

4.8 Radiated Emission Measurement

4.8.1 Limits of Radiated Emission Measurement

The power of any emission outside of the authorized operating frequency ranges must be attenuated below the transmitting power (P) by a factor of at least $43 + 10 \log(P)$ dB. The emission limit is equal to -13 dBm.

4.8.2 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.R.P power - 2.15 dB.

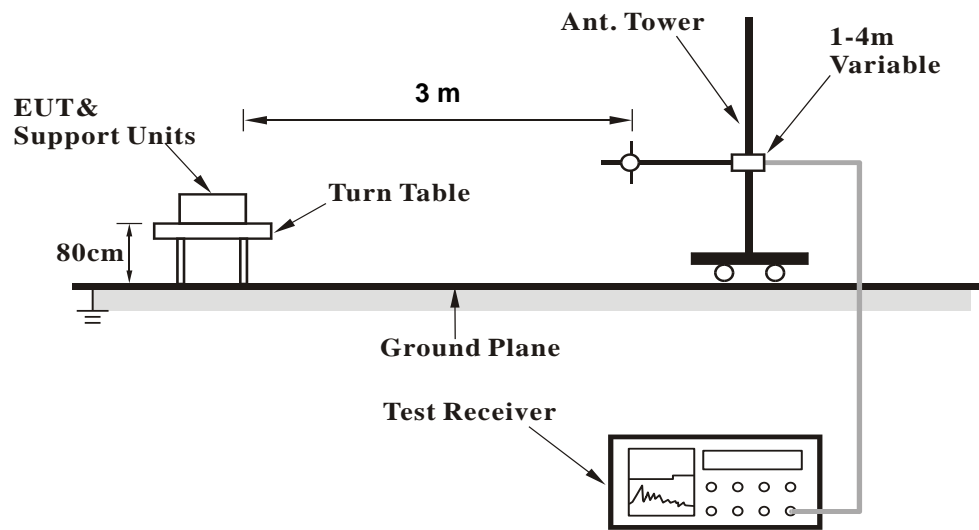
NOTE: The resolution bandwidth and video bandwidth of test receiver/spectrum analyzer is 1 MHz/3 MHz.

4.8.3 Deviation from Test Standard

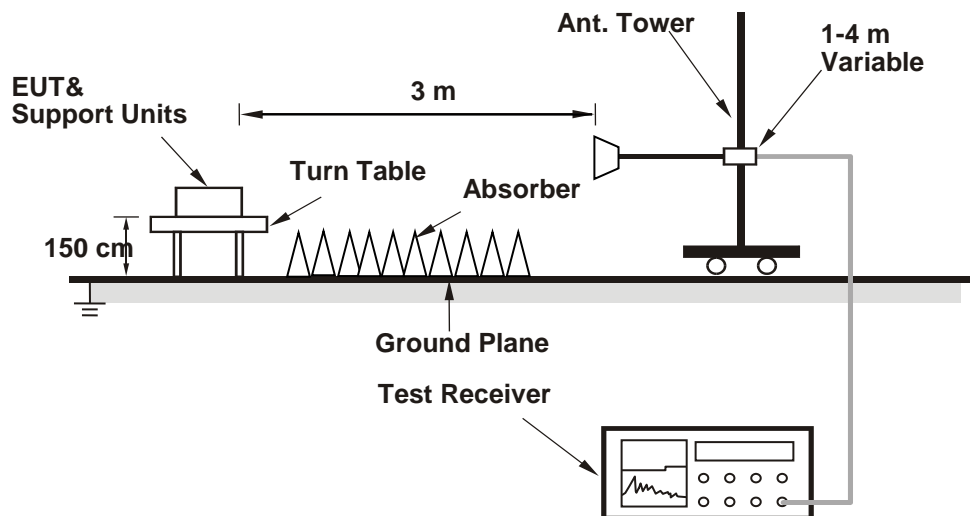
No deviation.

4.8.4 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).

4.8.5 Test Results

GSM:

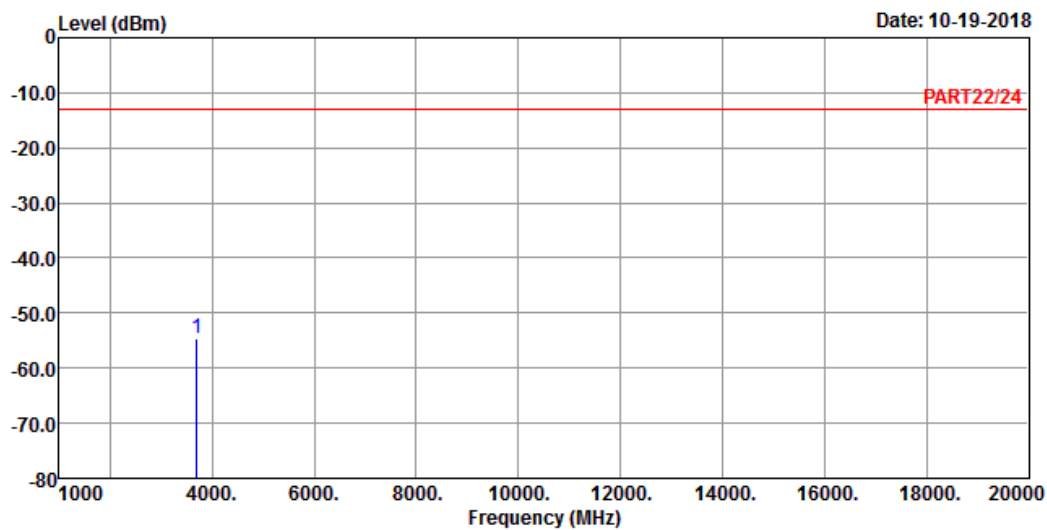
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : PCS 1900 Link_L-CH
 Tested by: Thomas Wei

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

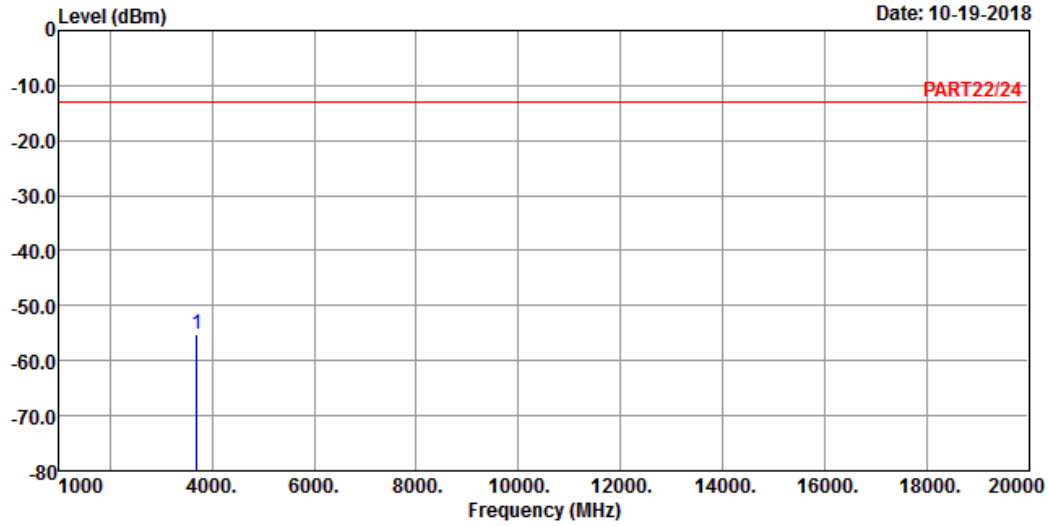
1 pp 3700.40 -54.53 -47.60 -13.00 -41.53 -6.93 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : PCS 1900 Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3700.40	-55.25	-48.32	-13.00	-42.25	-6.93	Peak

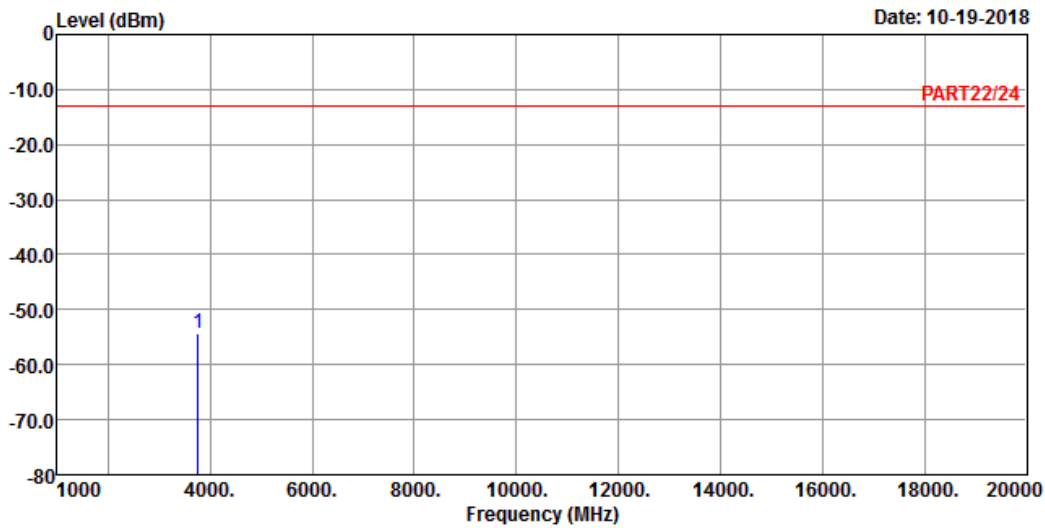
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : PCS 1900 Link_M-CH
 Tested by: Thomas Wei

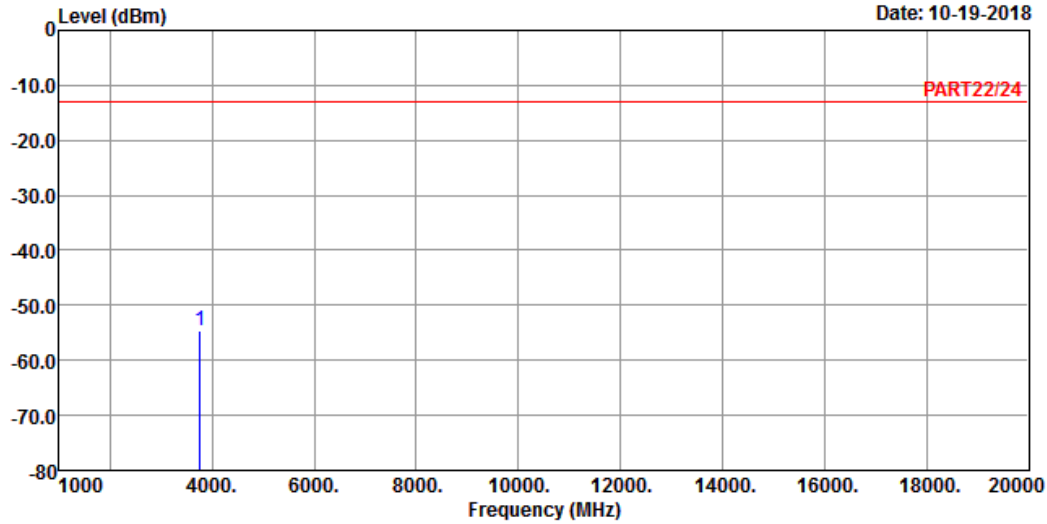
Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3760.00	-54.30	-47.65	-13.00	-41.30	-6.65	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : PCS 1900 Link_M-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3760.00	-54.61	-47.96	-13.00	-41.61	-6.65	Peak

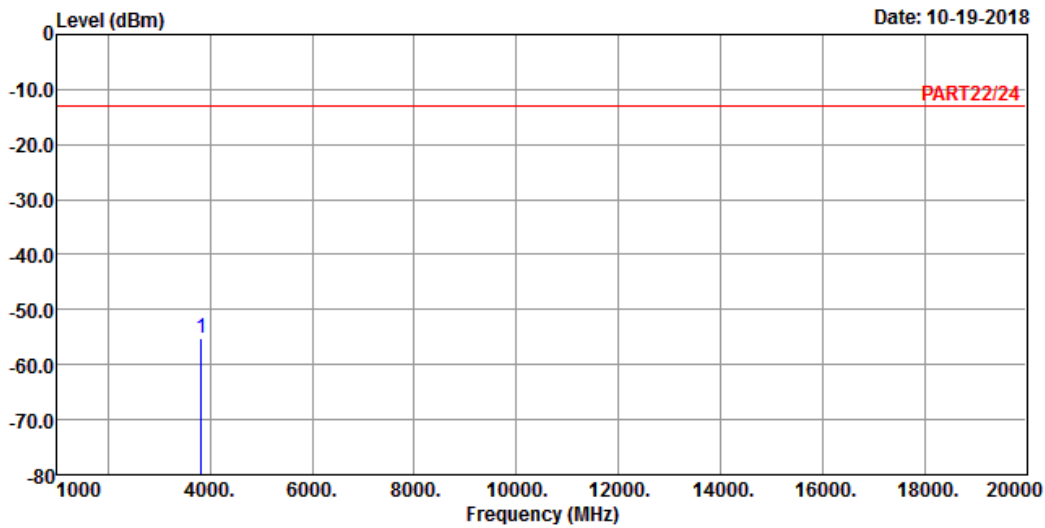
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Date: 10-19-2018

Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : PCS 1900 Link_H-CH
 Tested by: Thomas Wei

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

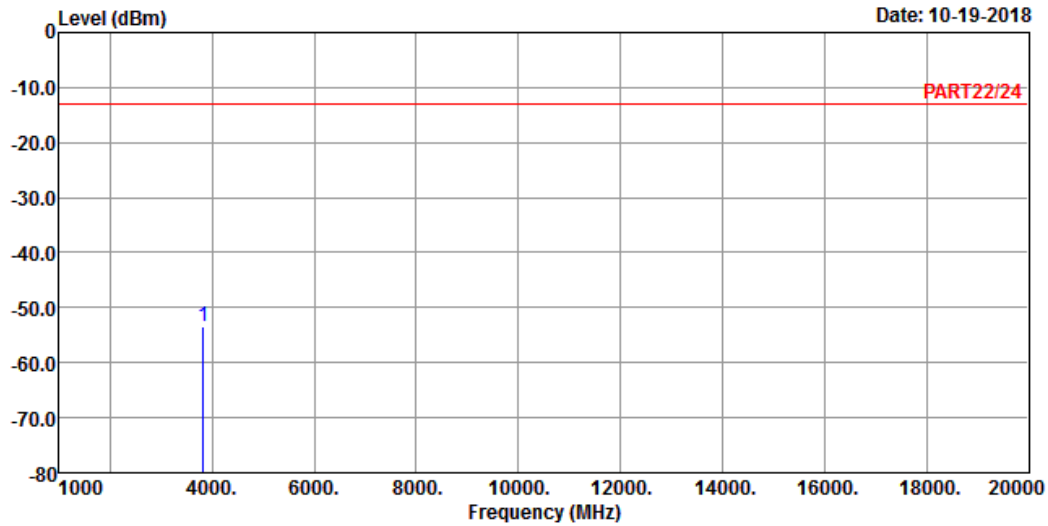
1 pp 3819.60 -55.29 -48.89 -13.00 -42.29 -6.40 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : PCS 1900 Link_H-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3819.60	-53.55	-47.15	-13.00	-40.55	-6.40	Peak

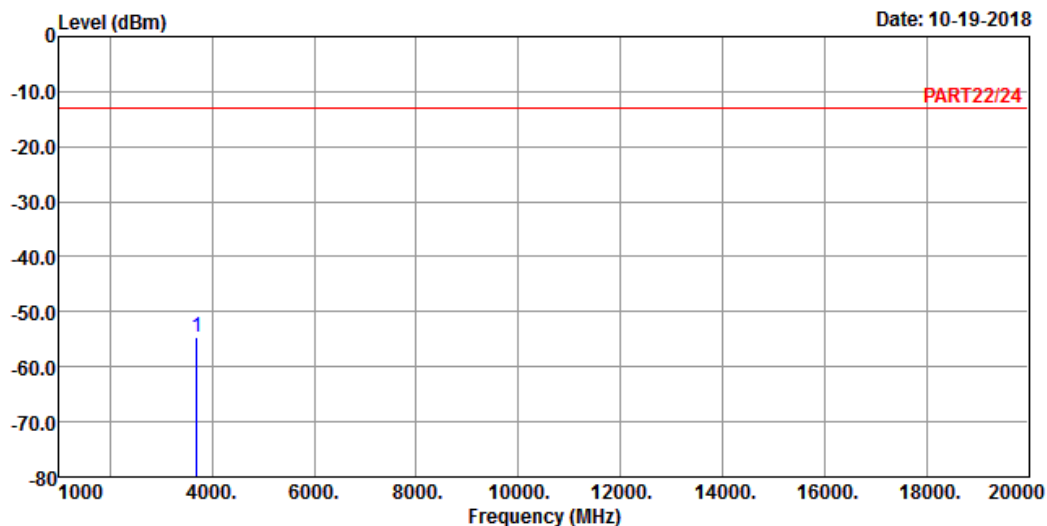
EDGE:
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : EDGE 1900 Link_L-CH
 Tested by: Thomas Wei

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

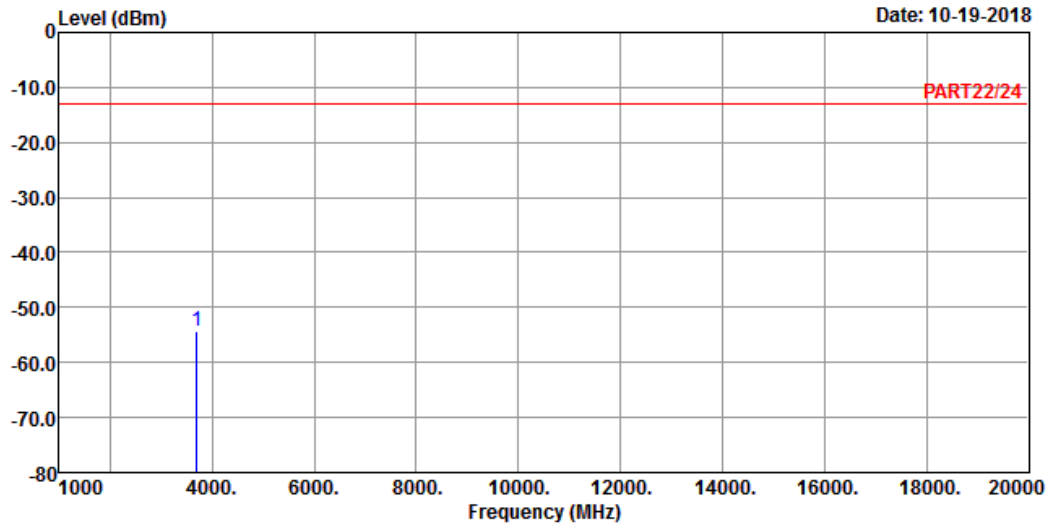
1 pp 3700.40 -54.50 -47.57 -13.00 -41.50 -6.93 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : EDGE 1900 Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3700.40	-54.33	-47.40	-13.00	-41.33	-6.93	Peak

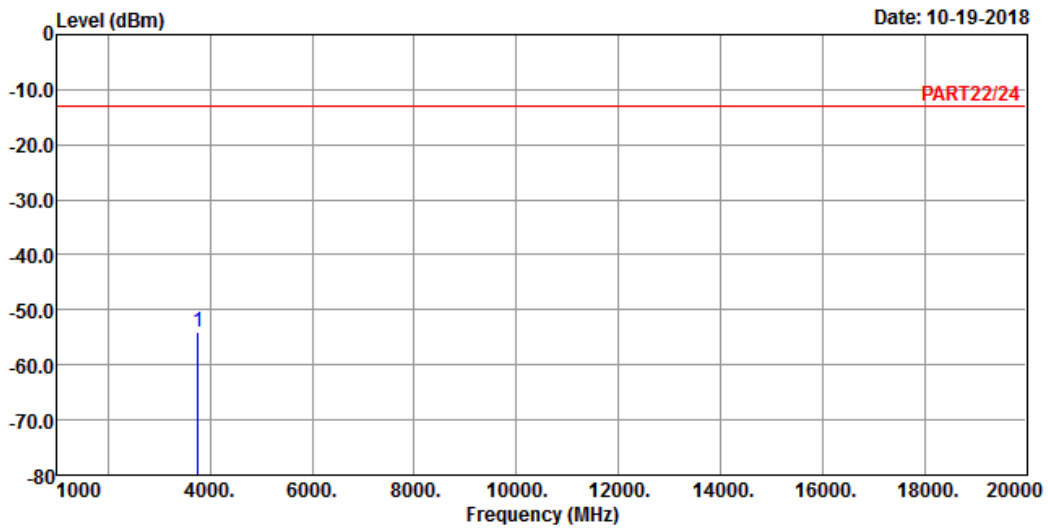
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Date: 10-19-2018

Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : EDGE 1900 Link_M-CH
 Tested by: Thomas Wei

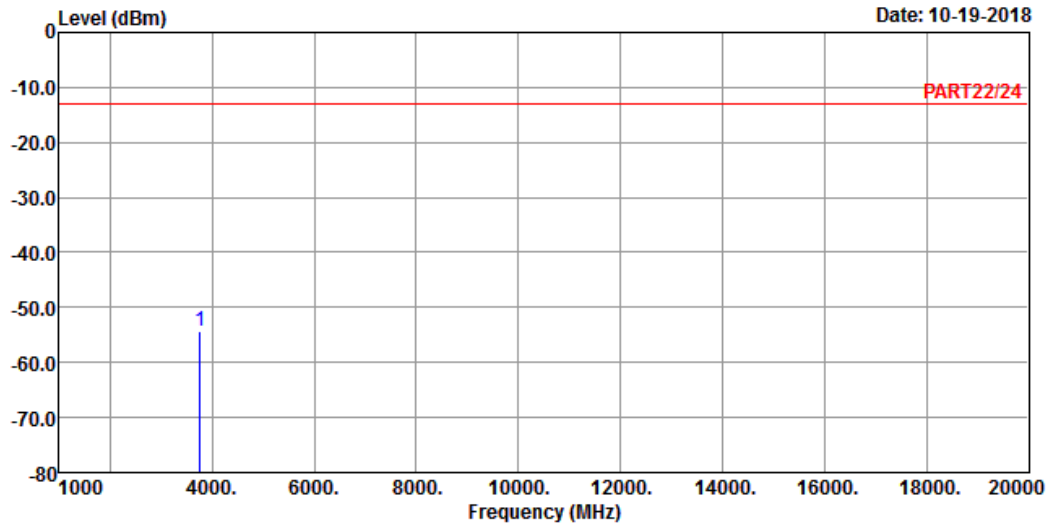
Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3760.00	-54.04	-47.39	-13.00	-41.04	-6.65	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : EDGE 1900 Link_M-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3760.00	-54.46	-47.81	-13.00	-41.46	-6.65	Peak

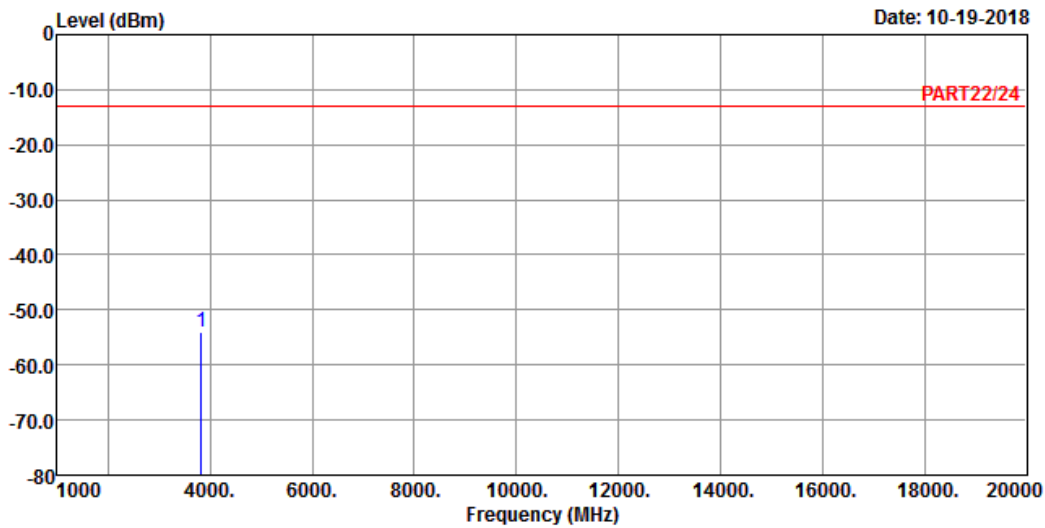
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Date: 10-19-2018

Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : EDGE 1900 Link_H-CH
 Tested by: Thomas Wei

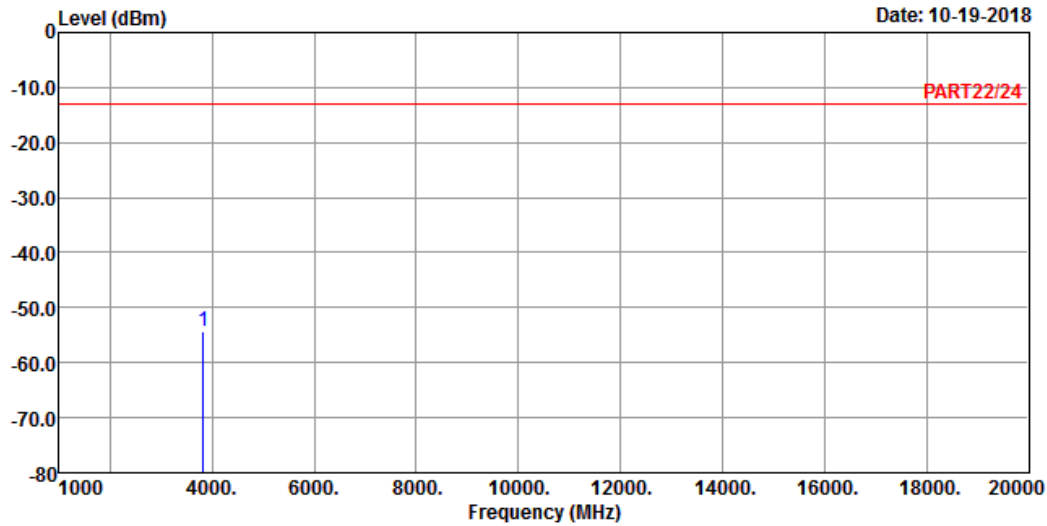
	Read	Limit	Over			
Freq	Level	Level	Line	Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3819.60	-54.16	-47.76	-13.00	-41.16	-6.40	Peak



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A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : EDGE 1900 Link_H-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3819.60	-54.32	-47.92	-13.00	-41.32	-6.40	Peak

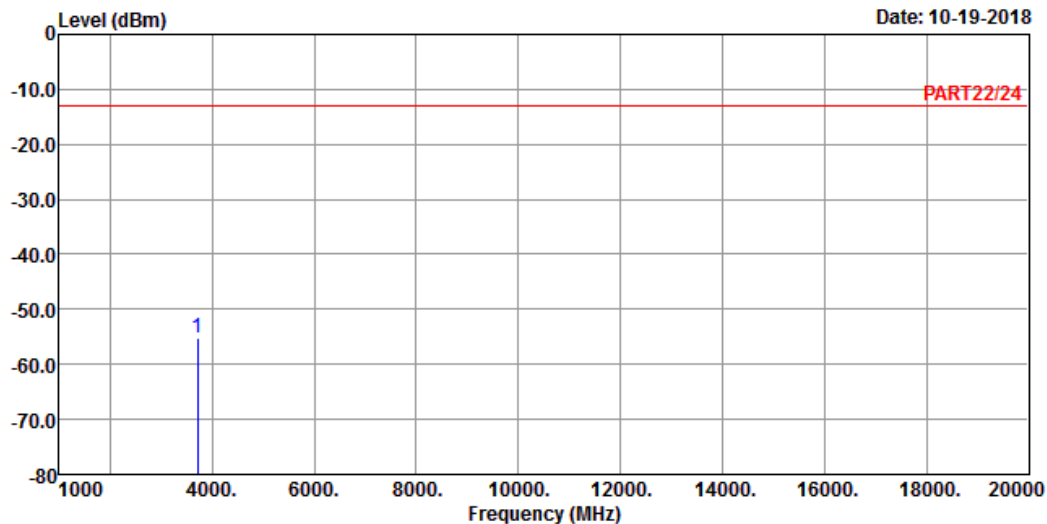
WCDMA:
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
Condition: PART22/24 HORIZONTAL
Remark : WCDMA Band 2 Link_L-CH
Tested by: Thomas Wei

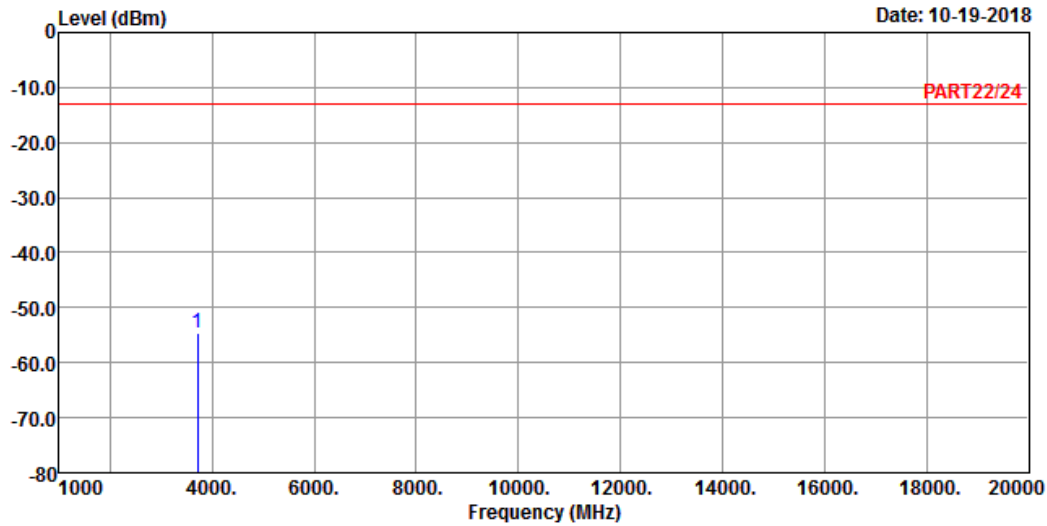
Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3704.80	-55.35	-48.42	-13.00	-42.35	-6.93	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : WCDMA Band 2 Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3704.80	-54.71	-47.78	-13.00	-41.71	-6.93	Peak

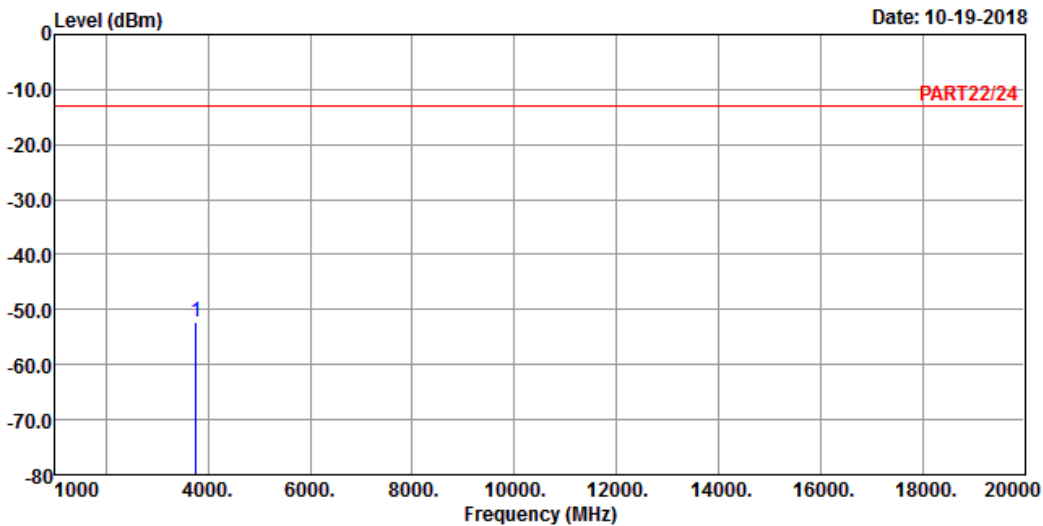
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : WCDMA Band 2 Link_M-CH
 Tested by: Thomas Wei

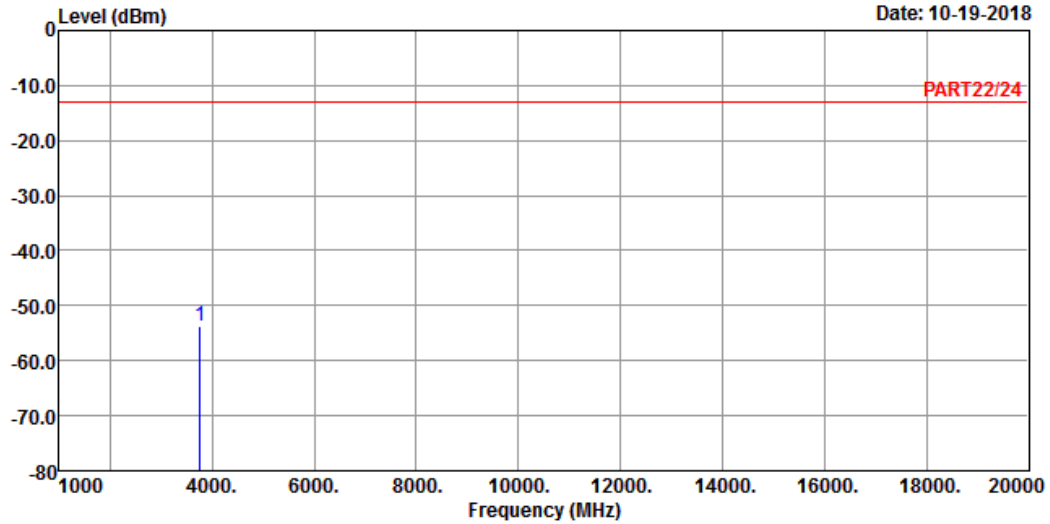
Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3760.00	-52.16	-45.51	-13.00	-39.16	-6.65	Peak



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A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : WCDMA Band 2 Link_M-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3760.00	-53.81	-47.16	-13.00	-40.81	-6.65	Peak

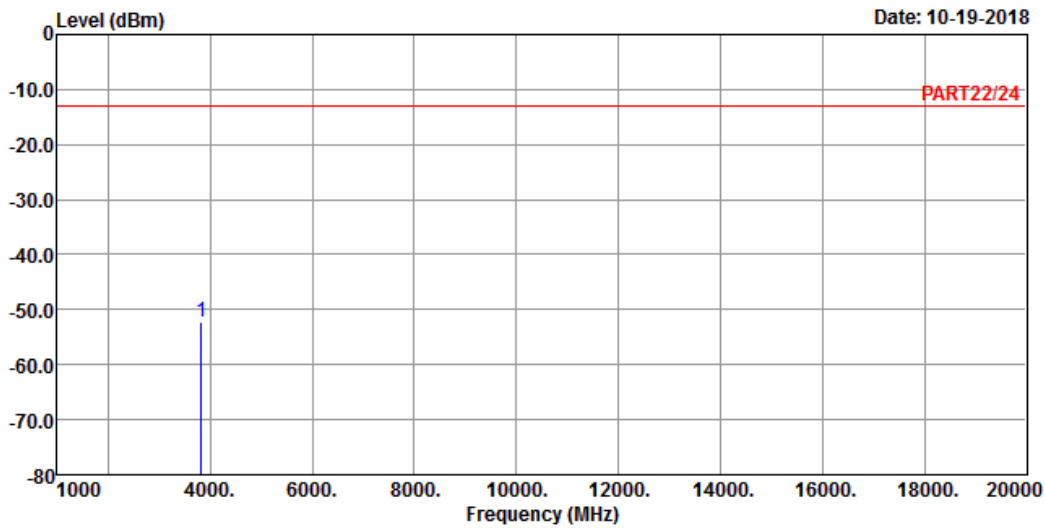
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : WCDMA Band 2 Link_H-CH
 Tested by: Thomas Wei

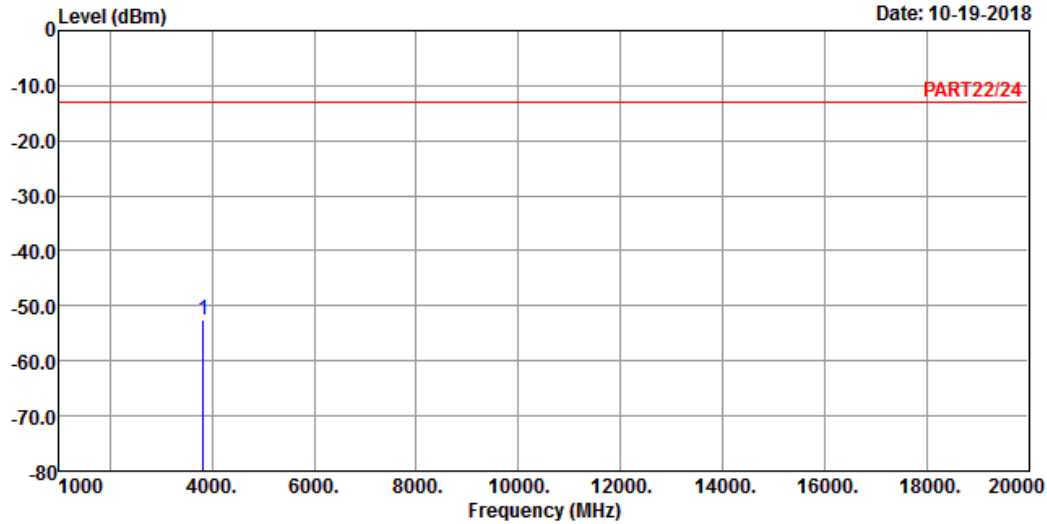
	Read	Limit	Over			
Freq	Level	Level	Line	Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3815.20	-52.11	-45.71	-13.00	-39.11	-6.40	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : WCDMA Band 2 Link_H-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3815.20	-52.61	-46.21	-13.00	-39.61	-6.40	Peak

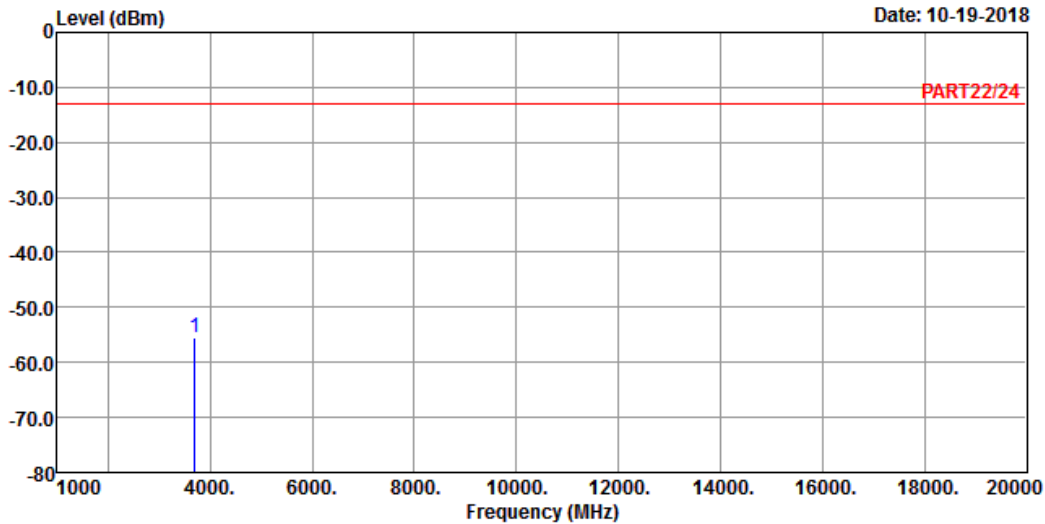
CDMA:
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
Condition: PART22/24 HORIZONTAL
Remark : CDMA BC1 Link_L-CH
Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3702.50	-55.44	-48.51	-13.00	-42.44	-6.93	Peak

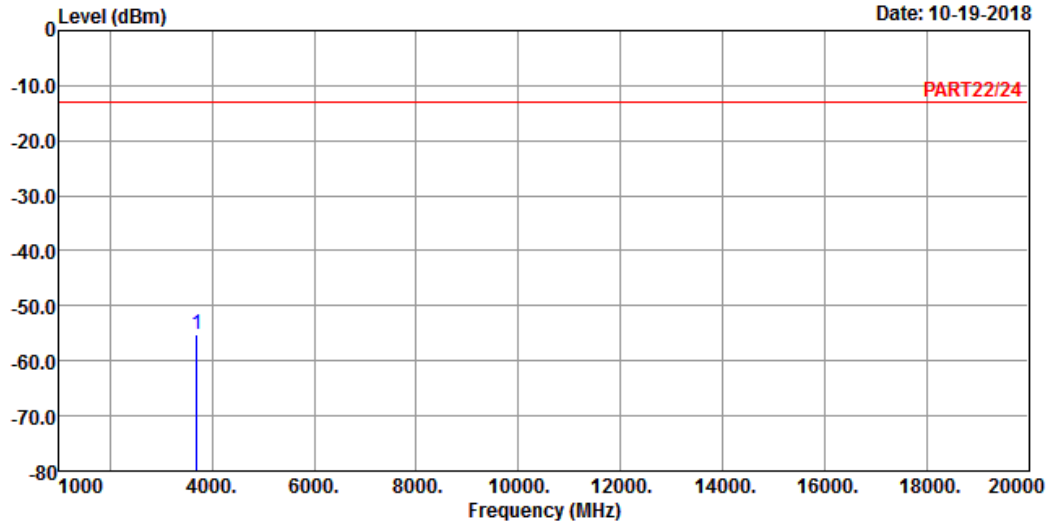


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2

Date: 10-19-2018



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : CDMA BC1 Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3702.50	-55.14	-48.21	-13.00	-42.14	-6.93	Peak

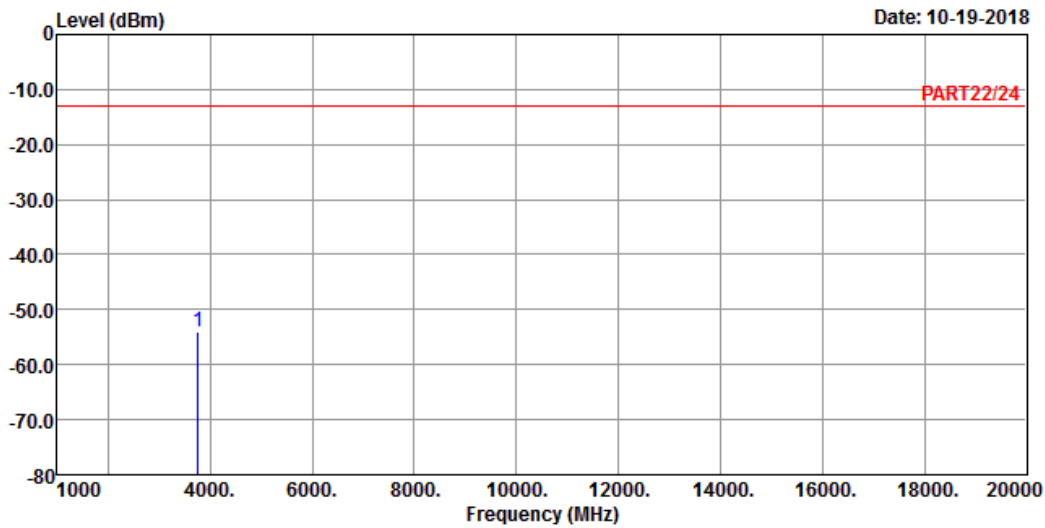
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : CDMA BC1 Link_M-CH
 Tested by: Thomas Wei

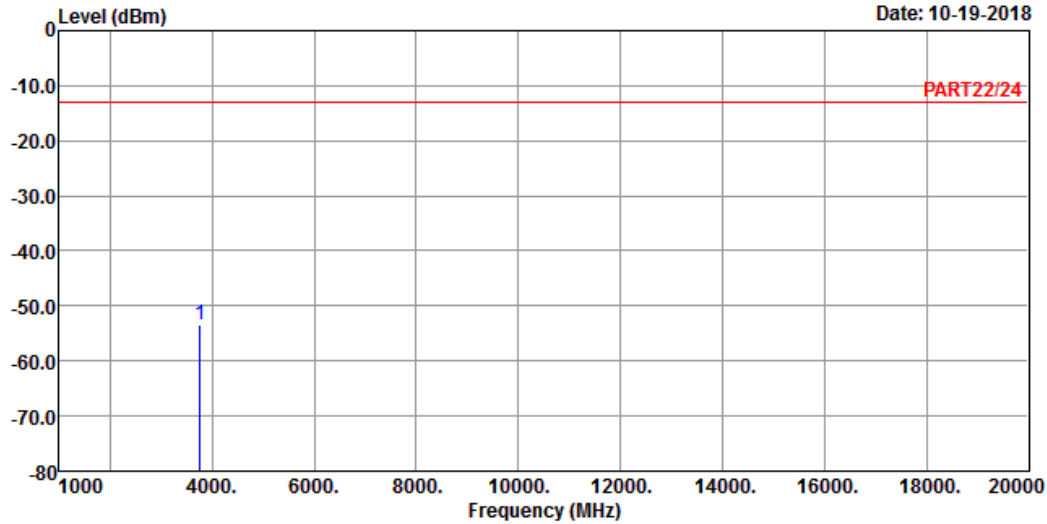
Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3760.00	-54.03	-47.38	-13.00	-41.03	-6.65	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : CDMA BC1 Link_M-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3760.00	-53.45	-46.80	-13.00	-40.45	-6.65	Peak

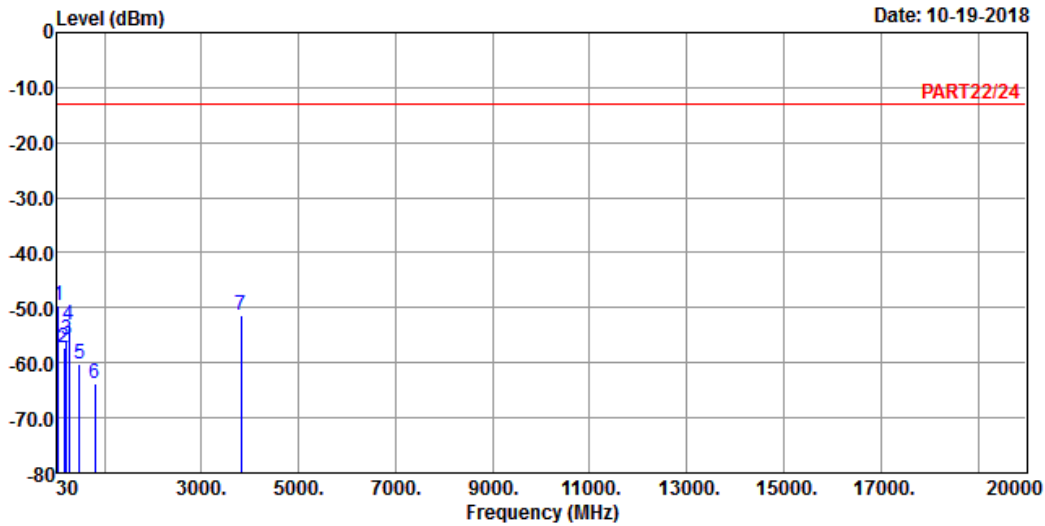
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remark : CDMA BC1 Link_H-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit	Over	Limit Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	pp	44.55	-49.69	-47.70	-13.00	-36.69	-1.99 Peak
2		168.71	-57.31	-51.85	-13.00	-44.31	-5.46 Peak
3		213.33	-55.74	-48.27	-13.00	-42.74	-7.47 Peak
4		273.47	-53.09	-46.62	-13.00	-40.09	-6.47 Peak
5		487.84	-60.25	-55.40	-13.00	-47.25	-4.85 Peak
6		808.91	-63.81	-64.47	-13.00	-50.81	0.66 Peak
7		3817.50	-51.32	-44.92	-13.00	-38.32	-6.40 Peak

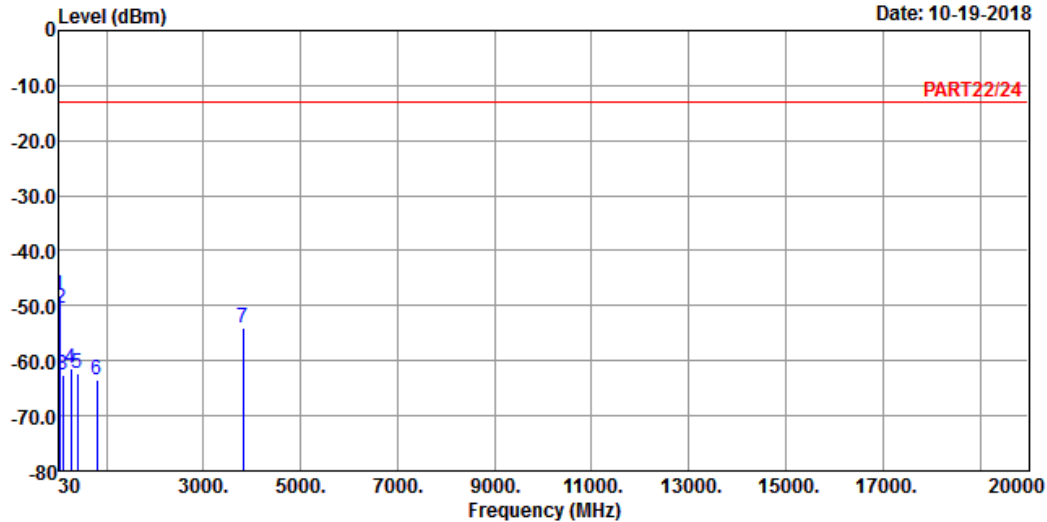


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6

Date: 10-19-2018



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : CDMA BC1 Link_H-CH
 Tested by: Thomas Wei

	Read	Limit	Over			
Freq	Level	Level	Line	Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp	31.94	-48.13	-47.53	-13.00	-35.13	-0.60 Peak
2	43.58	-50.38	-48.91	-13.00	-37.38	-1.47 Peak
3	96.93	-62.52	-51.79	-13.00	-49.52	-10.73 Peak
4	270.56	-61.48	-55.07	-13.00	-48.48	-6.41 Peak
5	398.60	-62.22	-56.27	-13.00	-49.22	-5.95 Peak
6	800.18	-63.43	-64.17	-13.00	-50.43	0.74 Peak
7	3817.50	-54.16	-47.76	-13.00	-41.16	-6.40 Peak

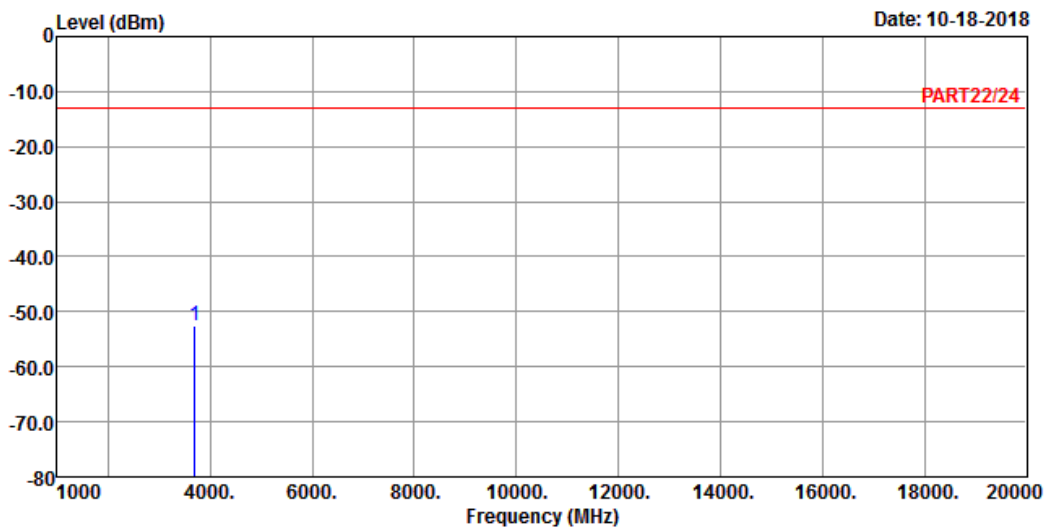
LTE Band 2
 Channel Bandwidth: 1.4 MHz / QPSK
 Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 2 QPSK_1.4M Link_L-CH
 Tested by: Thomas Wei

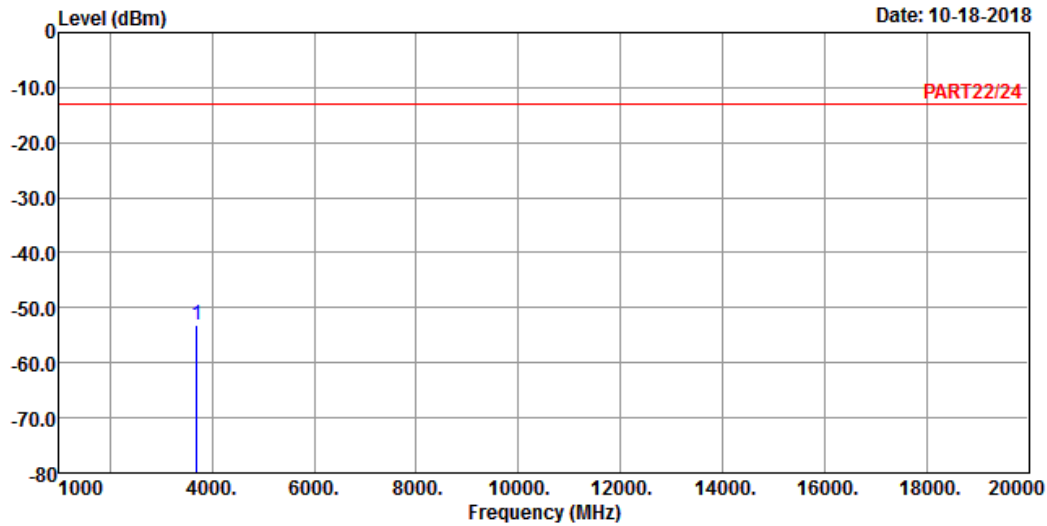
Read	Limit	Over				
Freq	Level	Level	Line	Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3701.40	-52.42	-45.49	-13.00	-39.42	-6.93	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : LTE Band 2 QPSK_1.4M Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3701.40	-53.19	-46.26	-13.00	-40.19	-6.93	Peak

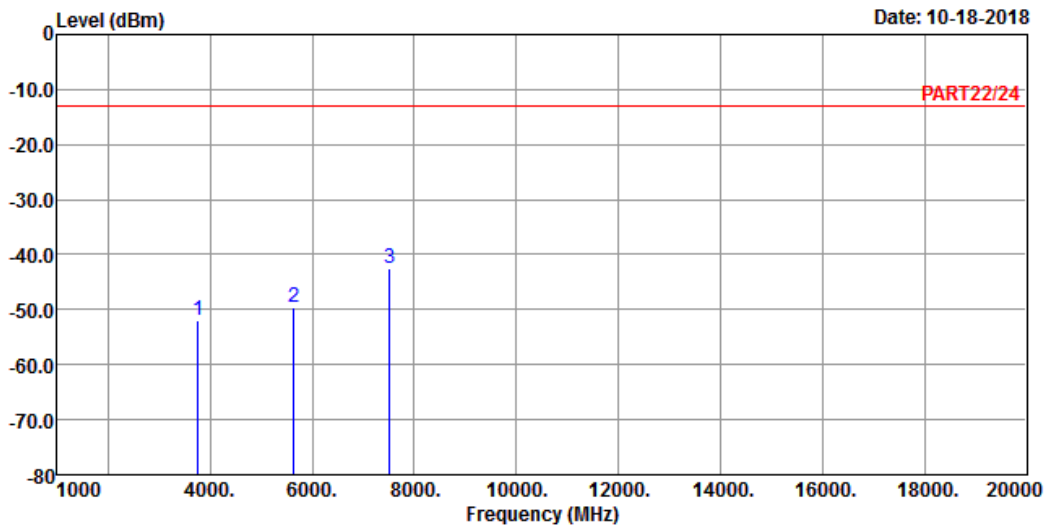
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 2 QPSK_1.4M Link_M-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	3760.00	-51.86	-45.21	-13.00	-38.86	-6.65	Peak
2	5640.00	-49.60	-47.74	-13.00	-36.60	-1.86	Peak
3 pp	7520.00	-42.40	-46.61	-13.00	-29.40	4.21	Peak

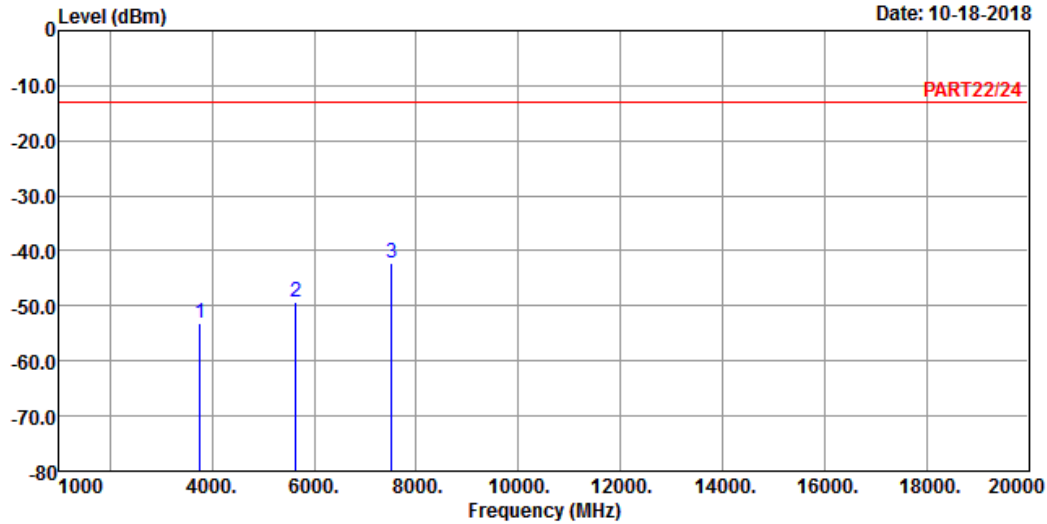


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2

Date: 10-18-2018



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 2 QPSK_1.4M Link_M-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	3760.00	-53.18	-46.53	-13.00	-40.18	-6.65	Peak
2	5640.00	-49.42	-47.56	-13.00	-36.42	-1.86	Peak
3 pp	7520.00	-42.26	-46.47	-13.00	-29.26	4.21	Peak

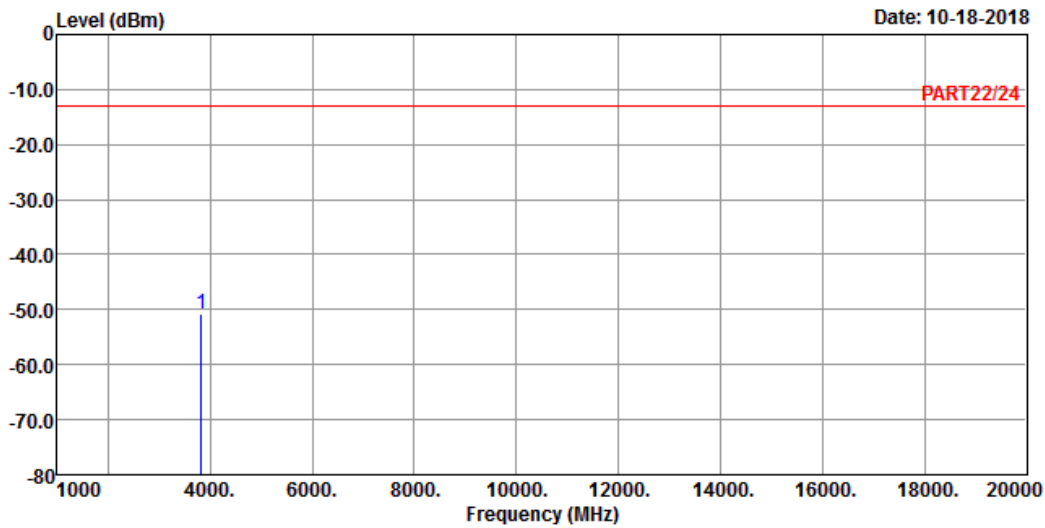
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 2 QPSK_1.4M Link_H-CH
 Tested by: Thomas Wei

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

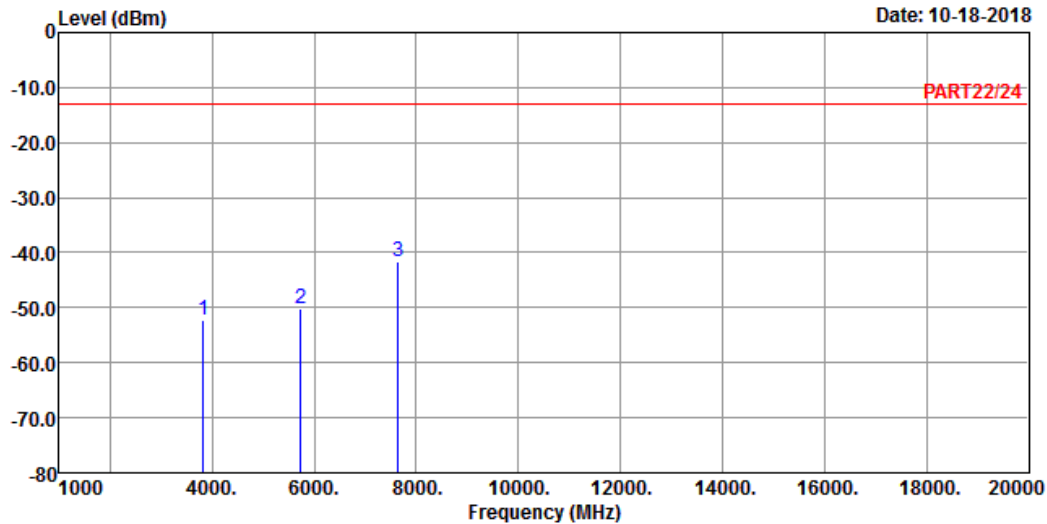
1 pp 3818.60 -50.70 -44.30 -13.00 -37.70 -6.40 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 2 QPSK_1.4M Link_H-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	3818.60	-52.33	-45.93	-13.00	-39.33	-6.40	Peak
2	5727.90	-50.26	-48.61	-13.00	-37.26	-1.65	Peak
3	7637.20	-41.77	-46.32	-13.00	-28.77	4.55	Peak

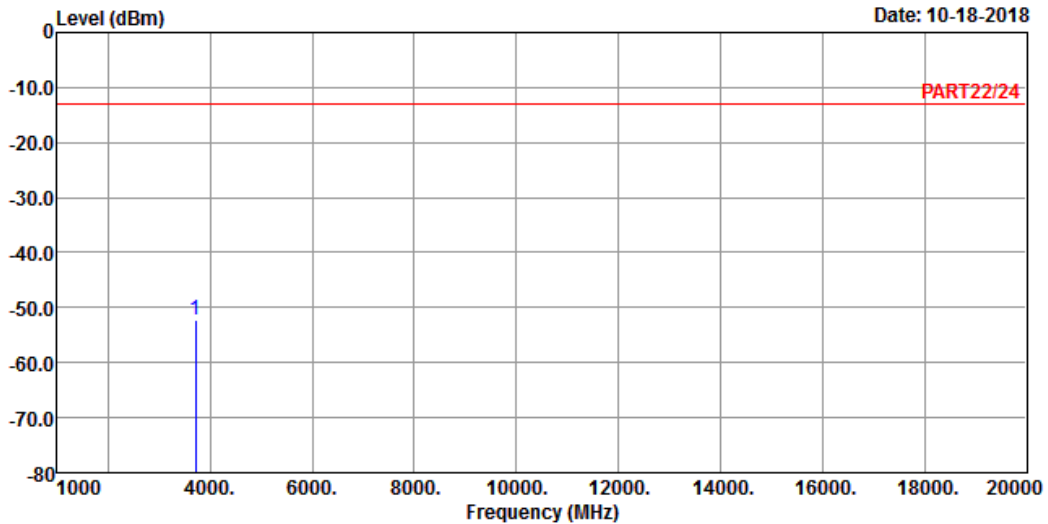
Channel Bandwidth: 5 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
Condition: PART22/24 HORIZONTAL
Remak : LTE Band 2 QPSK_5M Link_L-CH
Tested by: Thomas Wei

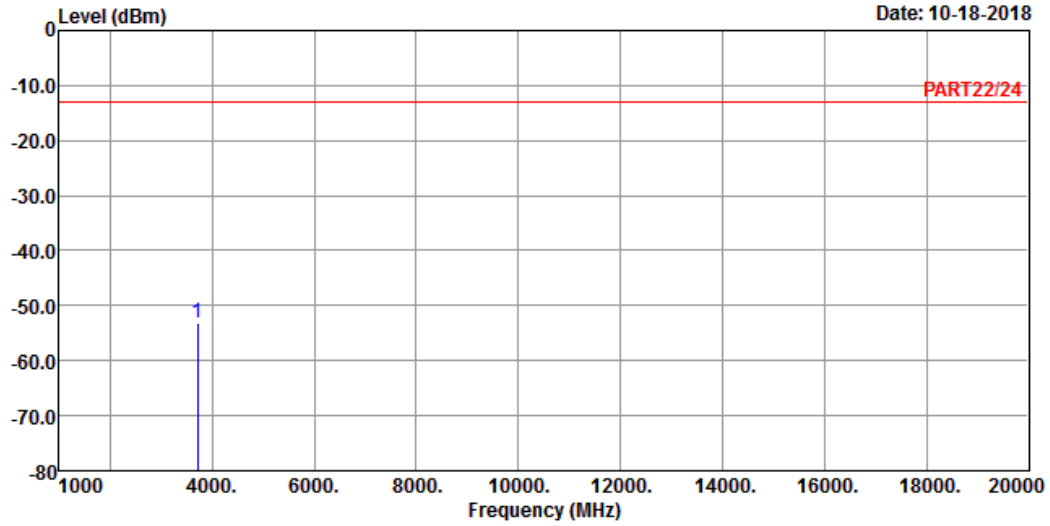
Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3705.00	-52.21	-45.28	-13.00	-39.21	-6.93	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 2 QPSK_5M Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3705.00	-53.11	-46.18	-13.00	-40.11	-6.93	Peak

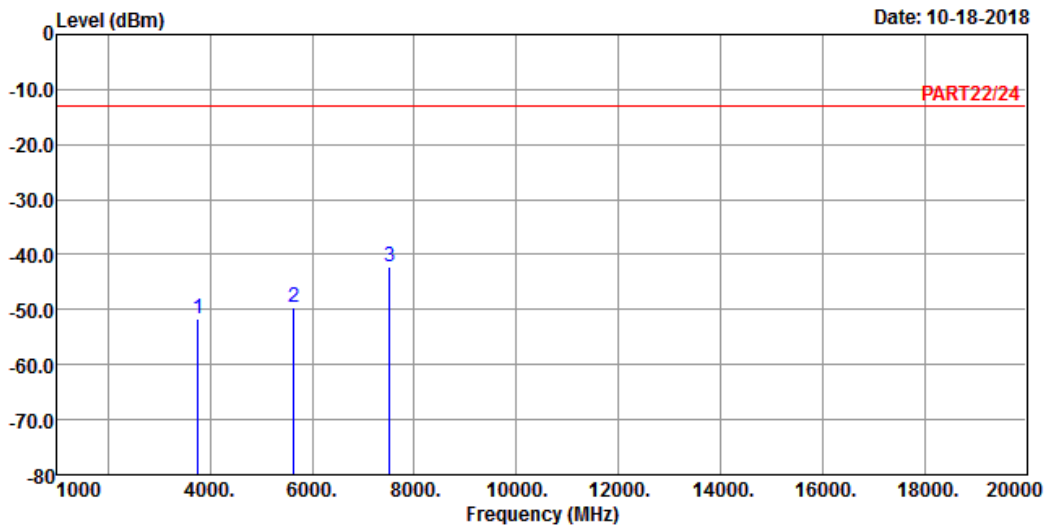
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 2 QPSK_5M Link_M-CH
 Tested by: Thomas Wei

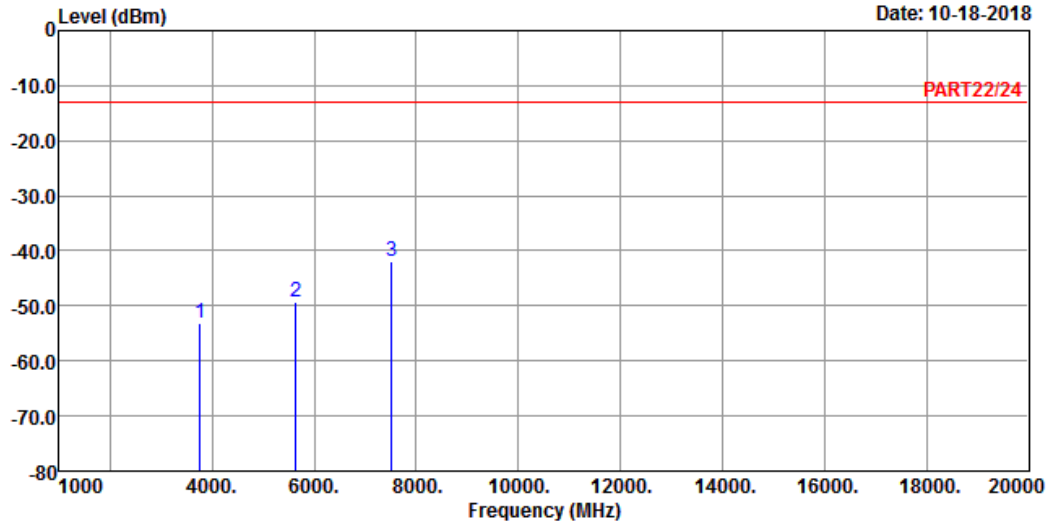
	Freq	Level	Read Level	Limit	Over		Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	3760.00	-51.77	-45.12	-13.00	-38.77	-6.65	Peak
2	5640.00	-49.67	-47.81	-13.00	-36.67	-1.86	Peak
3 pp	7520.00	-42.13	-46.34	-13.00	-29.13	4.21	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 2 QPSK_5M Link_M-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	3760.00	-53.09	-46.44	-13.00	-40.09	-6.65	Peak
2	5640.00	-49.31	-47.45	-13.00	-36.31	-1.86	Peak
3	7520.00	-41.95	-46.16	-13.00	-28.95	4.21	Peak

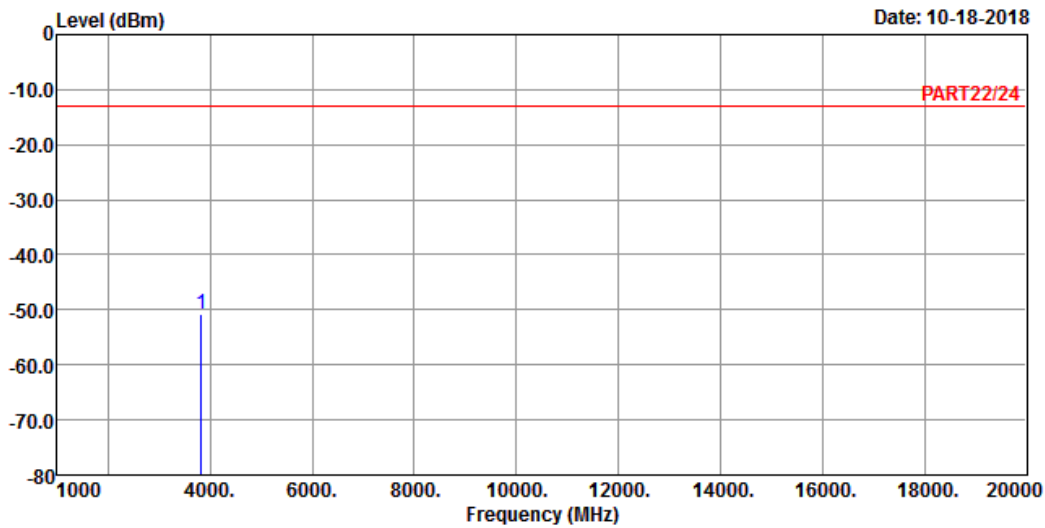
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 2 QPSK_5M Link_H-CH
 Tested by: Thomas Wei

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

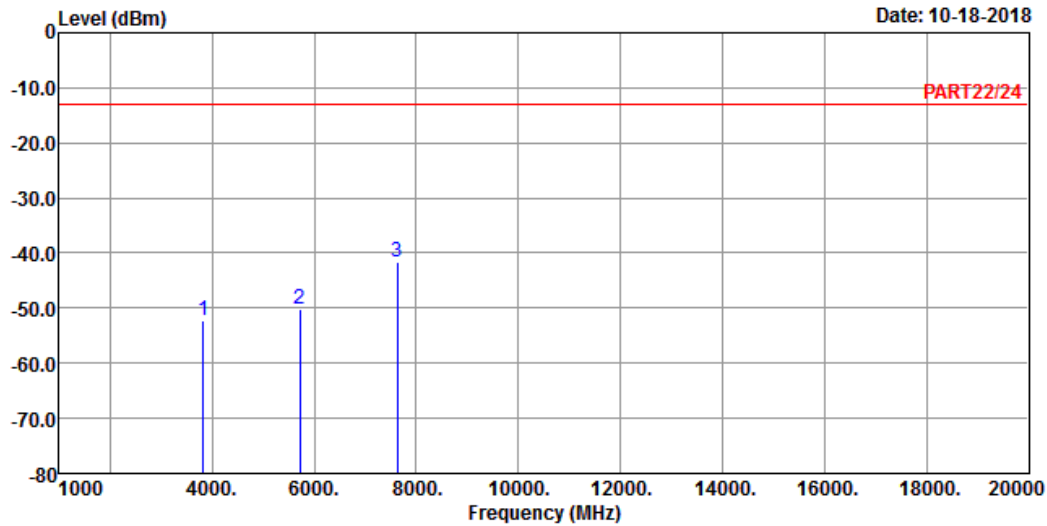
1 pp 3815.00 -50.76 -44.36 -13.00 -37.76 -6.40 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 2 QPSK_5M Link_H-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	3815.00	-52.29	-45.89	-13.00	-39.29	-6.40	Peak
2	5722.50	-50.22	-48.53	-13.00	-37.22	-1.69	Peak
3 pp	7630.00	-41.49	-46.00	-13.00	-28.49	4.51	Peak

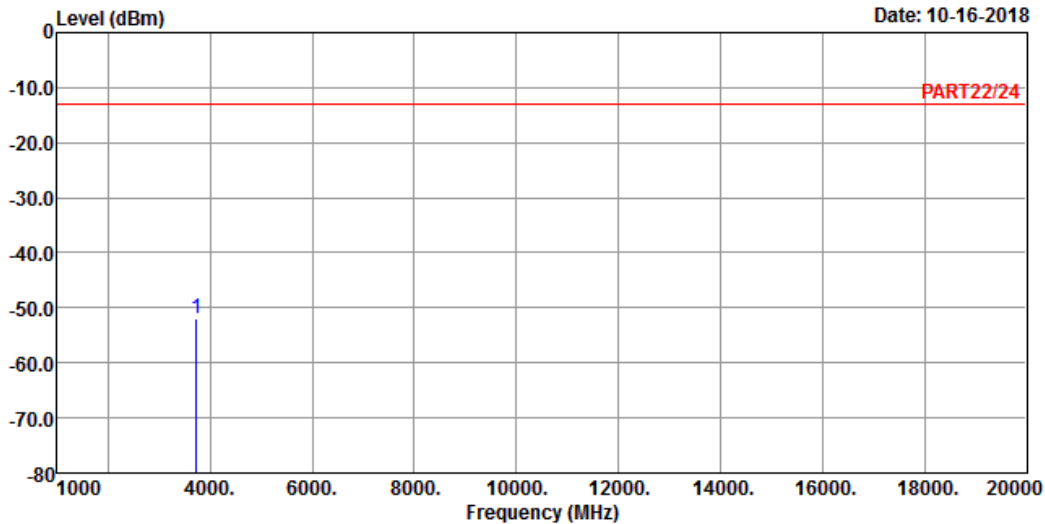
Channel Bandwidth: 20 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
Condition: PART22/24 HORIZONTAL
Remak : LTE Band 2 QPSK_20M Link_L-CH
Tested by: Thomas Wei

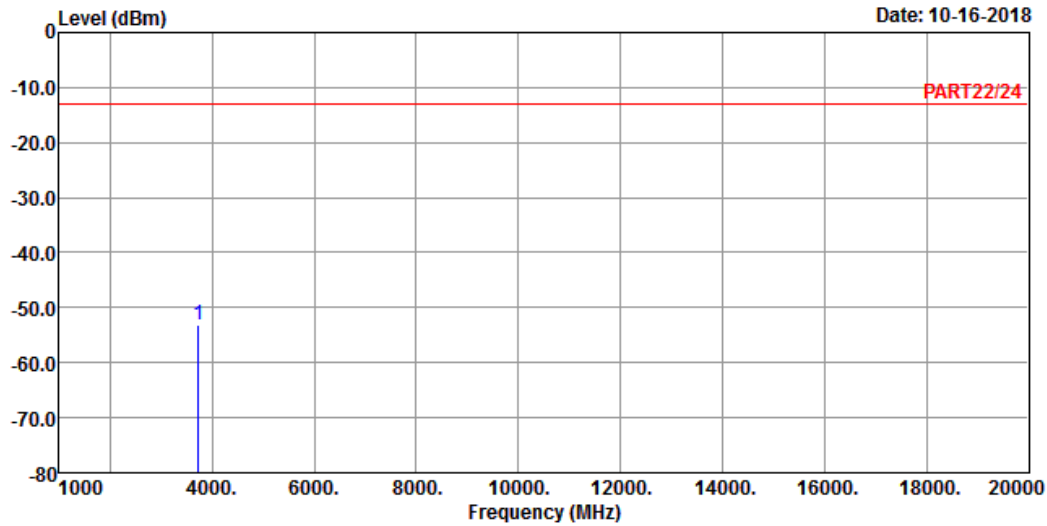
Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3720.00	-52.09	-45.27	-13.00	-39.09	-6.82	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 2 QPSK_20M Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3720.00	-53.19	-46.37	-13.00	-40.19	-6.82	Peak

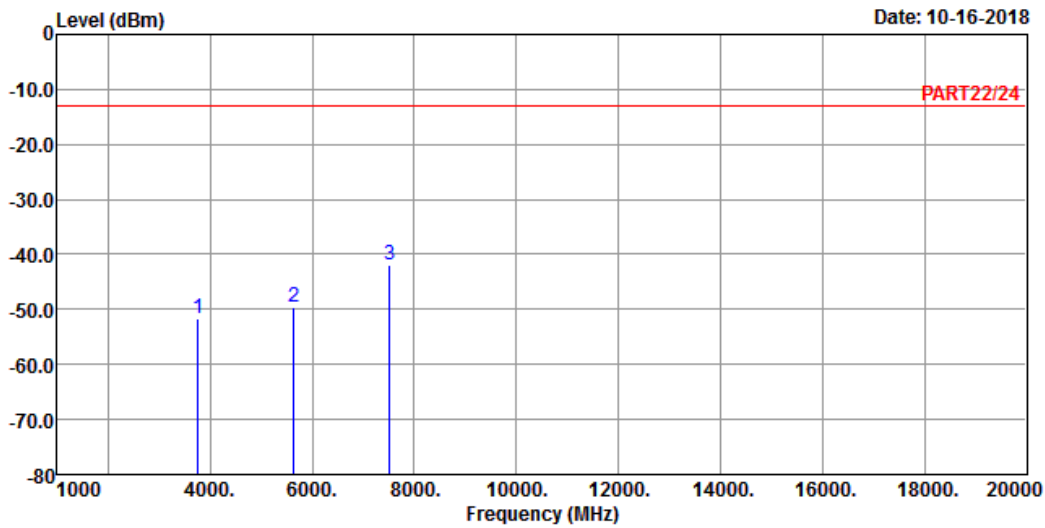
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 2 QPSK_20M Link_M-CH
 Tested by: Thomas Wei

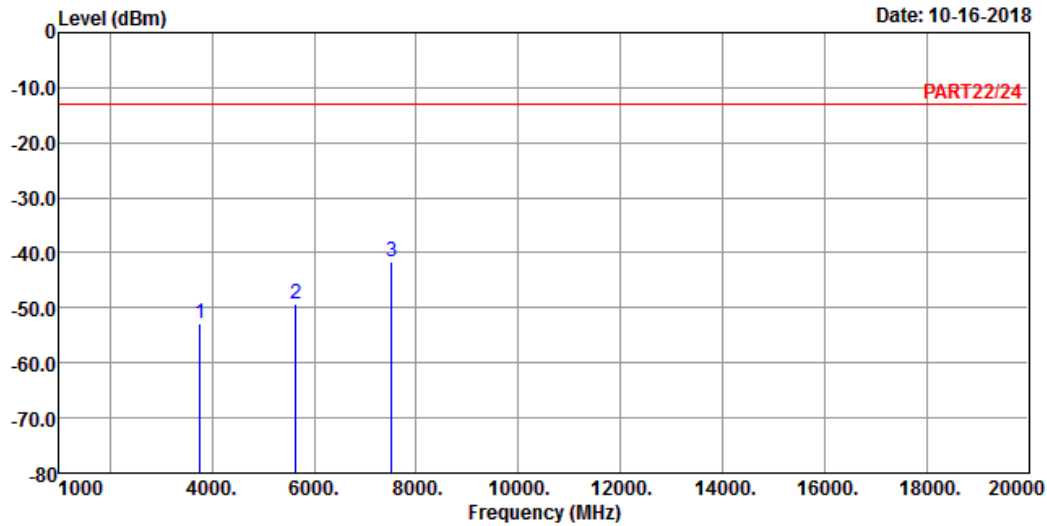
	Read	Limit	Over				
Freq	Level	Level	Line	Limit	Factor	Remark	
MHz	dBm	dBm	dBm	dB	dB		
1	3760.00	-51.59	-44.94	-13.00	-38.59	-6.65	Peak
2	5640.00	-49.73	-47.87	-13.00	-36.73	-1.86	Peak
3 pp	7520.00	-41.95	-46.16	-13.00	-28.95	4.21	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 2 QPSK_20M Link_M-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	3760.00	-52.94	-46.29	-13.00	-39.94	-6.65	Peak
2	5640.00	-49.18	-47.32	-13.00	-36.18	-1.86	Peak
3	7520.00	-41.62	-45.83	-13.00	-28.62	4.21	Peak

High Channel

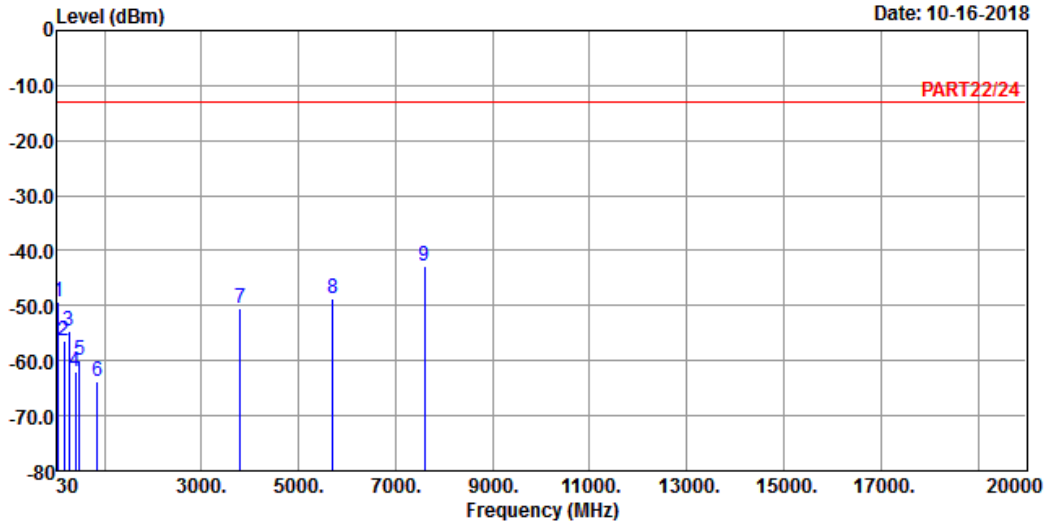


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5

Date: 10-16-2018



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 2 QPSK_20M Link_H-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	43.58	-49.33	-47.86	-13.00	-36.33	-1.47	Peak
2	171.62	-56.40	-50.53	-13.00	-43.40	-5.87	Peak
3	272.50	-54.65	-48.20	-13.00	-41.65	-6.45	Peak
4	395.69	-62.04	-56.07	-13.00	-49.04	-5.97	Peak
5	488.81	-59.99	-55.16	-13.00	-46.99	-4.83	Peak
6	860.32	-63.69	-64.04	-13.00	-50.69	0.35	Peak
7	3800.00	-50.42	-43.99	-13.00	-37.42	-6.43	Peak
8	5700.00	-48.84	-47.11	-13.00	-35.84	-1.73	Peak
9 pp	7600.00	-42.91	-47.38	-13.00	-29.91	4.47	Peak

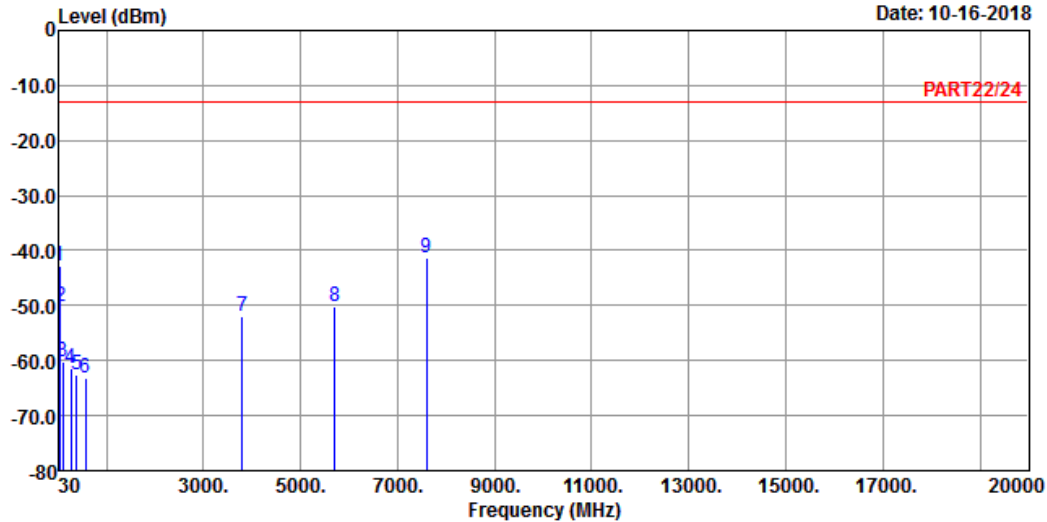


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6

Date: 10-16-2018



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 2 QPSK_20M Link_H-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	30.00	-42.75	-43.13	-13.00	-29.75	0.38	Peak
2	44.55	-50.33	-48.34	-13.00	-37.33	-1.99	Peak
3	99.84	-60.33	-49.77	-13.00	-47.33	-10.56	Peak
4	275.41	-61.51	-55.00	-13.00	-48.51	-6.51	Peak
5	393.75	-62.59	-56.61	-13.00	-49.59	-5.98	Peak
6	573.20	-63.18	-61.30	-13.00	-50.18	-1.88	Peak
7	3800.00	-52.06	-45.63	-13.00	-39.06	-6.43	Peak
8	5700.00	-50.16	-48.43	-13.00	-37.16	-1.73	Peak
9 pp	7600.00	-41.21	-45.68	-13.00	-28.21	4.47	Peak

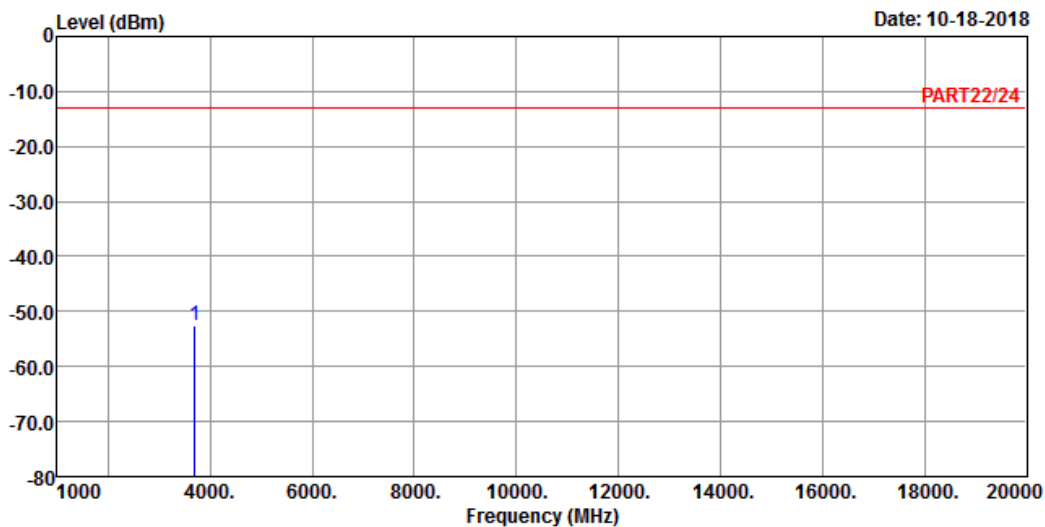
LTE Band 25
 Channel Bandwidth: 1.4 MHz / QPSK
 Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 25 QPSK_1.4M Link_L-CH
 Tested by: Thomas Wei

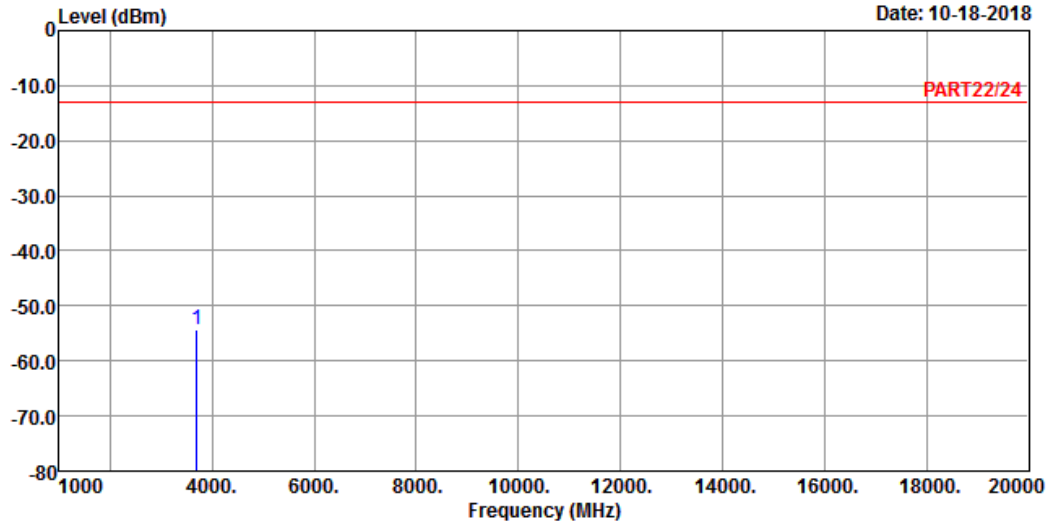
Freq	Level	Read Level	Limit	Over	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3701.40	-52.66	-45.73	-13.00	-39.66	-6.93	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remark : LTE Band 25 QPSK_1.4M Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3701.40	-54.36	-47.43	-13.00	-41.36	-6.93	Peak

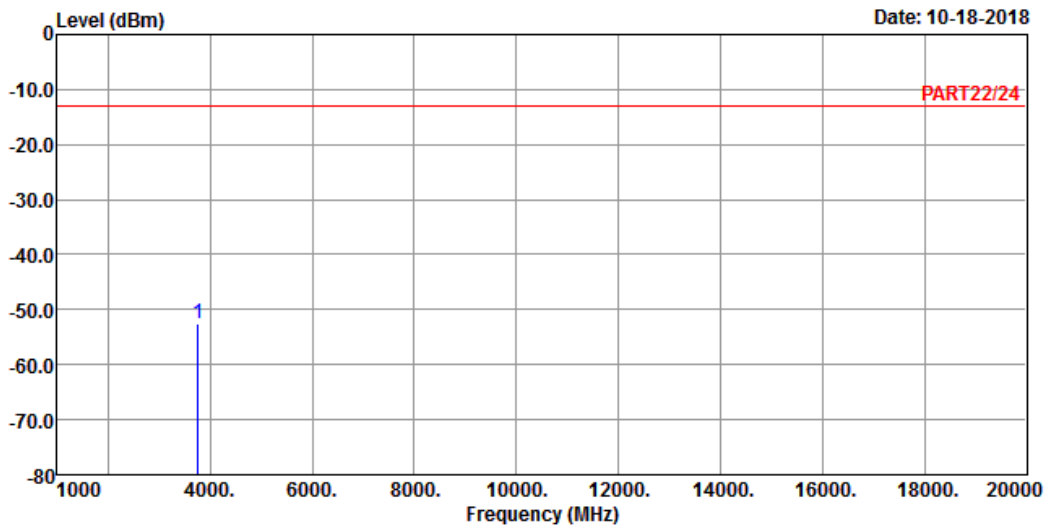
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 25 QPSK_1.4M Link_M-CH
 Tested by: Thomas Wei

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

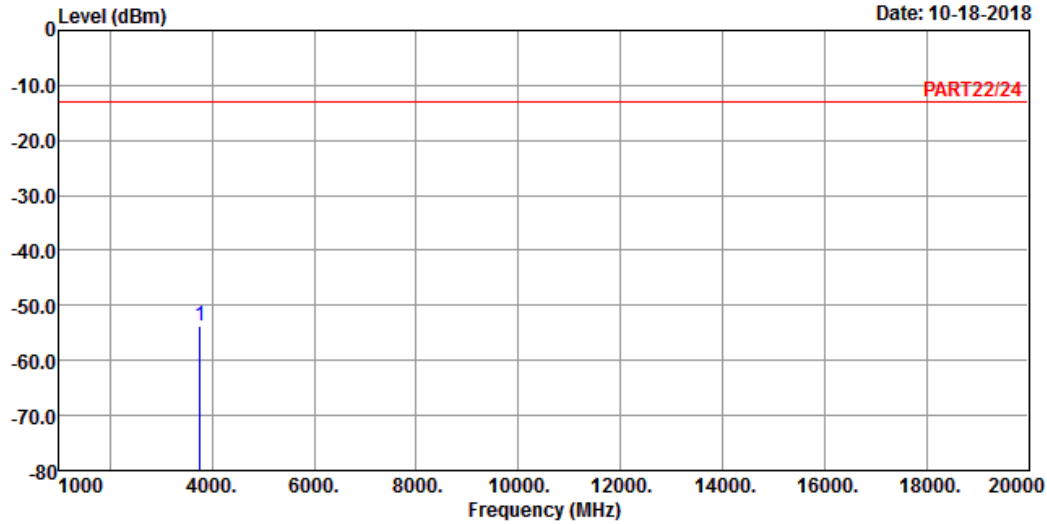
1 pp 3765.00 -52.43 -45.83 -13.00 -39.43 -6.60 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 25 QPSK_1.4M Link_M-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3765.00	-53.83	-47.23	-13.00	-40.83	-6.60	Peak

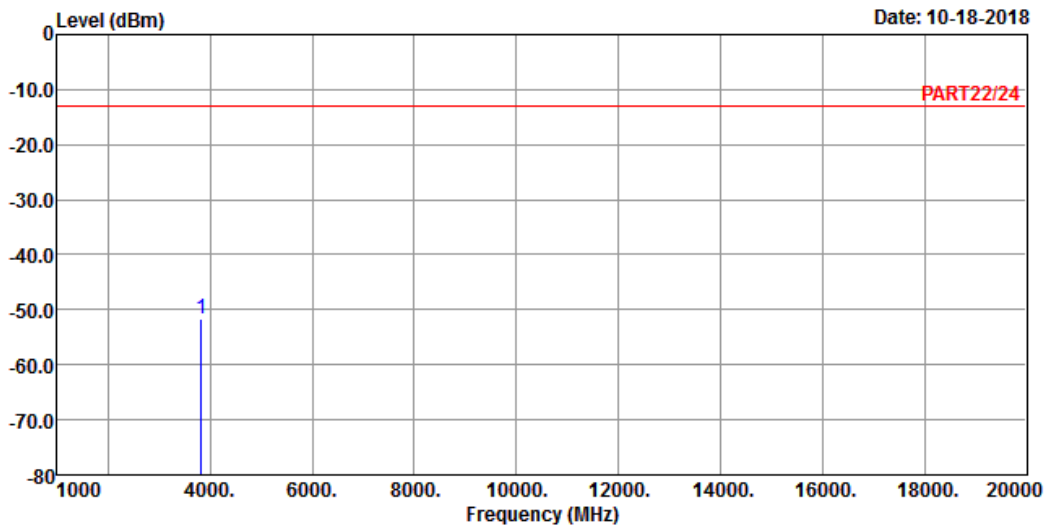
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 25 QPSK_1.4M Link_H-CH
 Tested by: Thomas Wei

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

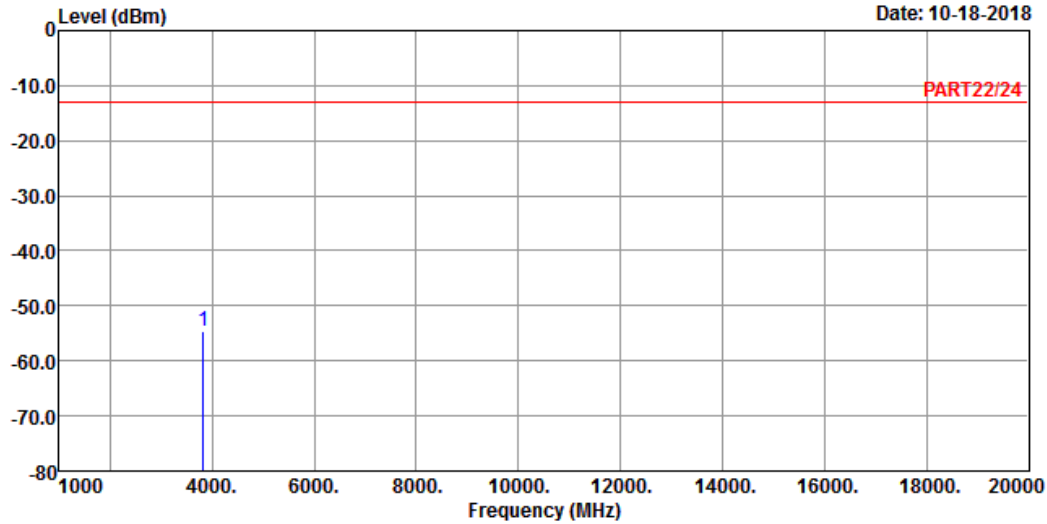
1 pp 3828.60 -51.79 -45.42 -13.00 -38.79 -6.37 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 25 QPSK_1.4M Link_H-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3828.60	-54.49	-48.12	-13.00	-41.49	-6.37	Peak

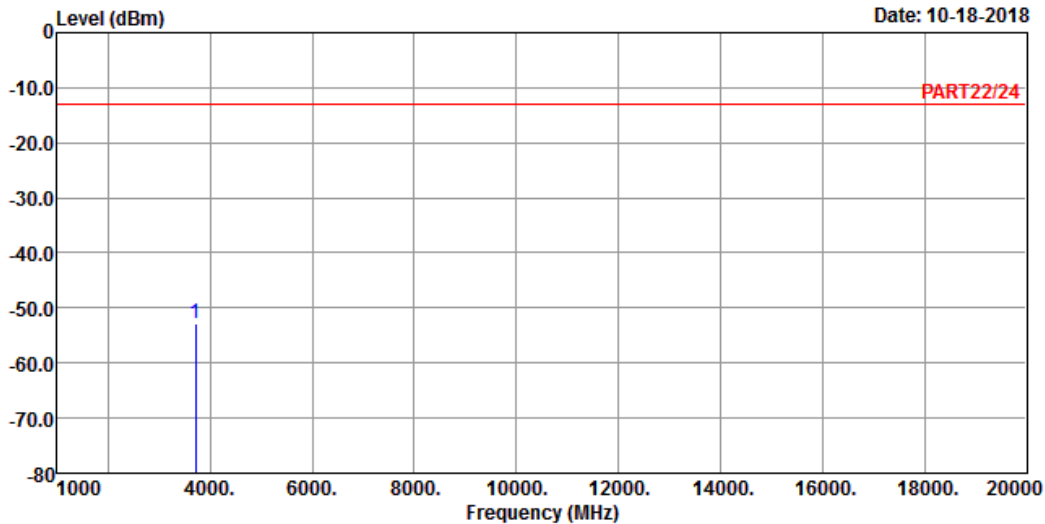
Channel Bandwidth: 5 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
Condition: PART22/24 HORIZONTAL
Remak : LTE Band 25 QPSK_5M Link_L-CH
Tested by: Thomas Wei

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

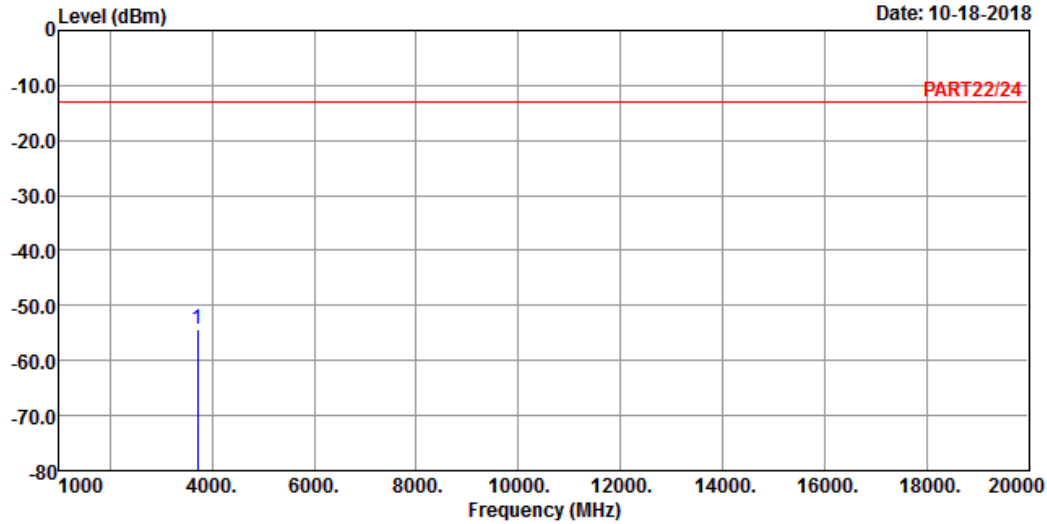
1 pp 3705.00 -52.71 -45.78 -13.00 -39.71 -6.93 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 25 QPSK_5M Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3705.00	-54.41	-47.48	-13.00	-41.41	-6.93	Peak

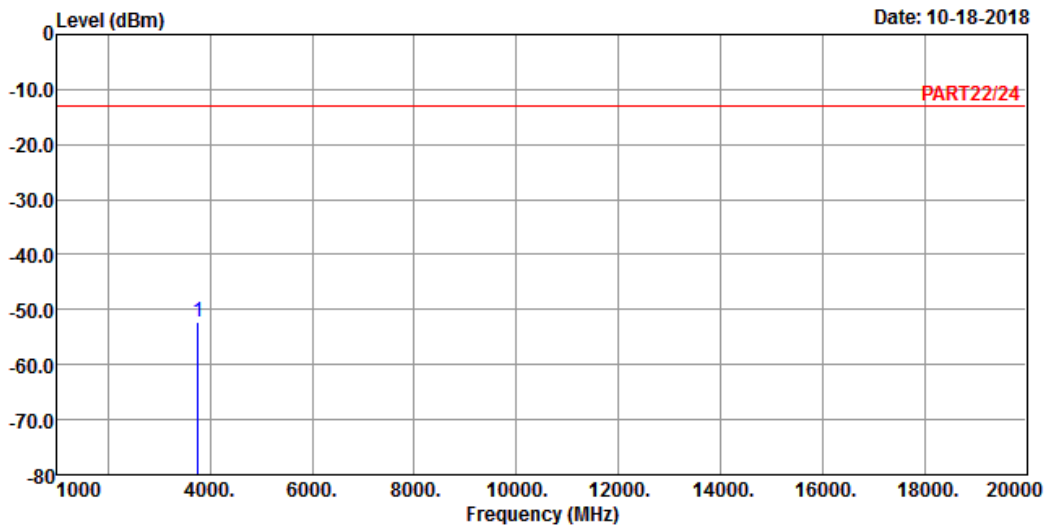
Middle Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 25 QPSK_5M Link_M-CH
 Tested by: Thomas Wei

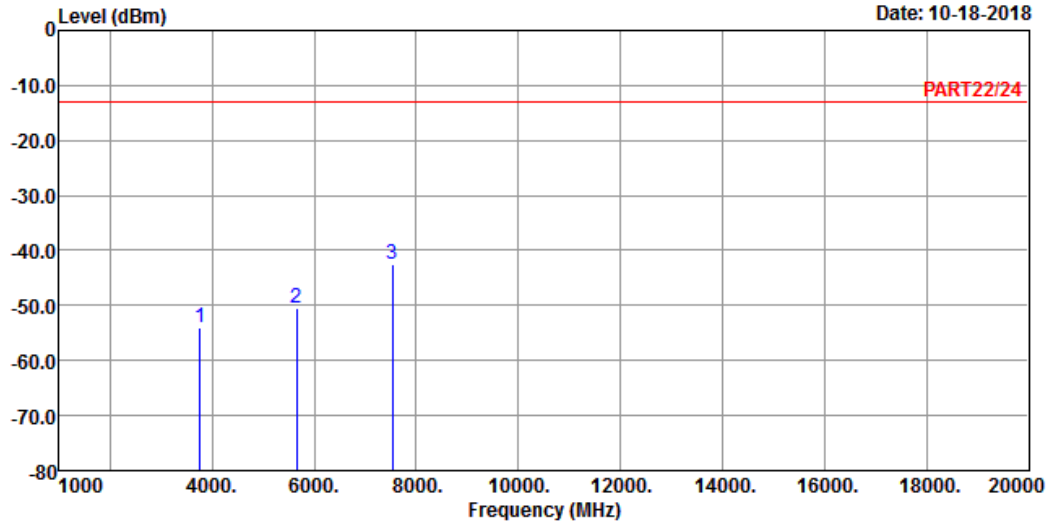
	Read	Limit	Over		
Freq	Level	Level	Line	Limit	Factor Remark
MHz	dBm	dBm	dBm	dB	dB
1 pp 3765.00	-52.34	-45.74	-13.00	-39.34	-6.60 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 25 QPSK_5M Link_M-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	3765.00	-53.91	-47.31	-13.00	-40.91	-6.60	Peak
2	5647.50	-50.49	-48.66	-13.00	-37.49	-1.83	Peak
3	7530.00	-42.36	-46.64	-13.00	-29.36	4.28	Peak

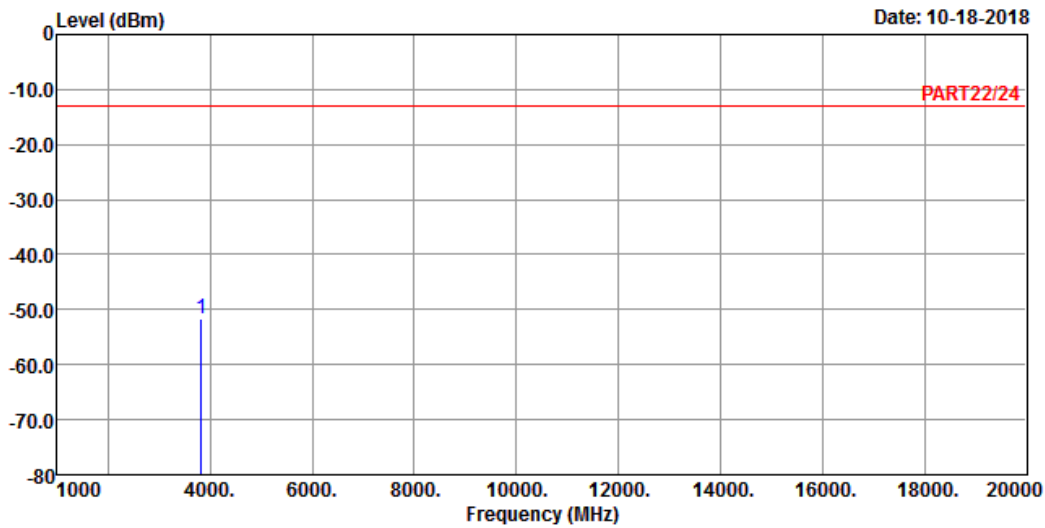
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 25 QPSK_5M Link_H-CH
 Tested by: Thomas Wei

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

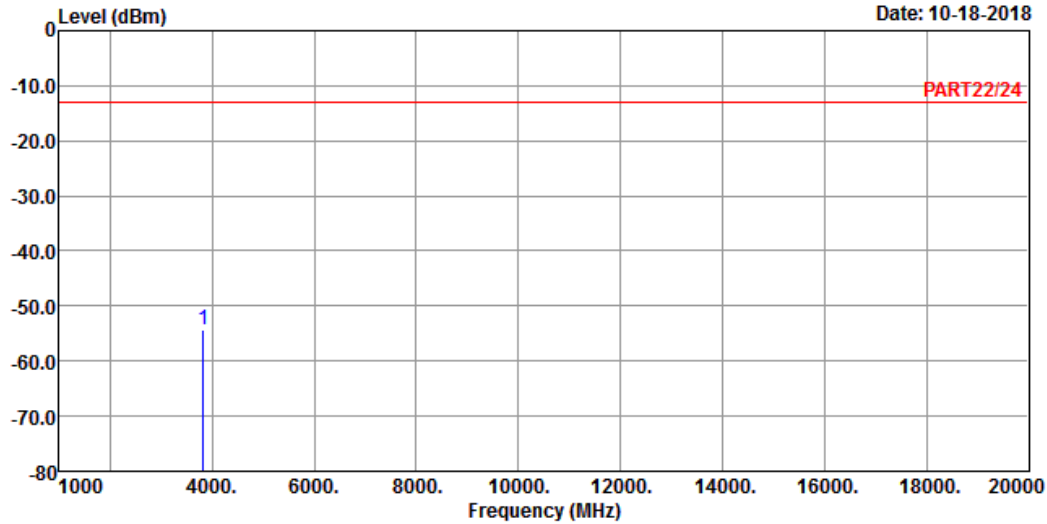
1 pp 3825.00 -51.56 -45.19 -13.00 -38.56 -6.37 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 25 QPSK_5M Link_H-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3825.00	-54.41	-48.04	-13.00	-41.41	-6.37	Peak

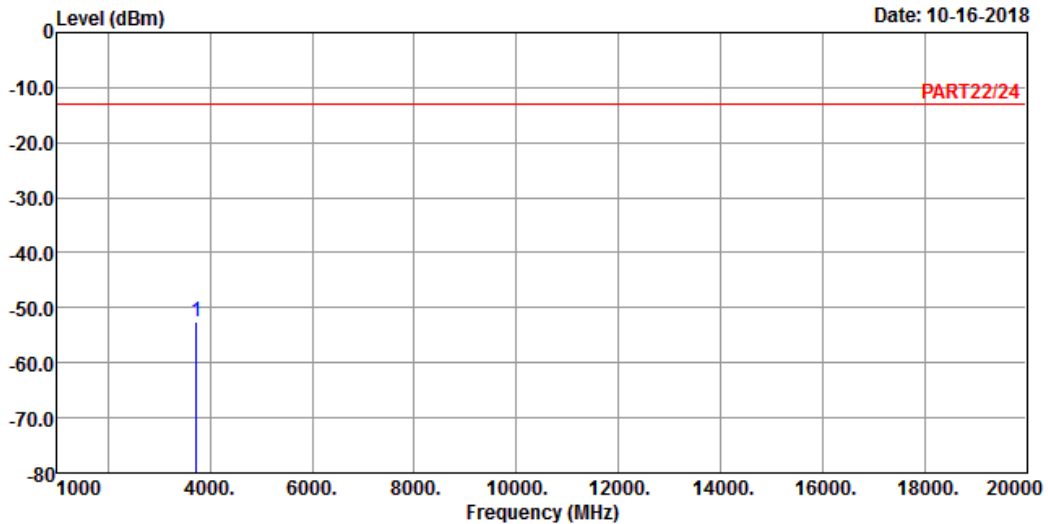
Channel Bandwidth: 20 MHz / QPSK
Low Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
Condition: PART22/24 HORIZONTAL
Remak : LTE Band 25 QPSK_20M Link_L-CH
Tested by: Thomas Wei

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

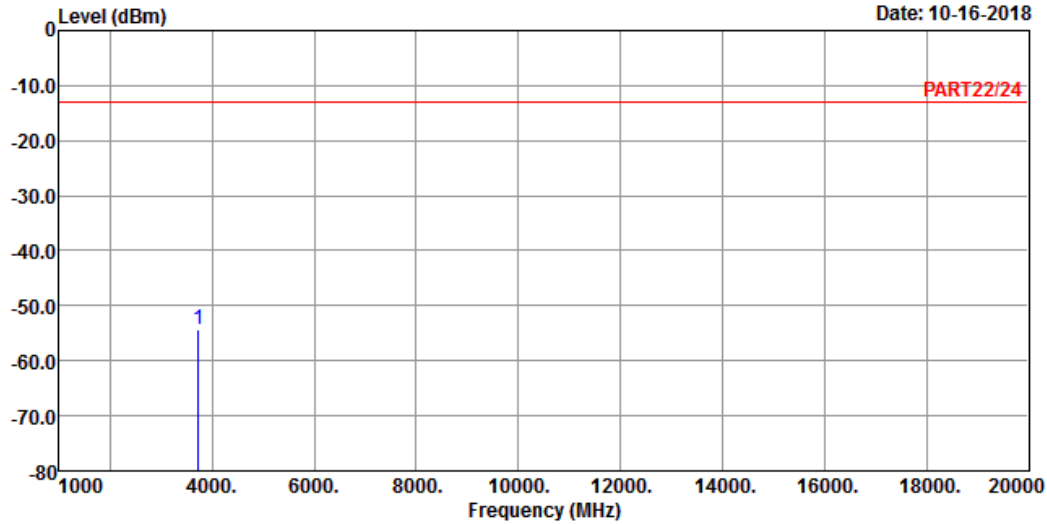
1 pp 3720.00 -52.66 -45.84 -13.00 -39.66 -6.82 Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 25 QPSK_20M Link_L-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3720.00	-54.32	-47.50	-13.00	-41.32	-6.82	Peak

Middle Channel

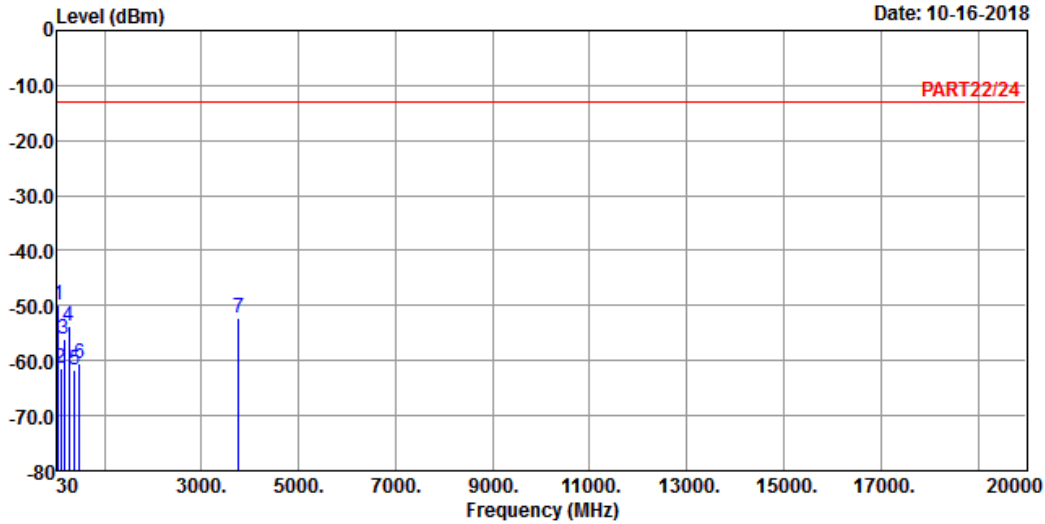


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 5

Date: 10-16-2018



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 25 QPSK_20M Link_M-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit	Over		Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	pp	44.55	-49.83	-47.84	-13.00	-36.83	-1.99 Peak
2		96.93	-61.49	-50.76	-13.00	-48.49	-10.73 Peak
3		171.62	-56.20	-50.33	-13.00	-43.20	-5.87 Peak
4		274.44	-53.65	-47.16	-13.00	-40.65	-6.49 Peak
5		393.75	-61.76	-55.78	-13.00	-48.76	-5.98 Peak
6		490.75	-60.50	-55.71	-13.00	-47.50	-4.79 Peak
7		3765.00	-52.11	-45.51	-13.00	-39.11	-6.60 Peak

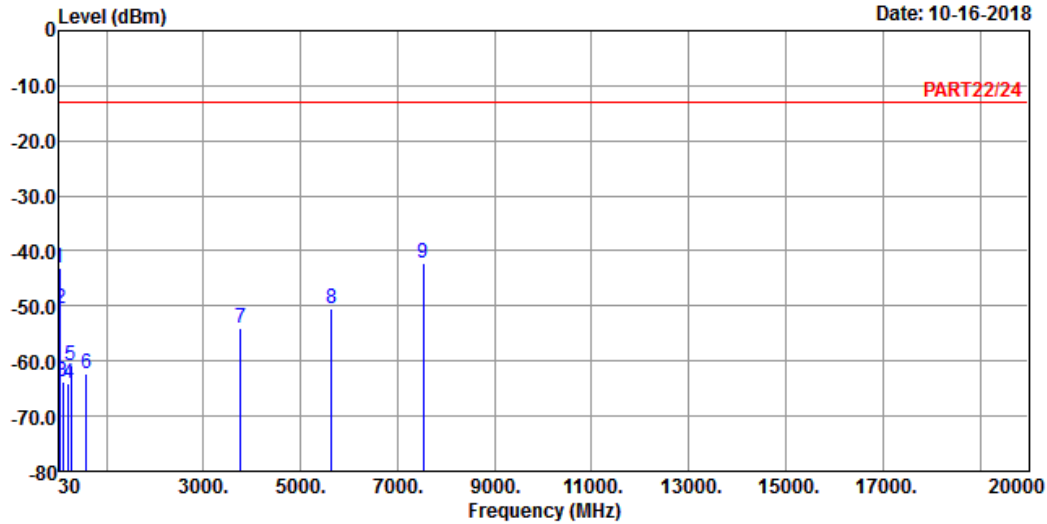


Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 6

Date: 10-16-2018



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 25 QPSK_20M Link_M-CH
 Tested by: Thomas Wei

	Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
	MHz	dBm	dBm	dBm	dB	dB	
1	30.00	-43.19	-43.57	-13.00	-30.19	0.38	Peak
2	43.58	-50.55	-49.08	-13.00	-37.55	-1.47	Peak
3	96.93	-63.86	-53.13	-13.00	-50.86	-10.73	Peak
4	217.21	-63.93	-56.61	-13.00	-50.93	-7.32	Peak
5	273.47	-60.67	-54.20	-13.00	-47.67	-6.47	Peak
6	583.87	-62.20	-60.76	-13.00	-49.20	-1.44	Peak
7	3765.00	-53.98	-47.38	-13.00	-40.98	-6.60	Peak
8	5647.50	-50.42	-48.59	-13.00	-37.42	-1.83	Peak
9 pp	7530.00	-42.08	-46.36	-13.00	-29.08	4.28	Peak

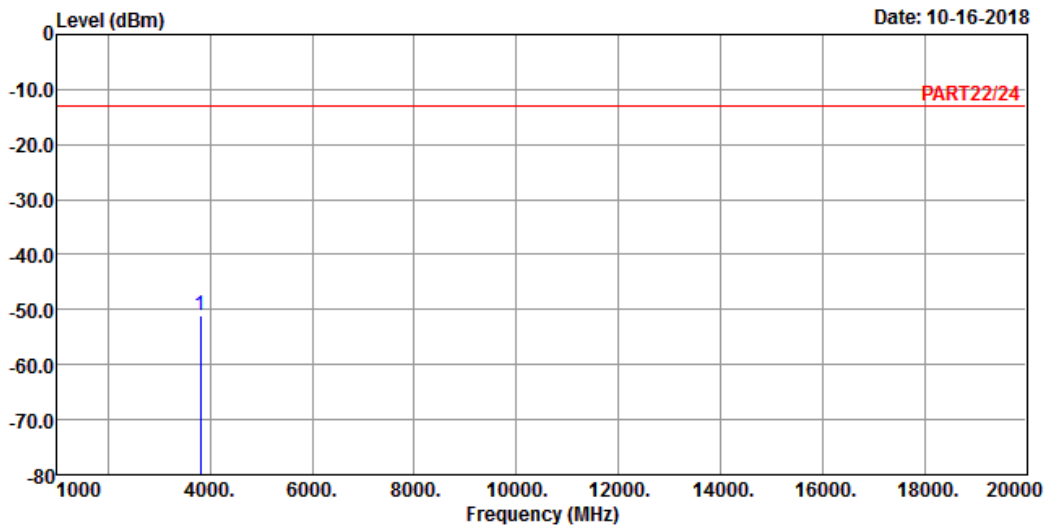
High Channel



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 1



Site : 966 Chamber 5
 Condition: PART22/24 HORIZONTAL
 Remak : LTE Band 25 QPSK_20M Link_H-CH
 Tested by: Thomas Wei

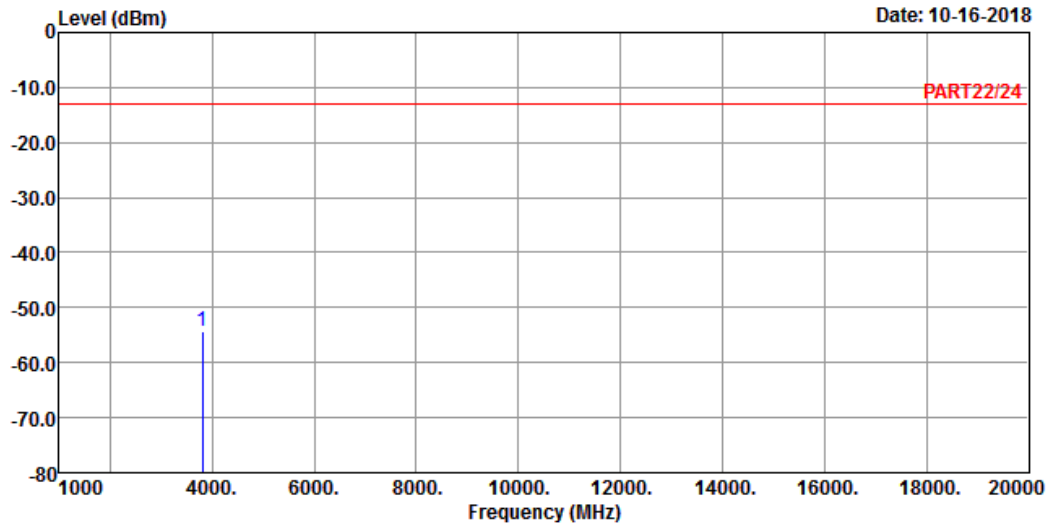
	Read	Limit	Over			
Freq	Level	Level	Line	Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3810.00	-51.09	-44.69	-13.00	-38.09	-6.40	Peak



Bureau Veritas Consumer Products Services Ltd., Taoyuan Branch

A D T

Data: 2



Site : 966 Chamber 5
 Condition: PART22/24 VERTICAL
 Remak : LTE Band 25 QPSK_20M Link_H-CH
 Tested by: Thomas Wei

Freq	Level	Read Level	Limit Line	Over Limit	Factor	Remark
MHz	dBm	dBm	dBm	dB	dB	
1 pp 3810.00	-54.38	-47.98	-13.00	-41.38	-6.40	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

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Web Site: www.bureauveritas-adt.com

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

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