

BAND EDGE COMPLIANCE



XMIT 2019.09.05

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
Generator - Signal	Agilent	N5173B	TIW	5-Jul-17	5-Jul-20
Cable	Micro-Coax	UFD150A-1-0720-200200	MNL	15-Sep-19	15-Sep-20
Block - DC	Fairview Microwave	SD3379	AMI	6-Aug-19	6-Aug-20
Analyzer - Spectrum Analyzer	Keysight	N9010A	AFN	1-May-19	1-May-20

TEST DESCRIPTION

The measurement was made using a direct connection between the RF output of the EUT and a spectrum analyzer. The spurious RF conducted emissions at the edges of the authorized band were measured with the EUT set to low and high transmit frequencies. The EUT was transmitting at the data rate(s) listed in the datasheet in a no hop mode. The channels closest to the band edges were selected.

The spectrum was scanned below the lower band edge and above the higher band edge.

BAND EDGE COMPLIANCE



TelTx 2019.08.30.0 XMt 2019.09.05

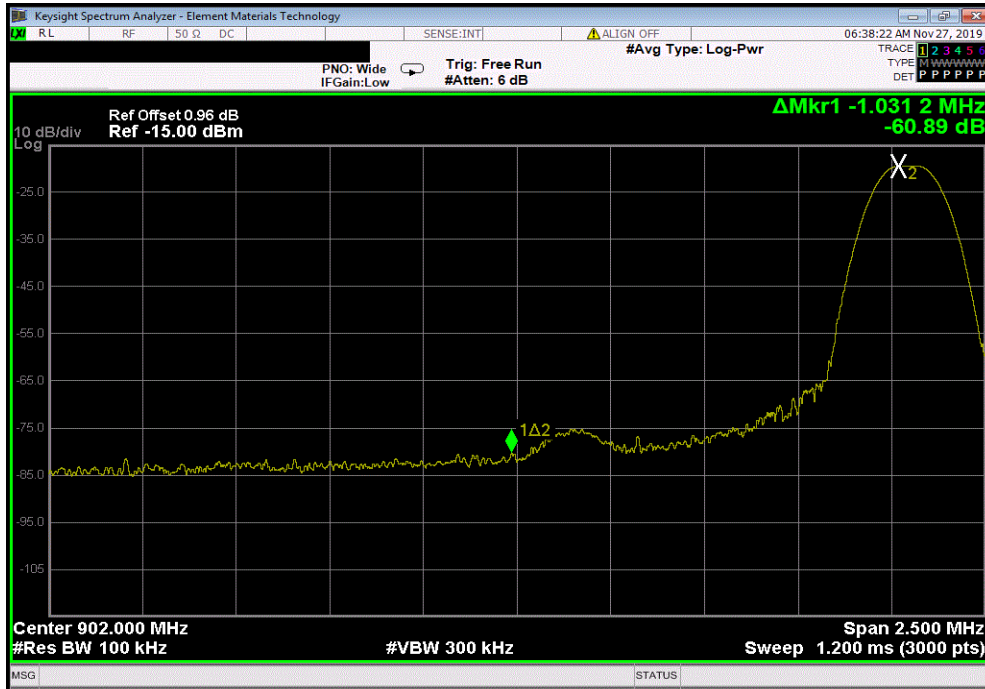
EUT: Beacon		Work Order: SMNC0001	
Serial Number: Unit 1		Date: 26-Nov-19	
Customer: SMRTGrid Inc.		Temperature: 23.2 °C	
Attendees: Bill Haag		Humidity: 29.4% RH	
Project: None		Barometric Pres.: 1013 mbar	
Tested by: Dustin Sparks		Power: Battery	
		Job Site: MN08	
TEST SPECIFICATIONS		Test Method	
FCC 15.247:2019		ANSI C63.10:2013	
COMMENTS			
DC block, measurement cable, and customer U.FL to SMA cable included in reference level offset. No external attenuator required due to low output power.			
DEVIATIONS FROM TEST STANDARD			
None			
Configuration #	4	Signature <i>Dustin Sparks</i>	
		Value (dBc)	Limit ≤ (dBc) Result
LoRa, 902-928 MHz			
Low Channel, 903.08 MHz			
	293 bps	-60.89	-20 Pass
	3516 bps	-60.41	-20 Pass
	37500 bps	-56.42	-20 Pass
High Channel, 926.84 MHz			
	293 bps	-56.75	-20 Pass
	3516 bps	-55.69	-20 Pass
	37500 bps	-55.11	-20 Pass

BAND EDGE COMPLIANCE

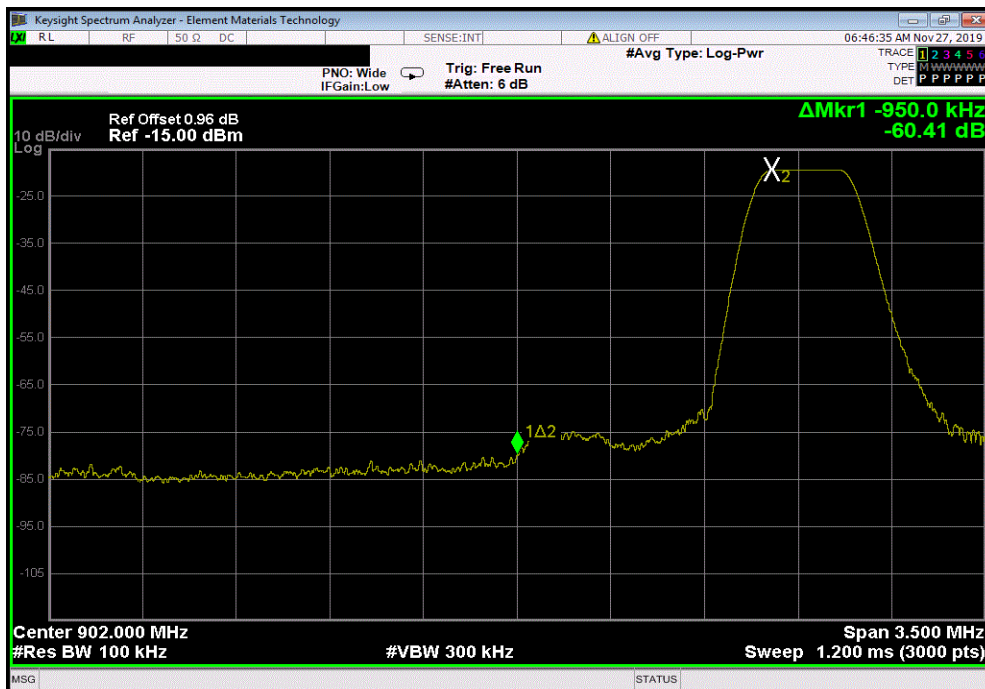


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LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 293 bps						
	Value (dBc)	Limit ≤ (dBc)	Result			
	-60.89	-20	Pass			



LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 3516 bps						
	Value (dBc)	Limit ≤ (dBc)	Result			
	-60.41	-20	Pass			

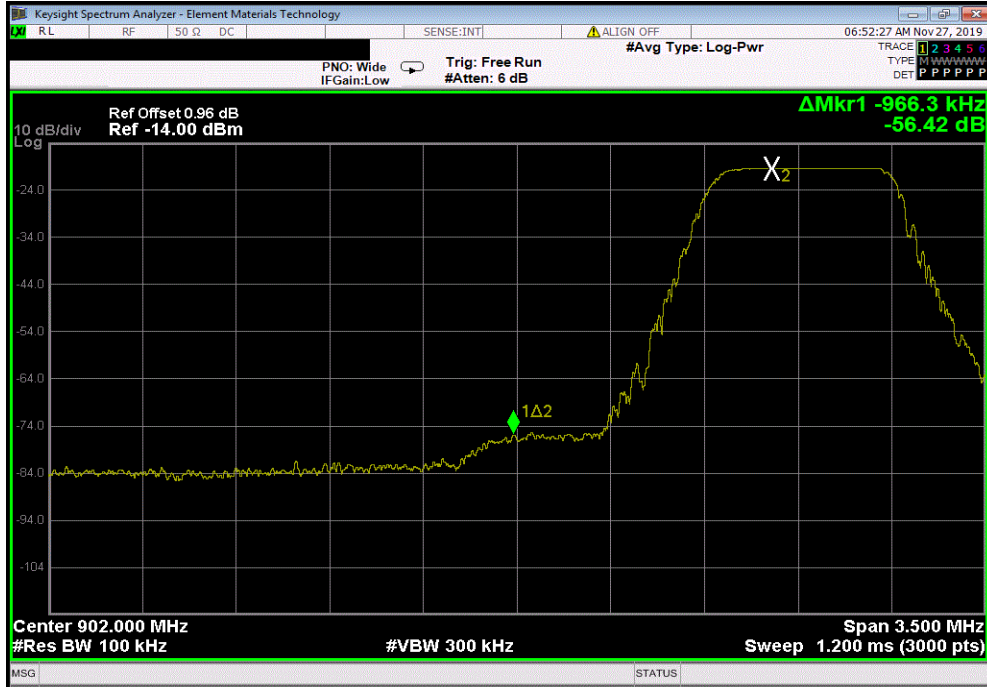


BAND EDGE COMPLIANCE

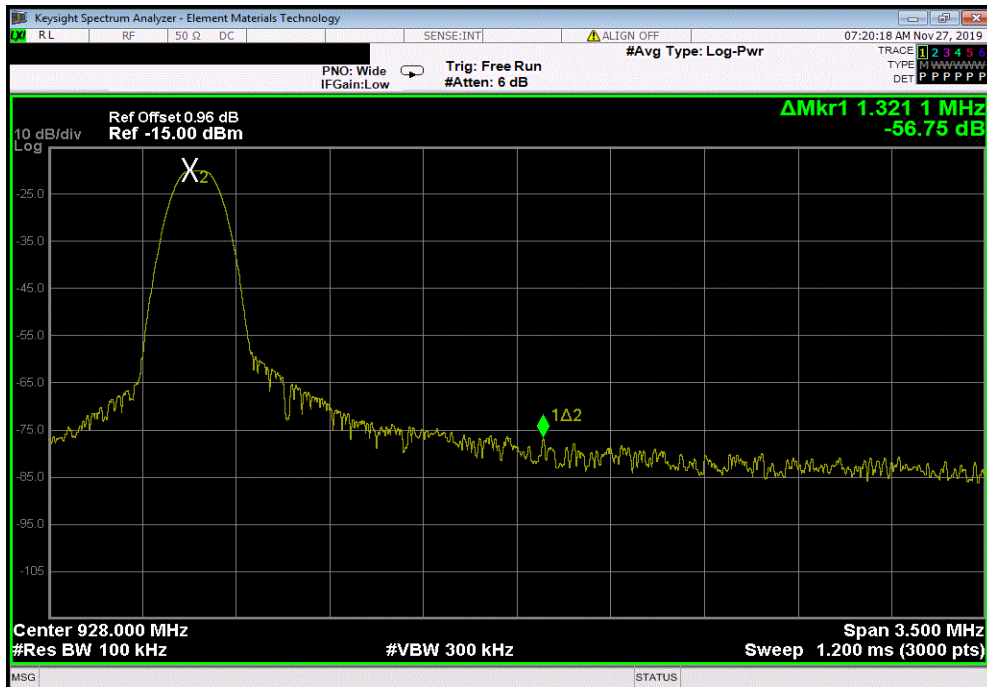


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LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 37500 bps						
	Value (dBc)	Limit ≤ (dBc)	Result			
	-56.42	-20	Pass			



LoRa, 902-928 MHz, High Channel, 926.84 MHz, 293 bps						
	Value (dBc)	Limit ≤ (dBc)	Result			
	-56.75	-20	Pass			

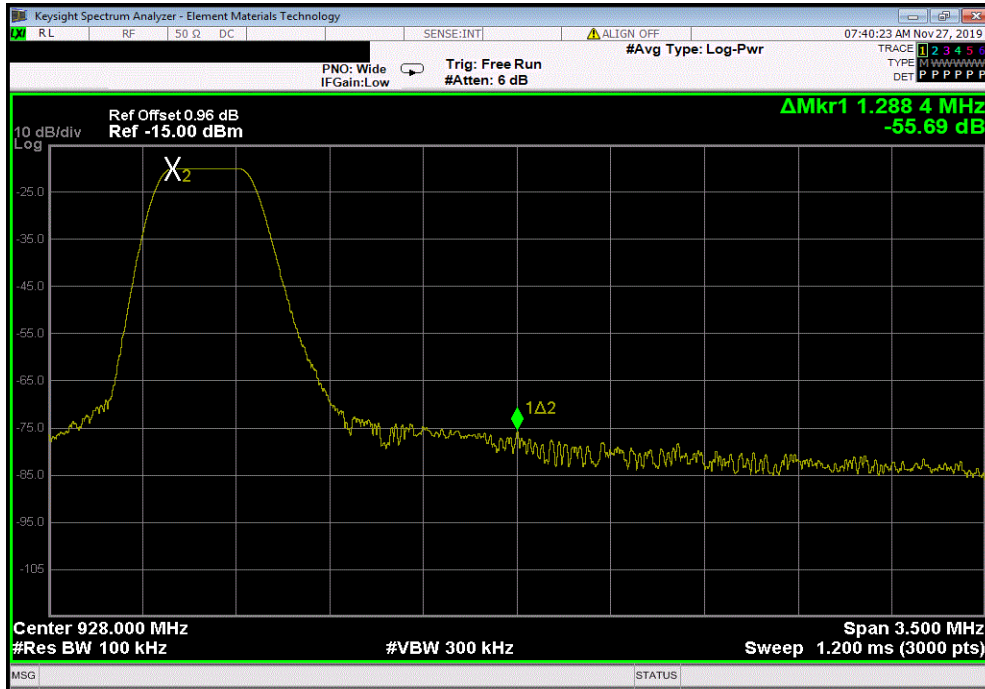


BAND EDGE COMPLIANCE

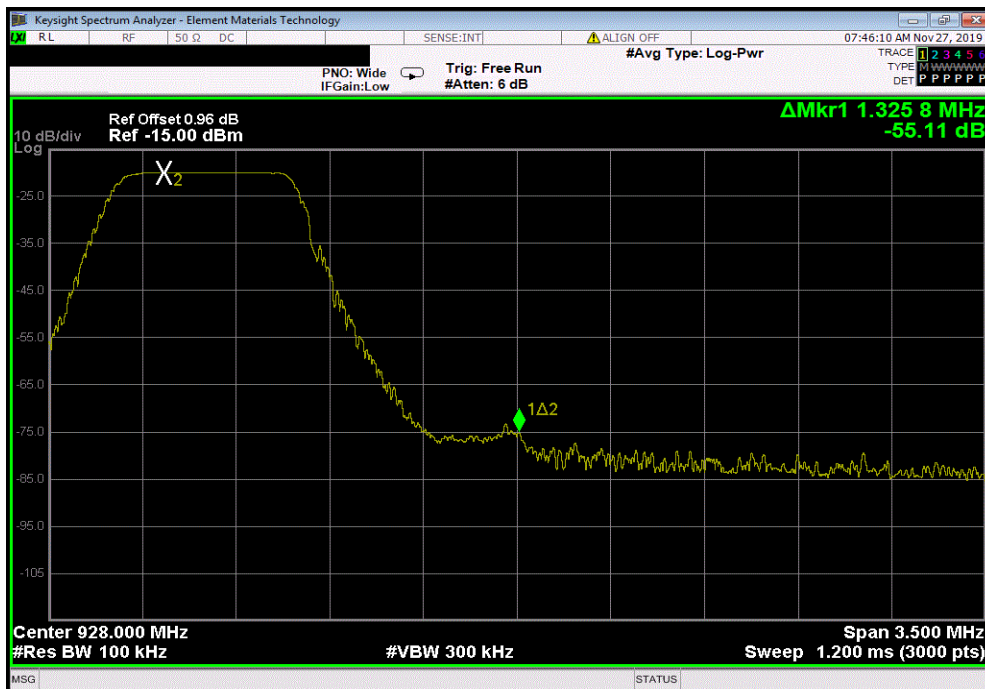


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, High Channel, 926.84 MHz, 3516 bps						
	Value	Limit	Result			
	(dBc)	≤ (dBc)				
	-55.69	-20	Pass			



LoRa, 902-928 MHz, High Channel, 926.84 MHz, 37500 bps						
	Value	Limit	Result			
	(dBc)	≤ (dBc)				
	-55.11	-20	Pass			



BAND EDGE COMPLIANCE (HOPPING MODE)



XMit 2019.09.05

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
Generator - Signal	Agilent	N5173B	TIW	5-Jul-17	5-Jul-20
Cable	Micro-Coax	UFD150A-1-0720-200200	MNL	15-Sep-19	15-Sep-20
Block - DC	Fairview Microwave	SD3379	AMI	6-Aug-19	6-Aug-20
Analyzer - Spectrum Analyzer	Keysight	N9010A	AFN	1-May-19	1-May-20

TEST DESCRIPTION

The measurement was made using a direct connection between the RF output of the EUT and a spectrum analyzer. The spurious RF conducted emissions at the edges of the authorized band were measured with the EUT set to its normal pseudo-random hopping sequence. The EUT was transmitting at the data rate(s) listed in the datasheet.

The spectrum was scanned below the lower band edge and above the higher band edge.

BAND EDGE COMPLIANCE (HOPPING MODE)



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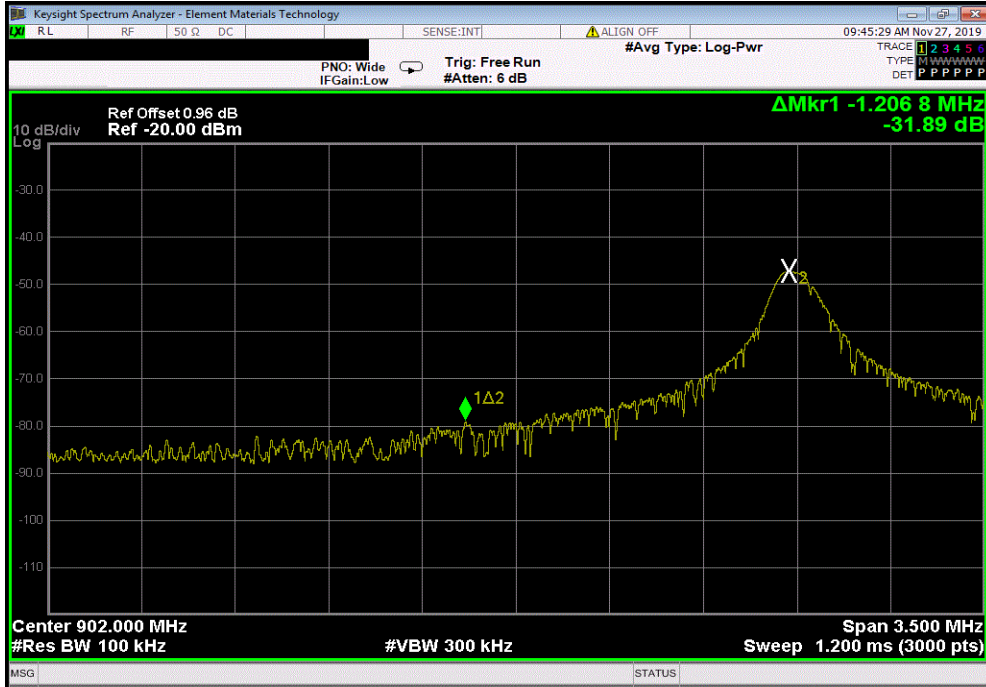
EUT: Beacon		Work Order: SMNC0001	
Serial Number: Unit 1		Date: 26-Nov-19	
Customer: SMRTGrid Inc.		Temperature: 23.3 °C	
Attendees: Bill Haag		Humidity: 29.5% RH	
Project: None		Barometric Pres.: 1012 mbar	
Tested by: Dustin Sparks		Power: Battery	
Job Site: MN08		Test Method	
FCC 15.247:2019		ANSI C63.10:2013	
COMMENTS			
DC block, measurement cable, and customer U.FL to SMA cable included in reference level offset. No external attenuator required due to low output power.			
DEVIATIONS FROM TEST STANDARD			
None			
Configuration #	4	Signature <i>Dustin Sparks</i>	
		Value (dBc)	Limit ≤ (dBc) Result
Hopping Mode (All Channels)			
LoRa, 293 bps			
	Low Channel, 903.08 MHz	-31.89	-20 Pass
	High Channel, 926.84 MHz	-30.05	-20 Pass
LoRa, 3516 bps			
	Low Channel, 903.08 MHz	-31.85	-20 Pass
	High Channel, 926.84 MHz	-29.97	-20 Pass
LoRa, 37500 bps			
	Low Channel, 903.08 MHz	-31.73	-20 Pass
	High Channel, 926.84 MHz	-30.16	-20 Pass

BAND EDGE COMPLIANCE (HOPPING MODE)

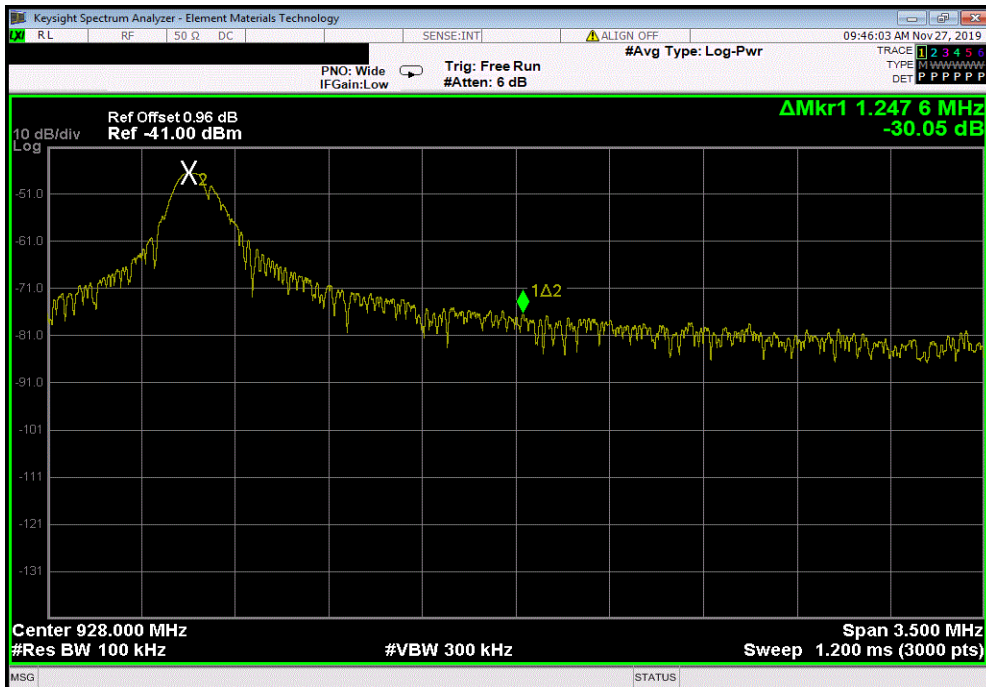


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Hopping Mode (All Channels), LoRa, 293 bps, Low Channel, 903.08 MHz						
				Value (dBc)	Limit ≤ (dBc)	Result
				-31.89	-20	Pass



Hopping Mode (All Channels), LoRa, 293 bps, High Channel, 926.84 MHz						
				Value (dBc)	Limit ≤ (dBc)	Result
				-30.05	-20	Pass

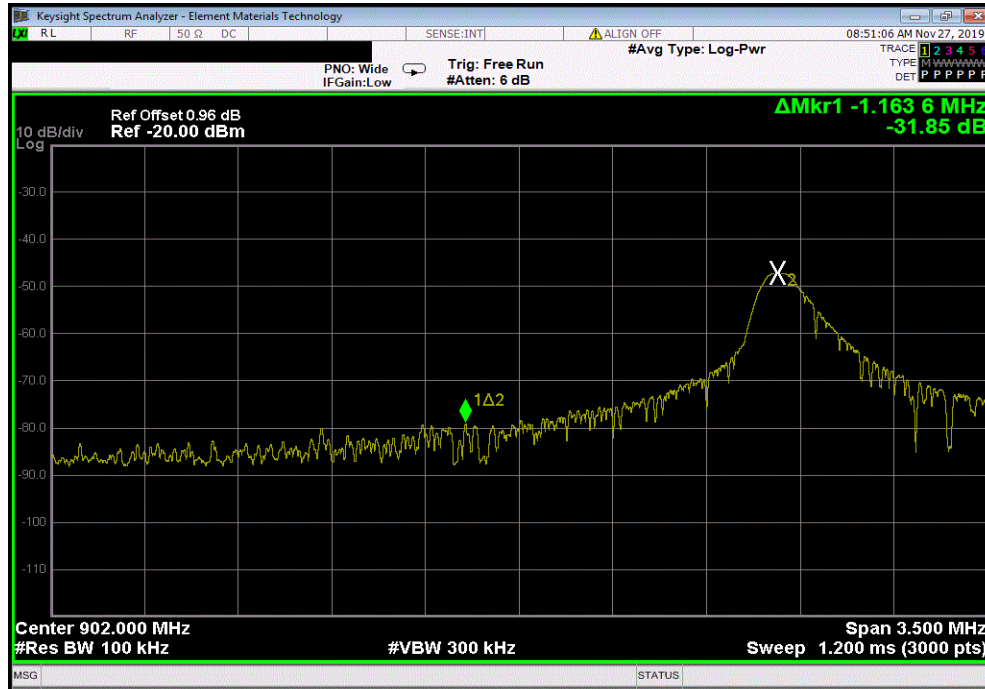


BAND EDGE COMPLIANCE (HOPPING MODE)

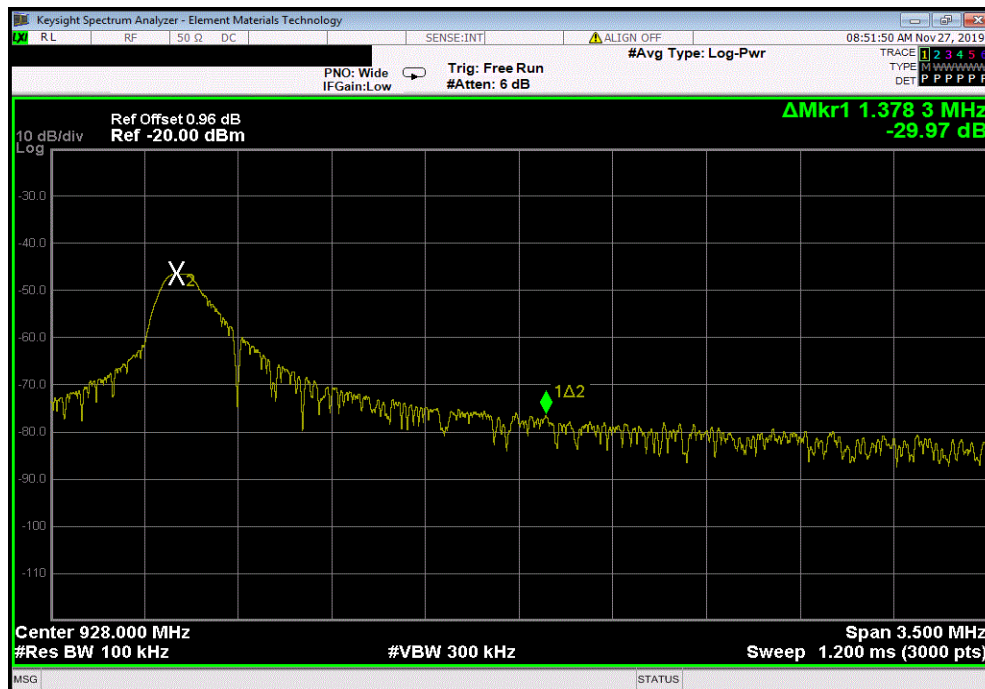


TbTx 2019.08.30.0 XMI 2019.09.05

Hopping Mode (All Channels), LoRa, 3516 bps, Low Channel, 903.08 MHz						
	Value (dBc)	Limit ≤ (dBc)	Result			
	-31.85	-20	Pass			



Hopping Mode (All Channels), LoRa, 3516 bps, High Channel, 926.84 MHz						
	Value (dBc)	Limit ≤ (dBc)	Result			
	-29.97	-20	Pass			

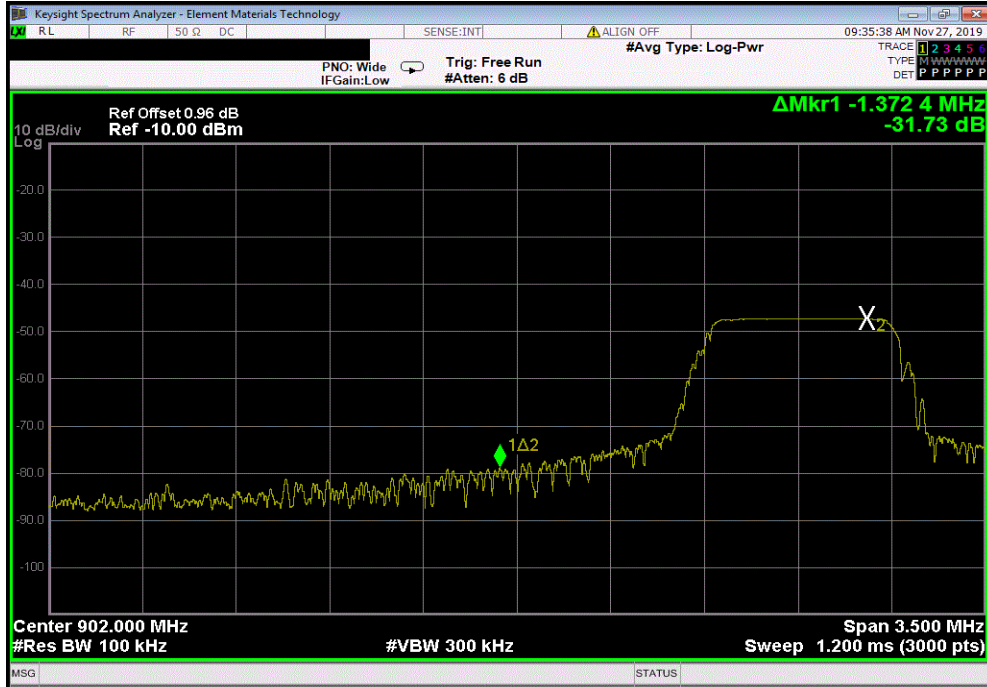


BAND EDGE COMPLIANCE (HOPPING MODE)

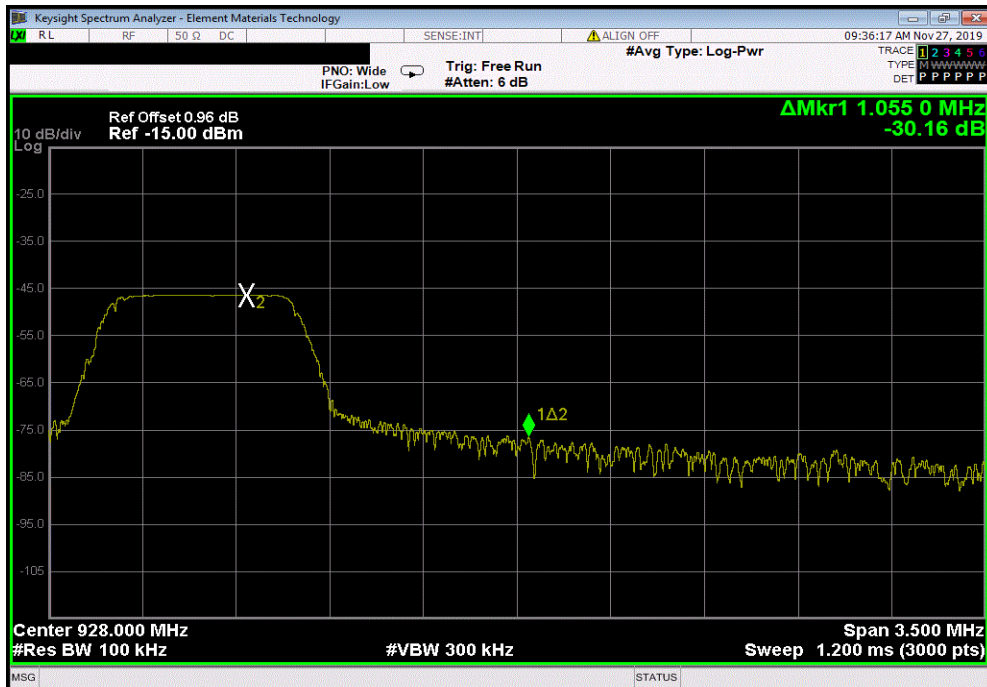


TbTx 2019.08.30.0 XMI 2019.09.05

Hopping Mode (All Channels), LoRa, 37500 bps, Low Channel, 903.08 MHz						
	Value	Limit	Result			
	(dBc)	≤ (dBc)				
	-31.73	-20	Pass			



Hopping Mode (All Channels), LoRa, 37500 bps, High Channel, 926.84 MHz						
	Value	Limit	Result			
	(dBc)	≤ (dBc)				
	-30.16	-20	Pass			



OCCUPIED BANDWIDTH



XMIT 2019.09.05

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TEST EQUIPMENT

Description	Manufacturer	Model	ID	Last Cal.	Cal. Due
Generator - Signal	Agilent	N5173B	TIW	5-Jul-17	5-Jul-20
Cable	Micro-Coax	UFD150A-1-0720-200200	MNL	15-Sep-19	15-Sep-20
Block - DC	Fairview Microwave	SD3379	AMI	6-Aug-19	6-Aug-20
Analyzer - Spectrum Analyzer	Keysight	N9010A	AFN	1-May-19	1-May-20

TEST DESCRIPTION

The measurement was made using a direct connection between the RF output of the EUT and a spectrum analyzer. The 20 dB occupied bandwidth was measured with the EUT set to low, medium and high transmit frequencies in the band. The EUT was transmitting at the data rate(s) listed in the datasheet in a no-hop mode.

OCCUPIED BANDWIDTH



TelTx 2019.08.30.0 XMt 2019.09.05

EUT: Beacon		Work Order: SMNC0001	
Serial Number: Unit 1		Date: 26-Nov-19	
Customer: SMRTGrid Inc.		Temperature: 23.1 °C	
Attendees: Bill Haag		Humidity: 29.6% RH	
Project: None		Barometric Pres.: 1011 mbar	
Tested by: Dustin Sparks		Power: Battery	
Job Site: MN08			
TEST SPECIFICATIONS			
FCC 15.247:2019		Test Method	
		ANSI C63.10:2013	
COMMENTS			
DC block, measurement cable, and customer U.FL to SMA cable included in reference level offset. No external attenuator required due to low output power.			
DEVIATIONS FROM TEST STANDARD			
None			
Configuration #	4	Signature <i>Dustin Sparks</i>	

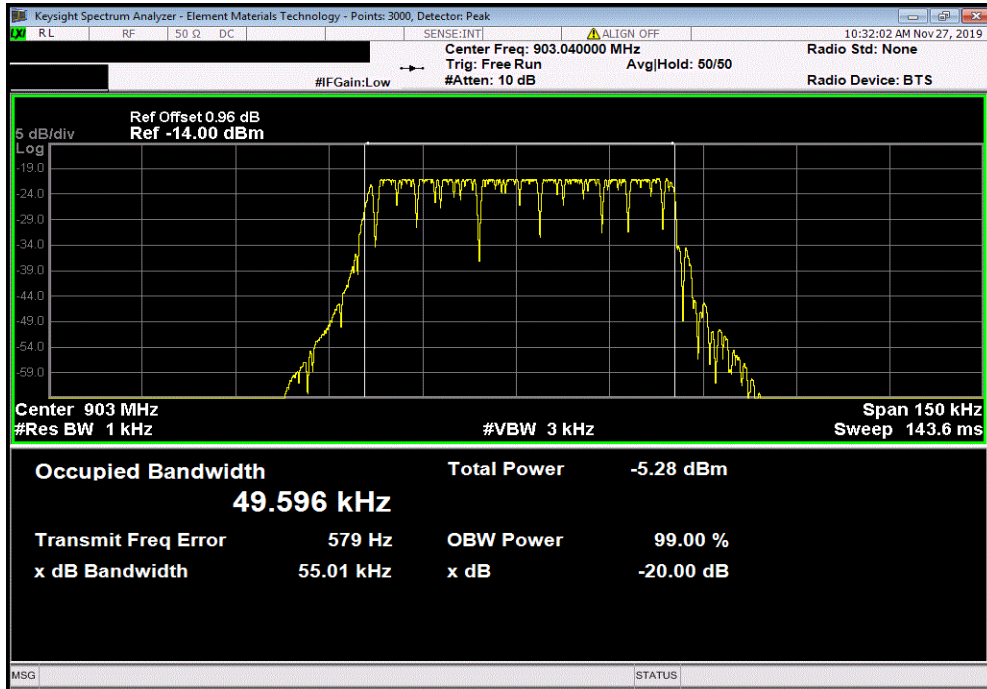
	Value	Limit	Result
LoRa, 902-928 MHz			
Low Channel, 903.04 MHz			
293 bps	55.015 kHz	< 2.2 MHz	Pass
3516 bps	280.177 kHz	< 2.2 MHz	Pass
37500 bps	700.362 kHz	< 2.2 MHz	Pass
Mid Channel, 915 MHz			
293 bps	55.3 kHz	< 2.2 MHz	Pass
3516 bps	278.522 kHz	< 2.2 MHz	Pass
37500 bps	679.095 kHz	< 2.2 MHz	Pass
High Channel, 926.84 MHz			
293 bps	54.274 kHz	< 2.2 MHz	Pass
3516 bps	277.763 kHz	< 2.2 MHz	Pass
37500 bps	699.609 kHz	< 2.2 MHz	Pass

OCCUPIED BANDWIDTH

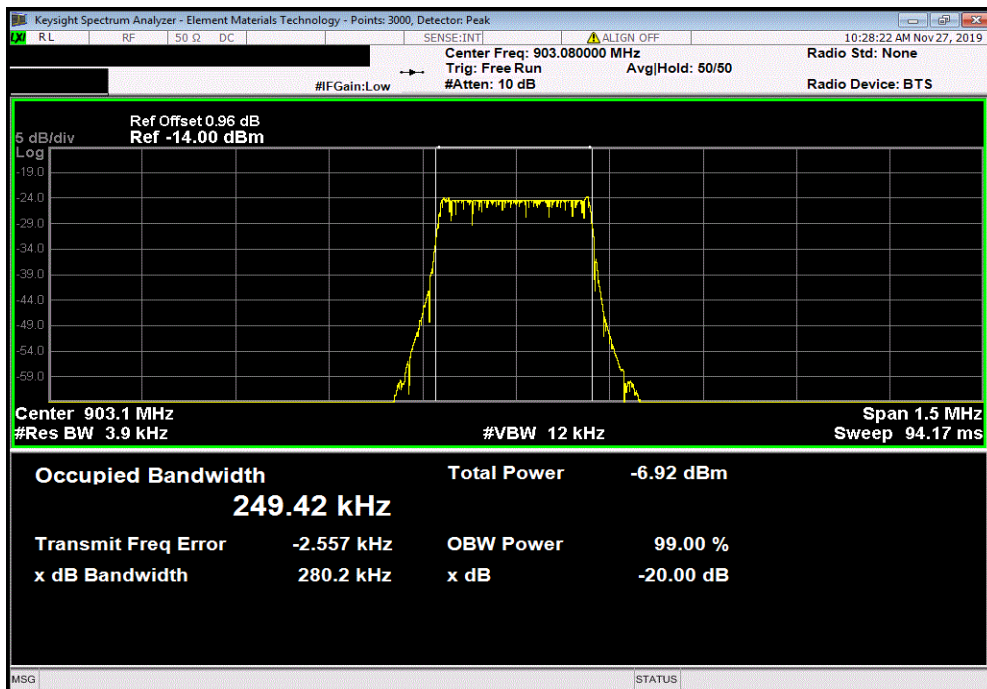


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Low Channel, 903.04 MHz, 293 bps			
	Value	Limit	Result
	55.015 kHz	< 2.2 MHz	Pass



LoRa, 902-928 MHz, Low Channel, 903.04 MHz, 3516 bps			
	Value	Limit	Result
	280.177 kHz	< 2.2 MHz	Pass

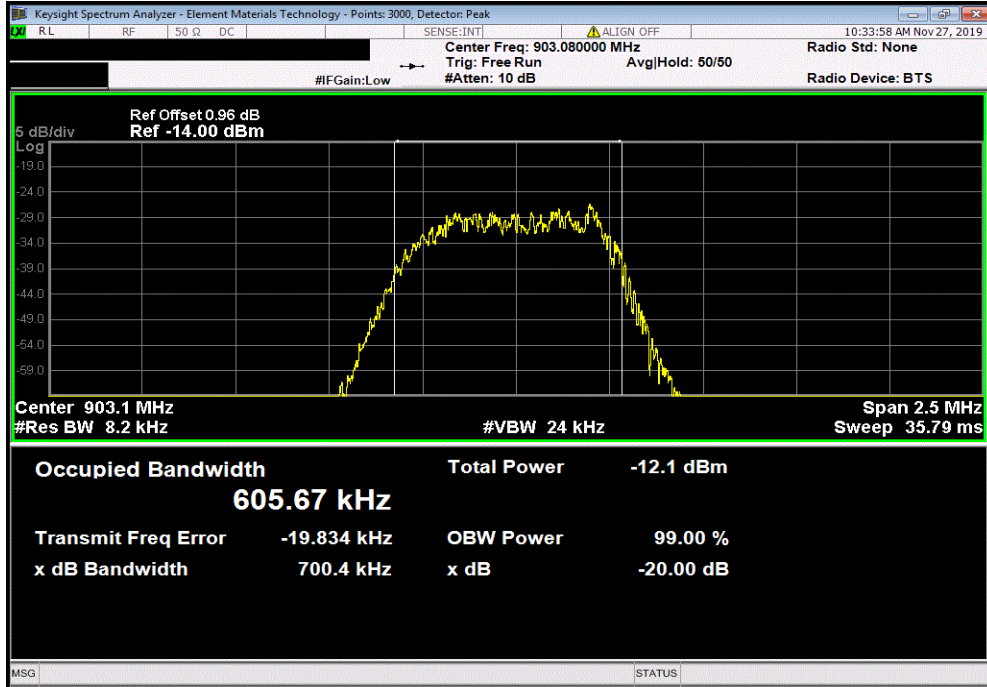


OCCUPIED BANDWIDTH

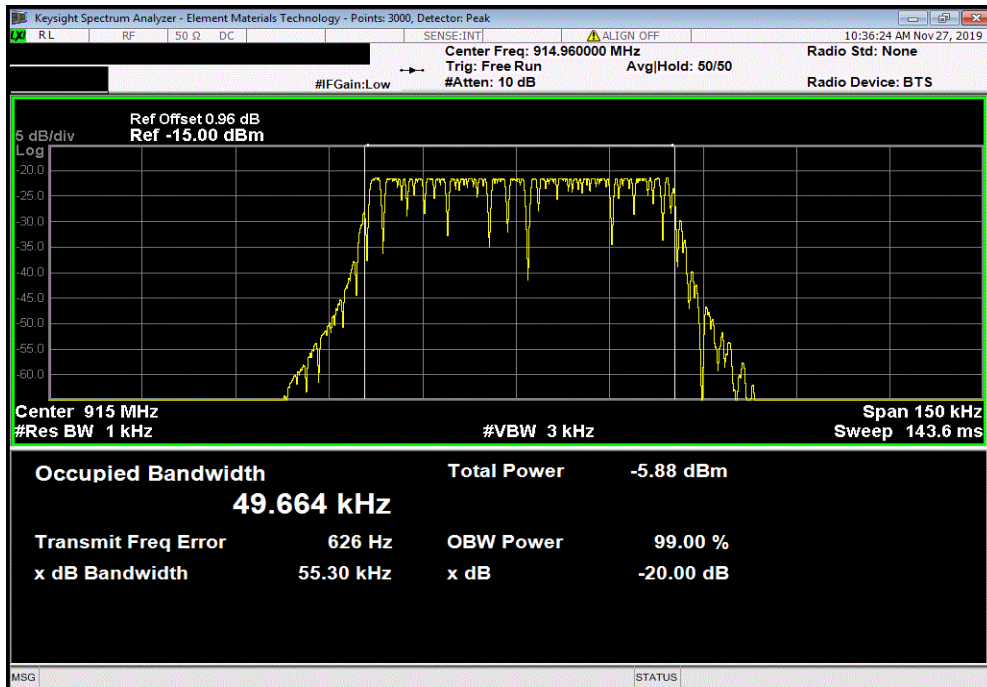


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Low Channel, 903.04 MHz, 37500 bps						
				Value	Limit	Result
				700.362 kHz	< 2.2 MHz	Pass



LoRa, 902-928 MHz, Mid Channel, 915 MHz, 293 bps						
				Value	Limit	Result
				55.3 kHz	< 2.2 MHz	Pass

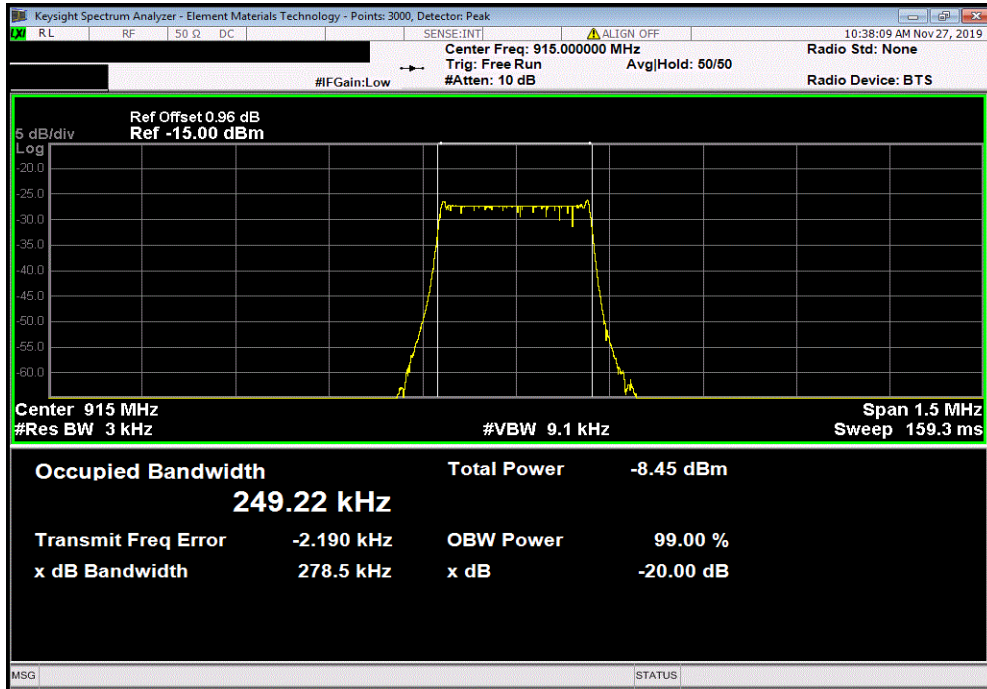


OCCUPIED BANDWIDTH

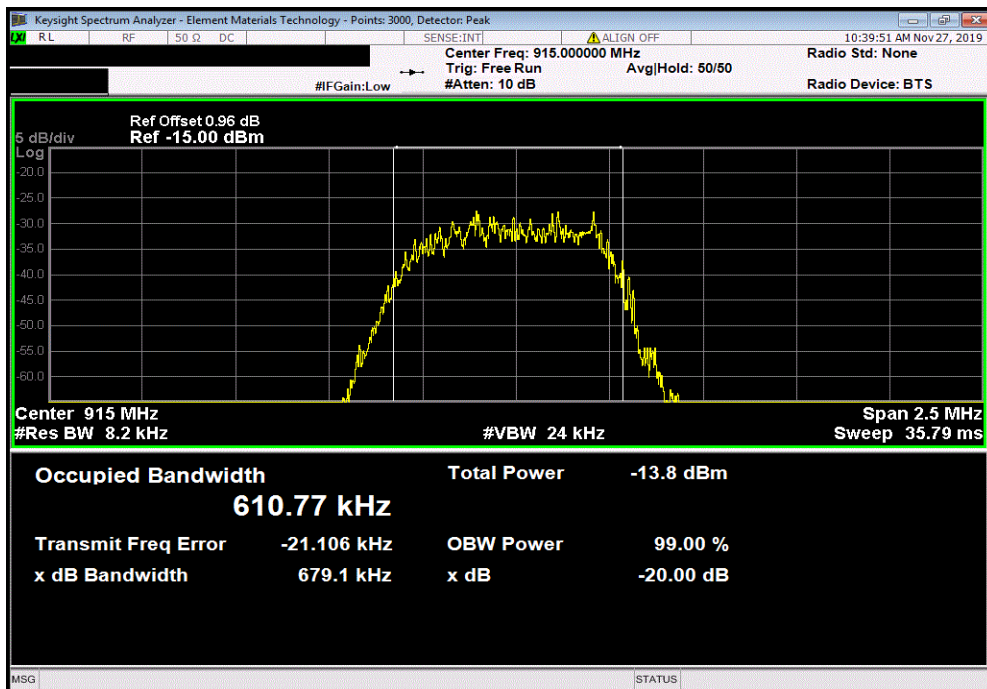


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Mid Channel, 915 MHz, 3516 bps			
	Value	Limit	Result
	278.522 kHz	< 2.2 MHz	Pass



LoRa, 902-928 MHz, Mid Channel, 915 MHz, 37500 bps			
	Value	Limit	Result
	679.095 kHz	< 2.2 MHz	Pass

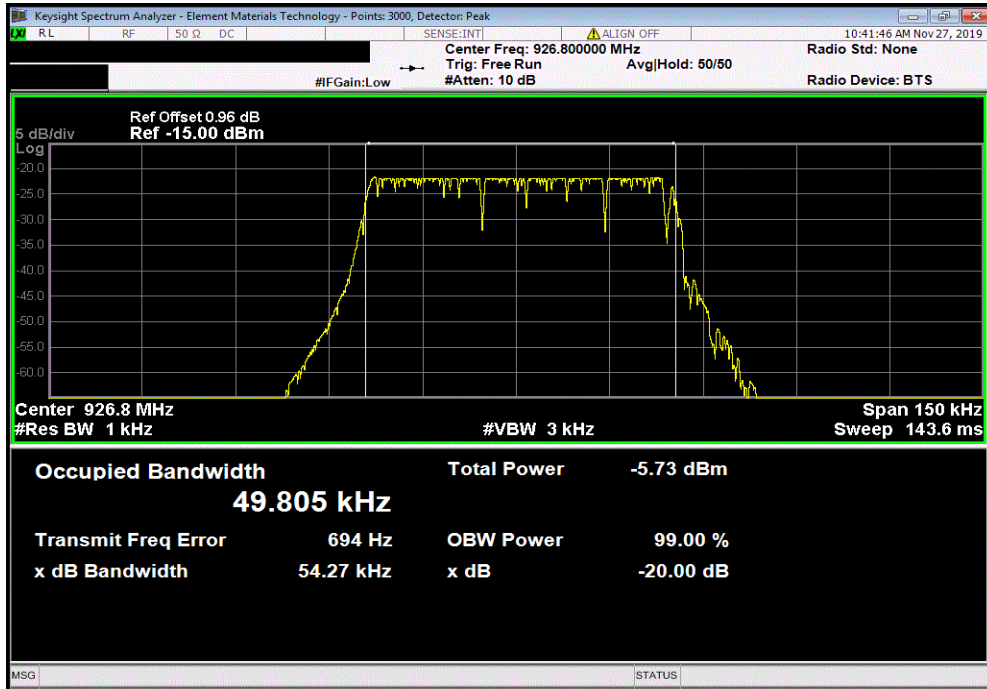


OCCUPIED BANDWIDTH

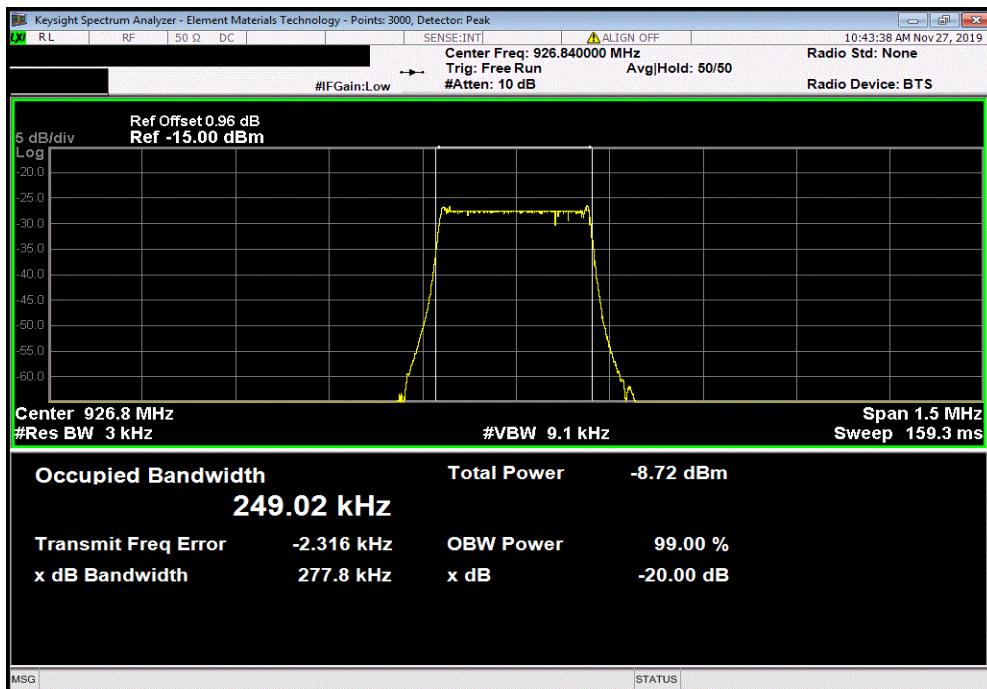


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LoRa, 902-928 MHz, High Channel, 926.84 MHz, 293 bps			
	Value	Limit	Result
	54.274 kHz	< 2.2 MHz	Pass



LoRa, 902-928 MHz, High Channel, 926.84 MHz, 3516 bps			
	Value	Limit	Result
	277.763 kHz	< 2.2 MHz	Pass

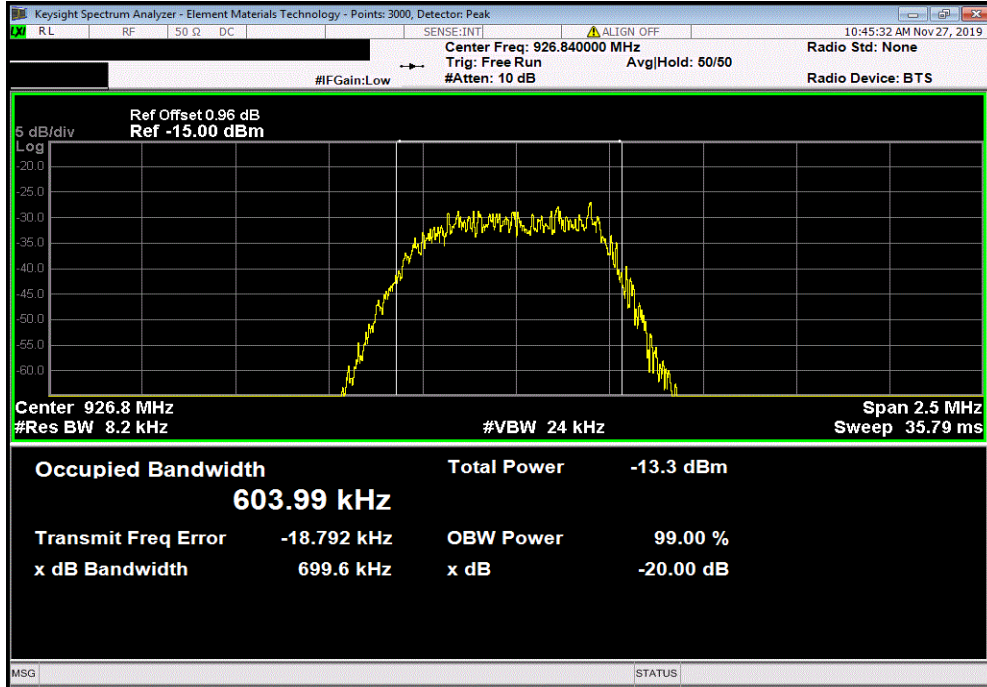


OCCUPIED BANDWIDTH



TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, High Channel, 926.84 MHz, 37500 bps			
	Value	Limit	Result
	699.609 kHz	< 2.2 MHz	Pass



< 2.2 MHz Pass

SPURIOUS CONDUCTED EMISSIONS



XMit 2019.09.05

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TEST EQUIPMENT

Description	Manufacturer	Model	ID	Last Cal.	Cal. Due
Generator - Signal	Agilent	N5173B	TIW	5-Jul-17	5-Jul-20
Cable	Micro-Coax	UFD150A-1-0720-200200	MNL	15-Sep-19	15-Sep-20
Block - DC	Fairview Microwave	SD3379	AMI	6-Aug-19	6-Aug-20
Analyzer - Spectrum Analyzer	Keysight	N9010A	AFN	1-May-19	1-May-20

TEST DESCRIPTION

The measurement was made using a direct connection between the RF output of the EUT and a spectrum analyzer. The spurious RF conducted emissions were measured with the EUT set to low, medium and high transmit frequencies. The EUT was transmitting at the data rate(s) listed in the datasheet. For each transmit frequency, the spectrum was scanned throughout the specified frequency range.

SPURIOUS CONDUCTED EMISSIONS



TelTx 2019.08.30.0 XMt 2019.09.05

EUT: Beacon		Work Order: SMNC0001	
Serial Number: Unit 1		Date: 26-Nov-19	
Customer: SMRTGrid Inc.		Temperature: 23.2 °C	
Attendees: Bill Haag		Humidity: 28.9% RH	
Project: None		Barometric Pres.: 1013 mbar	
Tested by: Dustin Sparks		Power: Battery	
Job Site: MN08		Test Method	
FCC 15.247:2019		ANSI C63.10:2013	
COMMENTS			
DC block, measurement cable, and customer U.FL to SMA cable included in reference level offset. No external attenuator required due to low output power.			
DEVIATIONS FROM TEST STANDARD			
None			
Configuration #	4	Signature <i>Dustin Sparks</i>	

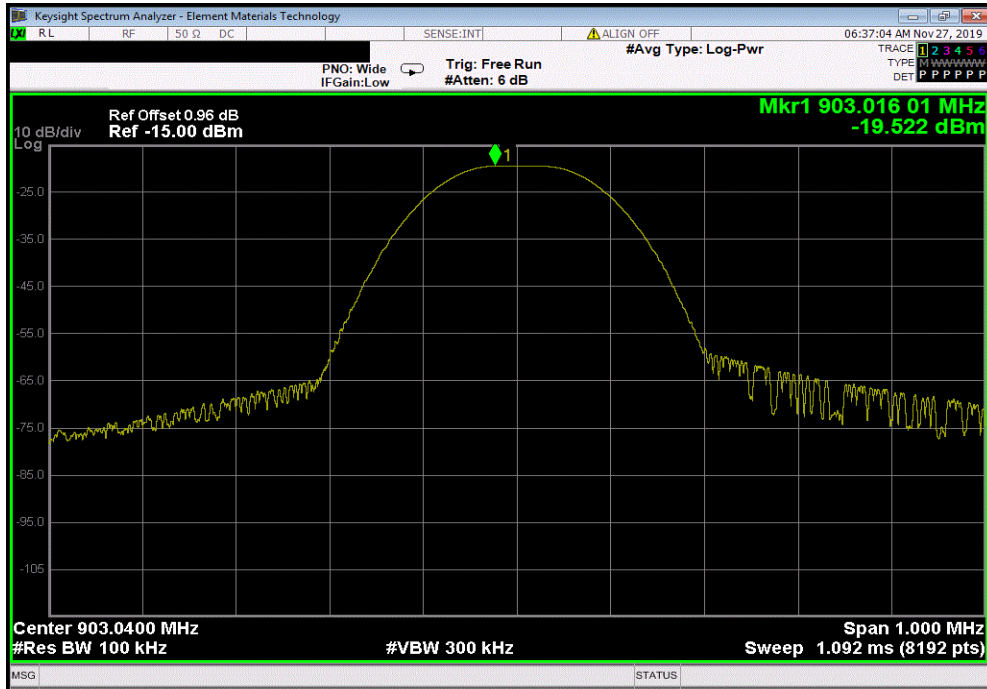
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result	
LoRa, 902-928 MHz					
Low Channel, 903.08 MHz					
293 bps	Fundamental	903.02	N/A	N/A	
293 bps	30 MHz - 10 GHz	8126.75	-33.21	-20	Pass
3516 bps	Fundamental	902.96	N/A	N/A	N/A
3516 bps	30 MHz - 10 GHz	8126.75	-33.03	-20	Pass
37500 bps	Fundamental	903.06	N/A	N/A	N/A
37500 bps	30 MHz - 10 GHz	8126.75	-33.21	-20	Pass
Mid Channel, 915 MHz					
293 bps	Fundamental	914.94	N/A	N/A	N/A
293 bps	30 MHz - 10 GHz	8235.08	-32.52	-20	Pass
3516 bps	Fundamental	914.88	N/A	N/A	N/A
3516 bps	30 MHz - 10 GHz	8235.08	-32.37	-20	Pass
37500 bps	Fundamental	914.94	N/A	N/A	N/A
37500 bps	30 MHz - 10 GHz	8236.29	-33.55	-20	Pass
High Channel, 926.84 MHz					
293 bps	Fundamental	926.82	N/A	N/A	N/A
293 bps	30 MHz - 10 GHz	1853.35	-35.19	-20	Pass
3516 bps	Fundamental	926.84	N/A	N/A	N/A
3516 bps	30 MHz - 10 GHz	1853.35	-35.01	-20	Pass
37500 bps	Fundamental	926.78	N/A	N/A	N/A
37500 bps	30 MHz - 10 GHz	1853.35	-34.61	-20	Pass

SPURIOUS CONDUCTED EMISSIONS

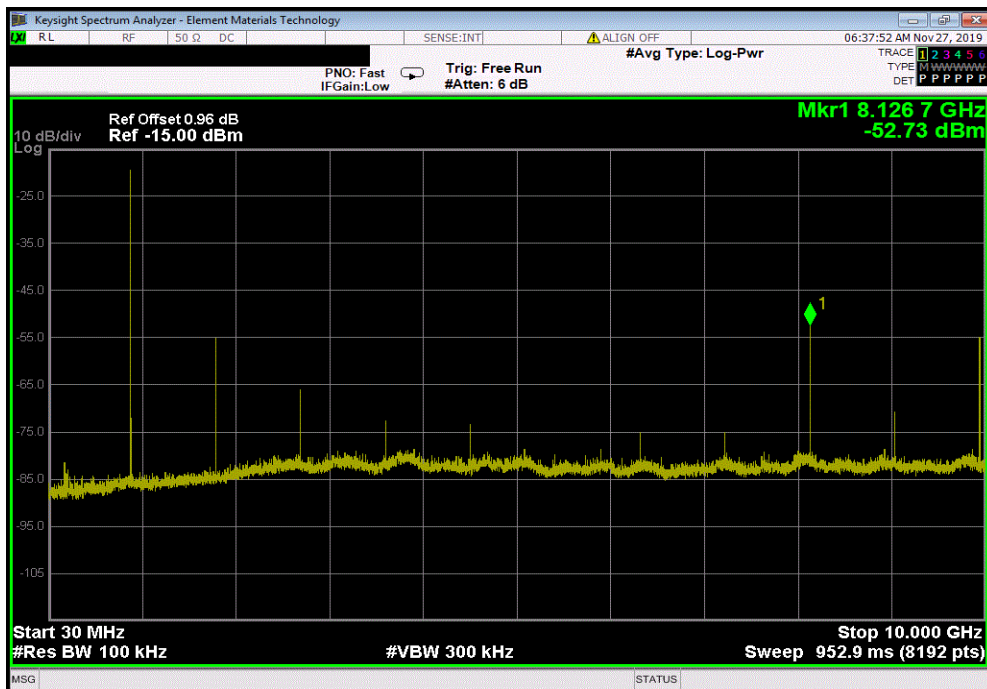


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LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 293 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
Fundamental	903.02	N/A	N/A	N/A		



LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 293 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
30 MHz - 10 GHz	8126.75	-33.21	-20	Pass		

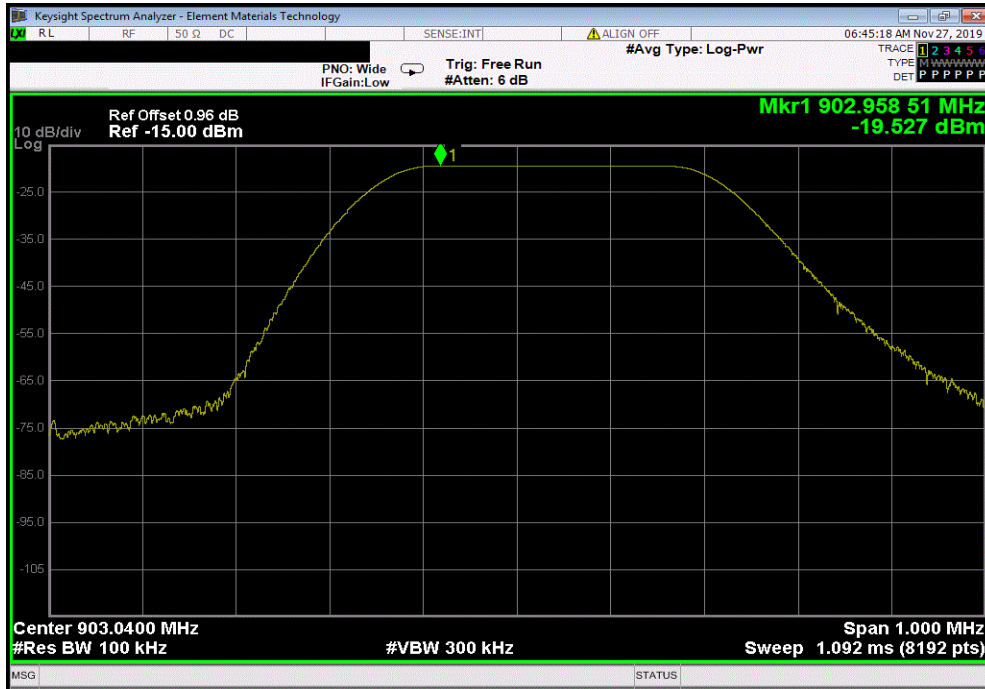


SPURIOUS CONDUCTED EMISSIONS

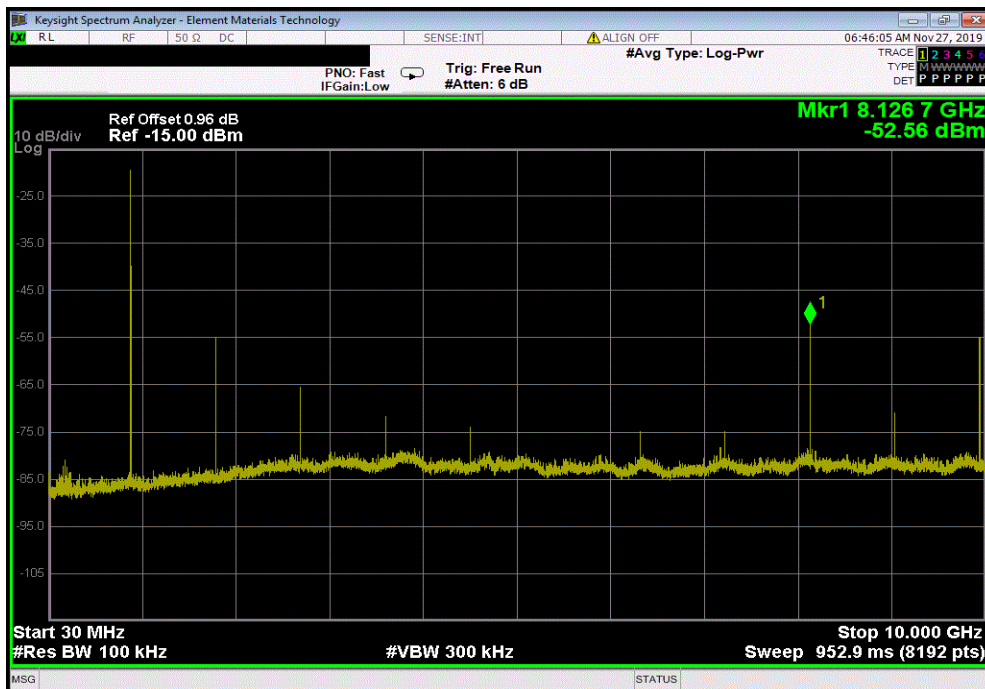


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 293 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
Fundamental	902.96	N/A	N/A	N/A		



LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 293 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
30 MHz - 10 GHz	8126.75	-33.03	-20	Pass		

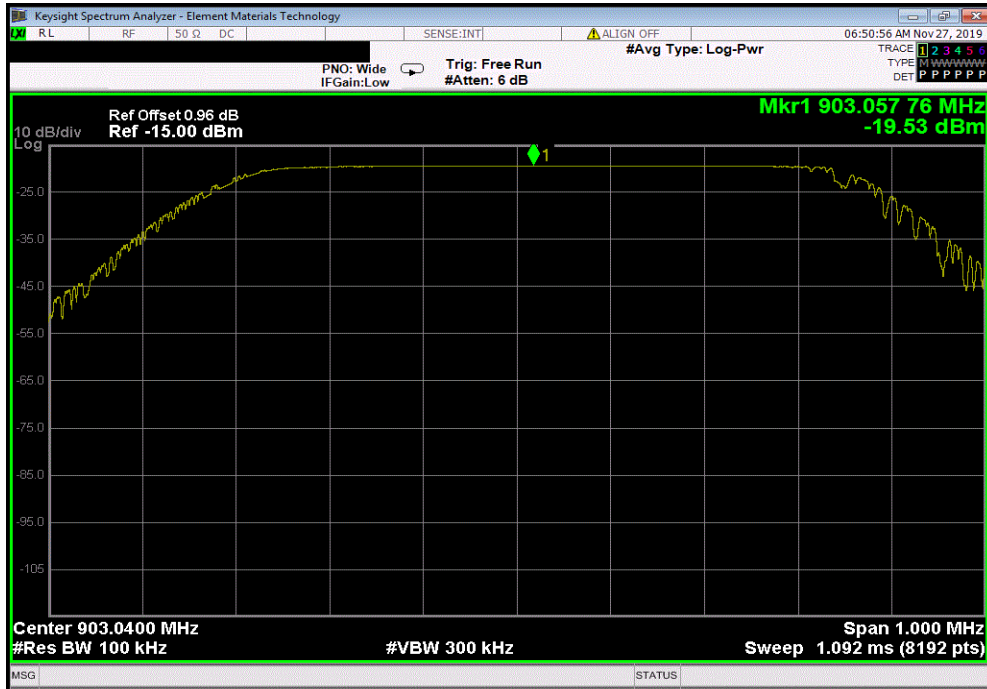


SPURIOUS CONDUCTED EMISSIONS

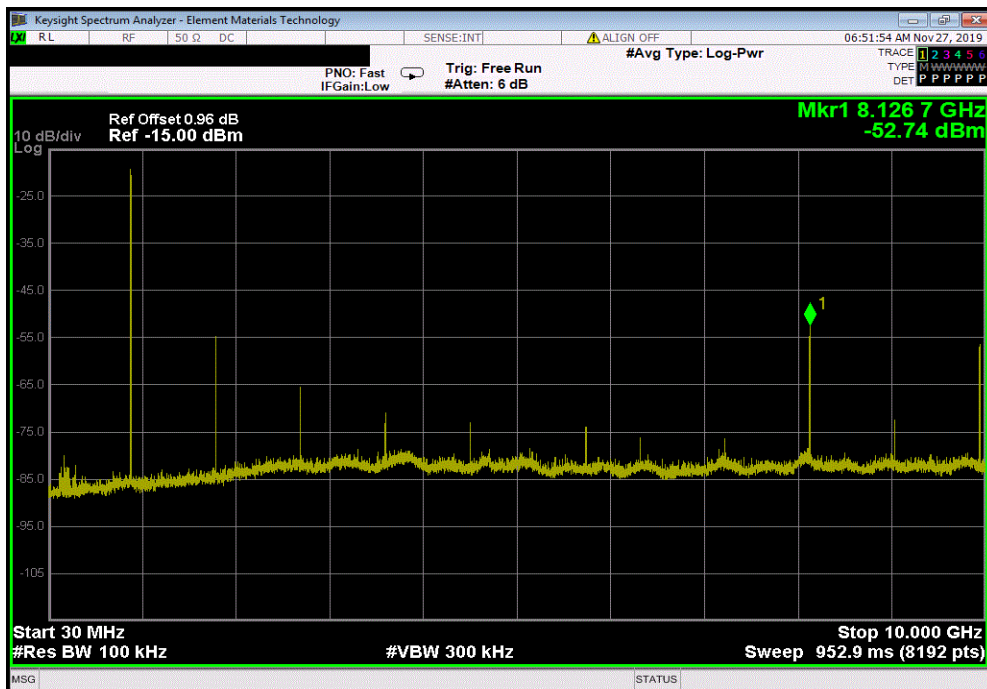


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LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 293 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
Fundamental	903.06	N/A	N/A	N/A		



LoRa, 902-928 MHz, Low Channel, 903.08 MHz, 293 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
30 MHz - 10 GHz	8126.75	-33.21	-20	Pass		

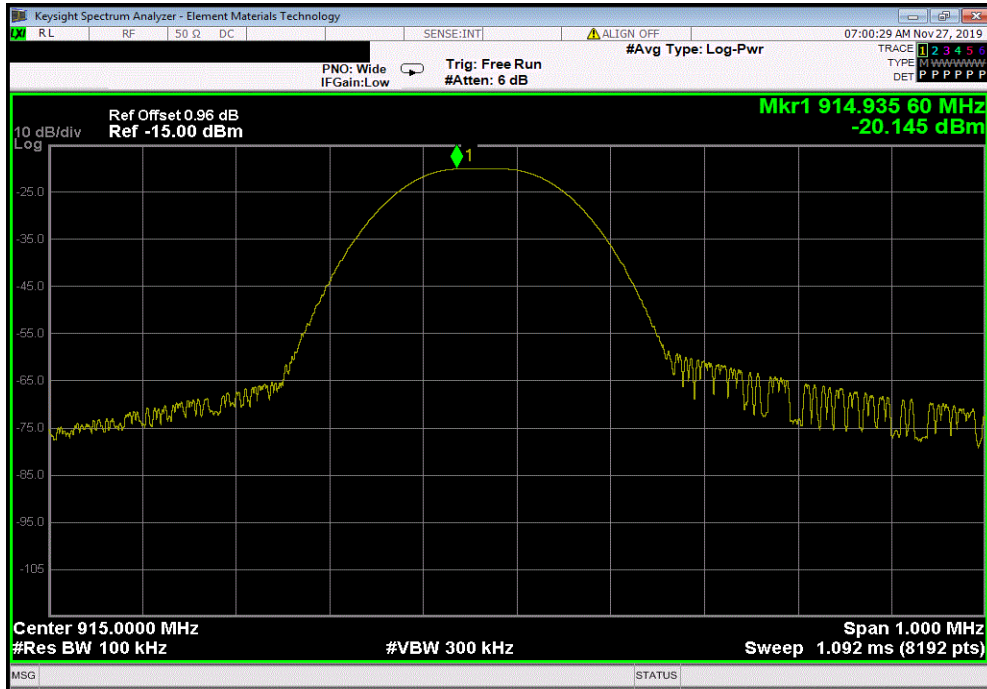


SPURIOUS CONDUCTED EMISSIONS

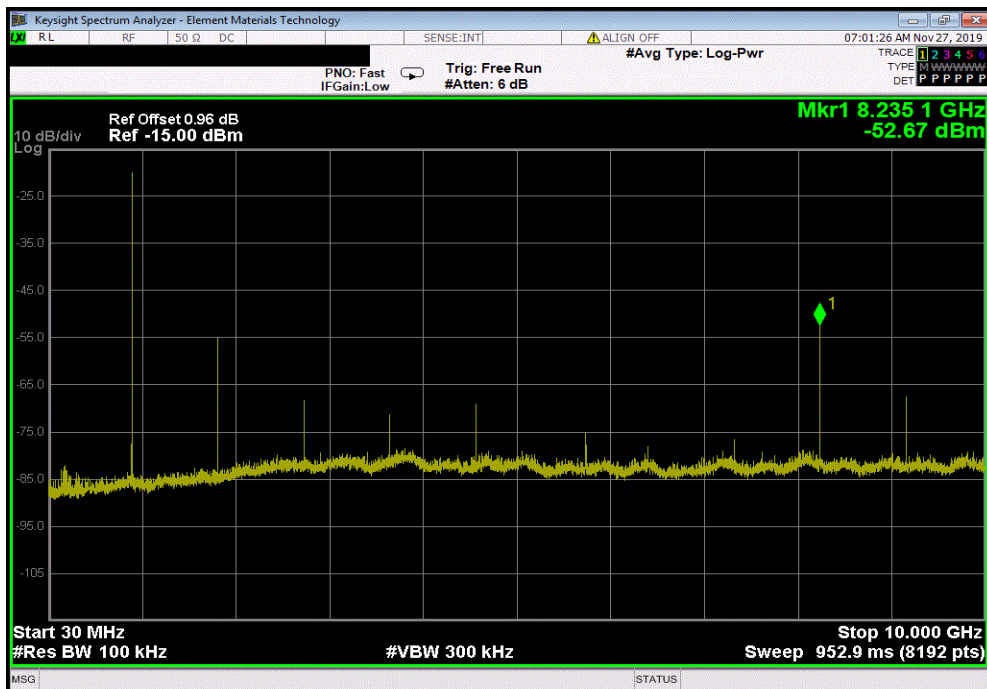


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LoRa, 902-928 MHz, Mid Channel, 915 MHz, 293 bps					
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result	
Fundamental	914.94	N/A	N/A	N/A	



LoRa, 902-928 MHz, Mid Channel, 915 MHz, 293 bps					
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result	
30 MHz - 10 GHz	8235.08	-32.52	-20	Pass	

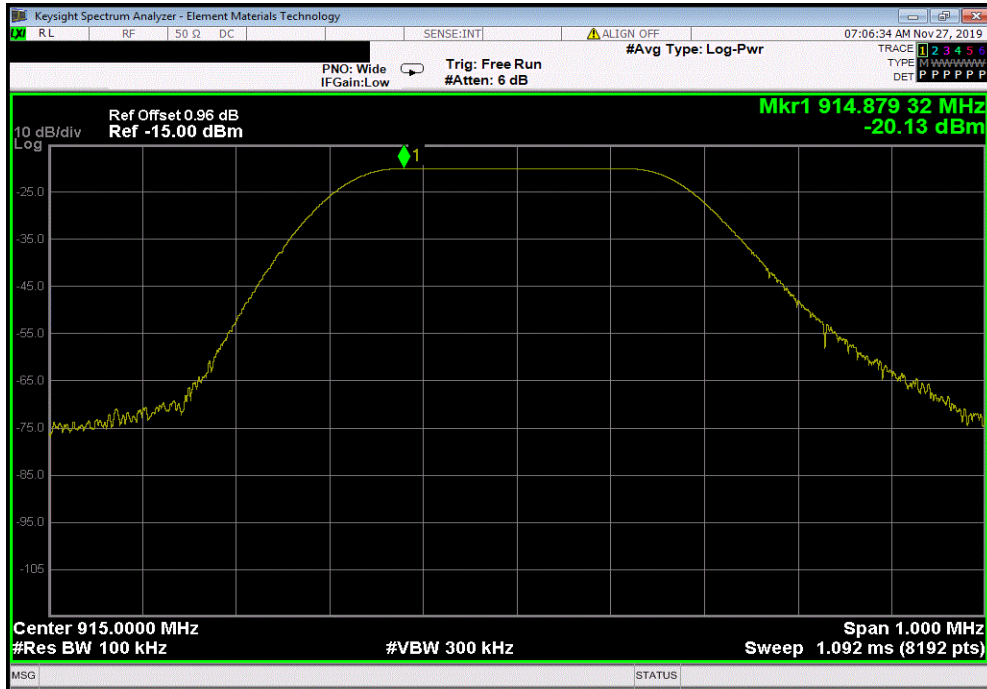


SPURIOUS CONDUCTED EMISSIONS

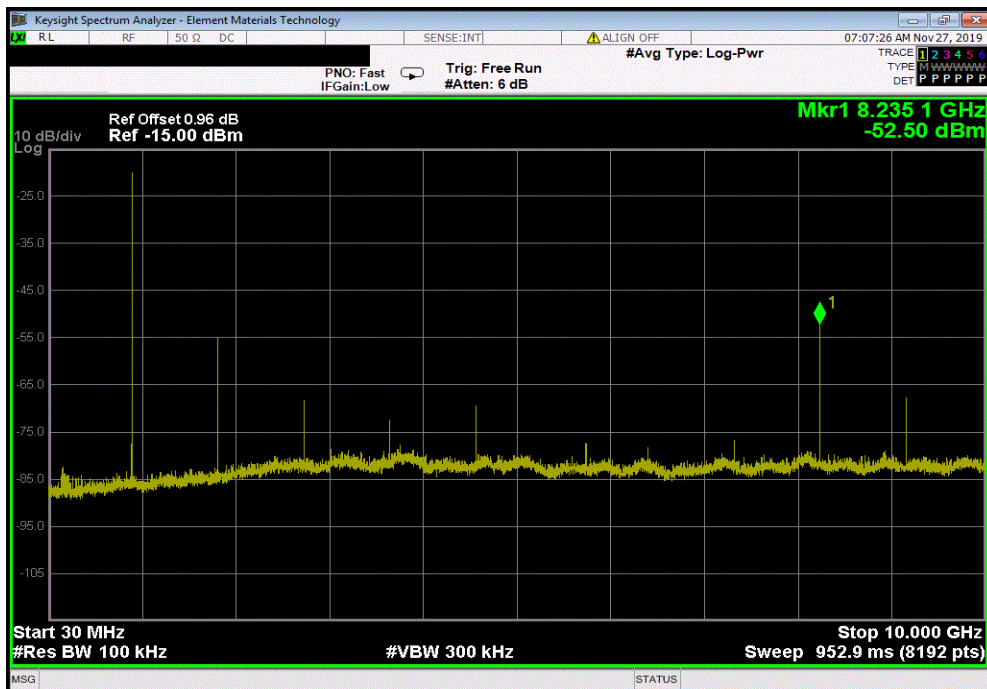


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Mid Channel, 915 MHz, 3516 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
Fundamental	914.88	N/A	N/A	N/A		



LoRa, 902-928 MHz, Mid Channel, 915 MHz, 3516 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
30 MHz - 10 GHz	8235.08	-32.37	-20	Pass		

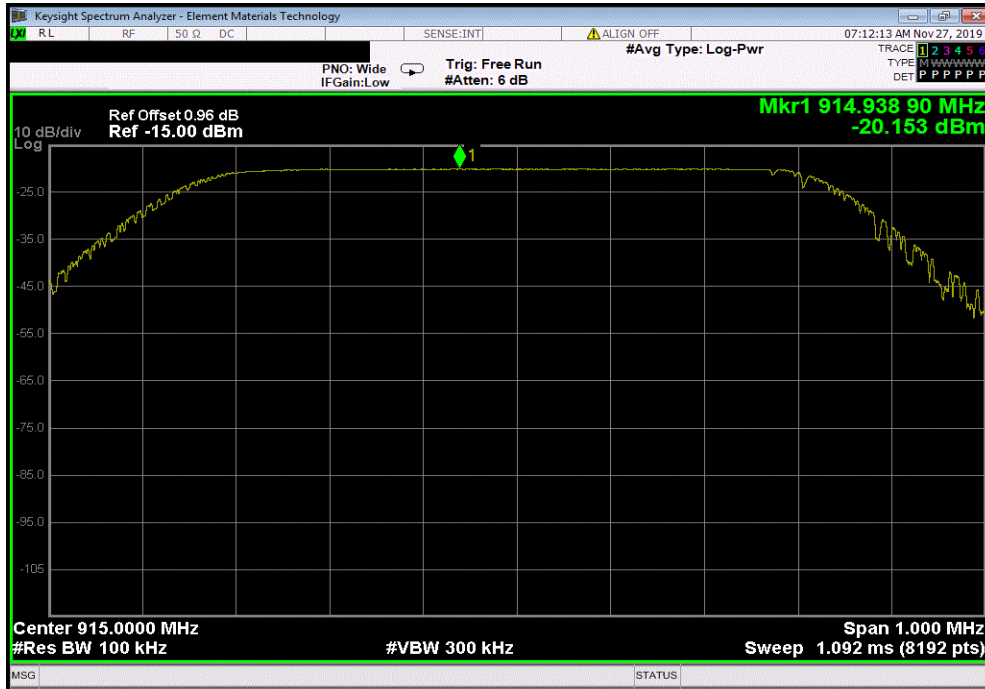


SPURIOUS CONDUCTED EMISSIONS

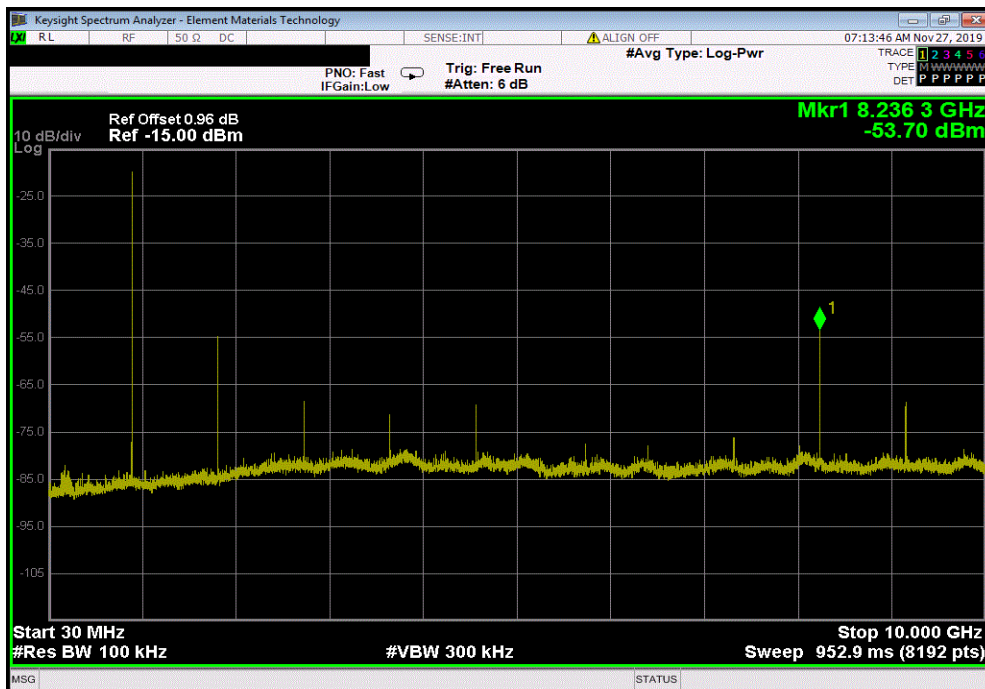


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Mid Channel, 915 MHz, 37500 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
Fundamental	914.94	N/A	N/A	N/A		



LoRa, 902-928 MHz, Mid Channel, 915 MHz, 37500 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
30 MHz - 10 GHz	8236.29	-33.55	-20	Pass		

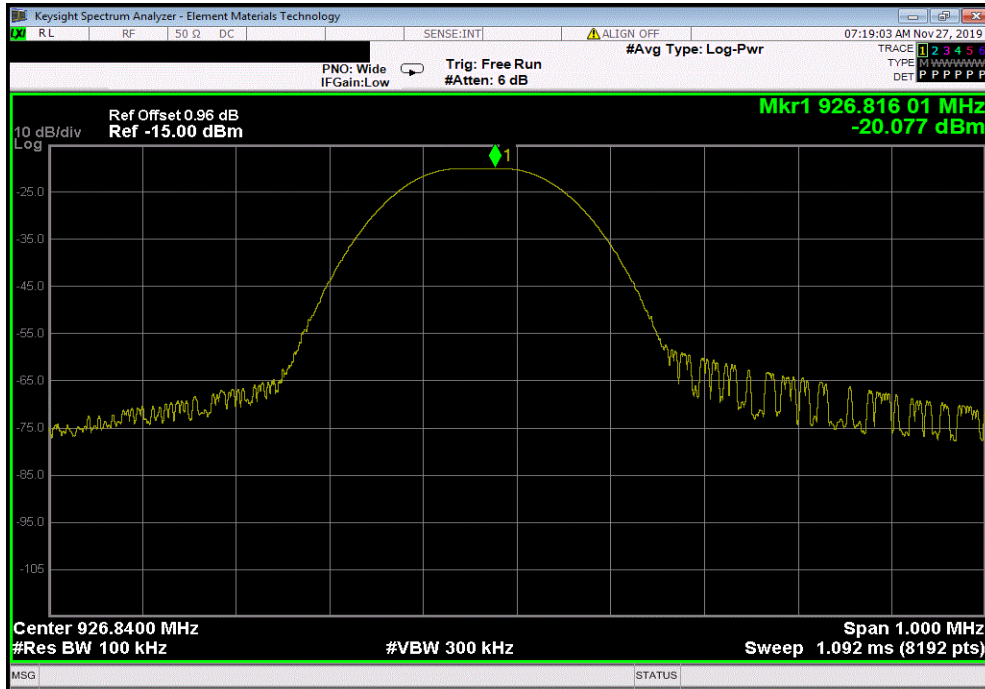


SPURIOUS CONDUCTED EMISSIONS

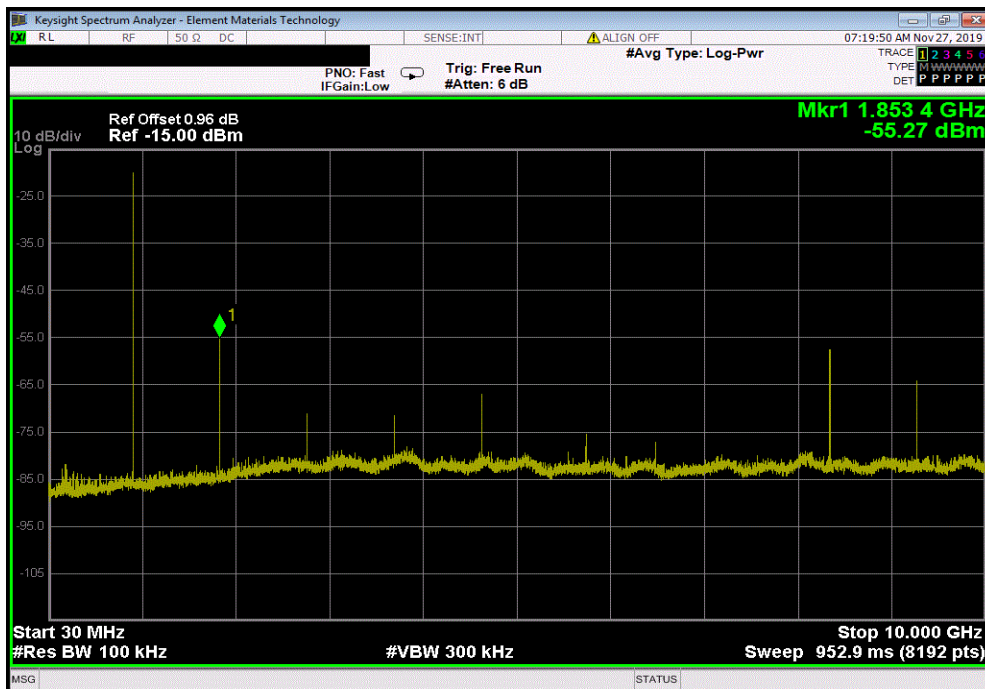


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, High Channel, 926.84 MHz, 293 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
Fundamental	926.82	N/A	N/A	N/A		



LoRa, 902-928 MHz, High Channel, 926.84 MHz, 293 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
30 MHz - 10 GHz	1853.35	-35.19	-20	Pass		

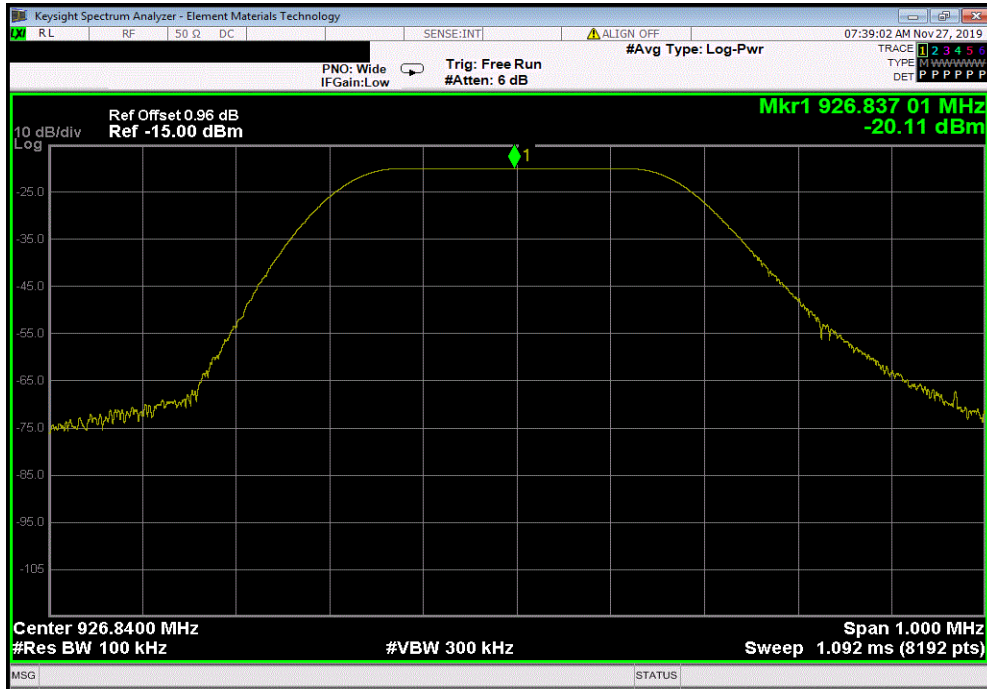


SPURIOUS CONDUCTED EMISSIONS

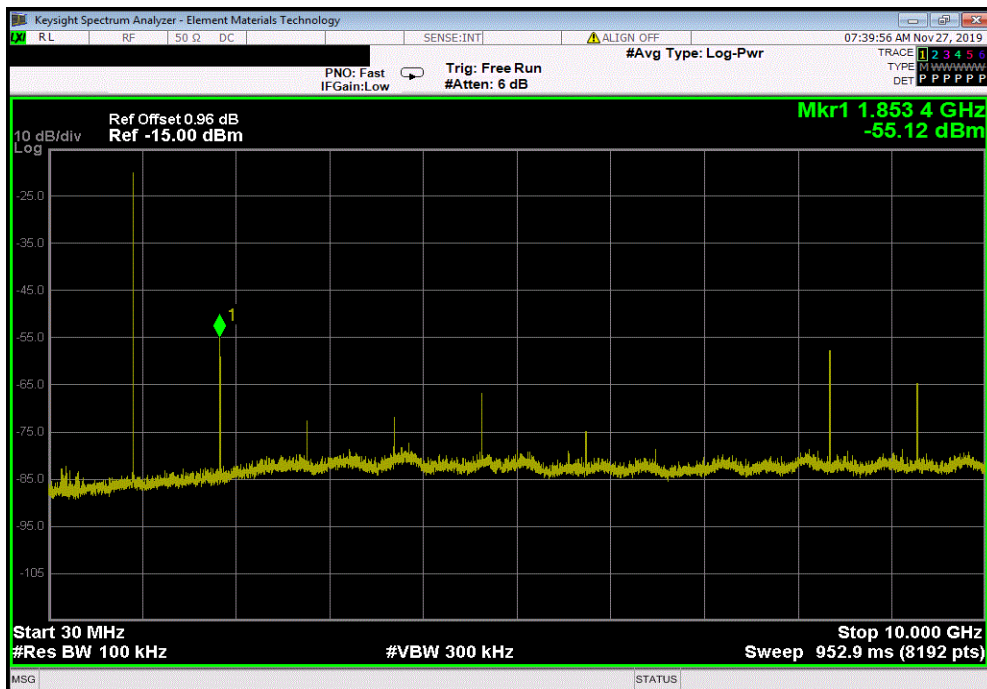


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, High Channel, 926.84 MHz, 3516 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
Fundamental	926.84	N/A	N/A	N/A		



LoRa, 902-928 MHz, High Channel, 926.84 MHz, 3516 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
30 MHz - 10 GHz	1853.35	-35.01	-20	Pass		

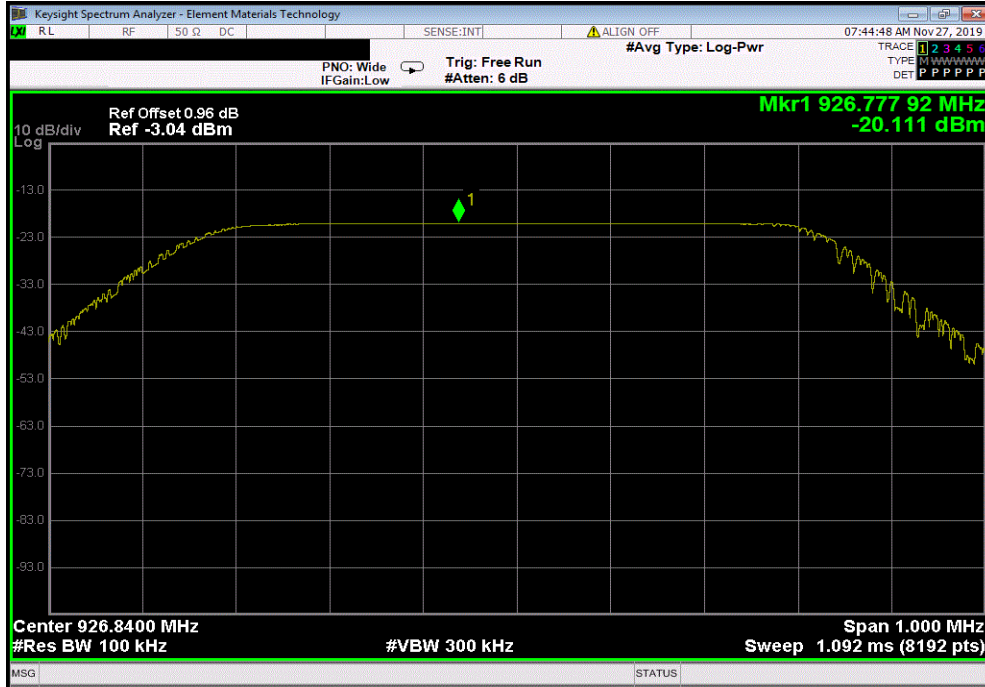


SPURIOUS CONDUCTED EMISSIONS

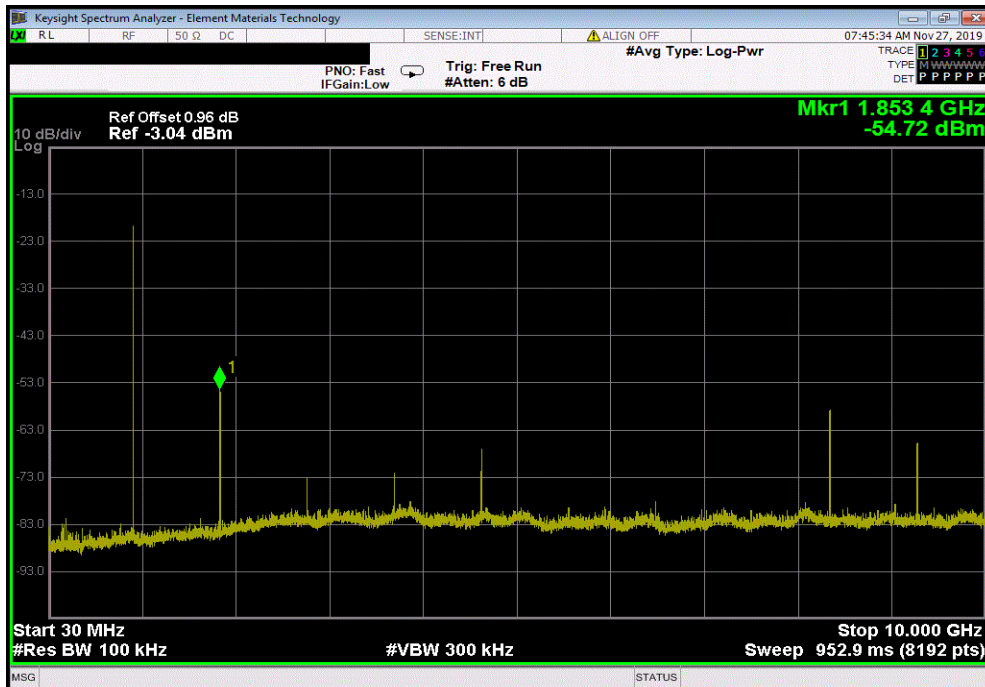


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, High Channel, 926.84 MHz, 37500 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
Fundamental	926.78	N/A	N/A	N/A		



LoRa, 902-928 MHz, High Channel, 926.84 MHz, 37500 bps						
Frequency Range	Measured Freq (MHz)	Max Value (dBc)	Limit ≤ (dBc)	Result		
30 MHz - 10 GHz	1853.35	-34.61	-20	Pass		



POWER SPECTRAL DENSITY



XMIT 2019.09.05

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
Generator - Signal	Agilent	N5173B	TIW	5-Jul-17	5-Jul-20
Cable	Micro-Coax	UFD150A-1-0720-200200	MNL	15-Sep-19	15-Sep-20
Block - DC	Fairview Microwave	SD3379	AMI	6-Aug-19	6-Aug-20
Analyzer - Spectrum Analyzer	Keysight	N9010A	AFN	1-May-19	1-May-20

TEST DESCRIPTION

The measurement was made using a direct connection between the RF output of the EUT and a spectrum analyzer. The maximum power spectral density measurements was measured using the channels and modes as called out on the following data sheets.

Per the procedure outlined in ANSI C63.10 the peak power spectral density was measured in a 3 kHz RBW.

POWER SPECTRAL DENSITY



TelTx 2019.08.30.0 XMt 2019.09.05

EUT: Beacon		Work Order: SMNC0001	
Serial Number: Unit 1		Date: 26-Nov-19	
Customer: SMRTGrid Inc.		Temperature: 23.2 °C	
Attendees: Bill Haag		Humidity: 28.9% RH	
Project: None		Barometric Pres.: 1013 mbar	
Tested by: Dustin Sparks		Power: Battery	
Job Site: MN08		Test Method	
FCC 15.247:2019		ANSI C63.10:2013	
COMMENTS			
DC block, measurement cable, and customer U.FL to SMA cable included in reference level offset. No external attenuator required due to low output power.			
DEVIATIONS FROM TEST STANDARD			
None			
Configuration #	4	Signature <i>Dustin Sparks</i>	

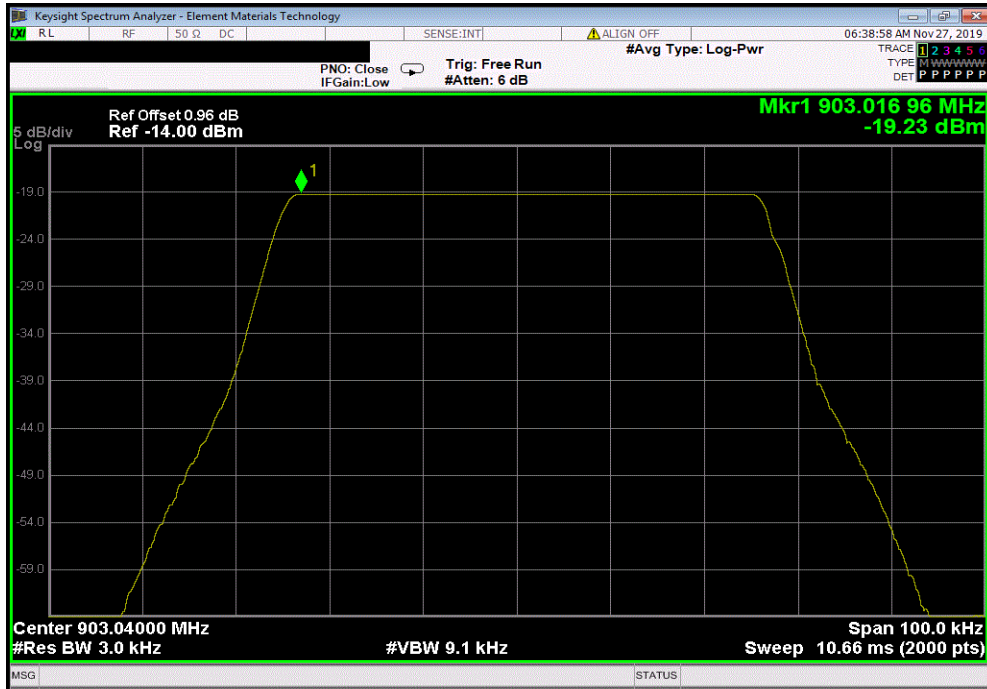
	Value dBm/3kHz	Limit < dBm/3kHz	Results
LoRa, 902-928 MHz			
Low Channel, 903.04 MHz			
293 bps	-19.227	8	Pass
3516 bps	-25.828	8	Pass
37500 bps	-32.702	8	Pass
Mid Channel, 915 MHz			
293 bps	-19.848	8	Pass
3516 bps	-26.413	8	Pass
37500 bps	-33.287	8	Pass
High Channel, 926.84 MHz			
293 bps	-19.791	8	Pass
3516 bps	-26.38	8	Pass
37500 bps	-33.339	8	Pass

POWER SPECTRAL DENSITY

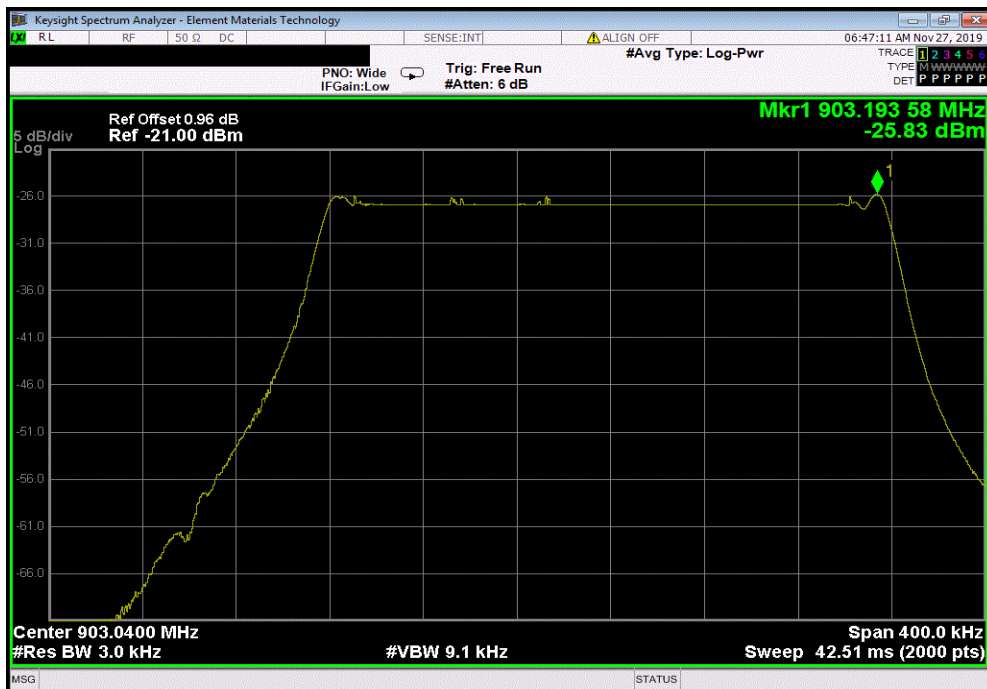


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Low Channel, 903.04 MHz, 293 bps						
	Value	Limit	Results			
	dBm/3kHz	< dBm/3kHz				
	-19.227	8	Pass			



LoRa, 902-928 MHz, Low Channel, 903.04 MHz, 3516 bps						
	Value	Limit	Results			
	dBm/3kHz	< dBm/3kHz				
	-25.828	8	Pass			

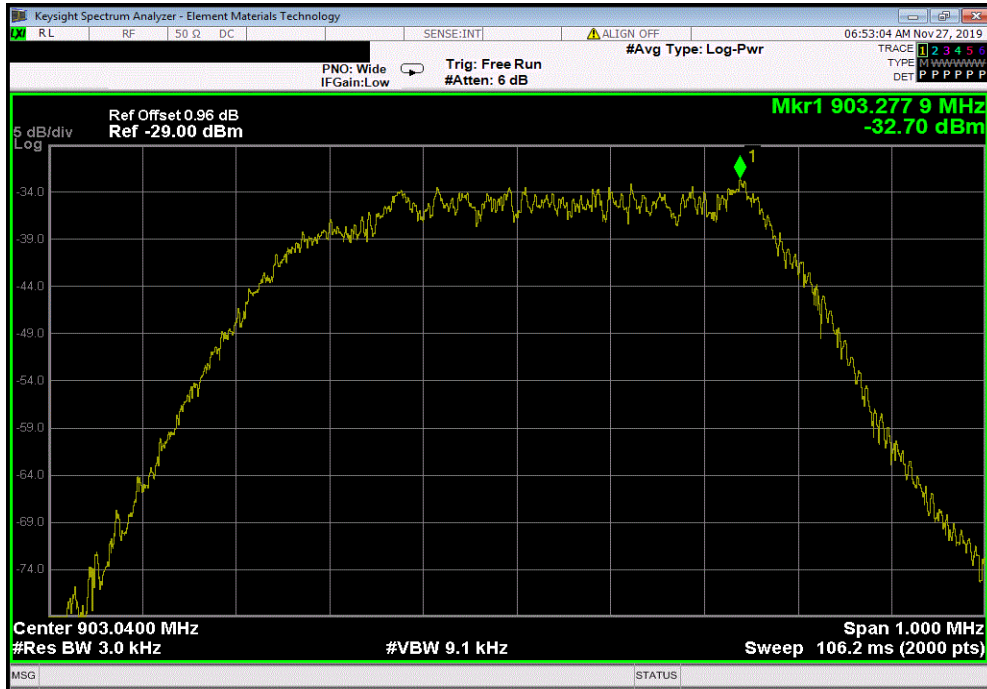


POWER SPECTRAL DENSITY

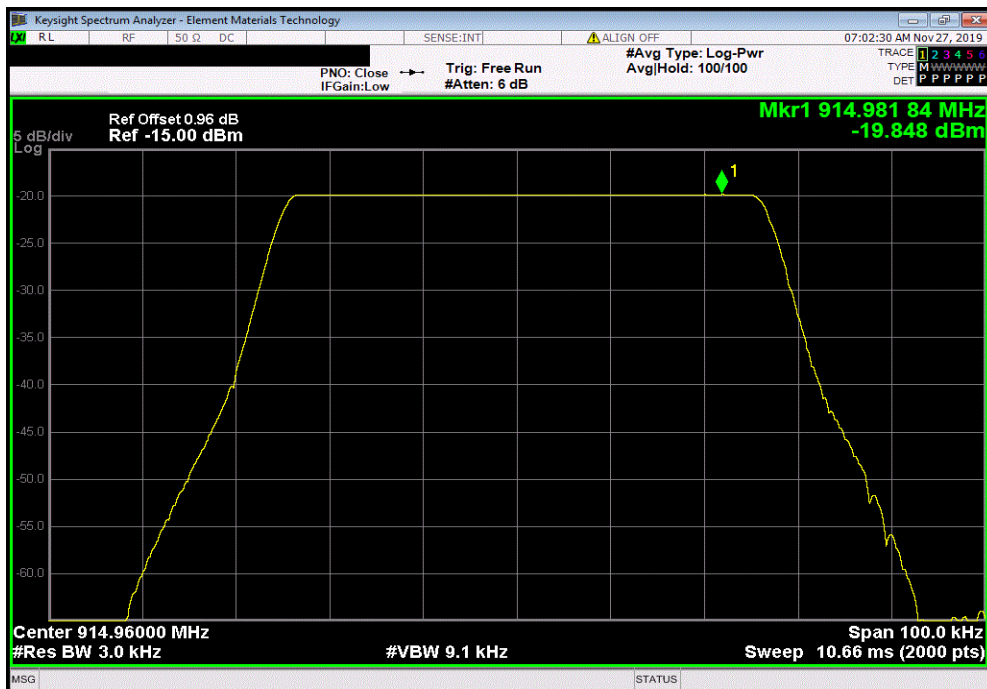


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Low Channel, 903.04 MHz, 37500 bps						
	Value	Limit	Results			
	dBm/3kHz	< dBm/3kHz				
	-32.702	8	Pass			



LoRa, 902-928 MHz, Mid Channel, 915 MHz, 293 bps						
	Value	Limit	Results			
	dBm/3kHz	< dBm/3kHz				
	-19.848	8	Pass			

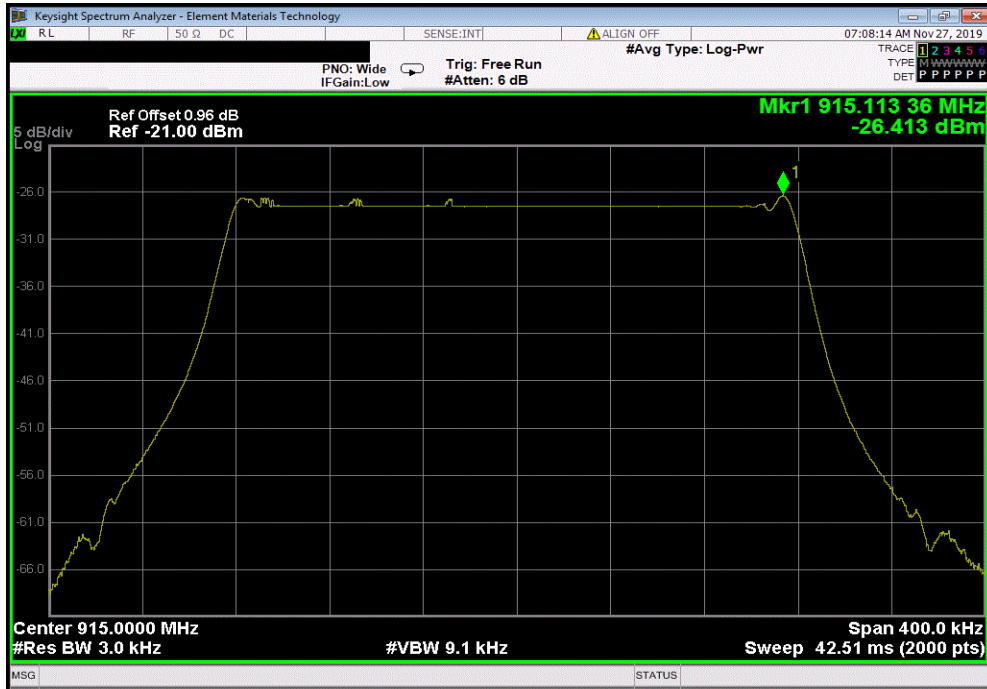


POWER SPECTRAL DENSITY

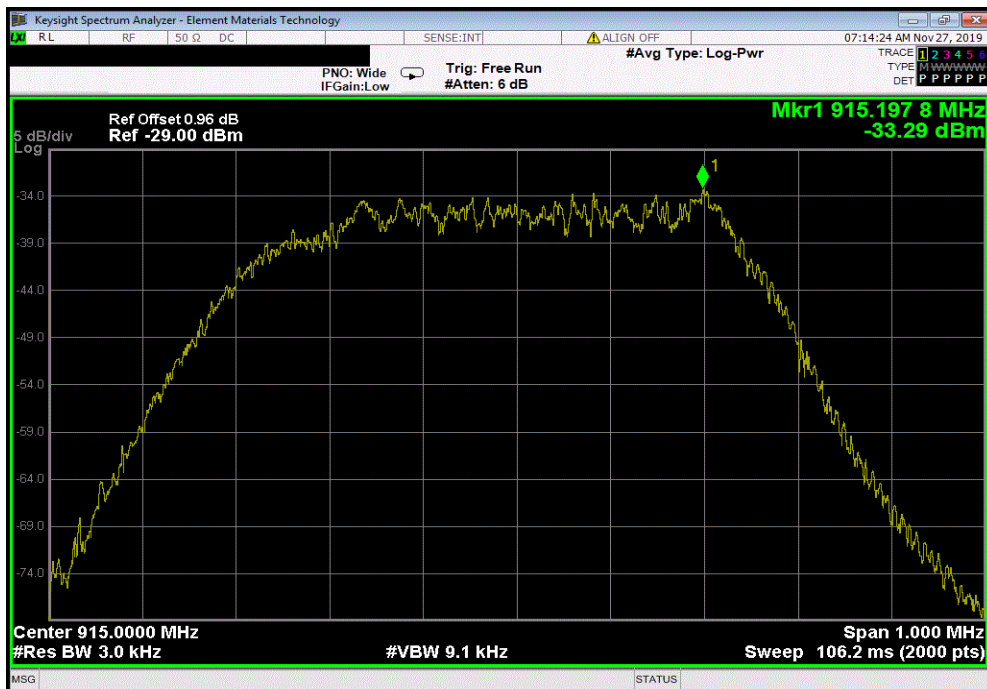


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, Mid Channel, 915 MHz, 3516 bps						
	Value	Limit	Results			
	dBm/3kHz	< dBm/3kHz				
	-26.413	8	Pass			



LoRa, 902-928 MHz, Mid Channel, 915 MHz, 37500 bps						
	Value	Limit	Results			
	dBm/3kHz	< dBm/3kHz				
	-33.287	8	Pass			

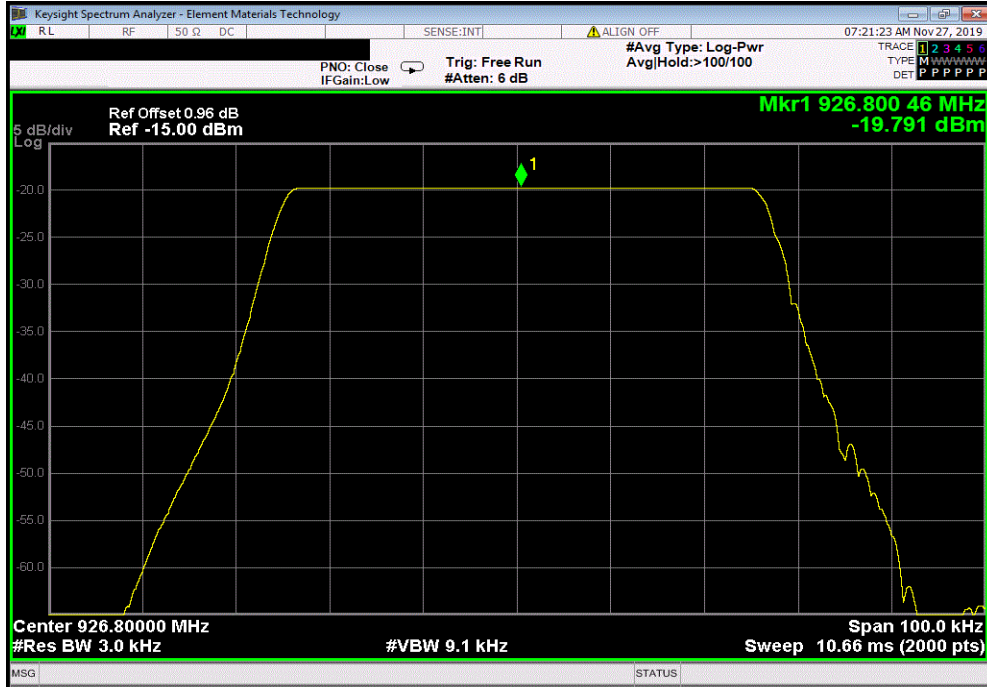


POWER SPECTRAL DENSITY

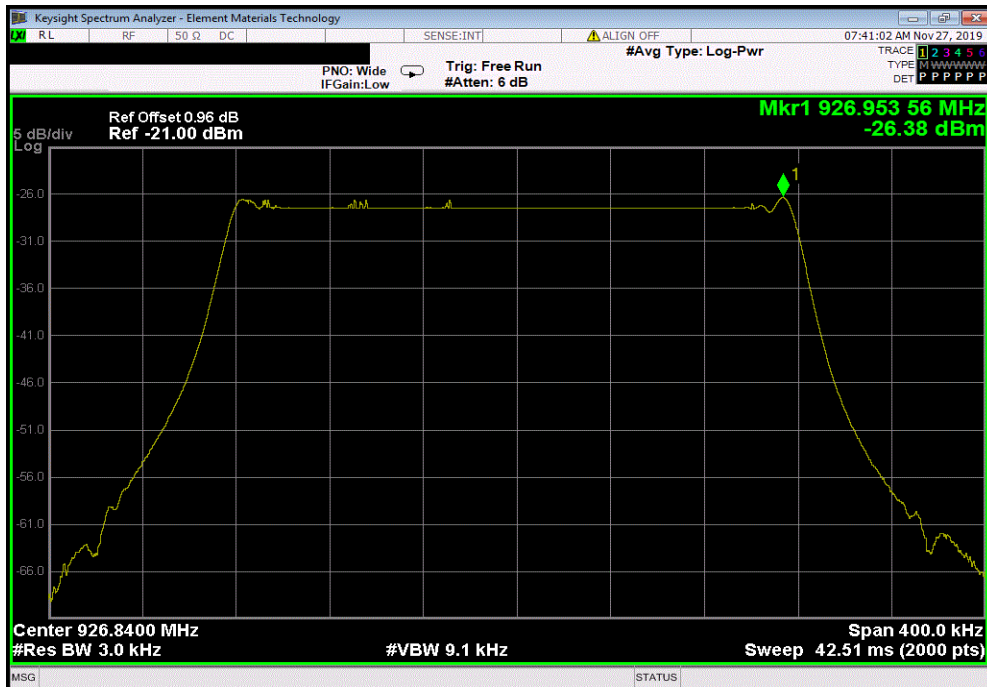


TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, High Channel, 926.84 MHz, 293 bps						
	Value	Limit	Results			
	dBm/3kHz	< dBm/3kHz				
	-19.791	8	Pass			



LoRa, 902-928 MHz, High Channel, 926.84 MHz, 3516 bps						
	Value	Limit	Results			
	dBm/3kHz	< dBm/3kHz				
	-26.38	8	Pass			



POWER SPECTRAL DENSITY



TbTx 2019.08.30.0 XMI 2019.09.05

LoRa, 902-928 MHz, High Channel, 926.84 MHz, 37500 bps			
	Value	Limit	Results
	dBm/3kHz	< dBm/3kHz	
	-33.339	8	Pass

