

Partial FCC Test Report

(PART 27)

Report No.: RF170822C16D-4

FCC ID: ZMOL850GL

Test Model: L850-GL

Received Date: Apr. 18, 2018

Test Date: May 24, 2018 ~ May 27, 2018

Issued Date: Jun. 27, 2018

Applicant: Fibocom Wireless Inc.

Address: 5/F, Tower A, Technology Building II, 1057#Nanhai Blvd, Shenzhen 518067, China

Issued By: Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch

Lab Address: No. 47-2, 14th Ling, Chia Pau Vil., Lin Kou Dist., New Taipei City, Taiwan (R.O.C)

Test Location: No. 19, Hwa Ya 2nd Rd, Wen Hwa Vil, Kwei Shan Dist., Taoyuan City 33383, Taiwan (R.O.C)

FCC Registration /
Designation Number: 788550 / TW0003



This report is for your exclusive use. Any copying or replication of this report to or for any other person or entity, or use of our name or trademark, is permitted only with our prior written permission. This report sets forth our findings solely with respect to the test samples identified herein. The results set forth in this report are not indicative or representative of the quality or characteristics of the lot from which a test sample was taken or any similar or identical product unless specifically and expressly noted. Our report includes all of the tests requested by you and the results thereof based upon the information that you provided to us. You have 60 days from date of issuance of this report to notify us of any material error or omission caused by our negligence, provided, however, that such notice shall be in writing and shall specifically address the issue you wish to raise. A failure to raise such issue within the prescribed time shall constitute your unqualified acceptance of the completeness of this report, the tests conducted and the correctness of the report contents. Unless specific mention, the uncertainty of measurement has been explicitly taken into account to declare the compliance or non-compliance to the specification. The report must not be used by the client to claim product certification, approval, or endorsement by TAF or any government agencies.

Table of Contents

Release Control Record	3
1 Certificate of Conformity	4
2 Summary of Test Results.....	5
2.1 Measurement Uncertainty.....	8
2.2 Test Site and Instruments	9
3 General Information	10
3.1 General Description of EUT	10
3.2 Configuration of System under Test.....	12
3.2.1 Description of Support Units.....	12
3.3 Test Mode Applicability and Tested Channel Detail	13
3.4 EUT Operating Conditions	15
3.5 General Description of Applied Standards.....	15
4 Test Types and Results	16
4.1 Output Power Measurement.....	16
4.1.1 Limits of Output Power Measurement.....	16
4.1.2 Test Procedures.....	16
4.1.3 Test Setup.....	17
4.1.4 Test Results	18
4.2 Radiated Emission Measurement.....	29
4.2.1 Limits of Radiated Emission Measurement.....	29
4.2.2 Test Procedure	29
4.2.3 Deviation from Test Standard	29
4.2.4 Test Setup.....	30
4.2.5 Test Results	31
5 Pictures of Test Arrangements.....	119
Appendix – Information on the Testing Laboratories	120

Release Control Record

Issue No.	Description	Date Issued
RF170822C16D-4	Original Release	Jun. 27, 2018

1 Certificate of Conformity

Product: LTE module

Brand: Fibocom

Test Model: L850-GL

Sample Status: Production Unit

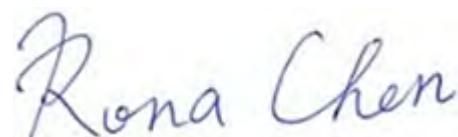
Applicant: Fibocom Wireless Inc.

Test Date: May 24, 2018 ~ May 27, 2018

Standards: FCC Part 27, Subpart C, H, F, L

The above equipment has been tested by **Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch**, and found compliance with the requirement of the above standards. The test record, data evaluation & Equipment Under Test (EUT) configurations represented herein are true and accurate accounts of the measurements of the sample's RF characteristics under the conditions specified in this report.

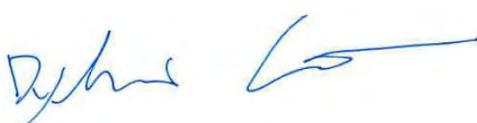
Prepared by :



, **Date:** Jun. 27, 2018

Rona Chen / Specialist

Approved by :



, **Date:** Jun. 27, 2018

Dylan Chiou / Project Engineer

2 Summary of Test Results

Applied Standard: FCC Part 27 & Part 2 (WCDMA)			
FCC Clause	Test Item	Result	Remarks
2.1046 27.50(d)(4)	Equivalent Isotropic Radiated Power	Pass	Meet the requirement of limit.
2.1055 27.54	Frequency Stability	N/A	Refer to Note
2.1049 27.53(h)	Occupied Bandwidth	N/A	Refer to Note
27.50(d)(5)	Peak to Average Ratio	N/A	Refer to Note
27.53(h)	Band Edge Measurements	N/A	Refer to Note
2.1051 27.53(h)	Conducted Spurious Emissions	N/A	Refer to Note
2.1053 27.53(h)	Radiated Spurious Emissions	Pass	Meet the requirement of limit. Minimum passing margin is -28.82 dB at 40.67 MHz.

Applied Standard: FCC Part 27 & Part 2 (LTE 4)			
FCC Clause	Test Item	Result	Remarks
2.1046 27.50(d)(4)	Maximum Peak Output Power	Pass	Meet the requirement of limit.
2.1055 27.54	Frequency Stability	N/A	Refer to Note
2.1049 27.53(h)	Occupied Bandwidth	N/A	Refer to Note
27.50(d)(5)	Peak to Average Ratio	N/A	Refer to Note
27.53(h)	Band Edge Measurements	N/A	Refer to Note
2.1051 27.53(h)	Conducted Spurious Emissions	N/A	Refer to Note
2.1053 27.53(h)	Radiated Spurious Emissions	Pass	Meet the requirement of limit. Minimum passing margin is -28.78 dB at 39.70 MHz.

Applied Standard: FCC Part 27 & Part 2 (LTE 12)

FCC Clause	Test Item	Result	Remarks
2.1046 27.50(c)(10)	Maximum Peak Output Power	Pass	Meet the requirement of limit.
2.1055 27.54	Frequency Stability	N/A	Refer to Note
2.1049 27.53(g)	Occupied Bandwidth	N/A	Refer to Note
27.50(d)(5)	Peak to Average Ratio	N/A	Refer to Note
27.53(g)	Band Edge Measurements	N/A	Refer to Note
2.1051 27.53(g)	Conducted Spurious Emissions	N/A	Refer to Note
2.1053 27.53(g)	Radiated Spurious Emissions	Pass	Meet the requirement of limit. Minimum passing margin is -22.12 dB at 2145.90 MHz.

Applied Standard: FCC Part 27 & Part 2 (LTE 13)

FCC Clause	Test Item	Result	Remarks
2.1046 27.50(b)(10)	Maximum Peak Output Power	Pass	Meet the requirement of limit.
2.1055 27.54	Frequency Stability	N/A	Refer to Note
2.1049 27.53(g)	Occupied Bandwidth	N/A	Refer to Note
27.50(d)(5)	Peak to Average Ratio	N/A	Refer to Note
27.53(g)	Band Edge Measurements	N/A	Refer to Note
2.1051 27.53(g)	Conducted Spurious Emissions	N/A	Refer to Note
2.1053 27.53(g)(f)	Radiated Spurious Emissions	Pass	Meet the requirement of limit. Minimum passing margin is -8.01 dB at 1564.00 MHz.

Applied Standard: FCC Part 27 & Part 2 (LTE 17)

FCC Clause	Test Item	Result	Remarks
2.1046 27.50(c)(10)	Maximum Peak Output Power	Pass	Meet the requirement of limit.
2.1055 27.54	Frequency Stability	N/A	Refer to Note
2.1049 27.53(g)	Occupied Bandwidth	N/A	Refer to Note
27.50(d)(5)	Peak to Average Ratio	N/A	Refer to Note
27.53(g)	Band Edge Measurements	N/A	Refer to Note
2.1051 27.53(g)	Conducted Spurious Emissions	N/A	Refer to Note
2.1053 27.53(g)	Radiated Spurious Emissions	Pass	Meet the requirement of limit. Minimum passing margin is -29.67 dB at 39.70 MHz.

Applied Standard: FCC Part 27 & Part 2 (LTE 66)

FCC Clause	Test Item	Result	Remarks
2.1046 27.50(d)(4)	Maximum Peak Output Power	Pass	Meet the requirement of limit.
2.1055 27.54	Frequency Stability	N/A	Refer to Note
2.1049 27.53(h)	Occupied Bandwidth	N/A	Refer to Note
27.50(d)(5)	Peak to Average Ratio	N/A	Refer to Note
27.53(h)	Band Edge Measurements	N/A	Refer to Note
2.1051 27.53(h)	Conducted Spurious Emissions	N/A	Refer to Note
2.1053 27.53(h)	Radiated Spurious Emissions	Pass	Meet the requirement of limit. Minimum passing margin is -20.40 dB at 5160.00 MHz.

Note:

This report is a partial report. Therefore, only test item of Equivalent Isotropic Radiated Power / Maximum Peak Output Power and Radiated Spurious Emissions tests were performed for this report. Other testing data please refer to BV CPS report no.: RF170106C02-4 for module (Brand: Fibocom, Model: L850-GL)

2.1 Measurement Uncertainty

Where relevant, the following measurement uncertainty levels have been estimated for tests performed on the EUT as specified in CISPR 16-4-2:

Measurement	Frequency	Expended Uncertainty (k=2) (±)
Conducted Emissions at mains ports	150 kHz ~ 30 MHz	2.44 dB
Radiated Emissions up to 1 GHz	30 MHz ~ 200 MHz	2.93 dB
	200 MHz ~ 1000 MHz	2.95 dB
Radiated Emissions above 1 GHz	1 GHz ~ 18 GHz	2.26 dB
	18 GHz ~ 40 GHz	1.94 dB

2.2 Test Site and Instruments

Description & Manufacturer	Model No.	Serial No.	Date of Calibration	Due Date of Calibration
Test Receiver Agilent	N9038A	MY51210203	Mar. 16, 2018	Mar. 15, 2019
Spectrum Analyzer Agilent	N9010A	MY52220314	Nov. 24, 2017	Nov. 23, 2018
Spectrum Analyzer ROHDE & SCHWARZ	FSU43	101261	Jan. 11, 2018	Jan. 10, 2019
Double Ridge Guide Horn Antenna EMCO	3115	5619	Nov. 30, 2017	Nov. 29, 2018
BILOG Antenna SCHWARZBECK	VULB 9168	9168-153	Dec. 06, 2017	Dec. 05, 2018
Fixed Attenuator Mini-Circuits	BW-N10W5+	NA	Jul. 07, 2017	Jul. 06, 2018
MXG Vector signal generator Agilent	N5182B	MY53050430	Oct. 24, 2017	Oct. 23, 2018
Preamplifier EMCI	EMC 012645	980115	Oct. 20, 2017	Oct. 19, 2018
Preamplifier EMCI	EMC 184045	980116	Oct. 20, 2017	Oct. 19, 2018
Preamplifier EMCI	EMC 330H	980112	Oct. 13, 2017	Oct. 12, 2018
RF Coaxial Cable HUBER+SUHNNER	EMC104-SM-SM-80 00&3000	140811+170717	Oct. 20, 2017	Oct. 19, 2018
RF Coaxial Cable HUBER+SUHNNER	SUCOFLEX 104	EMC104-SM-SM-1000(140807)	Oct. 20, 2017	Oct. 19, 2018
RF Coaxial Cable Worken	8D-FB	Cable-Ch10-01	Oct. 20, 2017	Oct. 19, 2018
Software BV ADT	E3 6.120103	NA	NA	NA
Antenna Tower MF	MFA-440H	NA	NA	NA
Turn Table MF	MFT-201SS	NA	NA	NA
Antenna Tower & Turn Table Controller MF	MF-7802	NA	NA	NA
Radio Communication Analyzer Anritsu	MT8820C	6201010284	Dec. 28, 2017	Dec. 27, 2018
Temperature & Humidity Chamber	GTH-120-40-CP-AR	MAA1306-019	Sep. 08, 2017	Sep. 07, 2018
DC Power Supply Topward	33010D	807748	Oct. 25, 2016	Oct. 24, 2018
Digital Multimeter Fluke	87-III	70360742	Jun. 30, 2017	Jun. 29, 2018
HORN Antenna Schwarzbeck	BBHA 9120D	9120D-969	Dec. 12, 2017	Dec. 11, 2018

Note:

1. The calibration interval of the above test instruments is 12 / 24 months and the calibrations are traceable to NML/ROC and NIST/USA.
2. The test was performed in HwaYa Chamber 10.
3. The horn antenna and preamplifier (model: EMC 184045) are used only for the measurement of emission frequency above 1 GHz if tested.
4. The IC Site Registration No. is IC7450F-10.

3 General Information

3.1 General Description of EUT

Product	LTE module	
Brand	Fibocom	
Test Model	L850-GL	
Status of EUT	Production Unit	
Power Supply Rating	5.0 Vdc (Host equipment)	
Modulation Type	WCDMA	QPSK
	LTE	QPSK, 16QAM
Frequency Range	WCDMA	1712.4 ~ 1752.6 MHz
	LTE Band 4 (Channel Bandwidth: 1.4 MHz)	1710.7 ~ 1754.3 MHz
	LTE Band 4 (Channel Bandwidth: 3 MHz)	1711.5 ~ 1753.5 MHz
	LTE Band 4 (Channel Bandwidth: 5 MHz)	1712.5 ~ 1752.5 MHz
	LTE Band 4 (Channel Bandwidth: 10 MHz)	1715.0 ~ 1750.0 MHz
	LTE Band 4 (Channel Bandwidth: 15 MHz)	1717.5 ~ 1747.5 MHz
	LTE Band 4 (Channel Bandwidth: 20 MHz)	1720.0 ~ 1745.0 MHz
	LTE Band 12 (Channel Bandwidth: 1.4 MHz)	699.7 ~ 715.3 MHz
	LTE Band 12 (Channel Bandwidth: 3 MHz)	700.5 ~ 714.5 MHz
	LTE Band 12 (Channel Bandwidth: 5 MHz)	701.5 ~ 713.5 MHz
	LTE Band 12 (Channel Bandwidth: 10 MHz)	704.0 ~ 711.0 MHz
	LTE Band 13 (Channel Bandwidth: 5 MHz)	779.5 ~ 784.5 MHz
	LTE Band 13 (Channel Bandwidth: 10 MHz)	782.0 MHz
	LTE Band 17 (Channel Bandwidth: 5 MHz)	706.5 ~ 713.5 MHz
	LTE Band 17 (Channel Bandwidth: 10 MHz)	709.0 ~ 711.0 MHz
	LTE Band 66 (Channel Bandwidth: 1.4 MHz)	1710.7 ~ 1779.3 MHz
	LTE Band 66 (Channel Bandwidth: 3 MHz)	1711.5 ~ 1778.5 MHz
	LTE Band 66 (Channel Bandwidth: 5 MHz)	1712.5 ~ 1777.5 MHz
	LTE Band 66 (Channel Bandwidth: 10 MHz)	1715.0 ~ 1775.0 MHz
	LTE Band 66 (Channel Bandwidth: 15 MHz)	1717.5 ~ 1772.5 MHz
	LTE Band 66 (Channel Bandwidth: 20 MHz)	1720.0 ~ 1770.0 MHz
Max. ERP Power	LTE Band 12 (Channel Bandwidth: 1.4 MHz)	99.54 mW
	LTE Band 12 (Channel Bandwidth: 3 MHz)	108.14 mW
	LTE Band 12 (Channel Bandwidth: 5 MHz)	118.85 mW
	LTE Band 12 (Channel Bandwidth: 10 MHz)	129.72 mW
	LTE Band 13 (Channel Bandwidth: 5 MHz)	100.23 mW
	LTE Band 13 (Channel Bandwidth: 10 MHz)	129.12 mW
	LTE Band 17 (Channel Bandwidth: 5 MHz)	126.18 mW
	LTE Band 17 (Channel Bandwidth: 10 MHz)	133.05 mW

Max. EIRP Power	WCDMA	244.91 mW
	LTE Band 4 (Channel Bandwidth: 1.4 MHz)	105.44 mW
	LTE Band 4 (Channel Bandwidth: 3 MHz)	114.29 mW
	LTE Band 4 (Channel Bandwidth: 5 MHz)	121.90 mW
	LTE Band 4 (Channel Bandwidth: 10 MHz)	130.92 mW
	LTE Band 4 (Channel Bandwidth: 15 MHz)	139.96 mW
	LTE Band 4 (Channel Bandwidth: 20 MHz)	149.97 mW
	LTE Band 66 (Channel Bandwidth: 1.4 MHz)	93.33 mW
	LTE Band 66 (Channel Bandwidth: 3 MHz)	99.77 mW
	LTE Band 66 (Channel Bandwidth: 5 MHz)	107.15 mW
	LTE Band 66 (Channel Bandwidth: 10 MHz)	114.29 mW
	LTE Band 66 (Channel Bandwidth: 15 MHz)	122.18 mW
	LTE Band 66 (Channel Bandwidth: 20 MHz)	131.22 mW
Antenna Type	Refer to Note as below	
Accessory Device	Refer to Note as below	
Data Cable Supplied	Refer to Note as below	

Note:

1. The EUT is authorized for use in specific End-product. Please refer to below table for more details.

Product	Brand	Model
Convertible PC	Lenovo	TP00078C

2. The End-product contains following accessory devices.

Product	Brand	Model	Description
Adapter	Lenovo	ADLX65NDC3A	I/P: 100-240 Vac, 50-60 Hz, 1.5 A O/P: 20 Vdc, 3.25 A
Battery	Lenovo	SB10K97589	15.2 Vdc, 3260 mAh

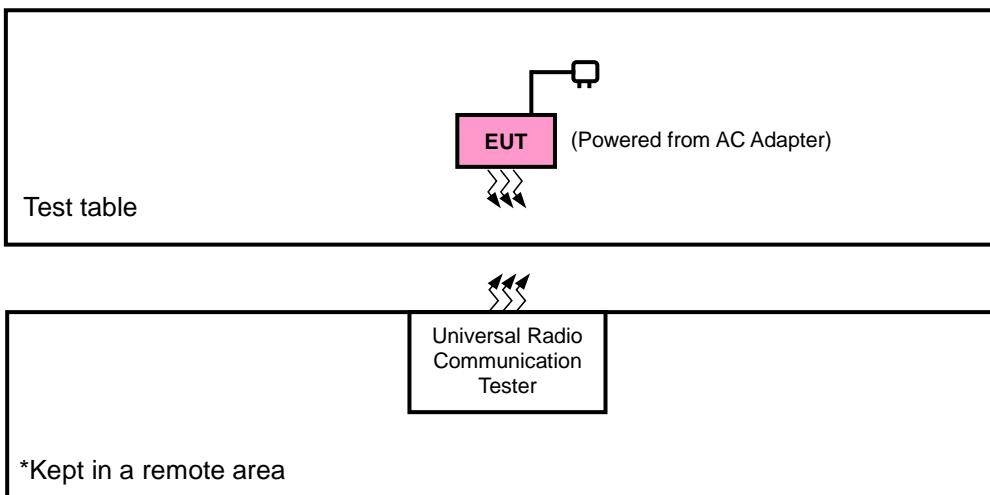
3. The information of antenna of End-product is listed as below.

Antenna Type	Manufacturer	Part No.	Antenna Gain (dBi)				
			WCDMA IV / LTE Band 4	LTE Band 12	LTE Band 13	LTE Band 17	LTE Band 66
PIFA	HUA CHENG TECHNOLOGY Co., Ltd	Main Antenna: DC33001WM60 Aux. Antenna: DC33001WM10 (Rx only)	1.58	-2.78	-1.73	-2.78	1.56

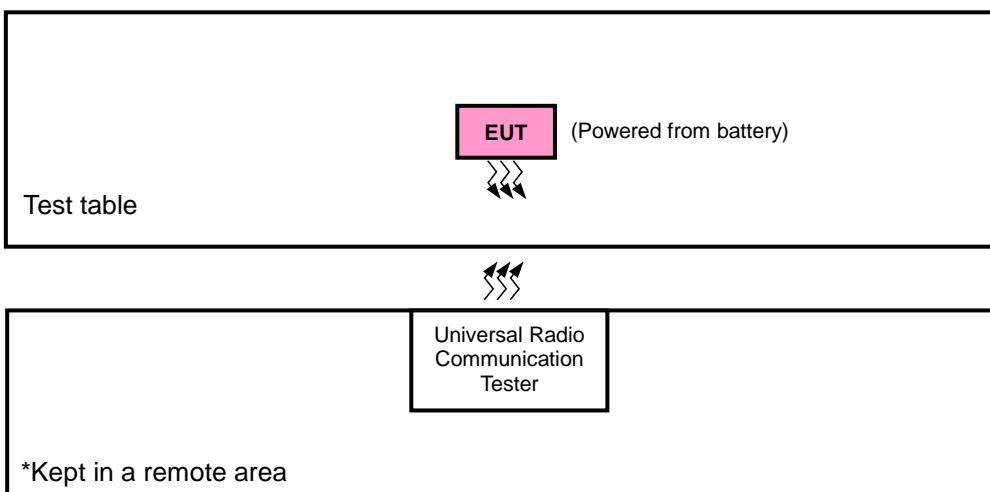
4. The above EUT information is declared by manufacturer and for more detailed features description, please refers to the manufacturer's specifications or user's manual.

3.2 Configuration of System under Test

<Radiated Emission Test>



<E.R.P. / E.I.R.P. Test>



3.2.1 Description of Support Units

The EUT has been tested as an independent unit together with other necessary accessories or support units. The following support units or accessories were used to form a representative test configuration during the tests.

No.	Product	Brand	Model No.	Serial No.	FCC ID
1.	Communications Tester-Wireless	Agilent	8960 Series 10	MY53201073	N/A

No.	Signal Cable Description Of The Above Support Units
1.	N/A

Note:

1. All power cords of the above support units are non-shielded (1.8m).
2. Items 1 acted as communication partners to transfer data.

3.3 Test Mode Applicability and Tested Channel Detail

Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates, XYZ axis & NB Mode, and antenna ports.

The worst case was found when positioned as the table below. Following channel(s) was (were) selected for the final test as listed below:

Band	ERP / EIRP	Radiated Emission
WCDMA	NB Mode	NB Mode
LTE Band 4	NB Mode	NB Mode
LTE Band 12	Y-plane	Y-axis
LTE Band 13	Y-plane	Y-axis
LTE Band 17	Y-plane	Y-axis
LTE Band 66	NB Mode	NB Mode

WCDMA

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Mode
-	EIRP	1312 to 1513	1312, 1413, 1513	WCDMA
-	Radiated Emission	1312 to 1513	1312, 1413, 1513	WCDMA

LTE Band 4

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Channel Bandwidth	Modulation	Mode
-	EIRP	19957 to 20393	19957, 20175, 20393	1.4 MHz	QPSK, 16QAM	1 RB / 5 RB Offset
		19965 to 20385	19965, 20175, 20385	3 MHz	QPSK, 16QAM	1 RB / 14 RB Offset
		19975 to 20375	19975, 20175, 20375	5 MHz	QPSK, 16QAM	1 RB / 24 RB Offset
		20000 to 20350	20000, 20175, 20350	10 MHz	QPSK, 16QAM	1 RB / 49 RB Offset
		20025 to 20325	20025, 20175, 20325	15 MHz	QPSK, 16QAM	1 RB / 74 RB Offset
		20050 to 20300	20050, 20175, 20300	20 MHz	QPSK, 16QAM	1 RB / 99 RB Offset
-	Radiated Emission	19957 to 20393	19957, 20175, 20393	1.4 MHz	QPSK	1 RB / 2 RB Offset
		19975 to 20375	19975, 20175, 20375	5 MHz	QPSK	12 RB / 0 RB Offset
		20050 to 20300	20050, 20175, 20300	20 MHz	QPSK	50 RB / 0 RB Offset

Note: This device was tested under all bandwidths, RB configurations and modulations. The worst case was found in QPSK modulation.

LTE Band 12

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Channel Bandwidth	Modulation	Mode
-	ERP	23017 to 23173	23017, 23095, 23173	1.4 MHz	QPSK, 16QAM	1 RB / 2 RB Offset
		23025 to 23165	23025, 23095, 23165	3 MHz	QPSK, 16QAM	1 RB / 7 RB Offset
		23035 to 23155	23035, 23095, 23155	5 MHz	QPSK, 16QAM	1 RB / 12 RB Offset
		23060 to 23130	23060, 23095, 23130	10 MHz	QPSK, 16QAM	1 RB / 24 RB Offset
-	Radiated Emission	23017 to 23173	23017, 23095, 23173	1.4 MHz	QPSK	1 RB / 0 RB Offset
		23035 to 23155	23035, 23095, 23155	5 MHz	QPSK	1 RB / 0 RB Offset
		23060 to 23130	23060, 23095, 23130	10 MHz	QPSK	1 RB / 0 RB Offset

Note: This device was tested under all bandwidths, RB configurations and modulations. The worst case was found in QPSK modulation.

LTE Band 13

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Channel Bandwidth	Modulation	Mode
-	ERP	23205 to 23255	23205, 23230, 23255	5 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		23230	23230	10 MHz	QPSK, 16QAM	1 RB / 24 RB Offset
-	Radiated Emission	23205 to 23255	23205, 23230, 23255	5 MHz	QPSK	1 RB / 0 RB Offset
		23230	23230	10 MHz	QPSK	1 RB / 0 RB Offset

Note: This device was tested under all bandwidths, RB configurations and modulations. The worst case was found in QPSK modulation.

LTE Band 17

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Channel Bandwidth	Modulation	Mode
-	ERP	23755 to 23825	23755, 23790, 23825	5 MHz	QPSK, 16QAM	1 RB / 12 RB Offset
		23780 to 23800	23780, 23790, 23800	10 MHz	QPSK, 16QAM	1 RB / 24 RB Offset
-	Radiated Emission	23755 to 23825	23755, 23790, 23825	5 MHz	QPSK	1 RB / 12 RB Offset
		23780 to 23800	23780, 23790, 23800	10 MHz	QPSK	1 RB / 24 RB Offset

Note: This device was tested under all bandwidths, RB configurations and modulations. The worst case was found in QPSK modulation.

LTE Band 66

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Channel Bandwidth	Modulation	Mode
-	EIRP	131979 to 132665	131979, 132322, 132665	1.4 MHz	QPSK, 16QAM	1 RB / 5 RB Offset
		131987 to 132657	131987, 132322, 132657	3 MHz	QPSK, 16QAM	1 RB / 14 RB Offset
		131997 to 132647	131997, 132322, 132647	5 MHz	QPSK, 16QAM	1 RB / 24 RB Offset
		132022 to 132622	132022, 132322, 132622	10 MHz	QPSK, 16QAM	1 RB / 49 RB Offset
		132047 to 132597	132047, 132322, 132597	15 MHz	QPSK, 16QAM	1 RB / 74 RB Offset
		132072 to 132572	132072, 132322, 132572	20 MHz	QPSK, 16QAM	1 RB / 99 RB Offset
-	Radiated Emission	131979 to 132665	131979, 132322, 132665	1.4 MHz	QPSK	1 RB / 2 RB Offset
		131997 to 132647	131997, 132322, 132647	5 MHz	QPSK	12 RB / 0 RB Offset
		132072 to 132572	132072, 132322, 132572	20 MHz	QPSK	50 RB / 0 RB Offset

Test Condition:

Test Item	Environmental Conditions	Input Power	Tested By
ERP / EIRP	25 deg. C, 65 % RH	5 Vdc	Getaz Yang
Radiated Emission	25 deg. C, 65 % RH	120 Vac, 60 Hz	Getaz Yang Jisysong Wang

3.4 EUT Operating Conditions

The EUT makes a call to the communication simulator. The communication simulator station system controlled a EUT to export maximum output power under transmission mode and specific channel frequency

3.5 General Description of Applied Standards

The EUT is a RF Product. According to the specifications of the manufacturer, it must comply with the requirements of the following standards:

FCC 47 CFR Part 2

FCC 47 CFR Part 27

KDB 971168 D01 Power Meas License Digital Systems v03r01

ANSI/TIA/EIA-603-E 2016

ANSI 63.26-2015

Note: All test items have been performed and recorded as per the above standards.

4 Test Types and Results

4.1 Output Power Measurement

4.1.1 Limits of Output Power Measurement

Fixed, mobile, and portable (hand-held) stations operating in the 1710–1755 MHz band are limited to 1 watt EIRP.

Portable stations (hand-held devices) operating in the 704-716 MHz band are limited to 3 watts ERP

4.1.2 Test Procedures

EIRP / ERP Measurement:

- a. All measurements were done at low, middle and high operational frequency range. RBW and VBW is 5 MHz for WCDMA and 10 MHz for LTE mode.
- b. Substitution method is used for E.I.R.P measurement. In the semi-anechoic chamber, EUT placed on the 0.8 m (below or equal 1 GHz) and/or 1.5 m (above 1 GHz) height of Turn Table, rotated the table around 360 degrees to search the maximum radiation power and receiver antenna shall be rotated vertical and horizontal polarization and moved height from 1 m to 4 m to find the maximum polar radiated power. The “Read Value” is the spectrum reading the maximum power value.
- c. The substitution horn antenna is substituted for EUT at the same position and signals generator export the CW signal to the substitution antenna via a tx cable. Rotated the Turn Table and moved receiving antenna to find the maximum radiation power. Adjust output power level of S.G to get a Value of spectrum reading equal to “Read Value” of step b. Record the power level of S.G.
- d. EIRP = Output power level of S.G – TX cable loss + Antenna gain of substitution horn. E.R.P power can be calculated form E.I.R.P power by subtracting the gain of dipole, E.R.P power = E.I.P.R power - 2.15 dB.

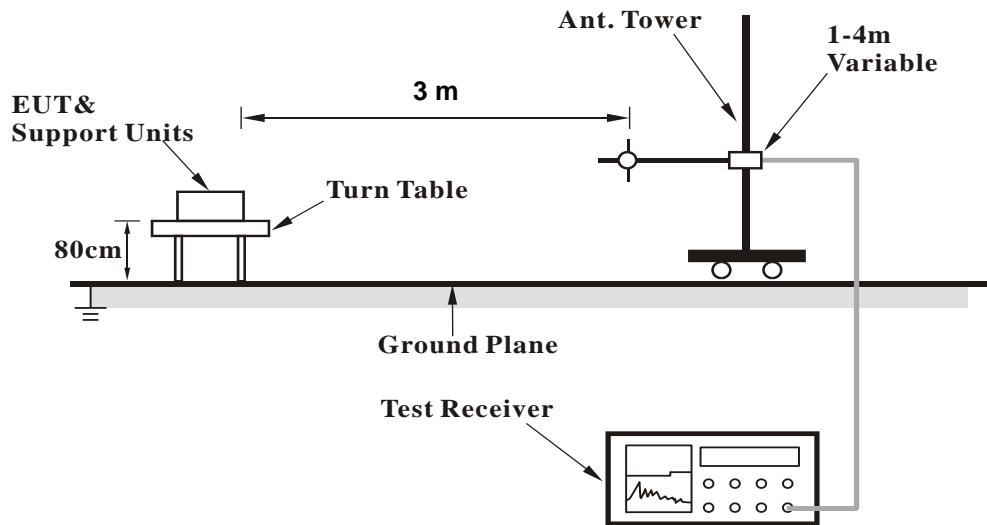
Conducted Power Measurement:

- a. The EUT was set up for the maximum power with LTE link data modulation and link up with simulator.
- b. Set the EUT to transmit under low, middle and high channel and record the power level shown on simulator.

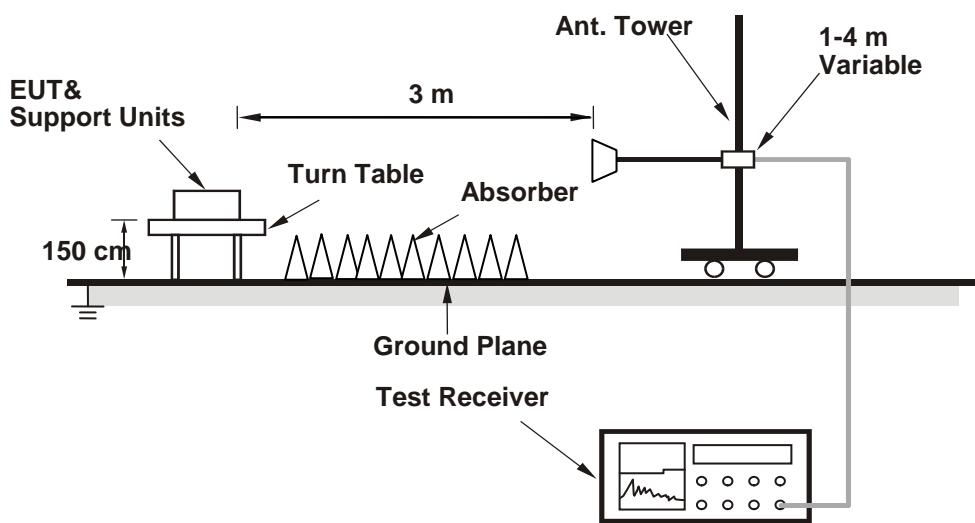
4.1.3 Test Setup

EIRP / ERP Measurement:

<Radiated Emission below or equal 1 GHz>

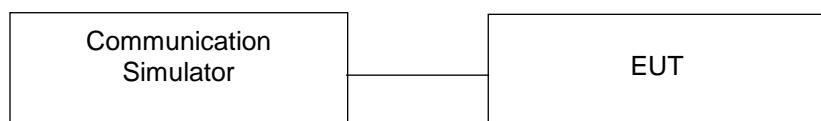


<Radiated Emission above 1 GHz>



For the actual test configuration, please refer to the attached file (Test Setup Photo).

Conducted Power Measurement:



4.1.4 Test Results

ERP Power (dBm)

LTE Band 12							
Channel Bandwidth: 1.4 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	ERP (dBm)	ERP (mW)	Polarization (H/V)
Y	23017	699.7	-10.51	30.36	17.70	58.88	H
	23095	707.5	-10.83	30.17	17.19	52.36	
	23173	715.3	-11.35	30.17	16.67	46.45	
	23017	699.7	-9.90	32.03	19.98	99.54	V
	23095	707.5	-10.17	31.98	19.66	92.47	
	23173	715.3	-10.37	32.06	19.54	89.95	
Channel Bandwidth: 1.4 MHz / 16QAM							
Y	23017	699.7	-11.63	30.36	16.58	45.50	H
	23095	707.5	-11.95	30.17	16.07	40.46	
	23173	715.3	-12.47	30.17	15.55	35.89	
	23017	699.7	-11.02	32.03	18.86	76.91	V
	23095	707.5	-11.29	31.98	18.54	71.45	
	23173	715.3	-11.49	32.06	18.42	69.50	

LTE Band 12							
Channel Bandwidth: 3 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	ERP (dBm)	ERP (mW)	Polarization (H/V)
Y	23025	700.5	-9.96	30.17	18.06	63.97	H
	23095	707.5	-10.47	30.17	17.55	56.89	
	23165	714.5	-11.00	30.18	17.03	50.47	
	23025	700.5	-9.47	31.96	20.34	108.14	V
	23095	707.5	-9.81	31.98	20.02	100.46	
	23165	714.5	-9.98	32.03	19.90	97.72	
Channel Bandwidth: 3 MHz / 16QAM							
Y	23025	700.5	-11.01	30.17	17.01	50.23	H
	23095	707.5	-11.52	30.17	16.50	44.67	
	23165	714.5	-12.05	30.18	15.98	39.63	
	23025	700.5	-10.52	31.96	19.29	84.92	V
	23095	707.5	-10.86	31.98	18.97	78.89	
	23165	714.5	-11.03	32.03	18.85	76.74	

LTE Band 12								
Channel Bandwidth: 5 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	ERP (dBm)	ERP (mW)	Polarization (H/V)	
Y	23035	701.5	-9.55	30.17	18.47	70.31	H	
	23095	707.5	-10.06	30.17	17.96	62.52		
	23155	713.5	-10.59	30.18	17.44	55.46		
	23035	701.5	-9.06	31.96	20.75	118.85	V	
	23095	707.5	-9.40	31.98	20.43	110.41		
	23155	713.5	-9.57	32.03	20.31	107.40		
Channel Bandwidth: 5 MHz / 16QAM								
Y	23035	701.5	-10.54	30.17	17.48	55.98	H	
	23095	707.5	-11.05	30.17	16.97	49.77		
	23155	713.5	-11.58	30.18	16.45	44.16		
	23035	701.5	-10.05	31.96	19.76	94.62	V	
	23095	707.5	-10.39	31.98	19.44	87.90		
	23155	713.5	-10.56	32.03	19.32	85.51		
LTE Band 12								
Channel Bandwidth: 10 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	ERP (dBm)	ERP (mW)	Polarization (H/V)	
Y	23060	704.0	-9.17	30.17	18.85	76.74	H	
	23095	707.5	-9.68	30.17	18.34	68.23		
	23130	711.0	-10.21	30.18	17.82	60.53		
	23060	704.0	-8.68	31.96	21.13	129.72	V	
	23095	707.5	-9.02	31.98	20.81	120.50		
	23130	711.0	-9.19	32.03	20.69	117.22		
Channel Bandwidth: 10 MHz / 16QAM								
Y	23060	704.0	-10.19	30.17	17.83	60.67	H	
	23095	707.5	-10.70	30.17	17.32	53.95		
	23130	711.0	-11.23	30.18	16.80	47.86		
	23060	704.0	-9.70	31.96	20.11	102.57	V	
	23095	707.5	-10.04	31.98	19.79	95.28		
	23130	711.0	-10.21	32.03	19.67	92.68		

LTE Band 13							
Channel Bandwidth: 5 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	ERP (dBm)	ERP (mW)	Polarization (H/V)
Y	23205	779.5	-14.07	32.24	16.02	39.99	H
	23230	782.0	-14.17	32.17	15.85	38.46	
	23255	784.5	-13.71	32.11	16.25	42.17	
	23205	779.5	-10.29	32.43	19.99	99.77	V
	23230	782.0	-10.54	32.42	19.73	93.97	
	23255	784.5	-10.30	32.46	20.01	100.23	
Channel Bandwidth: 5 MHz / 16QAM							
Y	23205	779.5	-15.12	32.24	14.97	31.41	H
	23230	782.0	-15.22	32.17	14.80	30.20	
	23255	784.5	-14.76	32.11	15.20	33.11	
	23205	779.5	-11.34	32.43	18.94	78.34	V
	23230	782.0	-11.59	32.42	18.68	73.79	
	23255	784.5	-11.35	32.46	18.96	78.70	

LTE Band 13							
Channel Bandwidth: 10 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	ERP (dBm)	ERP (mW)	Polarization (H/V)
Y	23230	782.0	-12.79	32.17	17.23	52.84	H
	23230	782.0	-9.16	32.42	21.11	129.12	V
Channel Bandwidth: 10 MHz / 16QAM							
Y	23230	782.0	-13.81	32.17	16.21	41.78	H
	23230	782.0	-10.18	32.42	20.09	102.09	V

LTE Band 17								
Channel Bandwidth: 5 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	ERP (dBm)	ERP (mW)	Polarization (H/V)	
Y	23755	706.5	-10.18	30.36	18.03	63.53	H	
	23790	710.0	-10.27	30.17	17.75	59.57		
	23825	713.5	-10.63	30.17	17.39	54.83		
	23755	706.5	-8.87	32.03	21.01	126.18	V	
	23790	710.0	-9.04	31.98	20.79	119.95		
	23825	713.5	-9.29	32.06	20.62	115.35		
Channel Bandwidth: 5 MHz / 16QAM								
Y	23755	706.5	-11.24	30.36	16.97	49.77	H	
	23790	710.0	-11.33	30.17	16.69	46.67		
	23825	713.5	-11.69	30.17	16.33	42.95		
	23755	706.5	-9.93	32.03	19.95	98.86	V	
	23790	710.0	-10.10	31.98	19.73	93.97		
	23825	713.5	-10.35	32.06	19.56	90.36		
LTE Band 17								
Channel Bandwidth: 10 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	ERP (dBm)	ERP (mW)	Polarization (H/V)	
Y	23780	709.0	-9.76	30.17	18.26	66.99	H	
	23790	710.0	-10.04	30.17	17.98	62.81		
	23800	711.0	-10.41	30.18	17.62	57.81		
	23780	709.0	-8.57	31.96	21.24	133.05	V	
	23790	710.0	-8.81	31.98	21.02	126.47		
	23800	711.0	-9.03	32.03	20.85	121.62		
Channel Bandwidth: 10 MHz / 16QAM								
Y	23780	709.0	-10.78	30.17	17.24	52.97	H	
	23790	710.0	-11.06	30.17	16.96	49.66		
	23800	711.0	-11.43	30.18	16.60	45.71		
	23780	709.0	-9.59	31.96	20.22	105.20	V	
	23790	710.0	-9.83	31.98	20.00	100.00		
	23800	711.0	-10.05	32.03	19.83	96.16		

EIRP Power (dBm)

WCDMA							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)
NB Mode	1312	1712.4	-15.74	36.29	20.55	113.50	H
	1413	1732.6	-15.78	36.69	20.91	123.31	
	1513	1752.6	-16.96	36.98	20.02	100.46	
	1312	1712.4	-13.54	37.11	23.57	227.51	V
	1413	1732.6	-13.71	37.60	23.89	244.91	
	1513	1752.6	-14.47	37.65	23.18	207.97	

LTE Band 4
Channel Bandwidth: 1.4 MHz / QPSK

Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)
NB Mode	19957	1710.7	-19.72	36.45	16.73	47.10	H
	20175	1732.5	-20.48	36.80	16.32	42.85	
	20393	1754.3	-21.30	36.94	15.64	36.64	
	19957	1710.7	-17.05	37.28	20.23	105.44	V
	20175	1732.5	-17.73	37.63	19.90	97.72	
	20393	1754.3	-18.08	37.64	19.56	90.36	

Channel Bandwidth: 1.4 MHz / 16QAM

NB Mode	19957	1710.7	-20.73	36.45	15.72	37.33	H
	20175	1732.5	-21.49	36.80	15.31	33.96	
	20393	1754.3	-22.31	36.94	14.63	29.04	
	19957	1710.7	-18.06	37.28	19.22	83.56	V
	20175	1732.5	-18.74	37.63	18.89	77.45	
	20393	1754.3	-19.09	37.64	18.55	71.61	

LTE Band 4							
Channel Bandwidth: 3 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)
NB Mode	19965	1711.5	-19.37	36.45	17.08	51.05	H
	20175	1732.5	-20.13	36.80	16.67	46.45	
	20385	1753.5	-20.95	36.94	15.99	39.72	
	19965	1711.5	-16.70	37.28	20.58	114.29	V
	20175	1732.5	-17.38	37.63	20.25	105.93	
	20385	1753.5	-17.73	37.64	19.91	97.95	
Channel Bandwidth: 3 MHz / 16QAM							
NB Mode	19965	1711.5	-20.35	36.45	16.10	40.74	H
	20175	1732.5	-21.11	36.80	15.69	37.07	
	20385	1753.5	-21.93	36.94	15.01	31.70	
	19965	1711.5	-17.68	37.28	19.60	91.20	V
	20175	1732.5	-18.36	37.63	19.27	84.53	
	20385	1753.5	-18.71	37.64	18.93	78.16	

LTE Band 4							
Channel Bandwidth: 5 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)
NB Mode	19975	1712.5	-19.09	36.45	17.36	54.45	H
	20175	1732.5	-19.85	36.80	16.95	49.55	
	20375	1752.5	-20.67	36.94	16.27	42.36	
	19975	1712.5	-16.42	37.28	20.86	121.90	V
	20175	1732.5	-17.10	37.63	20.53	112.98	
	20375	1752.5	-17.45	37.64	20.19	104.47	
Channel Bandwidth: 5 MHz / 16QAM							
NB Mode	19975	1712.5	-20.16	36.45	16.29	42.56	H
	20175	1732.5	-20.92	36.80	15.88	38.73	
	20375	1752.5	-21.74	36.94	15.20	33.11	
	19975	1712.5	-17.49	37.28	19.79	95.28	V
	20175	1732.5	-18.17	37.63	19.46	88.31	
	20375	1752.5	-18.52	37.64	19.12	81.66	

LTE Band 4								
Channel Bandwidth: 10 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)	
NB Mode	20000	1715.0	-18.97	36.64	17.67	58.48	H	
	20175	1732.5	-19.54	36.80	17.26	53.21		
	20350	1750.0	-20.22	36.80	16.58	45.50		
	20000	1715.0	-16.27	37.44	21.17	130.92	V	
	20175	1732.5	-16.79	37.63	20.84	121.34		
	20350	1750.0	-17.14	37.64	20.50	112.20		
Channel Bandwidth: 10 MHz / 16QAM								
NB Mode	20000	1715.0	-20.02	36.64	16.62	45.92	H	
	20175	1732.5	-20.59	36.80	16.21	41.78		
	20350	1750.0	-21.27	36.80	15.53	35.73		
	20000	1715.0	-17.32	37.44	20.12	102.80	V	
	20175	1732.5	-17.84	37.63	19.79	95.28		
	20350	1750.0	-18.19	37.64	19.45	88.10		
LTE Band 4								
Channel Bandwidth: 15 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)	
NB Mode	20025	1717.5	-18.49	36.45	17.96	62.52	H	
	20175	1732.5	-19.25	36.80	17.55	56.89		
	20325	1747.5	-20.07	36.94	16.87	48.64		
	20025	1717.5	-15.82	37.28	21.46	139.96	V	
	20175	1732.5	-16.50	37.63	21.13	129.72		
	20325	1747.5	-16.85	37.64	20.79	119.95		
Channel Bandwidth: 15 MHz / 16QAM								
NB Mode	20025	1717.5	-19.48	36.45	16.97	49.77	H	
	20175	1732.5	-20.24	36.80	16.56	45.29		
	20325	1747.5	-21.06	36.94	15.88	38.73		
	20025	1717.5	-16.81	37.28	20.47	111.43	V	
	20175	1732.5	-17.49	37.63	20.14	103.28		
	20325	1747.5	-17.84	37.64	19.80	95.50		

LTE Band 4								
Channel Bandwidth: 20 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)	
NB Mode	20050	1720.0	-18.19	36.45	18.26	66.99	H	
	20175	1732.5	-18.95	36.80	17.85	60.95		
	20300	1745.0	-19.77	36.94	17.17	52.12		
	20050	1720.0	-15.52	37.28	21.76	149.97	V	
	20175	1732.5	-16.20	37.63	21.43	139.00		
	20300	1745.0	-16.55	37.64	21.09	128.53		
Channel Bandwidth: 20 MHz / 16QAM								
NB Mode	20050	1720.0	-19.20	36.45	17.25	53.09	H	
	20175	1732.5	-19.96	36.80	16.84	48.31		
	20300	1745.0	-20.78	36.94	16.16	41.30		
	20050	1720.0	-16.53	37.28	20.75	118.85	V	
	20175	1732.5	-17.21	37.63	20.42	110.15		
	20300	1745.0	-17.56	37.64	20.08	101.86		
LTE Band 66								
Channel Bandwidth: 1.4 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)	
NB Mode	131979	1710.7	-20.67	36.45	15.78	37.84	H	
	132322	1745.0	-21.45	36.80	15.35	34.28		
	132665	1779.3	-21.40	36.94	15.54	35.81		
	131979	1710.7	-17.58	37.28	19.70	93.33	V	
	132322	1745.0	-18.26	37.63	19.37	86.50		
	132665	1779.3	-18.11	37.64	19.53	89.74		
Channel Bandwidth: 1.4 MHz / 16QAM								
NB Mode	131979	1710.7	-21.74	36.45	14.71	29.58	H	
	132322	1745.0	-22.52	36.80	14.28	26.79		
	132665	1779.3	-22.47	36.94	14.47	27.99		
	131979	1710.7	-18.65	37.28	18.63	72.95	V	
	132322	1745.0	-19.33	37.63	18.30	67.61		
	132665	1779.3	-19.18	37.64	18.46	70.15		

LTE Band 66							
Channel Bandwidth: 3 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)
NB Mode	131987	1711.5	-20.38	36.45	16.07	40.46	H
	132322	1745.0	-21.16	36.80	15.64	36.64	
	132657	1778.5	-21.11	36.94	15.83	38.28	
	131987	1711.5	-17.29	37.28	19.99	99.77	V
	132322	1745.0	-17.97	37.63	19.66	92.47	
	132657	1778.5	-17.82	37.64	19.82	95.94	
Channel Bandwidth: 3 MHz / 16QAM							
NB Mode	131987	1711.5	-21.44	36.45	15.01	31.70	H
	132322	1745.0	-22.22	36.80	14.58	28.71	
	132657	1778.5	-22.17	36.94	14.77	29.99	
	131987	1711.5	-18.35	37.28	18.93	78.16	V
	132322	1745.0	-19.03	37.63	18.60	72.44	
	132657	1778.5	-18.88	37.64	18.76	75.16	

LTE Band 66							
Channel Bandwidth: 5 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)
NB Mode	131997	1712.5	-20.07	36.45	16.38	43.45	H
	132322	1745.0	-20.85	36.80	15.95	39.36	
	132647	1777.5	-20.80	36.94	16.14	41.11	
	131997	1712.5	-16.98	37.28	20.30	107.15	V
	132322	1745.0	-17.66	37.63	19.97	99.31	
	132647	1777.5	-17.51	37.64	20.13	103.04	
Channel Bandwidth: 5 MHz / 16QAM							
NB Mode	131997	1712.5	-21.05	36.45	15.40	34.67	H
	132322	1745.0	-21.83	36.80	14.97	31.41	
	132647	1777.5	-21.78	36.94	15.16	32.81	
	131997	1712.5	-17.96	37.28	19.32	85.51	V
	132322	1745.0	-18.64	37.63	18.99	79.25	
	132647	1777.5	-18.49	37.64	19.15	82.22	

LTE Band 66								
Channel Bandwidth: 10 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)	
NB Mode	132022	1715.0	-19.98	36.64	16.66	46.34	H	
	132322	1745.0	-20.57	36.80	16.23	41.98		
	132622	1775.0	-20.38	36.80	16.42	43.85		
	132022	1715.0	-16.86	37.44	20.58	114.29	V	
	132322	1745.0	-17.38	37.63	20.25	105.93		
	132622	1775.0	-17.23	37.64	20.41	109.90		
Channel Bandwidth: 10 MHz / 16QAM								
NB Mode	132022	1715.0	-20.97	36.64	15.67	36.90	H	
	132322	1745.0	-21.56	36.80	15.24	33.42		
	132622	1775.0	-21.37	36.80	15.43	34.91		
	132022	1715.0	-17.85	37.44	19.59	90.99	V	
	132322	1745.0	-18.37	37.63	19.26	84.33		
	132622	1775.0	-18.22	37.64	19.42	87.50		
LTE Band 66								
Channel Bandwidth: 15 MHz / QPSK								
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)	
NB Mode	132047	1717.5	-19.50	36.45	16.95	49.55	H	
	132322	1745.0	-20.28	36.80	16.52	44.87		
	132597	1772.5	-20.23	36.94	16.71	46.88		
	132047	1717.5	-16.41	37.28	20.87	122.18	V	
	132322	1745.0	-17.09	37.63	20.54	113.24		
	132597	1772.5	-16.94	37.64	20.70	117.49		
Channel Bandwidth: 15 MHz / 16QAM								
NB Mode	132047	1717.5	-20.55	36.45	15.90	38.90	H	
	132322	1745.0	-21.33	36.80	15.47	35.24		
	132597	1772.5	-21.28	36.94	15.66	36.81		
	132047	1717.5	-17.46	37.28	19.82	95.94	V	
	132322	1745.0	-18.14	37.63	19.49	88.92		
	132597	1772.5	-17.99	37.64	19.65	92.26		

LTE Band 66							
Channel Bandwidth: 20 MHz / QPSK							
Plane	Channel	Frequency (MHz)	LVL (dBm)	Correction Factor (dB)	EIRP (dBm)	EIRP (mW)	Polarization (H/V)
NB Mode	132072	1720.0	-19.19	36.45	17.26	53.21	H
	132322	1745.0	-19.97	36.80	16.83	48.19	
	132572	1770.0	-19.92	36.94	17.02	50.35	
	132072	1720.0	-16.10	37.28	21.18	131.22	V
	132322	1745.0	-16.78	37.63	20.85	121.62	
	132572	1770.0	-16.63	37.64	21.01	126.18	
Channel Bandwidth: 20 MHz / 16QAM							
NB Mode	132072	1720.0	-20.20	36.45	16.25	42.17	H
	132322	1745.0	-20.98	36.80	15.82	38.19	
	132572	1770.0	-20.93	36.94	16.01	39.90	
	132072	1720.0	-17.11	37.28	20.17	103.99	V
	132322	1745.0	-17.79	37.63	19.84	96.38	
	132572	1770.0	-17.64	37.64	20.00	100.00	

4.2 Radiated Emission Measurement

4.2.1 Limits of Radiated Emission Measurement

- a. The power of any emission outside a licensee's frequency block shall be attenuated below the transmitter power (P) by at least $43 + 10 \log (P)$ dB. The limit of emission is equal to -13 dBm.
- b. For operations in the 775-788 MHz, emissions in the band 1559-1610 MHz shall be limited to -70 dBW/MHz. The limit of emissions is equal to -40 dBm.

4.2.2 Test Procedure

- a. Substitution method is used for E.I.R.P measurement. In the semi-anechoic chamber, EUT placed on the 0.8 m (below or equal 1 GHz) and/or 1.5 m (above 1 GHz) height of Turn Table, rotated the table around 360 degrees to search the maximum radiation power and receiver antenna shall be rotated vertical and horizontal polarization and moved height from 1 m to 4 m to find the maximum polar radiated power. The "Read Value" is the spectrum reading the maximum power value.
- b. The substitution horn antenna is substituted for EUT at the same position and signals generator export the CW signal to the substitution antenna via a TX cable. Rotated the Turn Table and moved receiving antenna to find the maximum radiation power. Adjust output power level of S.G to get a Value of spectrum reading equal to "Read Value" of step a. Record the power level of S.G.
- c. EIRP = Output power level of S.G – TX cable loss + Antenna gain of substitution horn.
- d. E.R.P power can be calculated form E.I.R.P power by subtracting the gain of dipole, E.R.P power = E.I.P.R power - 2.15 dB.

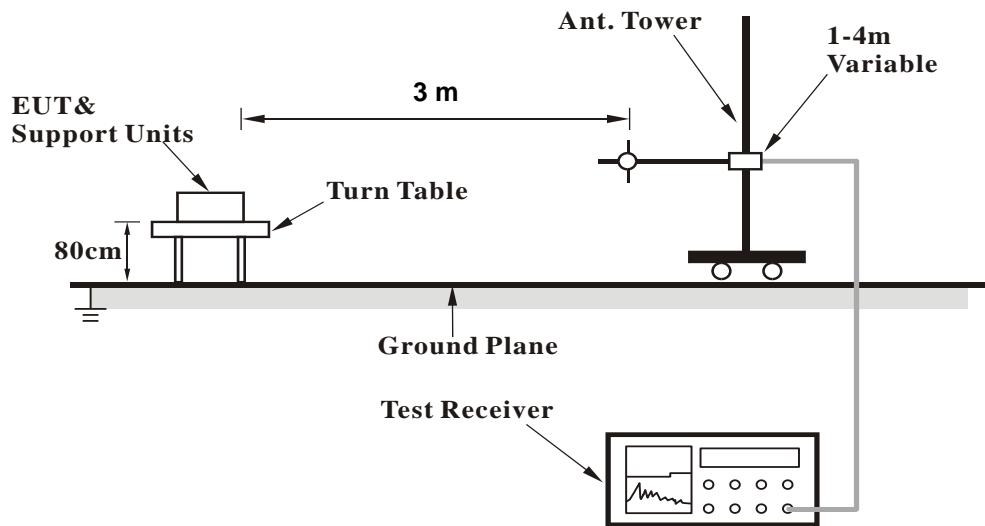
Note: The resolution bandwidth of spectrum analyzer is 1 MHz and the video bandwidth is 3 MHz.

4.2.3 Deviation from Test Standard

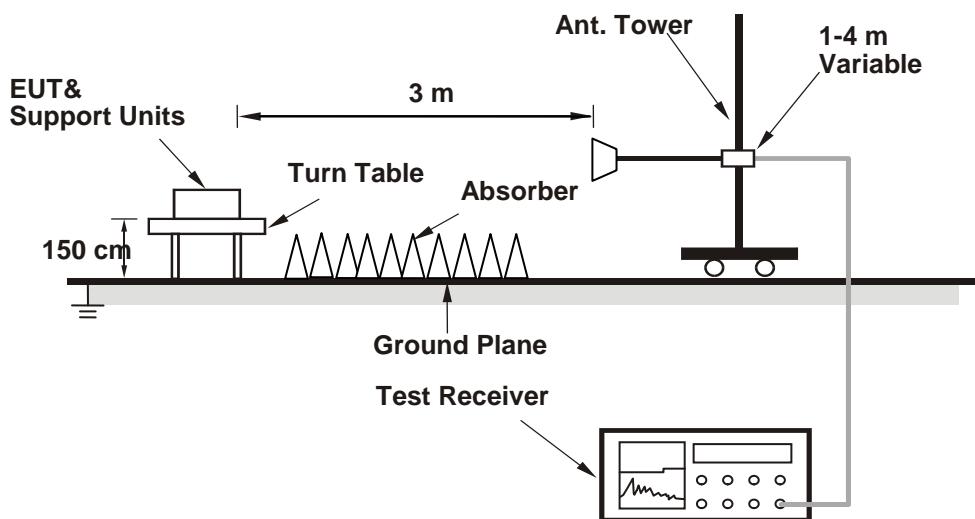
No deviation.

4.2.4 Test Setup

<Radiated Emission below or equal 1 GHz>



<Radiated Emission above 1 GHz>



For the actual test configuration, please refer to the attached file (Test Setup Photo).

4.2.5 Test Results

WCDMA:

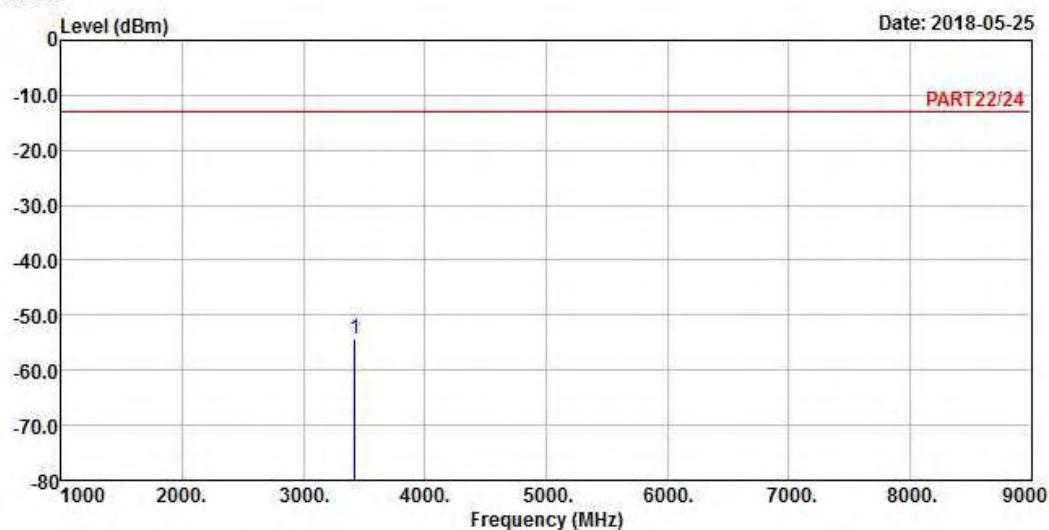
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5



Site : 966 Chamber 5

Condition: PART22/24 HORIZONTAL

Remark : WCDMA Band 4 Link_L-CH

Tested by: Getaz Yang

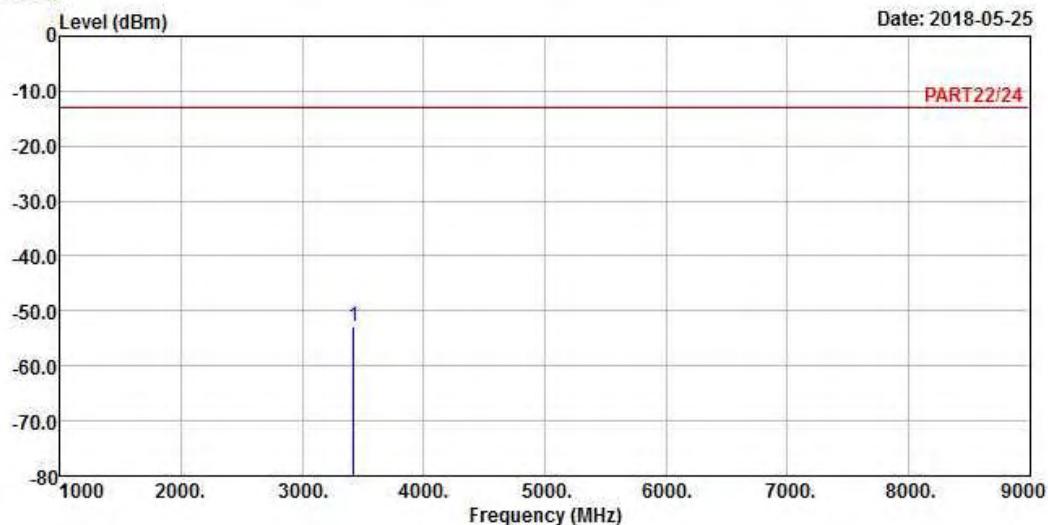
Freq	Read		Limit Line	Over Limit Factor	Remark
	Level	Level			
MHz	dBm	dBm	dBm	dB	dB
1 pp	3424.80	-54.46	-46.12	-13.00	-41.46 -8.34 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6



Site : 966 Chamber 5

Condition: PART22/24 VERTICAL

Remark : WCDMA Band 4 Link_L-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over Line	Over Limit	Factor	Remark
1 pp	3424.80	-52.93	-44.59	-13.00	-39.93	-8.34 Peak

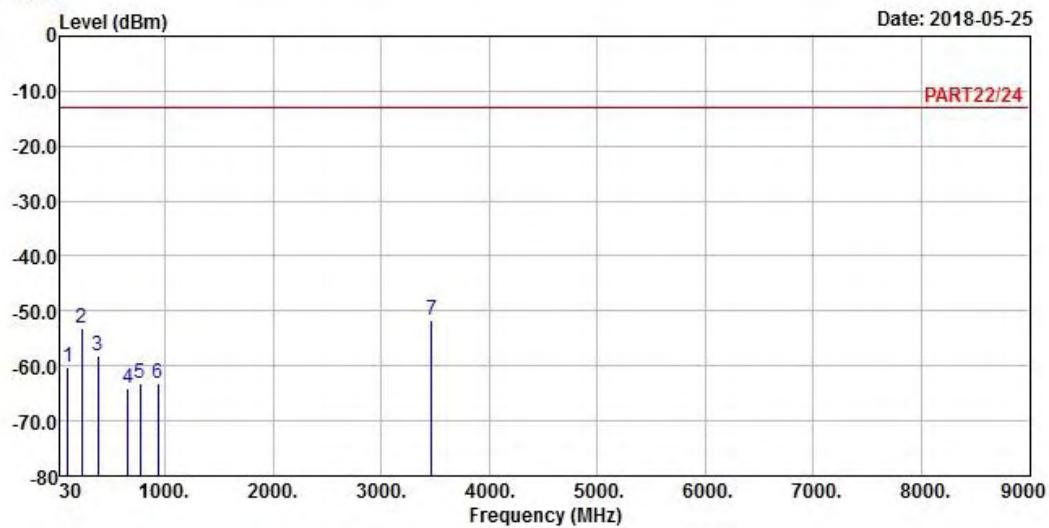
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 7



Site : 966 Chamber 5

Condition: PART22/24 HORIZONTAL

Remark : WCDMA Band 4 Link_M-CH

Tested by: Getaz Yang

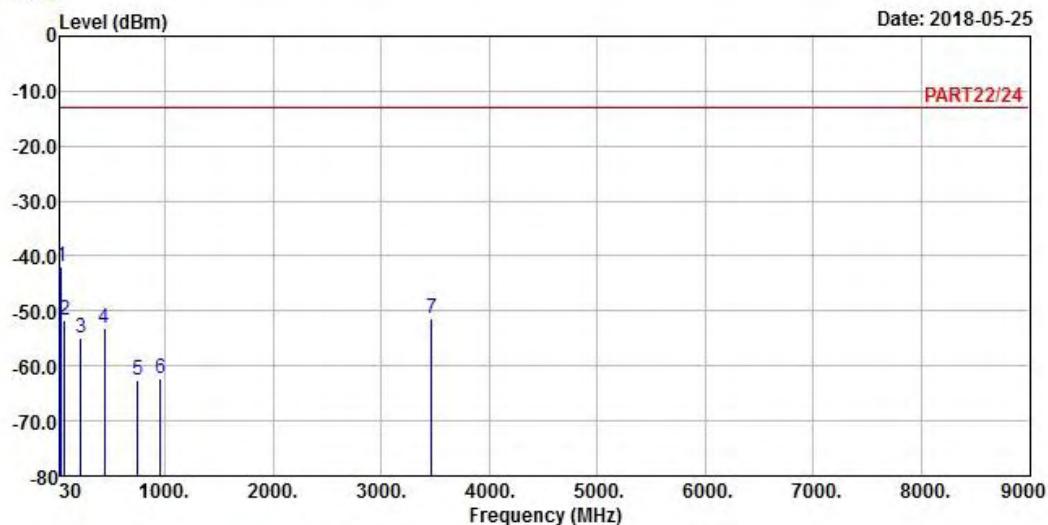
Freq	Read		Limit	Over	Factor	Remark
	MHz	dBm	dBm	dBm		
1	101.78	-60.16	-49.64	-13.00	-47.16	-10.52 Peak
2	226.91	-53.25	-46.32	-13.00	-40.25	-6.93 Peak
3	375.32	-58.16	-52.07	-13.00	-45.16	-6.09 Peak
4	652.74	-64.07	-63.23	-13.00	-51.07	-0.84 Peak
5	768.17	-63.27	-64.10	-13.00	-50.27	0.83 Peak
6	932.10	-63.12	-64.49	-13.00	-50.12	1.37 Peak
7 pp	3465.20	-51.77	-43.89	-13.00	-38.77	-7.88 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 8



Site : 966 Chamber 5

Condition: PART22/24 VERTICAL

Remark : WCDMA Band 4 Link_M-CH

Tested by: Getaz Yang

	Freq	Read Level	Limit Level	Over Line	Over Limit	Over Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1 pp	40.67	-41.82	-41.94	-13.00	-28.82	0.12	Peak
2	67.83	-51.65	-43.40	-13.00	-38.65	-8.25	Peak
3	219.15	-54.82	-47.58	-13.00	-41.82	-7.24	Peak
4	438.37	-53.10	-47.46	-13.00	-40.10	-5.64	Peak
5	743.92	-62.63	-63.39	-13.00	-49.63	0.76	Peak
6	954.41	-62.14	-64.11	-13.00	-49.14	1.97	Peak
7	3465.20	-51.40	-43.52	-13.00	-38.40	-7.88	Peak

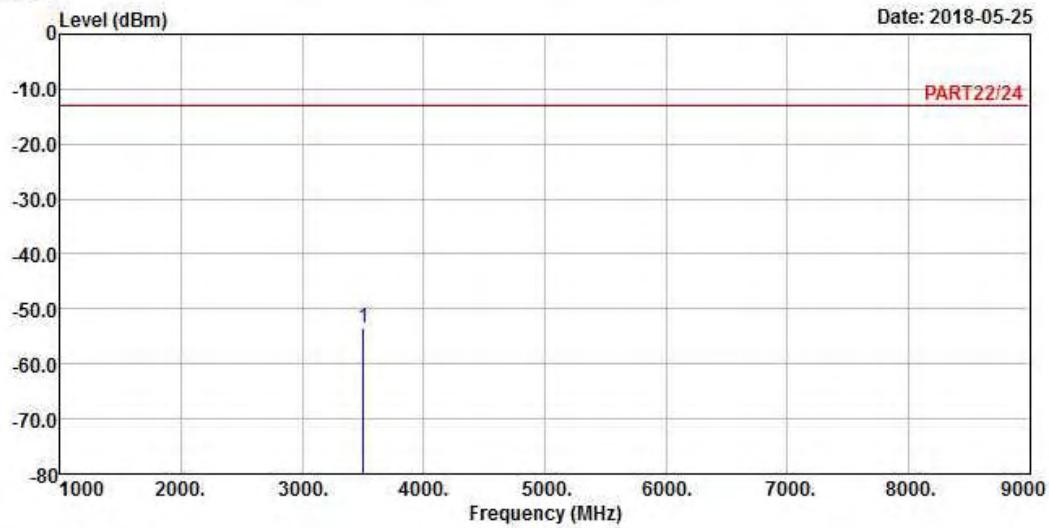
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5



Site : 966 Chamber 5

Condition: PART22/24 HORIZONTAL

Remark : WCDMA Band 4 Link_H-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

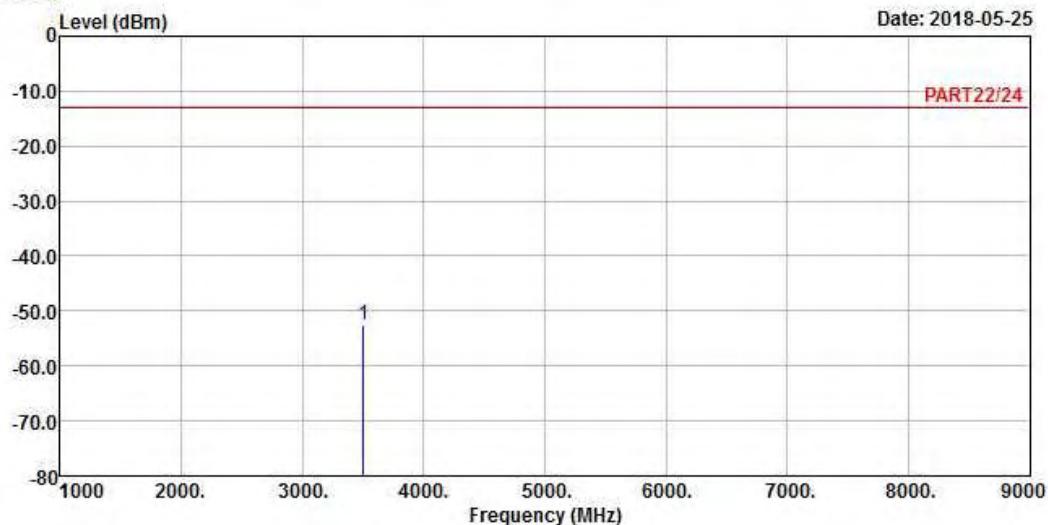
1 pp 3505.20 -53.55 -46.10 -13.00 -40.55 -7.45 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6



Site : 966 Chamber 5

Condition: PART22/24 VERTICAL

Remark : WCDMA Band 4 Link_H-CH

Tested by: Getaz Yang

Freq	Level	Read	Limit	Over	Factor	Remark
		Line	dBm	dB		
MHz	dBm	dBm	dB	dB		
1 pp	3505.20	-52.50	-45.05	-13.00	-39.50	-7.45 Peak

LTE Band 4

Channel Bandwidth: 1.4 MHz / QPSK

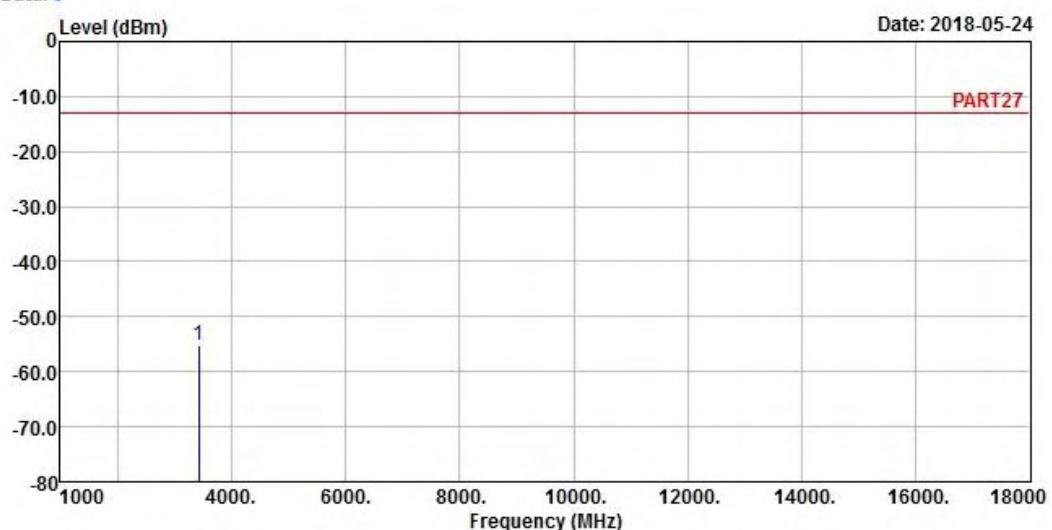
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_1.4M Link_L-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
------	------------	-------------	-----------	--------------	--------

MHz	dBm	dBm	dBm	dB	dB
-----	-----	-----	-----	----	----

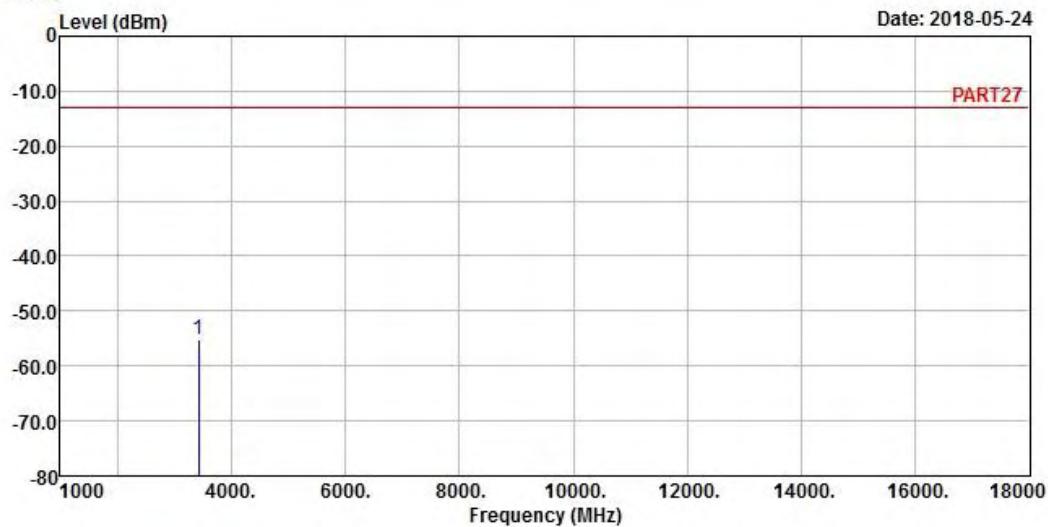
1 pp 3421.40 -55.07 -46.73 -13.00 -42.07 -8.34 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_1.4M Link_L-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3421.40	-55.22	-46.88	-13.00	-42.22 -8.34 Peak

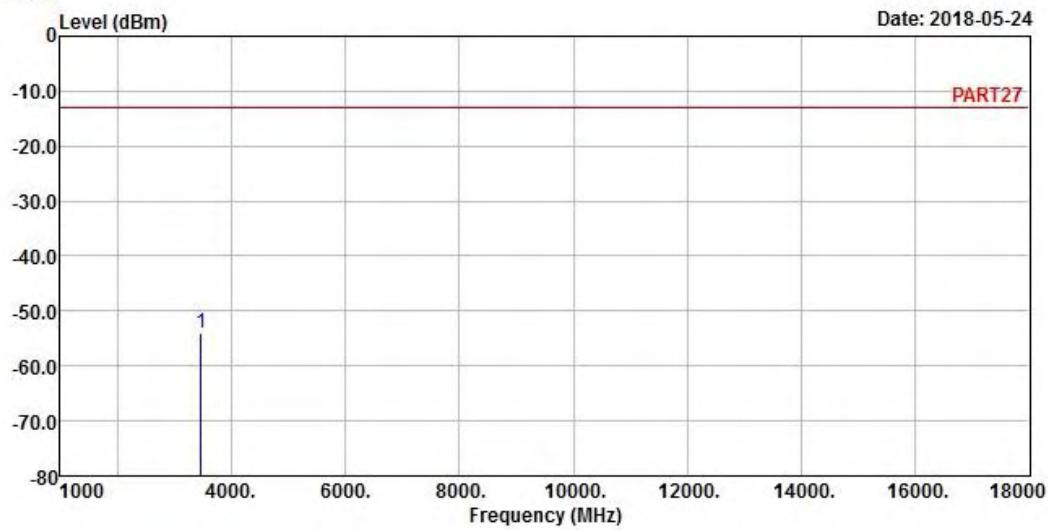
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_1.4M Link_M-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

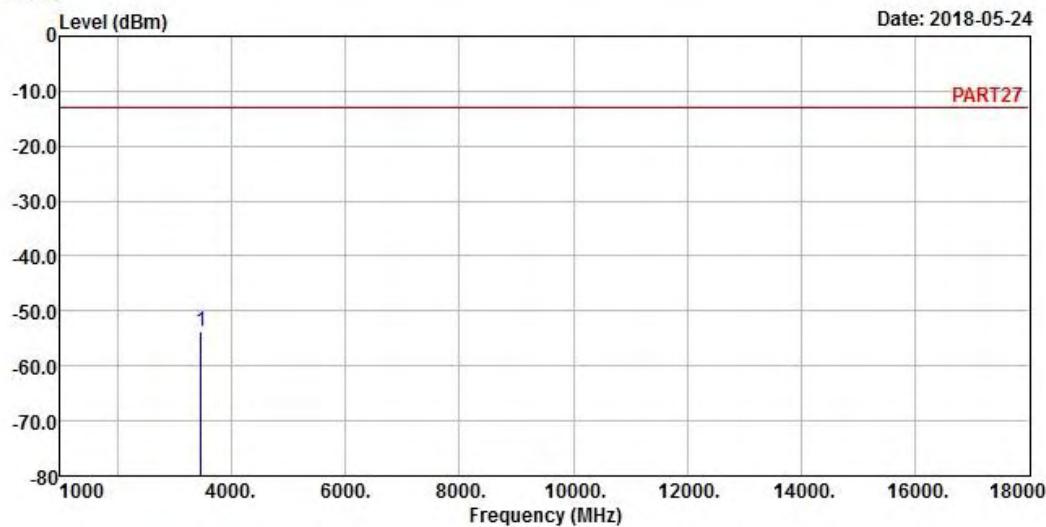
1 pp 3465.00 -54.00 -46.12 -13.00 -41.00 -7.88 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_1.4M Link_M-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3465.00	-53.61	-45.73	-13.00	-40.61 -7.88 Peak

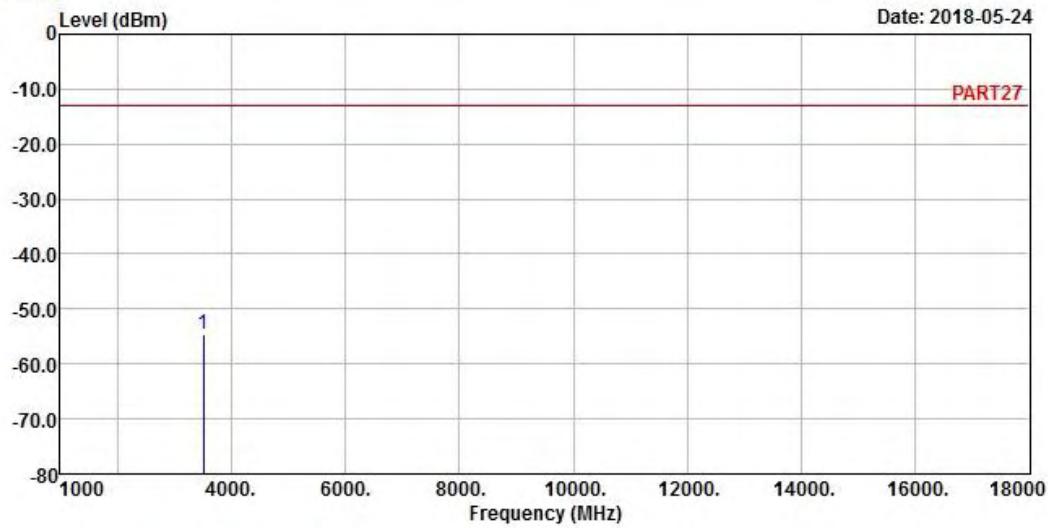
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_1.4M Link_H-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	

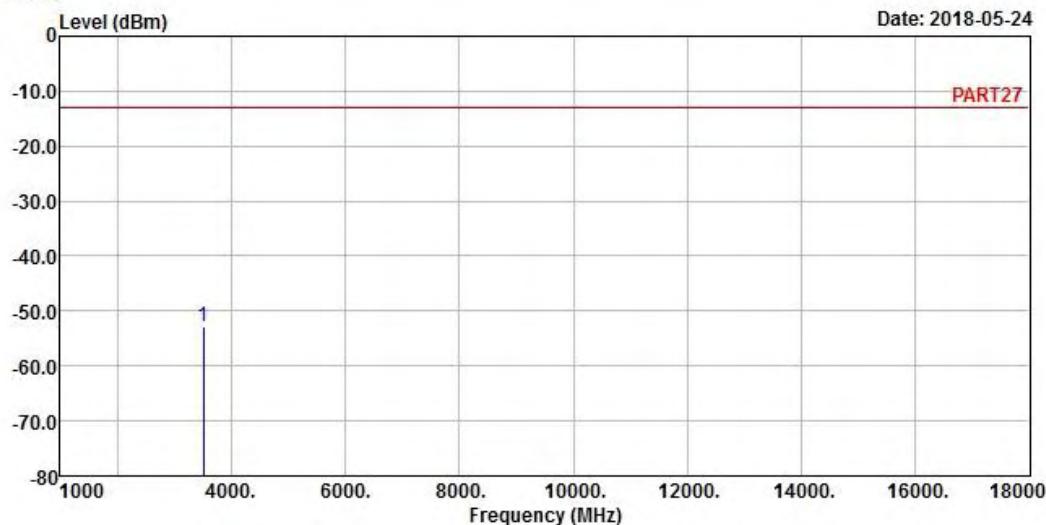
1 pp 3508.60 -54.64 -47.19 -13.00 -41.64 -7.45 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_1.4M Link_H-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3508.60	-52.92	-45.47	-13.00	-39.92 -7.45 Peak

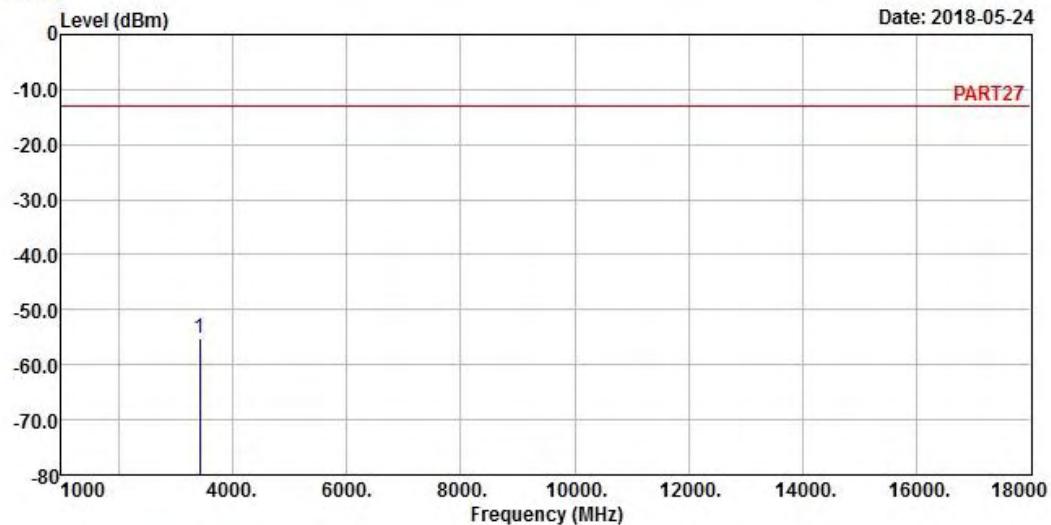
Channel Bandwidth: 5 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_5M Link_L-CH

Tested by: Jisyong Wang

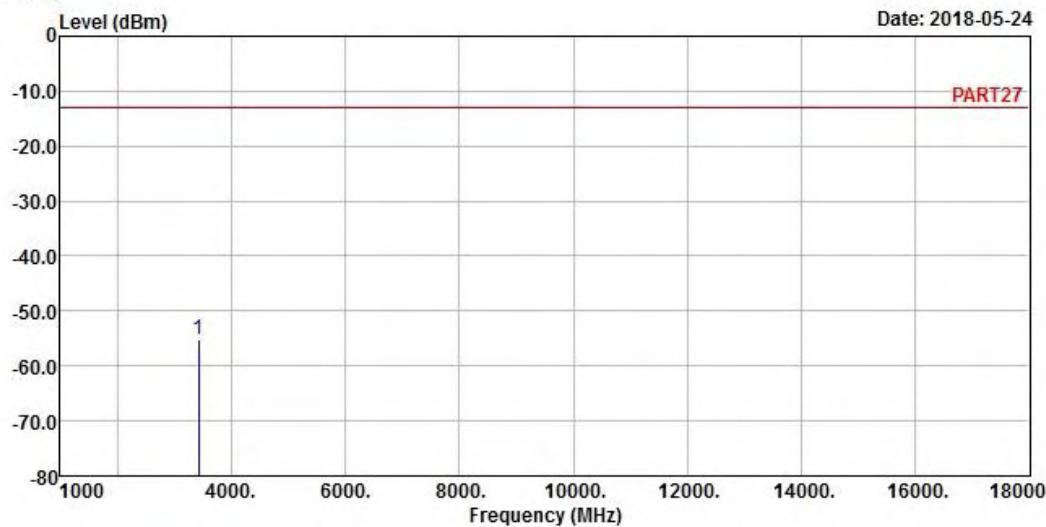
Freq	Read	Limit	Over	Remark		
	Level	Line	Limit Factor			
MHz	dBm	dBm	dBm	dB		
1 pp	3425.00	-55.07	-46.73	-13.00	-42.07	-8.34 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_5M Link_L-CH

Tested by: Jisyong Wang

Freq	Read	Limit	Over	Remark		
	Level	Line	Limit Factor			
MHz	dBm	dBm	dBm	dB	dB	
1 pp	3425.00	-55.22	-46.88	-13.00	-42.22	-8.34 Peak

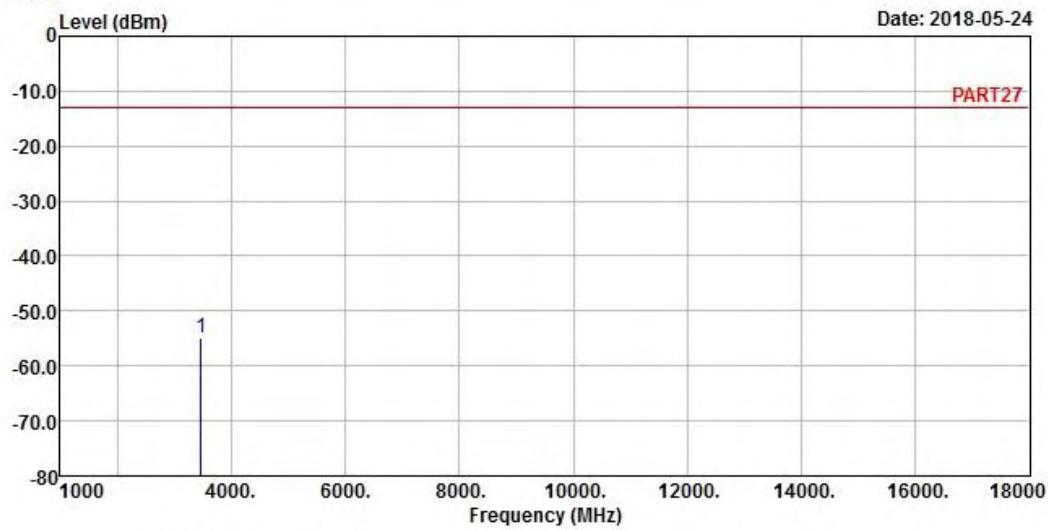
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_5M Link_M-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
------	------------	-------------	-----------	--------------	--------

MHz	dBm	dBm	dBm	dB	dB
-----	-----	-----	-----	----	----

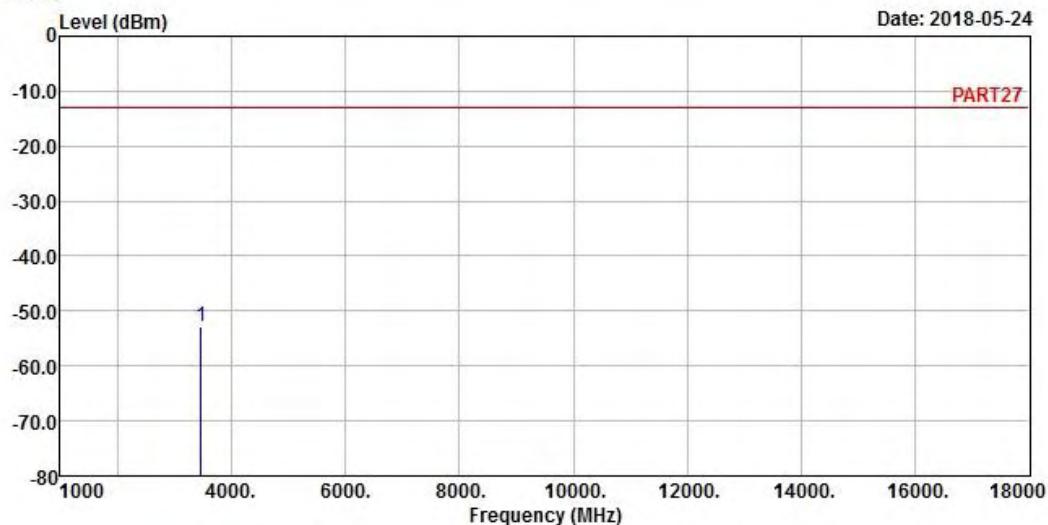
1 pp 3465.00 -54.91 -47.03 -13.00 -41.91 -7.88 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_5M Link_M-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3465.00	-52.93	-45.05	-13.00	-39.93 -7.88 Peak

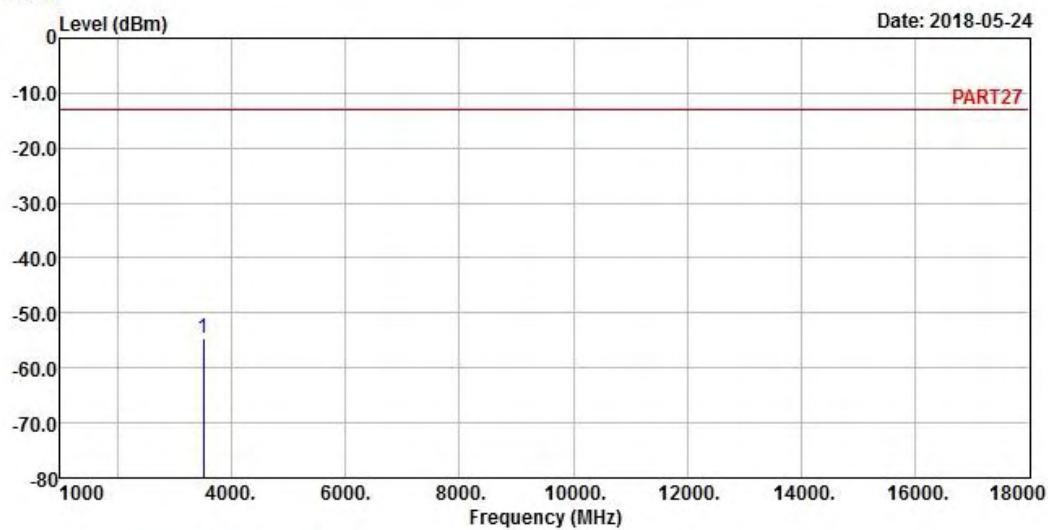
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_5M Link_H-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
------	------------	-------------	-----------	--------------	--------

MHz	dBm	dBm	dBm	dB	dB
-----	-----	-----	-----	----	----

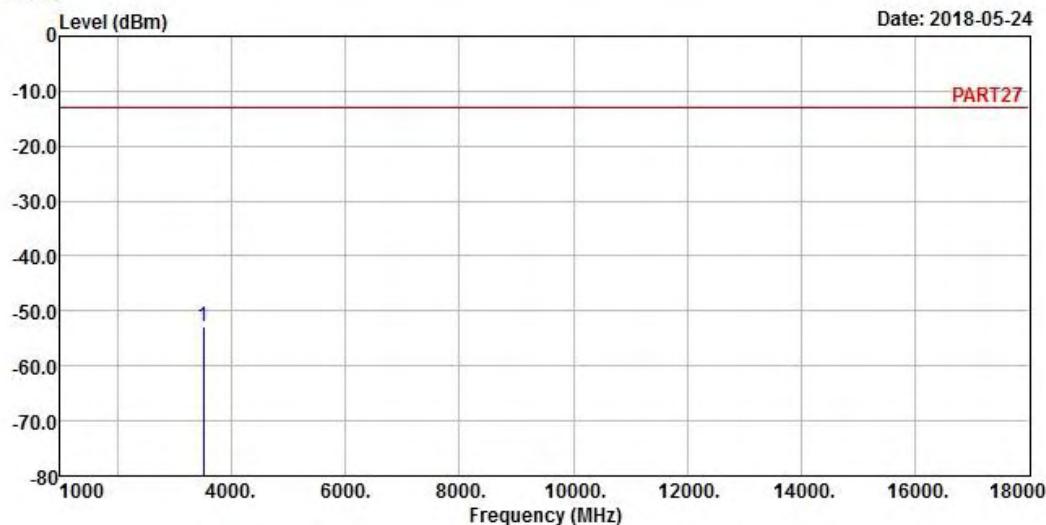
1 pp 3505.00 -54.64 -47.19 -13.00 -41.64 -7.45 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_5M Link_H-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3505.00	-52.92	-45.47	-13.00	-39.92 -7.45 Peak

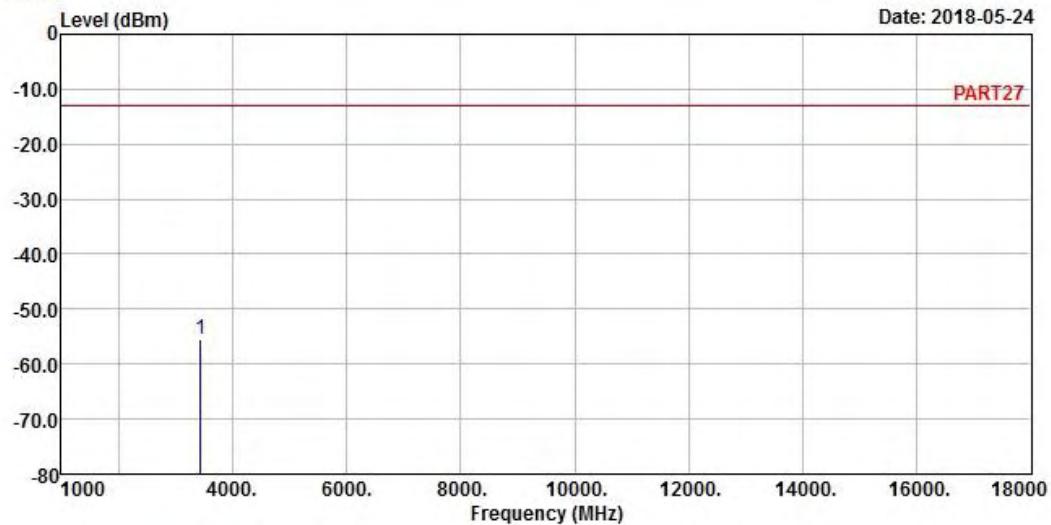
Channel Bandwidth: 20 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_20M Link_L-CH

Tested by: Jisyong Wang

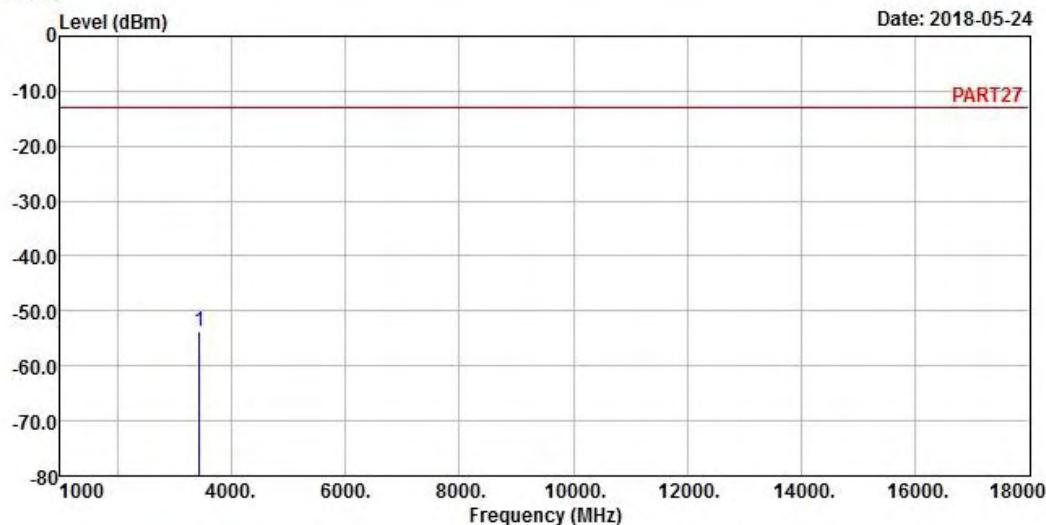
Freq	Read	Limit	Over	Remark		
	Level	Level	Line			
MHz	dBm	dBm	dBm	dB		
1 pp	3440.00	-55.46	-47.24	-13.00	-42.46	-8.22 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_20M Link_L-CH

Tested by: Jisyong Wang

Freq	Read	Limit	Over	Remark		
	Level	Line	Limit Factor			
MHz	dBm	dBm	dBm	dB	dB	
1 pp	3440.00	-53.81	-45.59	-13.00	-40.81	-8.22 Peak

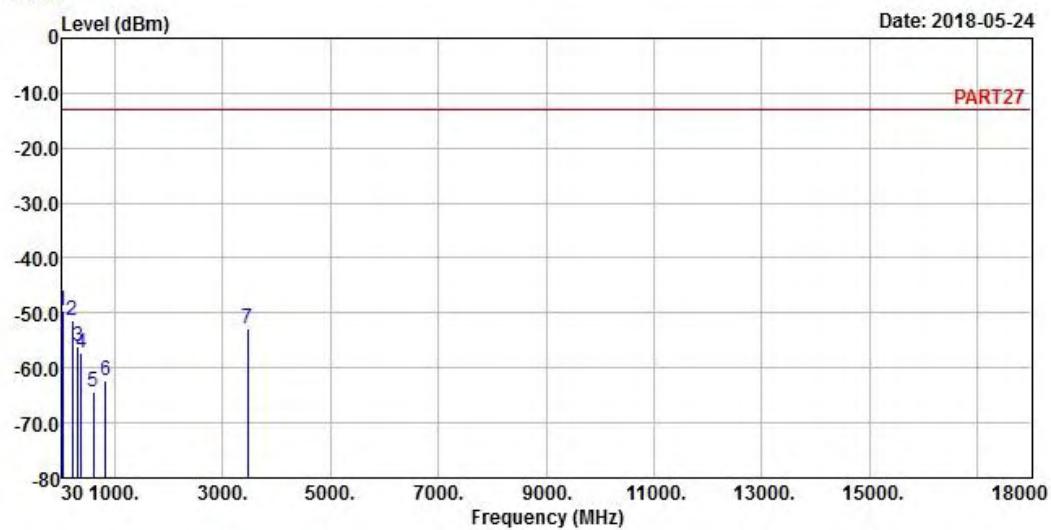
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_20M Link_M-CH

Tested by: Jisyong Wang

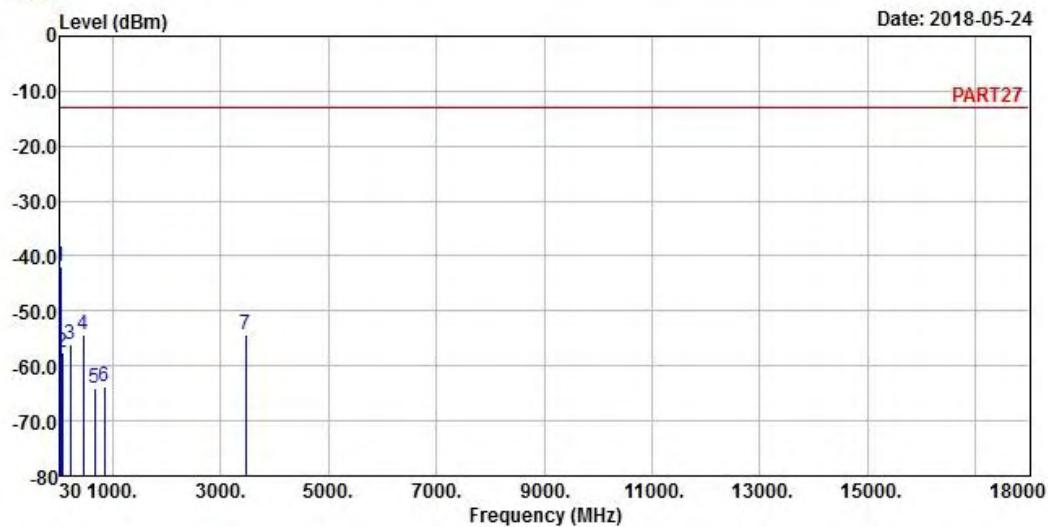
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1 pp	41.64	-49.70	-49.29	-13.00	-36.70	-0.41 Peak
2	217.21	-51.49	-44.17	-13.00	-38.49	-7.32 Peak
3	326.82	-56.16	-49.56	-13.00	-43.16	-6.60 Peak
4	376.29	-57.37	-51.29	-13.00	-44.37	-6.08 Peak
5	609.09	-64.45	-63.67	-13.00	-51.45	-0.78 Peak
6	825.40	-62.29	-62.80	-13.00	-49.29	0.51 Peak
7	3465.00	-52.89	-45.01	-13.00	-39.89	-7.88 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_20M Link_M-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Read	Limit	Over	Remark
			Line	Line	Factor	
MHz	dBm	dBm	dBm	dB	dB	
1 pp	39.70	-41.78	-42.42	-13.00	-28.78	0.64 Peak
2	71.71	-57.64	-48.79	-13.00	-44.64	-8.85 Peak
3	210.42	-56.22	-48.63	-13.00	-43.22	-7.59 Peak
4	450.01	-54.27	-48.72	-13.00	-41.27	-5.55 Peak
5	659.53	-64.04	-63.31	-13.00	-51.04	-0.73 Peak
6	840.92	-63.66	-64.03	-13.00	-50.66	0.37 Peak
7	3465.00	-54.38	-46.50	-13.00	-41.38	-7.88 Peak

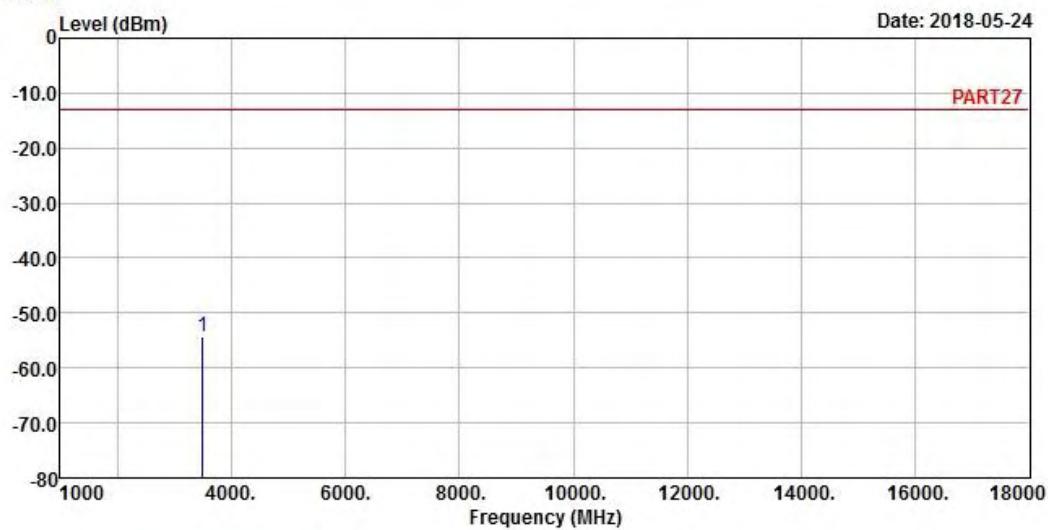
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 4 QPSK_20M Link_H-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

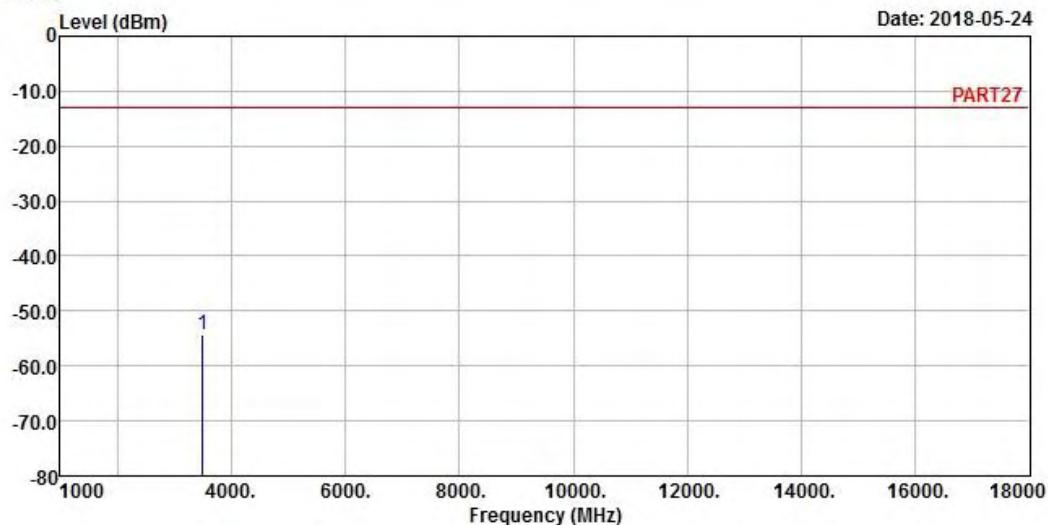
1 pp 3490.00 -54.18 -46.53 -13.00 -41.18 -7.65 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

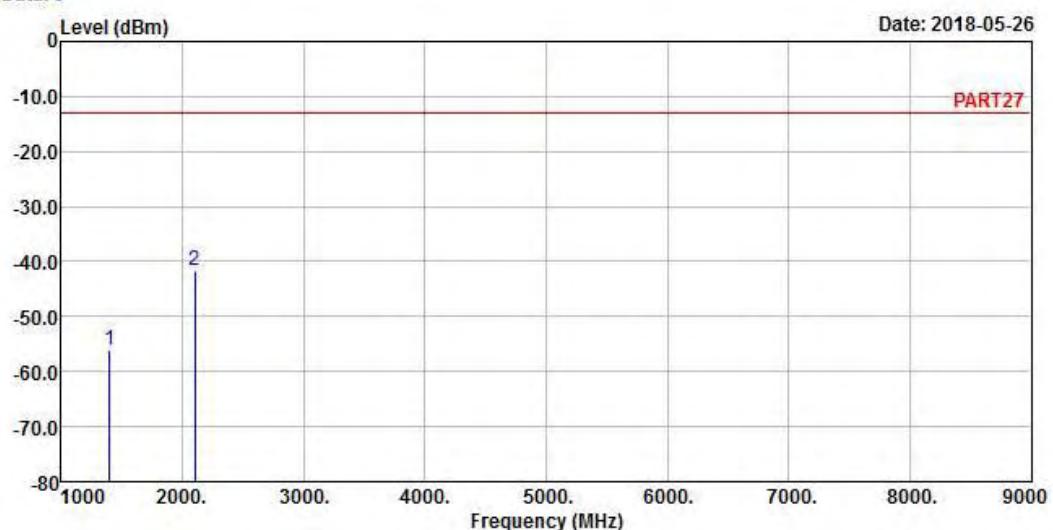
Condition: PART27 VERTICAL

Remak : LTE Band 4 QPSK_20M Link_H-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3490.00	-54.45	-46.80	-13.00	-41.45 -7.65 Peak

LTE Band 12
Channel Bandwidth: 1.4 MHz / QPSK
Low Channel

Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch
A D T
Data: 3

Site : 966 Chamber 5
Condition: PART27 HORIZONTAL
Remak : LTE Band 12 QPSK_1.4M Link_L-CH
Tested by: Getaz Yang

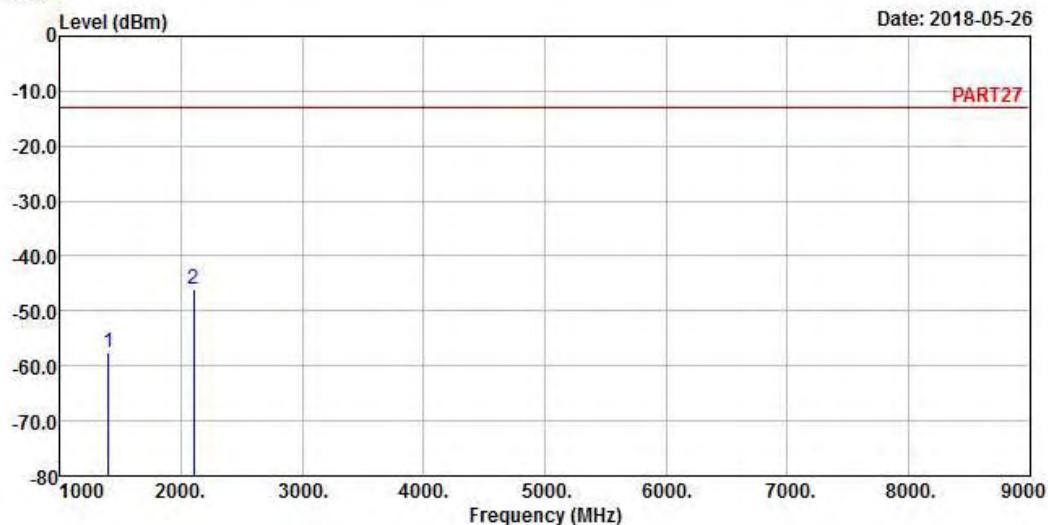
	Read	Limit	Over			
Freq	Level	Level	Line	Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB
1	1399.40	-56.05	-44.20	-13.00	-43.05	-11.85 Peak
2 pp	2099.10	-41.71	-31.55	-13.00	-28.71	-10.16 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_1.4M Link_L-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over	Remark
			Line	
MHz	dBm	dBm	dBm	dB
1	1399.40	-57.50	-45.65	-13.00 -44.50 -11.85 Peak
2 pp	2099.10	-45.99	-35.83	-13.00 -32.99 -10.16 Peak

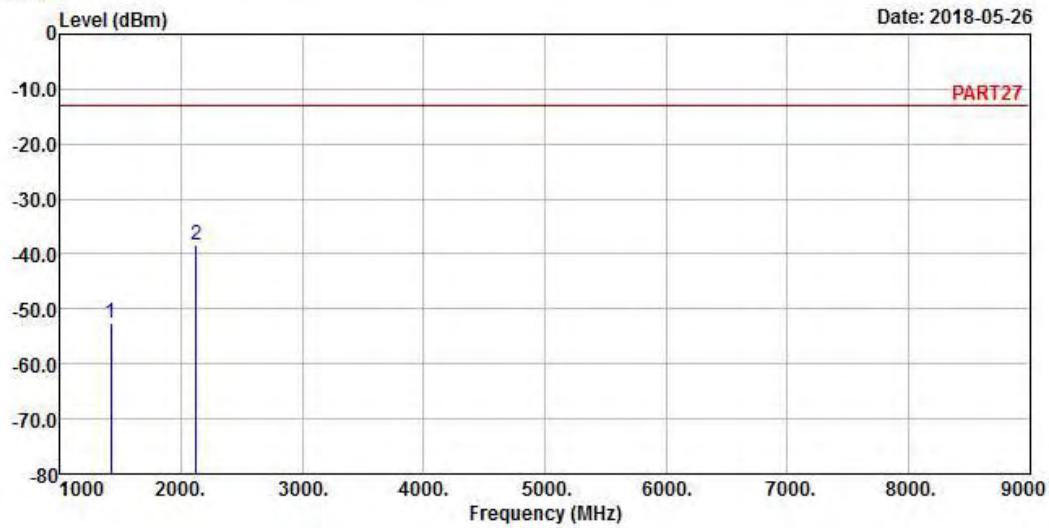
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 12 QPSK_1.4M Link_M-CH

Tested by: Getaz Yang

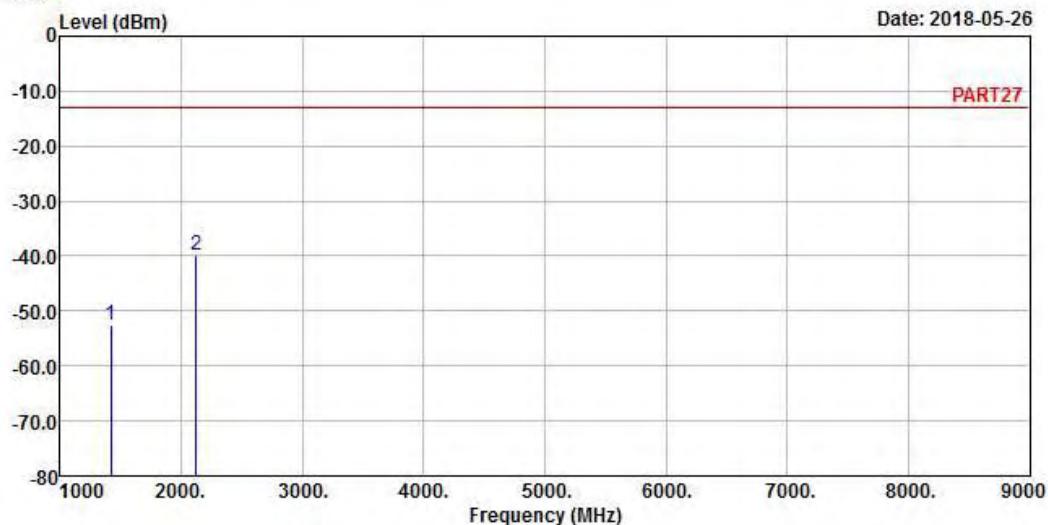
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	1415.00	-52.43	-40.35	-13.00	-39.43	-12.08 Peak
2 pp	2122.50	-38.31	-28.44	-13.00	-25.31	-9.87 Peak



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_1.4M Link_M-CH

Tested by: Getaz Yang

Freq	Read	Limit	Over	Remark	
	Level	Level	Line		
MHz	dBm	dBm	dBm	dB	dB
1	1415.00	-52.67	-40.59	-13.00	-39.67 -12.08 Peak
2 pp	2122.50	-39.75	-29.88	-13.00	-26.75 -9.87 Peak

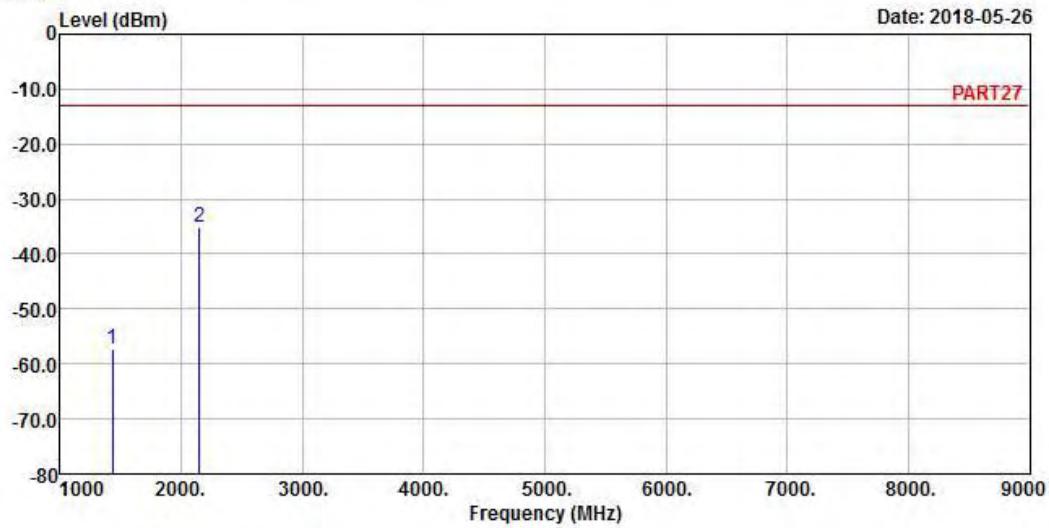
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 12 QPSK_1.4M Link_H-CH

Tested by: Getaz Yang

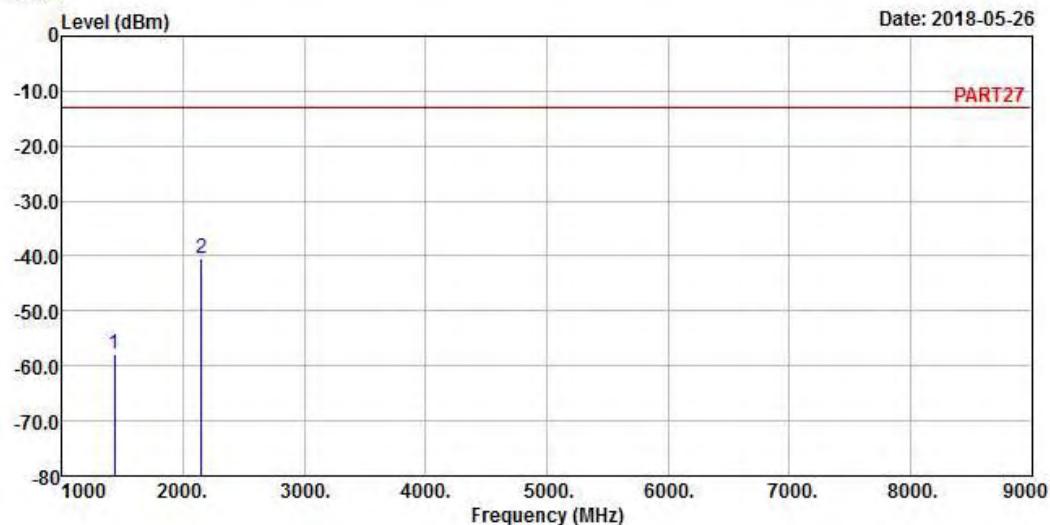
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	1430.60	-57.33	-45.02	-13.00	-44.33	-12.31 Peak
2 pp	2145.90	-35.12	-25.65	-13.00	-22.12	-9.47 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_1.4M Link_H-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over			Remark
			Line	Limit	Factor	
MHz	dBm	dBm	dBm	dB	dB	
1	1430.60	-57.77	-45.46	-13.00	-44.77	-12.31 Peak
2 pp	2145.90	-40.54	-31.07	-13.00	-27.54	-9.47 Peak

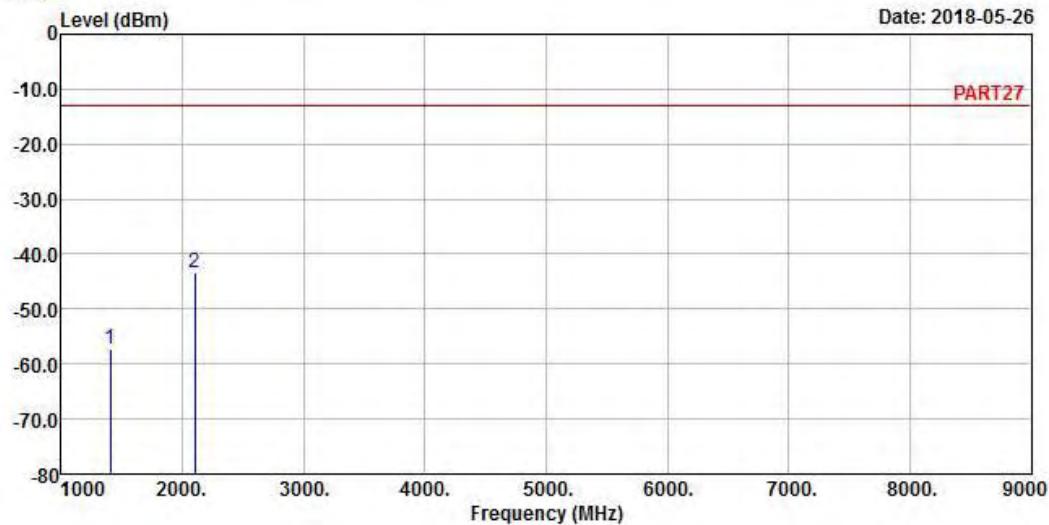
Channel Bandwidth: 5 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 12 QPSK_5M Link_L-CH

Tested by: Getaz Yang

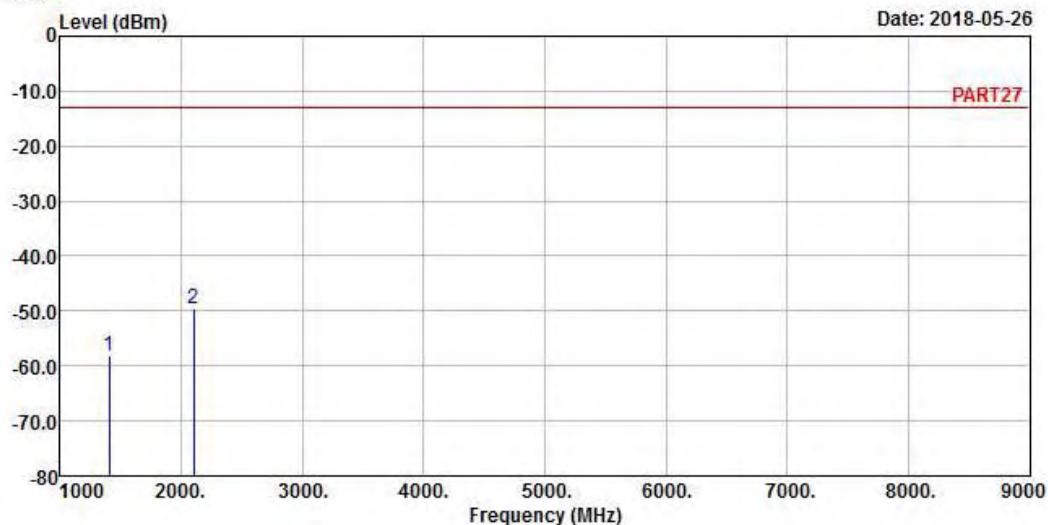
Freq	Read	Limit	Over	Remark		
	Level	Level	Line			
MHz	dBm	dBm	dBm	dB	dB	
1	1403.00	-57.18	-45.27	-13.00	-44.18	-11.91 Peak
2 pp	2104.50	-43.30	-33.14	-13.00	-30.30	-10.16 Peak



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_5M Link_L-CH

Tested by: Getaz Yang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1403.00	-58.15	-46.24	-13.00	-45.15	-11.91 Peak
2104.50	-49.64	-39.48	-13.00	-36.64	-10.16 Peak

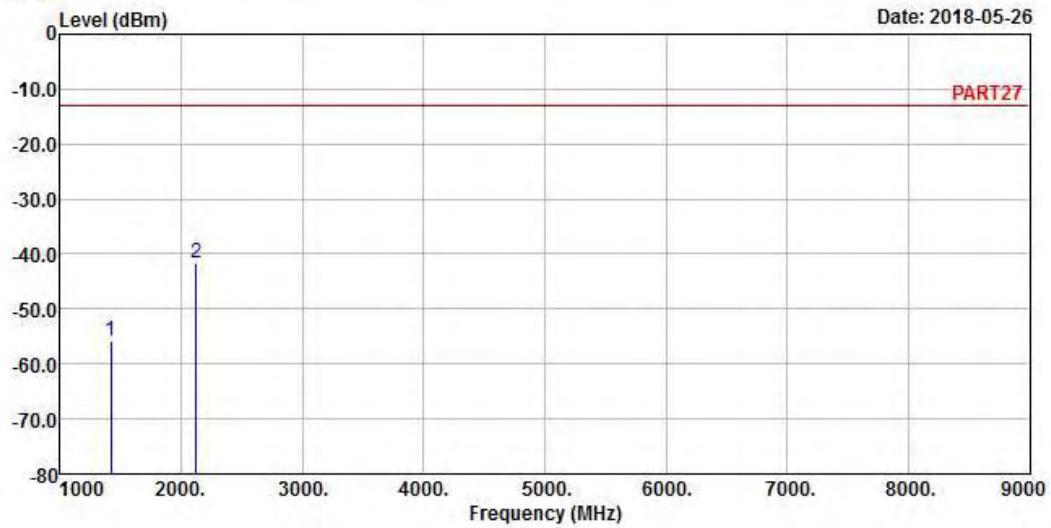
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 12 QPSK_5M Link_M-CH

Tested by: Getaz Yang

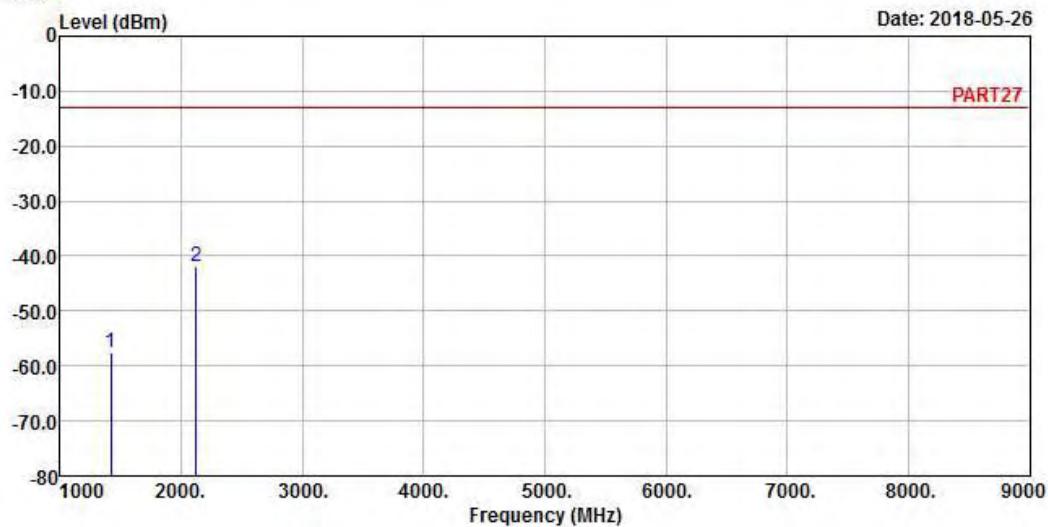
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	1415.00	-55.77	-43.69	-13.00	-42.77	-12.08 Peak
2 pp	2122.50	-41.68	-31.81	-13.00	-28.68	-9.87 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_5M Link_M-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over	Factor	Remark
			Line		
1415.00	-57.61	-45.53	-13.00	-44.61	-12.08 Peak
2122.50	-41.90	-32.03	-13.00	-28.90	-9.87 Peak

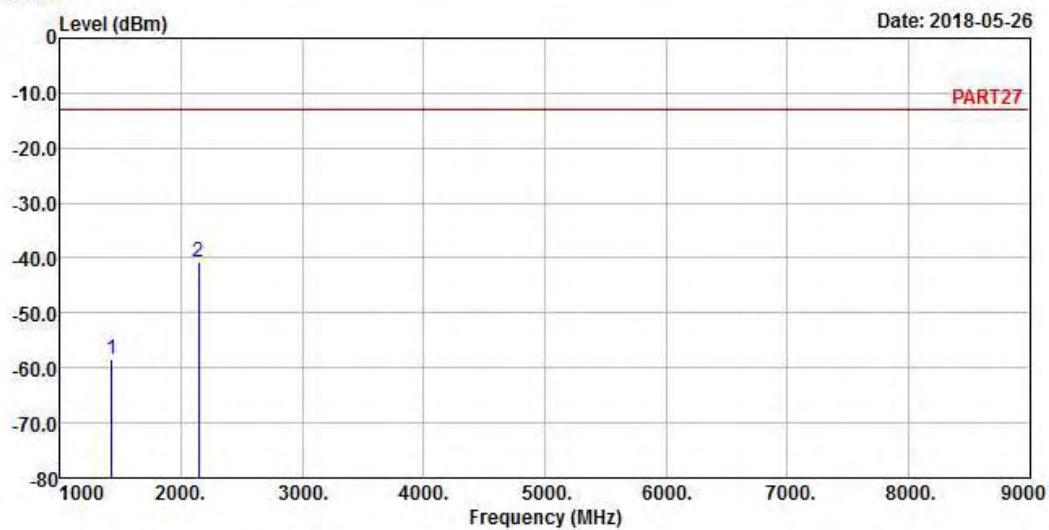
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 12 QPSK_5M Link_H-CH

Tested by: Getaz Yang

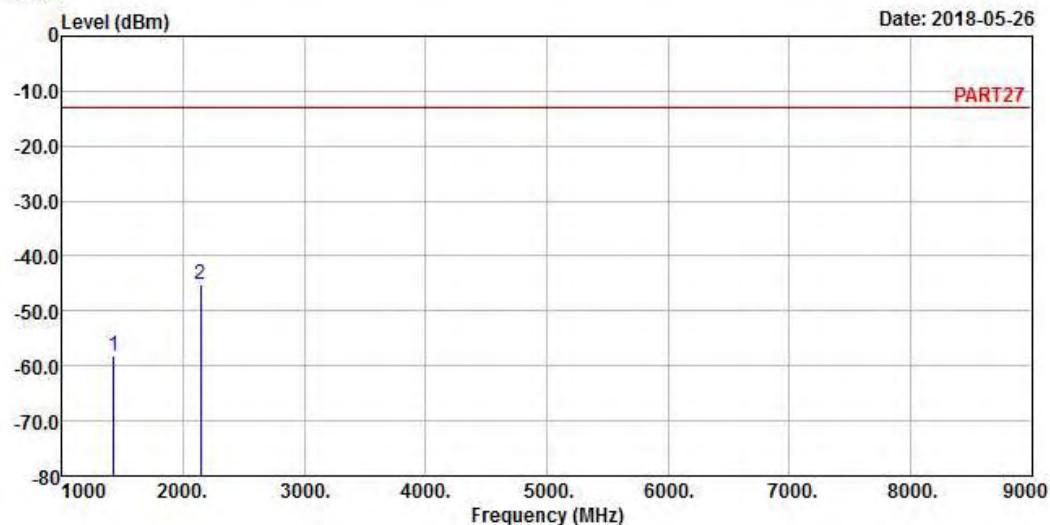
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	1427.00	-58.39	-46.14	-13.00	-45.39	-12.25 Peak
2 pp	2140.50	-40.70	-31.13	-13.00	-27.70	-9.57 Peak



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_5M Link_H-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over	Factor	Remark
			Line		
MHz	dBm	dBm	dBm	dB	dB
1	1427.00	-58.04	-45.79	-13.00	-45.04 -12.25 Peak
2 pp	2140.50	-45.13	-35.56	-13.00	-32.13 -9.57 Peak

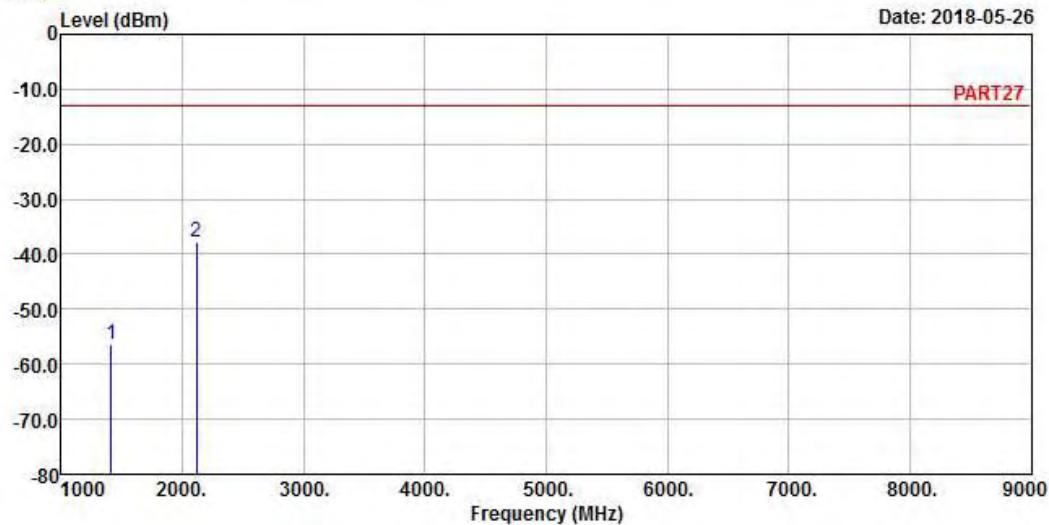
Channel Bandwidth: 10 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 12 QPSK_10M Link_L-CH

Tested by: Getaz Yang

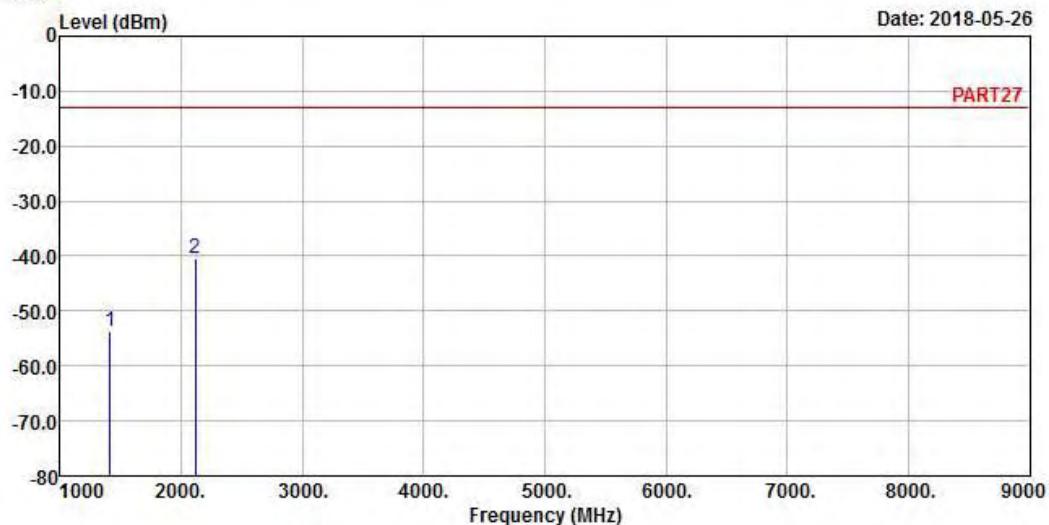
Freq	Read		Limit	Over	Remark
	Level	Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1	1408.00	-56.51	-44.55	-13.00	-43.51 -11.96 Peak
2 pp	2112.00	-37.65	-27.69	-13.00	-24.65 -9.96 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_10M Link_L-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over	Remark
			Line	
MHz	dBm	dBm	dBm	dB
1	1408.00	-53.82	-41.86	-13.00 -40.82 -11.96 Peak
2 pp	2112.00	-40.45	-30.49	-13.00 -27.45 -9.96 Peak

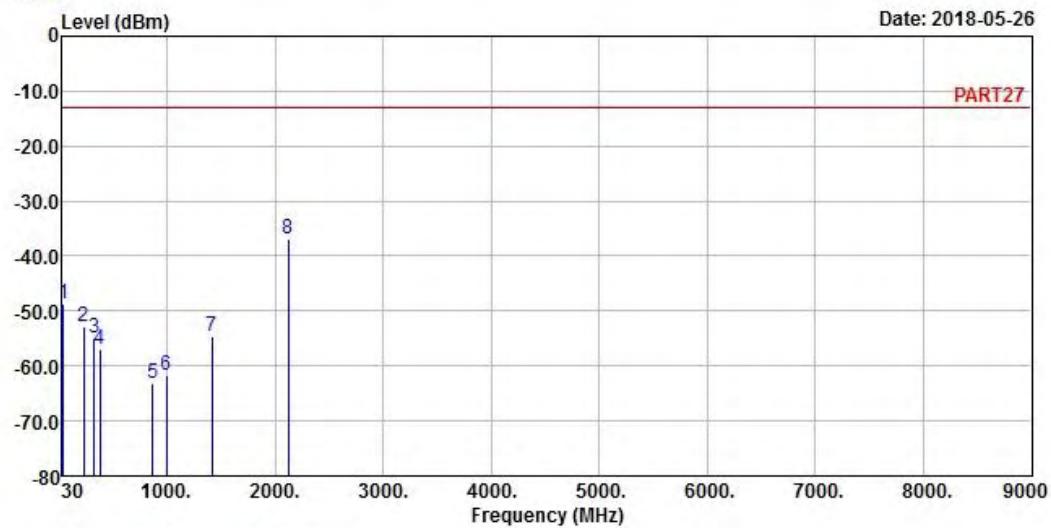
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 12 QPSK_10M Link_M-CH

Tested by: Getaz Yang

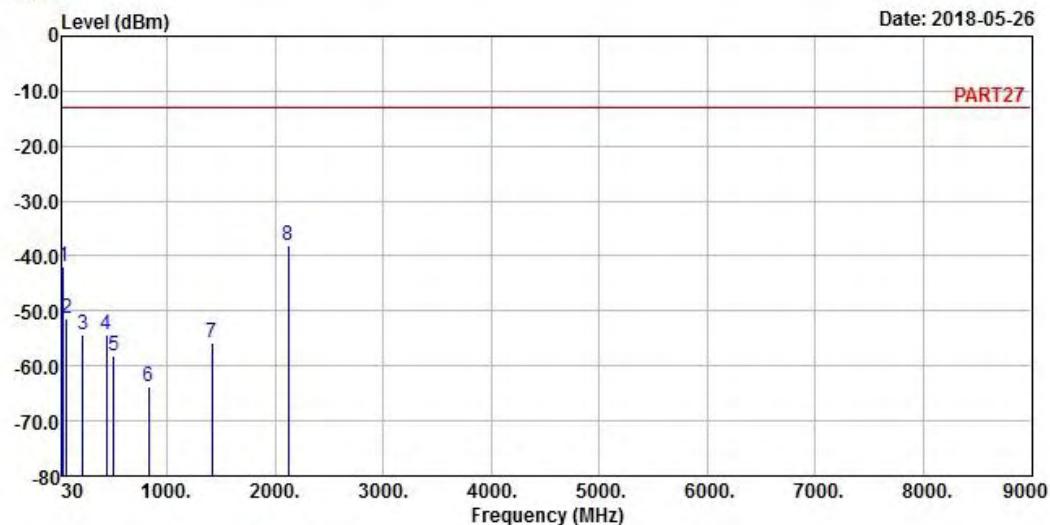
Freq	Read	Limit	Over	Factor	Remark	
	Freq	Level	Line			
	MHz	dBm	dBm	dBm	dB	
1	39.70	-48.65	-49.29	-13.00	-35.65	0.64 Peak
2	225.94	-52.82	-45.85	-13.00	-39.82	-6.97 Peak
3	326.82	-54.83	-48.23	-13.00	-41.83	-6.60 Peak
4	374.35	-56.87	-50.77	-13.00	-43.87	-6.10 Peak
5	864.20	-63.29	-63.66	-13.00	-50.29	0.37 Peak
6	997.09	-61.69	-65.17	-13.00	-48.69	3.48 Peak
7	1415.00	-54.67	-42.59	-13.00	-41.67	-12.08 Peak
8 pp	2122.50	-37.01	-27.14	-13.00	-24.01	-9.87 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_10M Link_M-CH

Tested by: Getaz Yang

Freq	Read	Limit	Over	Remark		
	Level	Level	Line			
	MHz	dBm	dBm	dB	dB	
1	38.73	-42.04	-42.14	-13.00	-29.04	0.10 Peak
2	67.83	-51.26	-43.01	-13.00	-38.26	-8.25 Peak
3	217.21	-54.26	-46.94	-13.00	-41.26	-7.32 Peak
4	440.31	-54.39	-48.76	-13.00	-41.39	-5.63 Peak
5	504.33	-58.21	-53.74	-13.00	-45.21	-4.47 Peak
6	828.31	-63.85	-64.33	-13.00	-50.85	0.48 Peak
7	1415.00	-55.70	-43.62	-13.00	-42.70	-12.08 Peak
8 pp	2122.50	-38.10	-28.23	-13.00	-25.10	-9.87 Peak

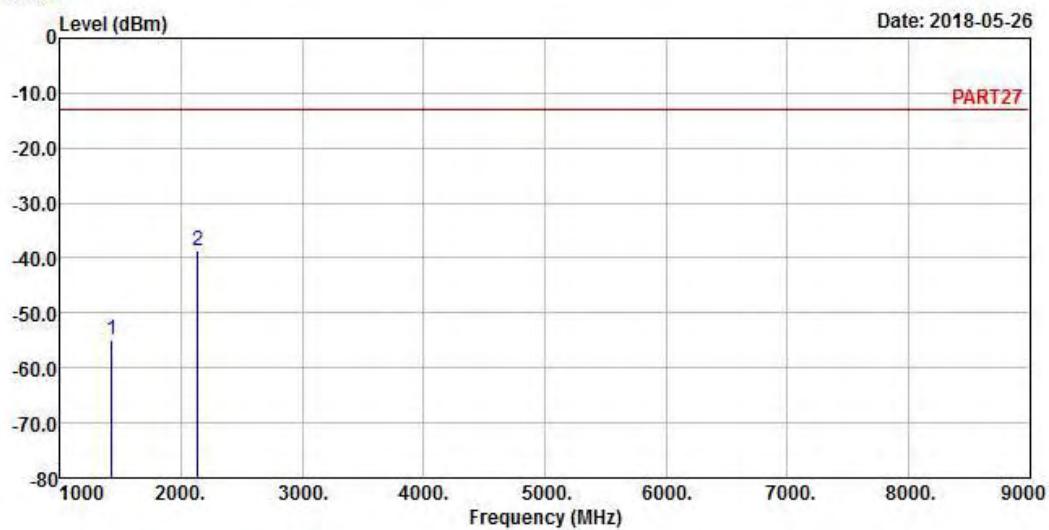
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 12 QPSK_10M Link_H-CH

Tested by: Getaz Yang

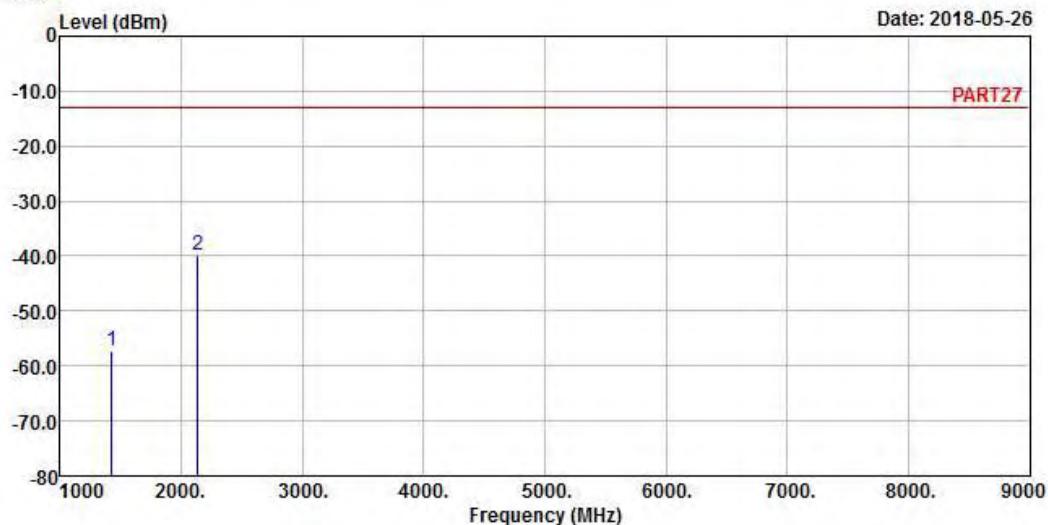
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	1422.00	-54.86	-42.67	-13.00	-41.86	-12.19 Peak
2 pp	2133.00	-38.60	-28.93	-13.00	-25.60	-9.67 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 12 QPSK_10M Link_H-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over	Factor	Remark
			Line		
MHz	dBm	dBm	dBm	dB	dB
1	1422.00	-57.41	-45.22	-13.00	-44.41 -12.19 Peak
2 pp	2133.00	-39.76	-30.09	-13.00	-26.76 -9.67 Peak

LTE Band 13

1RB

Channel Bandwidth: 5 MHz / QPSK

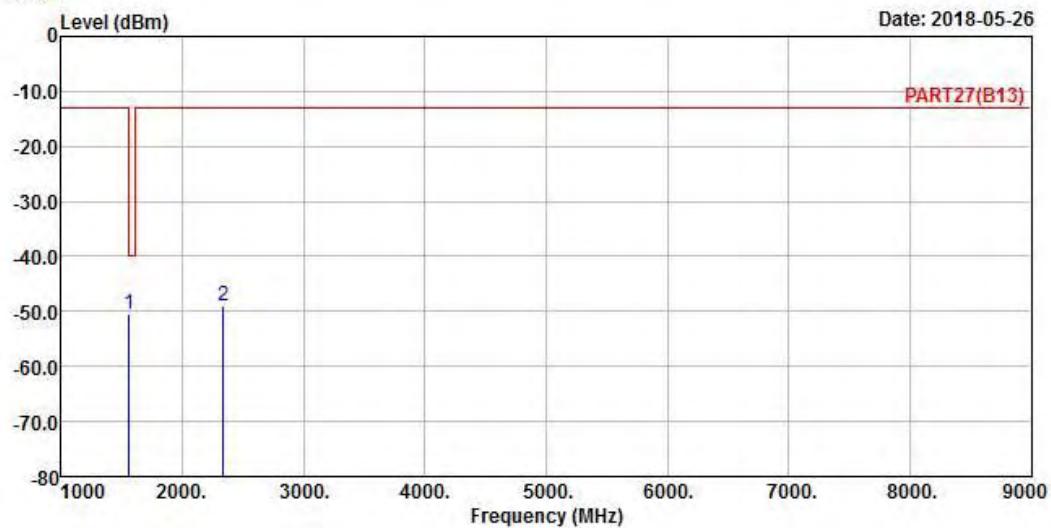
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27(B13) HORIZONTAL

Remak : LTE Band 13 QPSK_5M Link_L-CH

Tested by: Getaz Yang

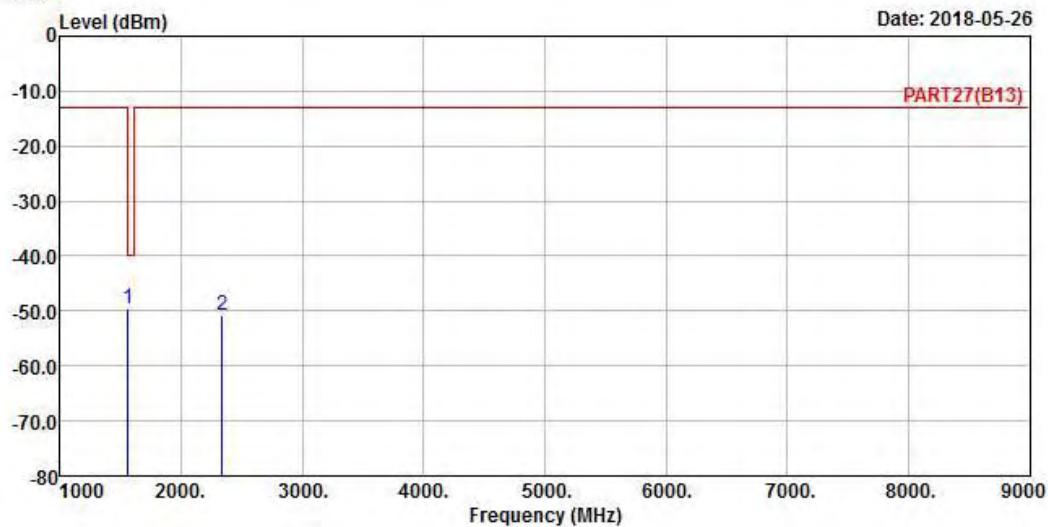
	Freq	Read Level	Limit Level	Over Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB		
1 pp	1559.00	-50.39	-37.07	-40.00	-10.39	-13.32	Peak
2	2338.50	-48.86	-39.48	-13.00	-35.86	-9.38	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27(B13) VERTICAL

Remak : LTE Band 13 QPSK_5M Link_L-CH

Tested by: Getaz Yang

Freq	Read Level	Limit Level	Over Line	Over Limit Factor		Remark
				dBm	dB	
1 pp	1559.00	-49.67	-36.35	-40.00	-9.67	-13.32 Peak
2	2338.50	-50.69	-41.31	-13.00	-37.69	-9.38 Peak

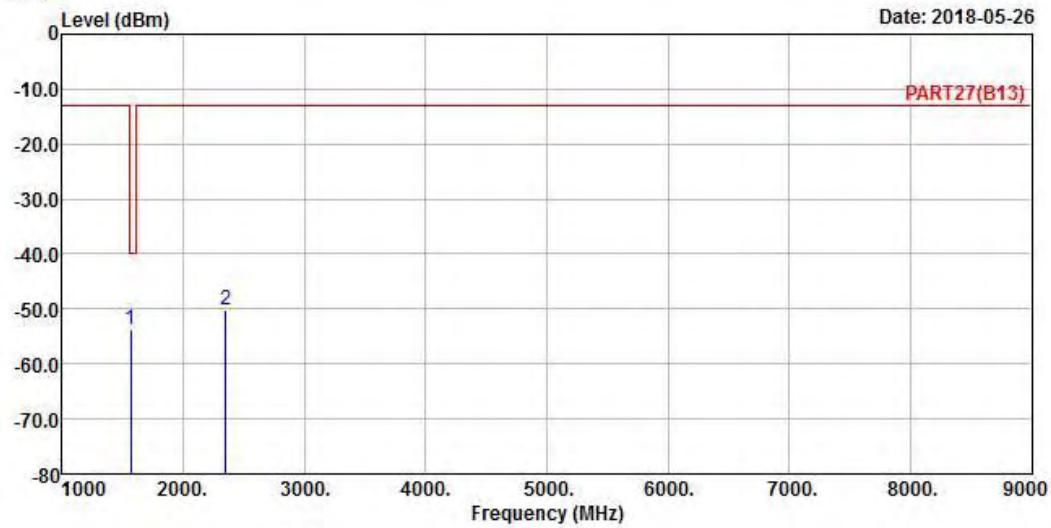
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27(B13) HORIZONTAL

Remak : LTE Band 13 QPSK_5M Link_M-CH

Tested by: Getaz Yang

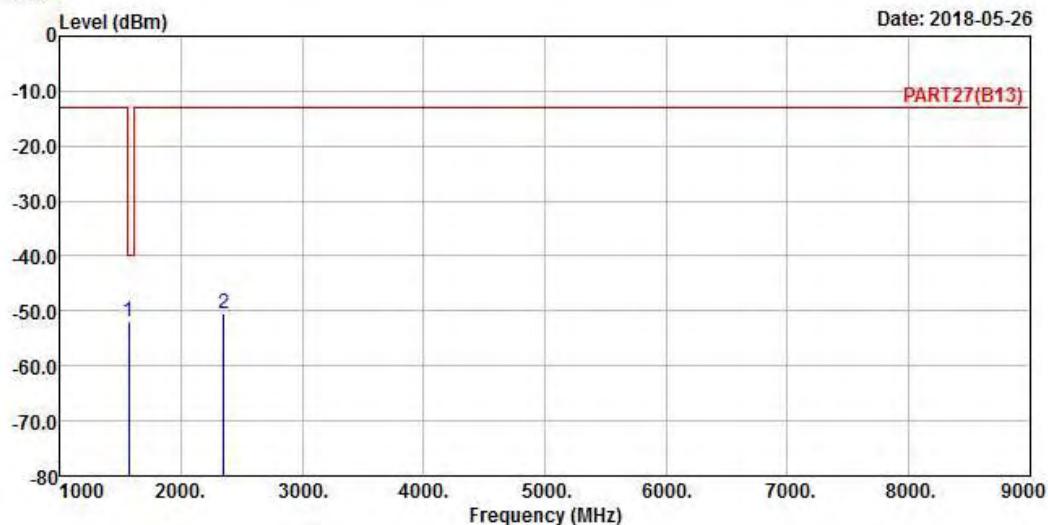
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1 pp	1564.00	-53.87	-40.53	-40.00	-13.87	-13.34 Peak
2	2346.00	-50.31	-40.87	-13.00	-37.31	-9.44 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27(B13) VERTICAL

Remak : LTE Band 13 QPSK_5M Link_M-CH

Tested by: Getaz Yang

Freq	Read Level	Limit	Over	Remark
		Line	Limit Factor	
MHz	dBm	dBm	dB	dB
1 pp	1564.00	-51.88	-38.54	-40.00 -11.88 -13.34 Peak
2	2346.00	-50.45	-41.01	-13.00 -37.45 -9.44 Peak

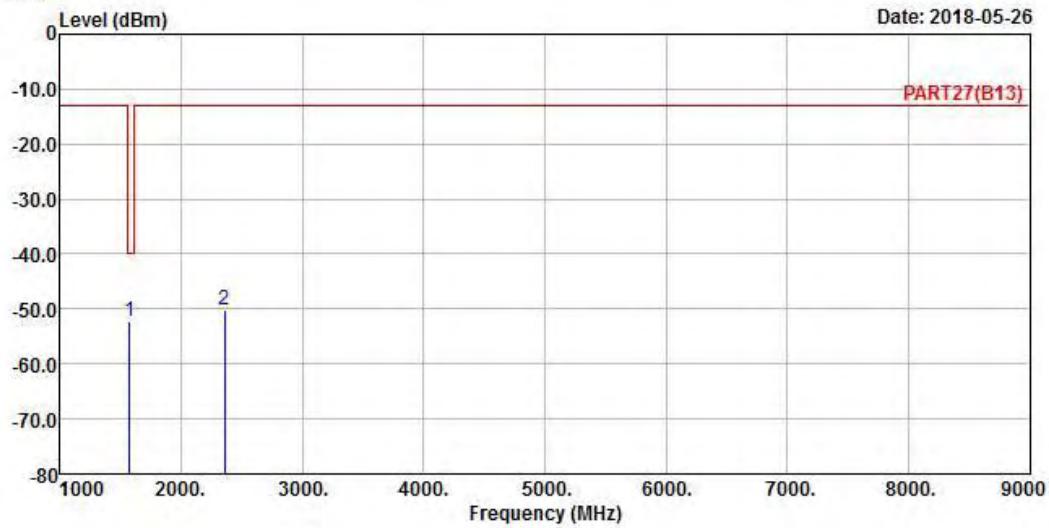
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27(B13) HORIZONTAL

Remak : LTE Band 13 QPSK_5M Link_H-CH

Tested by: Getaz Yang

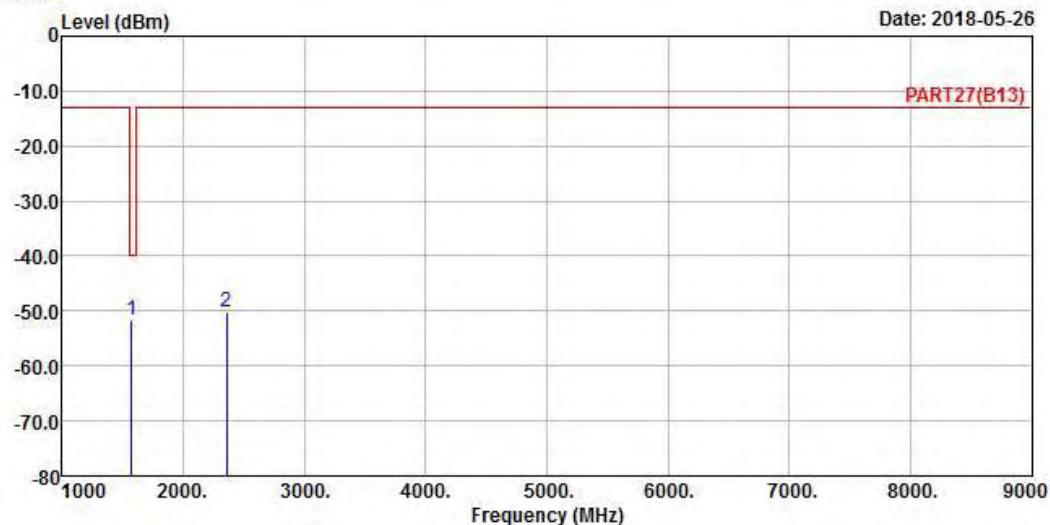
Freq	Read		Limit		Over	
	Level	Level	Line	Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp	1569.00	-52.19	-38.84	-40.00	-12.19	-13.35 Peak
2	2353.50	-50.30	-40.79	-13.00	-37.30	-9.51 Peak



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27(B13) VERTICAL

Remak : LTE Band 13 QPSK_5M Link_H-CH

Tested by: Getaz Yang

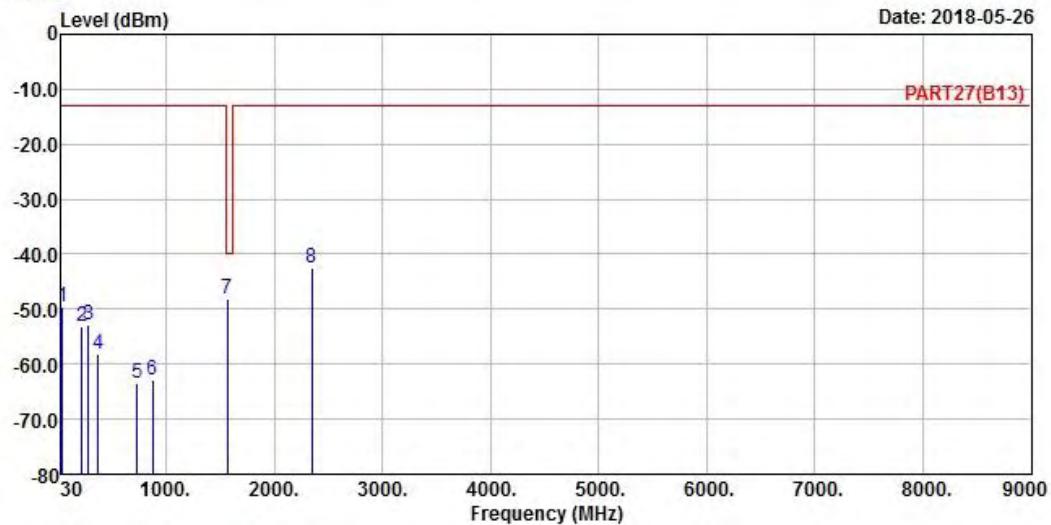
Freq	Read Level	Limit	Over	Remark
		Line	Limit Factor	
MHz	dBm	dBm	dB	
1 pp 1569.00	-51.68	-38.33	-40.00	-11.68 -13.35 Peak
2 2353.50	-50.10	-40.59	-13.00	-37.10 -9.51 Peak

Channel Bandwidth: 10 MHz / QPSK
Middle Channel


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5



Site : 966 Chamber 5

Condition: PART27(B13) HORIZONTAL

Remak : LTE Band 13 QPSK_10M Link_M-CH

Tested by: Getaz Yang

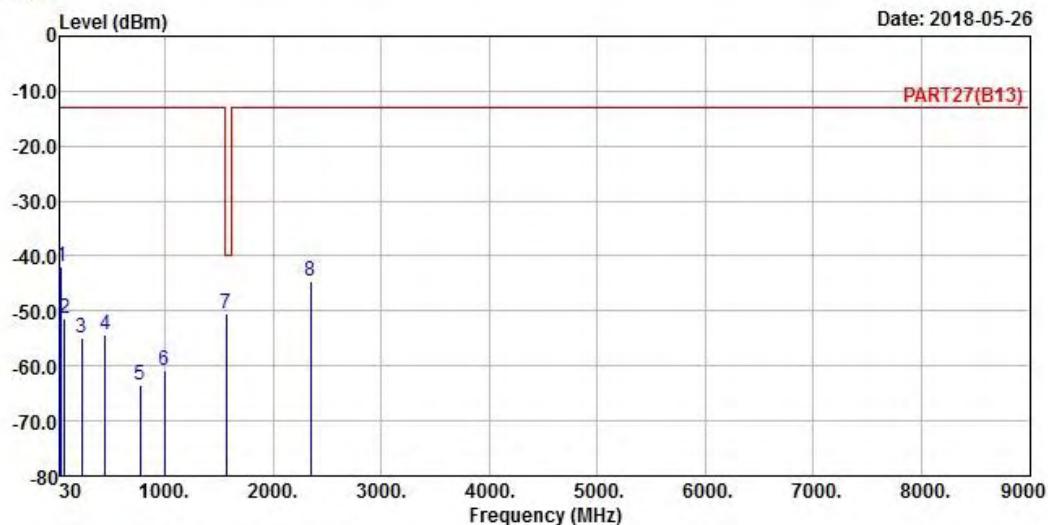
	Freq	Read Level	Limit Level	Over Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	41.64	-49.58	-49.17	-13.00	-36.58	-0.41	Peak
2	223.03	-53.12	-46.04	-13.00	-40.12	-7.08	Peak
3	280.26	-52.86	-46.25	-13.00	-39.86	-6.61	Peak
4	373.38	-58.20	-52.10	-13.00	-45.20	-6.10	Peak
5	730.34	-63.46	-63.96	-13.00	-50.46	0.50	Peak
6	872.93	-62.98	-63.40	-13.00	-49.98	0.42	Peak
7 pp	1564.00	-48.01	-34.67	-40.00	-8.01	-13.34	Peak
8	2346.00	-42.62	-33.18	-13.00	-29.62	-9.44	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6



Site : 966 Chamber 5

Condition: PART27(B13) VERTICAL

Remak : LTE Band 13 QPSK_10M Link_M-CH

Tested by: Getaz Yang

	Freq	Read Level	Limit Level	Over Line	Over Limit	Over Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	39.70	-41.83	-42.47	-13.00	-28.83	0.64	Peak
2	67.83	-51.26	-43.01	-13.00	-38.26	-8.25	Peak
3	224.00	-55.01	-47.96	-13.00	-42.01	-7.05	Peak
4	446.13	-54.30	-48.72	-13.00	-41.30	-5.58	Peak
5	771.08	-63.38	-64.20	-13.00	-50.38	0.82	Peak
6	997.09	-60.86	-64.34	-13.00	-47.86	3.48	Peak
7 pp	1564.00	-50.37	-37.03	-40.00	-10.37	-13.34	Peak
8	2346.00	-44.66	-35.22	-13.00	-31.66	-9.44	Peak

Full RB

Channel Bandwidth: 5 MHz / QPSK

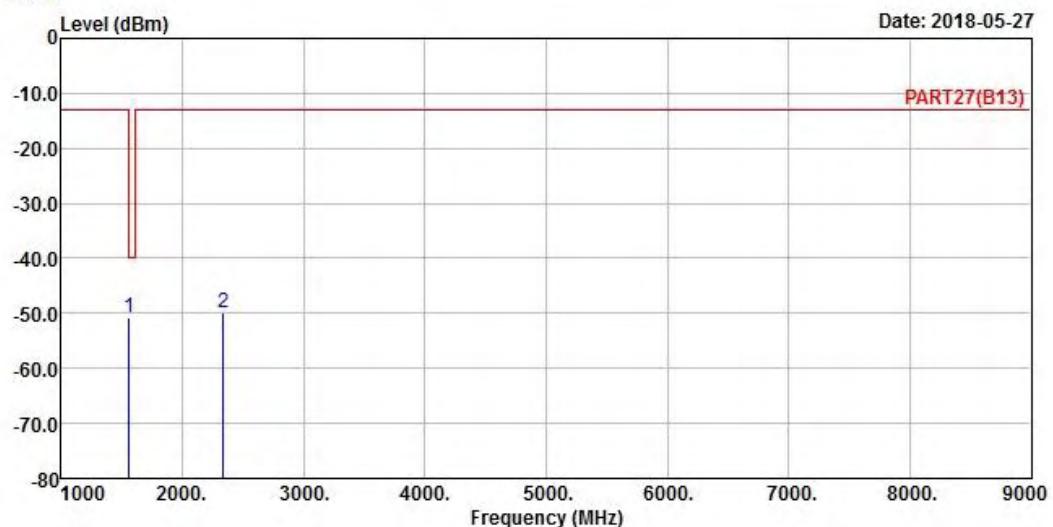
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27(B13) HORIZONTAL

Remak : LTE Band 13 QPSK_5M Link_L-CH

Tested by: Getaz Yang

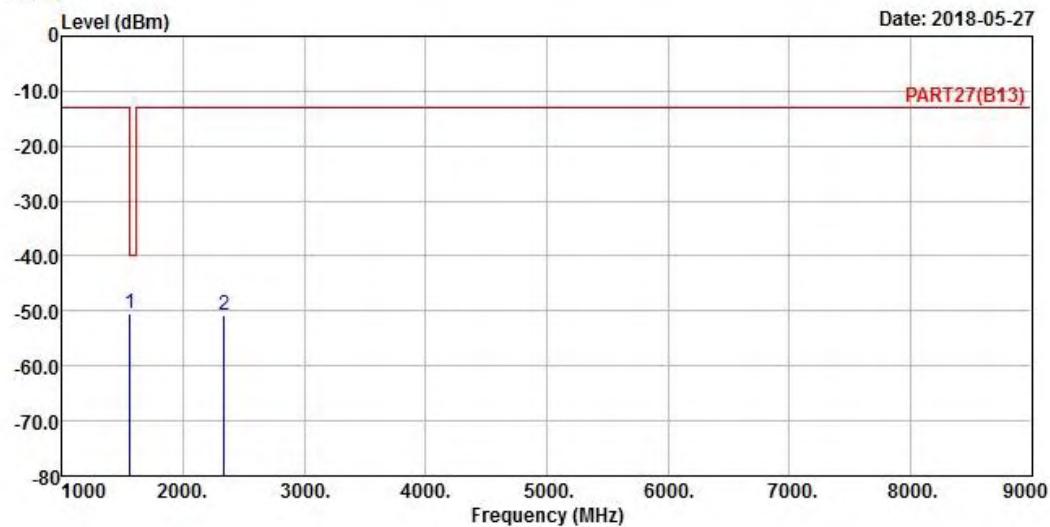
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1 pp	1559.00	-50.75	-37.43	-40.00	-10.75	-13.32 Peak
2	2338.50	-49.85	-40.47	-13.00	-36.85	-9.38 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27(B13) VERTICAL

Remak : LTE Band 13 QPSK_5M Link_L-CH

Tested by: Getaz Yang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	
1 pp	1559.00	-50.41	-37.09	-40.00	-10.41 -13.32 Peak
2	2338.50	-50.78	-41.40	-13.00	-37.78 -9.38 Peak

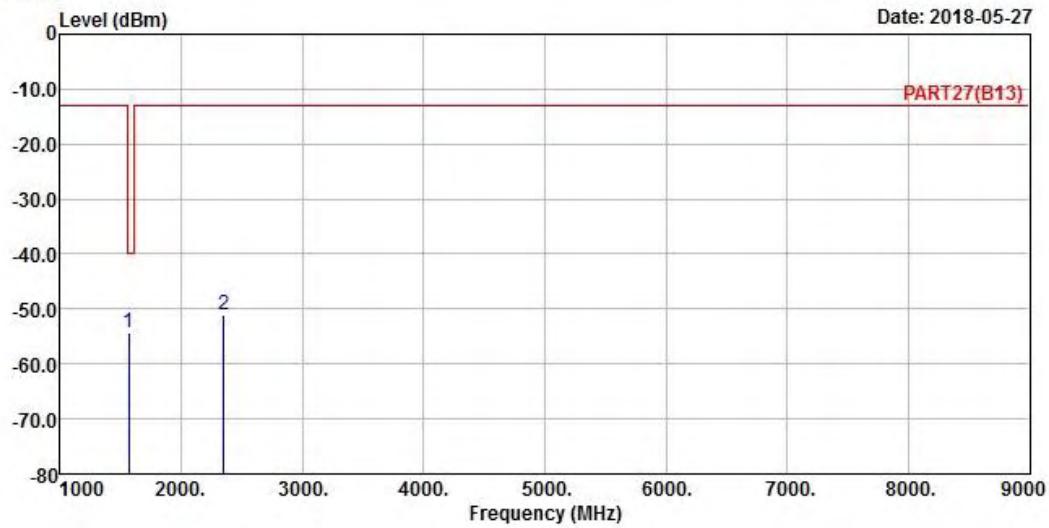
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27(B13) HORIZONTAL

Remak : LTE Band 13 QPSK_5M Link_M-CH

Tested by: Getaz Yang

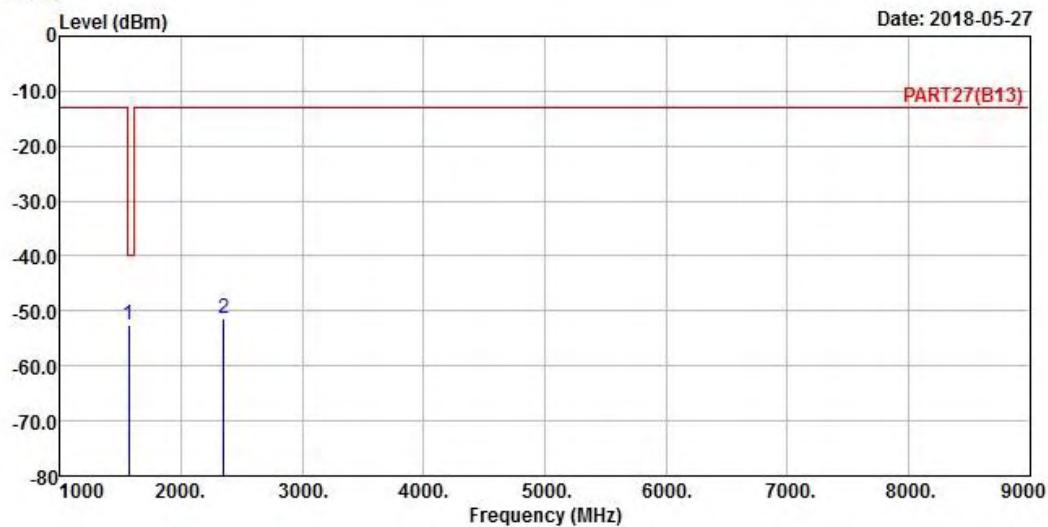
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1 pp	1564.00	-54.25	-40.91	-40.00	-14.25	-13.34 Peak
2	2346.00	-51.01	-41.57	-13.00	-38.01	-9.44 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27(B13) VERTICAL

Remak : LTE Band 13 QPSK_5M Link_M-CH

Tested by: Getaz Yang

	Freq	Read Level	Limit Level	Over Line	Over Limit	Over Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1 pp	1564.00	-52.56	-39.22	-40.00	-12.56	-13.34	Peak
2	2346.00	-51.48	-42.04	-13.00	-38.48	-9.44	Peak

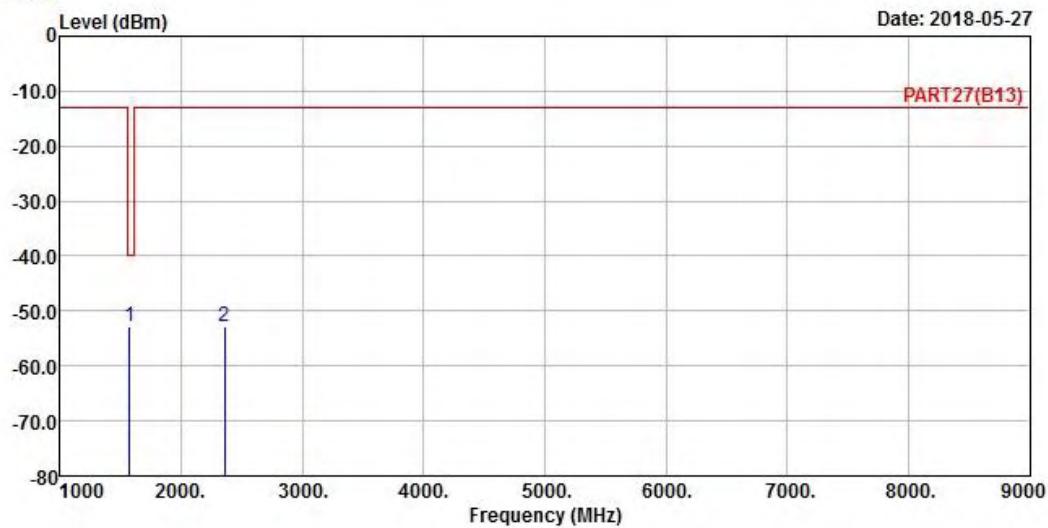
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27(B13) HORIZONTAL

Remak : LTE Band 13 QPSK_5M Link_H-CH

Tested by: Getaz Yang

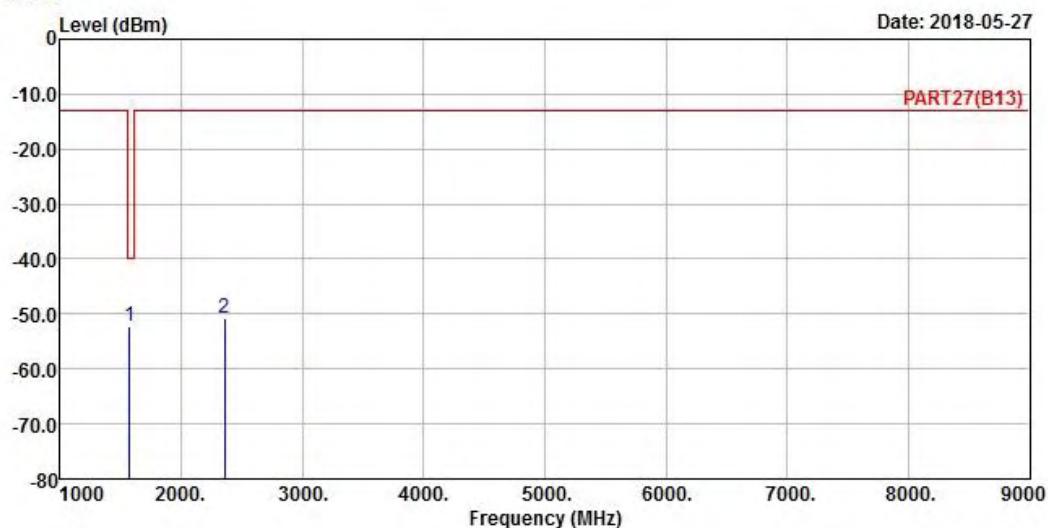
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1 pp	1569.00	-52.89	-39.54	-40.00	-12.89	-13.35 Peak
2	2353.50	-52.78	-43.27	-13.00	-39.78	-9.51 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27(B13) VERTICAL

Remak : LTE Band 13 QPSK_5M Link_H-CH

Tested by: Getaz Yang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	
1 pp	1569.00	-52.26	-38.91	-40.00	-12.26 -13.35 Peak
2	2353.50	-50.76	-41.25	-13.00	-37.76 -9.51 Peak

Channel Bandwidth: 10 MHz / QPSK

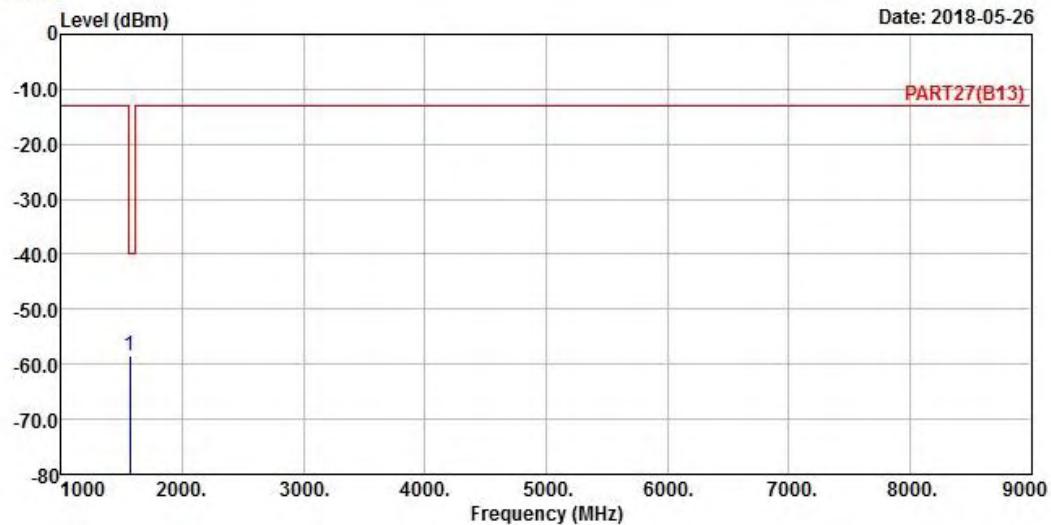
Middle Channel



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27(B13) HORIZONTAL

Remak : LTE Band 13 QPSK_10M Link_M-CH

Tested by: Getaz Yang

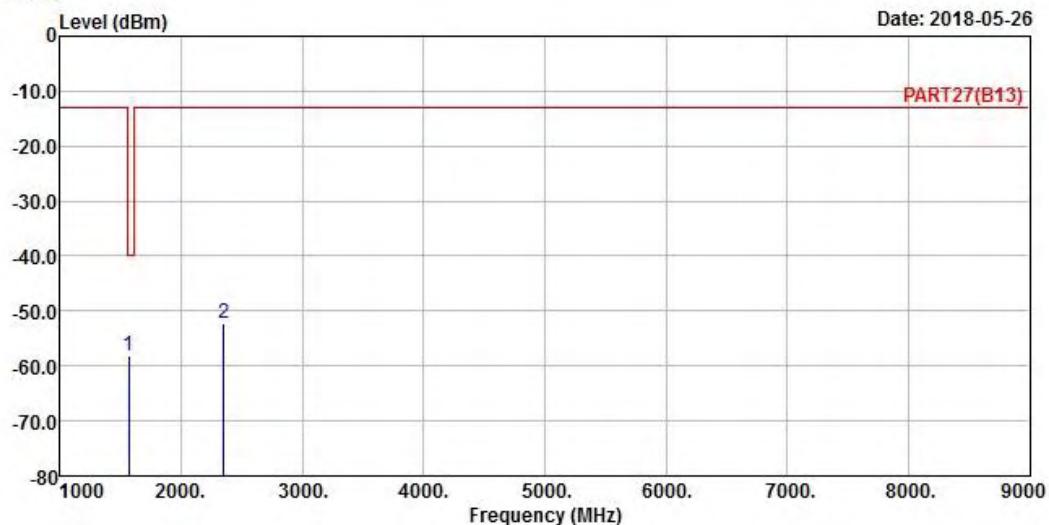
	Freq	Read Level	Limit Level	Over Line	Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1 pp	1564.00	-58.33	-44.99	-40.00	-18.33	-13.34	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27(B13) VERTICAL

Remak : LTE Band 13 QPSK_10M Link_M-CH

Tested by: Getaz Yang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	
1 pp	1564.00	-58.19	-44.85	-40.00	-18.19 -13.34 Peak
2	2346.00	-52.26	-42.82	-13.00	-39.26 -9.44 Peak

LTE Band 17

Channel Bandwidth: 5 MHz / QPSK

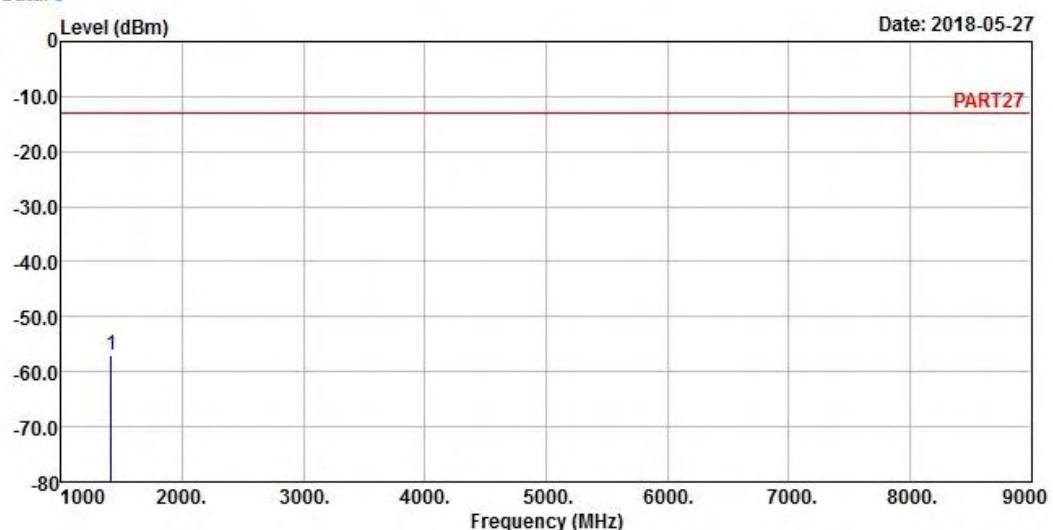
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 17 QPSK_5M Link_L-CH

Tested by: Jisyong Wang

Read	Limit	Over			
Freq	Level	Line	Limit	Factor	Remark

MHz	dBm	dBm	dBm	dB	dB
-----	-----	-----	-----	----	----

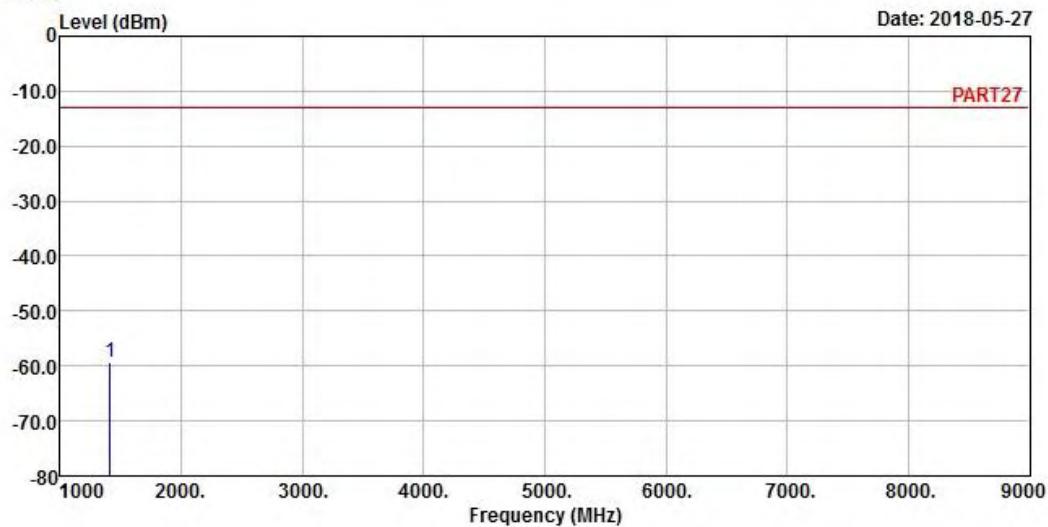
1 pp	1413.00	-56.98	-44.96	-13.00	-43.98	-12.02	Peak
------	---------	--------	--------	--------	--------	--------	------



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 17 QPSK_5M Link_L-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1413.00	-59.21	-47.19	-13.00	-46.21	-12.02 Peak

1 pp 1413.00 -59.21 -47.19 -13.00 -46.21 -12.02 Peak

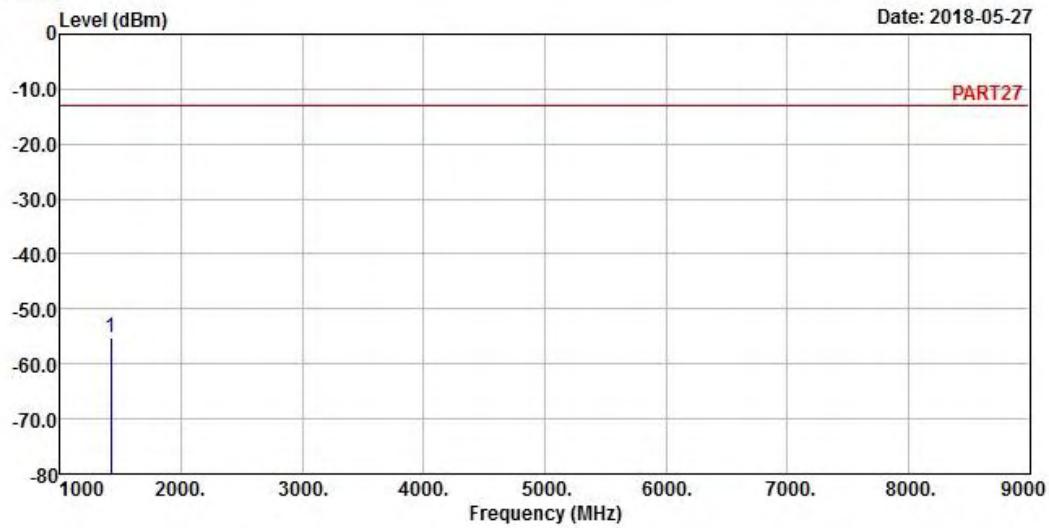
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 17 QPSK_5M Link_M-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	

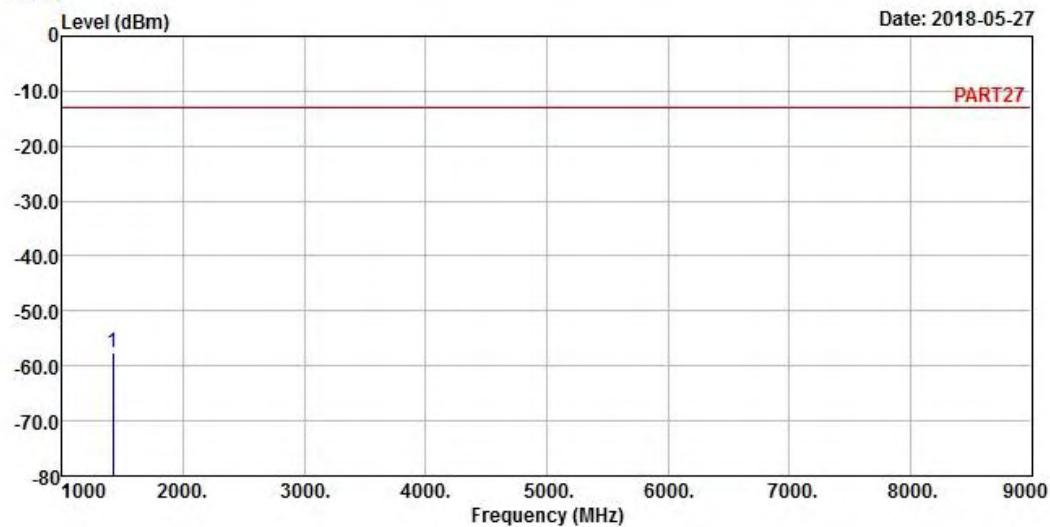
1 pp 1420.00 -55.24 -43.10 -13.00 -42.24 -12.14 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 17 QPSK_5M Link_M-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1420.00	-57.68	-45.54	-13.00	-44.68	-12.14 Peak

1 pp 1420.00 -57.68 -45.54 -13.00 -44.68 -12.14 Peak

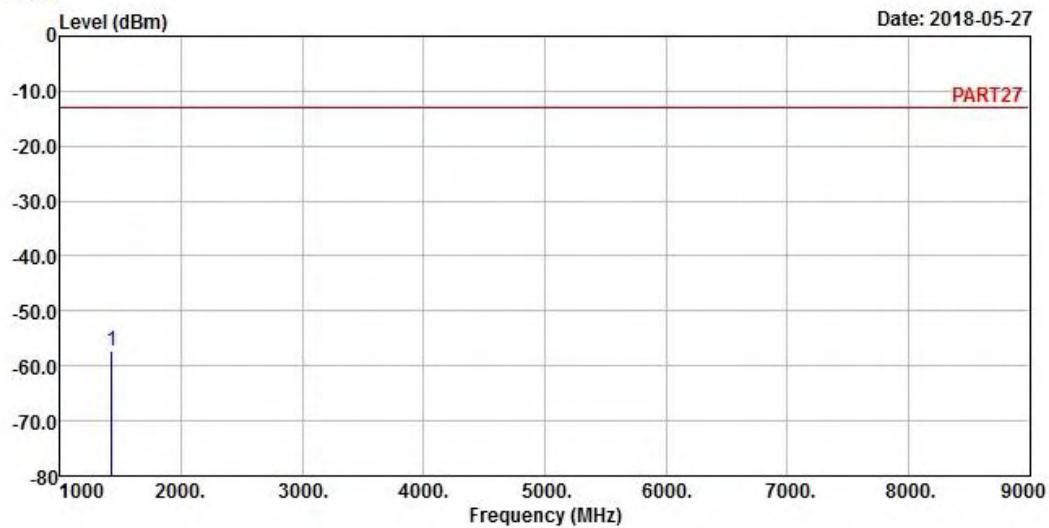
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 17 QPSK_5M Link_H-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

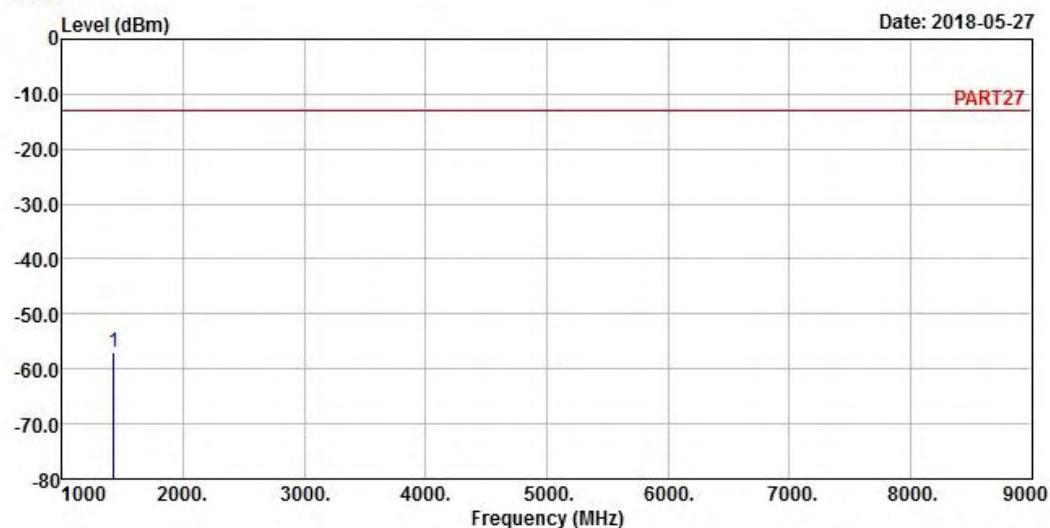
1 pp 1427.00 -57.25 -45.00 -13.00 -44.25 -12.25 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 17 QPSK_5M Link_H-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	

1 pp 1427.00 -57.02 -44.77 -13.00 -44.02 -12.25 Peak

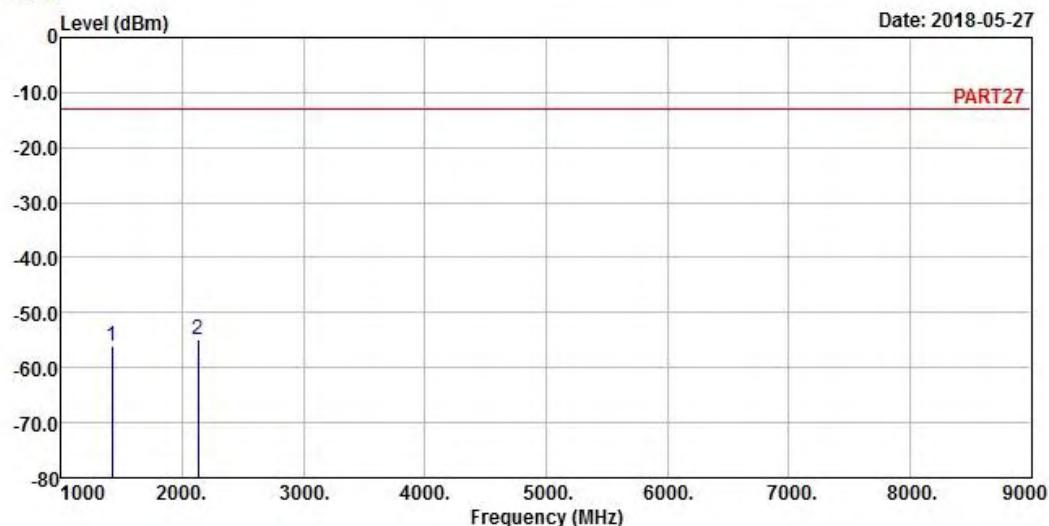
Channel Bandwidth: 10 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 17 QPSK_10M Link_L-CH

Tested by: Jisyong Wang

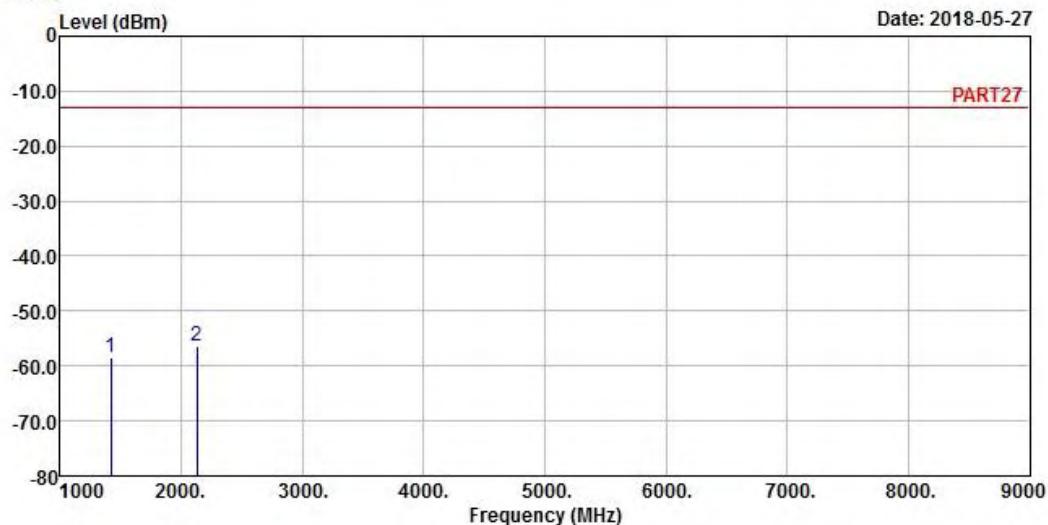
Freq	Level	Read	Limit	Over	Remark
		MHz	dBm	dBm	
1	1418.00	-56.12	-43.98	-13.00	-43.12 -12.14 Peak
2 pp	2127.00	-55.04	-45.27	-13.00	-42.04 -9.77 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 17 QPSK_10M Link_L-CH

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	
1	1418.00	-58.50	-46.36	-13.00	-45.50 -12.14 Peak
2 pp	2127.00	-56.44	-46.67	-13.00	-43.44 -9.77 Peak

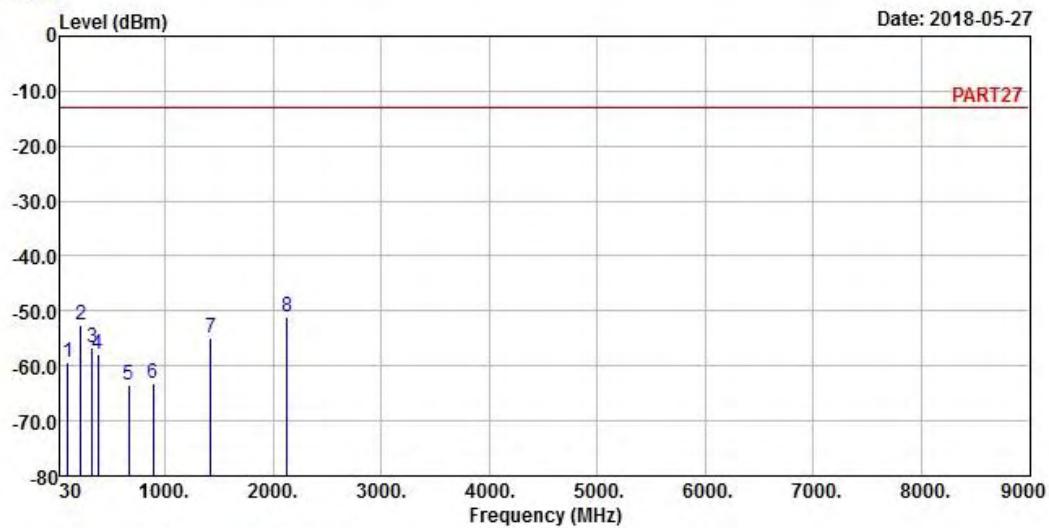
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 17 QPSK_10M Link_M-CH

Tested by: Jisyong Wang

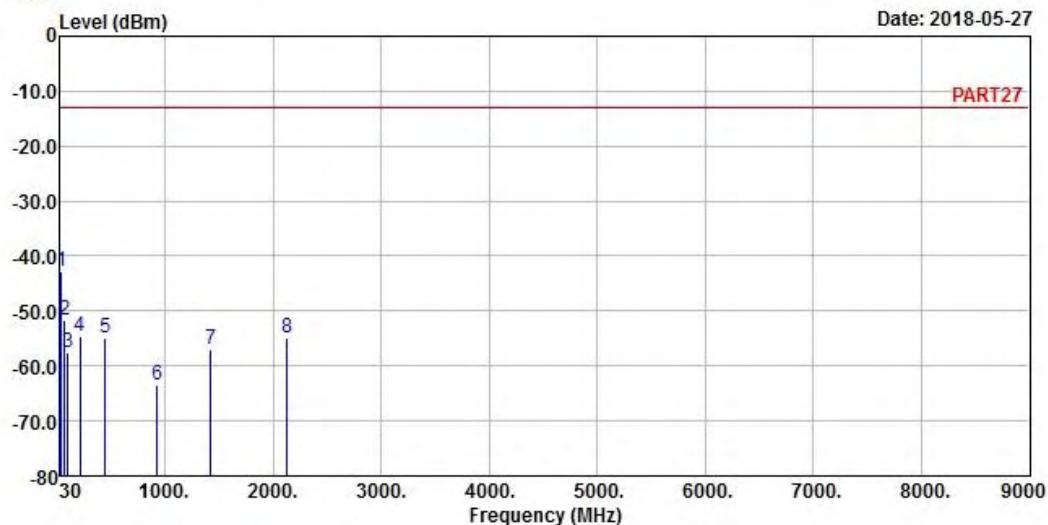
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	102.75	-59.38	-48.89	-13.00	-46.38	-10.49 Peak
2	218.18	-52.62	-45.34	-13.00	-39.62	-7.28 Peak
3	321.97	-56.58	-49.91	-13.00	-43.58	-6.67 Peak
4	376.29	-58.01	-51.93	-13.00	-45.01	-6.08 Peak
5	661.47	-63.57	-62.87	-13.00	-50.57	-0.70 Peak
6	888.45	-63.10	-63.61	-13.00	-50.10	0.51 Peak
7	1420.00	-54.83	-42.69	-13.00	-41.83	-12.14 Peak
8 pp	2130.00	-51.01	-41.24	-13.00	-38.01	-9.77 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 17 QPSK_10M Link_M-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Read	Limit	Over	Remark
			Line	Line	Factor	
MHz	dBm	dBm	dBm	dB	dB	
1 pp	39.70	-42.67	-43.31	-13.00	-29.67	0.64 Peak
2	68.80	-51.73	-43.41	-13.00	-38.73	-8.32 Peak
3	98.87	-57.64	-47.02	-13.00	-44.64	-10.62 Peak
4	214.30	-54.47	-47.03	-13.00	-41.47	-7.44 Peak
5	448.07	-54.83	-49.26	-13.00	-41.83	-5.57 Peak
6	924.34	-63.58	-64.75	-13.00	-50.58	1.17 Peak
7	1420.00	-57.10	-44.96	-13.00	-44.10	-12.14 Peak
8	2130.00	-55.05	-45.28	-13.00	-42.05	-9.77 Peak

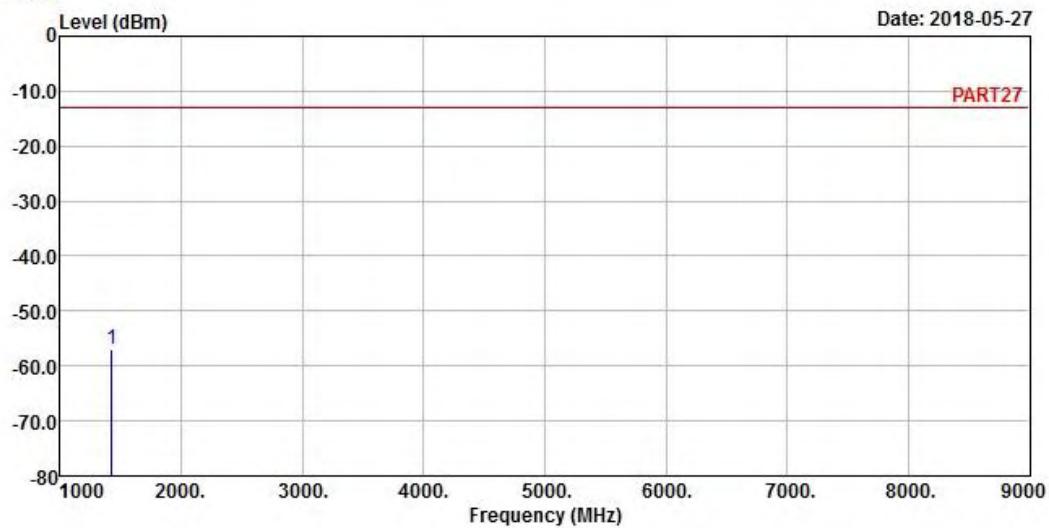
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 17 QPSK_10M Link_H-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

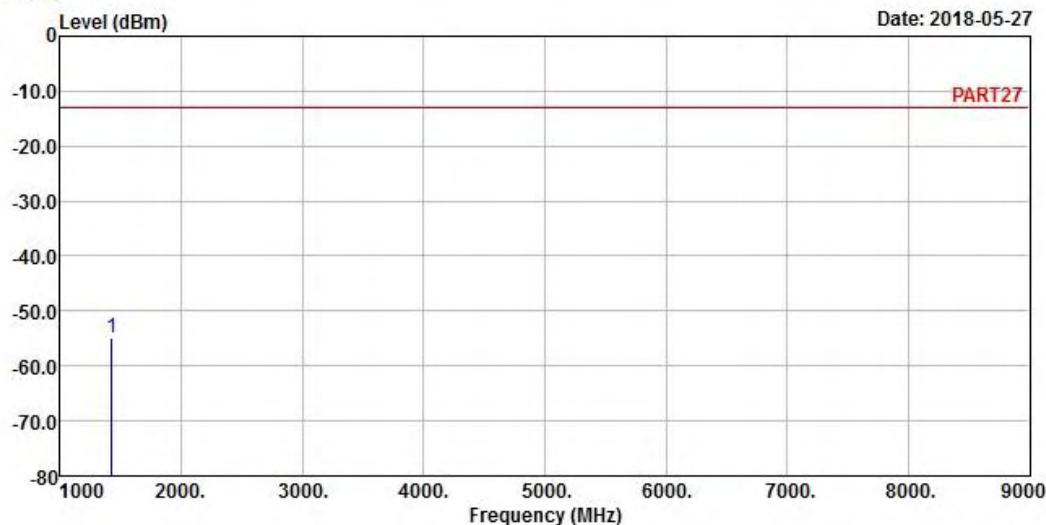
1 pp 1422.00 -57.10 -44.91 -13.00 -44.10 -12.19 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 17 QPSK_10M Link_H-CH

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit	Over Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	

1 pp 1422.00 -55.01 -42.82 -13.00 -42.01 -12.19 Peak

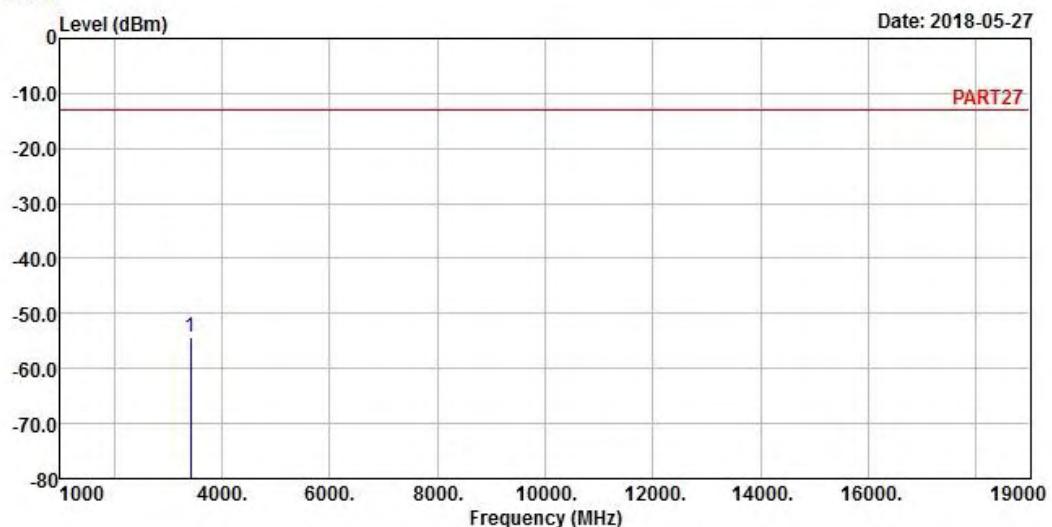
LTE Band 66:
Channel Bandwidth: 1.4 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5
 Condition: PART27 HORIZONTAL
 Remak : LTE Band 66 QPSK_1.4M_L-CH Link
 Tested by: Jisyong Wang

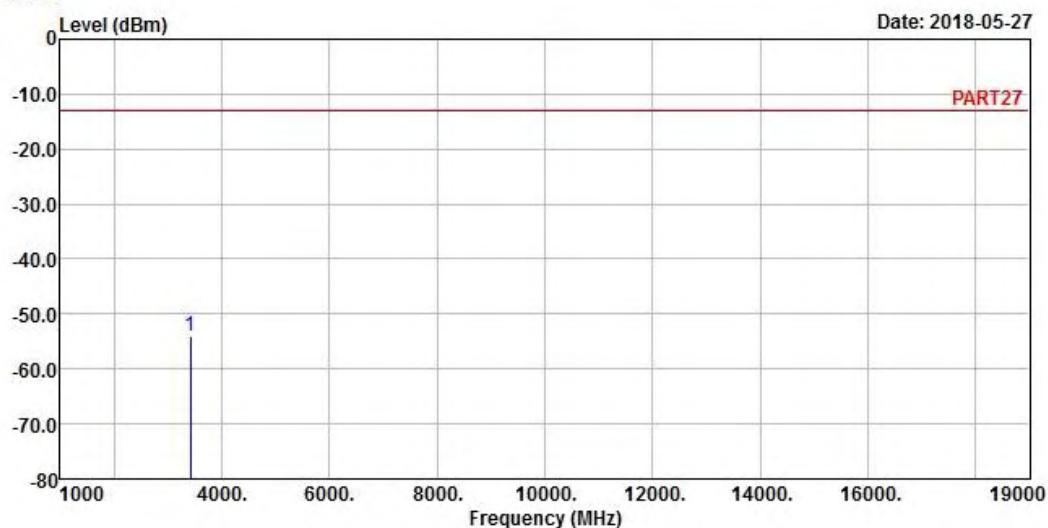
Freq	Read	Limit	Over	Factor	Remark
	Level	Level	Line		
MHz	dBm	dBm	dBm	dB	dB
1 pp	3421.40	-54.44	-46.10	-13.00	-41.44 -8.34 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_1.4M_L-CH Link

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3421.40	-53.92	-45.58	-13.00	-40.92 -8.34 Peak

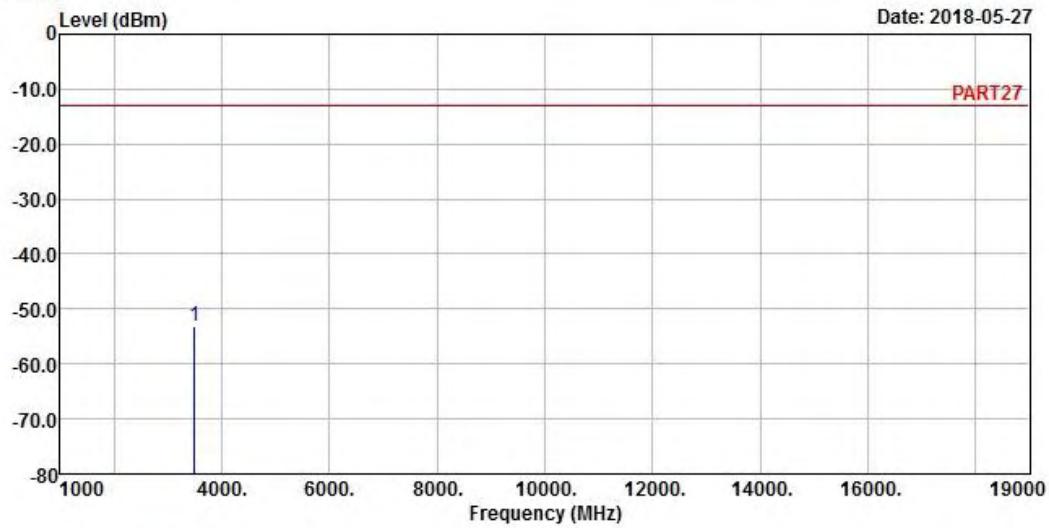
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 66 QPSK_1.4M_M-CH Link

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

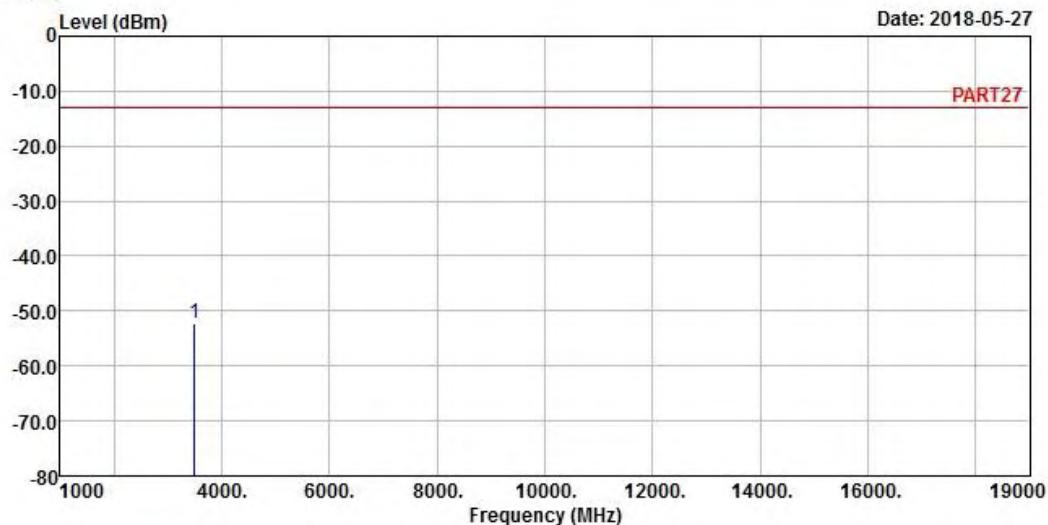
1 pp 3490.00 -53.25 -45.60 -13.00 -40.25 -7.65 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_1.4M_M-CH Link

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3490.00	-52.25	-44.60	-13.00	-39.25 -7.65 Peak

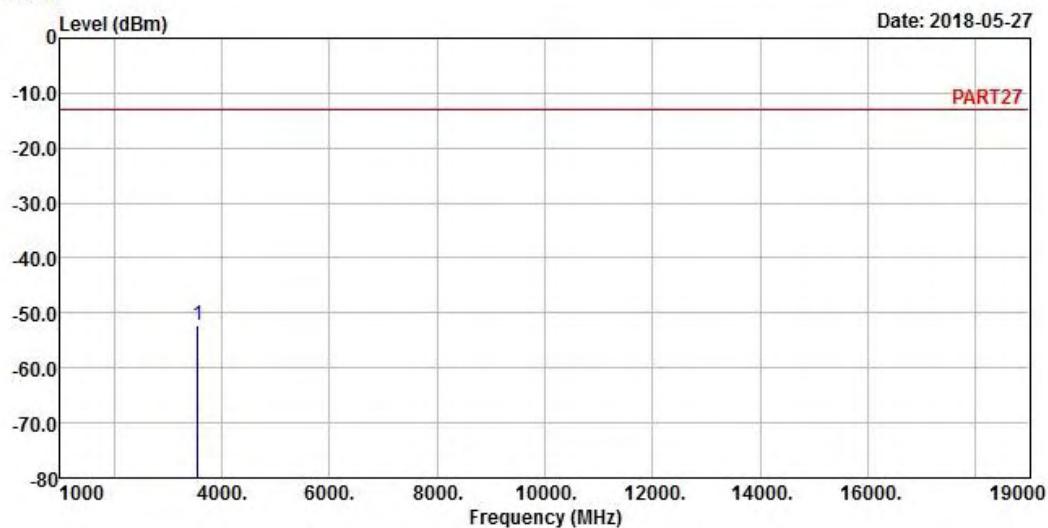
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 66 QPSK_1.4M_H-CH Link

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

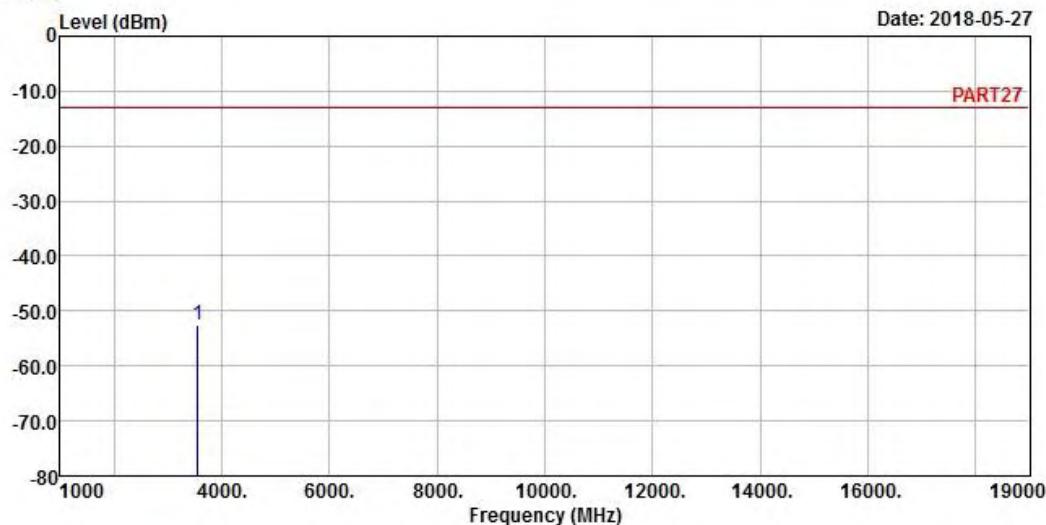
1 pp 3558.60 -52.13 -45.06 -13.00 -39.13 -7.07 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_1.4M_H-CH Link

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3558.60	-52.69	-45.62	-13.00	-39.69 -7.07 Peak

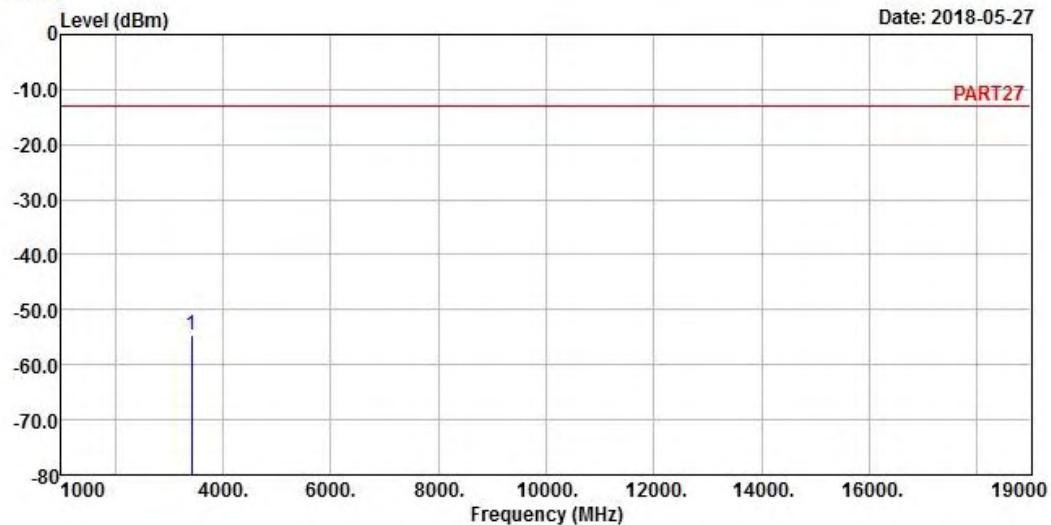
Channel Bandwidth: 5 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 66 QPSK_5M_L-CH Link

Tested by: Jisyong Wang

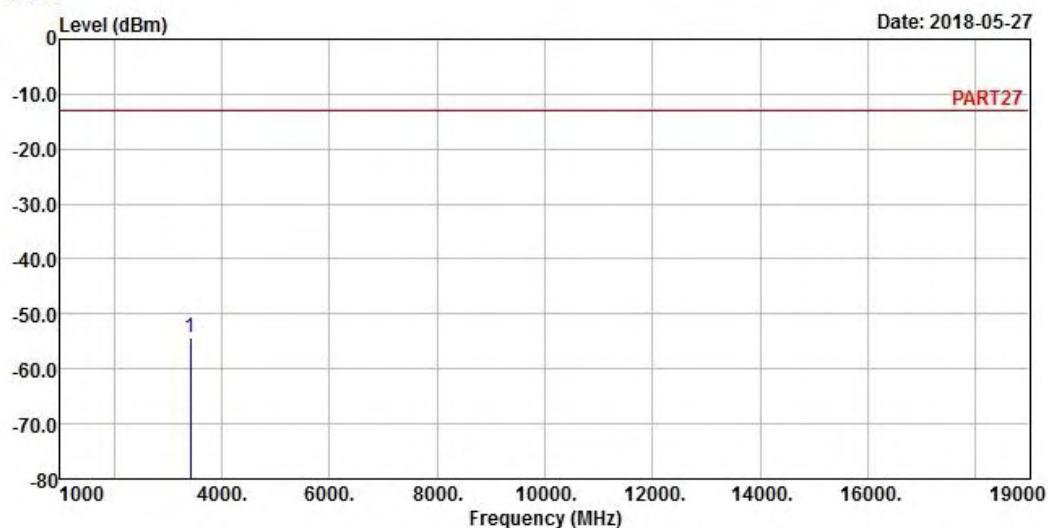
Freq	Read	Limit	Over	Remark		
	Level	Level	Line			
MHz	dBm	dBm	dBm	dB	dB	
1 pp	3425.00	-54.48	-46.14	-13.00	-41.48	-8.34 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_5M_L-CH Link

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3425.00	-54.29	-45.95	-13.00	-41.29 -8.34 Peak

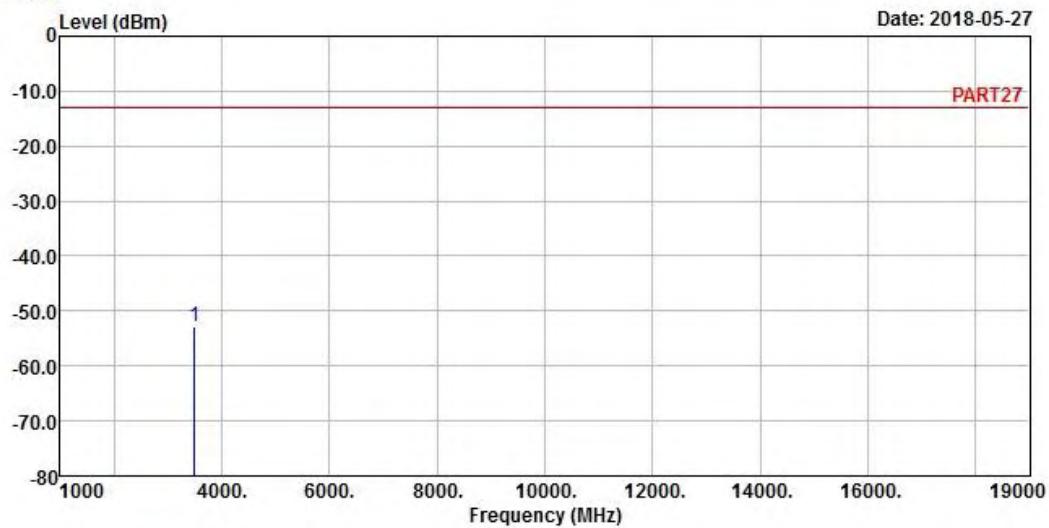
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 66 QPSK_5M_M-CH Link

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

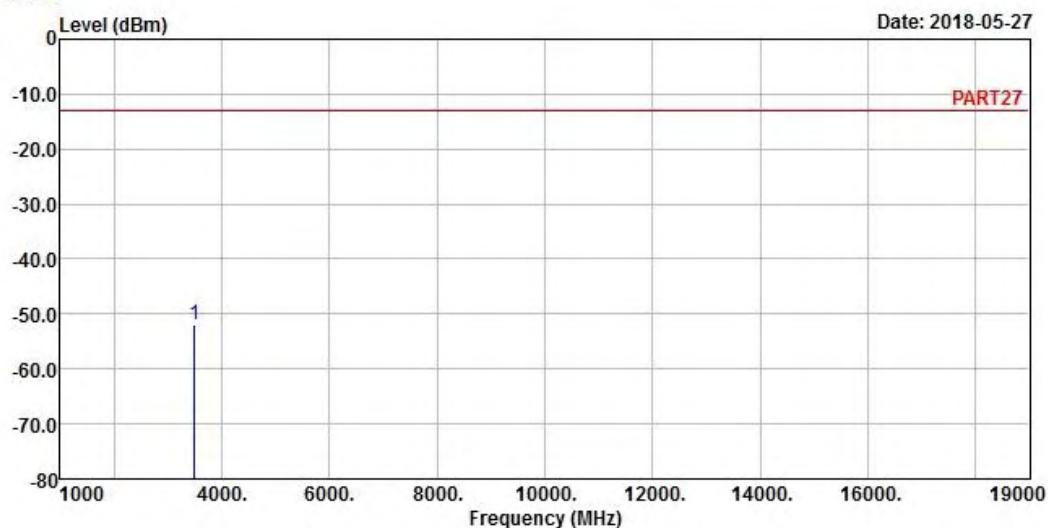
1 pp 3490.00 -52.89 -45.24 -13.00 -39.89 -7.65 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_5M_M-CH Link

Tested by: Jisyong Wang

Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3490.00	-51.92	-44.27	-13.00	-38.92 -7.65 Peak

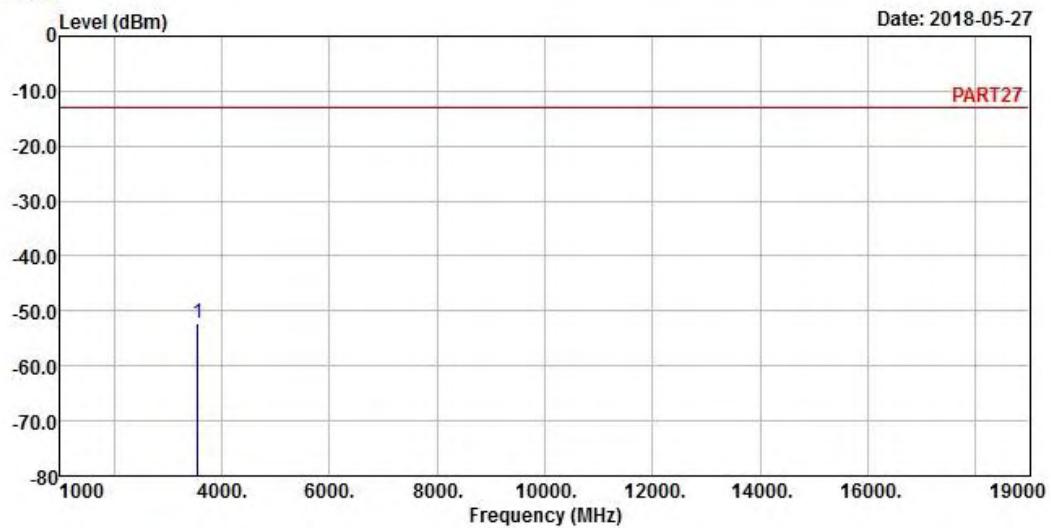
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 66 QPSK_5M_H-CH Link

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
MHz	dBm	dBm	dBm	dB	dB

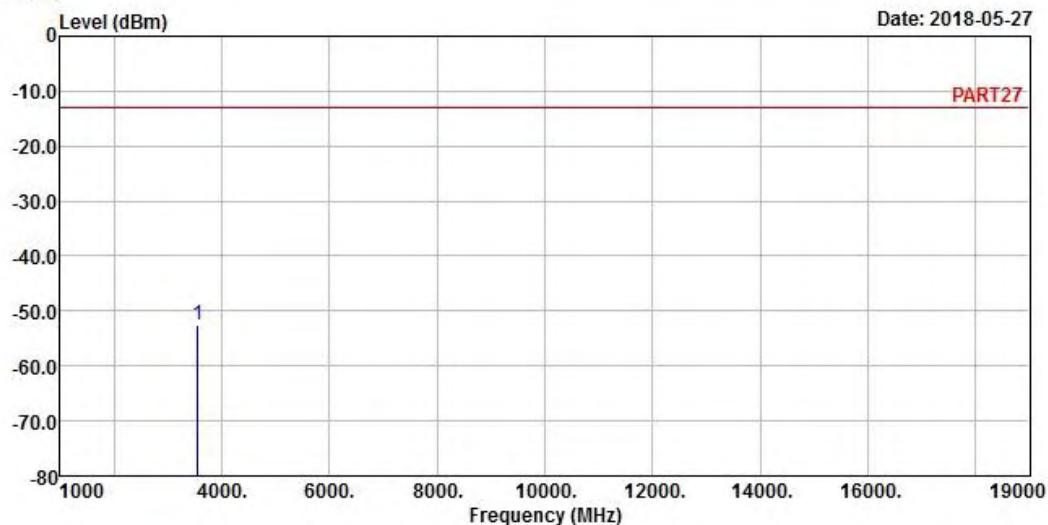
1 pp 3555.00 -52.13 -44.98 -13.00 -39.13 -7.15 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_5M_H-CH Link

Tested by: Jisyong Wang

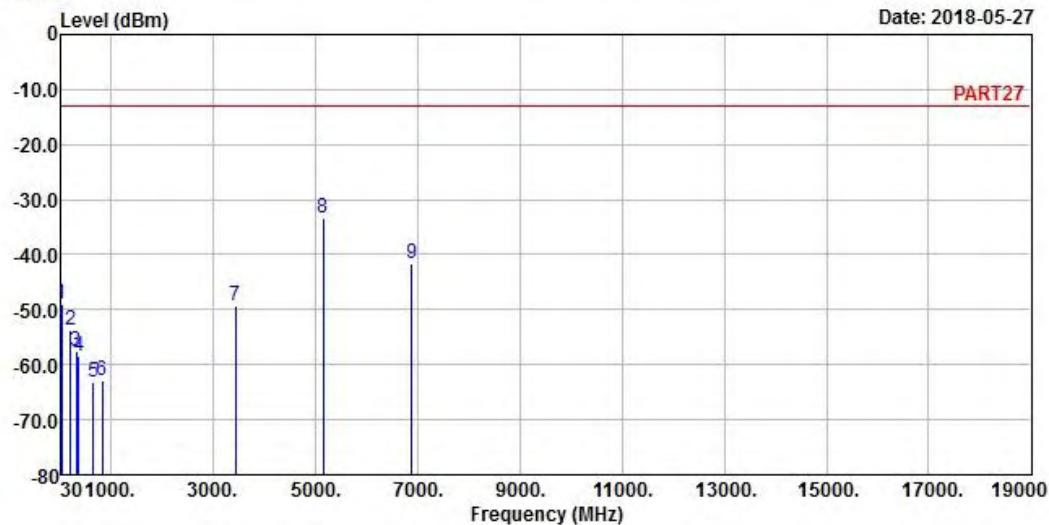
Freq	Level	Read	Limit	Over	Remark
		Level	Line	Limit Factor	
MHz	dBm	dBm	dBm	dB	dB
1 pp	3555.00	-52.69	-45.54	-13.00	-39.69 -7.15 Peak

Channel Bandwidth: 20 MHz / QPSK
Low Channel


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 66 QPSK_20M_L-CH Link

Tested by: Jisyong Wang

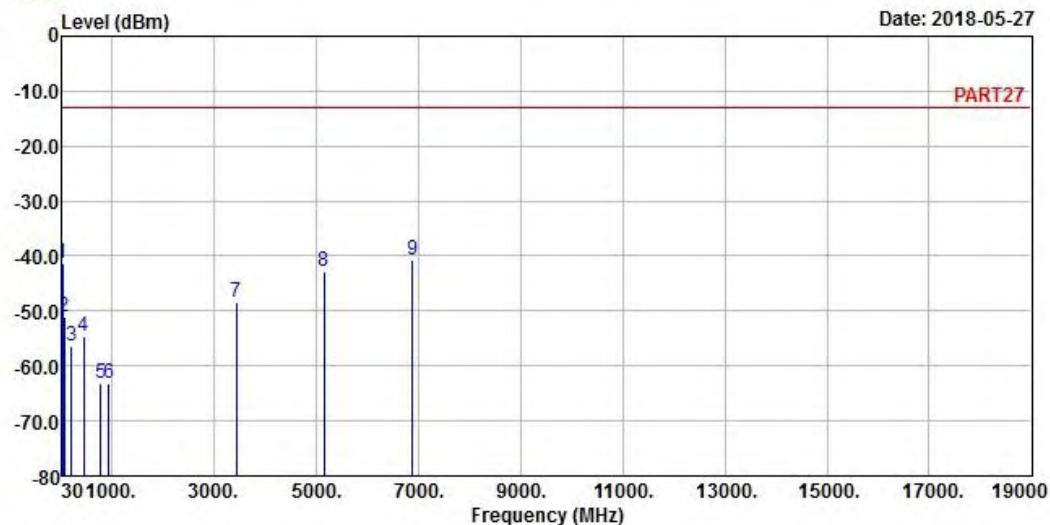
	Read	Limit	Over			
Freq	Level	Level	Line	Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1	42.61	-49.14	-48.20	-13.00	-36.14	-0.94 Peak
2	216.24	-53.64	-46.28	-13.00	-40.64	-7.36 Peak
3	324.88	-57.58	-50.95	-13.00	-44.58	-6.63 Peak
4	375.32	-58.55	-52.46	-13.00	-45.55	-6.09 Peak
5	656.62	-63.29	-62.51	-13.00	-50.29	-0.78 Peak
6	826.37	-62.98	-63.48	-13.00	-49.98	0.50 Peak
7	3440.00	-49.18	-40.96	-13.00	-36.18	-8.22 Peak
8 pp	5160.00	-33.40	-31.49	-13.00	-20.40	-1.91 Peak
9	6880.00	-41.61	-44.09	-13.00	-28.61	2.48 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_20M_L-CH Link

Tested by: Jisyong Wang

		Read	Limit	Over		
Freq	Level	Level	Line	Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	38.73	-41.32	-41.42	-13.00	-28.32	0.10 Peak
2	68.80	-51.21	-42.89	-13.00	-38.21	-8.32 Peak
3	216.24	-56.27	-48.91	-13.00	-43.27	-7.36 Peak
4	445.16	-54.57	-48.98	-13.00	-41.57	-5.59 Peak
5	777.87	-63.07	-63.87	-13.00	-50.07	0.80 Peak
6	937.92	-63.03	-64.54	-13.00	-50.03	1.51 Peak
7	3440.00	-48.46	-40.24	-13.00	-35.46	-8.22 Peak
8	5160.00	-42.92	-41.01	-13.00	-29.92	-1.91 Peak
9 pp	6880.00	-40.73	-43.21	-13.00	-27.73	2.48 Peak

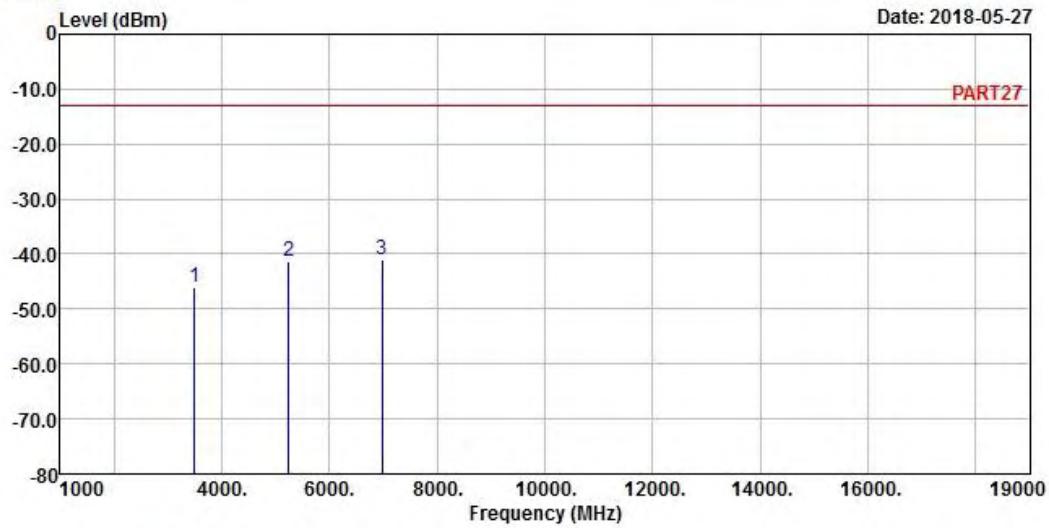
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 66 QPSK_20M_M-CH Link

Tested by: Jisyong Wang

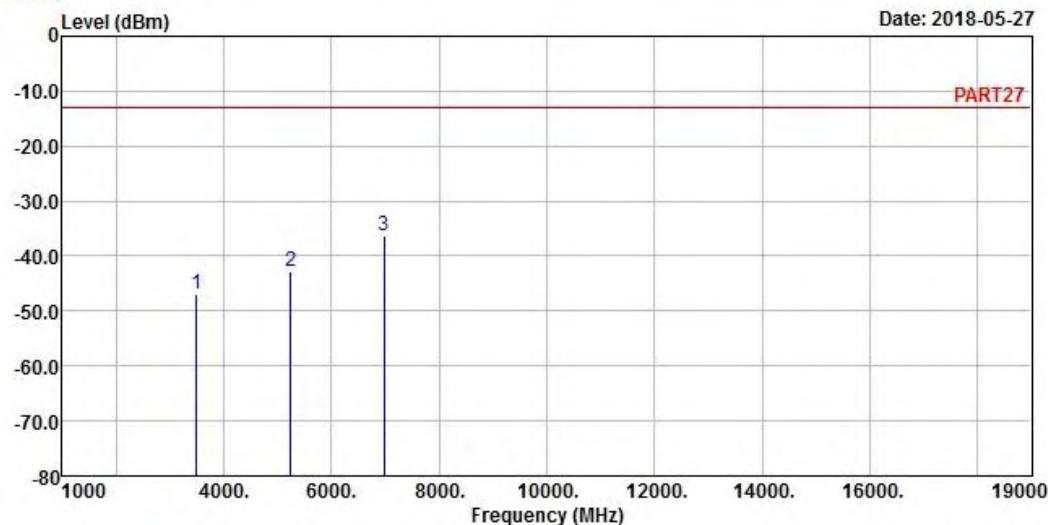
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	3490.00	-46.16	-38.51	-13.00	-33.16	-7.65 Peak
2	5235.00	-41.44	-39.03	-13.00	-28.44	-2.41 Peak
3 pp	6980.00	-40.99	-44.05	-13.00	-27.99	3.06 Peak



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_20M_M-CH Link

Tested by: Jisyong Wang

Freq	Level	Read Level	Read	Limit	Over	Remark
			Line	Limit	Factor	
MHz	dBm	dBm	dBm	dB	dB	
1	3490.00	-46.86	-39.21	-13.00	-33.86	-7.65 Peak
2	5235.00	-42.74	-40.33	-13.00	-29.74	-2.41 Peak
3 pp	6980.00	-36.42	-39.48	-13.00	-23.42	3.06 Peak

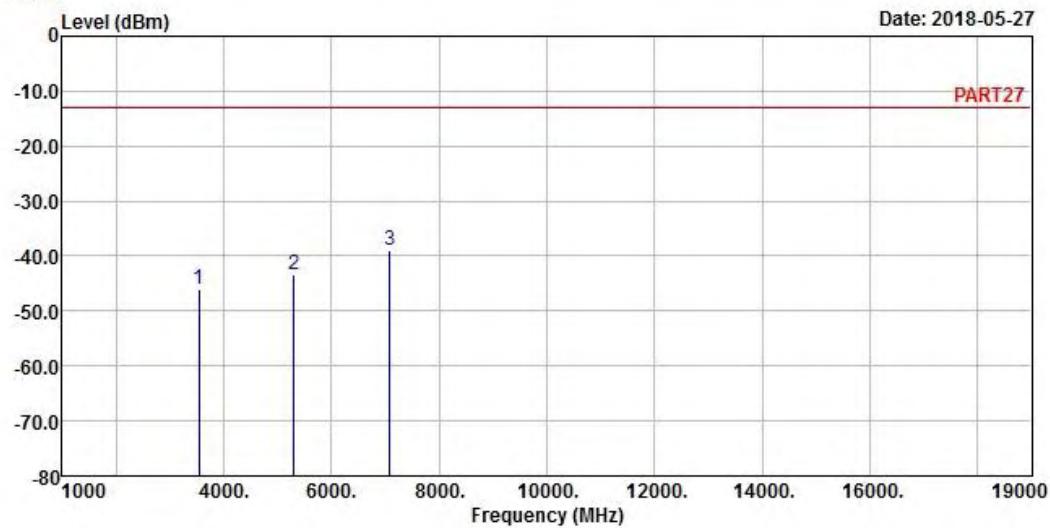
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 3



Site : 966 Chamber 5

Condition: PART27 HORIZONTAL

Remak : LTE Band 66 QPSK_20M_H-CH Link

Tested by: Jisyong Wang

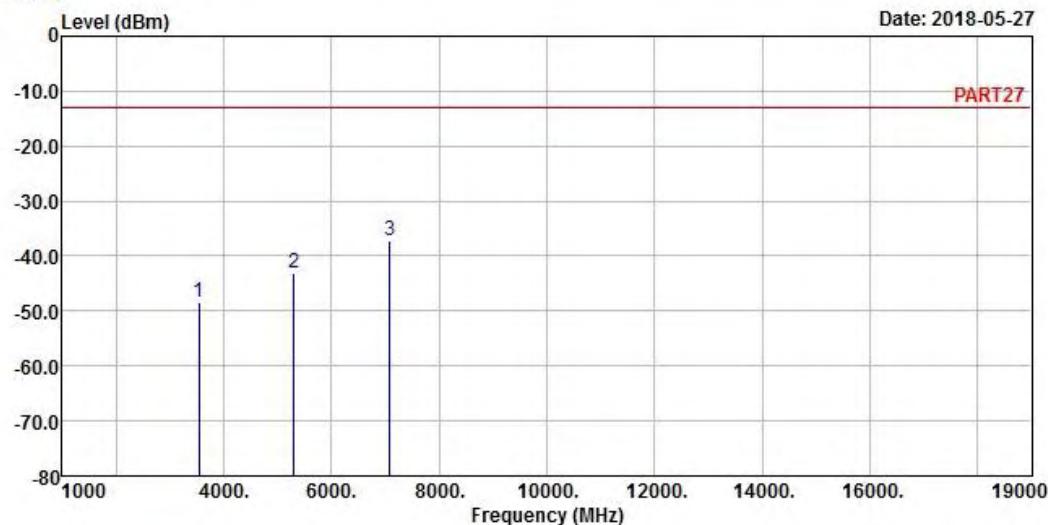
	Freq	Read Level	Limit Level	Over Line	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	
1	3540.00	-45.95	-38.73	-13.00	-32.95	-7.22 Peak
2	5310.00	-43.44	-40.58	-13.00	-30.44	-2.86 Peak
3 pp	7080.00	-38.94	-42.10	-13.00	-25.94	3.16 Peak



Bureau Veritas Consumer Products Services Ltd.,Taoyuan Branch

A D T

Data: 4



Site : 966 Chamber 5

Condition: PART27 VERTICAL

Remak : LTE Band 66 QPSK_20M_H-CH Link

Tested by: Jisyong Wang

Freq	Read Level	Limit Level	Over	Factor	Remark
			Line		
MHz	dBm	dBm	dBm	dB	
1	3540.00	-48.30	-41.08	-13.00	-35.30 -7.22 Peak
2	5310.00	-43.22	-40.36	-13.00	-30.22 -2.86 Peak
3 pp	7080.00	-37.18	-40.34	-13.00	-24.18 3.16 Peak

5 Pictures of Test Arrangements

Please refer to the attached file (Test Setup Photo).

Appendix – Information on the Testing Laboratories

We, Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch, were founded in 1988 to provide our best service in EMC, Radio, Telecom and Safety consultation. Our laboratories are FCC recognized accredited test firms and accredited according to ISO/IEC 17025.

If you have any comments, please feel free to contact us at the following:

Linko EMC/RF Lab

Tel: 886-2-26052180
Fax: 886-2-26051924

Hsin Chu EMC/RF/Telecom Lab

Tel: 886-3-6668565
Fax: 886-3-6668323

Hwa Ya EMC/RF/Safety

Tel: 886-3-3183232
Fax: 886-3-3270892

Email: service.adt@tw.bureauveritas.com

Web Site: www.bureauveritas-adt.com

The address and road map of all our labs can be found in our web site also.

--- END ---