SPURIOUS CONDUCTED EMISSIONS - BAND 25

XMit 2020.03.25.0

Testing was performed using the mode(s) of operation and configuration(s) noted within the report. The individuals and/or the organization requesting the test provided the modes, configurations and settings used to complete the evaluation. The actual test parameters are specified in the test data, this includes items such as investigated frequency range (scanned) and test levels. The testing methods and performance specifications, as well as the test site used for the evaluation are indicated in the test data.

TEST EQUIPMENT

Description	Manufacturer	Model	ID	Last Cal.	Cal. Due
Analyzer - Spectrum Analyzer	Agilent	N9010A	AFL	27-Feb-20	27-Feb-21
Generator - Signal	Keysight	N5171B-506	TEW	2-May-18	2-May-21
Generator - Signal	Agilent	N5173B	TIW	5-Jul-17	5-Jul-20

TEST DESCRIPTION

The antenna port spurious emissions were measured at the RF output terminal of the EUT through 4 different attenuation configurations which continues through to the RF input of the spectrum analyzer. Analyzer plots utilizing a resolution bandwidth called out by the client's test plan were made for each modulation type from 9 KHz to 22 GHz. The peak conducted power of spurious emissions, up to the 10th harmonic of the transmit frequency, were investigated to ensure they were less than the limits also called out by the client's test plan shown below.

The measurement methods are detailed in KDB971168 D01v03 section 6 and ANSI C63.26-2015.

Per FCC 2.1057(a)(1), the upper level of measurement is the 10th harmonic of the highest fundamental frequency.

These measurements are for frequency band after the first 1.0 MHz bands immediately outside and adjacent to the frequency block.

Per section FCC 24.238(a), the power of any emission outside of the authorized operating frequency range cannot exceed -13 dBm for a 1 MHz measurement bandwidth. The limit is adjusted to -19 dBm [-13 dBm -10 log (4)] per FCC KDB 662911D01 v02r01 because the BTS may operate as a 4 port MIMO transmitter.

The limit for the 9kHz to 150kHz frequency range was adjusted to –49dBm to correct for a spectrum analyzer RBW of 1kHz versus required RBW of 1MHz [i.e.: -49dBm = -19dBm -10log(1MHz/1kHz)]. The limit for the 150kHz to 20MHz frequency range was adjusted to –39dBm to correct for a spectrum analyzer RBW of 10kHz versus required RBW of 1MHz [i.e.: -39dBm = -19dBm -10log(1MHz/10kHz)]. The required limit of -19dBm with a RBW of > 1MHz was used for all other frequency ranges.

RF conducted emissions testing was performed only on one port. The testing was performed on the same version of hardware (AHFIG) as the original certification test. The AHFIG antenna ports are essentially electrically identical (the RF power variation between antenna ports is small as shown in the original certification testing) and antenna port 4 was selected to perform the testing under this effort as allowed by ANSI C63.26-2015 paragraph 5.7.2i.

Carrier bandwidths of 10, 15, & 20MHz were verified using NB IoT GB carriers under this effort. The LTE modulation type for this testing was set up according to 3GPP TS 36.141 E-UTRA Test Models and is “E-TM 1.1 (QPSK modulation type) with N-TM (narrow band IoT)”.

SPURIOUS CONDUCTED EMISSIONS - BAND 25

element

TbtTx 2020.06.08.0 BETA XMit 2020.03.25.0

EUT:	**AHFIG**			**Work Order:**	**NOKI0016**
Serial Number:	**K9191322351**			**Date:**	**23-Jun-20**
Customer:	**Nokia Solutions and Networks**			**Temperature:**	**23.1 °C**
Attendees:	**Mitchell Hill, John Rattanavong**			**Humidity:**	**51.7% RH**
Project:	**None**			**Barometric Pres.:**	**1015 mbar**
Tested by:	**Brandon Hobbs**	**Power:**	**54 VDC**	**Job Site:**	**TX05**

TEST SPECIFICATIONS	**Test Method**
FCC 24E:2020	ANSI C63.26:2015

COMMENTS

All measurement path losses were accounted for in the reference level offest including any attenuators, filters and DC blocks. The carrier was set to maximum for all testing.

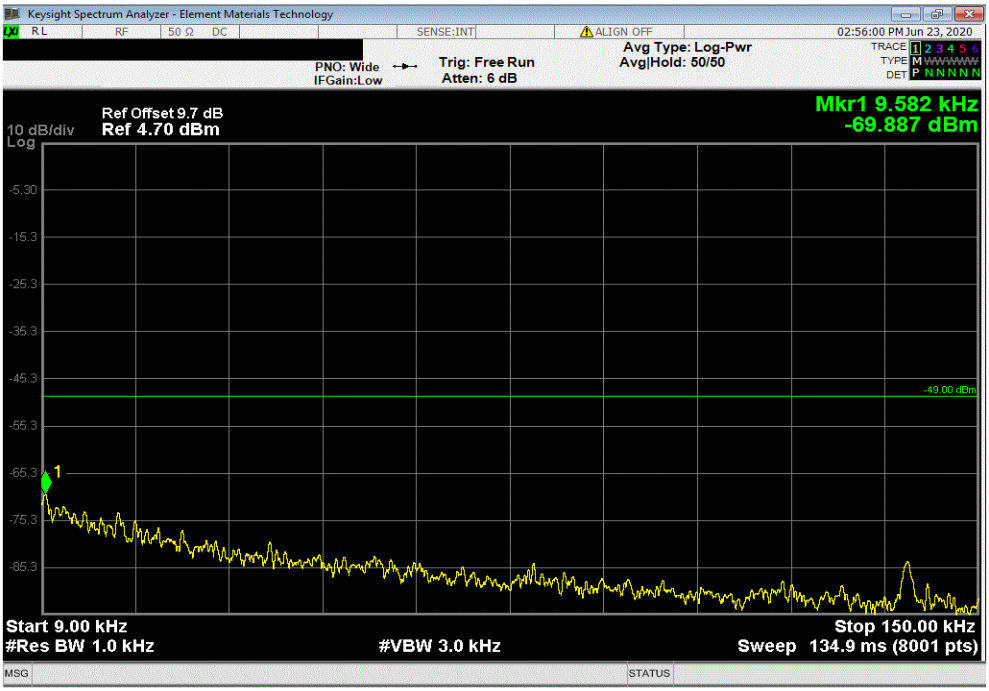
DEVIATIONS FROM TEST STANDARD

None

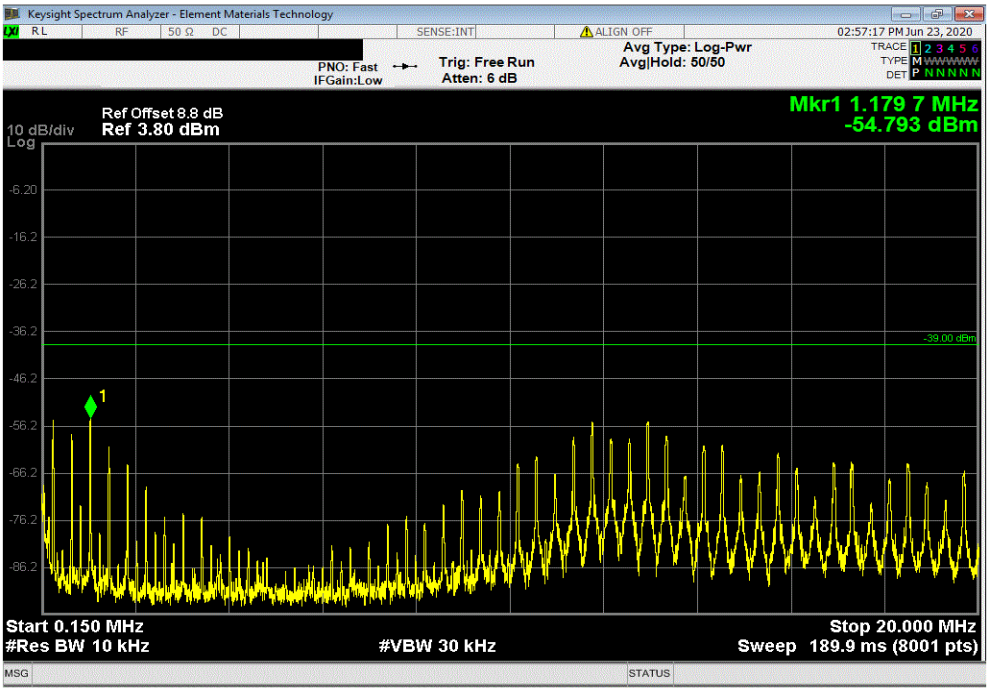
Configuration #	**5,6,7,8**	*Signature*

		Frequency Range	**Measured Freq (MHz)**	**Max Value (dBm)**	**Limit < (dBm)**	**Result**
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz						
10 MHz Bandwidth						
QPSK Modulation						
	Mid Channel 1962.5 MHz	9 kHz - 150 kHz	0.01	-69.89	-49	Pass
	Mid Channel 1962.5 MHz	150 kHz - 20 MHz	1.18	-54.79	-39	Pass
	Mid Channel 1962.5 MHz	20 MHz - 3 GHz	2646.13	-25.06	-19	Pass
	Mid Channel 1962.5 MHz	3 GHz - 10 GHz	3755.13	-37.5	-19	Pass
	Mid Channel 1962.5 MHz	10 GHz - 18 GHz	14809	-35.99	-19	Pass
	Mid Channel 1962.5 MHz	18 GHz - 22 GHz	21446	-26.38	-19	Pass
15 MHz Bandwidth						
QPSK Modulation						
	Mid Channel 1962.5 MHz	9 kHz - 150 kHz	0.01	-70.59	-49	Pass
	Mid Channel 1962.5 MHz	150 kHz - 20 MHz	1.18	-54.81	-39	Pass
	Mid Channel 1962.5 MHz	20 MHz - 3 GHz	2611.86	-24.68	-19	Pass
	Mid Channel 1962.5 MHz	3 GHz - 10 GHz	3756	-38.16	-19	Pass
	Mid Channel 1962.5 MHz	10 GHz - 18 GHz	14277	-35.75	-19	Pass
	Mid Channel 1962.5 MHz	18 GHz - 22 GHz	21839	-25.83	-19	Pass
20 MHz Bandwidth						
QPSK Modulation						
	Mid Channel 1962.5 MHz	9 kHz - 150 kHz	0.01	-69.97	-49	Pass
	Mid Channel 1962.5 MHz	150 kHz - 20 MHz	1.18	-54.67	-39	Pass
	Mid Channel 1962.5 MHz	20 MHz - 3 GHz	2643.15	-25.29	-19	Pass
	Mid Channel 1962.5 MHz	3 GHz - 10 GHz	3808.5	-37.96	-19	Pass
	Mid Channel 1962.5 MHz	10 GHz - 18 GHz	15739	-35.98	-19	Pass
	Mid Channel 1962.5 MHz	18 GHz - 22 GHz	21963	-26.51	-19	Pass

Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 10 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
9 kHz - 150 kHz		0.01	-69.89	-49	Pass

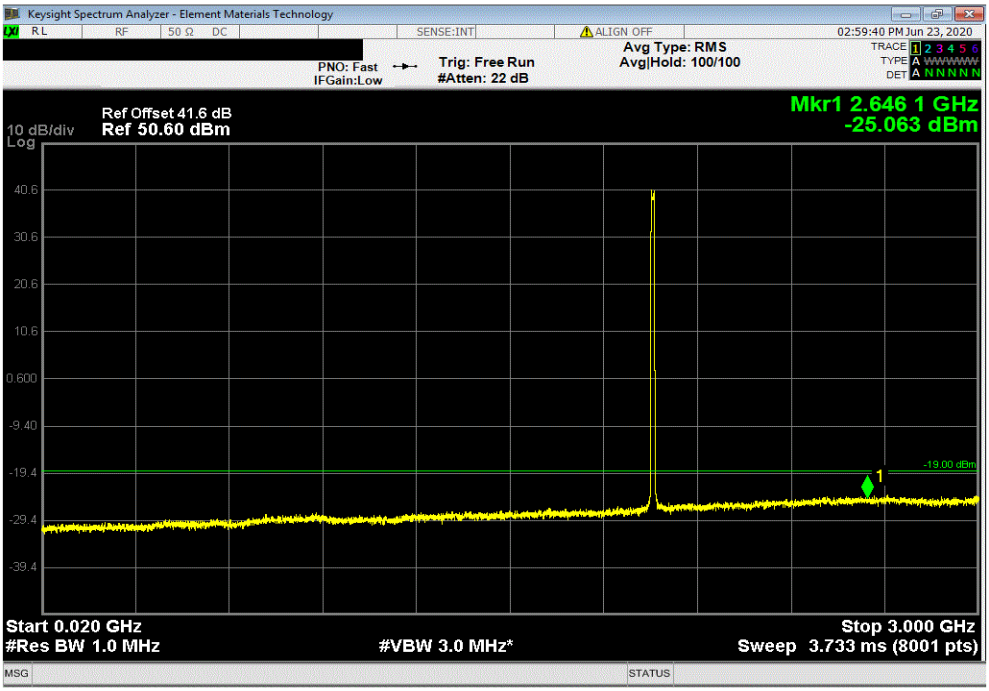


Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 10 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
150 kHz - 20 MHz	1.18	-54.79	-39	Pass

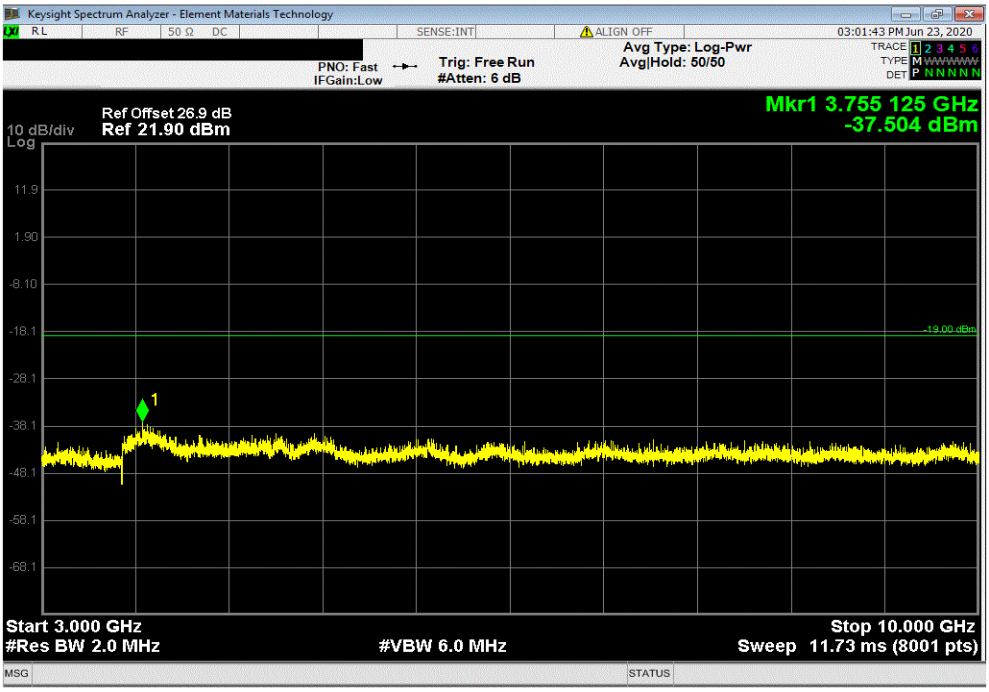


SPURIOUS CONDUCTED EMISSIONS - BAND 25

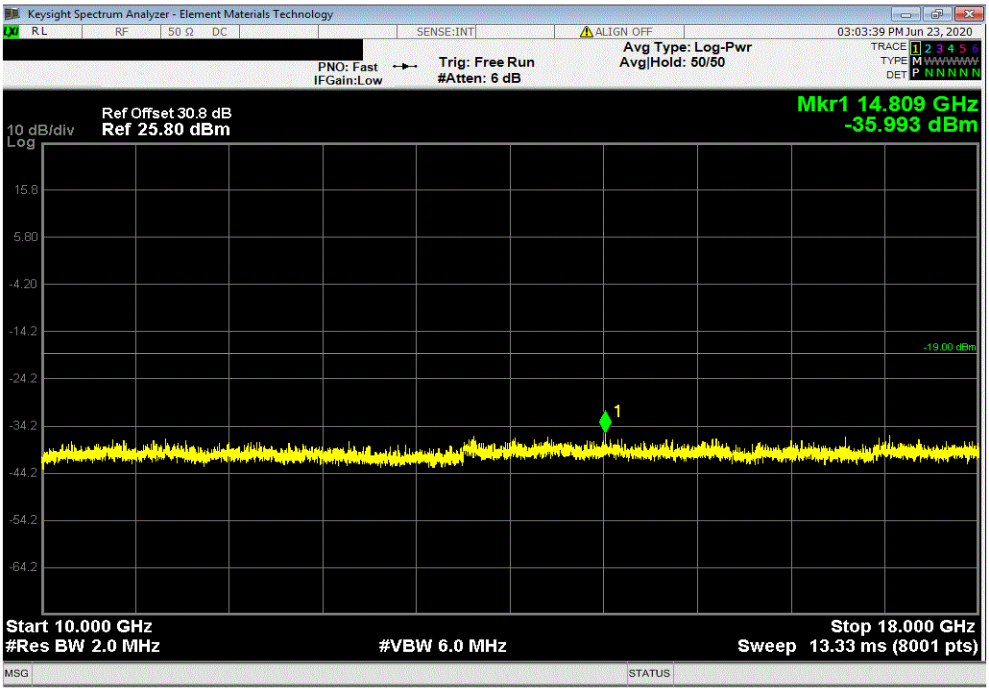
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 10 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
20 MHz - 3 GHz		2646.13	-25.06	-19	Pass



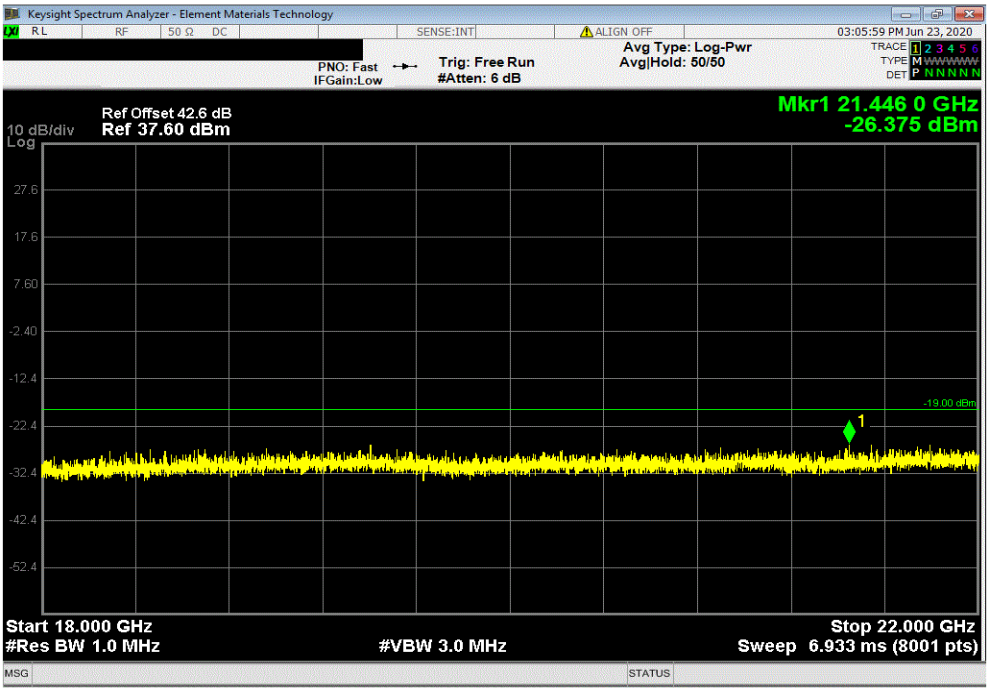
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 10 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
3 GHz - 10 GHz		3755.13	-37.5	-19	Pass



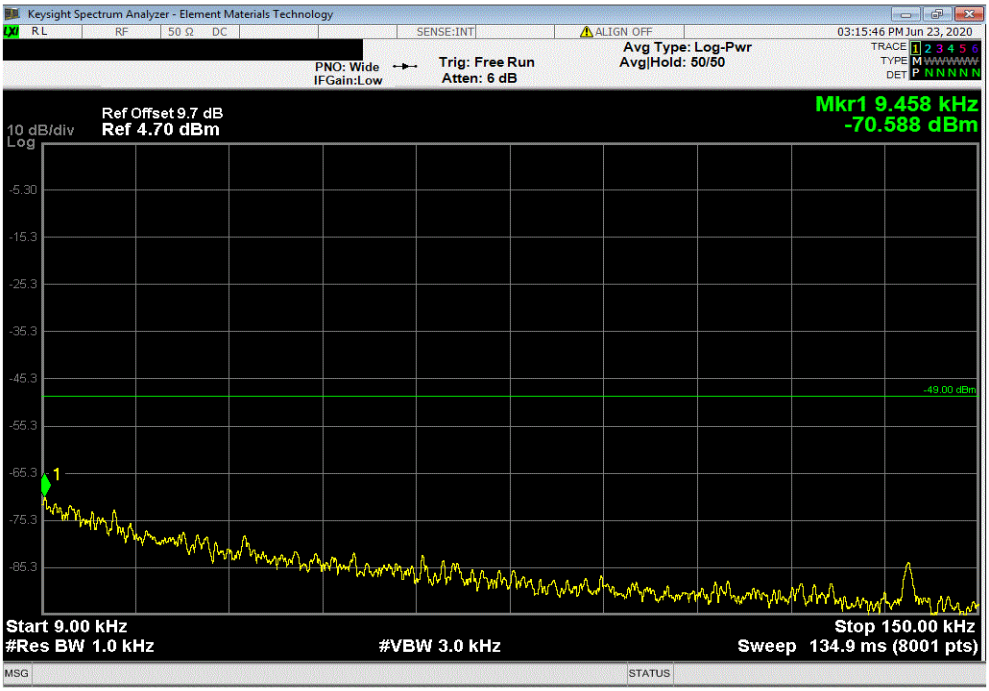
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 10 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	**Measured Freq (MHz)**	**Max Value (dBm)**	**Limit < (dBm)**	**Result**
10 GHz - 18 GHz	14809	-35.99	-19	Pass



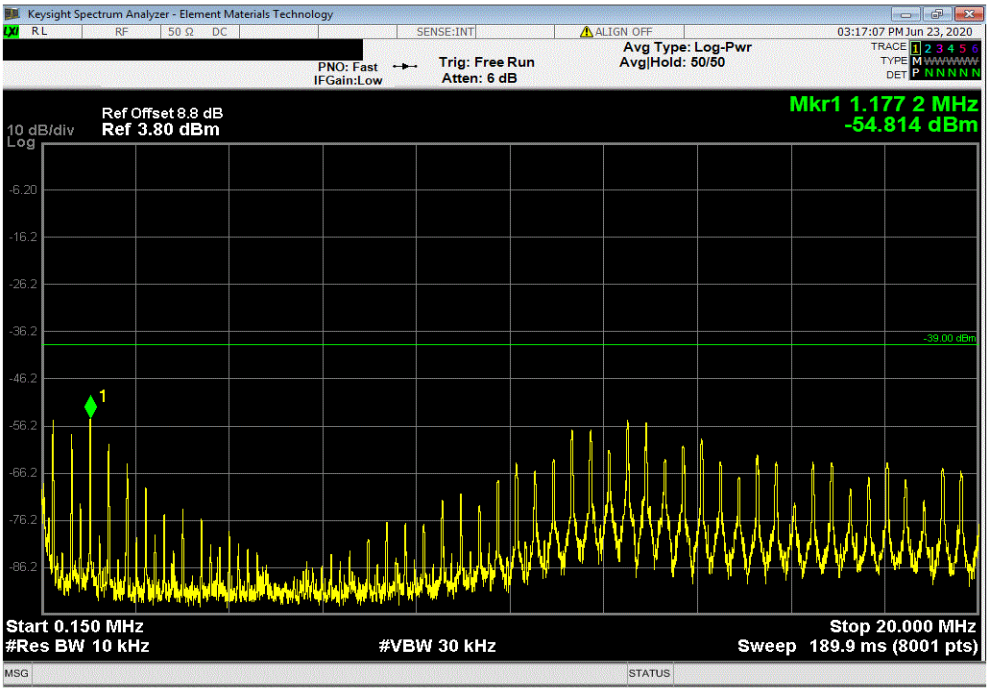
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 10 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	**Measured Freq (MHz)**	**Max Value (dBm)**	**Limit < (dBm)**	**Result**
18 GHz - 22 GHz	21446	-26.38	-19	Pass



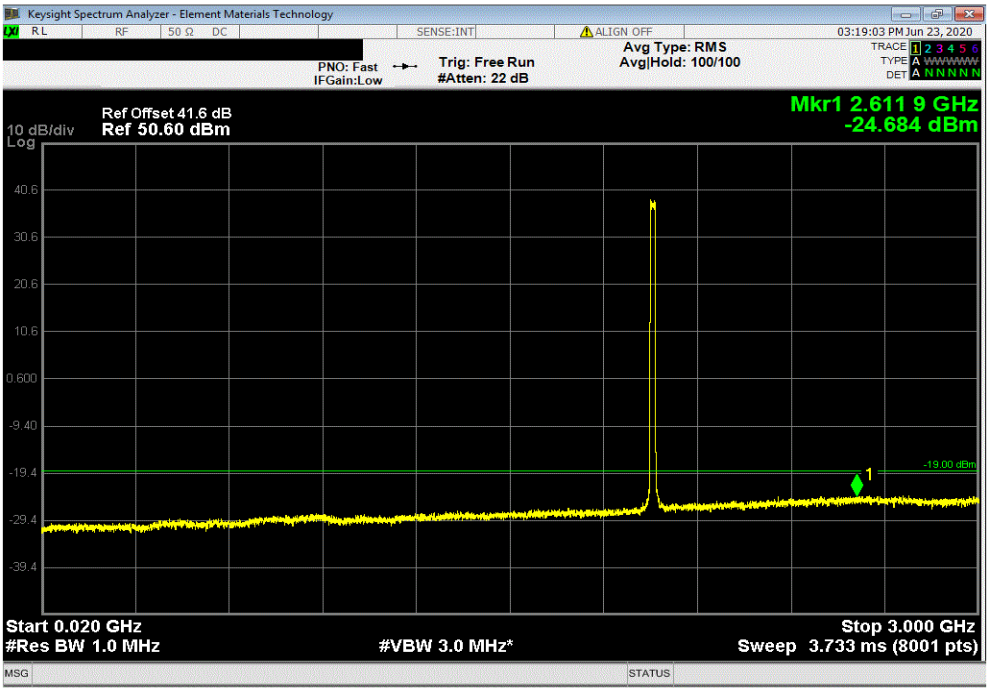
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 15 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
9 kHz - 150 kHz		0.01	-70.59	-49	Pass



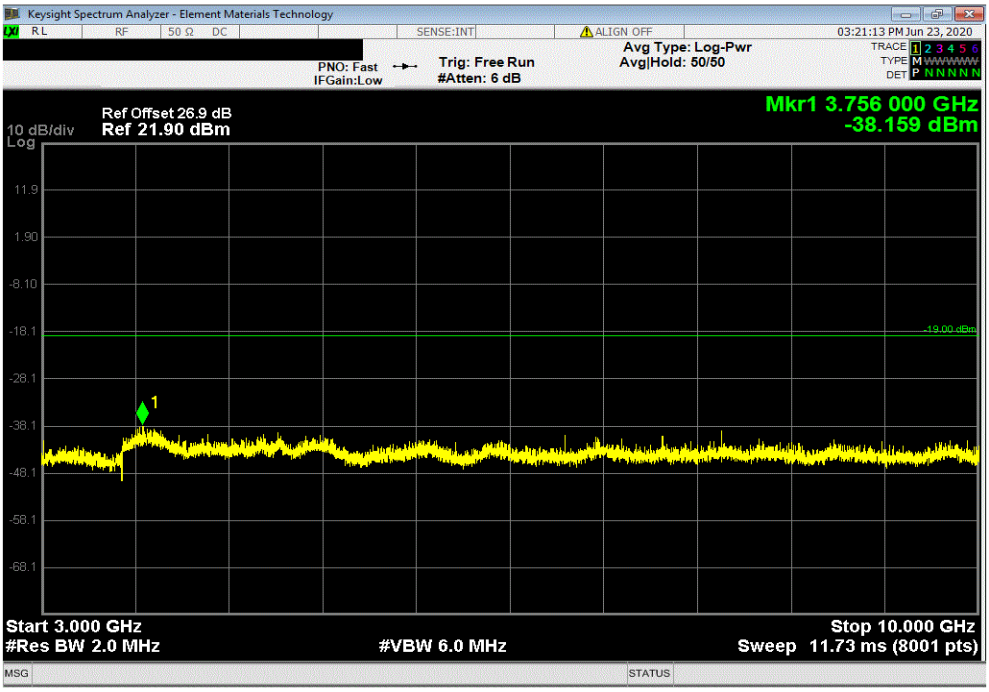
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 15 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
150 kHz - 20 MHz	1.18	-54.81	-39	Pass



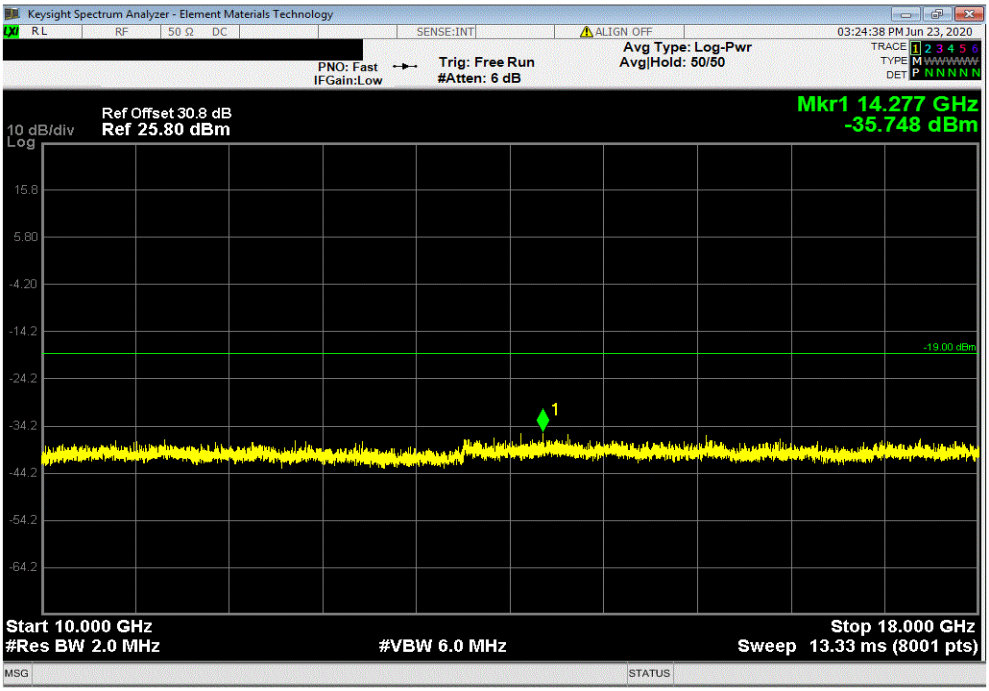
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 15 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
20 MHz - 3 GHz		2611.86	-24.68	-19	Pass



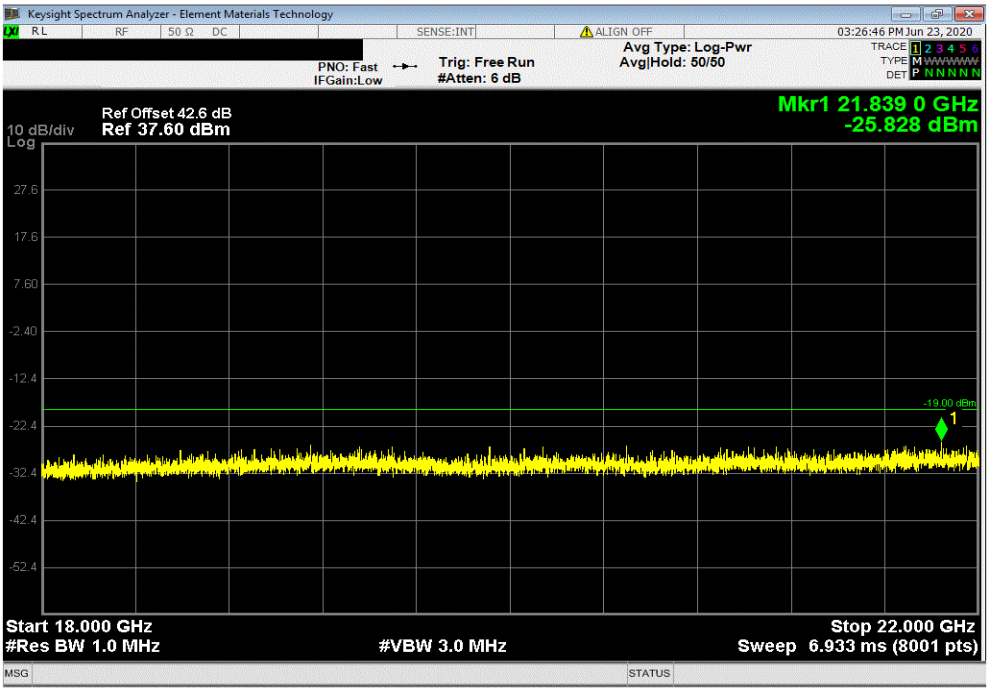
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 15 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
3 GHz - 10 GHz		3756	-38.16	-19	Pass



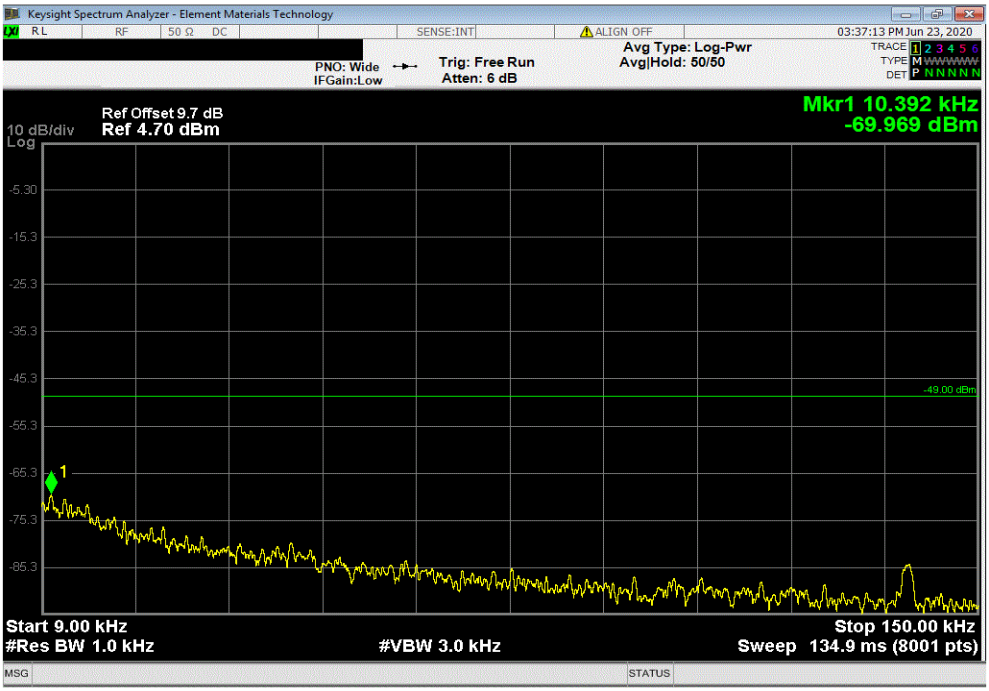
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 15 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
10 GHz - 18 GHz	14277	-35.75	-19	Pass



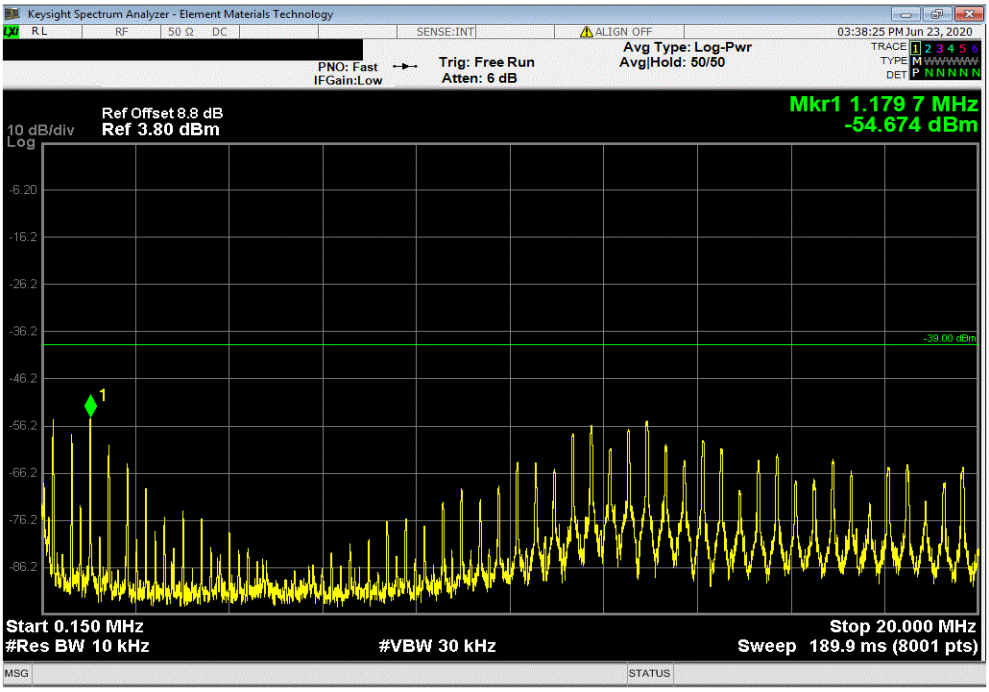
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 15 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
18 GHz - 22 GHz	21839	-25.83	-19	Pass



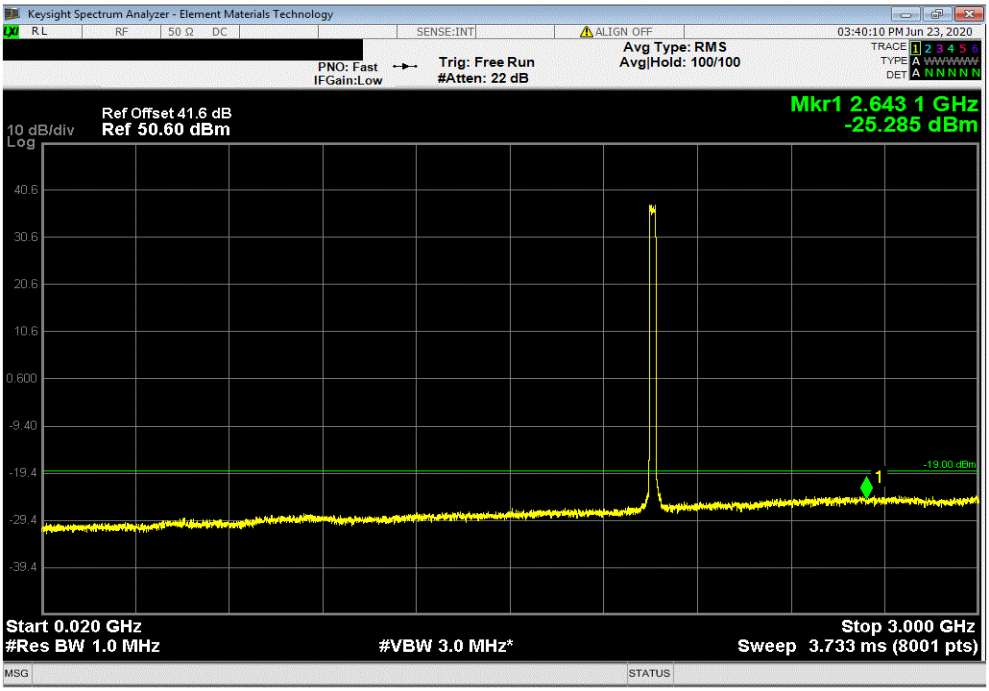
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 20 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
9 kHz - 150 kHz		0.01	-69.97	-49	Pass



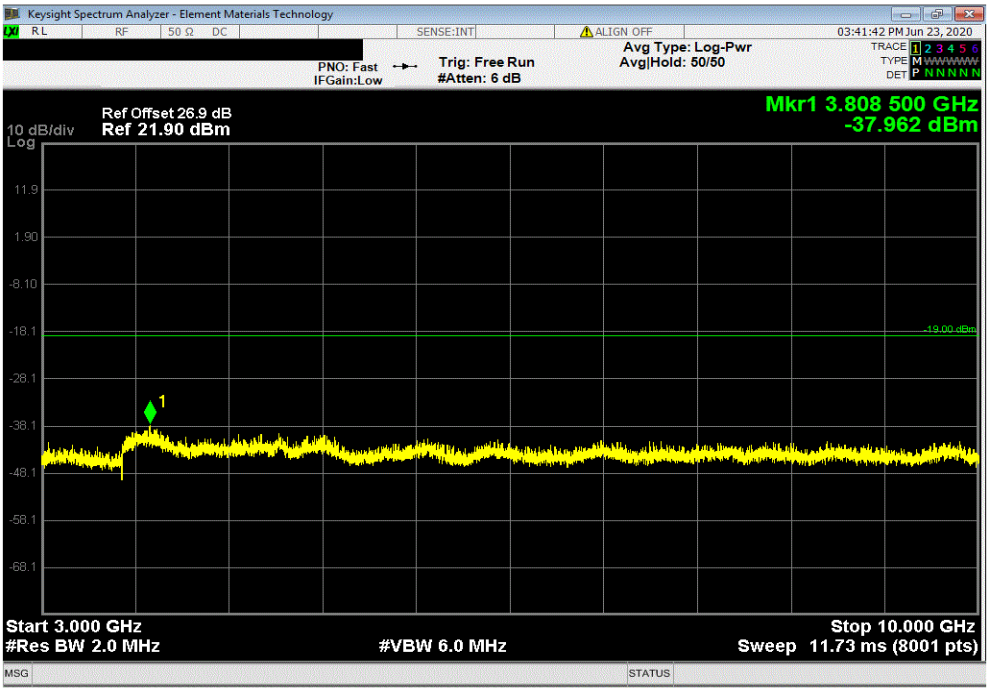
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 20 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
150 kHz - 20 MHz	1.18	-54.67	-39	Pass



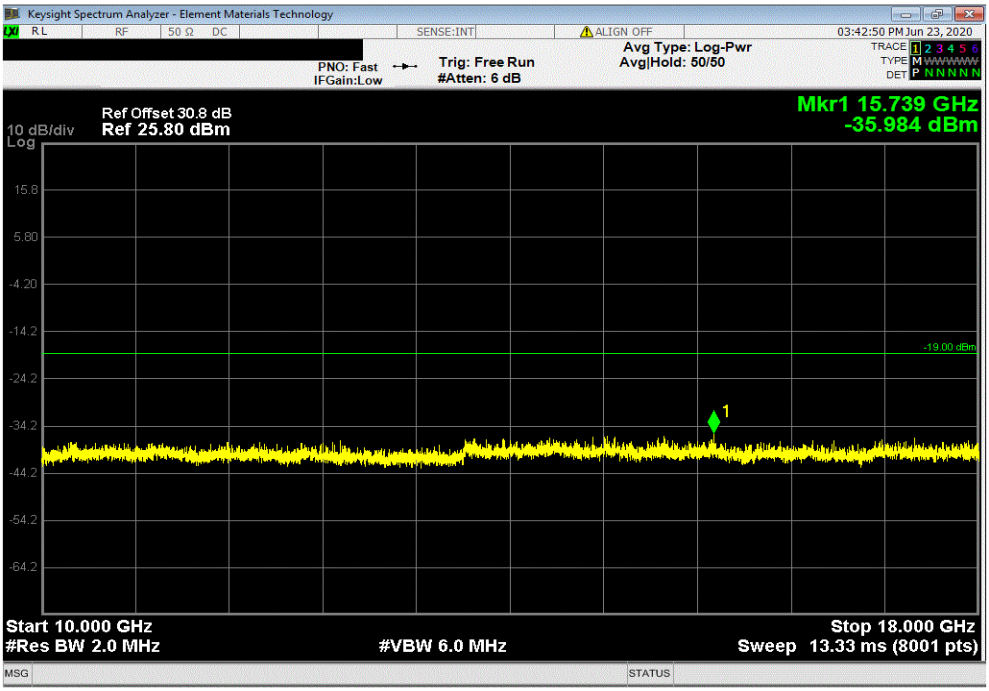
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 20 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
20 MHz - 3 GHz		2643.15	-25.29	-19	Pass



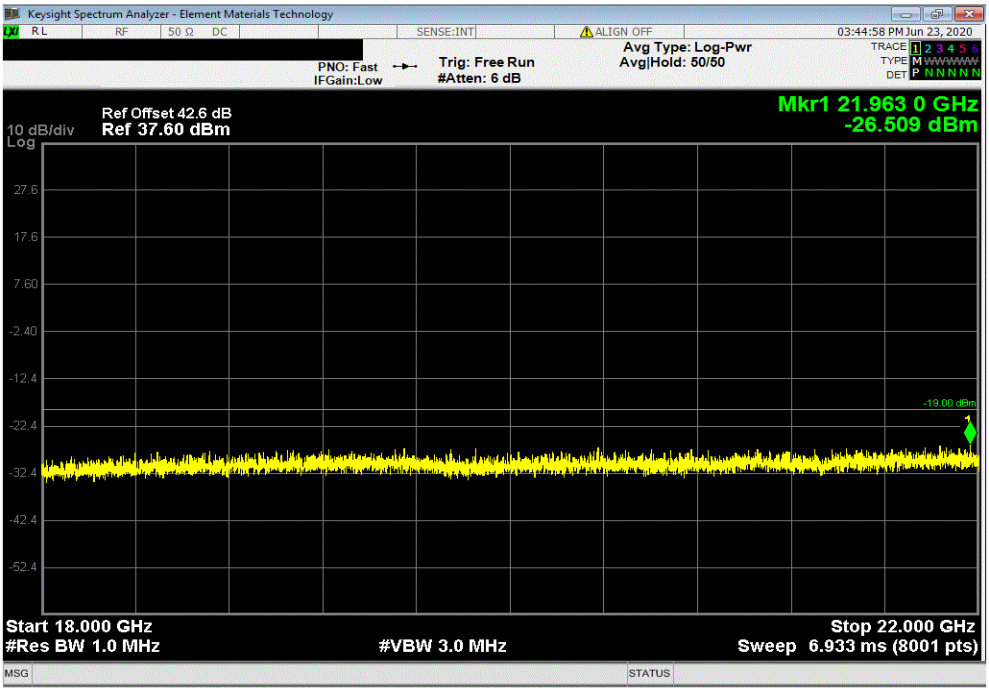
Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 20 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
3 GHz - 10 GHz		3808.5	-37.96	-19	Pass



Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 20 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	**Measured Freq (MHz)**	**Max Value (dBm)**	**Limit < (dBm)**	**Result**
10 GHz - 18 GHz	15739	-35.98	-19	Pass



Port 4, Band 25 NB IoT, 1930 MHz - 1995 MHz , 20 MHz Bandwidth, QPSK Modulation, Mid Channel 1962.5 MHz				
Frequency Range	**Measured Freq (MHz)**	**Max Value (dBm)**	**Limit < (dBm)**	**Result**
18 GHz - 22 GHz	21963	-26.51	-19	Pass



SPURIOUS CONDUCTED EMISSIONS - BAND 66

XMit 2020.03.25.0

Testing was performed using the mode(s) of operation and configuration(s) noted within the report. The individuals and/or the organization requesting the test provided the modes, configurations and settings used to complete the evaluation. The actual test parameters are specified in the test data, this includes items such as investigated frequency range (scanned) and test levels. The testing methods and performance specifications, as well as the test site used for the evaluation are indicated in the test data.

TEST EQUIPMENT

Description	Manufacturer	Model	ID	Last Cal.	Cal. Due
Analyzer - Spectrum Analyzer	Agilent	N9010A	AFL	27-Feb-20	27-Feb-21
Generator - Signal	Agilent	N5173B	TIW	5-Jul-17	5-Jul-20
Generator - Signal	Keysight	N5171B-506	TEW	2-May-18	2-May-21

TEST DESCRIPTION

The antenna port spurious emissions were measured at the RF output terminal of the EUT through 4 different attenuation configurations which continues through to the RF input of the spectrum analyzer. Analyzer plots utilizing a resolution bandwidth called out by the client's test plan were made for each modulation type from 9 KHz to 22 GHz. The peak conducted power of spurious emissions, up to the 10th harmonic of the transmit frequency, were investigated to ensure they were less than the limits also called out by the client's test plan shown below.

The measurement methods are detailed in KDB971168 D01v03 section 6 and ANSI C63.26-2015.

Per FCC 2.1057(a)(1), the upper level of measurement is the 10th harmonic of the highest fundamental frequency.

These measurements are for frequency band after the first 1.0 MHz bands immediately outside and adjacent to the frequency block.

Per section FCC 27.53(h)(1), the power of any emission outside of the authorized operating frequency range cannot exceed -13 dBm for a 1 MHz measurement bandwidth. The limit is adjusted to -19 dBm [-13 dBm -10 log (4)] per FCC KDB 662911D01 v02r01 because the BTS may operate as a 4 port MIMO transmitter. The conducted emissions limits are shown in Table 2.

The limit for the 9kHz to 150kHz frequency range was adjusted to –49dBm to correct for a spectrum analyzer RBW of 1kHz versus required RBW of 1MHz [i.e.: -49dBm = -19dBm -10log(1MHz/1kHz)]. The limit for the 150kHz to 20MHz frequency range was adjusted to –39dBm to correct for a spectrum analyzer RBW of 10kHz versus required RBW of 1MHz [i.e.: -39dBm = -19dBm -10log(1MHz/10kHz)]. The required limit of -19dBm with a RBW of > 1MHz was used for all other frequency ranges.

RF conducted emissions testing was performed only on one port. The testing was performed on the same version of hardware (AHFIG) as the original certification test. The AHFIG antenna ports are essentially electrically identical (the RF power variation between antenna ports is small as shown in the original certification testing) and antenna port 4 was selected to perform the testing under this effort as allowed by ANSI C63.26-2015 paragraph 5.7.2i.

Carrier bandwidths of 10, 15, & 20MHz were verified using NB IoT GB carriers under this effort. The LTE modulation type for this testing was set up according to 3GPP TS 36.141 E-UTRA Test Models and is “E-TM 1.1 (QPSK modulation type) with N-TM (narrow band IoT)”.

SPURIOUS CONDUCTED EMISSIONS - BAND 66

element

TbtTx 2020.06.08.0 BETA XMit 2020.03.25.0

EUT:	**AHFIG**			**Work Order:**	**NOKI0016**
Serial Number:	**K9191322351**			**Date:**	**23-Jun-20**
Customer:	**Nokia Solutions and Networks**			**Temperature:**	**23.3 °C**
Attendees:	**Mitchell Hill, John Rattanavong**			**Humidity:**	**51.9% RH**
Project:	**None**			**Barometric Pres.:**	**1015 mbar**
Tested by:	**Brandon Hobbs**	**Power:**	**54 VDC**	**Job Site:**	**TX05**

TEST SPECIFICATIONS	**Test Method**
FCC 27:2020	ANSI C63.26:2015

COMMENTS

All measurement path losses were accounted for in the reference level offest including any attenuators, filters and DC blocks. The carrier was set to maximum for all testing.

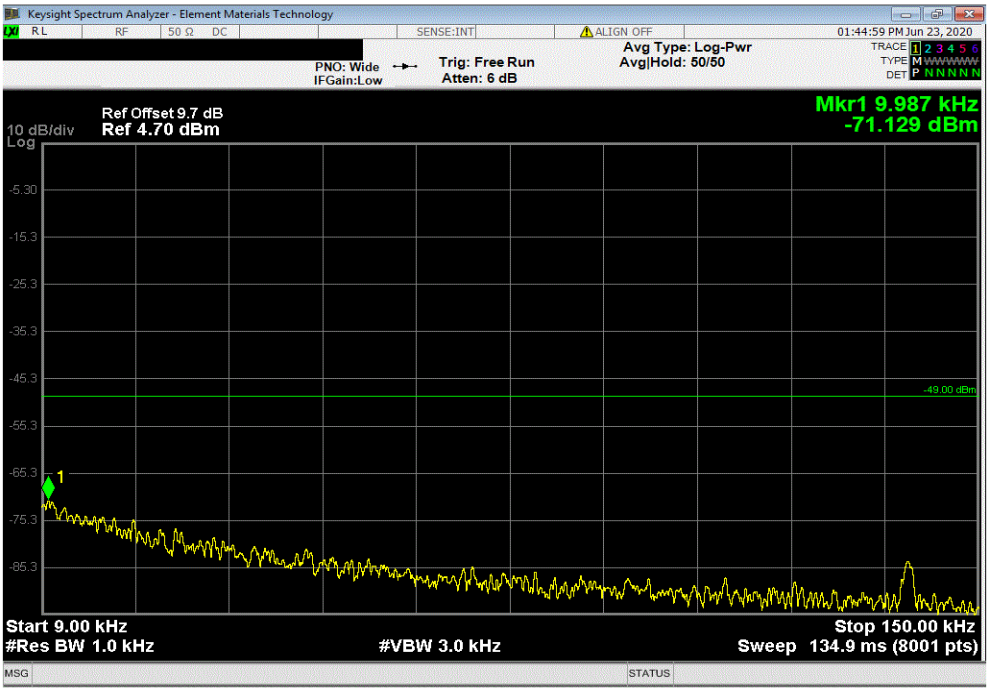
DEVIATIONS FROM TEST STANDARD

None

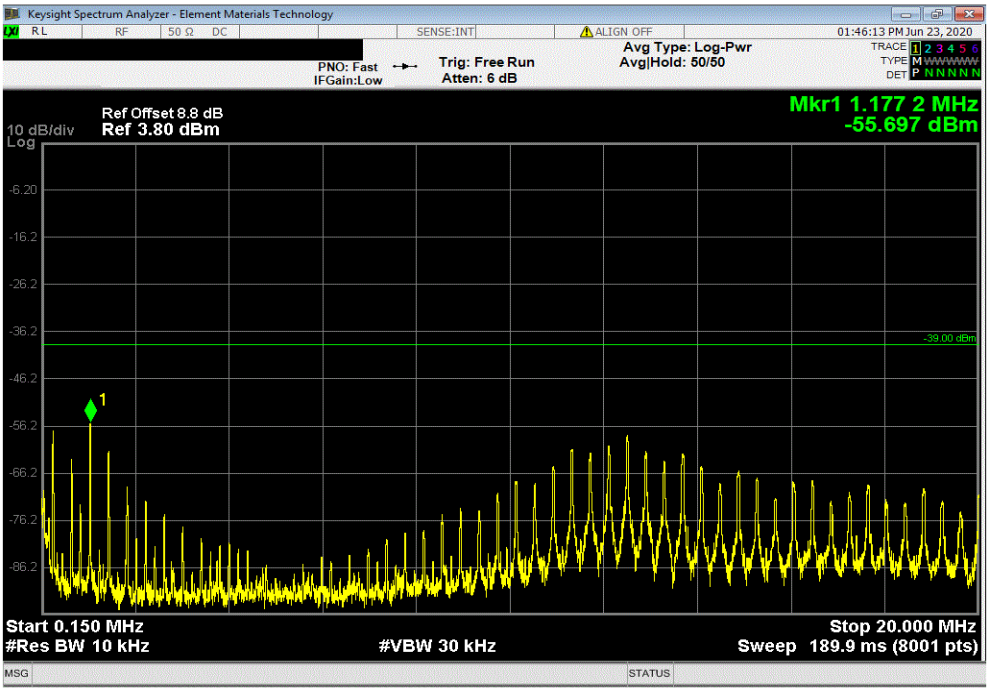
Configuration #	**5,6,7,8**	*Signature*

		Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz						
	10 MHz Bandwidth					
	QPSK Modulation					
Mid Channel 2155 MHz		9 kHz - 150 kHz	0.01	-71.13	-49	Pass
Mid Channel 2155 MHz		150 kHz - 20 MHz	1.18	-55.7	-39	Pass
Mid Channel 2155 MHz		20 MHz - 3 GHz	2618.93	-24.73	-19	Pass
Mid Channel 2155 MHz		3 GHz - 10 GHz	3836.5	-37.81	-19	Pass
Mid Channel 2155 MHz		10 GHz - 18 GHz	14411	-36.09	-19	Pass
Mid Channel 2155 MHz		18 GHz - 22 GHz	21564	-25.93	-19	Pass
	15 MHz Bandwidth					
	QPSK Modulation					
Mid Channel 2155 MHz		9 kHz - 150 kHz	0.01	-71.81	-49	Pass
Mid Channel 2155 MHz		150 kHz - 20 MHz	1.18	-55.7	-39	Pass
Mid Channel 2155 MHz		20 MHz - 3 GHz	2573.49	-24.73	-19	Pass
Mid Channel 2155 MHz		3 GHz - 10 GHz	3704.38	-38.11	-19	Pass
Mid Channel 2155 MHz		10 GHz - 18 GHz	16592	-36.08	-19	Pass
Mid Channel 2155 MHz		18 GHz - 22 GHz	21915.5	-26.15	-19	Pass
	20 MHz Bandwidth					
	QPSK Modulation					
Mid Channel 2155 MHz		9 kHz - 150 kHz	0.01	-70.51	-49	Pass
Mid Channel 2155 MHz		150 kHz - 20 MHz	1.18	-55.72	-39	Pass
Mid Channel 2155 MHz		20 MHz - 3 GHz	2612.23	-24.61	-19	Pass
Mid Channel 2155 MHz		3 GHz - 10 GHz	3833	-38.16	-19	Pass
Mid Channel 2155 MHz		10 GHz - 18 GHz	14006	-36.47	-19	Pass
Mid Channel 2155 MHz		18 GHz - 22 GHz	21776.5	-25.95	-19	Pass

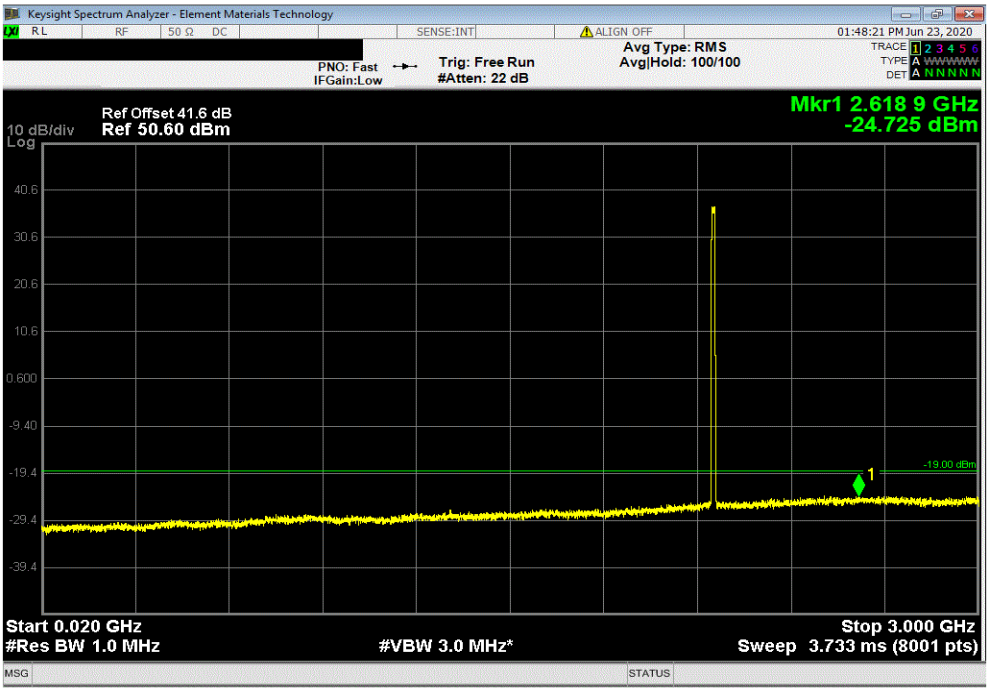
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 10 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
9 kHz - 150 kHz		0.01	-71.13	-49	Pass



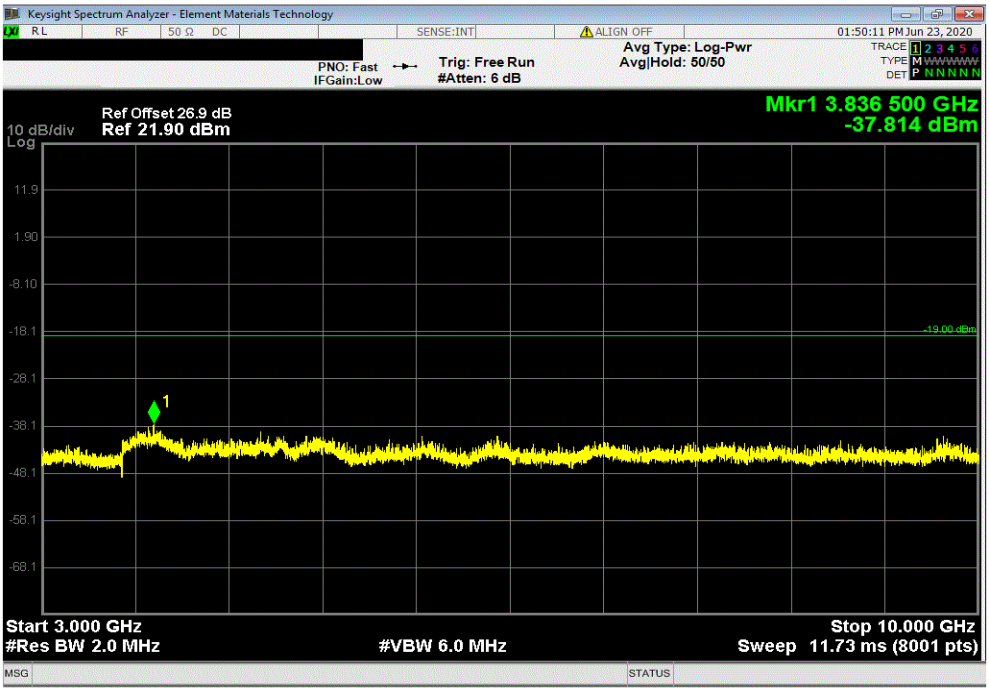
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 10 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
150 kHz - 20 MHz	1.18	-55.7	-39	Pass



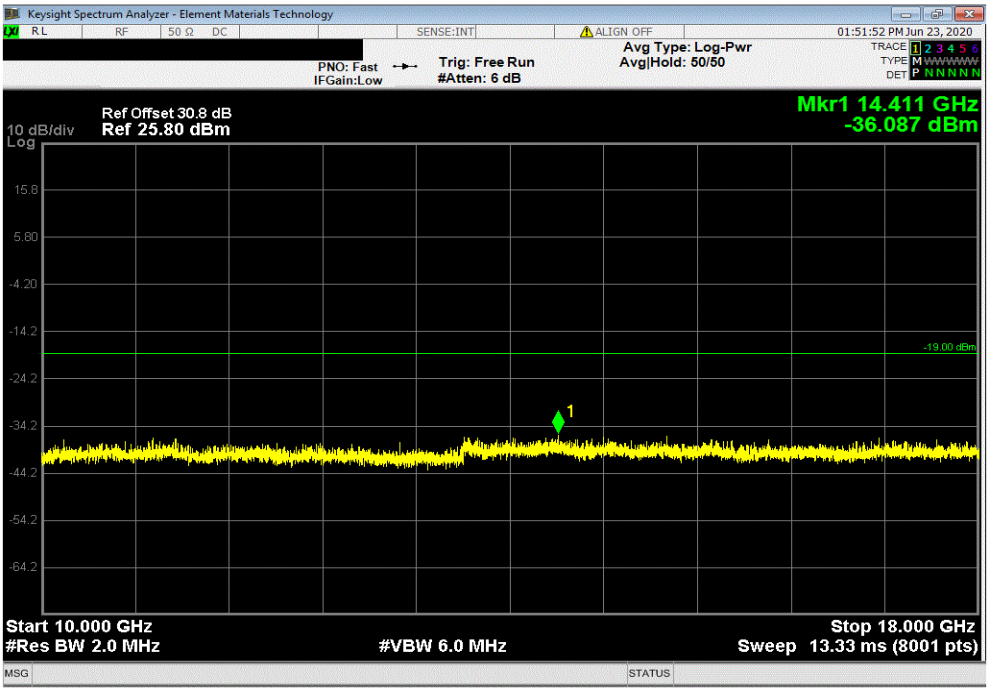
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 10 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
20 MHz - 3 GHz		2618.93	-24.73	-19	Pass



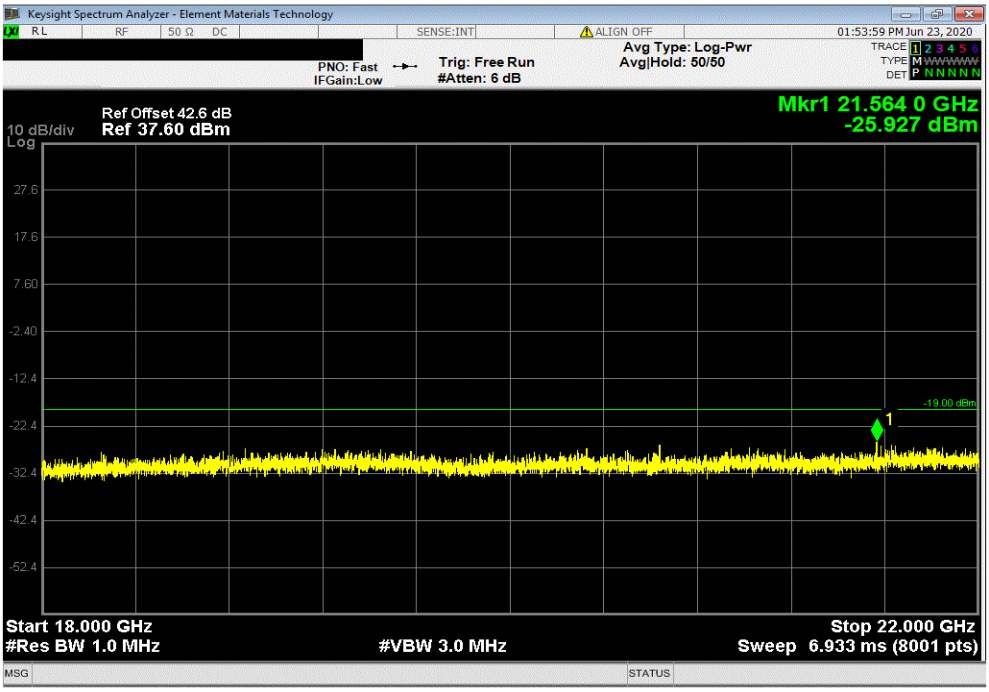
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 10 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
3 GHz - 10 GHz		3836.5	-37.81	-19	Pass



Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 10 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
10 GHz - 18 GHz	14411	-36.09	-19	Pass

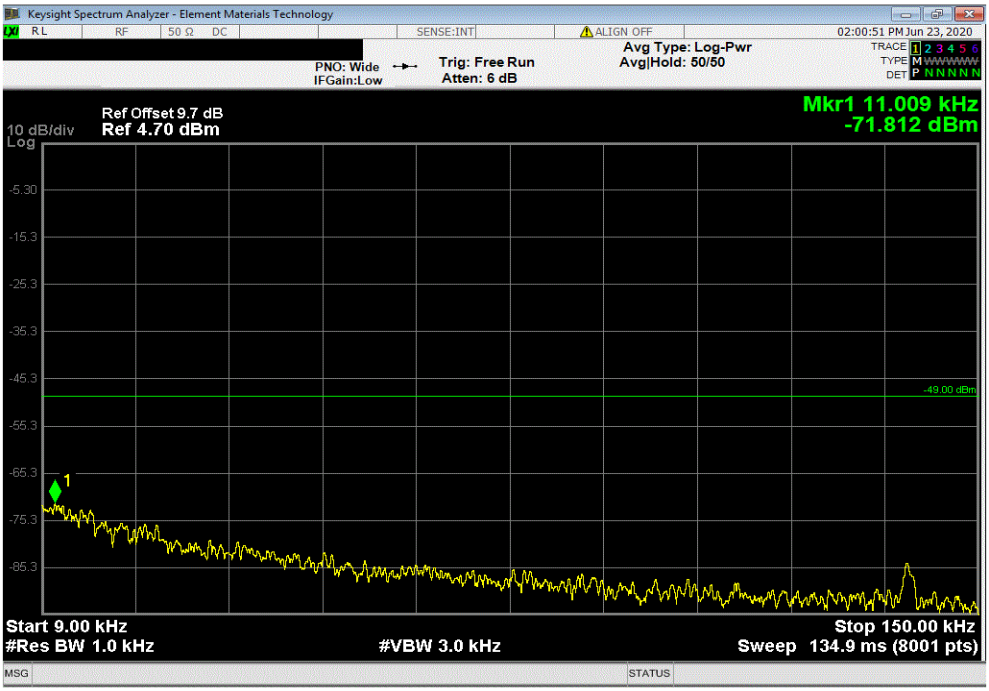


Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 10 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
18 GHz - 22 GHz	21564	-25.93	-19	Pass

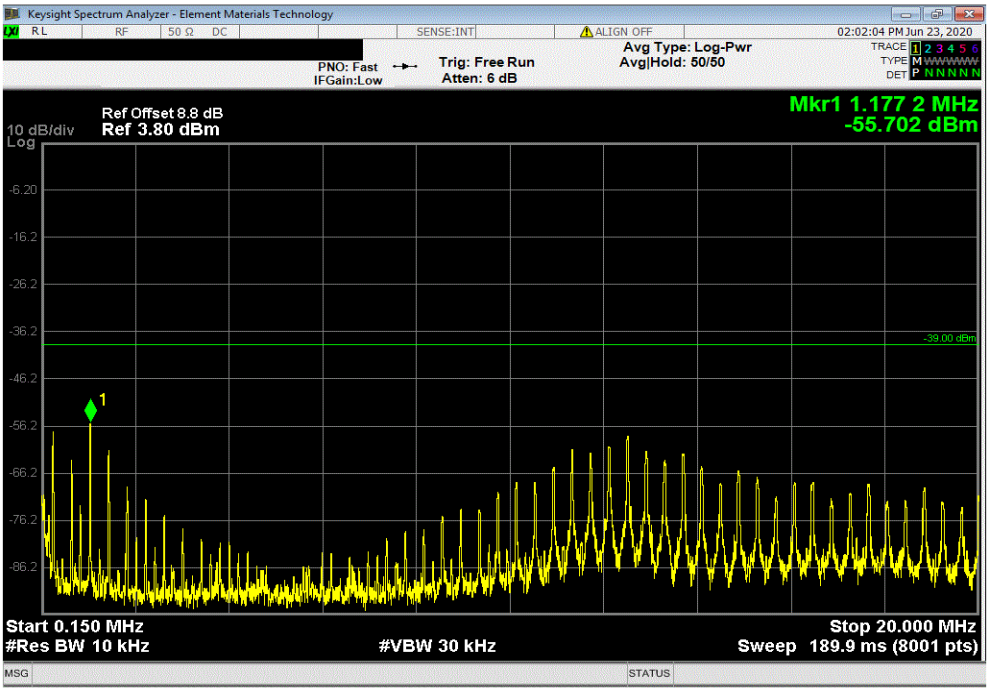


SPURIOUS CONDUCTED EMISSIONS - BAND 66

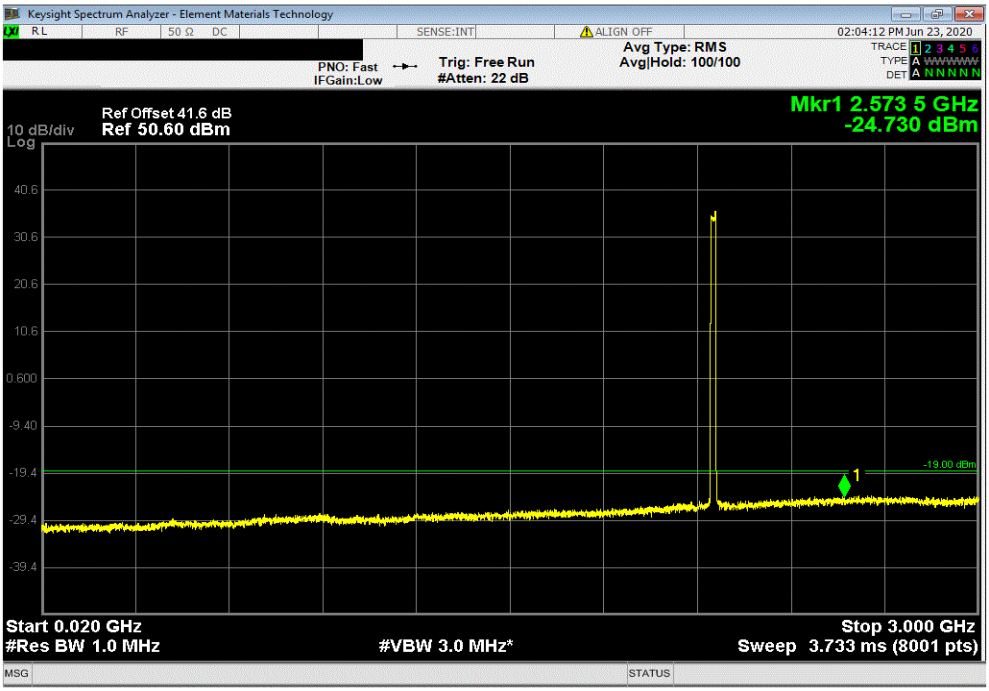
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 15 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
9 kHz - 150 kHz		0.01	-71.81	-49	Pass



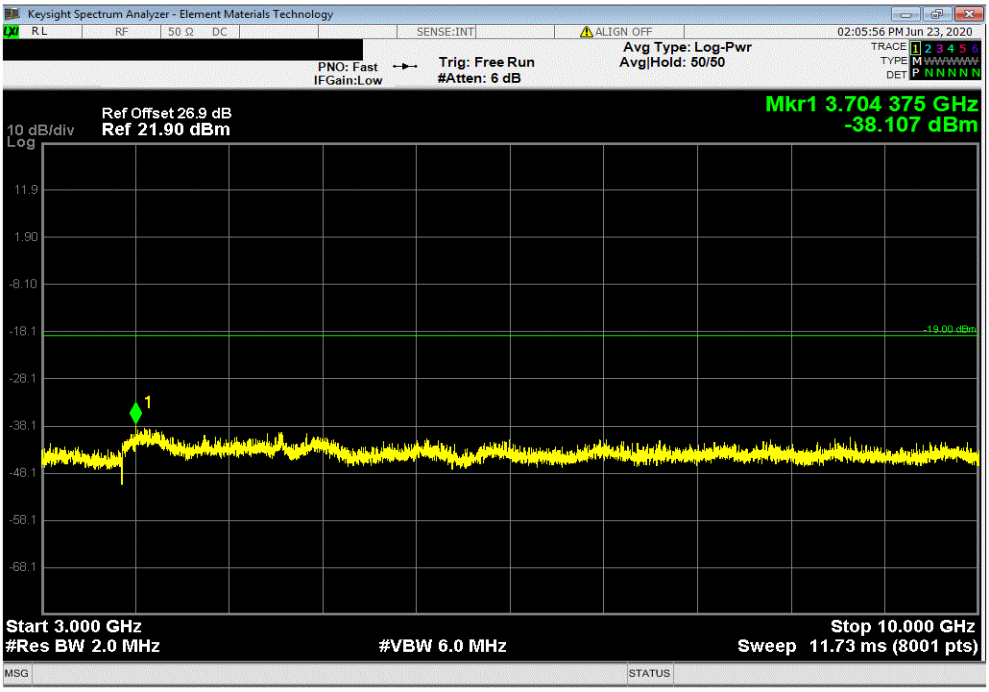
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 15 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
150 kHz - 20 MHz	1.18	-55.7	-39	Pass



Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 15 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz					
	Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
	20 MHz - 3 GHz	2573.49	-24.73	-19	Pass

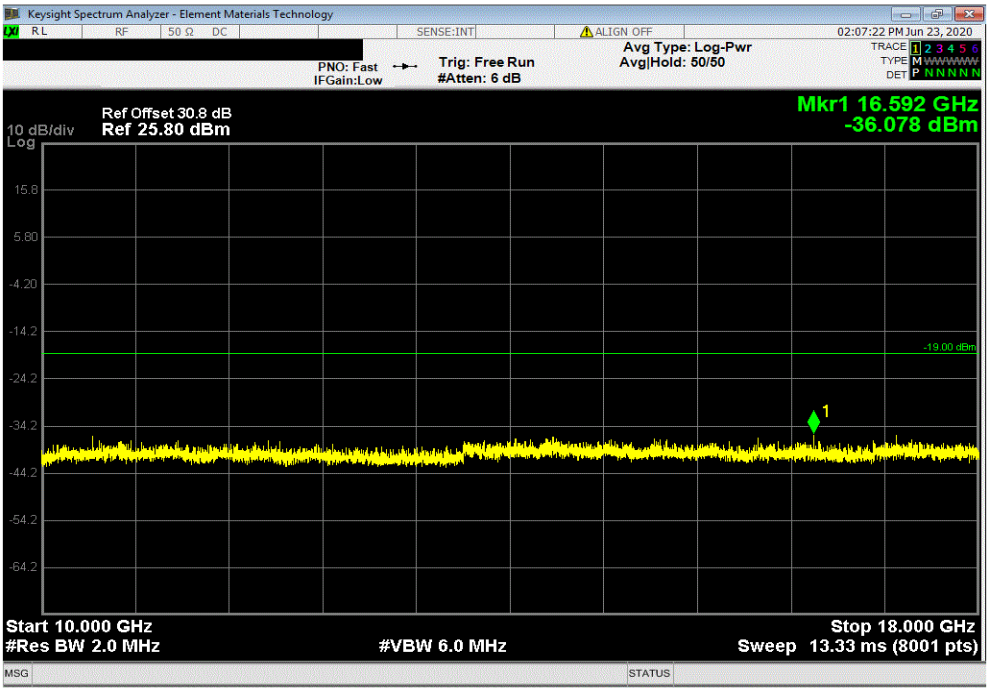


Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 15 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz					
	Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
	3 GHz - 10 GHz	3704.38	-38.11	-19	Pass

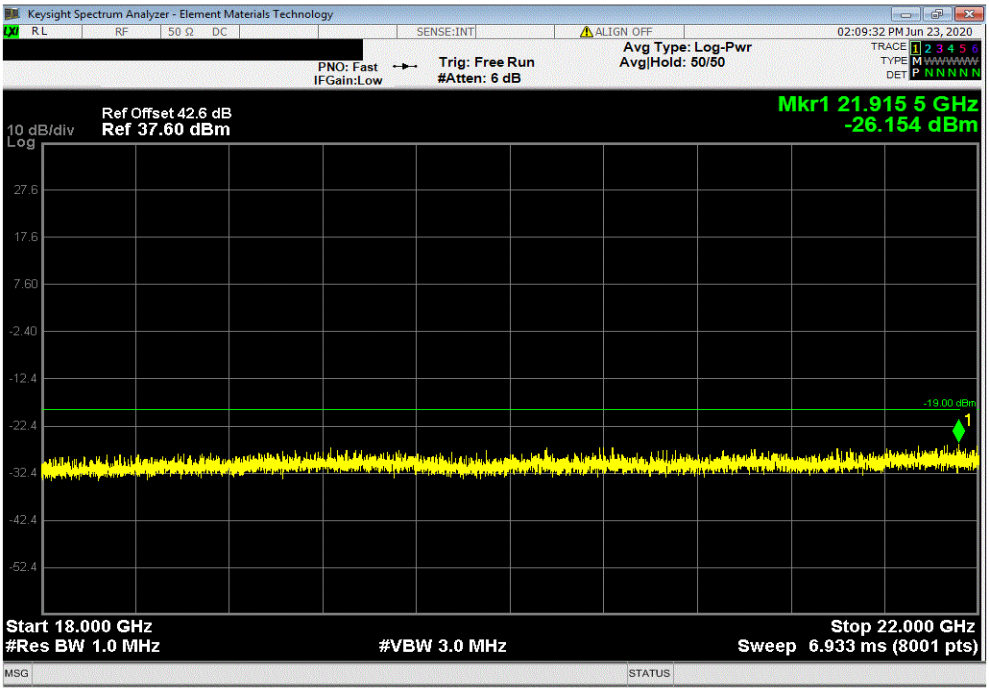


SPURIOUS CONDUCTED EMISSIONS - BAND 66

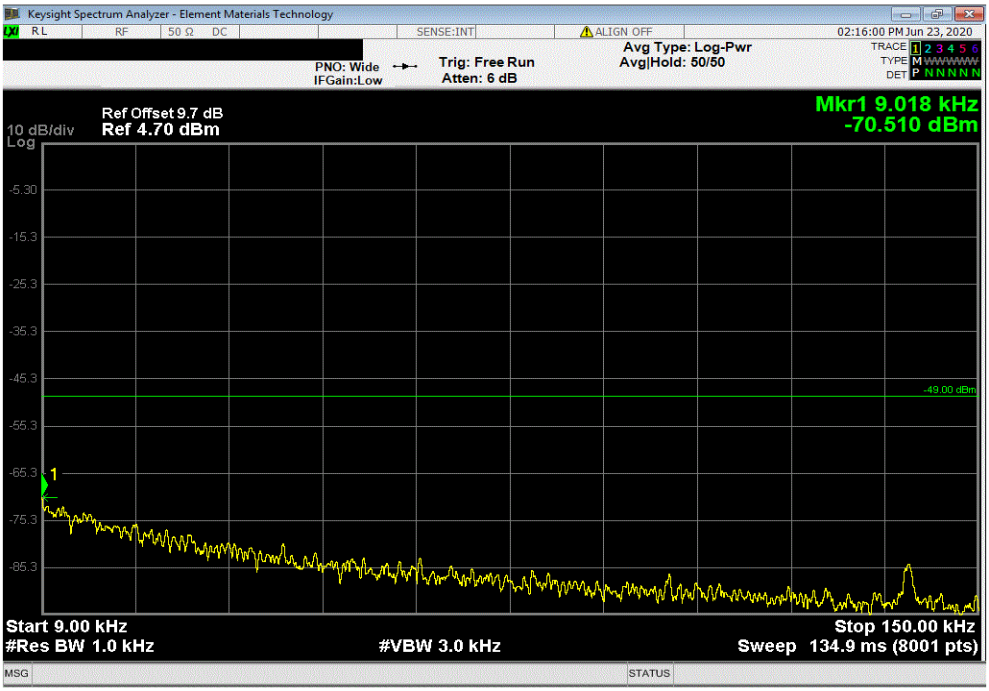
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 15 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
10 GHz - 18 GHz	16592	-36.08	-19	Pass



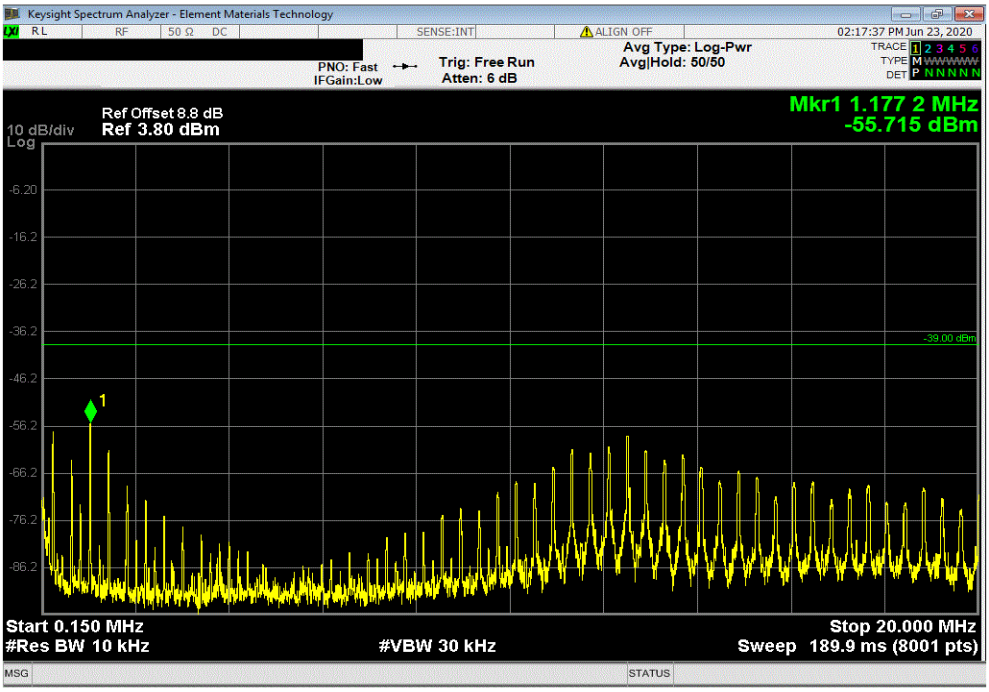
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 15 MHz Bandwidth , QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
18 GHz - 22 GHz	21915.5	-26.15	-19	Pass



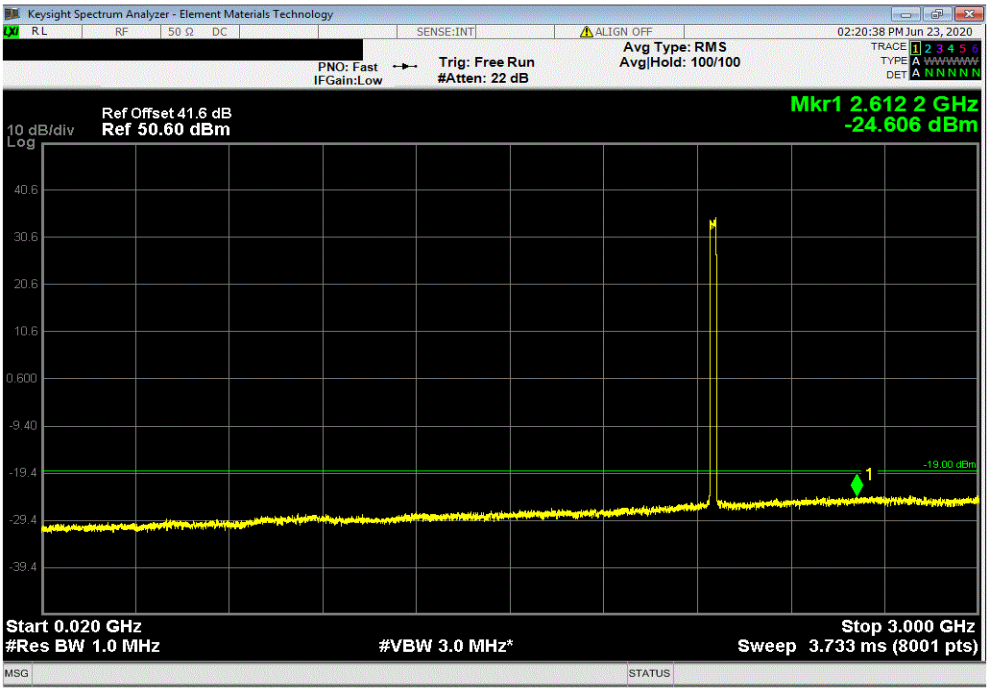
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 20 MHz Bandwidth, QPSK Modulation, Mid Channel 2155 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
9 kHz - 150 kHz		0.01	-70.51	-49	Pass



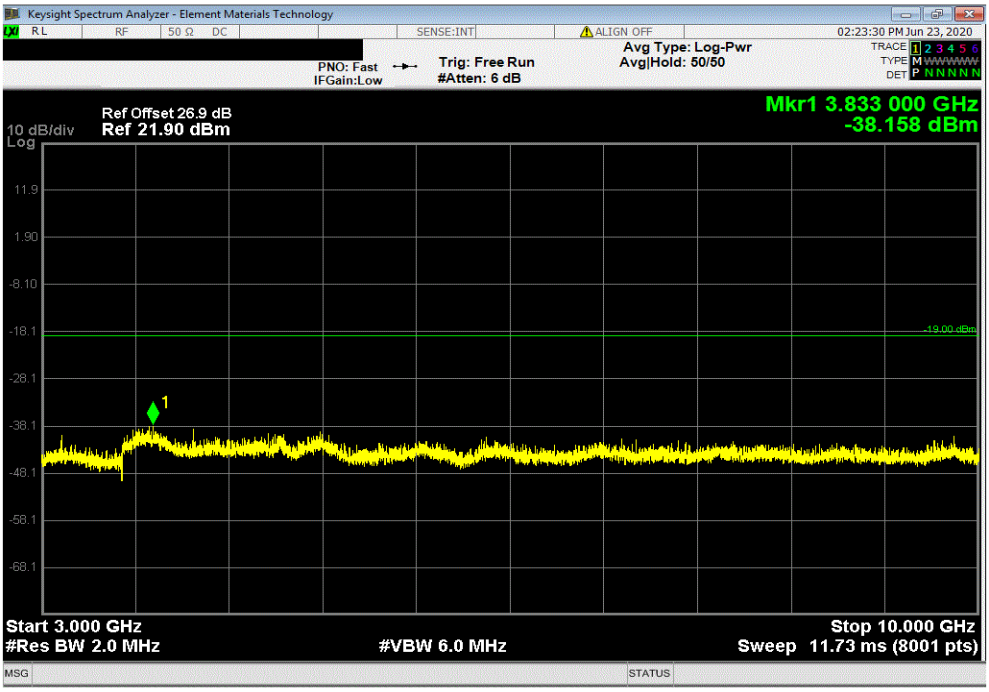
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 20 MHz Bandwidth, QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
150 kHz - 20 MHz	1.18	-55.72	-39	Pass



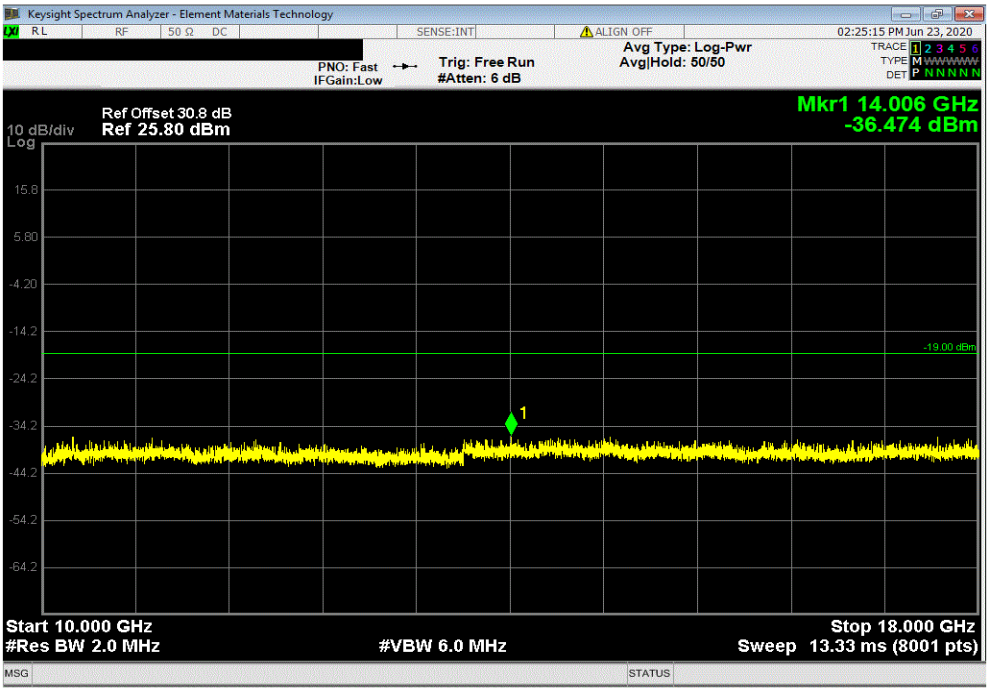
Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 20 MHz Bandwidth, QPSK Modulation, Mid Channel 2155 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
20 MHz - 3 GHz		2612.23	-24.61	-19	Pass



Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 20 MHz Bandwidth, QPSK Modulation, Mid Channel 2155 MHz					
Frequency Range		Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
3 GHz - 10 GHz		3833	-38.16	-19	Pass



Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 20 MHz Bandwidth, QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
10 GHz - 18 GHz	14006	-36.47	-19	Pass



Port 4, Band 66 NB IoT, 2110 MHz - 2200 MHz, 20 MHz Bandwidth, QPSK Modulation, Mid Channel 2155 MHz				
Frequency Range	Measured Freq (MHz)	Max Value (dBm)	Limit < (dBm)	Result
18 GHz - 22 GHz	21776.5	-25.95	-19	Pass