FCC Test Report

FCC ID	:	**QYL8265FB1**
Equipment	:	**Tablet**
Brand Name	:	**Getac**
Model Name	:	**F110**
Applicant	:	**Getac Technology Corporation. 5F., Building A, No. 209, Sec.1, Nangang Rd.,Nangang Dist., Taipei City 11568, Taiwan, R.O.C.**
Standard	:	**47 CFR FCC Part 15.247**

The product was received on Jul. 09, 2019, and testing was started from Jul. 12, 2019 and completed on Aug. 16, 2019. We, SPORTON INTERNATIONAL INC. EMC & Wireless Communications Laboratory, would like to declare that the tested sample has been evaluated in accordance with the procedures given in ANSI C63.10-2013 and shown compliance with the applicable technical standards.

The report must not be used by the client to claim product certification, approval, or endorsement by TAF or any agency of government.

The test results in this report apply exclusively to the tested model / sample. Without written approval of SPORTON INTERNATIONAL INC. EMC & Wireless Communications Laboratory, the test report shall not be reproduced except in full.

Allen Lin

Approved by: Allen Lin

SPORTON INTERNATIONAL INC. EMC & Wireless Communications Laboratory

No. 52, Huaya 1st Rd., Guishan Dist., Taoyuan City, Taiwan (R.O.C.)

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History of this test report

Report No.	Version	Description	Issued Date
FR391803-60AL	01	Initial issue of report	Aug. 28, 2019

Summary of Test Result

Report Clause	Ref. Std. Clause	Test Items	Result (PASS/FAIL)	Remark
1.1.2	15.203	Antenna Requirement	PASS	FCC 15.203
3.1	15.207	AC Power-line Conducted Emissions	PASS	FCC 15.207
3.2	15.247(a)	DTS Bandwidth	PASS	≥500kHz
3.3	15.247(b)	Maximum Conducted Output Power	PASS	Power [dBm]:30
3.4	15.247(e)	Power Spectral Density	PASS	PSD [dBm/3kHz]:8
3.5	15.247(d)	Emissions in Non-restricted Frequency Bands	PASS	Non-Restricted Bands: >30 dBc
3.6	15.247(d)	Emissions in Restricted Frequency Bands	PASS	Restricted Bands: FCC 15.209

Declaration of Conformity:
The test results with all measurement uncertainty excluded are presented in accordance with the regulation limits or requirements declared by manufacturers.
Comments and explanations:
None

Reviewed by: Jackson Tsai

Report Producer: Jenny Yang

1 General Description

1.1 Information

1.1.1 RF General Information

Frequency Range (MHz)	Bluetooth Mode	Ch. Frequency (MHz)	Channel Number
2400-2483.5	LE	2402-2480	0-39 [40]

Band	Mode	BWch (MHz)	Nant
2.4-2.4835GHz	BT-LE(1Mbps)	1.0	1TX

Note:
- Bluetooth LE uses a GFSK (1Mbps) modulation for DSSS.
- BWch is the nominal channel bandwidth.

1.1.2 Antenna Information

Ant.	Brand	Model Name	Antenna Type	Connector
1 (Main)	-	-	PIFA antenna	I-PEX
2 (Aux)	-	-	PIFA antenna	I-PEX

Ant.	Port	Gain (dBi)					
		2.4G	5G				BT
			U-NII-1	U-NII-2A	U-NII-2C	U-NII-3	
1	1	2.96	3.55	3.47	3.14	2.8	-
2	2	1.83	0.58	0.58	0.8	1.11	1.83

Note 1: The EUT has two antennas.

For 2.4GHz function:

For IEEE 802.11 b/g/n mode (1TX/1RX)

Support diversity function and tested on both chains.

For IEEE 802.11 b/g/n mode (2TX/2RX)

Ant. 1 (port 1) and Ant. 2 (port 2) could transmit/receive simultaneously.

For 5GHz function:

For IEEE 802.11 a/n/ac mode (1TX/1RX)

Support diversity function and tested on both chains.

For IEEE 802.11 a/n/ac mode (2TX/2RX)

Ant. 1 (port 1) and Ant. 2 (port 2) could transmit/receive simultaneously.

For BT function:

For IEEE 802.15.1 Bluetooth mode (1TX/1RX)

Ant. 2 (port 2) can be used as transmitting/receiving antenna.

1.1.3 EUT Information

Identify EUT				
WLAN Module	Brand Name: Intel / Model Name: 8265NGW			
Operational Condition				
EUT Power Type	From AC Adapter / Battery			
EUT Function	☒	Point-to-multipoint	☐	Point-to-point

Type of EUT		
☒	Stand-alone	
☐	Combined (EUT where the radio part is fully integrated within another device)	
	Combined Equipment - Brand Name / Model No.:	…
☐	Plug-in radio (EUT intended for a variety of host systems)	
	Host System - Brand Name / Model No.:	…
☐	Other:	

1.1.4 Mode Test Duty Cycle

Mode	DC	DCF(dB)	T(s)	VBW(Hz) ≥ 1/T
BT-LE(1Mbps)	0.631	2	396.875u	3k

Note. If DC < 0.98, the DCF was added while measuring Output power and PSD.

1.2 Testing Applied Standards

According to the specifications of the manufacturer, the EUT must comply with the requirements of the following standards:

- 47 CFR FCC Part 15
- ANSI C63.10-2013
- KDB 558074 D01 v05r02

1.3 Testing Location Information

Testing Location			
☒	HWA YA	ADD : No. 52, Huaya 1st Rd., Guishan Dist., Taoyuan City, Taiwan (R.O.C.)	
		TEL : 886-3-327-3456	FAX : 886-3-327-0973
Test site Designation No. TW1190 with FCC.			
☐	JHUBEI	ADD : No.8, Ln. 724, Bo'ai St., Zhubei City, Hsinchu County, Taiwan (R.O.C.)	
		TEL : 886-3-656-9065	FAX : 886-3-656-9085
Test site Designation No. TW0006 with FCC.			

Test Condition	Test Site No.	Test Engineer	Test Environment	Test Date
AC Conduction	CO04-HY	Jeff	21.8~24.2°C / 51.3~53.1%	17/Jul/2019
RF Conducted	TH06-HY	Alan	23.5~24.9°C / 65~66.5%	15/Jul/2019~ 16/Aug/2019
Radiated	03CH02-HY	Patrick	23.7~25.9°C / 51.4~56.2%	12/Jul/2019~ 05/Aug/2019

1.4 Measurement Uncertainty

ISO/IEC 17025 requires that an estimate of the measurement uncertainties associated with the emissions test results be included in the report. The measurement uncertainties given below are based on a 95% confidence level (based on a coverage factor (k=2)

Test Items	Uncertainty	Remark
Conducted Emission (150kHz ~ 30MHz)	3.54 dB	Confidence levels of 95%
Radiated Emission (9kHz ~ 30MHz)	1.6 dB	Confidence levels of 95%
Radiated Emission (30MHz ~ 1,000MHz)	4.3 dB	Confidence levels of 95%
Radiated Emission (1GHz ~ 18GHz)	3.9 dB	Confidence levels of 95%
Radiated Emission (18GHz ~ 40GHz)	3.5 dB	Confidence levels of 95%
Conducted Emission	1.3 dB	Confidence levels of 95%
Temperature	0.7 °C	Confidence levels of 95%
Humidity	4 %	Confidence levels of 95%

2 Test Configuration of EUT

2.1 Test Condition

RF Conducted	Abbreviation	Remark
TnomVnom	Tnom	20°C
-	Vnom	120V

2.2 Test Channel Mode

Test Software	DRTU

Mode	Power Setting
BT-LE(1Mbps)	-
2402MHz	16
2440MHz	16
2480MHz	16

2.3 The Worst Case Measurement Configuration

The Worst Case Mode for Following Conformance Tests	
Tests Item	AC power-line conducted emissions
Condition	AC power-line conducted measurement for line and neutral
Operating Mode	CTX
1	Adapter mode

The Worst Case Mode for Following Conformance Tests	
Tests Item	DTS Bandwidth Maximum Conducted Output Power Power Spectral Density Emissions in Non-restricted Frequency Bands
Test Condition	Conducted measurement at transmit chains

The Worst Case Mode for Following Conformance Tests			
Tests Item	Emissions in Restricted Frequency Bands		
Test Condition	Radiated measurement If EUT consist of multiple antenna assembly (multiple antenna are used in EUT regardless of spatial multiplexing MIMO configuration), the radiated test should be performed with highest antenna gain of each antenna type. Simultaneous transmission was estimated to be pass by applicant		
Operating Mode < 1GHz	CTX		
1	Adapter mode		
Operating Mode > 1GHz	CTX		
Orthogonal Planes of EUT	**X Plane**	**Y Plane**	**Z Plane**
			
Worst Planes of EUT	V		

2.4 Accessories and Support Equipment

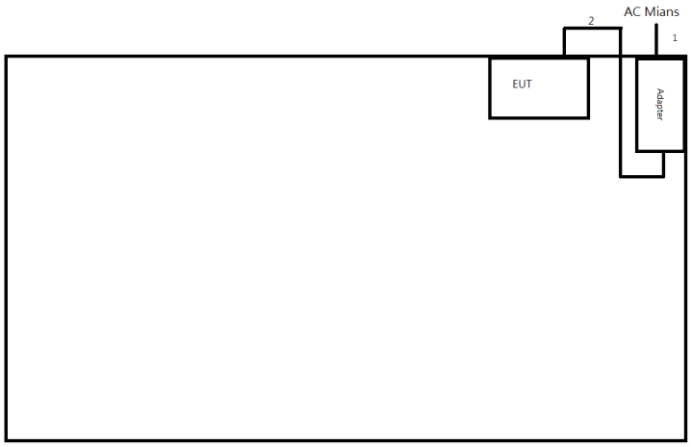
Accessories				
AC Adapter	Brand Name	Chicony	Model Name	A12-065N2A
	Power Rating	I/P: 100-240Vac, 1.7A, O/P: 19Vdc, 3.42 A, 65W		
	AC Power Cord	1.7meter, non-shielded cable, w/o ferrite core		
	DC Power Cable	1.7meter, non-shielded cable, with a ferrite core		
Battery *2	Brand Name	Getac	Model Name	BP3S1P2160-S
	Power Rating	11.4Vdc, 2160mAh	Type	Li-ion

Reminder: Regarding to more detail and other information, please refer to user manual.

Support Equipment – RF Conducted				
No.	**Equipment**	**Brand Name**	**Model Name**	**FCC ID**
1	Notebook	DELL	E5410	DoC
2	Adapter for NB	DELL	HA65NM130	DoC
3	AC Power Source	GW	APS-9102	-

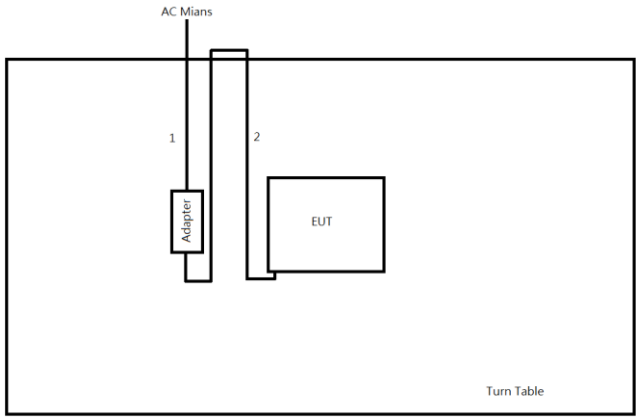
2.5 Test Setup Diagram

Test Setup Diagram – AC Line Conducted Emission Test



Item	Connection	Shielded	Length(m)	Remark
1	AC Power line	No	1.7	-
2	DC Power line	No	1.7	-

Test Setup Diagram - Radiated Test



Item	Connection	Shielded	Length(m)	Remark
1	AC Power line	No	1.7	-
2	DC Power line	No	1.7	-

3 Transmitter Test Result

3.1 AC Power-line Conducted Emissions

3.1.1 AC Power-line Conducted Emissions Limit

AC Power-line Conducted Emissions Limit		
Frequency Emission (MHz)	**Quasi-Peak**	**Average**
0.15-0.5	66 - 56 *	56 - 46 *
0.5-5	56	46
5-30	60	50
Note 1: * Decreases with the logarithm of the frequency.		

3.1.2 Measuring Instruments

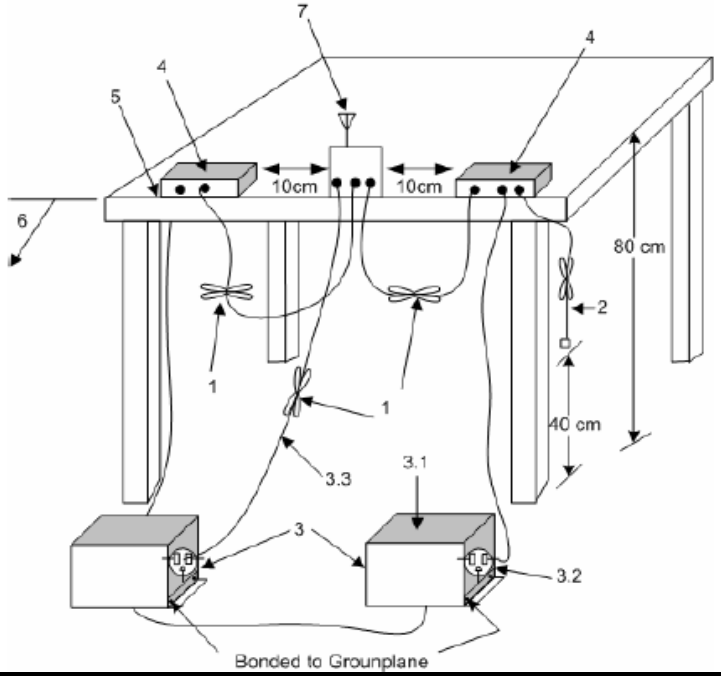
Refer a test equipment and calibration data table in this test report.

3.1.3 Test Procedures

Test Method
▪ Refer as ANSI C63.10-2013, clause 6.2 foray power-line conducted emissions.

3.1.4 Test Setup

AC Power-line Conducted Emissions



3.1.5 Test Result of AC Power-line Conducted Emissions

Refer as Appendix A

3.2 DTS Bandwidth

3.2.1 6dB Bandwidth Limit

6dB Bandwidth Limit
Systems using digital modulation techniques:
▪ 6 dB bandwidth ≥ 500 kHz.

3.2.2 Measuring Instruments

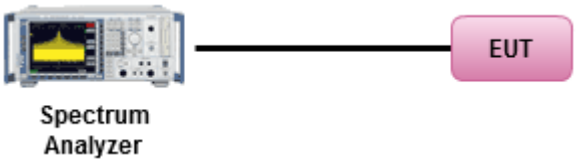
Refer a test equipment and calibration data table in this test report.

3.2.3 Test Procedures

Test Method	
▪ For the emission bandwidth shall be measured using one of the options below:	
	☒ Refer as KDB 558074, clause 8.2 (11.8 of ANSI C63.10) DTS bandwidth measurement.
	☐ Refer as RSS-Gen, clause 6.7 for occupied bandwidth testing.
	☐ Refer as ANSI C63.10, clause 6.9.3 for occupied bandwidth testing.

3.2.4 Test Setup

Emission Bandwidth



3.2.5 Test Result of Emission Bandwidth

Refer as Appendix B

3.3 Maximum Conducted Output Power

3.3.1 Maximum Conducted Output Power Limit

Maximum Conducted Output Power Limit			
	▪ If G_{TX} ≤ 6 dBi, then P_{Out} ≤ 30 dBm (1 W)		
	▪ Point-to-multipoint systems (P2M): If G_{TX} > 6 dBi, then P_{Out} = 30 – (G_{TX} – 6) dBm		
	▪ Point-to-point systems (P2P): If G_{TX} > 6 dBi, then P_{Out} = 30 – (G_{TX} – 6)/3 dBm		
	▪ Smart antenna system (SAS):		
		- Single beam: If G_{TX} > 6 dBi, then P_{Out} = 30 – (G_{TX} – 6)/3 dBm	
		- Overlap beam: If G_{TX} > 6 dBi, then P_{Out} = 30 – (G_{TX} – 6)/3 dBm	
		- Aggregate power on all beams: If G_{TX} > 6 dBi, then P_{Out} = 30 – (G_{TX} – 6)/3 + 8dB dBm	
e.i.r.p. Power Limit:			
▪ 2400-2483.5 MHz Band			
	▪ Point-to-multipoint systems (P2M): P_{eirp} ≤ 36 dBm (4 W)		
	▪ Point-to-point systems (P2P): P_{eirp} ≤ MAX(36, [P_{Out} + G_{TX}]) dBm		
	▪ Smart antenna system (SAS)		
		- Single beam: P_{eirp} ≤ MAX(36, P_{Out} + G_{TX}) dBm	
		- Overlap beam: P_{eirp} ≤ MAX(36, P_{Out} + G_{TX}) dBm	
		- Aggregate power on all beams: P_{eirp} ≤ MAX(36, [P_{Out} + G_{TX} + 8]) dBm	
P_{Out} = maximum peak conducted output power or maximum conducted output power in dBm, **G_{TX}** = the maximum transmitting antenna directional gain in dBi.			

3.3.2 Measuring Instruments

Refer a test equipment and calibration data table in this test report.

3.3.3 Test Procedures

Test Method	
▪ Maximum Peak Conducted Output Power	
	☐ Refer as KDB 558074, clause 8.3.1.1 (11.9.1.1 of ANSI C63.10) RBW ≥ EBW method.
	☐ Refer as KDB 558074, clause 8.3.1.2 (11.9.1.2 of ANSI C63.10) integrated band power method.
	☐ Refer as KDB 558074, clause 8.3.1.3 (11.9.1.3 of ANSI C63.10) peak power meter.
▪ Maximum Average Conducted Output Power	
	☐ Refer as KDB 558074, clause 8.3.2.2 (11.9.2.2 of ANSI C63.10) using a spectrum analyzer.
	☒ Refer as KDB 558074, clause 8.3.2.3 (11.9.2.3 of ANSI C63.10) using a power meter.
▪ For conducted measurement.	
	▪ If the EUT supports multiple transmit chains using options given below: Refer as KDB 662911, In-band power measurements. Using the measure-and-sum approach, measured all transmit ports individually. Sum the power (in linear power units e.g., mW) of all ports for each individual sample and save them.
	▪ If multiple transmit chains, EIRP calculation could be following as methods: $P_{total} = P_1 + P_2 + \ldots + P_n$ (calculated in linear unit [mW] and transfer to log unit [dBm]) $EIRP_{total} = P_{total} + DG$

3.3.4 Test Setup

Maximum Conducted Output Power (Power Meter)


3.3.5 Test Result of Maximum Conducted Output Power

Refer as Appendix C

3.4 Power Spectral Density

3.4.1 Power Spectral Density Limit

Power Spectral Density Limit
▪ Power Spectral Density (PSD)≤8 dBm/3kHz

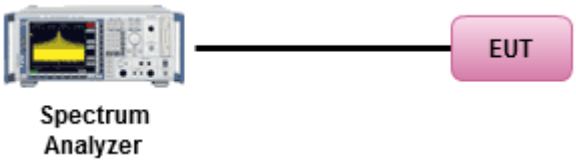
3.4.2 Measuring Instruments

Refer a test equipment and calibration data table in this test report.

3.4.3 Test Procedures

Test Method		
▪ Peak power spectral density procedures that the same method as used to determine the conducted output power. If maximum peak conducted output power was measured to demonstrate compliance to the output power limit, then the peak PSD procedure below (Method PKPSD) shall be used. If maximum conducted output power was measured to demonstrate compliance to the output power limit, then one of the average PSD procedures shall be used, as applicable based on the following criteria (the peak PSD procedure is also an acceptable option).		
	☒ Refer as KDB 558074, clause 8.4 (11.10 of ANSI C63.10) Method PKPSD.	
▪ For conducted measurement.		
	▪ If The EUT supports multiple transmit chains using options given below:	
		▪ Measure and sum the spectra across the outputs. Refer as KDB 662911, In-band power spectral density (PSD). Sample all transmit ports simultaneously using a spectrum analyzer for each transmit port. Where the trace bin-by-bin of each transmit port summing can be performed. (i.e., in the first spectral bin of output 1 is summed with that in the first spectral bin of output 2 and that from the first spectral bin of output 3, and so on up to the NTX output to obtain the value for the first frequency bin of the summed spectrum.). Add up the amplitude (power) values for the different transmit chains and use this as the new data trace.

3.4.4 Test Setup

Power Spectral Density


3.4.5 Test Result of Power Spectral Density

Refer as Appendix D

3.5 Emissions in Non-restricted Frequency Bands

3.5.1 Emissions in Non-restricted Frequency Bands Limit

Un-restricted Band Emissions Limit	
RF output power procedure	**Limit (dB)**
Peak output power procedure	20
Average output power procedure	30
Note 1: If the peak output power procedure is used to measure the fundamental emission power to demonstrate compliance to requirements, then the peak conducted output power measured within any 100 kHz outside the authorized frequency band shall be attenuated by at least 20 dB relative to the maximum measured in-band peak level. Note 2: If the average output power procedure is used to measure the fundamental emission power to demonstrate compliance to requirements, then the power in any 100 kHz outside of the authorized frequency band shall be attenuated by at least 30 dB relative to the maximum measured in-band average level.	

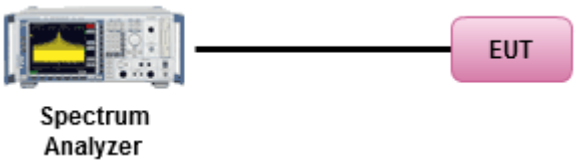
3.5.2 Measuring Instruments

Refer a test equipment and calibration data table in this test report.

3.5.3 Test Procedures

Test Method
▪ Refer as KDB 558074, clause 8.5 (11.11 of ANSI C63.10) for non-restricted frequency bands.

3.5.4 Test Setup

Emissions in Non-restricted Frequency Bands


3.5.5 Test Result of Emissions in Non-restricted Frequency Bands

Refer as Appendix E

3.6 Emissions in Restricted Frequency Bands

3.6.1 Emissions in Restricted Frequency Bands Limit

Restricted Band Emissions Limit			
Frequency Range (MHz)	**Field Strength (uV/m)**	**Field Strength (dBuV/m)**	**Measure Distance (m)**
0.009~0.490	2400/F(kHz)	48.5 - 13.8	300
0.490~1.705	24000/F(kHz)	33.8 - 23	30
1.705~30.0	30	29	30
30~88	100	40	3
88~216	150	43.5	3
216~960	200	46	3
Above 960	500	54	3

Note 1: Test distance for frequencies at or above 30 MHz, measurements may be performed at a distance other than the limit distance provided they are not performed in the near field and the emissions to be measured can be detected by the measurement equipment. When performing measurements at a distance other than that specified, the results shall be extrapolated to the specified distance using an extrapolation factor of 20 dB/decade (inverse of linear distance for field-strength measurements, inverse of linear distance-squared for power-density measurements).

Note 2: Test distance for frequencies at below 30 MHz, measurements may be performed at a distance closer than the EUT limit distance; however, an attempt should be made to avoid making measurements in the near field. When performing measurements below30 MHz at a closer distance than the limit distance, the results shall be extrapolated to the specified distance by either making measurements at a minimum of two or more distances on at least one radial to determine the proper extrapolation factor or by using the square of an inverse linear distance extrapolation factor (40 dB / decade). The test report shall specify the extrapolation method used to determine compliance of the EUT.

Note 3: Using the distance of 1m during the test for above 18 GHz, and the test value to correct for the distance factor at 3m.

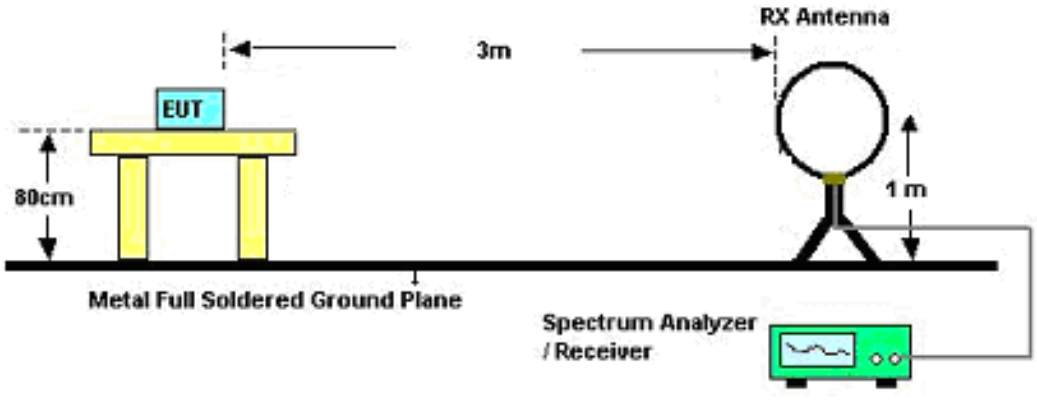
3.6.2 Measuring Instruments

Refer a test equipment and calibration data table in this test report.

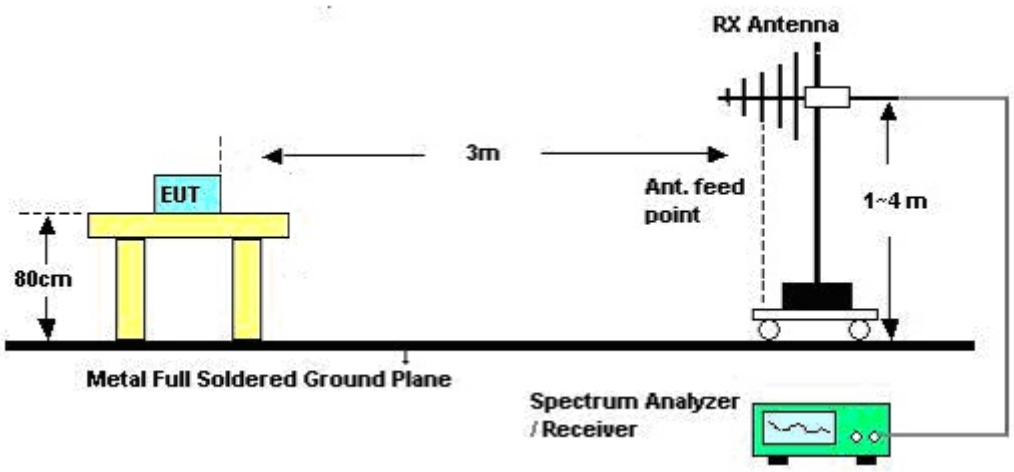
3.6.3 Test Procedures

Test Method	
▪ The average emission levels shall be measured in [duty cycle ≥ 98 or duty factor].	
▪ Refer as ANSI C63.10, clause 6.10.3 band-edge testing shall be performed at the lowest frequency channel and highest frequency channel within the allowed operating band.	
▪ For the transmitter unwanted emissions shall be measured using following options below:	
	▪ Refer as KDB 558074, clause 8.6 (11.12 of ANSI C63.10) for restricted frequency bands.
▪ For the transmitter band-edge emissions shall be measured using following options below:	
	▪ Refer as KDB 558074 clause 8.7.1, When the performing peak or average radiated measurements, emissions within 2 MHz of the authorized band edge may be measured using the marker-delta method described below.
	▪ Refer as KDB 558074, clause 8.7.2 (6.10.6 of ANSI C63.10) for marker-delta method for band-edge measurements.
	▪ Refer as KDB 558074, clause 8.7.3 for narrower resolution bandwidth (100kHz) using the band power and summing the spectral levels.
▪ Use the following spectrum analyzer settings:	
	▪ Set RBW=100 kHz for f < 1 GHz; VBW=3 * RBW; Sweep = auto; Detector function = peak; Trace = max hold.
	▪ Set RBW = 1 MHz, VBW= 3MHz for f ≥ 1 GHz for peak measurement. For average measurement, refer as 1.1.4.

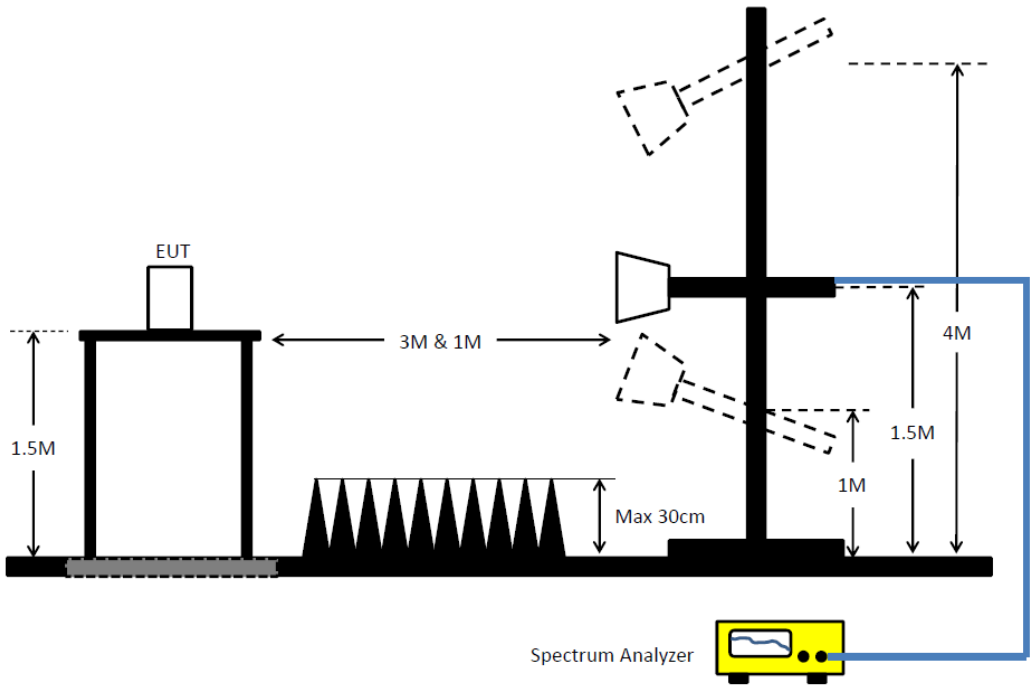
3.6.4 Test Setup

Emissions in Restricted Frequency Bands
9kHz ~30MHz


30MHz~1GHz



Above 1GHz



3.6.5 Test Result of Emissions in Restricted Frequency Bands (Below 30MHz)

The amplitude of spurious emissions which are attenuated by more than 20dB below the permissible value has no need to be reported.

3.6.6 Test Result of Emissions in Restricted Frequency Bands

Refer as Appendix F

4 Test Equipment and Calibration Data

Instrument for AC Conduction

Instrument	Manufacturer	Model No.	Serial No.	Spec.	Calibration Date	Calibration Due Date
EMC Receiver	R&S	ESR3	102052	9kHz ~ 3.6GHz	09/Apr/2019	08/Apr/2020
LISN	R&S	ENV216	101295	9kHz ~ 30MHz	08/Nov/2018	07/Nov/2019
RF Cable-CON	MTJ	RG142	CB002-CO	9kHz ~ 200MHz	17/Sep/2018	16/Sep/2019
AC POWER	APC	AFC-11005G	F310050055	47Hz~63Hz 5~300V	NCR	NCR
Impuls Begrenzer Pulse Limiter	SCHWARZBECK	VTSD 9561-F	9561-F041	9 kHz ~ 30 MHz	12/Oct/2018	11/Oct/2019

NCR : Non-Calibration Require

Instrument for Radiated Test

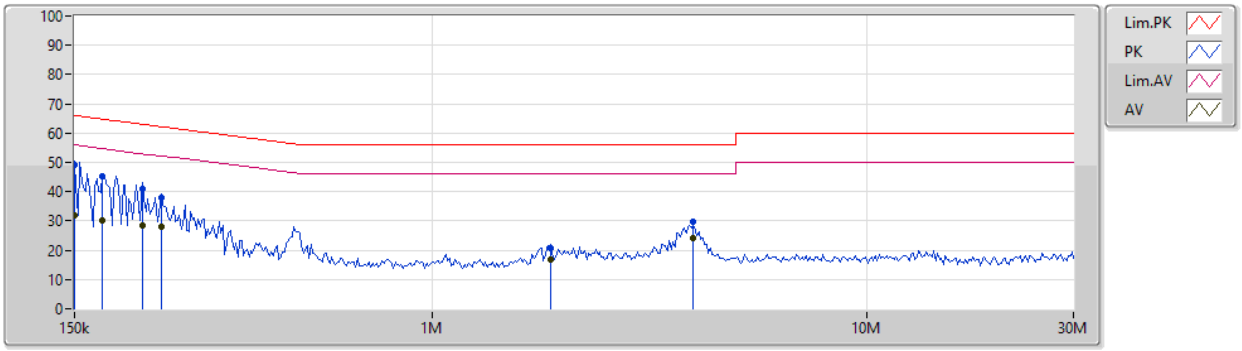
Instrument	Manufacturer	Model No.	Serial No.	Spec.	Calibration Date	Calibration Due Date
3m Semi Anechoic Chamber	SIDT FRANKONIA	SAC-3M	03CH02-HY	30MHz ~ 1GHz 3m	19/Oct/2018	18/Oct/2019
3m Semi Anechoic Chamber	SIDT FRANKONIA	SAC-3M	03CH02-HY	1GHz ~ 18GHz 3m	17/Oct/2018	16/Oct/2019
Amplifier	Agilent	8447D	2944A11149	30-1000MHz	02/Jul/2019	01/Jul/2020
Microwave Preamplifier	Agilent	8449B	3008A02373	1GHz ~ 26.5GHz	23/Oct/2018	22/Oct/2019
Spectrum Analyzer	Rohde & Schwarz	FSP40	100593	9KHz - 40GHz	27/Dec/2018	26/Dec/2019
Signal Analyzer	KEYSIGHT	N9010A	SG56070103	10Hz ~ 40GHz	05/Mar/2019	04/Mar/2020
RF Cable-R03m	Jye Bao	RG142	CB017	9kHz ~ 1GHz	18/Jan/2019	17/Jan/2020
RF Cable-high	SUHNER	SUCOFLEX104	MY34918/4	1GHz ~ 40GHz	18/Jan/2019	17/Jan/2020
Bilog Antenna & 5dB Attenuator	SCHAFFNER / MTJ	CBL 6112B / MTJ6102-05	2723 / 2	30MHz ~ 1GHz	08/Sep/2018	07/Sep/2019
EMI Test Receiver	R&S	ESR	102052	9kHz ~ 3.6GHz	09/Apr/2019	08/Apr/2020
Loop Antenna	TESEQ	HLA 6120	31244	9k-30MHz	15/Mar/2019	14/Mar/2020
Broadband Horn Antenna	SCHWARZBECK	BBHA 9170	BBHA 9170221	15GHz ~ 40GHz	22/Mar/2019	21/Mar/2020
Double Ridged Guide Horn Antenna	SCHWARZBECK	BBHA 9120 D	BBHA 9120 D 01543	1GHz ~ 18GHz	03/Jun/2019	02/Jun/2020

Instrument for Conducted Test

Instrument	Manufacturer	Model No.	Serial No.	Spec.	Calibration Date	Calibration Due Date
Spectrum Analyzer	R&S	FSV 40	101013	10Hz~40GHz	13/Mar/2019	12/Mar/2020
Power Sensor	Anritsu	MA2411B	1339407	300MHz ~ 40GHz	17/Nov/2018	16/Nov/2019
Power Meter	Anritsu	ML2495A	1517010	300MHz ~ 40GHz	17/Nov/2018	16/Nov/2019
Cable 0.2m	HUBER	MY10710/4	RF Cable - 01	30MHz ~18G	10/Jan/2019	09/Jan/2020
Cable 0.2m	HUBER	MY10711/4	RF Cable - 02	30MHz ~18G	10/Jan/2019	09/Jan/2020
Cable 0.5m	HUBER	MY39470/4	RF Cable - 29	30MHz ~18G	10/Jan/2019	09/Jan/2020
SMB100A Signal Generator	R&S	SMB100A03	181147	100kHz~40GHz	12/Nov/2018	10/Nov/2020

AC Power-line Conducted Emissions Result			
Operating Mode	1	**Power Phase**	Neutral
Operating Function	Adapter Mode		

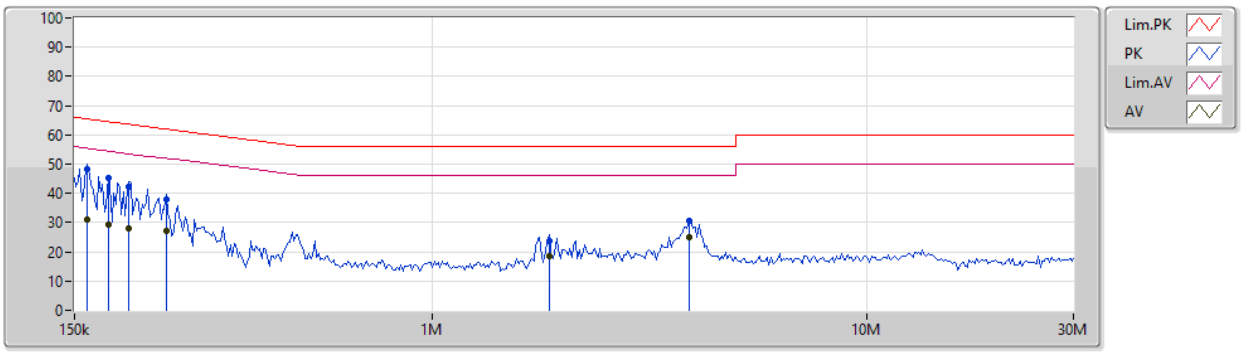
17/07/2019



Type	Freq	Level	Limit	Margin	Factor	Condition	Comment	Raw	LISN	CL	AT
	(Hz)	(dBuV)	(dBuV)	(dB)	(dB)			(dBuV)	(dB)	(dB)	(dB)
QP	150k	49.21	66.00	-16.79	19.48	Neutral	"Worst"	29.73	9.60	0.01	9.87
AV	150k	32.08	56.00	-23.92	19.48	Neutral	-	12.60	9.60	0.01	9.87
QP	174.145k	45.22	64.76	-19.54	19.48	Neutral	-	25.74	9.60	0.01	9.87
AV	174.145k	29.99	54.76	-24.77	19.48	Neutral	-	10.51	9.60	0.01	9.87
QP	214.615k	40.74	63.02	-22.28	19.47	Neutral	-	21.27	9.59	0.01	9.87
AV	214.615k	28.58	53.02	-24.44	19.47	Neutral	-	9.11	9.59	0.01	9.87
QP	237.069k	38.14	62.20	-24.06	19.47	Neutral	-	18.67	9.59	0.01	9.87
AV	237.069k	28.03	52.20	-24.17	19.47	Neutral	-	8.56	9.59	0.01	9.87
QP	1.878M	20.67	56.00	-35.33	19.53	Neutral	-	1.14	9.61	0.03	9.89
AV	1.878M	16.76	46.00	-29.24	19.53	Neutral	-	-2.77	9.61	0.03	9.89
QP	4.001M	29.85	56.00	-26.15	19.55	Neutral	-	10.30	9.61	0.05	9.89
AV	4.001M	24.09	46.00	-21.91	19.55	Neutral	-	4.54	9.61	0.05	9.89

AC Power-line Conducted Emissions Result			
Operating Mode	1	**Power Phase**	Line
Operating Function	Adapter Mode		

17/07/2019



Type	Freq	Level	Limit	Margin	Factor	Condition	Comment	Raw	LISN	CL	AT
	(Hz)	(dBuV)	(dBuV)	(dB)	(dB)			(dBuV)	(dB)	(dB)	(dB)
QP	160.82k	48.30	65.43	-17.13	19.48	Line	"Worst"	28.82	9.60	0.01	9.87
AV	160.82k	30.91	55.43	-24.52	19.48	Line	-	11.43	9.60	0.01	9.87
QP	179.422k	45.23	64.51	-19.28	19.48	Line	-	25.75	9.60	0.01	9.87
AV	179.422k	29.52	54.51	-24.99	19.48	Line	-	10.04	9.60	0.01	9.87
QP	200.176k	42.27	63.61	-21.34	19.48	Line	-	22.79	9.60	0.01	9.87
AV	200.176k	27.90	53.61	-25.71	19.48	Line	-	8.42	9.60	0.01	9.87
QP	244.252k	38.05	61.95	-23.90	19.48	Line	-	18.57	9.60	0.01	9.87
AV	244.252k	26.97	51.95	-24.98	19.48	Line	-	7.49	9.60	0.01	9.87
QP	1.86M	23.71	56.00	-32.29	19.54	Line	-	4.17	9.62	0.03	9.89
AV	1.86M	18.38	46.00	-27.62	19.54	Line	-	-1.16	9.62	0.03	9.89
QP	3.922M	30.50	56.00	-25.50	19.57	Line	-	10.93	9.63	0.05	9.89
AV	3.922M	24.86	46.00	-21.14	19.57	Line	-	5.29	9.63	0.05	9.89

Summary

Mode	Max-N dB (Hz)	Max-OBW (Hz)	ITU-Code	Min-N dB (Hz)	Min-OBW (Hz)
2.4-2.4835GHz	-	-	-	-	-
BT-LE(1Mbps)	651.25k	1.037M	1M04F1D	640k	1.036M

Max-N dB = Maximum 6dB down bandwidth; **Max-OBW** = Maximum 99% occupied bandwidth;
Min-N dB = Minimum 6dB down bandwidth; **Min-OBW** = Minimum 99% occupied bandwidth;

Result

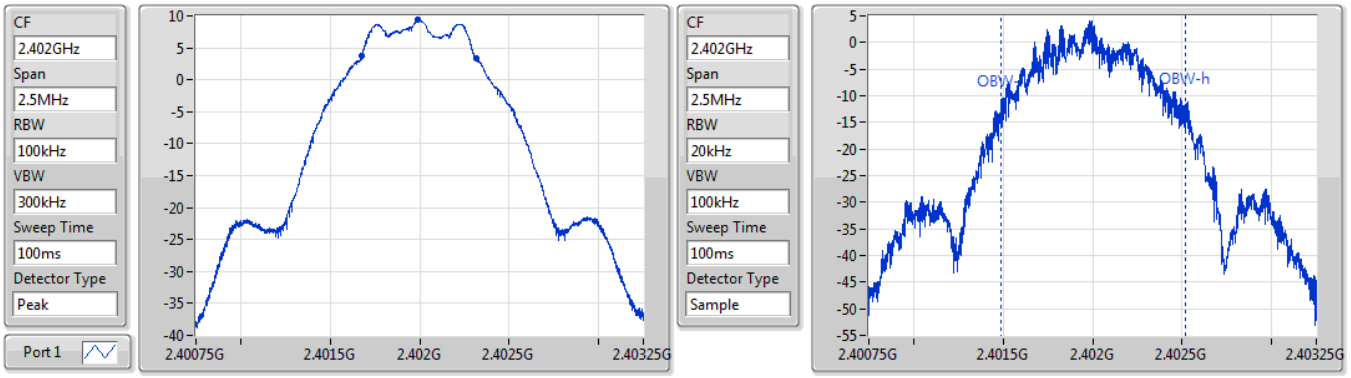
Mode	Result	Limit (Hz)	Port 1-N dB (Hz)	Port 1-OBW (Hz)
BT-LE(1Mbps)	-	-	-	-
2402MHz_TnomVnom	Pass	500k	640k	1.036M
2440MHz_TnomVnom	Pass	500k	643.75k	1.037M
2480MHz_TnomVnom	Pass	500k	651.25k	1.037M

Port X-N dB = Port **X** 6dB down bandwidth; **Port X-OBW** = Port **X** 99% occupied bandwidth;

BT-LE(1Mbps) EBW

2402MHz

16/07/2019

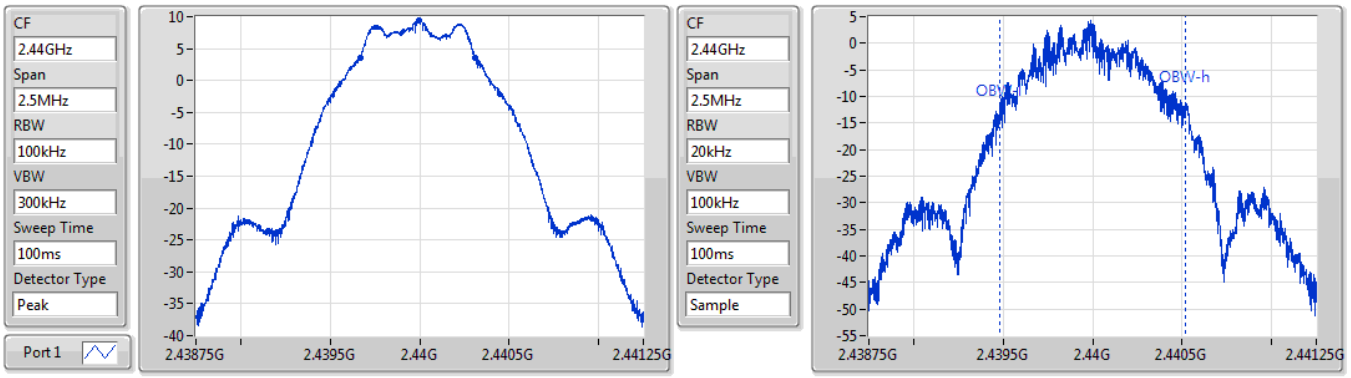


6dB(Hz)	Fl-6dB(Hz)	Fh-6dB(Hz)	OBW(Hz)	Fl-OBW(Hz)	Fh-OBW(Hz)	Limit(Hz)	Port
640k	2.401676G	2.402316G	1.036M	2.401485G	2.402521G	500k	1

BT-LE(1Mbps) EBW

2440MHz

16/07/2019

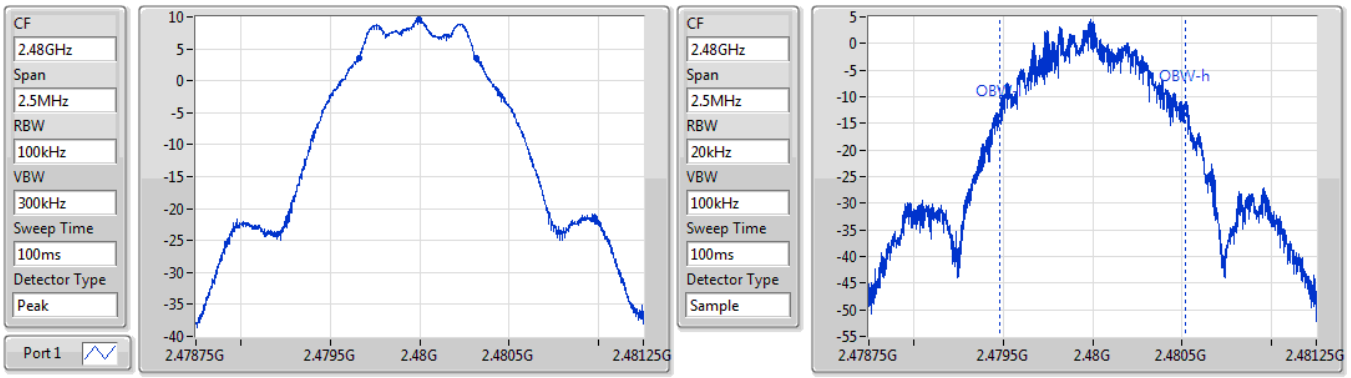


6dB(Hz)	Fl-6dB(Hz)	Fh-6dB(Hz)	OBW(Hz)	Fl-OBW(Hz)	Fh-OBW(Hz)	Limit(Hz)	Port
643.75k	2.439669G	2.440313G	1.037M	2.439483G	2.44052G	500k	1

BT-LE(1Mbps) **EBW**

2480MHz

16/07/2019



6dB(Hz)	Fl-6dB(Hz)	Fh-6dB(Hz)	OBW(Hz)	Fl-OBW(Hz)	Fh-OBW(Hz)	Limit(Hz)	Port
651.25k	2.479663G	2.480314G	1.037M	2.479482G	2.480518G	500k	1

Summary

Mode	Power (dBm)	Power (W)
2.4-2.4835GHz	-	-
BT-LE(1Mbps)	9.34	0.00859

Result

Mode	Result	Gain (dBi)	Power (dBm)	Power Limit (dBm)
BT-LE(1Mbps)	-	-	-	-
2402MHz_TnomVnom	Pass	1.83	9.21	30.00
2440MHz_TnomVnom	Pass	1.83	9.31	30.00
2480MHz_TnomVnom	Pass	1.83	9.34	30.00

DG = Directional Gain; **Port X** = Port X output power

Summary

Mode	PD (dBm/RBW)
2.4-2.4835GHz	-
BT-LE(1Mbps)	-5.99

RBW=3 kHz.

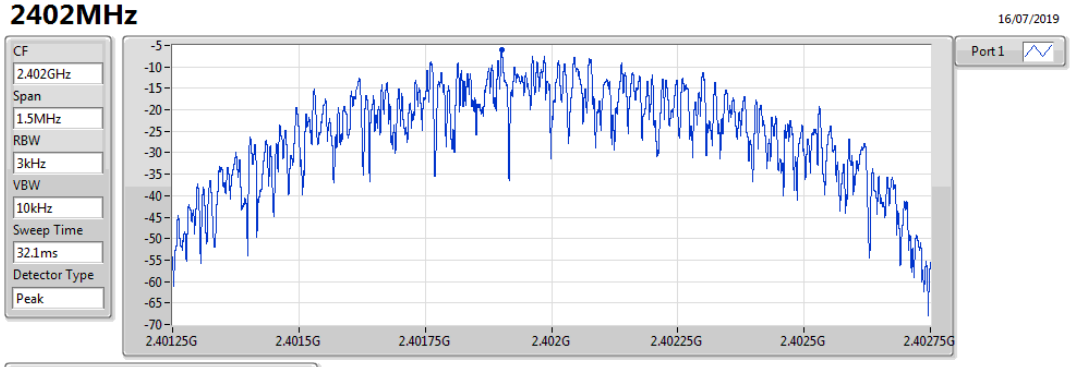
Result

Mode	Result	Gain (dBi)	PD (dBm/RBW)	PD Limit (dBm/RBW)
BT-LE(1Mbps)	-	-	-	-
2402MHz_TnomVnom	Pass	1.83	-6.07	8.00
2440MHz_TnomVnom	Pass	1.83	-5.99	8.00
2480MHz_TnomVnom	Pass	1.83	-6.96	8.00

DG = Directional Gain; RBW=3 kHz;
PD = trace bin-by-bin of each transmits port summing can be performed maximum power density; **Port X** = Port X power density;

BT-LE(1Mbps) **PSD**

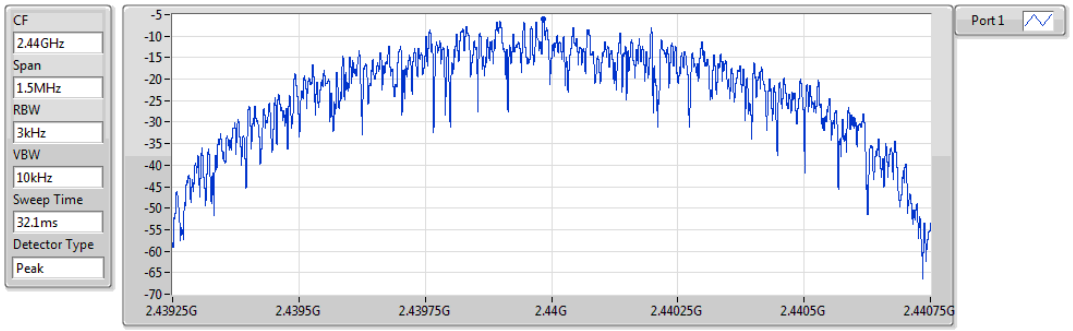
2402MHz



Sum	PD	Port 1
(dBm/RBW)	(dBm/RBW)	(dBm/RBW)
-6.07	-6.07	-6.07

BT-LE(1Mbps) **PSD**

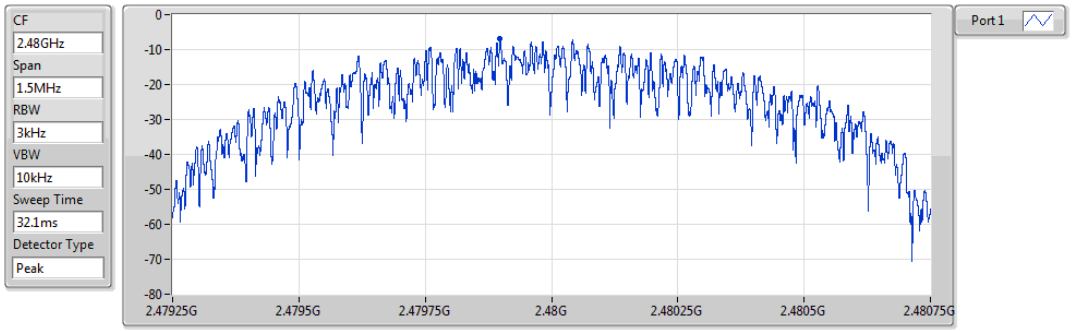
2440MHz



Sum	PD	Port 1
(dBm/RBW)	(dBm/RBW)	(dBm/RBW)
-5.99	-5.99	-5.99

BT-LE(1Mbps) **PSD**

2480MHz



Sum	PD	Port 1
(dBm/RBW)	(dBm/RBW)	(dBm/RBW)
-6.96	-6.96	-6.96

Summary

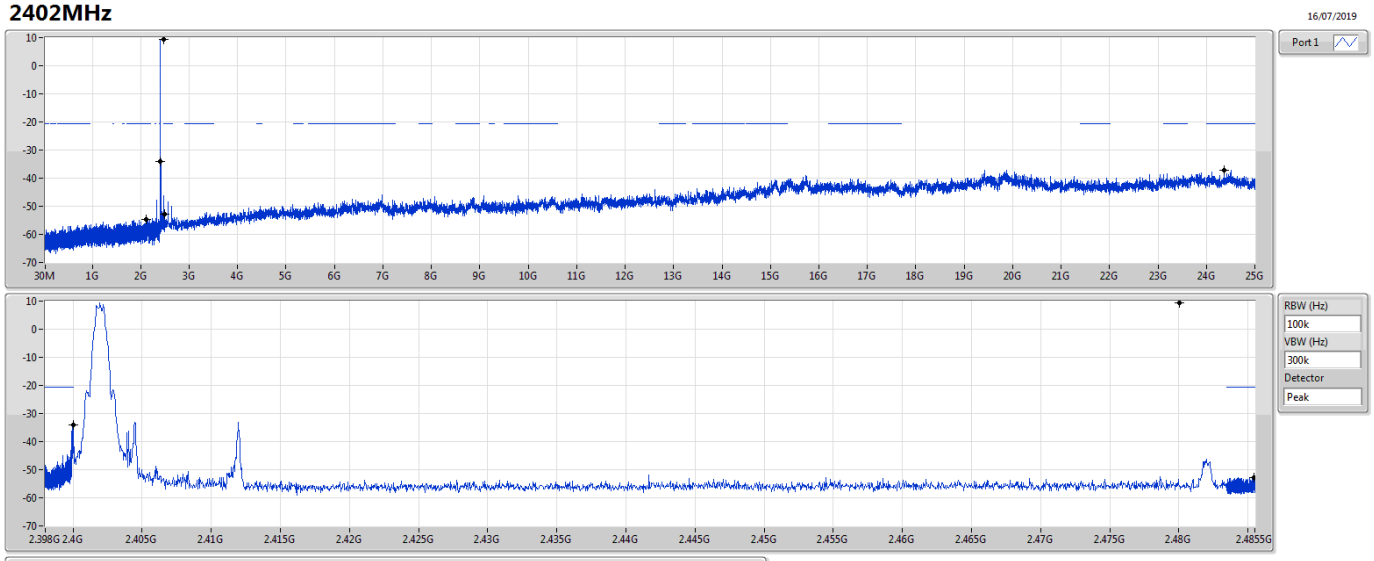
Mode	Result	Ref (Hz)	Ref (dBm)	Limit (dBm)	Freq (Hz)	Level (dBm)	Freq (Hz)	Level (dBm)	Freq (Hz)	Level (dBm)	Freq (Hz)	Level (dBm)	Port
2.4-2.4835GHz	-	-	-	-	-	-	-	-	-	-	-	-	-
BT-LE(1Mbps)	Pass	2.48003G	9.51	-20.49	2.12124G	-54.84	2.4G	-33.92	2.48541G	-52.80	24.36959G	-37.23	1

Result

Mode	Result	Ref (Hz)	Ref (dBm)	Limit (dBm)	Freq (Hz)	Level (dBm)	Freq (Hz)	Level (dBm)	Freq (Hz)	Level (dBm)	Freq (Hz)	Level (dBm)	Port
BT-LE(1Mbps)	-	-	-	-	-	-	-	-	-	-	-	-	-
2402MHz_TnomVnom	Pass	2.48003G	9.51	-20.49	2.12124G	-54.84	2.4G	-33.92	2.48541G	-52.80	24.36959G	-37.23	1
2440MHz_TnomVnom	Pass	2.48003G	9.51	-20.49	2.3906G	-54.27	2.39989G	-52.79	2.4845G	-52.62	24.48498G	-38.29	1
2480MHz_TnomVnom	Pass	2.48003G	9.51	-20.49	2.18251G	-54.45	2.39997G	-42.88	2.48377G	-48.45	23.16225G	-38.28	1

BT-LE(1Mbps) **CSE NdB**

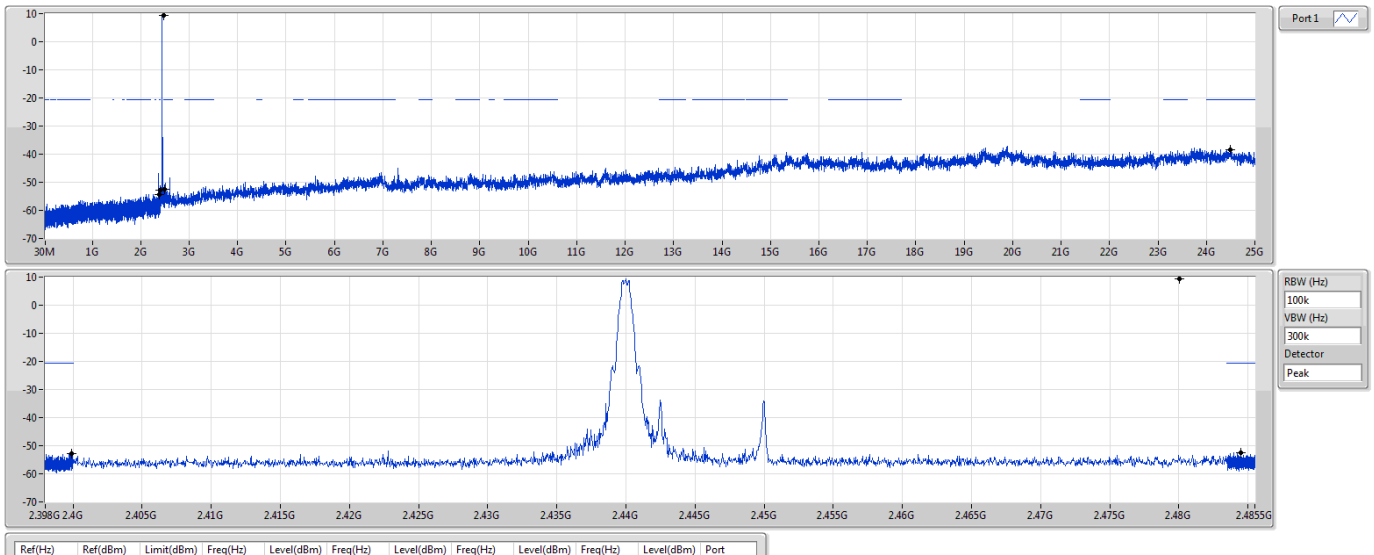
2402MHz



Ref(Hz)	Ref(dBm)	Limit(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Port
2.48003G	9.51	-20.49	2.12124G	-54.84	2.4G	-33.92	2.48541G	-52.80	24.36959G	-37.23	1

BT-LE(1Mbps) **CSE NdB**

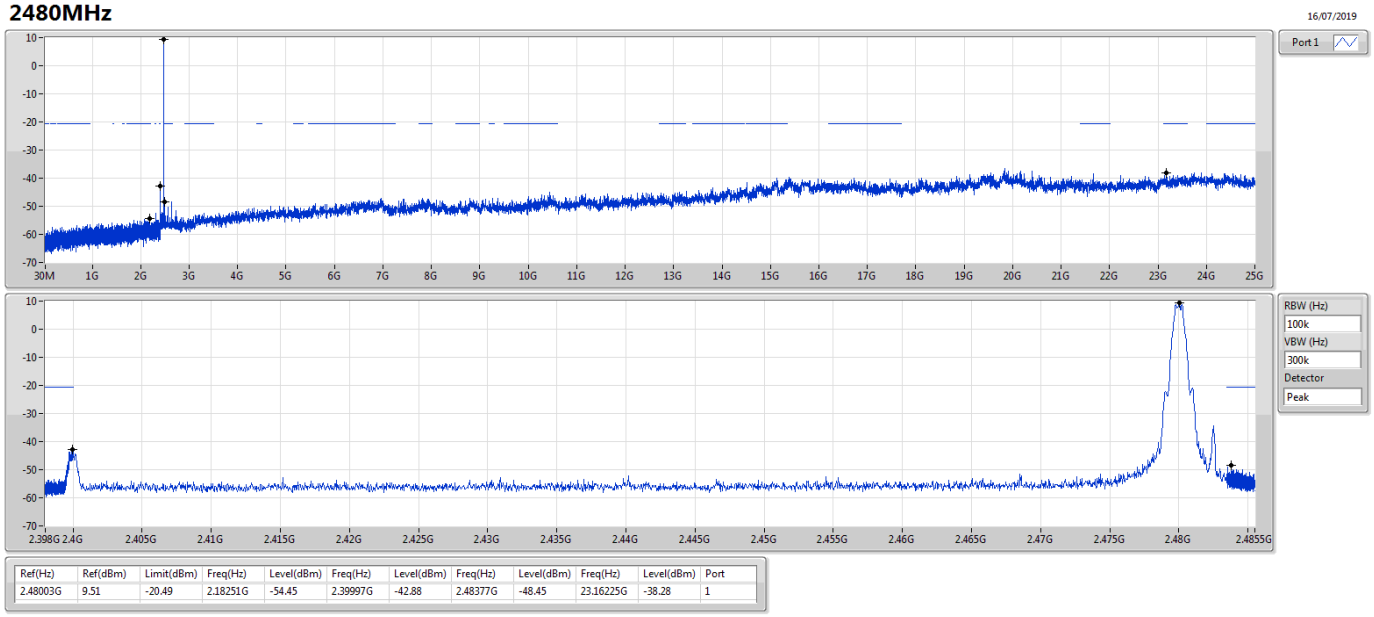
2440MHz



Ref(Hz)	Ref(dBm)	Limit(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Port
2.48003G	9.51	-20.49	2.3906G	-54.27	2.39989G	-52.79	2.4845G	-52.62	24.48498G	-38.29	1

BT-LE(1Mbps) **CSE NdB**

2480MHz



Ref(Hz)	Ref(dBm)	Limit(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Freq(Hz)	Level(dBm)	Port
2.48003G	9.51	-20.49	2.18251G	-54.45	2.39997G	-42.88	2.48377G	-48.45	23.16225G	-38.28	1

Summary

Mode	Result	Type	Freq (Hz)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Factor (dB)	Dist (m)	Condition	Azimuth (°)	Height (m)	Comments
2.4-2.4835GHz	-	-	-	-	-	-	-	-	-	-	-	-
BT-LE(1Mbps)	Pass	PK	551.86M	36.96	46.00	-9.04	-1.28	3	Horizontal	0	1.00	-

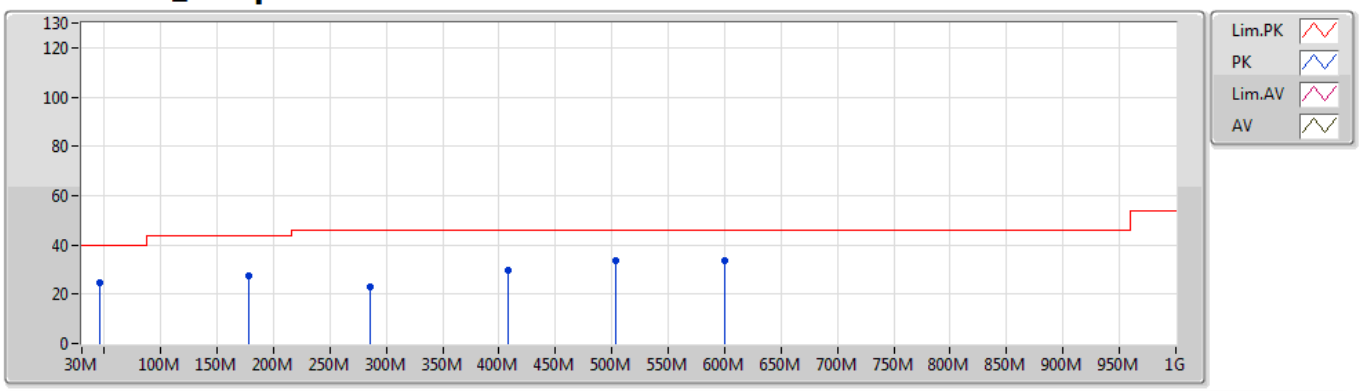
Result

Mode	Result	Type	Freq (Hz)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Factor (dB)	Dist (m)	Condition	Azimuth (°)	Height (m)	Comments
BT-LE(1Mbps)	-	-	-	-	-	-	-	-	-	-	-	-
2440MHz	Pass	PK	45.52M	24.57	40.00	-15.43	-11.97	3	Vertical	360	1.00	-
2440MHz	Pass	PK	177.44M	27.55	43.50	-15.95	-10.96	3	Vertical	360	1.00	-
2440MHz	Pass	PK	286.08M	23.08	46.00	-22.92	-6.18	3	Vertical	360	1.00	-
2440MHz	Pass	PK	408.3M	29.65	46.00	-16.35	-3.46	3	Vertical	360	1.00	-
2440MHz	Pass	PK	503.36M	33.88	46.00	-12.12	-2.42	3	Vertical	360	1.00	-
2440MHz	Pass	PK	600.36M	33.80	46.00	-12.20	-1.09	3	Vertical	360	1.00	-
2440MHz	Pass	PK	30M	23.33	40.00	-16.67	-4.40	3	Horizontal	0	1.00	-
2440MHz	Pass	PK	169.68M	30.87	43.50	-12.63	-10.78	3	Horizontal	0	1.00	-
2440MHz	Pass	PK	284.14M	30.92	46.00	-15.08	-6.23	3	Horizontal	0	1.00	-
2440MHz	Pass	PK	551.86M	36.96	46.00	-9.04	-1.28	3	Horizontal	0	1.00	-
2440MHz	Pass	PK	648.86M	33.87	46.00	-12.13	-0.50	3	Horizontal	0	1.00	-
2440MHz	Pass	PK	743.92M	34.81	46.00	-11.19	0.62	3	Horizontal	0	1.00	-

BT-LE(1Mbps)

16/07/2019

2440MHz_Adapter

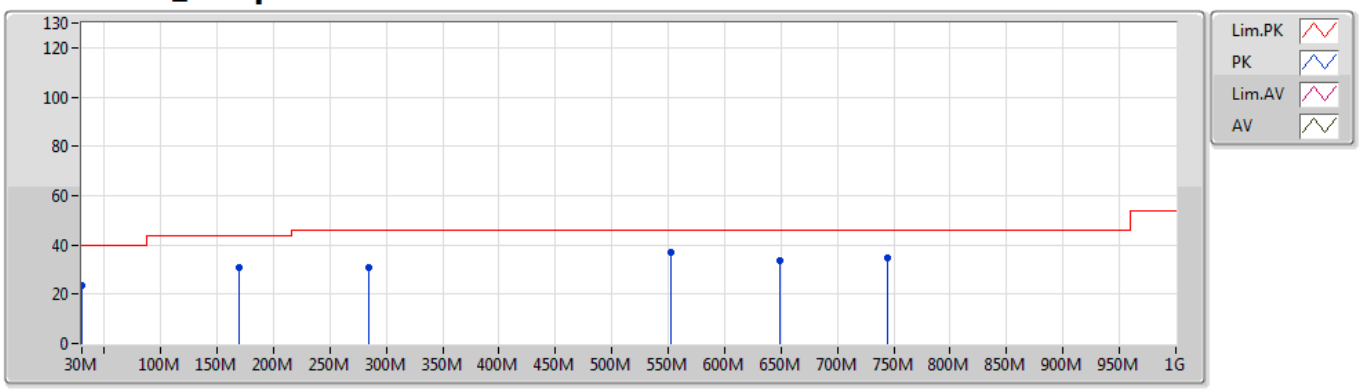


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
PK	45.52M	24.57	40.00	-15.43	-11.97	3	Vertical	360	1.00	-	36.54	14.96	0.75	27.68
PK	177.44M	27.55	43.50	-15.95	-10.96	3	Vertical	360	1.00	-	38.51	14.44	2.09	27.49
PK	286.08M	23.08	46.00	-22.92	-6.18	3	Vertical	360	1.00	-	29.26	18.06	2.93	27.17
PK	408.3M	29.65	46.00	-16.35	-3.46	3	Vertical	360	1.00	-	33.11	21.28	3.20	27.94
PK	503.36M	33.88	46.00	-12.12	-2.42	3	Vertical	360	1.00	-	36.30	22.68	3.33	28.43
PK	600.36M	33.80	46.00	-12.20	-1.09	3	Vertical	360	1.00	-	34.89	23.75	3.67	28.51

BT-LE(1Mbps)

16/07/2019

2440MHz_Adapter



Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
PK	30M	23.33	40.00	-16.67	-4.40	3	Horizontal	0	1.00	-	27.73	23.01	0.29	27.70
PK	169.68M	30.87	43.50	-12.63	-10.78	3	Horizontal	0	1.00	-	41.65	14.72	2.03	27.53
PK	284.14M	30.92	46.00	-15.08	-6.23	3	Horizontal	0	1.00	-	37.15	18.03	2.91	27.17
PK	551.86M	36.96	46.00	-9.04	-1.28	3	Horizontal	0	1.00	-	38.24	23.76	3.59	28.63
PK	648.86M	33.87	46.00	-12.13	-0.50	3	Horizontal	0	1.00	-	34.37	24.24	3.80	28.54
PK	743.92M	34.81	46.00	-11.19	0.62	3	Horizontal	0	1.00	-	34.19	24.86	4.11	28.35

Summary

Mode	Result	Type	Freq (Hz)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Factor (dB)	Dist (m)	Condition	Azimuth (°)	Height (m)	Comments
2.4-2.4835GHz	-	-	-	-	-	-	-	-	-	-	-	-
BT-LE(1Mbps)	Pass	AV	2.49G	51.62	54.00	-2.38	33.66	3	Vertical	99	1.00	-

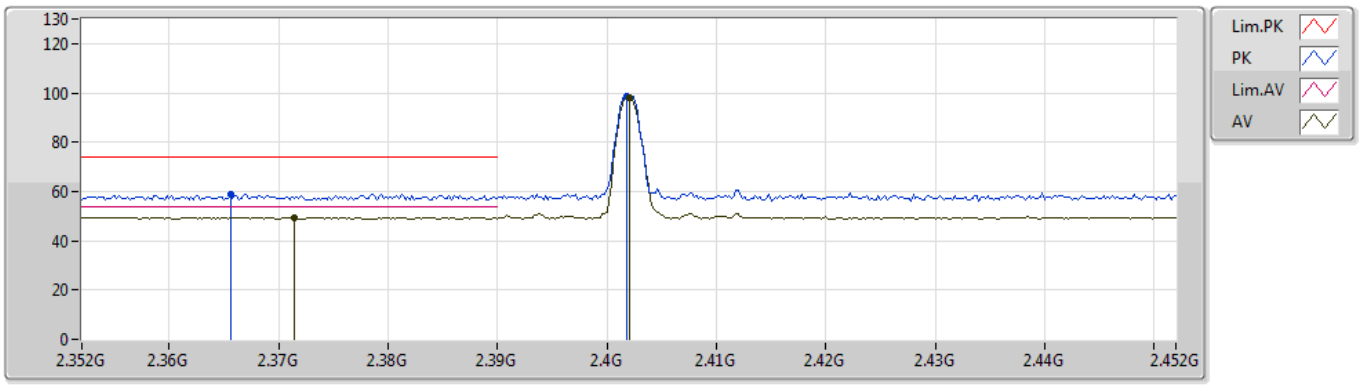
Result

Mode	Result	Type	Freq (Hz)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Factor (dB)	Dist (m)	Condition	Azimuth (°)	Height (m)	Comments
BT-LE(1Mbps)	-	-	-	-	-	-	-	-	-	-	-	-
2402MHz	Pass	AV	2.3714G	49.59	54.00	-4.41	33.83	3	Vertical	261	1.02	-
2402MHz	Pass	AV	2.402G	98.15	Inf	-Inf	33.71	3	Vertical	261	1.02	-
2402MHz	Pass	PK	2.3656G	58.98	74.00	-15.02	33.86	3	Vertical	261	1.02	-
2402MHz	Pass	PK	2.4018G	98.65	Inf	-Inf	33.71	3	Vertical	261	1.02	-
2402MHz	Pass	AV	2.3664G	49.63	54.00	-4.37	33.85	3	Horizontal	295	1.34	-
2402MHz	Pass	AV	2.402G	99.13	Inf	-Inf	33.71	3	Horizontal	295	1.34	-
2402MHz	Pass	PK	2.3526G	60.17	74.00	-13.83	33.91	3	Horizontal	295	1.34	-
2402MHz	Pass	PK	2.402G	99.67	Inf	-Inf	33.71	3	Horizontal	295	1.34	-
2402MHz	Pass	AV	4.8088G	39.10	54.00	-14.90	10.22	3	Vertical	202	1.50	-
2402MHz	Pass	PK	4.80784G	48.89	74.00	-25.11	10.22	3	Vertical	202	1.50	-
2402MHz	Pass	AV	4.81264G	39.05	54.00	-14.95	10.23	3	Horizontal	57	1.50	-
2402MHz	Pass	PK	4.80268G	48.77	74.00	-25.23	10.22	3	Horizontal	57	1.50	-
2440MHz	Pass	AV	2.36G	51.50	54.00	-2.50	33.88	3	Vertical	269	1.01	-
2440MHz	Pass	AV	2.44G	99.83	Inf	-Inf	33.69	3	Vertical	269	1.01	-
2440MHz	Pass	AV	2.4876G	49.80	54.00	-4.20	33.66	3	Vertical	269	1.01	-
2440MHz	Pass	PK	2.3812G	58.71	74.00	-15.29	33.79	3	Vertical	269	1.01	-
2440MHz	Pass	PK	2.44G	100.35	Inf	-Inf	33.69	3	Vertical	269	1.01	-
2440MHz	Pass	PK	2.494G	59.14	74.00	-14.86	33.66	3	Vertical	269	1.01	-
2440MHz	Pass	AV	2.36G	50.13	54.00	-3.87	33.88	3	Horizontal	295	2.01	-
2440MHz	Pass	AV	2.44G	98.91	Inf	-Inf	33.69	3	Horizontal	295	2.01	-
2440MHz	Pass	AV	2.4944G	50.00	54.00	-4.00	33.66	3	Horizontal	295	2.01	-
2440MHz	Pass	PK	2.3488G	58.75	74.00	-15.25	33.92	3	Horizontal	295	2.01	-
2440MHz	Pass	PK	2.44G	99.49	Inf	-Inf	33.69	3	Horizontal	295	2.01	-
2440MHz	Pass	PK	2.4996G	59.03	74.00	-14.97	33.65	3	Horizontal	295	2.01	-
2440MHz	Pass	AV	4.89344G	39.07	54.00	-14.93	10.30	3	Vertical	133	2.39	-
2440MHz	Pass	PK	4.88456G	49.23	74.00	-24.77	10.30	3	Vertical	133	2.39	-
2440MHz	Pass	AV	4.88402G	38.78	54.00	-15.22	10.29	3	Horizontal	161	1.79	-
2440MHz	Pass	PK	4.89434G	48.37	74.00	-25.63	10.30	3	Horizontal	161	1.79	-
2480MHz	Pass	AV	2.48G	100.37	Inf	-Inf	33.67	3	Vertical	99	1.00	-
2480MHz	Pass	AV	2.49G	51.62	54.00	-2.38	33.66	3	Vertical	99	1.00	-
2480MHz	Pass	PK	2.4798G	100.87	Inf	-Inf	33.66	3	Vertical	99	1.00	-
2480MHz	Pass	PK	2.49G	60.45	74.00	-13.55	33.66	3	Vertical	99	1.00	-
2480MHz	Pass	AV	2.48G	91.58	Inf	-Inf	33.67	3	Horizontal	294	1.50	-
2480MHz	Pass	AV	2.4984G	49.88	54.00	-4.12	33.65	3	Horizontal	294	1.50	-
2480MHz	Pass	PK	2.4798G	92.15	Inf	-Inf	33.66	3	Horizontal	294	1.50	-
2480MHz	Pass	PK	2.4908G	59.27	74.00	-14.73	33.66	3	Horizontal	294	1.50	-
2480MHz	Pass	AV	4.94536G	38.76	54.00	-15.24	10.26	3	Vertical	342	1.80	-
2480MHz	Pass	PK	4.9597G	48.01	74.00	-25.99	10.26	3	Vertical	342	1.80	-
2480MHz	Pass	AV	4.96828G	39.05	54.00	-14.95	10.24	3	Horizontal	34	1.88	-
2480MHz	Pass	PK	4.95382G	48.52	74.00	-25.48	10.26	3	Horizontal	34	1.88	-

BT-LE(1Mbps)

14/07/2019

2402MHz_TX

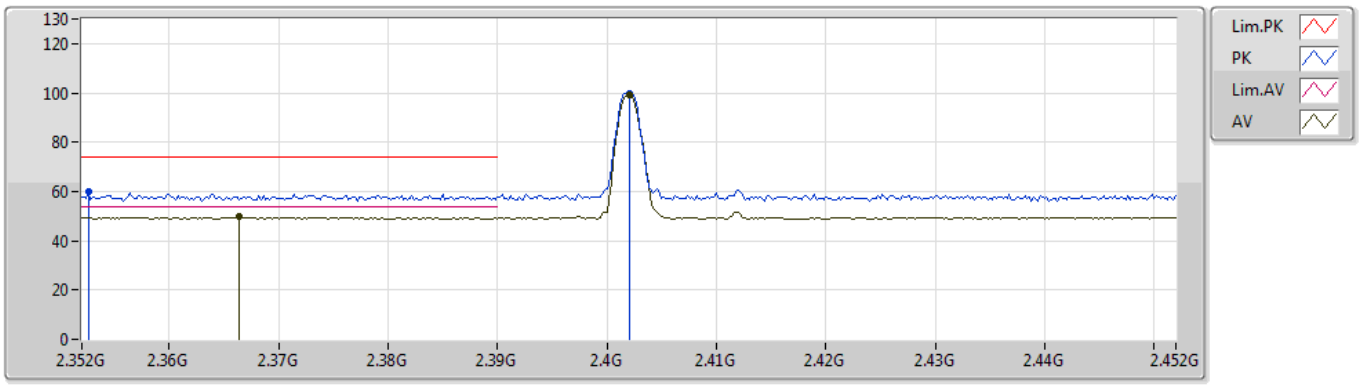


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	2.3714G	49.59	54.00	-4.41	33.83	3	Vertical	261	1.02	-	15.76	27.71	6.12	-
AV	2.402G	98.15	Inf	-Inf	33.71	3	Vertical	261	1.02	-	64.44	27.60	6.11	-
PK	2.3656G	58.98	74.00	-15.02	33.86	3	Vertical	261	1.02	-	25.12	27.74	6.12	-
PK	2.4018G	98.65	Inf	-Inf	33.71	3	Vertical	261	1.02	-	64.94	27.60	6.11	-

BT-LE(1Mbps)

2402MHz_TX

14/07/2019

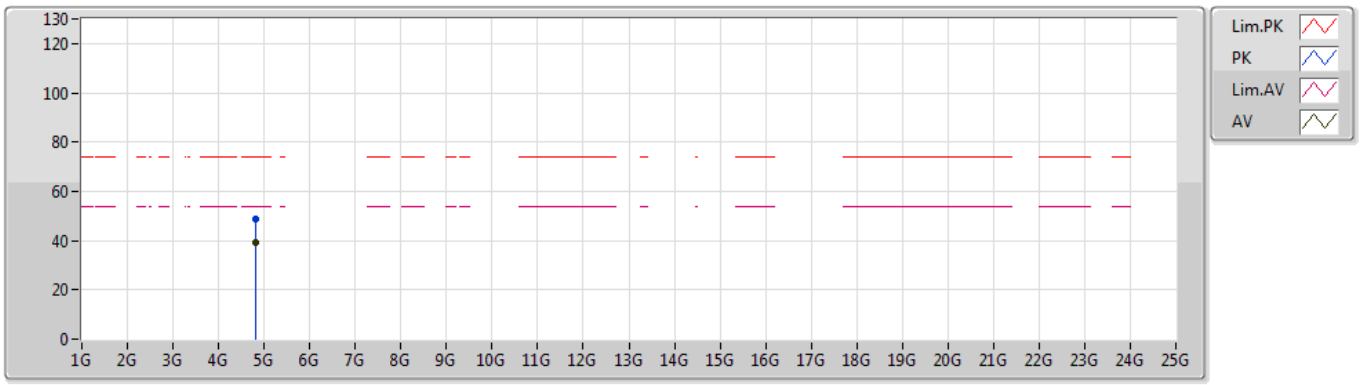


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	2.3664G	49.63	54.00	-4.37	33.85	3	Horizontal	295	1.34	-	15.78	27.73	6.12	-
AV	2.402G	99.13	Inf	-Inf	33.71	3	Horizontal	295	1.34	-	65.42	27.60	6.11	-
PK	2.3526G	60.17	74.00	-13.83	33.91	3	Horizontal	295	1.34	-	26.26	27.79	6.12	-
PK	2.402G	99.67	Inf	-Inf	33.71	3	Horizontal	295	1.34	-	65.96	27.60	6.11	-

BT-LE(1Mbps)

14/07/2019

2402MHz_TX

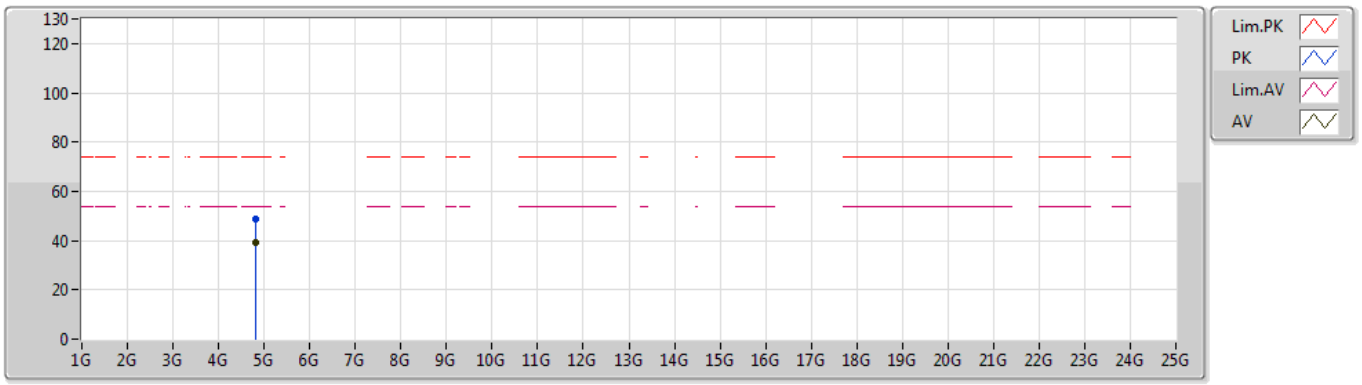


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	4.8088G	39.10	54.00	-14.90	10.22	3	Vertical	202	1.50	-	28.88	31.10	8.90	29.78
PK	4.80784G	48.89	74.00	-25.11	10.22	3	Vertical	202	1.50	-	38.67	31.10	8.90	29.78

BT-LE(1Mbps)

14/07/2019

2402MHz_TX

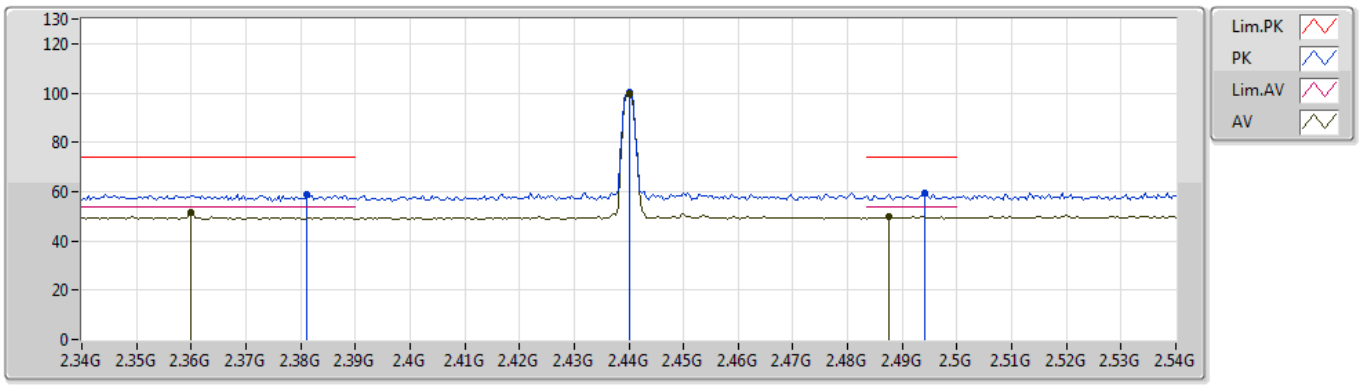


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	4.81264G	39.05	54.00	-14.95	10.23	3	Horizontal	57	1.50	-	28.82	31.10	8.91	29.78
PK	4.80268G	48.77	74.00	-25.23	10.22	3	Horizontal	57	1.50	-	38.55	31.10	8.90	29.78

BT-LE(1Mbps)

2440MHz_TX

14/07/2019

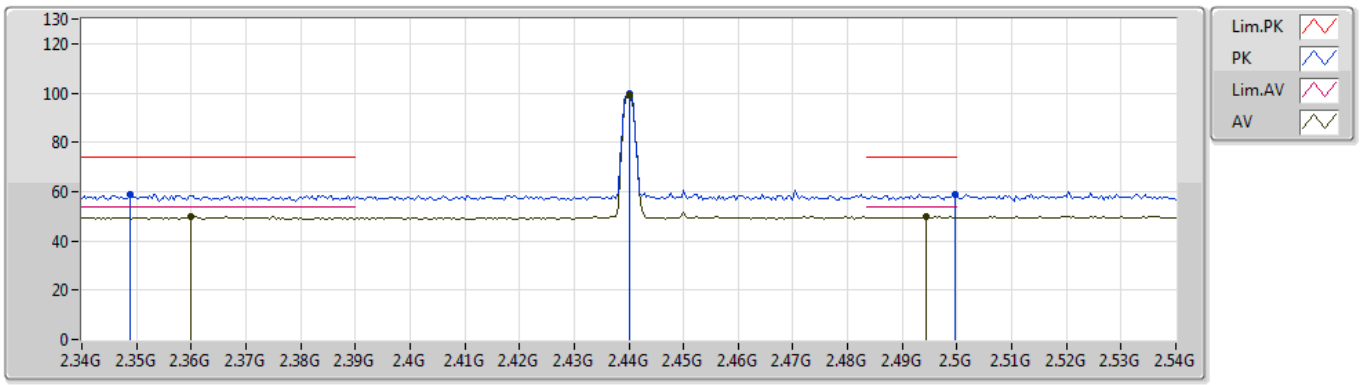


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	2.36G	51.50	54.00	-2.50	33.88	3	Vertical	269	1.01	-	17.62	27.76	6.12	-
AV	2.44G	99.83	Inf	-Inf	33.69	3	Vertical	269	1.01	-	66.14	27.56	6.13	-
AV	2.4876G	49.80	54.00	-4.20	33.66	3	Vertical	269	1.01	-	16.14	27.51	6.15	-
PK	2.3812G	58.71	74.00	-15.29	33.79	3	Vertical	269	1.01	-	24.92	27.68	6.11	-
PK	2.44G	100.35	Inf	-Inf	33.69	3	Vertical	269	1.01	-	66.66	27.56	6.13	-
PK	2.494G	59.14	74.00	-14.86	33.66	3	Vertical	269	1.01	-	25.48	27.51	6.15	-

BT-LE(1Mbps)

2440MHz_TX

14/07/2019

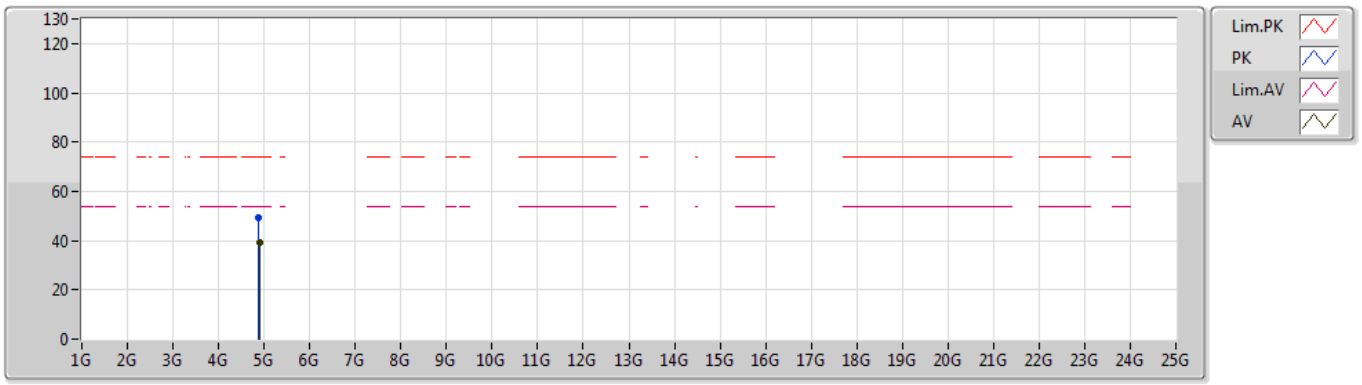


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	2.36G	50.13	54.00	-3.87	33.88	3	Horizontal	295	2.01	-	16.25	27.76	6.12	-
AV	2.44G	98.91	Inf	-Inf	33.69	3	Horizontal	295	2.01	-	65.22	27.56	6.13	-
AV	2.4944G	50.00	54.00	-4.00	33.66	3	Horizontal	295	2.01	-	16.34	27.51	6.15	-
PK	2.3488G	58.75	74.00	-15.25	33.92	3	Horizontal	295	2.01	-	24.83	27.80	6.12	-
PK	2.44G	99.49	Inf	-Inf	33.69	3	Horizontal	295	2.01	-	65.80	27.56	6.13	-
PK	2.4996G	59.03	74.00	-14.97	33.65	3	Horizontal	295	2.01	-	25.38	27.50	6.15	-

BT-LE(1Mbps)

14/07/2019

2440MHz_TX

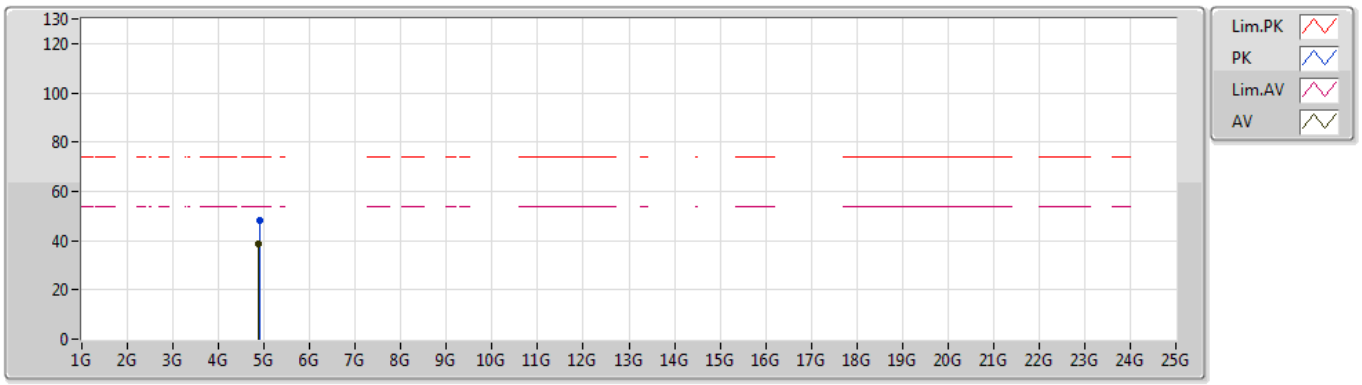


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	4.89344G	39.07	54.00	-14.93	10.30	3	Vertical	133	2.39	-	28.77	31.10	8.97	29.77
PK	4.88456G	49.23	74.00	-24.77	10.30	3	Vertical	133	2.39	-	38.93	31.10	8.97	29.77

BT-LE(1Mbps)

14/07/2019

2440MHz_TX

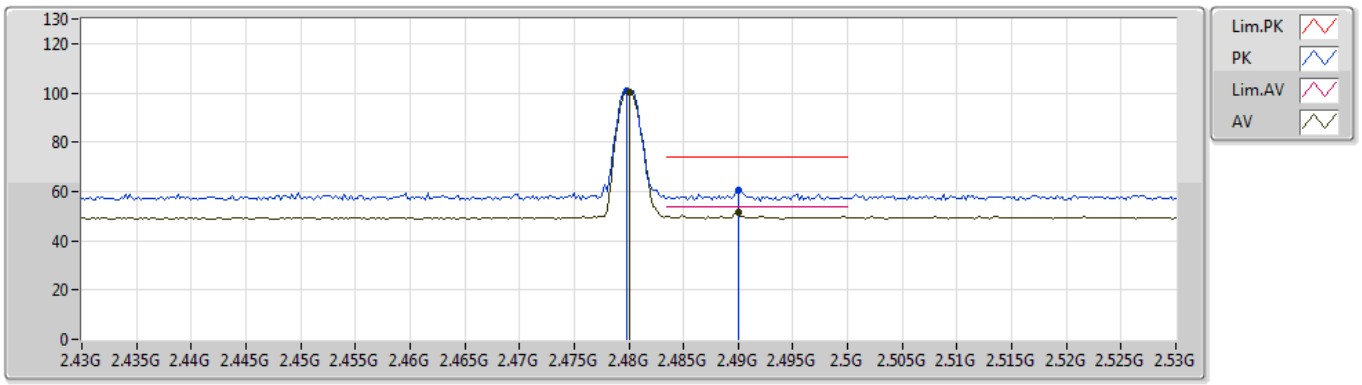


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	4.88402G	38.78	54.00	-15.22	10.29	3	Horizontal	161	1.79	-	28.49	31.10	8.96	29.77
PK	4.89434G	48.37	74.00	-25.63	10.30	3	Horizontal	161	1.79	-	38.07	31.10	8.97	29.77

BT-LE(1Mbps)

2480MHz_TX

14/07/2019

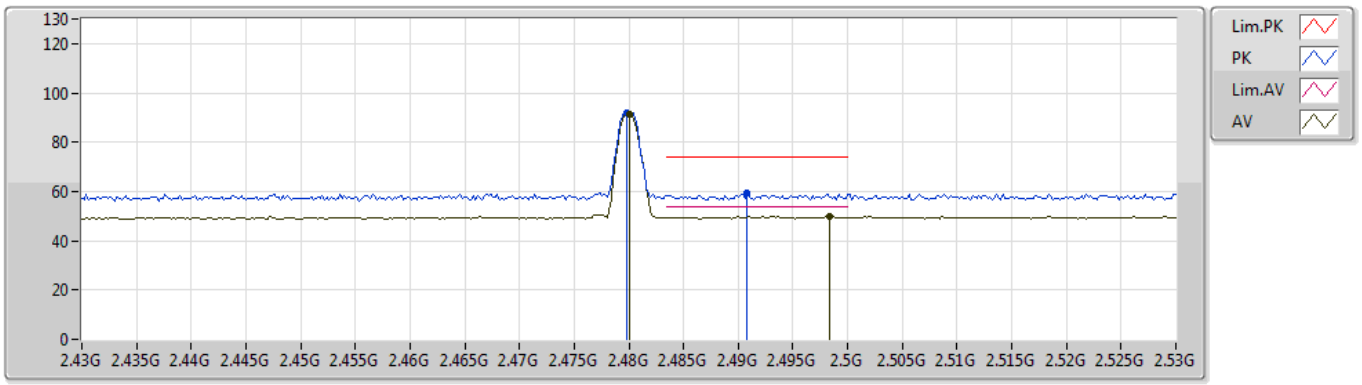


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	2.48G	100.37	Inf	-Inf	33.67	3	Vertical	99	1.00	-	66.70	27.52	6.15	-
AV	2.49G	51.62	54.00	-2.38	33.66	3	Vertical	99	1.00	-	17.96	27.51	6.15	-
PK	2.4798G	100.87	Inf	-Inf	33.66	3	Vertical	99	1.00	-	67.21	27.52	6.14	-
PK	2.49G	60.45	74.00	-13.55	33.66	3	Vertical	99	1.00	-	26.79	27.51	6.15	-

BT-LE(1Mbps)

2480MHz_TX

14/07/2019

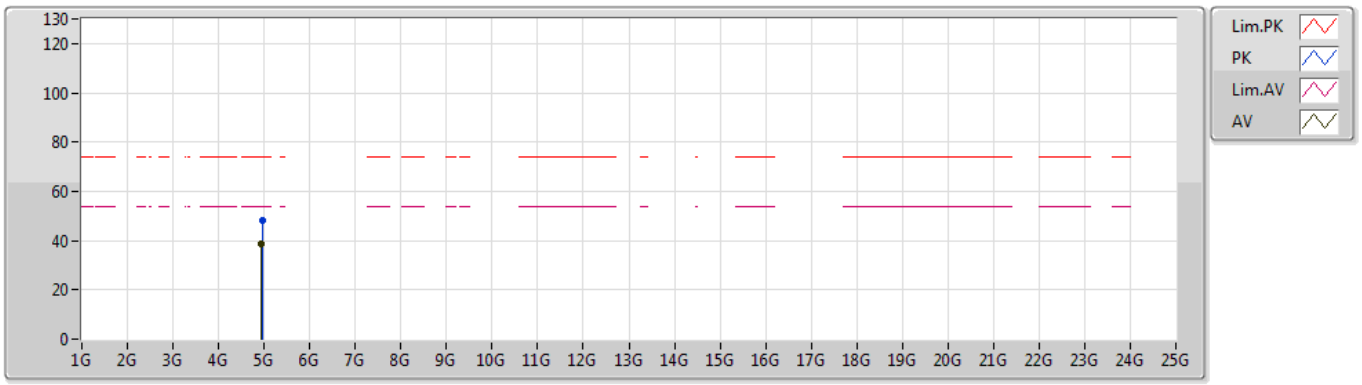


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	2.48G	91.58	Inf	-Inf	33.67	3	Horizontal	294	1.50	-	57.91	27.52	6.15	-
AV	2.4984G	49.88	54.00	-4.12	33.65	3	Horizontal	294	1.50	-	16.23	27.50	6.15	-
PK	2.4798G	92.15	Inf	-Inf	33.66	3	Horizontal	294	1.50	-	58.49	27.52	6.14	-
PK	2.4908G	59.27	74.00	-14.73	33.66	3	Horizontal	294	1.50	-	25.61	27.51	6.15	-

BT-LE(1Mbps)

14/07/2019

2480MHz_TX

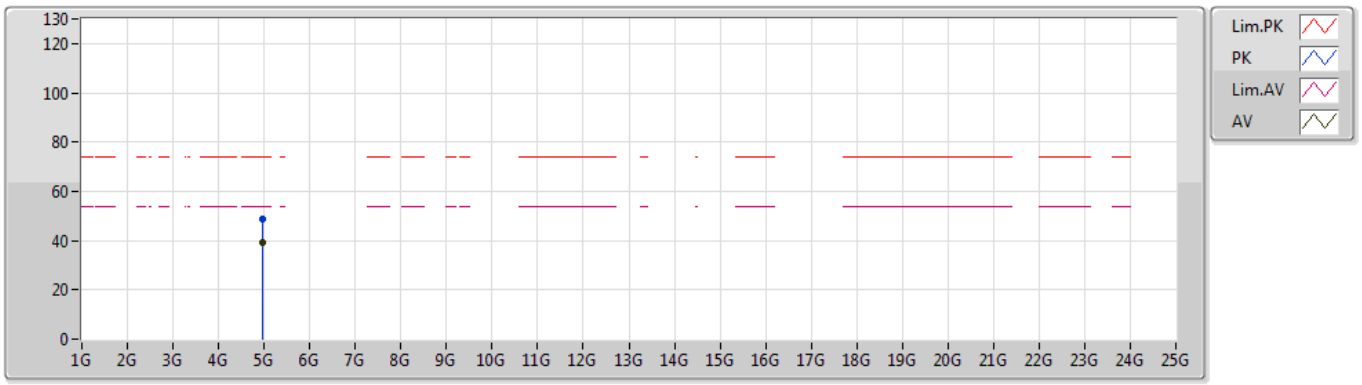


Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	4.94536G	38.76	54.00	-15.24	10.26	3	Vertical	342	1.80	-	28.50	31.28	9.01	30.03
PK	4.9597G	48.01	74.00	-25.99	10.26	3	Vertical	342	1.80	-	37.75	31.34	9.03	30.11

BT-LE(1Mbps)

14/07/2019

2480MHz_TX



Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB)	(m)		(°)	(m)		(dBuV)	(dB)	(dB)	(dB)
AV	4.96828G	39.05	54.00	-14.95	10.24	3	Horizontal	34	1.88	-	28.81	31.37	9.03	30.16
PK	4.95382G	48.52	74.00	-25.48	10.26	3	Horizontal	34	1.88	-	38.26	31.32	9.02	30.08