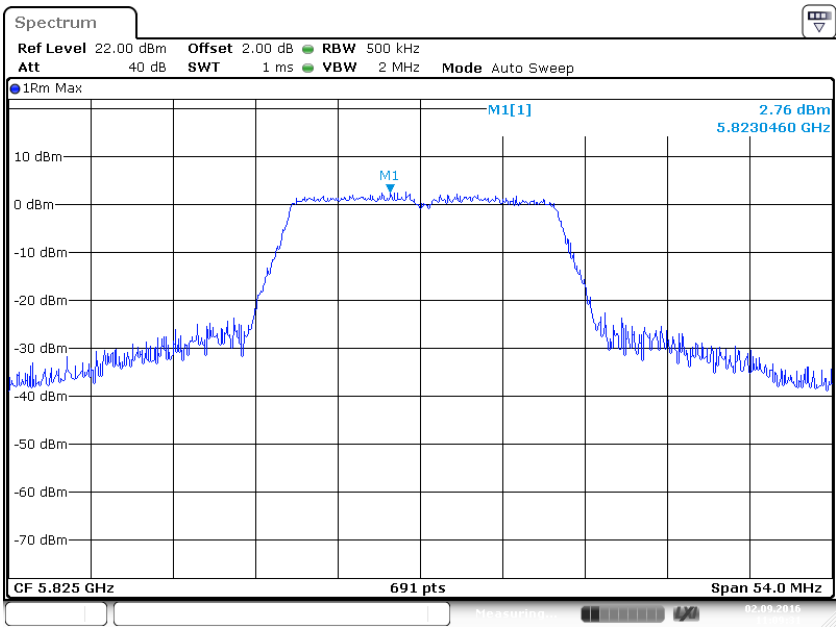
Date: 31.JUL.2016 15:56:22



Date: 2.SEP.2016 11:12:00

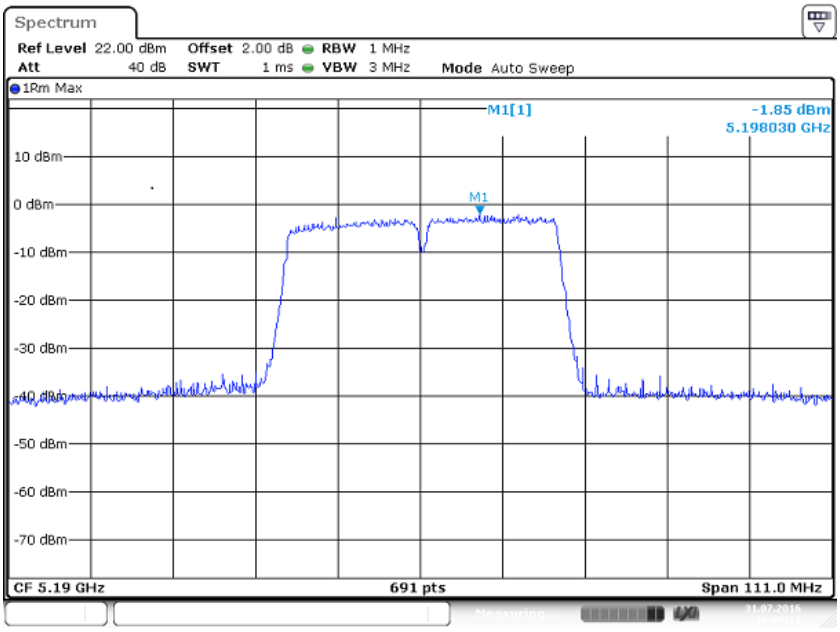


Date: 2.SEP.2016 11:10:51

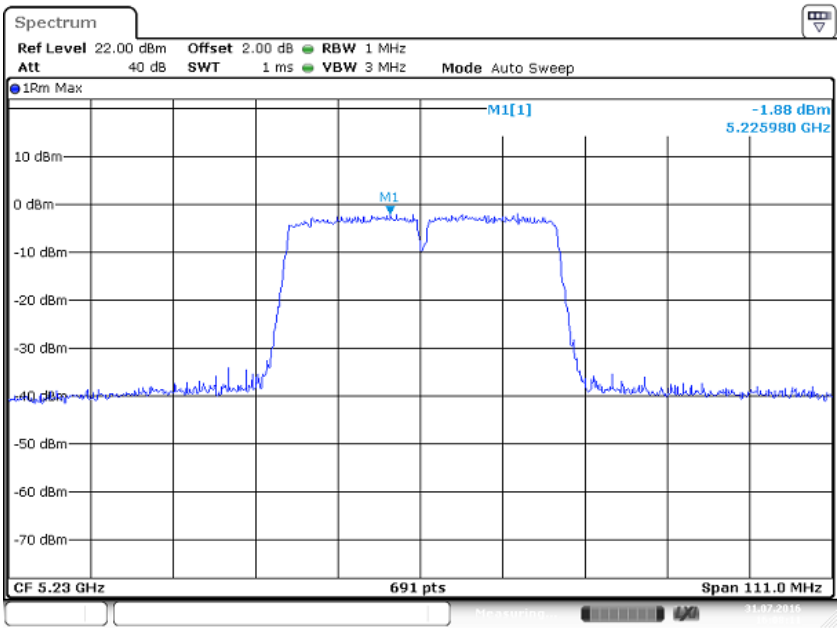


Date: 2.SEP.2016 11:09:30

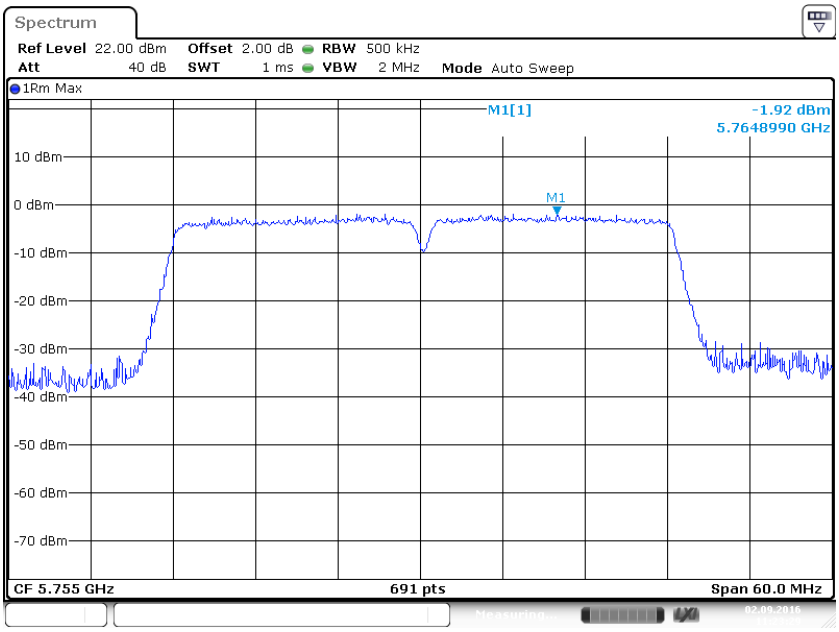
Wi-Fi 802.11 n(HT40)



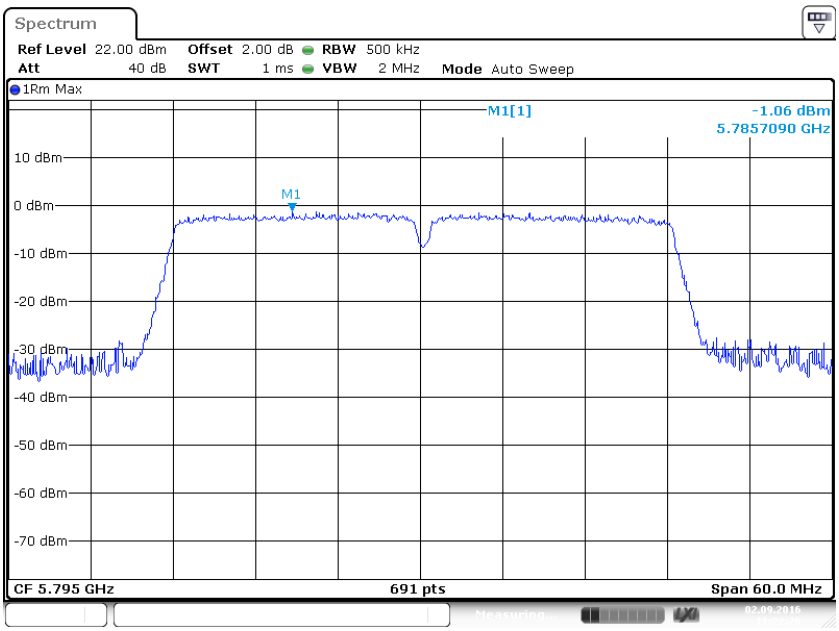
Date: 31.JUL.2016 16:09:11



Date: 31.JUL.2016 16:08:11

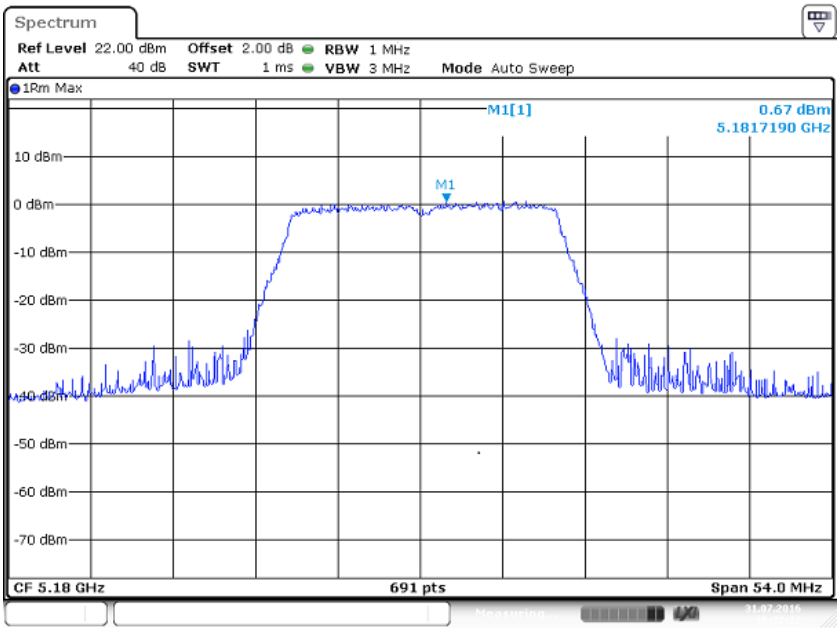


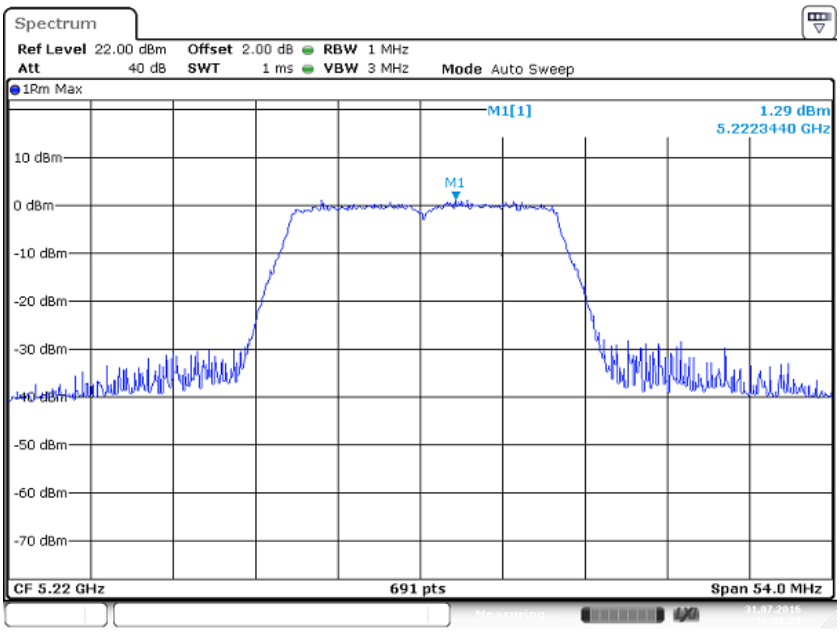
Date: 2.SEP.2016 11:23:29

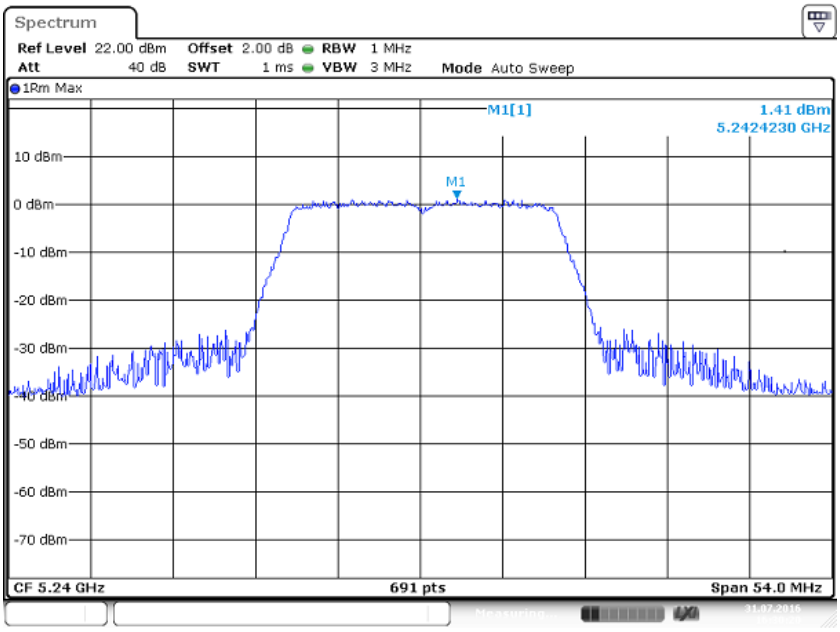


Date: 2.SEP.2016 11:22:26

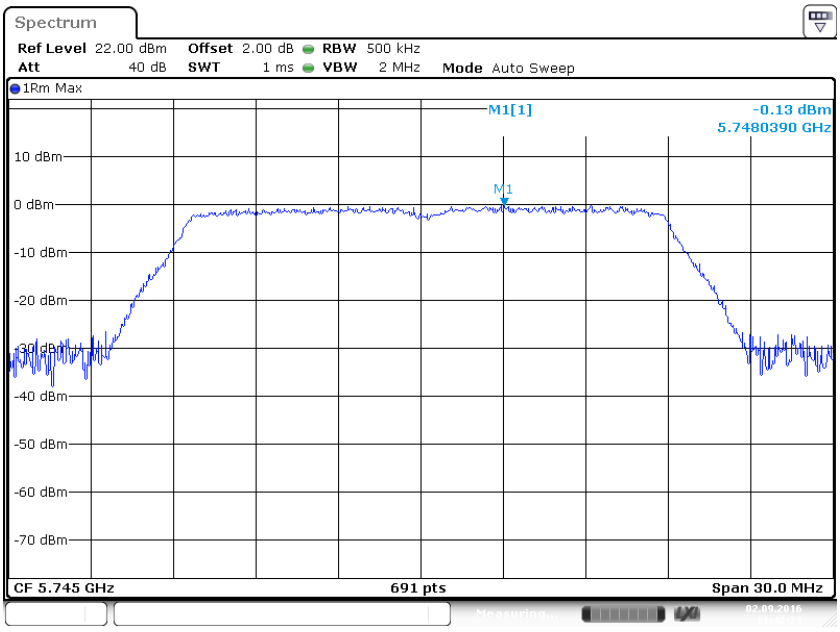
Wi-Fi 802.11 ac (HT20)



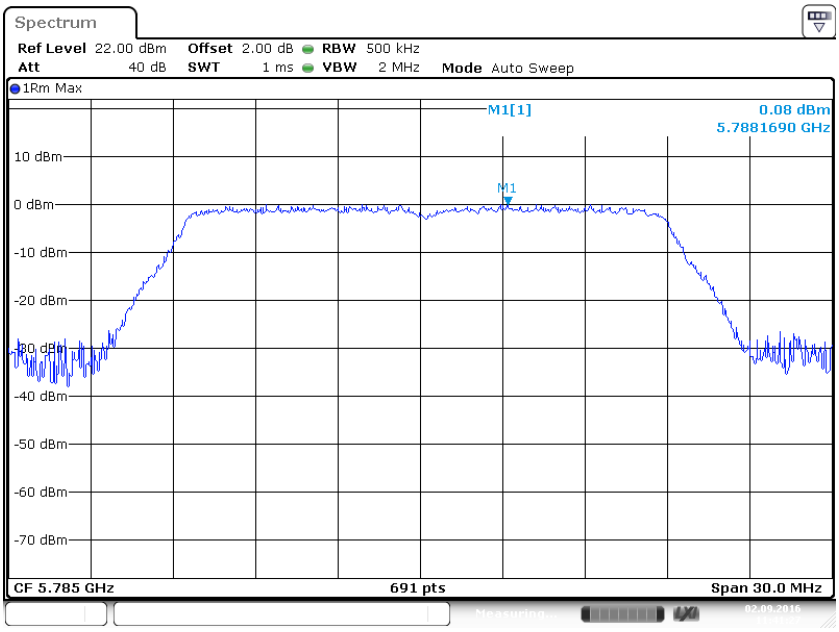




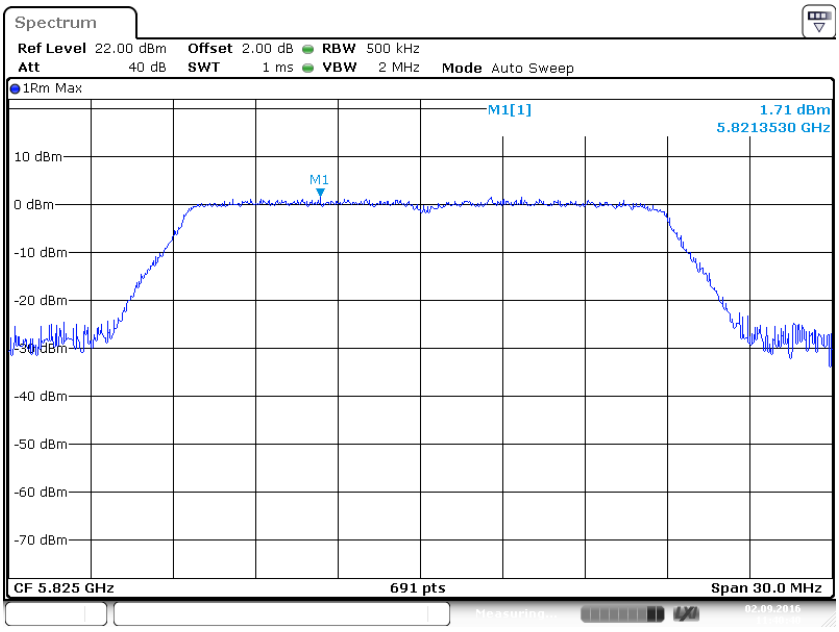
Date: 31.JUL.2016 16:30:20



Date: 2.SEP.2016 11:42:23

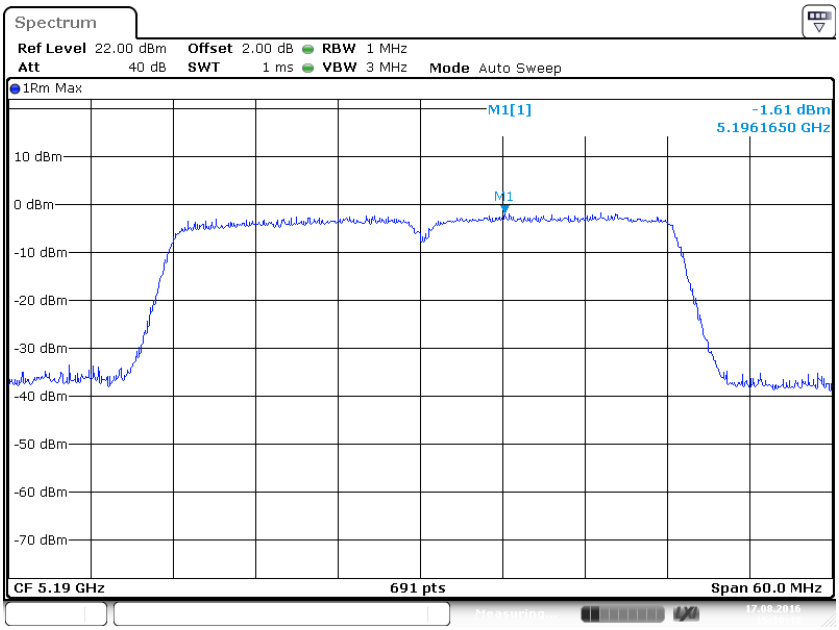


Date: 2.SEP.2016 11:41:27

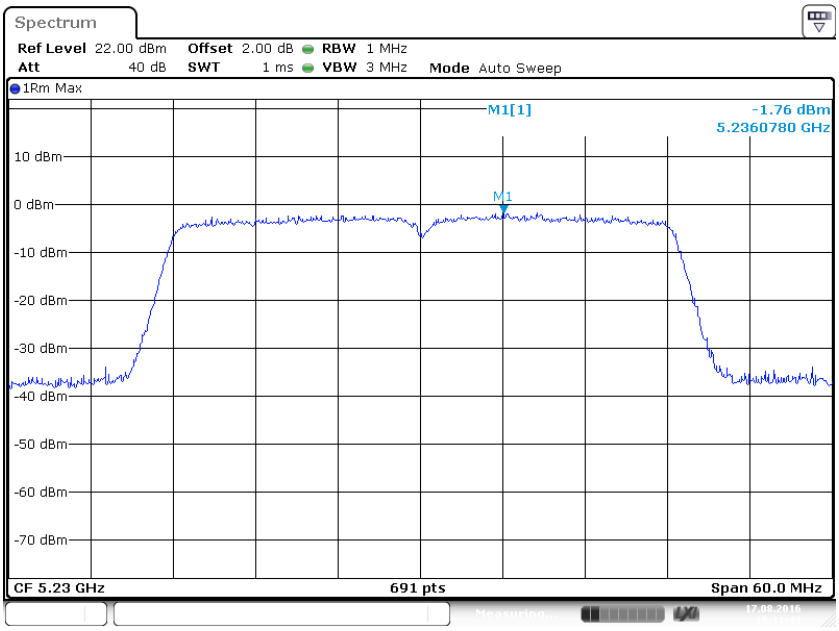


Date: 2.SEP.2016 11:40:40

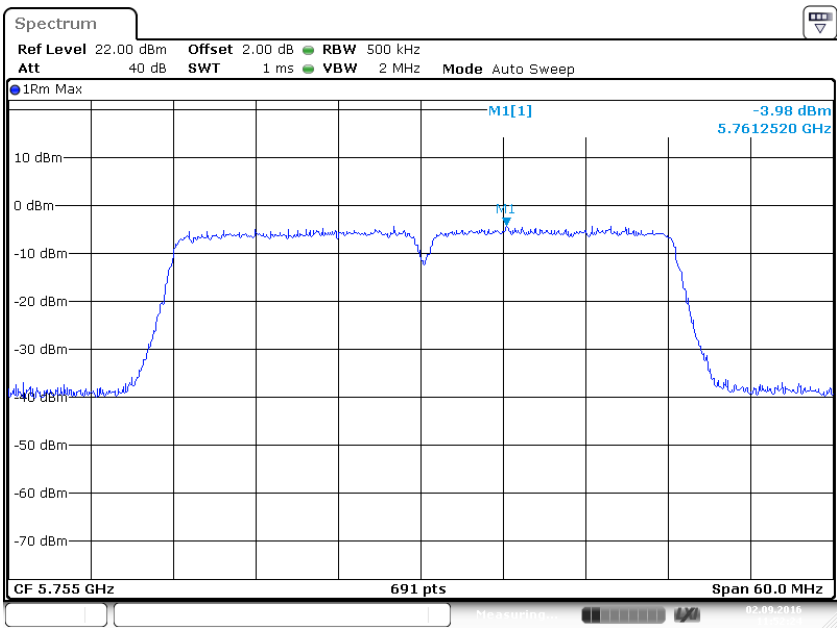
Wi-Fi 802.11 ac (HT40)



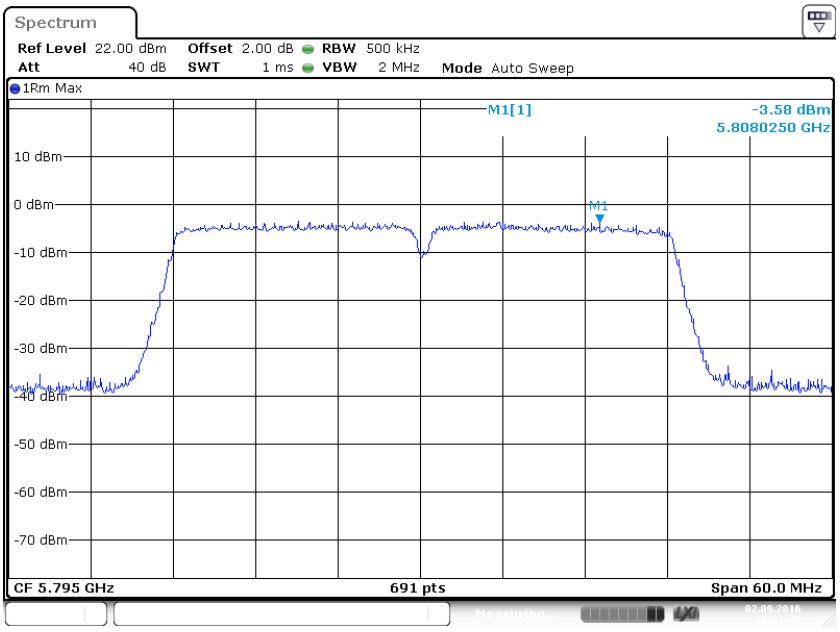
Date: 17.AUG.2016 15:30:49



Date: 17.AUG.2016 15:31:43

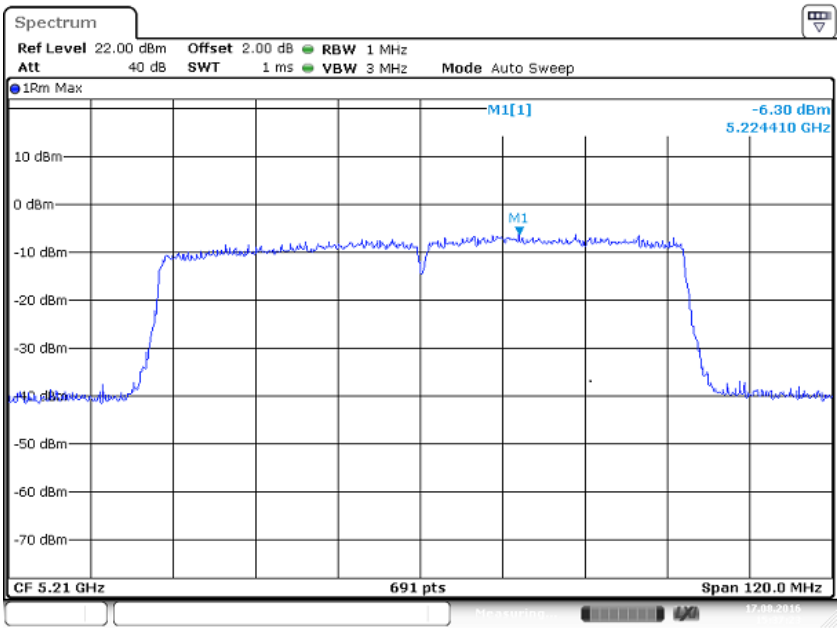


Date: 2.SEP.2016 11:52:24

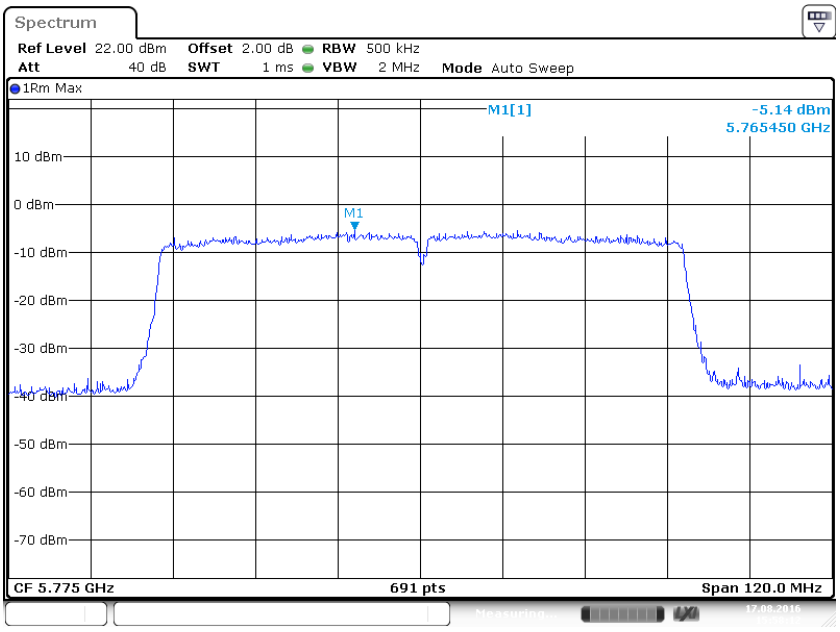


Date: 2.SEP.2016 11:51:48

Wi-Fi 802.11 ac (HT80)



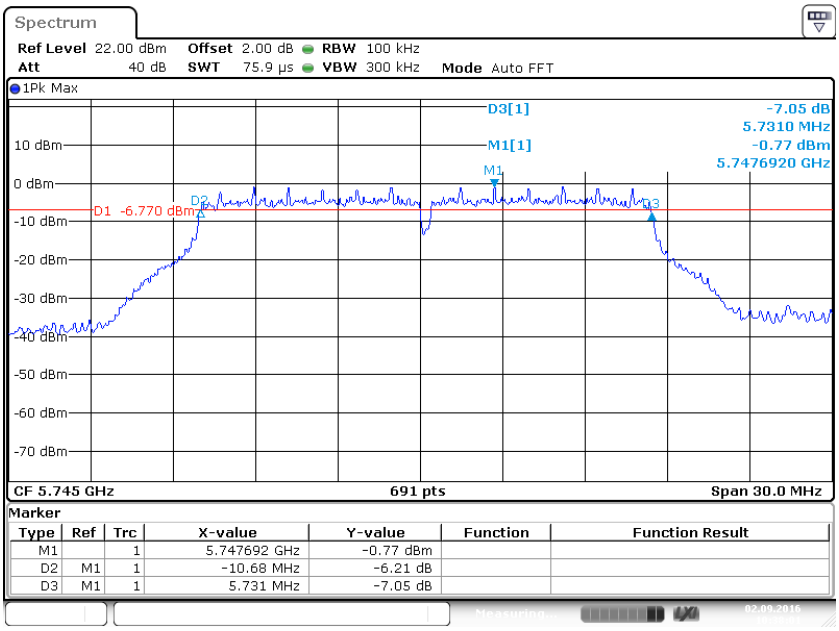
Date: 17.AUG.2016 15:37:23



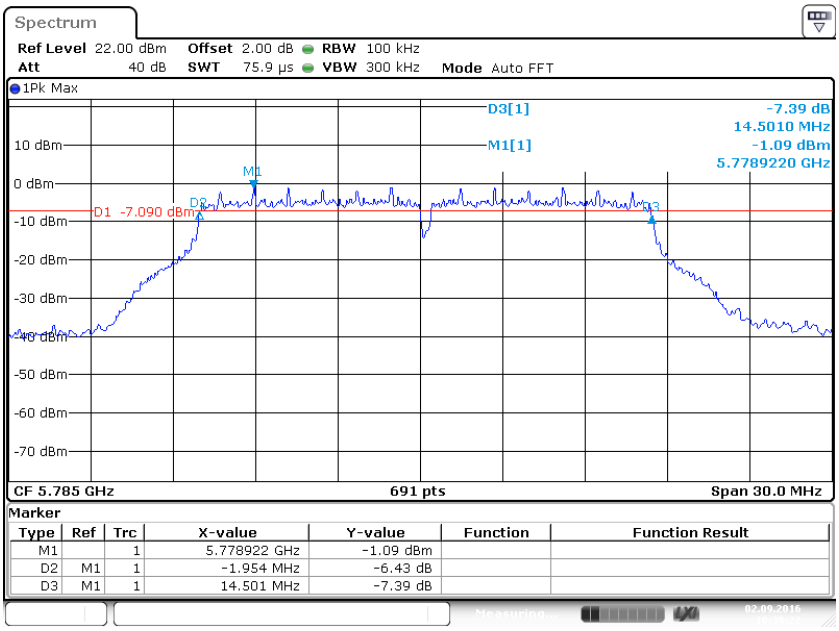
Date: 17.AUG.2016 15:58:12

Appendix F.2: 6dB Bandwidth

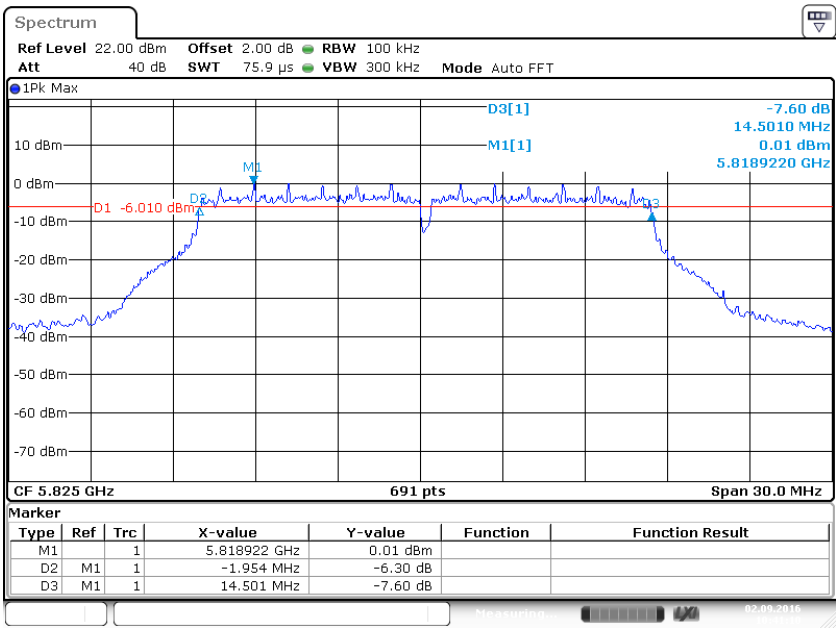
Wi-Fi 802.11 a mode



Date: 2.SEP.2016 10:38:01

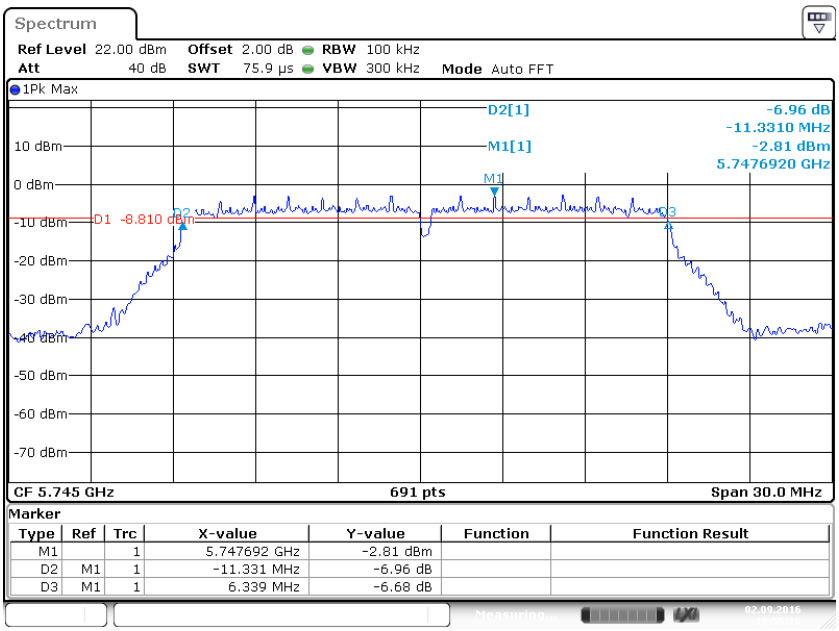


Date: 2.SEP.2016 10:39:22

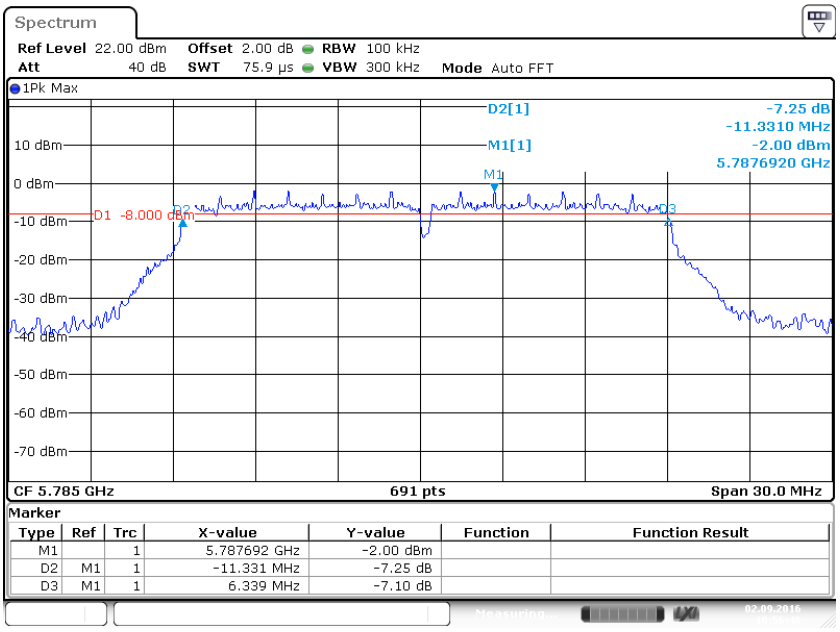


Date: 2.SEP.2016 10:41:10

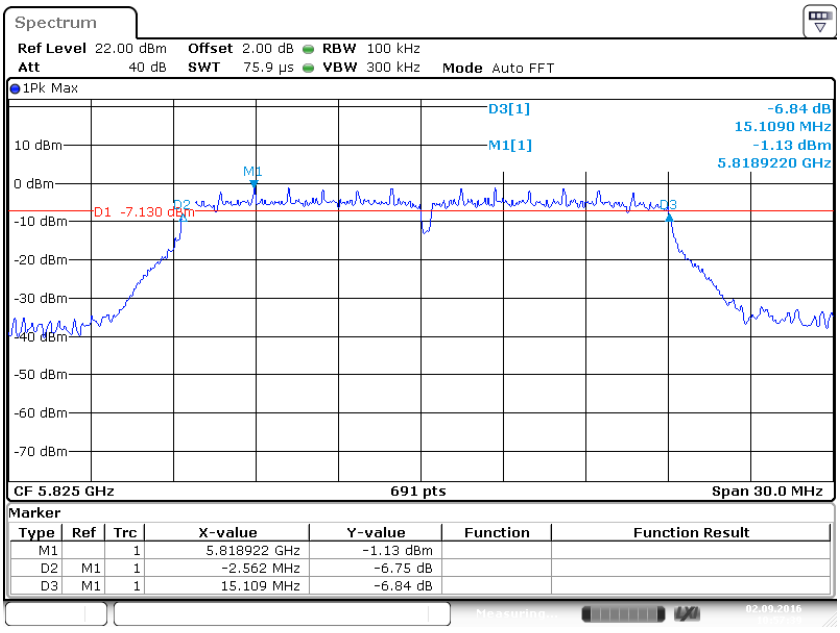
Wi-Fi 802.11 n (HT20) mode



Date: 2.SEP.2016 10:55:26

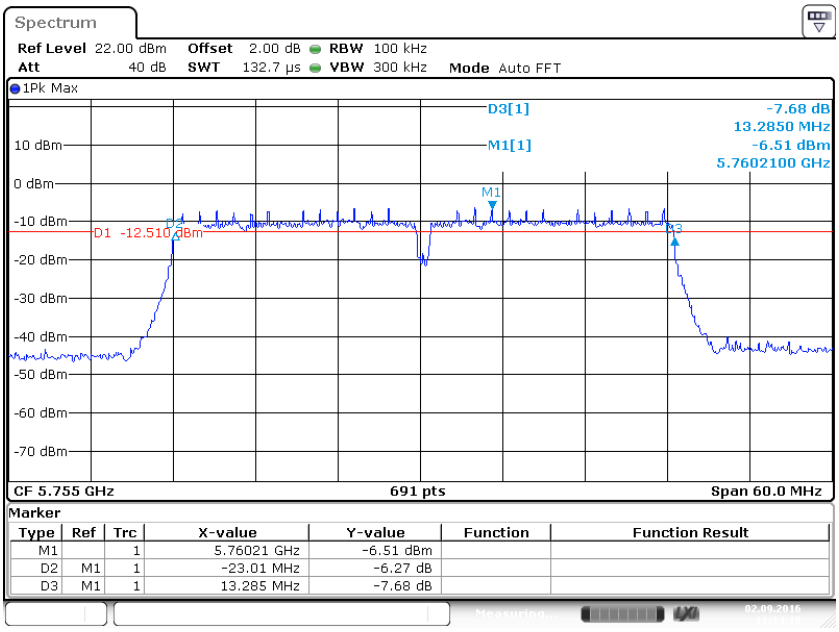


Date: 2.SEP.2016 10:56:46

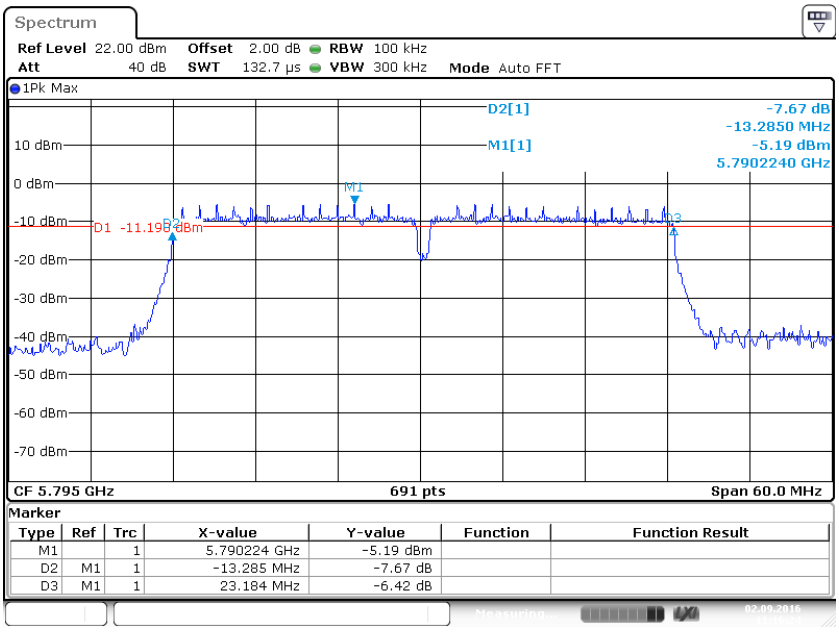


Date: 2.SEP.2016 10:57:39

Wi-Fi 802.11 n(HT40) mode

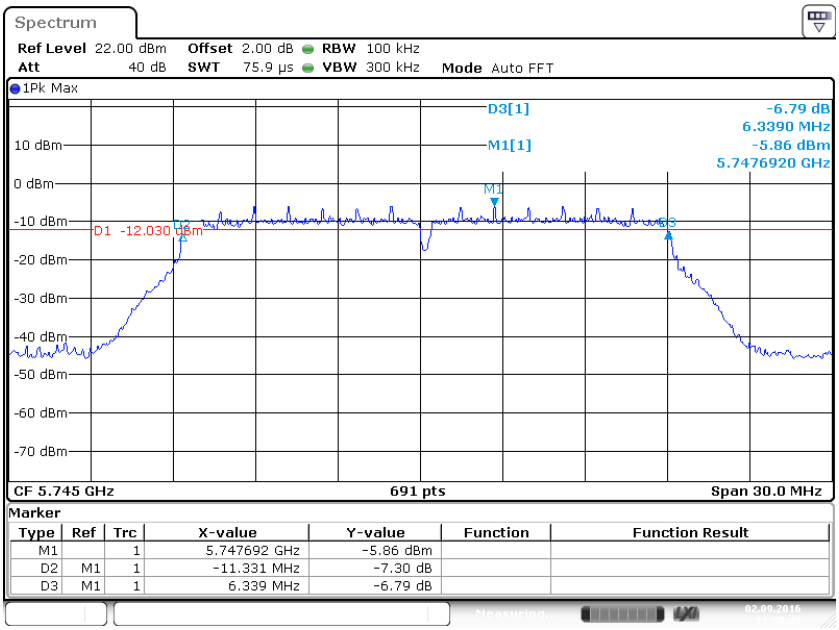


Date: 2.SEP.2016 11:14:19

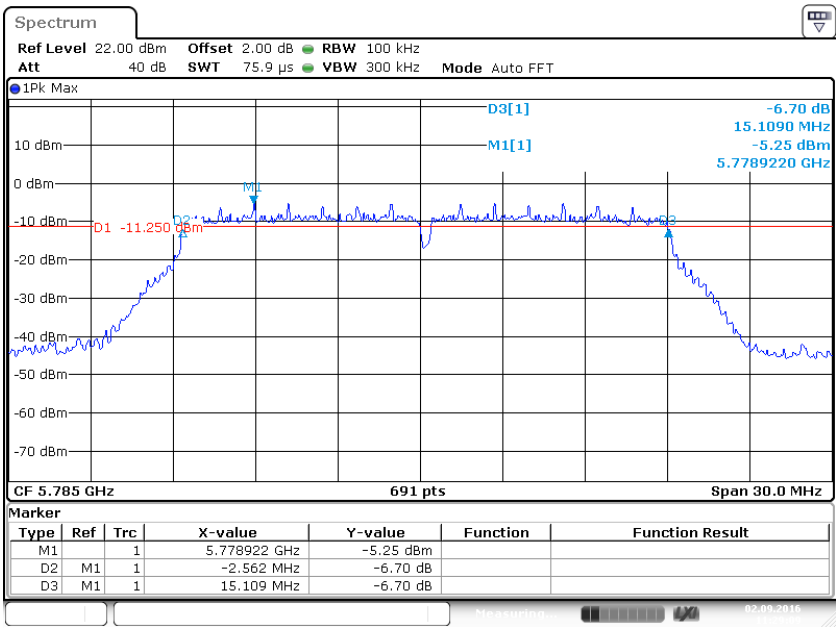


Date: 2.SEP.2016 11:16:24

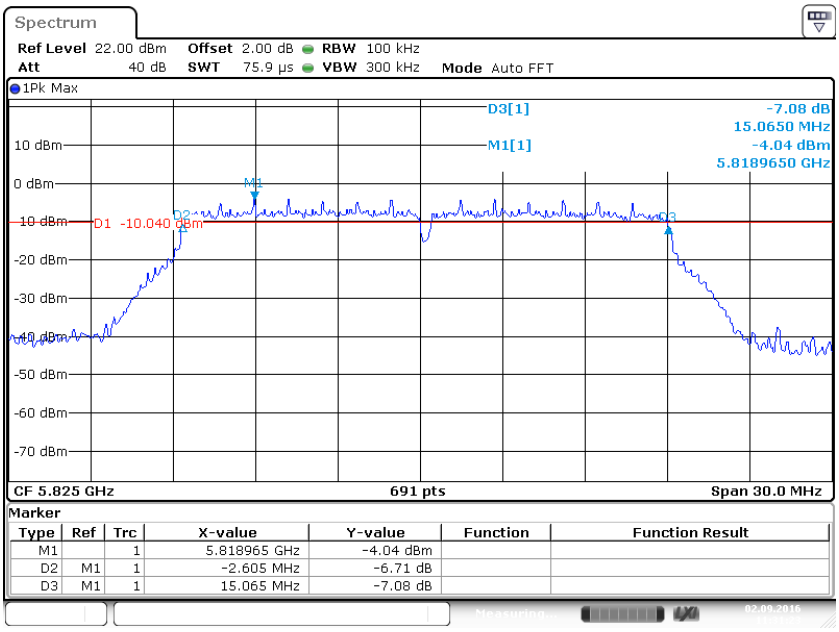
Wi-Fi 802.11 ac(HT20) mode



Date: 2.SEP.2016 11:30:00

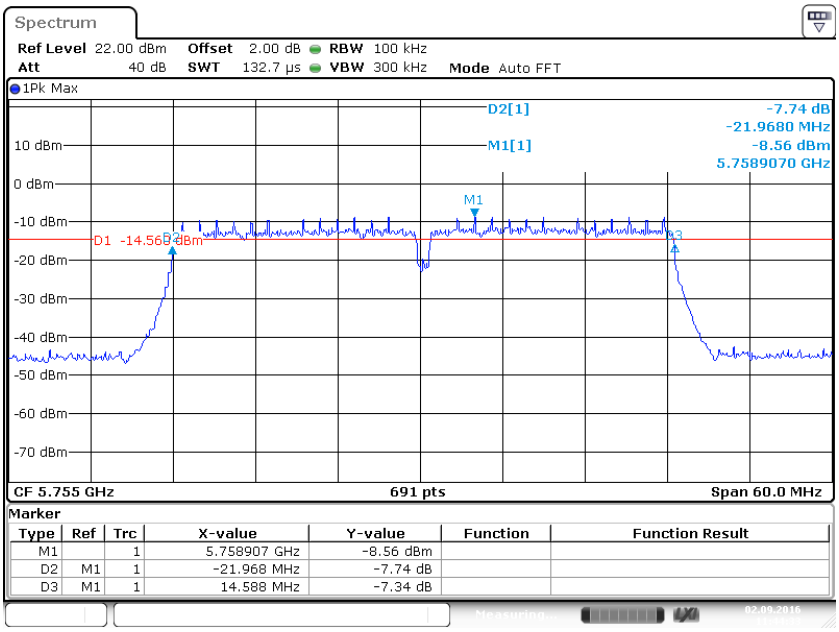


Date: 2.SEP.2016 11:29:09

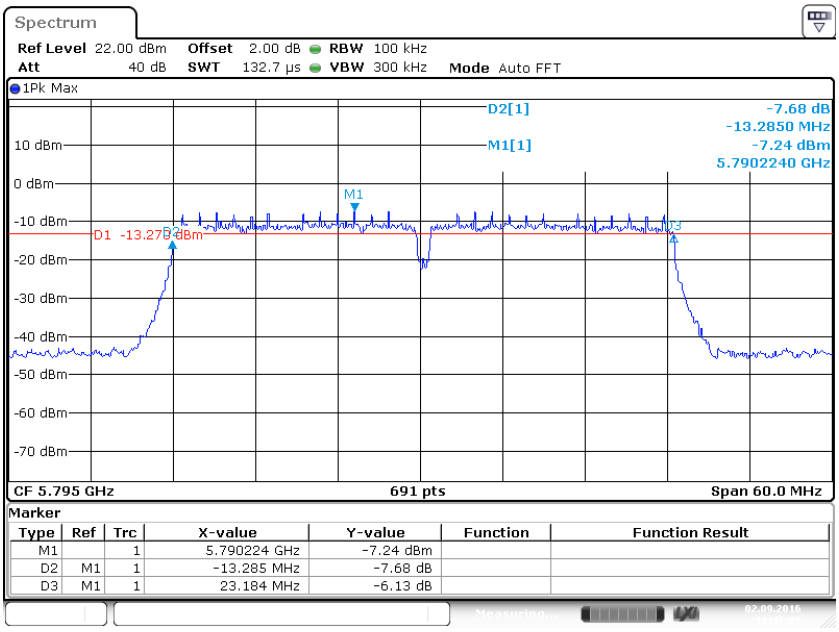


Date: 2.SEP.2016 11:31:22

Wi-Fi 802.11 ac(HT40) mode

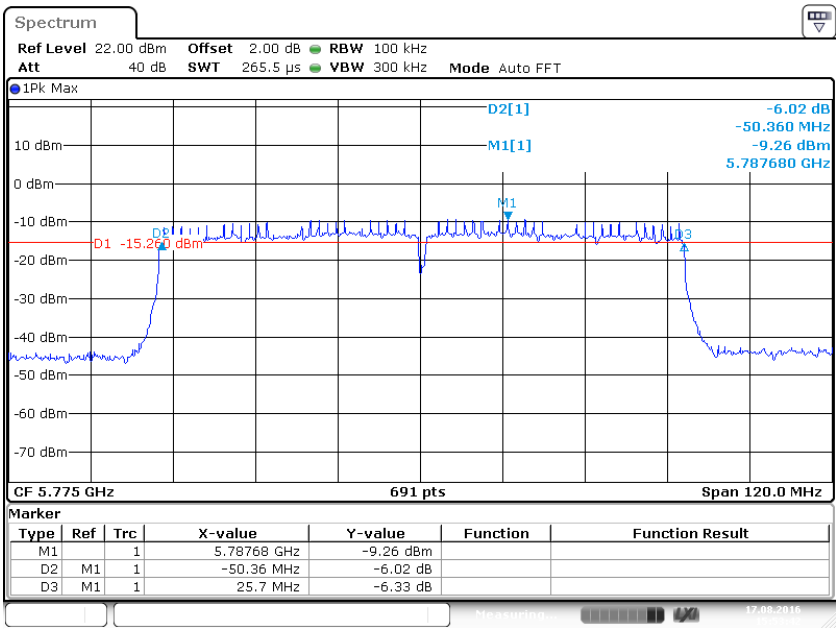


Date: 2.SEP.2016 11:44:33



Date: 2.SEP.2016 11:46:00

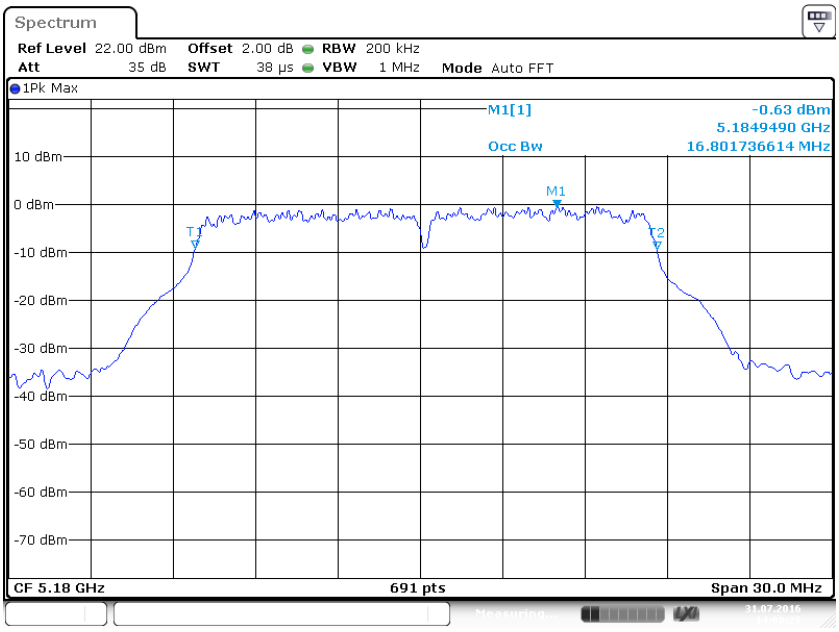
Wi-Fi 802.11 ac(HT80) mode



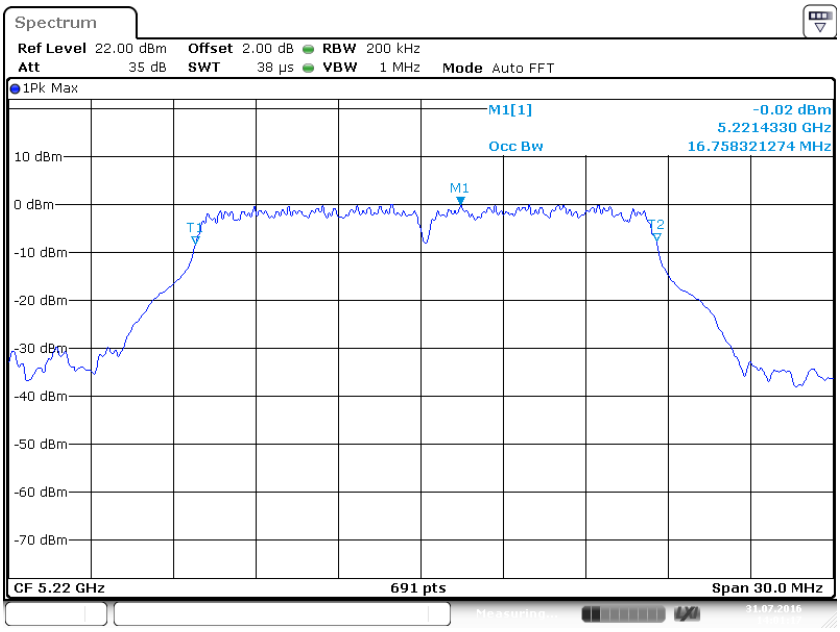
Date: 17.AUG.2016 15:53:43

Appendix F.3: 99% Bandwidth

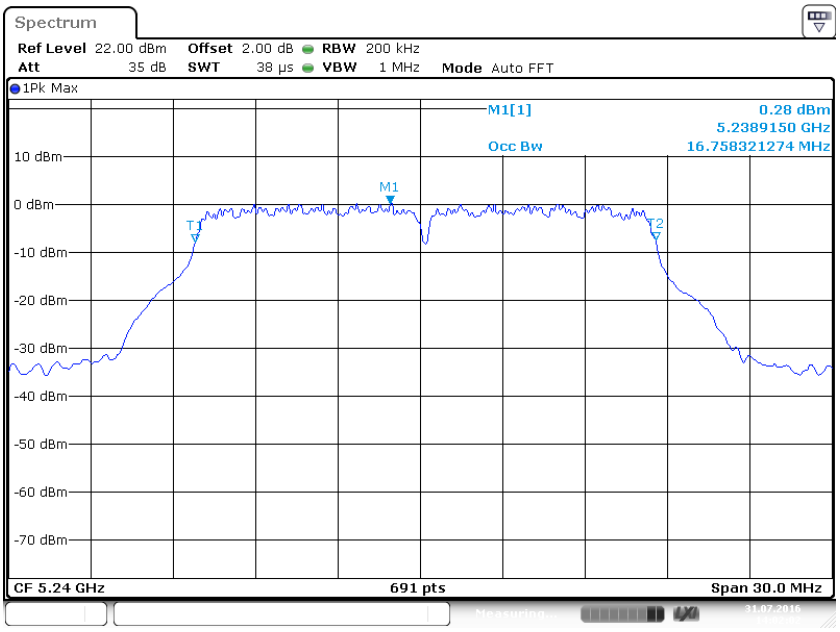
Wi-Fi 802.11 a mode



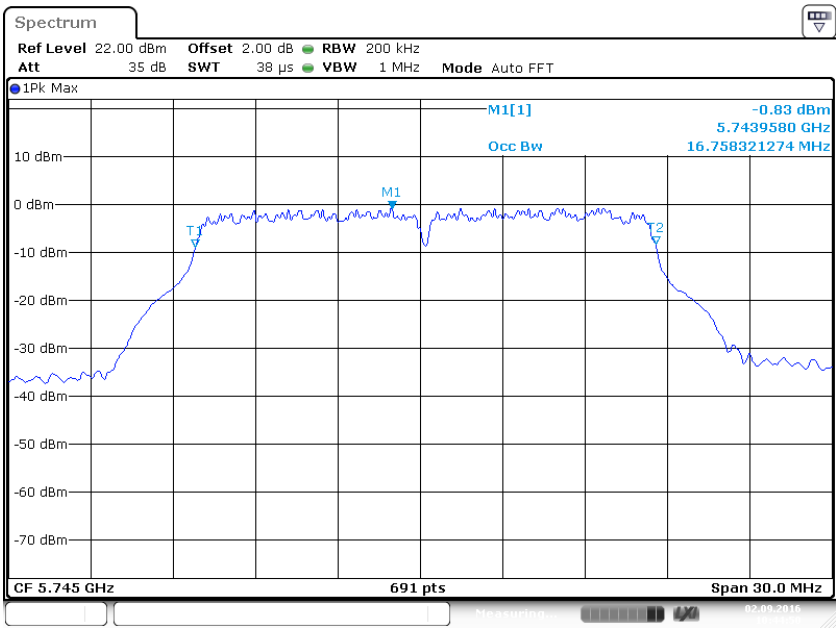
Date: 31.JUL.2016 14:00:29



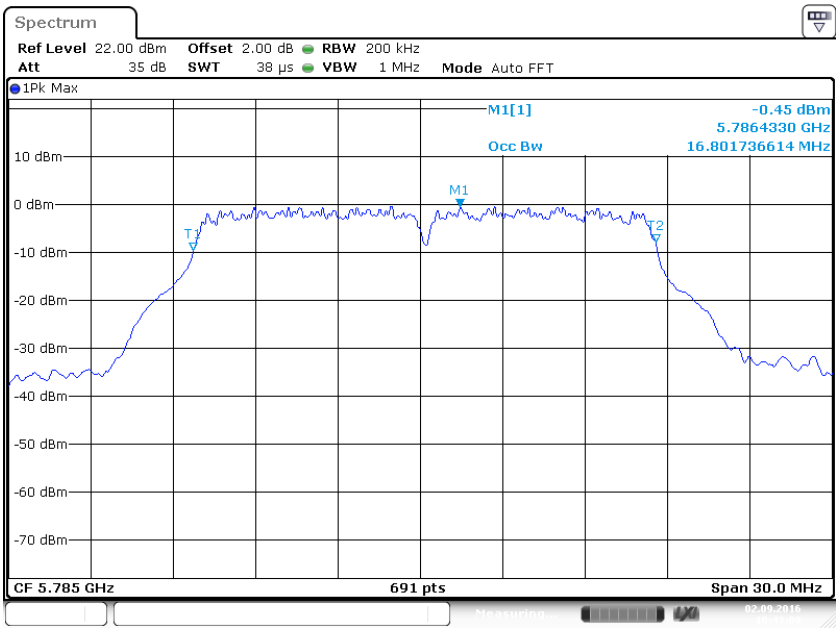
Date: 31.JUL.2016 14:01:17



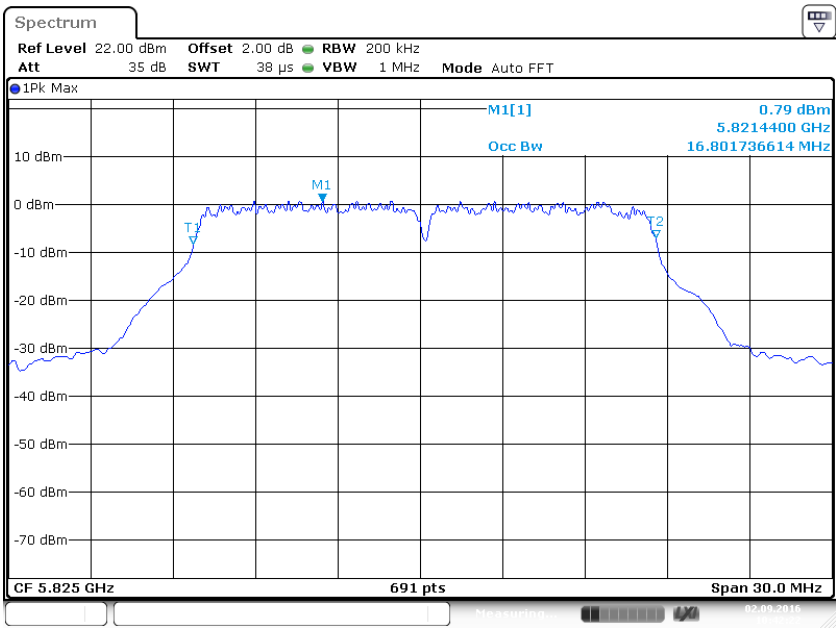
Date: 31.JUL.2016 14:02:03



Date: 2.SEP.2016 10:44:50

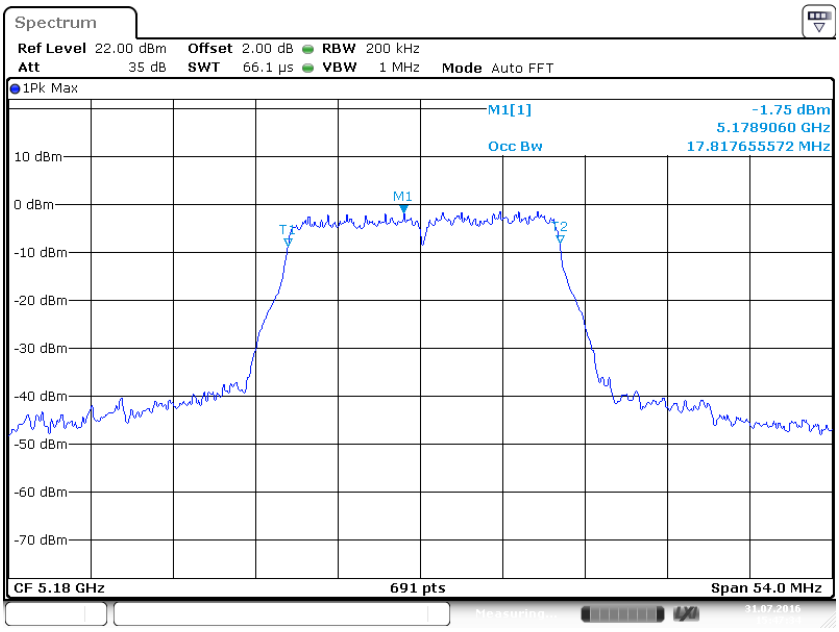


Date: 2.SEP.2016 10:43:09

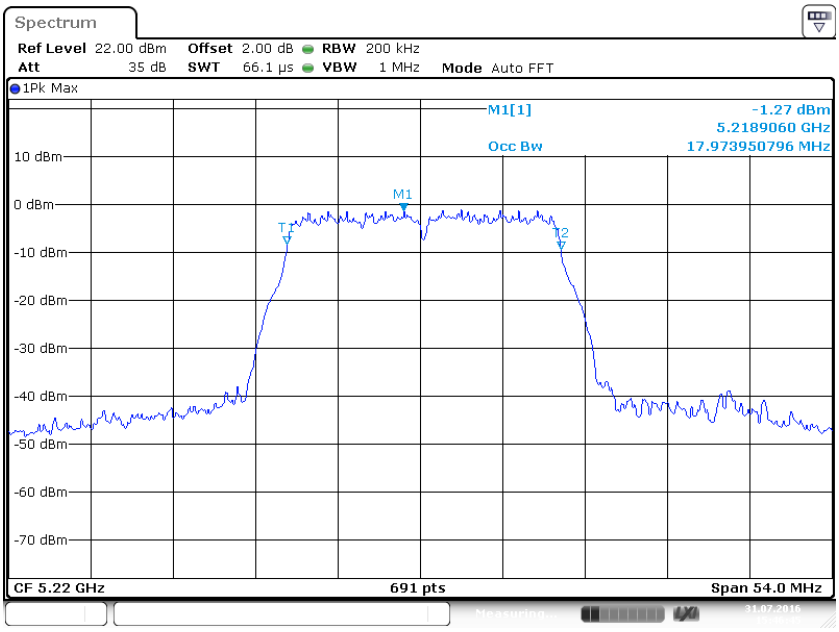


Date: 2.SEP.2016 10:42:22

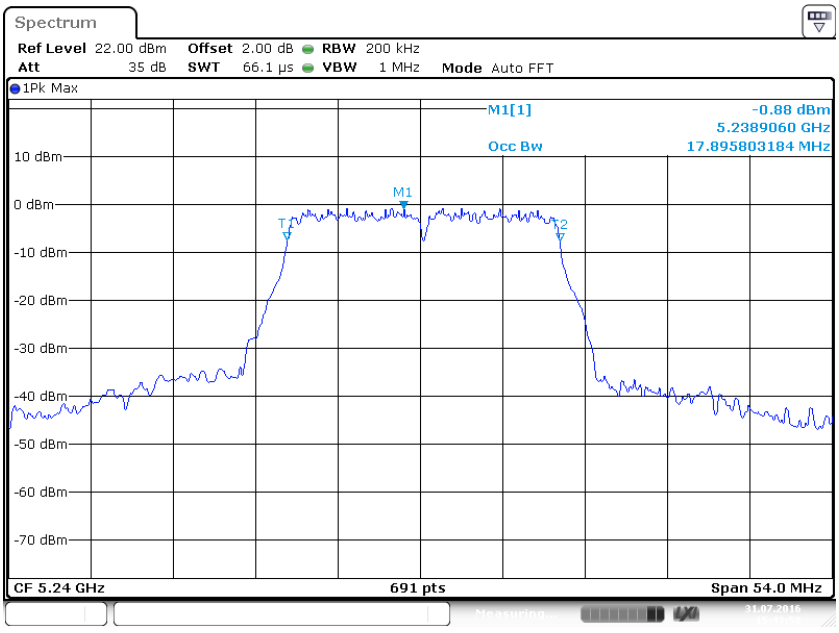
Wi-Fi 802.11 n (HT20) mode



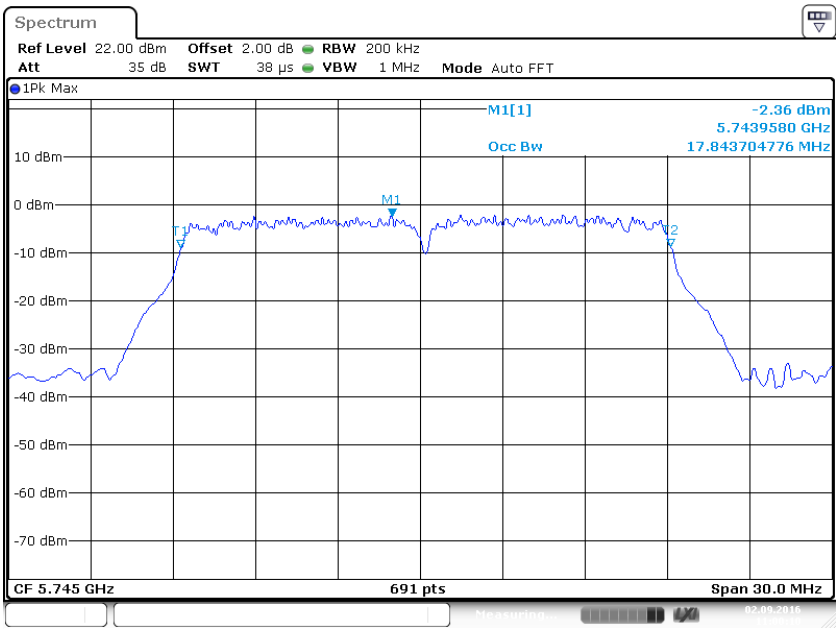
Date: 31.JUL.2016 15:47:35



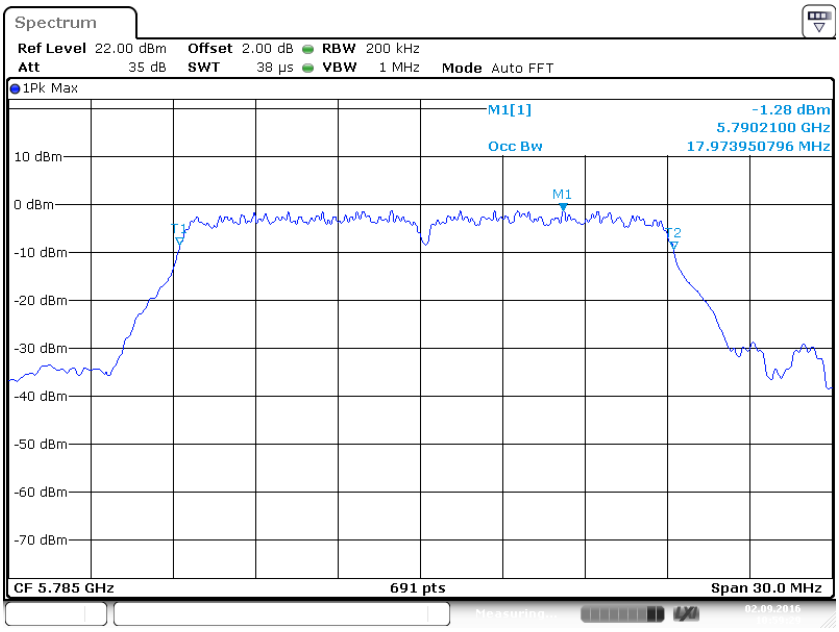
Date: 31.JUL.2016 15:46:45



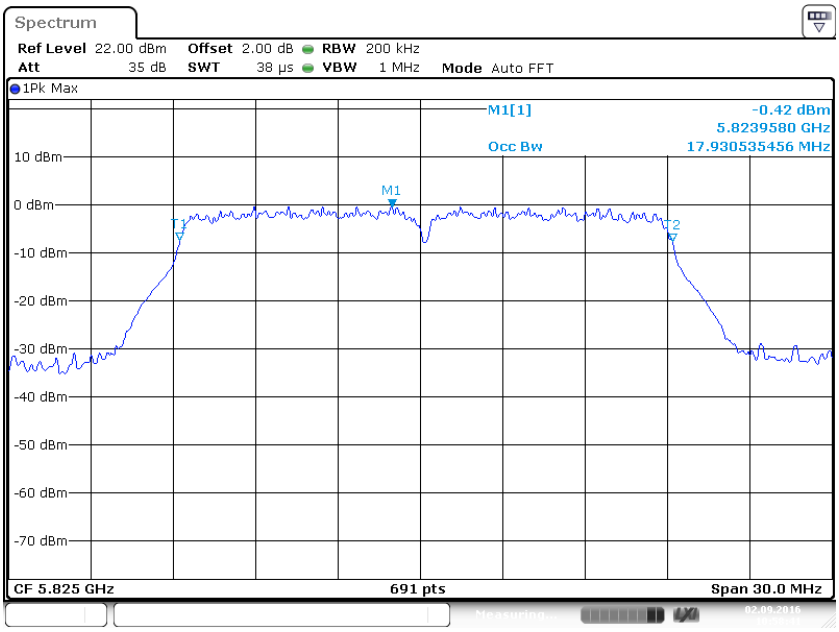
Date: 31.JUL.2016 15:43:58



Date: 2.SEP.2016 11:00:09

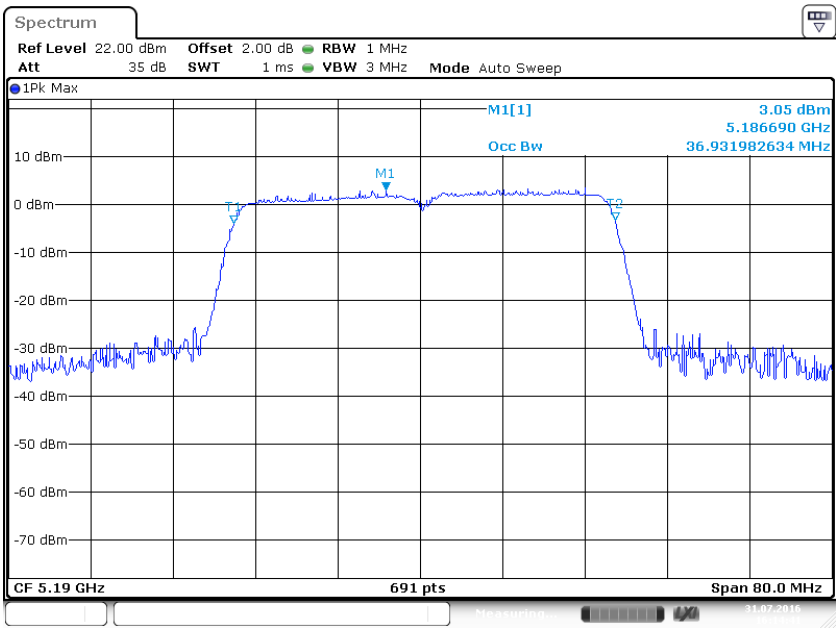


Date: 2.SEP.2016 10:59:29

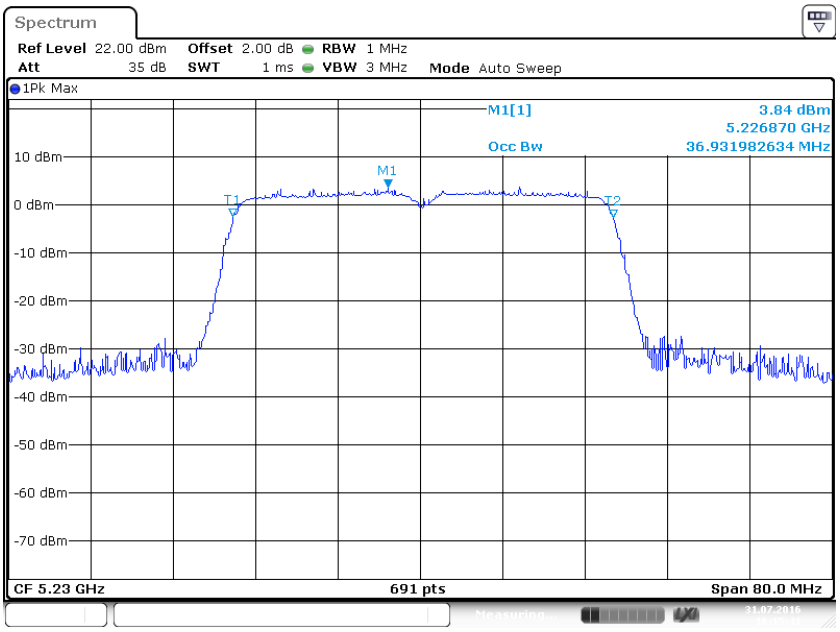


Date: 2.SEP.2016 10:58:41

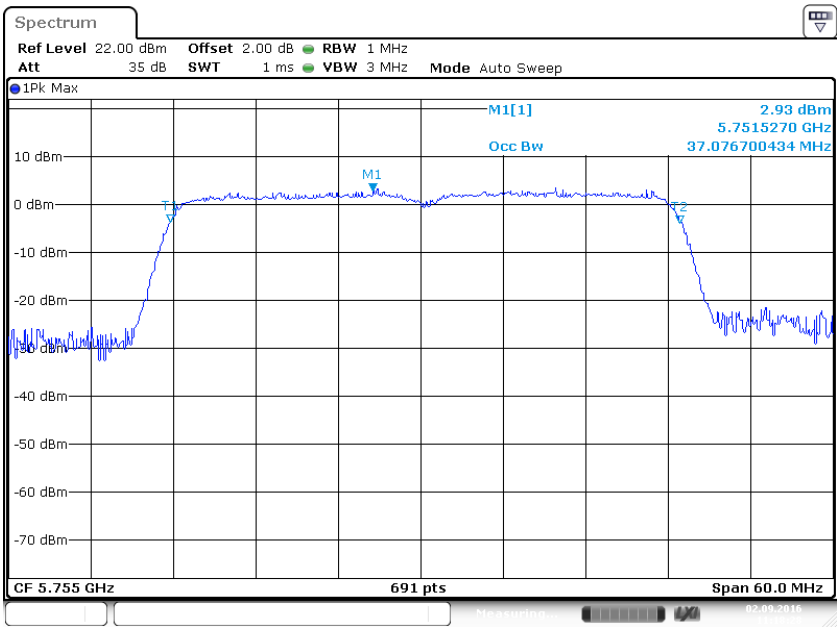
Wi-Fi 802.11 n (HT40) mode



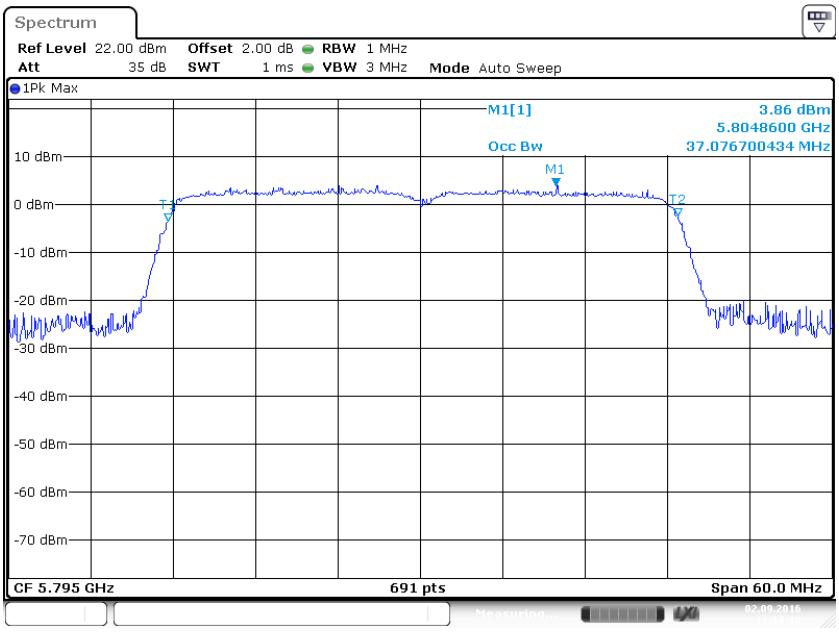
Date: 31.JUL.2016 16:14:41



Date: 31.JUL.2016 16:15:41

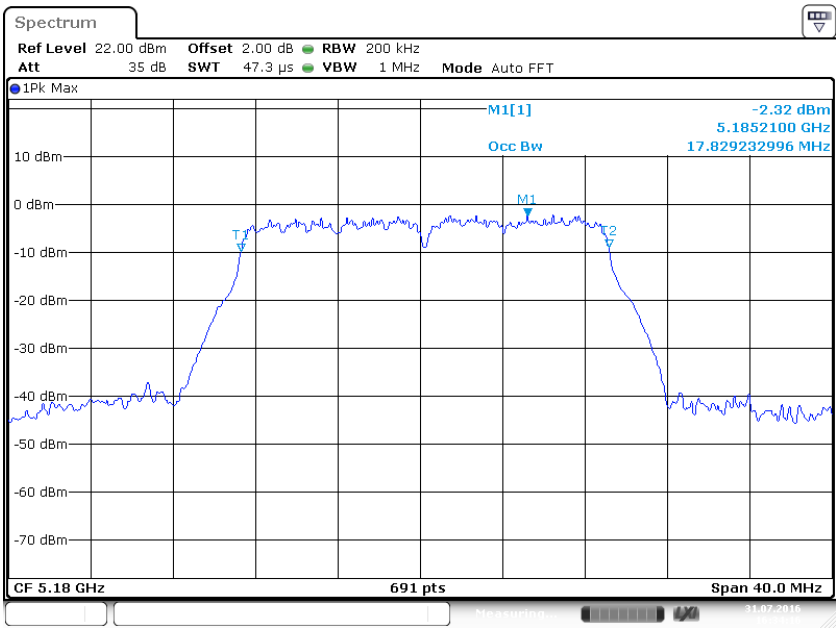


Date: 2.SEP.2016 11:18:28

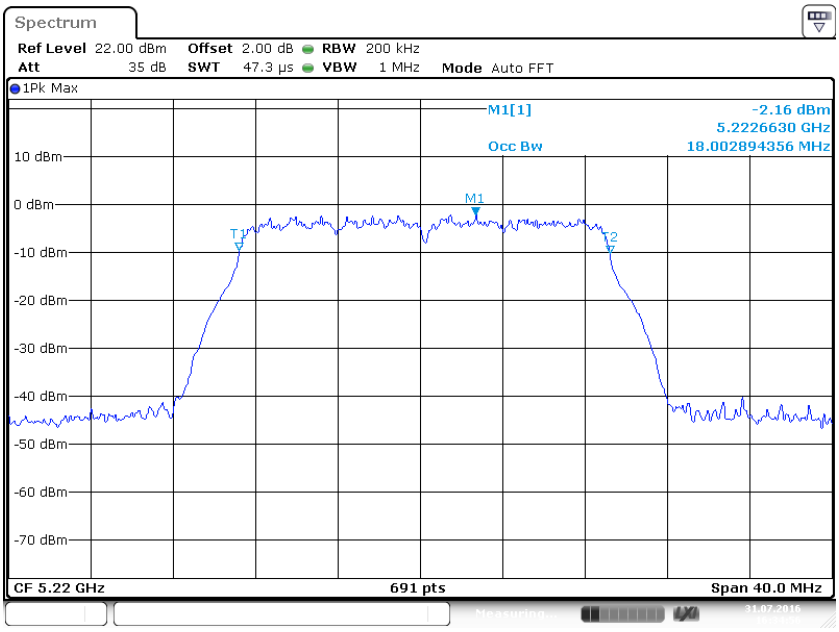


Date: 2.SEP.2016 11:17:30

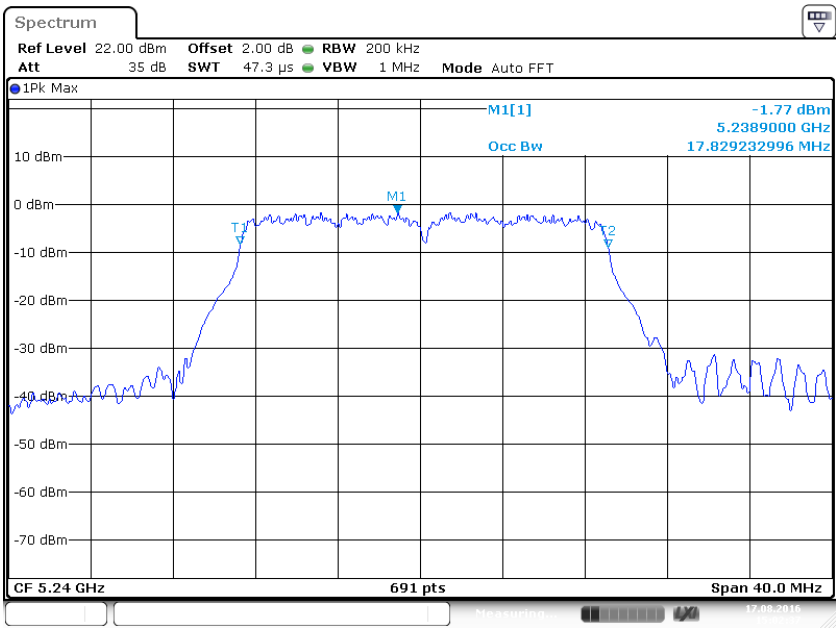
Wi-Fi 802.11 ac (HT20) mode



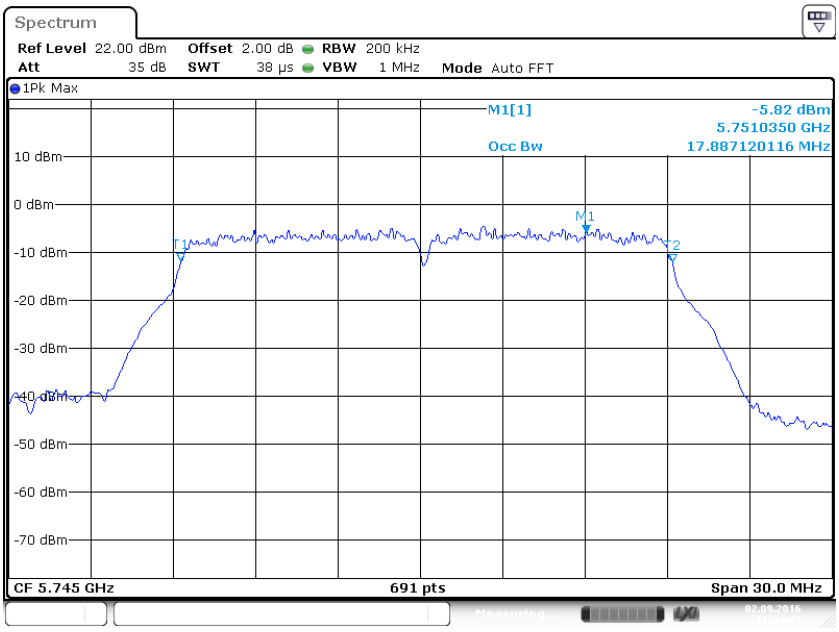
Date: 31.JUL.2016 16:34:17



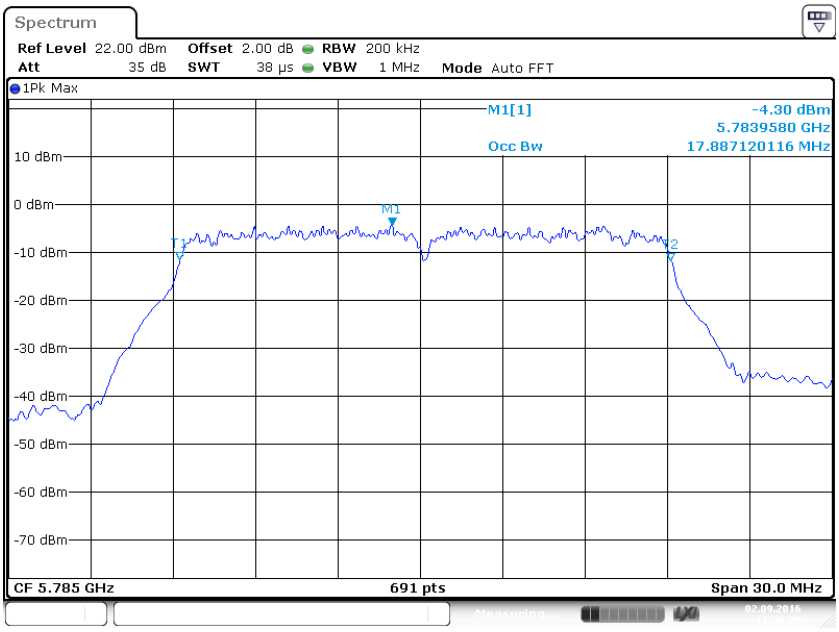
Date: 31.JUL.2016 16:34:56



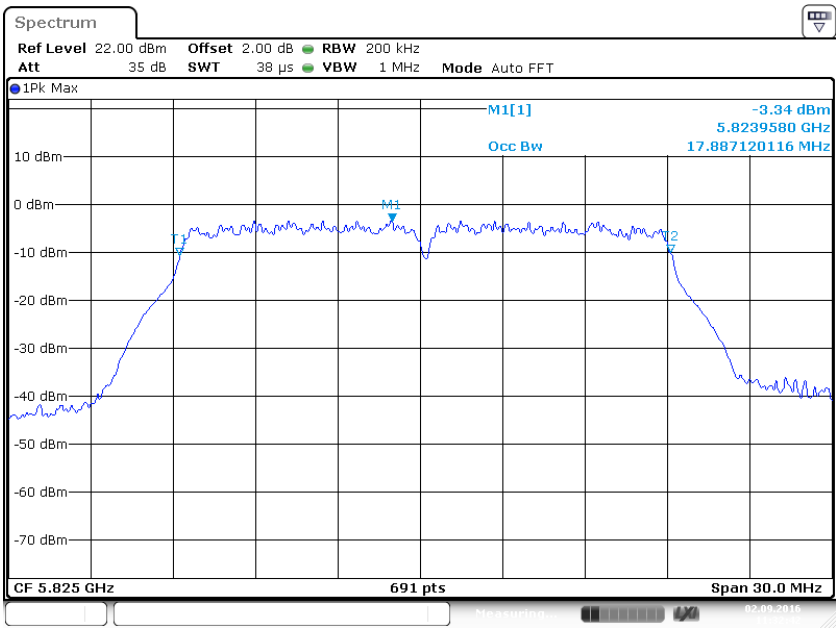
Date: 17.AUG.2016 15:02:37



Date: 2.SEP.2016 11:34:07

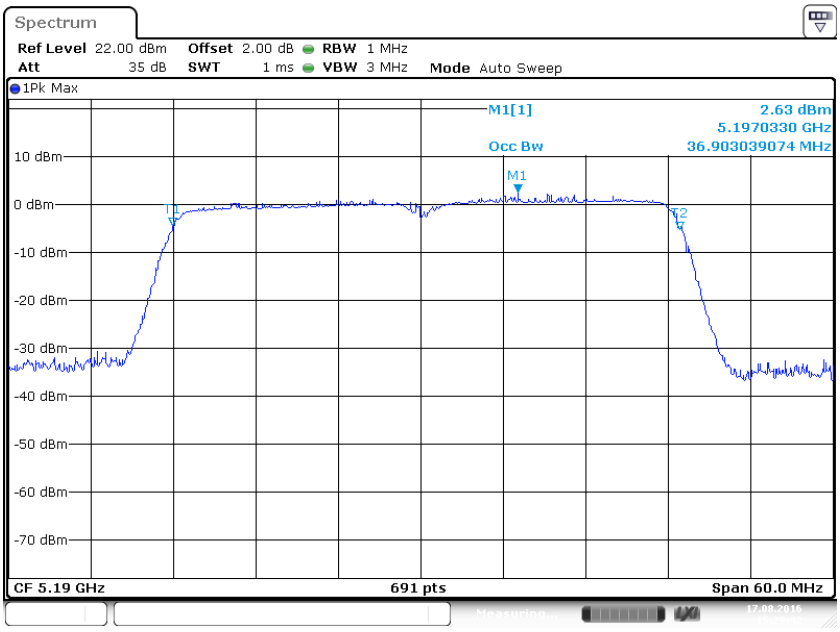


Date: 2.SEP.2016 11:33:29

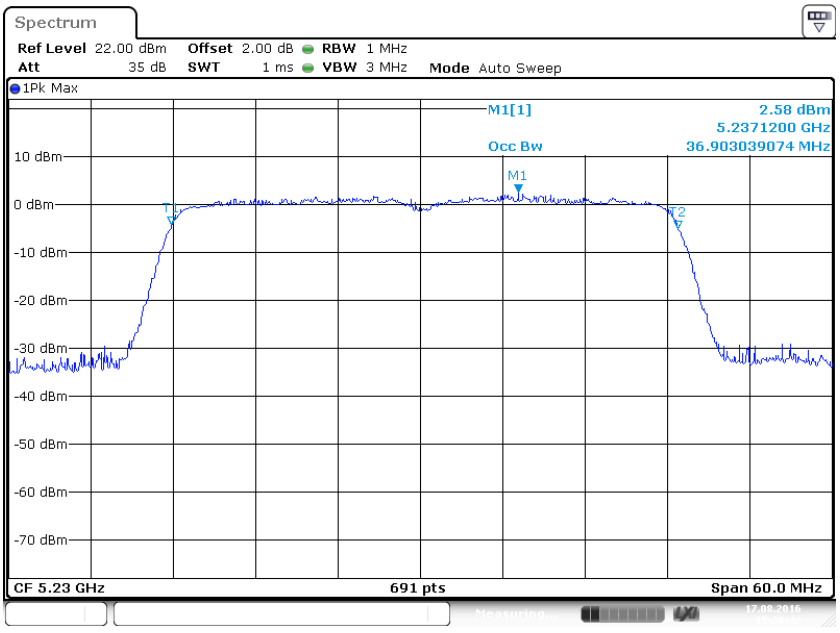


Date: 2.SEP.2016 11:32:42

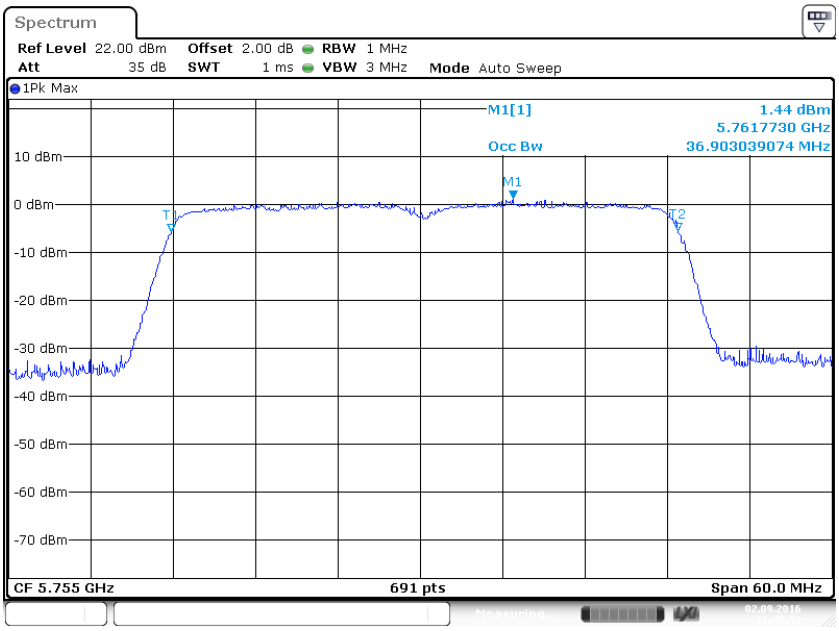
Wi-Fi 802.11 ac (HT40) mode



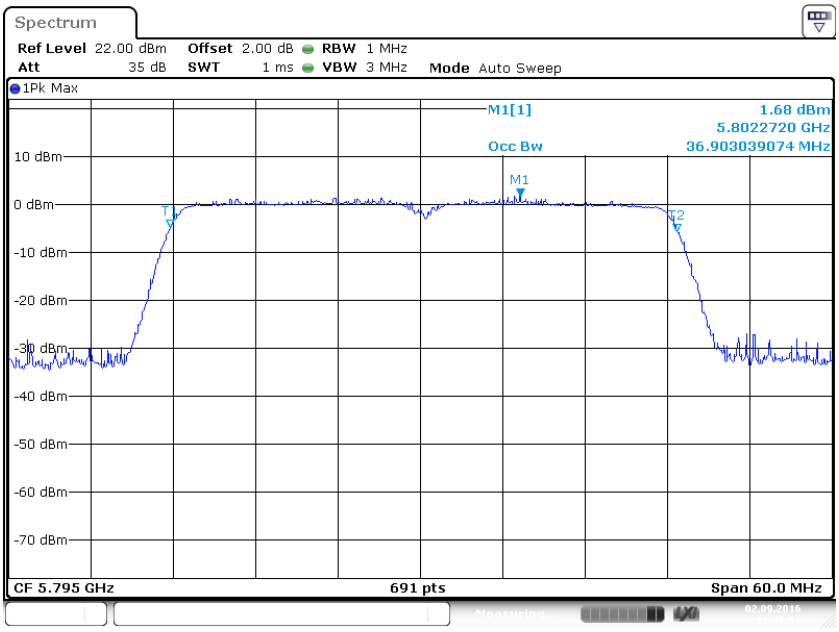
Date: 17.AUG.2016 15:29:42



Date: 17.AUG.2016 15:28:42

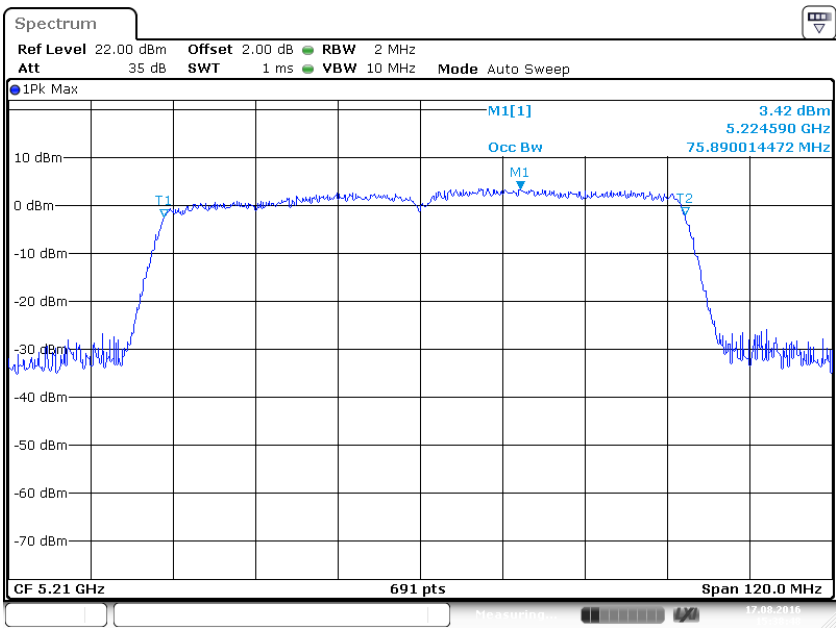


Date: 2.SEP.2016 11:47:37

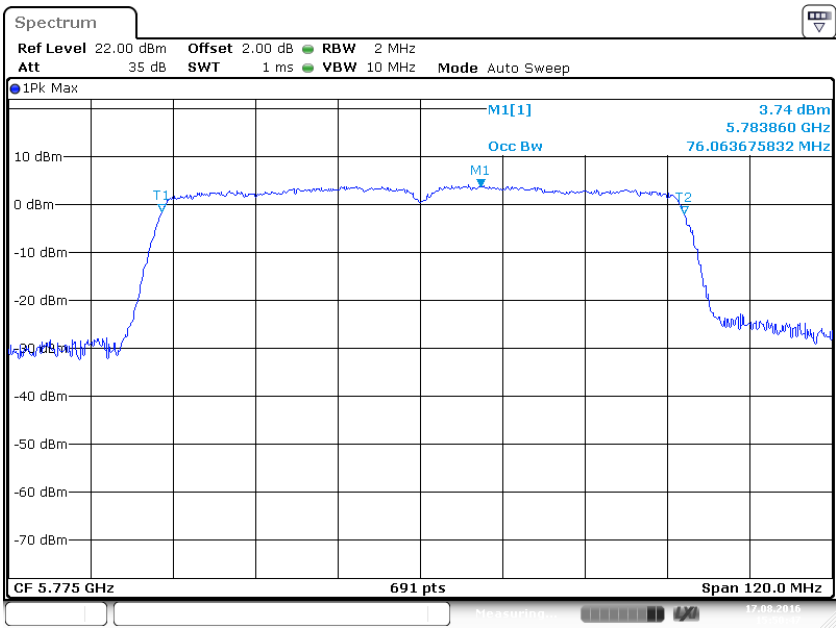


Date: 2.SEP.2016 11:46:51

Wi-Fi 802.11 ac (HT80) mode



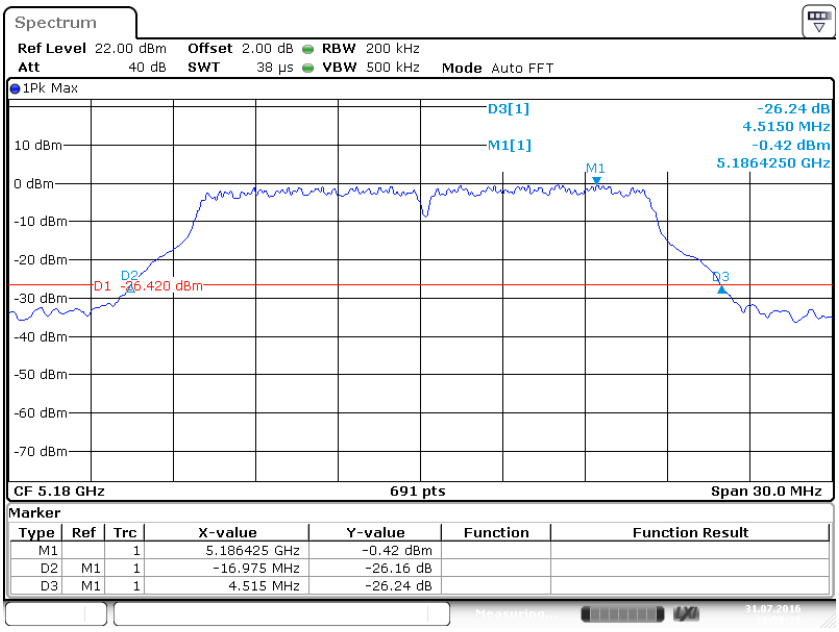
Date: 17.AUG.2016 15:38:48



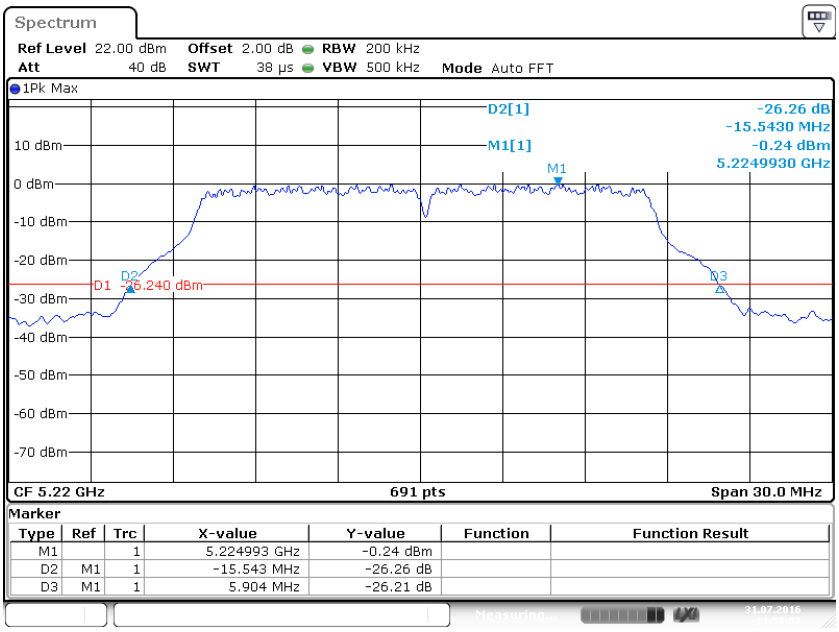
Date: 17.AUG.2016 15:50:47

Appendix F.4: 26dB Bandwidth

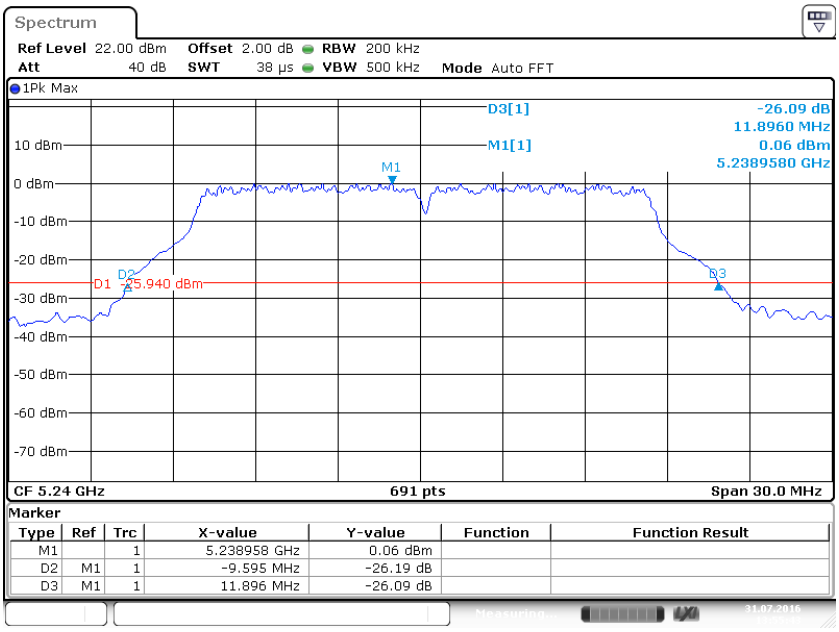
Wi-Fi 802.11 a mode



Date: 31.JUL.2016 13:59:25

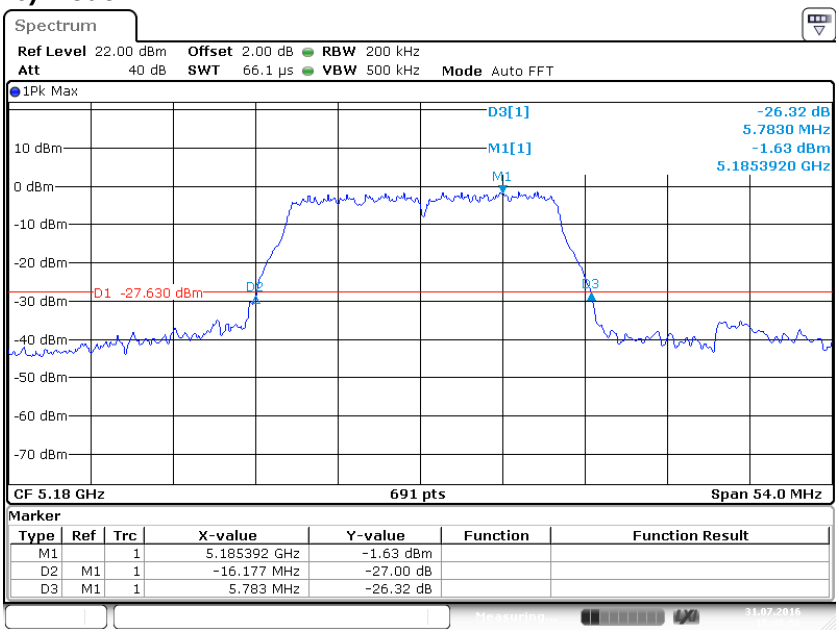


Date: 31.JUL.2016 13:58:07

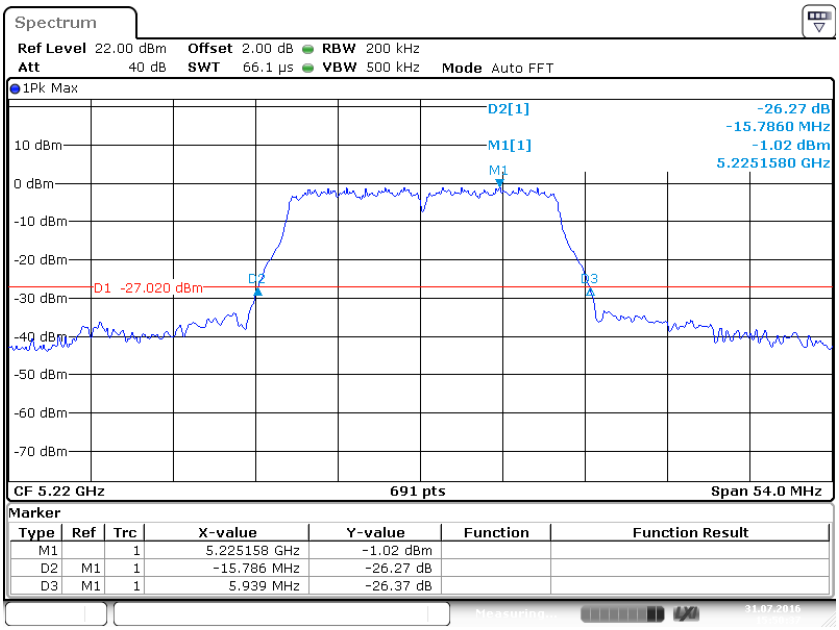


Date: 31.JUL.2016 13:55:44

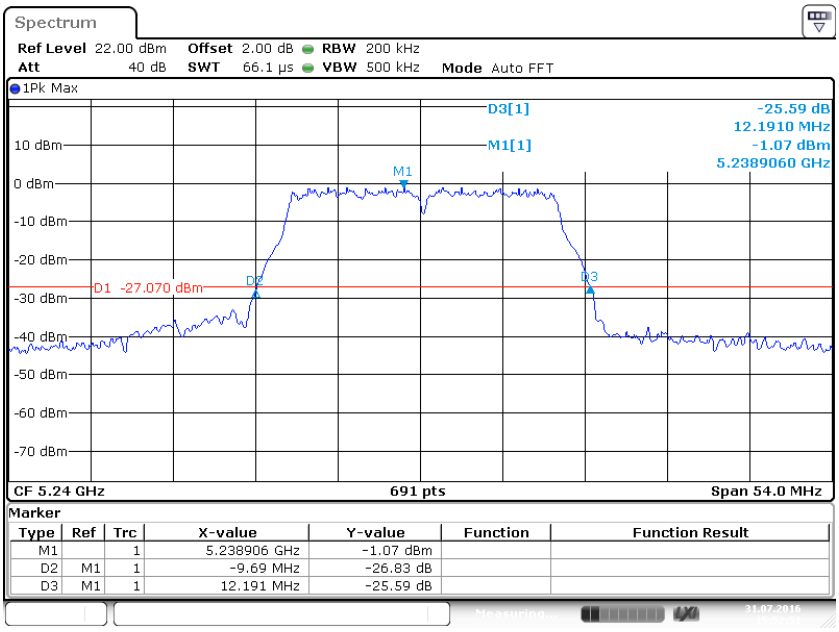
Wi-Fi 802.11 n (HT20) mode



Date: 31.JUL.2016 15:48:56

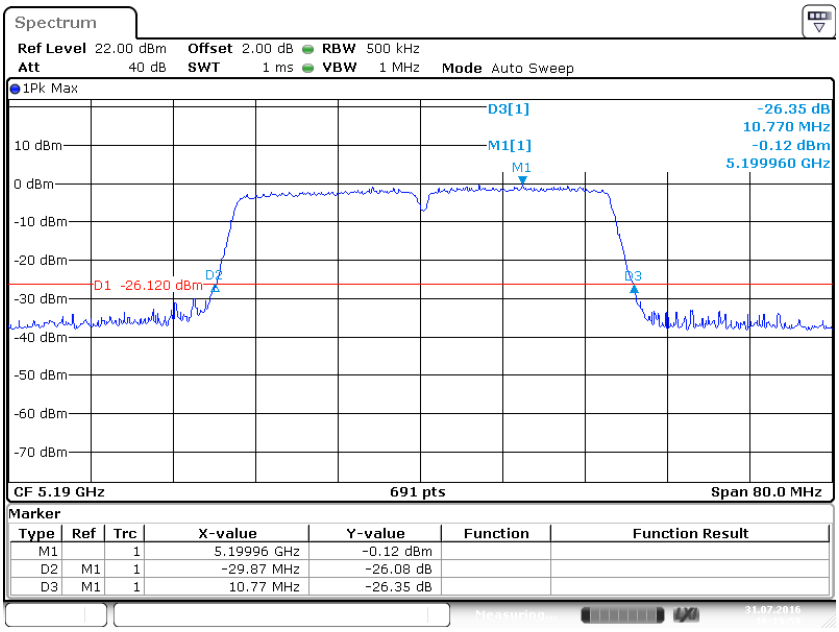


Date: 31.JUL.2016 15:50:37

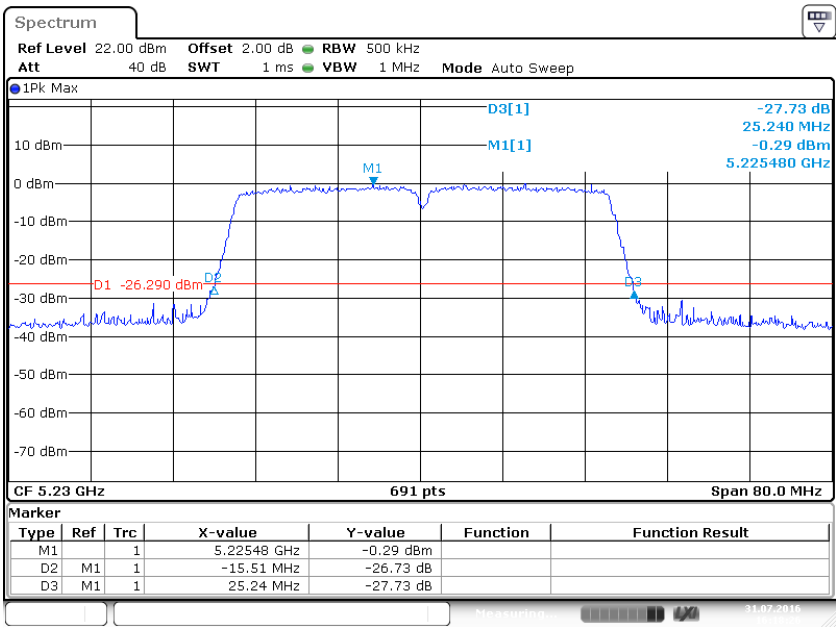


Date: 31.JUL.2016 15:52:51

Wi-Fi 802.11 n (HT40) mode

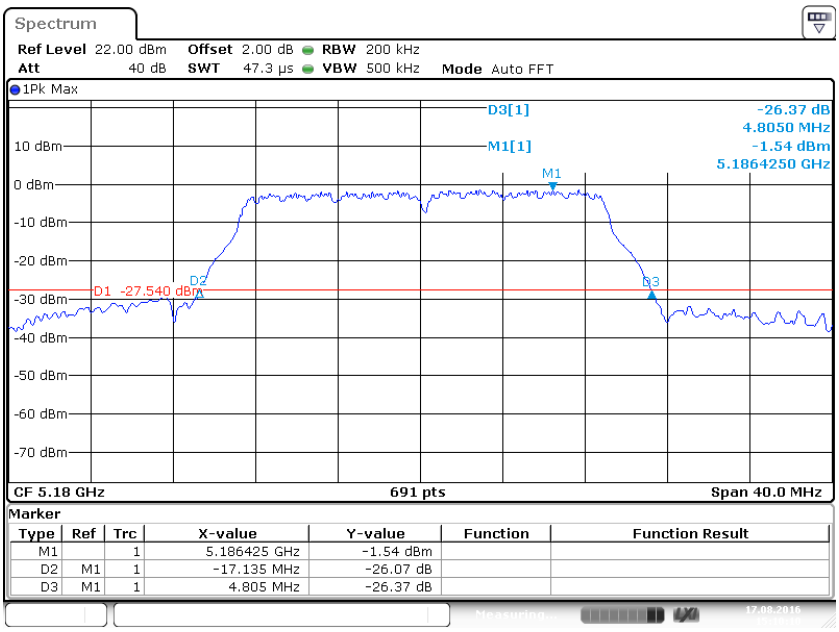


Date: 31.JUL.2016 16:19:59

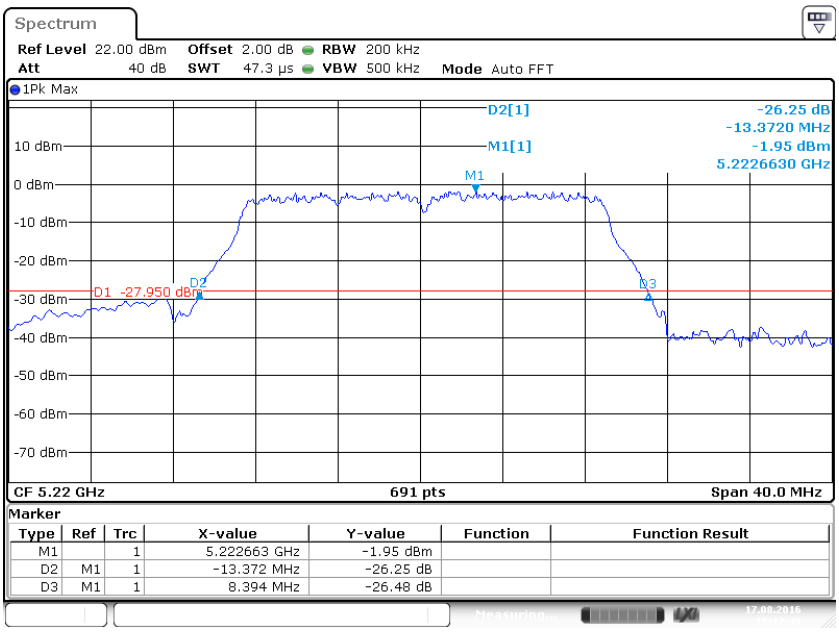


Date: 31.JUL.2016 16:18:27

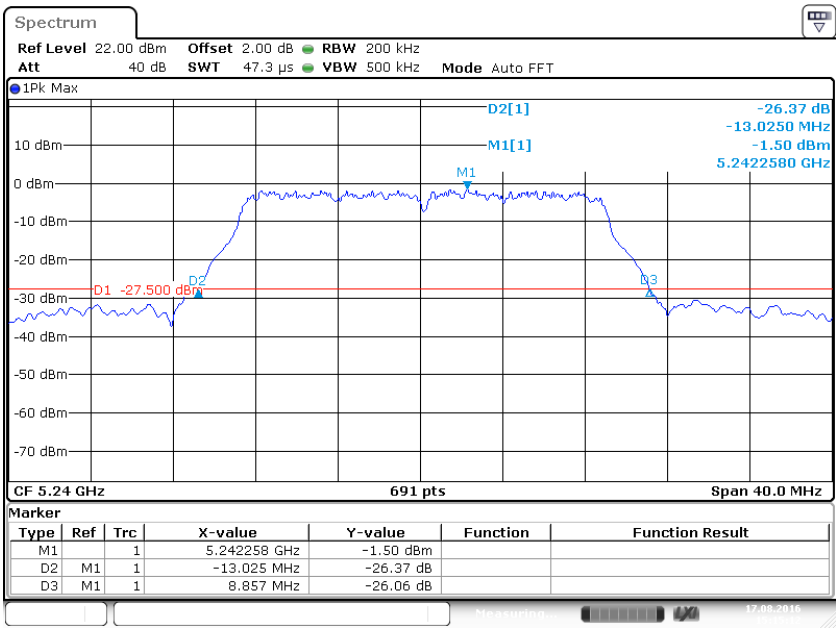
Wi-Fi 802.11 ac (HT20) mode



Date: 17.AUG.2016 15:10:10

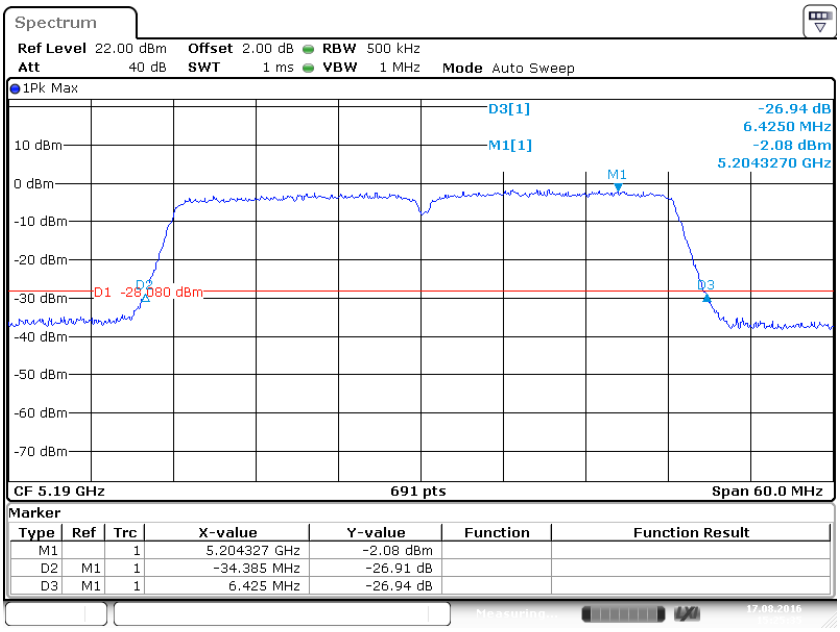


Date: 17.AUG.2016 15:12:45

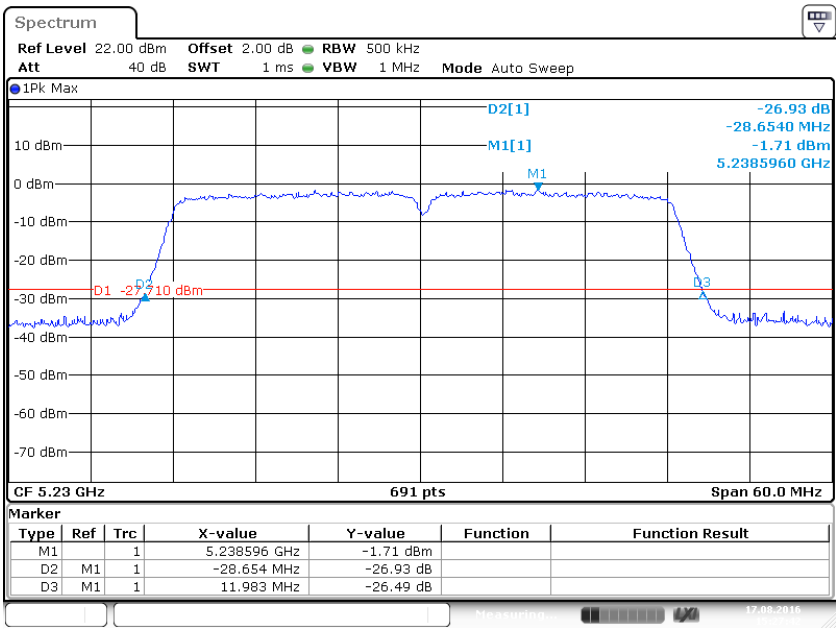


Date: 17.AUG.2016 15:15:12

Wi-Fi 802.11 ac (HT40) mode

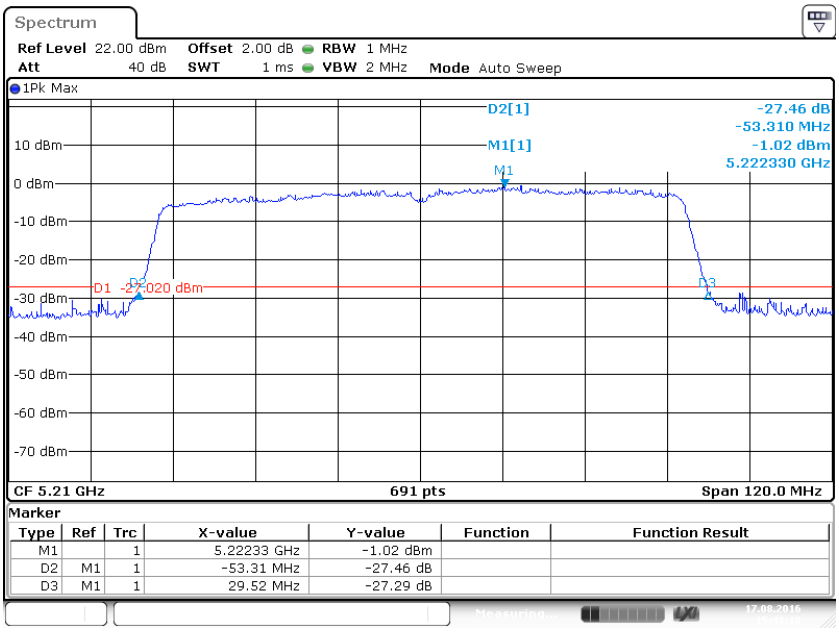


Date: 17.AUG.2016 15:25:36



Date: 17.AUG.2016 15:27:42

Wi-Fi 802.11 ac (HT80) mode



Date: 17.AUG.2016 15:41:18