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TEST REPORT

of

FCC Part 2 Subpart J, Part 22 Subpart C/H,
Part 24 Subpart E and Part 27 Subpart C

FCC ID: XHG-RT410

Equipment Under Test	:	Mobile Hotspot
Model Name	:	RT410
Variant Model Name(s)	:	-
Applicant	:	Franklin Technology Inc.
Manufacturer	:	Franklin Technology Inc.
Date of Receipt	:	2020.09.15
Date of Test(s)	:	2020.09.16 ~ 2020.11.20
Date of Issue	:	2020.11.20

In the configuration tested, the EUT complied with the standards specified above. This test report does not assure KOLAS accreditation.

1) The results of this test report are effective only to the items tested.
2) The SGS Korea is not responsible for the sampling, the results of this test report apply to the sample as received.
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Tested by: **Murphy Kim**

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SGS Korea Co., Ltd. Gunpo Laboratory

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1. General Information

1.1. Testing Laboratory

SGS Korea Co., Ltd. (Gunpo Laboratory)
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- Designation number: KR0150

All SGS services are rendered in accordance with the applicable SGS conditions of service available on request and accessible at http://www.sgs.com/en/Terms-and-Conditions.aspx.

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1.2. Details of Applicant

Applicant : Franklin Technology Inc.
Address : 906 JEI Platz, 186, Gasan digital 1-ro, Gumcheon-Gu, Seoul, South Korea, 08502
Contact Person : Lee, James
Phone No. : +82 70 8228 6445

1.3. Details of Manufacturer

Company : Same as applicant
Address : Same as applicant

1.4. Description of EUT

Kind of Product	Mobile Hotspot
Model Name	R717V
Power Supply	DC 3.8 V
Rated Power	LTE Band 2, 5: 22 ㎧m LTE Band 4, 66: 21.5 ㎧m LTE Band 12, 41: 23.5 ㎧m LTE Band 25: 22.2 ㎧m LTE Band 26: 23 ㎧m LTE Band 71: 23.3 ㎧m
Frequency Range	LTE Band 2: 1 850 ㎒ ~ 1 910 ㎒ LTE Band 4: 1 710 ㎒ ~ 1 755 ㎒ LTE Band 5: 824 ㎒ ~ 849 ㎒ LTE Band 12: 699 ㎒ ~ 716 ㎒ LTE Band 25: 1 850 ㎒ ~ 1 915 ㎒ LTE Band 26: 824 ㎒ ~ 849 ㎒ LTE Band 41: 2 496 ㎒ ~ 2 690 ㎒ LTE Band 66: 1 710 ㎒ ~ 1 780 ㎒ LTE Band 71: 663 ㎒ ~ 698 ㎒
Modulation Technique	QPSK, 16QAM
Antenna Type	FPCB type antenna
Antenna Gain	699 ㎒ ~ 716 ㎒: -0.59 ㎧i 1 850 ㎒ ~ 1 915 ㎒: 3.01 ㎧i 824 ㎒ ~ 849 ㎒: 2.89 ㎧i 2 496 ㎒ ~ 2 690 ㎒: 3.62 ㎧i 1 710 ㎒ ~ 1 780 ㎒: 4.16 ㎧i 663 ㎒ ~ 698 ㎒: -1.94 ㎧i

1.5. Test Equipment List

Equipment	Manufacturer	Model	S/N	Cal. Date	Cal. Interval	Cal. Due
Signal Generator	Agilent	E8257D	MY51501169	Nov. 11, 2019	Annual	Nov. 11, 2020
Spectrum Analyzer	R&S	FSV30	103455	Dec. 22, 2019	Annual	Dec. 22, 2020
Mobile Test Unit	R&S	CMW500	144034	Feb. 28, 2020	Annual	Feb. 28, 2021
Power Meter	Anritsu	ML2495A	1223004	Jun. 01, 2020	Annual	Jun. 01, 2021
Power Sensor	Anritsu	MA2411B	1207272	Jun. 01, 2020	Annual	Jun. 01, 2021
Temperature Chamber	ESPEC CORP.	PL-1J	15000793	Jun. 02, 2020	Annual	Jun. 02, 2021
High Pass Filter	Wainwright Instrument GmbH	WHKX10-900-1000-18000-40SS	7	Mar. 04, 2020	Annual	Mar. 04, 2021
High Pass Filter	Wainwright Instrument GmbH	WHKX1.5/15G-6SS	4	Jun. 11, 2020	Annual	Jun. 11, 2021
High Pass Filter	Wainwright Instrument GmbH	WHKX2.2/12.75G-10SS	8	Mar. 04, 2020	Annual	Mar. 04, 2021
High Pass Filter	Wainwright Instrument GmbH	WHK3.0/18G-10SS	344	May 18, 2020	Annual	May 18, 2021
High Pass Filter	Wainwright Instrument GmbH	WHK7.5/26.5G-6SS	15	Jun. 05, 2020	Annual	Jun. 05, 2021
Directional Coupler	KRYTAR	152613	122660	Jun. 11, 2020	Annual	Jun. 11, 2021
DC Power Supply	Agilent	U8002A	MY49030063	Feb. 03, 2020	Annual	Feb. 03, 2021
Preamplifier	H.P.	8447F	2944A03909	Aug. 06, 2020	Annual	Aug. 06, 2021
Signal Conditioning Unit	R&S	SCU 18	10117	Jun. 10, 2020	Annual	Jun. 10, 2021
Preamplifier	MITEQ Inc.	JS44-18004000-35-8P	1546891	May 08, 2020	Annual	May 08, 2021
Loop Antenna	Schwarzbeck Mess-Elektronik	FMZB 1519	1519-039	Aug. 22, 2019	Biennial	Aug. 22, 2021
Bilog Antenna	Schwarzbeck Mess-Elektronik	VULB9163	396	Mar. 21, 2019	Biennial	Mar. 21, 2021
Horn Antenna	R&S	HF906	100326	Feb. 14, 2020	Annual	Feb. 14, 2021
Horn Antenna	Schwarzbeck Mess-Elektronik	BBHA9170	9170-540	Jul. 24, 2019	Biennial	Jul. 24, 2021
Antenna Master	Innco systems GmbH	MM4000	N/A	N.C.R.	N/A	N.C.R.
Turn Table	Innco systems GmbH	DS 1200S	N/A	N.C.R.	N/A	N.C.R.
Controller	Innco systems GmbH	CONTROLLER CO3000-4P	CO3000/963/383 30516/L	N.C.R.	N/A	N.C.R.
Anechoic Chamber	SY Corporation	L × W × H (9.6 m × 6.4 m × 6.4 m)	N/A	N.C.R.	N/A	N.C.R.
Coaxial Cable	RFONE	SFX086-NMNM-5M (5m)	20200323001	Aug. 10, 2020	Semi-annual	Feb. 10, 2021
Coaxial Cable	RFONE	PL520-NMNM-10M (10 m)	20200324001	Aug. 10, 2020	Semi-annual	Feb. 10, 2021
Coaxial Cable	Rosenberger	LA1-C006-1500	131014 01/20	Aug. 21, 2020	Semi-annual	Feb. 21, 2021
Coaxial Cable	Rosenberger	LA1-C006-1500	131014 05/20	Aug. 21, 2020	Semi-annual	Feb. 21, 2021
Coaxial Cable	Rosenberger	LA1-C006-1500	131014 10/20	Aug. 21, 2020	Semi-annual	Feb. 21, 2021

▶ Support Equipment

Description	Manufacturer	Model	Serial Number
N/A	-	-	-

1.6. Summary of Test Results

The EUT has been tested according to the following specifications:

APPLIED STANDARD: FCC Part 2, 22, 24 and 27		
Section	**Test Item(s)**	**Result**
§2.1046 §22.913(a)(5) §24.232(c) §27.50(c)(10) §27.50(d)(4) §27.50(h)(2)	RF Radiated Output Power	Complied
§22.917(a) §24.238(a) §27.53(g) §27.53(h)(1) §27.53(m)(4)	Spurious Radiated Emission	Complied
§2.1046	Conducted Output Power	N/A[1)]
§2.1049	Occupied Bandwidth	Complied
§22.913(d) §24.232(d) §27.50(d)(5)	Peak-Average Ratio	Complied
§22.917(a) §24.238(a) §27.53(g) §27.53(h)(1) §27.53(m)(4)	Spurious Emission at Antenna Terminal	Complied
§22.917(a) §24.238(a) §27.53(g) §27.53(h)(1) §27.53(m)(4)	Band Edge	Complied
§2.1055 §22.355 §24.235 §27.54	Frequency Stability	Complied

Note;

1) Refer to SAR report.

1.7. Sample Calculation for Offset

Where relevant, the following sample calculation is provided:

1.7.1. Conducted Test

Offset value (㎲) = Directional Coupler (㎲) + Cable loss (㎲)

1.7.2. Radiation test

- E.I.R.P. (㎲ m) = Measured level (㎲㎶) + Antenna factor (㎲/m) + Cable loss (㎲) + 20 Log D - 104.5; where D is the measurement distance in meters.
- E.R.P. (㎲ m) = E.I.R.P. (㎲ m) - 2.15 (㎲)

1.8. Device Capabilities

This device contains the following capabilities;

LTE Band 25 (1 850 ㎒ ~ 1 915 ㎒) overlaps the entire frequency range of LTE Band 2 (1 850 ㎒ ~ 1 910 ㎒). Therefore, test data provided in this report covers LTE Band 2 as well as Band 25.
LTE Band 66 (1 710 ㎒ ~ 1 780 ㎒) overlaps the entire frequency range of LTE Band 4 (1 710 ㎒ ~ 1 755 ㎒). Therefore, test data provided in this report covers LTE Band 4 as well as Band 66.
LTE Band 26 (814 ㎒ ~ 849 ㎒) overlaps the entire frequency range of LTE Band 5 (824 ㎒ ~ 849 ㎒). Therefore, test data provided in this report covers LTE Band 5 as well as Band 26.

1.9. Measurement Uncertainty

Where relevant, the following measurement uncertainty levels have been estimated for tests performed on the apparatus:

Parameter	Uncertainty
Radiated Emission, 9 ㎑ to 30 ㎒	± 3.59 ㎲
Radiated Emission, below 1 ㎓	± 5.88 ㎲
Radiated Emission, above 1 ㎓	± 5.94 ㎲

Uncertainty figures are valid to a confidence level of 95 %.

1.10. Test Report Revision

Revision	Report Number	Date of Issue	Description
0	F690501-RF-RTL001275	2020.10.29	Initial
1	F690501-RF-RTL001275-1	2020.11.18	Revised the frequency information
2	F690501-RF-RTL001275-2	2020.11.20	Added upper band edge test for LTE B2 and B4

1.11. Emission Designator and Max Power

Mode	Frequency Range (㎒)	Modulation	Emission Designator	E.R.P. / E.I.R.P.	
				Max power (dBm)	Max power (㎽)
LTE Band 12	699.7 ~ 715.3	QPSK	1M11G7D	24.56	285.76
		16QAM	1M10D7D	23.46	221.82
	700.5 ~ 714.5	QPSK	2M69G7D	24.58	287.08
		16QAM	2M68D7D	23.46	221.82
	701.5 ~ 713.5	QPSK	4M53G7D	24.77	299.92
		16QAM	4M52D7D	23.90	245.47
	704 ~ 711	QPSK	8M94G7D	24.83	304.09
		16QAM	8M94D7D	23.99	250.61
LTE Band 25/2	1 850.7 ~ 1 914.3	QPSK	1M10G7D	25.11	324.34
		16QAM	1M10D7D	24.11	257.63
	1 851.5 ~ 1 913.5	QPSK	2M69G7D	24.95	312.61
		16QAM	2M69D7D	24.02	252.35
	1 852.5 ~ 1 912.5	QPSK	4M53G7D	23.98	250.03
		16QAM	4M52D7D	22.89	194.54
	1 855 ~ 1 910	QPSK	8M97G7D	24.79	301.30
		16QAM	8M94D7D	23.81	240.44
	1 857.5 ~ 1 907.5	QPSK	13M5G7D	24.77	299.92
		16QAM	13M5D7D	23.82	240.99
	1 860 ~ 1 905	QPSK	17M9G7D	25.52	356.45
		16QAM	17M9D7D	24.67	293.09
LTE Band 26/5	824.7 ~ 848.3	QPSK	1M10G7D	23.09	203.70
		16QAM	1M10D7D	22.77	189.23
	825.5 ~ 847.5	QPSK	2M69G7D	23.72	235.50
		16QAM	2M69D7D	22.96	197.70
	826.5 ~ 846.5	QPSK	4M53G7D	24.01	251.77
		16QAM	4M52D7D	22.82	191.43
	829 ~ 844	QPSK	8M97G7D	23.88	244.34
		16QAM	8M94D7D	23.25	211.35
LTE Band 26	831.5 ~ 841.5	QPSK	13M4G7D	23.81	240.44
		16QAM	13M5D7D	23.17	207.49
LTE Band 41	2 498.5 ~ 2 687.5	QPSK	4M52G7D	24.09	256.45
		16QAM	4M52D7D	23.22	209.89
	2 501 ~ 2 685	QPSK	8M92G7D	24.04	253.51
		16QAM	8M92D7D	22.53	179.06
	2 503.5 ~ 2 682.5	QPSK	13M5G7D	24.73	297.17
		16QAM	13M5D7D	23.75	237.14
	2 506 ~ 2 680	QPSK	17M9G7D	24.39	274.79
		16QAM	17M9D7D	23.51	224.39

Mode	Frequency Range (㎒)	Modulation	Emission Designator	E.R.P. / E.I.R.P.	
				Max power (dB m)	Max power (㎽)
LTE Band 66/4	1 710.7 ~ 1 779.3	QPSK	1M11G7D	24.55	285.10
		16QAM	1M10D7D	23.59	228.56
	1 711.5 ~ 1 778.5	QPSK	2M69G7D	24.29	268.53
		16QAM	2M69D7D	23.24	210.86
	1 712.5 ~ 1 777.5	QPSK	4M52G7D	24.13	258.82
		16QAM	4M52D7D	23.91	246.04
	1 715 ~ 1 775	QPSK	8M97G7D	24.92	310.46
		16QAM	8M94D7D	24.21	263.63
	1 717.5 ~ 1 772.5	QPSK	13M5G7D	25.01	316.96
		16QAM	13M5D7D	24.17	261.22
	1 720 ~ 1 770	QPSK	17M9G7D	25.34	341.98
		16QAM	18M0D7D	24.21	263.63
LTE Band 71	665.5 ~ 695.5	QPSK	4M53G7D	20.36	108.64
		16QAM	4M52D7D	19.32	85.51
	668 ~ 693	QPSK	8M92G7D	20.64	115.88
		16QAM	8M94D7D	19.69	93.11
	670.5 ~ 690.5	QPSK	13M5G7D	20.57	114.02
		16QAM	13M5D7D	19.69	93.11
	673 ~ 688	QPSK	17M8G7D	20.84	121.34
		16QAM	17M9D7D	20.06	101.39

1.12. Worst Case Configuration and Mode

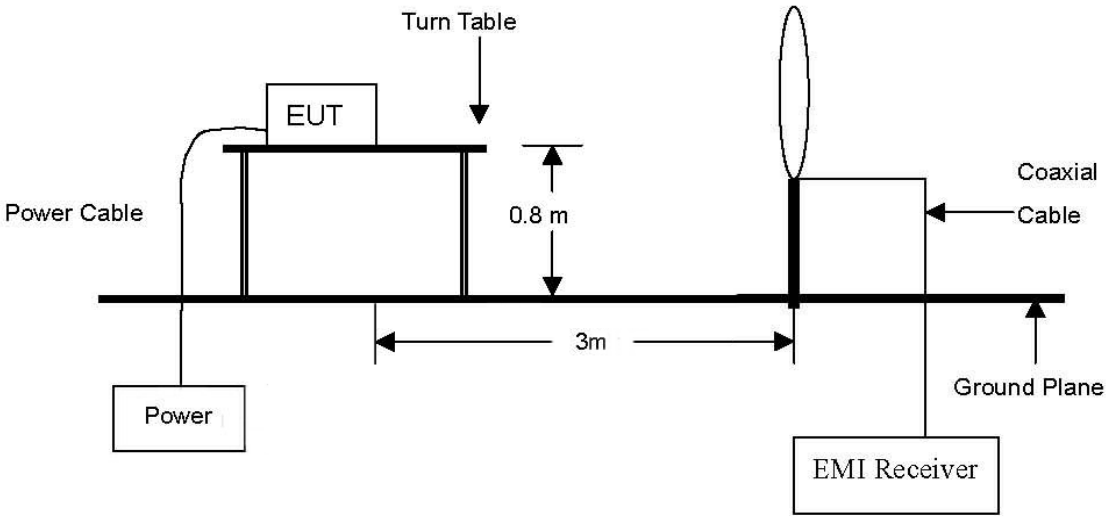
All testing was performed using QPSK and 16QAM modulations, except conducted spurious emissions, radiated spurious emissions, peak-average ratio and band-edge were tested only QPSK modulation as worst case. The worst-case is based on the conducted output power measurement investigation results.

The radiation test of the EUT was investigated in three orthogonal orientations X, Y, and Z, and the worst case data is reported.

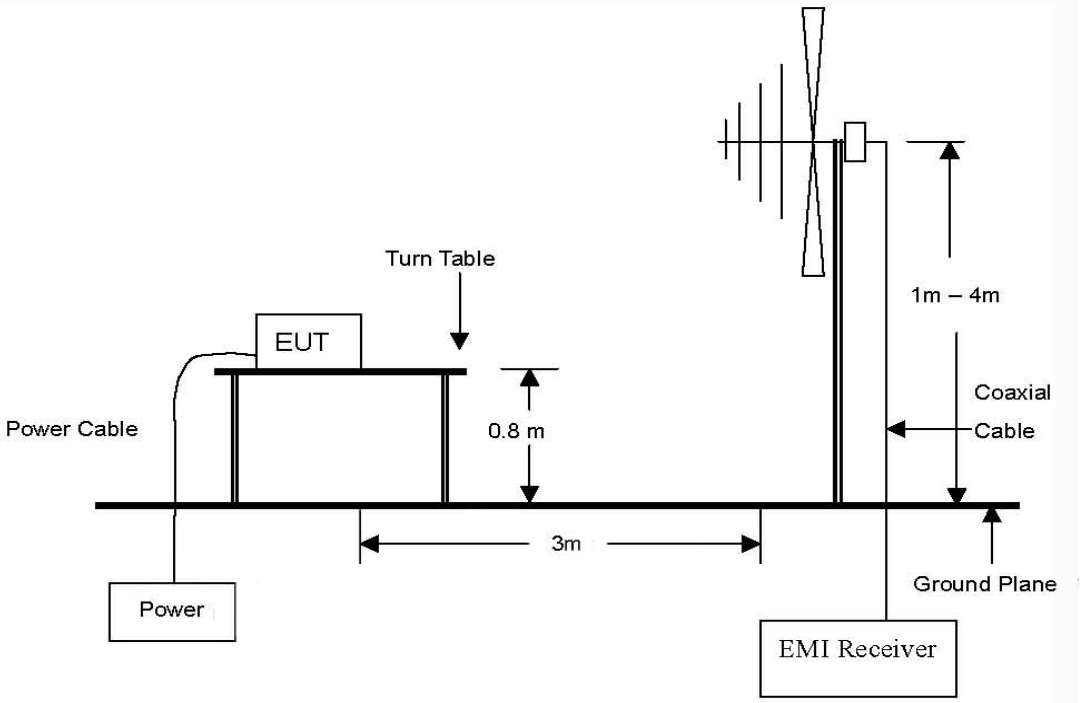
2. RF Radiated Output Power & Spurious Radiated Emission

2.1. Test setup

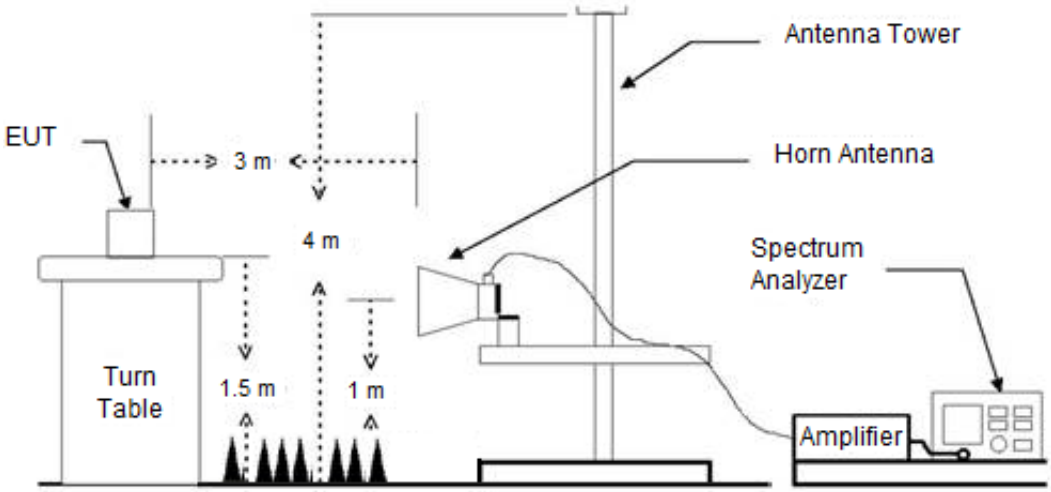
The diagram below shows the test setup that is utilized to make the measurements for emission from 9 ㎑ to 30 ㎒.



The diagram below shows the test setup that is utilized to make the measurements for emission from 30 ㎒ to 1 ㎓ Emissions.



The diagram below shows the test setup that is utilized to make the measurements for emission from 1 ㎓ to 27 ㎓ Emissions.



2.2. Limit

2.2.1. Limit of Radiated Output Power

- §22.913(a)(5), the ERP of mobile transmitters and auxiliary test transmitters must not exceed 7 watts.

- §24.232(c), mobile and portable stations are limited to 2 watts EIRP and the equipment must employ a means to limiting power to the minimum necessary for successful communications.

- §27.50(c)(10), Portable stations (hand-held devices) in the 600 ㎒ uplink band and the 698-746 ㎒ band, and fixed and mobile stations in the 600 ㎒ uplink band are limited to 3 watts ERP.

- §27.50(d)(4), fixed, mobile, and portable (hand-held) stations operating in the 1 710-1 755 ㎒ band and mobile and portable stations operating in the 1 695-1 710 ㎒ and 1 755-1 780 ㎒ bands are limited to 1 watt EIRP.

- §27.50(h)(2), Mobile and other user stations. Mobile stations are limited to 2.0 watts EIRP. All user stations are limited to 2.0 watts transmitter output power.

2.2.2. Limit of Spurious Radiated Emission

- §22.917(a), the power of any emission outside of the authorized operating frequency ranges must be attenuated below the transmitting power (P) by a factor of at least 43 + 10log(P) ㏈.

- §24.238(a), the power of any emission outside of the authorized operating frequency ranges must be attenuated below the transmitting power (P) by a factor of at least 43 + 10 log(P) ㏈.

- §27.53(g), the power of any emission outside a licensee's frequency band(s) of operation shall be attenuated below the transmitter power (P) within the licensed band(s) of operation, measured in watts, by at least 43 + 10 log (P) ㏈.

- §27.53(h)(1), for operations in the 1 695-1 710 ㎒, 1 710-1 755 ㎒, 1 755-1 780 ㎒, 1 915-1 920 ㎒, 1 995-2 000 ㎒, 2 000-2 020 ㎒, 2 110-2 155 ㎒, 2 155-2 180 ㎒, and 2 180-2 200 bands, the power of any emission outside a licensee's frequency block shall be attenuated below the transmitter power (P) in watts by at least 43 + 10 $\log_{10}$ (P) ㏈.

- §27.53(m)(4), for mobile digital stations, the attenuation factor shall be not less than 40 + 10 $\log_{10}$ (P) ㏈ on all frequencies between the channel edge and 5 megahertz from the channel edge, 43 + 10 $\log_{10}$ (P) ㏈ on all frequencies between 5 megahertz and X megahertz from the channel edge, and 55 + 10 $\log_{10}$ (P) ㏈ on all frequencies more than X megahertz from the channel edge, where X is the greater of 6 megahertz or the actual emission bandwidth as defined in paragraph (m)(6) of this section. In addition, the attenuation factor shall not be less that 43 + 10 $\log_{10}$ (P) ㏈ on all frequencies between 2490.5 ㎒ and 2496 ㎒ and 55 + 10 $\log_{10}$ (P) ㏈ at or below 2490.5 ㎒. Mobile Satellite Service licensees operating on frequencies below 2495 ㎒ may also submit a documented interference complaint against BRS licensees operating on channel BRS Channel 1 on the same terms and conditions as adjacent channel BRS or EBS licensees.

2.3. Test Procedure: Based on ANSI/TIA 603E: 2016 and ANSI C63.26-2015, KDB 971168 D01 Power Meas License Digital Systems v03r01.

1. On a test site, the EUT shall be placed at 0.8 m or 1.5 m height on a turn table, and in the position close to normal use as declared by the applicant.
2. The test antenna shall be oriented initially for vertical polarization located 3 m from EUT to correspond to the fundamental frequency of the transmitter.
3. The output of the test antenna shall be connected to the measuring receiver and the peak detector is used for the measurement.
4. The maximized power level is recorded using the spectrum analyzer “Channel Power” function with the integration band set to the emissions occupied bandwidth, RBW = 1-5 % of the OBW (not to exceed 1 ㎒), VBW ≥ 3 x RBW, Detector = power averaging (rms), sweep time = auto, trace average at least 100 traces in power averaging (rms) mode, per the guidelines of KDB 971168 D01 Power Meas License Digital Systems v03r01.
5. Radiated spurious emissions measurement method was set as follows:
   RBW = 100 ㎑ for emissions below 1 ㎓ and 1 ㎒ for emissions above 1 ㎓, VBW ≥ 3 x RBW,
   Detector = RMS, trace mode = max hold, per the guidelines of KDB 971168 D01 Power Meas License Digital Systems v03r01.
6. The transmitter shall be switched on, the measuring receiver shall be tuned to the frequency of the transmitter under test.
7. The test antenna shall be raised and lowered through the specified range of height until the maximum signal level is detected by the measuring receiver.
8. The transmitter shall be rotated through 360° in the horizontal plane, until the maximum signal level is detected by the measuring receiver.
9. The test antenna shall be raised and lowered again through the specified range of height until the maximum signal level is detected by the measuring receiver.
10. The maximum signal level detected by the measuring receiver shall be noted.
11. In necessary, the input attenuator setting on the measuring receiver shall be adjusted in order to increase the sensitivity of the measuring receiver.
12. The test antenna shall be raised and lowered through the specified range of height to ensure that the maximum signal is received.
13. The measurement shall be repeated with the test antenna orientated for horizontal polarization.

2.4. Test result for RF radiated output power

Ambient temperature : (23 ± 1) ℃
Relative humidity : 47 % R.H.

LTE band 12 (1.4 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dBm)	(㎽)
699.70	QPSK	91.23	H	25.50	4.89	121.62	-97.41	24.21	263.63
699.70		86.01	V	25.50	4.89	116.40	-97.41	18.99	79.25
707.50		91.32	H	25.50	4.90	121.72	-97.41	24.31	269.77
707.50		86.21	V	25.50	4.90	116.61	-97.41	19.20	83.18
715.30		91.44	H	25.61	4.92	121.97	-97.41	24.56	285.76
715.30		86.27	V	25.61	4.92	116.80	-97.41	19.39	86.90
699.70	16QAM	90.31	H	25.50	4.89	120.70	-97.41	23.29	213.30
699.70		85.32	V	25.50	4.89	115.71	-97.41	18.30	67.61
707.50		90.22	H	25.50	4.90	120.62	-97.41	23.21	209.41
707.50		85.27	V	25.50	4.90	115.67	-97.41	18.26	66.99
715.30		90.34	H	25.61	4.92	120.87	-97.41	23.46	221.82
715.30		85.44	V	25.61	4.92	115.97	-97.41	18.56	71.78

*1 RB size / 0 Offset

LTE band 12 (3 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dBm)	(㎽)
700.50	QPSK	91.43	H	25.50	4.89	121.82	-97.41	24.41	276.06
700.50		86.11	V	25.50	4.89	116.50	-97.41	19.09	81.10
707.50		91.51	H	25.50	4.90	121.91	-97.41	24.50	281.84
707.50		85.98	V	25.50	4.90	116.38	-97.41	18.97	78.89
714.50		91.49	H	25.59	4.91	121.99	-97.41	24.58	287.08
714.50		86.23	V	25.59	4.91	116.73	-97.41	19.32	85.51
700.50	16QAM	90.19	H	25.50	4.89	120.58	-97.41	23.17	207.49
700.50		85.28	V	25.50	4.89	115.67	-97.41	18.26	66.99
707.50		90.42	H	25.50	4.90	120.82	-97.41	23.41	219.28
707.50		85.12	V	25.50	4.90	115.52	-97.41	18.11	64.71
714.50		90.37	H	25.59	4.91	120.87	-97.41	23.46	221.82
714.50		85.37	V	25.59	4.91	115.87	-97.41	18.46	70.15

*1 RB size / 0 Offset

LTE band 12 (5 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
701.50	QPSK	91.48	H	25.50	4.89	121.87	-97.41	24.46	279.25
701.50		85.60	V	25.50	4.89	115.99	-97.41	18.58	72.11
707.50		91.78	H	25.50	4.90	122.18	-97.41	24.77	299.92
707.50		86.50	V	25.50	4.90	116.90	-97.41	19.49	88.92
713.50		91.68	H	25.57	4.91	122.16	-97.41	24.75	298.54
713.50		86.33	V	25.57	4.91	116.81	-97.41	19.40	87.10
701.50	16QAM	90.28	H	25.50	4.89	120.67	-97.41	23.26	211.84
701.50		85.06	V	25.50	4.89	115.45	-97.41	18.04	63.68
707.50		90.91	H	25.50	4.90	121.31	-97.41	23.90	245.47
707.50		85.07	V	25.50	4.90	115.47	-97.41	18.06	63.97
713.50		90.78	H	25.57	4.91	121.26	-97.41	23.85	242.66
713.50		85.30	V	25.57	4.91	115.78	-97.41	18.37	68.71

*1 RB size / 0 Offset

LTE band 12 (10 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
704.00	QPSK	91.51	H	25.50	4.89	121.90	-97.41	24.49	281.19
704.00		86.01	V	25.50	4.89	116.40	-97.41	18.99	79.25
707.50		91.16	H	25.50	4.90	121.56	-97.41	24.15	260.02
707.50		86.77	V	25.50	4.90	117.17	-97.41	19.76	94.62
711.00		91.82	H	25.52	4.90	122.24	-97.41	24.83	304.09
711.00		86.99	V	25.52	4.90	117.41	-97.41	20.00	100.00
704.00	16QAM	90.68	H	25.50	4.89	121.07	-97.41	23.66	232.27
704.00		85.48	V	25.50	4.89	115.87	-97.41	18.46	70.15
707.50		90.54	H	25.50	4.90	120.94	-97.41	23.53	225.42
707.50		85.58	V	25.50	4.90	115.98	-97.41	18.57	71.94
711.00		90.98	H	25.52	4.90	121.40	-97.41	23.99	250.61
711.00		85.53	V	25.52	4.90	115.95	-97.41	18.54	71.45

*1 RB size / 0 Offset

LTE band 25/2 (1.4 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 850.70	QPSK	81.85	H	27.51	8.66	118.02	-95.26	22.76	188.80
1 850.70		82.20	V	27.51	8.66	118.37	-95.26	23.11	204.64
1 882.50		84.03	H	27.76	8.58	120.37	-95.26	25.11	324.34
1 882.50		83.88	V	27.76	8.58	120.22	-95.26	24.96	313.33
1 914.30		81.27	H	27.79	8.61	117.67	-95.26	22.41	174.18
1 914.30		82.32	V	27.79	8.61	118.72	-95.26	23.46	221.82
1 850.70	16QAM	80.55	H	27.51	8.66	116.72	-95.26	21.46	139.96
1 850.70		81.35	V	27.51	8.66	117.52	-95.26	22.26	168.27
1 882.50		83.03	H	27.76	8.58	119.37	-95.26	24.11	257.63
1 882.50		82.97	V	27.76	8.58	119.31	-95.26	24.05	254.10
1 914.30		80.50	H	27.79	8.61	116.90	-95.26	21.64	145.88
1 914.30		81.10	V	27.79	8.61	117.50	-95.26	22.24	167.49

*1 RB size / 0 Offset

LTE band 25/2 (3 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 851.50	QPSK	82.36	H	27.51	8.65	118.52	-95.26	23.26	211.84
1 851.50		82.15	V	27.51	8.65	118.31	-95.26	23.05	201.84
1 882.50		83.65	H	27.76	8.58	119.99	-95.26	24.73	297.17
1 882.50		83.87	V	27.76	8.58	120.21	-95.26	24.95	312.61
1 913.50		81.26	H	27.79	8.61	117.66	-95.26	22.40	173.78
1 913.50		82.21	V	27.79	8.61	118.61	-95.26	23.35	216.27
1 851.50	16QAM	81.28	H	27.51	8.65	117.44	-95.26	22.18	165.20
1 851.50		81.53	V	27.51	8.65	117.69	-95.26	22.43	174.98
1 882.50		82.94	H	27.76	8.58	119.28	-95.26	24.02	252.35
1 882.50		82.67	V	27.76	8.58	119.01	-95.26	23.75	237.14
1 913.50		80.07	H	27.79	8.61	116.47	-95.26	21.21	132.13
1 913.50		81.35	V	27.79	8.61	117.75	-95.26	22.49	177.42

*1 RB size / 0 Offset

LTE band 25/2 (5 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 852.50	QPSK	80.35	H	27.52	8.65	116.52	-95.26	21.26	133.66
1 852.50		81.53	V	27.52	8.65	117.70	-95.26	22.44	175.39
1 882.50		80.66	H	27.76	8.58	117.00	-95.26	21.74	149.28
1 882.50		82.90	V	27.76	8.58	119.24	-95.26	23.98	250.03
1 912.50		81.22	H	27.80	8.61	117.63	-95.26	22.37	172.58
1 912.50		82.10	V	27.80	8.61	118.51	-95.26	23.25	211.35
1 852.50	16QAM	79.40	H	27.52	8.65	115.57	-95.26	20.31	107.40
1 852.50		80.83	V	27.52	8.65	117.00	-95.26	21.74	149.28
1 882.50		79.86	H	27.76	8.58	116.20	-95.26	20.94	124.17
1 882.50		81.81	V	27.76	8.58	118.15	-95.26	22.89	194.54
1 912.50		80.58	H	27.80	8.61	116.99	-95.26	21.73	148.94
1 912.50		80.69	V	27.80	8.61	117.10	-95.26	21.84	152.76

*1 RB size / 0 Offset

LTE band 25/2 (10 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 855.00	QPSK	82.30	H	27.54	8.64	118.48	-95.26	23.22	209.89
1 855.00		82.00	V	27.54	8.64	118.18	-95.26	22.92	195.88
1 882.50		83.71	H	27.76	8.58	120.05	-95.26	24.79	301.30
1 882.50		83.22	V	27.76	8.58	119.56	-95.26	24.30	269.15
1 910.00		82.48	H	27.82	8.60	118.90	-95.26	23.64	231.21
1 910.00		82.58	V	27.82	8.60	119.00	-95.26	23.74	236.59
1 855.00	16QAM	81.51	H	27.54	8.64	117.69	-95.26	22.43	174.98
1 855.00		81.24	V	27.54	8.64	117.42	-95.26	22.16	164.44
1 882.50		82.73	H	27.76	8.58	119.07	-95.26	23.81	240.44
1 882.50		82.33	V	27.76	8.58	118.67	-95.26	23.41	219.28
1 910.00		81.49	H	27.82	8.60	117.91	-95.26	22.65	184.08
1 910.00		81.45	V	27.82	8.60	117.87	-95.26	22.61	182.39

*1 RB size / 0 Offset

LTE band 25/2 (15 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 857.50	QPSK	79.61	H	27.56	8.63	115.80	-95.26	20.54	113.24
1 857.50		81.89	V	27.56	8.63	118.08	-95.26	22.82	191.43
1 882.50		80.88	H	27.76	8.58	117.22	-95.26	21.96	157.04
1 882.50		82.89	V	27.76	8.58	119.23	-95.26	23.97	249.46
1 907.50		79.91	H	27.84	8.60	116.35	-95.26	21.09	128.53
1 907.50		83.59	V	27.84	8.60	120.03	-95.26	24.77	299.92
1 857.50	16QAM	78.72	H	27.56	8.63	114.91	-95.26	19.65	92.26
1 857.50		81.06	V	27.56	8.63	117.25	-95.26	21.99	158.12
1 882.50		80.04	H	27.76	8.58	116.38	-95.26	21.12	129.42
1 882.50		81.90	V	27.76	8.58	118.24	-95.26	22.98	198.61
1 907.50		78.86	H	27.84	8.60	115.30	-95.26	20.04	100.93
1 907.50		82.64	V	27.84	8.60	119.08	-95.26	23.82	240.99

*1 RB size / 0 Offset

LTE band 25/2 (20 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 860.00	QPSK	80.03	H	27.58	8.62	116.23	-95.26	20.97	125.03
1 860.00		82.10	V	27.58	8.62	118.30	-95.26	23.04	201.37
1 882.50		81.40	H	27.76	8.58	117.74	-95.26	22.48	177.01
1 882.50		82.76	V	27.76	8.58	119.10	-95.26	23.84	242.10
1 905.00		81.05	H	27.86	8.60	117.51	-95.26	22.25	167.88
1 905.50		84.32	V	27.86	8.60	120.78	-95.26	25.52	356.45
1 860.00	16QAM	78.59	H	27.58	8.62	114.79	-95.26	19.53	89.74
1 860.00		80.72	V	27.58	8.62	116.92	-95.26	21.66	146.55
1 882.50		80.75	H	27.76	8.58	117.09	-95.26	21.83	152.41
1 882.50		81.90	V	27.76	8.58	118.24	-95.26	22.98	198.61
1 905.00		80.63	H	27.86	8.60	117.09	-95.26	21.83	152.41
1 905.00		83.47	V	27.86	8.60	119.93	-95.26	24.67	293.09

*1 RB size / 0 Offset

LTE band 26/5 (1.4 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
824.70	QPSK	88.25	H	26.89	5.36	120.50	-97.41	23.09	203.70
824.70		87.26	V	26.89	5.36	119.51	-97.41	22.10	162.18
836.50		87.57	H	27.30	5.38	120.25	-97.41	22.84	192.31
836.50		86.55	V	27.30	5.38	119.23	-97.41	21.82	152.05
848.30		87.06	H	27.43	5.43	119.92	-97.41	22.51	178.24
848.30		87.41	V	27.43	5.43	120.27	-97.41	22.86	193.20
824.70	16QAM	87.93	H	26.89	5.36	120.18	-97.41	22.77	189.23
824.70		86.57	V	26.89	5.36	118.82	-97.41	21.41	138.36
836.50		86.75	H	27.30	5.38	119.43	-97.41	22.02	159.22
836.50		85.48	V	27.30	5.38	118.16	-97.41	20.75	118.85
848.30		86.04	H	27.43	5.43	118.90	-97.41	21.49	140.93
848.30		86.31	V	27.43	5.43	119.17	-97.41	21.76	149.97

*1 RB size / 0 Offset

LTE band 26/5 (3 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
825.50	QPSK	88.85	H	26.92	5.36	121.13	-97.41	23.72	235.50
825.50		87.14	V	26.92	5.36	119.42	-97.41	22.01	158.85
836.50		87.37	H	27.30	5.38	120.05	-97.41	22.64	183.65
836.50		86.59	V	27.30	5.38	119.27	-97.41	21.86	153.46
847.50		87.56	H	27.40	5.43	120.39	-97.41	22.98	198.61
847.50		86.93	V	27.40	5.43	119.76	-97.41	22.35	171.79
825.50	16QAM	88.09	H	26.92	5.36	120.37	-97.41	22.96	197.70
825.50		86.32	V	26.92	5.36	118.60	-97.41	21.19	131.52
836.50		86.13	H	27.30	5.38	118.81	-97.41	21.40	138.04
836.50		85.65	V	27.30	5.38	118.33	-97.41	20.92	123.59
847.50		86.44	H	27.40	5.43	119.27	-97.41	21.86	153.46
847.50		86.17	V	27.40	5.43	119.00	-97.41	21.59	144.21

*1 RB size / 0 Offset

LTE band 26/5 (5 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
826.50	QPSK	89.10	H	26.96	5.36	121.42	-97.41	24.01	251.77
826.50		87.05	V	26.96	5.36	119.37	-97.41	21.96	157.04
836.50		87.21	H	27.30	5.38	119.89	-97.41	22.48	177.01
836.50		86.50	V	27.30	5.38	119.18	-97.41	21.77	150.31
846.50		86.63	H	27.36	5.42	119.41	-97.41	22.00	158.49
846.50		86.49	V	27.36	5.42	119.27	-97.41	21.86	153.46
826.50	16QAM	87.91	H	26.96	5.36	120.23	-97.41	22.82	191.43
826.50		86.23	V	26.96	5.36	118.55	-97.41	21.14	130.02
836.50		86.07	H	27.30	5.38	118.75	-97.41	21.34	136.14
836.50		85.48	V	27.30	5.38	118.16	-97.41	20.75	118.85
846.50		86.03	H	27.36	5.42	118.81	-97.41	21.40	138.04
846.50		85.51	V	27.36	5.42	118.29	-97.41	20.88	122.46

*1 RB size / 0 Offset

LTE band 26/5 (10 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
829.00	QPSK	88.86	H	27.06	5.37	121.29	-97.41	23.88	244.34
829.00		86.89	V	27.06	5.37	119.32	-97.41	21.91	155.24
836.50		87.82	H	27.30	5.38	120.50	-97.41	23.09	203.70
836.50		86.33	V	27.30	5.38	119.01	-97.41	21.60	144.54
844.00		87.33	H	27.30	5.40	120.03	-97.41	22.62	182.81
844.00		86.56	V	27.30	5.40	119.26	-97.41	21.85	153.11
829.00	16QAM	88.23	H	27.06	5.37	120.66	-97.41	23.25	211.35
829.00		85.95	V	27.06	5.37	118.38	-97.41	20.97	125.03
836.50		86.92	H	27.30	5.38	119.60	-97.41	22.19	165.58
836.50		85.46	V	27.30	5.38	118.14	-97.41	20.73	118.30
844.00		86.49	H	27.30	5.40	119.19	-97.41	21.78	150.66
844.00		85.97	V	27.30	5.40	118.67	-97.41	21.26	133.66

*1 RB size / 0 Offset

LTE band 26 (15 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
831.50	QPSK	88.69	H	27.16	5.37	121.22	-97.41	23.81	240.44
831.50		87.35	V	27.16	5.37	119.88	-97.41	22.47	176.60
841.50		87.58	H	27.30	5.39	120.27	-97.41	22.86	193.20
841.50		86.43	V	27.30	5.39	119.12	-97.41	21.71	148.25
831.50	16QAM	88.05	H	27.16	5.37	120.58	-97.41	23.17	207.49
831.50		86.41	V	27.16	5.37	118.94	-97.41	21.53	142.23
841.50		86.60	H	27.30	5.39	119.29	-97.41	21.88	154.17
841.50		85.34	V	27.30	5.39	118.03	-97.41	20.62	115.35

*1 RB size / 0 Offset

LTE band 41 (5 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
2 498.50	QPSK	74.91	H	28.31	9.93	113.15	-95.26	17.89	61.52
2 498.50		75.45	V	28.31	9.93	113.69	-95.26	18.43	69.66
2 593.00		80.50	H	28.56	10.29	119.35	-95.26	24.09	256.45
2 593.00		80.15	V	28.56	10.29	119.00	-95.26	23.74	236.59
2 687.50		77.84	H	28.85	10.50	117.19	-95.26	21.93	155.96
2 687.50		77.24	V	28.85	10.50	116.59	-95.26	21.33	135.83
2 498.50	16QAM	73.56	H	28.31	9.93	111.80	-95.26	16.54	45.08
2 498.50		74.55	V	28.31	9.93	112.79	-95.26	17.53	56.62
2 593.00		79.63	H	28.56	10.29	118.48	-95.26	23.22	209.89
2 593.00		79.31	V	28.56	10.29	118.16	-95.26	22.90	194.98
2 687.50		76.77	H	28.85	10.50	116.12	-95.26	20.86	121.90
2 687.50		76.26	V	28.85	10.50	115.61	-95.26	20.35	108.39

*1 RB size / 0 Offset

LTE band 41 (10 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
2 501.00	QPSK	75.28	H	28.30	9.93	113.51	-95.26	18.25	66.83
2 501.00		75.76	V	28.30	9.93	113.99	-95.26	18.73	74.64
2 593.00		80.40	H	28.56	10.29	119.25	-95.26	23.99	250.61
2 593.00		80.45	V	28.56	10.29	119.30	-95.26	24.04	253.51
2 685.00		78.92	H	28.86	10.51	118.29	-95.26	23.03	200.91
2 685.00		78.64	V	28.86	10.51	118.01	-95.26	22.75	188.36
2 501.00	16QAM	74.34	H	28.30	9.93	112.57	-95.26	17.31	53.83
2 501.00		75.03	V	28.30	9.93	113.26	-95.26	18.00	63.10
2 593.00		78.94	H	28.56	10.29	117.79	-95.26	22.53	179.06
2 593.00		78.75	V	28.56	10.29	117.60	-95.26	22.34	171.40
2 685.00		77.91	H	28.86	10.51	117.28	-95.26	22.02	159.22
2 685.00		77.84	V	28.86	10.51	117.21	-95.26	21.95	156.68

*1 RB size / 0 Offset

LTE band 41 (15 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
2 503.50	QPSK	75.24	H	28.30	9.94	113.48	-95.26	18.22	66.37
2 503.50		74.98	V	28.30	9.94	113.22	-95.26	17.96	62.52
2 593.00		79.42	H	28.56	10.29	118.27	-95.26	23.01	199.99
2 593.00		79.54	V	28.56	10.29	118.39	-95.26	23.13	205.59
2 682.50		80.60	H	28.87	10.52	119.99	-95.26	24.73	297.17
2 682.50		79.74	V	28.87	10.52	119.13	-95.26	23.87	243.78
2 503.50	16QAM	74.13	H	28.30	9.94	112.37	-95.26	17.11	51.40
2 503.50		73.85	V	28.30	9.94	112.09	-95.26	16.83	48.19
2 593.00		78.12	H	28.56	10.29	116.97	-95.26	21.71	148.25
2 593.00		77.58	V	28.56	10.29	116.43	-95.26	21.17	130.92
2 682.50		79.62	H	28.87	10.52	119.01	-95.26	23.75	237.14
2 682.50		79.41	V	28.87	10.52	118.80	-95.26	23.54	225.94

*1 RB size / 0 Offset

LTE band 41 (20 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
2 506.00	QPSK	75.27	H	28.30	9.94	113.51	-95.26	18.25	66.83
2 506.00		74.76	V	28.30	9.94	113.00	-95.26	17.74	59.43
2 593.00		80.43	H	28.56	10.29	119.28	-95.26	24.02	252.35
2 593.00		80.24	V	28.56	10.29	119.09	-95.26	23.83	241.55
2 680.00		80.25	H	28.88	10.52	119.65	-95.26	24.39	274.79
2 680.00		80.08	V	28.88	10.52	119.48	-95.26	24.22	264.24
2 506.00	16QAM	74.23	H	28.30	9.94	112.47	-95.26	17.21	52.60
2 506.00		74.11	V	28.30	9.94	112.35	-95.26	17.09	51.17
2 593.00		79.55	H	28.56	10.29	118.40	-95.26	23.14	206.06
2 593.00		79.04	V	28.56	10.29	117.89	-95.26	22.63	183.23
2 680.00		79.37	H	28.88	10.52	118.77	-95.26	23.51	224.39
2 680.00		78.48	V	28.88	10.52	117.88	-95.26	22.62	182.81

*1 RB size / 0 Offset

LTE band 66/4 (1.4 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 710.70	QPSK	81.55	H	26.96	8.21	116.72	-95.26	21.46	139.96
1 710.70		82.60	V	26.96	8.21	117.77	-95.26	22.51	178.24
1 745.00		83.74	H	26.82	8.34	118.90	-95.26	23.64	231.21
1 745.00		84.65	V	26.82	8.34	119.81	-95.26	24.55	285.10
1 779.30		81.73	H	26.80	8.30	116.83	-95.26	21.57	143.55
1 779.30		83.70	V	26.80	8.30	118.80	-95.26	23.54	225.94
1 710.70	16QAM	80.67	H	26.96	8.21	115.84	-95.26	20.58	114.29
1 710.70		81.54	V	26.96	8.21	116.71	-95.26	21.45	139.64
1 745.00		82.88	H	26.82	8.34	118.04	-95.26	22.78	189.67
1 745.00		83.69	V	26.82	8.34	118.85	-95.26	23.59	228.56
1 779.30		80.43	H	26.80	8.30	115.53	-95.26	20.27	106.41
1 779.30		82.28	V	26.80	8.30	117.38	-95.26	22.12	162.93

*1 RB size / 0 Offset

LTE band 66/4 (3 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 711.50	QPSK	81.78	H	26.95	8.21	116.94	-95.26	21.68	147.23
1 711.50		82.19	V	26.95	8.21	117.35	-95.26	22.09	161.81
1 745.00		83.86	H	26.82	8.34	119.02	-95.26	23.76	237.68
1 745.00		84.39	V	26.82	8.34	119.55	-95.26	24.29	268.53
1 778.50		81.84	H	26.80	8.29	116.93	-95.26	21.67	146.89
1 778.50		84.04	V	26.80	8.29	119.13	-95.26	23.87	243.78
1 711.50	16QAM	80.81	H	26.95	8.21	115.97	-95.26	20.71	117.76
1 711.50		81.52	V	26.95	8.21	116.68	-95.26	21.42	138.68
1 745.00		82.56	H	26.82	8.34	117.72	-95.26	22.46	176.20
1 745.00		83.34	V	26.82	8.34	118.50	-95.26	23.24	210.86
1 778.50		80.44	H	26.80	8.29	115.53	-95.26	20.27	106.41
1 778.50		82.79	V	26.80	8.29	117.88	-95.26	22.62	182.81

*1 RB size / 0 Offset

LTE band 66/4 (5 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 712.50	QPSK	81.68	H	26.95	8.21	116.84	-95.26	21.58	143.88
1 712.50		82.34	V	26.95	8.21	117.50	-95.26	22.24	167.49
1 745.00		83.70	H	26.82	8.34	118.86	-95.26	23.60	229.09
1 745.00		84.23	V	26.82	8.34	119.39	-95.26	24.13	258.82
1 777.50		82.64	H	26.80	8.29	117.73	-95.26	22.47	176.60
1 777.50		83.29	V	26.80	8.29	118.38	-95.26	23.12	205.12
1 712.50	16QAM	80.97	H	26.95	8.21	116.13	-95.26	20.87	122.18
1 712.50		82.00	V	26.95	8.21	117.16	-95.26	21.90	154.88
1 745.00		82.89	H	26.82	8.34	118.05	-95.26	22.79	190.11
1 745.00		84.01	V	26.82	8.34	119.17	-95.26	23.91	246.04
1 777.50		81.89	H	26.80	8.29	116.98	-95.26	21.72	148.59
1 777.50		82.56	V	26.80	8.29	117.65	-95.26	22.39	173.38

*1 RB size / 0 Offset

LTE band 66/4 (10 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 715.00	QPSK	82.24	H	26.94	8.21	117.39	-95.26	22.13	163.31
1 715.00		83.12	V	26.94	8.21	118.27	-95.26	23.01	199.99
1 745.00		84.29	H	26.82	8.34	119.45	-95.26	24.19	262.42
1 745.00		85.02	V	26.82	8.34	120.18	-95.26	24.92	310.46
1 775.00		82.81	H	26.80	8.27	117.88	-95.26	22.62	182.81
1 775.00		83.44	V	26.80	8.27	118.51	-95.26	23.25	211.35
1 715.00	16QAM	80.80	H	26.94	8.21	115.95	-95.26	20.69	117.22
1 715.00		81.33	V	26.94	8.21	116.48	-95.26	21.22	132.43
1 745.00		83.21	H	26.82	8.34	118.37	-95.26	23.11	204.64
1 745.00		84.31	V	26.82	8.34	119.47	-95.26	24.21	263.63
1 775.00		81.22	H	26.80	8.27	116.29	-95.26	21.03	126.77
1 775.00		82.03	V	26.80	8.27	117.10	-95.26	21.84	152.76

*1 RB size / 0 Offset

LTE band 66/4 (15 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 717.50	QPSK	82.55	H	26.93	8.21	117.69	-95.26	22.43	174.98
1 717.50		83.29	V	26.93	8.21	118.43	-95.26	23.17	207.49
1 745.00		84.37	H	26.82	8.34	119.53	-95.26	24.27	267.30
1 745.00		85.11	V	26.82	8.34	120.27	-95.26	25.01	316.96
1 772.50		83.27	H	26.80	8.28	118.35	-95.26	23.09	203.70
1 772.50		84.19	V	26.80	8.28	119.27	-95.26	24.01	251.77
1 717.50	16QAM	81.47	H	26.93	8.21	116.61	-95.26	21.35	136.46
1 717.50		82.34	V	26.93	8.21	117.48	-95.26	22.22	166.72
1 745.00		83.46	H	26.82	8.34	118.62	-95.26	23.36	216.77
1 745.00		84.27	V	26.82	8.34	119.43	-95.26	24.17	261.22
1 772.50		81.87	H	26.80	8.28	116.95	-95.26	21.69	147.57
1 772.50		82.97	V	26.80	8.28	118.05	-95.26	22.79	190.11

*1 RB size / 0 Offset

LTE band 66/4 (20 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P.	
								(dB m)	(㎽)
1 720.00	QPSK	82.21	H	26.92	8.20	117.33	-95.26	22.07	161.06
1 720.00		83.19	V	26.92	8.20	118.31	-95.26	23.05	201.84
1 745.00		84.34	H	26.82	8.34	119.50	-95.26	24.24	265.46
1 745.00		85.25	V	26.82	8.34	120.41	-95.26	25.15	327.34
1 770.00		84.34	H	26.80	8.29	119.43	-95.26	24.17	261.22
1 770.00		85.51	V	26.80	8.29	120.60	-95.26	25.34	341.98
1 720.00	16QAM	81.21	H	26.92	8.20	116.33	-95.26	21.07	127.94
1 720.00		82.11	V	26.92	8.20	117.23	-95.26	21.97	157.40
1 745.00		83.31	H	26.82	8.34	118.47	-95.26	23.21	209.41
1 745.00		84.20	V	26.82	8.34	119.36	-95.26	24.10	257.04
1 770.00		83.59	H	26.80	8.29	118.68	-95.26	23.42	219.79
1 770.00		84.38	V	26.80	8.29	119.47	-95.26	24.21	263.63

*1 RB size / 0 Offset

LTE band 71 (5 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
665.50	QPSK	74.77	H	25.31	4.74	104.82	-97.41	7.41	5.51
665.50		87.21	V	25.31	4.74	117.26	-97.41	19.85	96.61
680.50		82.16	H	25.40	4.82	112.38	-97.41	14.97	31.41
680.50		87.55	V	25.40	4.82	117.77	-97.41	20.36	108.64
695.50		84.48	H	25.50	4.87	114.85	-97.41	17.44	55.46
695.50		86.66	V	25.50	4.87	117.03	-97.41	19.62	91.62
665.50	16QAM	74.19	H	25.31	4.74	104.24	-97.41	6.83	4.82
665.50		86.59	V	25.31	4.74	116.64	-97.41	19.23	83.75
680.50		81.05	H	25.40	4.82	111.27	-97.41	13.86	24.32
680.50		86.51	V	25.40	4.82	116.73	-97.41	19.32	85.51
695.50		83.51	H	25.50	4.87	113.88	-97.41	16.47	44.36
695.50		85.66	V	25.50	4.87	116.03	-97.41	18.62	72.78

*1 RB size / 0 Offset

LTE band 71 (10 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
668.00	QPSK	75.21	H	25.36	4.75	105.32	-97.41	7.91	6.18
668.00		87.14	V	25.36	4.75	117.25	-97.41	19.84	96.38
680.50		81.33	H	25.40	4.82	111.55	-97.41	14.14	25.94
680.50		87.83	V	25.40	4.82	118.05	-97.41	20.64	115.88
693.00		83.95	H	25.50	4.86	114.31	-97.41	16.90	48.98
693.00		86.99	V	25.50	4.86	117.35	-97.41	19.94	98.63
668.00	16QAM	74.29	H	25.36	4.75	104.40	-97.41	6.99	5.00
668.00		86.79	V	25.36	4.75	116.90	-97.41	19.49	88.92
680.50		80.65	H	25.40	4.82	110.87	-97.41	13.46	22.18
680.50		86.88	V	25.40	4.82	117.10	-97.41	19.69	93.11
693.00		83.21	H	25.50	4.86	113.57	-97.41	16.16	41.30
693.00		85.71	V	25.50	4.86	116.07	-97.41	18.66	73.45

*1 RB size / 0 Offset

LTE band 71 (15 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
670.50	QPSK	75.46	H	25.40	4.76	105.62	-97.41	8.21	6.62
670.50		87.47	V	25.40	4.76	117.63	-97.41	20.22	105.20
680.50		80.60	H	25.40	4.82	110.82	-97.41	13.41	21.93
680.50		87.76	V	25.40	4.82	117.98	-97.41	20.57	114.02
690.50		83.23	H	25.50	4.85	113.58	-97.41	16.17	41.40
690.50		87.27	V	25.50	4.85	117.62	-97.41	20.21	104.95
670.50	16QAM	74.49	H	25.40	4.76	104.65	-97.41	7.24	5.30
670.50		86.94	V	25.40	4.76	117.10	-97.41	19.69	93.11
680.50		79.68	H	25.40	4.82	109.90	-97.41	12.49	17.74
680.50		86.88	V	25.40	4.82	117.10	-97.41	19.69	93.11
690.50		82.57	H	25.50	4.85	112.92	-97.41	15.51	35.56
690.50		85.48	V	25.50	4.85	115.83	-97.41	18.42	69.50

*1 RB size / 0 Offset

LTE band 71 (20 ㎒)

Frequency (㎒)	Mode	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	CL (dB)	E (dBμV/m)	CF (dB)	E.R.P.	
								(dB m)	(㎽)
673.00	QPSK	75.51	H	25.40	4.78	105.69	-97.41	8.28	6.73
673.00		87.65	V	25.40	4.78	117.83	-97.41	20.42	110.15
680.50		79.60	H	25.40	4.82	109.82	-97.41	12.41	17.42
680.50		87.90	V	25.40	4.82	118.12	-97.41	20.71	117.76
688.00		82.51	H	25.46	4.84	112.81	-97.41	15.40	34.67
688.00		87.95	V	25.46	4.84	118.25	-97.41	20.84	121.34
673.00	16QAM	74.48	H	25.40	4.78	104.66	-97.41	7.25	5.31
673.00		86.50	V	25.40	4.78	116.68	-97.41	19.27	84.53
680.50		78.89	H	25.40	4.82	109.11	-97.41	11.70	14.79
680.50		86.73	V	25.40	4.82	116.95	-97.41	19.54	89.95
688.00		81.47	H	25.46	4.84	111.77	-97.41	14.36	27.29
688.00		87.17	V	25.46	4.84	117.47	-97.41	20.06	101.39

*1 RB size / 0 Offset

Remark;

1. AF = Antenna Factor, CL = Cable Loss, CF = Conversion Factor.
2. E (dBμV/m) = Measured Level (dBμV) + Antenna Factor (dB/m) + Cable Loss (dB).
3. E.I.R.P. (dB m) = E (dBμV/m) + CF (dB).
4. E.R.P. (dB m) = E (dBμV/m) + CF (dB) - 2.15 (dB); where E.R.P. and E.I.R.P. are expressed in consistent units.
5. CF (dB) = 20 log D - 104.8; where D is the measurement distance in meters, According to KDB 971168 D01 v03r01 5.8.4.

2.5. Spurious radiated emission

LTE band 12 (1.4 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dB m)	Limit (dB m)	Margin (dB)
Low Channel (699.7 ㎒)									
1 398.69	48.88	H	24.90	-37.66	36.12	-97.41	-61.29	-13	48.29
1 398.58	48.62	V	24.90	-37.66	35.86	-97.41	-61.55	-13	48.55
Middle Channel (707.5 ㎒)									
1 414.06	57.07	H	24.98	-37.59	44.46	-97.41	-52.95	-13	39.95
1 414.20	57.10	V	24.99	-37.59	44.50	-97.41	-52.91	-13	39.91
High Channel (715.3 ㎒)									
1 429.62	45.49	H	25.08	-37.51	33.06	-97.41	-64.35	-13	51.35
1 429.48	45.28	V	25.08	-37.51	32.85	-97.41	-64.56	-13	51.56

*1 RB size / 0 Offset

LTE band 12 (3 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dB m)	Limit (dB m)	Margin (dB)
Low Channel (700.5 ㎒)									
1 398.57	50.27	H	24.90	-37.66	37.51	-97.41	-59.90	-13	46.90
1 398.62	50.11	V	24.90	-37.66	37.35	-97.41	-60.06	-13	47.06
Middle Channel (707.5 ㎒)									
1 412.56	56.37	H	24.98	-37.60	43.75	-97.41	-53.66	-13	40.66
1 412.50	56.08	V	24.98	-37.60	43.46	-97.41	-53.95	-13	40.95
High Channel (714.5 ㎒)									
1 426.69	45.79	H	25.06	-37.53	33.32	-97.41	-64.09	-13	51.09
1 426.64	45.44	V	25.06	-37.53	32.97	-97.41	-64.44	-13	51.44

*1 RB size / 0 Offset

LTE band 12 (5 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (701.5 ㎒)									
1 398.79	52.04	H	24.90	-37.66	39.28	-97.41	-58.13	-13	45.13
1 398.50	54.34	V	24.90	-37.66	41.58	-97.41	-55.83	-13	42.83
Middle Channel (707.5 ㎒)									
1 410.66	58.66	H	24.96	-37.61	46.01	-97.41	-51.40	-13	38.40
1 410.66	57.96	V	24.96	-37.61	45.31	-97.41	-52.10	-13	39.10
High Channel (713.5 ㎒)									
1 422.53	53.19	H	25.04	-37.55	40.68	-97.41	-56.73	-13	43.73
1 422.72	49.04	V	25.04	-37.55	36.53	-97.41	-60.88	-13	47.88

*1 RB size / 0 Offset

LTE band 12 (10 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (704.0 ㎒)									
1 399.37	52.67	H	24.90	-37.67	39.90	-97.41	-57.51	-13	44.51
1 399.20	55.39	V	24.90	-37.66	42.63	-97.41	-54.78	-13	41.78
Middle Channel (707.5 ㎒)									
1 406.32	54.84	H	24.94	-37.64	42.14	-97.41	-55.27	-13	42.27
1 406.05	55.50	V	24.94	-37.64	42.80	-97.41	-54.61	-13	41.61
High Channel (711.0 ㎒)									
1 413.26	58.88	H	24.98	-37.60	46.26	-97.41	-51.15	-13	38.15
1 413.15	58.51	V	24.98	-37.60	45.89	-97.41	-51.52	-13	38.52

*1 RB size / 0 Offset

LTE band 25/2 (1.4 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 850.7 ㎒)									
5 550.71	65.11	H	34.00	-29.17	69.94	-95.26	-25.32	-13	12.32
5 550.87	64.32	V	34.00	-29.17	69.15	-95.26	-26.11	-13	13.11
7 401.02	55.05	H	36.00	-27.16	63.89	-95.26	-31.37	-13	18.37
7 401.02	55.33	V	36.00	-27.16	64.17	-95.26	-31.09	-13	18.09
9 251.33	55.16	H	37.01	-24.13	68.04	-95.26	-27.22	-13	14.22
9 251.40	54.90	V	37.01	-24.13	67.78	-95.26	-27.48	-13	14.48
Middle Channel (1 882.5 ㎒)									
5 646.26	66.16	H	34.00	-28.95	71.21	-95.26	-24.05	-13	11.05
5 646.29	64.97	V	34.00	-28.95	70.02	-95.26	-25.24	-13	12.24
7 528.19	57.02	H	36.00	-27.08	65.94	-95.26	-29.32	-13	16.32
7 528.13	56.73	V	36.00	-27.08	65.65	-95.26	-29.61	-13	16.61
9 410.31	55.39	H	37.44	-24.02	68.81	-95.26	-26.45	-13	13.45
9 410.31	56.51	V	37.44	-24.02	69.93	-95.26	-25.33	-13	12.33
High Channel (1 914.3 ㎒)									
5 741.51	71.63	H	34.02	-28.94	76.71	-95.26	-18.55	-13	5.55
5 741.80	69.88	V	34.02	-28.95	74.95	-95.26	-20.31	-13	7.31
7 655.48	59.98	H	35.99	-26.84	69.13	-95.26	-26.13	-13	13.13
7 655.36	59.04	V	35.99	-26.84	68.19	-95.26	-27.07	-13	14.07
9 569.42	57.38	H	37.50	-23.62	71.26	-95.26	-24.00	-13	11.00
9 569.42	55.43	V	37.50	-23.62	69.31	-95.26	-25.95	-13	12.95

*1 RB size / 0 Offset

LTE band 25/2 (3 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 851.5 ㎒)									
5 550.82	64.68	H	34.00	-29.17	69.51	-95.26	-25.75	-13	12.75
5 551.21	63.90	V	34.00	-29.17	68.73	-95.26	-26.53	-13	13.53
7 401.02	55.28	H	36.00	-27.16	64.12	-95.26	-31.14	-13	18.14
7 401.08	55.26	V	36.00	-27.16	64.10	-95.26	-31.16	-13	18.16
9 251.40	55.36	H	37.01	-24.13	68.24	-95.26	-27.02	-13	14.02
9 251.27	55.60	V	37.01	-24.13	68.48	-95.26	-26.78	-13	13.78
Middle Channel (1 882.5 ㎒)									
5 643.68	65.54	H	34.00	-28.97	70.57	-95.26	-24.69	-13	11.69
5 643.83	64.67	V	34.00	-28.97	69.70	-95.26	-25.56	-13	12.56
7 524.88	56.68	H	36.00	-27.08	65.60	-95.26	-29.66	-13	16.66
7 524.81	56.66	V	36.00	-27.08	65.58	-95.26	-29.68	-13	16.68
9 406.31	56.10	H	37.43	-24.04	69.49	-95.26	-25.77	-13	12.77
9 406.19	55.42	V	37.42	-24.04	68.80	-95.26	-26.46	-13	13.46
High Channel (1 913.5 ㎒)									
5 736.68	71.56	H	34.03	-28.96	76.63	-95.26	-18.63	-13	5.63
5 737.17	70.47	V	34.03	-28.95	75.55	-95.26	-19.71	-13	6.71
7 649.05	59.85	H	36.00	-26.85	69.00	-95.26	-26.26	-13	13.26
7 649.17	59.74	V	36.00	-26.85	68.89	-95.26	-26.37	-13	13.37
9 561.17	58.84	H	37.50	-23.60	72.74	-95.26	-22.52	-13	9.52
9 561.04	56.74	V	37.50	-23.60	70.64	-95.26	-24.62	-13	11.62

*1 RB size / 0 Offset

LTE band 25/2 (5 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 852.5 ㎒)									
5 551.06	64.26	H	34.00	-29.17	69.09	-95.26	-26.17	-13	13.17
5 551.71	63.64	V	34.00	-29.17	68.47	-95.26	-26.79	-13	13.79
7 401.45	55.20	H	36.00	-27.16	64.04	-95.26	-31.22	-13	18.22
7 401.27	55.35	V	36.00	-27.16	64.19	-95.26	-31.07	-13	18.07
9 251.77	55.31	H	37.01	-24.13	68.19	-95.26	-27.07	-13	14.07
9 251.83	54.94	V	37.01	-24.13	67.82	-95.26	-27.44	-13	14.44
Middle Channel (1 882.5 ㎒)									
5 641.06	65.01	H	34.00	-28.98	70.03	-95.26	-25.23	-13	12.23
5 641.66	64.22	V	34.00	-28.98	69.24	-95.26	-26.02	-13	13.02
7 521.25	55.71	H	36.00	-27.07	64.64	-95.26	-30.62	-13	17.62
7 521.31	55.91	V	36.00	-27.07	64.84	-95.26	-30.42	-13	17.42
9 401.75	55.12	H	37.41	-24.05	68.48	-95.26	-26.78	-13	13.78
9 401.63	54.98	V	37.41	-24.05	68.34	-95.26	-26.92	-13	13.92
High Channel (1 912.5 ㎒)									
5 731.06	69.76	H	34.04	-28.97	74.83	-95.26	-20.43	-13	7.43
5 731.16	68.98	V	34.04	-28.97	74.05	-95.26	-21.21	-13	8.21
7 641.05	60.01	H	36.00	-26.88	69.13	-95.26	-26.13	-13	13.13
7 641.24	59.19	V	36.00	-26.87	68.32	-95.26	-26.94	-13	13.94
9 551.61	58.75	H	37.50	-23.56	72.69	-95.26	-22.57	-13	9.57
9 551.34	57.06	V	37.50	-23.56	71.00	-95.26	-24.26	-13	11.26

*1 RB size / 0 Offset

LTE band 25/2 (10 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 855.0 ㎒)									
5 551.83	63.93	H	34.00	-29.17	68.76	-95.26	-26.50	-13	13.50
5 551.99	63.29	V	34.00	-29.17	68.12	-95.26	-27.14	-13	14.14
7 402.52	55.11	H	36.00	-27.16	63.95	-95.26	-31.31	-13	18.31
7 402.32	55.61	V	36.00	-27.16	64.45	-95.26	-30.81	-13	17.81
9 253.15	55.17	H	37.01	-24.13	68.05	-95.26	-27.21	-13	14.21
9 253.56	54.33	V	37.01	-24.13	67.21	-95.26	-28.05	-13	15.05
Middle Channel (1 882.5 ㎒)									
5 634.31	64.71	H	34.00	-29.03	69.68	-95.26	-25.58	-13	12.58
5 634.48	64.11	V	34.00	-29.03	69.08	-95.26	-26.18	-13	13.18
7 512.63	54.75	H	36.00	-27.04	63.71	-95.26	-31.55	-13	18.55
7 512.50	54.62	V	36.00	-27.03	63.59	-95.26	-31.67	-13	18.67
9 390.32	54.44	H	37.40	-24.07	67.77	-95.26	-27.49	-13	14.49
9 390.12	54.37	V	37.40	-24.07	67.70	-95.26	-27.56	-13	14.56
High Channel (1 910.0 ㎒)									
5 718.21	62.04	H	34.06	-29.01	67.09	-95.26	-28.17	-13	15.17
5 716.96	64.14	V	34.07	-29.01	69.20	-95.26	-26.06	-13	13.06
7 622.49	56.47	H	36.00	-26.94	65.53	-95.26	-29.73	-13	16.73
7 622.36	56.25	V	36.00	-26.94	65.31	-95.26	-29.95	-13	16.95
9 527.92	55.12	H	37.54	-23.66	69.00	-95.26	-26.26	-13	13.26
9 527.64	53.41	V	37.54	-23.66	67.29	-95.26	-27.97	-13	14.97

*1 RB size / 0 Offset

LTE band 25/2 (15 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 857.5 ㎒)									
5 552.67	63.00	H	34.00	-29.17	67.83	-95.26	-27.43	-13	14.43
5 552.71	63.22	V	34.00	-29.17	68.05	-95.26	-27.21	-13	14.21
7 403.58	55.00	H	36.00	-27.17	63.83	-95.26	-31.43	-13	18.43
7 403.45	55.64	V	36.00	-27.17	64.47	-95.26	-30.79	-13	17.79
9 254.21	54.99	H	37.02	-24.13	67.88	-95.26	-27.38	-13	14.38
9 254.54	54.82	V	37.02	-24.13	67.71	-95.26	-27.55	-13	14.55
Middle Channel (1 882.5 ㎒)									
5 627.38	64.79	H	34.00	-29.09	69.70	-95.26	-25.56	-13	12.56
5 627.96	64.38	V	34.00	-29.08	69.30	-95.26	-25.96	-13	12.96
7 503.44	54.14	H	36.00	-27.00	63.14	-95.26	-32.12	-13	19.12
7 503.38	53.56	V	36.00	-27.00	62.56	-95.26	-32.70	-13	19.70
9 379.25	54.19	H	37.40	-24.08	67.51	-95.26	-27.75	-13	14.75
9 379.19	54.17	V	37.40	-24.08	67.49	-95.26	-27.77	-13	14.77
High Channel (1 907.5 ㎒)									
5 702.53	66.67	H	34.09	-29.05	71.71	-95.26	-23.55	-13	10.55
5 703.22	66.93	V	34.09	-29.05	71.97	-95.26	-23.29	-13	10.29
7 603.43	54.67	H	36.00	-26.99	63.68	-95.26	-31.58	-13	18.58
7 603.43	55.02	V	36.00	-26.99	64.03	-95.26	-31.23	-13	18.23
9 504.43	54.81	H	37.59	-23.78	68.62	-95.26	-26.64	-13	13.64
9 504.33	52.95	V	37.59	-23.78	66.76	-95.26	-28.50	-13	15.50

*1 RB size / 0 Offset

LTE band 25/2 (20 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 860.0 ㎒)									
5 553.37	62.68	H	34.00	-29.18	67.50	-95.26	-27.76	-13	14.76
5 553.34	63.00	V	34.00	-29.18	67.82	-95.26	-27.44	-13	14.44
7 404.39	55.39	H	36.00	-27.17	64.22	-95.26	-31.04	-13	18.04
7 404.33	55.68	V	36.00	-27.17	64.51	-95.26	-30.75	-13	17.75
9 255.46	54.72	H	37.02	-24.13	67.61	-95.26	-27.65	-13	14.65
9 255.46	54.96	V	37.02	-24.13	67.85	-95.26	-27.41	-13	14.41
Middle Channel (1 882.5 ㎒)									
5 620.87	65.84	H	34.00	-29.13	70.71	-95.26	-24.55	-13	11.55
5 620.73	65.53	V	34.00	-29.13	70.40	-95.26	-24.86	-13	11.86
7 494.50	54.42	H	36.00	-27.01	63.41	-95.26	-31.85	-13	18.85
7 494.57	54.02	V	36.00	-27.01	63.01	-95.26	-32.25	-13	19.25
9 367.82	54.84	H	37.40	-24.08	68.16	-95.26	-27.10	-13	14.10
9 367.56	53.86	V	37.40	-24.08	67.18	-95.26	-28.08	-13	15.08
High Channel (1 905.0 ㎒)									
5 687.33	67.87	H	34.07	-29.02	72.92	-95.26	-22.34	-13	9.34
5 688.74	68.40	V	34.08	-29.03	73.45	-95.26	-21.81	-13	8.81
7 584.49	57.11	H	36.00	-27.05	66.06	-95.26	-29.20	-13	16.20
7 584.49	56.40	V	36.00	-27.05	65.35	-95.26	-29.91	-13	16.91
9 480.49	56.31	H	37.60	-23.84	70.07	-95.26	-25.19	-13	12.19
9 480.73	55.46	V	37.60	-23.84	69.22	-95.26	-26.04	-13	13.04

*1 RB size / 0 Offset

LTE band 26/5 (1.4 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (824.7 ㎒)									
1 648.50	56.84	H	25.78	-36.80	45.82	-97.41	-51.59	-13	38.59
1 648.87	55.12	V	25.78	-36.80	44.10	-97.41	-53.31	-13	40.31
Middle Channel (836.5 ㎒)									
1 672.25	54.79	H	26.33	-36.65	44.47	-97.41	-52.94	-13	39.94
1 672.81	53.29	V	26.35	-36.65	42.99	-97.41	-54.42	-13	41.42
High Channel (848.3 ㎒)									
1 695.67	57.68	H	26.90	-36.57	48.01	-97.41	-49.40	-13	36.40
1 695.26	56.81	V	26.89	-36.58	47.12	-97.41	-50.29	-13	37.29

*1 RB size / 0 Offset

LTE band 26/5 (3 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (825.5 ㎒)									
1 648.63	56.39	H	25.78	-36.80	45.37	-97.41	-52.04	-13	39.04
1 648.72	55.13	V	25.78	-36.80	44.11	-97.41	-53.30	-13	40.30
Middle Channel (836.5 ㎒)									
1 670.45	53.64	H	26.29	-36.66	43.27	-97.41	-54.14	-13	41.14
1 670.82	53.02	V	26.30	-36.66	42.66	-97.41	-54.75	-13	41.75
High Channel (847.5 ㎒)									
1 692.50	54.12	H	26.82	-36.58	44.36	-97.41	-53.05	-13	40.05
1 692.81	52.98	V	26.83	-36.58	43.23	-97.41	-54.18	-13	41.18

*1 RB size / 0 Offset

LTE band 26/5 (5 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (826.5 ㎒)									
1 648.70	56.09	H	25.78	-36.80	45.07	-97.41	-52.34	-13	39.34
1 648.43	55.71	V	25.77	-36.80	44.68	-97.41	-52.73	-13	39.73
Middle Channel (836.5 ㎒)									
1 668.57	50.51	H	26.25	-36.67	40.09	-97.41	-57.32	-13	44.32
1 668.29	49.19	V	26.24	-36.67	38.76	-97.41	-58.65	-13	45.65
High Channel (846.5 ㎒)									
1 688.75	51.69	H	26.73	-36.59	41.83	-97.41	-55.58	-13	42.58
1 688.28	50.82	V	26.72	-36.59	40.95	-97.41	-56.46	-13	43.46

*1 RB size / 0 Offset

LTE band 26/5 (10 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (829.0 ㎒)									
1 649.18	56.42	H	25.79	-36.80	45.41	-97.41	-52.00	-13	39.00
1 649.22	56.09	V	25.79	-36.80	45.08	-97.41	-52.33	-13	39.33
Middle Channel (836.5 ㎒)									
1 664.03	49.28	H	26.14	-36.70	38.72	-97.41	-58.69	-13	45.69
1 664.14	48.67	V	26.14	-36.70	38.11	-97.41	-59.30	-13	46.30
High Channel (844.0 ㎒)									
1 679.13	57.38	H	26.50	-36.62	47.26	-97.41	-50.15	-13	37.15
1 679.23	56.62	V	26.50	-36.62	46.50	-97.41	-50.91	-13	37.91

*1 RB size / 0 Offset

LTE band 26 (15 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (831.5 ㎒)									
1649.80	56.44	H	25.80	-36.79	45.45	-97.41	-51.96	-13	38.96
1649.32	55.94	V	25.79	-36.79	44.94	-97.41	-52.47	-13	39.47
High Channel (841.5 ㎒)									
1669.75	51.61	H	26.27	-36.66	41.22	-97.41	-56.19	-13	43.19
1669.39	50.94	V	26.27	-36.66	40.55	-97.41	-56.86	-13	43.86

*1 RB size / 0 Offset

LTE band 41 (5 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (2 498.5 ㎒)									
4 992.74	53.24	H	33.20	-30.34	56.10	-95.26	-39.16	-25	14.16
4 992.68	53.12	V	33.20	-30.34	55.98	-95.26	-39.28	-25	14.28
7 489.01	47.45	H	36.00	-27.03	56.42	-95.26	-38.84	-25	13.84
7 489.12	46.96	V	36.00	-27.03	55.93	-95.26	-39.33	-25	14.33
9 985.45	42.65	H	37.67	-23.00	57.32	-95.26	-37.94	-25	12.94
9 985.47	42.45	V	37.67	-23.00	57.12	-95.26	-38.14	-25	13.14
Middle Channel (2 593.0 ㎒)									
5 181.62	61.22	H	33.56	-29.95	64.83	-95.26	-30.43	-25	5.43
5 181.51	61.17	V	33.56	-29.95	64.78	-95.26	-30.48	-25	5.48
7 772.52	54.25	H	36.00	-26.59	63.66	-95.26	-31.60	-25	6.60
7 772.47	53.43	V	36.00	-26.59	62.84	-95.26	-32.42	-25	7.42
10 363.46	42.22	H	37.70	-22.65	57.27	-95.26	-37.99	-25	12.99
10 363.41	42.46	V	37.70	-22.65	57.51	-95.26	-37.75	-25	12.75
High Channel (2 687.5 ㎒)									
5 370.07	64.32	H	33.94	-29.56	68.70	-95.26	-26.56	-25	1.56
5 370.23	64.15	V	33.94	-29.56	68.53	-95.26	-26.73	-25	1.73
8 056.07	56.62	H	36.21	-26.17	66.66	-95.26	-28.60	-25	3.60
8 056.02	58.00	V	36.21	-26.17	68.04	-95.26	-27.22	-25	2.22
10 741.44	45.17	H	37.88	-22.21	60.84	-95.26	-34.42	-25	9.42
10 741.42	44.86	V	37.88	-22.21	60.53	-95.26	-34.73	-25	9.73

*1 RB size / 0 Offset

LTE band 41 (10 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (2 501.0 ㎒)									
4 993.27	55.78	H	33.20	-30.33	58.65	-95.26	-36.61	-25	11.61
4 993.30	55.34	V	33.20	-30.33	58.21	-95.26	-37.05	-25	12.05
7 489.88	47.96	H	36.00	-27.03	56.93	-95.26	-38.33	-25	13.33
7 489.68	47.45	V	36.00	-27.03	56.42	-95.26	-38.84	-25	13.84
9 986.42	52.05	H	37.67	-23.00	66.72	-95.26	-28.54	-25	3.54
9 986.38	51.65	V	37.67	-23.00	66.32	-95.26	-28.94	-25	3.94
Middle Channel (2 593.0 ㎒)									
5 177.17	62.32	H	33.55	-29.95	65.92	-95.26	-29.34	-25	4.34
5 177.06	61.76	V	33.55	-29.95	65.36	-95.26	-29.90	-25	4.90
7 765.90	54.08	H	36.00	-26.59	63.49	-95.26	-31.77	-25	6.77
7 765.76	53.66	V	36.00	-26.59	63.07	-95.26	-32.19	-25	7.19
10 354.50	53.18	H	37.70	-22.65	68.23	-95.26	-27.03	-25	2.03
10 354.46	52.68	V	37.70	-22.65	67.73	-95.26	-27.53	-25	2.53
High Channel (2 685.0 ㎒)									
5 361.10	58.54	H	33.92	-29.57	62.89	-95.26	-32.37	-25	7.37
5 361.24	57.09	V	33.92	-29.57	61.44	-95.26	-33.82	-25	8.82
8 041.88	56.44	H	36.18	-26.20	66.42	-95.26	-28.84	-25	3.84
8 041.72	56.04	V	36.18	-26.20	66.02	-95.26	-29.24	-25	4.24
10 722.46	51.22	H	37.84	-22.25	66.81	-95.26	-28.45	-25	3.45
10 722.40	50.88	V	37.84	-22.25	66.47	-95.26	-28.79	-25	3.79

*1 RB size / 0 Offset

LTE band 41 (15 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (2 503.5 ㎒)									
4 993.71	55.86	H	33.20	-30.33	58.73	-95.26	-36.53	-25	11.53
4 993.64	55.41	V	33.20	-30.33	58.28	-95.26	-36.98	-25	11.98
7 490.68	47.76	H	36.00	-27.03	56.73	-95.26	-38.53	-25	13.53
7 490.60	47.25	V	36.00	-27.02	56.23	-95.26	-39.03	-25	14.03
9 987.55	51.72	H	37.68	-22.98	66.42	-95.26	-28.84	-25	3.84
9 987.50	51.29	V	37.68	-22.99	65.98	-95.26	-29.28	-25	4.28
Middle Channel (2 593.0 ㎒)									
5 172.62	62.24	H	33.55	-29.97	65.82	-95.26	-29.44	-25	4.44
5 172.60	61.43	V	33.55	-29.97	65.01	-95.26	-30.25	-25	5.25
7 759.30	53.88	H	36.00	-26.60	63.28	-95.26	-31.98	-25	6.98
7 759.22	53.29	V	36.00	-26.60	62.69	-95.26	-32.57	-25	7.57
10 345.50	52.25	H	37.70	-22.63	67.32	-95.26	-27.94	-25	2.94
10 345.58	51.80	V	37.70	-22.63	66.87	-95.26	-28.39	-25	3.39
High Channel (2 685.0 ㎒)									
5 351.67	59.48	H	33.90	-29.59	63.79	-95.26	-31.47	-25	6.47
5 351.48	58.98	V	33.90	-29.59	63.29	-95.26	-31.97	-25	6.97
8 027.40	56.21	H	36.15	-26.21	66.15	-95.26	-29.11	-25	4.11
8 027.38	56.02	V	36.15	-26.21	65.96	-95.26	-29.30	-25	4.30
10 703.46	51.18	H	37.81	-22.30	66.69	-95.26	-28.57	-25	3.57
10 703.38	50.66	V	37.81	-22.30	66.17	-95.26	-29.09	-25	4.09

*1 RB size / 0 Offset

LTE band 41 (20 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (2 506.0 ㎒)									
4 994.09	56.00	H	33.20	-30.32	58.88	-95.26	-36.38	-25	11.38
4 994.20	55.74	V	33.20	-30.32	58.62	-95.26	-36.64	-25	11.64
7 491.32	47.52	H	36.00	-27.03	56.49	-95.26	-38.77	-25	13.77
7 491.40	47.06	V	36.00	-27.03	56.03	-95.26	-39.23	-25	14.23
9 988.30	50.35	H	37.68	-22.98	65.05	-95.26	-30.21	-25	5.21
9 988.36	49.95	V	37.68	-22.98	64.65	-95.26	-30.61	-25	5.61
Middle Channel (2 593.0 ㎒)									
5 168.27	61.83	H	33.54	-29.97	65.40	-95.26	-29.86	-25	4.86
5 168.41	61.22	V	33.54	-29.97	64.79	-95.26	-30.47	-25	5.47
7 752.42	53.68	H	36.00	-26.60	63.08	-95.26	-32.18	-25	7.18
7 752.32	53.33	V	36.00	-26.60	62.73	-95.26	-32.53	-25	7.53
10 336.50	52.38	H	37.70	-22.63	67.45	-95.26	-27.81	-25	2.81
10 336.42	51.97	V	37.70	-22.63	67.04	-95.26	-28.22	-25	3.22
High Channel (2 682.5 ㎒)									
5 342.61	61.33	H	33.89	-29.63	65.59	-95.26	-29.67	-25	4.67
5 342.54	60.99	V	33.89	-29.63	65.25	-95.26	-30.01	-25	5.01
8 013.20	56.02	H	36.13	-26.23	65.92	-95.26	-29.34	-25	4.34
8 013.17	55.75	V	36.13	-26.23	65.65	-95.26	-29.61	-25	4.61
10 684.46	51.18	H	37.80	-22.25	66.73	-95.26	-28.53	-25	3.53
10 684.55	50.76	V	37.80	-22.25	66.31	-95.26	-28.95	-25	3.95

*1 RB size / 0 Offset

LTE band 66/4 (1.4 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 710.7 ㎒)									
3 420.59	53.96	H	31.02	-33.12	51.86	-95.26	-43.40	-13	30.40
3 420.57	52.61	V	31.02	-33.12	50.51	-95.26	-44.75	-13	31.75
5 130.83	70.89	H	33.46	-30.08	74.27	-95.26	-20.99	-13	7.99
5 130.76	70.82	V	33.46	-30.08	74.20	-95.26	-21.06	-13	8.06
Middle Channel (1 745.0 ㎒)									
3 489.19	61.35	H	31.20	-32.90	59.65	-95.26	-35.61	-13	22.61
3 489.19	61.99	V	31.20	-32.90	60.29	-95.26	-34.97	-13	21.97
5 233.69	69.64	H	33.67	-29.67	73.64	-95.26	-21.62	-13	8.62
5 233.75	71.15	V	33.67	-29.67	75.15	-95.26	-20.11	-13	7.11
High Channel (1 779.3 ㎒)									
3 557.80	58.69	H	31.13	-32.48	57.34	-95.26	-37.92	-13	24.92
3 557.28	60.28	V	31.13	-32.47	58.94	-95.26	-36.32	-13	23.32
5 336.68	69.80	H	33.87	-29.67	74.00	-95.26	-21.26	-13	8.26
5 336.21	72.14	V	33.87	-29.67	76.34	-95.26	-18.92	-13	5.92

*1 RB size / 0 Offset

LTE band 66/4 (3 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 711.5 ㎒)									
3 420.38	53.72	H	31.02	-33.12	51.62	-95.26	-43.64	-13	30.64
3 420.63	52.21	V	31.02	-33.12	50.11	-95.26	-45.15	-13	32.15
5 130.76	71.45	H	33.46	-30.08	74.83	-95.26	-20.43	-13	7.43
5 130.76	71.29	V	33.46	-30.08	74.67	-95.26	-20.59	-13	7.59
Middle Channel (1 745.0 ㎒)									
3 487.50	60.03	H	31.20	-32.89	58.34	-95.26	-36.92	-13	23.92
3 487.34	60.94	V	31.20	-32.89	59.25	-95.26	-36.01	-13	23.01
5 231.31	69.34	H	33.66	-29.69	73.31	-95.26	-21.95	-13	8.95
5 231.43	70.38	V	33.66	-29.69	74.35	-95.26	-20.91	-13	7.91
High Channel (1 778.5 ㎒)									
3 554.62	57.57	H	31.12	-32.45	56.24	-95.26	-39.02	-13	26.02
3 554.37	59.37	V	31.12	-32.45	58.04	-95.26	-37.22	-13	24.22
5 331.80	69.77	H	33.86	-29.69	73.94	-95.26	-21.32	-13	8.32
5 331.74	72.99	V	33.86	-29.69	77.16	-95.26	-18.10	-13	5.10

*1 RB size / 0 Offset

LTE band 66/4 (5 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 712.5 ㎒)									
3 420.88	53.72	H	31.03	-33.11	51.64	-95.26	-43.62	-13	30.62
3 420.45	52.24	V	31.02	-33.12	50.14	-95.26	-45.12	-13	32.12
5 131.01	70.96	H	33.46	-30.08	74.34	-95.26	-20.92	-13	7.92
5 131.08	70.96	V	33.46	-30.08	74.34	-95.26	-20.92	-13	7.92
Middle Channel (1 745.0 ㎒)									
3 485.81	59.87	H	31.20	-32.89	58.18	-95.26	-37.08	-13	24.08
3 485.62	59.99	V	31.20	-32.89	58.30	-95.26	-36.96	-13	23.96
5 228.63	69.16	H	33.66	-29.71	73.11	-95.26	-22.15	-13	9.15
5 228.62	70.27	V	33.66	-29.71	74.22	-95.26	-21.04	-13	8.04
High Channel (1 777.5 ㎒)									
3 550.81	55.91	H	31.10	-32.41	54.60	-95.26	-40.66	-13	27.66
3 550.57	57.26	V	31.10	-32.41	55.95	-95.26	-39.31	-13	26.31
5 325.93	69.56	H	33.85	-29.72	73.69	-95.26	-21.57	-13	8.57
5 326.05	73.86	V	33.85	-29.72	77.99	-95.26	-17.27	-13	4.27

*1 RB size / 0 Offset

LTE band 66/4 (10 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 715.0 ㎒)									
3 421.38	53.73	H	31.03	-33.11	51.65	-95.26	-43.61	-13	30.61
3 421.25	52.97	V	31.03	-33.11	50.89	-95.26	-44.37	-13	31.37
5 131.89	70.99	H	33.46	-30.07	74.38	-95.26	-20.88	-13	7.88
5 131.89	70.59	V	33.46	-30.07	73.98	-95.26	-21.28	-13	8.28
Middle Channel (1 745.0 ㎒)									
3 481.25	59.36	H	31.20	-32.89	57.67	-95.26	-37.59	-13	24.59
3 481.26	59.06	V	31.20	-32.89	57.37	-95.26	-37.89	-13	24.89
5 221.69	70.89	H	33.64	-29.76	74.77	-95.26	-20.49	-13	7.49
5 221.81	70.83	V	33.64	-29.76	74.71	-95.26	-20.55	-13	7.55
High Channel (1 775.0 ㎒)									
3 541.24	56.91	H	31.12	-32.46	55.57	-95.26	-39.69	-13	26.69
3 541.18	57.20	V	31.12	-32.46	55.86	-95.26	-39.40	-13	26.40
5 311.74	69.78	H	33.82	-29.80	73.80	-95.26	-21.46	-13	8.46
5 311.71	72.30	V	33.82	-29.80	76.32	-95.26	-18.94	-13	5.94

*1 RB size / 0 Offset

LTE band 66/4 (15 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 717.5 ㎒)									
3 421.57	52.43	H	31.03	-33.11	50.35	-95.26	-44.91	-13	31.91
3 421.70	54.08	V	31.03	-33.11	52.00	-95.26	-43.26	-13	30.26
5 132.58	71.26	H	33.47	-30.07	74.66	-95.26	-20.60	-13	7.60
5 132.58	71.04	V	33.47	-30.07	74.44	-95.26	-20.82	-13	7.82
Middle Channel (1 745.0 ㎒)									
3 476.63	59.49	H	31.20	-32.88	57.81	-95.26	-37.45	-13	24.45
3 476.64	60.96	V	31.20	-32.88	59.28	-95.26	-35.98	-13	22.98
5 215.13	70.86	H	33.63	-29.80	74.69	-95.26	-20.57	-13	7.57
5 215.06	70.31	V	33.63	-29.80	74.14	-95.26	-21.12	-13	8.12
High Channel (1 772.5 ㎒)									
3 531.75	60.83	H	31.20	-32.88	57.81	-95.26	-37.45	-13	24.45
3 531.68	60.87	V	31.20	-32.88	59.28	-95.26	-35.98	-13	22.98
5 297.56	70.40	H	33.63	-29.80	74.69	-95.26	-20.57	-13	7.57
5 297.56	72.13	V	33.63	-29.80	74.14	-95.26	-21.12	-13	8.12

*1 RB size / 0 Offset

LTE band 66/4 (20 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.I.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (1 720.0 ㎒)									
3 422.58	52.29	H	31.04	-33.11	50.22	-95.26	-45.04	-13	32.04
3 422.34	54.22	V	31.03	-33.11	52.14	-95.26	-43.12	-13	30.12
5 133.33	70.89	H	33.47	-30.07	74.29	-95.26	-20.97	-13	7.97
5 133.39	70.52	V	33.47	-30.07	73.92	-95.26	-21.34	-13	8.34
Middle Channel (1 745.0 ㎒)									
3 472.19	59.73	H	31.20	-32.91	58.02	-95.26	-37.24	-13	24.24
3 472.15	60.12	V	31.20	-32.91	58.41	-95.26	-36.85	-13	23.85
5 208.25	69.84	H	33.62	-29.86	73.60	-95.26	-21.66	-13	8.66
5 208.38	69.64	V	33.62	-29.85	73.41	-95.26	-21.85	-13	8.85
High Channel (1 770.0 ㎒)									
3 522.25	61.00	H	31.16	-32.61	59.55	-95.26	-35.71	-13	22.71
3 522.53	61.21	V	31.15	-32.60	59.76	-95.26	-35.50	-13	22.50
5 283.37	68.61	H	33.77	-29.77	72.61	-95.26	-22.65	-13	9.65
5 283.37	70.20	V	33.77	-29.77	74.20	-95.26	-21.06	-13	8.06

*1 RB size / 0 Offset

LTE band 71 (5 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (665.5 ㎒)									
1 326.65	64.62	H	25.14	-37.77	51.99	-97.41	-45.42	-13	32.42
1 326.43	64.99	V	25.14	-37.77	52.36	-97.41	-45.05	-13	32.05
Middle Channel (680.5 ㎒)									
1 356.65	58.40	H	24.99	-37.73	45.66	-97.41	-51.75	-13	38.75
1 356.25	57.29	V	24.99	-37.74	44.54	-97.41	-52.87	-13	39.87
High Channel (695.5 ㎒)									
1 386.74	57.03	H	24.93	-37.58	44.38	-97.41	-53.03	-13	40.03
1 386.66	58.01	V	24.93	-37.58	45.36	-97.41	-52.05	-13	39.05

*1 RB size / 0 Offset

LTE band 71 (10 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (668.0 ㎒)									
1 327.23	65.00	H	25.14	-37.78	52.36	-97.41	-45.05	-13	32.05
1 327.11	64.83	V	25.14	-37.78	52.19	-97.41	-45.22	-13	32.22
Middle Channel (680.5 ㎒)									
1 352.25	61.40	H	25.00	-37.79	48.61	-97.41	-48.80	-13	35.80
1 352.38	60.87	V	25.00	-37.79	48.08	-97.41	-49.33	-13	36.33
High Channel (693.0 ㎒)									
1 377.12	58.24	H	24.95	-37.51	45.68	-97.41	-51.73	-13	38.73
1 377.26	58.81	V	24.95	-37.51	46.25	-97.41	-51.16	-13	38.16

*1 RB size / 0 Offset

LTE band 71 (15 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (670.5 ㎒)									
1 327.77	64.69	H	25.13	-37.78	52.04	-97.41	-45.37	-13	32.37
1 327.20	65.02	V	25.14	-37.78	52.38	-97.41	-45.03	-13	32.03
Middle Channel (680.5 ㎒)									
1 347.65	61.75	H	25.01	-37.82	48.94	-97.41	-48.47	-13	35.47
1 347.28	62.04	V	25.02	-37.82	49.24	-97.41	-48.17	-13	35.17
High Channel (690.5 ㎒)									
1 367.49	54.78	H	24.97	-37.60	42.15	-97.41	-55.26	-13	42.26
1 367.82	53.98	V	24.96	-37.59	41.35	-97.41	-56.06	-13	43.06

*1 RB size / 0 Offset

LTE band 71 (20 ㎒ - QPSK)

Frequency (㎒)	Measured Level (dBμV)	Ant. Pol.	AF (dB/m)	AMP+CL (dB)	E (dBμV/m)	CF (dB)	E.R.P. (dBm)	Limit (dBm)	Margin (dB)
Low Channel (673.0 ㎒)									
1 328.23	64.28	H	25.13	-37.78	51.63	-97.41	-45.78	-13	32.78
1 328.28	65.03	V	25.13	-37.78	52.38	-97.41	-45.03	-13	32.03
Middle Channel (680.5 ㎒)									
1 343.15	61.41	H	25.04	-37.81	48.64	-97.41	-48.77	-13	35.77
1 343.81	60.58	V	25.04	-37.81	47.81	-97.41	-49.60	-13	36.60
High Channel (688.0 ㎒)									
1 358.15	58.30	H	24.98	-37.72	45.56	-97.41	-51.85	-13	38.85
1 358.42	57.98	V	24.98	-37.71	45.25	-97.41	-52.16	-13	39.16

*1 RB size / 0 Offset

Remark;

1. AF = Antenna Factor, AMP= Amplifier Gain, CL = Cable Loss, CF = Conversion Factor.
2. E (dBμV/m) = Measured Level (dBμV) + Antenna Factor (dB/m) + AMP (dB) + Cable Loss (dB).
3. E.I.R.P. (dBm) = E (dBμV/m) + CF (dB).
4. E.R.P. (dBm) = E (dBμV/m) + CF (dB) - 2.15 (dB); where E.R.P. and E.I.R.P. are expressed in consistent units.
5. CF (dB) = 20 log D - 104.8; where D is the measurement distance in meters, According to KDB 971168 D01 v03r01 5.8.4.

3. Occupied Bandwidth

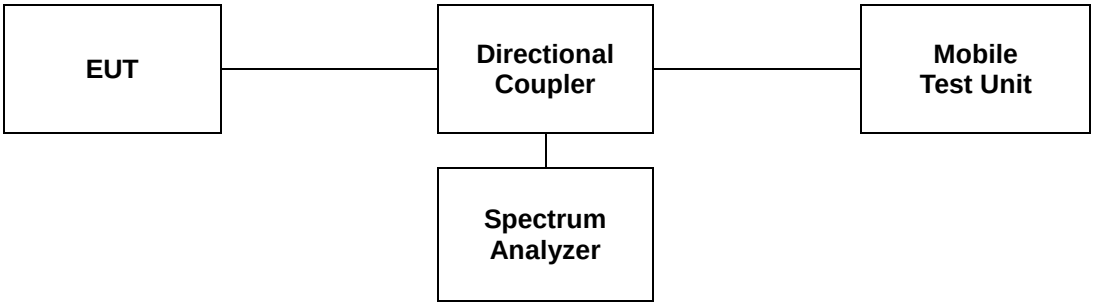
3.1. Limit

CFR 47, Section FCC §2.1049.

3.2. Test Procedure

The test follows section 5.4.4 of ANSI C63.26-2015.

a. The spectrum analyzer center frequency is set to the nominal EUT channel center frequency. The frequency span for the spectrum analyzer shall be set wide enough to capture all modulation. products including the emission skirts (typically a span of 1.5 × OBW is sufficient).
b. The nominal IF filter 3 dB bandwidth (RBW) shall be in the range of 1 % to 5 % of the anticipated OBW, and the VBW shall be set ≥ 3 × RBW.
c. Set the reference level of the instrument as required to prevent the signal amplitude from exceeding the maximum spectrum analyzer input mixer level for linear operation. See guidance provided in 4.2.3.
d. Set the detection mode to peak, and the trace mode to max-hold.
e. If the instrument does not have a 99 % OBW function, recover the trace data points and sum directly in linear power terms. Place the recovered amplitude data points, beginning at the lowest frequency, in a running sum until 0.5 % of the total is reached. Record that frequency as the lower OBW frequency. Repeat the process until 99.5 % of the total is reached and record that frequency as the upper OBW frequency. The 99 % power OBW can be determined by computing the difference these two frequencies.
f. The OBW shall be reported and plot(s) of the measuring instrument display shall be provided with the test report. The frequency and amplitude axis and scale shall be clearly labeled. Tabular data can be reported in addition to the plot(s).



3.3 Test Results

Ambient temperature : (23 ± 1) ℃
Relative humidity : 47 % R.H.

Band	Bandwidth (㎒)	Frequency (㎒)	Occupied Bandwidth (㎒)	
			QPSK	16QAM
12	1.4	707.5	1.107	1.098
	3		2.692	2.677
	5		4.530	4.515
	10		8.944	8.944

Band	Bandwidth (㎒)	Frequency (㎒)	Occupied Bandwidth (㎒)	
			QPSK	16QAM
25/2	1.4	1 882.5	1.103	1.103
	3		2.692	2.692
	5		4.530	4.515
	10		8.973	8.944
	15		13.502	13.502
	20		17.945	17.945

Band	Bandwidth (㎒)	Frequency (㎒)	Occupied Bandwidth (㎒)	
			QPSK	16QAM
26/5	1.4	836.5	1.098	1.103
	3		2.692	2.685
	5		4.530	4.515
	10		8.973	8.944
26	15	831.5	13.415	13.459

Band	Bandwidth (㎒)	Frequency (㎒)	Occupied Bandwidth (㎒)	
			QPSK	16QAM
41	5	2 593.0	4.515	4.515
	10		8.915	8.915
	15		13.459	13.502
	20		17.887	17.887

Band	Bandwidth (㎒)	Frequency (㎒)	Occupied Bandwidth (㎒)	
			QPSK	16QAM
66/4	1.4	1 745.0	1.107	1.103
	3		2.692	2.685
	5		4.515	4.515
	10		8.973	8.944
	15		13.502	13.502
	20		17.945	18.003

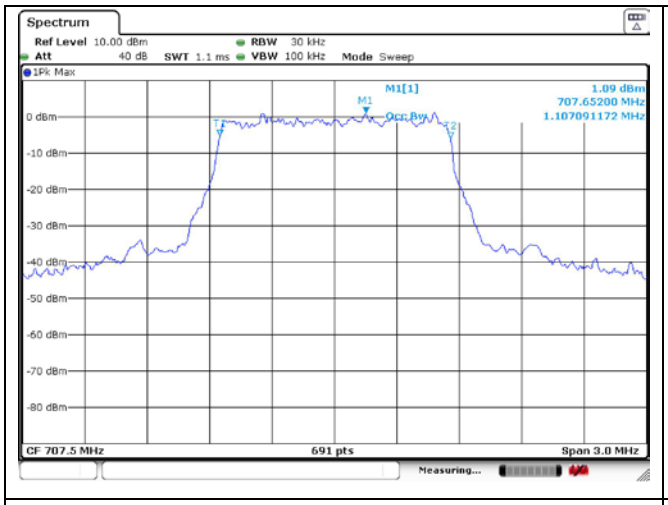
Band	Bandwidth (㎒)	Frequency (㎒)	Occupied Bandwidth (㎒)	
			QPSK	16QAM
71	5	680.5	4.530	4.515
	10		8.915	8.944
	15		13.459	13.459
	20		17.829	17.887

Note;

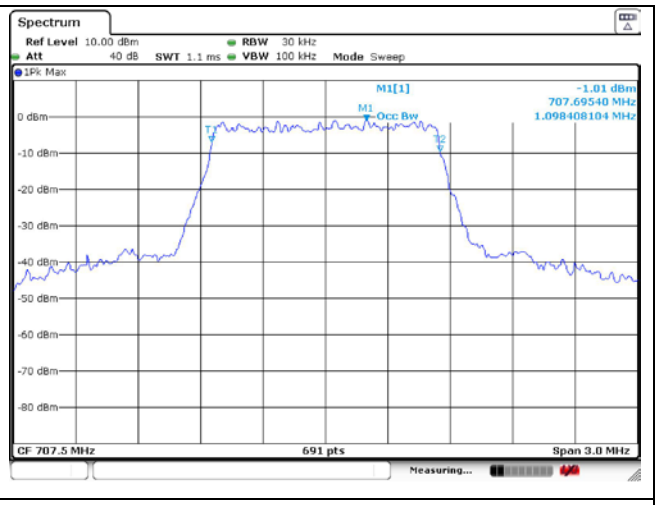
There is no limit required and power is the same for low, middle and high channel; therefore, All channels were tested but only middle channel was reported.

- Test plots

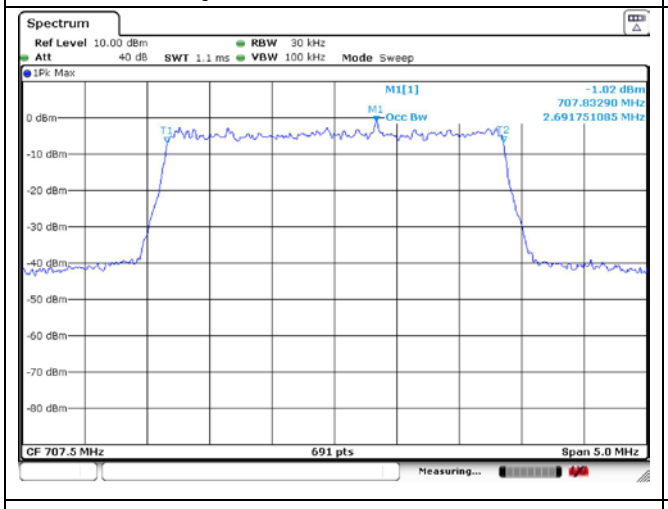
LTE band 12



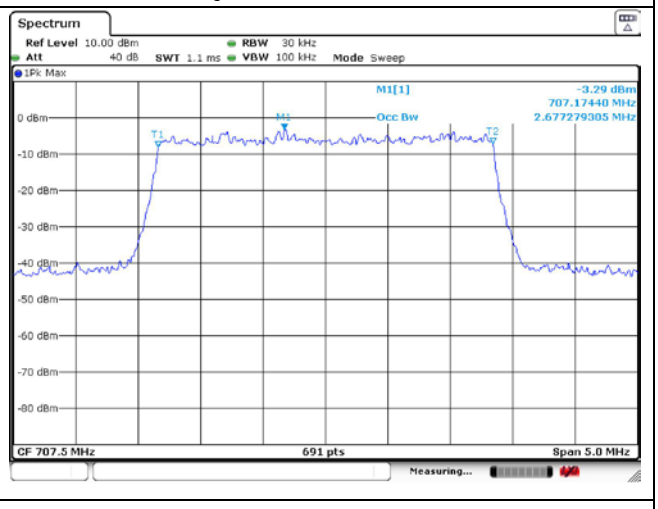
1.4 ㎒ QPSK Middle Channel - Full RB



1.4 ㎒ 16QAM Middle Channel - Full RB

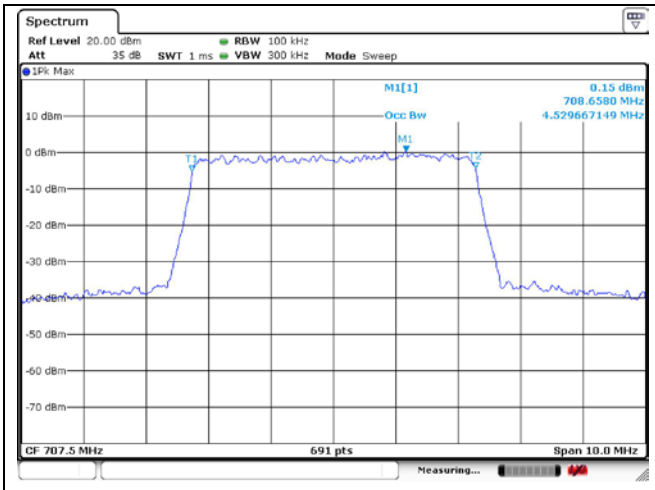


3 ㎒ QPSK Middle Channel - Full RB

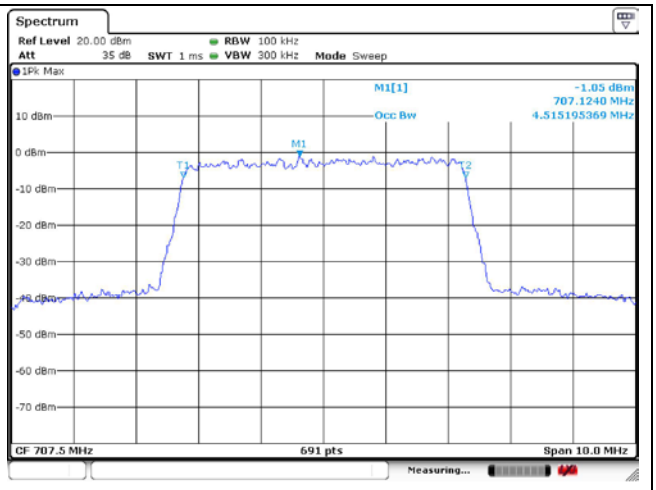


3 ㎒ 16QAM Middle Channel - Full RB

LTE band 12



5 ㎒ QPSK Middle Channel - Full RB



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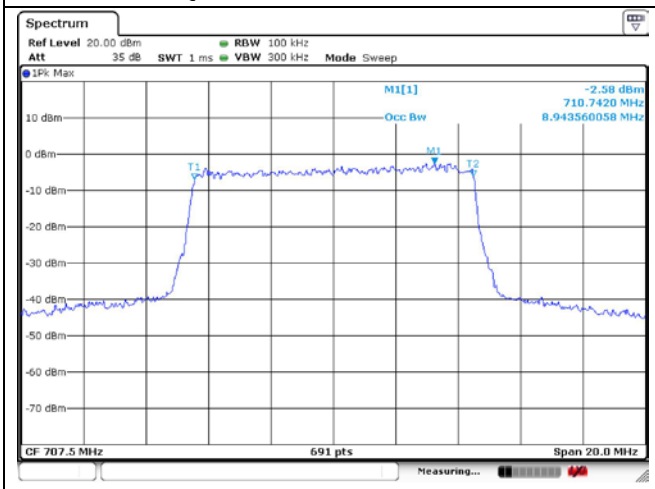
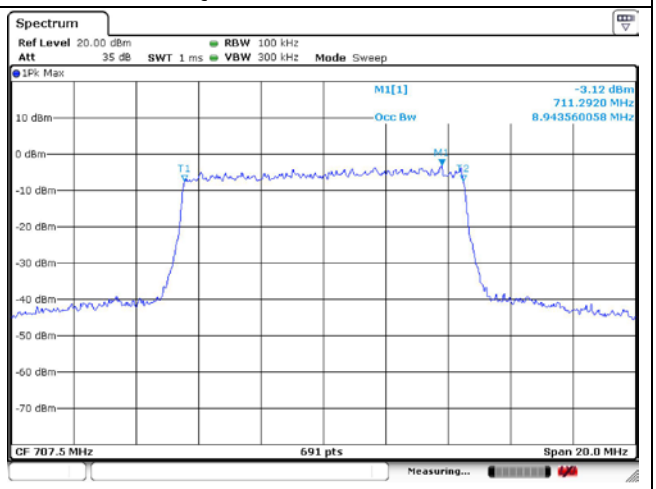
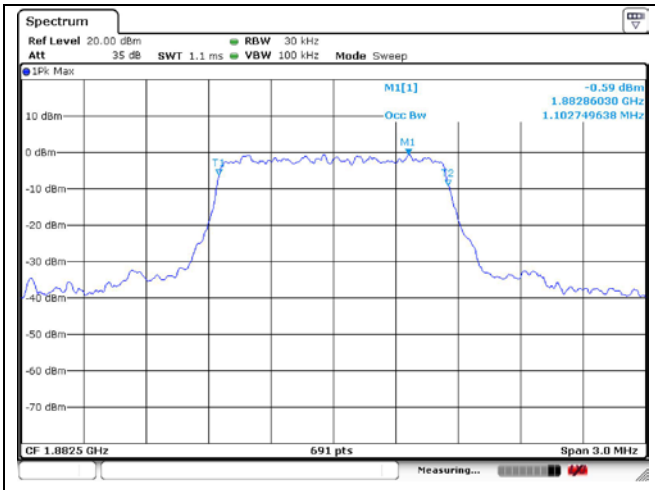


10 ㎒ QPSK Middle Channel - Full RB



10 ㎒ 16QAM Middle Channel - Full RB

LTE band 25/2



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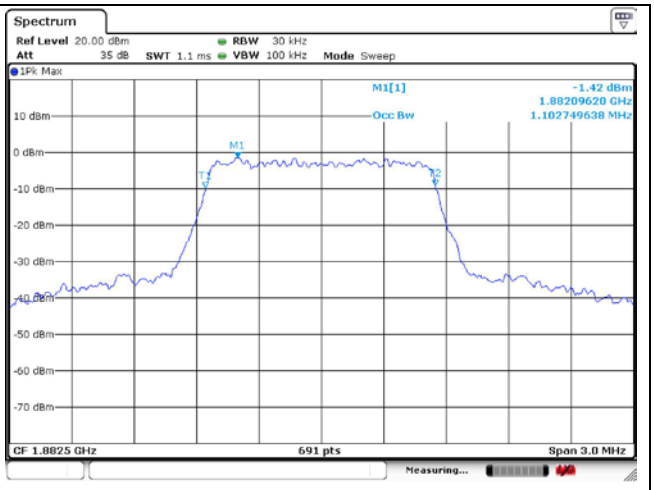

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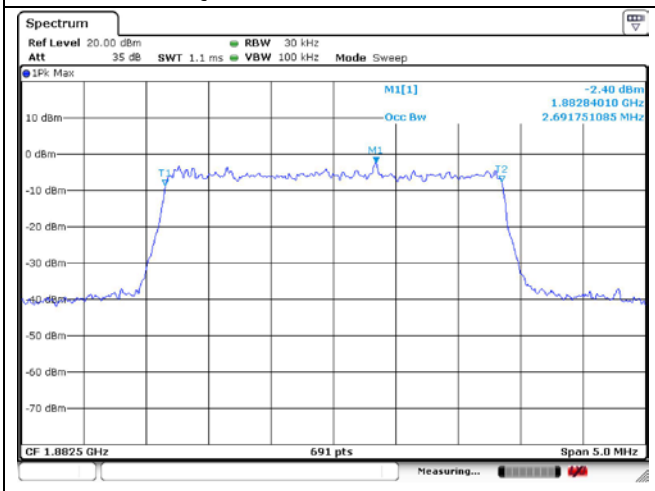
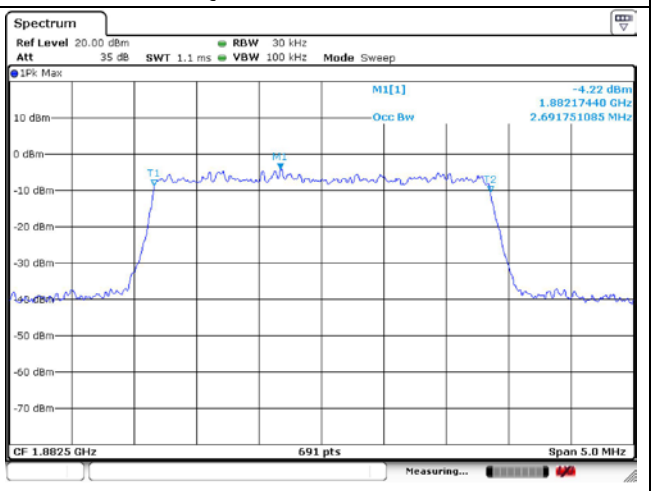
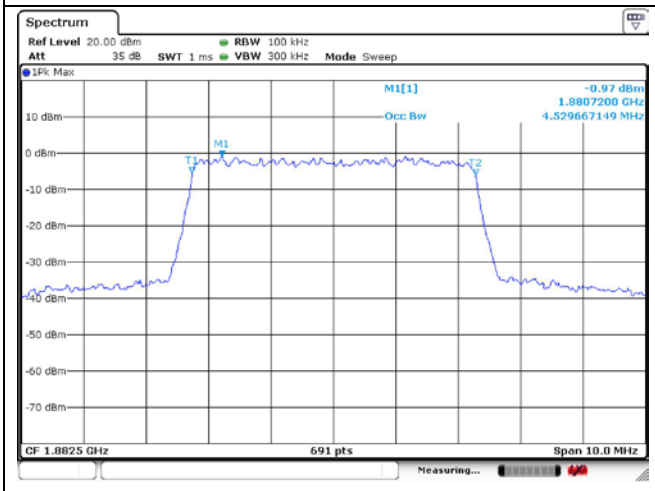


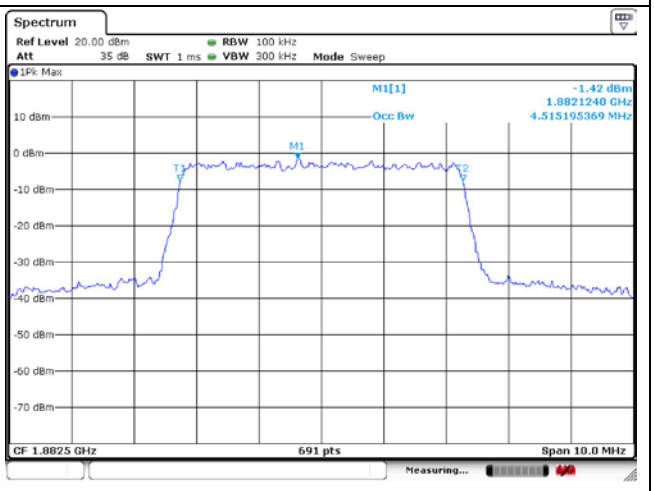
3 ㎒ QPSK Middle Channel - Full RB



3 ㎒ 16QAM Middle Channel - Full RB

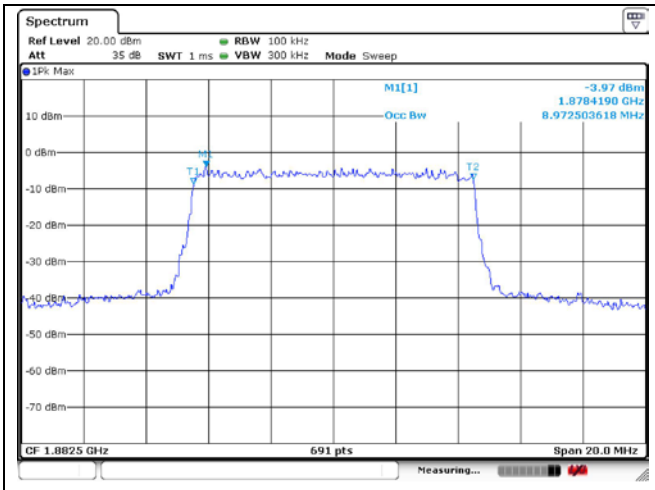


5 ㎒ QPSK Middle Channel - Full RB



5 ㎒ 16QAM Middle Channel - Full RB

LTE band 25/2



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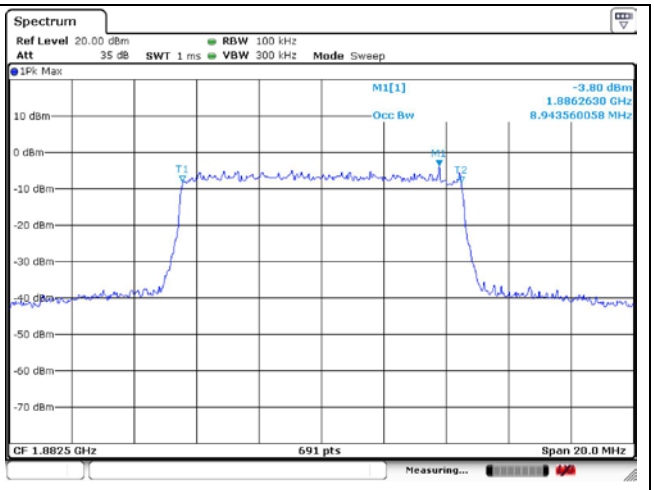

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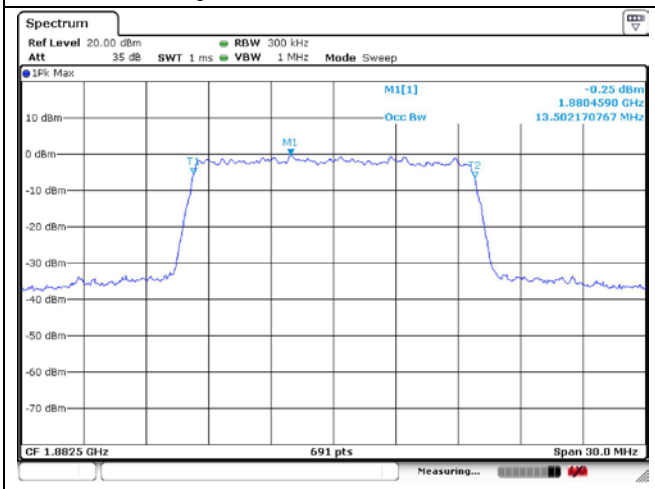
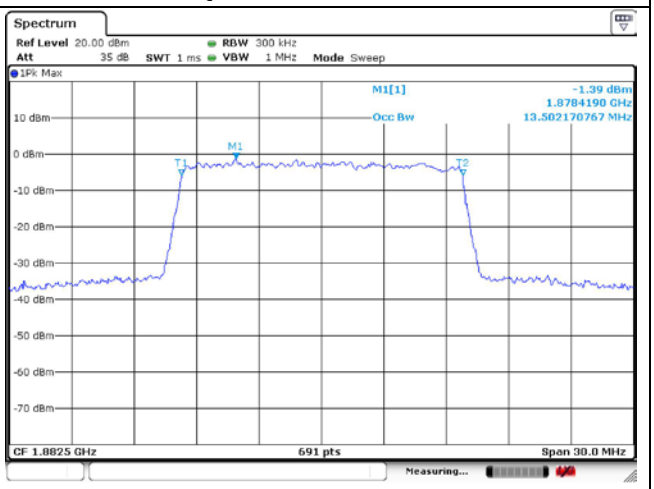


15 ㎒ QPSK Middle Channel - Full RB



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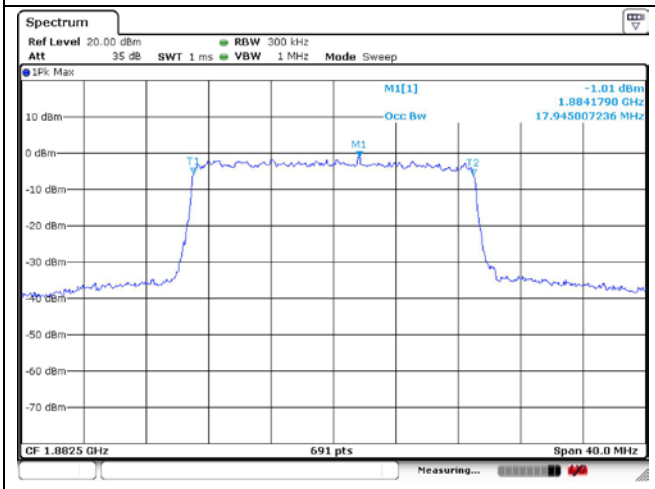

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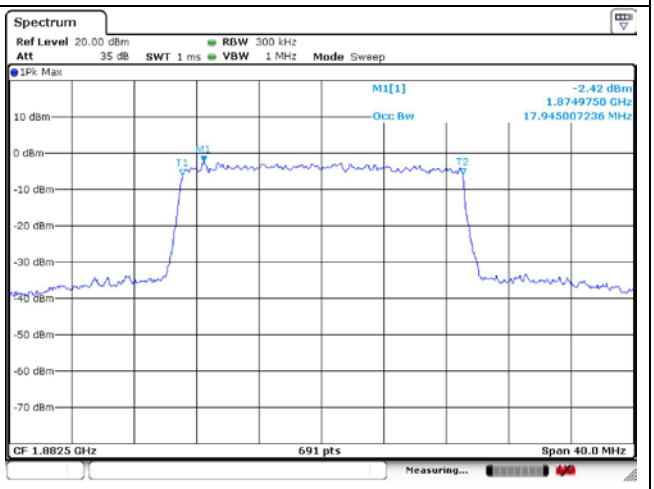
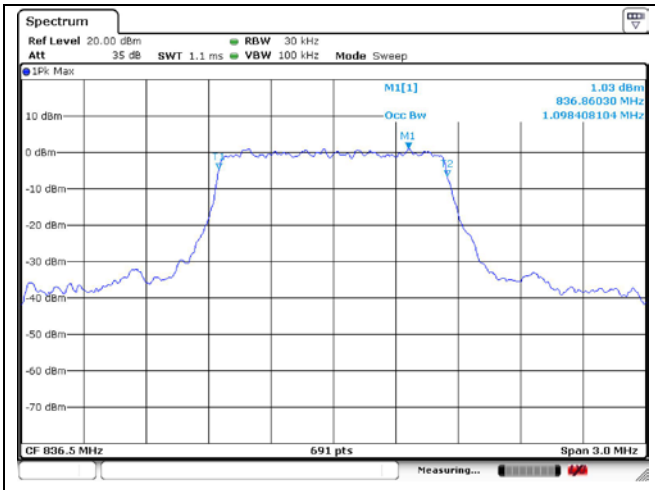
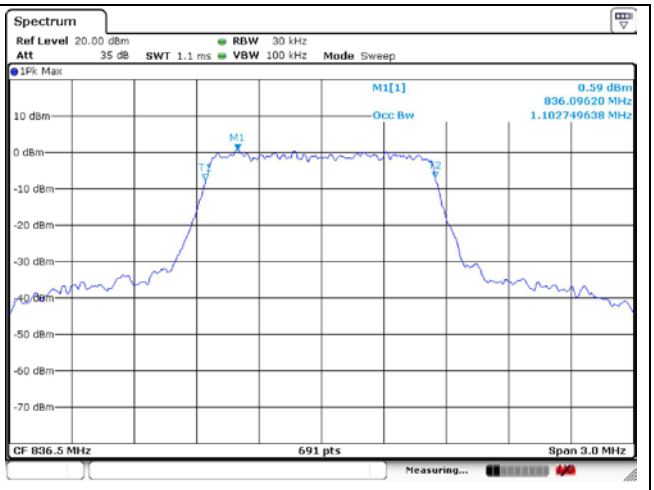


20 ㎒ 16QAM Middle Channel - Full RB

LTE band 26/5



1.4 ㎒ QPSK Middle Channel - Full RB



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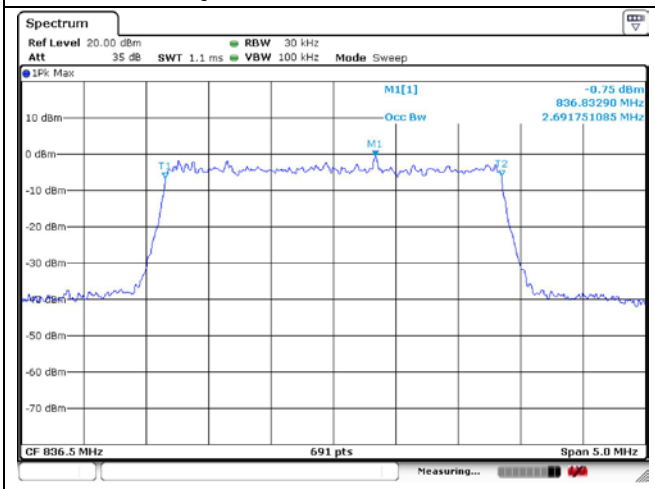
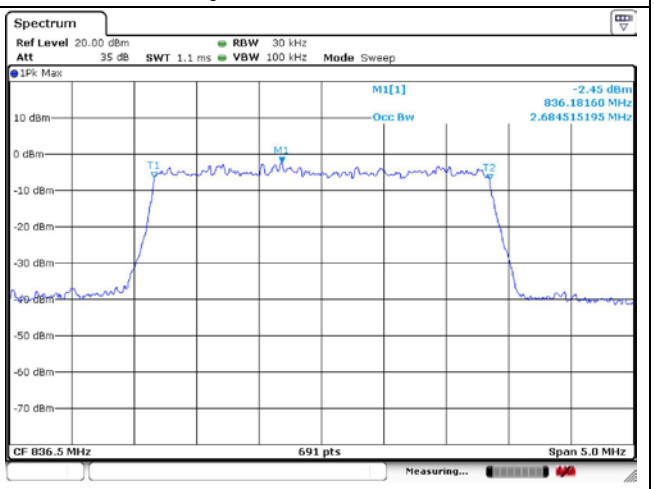


3 ㎒ QPSK Middle Channel - Full RB



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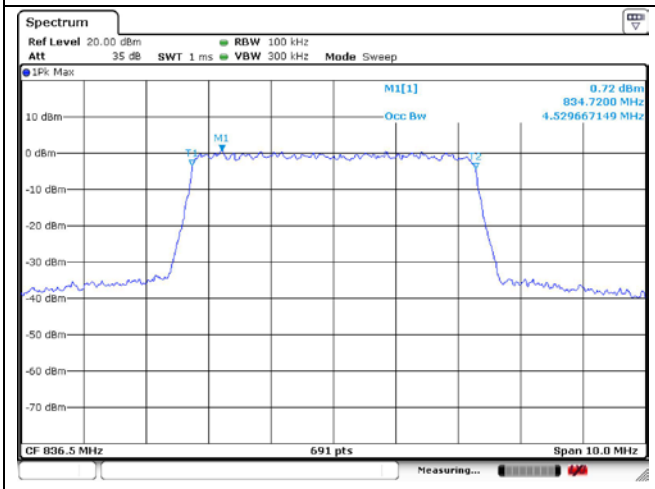
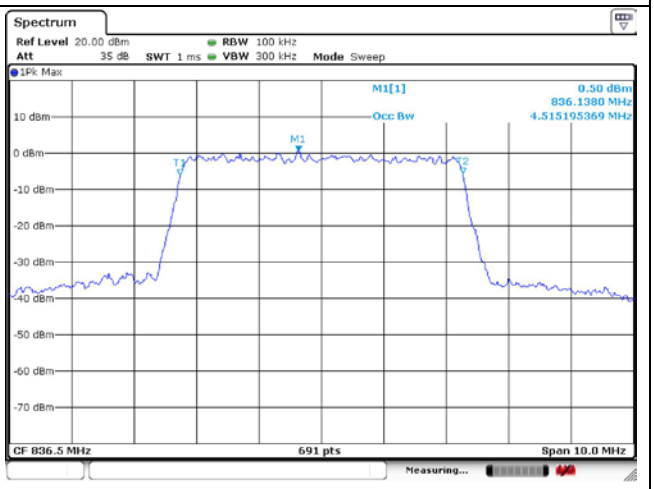
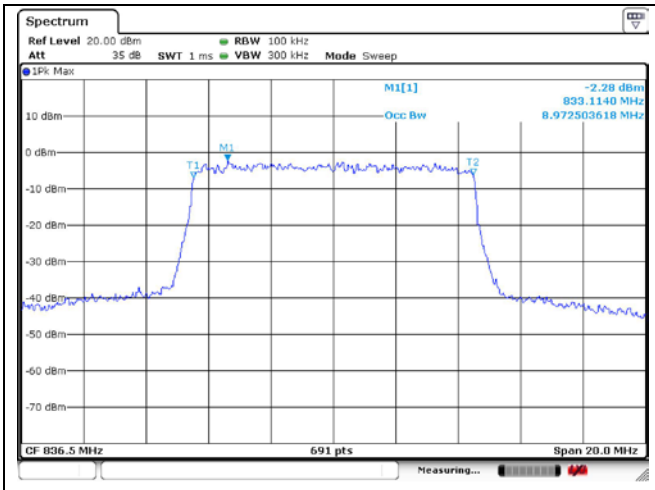


5 ㎒ QPSK Middle Channel - Full RB



5 ㎒ 16QAM Middle Channel - Full RB

LTE band 26/5



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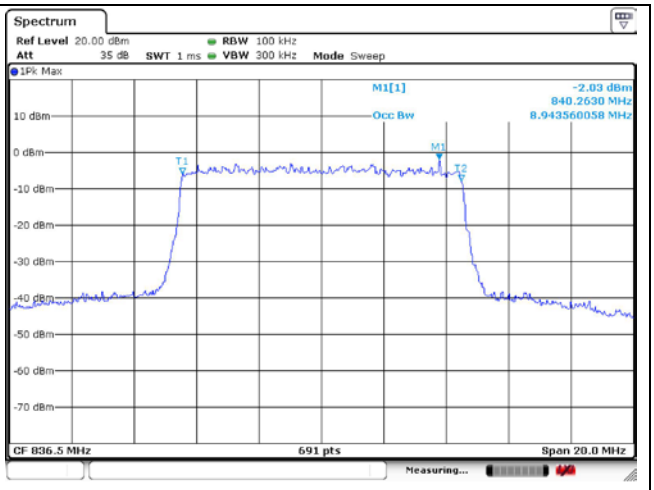
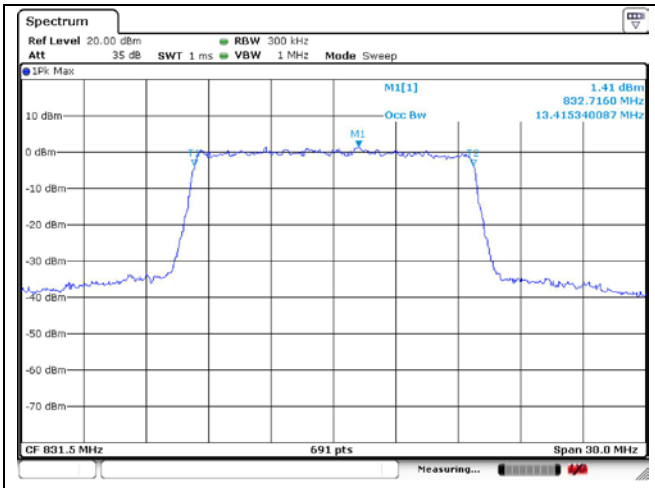
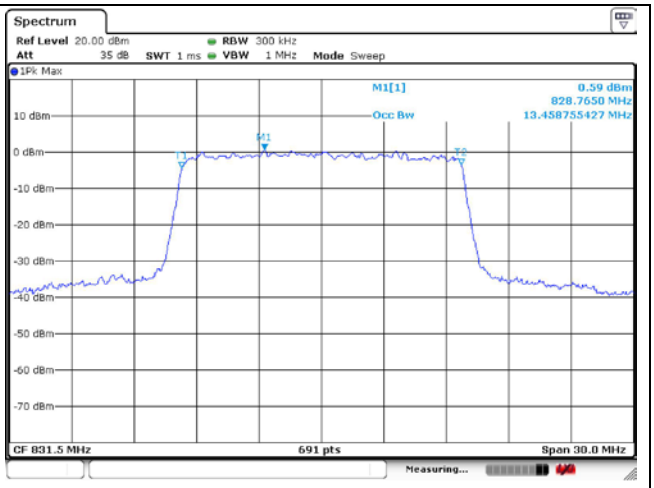


10 ㎒ 16QAM Middle Channel - Full RB

LTE band 26



15 ㎒ QPSK Middle Channel - Full RB



15 ㎒ 16QAM Middle Channel - Full RB