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MEASUREMENT REPORT LTE / Sub 6Ghz NR

Applicant Name:

LG Electronics USA, Inc. 1000 Sylvan Avenue Englewood Cliffs, NJ 07632 United States

Date of Testing: 12/30/2019 - 2/14/2020 Test Site/Location: PCTEST Lab. Columbia, MD, USA Test Report Serial No.: 1M1912300229-03.ZNF

FCC ID:

ZNFV600AM

APPLICANT:

LG Electronics USA, Inc.

Application Type: Model: Additional Model(s): EUT Type: FCC Classification: FCC Rule Part(s): Test Procedure(s): Certification LM-V600AM LMV600AM, V600AM Portable Handset PCS Licensed Transmitter Held to Ear (PCE) 22, 24, & 27 ANSI C63.26-2015, ANSI/TIA-603-E-2016, KDB 971168 D01 v03r01, KDB 648474 D03 v01r04

This equipment has been shown to be capable of compliance with the applicable technical standards as indicated in the measurement report and was tested in accordance with the measurement procedures specified in §2.947. Test results reported herein relate only to the item(s) tested.

I attest to the accuracy of data. All measurements reported herein were performed by me or were made under my supervision and are correct to the best of my knowledge and belief. I assume full responsibility for the completeness of these measurements and vouch for the qualifications of all persons taking them.

Randy Ortanez President



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MEASUREMENT REPORT FCC Part 22, 24, & 27

			EF	RP	EI	RP		
Mode	FCC Rule Part	Tx Frequency (MHz)	Max. Power (W)	Max. Power (dBm)	Max. Power (W)	Max. Power (dBm)	Emission Designator	Modulation
LTE Band 12	27	699.7 - 715.3	0.073	18.66	0.121	20.81	1M11G7D	QPSK
LTE Band 12	27	699.7 - 715.3	0.059	17.71	0.097	19.86	1M10W7D	16QAM
LTE Band 12	27	699.7 - 715.3	0.046	16.64	0.076	18.79	1M09W7D	64QAM
LTE Band 12	27	699.7 - 715.3	0.023	13.53	0.037	15.68	1M10W7D	256QAM
LTE Band 12	27	700.5 - 714.5	0.073	18.65	0.120	20.80	2M70G7D	QPSK
LTE Band 12	27	700.5 - 714.5	0.059	17.74	0.097	19.89	2M71W7D	16QAM
LTE Band 12	27	700.5 - 714.5	0.046	16.67	0.076	18.82	2M70W7D	64QAM
LTE Band 12	27	700.5 - 714.5	0.023	13.61	0.038	15.76	2M70W7D	256QAM
LTE Band 12	27	701.5 - 713.5	0.073	18.62	0.119	20.77	4M52G7D	QPSK
LTE Band 12	27	701.5 - 713.5	0.058	17.63	0.095	19.78	4M50W7D	16QAM
LTE Band 12	27	701.5 - 713.5	0.047	16.70	0.077	18.85	4M52W7D	64QAM
LTE Band 12	27	701.5 - 713.5	0.023	13.68	0.038	15.83	4M50W7D	256QAM
LTE Band 12	27	704 - 711	0.074	18.68	0.121	20.83	9M00G7D	QPSK
LTE Band 12	27	704 - 711	0.044	16.44	0.072	18.59	8M97W7D	16QAM
LTE Band 12	27	704 - 711	0.034	15.29	0.055	17.44	9M01W7D	64QAM
LTE Band 12	27	704 - 711	0.016	11.95	0.026	14.10	8M97W7D	256QAM
LTE Band 5	22H	824.7 - 848.3	0.055	17.38	0.090	19.53	0M11G7D	QPSK
LTE Band 5	22H	824.7 - 848.3	0.040	15.98	0.065	18.13	1M10W7D	16QAM
LTE Band 5	22H	824.7 - 848.3	0.032	15.11	0.053	17.26	1M09W7D	64QAM
LTE Band 5	22H	824.7 - 848.3	0.016	12.11	0.027	14.26	1M10W7D	256QAM
LTE Band 5	22H	825.5 - 847.5	0.054	17.31	0.088	19.46	2M70G7D	QPSK
LTE Band 5	22H	825.5 - 847.5	0.041	16.10	0.067	18.25	2M71W7D	16QAM
LTE Band 5	22H	825.5 - 847.5	0.032	15.10	0.053	17.25	2M70W7D	64QAM
LTE Band 5	22H	825.5 - 847.5	0.016	12.06	0.026	14.21	2M71W7D	256QAM
LTE Band 5	22H	826.5 - 846.5	0.054	17.33	0.089	19.48	4M50G7D	QPSK
LTE Band 5	22H	826.5 - 846.5	0.039	15.92	0.064	18.07	4M51W7D	16QAM
LTE Band 5	22H	826.5 - 846.5	0.032	15.06	0.053	17.21	4M53W7D	64QAM
LTE Band 5	22H	826.5 - 846.5	0.016	12.02	0.026	14.17	4M56W7D	256QAM
LTE Band 5	22H	829 - 844	0.055	17.40	0.090	19.55	8M99G7D	QPSK
LTE Band 5	22H	829 - 844	0.036	15.61	0.060	17.76	8M98W7D	16QAM
LTE Band 5	22H	829 - 844	0.028	14.49	0.046	16.64	9M00W7D	64QAM
LTE Band 5	22H	829 - 844	0.014	11.52	0.023	13.67	9M03W7D	256QAM

EUT Overview (<1 GHz)

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			EI	RP		
Mode	FCC Rule	Tx Frequency (MHz)	Max. Power	Max. Power	Emission	Modulation
Mode	Part		(W)	(dBm)	Designator	modulation
LTE Rond 66/4	27	1710 7 1770 2	· · ·	21.00	1111070	QPSK
LTE Band 66/4	27 27	<u>1710.7 - 1779.3</u> 1710.7 - 1779.3	0.155	21.90 20.93	1M11G7D	
LTE Band 66/4	27		0.124		1M10W7D	16QAM
LTE Band 66/4		1710.7 - 1779.3	0.097	19.85	1M09W7D	64QAM
LTE Band 66/4	27	1710.7 - 1779.3	0.047	16.72	1M10W7D	256QAM
LTE Band 66/4	27	1711.5 - 1778.5	0.156	21.92	2M71G7D	QPSK
LTE Band 66/4	27	1711.5 - 1778.5	0.115	20.62	2M71W7D	16QAM
LTE Band 66/4	27	1711.5 - 1778.5	0.097	19.87	2M71W7D	64QAM
LTE Band 66/4	27	1711.5 - 1778.5	0.049	16.88	2M71W7D	256QAM
LTE Band 66/4	27	1712.5 - 1777.5	0.153	21.85	4M54G7D	QPSK
LTE Band 66/4	27	1712.5 - 1777.5	0.115	20.60	4M54W7D	16QAM
LTE Band 66/4	27	1712.5 - 1777.5	0.097	19.87	4M54W7D	64QAM
LTE Band 66/4	27	1712.5 - 1777.5	0.047	16.74	4M54W7D	256QAM
LTE Band 66/4	27	1715 - 1775	0.155	21.90	8M99G7D	QPSK
LTE Band 66/4	27	1715 - 1775	0.117	20.69	9M01W7D	16QAM
LTE Band 66/4	27	1715 - 1775	0.092	19.66	9M01W7D	64QAM
LTE Band 66/4	27	1715 - 1775	0.049	16.91	9M01W7D	256QAM
LTE Band 66/4	27	1717.5 - 1772.5	0.153	21.85	13M5G7D	QPSK
LTE Band 66/4	27	1717.5 - 1772.5	0.117	20.70	13M5W7D	16QAM
LTE Band 66/4	27	1717.5 - 1772.5	0.094	19.71	13M5W7D	64QAM
LTE Band 66/4	27	1717.5 - 1772.5	0.048	16.81	13M5W7D	256QAM
LTE Band 66/4	27	1720 - 1770	0.157	21.95	18M0G7D	QPSK
LTE Band 66/4	27	1720 - 1770	0.110	20.41	18M0W7D	16QAM
LTE Band 66/4	27	1720 - 1770	0.089	19.50	18M0W7D	64QAM
LTE Band 66/4	27	1720 - 1770	0.047	16.68	18M0W7D	256QAM
LTE Band 2	24E	1850.7 - 1909.3	0.149	21.73	1M10G7D	QPSK
LTE Band 2	24E	1850.7 - 1909.3	0.122	20.85	1M10W7D	16QAM
LTE Band 2	24E	1850.7 - 1909.3	0.094	19.73	1M10W7D	64QAM
LTE Band 2	24E	1850.7 - 1909.3	0.048	16.82	1M10W7D	256QAM
LTE Band 2	24E	1851.5 - 1908.5	0.155	21.91	2M70G7D	QPSK
LTE Band 2	24E	1851.5 - 1908.5	0.123	20.90	2M70W7D	16QAM
LTE Band 2	24E	1851.5 - 1908.5	0.096	19.84	2M70W7D	64QAM
LTE Band 2	24E	1851.5 - 1908.5	0.048	16.85	2M71W7D	256QAM
LTE Band 2	24E	1852.5 - 1907.5	0.153	21.86	4M52G7D	QPSK
LTE Band 2	24E	1852.5 - 1907.5	0.117	20.70	4M52W7D	16QAM
LTE Band 2	24E	1852.5 - 1907.5	0.090	19.55	4M53W7D	64QAM
LTE Band 2	24E	1852.5 - 1907.5	0.049	16.86	4M50W7D	256QAM
LTE Band 2	24E	1855 - 1905	0.153	21.85	9M01G7D	QPSK
LTE Band 2	24E	1855 - 1905	0.115	20.60	8M97W7D	16QAM
LTE Band 2	24E	1855 - 1905	0.097	19.89	9M00W7D	64QAM
LTE Band 2	24E	1855 - 1905	0.048	16.81	8M95W7D	256QAM
LTE Band 2	24E	1857.5 - 1902.5	0.155	21.91	13M5G7D	QPSK
LTE Band 2	24E	1857.5 - 1902.5	0.100	20.62	13M5W7D	16QAM
LTE Band 2	24E	1857.5 - 1902.5	0.097	19.87	13M5W7D	64QAM
LTE Band 2	24E	1857.5 - 1902.5	0.049	16.88	13M5W7D	256QAM
LTE Band 2	24E	1860 - 1900	0.358	25.53	17M9G7D	QPSK
LTE Band 2	24L 24E	1860 - 1900	0.252	24.01	17M9W7D	16QAM
LTE Band 2	24E	1860 - 1900	0.203	23.07	18M0W7D	64QAM
LTE Band 2	24E	1860 - 1900	0.203	17.53	18M0W7D	256QAM
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EUT Overview (Mid Bands)

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			EI	RP		
Mode	FCC Rule Part	Tx Frequency (MHz)	Max. Power (W)	Max. Power (dBm)	Emission Designator	Modulation
LTE Band 30	27	2307.5 - 2312.5	0.101	20.05	4M51G7D	QPSK
LTE Band 30	27	2307.5 - 2312.5	0.069	18.41	4M49W7D	16QAM
LTE Band 30	27	2307.5 - 2312.5	0.058	17.61	4M53W7D	64QAM
LTE Band 30	27	2307.5 - 2312.5	0.036	15.53	4M55W7D	256QAM
LTE Band 30	27	2310	0.109	20.36	9M05G7D	QPSK
LTE Band 30	27	2310	0.078	18.90	8M97W7D	16QAM
LTE Band 30	27	2310	0.062	17.92	8M99W7D	64QAM
LTE Band 30	27	2310	0.033	15.22	9M01W7D	256QAM
LTE Band 41 (PC3)	27	2498.5 - 2687.5	0.150	21.77	4M53G7D	QPSK
LTE Band 41 (PC3)	27	2498.5 - 2687.5	0.110	20.42	4M53W7D	16QAM
LTE Band 41 (PC3)	27	2498.5 - 2687.5	0.084	19.25	4M51W7D	64QAM
LTE Band 41 (PC3)	27	2498.5 - 2687.5	0.044	16.43	4M52W7D	256QAM
LTE Band 41 (PC3)	27	2501 - 2685	0.153	21.84	9M00G7D	QPSK
LTE Band 41 (PC3)	27	2501 - 2685	0.112	20.49	9M02W7D	16QAM
LTE Band 41 (PC3)	27	2501 - 2685	0.086	19.32	9M00W7D	64QAM
LTE Band 41 (PC3)	27	2501 - 2685	0.045	16.50	9M03W7D	256QAM
LTE Band 41 (PC3)	27	2503.5 - 2682.5	0.153	21.85	13M5G7D	QPSK
LTE Band 41 (PC3)	27	2503.5 - 2682.5	0.112	20.50	13M5W7D	16QAM
LTE Band 41 (PC3)	27	2503.5 - 2682.5	0.086	19.33	13M5W7D	64QAM
LTE Band 41 (PC3)	27	2503.5 - 2682.5	0.045	16.51	13M5W7D	256QAM
LTE Band 41 (PC3)	27	2506 - 2680	0.157	21.97	18M0G7D	QPSK
LTE Band 41 (PC3)	27	2506 - 2680	0.123	20.90	18M0W7D	16QAM
LTE Band 41 (PC3)	27	2506 - 2680	0.104	20.19	18M0W7D	64QAM
LTE Band 41 (PC3)	27	2506 - 2680	0.050	17.03	18M0W7D	256QAM

EUT Overview (High Bands)

			EF	₹P	EI	RP		
Mode	FCC Rule Part	Tx Frequency (MHz)	Max. Power (W)	Max. Power (dBm)	Max. Power (W)	Max. Power (dBm)	Emission Designator	Modulation
n5	22H	826.5 - 846.5	0.033	15.14	0.054	17.29	4M50G7D	QPSK
n5	22H	826.5 - 846.5	0.021	13.20	0.034	15.35	4M52W7D	16QAM
n5	22H	826.5 - 846.5	0.017	12.27	0.028	14.42	4M57W7D	64QAM
n5	22H	826.5 - 846.5	0.010	10.20	0.017	12.35	4M52W7D	256QAM
n5	22H	829 - 844	0.033	15.19	0.054	17.34	9M35G7D	QPSK
n5	22H	829 - 844	0.021	13.25	0.035	15.40	9M37W7D	16QAM
n5	22H	829 - 844	0.017	12.32	0.028	14.47	9M34W7D	64QAM
n5	22H	829 - 844	0.011	10.25	0.017	12.40	9M30W7D	256QAM
n5	22H	831.5 - 841.5	0.034	15.32	0.056	17.47	14M2G7D	QPSK
n5	22H	831.5 - 841.5	0.022	13.38	0.036	15.53	14M2W7D	16QAM
n5	22H	831.5 - 841.5	0.018	12.45	0.029	14.60	14M2W7D	64QAM
n5	22H	831.5 - 841.5	0.011	10.38	0.018	12.53	14M2W7D	256QAM
n5	22H	834 - 839	0.034	15.32	0.056	17.47	19M0G7D	QPSK
n5	22H	834 - 839	0.022	13.38	0.036	15.53	18M9W7D	16QAM
n5	22H	834 - 839	0.018	12.45	0.029	14.60	18M9W7D	64QAM
n5	22H	834 - 839	0.011	10.38	0.018	12.53	19M0W7D	256QAM

EUT Sub 6GHz NR Overview (<1 GHz)

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			EI	RP		
Mode	FCC Rule Part	Tx Frequency (MHz)	Max. Power (W)	Max. Power (dBm)	Emission Designator	Modulation
n66	27	1712.5 - 1777.5	0.155	21.91	4M51G7D	QPSK
n66	27	1712.5 - 1777.5	0.089	19.50	4M53W7D	16QAM
n66	27	1712.5 - 1777.5	0.071	18.51	4M54W7D	64QAM
n66	27	1712.5 - 1777.5	0.040	16.07	4M52W7D	256QAM
n66	27	1715 - 1775	0.153	21.84	9M33G7D	QPSK
n66	27	1715 - 1775	0.088	19.43	9M33W7D	16QAM
n66	27	1715 - 1775	0.070	18.44	9M37W7D	64QAM
n66	27	1715 - 1775	0.040	16.00	9M32W7D	256QAM
n66	27	1717.5 - 1772.5	0.161	22.06	14M2G7D	QPSK
n66	27	1717.5 - 1772.5	0.092	19.65	14M2W7D	16QAM
n66	27	1717.5 - 1772.5	0.073	18.66	14M2W7D	64QAM
n66	27	1717.5 - 1772.5	0.042	16.22	14M2W7D	256QAM
n66	27	1720 - 1770	0.298	24.74	19M0G7D	QPSK
n66	27	1720 - 1770	0.171	22.33	19M0W7D	16QAM
n66	27	1720 - 1770	0.136	21.34	19M1W7D	64QAM
n66	27	1720 - 1770	0.078	18.90	19M0W7D	256QAM
n2	24E	1852.5 - 1907.5	0.385	25.86	4M53G7D	QPSK
n2	24E	1852.5 - 1907.5	0.265	24.24	4M52W7D	16QAM
n2	24E	1852.5 - 1907.5	0.207	23.15	4M52W7D	64QAM
n2	24E	1852.5 - 1907.5	0.144	21.58	4M53W7D	256QAM
n2	24E	1855 - 1905	0.386	25.87	9M37G7D	QPSK
n2	24E	1855 - 1905	0.266	24.25	9M33W7D	16QAM
n2	24E	1855 - 1905	0.207	23.16	9M38W7D	64QAM
n2	24E	1855 - 1905	0.144	21.59	9M33W7D	256QAM
n2	24E	1857.5 - 1902.5	0.394	25.96	14M1G7D	QPSK
n2	24E	1857.5 - 1902.5	0.272	24.34	14M2W7D	16QAM
n2	24E	1857.5 - 1902.5	0.211	23.25	14M2W7D	64QAM
n2	24E	1857.5 - 1902.5	0.147	21.68	14M2W7D	256QAM
n2	24E	1860 - 1900	0.406	26.09	19M0G7D	QPSK
n2	24E	1860 - 1900	0.280	24.47	19M1W7D	16QAM
n2	24E	1860 - 1900	0.218	23.38	19M0W7D	64QAM
n2	24E	1860 - 1900	0.152	21.81	19M0W7D	256QAM

EUT SUB 6GHZ NR Overview (Mid Bands)

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1.0 INTRODUCTION

1.1 Scope

Measurement and determination of electromagnetic emissions (EMC) of radio frequency devices including intentional and/or unintentional radiators for compliance with the technical rules and regulations of the Federal Communications Commission and the Innovation, Science and Economic Development Canada.

1.2 PCTEST Test Location

These measurement tests were conducted at the PCTEST facility located at 7185 Oakland Mills Road, Columbia, MD 21046. The measurement facility is compliant with the test site requirements specified in ANSI C63.4-2014.

1.3 Test Facility / Accreditations

Measurements were performed at PCTEST located in Columbia, MD 21046, U.S.A.

- PCTEST is an ISO 17025-2005 accredited test facility under the American Association for Laboratory Accreditation (A2LA) with Certificate number 2041.01 for Specific Absorption Rate (SAR), Hearing Aid Compatibility (HAC) testing, where applicable, and Electromagnetic Compatibility (EMC) testing for FCC and Innovation, Science, and Economic Development Canada rules.
- PCTEST TCB is a Telecommunication Certification Body (TCB) accredited to ISO/IEC 17065-2012 by A2LA (Certificate number 2041.03) in all scopes of FCC Rules and ISED Standards (RSS).
- PCTEST facility is a registered (2451B) test laboratory with the site description on file with ISED.

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2.0 PRODUCT INFORMATION

2.1 Equipment Description

The Equipment Under Test (EUT) is the **LG Portable Handset FCC ID: ZNFV600AM**. The test data contained in this report pertains only to the emissions due to the EUT's LTE and Sub 6GHz NR function.

Test Device Serial No.: 00075, 00083, 00091, 00034, 00042, 00059, 00067

2.2 Device Capabilities

This device contains the following capabilities:

850/1900 GSM/GPRS/EDGE, 850/1700/1900 WCDMA/HSPA, Multi-band LTE, 5G NR (n66, n2, n5), 802.11b/g/n/ac/ax WLAN, 802.11a/n/ac/ax UNII, Bluetooth (1x, EDR, LE), NFC

LTE Band 66 (1710 - 1780 MHz) overlaps the entire frequency range of LTE Band 4 (1710 - 1755 MHz). Therefore, test data provided in this report covers Band 4 as well as Band 66.

Sub 6GHz NR Band n5 (824 – 849 MHz) operates using 15kHz Subcarrier Spacing with both CP-OFDM and DFT-s OFDM waveforms. The band supports QPSK, 16QAM, 64QAM, and 256QAM modulation. The test data provided in this report represents the worst case configurations.

Sub 6GHz NR Band n66 (1710 – 1780 MHz) operates using 15kHz Subcarrier Spacing with both CP-OFDM and DFT-s OFDM waveforms. The band supports QPSK, 16QAM, 64QAM, and 256QAM modulation. The test data provided in this report represents the worst case configurations.

Sub 6GHz NR Band n2 (1850 – 1910 MHz) operates using 15kHz Subcarrier Spacing with both CP-OFDM and DFT-s OFDM waveforms. The band supports QPSK, 16QAM, 64QAM, and 256QAM modulation. The test data provided in this report represents the worst case configurations.

2.3 Test Configuration

The EUT was tested per the guidance of ANSI/TIA-603-E-2016 and KDB 971168 D01 v03r01. See Section 7.0 of this test report for a description of the radiated and antenna port conducted emissions tests.

This device supports wireless charging capability and, thus, is subject to the test requirements of KDB 648474 D03 v01r04. Additional radiated spurious emission measurements were performed with the EUT lying flat on an authorized wireless charging pad (WCP) FCC ID: YZP-PWMAW815A while operating under normal conditions in a simulated call or data transmission configuration. The worst case radiated emissions data is shown in this report.

This device supports Dual Display (DD) Cover, which attaches to the device to provide a secondary display on the inside of the cover. The display was rotated through all possible orientations to determine worst case angle. The worst case radiated emission data with the Dual Display Cover is included in this report.

2.4 EMI Suppression Device(s)/Modifications

No EMI suppression device(s) were added and no modifications were made during testing.

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3.0 DESCRIPTION OF TESTS

3.1 Measurement Procedure

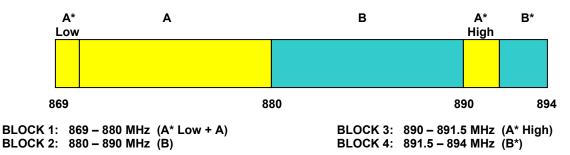
The measurement procedures described in the document titled "Land Mobile FM or PM – Communications Equipment – Measurements and Performance Standards" (ANSI/TIA-603-E-2016) and "Procedures for Compliance Measurement of the Fundamental Emission Power of Licensed Wideband (> 1 MHz) Digital Transmission Systems" (KDB 971168 D01 v03r01) were used in the measurement of the EUT.

3.2 Block A Frequency Range

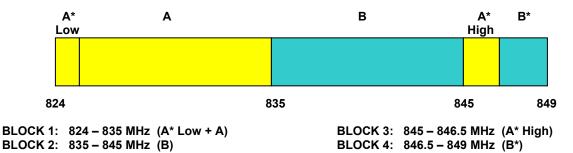
<u>698-746 MHz band</u>. The following frequencies are available for licensing pursuant to this part in the 698-746 MHz band: (1) Three paired channel blocks of 12 megahertz each are available for assignment as follows:

Block A: 698-704 MHz and 728-734 MHz; Block B: 704-710 MHz and 734-740 MHz; and Block C: 710-716 MHz and 740-746 MHz.

3.3 Cellular - Base Frequency Blocks



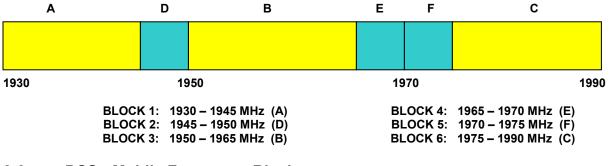
3.4 Cellular - Mobile Frequency Blocks



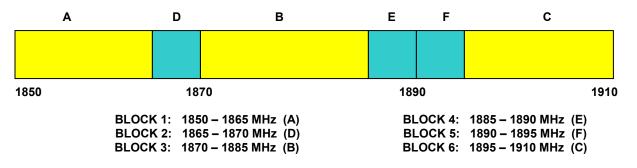
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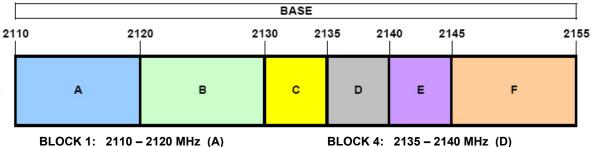
3.5 PCS - Base Frequency Blocks



3.6 PCS - Mobile Frequency Blocks

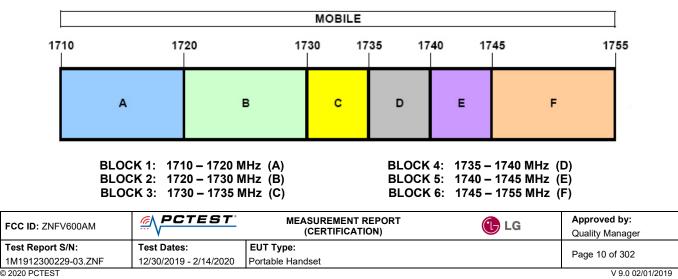


3.7 AWS - Base Frequency Blocks



BLOCK 2: 2120 – 2120 MHZ (A) BLOCK 2: 2120 – 2130 MHZ (B) BLOCK 3: 2130 – 2135 MHZ (C) BLOCK 4: 2135 – 2140 MHz (D) BLOCK 5: 2140 – 2145 MHz (E) BLOCK 6: 2145 – 2155 MHz (F)

3.8 AWS - Mobile Frequency Blocks





3.9 WCS – Mobile/Base Frequency Blocks

The following frequencies are available for WCS in the 2305-2320 MHz and 2345-2360 MHz bands:

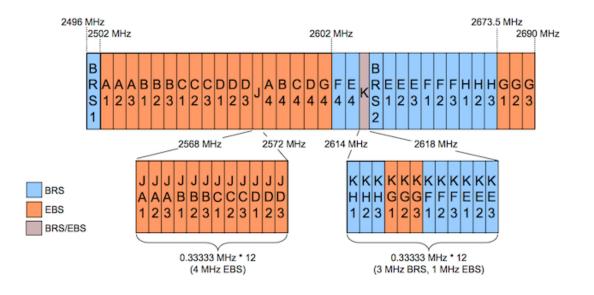
BLOCK 1: 2305-2310 and 2350-2355 MHz (A)

BLOCK 2: 2310-2315 and 2355-236 MHz (B)

BLOCK 3: 2315-2320 MHz (C)

BLOCK 4: 2345-2350 MHz (D)

3.10 BRS/EBS Frequency Block



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3.11 Radiated Power and Radiated Spurious Emissions

The radiated test facilities consisted of an indoor 3 meter semi-anechoic chamber used for final measurements and exploratory measurements, when necessary. The measurement area is contained within the semi-anechoic chamber which is shielded from any ambient interference. The test site inside the chamber is a 6m x 5.2m elliptical, obstruction-free area in accordance with Figure 5.7 of Clause 5 in ANSI C63.4-2014. Absorbers are arranged on the floor between the turn table and the antenna mast in such a way so as to maximize the reduction of reflections for measurements above 1GHz. For measurements below 1GHz, the absorbers are removed. A raised turntable is used for radiated measurement. The turn table is a continuously rotatable, remote-controlled, metallic turntable and 2 meters (6.56 ft.) in diameter. The turn table is flush with the raised floor of the chamber in order to maintain its function as a ground plane. An 80cm tall test table made of Styrodur is placed on top of the turn table. A Styrodur pedestal is placed on top of the test table to bring the total table height to 1.5m.

The equipment under test was transmitting while connected to its integral antenna and is placed on a turntable 3 meters from the receive antenna. The receive antenna height is adjusted between 1 and 4 meter height, the turntable is rotated through 360 degrees, and the EUT is manipulated through all orthogonal planes representative of its typical use to achieve the highest reading on the receive spectrum analyzer. Radiated power levels are also investigated with the receive antenna horizontally and vertically polarized. The maximized power level is recorded using the spectrum analyzer "Channel Power" function with the integration band set to the emissions' occupied bandwidth, a RMS detector, RBW = 100kHz, VBW = 300kHz, and a 1 second sweep time over a minimum of 10 sweeps, per the guidelines of KDB 971168 D01 v03r01.

Per the guidance of ANSI/TIA-603-E-2016, a half-wave dipole is then substituted in place of the EUT. For emissions above 1GHz, a horn antenna is substituted in place of the EUT. The substitute antenna is driven by a signal generator with the level of the signal generator being adjusted to obtain the same receive spectrum analyzer level previously recorded from the spurious emission from the EUT. The power of the emission is calculated using the following formula:

 $P_{d [dBm]} = P_{g [dBm]} - cable loss [dB] + antenna gain [dBd/dBi]$

Where, P_d is the dipole equivalent power, P_g is the generator output into the substitution antenna, and the antenna gain is the gain of the substitute antenna used relative to either a half-wave dipole (dBd) or an isotropic source (dBi). The substitute level is equal to $P_{g [dBm]}$ – cable loss [dB].

The calculated P_d levels are then compared to the absolute spurious emission limit of -13dBm which is equivalent to the required minimum attenuation of 43 + 10 log₁₀(Power [Watts]). For Band 41, the calculated P_d levels are compared to the absolute spurious emission limit of -25dBm which is equivalent to the required minimum attenuation of 55 + 10 log₁₀(Power [Watts]). For Band 30, the calculated P_d levels are compared to the absolute spurious emission limit of -40dBm which is equivalent to the required minimum attenuation of 70 + 10 log₁₀(Power [Watts]).

All radiated measurements are performed in a chamber that meets the site requirements per ANSI C63.4-2014. Additionally, radiated emissions below 30MHz are also validated on an Open Area Test Site to assert correlation with the chamber measurements per the requirements of KDB 474788 D01.

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4.0 MEASUREMENT UNCERTAINTY

The measurement uncertainties shown below were calculated in accordance with the requirements of ANSI C63.4-2014. All measurement uncertainty values are shown with a coverage factor of k = 2 to indicate a 95% level of confidence. The measurement uncertainty shown below meets or exceeds the U_{CISPR} measurement uncertainty values specified in CISPR 16-4-2 and, thus, can be compared directly to specified limits to determine compliance.

Contribution	Expanded Uncertainty (±dB)
Conducted Bench Top Measurements	1.13
Radiated Disturbance (<1GHz)	4.98
Radiated Disturbance (>1GHz)	5.07
Radiated Disturbance (>18GHz)	5.09

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5.0 TEST EQUIPMENT CALIBRATION DATA

Test Equipment Calibration is traceable to the National Institute of Standards and Technology (NIST). Measurements antennas used during testing were calibrated in accordance to the requirements of ANSI C63.5-2017.

Manufacturer	Model	Description	Cal Date	Cal Interval	Cal Due	Serial Number
-	LTx1	Licensed Transmitter Cable Set	6/4/2019	Annual	6/4/2020	LTx1
-	LTx3	LIcensed Transmitter Cable Set	6/3/2019	Annual	6/3/2020	LTx3
Agilent	N9020A	MXA Signal Analyzer	4/20/2019	Annual	4/20/2020	US46470561
Agilent	N9030A	PXA Signal Analyzer (44GHz)	6/12/2019	Annual	6/12/2020	MY52350166
Com-Power	PAM-103	Pre-Amplifier (1-1000MHz)	5/10/2019	Annual	5/10/2020	441112
Emco	3115	Horn Antenna (1-18GHz)	3/28/2018	Biennial	3/28/2020	9704-5182
EMCO	3160-09	Small Horn (18 - 26.5GHz)	8/9/2018	Biennial	8/9/2020	135427
ETS Lindgren	3164-08	Quad Ridge Horn Antenna	2/22/2019	Biennial	2/22/2021	128338
Mini Circuits	TVA-11-422	RF Power Amp		N/A		QA1317001
Mini Circuits	PWR-SEN-4GHS	USB Power Sensor	4/19/2019	Annual	4/19/2020	11401010036
Rohde & Schwarz	CMW500	Radio Communication Tester		N/A		100976
Rohde & Schwarz	CMW500	Radio Communication Tester		N/A		112347
Rohde & Schwarz	ESU26	EMI Test Receiver (26.5GHz)	6/5/2019	Annual	6/5/2020	100342
Rohde & Schwarz	SFUNIT-Rx	Shielded Filter Unit	7/11/2019	Annual	7/11/2020	102134
Rohde & Schwarz	SFUNIT-Rx	Shielded Filter Unit	7/8/2019	Annual	7/8/2020	102133
Seekonk	NC-100	Torque Wrench (8" lb)	5/10/2018	Biennial	5/10/2020	N/A
Sunol	JB5	Bi-Log Antenna (30M - 5GHz)	4/19/2018	Biennial	4/19/2020	A051107

Table 5-1. Test Equipment

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6.0 SAMPLE CALCULATIONS

Emission Designator

QPSK Modulation

Emission Designator = 8M62G7D

LTE BW = 8.62 MHz

G = Phase Modulation

7 = Quantized/Digital Info

D = Data transmission, telemetry, telecommand

QAM Modulation

Emission Designator = 8M45W7D

LTE BW = 8.45 MHz W = Amplitude/Angle Modulated 7 = Quantized/Digital Info D = Data transmission, telemetry, telecommand

Spurious Radiated Emission – LTE Band

Example: Middle Channel LTE Mode 2nd Harmonic (1564 MHz)

The average spectrum analyzer reading at 3 meters with the EUT on the turntable was -81.0 dBm. The gain of the substituted antenna is 8.1 dBi. The signal generator connected to the substituted antenna terminals is adjusted to produce a reading of -81.0 dBm on the spectrum analyzer. The loss of the cable between the signal generator and the terminals of the substituted antenna is 2.0 dB at 1564 MHz. So 6.1 dB is added to the signal generator reading of -30.9 dBm yielding -24.80 dBm. The fundamental EIRP was 25.501 dBm so this harmonic was 25.501 dBm - (-24.80).

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7.0 TEST RESULTS

7.1 Summary

Company Name:	LG Electronics USA, Inc.
FCC ID:	ZNFV600AM
FCC Classification:	PCS Licensed Transmitter Held to Ear (PCE)
Mode(s):	<u>LTE / Sub 6Ghz NR</u>

FCC Part Section(s)	Test Description	Test Limit	Test Condition	Test Result	Reference
2.1049	Occupied Bandwidth	N/A		PASS	Section 7.2, 7.12
2.1051 22.917(a) 24.238(a) 27.53(g) 27.53(h)	Out of Band Emissions	> 43 + 10 log ₁₀ (P[Watts]) at Band Edge and for all out-of- band emissions			Section 7.3, 7.4, 7.12
27.53(m)	Out of Band Emissions	Undesirable emissions must meet the limits detailed in 27.53(m)			Section 7.3, 7.4, 7.12
27.53(a)	Out of Band Emissions	Undesirable emissions must meet the limits detailed in 27.53(a)	CONDUCTED		Section 7.3, 7.4, 7.12
24.232(d)	Peak-Average Ratio	< 13 dB	CONDUCTED		Section 7.5, 7.12
2.1046	Transmitter Conducted Output Power	N/A			See RF Exposure Report
2.1055 22.355 24.235 27.54	Frequency Stability	< 2.5 ppm (Part 22) and fundamental emissions stay within authorized frequency block (Part 27)			Section 7.9

Table 7-1. Summary of Conducted Test Results

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FCC Part Section(s)	Test Description	Test Limit	Test Condition	Test Result	Reference
22.913(a)(5)	Effective Radiated Power / Equivalent Isotropic Radiated Power (Band 5, n5)	< 7 Watts max. ERP			Section 7.6, 7.12
27.50(c)(10)	Effective Radiated Power / Equivalent Isotropic Radiated Power (Band 12)	< 3 Watts max. ERP			Section 7.6
24.232(c) 27.50(h)(2)	Equivalent Isotropic Radiated Power (Band 2, n2)	< 2 Watts max. EIRP			Section 7.6, 7.12
27.50(d)(4)	Equivalent Isotropic Radiated Power (Band 4/66, n66)	< 1 Watts max. EIRP	RADIATED	PASS	Section 7.6, 7.12
27.50(a)(3)	Equivalent Isotropic Radiated Power (Band 30)	< 0.25 Watts max. EIRP			Section 7.6
2.1053 22.917(a) 24.238(a) 27.53(g) 27.53(h)	Undesirable Emissions (Band 12/5, 66/4, 2, n2, n66)	> 43 + 10 log ₁₀ (P[Watts]) for all out-of-band emissions			Section 7.8, 7.12
27.53(a)	Undesirable Emissions (Band 30)	> 70 + 10 log ₁₀ (P[Watts])			Section 7.8
27.53(m)	Uplink Carrier Aggregation	Undesirable emissions must meet the limits detailed in 27.53(m)			Section 7.8

Table 7-2. Summary of Radiated Test Results

Notes:

- 1) All modes of operation and data rates were investigated. The test results shown in the following sections represent the worst case emissions.
- 2) The analyzer plots (Sections 7.2, 7.3, 7.4, 7.5) were all taken with a correction table loaded into the analyzer. The correction table was used to account for the losses of the cables, directional couplers, and attenuators used as part of the system to maintain a link between the call box and the EUT at all frequencies of interest.
- 3) All antenna port conducted emissions testing was performed on a test bench with the antenna port of the EUT connected to the spectrum analyzer through calibrated cables, attenuators, and couplers.
- 4) For conducted spurious emissions, automated test software was used to measure emissions and capture the corresponding plots necessary to show compliance. The measurement software utilized is PCTEST "LTE Automation," Version 5.3.

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7.2 Occupied Bandwidth

Test Overview

The occupied bandwidth, that is the frequency bandwidth such that, below its lower and above its upper frequency limits, the mean powers radiated are each equal to 0.5 percent of the total mean power radiated by a given emission shall be measured. All modes of operation were investigated and the worst case configuration results are reported in this section.

Test Procedure Used

KDB 971168 D01 v03r01 - Section 4.2

Test Settings

- 1. The signal analyzer's automatic bandwidth measurement capability was used to perform the 99% occupied bandwidth and the 26dB bandwidth. The bandwidth measurement was not influenced by any intermediate power nulls in the fundamental emission.
- 2. RBW = 1 5% of the expected OBW
- 3. VBW \geq 3 x RBW
- 4. Detector = Peak
- 5. Trace mode = max hold
- 6. Sweep = auto couple
- 7. The trace was allowed to stabilize
- 8. If necessary, steps 2 7 were repeated after changing the RBW such that it would be within
 - 1-5% of the 99% occupied bandwidth observed in Step 7

Test Setup

The EUT and measurement equipment were set up as shown in the diagram below.



Figure 7-1. Test Instrument & Measurement Setup

Test Notes

None.

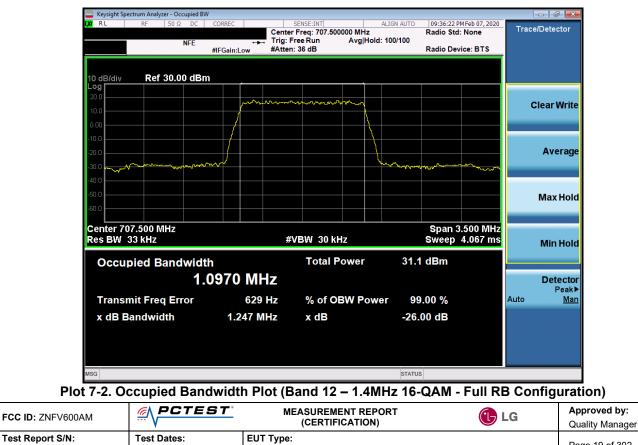
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Band 12



Plot 7-1. Occupied Bandwidth Plot (Band 12 – 1.4MHz QPSK - Full RB Configuration)



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Keysight Spectrum Analyzer - Occupied BW RL RF 50 Ω DC	CORREC	SENSE:INT	ALIGN AUTO	09:36:35 PM Feb 07, 2	2020 Trace/Detecto
NEE		r Freq: 707.500000 MHz Free Run Avg Hole	d: 100/100	Radio Std: None	Trace/Delecto
NFE		n: 36 dB		Radio Device: BTS	5
0 dB/div Ref 30.00 dBm	1				
og					
0.0	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	mann			Clear Wr
0.0					
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0.0					
0.0			1		Avera
0.0 0.0			J. Sound and and a second and a s		~~~
0.0					
0.0					Max Ho
0.0					
enter 707.500 MHz				Span 3.500 N	
es BW 33 kHz	#	VBW 30 kHz		Sweep 4.067	
Occupied Bandwidt	h	Total Power	30.4	dBm	
1.	0937 MHz				Detec
Transmit From Freeze	255 11-	% of OBW Pow			Pea Auto M
Transmit Freq Error	-255 Hz			0.00 %	Auto <u>Iv</u>
x dB Bandwidth	1.230 MHz	x dB	-26.	00 dB	
			STATUS		

Plot 7-3. Occupied Bandwidth Plot (Band 12 – 1.4MHz 64-QAM - Full RB Configuration)



Plot 7-4. Occupied Bandwidth Plot (Band 12 – 1.4MHz 256-QAM - Full RB Configuration)

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Keysight Spectrum Analyzer - Occupied BW					
LXIRL RF 50Ω AC	CORREC	SENSE:INT Center Frea: 707.500000 MHz	12:19:21 PM Radio Std:	1 Jan 10, 2020 None	Trace/Detector
		Trig: Free Run Avg Hold: 1 #Atten: 36 dB			
10 dB/div Ref 30.00 dBm					
20.0	darmon .	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~			Clear Write
0.00					_
-20.0					Average
-30.0					
-60.0					Max Hold
Center 707.5 MHz Res BW 68 kHz		#VBW 220 kHz		7.5 MHz 12.53 ms	Min Hold
Occupied Bandwidtl	า	Total Power	32.0 dBm		
2.0	6981 MH	2			Detector Peak
Transmit Freq Error	-2.013 k⊦	z % of OBW Power	r 99.00 %		Auto <u>Mar</u>
x dB Bandwidth	2.999 MH	z x dB	-26.00 dB		
ISG			STATUS		

Plot 7-5. Occupied Bandwidth Plot (Band 12 - 3.0MHz QPSK - Full RB Configuration)



Plot 7-6. Occupied Bandwidth Plot (Band 12 - 3.0MHz 16-QAM - Full RB Configuration)

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Keysight Spectrum Analyzer - (
XIRL RF 50	Ω AC	CORRE	C		ENSE:INT Freg: 707.500	000 MHz			12:19:47 P Radio Std	M Jan 10, 2020 : None	Trac	e/Detector
		#IFGa	in:Low	Trig: Fre #Atten:		Avg Hol	d: 10	00/100	Radio Dev	rice: BTS		
10 dB/div Ref 30.	.00 dBm											
20.0			, human flow	uladown (John 1	el when have the	delstown-life,						Clear Writ
0.00							۱.					
20.0		1					Ì					Averag
30.0 	un ann an Anna							<u>አ</u> ርትም ውር _የ ያያት	ուսերին <mark>իներիս</mark> ու	mitra maran		
-50.0												Max Hol
Center 707.5 MHz										n 7.5 MHz		
Res BW 68 kHz				#V	BW 220 k					12.53 ms		Min Hol
Occupied Ban			0 MI	47	Total P	ower		29.4	dBm			Detecto
Transmit Freq E			3.057		% of O	3W Pov	ver	99	.00 %		Auto	Peak Ma
x dB Bandwidth		2	2.989 N	IHz	x dB			-26.	00 dB			
SG								STATUS				

Plot 7-7. Occupied Bandwidth Plot (Band 12 - 3.0MHz 64-QAM - Full RB Configuration)



Plot 7-8. Occupied Bandwidth Plot (Band 12 - 3.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	PCTEST'	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager	
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Keysight Spectrum Analyzer - Occupie						
X RL RF 50 Ω A	C CORREC	SENSE:INT		12:16:35 PM Radio Std:		Trace/Detector
		Center Freq: 707.500 Trig: Free Run	Avg Hold: 100/100	Radio Std:	None	
	#IFGain:Low	#Atten: 36 dB		Radio Devid	ce: BTS	
10 dB/div Ref 30.00 d	Bm					
20.0		-				
10.0	- Contraction		- and the second s			Clear Write
0.00	/		l l			
			l l			
-10.0						
-20.0			M A	A		Average
-30.0 mmmmmmm			w/w/w/	man	man	
-40.0						
-50.0						
						Max Hold
-60.0						
Center 707.5 MHz				Snan 1	2.5 MHz	
Res BW 120 kHz		#VBW 390 k	Hz		ep 1 ms	M
						Min Hold
Occupied Bandwi	dth	Total P	ower 32.	dBm		
	4.5204 MH	Z				Detector
Transmit Freq Error	-1.919 k		BW Power 99	.00 %		Peak▶ Auto Man
Transmit Freq Error	-1.919 K		SW FOWER 98	0.00 %		Auto <u>Man</u>
x dB Bandwidth	5.009 M	Hz xdB	-26	00 dB		
MSG			STATU	5		

Plot 7-9. Occupied Bandwidth Plot (Band 12 - 5.0MHz QPSK - Full RB Configuration)



Plot 7-10. Occupied Bandwidth Plot (Band 12 - 5.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager	
Test Report S/N:	Test Dates:	EUT Type:		Dage 02 of 202	
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Keysight Spectrum Analyzer - Occup				
X RL RF 50 Ω	AC CORREC	SENSE:INT Center Freq: 707.500000 MHz	12:17:02 PM Jan 10, 2020 Radio Std: None	Trace/Detector
	#IFGain:Low	Trig: Free Run Avg Hold: 100/1 #Atten: 36 dB	100 Radio Device: BTS	
	#IFGall.LOW	materi oo ab	Radio Bende: BTo	
10 dB/div Ref 30.00	dBm			
_og				
20.0	mm	hand many many many many many many many many		Clear Writ
10.0				
0.00				
-10.0	<u> </u>			Averag
20.0 30.0	margar		man	Averag
30.0 www.www.www.				
-40.0				
-60.0				Max Hol
-00.0				
Center 707.5 MHz			Span 12.5 MHz	
Res BW 120 kHz		#VBW 390 kHz	Sweep 1 ms	Min Hol
Occupied Bandw	/idth	Total Power	29.9 dBm	
	4.5211 MH	7		Detecto
				Peak
Transmit Freq Erro	r -7.046 k	Hz % of OBW Power	99.00 %	Auto <u>Ma</u>
x dB Bandwidth	4.984 MI	Hz xdB	-26.00 dB	
SG			STATUS	

Plot 7-11. Occupied Bandwidth Plot (Band 12 - 5.0MHz 64-QAM - Full RB Configuration)



Plot 7-12. Occupied Bandwidth Plot (Band 12 - 5.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied B					- đ ×
XIRL RF 50Ω AC	Trig:	SENSE:INT er Freq: 707.500000 MHz Free Run Avg Holo n: 36 dB	Radio 1: 100/100	9:24 AM Jan 10, 2020 o Std: None	Trace/Detector
	#IFGain:Low #Atte	n: 36 dB	Radi	o Device: BTS	
10 dB/div Ref 40.00 dBr	n				
Log 30.0					
20.0		where the second state and the second state and second state and second state and second state and second state			Clear Write
10.0	A conception of the second sec	the state of the s			
0.00	/				
-10.0					Averag
-20.0	ana d		mentul	Ml at a seconda	
30.0 monthanklop month			Of the OD ON A		
-40.0					Max Hol
-50.0					
Center 707.5 MHz				Span 25 MHz	
Res BW 240 kHz	#	VBW 750 kHz		Sweep 1 ms	Min Hol
Occupied Bandwidt	th	Total Power	32.1 dBr	n	
8	9989 MHz				Detecto
					Peak
Transmit Freq Error	-2.519 kHz	% of OBW Pow			Auto <u>Ma</u>
x dB Bandwidth	9.867 MHz	x dB	-26.00 dl	В	
ISG			STATUS		
			0		

Plot 7-13. Occupied Bandwidth Plot (Band 12 - 10.0MHz QPSK - Full RB Configuration)



Plot 7-14. Occupied Bandwidth Plot (Band 12 - 10.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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				Trace/Detector
🛶 Trig:	Free Run Avg Hold		evice: BTS	
Bm				
man all and a	way have been and a			Clear Write
				Clear Write
	}			
				A
www		John Allhan man	how wants are	Average
				Max Hold
		Sp	an 25 MHz	
	#VDVV 750 KHZ	54	veep rins	Min Hold
dth	Total Power	30.2 dBm		
9.0067 MHz				Detector
2 285 kHz	% of OBW Powe	er 00.00 %	Au	Peak≯ to Man
			710	
9.888 MHZ	хав	-26.00 dB		
	trig #IFGain:Low #Att	Conrec SENSE:INT Criter Freq: 707.500000 MHz Trig: Freq Run Avg Hold #IFGain:Low The freq Run Avg Hold Avg Hold	CORREC SENSE:INT 12:03:27 Center Freq: 707.500000 MHz Radio St #IFGain:Low #Atten: 36 dB Avg Hold: 100/100 Bm	Correc SENSE:INT 12:03:27 PMJan 10,2020 Center Freq: 707.500000 MHz #IFGain:Low Tig: Free Run Avg Hold: 100/100 #Atten: 36 dB Bm Small Device: BTS Bm Small Device: BTS Bm Small Device: BTS Small Device: BTS Addition Device: BTS Small Device: BTS Small Device: BTS Addition Device: BTS Small Device: BTS Small Device: BTS Addition Device: BTS Additi

Plot 7-15. Occupied Bandwidth Plot (Band 12 - 10.0MHz 64-QAM - Full RB Configuration)



Plot 7-16. Occupied Bandwidth Plot (Band 12 - 10.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Band 5



Plot 7-17. Occupied Bandwidth Plot (Band 5 – 1.4MHz QPSK - Full RB Configuration)



Plot 7-18. Occupied Bandwidth Plot (Band 5 – 1.4MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u>PCTEST</u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occup RL RF 50 Ω		SENSE:INT	05:06:59 PM Fel	
KL KF JUSZ		ter Freq: 836.500000 MHz	Radio Std: No	
NF		: Free Run Avg Hold: 1		
	#IFGain:Low #Att	ten: 36 dB	Radio Device:	BIS
0 dB/div Ref 40.00	dBm			
.og				
20.0				Clear Writ
	march	an han h		
10.0				
).00				
10.0				Averaç
20.0				
30.0	- hoursen of	how	Munto and an American	
10.0				Max Ho
50.0				Maxilo
Center 836.5 MHz			Span 3.	
tes BW 33 kHz		#VBW 30 kHz	Sweep 5.8	867 ms Min Ho
Occupied Bandw	vidth	Total Power	29.5 dBm	
Occupied Ballum				
	1.0921 MHz			Detect
Transmit Freq Erro	r -750 Hz	% of OBW Power	99.00 %	Auto <u>M</u>
x dB Bandwidth	1.237 MHz	x dB	-26.00 dB	
iG			STATUS	

Plot 7-19. Occupied Bandwidth Plot (Band 5 – 1.4MHz 64-QAM - Full RB Configuration)



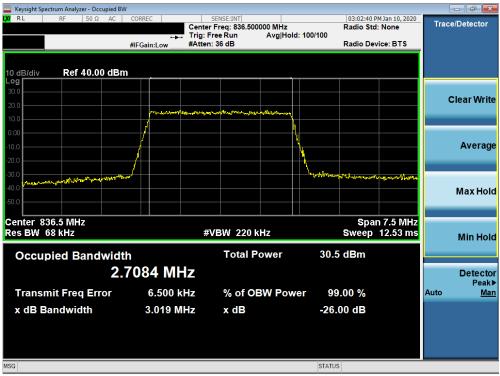
Plot 7-20. Occupied Bandwidth Plot (Band 5 - 1.4MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW					
LX RL RF 50 Ω AC		SENSE:INT Iter Freq: 836.500000 MHz	Radio Sto	M Jan 10, 2020 : None	Trace/Detector
		j:FreeRun Avg∣Hold ten:36 dB	: 100/100 Radio De	vice: BTS	
,	in dameon				
10 dB/div Ref 40.00 dBn	1 <u> </u>				
Log 30.0					
20.0					Clear Write
10.0		www.weenshow. Warran			
0.00	/				
-10.0			\		Average
-20.0			<u>}</u>		
-30.0 -40.0	N ⁴		and the second of the second o	way wake	
					Max Hold
-50.0					
Center 836.5 MHz				n 7.5 MHz	
Res BW 68 kHz		#VBW 220 kHz	Sweep	12.53 ms	Min Hold
Occupied Bandwidt	h	Total Power	31.9 dBm		
	7000 MHz				Detector
			~~~~		Peak►
Transmit Freq Error	-128 Hz	% of OBW Powe			Auto <u>Man</u>
x dB Bandwidth	3.015 MHz	x dB	-26.00 dB		
MSG			STATUS		

Plot 7-21. Occupied Bandwidth Plot (Band 5 - 3.0MHz QPSK - Full RB Configuration)



Plot 7-22. Occupied Bandwidth Plot (Band 5 - 3.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><i>CPCTEST</i></u>	MEASUREMENT REPORT (CERTIFICATION)	<b>Approved by:</b> Quality Manager
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Keysight Spectrum Analyzer -									[	- 6
CRL RF 50	Ω AC C	DRREC	Center Freq		000 MHz		Radio Std	M Jan 10, 2020 : None	Trac	e/Detector
	#1	⊷ FGain:Low	Trig: Free R #Atten: 36 d		Avg Hold	i: 100/100	Radio Dev	vice: BTS		
	<b>#</b> 1	I Gam.LOW								
IO dB/div Ref 40	.00 dBm									
og										
30.0										Clear Wri
20.0		مروالع	^{_1} 5.00~,116-00,147-04	district of the	annu u lan					
0.0		1	in definition of the same of the							
).00						1				
0.0		1				1				Avera
20.0						1				
30.0	Munice Warment					how	hand the second s	ughtwennyer		
10.0										MaxHo
50.0										
enter 836.5 MHz							Spa	n 7.5 MHz		
es BW 68 kHz			#VBW	220 ki	Hz			12.53 ms		Min Ho
	a du ui altia		т	otal Po	wor	20	.6 dBm			
Occupied Bar					JWei	23	.o ubiii			
	2.70	044 MH	IZ							Detect Pea
Transmit Freq E	rror	1.106 k	Hz %	of OE	W Pow	er 🤮	99.00 %		Auto	<u>M</u>
x dB Bandwidth	•	2.987 M	Hz y	dB		-26	5.00 dB			
		21001 11								
G						STAT	US			

Plot 7-23. Occupied Bandwidth Plot (Band 5 - 3.0MHz 64-QAM - Full RB Configuration)



Plot 7-24. Occupied Bandwidth Plot (Band 5 - 3.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	PCTEST'	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW				
C RL RF 50Ω AC	CORREC	SENSE:INT nter Freg: 836.500000 MHz	03:00:22 PM Ja Radio Std: N	
		g: Free Run Avg Hold: ten: 36 dB	100/100 Radio Device	BTS
10 dB/div Ref 40.00 dBm				
30.0				Center Fre
20.0	mm	v. w.		836.500000 MH
0.00				
10.0				
20.0	D D			
so.o				~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~
40.0				
Center 836.5 MHz			0non 42	5 841-
Res BW 120 kHz		#VBW 390 kHz	Span 12 Sweer	0 1 ms 1.250000 MH
Occupied Bandwidtl	ı	Total Power	32.2 dBm	<u>Auto</u> Ma
	5040 MHz			FreqOffse
Transmit Freq Error	2.347 kHz	% of OBW Powe	r 99.00 %	0 H
x dB Bandwidth	4.987 MHz	x dB	-26.00 dB	
	4.007 11112	A dB	20.00 40	
G			STATUS	

Plot 7-25. Occupied Bandwidth Plot (Band 5 - 5.0MHz QPSK - Full RB Configuration)



Plot 7-26. Occupied Bandwidth Plot (Band 5 - 5.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager		
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Keysight Spectrum Analyzer - Occupied B					
CIRL RF 50Ω AC	CORREC	SENSE:INT	03:00:52 I Radio Sto	M Jan 10, 2020	Frequency
		'rig: Free Run Avg Hold: Atten: 36 dB	100/100 Radio De	vice: BTS	
0 dB/div Ref 40.00 dB	m				
30.0					Center Fre
20.0	Juna	man many many many many many many many m			836.500000 MH
).00					
0.0					
0.0 	N		home my	mm	
50.0					
enter 836.5 MHz les BW 120 kHz		#VBW 390 kHz		12.5 MHz eep 1 ms	CF Ste 1.250000 MH
Occupied Bandwid	th	Total Power	30.6 dBm		<u>Auto</u> Ma
4.	.5288 MHz				Freq Offs
Transmit Freq Error	-13.260 kHz	z % of OBW Powe	er 99.00 %		. 01
x dB Bandwidth	4.982 MHz	x dB	-26.00 dB		
G			STATUS		

Plot 7-27. Occupied Bandwidth Plot (Band 5 - 5.0MHz 64-QAM - Full RB Configuration)



Plot 7-28. Occupied Bandwidth Plot (Band 5 - 5.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW					
IX/RL RF 50Ω AC	CORREC	SENSE:INT nter Freg: 836.500000 MHz	02:46:23 Radio Sto	PM Jan 10, 2020 d: None	Trace/Detector
	Tri		d:>100/100	vice: BTS	
10 dB/div Ref 40.00 dBm					
30.0					Clear Write
20.0	finnesser	way and the management			
0.00					
-10.0					Average
30.0 Un MANNA MANA			Whom a south and the south	M. Lasan	
-40.0					Max Hold
-50.0					
Center 836.5 MHz Res BW 240 kHz		#VBW 750 kHz		an 25 MHz eep 1 ms	Min Hold
Occupied Bandwidth		Total Power	32.1 dBm		
8.9	933 MHz				Detector Peak
Transmit Freq Error	-8.756 kHz	% of OBW Pow	er 99.00 %		Auto <u>Mar</u>
x dB Bandwidth	9.868 MHz	x dB	-26.00 dB		
ISG			STATUS		

Plot 7-29. Occupied Bandwidth Plot (Band 5 - 10.0MHz QPSK - Full RB Configuration)



Plot 7-30. Occupied Bandwidth Plot (Band 5 - 10.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BV					
RL RF 50 Ω AC		SENSE:INT enter Freq: 836.500000 MHz	Radio Std	M Jan 10, 2020 I: None	Trace/Detector
		rig: Free Run Avg Hold: 1 Atten: 36 dB	100/100 Radio Dev	vice: BTS	
0 dB/div Ref 40.00 dBn	n				
og 30.0					
20.0		man make of man and a second and a			Clear Writ
0.0					
0.0					Averaç
0.0			water warman		
0.0 Horallanon man Man			and the second s	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	Max Ho
0.0					Max no
enter 836.5 MHz				n 25 MHz	
es BW 240 kHz		#VBW 750 kHz	Swe	eep 1 ms	Min Ho
Occupied Bandwidt		Total Power	30.1 dBm		
8.	9980 MHz				Detect
Transmit Freq Error	3.095 kHz	% of OBW Power	99.00 %		Auto <u>Ma</u>
x dB Bandwidth	9.864 MHz	x dB	-26.00 dB		
G			STATUS		

Plot 7-31. Occupied Bandwidth Plot (Band 5 - 10.0MHz 64-QAM - Full RB Configuration)



Plot 7-32. Occupied Bandwidth Plot (Band 5 - 10.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager		
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### Band 66/4



Plot 7-33. Occupied Bandwidth Plot (Band 66/4 - 1.4MHz QPSK - Full RB Configuration)



Plot 7-34. Occupied Bandwidth Plot (Band 66/4 - 1.4MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u>PCTEST</u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW					
[X RL   RF   50 Ω AC		SENSE:INT Senter Freq: 1.745000000 GHz Trig: Free Run Avg Hold Atten: 36 dB	Radio Sto i: 100/100	PMJan 07, 2020 d: None vice: BTS	Trace/Detector
	#IFGain:Low +	Atten: 30 dB	Radio De	VICE. DT3	
10 dB/div Ref 30.00 dBm					
20.0		www.hundeling			Clear Write
10.0					Clear write
0.00					
-10.0					Average
-30.0	m		an a stranger and a second	Departs	Average
-40.0				an Allower	
-50.0					Max Hold
-60.0					
Center 1.745 GHz				n 3.5 MHz	
Res BW 33 kHz		#VBW 30 kHz	Sweep	5.867 ms	Min Hold
Occupied Bandwidt	h	Total Power	29.1 dBm		
	0941 MHz	,			Detector
	223 H		er 99.00 %		Peak▶ Auto Man
Transmit Freq Error					Auto <u>Mari</u>
x dB Bandwidth	1.231 MH	z x dB	-26.00 dB		
MSG			STATUS		

Plot 7-35. Occupied Bandwidth Plot (Band 66/4 - 1.4MHz 64-QAM - Full RB Configuration)



Plot 7-36. Occupied Bandwidth Plot (Band 66/4 - 1.4MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><i>CPCTEST</i></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager		
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Keysight Spectrum Analyzer - Occupied BW				
RL RF 50Ω AC	CORREC Cente	SENSE:INT er Freg: 1.745000000 GHz	11:08:19 PM Jan 0 Radio Std: Non	
	Trig:	Free Run Avg Hold: 100 n: 36 dB		
0 dB/div Ref 40.00 dBm				
30.0				Clear Writ
20.0	form month and the second	went my Many my my my		
0.00	/			
20.0				Averag
0.0 Mar has man mar mar and a start		\	Malmonder Marchelon Malera months	4.9.M.
10.0				Max Hol
enter 1.745 GHz			Span 7.5	MHZ
es BW 68 kHz	#	VBW 220 kHz	Sweep 12.5	
Occupied Bandwidt		Total Power	32.1 dBm	
2.7	7118 MHz			Detecto
Transmit Freq Error	-670 Hz	% of OBW Power	99.00 %	Auto <u>Ma</u>
x dB Bandwidth	3.010 MHz	x dB	-26.00 dB	

Plot 7-37. Occupied Bandwidth Plot (Band 66/4 - 3.0MHz QPSK - Full RB Configuration)



Plot 7-38. Occupied Bandwidth Plot (Band 66/4 - 3.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager	
Test Report S/N:	Test Dates:	EUT Type:		D 07 -f 000	
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🚾 Keysight Spectrum Analyzer - Occupi				
<b>LX </b> RL RF 50Ω /		SENSE:INT Center Freg: 1.745000000 GHz	11:08:44 PM Jan 07, 2020 Radio Std: None	Trace/Detector
	- <b>-</b>	Trig: Free Run Avg Hold: 10 #Atten: 36 dB		
10 dB/div Ref 40.00 d	dBm			
30.0				Clear Write
20.0	munin	Marine Marille marine marine		Clear Write
0.00				Average
-10.0				Average
-30.0			waren an	Max Hold
-50.0				
Center 1.745 GHz Res BW 68 kHz		#VBW 220 kHz	Span 7.5 MHz Sweep 12.53 ms	Min Hold
Occupied Bandw	idth	Total Power	30.1 dBm	
	2.7104 MH	Z		Detector Peak
Transmit Freq Error	-1.634 kH	z % of OBW Power	99.00 %	Auto <u>Mar</u>
x dB Bandwidth	3.020 MH	lz x dB	-26.00 dB	
ISG			STATUS	
~			514105	

Plot 7-39. Occupied Bandwidth Plot (Band 66/4 - 3.0MHz 64-QAM - Full RB Configuration)



Plot 7-40. Occupied Bandwidth Plot (Band 66/4 - 3.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW				
XX RL RF 50Ω AC	CORREC	SENSE:INT r Freg: 1.745000000 GHz	11:11:22 PM Ja Radio Std: No	
	Trig: F			she
		1: 36 dB	Radio Device:	BTS
10 dB/div Ref 30.00 dBm				
Log				
20.0	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	mmmm		Clear Write
10.0				
0.00				
-10.0				
-20.0	And			Average
-20.0	YV		Mr Mary Mary	winny
-40.0				
-50.0				Max Hold
-60.0				
			0non 42	
Center 1.745 GHz Res BW 120 kHz	#	VBW 390 kHz	Span 12 Sweep	1 mc
Nes Day 120 KHZ	u.	4044 330 MIZ	oweep	Min Hold
Occupied Bandwidt	h	Total Power	32.7 dBm	
4.:	5390 MHz			Detector Peak►
Transmit Freq Error	5.031 kHz	% of OBW Pow	er 99.00 %	Auto <u>Man</u>
x dB Bandwidth	5.015 MHz	x dB	-26.00 dB	
MSG			STATUS	

Plot 7-41. Occupied Bandwidth Plot (Band 66/4 - 5.0MHz QPSK - Full RB Configuration)



Plot 7-42. Occupied Bandwidth Plot (Band 66/4 - 5.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied						
<b>X RL</b> RF 50 Ω AC	CORREC	SENSE:INT Center Freq: 1.74500		11:11:40 PM Ja Radio Std: N		Trace/Detector
		Trig: Free Run	Avg Hold: 100/100	Radio Sta: N	one	
	#IFGain:Low	#Atten: 36 dB		Radio Device	: BTS	
10 dB/div Ref 30.00 dl	Pm					
20.0						
10.0	mmm	www.Athermone	may			Clear Write
0.00						
			۱ ۱			
-10.0						
-20.0			<u>├</u> ──			Average
-30.0 month Marchan			h	manpho	WANNY	
-40.0						
-50.0						
						Max Hold
-60.0						
Center 1.745 GHz				Span 12	2.5 MHz	
Res BW 120 kHz		#VBW 390 k	Hz		p 1 ms	
		#•BH 0001		01100		Min Hold
Occupied Bandwi	dth	Total P	ower 29.	.9 dBm		
4	4.5393 MH	Z				Detector
Transmit From Error	2 600 14		3W Power 9	9.00 %		Peak► Auto Man
Transmit Freq Error	-3.680 kl	12 % 01 U	Sw Power 9	9.00 %	<i>'</i>	Nuto <u>Ivian</u>
x dB Bandwidth	4.973 MI	lz x dB	-26	i.00 dB		
MSG			STAT	US		

Plot 7-43. Occupied Bandwidth Plot (Band 66/4 - 5.0MHz 64-QAM - Full RB Configuration)



Plot 7-44. Occupied Bandwidth Plot (Band 66/4 - 5.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied	BW				
X RL RF 50Ω AC	CORREC	SENSE:INT er Freg: 1.745000000 GH		07 PM Jan 07, 2020 Std: None	Trace/Detector
	Trig:		old:>100/100	sta: None	
	#IFGain:Low #Atte	en: 36 dB	Radio	Device: BTS	
10 dB/div Ref 30.00 dB	m				
Log					
20.0	1 Januar Mar	mannon	м — — — — — — — — — — — — — — — — — — —		Clear Write
10.0					Clear Write
0.00			-\		
-10.0	/				
-20.0	- All All All All All All All All All Al			- h	Average
-20.0 -30.0 mm MMr Mm Mh Malm Time			Wall water The los	hal marchestry	
-40.0					
-50.0					Max Hold
-60.0					
Center 1.745 GHz				non 26 Milla	
Res BW 240 kHz		#VBW 750 kHz		pan 25 MHz Sweep 1 ms	
112 DW 240 1112		#VDVV 750 KHZ		weep mis	Min Hold
Occupied Bandwid	lth	Total Power	31.9 dBm		
					-
ő	.9932 MHz				Detector Peak▶
Transmit Freq Error	9.182 kHz	% of OBW Po	wer 99.00 %		Auto <u>Man</u>
x dB Bandwidth	9.876 MHz	x dB	-26.00 dB		
			071710		
MSG			STATUS		

Plot 7-45. Occupied Bandwidth Plot (Band 66/4 - 10.0MHz QPSK - Full RB Configuration)



Plot 7-46. Occupied Bandwidth Plot (Band 66/4 - 10.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW							
LXI RL RF 50Ω AC	CORREC	SENSE:INT Center Freq: 1.74500		11:14:31 PM Radio Std:	1 Jan 07, 2020	Trace	/Detector
		Televis Trans a Dissue	Avg Hold: 100/		None		
	FGain:Low	#Atten: 36 dB		Radio Devi	ce: BTS		
10 dB/div Ref 30.00 dBm							
20.0							
10.0	polon and	www.www.hut.landland	manna			С	lear Write
	1						
0.00	1		le la				
-10.0							
-20.0					4		Average
-20.0 -30.0 million al mar William			V.,/L.,	mary Mappile	humming		
-40.0							
-50.0							Max Hold
-60.0							
Center 1.745 GHz Res BW 240 kHz		#VBW 750 k	LI-		1 25 MHz		
Res BW 240 KH2		#VBW /SUK	Π2	Swe	ep 1 ms		Min Hold
Occupied Bandwidth		Total P	ower	29.7 dBm			
9.0	086 MF	IZ					Detector
	45.05.00						Peak►
Transmit Freq Error	15.954 k	Hz % of OE	BW Power	99.00 %		Auto	<u>Man</u>
x dB Bandwidth	9.905 M	Hz x dB		-26.00 dB			
MSG				STATUS			

Plot 7-47. Occupied Bandwidth Plot (Band 66/4 - 10.0MHz 64-QAM - Full RB Configuration)



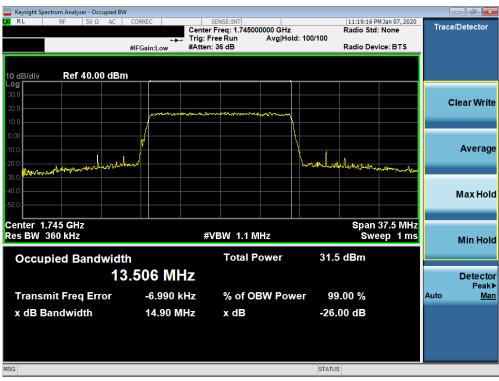
Plot 7-48. Occupied Bandwidth Plot (Band 66/4 - 10.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager		
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🤤 Keysight Spectrum Analyzer - Occupied BW							
LXIRL RF 50Ω AC CO	Trig:		ld: 100/100	11:19:02 P Radio Std	M Jan 07, 2020 None	Trace/D	etector
#IF	Gain:Low #Atte	en: 36 dB		Radio Dev	ice: BTS		
10 dB/div Ref 40.00 dBm							
20.0	mar mar and a start					Cle	ar Write
10.0			<u></u>				
-10.0	1						verage
-20.0			hand	then man	When a Marmore		lioiuge
-30.0							
-40.0						м	ax Hold
Center 1.745 GHz Res BW 360 kHz		#VBW 1.1 MHz			37.5 MHz ep 1 ms	N	lin Hold
Occupied Bandwidth		Total Power	32.5	dBm			
	519 MHz					C	Detector
Transmit Freq Error	-3.248 kHz	% of OBW Pow	wer 99	.00 %		Auto	Peak▶ <u>Man</u>
x dB Bandwidth	14.85 MHz	x dB	-26.	00 dB			
MSG			STATUS	5			

Plot 7-49. Occupied Bandwidth Plot (Band 66/4 - 15.0MHz QPSK - Full RB Configuration)



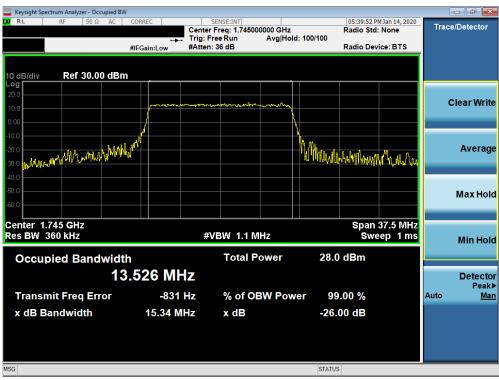
Plot 7-50. Occupied Bandwidth Plot (Band 66/4 - 15.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><i>CPCTEST</i></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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www.www.com analyzer - Occupied B	N				
LX/RL RF 50Ω AC	CORREC	SENSE:INT ter Freg: 1.745000000 GHz	11:19:27 Radio St	PM Jan 07, 2020 d: None	Trace/Detector
	🛶 Trig	: Free Run Avg Hold en: 36 dB	: 100/100	vice: BTS	
10 dB/div Ref 40.00 dBr	n				
Log 30.0					Clear Write
20.0	January Marting	and a second and the			Clear Write
0.00					•
-10.0	No Color				Average
-20.0			and the second	and the second second	
-40.0					Max Hold
Center 1.745 GHz				37.5 MHz	
Res BW 360 kHz		#VBW 1.1 MHz	SW	eep 1ms	Min Hold
Occupied Bandwid	th	Total Power	30.2 dBm		
1:	3.487 MHz				Detector Peak▶
Transmit Freq Error	-18.672 kHz	% of OBW Pow	er 99.00 %		Auto <u>Man</u>
x dB Bandwidth	14.77 MHz	x dB	-26.00 dB		
MSG			STATUS		

Plot 7-51. Occupied Bandwidth Plot (Band 66/4 - 15.0MHz 64-QAM - Full RB Configuration)



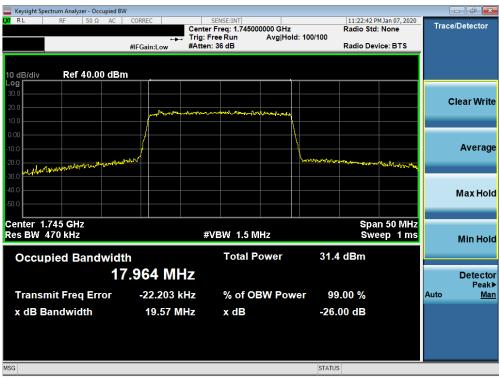
Plot 7-52. Occupied Bandwidth Plot (Band 66/4 - 15.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied B	N				
XIRL RF 50Ω AC	CORREC	SENSE:INT er Freg: 1.745000000 GHz		:28 PM Jan 07, 2020 Std: None	Trace/Detector
	Trig:		d: 100/100	Device: BTS	
10 dB/div Ref 40.00 dBr	n				
30.0					Clear Write
20.0	pelle man man man	man manufic and a second			Clear write
0.00	/				
-10.0	envol		monoperation		Average
30.0					
40.0					Max Hold
Center 1.745 GHz			s	Span 50 MHz	
Res BW 470 kHz	3	#VBW 1.5 MHz		Sweep 1 ms	Min Hold
Occupied Bandwid		Total Power	32.6 dBm	1	
17	7.967 MHz				Detecto Peak
Transmit Freq Error	-13.844 kHz	% of OBW Pow	er 99.00 %		Auto <u>Mar</u>
x dB Bandwidth	19.51 MHz	x dB	-26.00 dE	3	
sg			STATUS		

Plot 7-53. Occupied Bandwidth Plot (Band 66/4 - 20.0MHz QPSK - Full RB Configuration)



Plot 7-54. Occupied Bandwidth Plot (Band 66/4 - 20.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied B	W				
LX/RL RF 50Ω AC	CORREC	SENSE:INT er Freg: 1.745000000 GHz	11:22:58 Radio Sto	PM Jan 07, 2020	Trace/Detector
	++- Trig:	Free Run Avg Hold:>	100/100		
	#IFGain:Low #Atte	n: 36 dB	Radio De	vice: BTS	
10 dB/div Ref 40.00 dBi	n				
30.0					
20.0					Clear Write
10.0	marmitten wales of the	www.mahahalahalahalahalahalahalahalahalahala			
0.00					
-10.0	{				Average
					Average
-20.0 marthantichargent and the			an and a short of an for from the start	mellower low and	
-40.0					Max Hold
-50.0					
Center 1.745 GHz			Spa	an 50 MHz	
Res BW 470 kHz	#	≠VBW 1.5 MHz		eep 1 ms	Min Hold
		T-4-1 D-111-1	20 C dB-		
Occupied Bandwid		Total Power	30.6 dBm		
1	7.979 MHz				Detector
Transmit Freq Error	-41.111 kHz	% of OBW Power	99.00 %		Peak▶ Auto Man
					Auto <u>iman</u>
x dB Bandwidth	19.66 MHz	x dB	-26.00 dB		
MSG			STATUS		

Plot 7-55. Occupied Bandwidth Plot (Band 66/4 - 20.0MHz 64-QAM - Full RB Configuration)



Plot 7-56. Occupied Bandwidth Plot (Band 66/4 - 20.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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# Band 2



Plot 7-57. Occupied Bandwidth Plot (Band 2 - 1.4MHz QPSK - Full RB Configuration)



Plot 7-58. Occupied Bandwidth Plot (Band 2 - 1.4MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	PCTEST [®]	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW				
RL RF 50Ω AC		SENSE:INT er Freq: 1.880000000 GHz	04:07:26 PM Jan Radio Std: No	
		Free Run Avg Hold: 10 n: 36 dB	0/100 Radio Device:	BTS
	#iFGail.cow #/ tec		Radio Berlice.	
0 dB/div Ref 35.00 dBm				
og				
5.0				Clear Wr
5.0		and a star a		
.00				
.00				<b>.</b>
5.0				Avera
5.0	where the second	hur	Manah Mana and Mana and Mana	mp
5.0				Max Ho
5.0				
enter 1.88 GHz			Span 3.	
es BW 33 kHz	#	VBW 110 kHz	Sweep 5.8	67 ms Min Ho
Occupied Bandwidth		Total Power	29.7 dBm	
	983 MHz			Deter
1.0				Detect
Transmit Freq Error	1.550 kHz	% of OBW Power	99.00 %	Auto <u>N</u>
x dB Bandwidth	1.249 MHz	x dB	-26.00 dB	
G			STATUS	

Plot 7-59. Occupied Bandwidth Plot (Band 2 - 1.4MHz 64-QAM - Full RB Configuration)



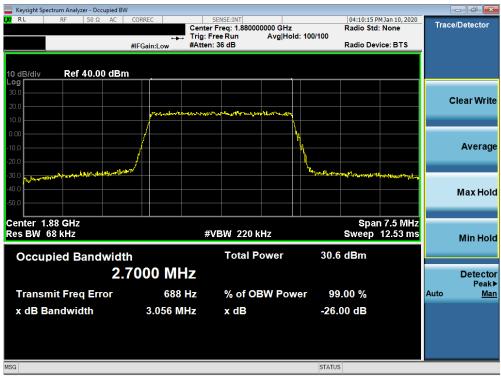
Plot 7-60. Occupied Bandwidth Plot (Band 2 - 1.4MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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🚾 Keysight Spectrum Analyzer - Occupied BW						_	
KI RF 50Ω AC			00 GHz Avg Hold:>100/100	Radio Std:		Trace	Detector
	#IFGain:Low	#Atten: 36 dB		Radio Devi	ice: BTS		
10 dB/div Ref 40.00 dBm							
30.0						<u> </u>	lear Write
20.0	- Annon	www.mashagaaalination	www			Ľ	
0.00			\				
-10.0							Average
-30.0	<i>з</i> <b>б</b>		Consumed and	manyman	Mananda		-
-40.0							Max Hold
Center 1.88 GHz				Enon	7.5 MHz		
Res BW 68 kHz		#VBW 220 kHz	2		12.53 ms		Min Hold
Occupied Bandwidth	ı	Total Pov	ver 32.1	dBm			
2.6	6967 MH	Z					Detector Peak▶
Transmit Freq Error	-3.273 kl	Hz % of OBW	V Power 99	0.00 %		Auto	Man
x dB Bandwidth	3.000 MH	Hz xdB	-26.	00 dB			
MSG			STATUS	5			

Plot 7-61. Occupied Bandwidth Plot (Band 2 - 3.0MHz QPSK - Full RB Configuration)



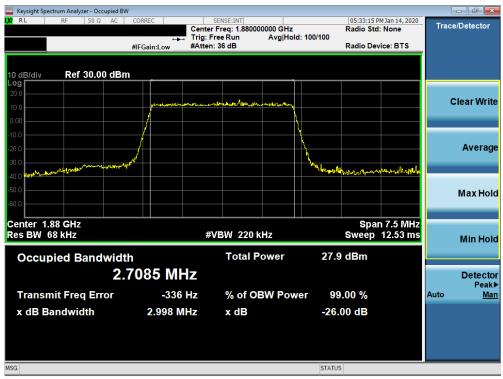
Plot 7-62. Occupied Bandwidth Plot (Band 2 - 3.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BV				
<mark>0 RL</mark> RF 50 Ω AC		SENSE:INT nter Freq: 1.880000000 GHz	04:10:25 PM Jan 10, 2020 Radio Std: None	Trace/Detector
		g:FreeRun Avg Hold:100 ten:36 dB	0/100 Radio Device: BTS	
	#IFGalli.Low #/		Radio Bende: BTo	
10 dB/div Ref 40.00 dBn	n			
-og				
30.0				Clear Writ
20.0	in the set	www.mbimbulman.		olcul Mil
10.0				
0.00				•
10.0				Avera
20.0				
30.0 martin la province and fallow and a second			all the and the second of the	
40.0				Max Ho
50.0				
Center 1.88 GHz			Span 7.5 MHz	
tes BW 68 kHz		#VBW 220 kHz	Sweep 12.53 ms	Min Ho
Occupied Bandwidt	h	Total Power	29.6 dBm	
Ζ.	6989 MHz			Detect
Transmit Freq Error	-1.710 kHz	% of OBW Power	99.00 %	Auto <u>M</u>
x dB Bandwidth	3.011 MHz	x dB	-26.00 dB	
SG			STATUS	

Plot 7-63. Occupied Bandwidth Plot (Band 2 - 3.0MHz 64-QAM - Full RB Configuration)



Plot 7-64. Occupied Bandwidth Plot (Band 2 - 3.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied	BW				
X RL RF 50Ω AC	CORREC	SENSE:INT r Freg: 1.880000000 GHz		9:48 PM Jan 10, 2020	Trace/Detector
	Trig: F		d:>100/100	o sta: None	
	#IFGain:Low #Atter	n: 36 dB	Radi	o Device: BTS	
10 dB/div Ref 30.00 dB	m				
Log					
20.0	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	monomin			Clear Write
10.0					elour mile
0.00			\		
-10.0					
-20.0					Average
30.0 Mar Mar Mar Mar	r had		h.h.m. MM	Ma do	
-40.0				mond al	
-50.0					Max Hold
-60.0					
Center 1.88 GHz				pan 12.5 MHz	
Res BW 120 kHz	#	VBW 390 kHz		Sweep 1 ms	
					Min Hold
Occupied Bandwid	lth	Total Power	32.8 dBr	n	
Λ	.5194 MHz				Detector
					Peak►
Transmit Freq Error	538 Hz	% of OBW Pov	ver 99.00 9	6	Auto <u>Man</u>
x dB Bandwidth	5.014 MHz	x dB	-26.00 d	в	
			20100 4		
MSG			STATUS		

Plot 7-65. Occupied Bandwidth Plot (Band 2 - 5.0MHz QPSK - Full RB Configuration)



Plot 7-66. Occupied Bandwidth Plot (Band 2 - 5.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><i>PCTEST</i></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager	
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Keysight Spectrum Analyzer - Occupied B				
CIRL RF 50Ω AC	CORREC	SENSE:INT	04:00:10 PM Jan 10, 2020 Radio Std: None	Trace/Detector
		rig: Free Run Avg Hold: 10 Atten: 36 dB		
IO dB/div Ref 30.00 dBr	n			
20.0 10.0		when the manual of the second se		Clear Writ
0.00				
20.0 30.0	~~		har and an and the state	Averag
10.0				Max Ho
60.0				Max Ho
center 1.88 GHz tes BW 120 kHz		#VBW 390 kHz	Span 12.5 MHz Sweep 1 ms	Min Ho
Occupied Bandwidt	:h	Total Power	29.9 dBm	
4.	5324 MHz	2		Detecto Peak
Transmit Freq Error	-10.868 kH	z % of OBW Power	99.00 %	Auto <u>Ma</u>
x dB Bandwidth	4.960 MH	z x dB	-26.00 dB	
G			STATUS	

Plot 7-67. Occupied Bandwidth Plot (Band 2 - 5.0MHz 64-QAM - Full RB Configuration)



Plot 7-68. Occupied Bandwidth Plot (Band 2 - 5.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	PCTEST'	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied	BW				
<b>X RL</b> RF 50 Ω AC		SENSE:INT er Freg: 1.880000000 GHz	03:57:19 0 Radio Sto	PM Jan 10, 2020	Trace/Detector
	Trig:		d: 100/100	a: None	
	#IFGain:Low #Atte	en: 36 dB	Radio De	vice: BTS	
10 dB/div Ref 30.00 dB	3m				
Log					
20.0	menter way was a second	mon man was more than and			Clear Write
10.0					
0.00	/				
-10.0					
-20.0					Average
-20.0 Mr. Margareland	An Des Office.		www.	cales Medlel 191	
-40.0					
-50.0					Max Hold
-60.0					
Center 1.88 GHz			Sna	an 25 MHz	
Res BW 240 kHz		#VBW 750 kHz		eep 1 ms	
					Min Hold
Occupied Bandwid	dth	Total Power	32.6 dBm		
C	).0133 MHz				Detector
					Peak
Transmit Freq Error	4.989 kHz	% of OBW Pow	ver 99.00 %		Auto <u>Man</u>
x dB Bandwidth	9.818 MHz	x dB	-26.00 dB		
MSG			STATUS		

Plot 7-69. Occupied Bandwidth Plot (Band 2 - 10.0MHz QPSK - Full RB Configuration)



Plot 7-70. Occupied Bandwidth Plot (Band 2 - 10.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW				
RL RF 50Ω AC	CORREC Cen	SENSE:INT ter Freg: 1.880000000 GHz	03:57:41 PM Jan Radio Std: No	
		: Free Run Avg Hold: 1 en: 36 dB	100/100 Radio Device:	BTS
0 dB/div <b>Ref 30.00 dB</b> m	· · · · · · · · · · · · · · · · · · ·			
		anonananaharahara		Clear Writ
0.00		\		
0.0 20.0 10.0	ma		have all the many	Averag
60.0				Max Hol
enter 1.88 GHz es BW 240 kHz		#VBW 750 kHz	Span 2 Sweep	5 MHz 1 ms Min Hol
Occupied Bandwidt		Total Power	30.0 dBm	
9.0	0049 MHz			Detecto
Transmit Freq Error	2.811 kHz	% of OBW Power	99.00 %	Auto <u>Ma</u>
x dB Bandwidth	9.819 MHz	x dB	-26.00 dB	
G			STATUS	

Plot 7-71. Occupied Bandwidth Plot (Band 2 - 10.0MHz 64-QAM - Full RB Configuration)



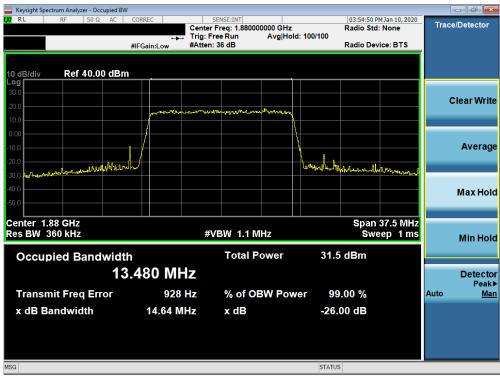
Plot 7-72. Occupied Bandwidth Plot (Band 2 - 10.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager	
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Keysight Spectrum Analyzer - Occupied BV	1				
XIRL RF 50Ω AC		SENSE:INT	Radio Sto	M Jan 10, 2020 I: None	Trace/Detector
		g: Free Run Avg Hold: ten: 36 dB	Radio De	vice: BTS	
10 dB/div Ref 40.00 dBn	<u>۱</u>				
30.0					Clear Write
20.0	proversion	wholes and a second			Clear write
10.0					
-10.00	/				Average
20.0					Average
-30.0 unander and the grand and and and and and and and and and	~µ/4		Some and the second of the sec	howald	
-40.0					Max Hold
-50.0					
Center 1.88 GHz			Span	37.5 MHz	
Res BW 360 kHz		#VBW 1.1 MHz		eep 1ms	Min Hold
Occupied Bandwidt	h	Total Power	32.2 dBm		
	.456 MHz				Detector
					Peak▶
Transmit Freq Error	15.029 kHz	% of OBW Powe			Auto <u>Man</u>
x dB Bandwidth	14.79 MHz	x dB	-26.00 dB		
MSG			STATUS		

Plot 7-73. Occupied Bandwidth Plot (Band 2 - 15.0MHz QPSK - Full RB Configuration)



Plot 7-74. Occupied Bandwidth Plot (Band 2 - 15.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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CORREC							- 0 ×
Cente	SENSE:INT er Freq: 1.8800000			03:55:00 P Radio Std	MJan 10, 2020 : None	Trace	e/Detector
		Avg Hold:	100/100	Radio Dev	vice: BTS		
Gameon							
						c	lear Writ
or how man and a	www.werterthall.	notra					
							Averag
			A Multin and				
				₽₽₽₽₩₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽₽	Marine Les Mappel		
							Max Hol
	VBW 1.1 MH	z		SWe	eep 1 ms		Min Ho
	Total Pov	wer	30.1	dBm			
497 MHz							Detecto
	% of OPV		- 00	00.9/		Auto	Peak Ma
		v Fowe				Auto	1110
14.79 MHz	x dB		-26.0	JU dB			
			STATUS				
	#FGain:Low #Atte	#FGain:Low #Atten: 36 dB #VBW 1.1 MH Total Por 497 MHz 9.952 kHz % of OB	#FGain:Low #Atten: 36 dB	#FGain:Low #Atten: 36 dB #VBW 1.1 MHz #VBW 1.1 MHz Total Power 30.1 497 MHz 9.952 kHz % of OBW Power 99 14.79 MHz x dB -26.0	##FGain:Low       #Atten: 36 dB       Radio Dev         #VBW 1.1 MHz       Span       Span         #VBW 1.1 MHz       Span       Sve         #497 MHz       99.00 %       99.00 %	#FGain:Low     #Atten: 36 dB     Radio Device: BTS       #UBW     1.1 MHz     Span 37.5 MHz       Sweep 1 ms     Total Power     30.1 dBm       #497 MHz     % of OBW Power     99.00 %       14.79 MHz     x dB     -26.00 dB	#FGain:Low       #Atten: 36 dB       Radio Device: BTS         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten: 36 dB       Image: Atten: 36 dB         Image: Atten: 36 dB       Image: Atten:

Plot 7-75. Occupied Bandwidth Plot (Band 2 - 15.0MHz 64-QAM - Full RB Configuration)



Plot 7-76. Occupied Bandwidth Plot (Band 2 - 15.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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🔤 Keysight Spectrum Analyzer - Occupied BW					
LXIRL RF 50Ω AC		SENSE:INT er Freq: 1.880000000 GHz Free Run Avg Hold:	Radio Std	M Jan 10, 2020 : None	Trace/Detector
		n: 36 dB	Radio Dev	vice: BTS	
10 dB/div Ref 40.00 dBm					
30.0					
20.0		manster and an and an and an			Clear Write
0.00					
-10.0	/	\			Average
-20.0			What have a for the stand of th	In Mallender	
-30.0					
-50.0					Max Hold
Center 1.88 GHz			Spa	n 50 MHz	
Res BW 470 kHz	#	¢VBW 1.5 MHz		eep 1 ms	Min Hold
Occupied Bandwidth	1	Total Power	32.8 dBm		
17	.949 MHz				Detector Peak▶
Transmit Freq Error	3.357 kHz	% of OBW Powe	er 99.00 %		Auto <u>Man</u>
x dB Bandwidth	19.85 MHz	x dB	-26.00 dB		
MSG			STATUS		

Plot 7-77. Occupied Bandwidth Plot (Band 2 - 20.0MHz QPSK - Full RB Configuration)



Plot 7-78. Occupied Bandwidth Plot (Band 2 - 20.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied					
<b>X RL</b> RF 50Ω AC	C	SENSE:INT enter Freq: 1.880000000 GHz	Radio Ste	PM Jan 10, 2020 d: None	Trace/Detector
		ig: Free Run Avg Hold: Atten: 36 dB		vice: BTS	
	an Guin.cow				
10 dB/div Ref 40.00 dl	3m				
- <b>og</b> 30.0					
20.0					Clear Writ
10.0	handhaden	man and a start a start and a start a start and a start			
0.00	/				
10.0					Averag
20.0	N MANANA W		monthermonthermo		
20.0				and the second second	
40.0					Max Hol
-50.0					
Center 1.88 GHz				an 50 MHz	
Res BW 470 kHz		#VBW 1.5 MHz	Sw	eep 1 ms	Min Hol
Occupied Bandwi	dth	Total Power	30.2 dBm		
	7.955 MHz				Detecto
					Peak
Transmit Freq Error	11.704 kHz	% of OBW Powe	r 99.00 %	<i>'</i>	Auto <u>Ma</u>
x dB Bandwidth	20.34 MHz	x dB	-26.00 dB		
SG			STATUS		

Plot 7-79. Occupied Bandwidth Plot (Band 2 - 20.0MHz 64-QAM - Full RB Configuration)



Plot 7-80. Occupied Bandwidth Plot (Band 2 - 20.0MHz 256-QAM - Full RB Configuration)

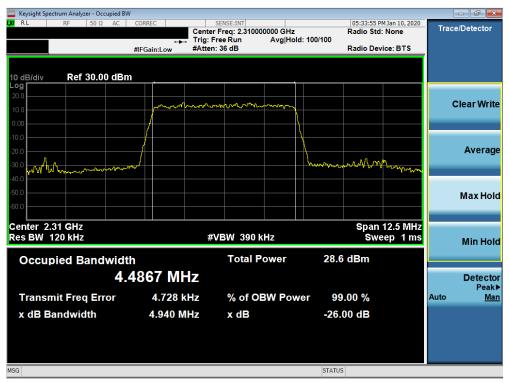
FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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## Band 30



Plot 7-81. Occupied Bandwidth Plot (Band 30 - 5.0MHz QPSK - Full RB Configuration)



#### Plot 7-82. Occupied Bandwidth Plot (Band 30 - 5.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u>PCTEST</u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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🔤 Keysight Spectrum Analyzer - Occupied BW	
X RL RF 50 Ω AC CORREC SENSE:INT 05:34:06 PM Jan	
Center Freq: 2.310000000 GHz Radio Std: Not	ne
#FGain:Low #Atten: 36 dB Radio Device:	BTS
10 dB/div Ref 30.00 dBm	
	Clear Write
-10.0	
-20.0	Average
and a Martin a	
	~mv/\/
-40.0	
-50.0	Max Hold
-60.0	
Center 2.31 GHz Span 12.4	
Res BW 120 kHz #VBW 390 kHz Sweep	1 ms Min Hold
Occupied Bandwidth Total Power 27.8 dBm	
4.5270 MHz	Detector
4.327 U MITIZ	Peak►
Transmit Freq Error -9.509 kHz % of OBW Power 99.00 %	Auto <u>Man</u>
x dB Bandwidth 4.976 MHz x dB -26.00 dB	
MSG STATUS	

Plot 7-83. Occupied Bandwidth Plot (Band 30 - 5.0MHz 64-QAM - Full RB Configuration)



Plot 7-84. Occupied Bandwidth Plot (Band 30 - 5.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW				
CRL RF 50Ω AC	CORREC	SENSE:INT	05:35:27 PM Jan 10, 2020 Radio Std: None	Trace/Detector
		rig: Free Run Avg Hold: 100 Atten: 36 dB		
IO dB/div Ref 30.00 dBm	<u>ا</u>			
20.0	manner	un and a second and a second		Clear Writ
0.00				
20.0 30.0 malaleterran	n the		Δ	Averag
40.0			and the second with the second s	
50.0 60.0				Max Hol
Center 2.31 GHz Res BW 240 kHz		#VBW 750 kHz	Span 25 MHz Sweep 1 ms	Min Hol
Occupied Bandwidt	h	Total Power	29.6 dBm	
9.0	0451 MHz	2		Detecto Peak
Transmit Freq Error	20.649 kH	z % of OBW Power	99.00 %	Auto <u>Ma</u>
x dB Bandwidth	9.762 MH	z x dB	-26.00 dB	
SG			STATUS	

Plot 7-85. Occupied Bandwidth Plot (Band 30 - 10.0MHz QPSK - Full RB Configuration)



Plot 7-86. Occupied Bandwidth Plot (Band 30 - 10.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW							d x
LX/RL RF 50Ω AC	CORREC	SENSE:INT Center Freg: 2.310000000 GI	Hz	05:35:52 PM Radio Std:	1 Jan 10, 2020 None	Trace/D	etector
	#IFGain:Low	Trig: Free Run Avg  #Atten: 36 dB	Hold: 100/100	Radio Devi	ce: BTS		
10 dB/div Ref 30.00 dBm							
Log		annow Provident Contraction and	~~			Cle	ar Write
0.00	-						
-10.0						,	Average
-30.0 ~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~			harrow	Marray and Marray Marray Marray	Whoman		
-50.0						м	ax Hold
Center 2.31 GHz					1 25 MHz		-
Res BW 240 kHz		#VBW 750 kHz Total Power	27	swe 3 dBm	ep 1ms	N	lin Hold
Occupied Bandwidtl 8.	) 9907 MH		21.	JUBII			Detector
Transmit Freq Error	15.408 ki	Hz % of OBW P	ower 9	9.00 %		Auto	Peak▶ <u>Man</u>
x dB Bandwidth	9.881 MI	Hz x dB	-26	.00 dB			
MSG			STATU	JS			

Plot 7-87. Occupied Bandwidth Plot (Band 30 - 10.0MHz 64-QAM - Full RB Configuration)



Plot 7-88. Occupied Bandwidth Plot (Band 30 - 10.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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## Band 41



Plot 7-89. Occupied Bandwidth Plot (Band 41 - 5.0MHz QPSK - Full RB Configuration)



### Plot 7-90. Occupied Bandwidth Plot (Band 41 - 5.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u>PCTEST</u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied B					
XIRL RF 50Ω AC	CORREC	SENSE:INT er Freg: 2.593000000 GHz		52:51 PM Jan 14, 2020 io Std: None	Trace/Detector
NFE	++- Trig:		d: 100/100 Rad	io Device: BTS	
10 dB/div Ref 30.00 dBr	n				
20.0 10.0		mmmmm			Clear Writ
0.00					
20.0 30.0 Marin marine	M		hormon	man halla	Averag
40.0					
-50.0					Max Hol
Center 2.593 GHz Res BW 120 kHz	#	≇VBW 390 kHz	S	pan 12.5 MHz Sweep 1 ms	Min Hol
Occupied Bandwid	th	Total Power	28.1 dB	m	
4.	5116 MHz				Detecto Peak
Transmit Freq Error	-1.510 kHz	% of OBW Pow	ver 99.00	%	Auto <u>Ma</u>
x dB Bandwidth	4.962 MHz	x dB	-26.00 d	В	
SG			STATUS		

Plot 7-91. Occupied Bandwidth Plot (Band 41 - 5.0MHz 64-QAM - Full RB Configuration)



Plot 7-92. Occupied Bandwidth Plot (Band 41 - 5.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW	1				
KL RF 50Ω AC	CORREC	SENSE:INT		1 Jan 14, 2020	Trace/Detector
		ter Freq: 2.593000000 GHz  : Free Run Avg Hold	Radio Std: 00/100	None	
		ten: 36 dB	Radio Devi	ice: BTS	
10 dB/div Ref 30.00 dBm Log					
20.0					
10.0	un man	www.whentherstrong			Clear Write
0.00					
-10.0					
-20.0			10		Average
-30.0 MMMMMMMMMMMMMMMMMMMMMMMMMMMMMMMMMMM	wW .		^ՠ Ոհետուսնոպորություններ	เกิดหัวหมูกก	
-40.0				Assess Mala	
-50.0					Max Hold
-60.0					
Center 2.593 GHz			0		
Res BW 240 kHz		#VBW 750 kHz		n 25 MHz ep 1 ms	
Res DW 240 RHZ		#VDVV 7JUKHZ	Swe	eprins	Min Hold
Occupied Bandwidt	h	Total Power	28.3 dBm		
			Loto della		
9.	0020 MHz				Detector
	10.050.111				Peak▶
Transmit Freq Error	10.358 kHz	% of OBW Pow	er 99.00 %		Auto <u>Man</u>
x dB Bandwidth	9.859 MHz	x dB	-26.00 dB		
MSG			STATUS		

Plot 7-93. Occupied Bandwidth Plot (Band 41 - 10.0MHz QPSK - Full RB Configuration)



Plot 7-94. Occupied Bandwidth Plot (Band 41 - 10.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW				
X RL RF 50Ω AC		SENSE:INT ter Freq: 2.593000000 GHz : Free Run Avg Hold: 10	05:05:51 PM Jan 14, 2020 Radio Std: None 00/100	Trace/Detector
		en: 36 dB	Radio Device: BTS	
10 dB/div Ref 30.00 dBm				
20.0	منوس محمد مرود م	Lunor The Marthen some youdy		Clear Write
0.00				
10.0				Average
-20.0 mpmanleh.hytherman	~~~~	<u></u>	Manhall barrow Mun Jalashanga	Average
40.0				
60.0				Max Hold
Center 2.593 GHz			Span 25 MHz	
Res BW 240 kHz		#VBW 750 kHz	Sweep 1 ms	Min Hold
Occupied Bandwidtl		Total Power	27.8 dBm	
9.0	048 MHz			Detecto Peak
Transmit Freq Error	5.440 kHz	% of OBW Power	99.00 %	Auto <u>Mar</u>
x dB Bandwidth	9.817 MHz	x dB	-26.00 dB	
sg			STATUS	

Plot 7-95. Occupied Bandwidth Plot (Band 41 - 10.0MHz 64-QAM - Full RB Configuration)



Plot 7-96. Occupied Bandwidth Plot (Band 41 - 10.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied B	W				
XX RL RF 50Ω AC	CORREC	SENSE:INT er Freg: 2.593000000 GHz		PM Jan 14, 2020	Trace/Detector
			Id:>100/100	a: None	
		n: 36 dB	Radio De	vice: BTS	
10 dB/div Ref 30.00 dB	m				
Log					
20.0					Clear Write
10.0	phenol when and a family of the	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~			Clear write
0.00	/				
-10.0					
-20.0			h		Average
	L of The			L. Mrs	, tronugo
Marmar Mar Mary Mary Mary Mar			hallow white and the tolly	$\mathcal{J}^{W}\mathcal{W}^{W}\mathcal{W}^{W}\mathcal{W}$	
-40.0					
-50.0					Max Hold
-60.0					
				07.5 8411	
Center 2.593 GHz Res BW 360 kHz	4	¢VBW 1.1 MHz		37.5 MHz	
Res BW 300 KH2	#		SW	eep 1 ms	Min Hold
Occupied Bandwid	th	Total Power	28.4 dBm		
1	3.545 MHz				Detector
Transmit Freq Error	-11.617 kHz	% of OBW Pov	ver 99.00 %		Peak▶ Auto Man
· · · ·					
x dB Bandwidth	14.76 MHz	x dB	-26.00 dB		
MSG			STATUS		
			JINIO		

Plot 7-97. Occupied Bandwidth Plot (Band 41 - 15.0MHz QPSK - Full RB Configuration)



Plot 7-98. Occupied Bandwidth Plot (Band 41 - 15.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied BW						
KIRE RF 50Ω AC	CORREC	SENSE:INT Center Freg: 2.59300	00000 GHz	05:09:58 Radio Sto	PM Jan 14, 2020 d: None	Trace/Detector
	+→ #IFGain:Low	Trig: Free Run #Atten: 36 dB	Avg Hold: 10		vice: BTS	
10 dB/div Ref 30.00 dBm	•					
20.0						01
10.0	primbino	-Armer New grower washes	man			Clear Wr
0.00						
10.0						Avera
20.0 destranter all the policy and the second	Ment		\		20-21-0-0	Avera
40.0						
50.0						Max Ho
60.0						maxine
Center 2.593 GHz				Span	37.5 MHz	
Res BW 360 kHz		#VBW 1.1 N	/IHz		eep 1ms	Min Ho
Occupied Bandwidt	h	Total F	ower	28.3 dBm		
	.485 MH	7				Detect
						Pea
Transmit Freq Error	2.619 kl		BW Power	99.00 %		Auto <u>M</u>
x dB Bandwidth	14.63 MI	Hz xdB		-26.00 dB		
				STATUS		

Plot 7-99. Occupied Bandwidth Plot (Band 41 - 15.0MHz 64-QAM - Full RB Configuration)



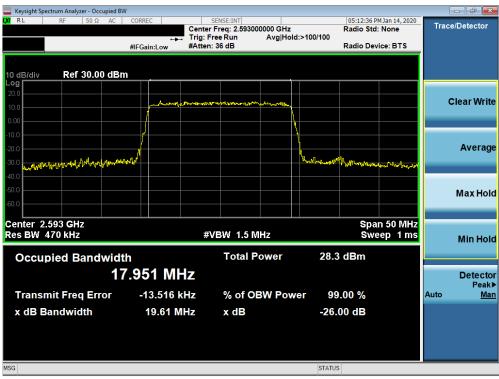
Plot 7-100. Occupied Bandwidth Plot (Band 41 - 15.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u>PCTEST</u></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager	
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Keysight Spectrum Analyzer - Occupied BW	1				
LXIRL RF 50Ω AC		SENSE:INT nter Freq: 2.593000000 GHz g: Free Run Avg Hol	05:12:22   Radio Sto d: 100/100	M Jan 14, 2020 I: None	Trace/Detector
		tten: 36 dB	Radio De	vice: BTS	
10 dB/div Ref 30.00 dBn	1				
20.0	and the second and the	advalant and			Clear Write
0.00			\ \		_
-20.0	A		Un Bry with we White the		Average
-40.0	1.016-		and the second of the factor	n fry Chall North Angel Stand	
-60.0					Max Hold
Center 2.593 GHz Res BW 470 kHz		#VBW 1.5 MHz		an 50 MHz eep 1 ms	Min Hold
Occupied Bandwidt	h	Total Power	28.0 dBm		
	8.001 MHz				Detector Peak
Transmit Freq Error	320 Hz	% of OBW Pow	/er 99.00 %		Auto <u>Mar</u>
x dB Bandwidth	19.45 MHz	x dB	-26.00 dB		
MSG			STATUS		

Plot 7-101. Occupied Bandwidth Plot (Band 41 - 20.0MHz QPSK - Full RB Configuration)



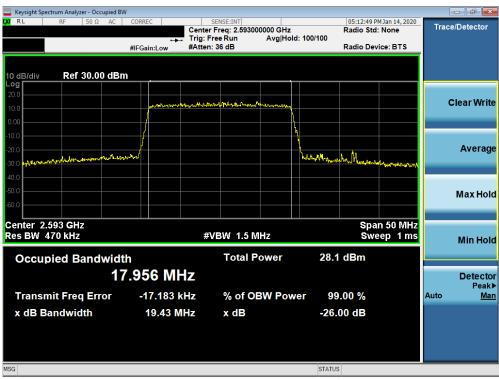
Plot 7-102. Occupied Bandwidth Plot (Band 41 - 20.0MHz 16-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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Keysight Spectrum Analyzer - Occupied	BW			
LX/RL RF 50Ω AC	Cent	SENSE:INT er Freq: 2.593000000 GHz	05:12:44 PM Jan 14 Radio Std: None	
		Free Run Avg Hold:>1 en: 36 dB	Radio Device: B	TS
10 dB/div Ref 30.00 dl	3m			
20.0				Clear Write
10.0	- Alantina Sistematic	and the second and the second		
0.00				
-10.0				Average
-30.0 tarthusser fatter of the work of the said	محموانلابال	\	How and the Manuscrate and the	awlan
-40.0				
-50.0				Max Hold
-60.0				
Center 2.593 GHz			Span 50	
Res BW 470 kHz		#VBW 1.5 MHz	Sweep	1 ms Min Hold
Occupied Bandwig	dth	Total Power	28.2 dBm	
1	7.953 MHz			Detector
Transmit Freq Error	-13.988 kHz	% of OBW Power	99.00 %	Peak▶ Auto Man
x dB Bandwidth	19.68 MHz	x dB	-26.00 dB	
	13.00 1112		-20.00 48	
MSG			STATUS	

Plot 7-103. Occupied Bandwidth Plot (Band 41 - 20.0MHz 64-QAM - Full RB Configuration)



Plot 7-104. Occupied Bandwidth Plot (Band 41 - 20.0MHz 256-QAM - Full RB Configuration)

FCC ID: ZNFV600AM	<u><u><u></u><u>PCTEST</u></u></u>	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager	
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# 7.3 Spurious and Harmonic Emissions at Antenna Terminal

### **Test Overview**

The level of the carrier and the various conducted spurious and harmonic frequencies is measured by means of a calibrated spectrum analyzer. The spectrum is scanned from the lowest frequency generated in the equipment up to a frequency including its 10th harmonic. All out of band emissions are measured with a spectrum analyzer connected to the antenna terminal of the EUT while the EUT is operating at its maximum duty cycle, at maximum power, and at the appropriate frequencies. All data rates were investigated to determine the worst case configuration. All modes of operation were investigated and the worst case configuration results are reported in this section.

The minimum permissible attenuation level of any spurious emission is  $43 + 10 \log_{10}(P_{[Watts]})$ , where P is the transmitter power in Watts.

For Band 30, the minimum permissible attenuation level of any spurious emission <2288MHz and >2365MHz is 70 + 10 log10(P[Watts]).

For Band 41, the minimum permissible attenuation level of any spurious emission is 55 + 10 log₁₀(*P*_[Watts]).

### Test Procedure Used

KDB 971168 D01 v03r01 - Section 6.0

### Test Settings

- 1. Start frequency was set to 30MHz and stop frequency was set to at least 10 * the fundamental frequency (separated into at least two plots per channel)
- 2. Detector = RMS
- 3. Trace mode = trace average for continuous emissions, max hold for pulse emissions
- 4. Sweep time = auto couple
- 5. The trace was allowed to stabilize
- 6. Please see test notes below for RBW and VBW settings

### Test Setup

The EUT and measurement equipment were set up as shown in the diagram below.



Figure 7-2. Test Instrument & Measurement Setup

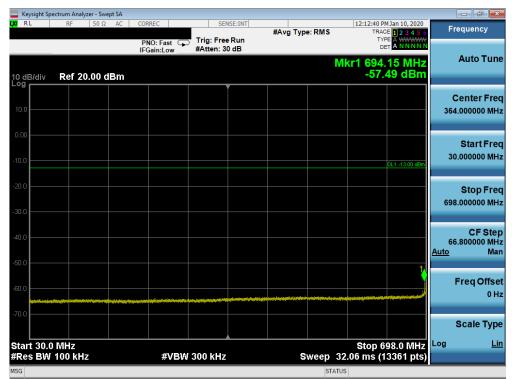
## Test Notes

Compliance with the applicable limits is based on the use of measurement instrumentation employing a resolution bandwidth of 100 kHz or greater for frequencies less than 1 GHz and 1 MHz or greater for frequencies greater than 1 GHz. However, in the 1 MHz bands immediately outside and adjacent to the frequency block a resolution bandwidth of at least one percent of the emission bandwidth of the fundamental emission of the transmitter may be employed. The emission bandwidth is defined as the width of the signal between two points, one below the carrier center frequency and one above the carrier center frequency, outside of which all emission are attenuated at least 26 dB below the transmitter power.

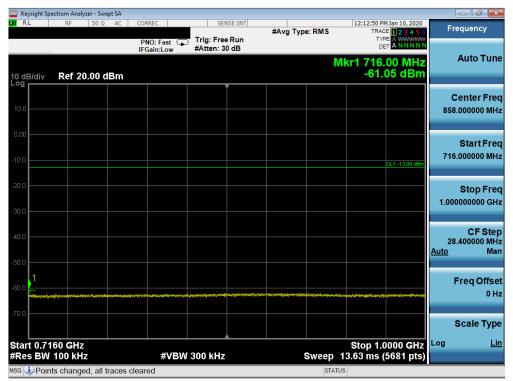
FCC ID: ZNFV600AM	PCTEST	MEASUREMENT REPORT (CERTIFICATION)	💽 LG	Approved by: Quality Manager
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# Band 12



Plot 7-105. Conducted Spurious Plot (Band 12 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Mid Channel)



Plot 7-106. Conducted Spurious Plot (Band 12 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Mid Channel)

FCC ID: ZNFV600AM	PCTEST	MEASUREMENT REPORT (CERTIFICATION)	LG	Approved by: Quality Manager
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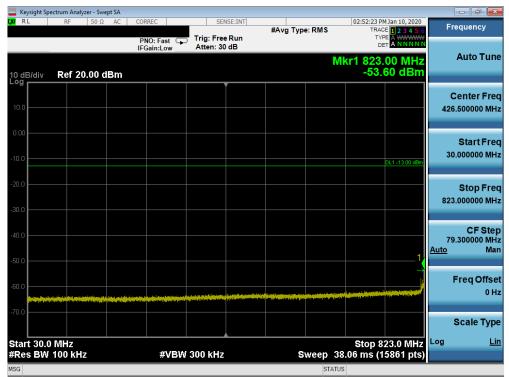
	ight Spec	trum Analyzer					1						
IXI RL		RF	50Ω AC	COR	REC	SEN	ISE:INT	#Avg Typ	e: RMS		MJan 10, 2020 E <b>1 2 3 4 5 6</b>	Fr	equency
					lO: Fast     ⊊ ain:Low	Trig: Free #Atten: 3		• //		rri 6.38			Auto Tune
10 dB/ Log	/div	Ref 0.00	dBm							-44.	56 dBm		
-10.0											DL1 -13.00 dBm		Center Freq
-20.0 -												1.00	Start Freq
-40.0				di mu, kada		و بام	(). Markang tanàng kanalang	1	d a sectoria da segura da segur			10.00	Stop Freq
-50.0				alian ann aite			indicate states are supply and		in via de difficienti de la de de de la de de la de de la de de la de de de la de de la de de la de de de de de	ili i , and many and a star and a	formation of the other states of the other		CF Step
-70.0												900 <u>Auto</u>	.000000 MHz Man
-80.0												I	Freq Offset 0 Hz
-90.0													Scale Type
Start #Res		GHz .0 MHz			#VBV	V 3.0 MHz		s	weep 1	Stop 10 5.60 ms (1	.000 GHz 8001 pts)	Log	<u>Lin</u>
MSG 🤳	Points	changed;	all trace	es cleare	ed				STATU				

Plot 7-107. Conducted Spurious Plot (Band 12 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Mid Channel)

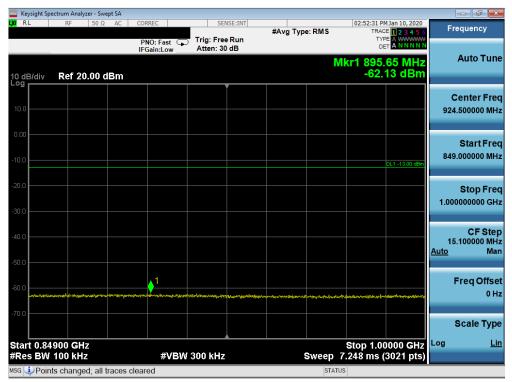
FCC ID: ZNFV600AM	<u><i>CPCTEST</i></u>	MEASUREMENT REPORT (CERTIFICATION)	Approved by: Quality Manager
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# Band 5



Plot 7-108. Conducted Spurious Plot (Band 5 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Low Channel)



Plot 7-109. Conducted Spurious Plot (Band 5 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Low Channel)

FCC ID: ZNFV600AM	PCTEST	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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	ectrum Analyzei	- Swept SA								- 6 -
L <mark>XI</mark> RL	RF	50 Ω AC	CORREC	SEN	ISE:INT	#Avg Typ	e: RMS		M Jan 10, 2020 E <b>1 2 3 4 5 6</b>	Frequency
			PNO: Fast IFGain:Low	Trig: Free Atten: 36		•		TYF		
			II Gam.Low	,			Μ	lkr1 6.90	6 0 GHz	Auto Tune
10 dB/div	Ref 25.0	00 dBm						-38.	53 dBm	
				) Y						Center Freq
15.0										5.50000000 GHz
5.00										Start Freq
5.00										1.000000000 GHz
-5.00										
-15.0									DL1 -13.00 dBm	Stop Frog
										Stop Freq 10.00000000 GHz
-25.0										
						. 1				CF Step
-35.0					فيلور بيتأثير والنفر					900.000000 MHz
-45.0	Charles and the second s			Constanting of the second	and a phone	a contraction of the state	and the second second		The state of the state	<u>Auto</u> Man
and the second second										Eren Offent
-55.0										Freq Offset 0 Hz
										0112
-65.0										Scale Type
Start 1.00 #Res BW			#\/B\A	3.0 MHz			woon 1	Stop 10	.000 0112	Log <u>Lin</u>
#Res DW	F.U WIHZ		#VDV	-3.0 MHZ		5	STAT	5.60 ms (1	800 F pts)	
							SIAI			

Plot 7-110. Conducted Spurious Plot (Band 5 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Low Channel)



Plot 7-111. Conducted Spurious Plot (Band 5 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Mid Channel)

FCC ID: ZNFV600AM	PCTEST	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager	
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		zer - Swept SA									d ×
L <mark>XI</mark> RL	RF	50 Ω AC	CORREC	SEN	ISE:INT	#Avg Typ	e RMS		I Jan 10, 2020	Frequ	ency
			PNO: Fast IFGain:Low	Trig: Free Atten: 30		#/ <b>19</b> - <b>)</b> -		TYP DE		Au	to Tune
10 dB/div Log	Ref 20	).00 dBm						lkr1 882. -62.	55 MHz 18 dBm		
										Cen	ter Freq
10.0										924.500	000 MHz
0.00											
-10.0											art Freq 000 MHz
-10.0									DL1 -13.00 dBm		
-20.0										St	op Freq
-30.0										1.000000	0000 GHz
											CF Step
-40.0											000 MHz Man
-50.0											Wall
-60.0		1								Fre	q Offset
******	iter to a first the state of the	hall all the states and states and	<u> </u>	gan fransiska af fry Lanastan	ad ^{lad} her (Me ⁿ erinau)	p ⁴ 44-124 ²⁴ -144-144-144-144-144-144-144-144-144-1	terbrativeljeviterovi	en produce de la présidente de la seconda de la second	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~		0 Hz
-70.0										Sca	le Type
Start 0.84	1000 CH							Stop 1-00	000 GHz		Lin
#Res BW			#VE	3W 300 kHz			Sweep	7.248 ms (	3021 pts)		
мsg 🗼 Роіг	nts change	ed; all traces c	leared				STATU	IS			

Plot 7-112. Conducted Spurious Plot (Band 5 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Mid Channel)



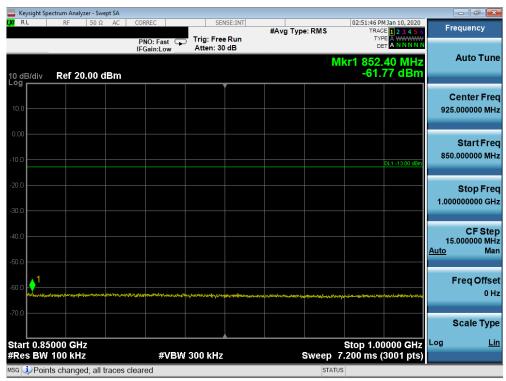
Plot 7-113. Conducted Spurious Plot (Band 5 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - Mid Channel)

FCC ID: ZNFV600AM	PCTEST	MEASUREMENT REPORT (CERTIFICATION)	🕒 LG	Approved by: Quality Manager
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PRL         RF         SO Q. AC         CORREC         SENSE:NT         D0251340 PM Jan 10, 2020         Frequency           PNO: Fast         Trig: Free Run Heain:Low         Trig: Free Run Atten: 30 dB         Trig: Free Run Atten: 30 dB         Trig: Free Run Atten: 30 dB         Trig: Free Run Heain:Low         Trig: Free Run Atten: 30 dB         <		🔤 Keysight Spectrum Analyzer - Swept SA 👘 💼 🛃														
PNO: Fast (FGain:Low)       Trig: Free Run Atten: 30 dB       Mkr1 797.00 MHzz -60.92 dBm       Auto Tune         0 d B/div       Ref 20.00 dBm       Center Freq 427.000000 MHz       Center Freq 427.000000 MHz       Start Freq 30.000000 MHz         0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d       0 d <t< td=""><td>L<mark>XI</mark>RL</td><td>L</td><td>RF</td><td>50 Ω</td><td>AC</td><td>CORREC</td><td></td><td>SEN</td><td>ISE:INT</td><td>#Ava Tvr</td><td>e RMS</td><td></td><td></td><td></td><td>Fr</td><td>equency</td></t<>	L <mark>XI</mark> RL	L	RF	50 Ω	AC	CORREC		SEN	ISE:INT	#Ava Tvr	e RMS				Fr	equency
Log       Image: Control multiple         100       Image: Control multiple         000       Image: Control multiple         000       Image: Control multiple         100       Image: Control multiple         200	40 dF	144	Po	20.00/	IRm							Mki	TYF DE r1 797.			Auto Tune
100       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1       1	Log	3/div	Rei	20.00	авт								-00.			
100       Start Freq         200       0.11-13.00 dem         200       0.11-13.00 dem         30.000000 MHz         4000         4000         4000         4000         4000         4000         4000         40000         40000         40000         40000         40000         40000         40000         40000         40000         40000         40000         40000         40000         40000         400000         400000         400000         400000         400000         400000         400000         4000000         4000000         4000000         4000000         40000000         4000	10.0 -															
200       Image: Constraint of the state of															30	•
Start 30.0 MHz														DL1 -13.00 dBm		Stop Freq
-4000       79.400000 MHz         -5000       -4000         -6000       -400000 MHz         -7000       -400000 MHz         Start 30.0 MHz       Stop 824.0 MHz	-30.0														824	
-60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0 -60.0																.400000 MHz
-70.0 Scale Type Start 30.0 MHz Stop 824.0 MHz										nationalization allocations	. J. Juny, Scientifi da J		and the second states of the	1		
Scale Type Start 30.0 MHz Stop 824.0 MHz				in a state of the second s				10.10.000	والمتعدية ساعاته	the Millipson of the second	and the second second	والمرابل	No. of the local division of the local divis			
Gtart 50.0 Miliz	-70.0 +															Scale Type
#VBW J00 knz 3weep 38.11 ms (13881 pts)							#\/R\M	300 642			woop	30-1	Stop 8	24.0 10112	Log	Lin
MSG STATUS	MSG	5 0 0 0	100	M112				500 KHZ					T III5 (I	566 F pts)		

Plot 7-114. Conducted Spurious Plot (Band 5 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - High Channel)



Plot 7-115. Conducted Spurious Plot (Band 5 - 10.0MHz QPSK - RB Size 1, RB Offset 0 - High Channel)

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