



(J-MIC) TEST REPORT

Report No. : BVT-RH-JPR-260003(1)

Applicant

• Name : GOQUAL CO., LTD.
• Address : 1001-1002, 10F, Gasan Business Center, 165, Gasan digital 1-ro, Geumcheon-gu, Seoul, 08503, Republic of Korea

Test Item

• Product Name : Specified Radio Equipment (Smart Home Camera)
• Model Name : GJW-MC505

Manufacturer

• Name : Huizhou DayaBay Precision Stand Electronics Co., LTD
• Address : 3F, No. 1 Building, Xinhuiyuan Science and Technology Co., Ltd., West Area of DayaBau, Huizhou City, Guangdong Province, P.R. China

Date of Test : 2026.04.13. ~ 2026.05.29

Technical Standard : Article 2, Paragraph 1, Item 19

Test Method Used : MIC Notice No.88 Appendix No.43

Test Result : ☒ Pass ☐ Fail

Note : None

This test report is not related to KOLAS accreditation

Affirmation Tested by
Name : Kwak, Yun-Kyoung (Signature)

Technical Manager
Name : Jang, Hyeon-Su (Signature)

2026 . 05 . 29 .

Bureau Veritas CPS Korea Tech Limited



Revision History of test report

Date	Report No.	Revision Histoty
2026.04.30	BVT-RH-JPR-260003	Initial issue
2026.05.29	BVT-RH-JPR-260003(1)	p.5 Add Equipment Description remarks comment p.9 Add calibration agency p.10 Revise MIC Rule p.24~26 Retest RF Output Power Revise the unit and antenna gain

Contents

1. INFORMATION OF TESTING LABORATORY	4
2. EQUIPMENT DESCRIPTION	5
3. SYSTEM CONFIGURATION FOR TEST	6
3.1 Characteristics of equipment	6
3.2 Used peripherals list	6
3.3 Product Modification	6
3.4 Operating Mode	6
3.5 Test Setup of EUT	6
3.6 Parameters of Test Software Setting	7
3.7 Table for Carrier Frequencies	8
3.8 Used Test Equipment List	9
4. SUMMARY TEST RESULTS	10
5. MEASUREMENT RESULTS	11
5.1 Frequency tolerance	11
5.2 Occupied bandwidth & Spread bandwidth	16
5.3 RF Output Power	24
5.4 Unwanted (Spurious) Emission Strength	27
5.5 Secondly Emitted Radio Wave Strength (RX Spurious Emission)	43
5.6 Carrier Sensing Function	52
5.7 Interference Prevention Function	53
5.8 Construction Protection Confirmation	54



1. Information of Testing Laboratory

Legal Name and address

Bureau Veritas CPS Korea Tech Limited

(Annyeong-dong) 26, 28, 30, Seja-ro 406beon-gil, Hwaseong-si, Gyeonggi-do, 18326, Republic of Korea

Website: <http://www.bvcpskoreatech.co.kr>

Test location and address

☒ Hwaseong

(Annyeong-dong) 26, 28, 30, Seja-ro 406beon-gil, Hwaseong-si, Gyeonggi-do, 18326, Republic of Korea

Tel: 82-31-222-4251

☐ Suwon

Yeongtong Innoplex 1st Complex No.2 B303, No.2 B304, 306, Sinwon-ro, Yeongtong-gu, Suwon-si, Gyeonggi-do, Suwon, 16675, Republic of Korea

Tel: +82-31-8002-3051, Fax: +82-31-8002-3061

☐ Anyang

Heungan-daero 49, Dongan-gu, Anyang-si, Gyeonggi-do, 14119, Republic of Korea

Tel: +82-31-689-4110, Fax: +82-31-689-4120

Registration information

- KOLAS No.: KT232
- RRA No.: KR0041
- A2LA No.: 4068.02, 4068.03
- FCC Designation No.: KR0041
- ISED CAB ID.: KR0041
- VCCI Membership No.: 2005

2. EQUIPMENT DESCRIPTION

The product specification described herein was declared by manufacturer. And refer to user's manual for the details.

Equipment Name	Specified Radio Equipment (Smart Home Camera)
Model No	GJW-MC505
Usage	IP Home Camera
Serial Number	Proto type
Modulation type	DSSS, OFDM
Emission Type	-
Maximum output power	3.71 mW/MHz
Operated Frequency	2 412 MHz ~ 2 472 MHz
Channel Number	13 (for 802.11b, g, n(HT20), ax(HE20)) 9 (for 802.11n(HT40), ax(HE40))
Operation temperature	-10°C to +50°C
Power Source	DC 5 V
Antenna Description	PCB Antenna
Remark	1. The device was operating at its default output power for all measurements. 2. The above DUT's information was declared by manufacturer. Please refer to the specifications or user manual for more detailed description. 3. The EUT has a constant voltage circuit and input voltage variation at the radio unit is less than 1%.

3. SYSTEM CONFIGURATION FOR TEST

3.1 Characteristics of equipment

The Equipment Under Test (EUT) contains the following capabilities: This equipment is Specified Radio Equipment (Smart Home Camera). The detailed explanation is refer as user manual.

3.2 Used peripherals list

Description	Model No.	Serial No.	Manufacture	Remark
Notebook	Vostro 3500	RN3K6 A01	DELL	-
Adapter	NSW26862	OKXTTW	DELL	For notebook

3.3 Product Modification

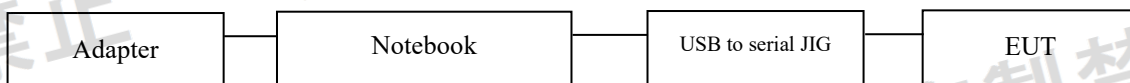
N/A

3.4 Operating Mode

Constantly transmitting with a modulated carrier at default power on the low, middle and high channels

3.5 Test Setup of EUT

The measurements were taken in continuous transmit mode using the test mode which controlled by demo_test_mode_tx.bat. The test command and the test Jig and cables were provided by the applicant.



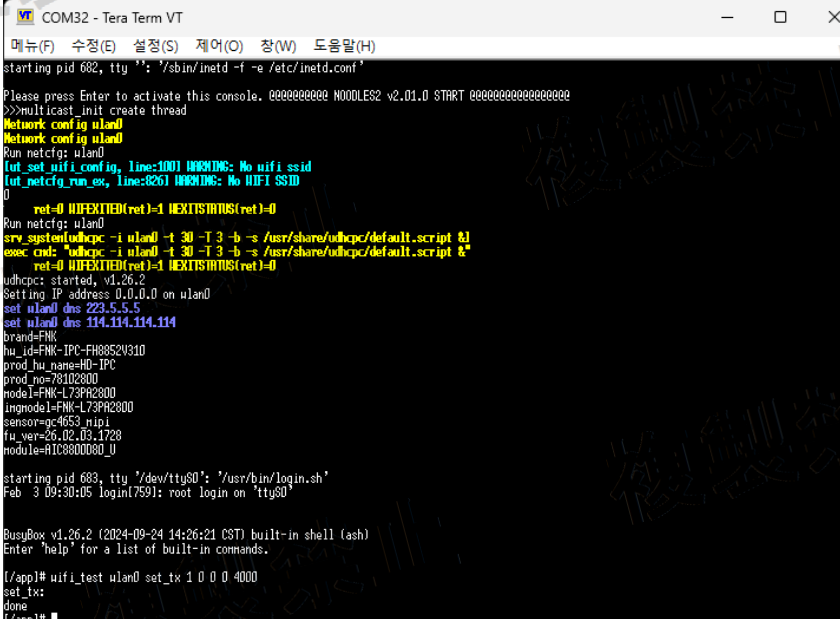
3.6 Parameters of Test Software Setting

During testing, Channel & Power Controlling Software provided by the customer was used to control the operating channel.

▣ TX Power setting value during test

Band	Rate	TX Power setting value		
		Low CH	Middle CH	High CH
2.4 GHz band	-	Default	Default	Default

▣ Test Program: Teraterm



```

COM32 - Tera Term VT
메뉴(F) 수정(E) 설정(S) 제어(O) 창(W) 도움말(H)
starting pid 682, tty '': /sbin/inetd -f -e /etc/inetd.conf
Please press Enter to activate this console. 0000000000 NODLES2 v2.01.0 START 0000000000000000
>>>multicast_init create thread
Network config wlan0
Network config wlan0
Run netcfg: wlan0
[ut_set_wifi_config, line:100] WARNING: No wifi ssid
[ut_netcfg_run_ex, line:826] WARNING: No WIFI SSID
0
ret=0 WIFEXITED(ret)=1 WEXITSTATUS(ret)=0
Run netcfg: wlan0
srv_systemdudhcp -i wlan0 -t 30 -T 3 -b -s /usr/share/udhcp/default.script &
exec cmd: 'udhcp -i wlan0 -t 30 -T 3 -b -s /usr/share/udhcp/default.script &'
ret=0 WIFEXITED(ret)=1 WEXITSTATUS(ret)=0
udhcp: started, v1.26.2
Setting IP address 0.0.0.0 on wlan0
set wlan0 dns 223.5.5.5
set wlan0 dns 114.114.114.114
brand=FWK
hu_id=FWK-IPC-FH8852U310
prod_hu_name=HD-IPC
prod_no=72102000
model=FWK-L73P82800
ingmodel=FWK-L73P82800
sensor-gc4653 mipi
fu_ver=26.02.03.1728
module=RIC8800080_U
starting pid 683, tty '/dev/tty80': /usr/bin/login.sh
Feb 3 09:30:05 login[759]: root login on 'tty80'

BusyBox v1.26.2 (2024-09-24 14:26:21 CST) built-in shell (ash)
Enter 'help' for a list of built-in commands.

[/app]# wifi_test wlan0 set_tx 1 0 0 0 4000
set_tx:
done
[/app]#
  
```

3.7 Table for Carrier Frequencies

■802.11b, g, n(HT20), ax(HE20)

Frequency Band	Channel No	Frequency (MHz)
2.4 GHz band	1	2 412
	2	2 417
	3	2 422
	4	2 427
	5	2 432
	6	2 437
	7	2 442
	8	2 447
	9	2 452
	10	2 457
	11	2 462
	12	2 467
	13	2 472

■802.11n(HT40), ax(HE40)

Frequency Band	Channel No	Frequency (MHz)
2.4 GHz band	3	2 422
	4	2 427
	5	2 432
	6	2 437
	7	2 442
	8	2 447
	9	2 452
	10	2 457
	11	2 462

3.8 Used Test Equipment List

Equipment Name	Manufacturer	Model No.	Serial No.	Calibration Agency	Cal. Method	Cal. Date	Next Cal. Date
Signal Analyzer	Rohde & Schwarz	FSV40	101727	**SICT	(c)	2025.08.11	2026.08.11
Signal Generator	Rohde & Schwarz	SMB100A	179628	***HCT	(c)	2025.12.22	2026.12.22
DC Power supply	Agilent Technology	6632B	MY43004005	HCT	(c)	2025.12.24	2026.12.24
Attenuator	WEINSCHTEL	54A-10	74564	SICT	(c)	2025.08.11	2026.08.11
Attenuator	WEINSCHTEL	56-10	66920	HCT	(c)	2025.12.22	2026.12.22
Power divider	SQ361	WEINSCHTEL	1580	HCT	(c)	2025.12.24	2026.12.24
EPM Series Power meter	Agilent Technology	E4418B	GB39512547	****KTICC	(c)	2025.12.23	2026.12.23
RF Power Sensor	Agilent Technology	E9300A	MY41496631	KTICC	(c)	2025.12.23	2026.12.23

*Cal Method

- (a) Calibration conducted by the National Institute of Information and Communications Technology -NICT -or a designated calibration agency under Article 102-8 paragraph (1)
- (b) Calibration conducted pursuant to the provisions of Article 135 or Article 144 of the Measurement Law (Law No. 51 of 1992) -Japan Calibration Service System
- (c) Calibration conducted in foreign countries, which shall be equivalent to the calibration conducted by the NICT or a designated calibration agency under Article 102-18 paragraph (1)
- (d) Calibration conducted by using other equipment that listed above from a) to c)

**SICT: A Tescal Company, Institute of Calibration & Technology Co.,Ltd

***HCT: HCT Co., Ltd.

****KTICC: Korea Testing Instruments Calibration Center

4. SUMMARY TEST RESULTS

Description of Test	MIC Rule	Used	Test Result
Frequency Tolerance	Article 2, Paragraph 1, Item 19	☒	Compliance
Occupied Bandwidth & Spread Bandwidth	Article 2, Paragraph 1, Item 19	☒	Compliance
RF Output Power	Article 2, Paragraph 1, Item 19	☒	Compliance
Unwanted (Spurious) Emission Strength	Article 2, Paragraph 1, Item 19	☒	Compliance
Secondarily Emitted Radio Wave Strength (RX Spurious Emission)	Article 2, Paragraph 1, Item 19	☒	Compliance
Carrier Sensing Function	Article 2, Paragraph 1, Item 19	☒	Compliance
Interference Prevention Function	Article 2, Paragraph 1, Item 19	☒	Compliance
Construction Protection Confirmation	Article 2, Paragraph 1, Item 19	☒	Compliance
Compliance/pass : The EUT complies with the essential requirements in the standard. Not Compliance : The EUT does not comply with the essential requirements in the standard. N/A : The test was not applicable in the standard.			

5. MEASUREMENT RESULTS

5.1 Frequency tolerance

5.1.1 Measurement Procedure

The transmitter output is connected to the Spectrum analyzer.
Setting the spectrum analyzer is as follows.

Center frequency: Operating frequency

Resolution BW: 1 kHz

Video BW: 30 kHz

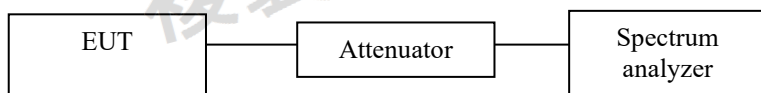
Sweep time: Auto

Sweep mode: Continuous sweep

Detector mode: Positive Peak

Trace mode: Max hold

5.1.2 Test setup



5.1.3 Limit

$\pm 20 \times 10^{-6}$ (20 ppm or below)

5.1.4 Test environment conditions

• Ambient temperature : (20 ~ 22) °C • Relative Humidity : (46 ~ 49) % R.H.

5.1.5 Measurement Result

■ 802.11b

Frequency [MHz]	Conducted power		Limit [ppm]	Test results
	[MHz]	[ppm]*		
2 412	2 411.989 105	-4.52	20	Compliance
2 442	2 441.989 002	-4.50	20	Compliance
2 472	2 471.988 955	-4.47	20	Compliance

■ 802.11g

Frequency [MHz]	Conducted power		Limit [ppm]	Test results
	[MHz]	[ppm]*		
2 412	2 412.994 431	-2.31	20	Compliance
2 442	2 441.994 196	-2.38	20	Compliance
2 472	2 471.994 152	-2.37	20	Compliance

■ 802.11n(HT20)

Frequency [MHz]	Conducted power		Limit [ppm]	Test results
	[MHz]	[ppm]*		
2 412	2 411.997 618	-0.99	20	Compliance
2 442	2 441.997 490	-1.03	20	Compliance
2 472	2 471.997 433	-1.04	20	Compliance

■ 802.11n(HT40)

Frequency [MHz]	Conducted power		Limit [ppm]	Test results
	[MHz]	[ppm]*		
2 422	2 421.993 820	-2.55	20	Compliance
2 442	2 441.993 855	-2.52	20	Compliance
2 462	2 461.993 836	-2.50	20	Compliance

■ 802.11ax(HE20)

Frequency [MHz]	Conducted power		Limit [ppm]	Test results
	[MHz]	[ppm]*		
2 412	2 411.993 887	-2.53	20	Compliance
2 442	2 441.993 758	-2.56	20	Compliance
2 472	2 471.993 688	-2.55	20	Compliance

■ 802.11ax(HE40)

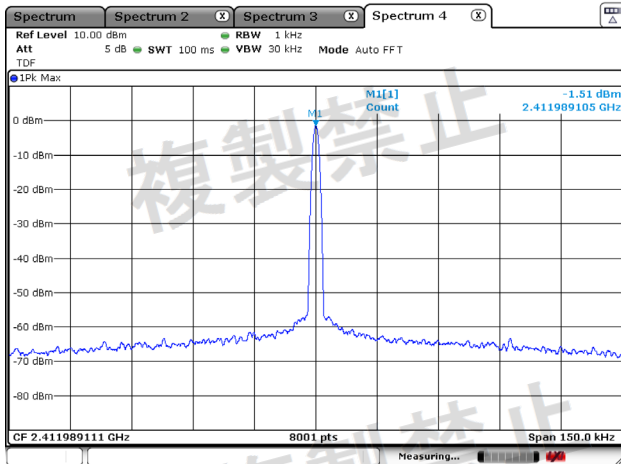
Frequency [MHz]	Conducted power		Limit [ppm]	Test results
	[MHz]	[ppm]*		
2 422	2 421.993 925	-2.51	20	Compliance
2 442	2 441.993 856	-2.52	20	Compliance
2 462	2 461.993 827	-2.51	20	Compliance

*ppm = [((Measured value (MHz) – Operating frequency (MHz))/ Operating frequency (MHz))] x 10⁻⁶

5.1.6 Test Plot

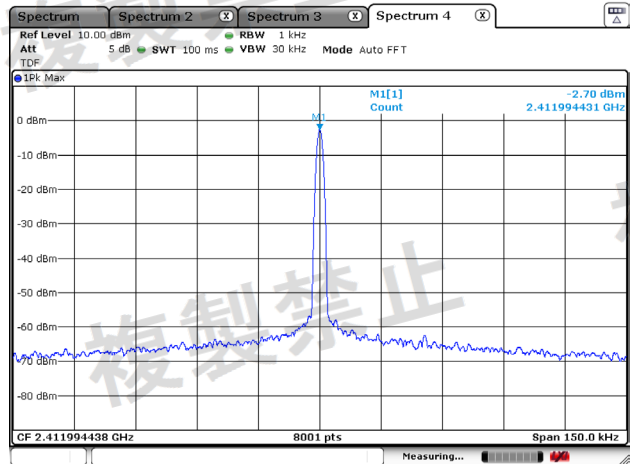
■ 802.11b

CH Low

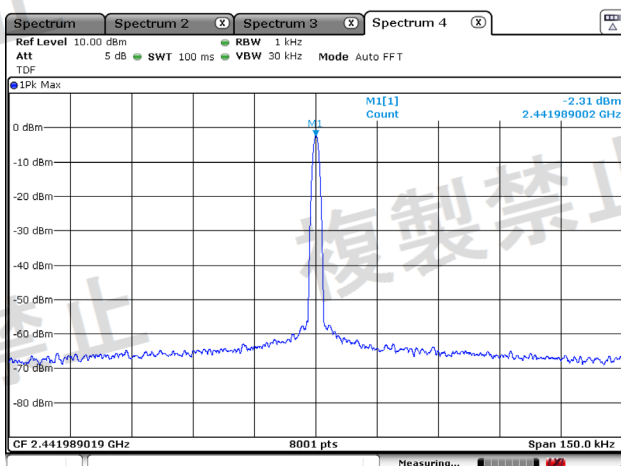


■ 802.11g

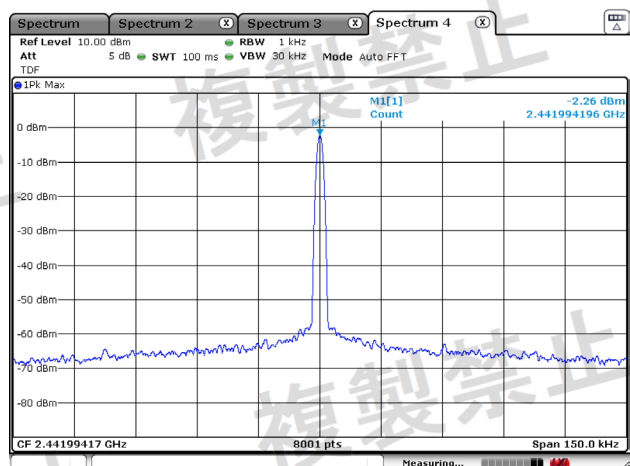
CH Low



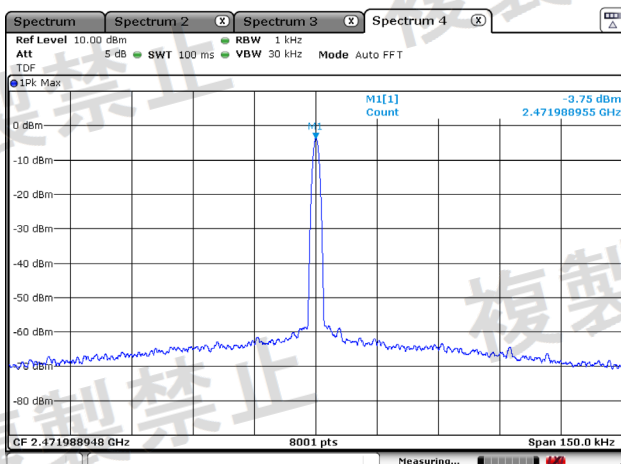
CH Middle



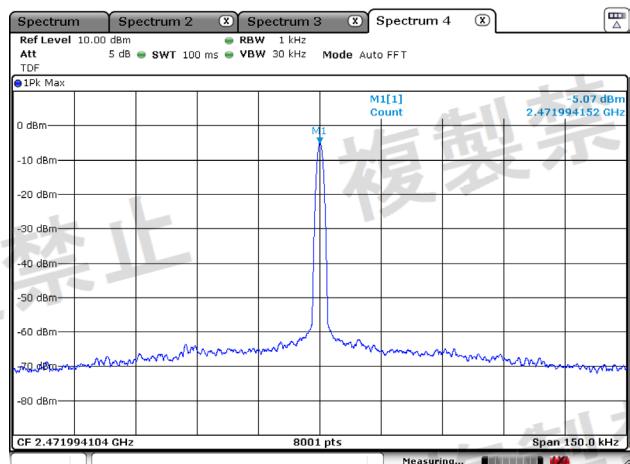
CH Middle



CH High

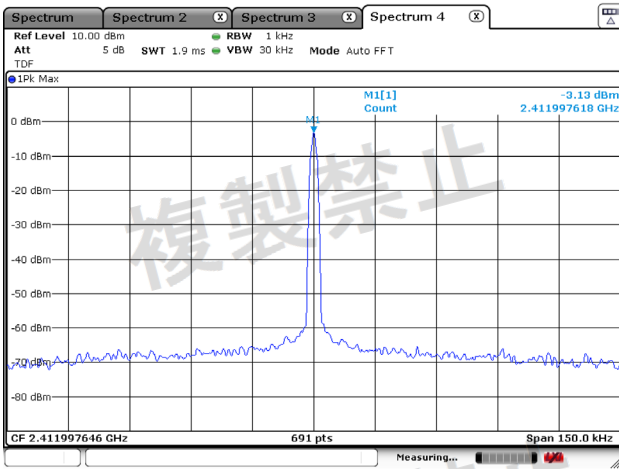


CH High



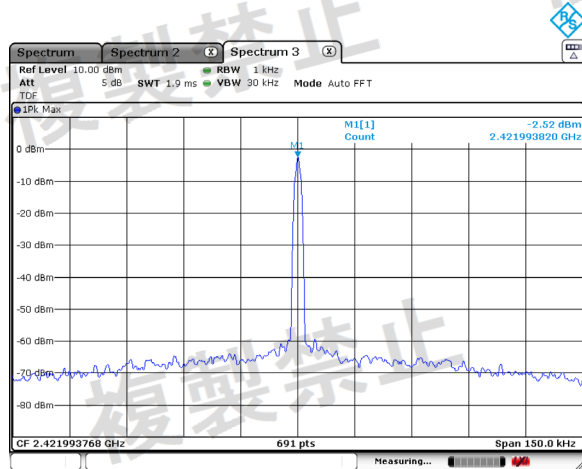
■ 802.11n(HT20)

CH Low

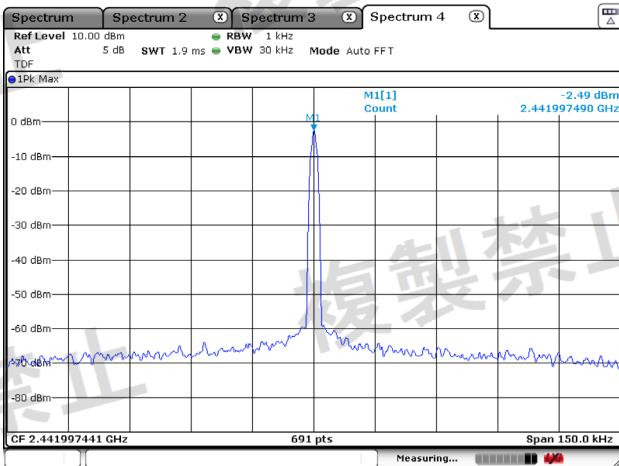


■ 802.11n(HT40)

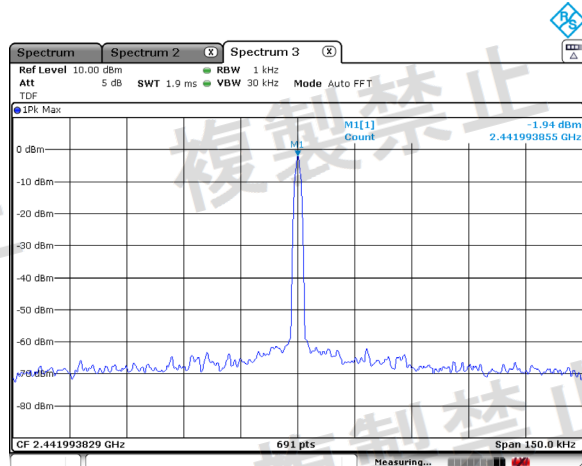
CH Low



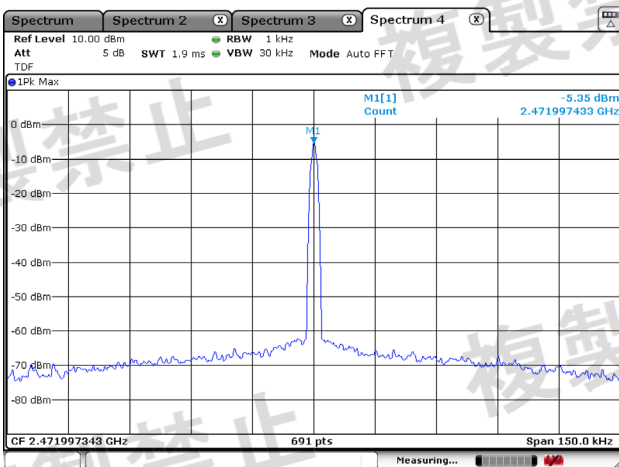
CH Middle



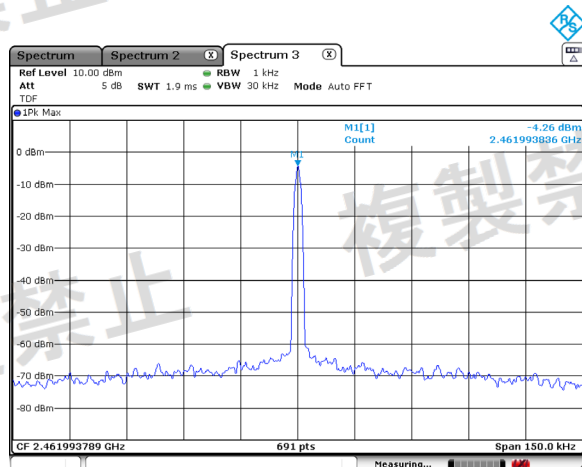
CH Middle



CH High

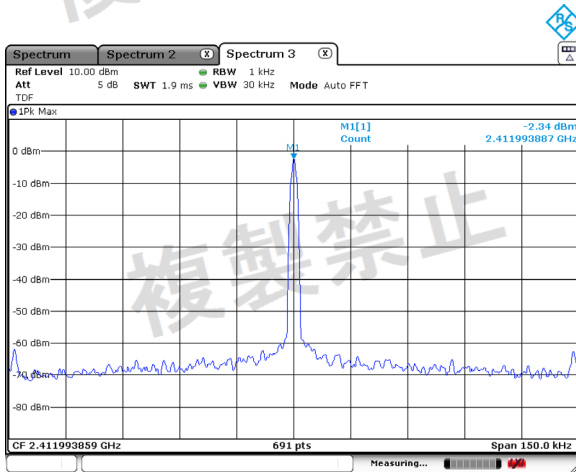


CH High



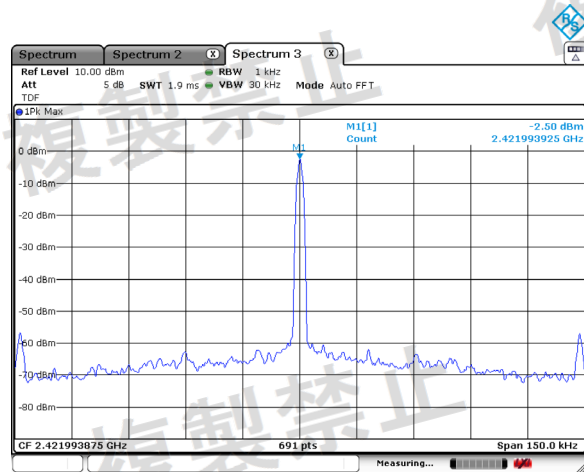
802.11ax(HE20)

CH Low

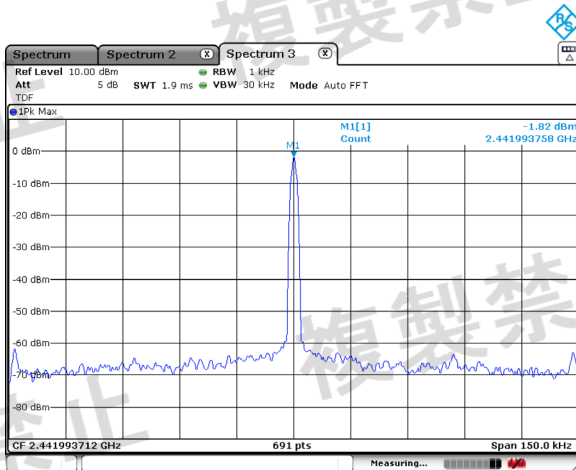


802.11ax(HE40)

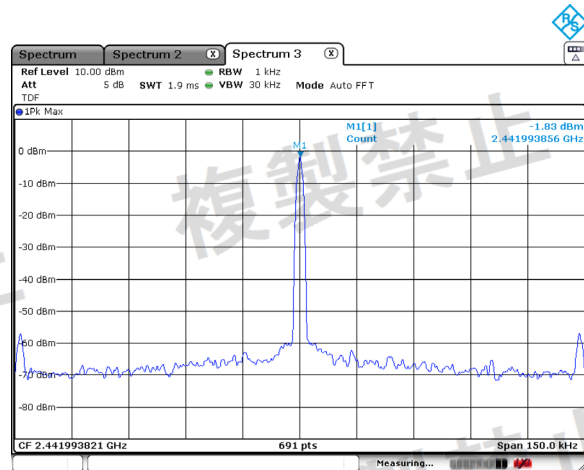
CH Low



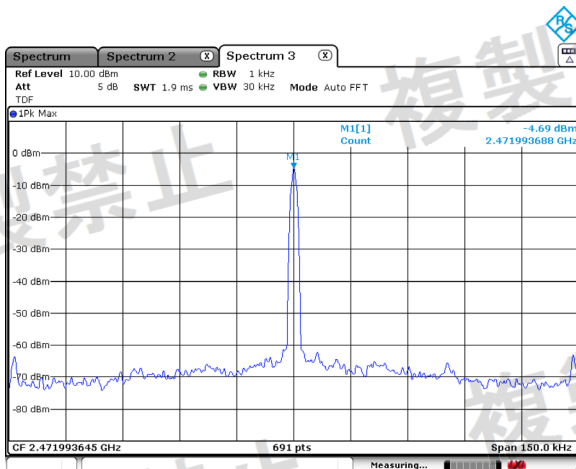
CH Middle



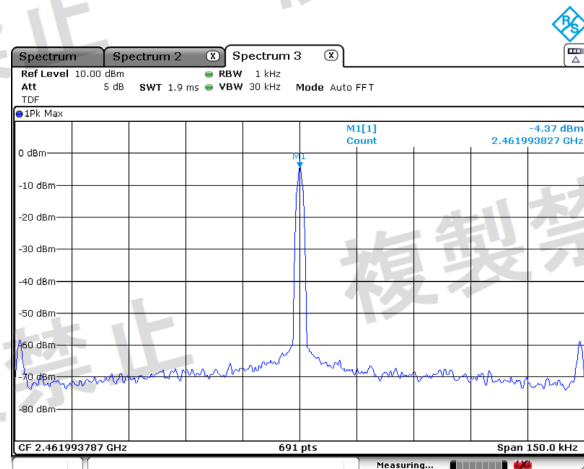
CH Middle



CH High



CH High



5.2 Occupied bandwidth & Spread bandwidth

5.2.1 Measurement Procedure

The transmitter output is connected to the Spectrum analyzer.
Setting the spectrum analyzer is as follows.

Center frequency: Operating frequency

Resolution BW: 300 kHz

Video BW: 300 kHz

Sweep time: Auto

Sweep mode: Continuous sweep

Detector mode: Positive Peak

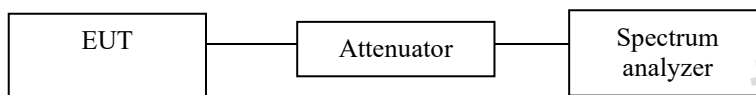
Trace mode: Max hold

Set to 99% of occupied bandwidth to measure occupied bandwidth. The limit is less than 26 MHz.

Set to 90% of occupied bandwidth to measure spread spectrum bandwidth and it must be greater than 500 kHz.

Spread Factor = Spread Bandwidth/modulation rate

5.2.2 Test setup



5.2.3 Limit

DS $\leq$ 26 MHz; Others $\leq$ 26 MHz;

OFDM (For BW=20 MHz) $\leq$ 26 MHz;

OFDM (For BW=40 MHz) $\leq$ 40 MHz

500 kHz $\leq$ Spread Bandwidth

5.2.4 Test environment conditions

• Ambient temperature : (20 ~ 22) °C • Relative Humidity : (38 ~ 42) % R.H.

5.2.5 Measurement Result

■802.11b

Frequency	99% Occupied bandwidth	Limit	Spread Bandwidth	Limit	Test results
[MHz]	[MHz]	[MHz]	[MHz]	[MHz]	
2 412	15.05	≤26	9.70	>0.5	Compliance
2 442	15.05		9.70		Compliance
2 472	15.05		9.70		Compliance

■802.11g

Frequency	99% Occupied bandwidth	Limit	Spread Bandwidth	Limit	Test results
[MHz]	[MHz]	[MHz]	[MHz]	[MHz]	
2 412	16.64	≤26	14.33	>0.5	Compliance
2 442	17.22		14.47		Compliance
2 472	16.64		14.33		Compliance

■802.11n(HT20)

Frequency	99% Occupied bandwidth	Limit	Spread Bandwidth	Limit	Test results
[MHz]	[MHz]	[MHz]	[MHz]	[MHz]	
2 412	18.23	≤26	15.20	>0.5	Compliance
2 442	17.95		15.34		Compliance
2 472	17.80		15.05		Compliance

■802.11n(HT40)

Frequency	99% Occupied bandwidth	Limit	Spread Bandwidth	Limit	Test results
[MHz]	[MHz]	[MHz]	[MHz]	[MHz]	
2 422	36.18	≤40	30.82	>0.5	Compliance
2 442	36.32		30.25		Compliance
2 462	36.18		30.39		Compliance

■802.11ax(HE20)

Frequency	99% Occupied bandwidth	Limit	Spread Bandwidth	Limit	Test results
[MHz]	[MHz]	[MHz]	[MHz]	[MHz]	
2 412	19.10	≤26	16.35	>0.5	Compliance
2 442	18.96		16.50		Compliance
2 472	18.96		15.77		Compliance

■802.11ax(HE40)

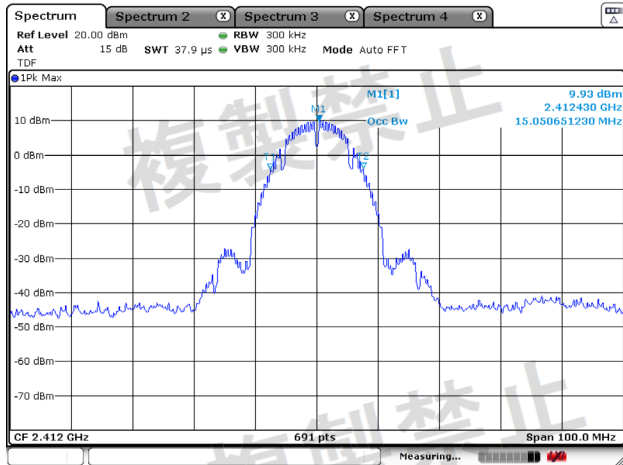
Frequency	99% Occupied bandwidth	Limit	Spread Bandwidth	Limit	Test results
[MHz]	[MHz]	[MHz]	[MHz]	[MHz]	
2 422	37.77	≤40	31.69	>0.5	Compliance
2 442	37.63		31.84		Compliance
2 462	37.63		30.68		Compliance

5.2.6 Test Plot

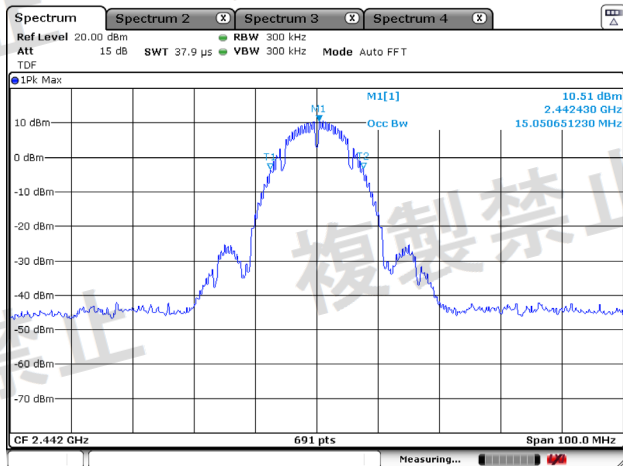
802.11b

99% Occupied Bandwidth

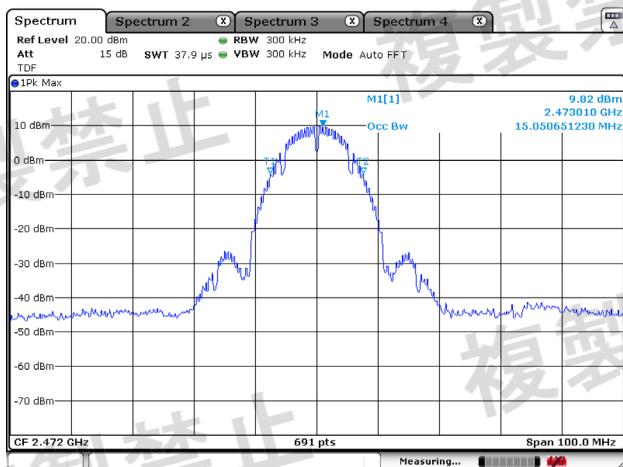
CH Low



CH Middle

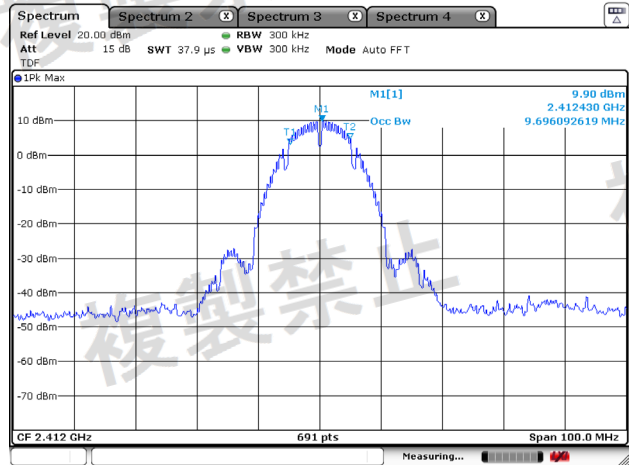


CH High

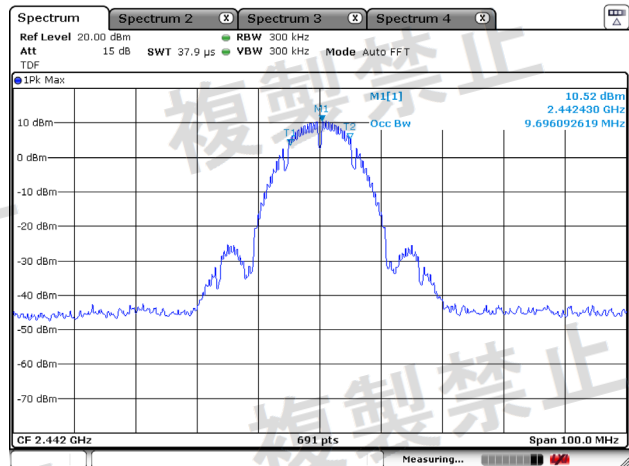


Spread Bandwidth

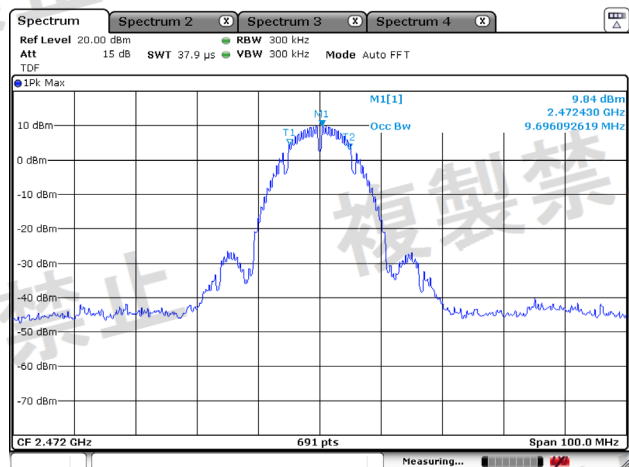
CH Low



CH Middle



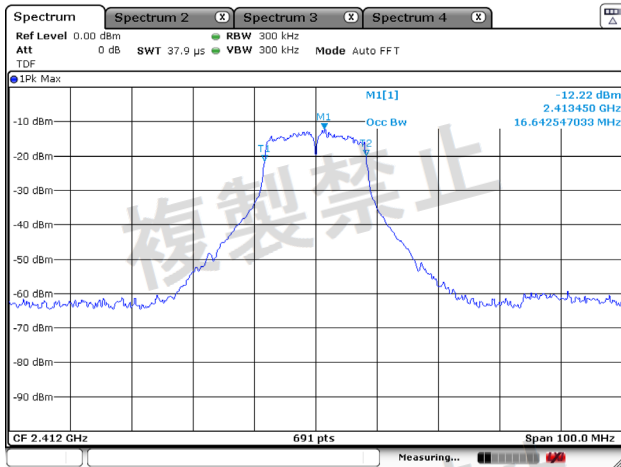
CH High



■ 802.11g

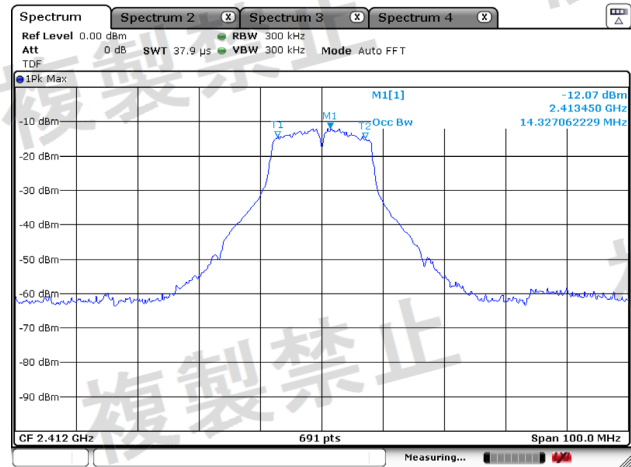
99% Occupied Bandwidth

CH Low

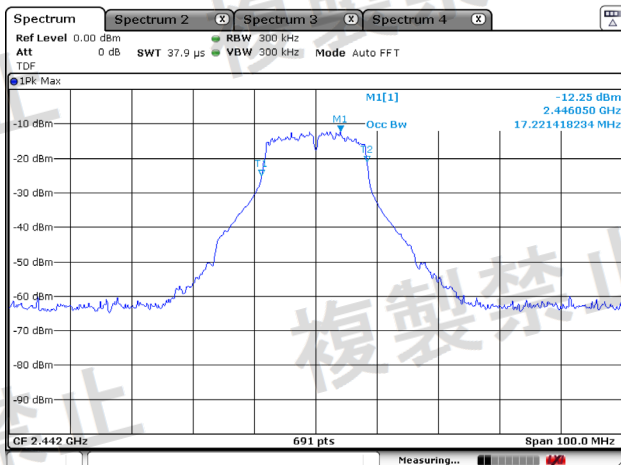


Spread Bandwidth

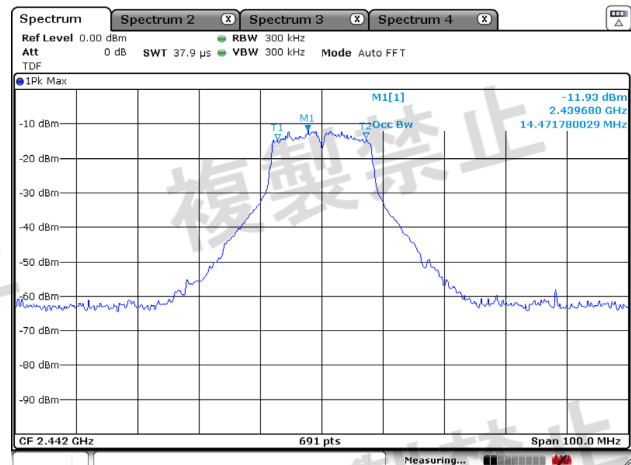
CH Low



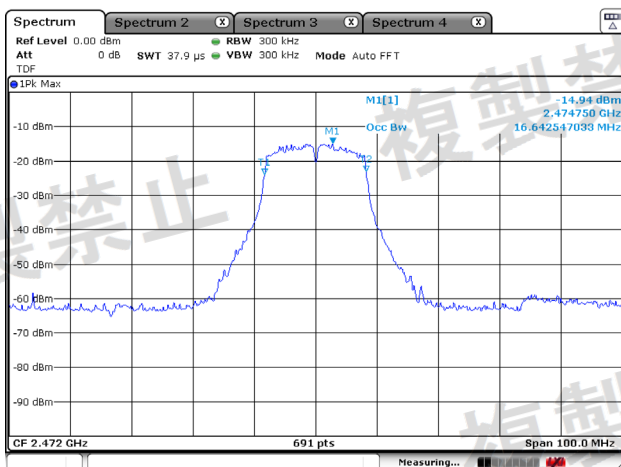
CH Middle



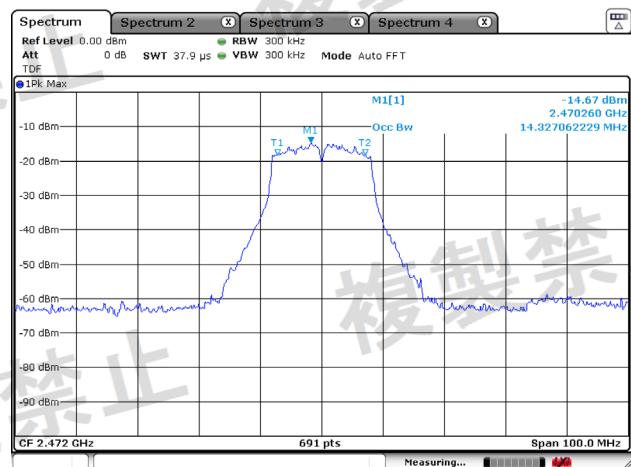
CH Middle



CH High



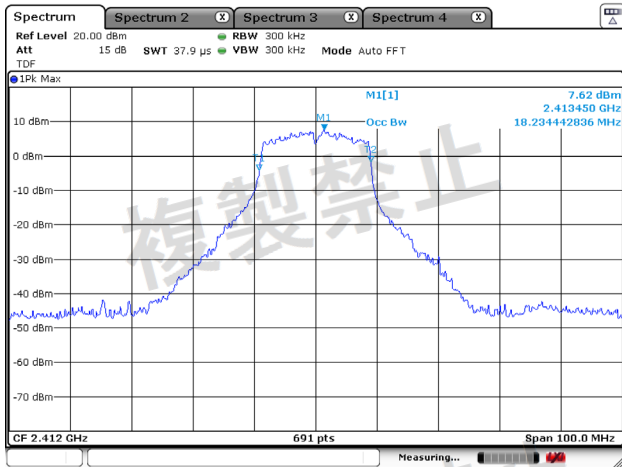
CH High



■ 802.11n(HT20)

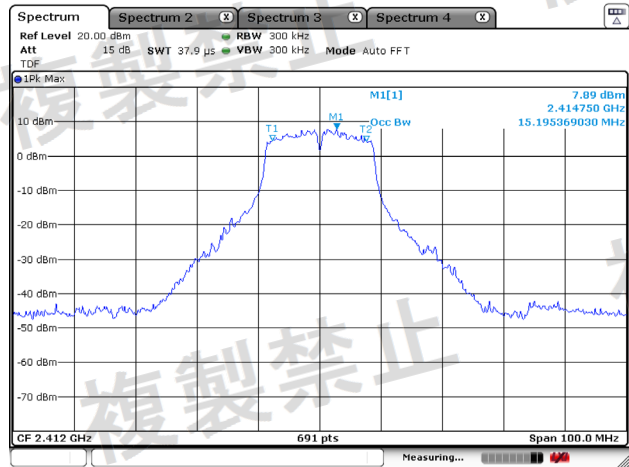
99% Occupied Bandwidth

CH Low

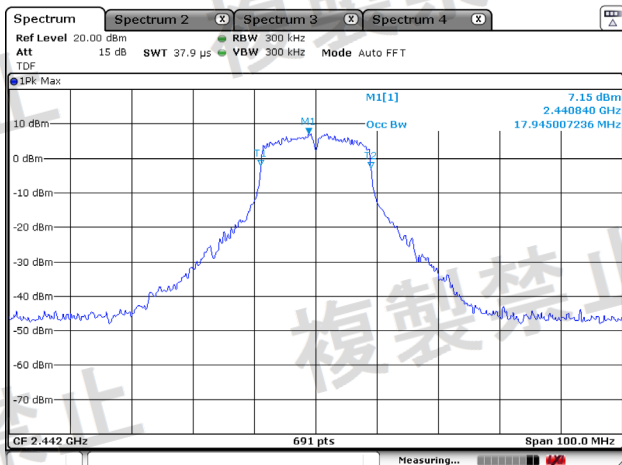


Spread Bandwidth

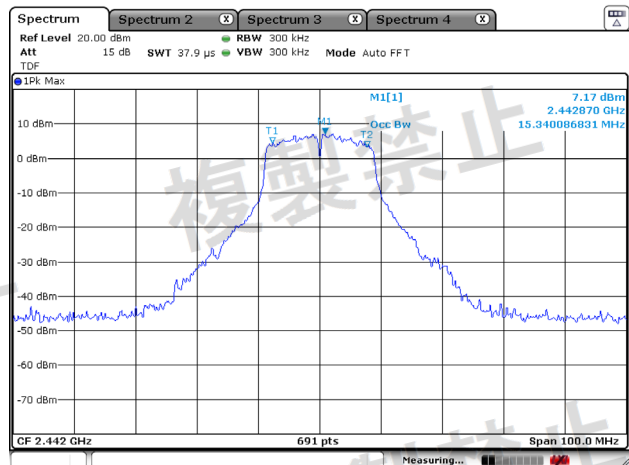
CH Low



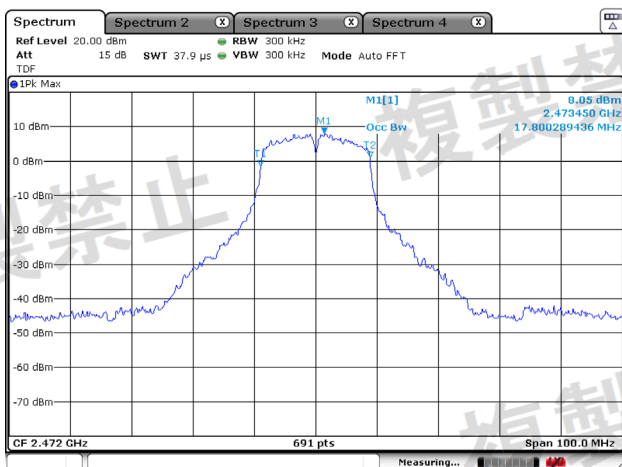
CH Middle



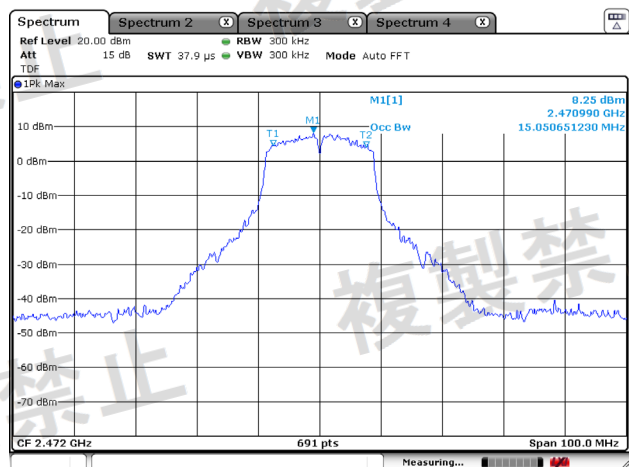
CH Middle



CH High



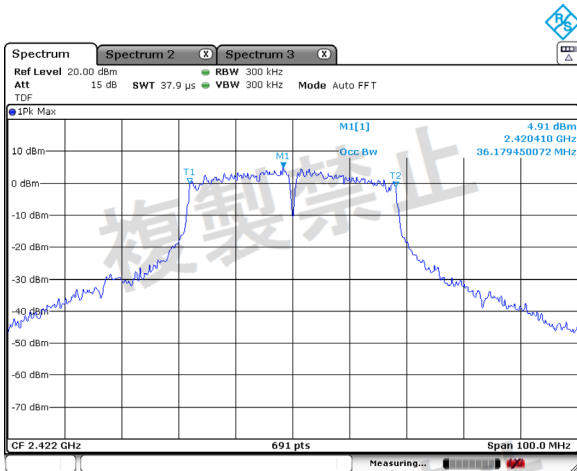
CH High



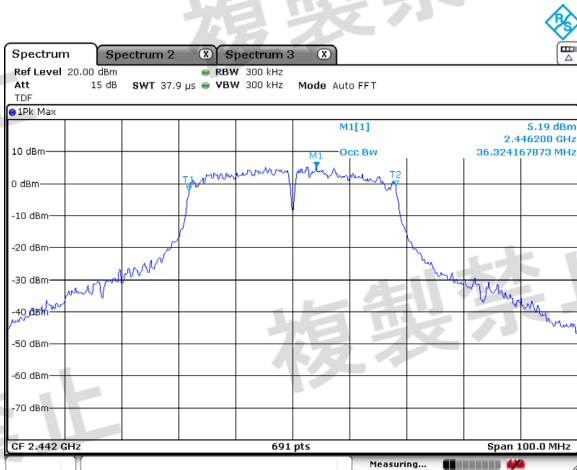
■ 802.11n(HT40)

99% Occupied Bandwidth

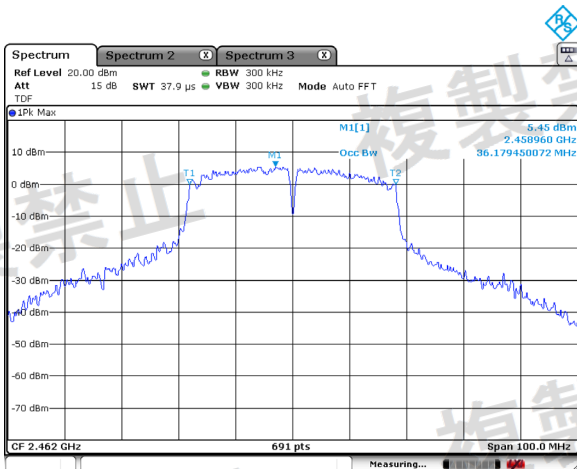
CH Low



CH Middle

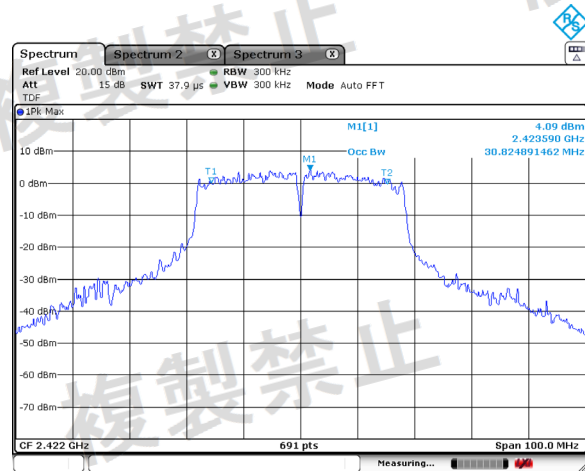


CH High

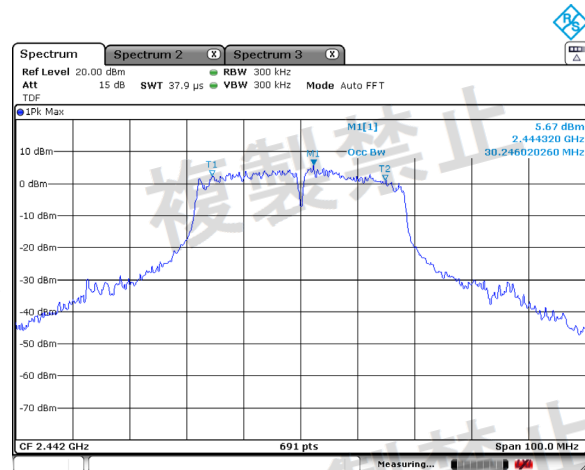


Spread Bandwidth

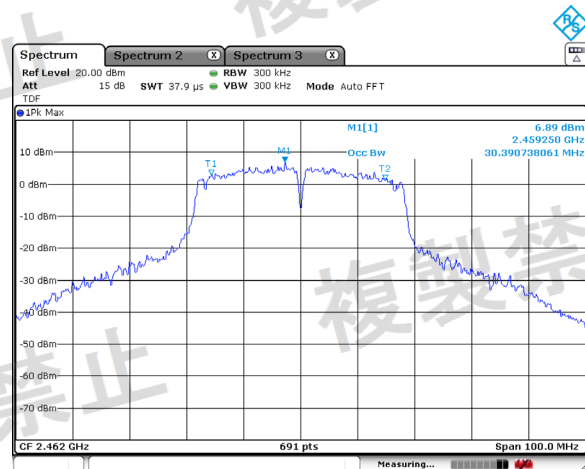
CH Low



CH Middle



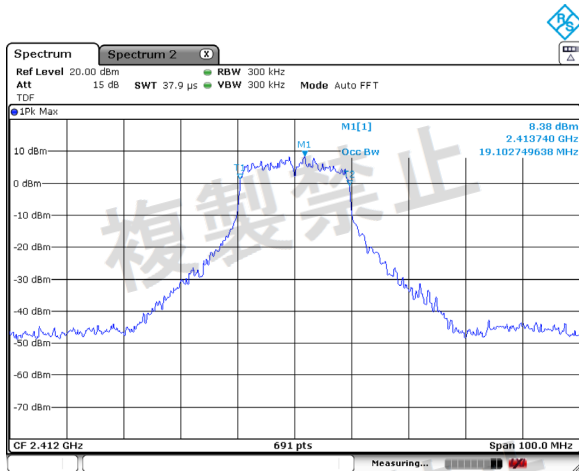
CH High



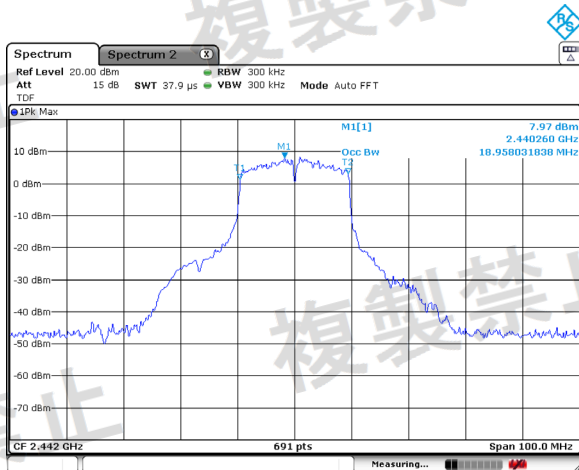
802.11ax(HE20)

99% Occupied Bandwidth

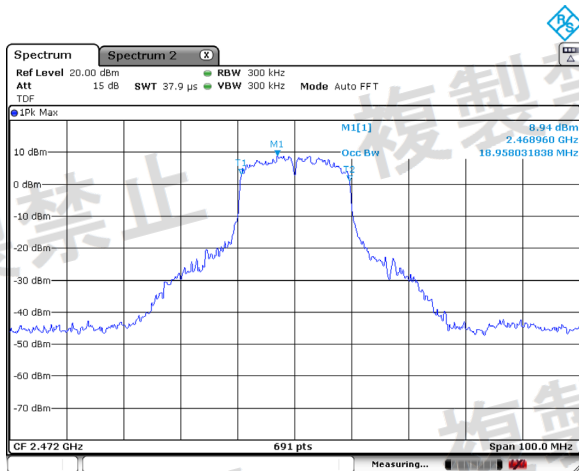
CH Low



CH Middle

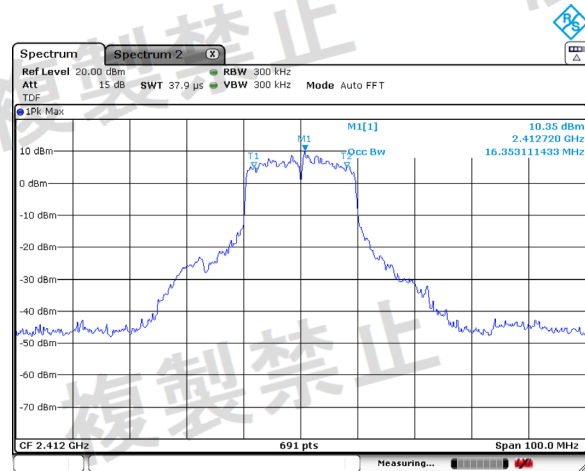


CH High

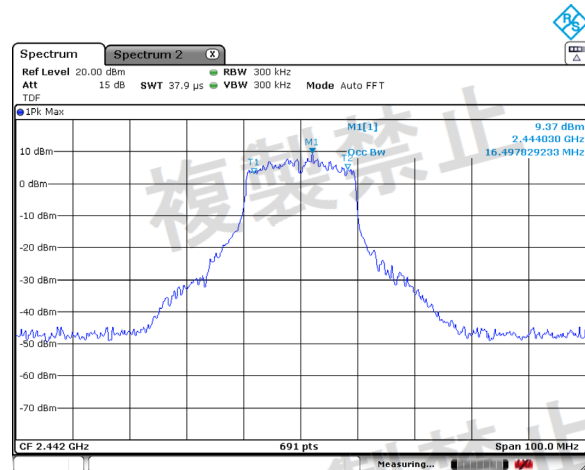


Spread Bandwidth

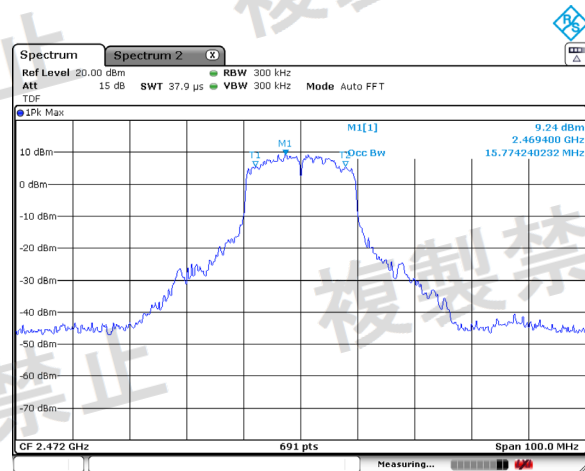
CH Low



CH Middle



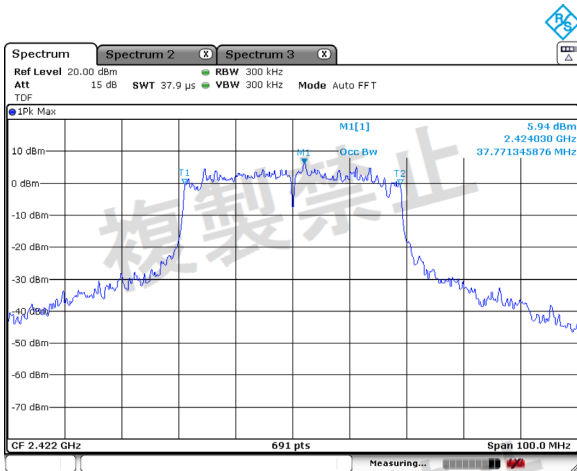
CH High



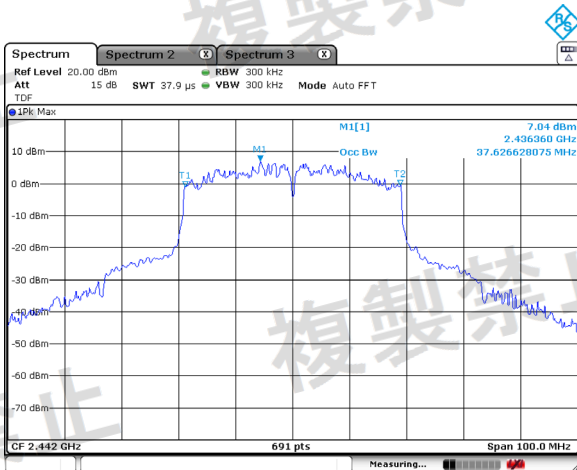
802.11ax(HE40)

99% Occupied Bandwidth

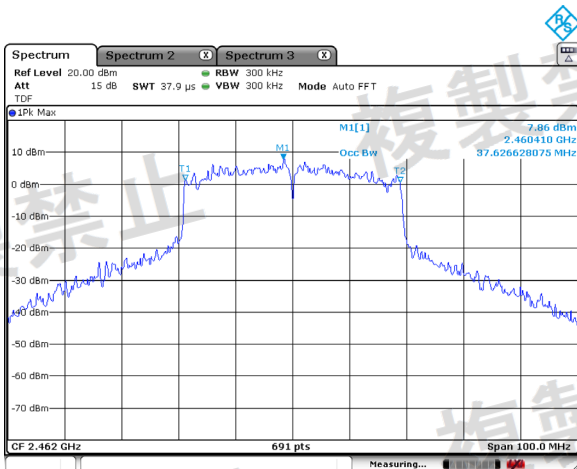
CH Low



CH Middle

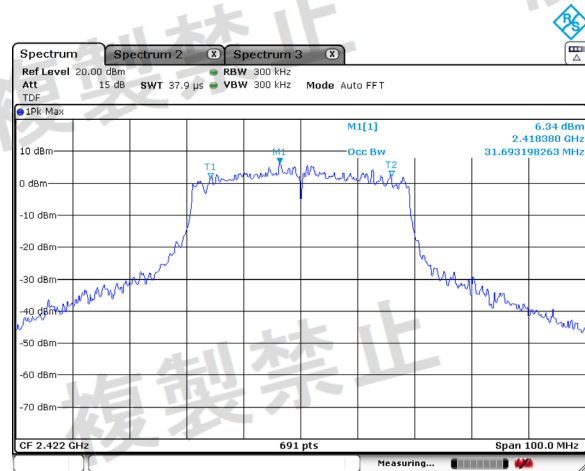


CH High

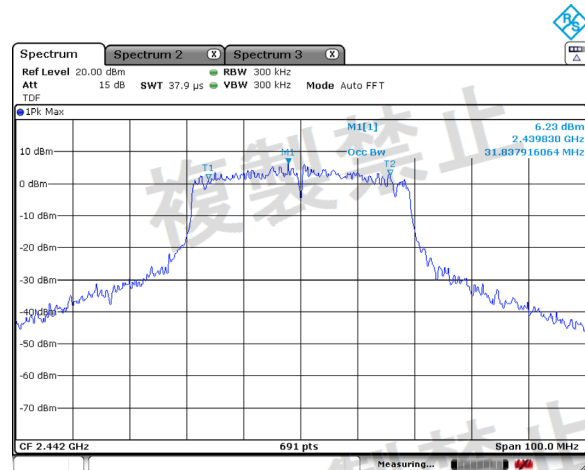


Spread Bandwidth

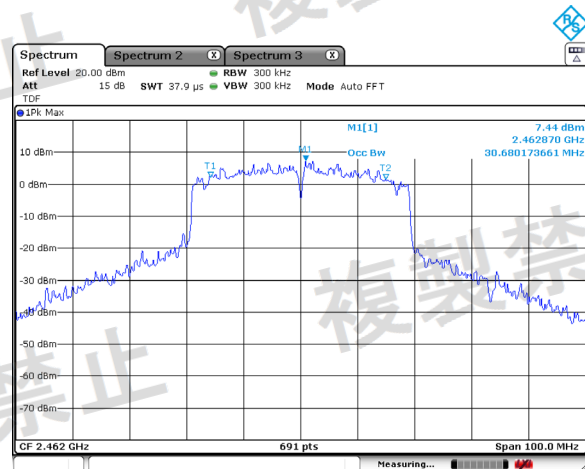
CH Low



CH Middle



CH High

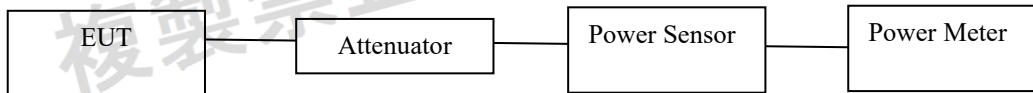


5.3 RF Output Power

5.3.1 Measurement Procedure

The transmitter output is connected to the Power meter.
Setting the EUT is operating frequency.

5.3.2 Test setup



5.3.3 Limit

10 mW/MHz or below (OFDM, DSSS)
5 mW/MHz or below ($26 \text{ MHz} < \text{OBW} \leq 40 \text{ MHz}$)
10 mW (Others)

5.3.4 Test environment conditions

• Ambient temperature : (20 ~ 22) °C • Relative Humidity : (46 ~ 49) % R.H.

5.3.5 Measurement Result

■802.11b

Frequency	Measure value		EIRP	Tolerance	Test results
[MHz]	[dBm/MHz]	[mW/MHz]	[dBm/MHz]	[%]	
2 412	5.35	3.43	8.51	-31.4	Compliance
2 442	6.01	3.99	9.17	-20.2	Compliance
2 472	5.44	3.50	8.60	-30.0	Compliance
Declared power [mW/MHz]			5		
Declared EIRP [dBm/MHz]			10.15		
Tolerance limit [%]			-80 ~ 20		
Antenna gain [dBi]			3.16		

■802.11g

Frequency	Measure value		EIRP	Tolerance	Test results
[MHz]	[dBm/MHz]	[mW/MHz]	[dBm/MHz]	[%]	
2 412	5.40	3.47	8.56	-30.6	Compliance
2 442	5.51	3.56	8.67	-28.8	Compliance
2 472	5.69	3.71	8.85	-25.8	Compliance
Declared power [mW/MHz]			5		
Declared EIRP [dBm/MHz]			10.15		
Tolerance limit [%]			-80 ~ 20		
Antenna gain [dBi]			3.16		

■802.11n(HT20)

Frequency	Measure value		EIRP	Tolerance	Test results
[MHz]	[dBm/MHz]	[mW/MHz]	[dBm/MHz]	[%]	
2 412	4.69	2.94	7.85	-41.2	Compliance
2 442	5.31	3.40	8.47	-32.0	Compliance
2 472	4.95	3.13	8.11	-37.4	Compliance
Declared power [mW/MHz]			5		
Declared EIRP [dBm/MHz]			10.15		
Tolerance limit [%]			-80 ~ 20		
Antenna gain [dBi]			3.16		

■802.11n(HT40)

Frequency	Measure value		EIRP	Tolerance	Test results
[MHz]	[dBm/MHz]	[mW/MHz]	[dBm/MHz]	[%]	
2 422	1.67	1.47	4.83	-51.0	Compliance
2 442	1.98	1.58	5.14	-47.3	Compliance
2 462	3.27	2.12	6.43	-29.3	Compliance
Declared power [mW/MHz]			3		
Declared EIRP [dBm/MHz]			7.93		
Tolerance limit [%]			-80 ~ 20		
Antenna gain [dBi]			3.16		

■802.11ax(HE20)

Frequency	Measure value		EIRP	Tolerance	Test results
[MHz]	[dBm/MHz]	[mW/MHz]	[dBm/MHz]	[%]	
2 412	2.33	1.71	5.49	-65.8	Compliance
2 442	4.48	2.81	7.64	-43.8	Compliance
2 472	5.56	3.60	8.72	-28.0	Compliance
Declared power [mW/MHz]			5		
Declared EIRP [dBm/MHz]			10.15		
Tolerance limit [%]			-80 ~ 20		
Antenna gain [dBi]			3.16		

■802.11ax(HE40)

Frequency	Measure value		EIRP	Tolerance	Test results
[MHz]	[dBm/MHz]	[mW/MHz]	[dBm/MHz]	[%]	
2 422	1.71	1.48	4.87	-50.7	Compliance
2 442	1.71	1.48	4.87	-50.7	Compliance
2 462	3.33	2.15	6.49	-28.3	Compliance
Declared power [mW/MHz]			3		
Declared EIRP [dBm/MHz]			7.93		
Tolerance limit [%]			-80 ~ 20		
Antenna gain [dBi]			3.16		

Power tolerance (%) = [(Measure value – Declared power) / Declared power] x 100

5.4 Unwanted (Spurious) Emission Strength

5.4.1 Measurement Procedure

Connect transmitter output to the spectrum analyzer input port.

Unwanted(Spurious) emission strength is measured by following setting:

Set the spectrum analyzer RBW: 1 MHz, VBW: Same as RBW, Sweep time: auto
Start: 30 MHz, Stop: 2 387 MHz. Sweep mode: auto and mark highest level.

Set the spectrum analyzer RBW: 1 MHz, VBW: Same as RBW, Sweep time: auto
Start: 2 387 MHz, Stop: 2 400 MHz. Sweep mode: auto and mark highest level.

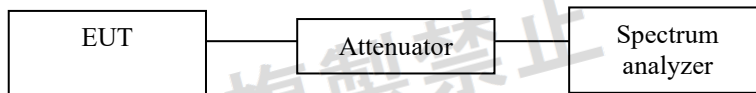
Set the spectrum analyzer RBW: 1 MHz, VBW: Same as RBW, Sweep time: auto
Start: 2 483.5 MHz, Stop: 2 496.5 MHz. Sweep mode: auto and mark highest level.

Set the spectrum analyzer RBW: RBW: 1 MHz, VBW: Same as RBW, Sweep time: auto
Start: 2 496.5 MHz, Stop: 12.5 GHz. Sweep mode: auto and mark highest level.

Detector mode : Positive Peak

Trace mode: Max hold

5.4.2 Test setup



5.4.3 Limit

30 MHz to 2 387 MHz: 2.5 $\mu\text{W}/\text{MHz}$
2 387 MHz to 2 400 MHz: 25 $\mu\text{W}/\text{MHz}$
2 483.5 MHz to 2 496.5 MHz: 25 $\mu\text{W}/\text{MHz}$
2 496.5 MHz to 12.5 GHz: 2.5 $\mu\text{W}/\text{MHz}$

5.4.4 Test environment conditions

• Ambient temperature : (20 ~ 22) °C • Relative Humidity : (46 ~ 49) % R.H.

5.4.5 Measurement Result

■802.11b

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm/MHz]	[uW/MHz]	[uW/MHz]	
Low Channel [2 412 MHz]					
30 ~ 2 387	2 385.30	-40.92	0.081	2.5	Compliance
2 387 ~ 2 400	2 397.30	-23.29	4.688	25	Compliance
2 483.5 ~ 2 496.5	2 488.19	-44.75	0.033	25	Compliance
2 496.5 ~ 12 500	4 820.50	-27.04	1.977	2.5	Compliance
Middle Channel [2 442 MHz]					
30 ~ 2 387	2 378.50	-46.07	0.025	2.5	Compliance
2 387 ~ 2 400	2 397.98	-41.48	0.071	25	Compliance
2 483.5 ~ 2 496.5	2 484.41	-40.85	0.082	25	Compliance
2 496.5 ~ 12 500	4 877.50	-26.76	2.109	2.5	Compliance
High Channel [2 472 MHz]					
30 ~ 2 387	1 481.40	-47.38	0.018	2.5	Compliance
2 387 ~ 2 400	2 391.39	-44.86	0.033	25	Compliance
2 483.5 ~ 2 496.5	2 486.76	-23.61	4.355	25	Compliance
2 496.5 ~ 12 500	4 950.50	-26.95	2.018	2.5	Compliance

■802.11g

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm/MHz]	[uW/MHz]	[uW/MHz]	
Low Channel [2 412 MHz]					
30 ~ 2 387	2 313.70	-52.52	0.006	2.5	Compliance
2 387 ~ 2 400	2 399.99	-24.96	3.192	25	Compliance
2 483.5 ~ 2 496.5	2 484.36	-55.58	0.003	25	Compliance
2 496.5 ~ 12 500	10 350.50	-50.14	0.010	2.5	Compliance
Middle Channel [2 442 MHz]					
30 ~ 2 387	2 197.70	-51.69	0.007	2.5	Compliance
2 387 ~ 2 400	2 396.30	-54.99	0.003	25	Compliance
2 483.5 ~ 2 496.5	2 483.74	-54.96	0.003	25	Compliance
2 496.5 ~ 12 500	11 334.50	-49.77	0.011	2.5	Compliance
High Channel [2 472 MHz]					
30 ~ 2 387	2 122.60	-53.55	0.004	2.5	Compliance
2 387 ~ 2 400	2 388.44	-55.91	0.003	25	Compliance
2 483.5 ~ 2 496.5	2 483.51	-32.49	0.564	25	Compliance
2 496.5 ~ 12 500	12 101.50	-49.64	0.011	2.5	Compliance

■802.11n(HT20)

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm/MHz]	[uW/MHz]	[uW/MHz]	
Low Channel [2 412 MHz]					
30 ~ 2 387	2 385.30	-33.06	0.494	2.5	Compliance
2 387 ~ 2 400	2 400.00	-16.64	21.677	25	Compliance
2 483.5 ~ 2 496.5	2 493.91	-39.91	0.102	25	Compliance
2 496.5 ~ 12 500	4 820.50	-31.18	0.762	2.5	Compliance
Middle Channel [2 442 MHz]					
30 ~ 2 387	2 310.30	-35.31	0.294	2.5	Compliance
2 387 ~ 2 400	2 388.74	-38.06	0.156	25	Compliance
2 483.5 ~ 2 496.5	2 484.22	-36.61	0.218	25	Compliance
2 496.5 ~ 12 500	4 877.50	-30.80	0.832	2.5	Compliance
High Channel [2 472 MHz]					
30 ~ 2 387	2 259.10	-40.24	0.095	2.5	Compliance
2 387 ~ 2 400	2 391.73	-39.79	0.105	25	Compliance
2 483.5 ~ 2 496.5	2 483.50	-16.74	21.184	25	Compliance
2 496.5 ~ 12 500	4 935.50	-29.84	1.038	2.5	Compliance

■802.11n(HT40)

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm/MHz]	[uW/MHz]	[uW/MHz]	
Low Channel [2 422 MHz]					
30 ~ 2 387	2 385.30	-29.44	1.138	2.5	Compliance
2 387 ~ 2 400	2 400.00	-19.09	12.331	25	Compliance
2 483.5 ~ 2 496.5	2 483.51	-45.32	0.029	25	Compliance
2 496.5 ~ 12 500	4 848.50	-33.93	0.405	2.5	Compliance
Middle Channel [2 442 MHz]					
30 ~ 2 387	2 211.30	-38.53	0.140	2.5	Compliance
2 387 ~ 2 400	2 396.96	-24.37	3.656	25	Compliance
2 483.5 ~ 2 496.5	2 485.82	-29.31	1.172	25	Compliance
2 496.5 ~ 12 500	4 877.50	-34.33	0.369	2.5	Compliance
High Channel [2 462 MHz]					
30 ~ 2 387	2 361.40	-32.74	0.532	2.5	Compliance
2 387 ~ 2 400	2 397.55	-41.57	0.070	25	Compliance
2 483.5 ~ 2 496.5	2 483.50	-18.78	13.243	25	Compliance
2 496.5 ~ 12 500	2 503.50	-26.90	2.042	2.5	Compliance

■802.11ax(HE20)

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm/MHz]	[uW/MHz]	[uW/MHz]	
Low Channel [2 412 MHz]					
30 ~ 2 387	2 385.30	-30.48	0.895	2.5	Compliance
2 387 ~ 2 400	2 400.00	-16.34	23.227	25	Compliance
2 483.5 ~ 2 496.5	2 487.86	-46.43	0.023	25	Compliance
2 496.5 ~ 12 500	4 820.50	-32.51	0.561	2.5	Compliance
Middle Channel [2 442 MHz]					
30 ~ 2 387	2 337.50	-35.65	0.272	2.5	Compliance
2 387 ~ 2 400	2 399.99	-42.02	0.063	25	Compliance
2 483.5 ~ 2 496.5	2 491.98	-43.51	0.045	25	Compliance
2 496.5 ~ 12 500	4 877.50	-32.19	0.604	2.5	Compliance
High Channel [2 472 MHz]					
30 ~ 2 387	2 235.20	-42.92	0.051	2.5	Compliance
2 387 ~ 2 400	2 389.08	-42.79	0.053	25	Compliance
2 483.5 ~ 2 496.5	2 483.50	-16.39	22.961	25	Compliance
2 496.5 ~ 12 500	4 950.50	-30.25	0.944	2.5	Compliance

■802.11ax(HE40)

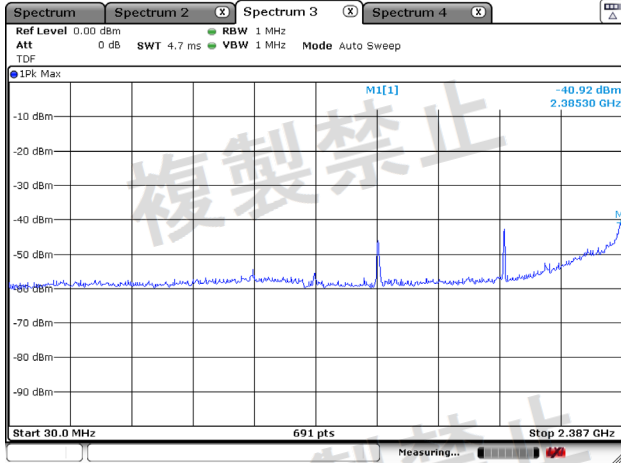
Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm/MHz]	[uW/MHz]	[uW/MHz]	
Low Channel [2 422 MHz]					
30 ~ 2 387	2 385.30	-29.33	1.167	2.5	Compliance
2 387 ~ 2 400	2 400.00	-20.82	8.279	25	Compliance
2 483.5 ~ 2 496.5	2 483.51	-44.43	0.036	25	Compliance
2 496.5 ~ 12 500	4 848.50	-33.96	0.402	2.5	Compliance
Middle Channel [2 442 MHz]					
30 ~ 2 387	2 358.00	-36.92	0.203	2.5	Compliance
2 387 ~ 2 400	2 399.99	-25.03	3.141	25	Compliance
2 483.5 ~ 2 496.5	2 483.64	-25.89	2.576	25	Compliance
2 496.5 ~ 12 500	4 877.50	-35.06	0.312	2.5	Compliance
High Channel [2 462 MHz]					
30 ~ 2 387	2 143.10	-37.42	0.181	2.5	Compliance
2 387 ~ 2 400	2 390.10	-41.12	0.077	25	Compliance
2 483.5 ~ 2 496.5	2 483.50	-20.54	8.831	25	Compliance
2 496.5 ~ 12 500	2 503.50	-27.50	1.778	2.5	Compliance

5.4.6 Test Plot

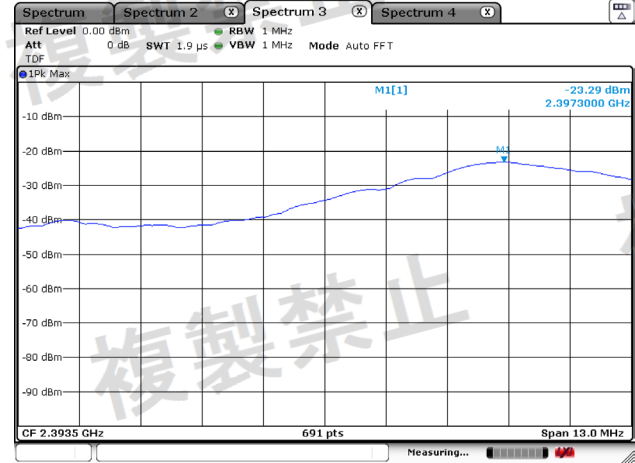
802.11b

CH Low

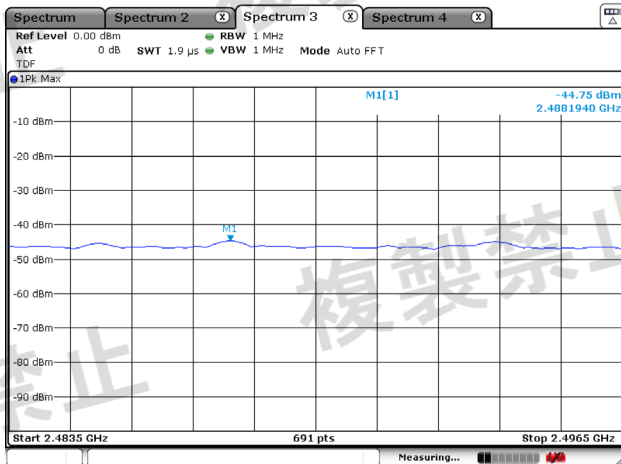
30 MHz ~ 2 387 MHz



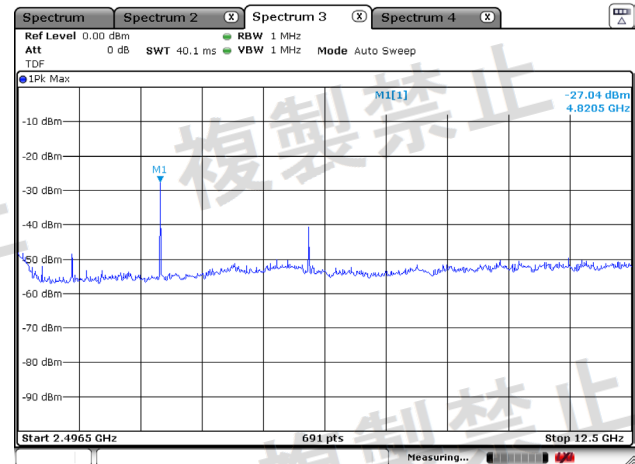
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz

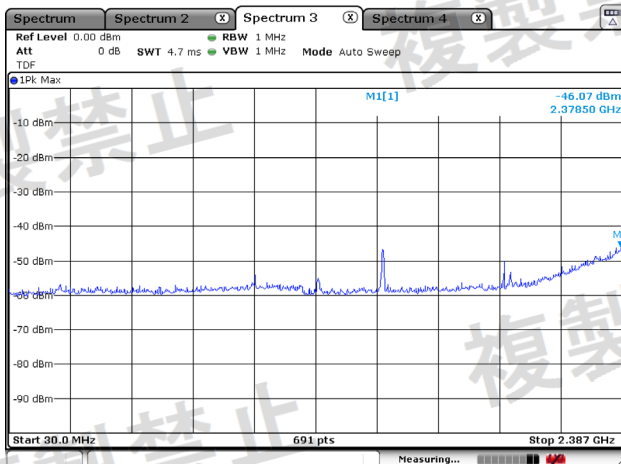


2 496.5 MHz ~ 12.5 GHz

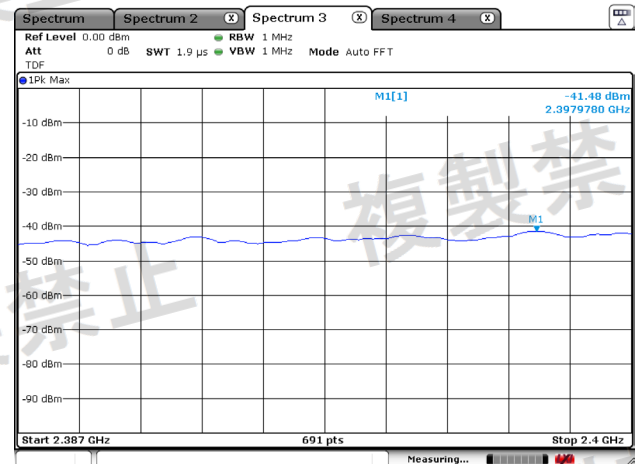


CH Mid

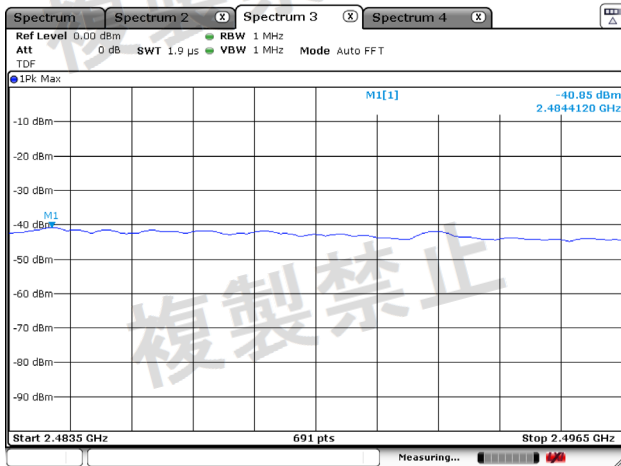
30 MHz ~ 2 387 MHz



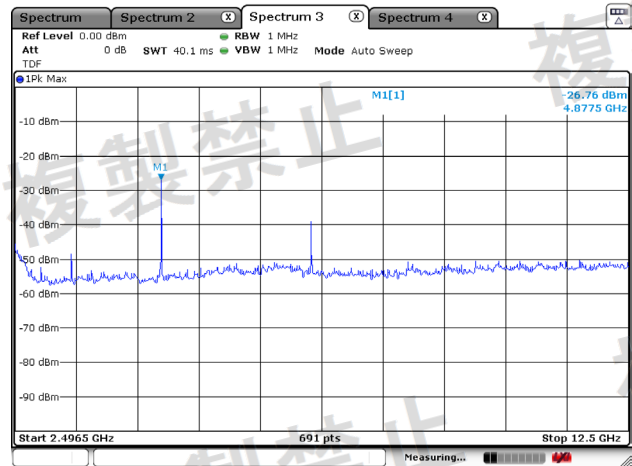
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz

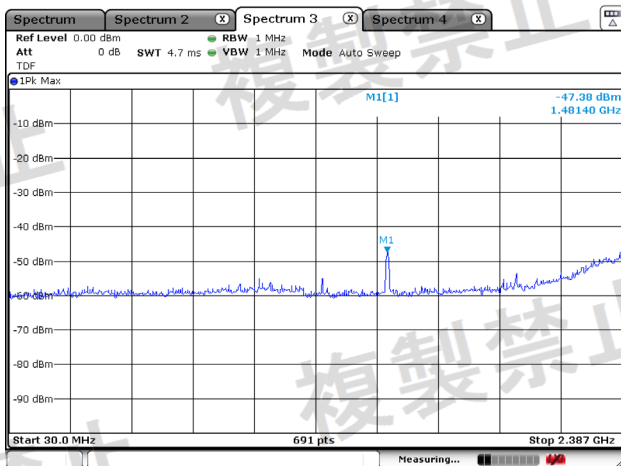


2 496.5 MHz ~ 12.5 GHz

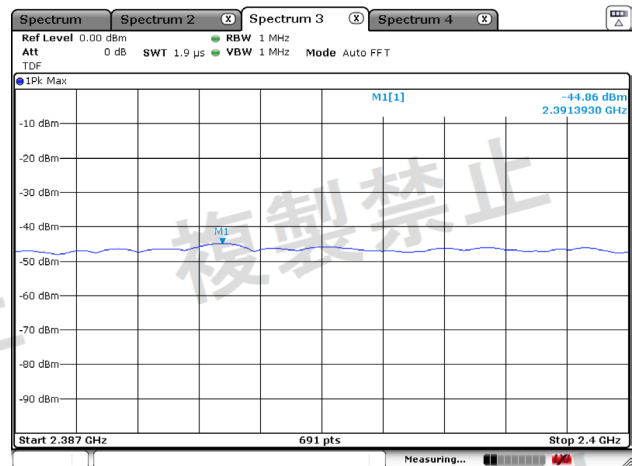


CH High

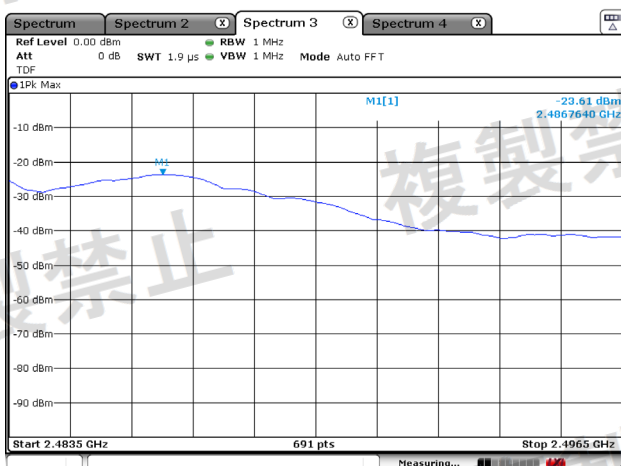
30 MHz ~ 2 387 MHz



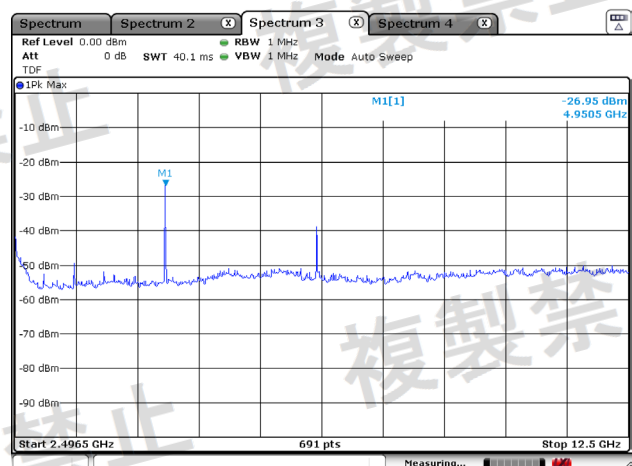
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz



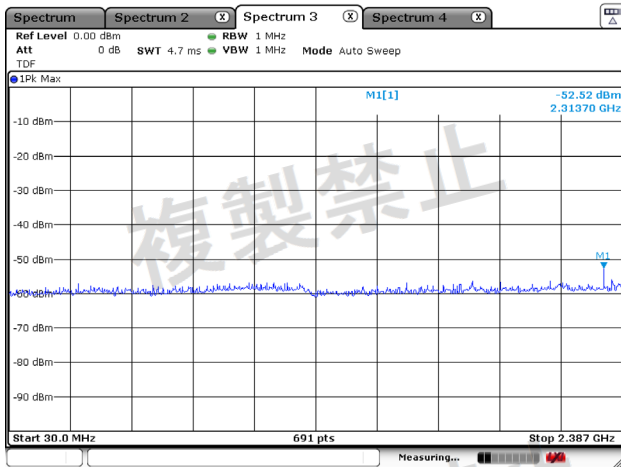
2 496.5 MHz ~ 12.5 GHz



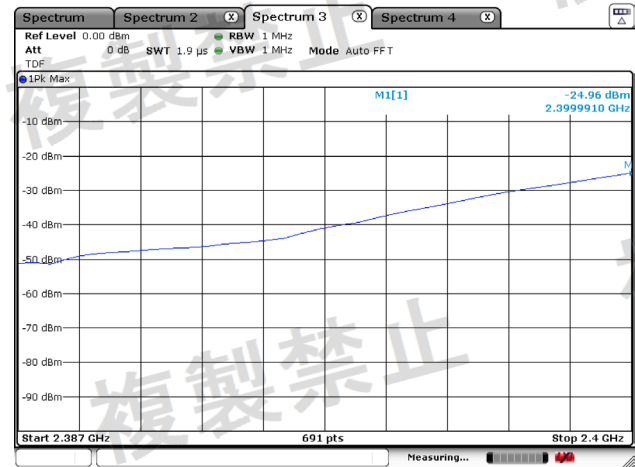
802.11g

CH Low

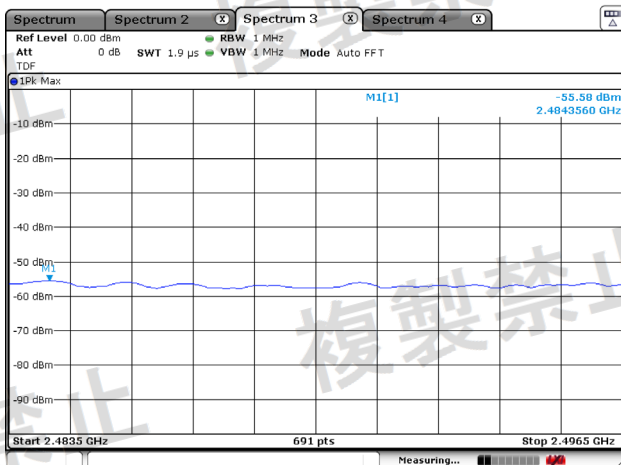
30 MHz ~ 2 387 MHz



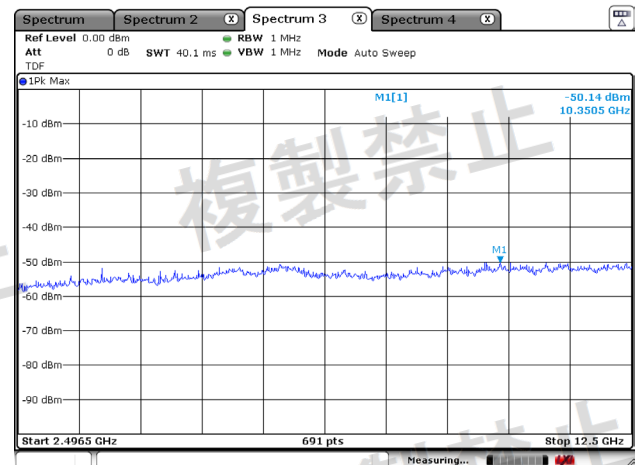
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz

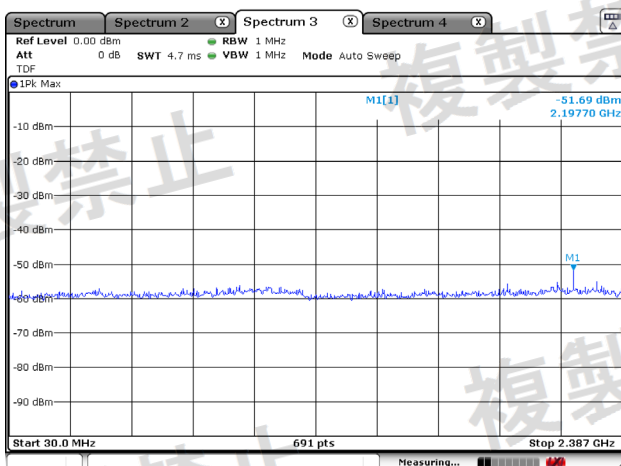


2 496.5 MHz ~ 12.5 GHz

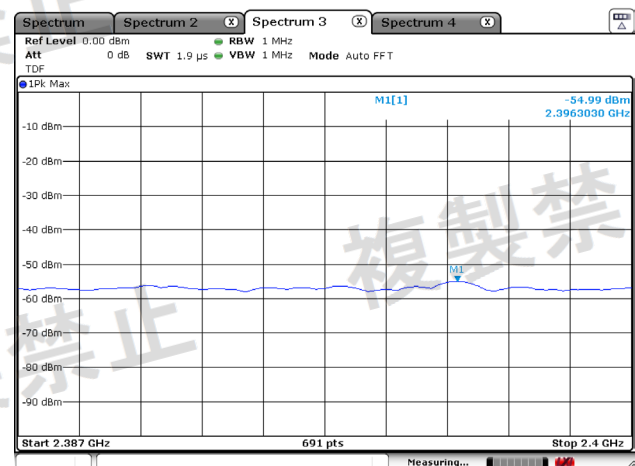


CH Mid

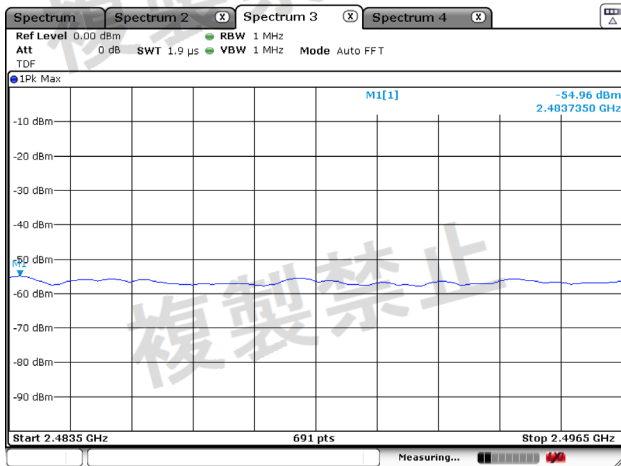
30 MHz ~ 2 387 MHz



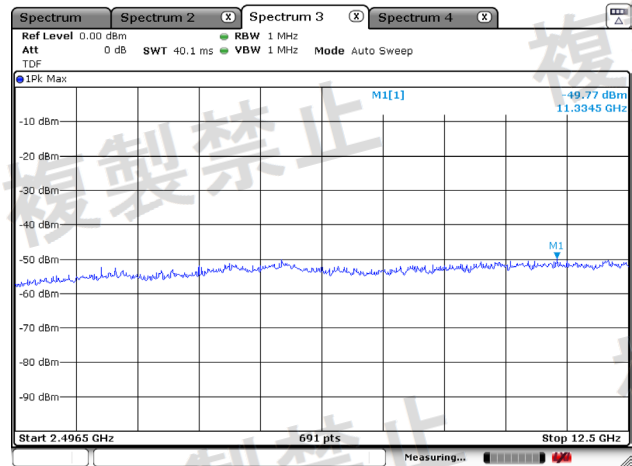
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz

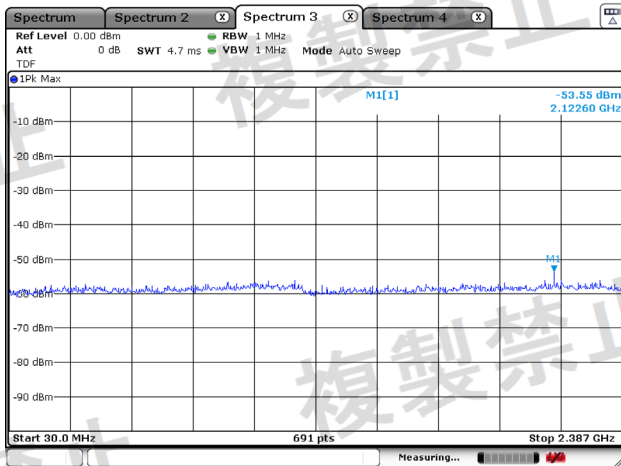


2 496.5 MHz ~ 12.5 GHz

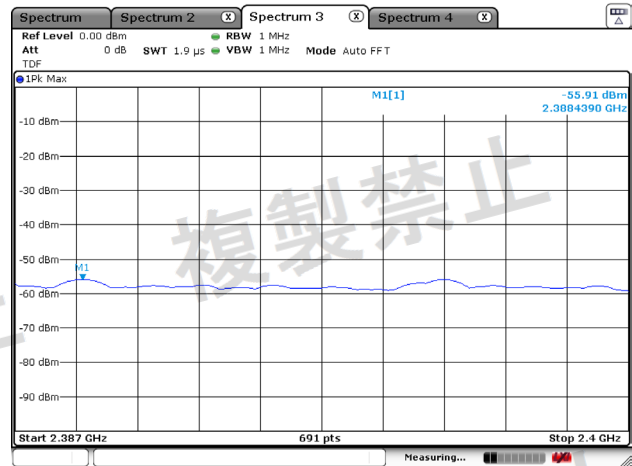


CH High

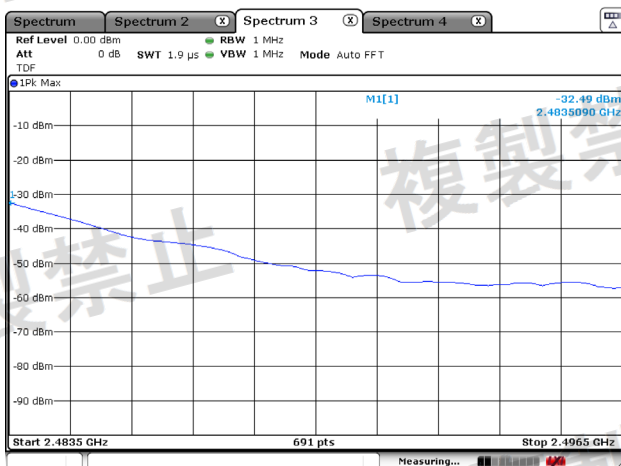
30 MHz ~ 2 387 MHz



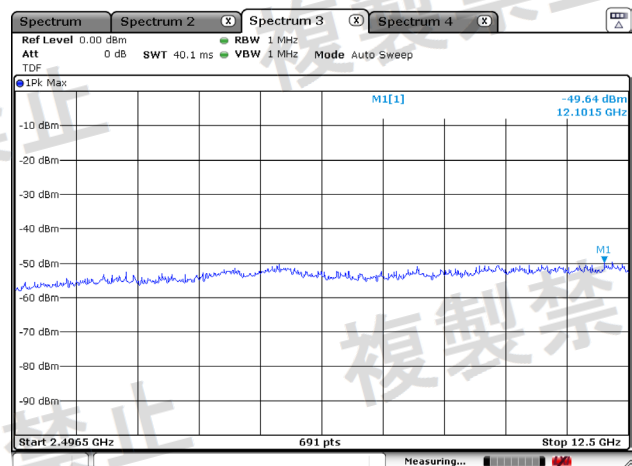
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz



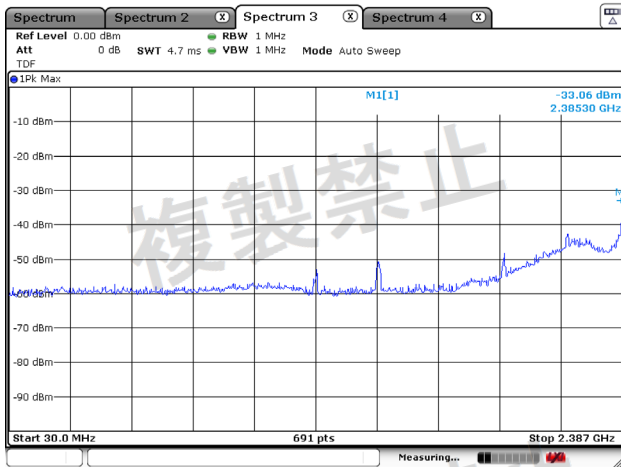
2 496.5 MHz ~ 12.5 GHz



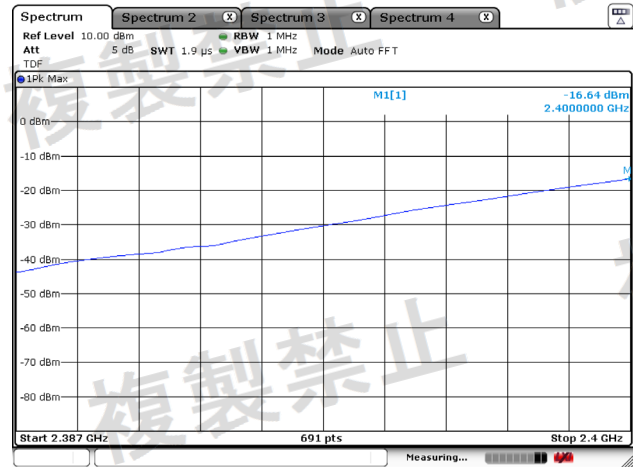
802.11n(HT20)

CH Low

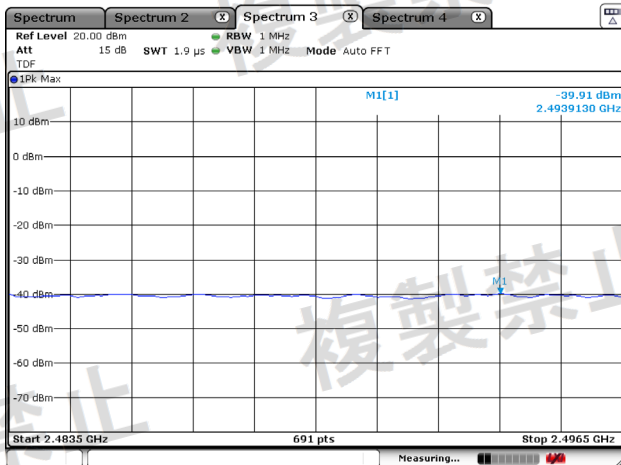
30 MHz ~ 2 387 MHz



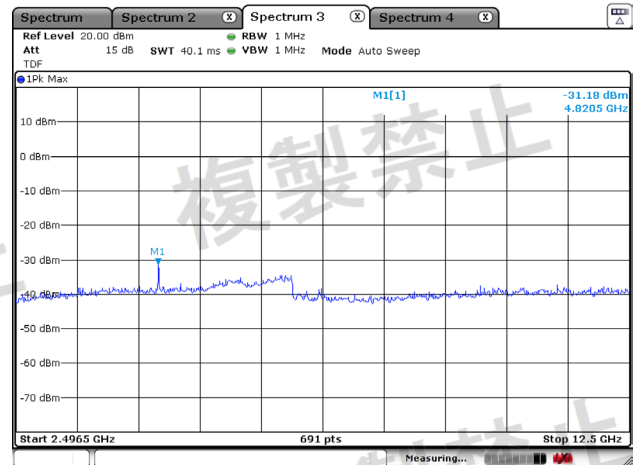
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz

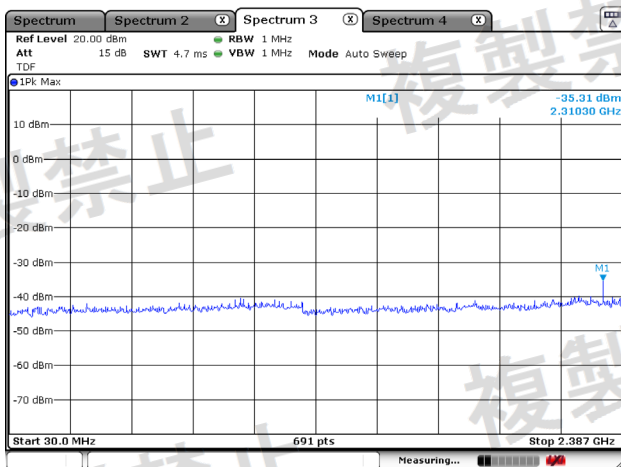


2 496.5 MHz ~ 12.5 GHz

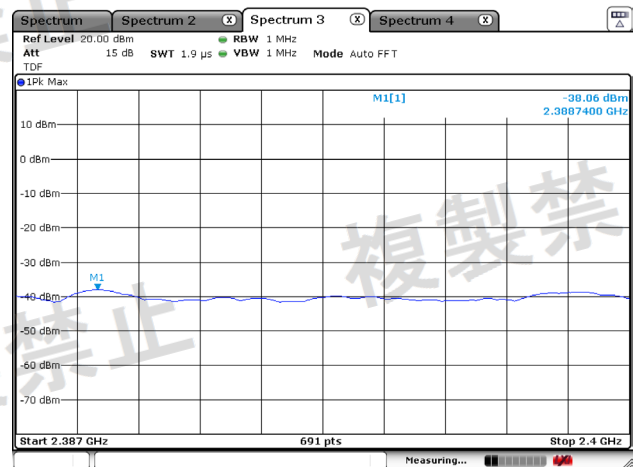


CH Mid

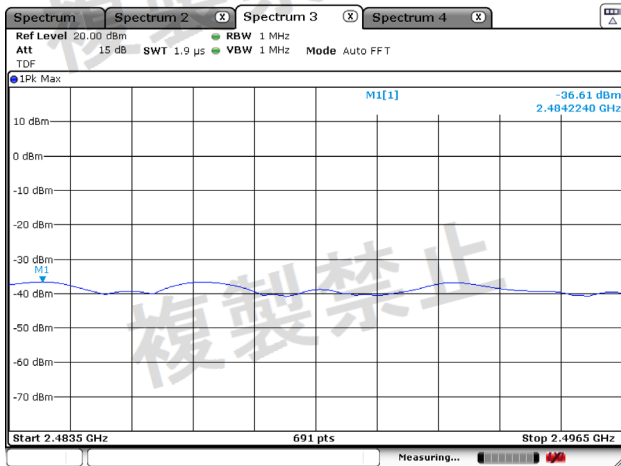
30 MHz ~ 2 387 MHz



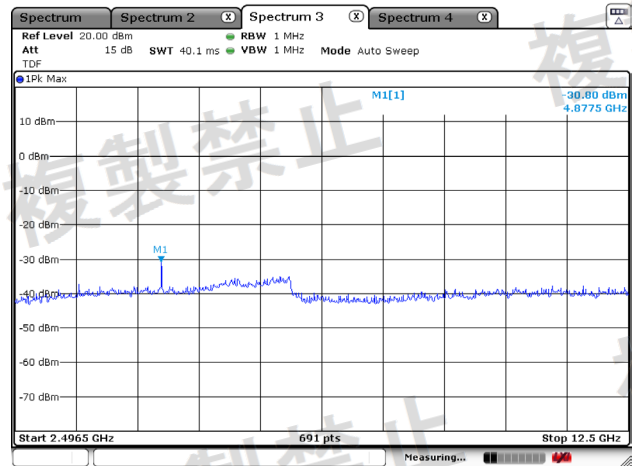
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz

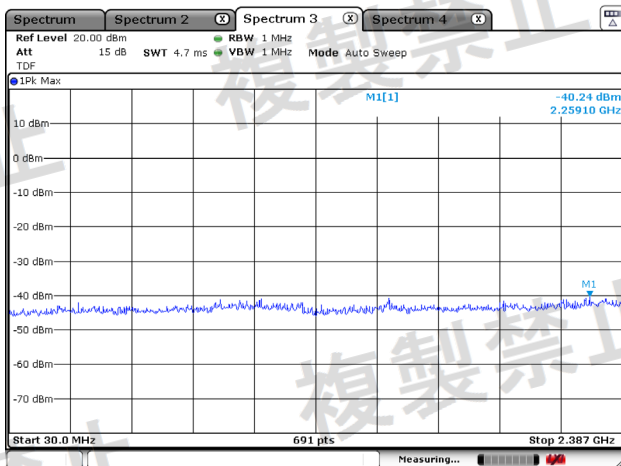


2 496.5 MHz ~ 12.5 GHz

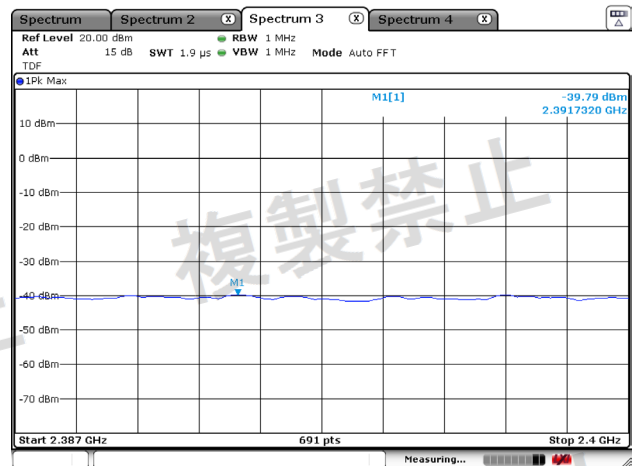


CH High

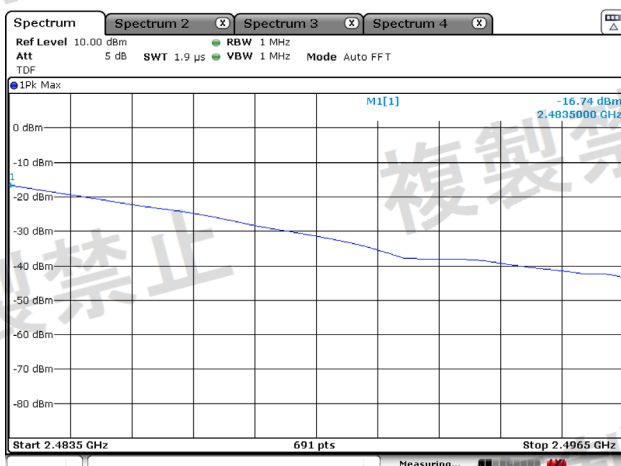
30 MHz ~ 2 387 MHz



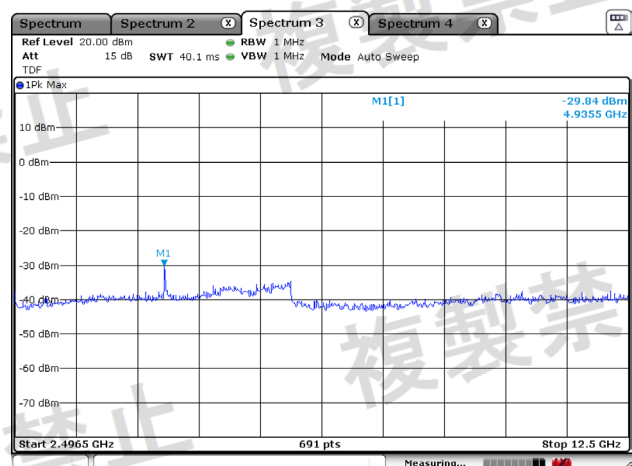
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz



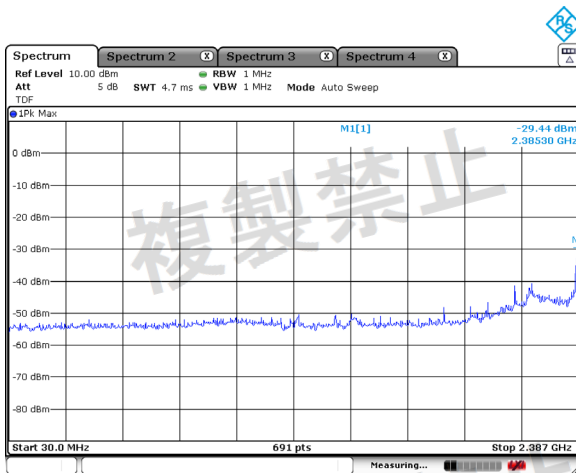
2 496.5 MHz ~ 12.5 GHz



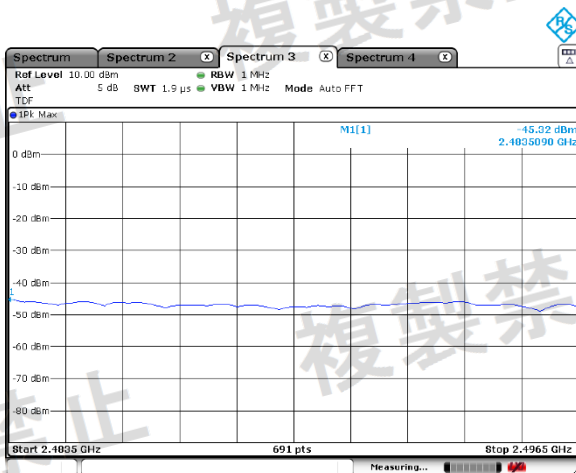
802.11n(HT40)

CH Low

30 MHz ~ 2 387 MHz

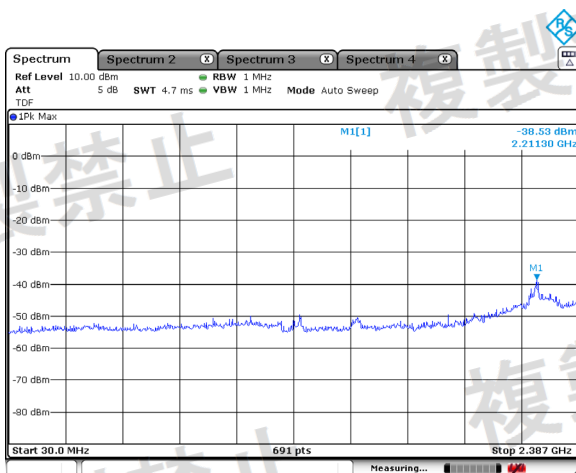


2 483.5 MHz ~ 2 496.5 MHz

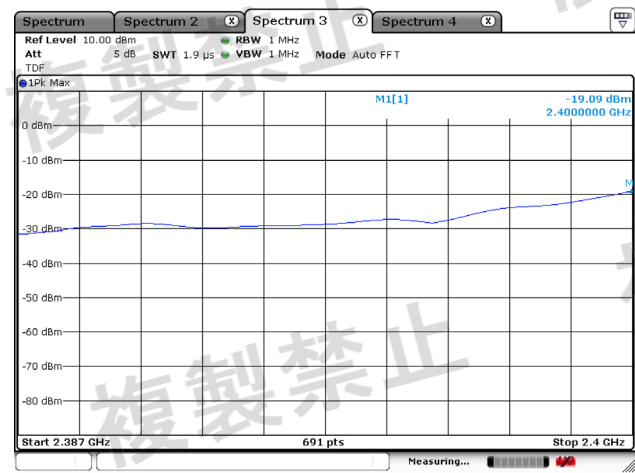


CH Mid

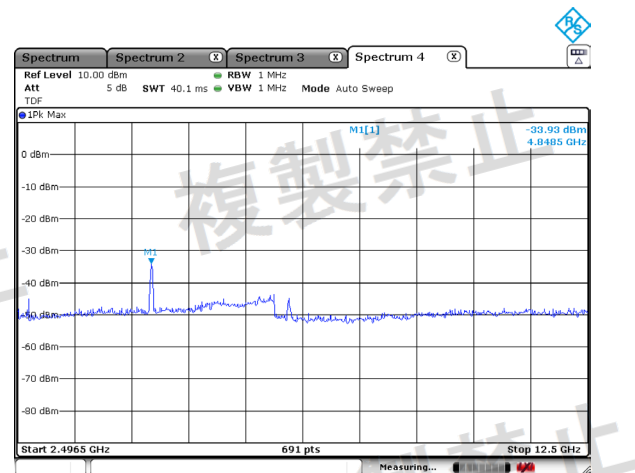
30 MHz ~ 2 387 MHz



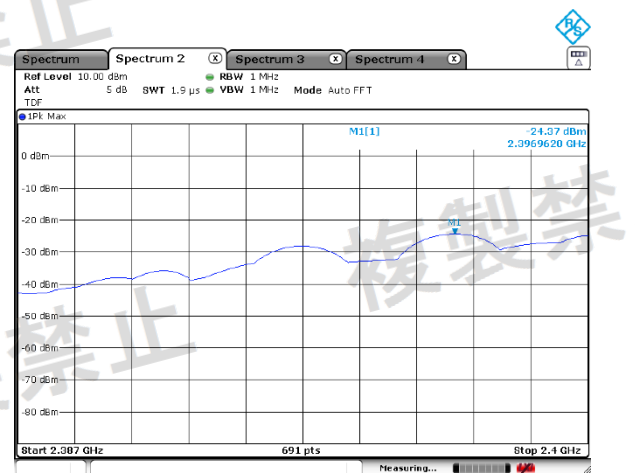
2 387 MHz ~ 2 400 MHz



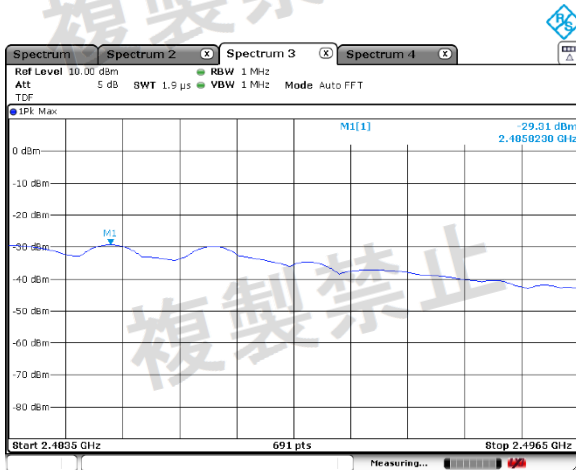
2 496.5 MHz ~ 12.5 GHz



2 387 MHz ~ 2 400 MHz

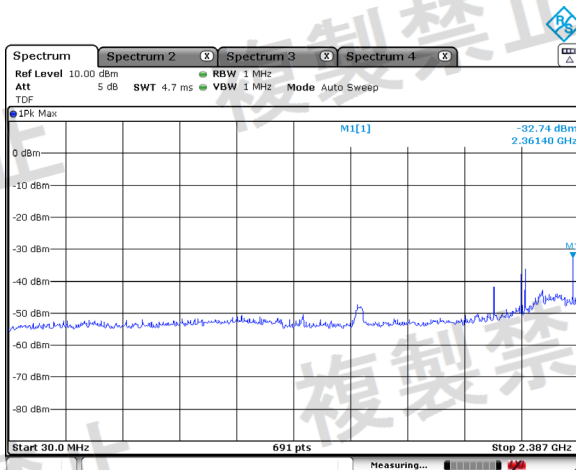


2 483.5 MHz ~ 2 496.5 MHz

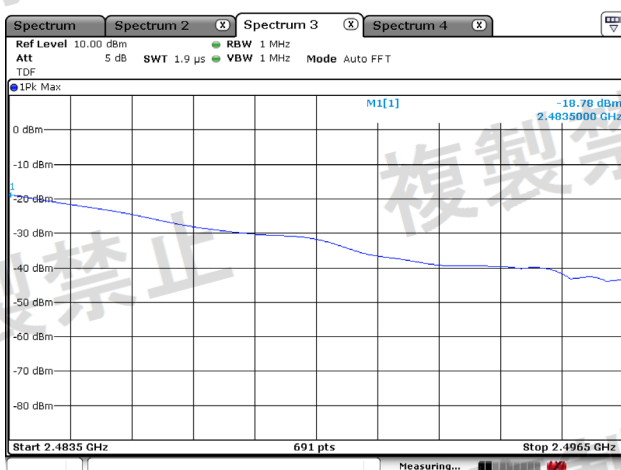


CH High

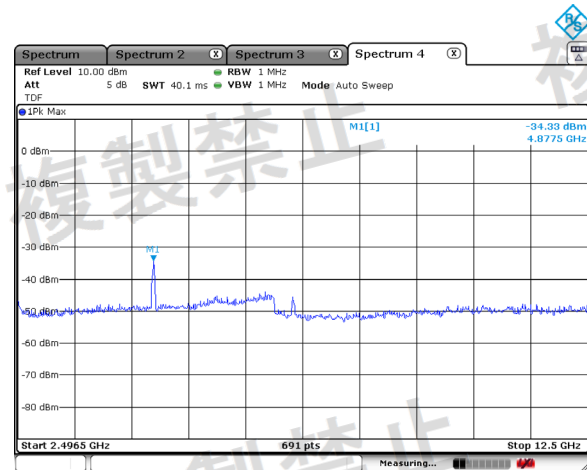
30 MHz ~ 2 387 MHz



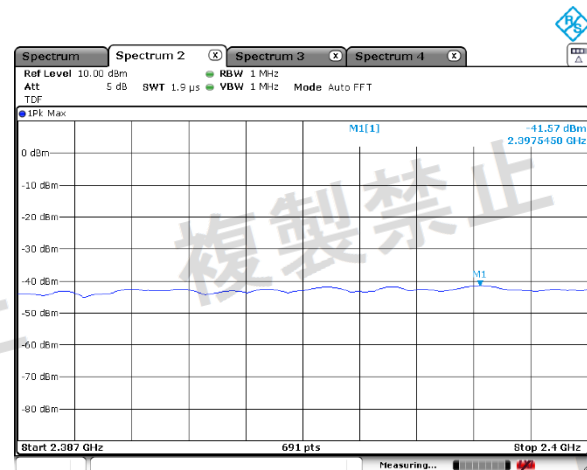
2 483.5 MHz ~ 2 496.5 MHz



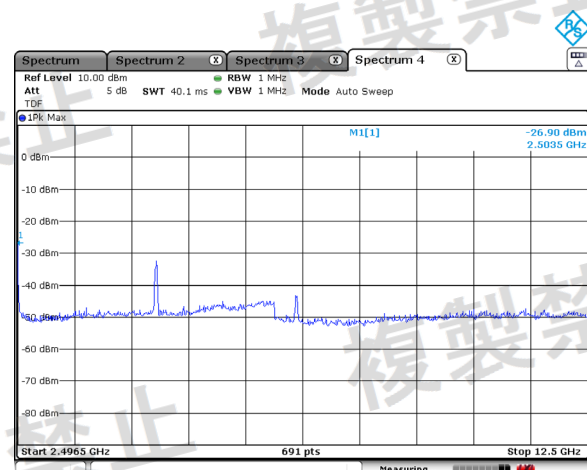
2 496.5 MHz ~ 12.5 GHz



2 387 MHz ~ 2 400 MHz



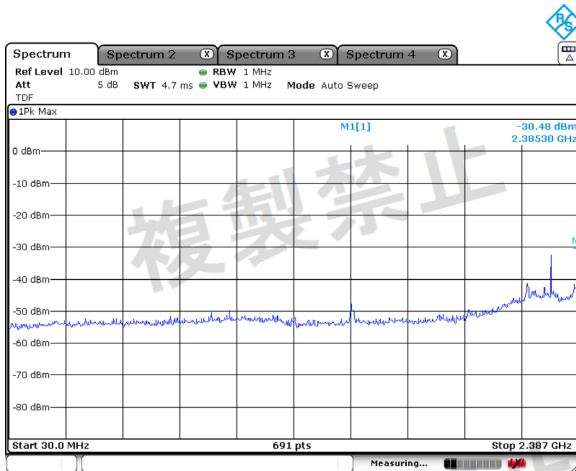
2 496.5 MHz ~ 12.5 GHz



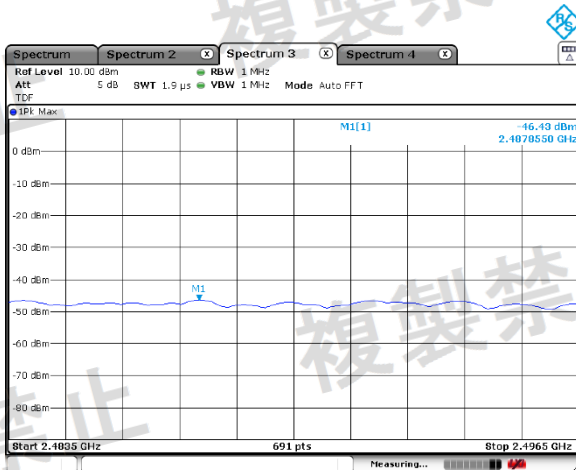
802.11ax(HE20)

CH Low

30 MHz ~ 2 387 MHz

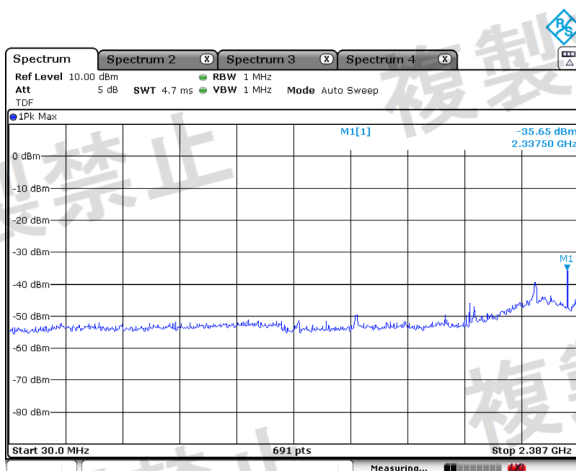


2 483.5 MHz ~ 2 496.5 MHz

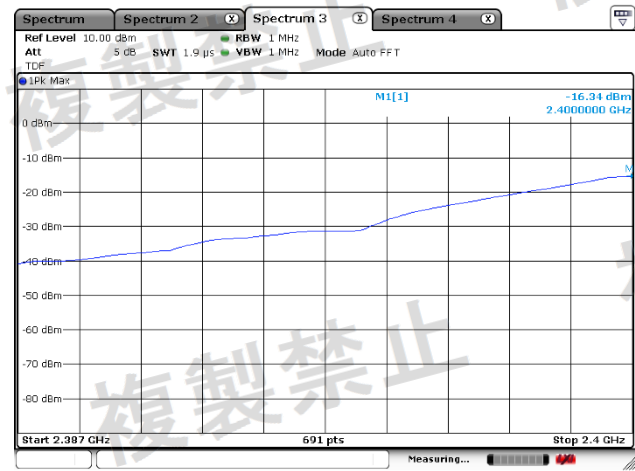


CH Mid

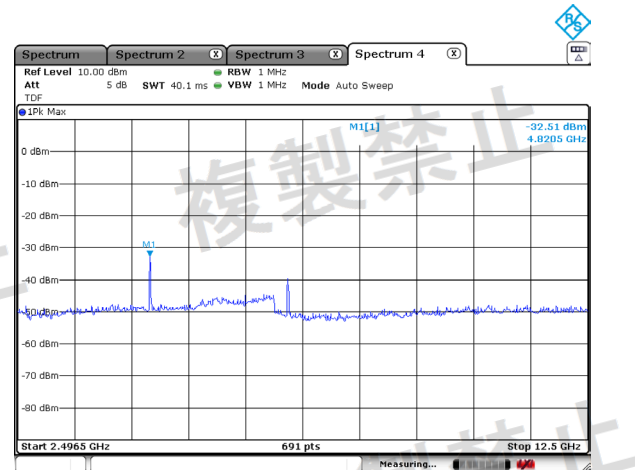
30 MHz ~ 2 387 MHz



2 387 MHz ~ 2 400 MHz



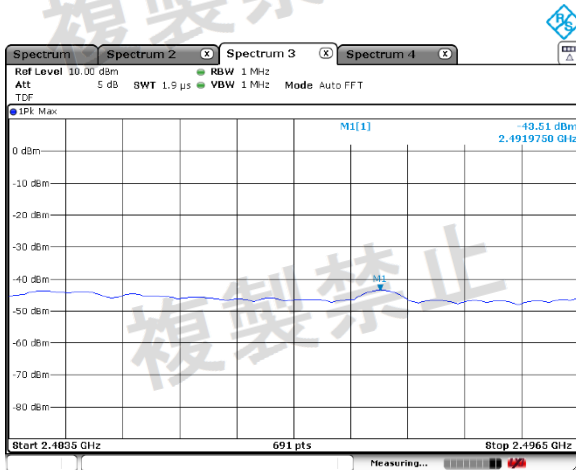
2 496.5 MHz ~ 12.5 GHz



2 387 MHz ~ 2 400 MHz

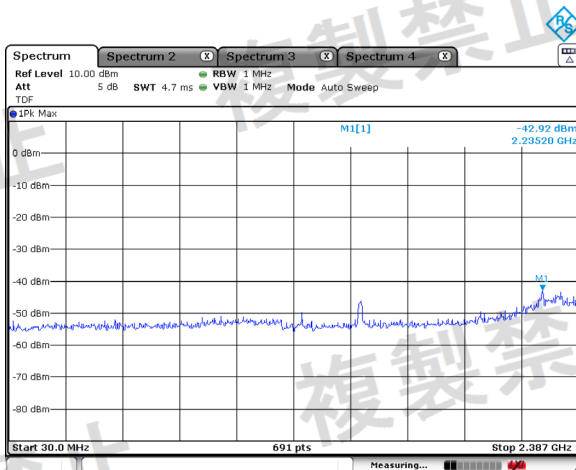


2 483.5 MHz ~ 2 496.5 MHz

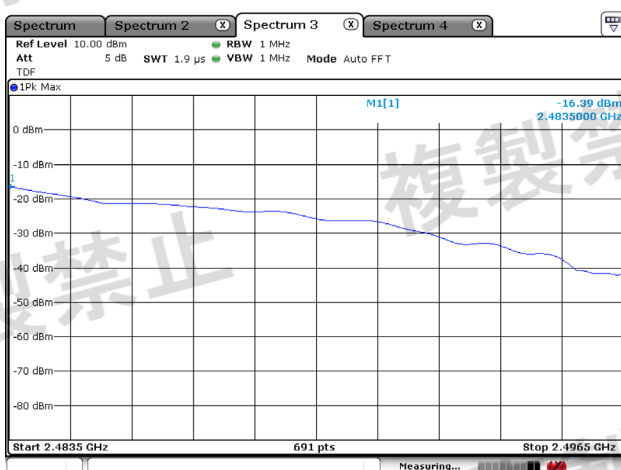


CH High

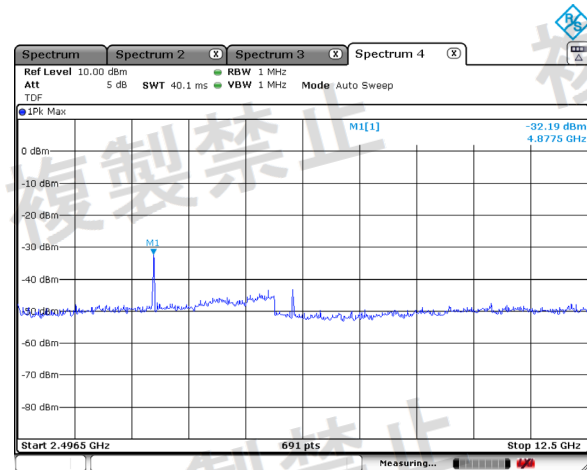
30 MHz ~ 2 387 MHz



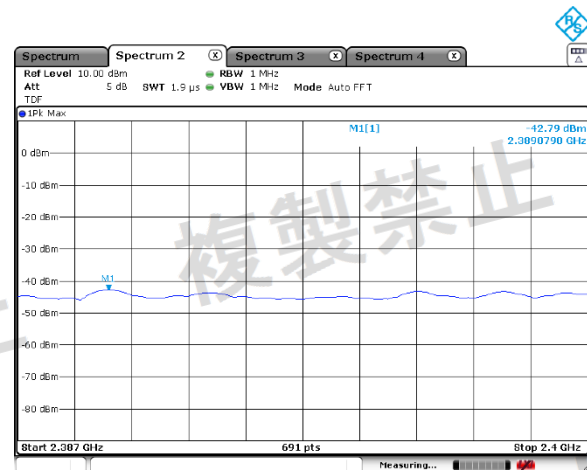
2 483.5 MHz ~ 2 496.5 MHz



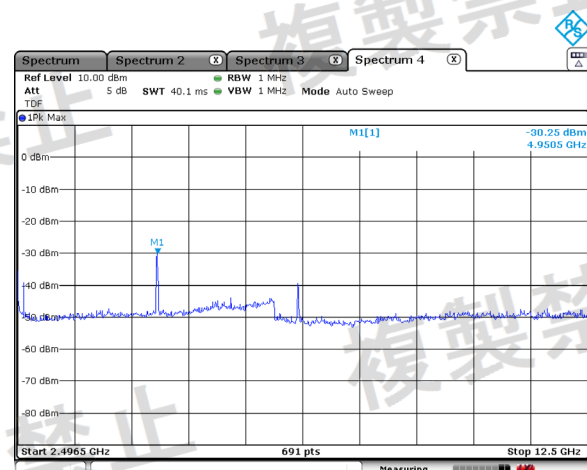
2 496.5 MHz ~ 12.5 GHz



2 387 MHz ~ 2 400 MHz



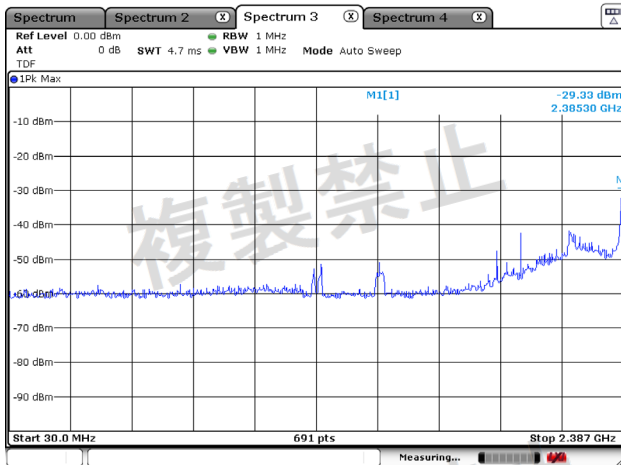
2 496.5 MHz ~ 12.5 GHz



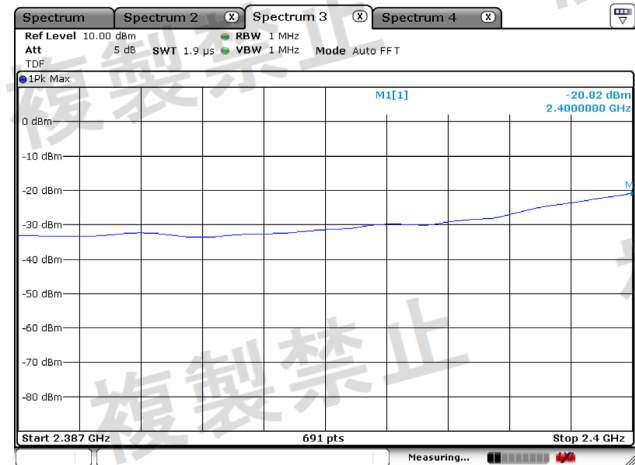
■ 802.11ax(HE40)

CH Low

30 MHz ~ 2 387 MHz



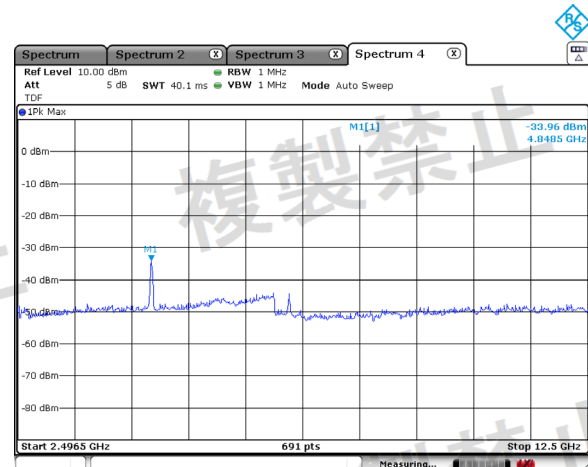
2 387 MHz ~ 2 400 MHz



2 483.5 MHz ~ 2 496.5 MHz

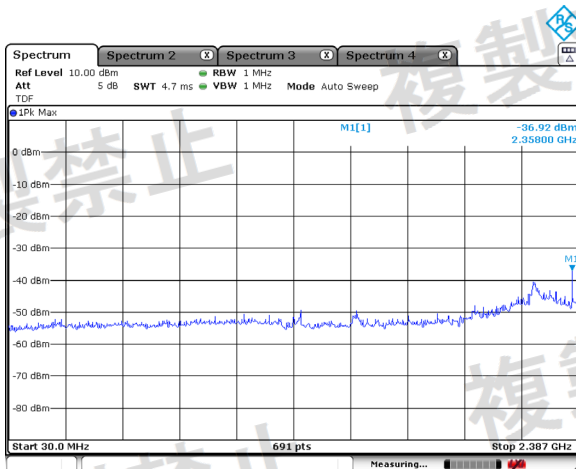


2 496.5 MHz ~ 12.5 GHz

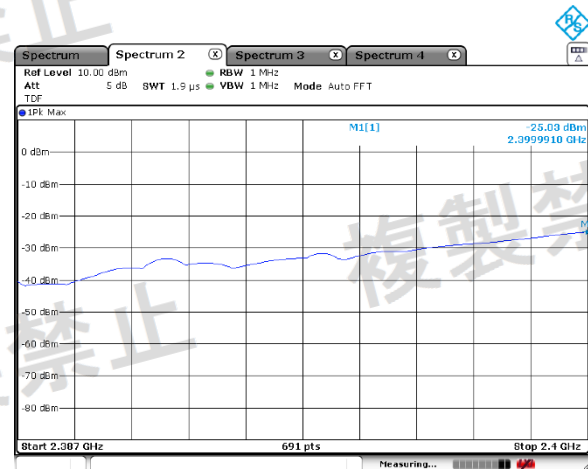


CH Mid

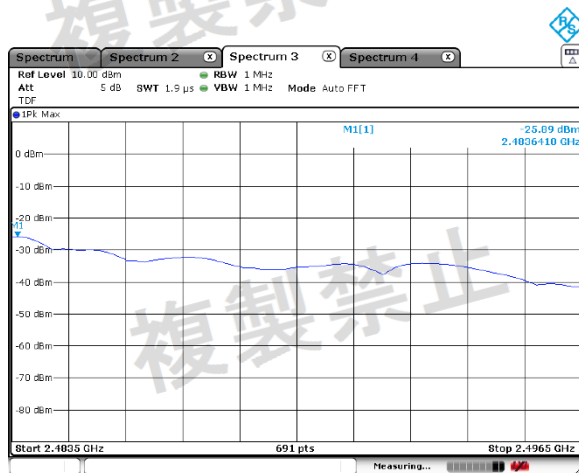
30 MHz ~ 2 387 MHz



2 387 MHz ~ 2 400 MHz

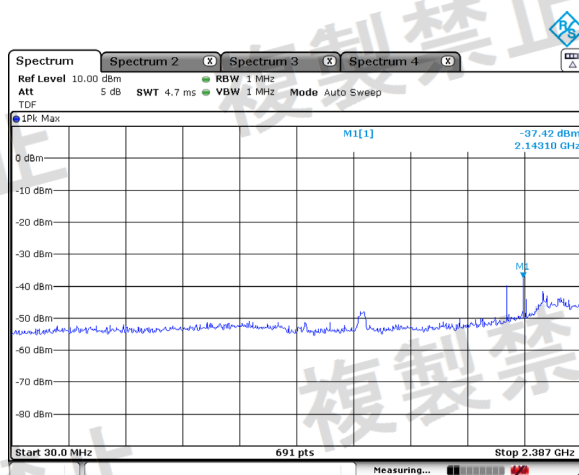


2 483.5 MHz ~ 2 496.5 MHz

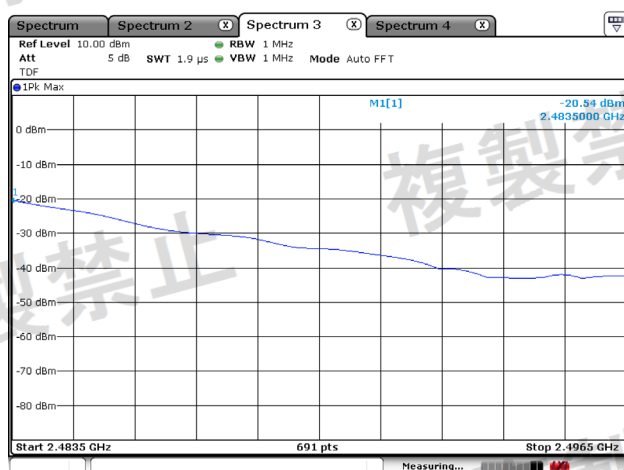


CH High

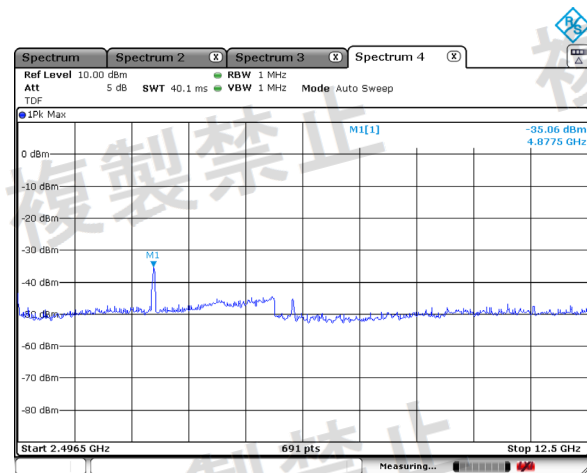
30 MHz ~ 2 387 MHz



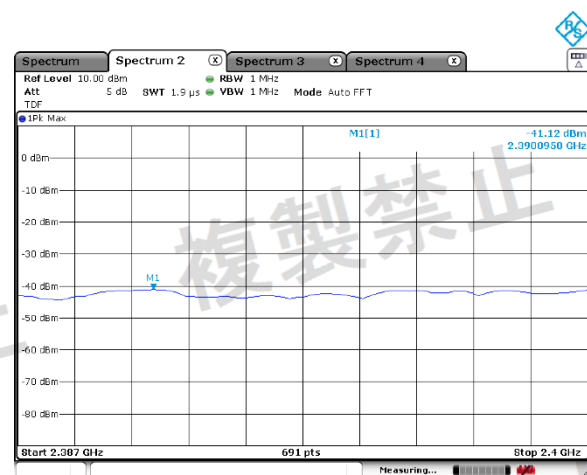
2 483.5 MHz ~ 2 496.5 MHz



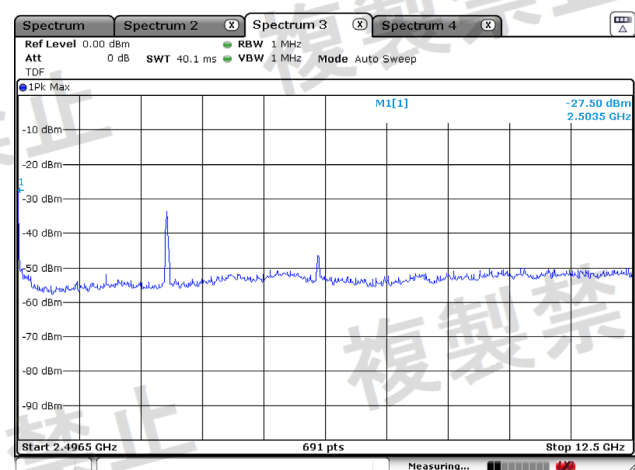
2 496.5 MHz ~ 12.5 GHz



2 387 MHz ~ 2 400 MHz



2 496.5 MHz ~ 12.5 GHz



5.5 Secondly Emitted Radio Wave Strength (RX Spurious Emission)

5.5.1 Measurement Procedure

Connect transmitter output to the spectrum analyzer input port.

Unwanted emission strength is measured by following setting:

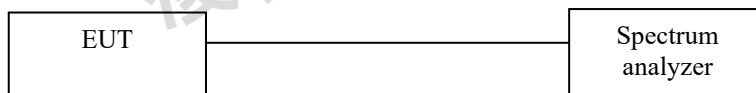
Set the spectrum analyzer RBW: 100 kHz, VBW: 100 kHz, Sweep time: auto
Start: 30 MHz, Stop: 1 GHz. Sweep mode: auto and mark highest level.

Set the spectrum analyzer RBW: 1 MHz, VBW: 3 MHz, Sweep time: auto
Start: 1 GHz, Stop: 12.5 GHz. Sweep mode: auto and mark highest level.

Detector mode : Positive Peak

Trace mode: Max hold

5.5.2 Test setup



5.5.3 Limit

30 MHz to 1 GHz: 4 nW/MHz

1 GHz to 12.5 GHz: 20 nW/MHz

5.5.4 Test environment conditions

• Ambient temperature : (20 ~ 22) °C • Relative Humidity : (46 ~ 49) % R.H.

5.5.5 Measurement Result

802.11b

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm]	[nw]	[nW]	
Low Channel [2 412 MHz]					
30 MHz ~ 1 GHz	367.6	-86.56	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 425.0	-71.55	0.070	20	Compliance
Middle Channel [2 442 MHz]					
30 MHz ~ 1 GHz	960.0	-86.59	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 175.0	-71.59	0.069	20	Compliance
High Channel [2 472 MHz]					
30 MHz ~ 1 GHz	875.8	-87.03	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 225.0	-71.13	0.077	20	Compliance

802.11g

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm]	[nw]	[nW]	
Low Channel [2 412 MHz]					
30 MHz ~ 1 GHz	874.4	-86.80	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 159.0	-71.57	0.070	20	Compliance
Middle Channel [2 442 MHz]					
30 MHz ~ 1 GHz	850.5	-86.30	0.002	4	Compliance
1 GHz ~ 12.5 GHz	10 178.0	-71.49	0.071	20	Compliance
High Channel [2 472 MHz]					
30 MHz ~ 1 GHz	847.7	-86.46	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 142.0	-71.51	0.071	20	Compliance

802.11n(HT20)

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm]	[nw]	[nW]	
Low Channel [2 412 MHz]					
30 MHz ~ 1 GHz	906.6	-86.90	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 159.0	-71.68	0.068	20	Compliance
Middle Channel [2 442 MHz]					
30 MHz ~ 1 GHz	785.9	-86.80	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 408.0	-71.19	0.076	20	Compliance
High Channel [2 472 MHz]					
30 MHz ~ 1 GHz	978.2	-86.64	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 325.0	-71.18	0.076	20	Compliance

■802.11n(HT40)

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm]	[nw]	[nW]	
Low Channel [2 422 MHz]					
30 MHz ~ 1 GHz	940.3	-86.66	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 209.0	-71.34	0.076	20	Compliance
Middle Channel [2 442 MHz]					
30 MHz ~ 1 GHz	999.3	-86.45	0.002	4	Compliance
1 GHz ~ 12.5 GHz	11 693.0	-71.26	0.075	20	Compliance
High Channel [2 462 MHz]					
30 MHz ~ 1 GHz	944.6	-86.68	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 225.0	-70.79	0.083	20	Compliance

■802.11ax(HE20)

Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm]	[nw]	[nW]	
Low Channel [2 422 MHz]					
30 MHz ~ 1 GHz	930.5	-86.90	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 142.0	-70.50	0.089	20	Compliance
Middle Channel [2 442 MHz]					
30 MHz ~ 1 GHz	909.5	-86.99	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 159.0	-71.41	0.072	20	Compliance
High Channel [2 462 MHz]					
30 MHz ~ 1 GHz	846.3	-86.83	0.002	4	Compliance
1 GHz ~ 12.5 GHz	12 225.0	-70.67	0.086	20	Compliance

■802.11ax(HE40)

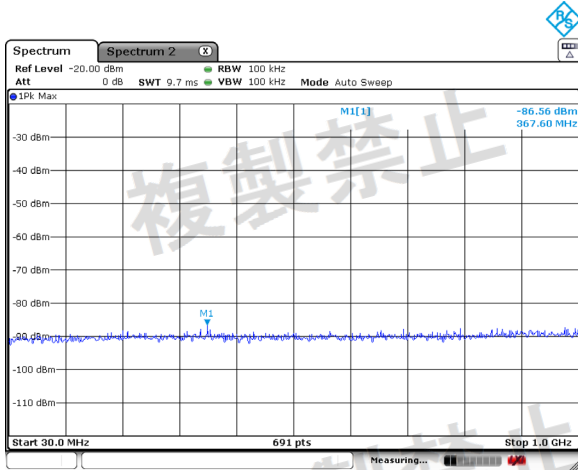
Frequency range	Measure value			Limit	Test results
[MHz]	[MHz]	[dBm]	[nw]	[nW]	
Low Channel [2 422 MHz]					
30 MHz ~ 1 GHz	985.30	-86.76	0.002	4	Compliance
1 GHz ~ 12.5 GHz	10 728.00	-70.88	0.082	20	Compliance
Middle Channel [2 442 MHz]					
30 MHz ~ 1 GHz	801.40	-87.20	0.002	4	Compliance
1 GHz ~ 12.5 GHz	10 644.00	-71.01	0.079	20	Compliance
High Channel [2 462 MHz]					
30 MHz ~ 1 GHz	930.50	-86.95	0.002	4	Compliance
1 GHz ~ 12.5 GHz	11 343.00	-71.49	0.071	20	Compliance

5.5.6 Test Plot

■ 802.11b

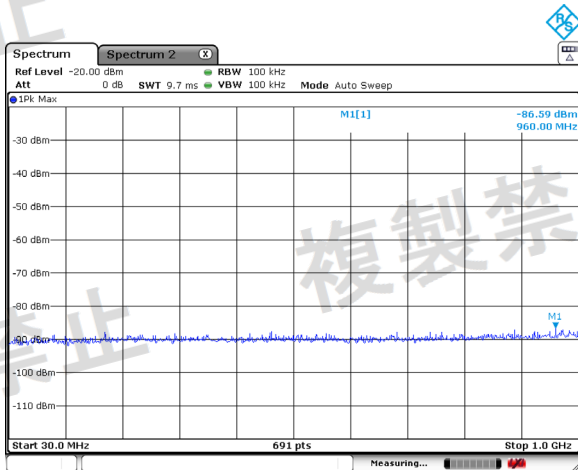
CH Low

30 MHz ~ 1 GHz



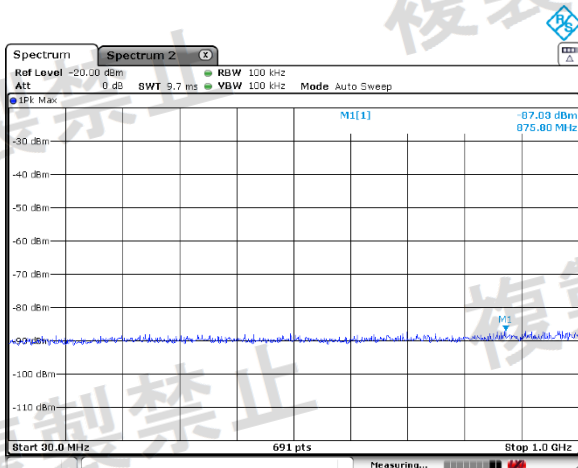
CH Mid

30 MHz ~ 1 GHz

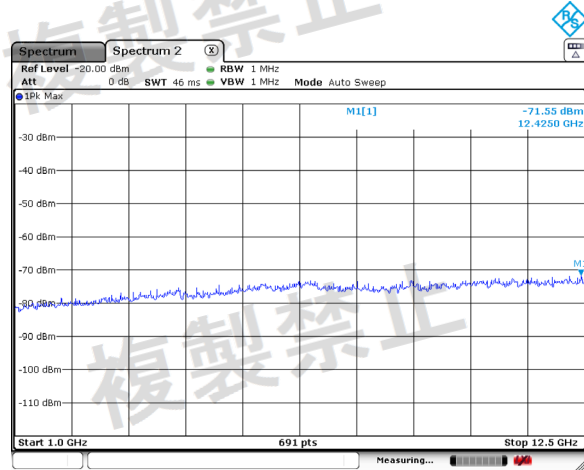


CH High

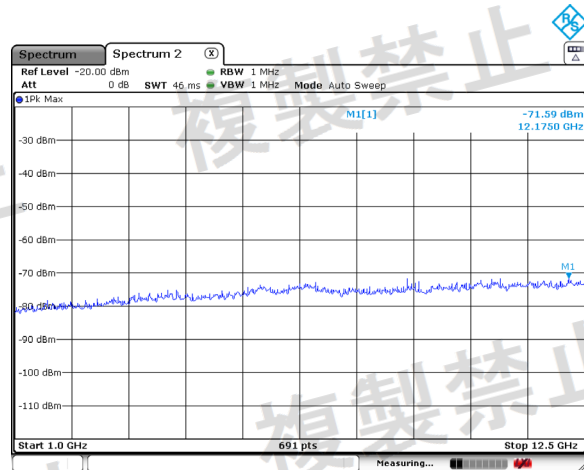
30 MHz ~ 1 GHz



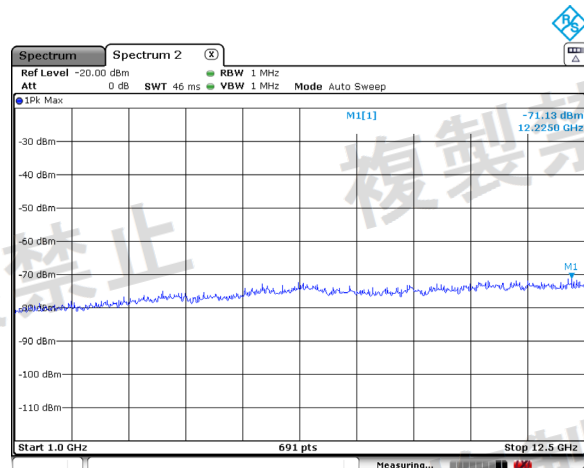
1 GHz ~ 12.5 GHz



1 GHz ~ 12.5 GHz



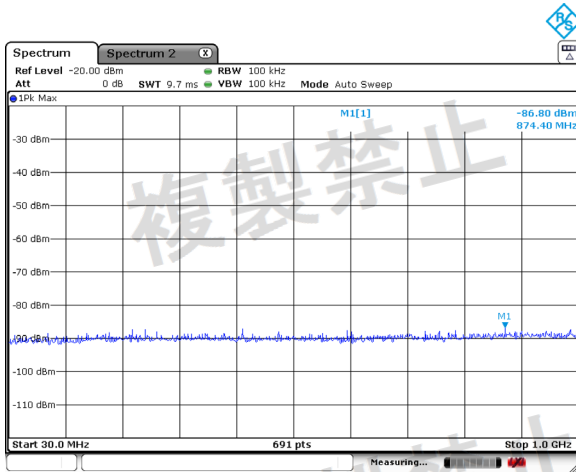
1 GHz ~ 12.5 GHz



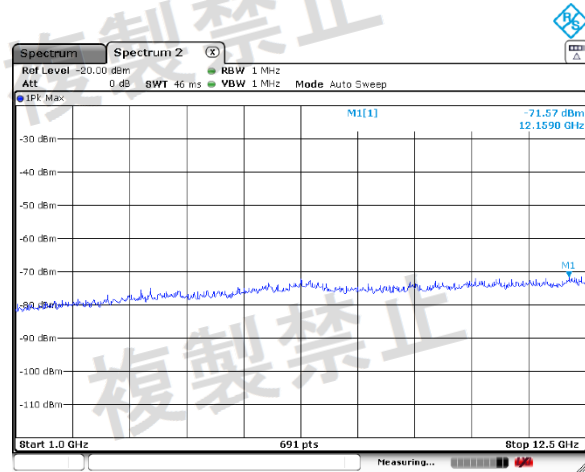
■ 802.11g

CH Low

30 MHz ~ 1 GHz

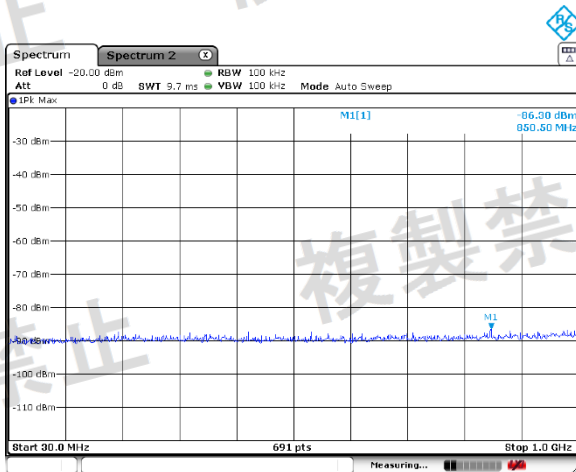


1 GHz ~ 12.5 GHz

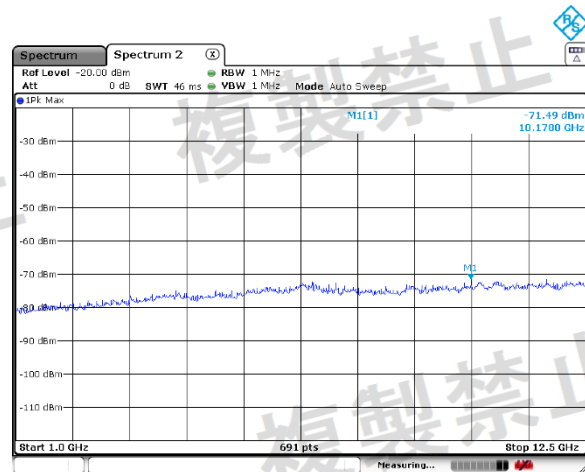


CH Mid

30 MHz ~ 1 GHz

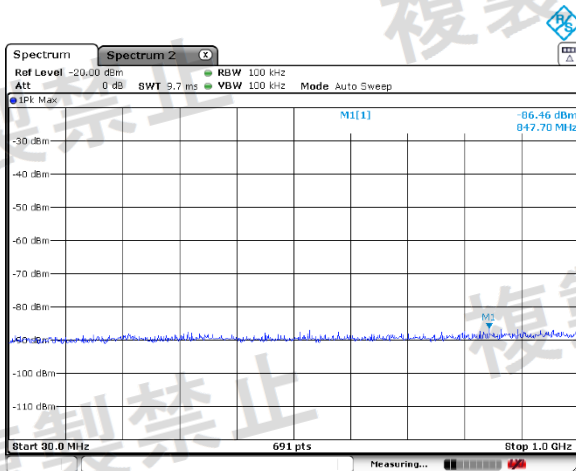


1 GHz ~ 12.5 GHz

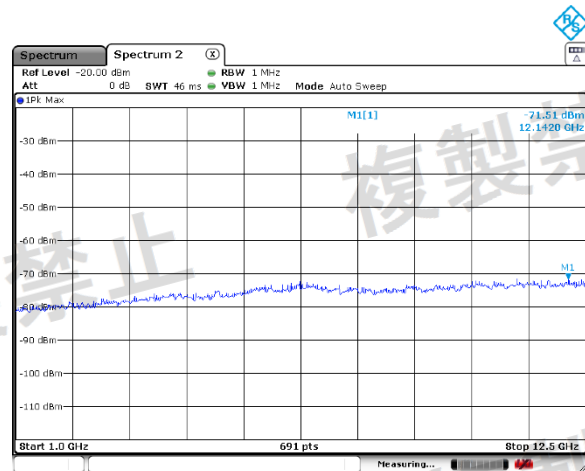


CH High

30 MHz ~ 1 GHz



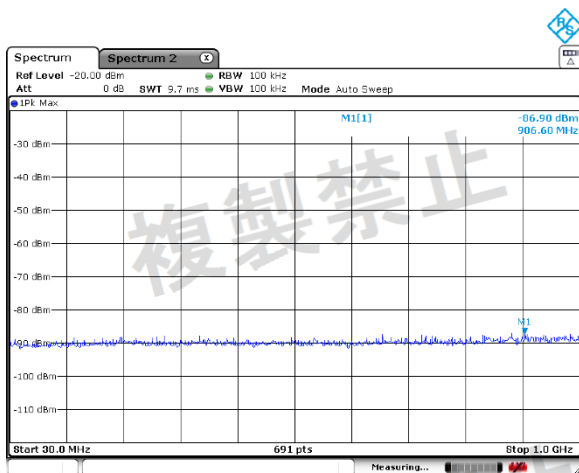
1 GHz ~ 12.5 GHz



■802.11n(HT20)

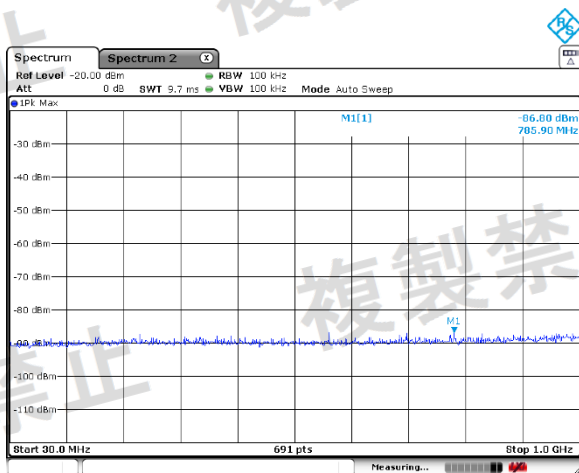
CH Low

30 MHz ~ 1 GHz



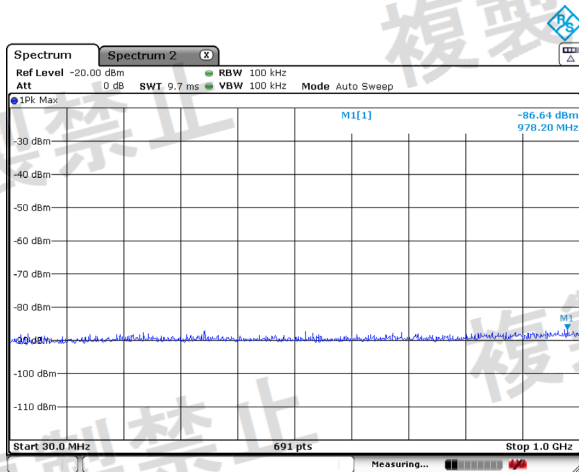
CH Mid

30 MHz ~ 1 GHz

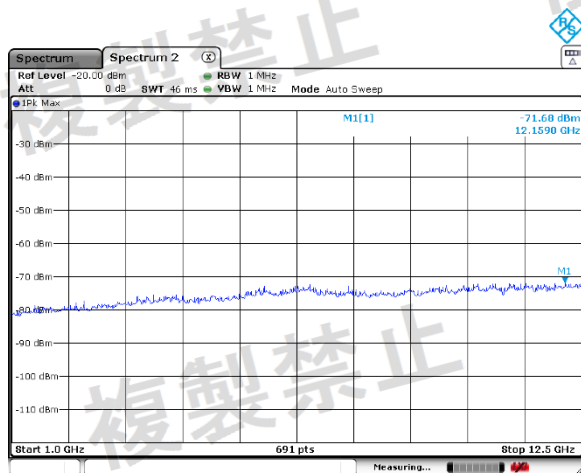


CH High

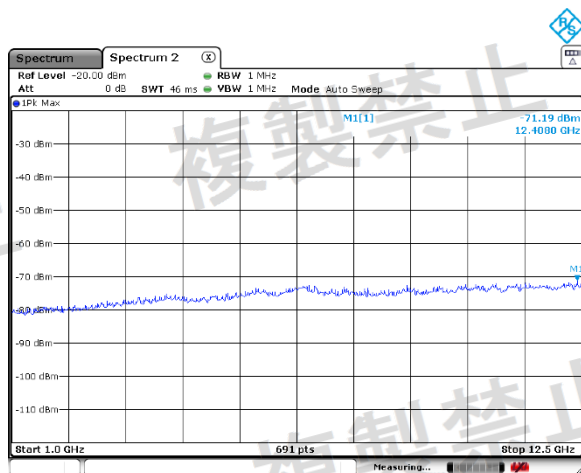
30 MHz ~ 1 GHz



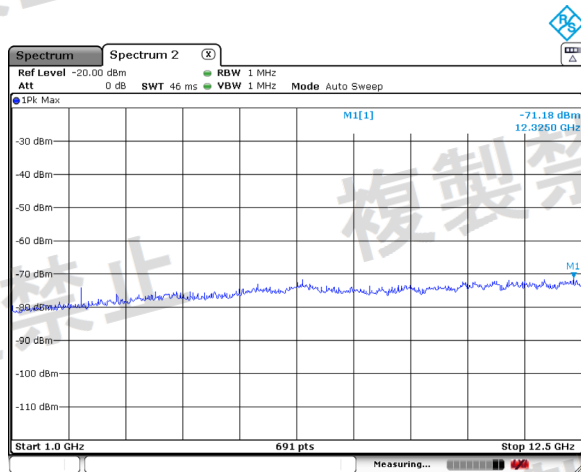
1 GHz ~ 12.5 GHz



1 GHz ~ 12.5 GHz



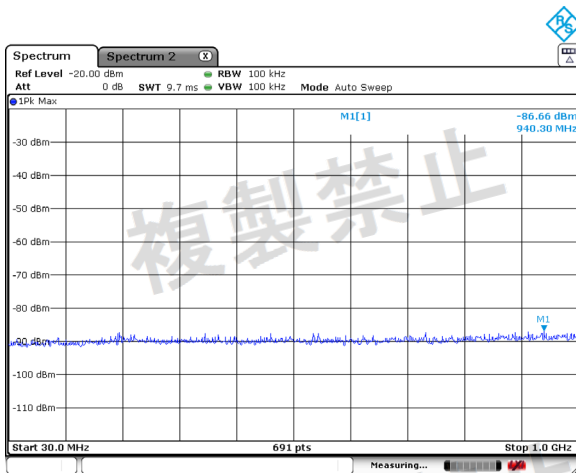
1 GHz ~ 12.5 GHz



802.11n(HT40)

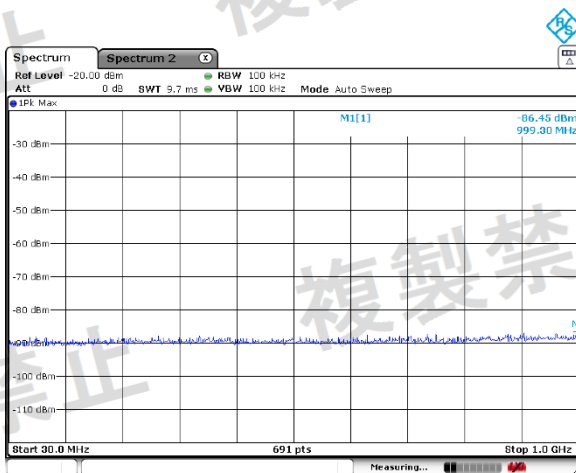
CH Low

30 MHz ~ 1 GHz



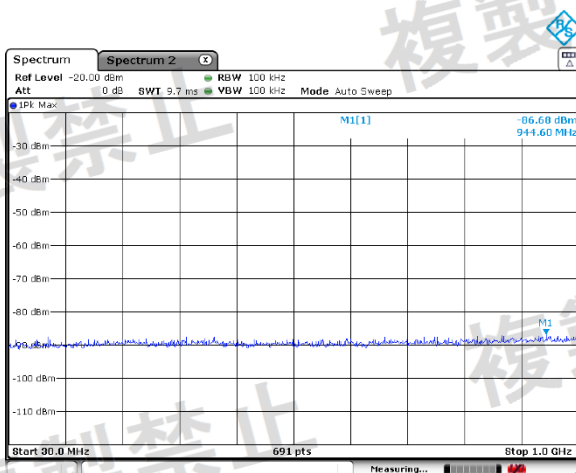
CH Mid

30 MHz ~ 1 GHz

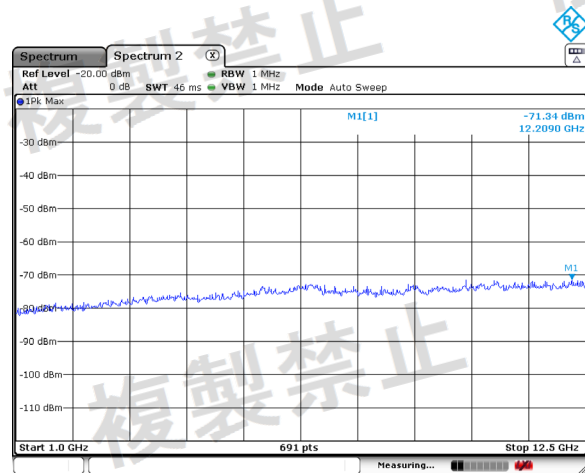


CH High

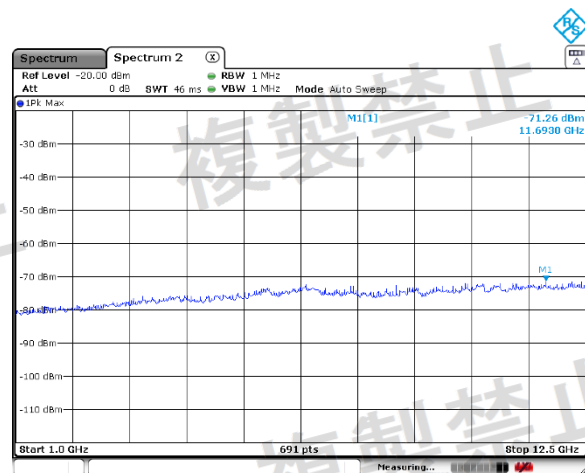
30 MHz ~ 1 GHz



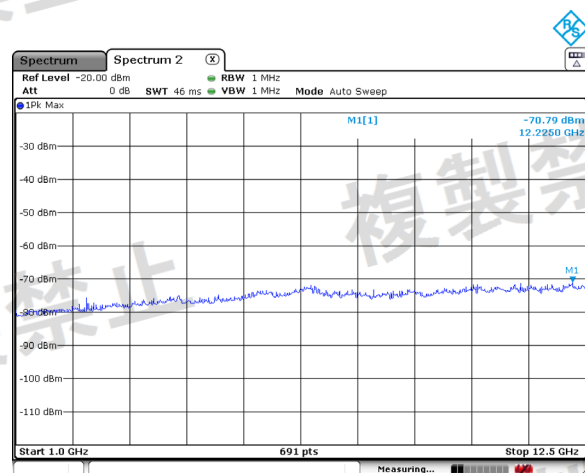
1 GHz ~ 12.5 GHz



1 GHz ~ 12.5 GHz



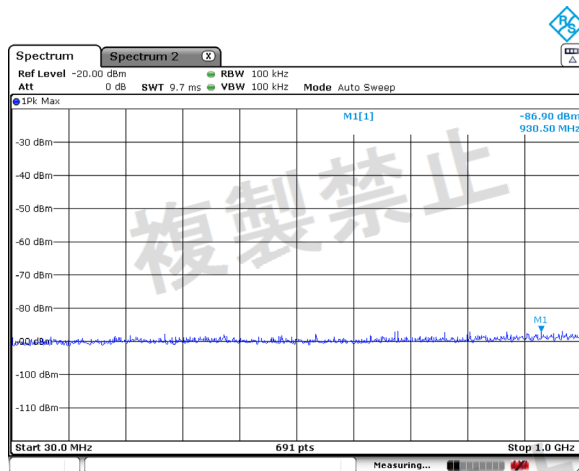
1 GHz ~ 12.5 GHz



802.11ax(HE20)

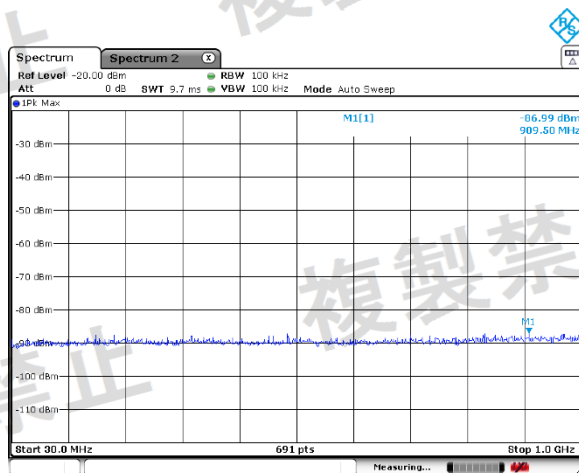
CH Low

30 MHz ~ 1 GHz



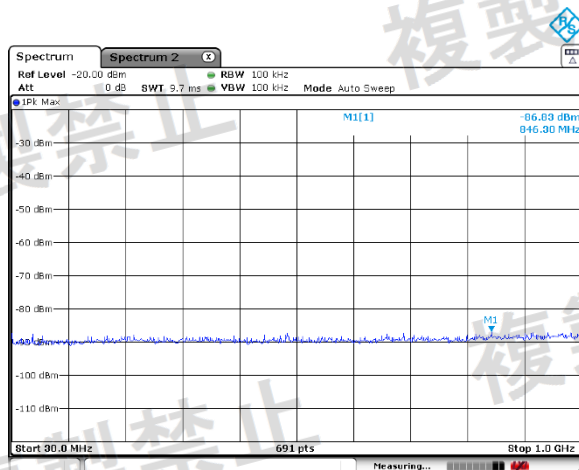
CH Mid

30 MHz ~ 1 GHz

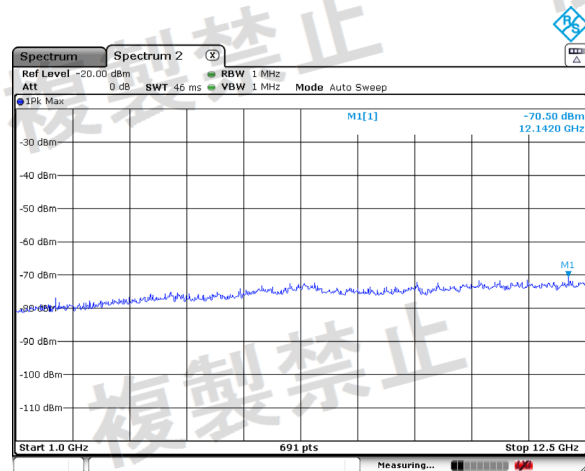


CH High

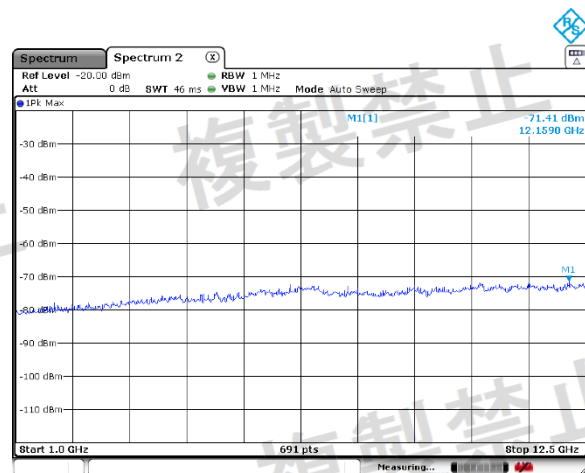
30 MHz ~ 1 GHz



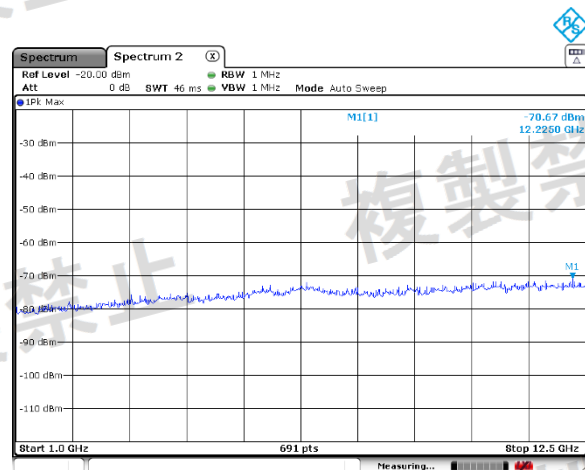
1 GHz ~ 12.5 GHz



1 GHz ~ 12.5 GHz



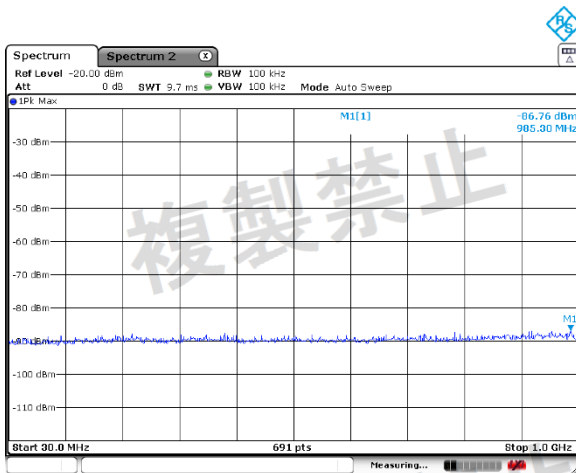
1 GHz ~ 12.5 GHz



■ 802.11ax(HE40)

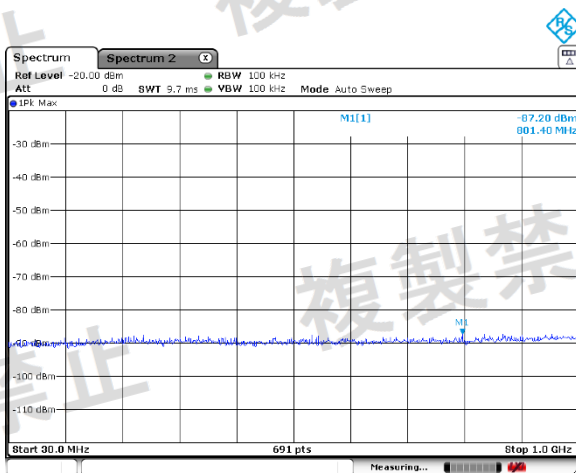
CH Low

30 MHz ~ 1 GHz



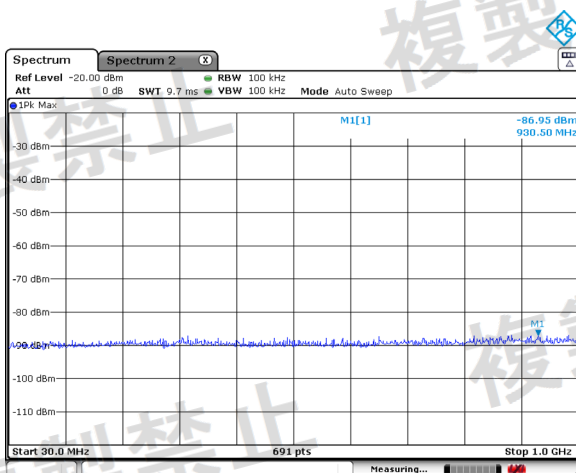
CH Mid

30 MHz ~ 1 GHz

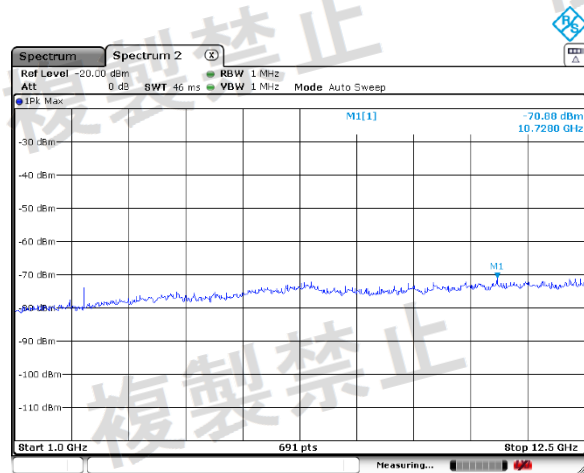


CH High

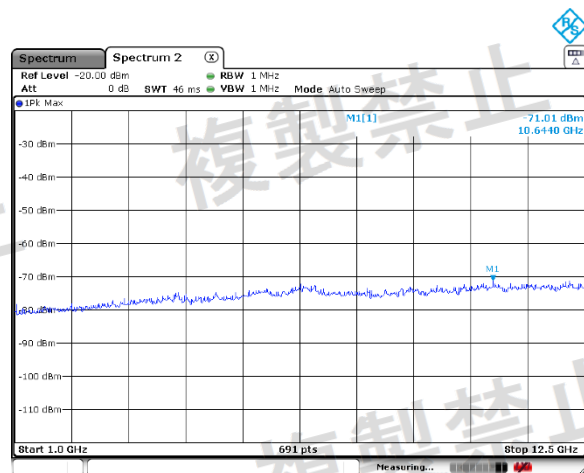
30 MHz ~ 1 GHz



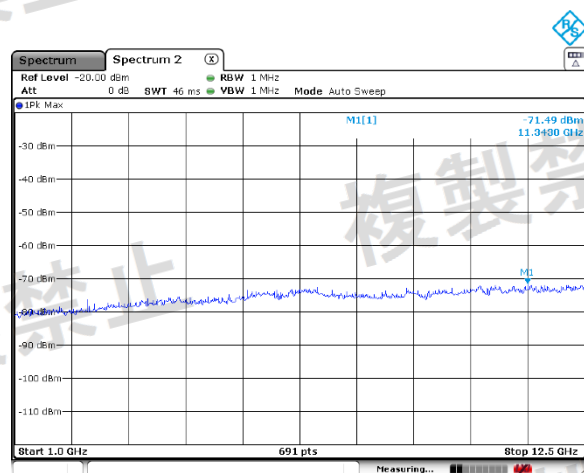
1 GHz ~ 12.5 GHz



1 GHz ~ 12.5 GHz



1 GHz ~ 12.5 GHz



5.6 Carrier Sensing Function

5.6.1 Measurement Procedure

The transmitter output is connected to the Signal Generator and Spectrum analyzer.

Use with divider or splitter

Setting the spectrum analyzer is as follows.

[Signal Generator Settings]

Center frequency: Operating frequency

Modulation: Un-modulated

Output level: $22.79 + G - 20 \cdot \log(f)$ dBm (G is the antenna gain is the test frequency)

[Spectrum Analyzer Settings]

Center frequency: Operating frequency

RBW: 1 MHz

VBW: 1 MHz

Span: 50 MHz

Sweep time: Auto

Sweep mode: Continuous sweep

Trigger: Free running

Detector: Positive peak

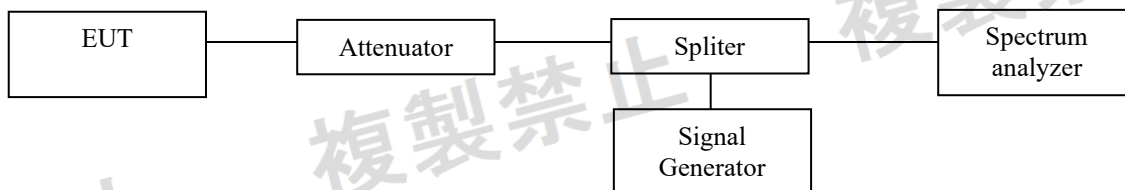
Turn off the RF signal of the S/G.

EUT have transmitted the maximum modulation signal and fixed channelize.

S/G RF signal on.

EUT shall be stop the transmitted any signal and S/G RF signal off, the EUT will be continuous transmitted signal.

5.6.2 Test setup



5.6.3 Test environment conditions

• Ambient temperature : (20 ~ 22) °C • Relative Humidity : (46 ~ 49) % R.H.

5.6.4 Test result

Good

5.7 Interference Prevention Function

5.7.1 Measurement Procedure

The EUT shall have the interference prevention ability to transmit or to receive the identification automatically, so that sender and receiver shall exclude other equipment

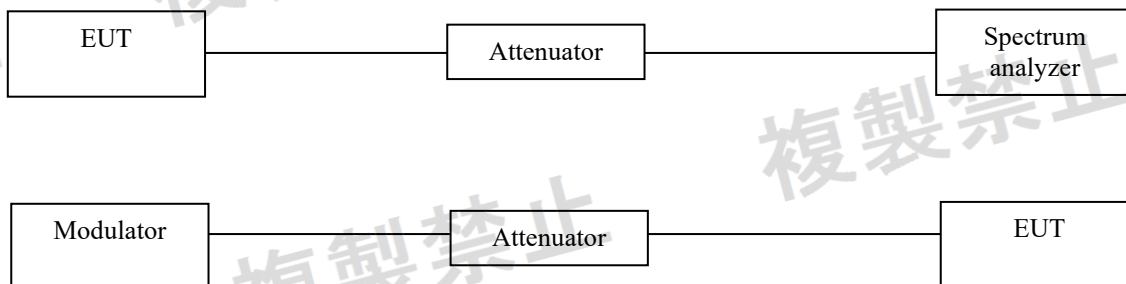
In the case that the EUT has the function of automatically transmitting the identification code:

1. Transmit the predetermined identification codes from EUT
2. Check the transmitted identification codes with the demodulator.

In the case of the receiving the identification codes:

1. Transmit the predetermined identification codes from the counterpart.
2. Check if communication is normal.
3. Transmit the signal other than predetermined ID codes from the counterpart.
4. Check if the EUT stops the transmission, or if it displays that identification codes are different from the predetermined ones.

5.7.2 Test setup



5.7.3 Test environment conditions

- Ambient temperature : (20 ~ 22) °C
- Relative Humidity : (46 ~ 49) % R.H.

5.7.4 Test result

Good

5.8 Construction Protection Confirmation

5.8.1 Limit

The high frequency circuit and modulation modules except for antenna shall be structured not to be opened easily.

5.8.2 Confirmation method

The RF and modulation portions are protected against illegal modification as following method:

Tick the appropriate box	
1. Sealed with special screws.	
2. Plastic chassis is being welded using ultrasonic waves.	☐
3. Chassis is glued using a special adhesive.	☐
4. Metal covers are spot-fused.	☐
5. Cover is specially interlocked.	☐
6. RF and Modulation components are covered with shielding case and this shielding case is soldered.	☐
7. Shield case is welded at RF and modulation parts, and ID-ROM is welded using the BGA Method.	☐
8. Shield case is welded at RF and modulation parts, and ID-ROM is glued at its lead with a special adhesive.	☐
9. Shield case is welded at RF and modulation parts, and ID-ROM is glued with a non-transparent laminating agent..	☐
10. RF and Modulation parts are mounted on PCB with surface mount technology, and there is no any adjustable part on PCB or adjustable parts are not exposed.	☒