






TEST REPORT

<p>KCTL KCTL Inc. 65, Sinwon-ro, Yeongtong-gu, Suwon-si, Gyeonggi-do, 16677, Korea TEL: 82-31-285-0894 FAX: 82-505-299-8311 www.kctl.co.kr</p>	<p>Report No.: KR20-SRF0261 Page (1) of (329)</p>	
<p>1. Client</p>		
<p>◦ Name : Samsung Electronics Co., Ltd. ◦ Address : 129, Samsung-ro, Yeongtong-gu, Suwon-si, Gyeonggi-do, 16677, Rep. of Korea ◦ Date of Receipt : 2020-08-31</p>		
<p>2. Use of Report : Certification</p>		
<p>3. Name of Product / Model : Tablet PC / SM-T577U/DS</p>		
<p>4. Manufacturer / Country of Origin : Samsung Electronics Co., Ltd. / Vietnam</p>		
<p>5. FCC ID : A3LSMT577U</p>		
<p>6. IC Certificate No. : 649E-SMT577U</p>		
<p>6. Date of Test : 2020-07-14 to 2020-09-28</p>		
<p>7. Location of Test : <input checked="" type="checkbox"/> Permanent Testing Lab <input type="checkbox"/> On Site Testing (Address: Address of testing location)</p>		
<p>8. Test method used : FCC Part 2 / RSS-Gen Issue 5 FCC Part 22 subpart H / RSS-132 Issue 3 FCC Part 24 subpart E / RSS-133 Issue 6 FCC Part 27 subpart C / RSS-130 Issue 2, RSS-139 Issue 3, RSS-199 Issue 3</p>		
<p>9. Test Results : Refer to the test result in the test report</p>		
<p>Affirmation</p>	<p>Tested by Name : Taeyoung Kim </p>	<p>Technical Manager Name : Seungyong Kim </p>
<p>2020-10-06</p>		
<p>KCTL Inc.</p>		
<p>As a test result of the sample which was submitted from the client, this report does not guarantee the whole product quality. This test report should not be used and copied without a written agreement by KCTL Inc.</p>		

REPORT REVISION HISTORY

Date	Revision	Page No
2020-10-06	Originally issued	-

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General remarks for test reports

Nothing significant to report.

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1. General information

Client : Samsung Electronics Co., Ltd.
Address : 129, Samsung-ro, Yeongtong-gu, Suwon-si, Gyeonggi-do, 16677,
Rep. of Korea
Manufacturer : Samsung Electronics Co., Ltd.
Address : 129, Samsung-ro, Yeongtong-gu, Suwon-si, Gyeonggi-do, 16677,
Rep. of Korea
Factory : Samsung Electronics Vietnam Thai Nguyen Co., Ltd (SEVT)
Address : Yen binh Industrial Park, Dong Tien Ward, Pho Yen Town Thai Nguyen
Province, Vietnam
Laboratory : KCTL Inc.
Address : 65, Sinwon-ro, Yeongtong-gu, Suwon-si, Gyeonggi-do, 16677, Korea
Accreditations : FCC Site Designation No: KR0040, FCC Site Registration No: 687132
VCCI Registration No. : R-20080, G-20078, C-20059, T-20056
Industry Canada Registration No. : 8035A
KOLAS No.: KT231

2. Device information

Equipment under test : Tablet PC
Model : SM-T577U/DS
Modulation technique : Bluetooth(BDR/EDR)_GFSK, $\pi/4$ DQPSK, 8DPSK
Bluetooth(BLE)_GFSK
WIFI(802.11a/b/g/n/ac/ax)_DSSS, OFDM, OFDMA
NFC_ASK
LTE_QPSK, 16QAM, 64QAM
WCDMA_QPSK
Number of channels : Bluetooth(BDR/EDR)_79 ch / Bluetooth(BLE)_40 ch
802.11b/g/n/ac/ax_HT20/VHT20/HE20 : 11 ch
UNII-1: 4 ch (20 MHz), 2 ch (40 MHz), 1 ch (80 MHz)
UNII-2A: 4 ch (20 MHz), 2 ch (40 MHz), 1 ch (80 MHz)
UNII-2C: 12 ch (20 MHz), 6 ch (40 MHz), 3 ch (80 MHz)
UNII-3: 5 ch (20 MHz), 2 ch (40 MHz), 1 ch (80 MHz)
NFC: 1 ch
Power source : DC 3.85 V
Antenna specification : LTE/WCDMA_LDS carrier Antenna
WIFI/Bluetooth(BDR/EDR/BLE)_LDS carrier Antenna
NFC_FPCB Antenna

Antenna gain	: WIFI/Bluetooth(BDR/EDR/BLE): ANT 1: -2.50 dBi, ANT 2: -2.50 dBi UNII-1 ANT 1: -3.20 dBi, ANT 2: -3.70 dBi UNII-2A ANT 1: -3.20 dBi, ANT 2: -3.80 dBi UNII-2C ANT 1: -6.20 dBi, ANT 2: -6.70 dBi UNII-3 ANT 1: -6.50 dBi, ANT 2: -6.40 dBi
Frequency range	: Bluetooth(BDR/EDR/BLE)_2 402 MHz ~ 2 480 MHz 2 412 MHz ~ 2 462 MHz (802.11b/g/n/ac/ax_HT20/VHT20/HE20) UNII-1: 5 180 MHz ~ 5 240 MHz (802.11a/n/ac/ax_HT20/VHT20/HE20) UNII-1: 5 190 MHz ~ 5 230 MHz (802.11n/ac/ax_HT40/VHT40/HE40) UNII-1: 5 210 MHz (802.11ac/ax_VHT80/HE80) UNII-2A: 5 260 MHz ~ 5 320 MHz (802.11a/n/ac/ax_HT20/VHT20/HE20) UNII-2A: 5 270 MHz ~ 5 310 MHz (802.11n/ac/ax_HT40/VHT40/HE40) UNII-2A: 5 290 MHz (802.11ac/ax_VHT80/HE80) UNII-2C: 5 500 MHz ~ 5 720 MHz (802.11a/n/ac/ax_HT20/VHT20/HE20) UNII-2C: 5 510 MHz ~ 5 710 MHz (802.11n/ac/ax_HT40/VHT40/HE40) UNII-2C: 5 530 MHz ~ 5 690 MHz (802.11ac/ax_VHT80/HE80) UNII-3: 5 745 MHz ~ 5 825 MHz (802.11a/n/ac/ax_HT20/VHT20/HE20) UNII-3: 5 755 MHz ~ 5 795 MHz (802.11n/ac/ax_HT40/VHT40/HE40) UNII-3: 5 775 MHz (802.11ac/ax_VHT80/HE80) LTE Band 2_1 850.7 MHz ~ 1 909.3 MHz LTE Band 4_1 710.7 MHz ~ 1 754.3 MHz LTE Band 5_824.7 MHz ~ 848.3 MHz LTE Band 7_2 502.5 MHz ~ 2 567.5 MHz LTE Band 12_699.7 MHz ~ 715.3 MHz LTE Band 13_779.5 MHz ~ 784.5 MHz LTE Band 14_790.5 MHz ~ 795.5 MHz LTE Band 17_706.5 MHz ~ 713.5 MHz LTE Band 25_1 850.7 MHz ~ 1 914.3 MHz LTE Band 26_824.7 MHz ~ 848.3 MHz, 814.7 MHz ~ 823.3 MHz LTE Band 41_2 498.5 MHz ~ 2 687.5 MHz (FCC) LTE Band 41_2 502.5 MHz ~ 2 687.5 MHz (IC) LTE Band 66_1 710.7 MHz ~ 1 779.3 MHz LTE Band 71_665.5 MHz ~ 695.5 MHz WCDMA 850_826.4 MHz ~ 846.6 MHz WCDMA 1700_1 712.4 MHz ~ 1 752.6 MHz WCDMA 1900_1 852.4 MHz ~ 1 907.6 MHz NFC_13.56 MHz
Software version	: T577U.001
Hardware version	: REV1.0
Test device serial No.	: Conducted(R32N400L08B, R32N601A7WX) Radiated(R32N400KG2R, R32N400KG4Z, R32N601AB7T)
Operation temperature	: -30 °C ~ 50 °C

2.1. Accessory information

Equipment	Manufacturer	Model	Serial No.	Power source	FCC ID
Travel Adapter	SOLU-M	EP-TA200	R37M12L1AC1 HM3	Input : 100-240V, 50-60Hz (0.5A) Output : 9.0V, 1.67A or 5.0V, 2.0A	-
Data Cable	RFTECH	EP-DT725BBE	-	-	-
External Earphone	ALMUS	EHS64AVF BE	-	-	-
Protective Cover	WILLTECH VINA	GH98-45810A	-	-	-
S-Pen	WACOM	CP-913W-00B	-	-	-

2.2. Frequency/channel operations

This device contains the following capabilities:

WiFi (802.11a/b/g/n/ac/ax), Bluetooth (BDR/EDR/BLE), NFC,
LTE Band 2, LTE Band 4, LTE Band 5, LTE Band 7, LTE Band 12, LTE Band 13, LTE Band 14, LTE Band 17, LTE Band 25, LTE Band 26, LTE Band 29 (Downlink only), LTE Band 41(PC2, PC3), LTE Band 66, LTE Band 71, WCDMA 850, WCDMA 1700, WCDMA 1900

LTE Band 2

Ch.	Frequency (MHz)
18607	1 850.7
18900	1 880.0
19193	1 909.3

Table 2.2.1. 1.4M BW

Ch.	Frequency (MHz)
18615	1 851.5
18900	1 880.0
19185	1 908.5

Table 2.2.2. 3M BW

Ch.	Frequency (MHz)
18625	1 852.5
18900	1 880.0
19175	1 907.5

Table 2.2.3. 5M BW

Ch.	Frequency (MHz)
18650	1 855.0
18900	1 880.0
19150	1 905.0

Table 2.2.4. 10M BW

Ch.	Frequency (MHz)
18675	1 857.5
18900	1 880.0
19125	1 902.5

Table 2.2.5. 15M BW

Ch.	Frequency (MHz)
18700	1 860.0
18900	1 880.0
19100	1 900.0

Table 2.2.6. 20M BW

LTE Band 4

Ch.	Frequency (MHz)
19957	1 710.7
20175	1 732.5
20393	1 754.3

Table 2.2.7. 1.4M BW

Ch.	Frequency (MHz)
19965	1 711.5
20175	1 732.5
20385	1 753.5

Table 2.2.8. 3M BW

Ch.	Frequency (MHz)
19975	1 712.5
20175	1 732.5
20375	1 752.5

Table 2.2.9. 5M BW

Ch.	Frequency (MHz)
20000	1 715.0
20175	1 732.5
20350	1 750.0

Table 2.2.10. 10M BW

Ch.	Frequency (MHz)
20025	1 717.5
20175	1 732.5
20325	1 747.5

Table 2.2.11. 15M BW

Ch.	Frequency (MHz)
20050	1 720.0
20175	1 732.5
20300	1 745.0

Table 2.2.12. 20M BW

LTE Band 5

Ch.	Frequency (MHz)
20407	824.7
20525	836.5
20643	848.3

Table 2.2.13. 1.4M BW

Ch.	Frequency (MHz)
20415	825.5
20525	836.5
20635	847.5

Table 2.2.14. 3M BW

Ch.	Frequency (MHz)
20425	826.5
20525	836.5
20625	846.5

Table 2.2.15. 5M BW

Ch.	Frequency (MHz)
20450	829.0
20525	836.5
20600	844.0

Table 2.2.16. 10M BW

LTE Band 7

Ch.	Frequency (MHz)
20775	2 502.5
21100	2 535.0
21425	2 567.5

Table 2.2.17. 5M BW

Ch.	Frequency (MHz)
20800	2 505.0
21100	2 535.0
21400	2 565.0

Table 2.2.18. 10M BW

Ch.	Frequency (MHz)
20825	2 507.5
21100	2 535.0
21375	2 562.5

Table 2.2.19. 15M BW

Ch.	Frequency (MHz)
20850	2 510.0
21100	2 535.0
21350	2 560.0

Table 2.2.20. 20M BW

LTE Band 12

Ch.	Frequency (MHz)
23017	699.7
23095	707.5
23173	715.3

Table 2.2.21. 1.4M BW

Ch.	Frequency (MHz)
23025	700.5
23095	707.5
23165	714.5

Table 2.2.22. 3M BW

Ch.	Frequency (MHz)
23035	701.5
23095	707.5
23155	713.5

Table 2.2.23. 5M BW

Ch.	Frequency (MHz)
23060	704.0
23095	707.5
23130	711.0

Table 2.2.24. 10M BW

LTE Band 13

Ch.	Frequency (MHz)	Ch.	Frequency (MHz)
23205	779.5	-	-
23230	782.0	23230	782.0
23255	784.5	-	-

Table 2.2.25. 5M BW

Table 2.2.26. 10M BW

LTE Band 17

Ch.	Frequency (MHz)	Ch.	Frequency (MHz)
23755	706.5	23780	709.0
23790	710.0	23790	710.0
23825	713.5	23800	711.0

Table 2.2.27. 5M BW

Table 2.2.28. 10M BW

LTE Band 25

Ch.	Frequency (MHz)	Ch.	Frequency (MHz)	Ch.	Frequency (MHz)
26047	1 850.7	26055	1 851.5	26065	1 852.5
26365	1 882.5	26365	1 882.5	26365	1 882.5
26683	1 914.3	26675	1 913.5	26665	1 912.5

Table 2.3.29. 1.4M BW

Table 2.3.30. 3M BW

Table 2.3.31. 5M BW

Ch.	Frequency (MHz)	Ch.	Frequency (MHz)	Ch.	Frequency (MHz)
26090	1 855.0	26115	1 857.5	26140	1 860.0
26365	1 882.5	26365	1 882.5	26365	1 882.5
26640	1 910.0	26615	1 907.5	26590	1 905.0

Table 2.3.32. 10M BW

Table 2.3.33. 15M BW

Table 2.3.34. 20M BW

LTE Band 26

Ch.	Frequency (MHz)
26797	824.7
26915	836.5
27033	848.3

Table 2.3.35. 1.4M BW

Ch.	Frequency (MHz)
26805	825.5
26915	836.5
27025	847.5

Table 2.3.36. 3M BW

Ch.	Frequency (MHz)
26815	826.5
26915	836.5
27015	846.5

Table 2.3.37. 5M BW

Ch.	Frequency (MHz)
26840	829.0
26915	836.5
26990	844.0

Table 2.3.38. 10M BW

Ch.	Frequency (MHz)
26865	831.5
26915	836.5
26965	841.5

Table 2.3.39. 15M BW

LTE Band 41 (FCC)

Ch.	Frequency (MHz)
39675	2 498.5
40620	2 593.0
41565	2 687.5

Table 2.2.40. 5M BW

Ch.	Frequency (MHz)
39700	2 501.0
40620	2 593.0
41540	2 685.0

Table 2.2.41. 10M BW

Ch.	Frequency (MHz)
39725	2 503.5
40620	2 593.0
41515	2 682.5

Table 2.2.42. 15M BW

Ch.	Frequency (MHz)
39750	2 506.0
40620	2 593.0
41490	2 680.0

Table 2.2.43. 20M BW

LTE Band 41 (IC)

Ch.	Frequency (MHz)
39715	2 502.5
40620	2 593.0
41565	2 687.5

Table 2.2.44. 5M BW

Ch.	Frequency (MHz)
39740	2 505.0
40620	2 593.0
41540	2 685.0

Table 2.2.45. 10M BW

Ch.	Frequency (MHz)
39765	2 507.5
40620	2 593.0
41515	2 682.5

Table 2.2.46. 15M BW

Ch.	Frequency (MHz)
39790	2 510.0
40620	2 593.0
41490	2 680.0

Table 2.2.47. 20M BW

LTE Band 66

Ch.	Frequency (MHz)
131979	1 710.7
132322	1 745.0
132665	1 779.3

Table 2.2.48. 1.4M BW

Ch.	Frequency (MHz)
131987	1 711.5
132322	1 745.0
132657	1 778.5

Table 2.2.49. 3M BW

Ch.	Frequency (MHz)
131997	1 712.5
132322	1 745.0
132647	1 777.5

Table 2.2.50. 5M BW

Ch.	Frequency (MHz)
132022	1 715.0
132322	1 745.0
132622	1 775.0

Table 2.2.51. 10M BW

Ch.	Frequency (MHz)
132047	1 717.5
132322	1 745.0
132597	1 772.5

Table 2.2.52. 15M BW

Ch.	Frequency (MHz)
132072	1 720.0
132322	1 745.0
132572	1 770.0

Table 2.2.53. 20M BW

LTE Band 71

Ch.	Frequency (MHz)
133147	665.5
133297	680.5
133447	695.5

Table 2.3.54. 5M BW

Ch.	Frequency (MHz)
133172	668.0
133297	680.5
133422	693.0

Table 2.3.55. 10M BW

Ch.	Frequency (MHz)
133197	670.5
133297	680.5
133397	690.5

Table 2.3.56. 15M BW

Ch.	Frequency (MHz)
133222	673.0
133297	680.5
133372	688.0

Table 2.3.57. 20M BW

Notes:

1. LTE Band 66(1 710 - 1 780 MHz) overlaps the entire frequency range of LTE Band 4(1 710 - 1 755 MHz) and they have same maximum tune-up power. Therefore, test data provided in this report covers Band 4 as well as Band 66 subpart to Part27.
2. LTE Band 12(698 - 716 MHz) overlaps the entire frequency range of LTE Band 17(704 - 716 MHz) and they have same maximum tune-up power. Therefore, test data provided in this report covers Band 17 as well as Band 12 subpart to Part27.
3. LTE Band 25(1 850 - 1 915 MHz) overlaps the entire frequency range of LTE Band 2(1 850 - 1 910 MHz) and they have same maximum tune-up power. Therefore, test data provided in this report covers Band 2 as well as Band 25 subpart to Part24.
4. LTE Bnad 41(PC2) is not supported in Canada.
5. As for 814 - 824 MHz, the lower band (814 - 824 MHz) of Band 26 is not supported in Canada.

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3. Introduction

This report referenced from the FCC ID : A3LSMT575 PCE WWAN (FCC CFR 47 Part 22, 24, 27). And the applicant takes full responsibility that the test data as referenced in this report represent compliance for this FCC ID.

3.1 Difference

The FCC ID: A3LSMT577U shares the same enclosure and circuit board as FCC ID: A3LSMT575. The WIFI/BT/BLE/NFC/WCDMA/LTE antenna and surrounding circuitry and layout are identical between these two units.

As for all bands, they have been verified and the parent model test results under FCC ID : A3LSMT575 shall remain representative of FCC ID : A3LSMT577U.

Note. The Product equality letter includes detailed information about the differences between FCC ID: A3LSMT575 and FCC ID: A3LSMT577U.

3.2 Spot check verification data (Band-edge & Spurious emission)

Test band	Test item	Test mode	Channel	Measured frequency (MHz)	SM-T575	SM-577U/DS	Deviation (dB)	(dB)
LTE Bnad 5	ERP	QPSK_10M	20450	829.0	22.66	22.35	-0.31	-
	RSE	QPSK_10M	20525	2 509.82	-46.70	-52.00	-5.30	3 Harmonic
LTE Bnad 12	ERP	QPSK_3M	23165	714.50	22.28	19.51	-2.77	-
	RSE	QPSK_3M	23025	2 097.64	-50.40	-51.00	-0.60	3 Harmonic
LTE Bnad 13	ERP	QPSK_10M	23230	782.0	20.65	19.91	-0.74	-
	RSE	QPSK_10M	23230	1 572.82	-56.80	-57.20	-0.40	2 Harmonic
LTE Bnad 41 (PC3)	ERIP	QPSK_15M	40620	2 593.0	25.22	23.53	-1.69	-
	RSE	QPSK_15M	41515	8 048.00	-46.80	-54.90	-8.10	3 Harmonic
LTE Bnad 66	EIRP	QPSK_3M	132322	1 745.0	23.98	24.45	0.47	-
	RSE	QPSK_3M	132322	5 235.69	-48.50	-50.60	-2.10	3 Harmonic

Notes:

- For FCC ID: A3LSMT577U has been verified the performance as for PCB WWAN identical with the FCC ID: A3LSMT575.
- Comparison of two models, upper deviation is within 3 dB range and all test results are under FCC technical limits.
- The test procedure(s) in this report were performed in accordance as following.
 - ◆ KDB 484596 D01 v01

3.3 Reference Detail

Reference application that contains the reused reference data in the individual test reports.

Equipment Class	Reference FCC ID	Application Type	Reference Test report Number	Exhibit Type	Variant Test Report Number	Date Re-used
DTS	A3LSMT575	Original	KP20-SRF0209 (802.11b/g/n/ac)	Test report	KR20-SRF0255	All
			KP20-SRF0214 (802.11ax)	Test report	KR20-SRF0256	All
			KP20-SRF0208 (Bluetooth LE)	Test report	KR20-SRF0253	All
DSS	A3LSMT575	Original	KP20-SRF0207 (Bluetooth)	Test report	KR20-SRF0252	All
NII	A3LSMT575	Original	KP20-SRF0210 (802.11a/n/ac)	Test report	KR20-SRF0257	All
			KP20-SRF0215 (802.11ax)	Test report	KR20-SRF0258	All
			KR20-SRF0216 (DFS)	Test report	KR20-SRF0259	All
DXX	A3LSMT575	Original	KP20-SRF0211 (NFC)	Test report	KR20-SRF0254	All
PCB	A3LSMT575	Original	KP20-SRF0212 (2G, 3G)	Test report	KR20-SRF0260	Partial
			KP20-SRF0213 (LTE)	Test report	KR20-SRF0261	Partial

For this application the data reuse is summarized below for each equipment class

Equipment Class	Reference FCC ID	Application Type	Test Item	Data Re-used
DTS	A3LSMT575	Original	WLAN (802.11b/g/n/ac)	All
			WLAN (802.11ax)	All
			Bluetooth LE	All
DSS	A3LSMT575	Original	Bluetooth	All
NII	A3LSMT575	Original	WLAN (802.11a/n/ac)	All
			WLAN (802.11ax)	All
			WLAN (DFS)	All
DXX	A3LSMT575	Original	NFC	All
PCB	A3LSMT575	Original	2G, 3G	All except for 2G
			LTE	Band 66, Band 12, Band 5, Band 13, LTE 41(PC3)

4. Maximum ERP/EIRP power**LTE Band 5**

Mode	Tx frequency (MHz)	Emission designator	ERP	
			Max. power (dBm)	Max. power (W)
LTE Band 5	824.7 ~ 848.3	1M10G7D	21.86	0.153
		1M10W7D	20.76	0.119
	825.5 ~ 847.5	2M71G7D	21.81	0.152
		2M72W7D	21.17	0.131
	826.5 ~ 846.5	4M56G7D	22.23	0.167
		4M57W7D	21.34	0.136
	829.0 ~ 844.0	9M07G7D	22.66	0.185
		9M09W7D	21.75	0.150

LTE Band 7

Mode	Tx frequency (MHz)	Emission designator	EIRP	
			Max. power (dBm)	Max. power (W)
LTE Band 7	2 502.5 ~ 2 567.5	4M52G7D	23.83	0.242
		4M56W7D	22.97	0.198
	2 505.0 ~ 2 565.0	9M04G7D	24.09	0.256
		9M04W7D	22.94	0.197
	2 507.5 ~ 2 562.5	13M5G7D	23.98	0.250
		13M5W7D	23.04	0.201
	2 510.0 ~ 2 560.0	18M1G7D	23.71	0.235
		18M1W7D	23.05	0.202

LTE Band 12/17

Mode	Tx frequency (MHz)	Emission designator	ERP	
			Max. power (dBm)	Max. power (W)
LTE Band 12	699.7 ~ 715.3	1M10G7D	22.12	0.163
		1M10W7D	21.27	0.134
	700.5 ~ 714.5	2M71G7D	22.28	0.169
		2M71W7D	21.38	0.137
LTE Band 12/17	701.5 ~ 713.5	4M56G7D	22.21	0.166
		4M55W7D	21.60	0.145
	704.0 ~ 711.0	9M04G7D	22.13	0.163
		9M09W7D	21.33	0.136

LTE Band 13

Mode	Tx frequency (MHz)	Emission designator	ERP	
			Max. power (dBm)	Max. power (W)
LTE Band 13	779.5 ~ 784.5	4M52G7D	20.62	0.115
		4M55W7D	19.47	0.089
	782.0	8M94G7D	20.65	0.116
		8M99W7D	19.65	0.092

LTE Band 25/2

Mode	Tx frequency (MHz)	Emission designator	EIRP	
			Max. power (dBm)	Max. power (W)
LTE Band 25/2	1 850.7 ~ 1 914.3	1M11G7D	24.28	0.268
		1M10W7D	23.30	0.214
	1 851.5 ~ 1 913.5	2M71G7D	24.28	0.268
		2M71W7D	23.36	0.217
	1 852.5 ~ 1 912.5	4M53G7D	24.32	0.270
		4M55W7D	23.40	0.219
	1 855.0 ~ 1 910.0	9M02G7D	24.29	0.269
		9M04W7D	23.27	0.212
	1 857.5 ~ 1 907.5	13M5G7D	24.26	0.267
		13M5W7D	23.32	0.215
	1 860.0 ~ 1 905.0	18M1G7D	24.11	0.258
		18M1W7D	23.41	0.219

LTE Band 26

Mode	Tx frequency (MHz)	Emission designator	ERP (FCC)		EIRP (IC)	
			Max. power (dBm)	Max. power (W)	Max. power (dBm)	Max. power (W)
LTE Band 26	824.7 ~ 848.3	1M10G7D	22.00	0.158	24.15	0.260
		1M10W7D	20.91	0.123	23.06	0.202
	825.5 ~ 847.5	2M73G7D	22.04	0.160	24.19	0.262
		2M73W7D	21.51	0.142	23.66	0.232
	826.5 ~ 846.5	4M53G7D	22.41	0.174	24.56	0.286
		4M55W7D	21.28	0.134	23.43	0.220
	829.0 ~ 844.0	8M99G7D	22.52	0.179	24.67	0.293
		8M99W7D	21.56	0.143	23.71	0.235
	831.5 ~ 841.5	13M5G7D	22.68	0.185	24.83	0.304
		13M5W7D	21.92	0.156	24.07	0.255

LTE Band 41(PC2)

Mode	Tx frequency (MHz)	Emission designator	EIRP	
			Max. power (dBm)	Max. power (W)
LTE Band 41(FCC)	2 498.5 ~ 2 687.5	4M53G7D	25.85	0.385
		4M53W7D	24.12	0.258
	2 501.0 ~ 2 685.0	8M99G7D	27.40	0.550
		9M09W7D	24.22	0.264
	2 503.5 ~ 2 682.5	13M5G7D	24.47	0.280
		13M5W7D	24.65	0.292
	2 506.0 ~ 2 680.0	18M1G7D	25.10	0.324
		18M1W7D	23.95	0.248

LTE Band 41(PC3)

Mode	Tx frequency (MHz)	Emission designator	EIRP	
			Max. power (dBm)	Max. power (W)
LTE Band41 (FCC/IC)	2 498.5 ~ 2 687.5	4M55G7D	25.09	0.323
		4M55W7D	21.67	0.147
	2 501.0 ~ 2 685.0	9M04G7D	24.20	0.263
		9M04W7D	21.90	0.155
	2 503.5 ~ 2 682.5	13M5G7D	25.22	0.333
		13M5W7D	24.14	0.259
	2 506.0 ~ 2 680.0	18M1G7D	23.70	0.234
		18M0W7D	21.50	0.141

LTE Band 41(PC3 IC Low channel)

Mode	Tx frequency (MHz)	Emission designator	EIRP	
			Max. power (dBm)	Max. power (W)
LTE Band 41(IC)	2 502.5	4M52G7D	23.84	0.242
		4M52W7D	22.79	0.190
	2 505.0	9M04G7D	23.52	0.225
		9M02W7D	22.99	0.199
	2 507.5	13M5G7D	23.66	0.232
		13M5W7D	22.71	0.187
	2 510.0	18M1G7D	23.75	0.237
		18M0W7D	22.61	0.182

LTE Band 66/4

Mode	Tx frequency (MHz)	Emission designator	EIRP	
			Max. power (dBm)	Max. power (W)
LTE Band 66/4	1 710.7 ~ 1 779.3	1M11G7D	23.88	0.244
		1M10W7D	22.97	0.198
	1 711.5 ~ 1 778.5	2M73G7D	23.98	0.250
		2M71W7D	23.02	0.200
	1 712.5 ~ 1 777.5	4M57G7D	23.92	0.247
		4M53W7D	22.94	0.197
	1 715.0 ~ 1 775.0	9M04G7D	23.79	0.239
		9M07W7D	22.68	0.185
	1 717.5 ~ 1 772.5	13M5G7D	23.77	0.238
		13M5W7D	23.02	0.200
	1 720.0 ~ 1 770.0	18M1G7D	23.67	0.233
		18M2W7D	22.63	0.183

LTE Band 71

Mode	Tx frequency (MHz)	Emission designator	ERP	
			Max. power (dBm)	Max. power (W)
LTE Band 71	665.5 ~ 695.5	4M53G7D	17.92	0.062
		4M57W7D	16.80	0.048
	668.0 ~ 693.0	9M04G7D	17.80	0.060
		9M04W7D	16.74	0.047
	670.5 ~ 690.5	13M5G7D	17.72	0.059
		13M5W7D	16.80	0.048
	673.0 ~ 688.0	18M0G7D	17.61	0.058
		18M0W7D	16.82	0.048

5. Summary of tests

FCC Part section(s)	RSS Section(s)	Parameter	Test Limit	Test Condition	Test results
2.1046	RSS-130(4.6) RSS-132(5.4) RSS-133(4.1) RSS-139(4.1)	Conducted Output Power	N/A	Conducted	Pass
2.1049	RSS-Gen(6.7) RSS-132(2.3)	Occupied Bandwidth & 26 dB Bandwidth	N/A		Pass
2.1051 22.917(a) 24.238(a) 27.53(c),(f),(g),(h),(m)	RSS-130(4.7) RSS-132(5.5) RSS-133(6.5) RSS-139(6.6) RSS-199(4.5)	Band Edge Emissions at Antenna Terminal	<43 + 10Log ₁₀ (P) dB for all out of band emissions, <65 + 10Log ₁₀ (P) dB		Pass
		Spurious Emissions at Antenna Terminal			Pass
24.232(d) 27.50(d)(5)	RSS-133(6.4) RSS-139(6.5) RSS-199(4.4)	Peak to Average Power Ratio	< 13 dB		Pass
2.1055 22.355	RSS-132(5.3) RSS-133(6.3)	Frequency stability	< 2.5 ppm		Pass
24.235	RSS-130(4.5)		Emission must remain in band		
27.54	RSS-139(6.4) RSS-199(4.3)				
22.913(a)(5)	RSS-132(5.4)	Effective Radiated Power	< 7 Watts max. ERP (FCC) <11.5 Watts max. EIRP (IC)	Radiated	Pass
27.50(b)(10) 27.50(c)(10)	RSS-130(4.6)		< 3 Watts max. ERP		Pass
24.232(c) 27.50(h)(2)	RSS-133(6.4) RSS-199(4.4)	Equivalent Isotropic Radiated Power	< 2 Watts max. EIRP		Pass
27.50(h)(2)	RSS-139(6.5)		< 1 Watts max. EIRP		Pass
2.1053 22.917(a) 24.238(a) 27.53(c),(f),(g),(h),(m)	RSS-130(4.7) RSS-132(5.5) RSS-133(6.5) RSS-139(6.6) RSS-199(4.5)	Radiated Spurious Emissions	<43 + 10Log ₁₀ (P) dB for all out of band emissions, <-70 dBW/MHz EIRP - Wideband <-80 dBW/MHz EIRP- Narrowband		Pass

Notes:

- The test procedure(s) in this report were performed in accordance as following.
 - ANSI C63.26-2015
 - ANSI/TIA-603-E-2016
 - KDB 971168 D01 v03r01

5.1. Worst case orientation

1. All modes of operation were investigated and the worst case emissions are reported with the EUT positioning, modulations, RB sizes and offsets, and channel bandwidth configurations in the test data.
2. Output power measurements were measured on QPSK, 16QAM and 64QAM Modulation. All tests except output power was performed with QPSK and 16QAM modulation.
3. All final radiated testing was performed with the EUT in worst case orientation.
4. For LTE Band 5, 7, 12/17, 13, 25/2, 26 and 41(PC2, PC3), the fundamental of the EUT was investigated in three orthogonal orientations X, Y and Z. It was determined that **X** orientation was worst-case orientation.
Therefore, all final radiated testing was performed with the EUT in **X** orientation.
5. For LTE Band 66/4, LTE Band 71 the fundamental of the EUT was investigated in three orthogonal orientations X, Y and Z. It was determined that **Y** orientation was worst-case orientation.
Therefore, all final radiated testing was performed with the EUT in **Y** orientation.
6. All the radiated tests have been performed several case.
(Stand-alone, with accessories (earphone, cover, TA etc.))
Worst case : Stand-alone

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Test condition	LTE Band	Modulation	Bandwidth (MHz)	RB size	RB offset
Radiated	B5	QPSK	10	1	0, 25, 49
	B7		10	1	0, 25, 49
	B12/17		3	1	0, 8, 14
	B13		10	1	0, 25, 49
	B25/2		5	1	0, 13, 24
	B26		15	1	0, 38, 74
	B41(PC2)		10	1	0, 25, 49
	B41(PC3)		15	1	0, 38, 74
	B66/4		3	1	0, 8, 14
	B71		5	1	0, 13, 24
Conducted	B5	QPSK 16QAM	1.4, 3, 5, 10	1	0, 5, 14, 24, 49
				Full	0
	B7		5, 10, 15, 20	1	0, 24, 49, 74, 99
				Full	0
	B12/17		1.4, 3, 5, 10	1	0, 5, 14, 24, 49
				Full	0
	B13		5, 10	1	0, 24, 49
				Full	0
	B25/2		1.4, 3, 5, 10, 15, 20	1	0, 5, 14, 24, 49, 74, 99
				Full	0
	B26		1.4, 3, 5, 10, 15	1	0, 5, 14, 24, 49, 74
				Full	0
	B41 (PC2, PC3)		5, 10, 15, 20	1	0, 24, 49, 74, 99
				Full	0
	B66/4		1.4, 3, 5, 10, 15, 20	1	0, 5, 14, 24, 49, 74, 99
				Full	0
B71	5, 10, 15, 20	1	0, 24, 49, 74, 99		
		Full	0		

6. 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 data shown herein 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.

Parameter	Expanded uncertainty (\pm)	
Conducted RF power	1.3 dB	
Conducted spurious emissions	1.3 dB	
Radiated spurious emissions	30 MHz ~ 1 GHz	3.7 dB
	Above 1 GHz	5.7 dB

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7. Measurement results explanation example

Frequency (MHz)	Factor(dB)	Frequency (MHz)	Factor(dB)
30	6.12	11 000	8.19
50	6.13	12 000	7.30
100	6.16	13 000	7.48
200	6.20	14 000	7.37
300	6.23	15 000	7.78
400	6.26	16 000	7.73
500	6.28	17 000	8.00
600	6.29	18 000	7.85
700	6.32	19 000	7.81
800	6.34	20 000	7.94
900	6.38	21 000	7.77
1 000	6.36	22 000	8.34
2 000	6.50	23 000	8.16
3 000	6.58	24 000	8.29
4 000	6.76	25 000	8.05
5 000	6.88	26 000	8.58
6 000	6.90	26 500	8.63
7 000	6.05	27 000	8.40
8 000	5.93	28 000	8.33
9 000	6.50	29 000	8.36
10 000	7.47	30 000	8.72

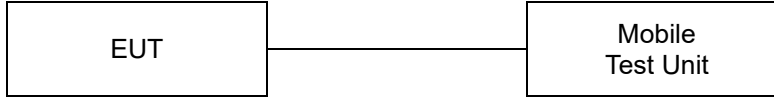
Note.

Offset(dB) = RF cable loss(dB) + Divider(dB)

8. Test results

8.1. Conducted output power

Test setup



Test procedure

971168 D01 v03r01 – Section 5.2
ANSI C63.26-2015 – Section 5.2.4.2
CFR 47, - Section §2.1046

Test settings

When an average power meter is used to perform RF output power measurements, the fundamental condition that measurement be performed only over durations of active transmissions at maximum output power level applies. Thus, an average power meter can always be used to perform the measurement when the EUT can be configured to transmit continuously.

If the EUT cannot be configured to transmit continuously (i.e., burst duty cycle < 98%), then the following options can be implemented to facilitate measurement of the average power with an average power meter:

- a) A gated average power meter can be used to perform the measurement if the gating parameters can be adjusted such that the power is measured only during active transmission bursts at maximum output power levels.
- b) A conventional average power meter with no signal gating capability can also be used if the measured burst duty cycle is constant (i.e., duty cycle variations are less than or equal to $\pm 2\%$) by performing the measurement over the on/off burst cycles and then correcting (increasing) the measured level by a factor equal to $[10\log(1/\text{duty cycle})]$. See 5.2.4.3.4 for guidance with respect to measuring the transmitter duty cycle.

See item r) of 4.1 for more information regarding power meter functional requirements and limitations, and consult the instrumentation-specific application literature for proper set-up and use.

Test results

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 2	1.4	QPSK	1	0	0	23.14	23.49	23.34	
			1	3	0	22.94	23.21	23.07	
			1	5	0	23.11	23.33	23.13	
			3	0	0	23.47	23.61	23.56	
			3	1	0	23.45	23.67	23.57	
			3	3	0	23.47	23.68	23.47	
		6	0	1	22.48	22.71	22.55		
		16QAM	1	0	1	22.67	23.19	22.66	
			1	3	1	22.43	23.19	22.54	
			1	5	1	22.57	23.08	22.57	
			3	0	1	22.36	22.54	22.67	
			3	1	1	22.40	22.65	22.69	
			3	3	1	22.60	22.60	22.62	
		6	0	2	21.57	21.74	21.57		
		64QAM	1	0	2	21.52	21.81	21.67	
			1	3	2	21.43	21.63	21.71	
			1	5	2	21.55	21.81	21.67	
			3	0	2	21.51	21.71	21.67	
	3		1	2	21.52	21.69	21.54		
	3		3	2	21.44	21.68	21.57		
	6	0	3	20.48	20.70	20.55			
	3	QPSK	1	0	0	23.11	23.37	23.25	
			1	8	0	22.94	23.27	23.33	
			1	14	0	22.97	23.30	23.29	
			8	0	1	22.54	22.70	22.72	
			8	4	1	22.54	22.68	22.72	
			8	7	1	22.53	22.73	22.72	
			15	0	1	22.53	22.71	22.72	
			16QAM	1	0	1	22.57	22.92	22.83
				1	8	1	22.46	23.00	22.73
		1		14	1	22.88	22.61	22.90	
		8		0	2	21.57	21.71	21.78	
		8		4	2	21.61	21.76	21.78	
		8		7	2	21.59	21.65	21.72	
		15	0	2	21.56	21.79	21.75		
		64QAM	1	0	2	21.64	21.85	21.86	
			1	8	2	21.56	21.76	21.79	
			1	14	2	21.49	21.71	21.69	
			8	0	3	20.43	20.64	20.65	
	8		4	3	20.50	20.72	20.72		
	8		7	3	20.40	20.68	20.70		
	15	0	3	20.44	20.68	20.67			

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 2	5	QPSK	1	0	0	22.88	23.18	23.16	
			1	12	0	22.91	23.29	23.30	
			1	24	0	23.08	23.30	23.32	
			12	0	1	22.59	22.77	22.80	
			12	7	1	22.57	22.78	22.76	
			12	13	1	22.58	22.75	22.74	
		25	0	1	22.60	22.77	22.76		
		16QAM	1	0	1	22.40	22.96	22.94	
			1	12	1	22.43	23.00	22.62	
			1	24	1	22.63	23.03	22.68	
			12	0	2	21.65	21.83	21.78	
			12	7	2	21.57	21.79	21.78	
			12	13	2	21.56	21.77	21.76	
		25	0	2	21.64	21.75	21.77		
		64QAM	1	0	2	21.52	21.78	21.84	
			1	12	2	21.61	21.93	21.86	
			1	24	2	21.69	21.67	21.75	
			12	0	3	20.52	20.58	20.75	
			12	7	3	20.44	20.64	20.71	
			12	13	3	20.46	20.66	20.73	
		25	0	3	20.54	20.57	20.67		
		10	QPSK	1	0	0	23.13	23.20	23.42
				1	25	0	23.14	23.26	23.43
				1	49	0	23.11	23.20	23.20
	25			0	1	22.65	22.74	22.76	
	25			12	1	22.70	22.78	22.74	
	25			25	1	22.64	22.74	22.74	
	50		0	1	22.70	22.79	22.80		
	16QAM		1	0	1	22.89	23.07	22.76	
			1	25	1	22.76	22.82	22.75	
			1	49	1	22.84	23.09	22.65	
			25	0	2	21.65	21.84	21.75	
			25	12	2	21.74	21.87	21.77	
			25	25	2	21.72	21.79	21.72	
	50		0	2	21.78	21.84	21.82		
	64QAM		1	0	2	21.59	21.66	21.86	
			1	25	2	21.71	21.71	21.92	
			1	49	2	21.67	21.68	21.67	
			25	0	3	20.55	20.64	20.70	
			25	12	3	20.65	20.69	20.79	
			25	25	3	20.57	20.67	20.73	
	50		0	3	20.64	20.65	20.79		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power		
						Frequency (MHz)		
						Low	Middle	High
LTE Band 2	15	QPSK	1	0	0	23.01	23.74	23.31
			1	36	0	23.06	23.27	23.32
			1	74	0	23.05	23.23	23.75
			36	0	1	22.69	22.79	22.86
			36	18	1	22.70	22.81	22.90
			36	37	1	22.67	22.77	22.83
			75	0	1	22.74	22.85	22.91
		16QAM	1	0	1	22.77	22.76	22.91
			1	36	1	22.84	22.85	23.00
			1	74	1	22.75	22.77	22.93
			36	0	2	21.72	21.82	21.84
			36	18	2	21.73	21.84	21.87
			36	37	2	21.64	21.76	21.83
			75	0	2	21.76	21.85	21.84
		64QAM	1	0	2	21.72	21.82	21.89
			1	36	2	21.85	21.89	22.03
			1	74	2	21.71	21.74	21.89
			36	0	3	20.60	20.72	20.83
			36	18	3	20.65	20.71	20.83
			36	37	3	20.64	20.61	20.78
			75	0	3	20.67	20.71	20.87
	20	QPSK	1	0	0	23.12	23.66	23.36
			1	49	0	23.70	23.25	23.82
			1	99	0	23.20	23.26	23.44
			50	0	1	22.70	22.74	22.88
			50	24	1	22.73	22.79	22.95
			50	50	1	22.69	22.74	22.93
			100	0	1	22.79	22.84	22.92
		16QAM	1	0	1	22.78	23.08	23.10
			1	49	1	22.85	23.09	23.17
			1	99	1	22.80	23.07	23.13
			50	0	2	21.69	21.76	21.95
			50	24	2	21.79	21.83	21.95
			50	50	2	21.73	21.73	21.93
			100	0	2	21.81	21.87	22.00
		64QAM	1	0	2	21.57	21.73	21.99
			1	49	2	21.80	21.81	22.11
			1	99	2	21.86	21.82	21.83
			50	0	3	20.63	20.62	20.84
			50	24	3	20.70	20.66	20.87
			50	50	3	20.62	20.65	20.86
			100	0	3	20.67	20.71	20.97

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 4	1.4	QPSK	1	0	0	24.02	23.87	24.00	
			1	3	0	24.01	23.93	23.98	
			1	5	0	23.91	23.87	23.93	
			3	0	0	24.11	24.04	24.09	
			3	1	0	24.16	24.06	24.04	
			3	3	0	24.07	23.94	23.99	
		16QAM	6	0	1	23.12	23.02	23.05	
			1	0	1	23.39	23.37	23.57	
			1	3	1	23.45	23.16	23.42	
			1	5	1	23.27	23.25	23.45	
			3	0	1	23.28	23.15	23.14	
			3	1	1	23.37	23.27	23.17	
		64QAM	3	3	1	23.17	23.33	23.26	
			6	0	2	22.28	22.21	22.35	
			1	0	2	22.39	22.31	22.42	
			1	3	2	22.29	22.18	22.44	
			1	5	2	22.43	22.25	22.34	
			3	0	2	22.36	22.26	22.30	
		3	QPSK	3	1	2	22.39	22.24	22.35
				3	3	2	22.35	22.22	22.38
				6	0	3	21.26	21.15	21.19
				1	0	0	24.00	23.92	23.97
				1	8	0	24.02	23.98	23.99
				1	14	0	23.95	23.88	23.94
	16QAM		8	0	1	23.12	23.02	23.08	
			8	4	1	23.04	22.97	23.03	
			8	7	1	23.06	22.97	23.04	
			15	0	1	23.06	22.97	23.00	
			1	0	1	23.27	23.26	22.99	
			1	8	1	23.33	23.27	23.01	
	64QAM	1	14	1	23.48	23.51	23.23		
		8	0	2	22.37	22.24	22.17		
		8	4	2	22.31	22.20	22.28		
		8	7	2	22.47	22.14	22.29		
		15	0	2	22.39	22.30	22.33		
		1	0	2	22.38	22.35	22.34		
	64QAM	1	8	2	22.46	22.18	22.34		
		1	14	2	22.32	22.18	22.25		
		8	0	3	21.30	21.12	21.30		
		8	4	3	21.30	21.12	21.34		
		8	7	3	21.29	21.09	21.23		
		15	0	3	21.23	21.18	21.19		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 4	5	QPSK	1	0	0	23.90	23.89	23.96	
			1	12	0	24.04	23.91	24.04	
			1	24	0	23.91	23.90	23.95	
			12	0	1	23.13	23.04	23.11	
			12	7	1	23.11	23.02	23.12	
			12	13	1	23.07	23.00	23.07	
		25	0	1	23.09	22.96	23.10		
		16QAM	1	0	1	23.42	23.12	23.56	
			1	12	1	23.50	23.31	23.36	
			1	24	1	23.58	23.36	23.33	
			12	0	2	22.38	22.26	22.32	
			12	7	2	22.35	22.20	22.30	
			12	13	2	22.37	22.21	22.29	
		25	0	2	22.41	22.27	22.37		
		64QAM	1	0	2	22.30	22.14	22.18	
			1	12	2	22.41	22.25	22.47	
			1	24	2	22.40	22.15	22.23	
			12	0	3	21.27	21.18	21.27	
			12	7	3	21.27	21.17	21.25	
			12	13	3	21.31	21.20	21.25	
		25	0	3	21.24	21.23	21.30		
		10	QPSK	1	0	0	23.90	23.84	23.95
				1	25	0	24.04	23.98	24.05
				1	49	0	24.06	23.93	23.98
	25			0	1	23.05	23.01	23.06	
	25			12	1	23.21	22.99	23.08	
	25			25	1	23.17	22.96	23.09	
	50		0	1	23.14	23.05	23.07		
	16QAM		1	0	1	23.73	23.47	23.20	
			1	25	1	23.38	23.39	23.31	
			1	49	1	23.78	23.45	23.10	
			25	0	2	22.39	22.22	22.29	
			25	12	2	22.48	22.35	22.37	
			25	25	2	22.44	22.18	22.31	
	50		0	2	22.53	22.32	22.37		
	64QAM		1	0	2	22.34	22.30	22.23	
			1	25	2	22.38	22.25	22.32	
			1	49	2	22.52	22.20	22.40	
			25	0	3	21.31	21.13	21.24	
			25	12	3	21.38	21.15	21.25	
			25	25	3	21.34	21.10	21.26	
	50		0	3	21.34	21.22	21.29		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 4	15	QPSK	1	0	0	23.95	23.91	24.01	
			1	36	0	24.06	23.93	24.07	
			1	74	0	24.04	23.95	24.10	
			36	0	1	23.12	23.04	23.17	
			36	18	1	23.09	23.01	23.16	
			36	37	1	23.10	23.02	23.08	
			75	0	1	23.24	23.10	23.22	
		16QAM	1	0	1	23.47	23.48	23.43	
			1	36	1	23.57	23.42	23.50	
			1	74	1	23.64	23.41	23.51	
			36	0	2	22.39	22.28	22.34	
			36	18	2	22.40	22.29	22.37	
			36	37	2	22.34	22.22	22.33	
			75	0	2	22.46	22.36	22.42	
		64QAM	1	0	2	22.33	22.23	22.28	
			1	36	2	22.49	22.24	22.49	
			1	74	2	22.37	22.33	22.47	
			36	0	3	21.28	21.16	21.28	
			36	18	3	21.29	21.15	21.36	
			36	37	3	21.27	21.11	21.29	
			75	0	3	21.33	21.18	21.31	
		20	QPSK	1	0	0	24.17	24.11	24.19
				1	49	0	24.28	24.14	24.33
				1	99	0	24.29	24.11	24.31
	50			0	1	23.25	23.14	23.33	
	50			24	1	23.37	23.28	23.39	
	50			50	1	23.33	23.18	23.35	
	100			0	1	23.40	23.27	23.41	
	16QAM		1	0	1	23.53	23.67	23.68	
			1	49	1	23.60	23.69	23.86	
			1	99	1	23.54	23.65	23.82	
			50	0	2	22.63	22.42	22.59	
			50	24	2	22.65	22.53	22.58	
			50	50	2	22.57	22.42	22.60	
			100	0	2	22.66	22.54	22.70	
	64QAM		1	0	2	22.35	22.20	22.30	
			1	49	2	22.55	22.43	22.57	
			1	99	2	22.40	22.37	22.57	
			50	0	3	21.22	21.08	21.22	
			50	24	3	21.32	21.18	21.32	
			50	50	3	21.32	21.11	21.26	
			100	0	3	21.41	21.27	21.34	

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 5	1.4	QPSK	1	0	0	23.36	23.47	23.40	
			1	3	0	23.06	23.12	23.64	
			1	5	0	23.30	23.32	23.29	
			3	0	0	23.28	23.30	23.30	
			3	1	0	23.27	23.35	23.26	
			3	3	0	23.22	23.40	23.28	
		6	0	1	22.26	22.37	22.27		
		16QAM	1	0	1	22.33	22.62	22.45	
			1	3	1	22.01	22.55	22.41	
			1	5	1	22.27	22.46	22.30	
			3	0	1	22.26	22.44	22.41	
			3	1	1	22.32	22.28	22.16	
			3	3	1	22.08	22.26	22.36	
		6	0	2	21.57	21.71	21.68		
		64QAM	1	0	2	21.25	21.45	21.07	
			1	3	2	21.37	21.58	21.29	
			1	5	2	21.43	21.51	21.51	
			3	0	2	21.42	21.59	21.42	
			3	1	2	21.36	21.37	21.46	
			3	3	2	21.33	21.33	21.49	
		6	0	3	20.36	20.62	20.43		
		3	QPSK	1	0	0	23.10	23.24	23.23
				1	8	0	22.91	23.22	23.11
				1	14	0	22.97	23.28	23.13
	8			0	1	22.52	22.65	22.58	
	8			4	1	22.49	22.65	22.62	
	8			7	1	22.48	22.65	22.65	
	15			0	1	22.57	22.71	22.62	
	16QAM			1	0	1	22.69	22.78	22.42
				1	8	1	22.38	23.07	22.29
				1	14	1	22.79	22.81	22.90
				8	0	2	21.63	21.65	21.65
				8	4	2	21.58	21.67	21.62
			8	7	2	21.64	21.59	21.59	
	15		0	2	21.56	21.74	21.63		
	64QAM		1	0	2	21.61	21.61	21.39	
			1	8	2	21.20	21.70	21.35	
			1	14	2	21.27	21.46	21.33	
			8	0	3	20.40	20.43	20.38	
			8	4	3	20.26	20.43	20.39	
			8	7	3	20.38	20.39	20.37	
	15		0	3	20.26	20.37	20.30		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power		
						Frequency (MHz)		
						Low	Middle	High
LTE Band 5	5	QPSK	1	0	0	22.98	23.12	23.07
			1	12	0	23.03	23.19	23.10
			1	24	0	23.10	23.21	23.12
			12	0	1	22.54	22.68	22.59
			12	7	1	22.51	22.65	22.57
			12	13	1	22.46	22.66	22.57
			25	0	1	22.55	22.70	22.61
		16QAM	1	0	1	22.44	22.57	22.63
			1	12	1	22.62	22.63	22.77
			1	24	1	22.54	22.87	22.68
			12	0	2	21.62	21.81	21.72
			12	7	2	21.62	21.76	21.64
			12	13	2	21.58	21.73	21.66
			25	0	2	21.62	21.71	21.64
		64QAM	1	0	2	21.42	21.31	21.38
			1	12	2	21.41	21.59	21.53
			1	24	2	21.44	21.32	21.33
			12	0	3	20.36	20.65	20.43
			12	7	3	20.33	20.50	20.43
			12	13	3	20.18	20.50	20.42
	25		0	3	20.34	20.55	20.40	
	10	QPSK	1	0	0	23.18	23.09	22.97
			1	25	0	23.23	23.53	23.05
			1	49	0	23.18	23.13	23.01
			25	0	1	22.50	22.59	22.45
			25	12	1	22.55	22.64	22.46
			25	25	1	22.53	22.60	22.44
			50	0	1	22.67	22.53	22.55
		16QAM	1	0	1	22.52	22.79	22.36
			1	25	1	22.51	22.87	22.56
			1	49	1	22.74	22.79	22.49
			25	0	2	21.55	21.67	21.53
			25	12	2	21.67	21.80	21.54
			25	25	2	21.64	21.74	21.58
			50	0	2	21.72	21.78	21.59
		64QAM	1	0	2	21.51	21.65	21.30
			1	25	2	21.58	21.54	21.56
			1	49	2	21.56	21.54	21.39
			25	0	3	20.41	20.54	20.23
			25	12	3	20.47	20.49	20.38
25			25	3	20.41	20.41	20.31	
50	0		3	20.32	20.50	20.40		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 7	5	QPSK	1	0	0	22.11	22.16	21.94	
			1	12	0	22.16	22.25	21.99	
			1	24	0	22.23	22.40	22.06	
			12	0	1	21.40	21.43	21.27	
			12	7	1	21.41	21.43	21.27	
			12	13	1	21.39	21.46	21.25	
		25	0	1	21.34	21.44	21.26		
		16QAM	1	0	1	21.44	21.69	21.49	
			1	12	1	21.60	21.46	21.35	
			1	24	1	21.45	21.48	21.29	
			12	0	2	20.36	20.50	20.23	
			12	7	2	20.35	20.40	20.20	
			12	13	2	20.36	20.46	20.20	
		25	0	2	20.40	20.45	20.22		
		64QAM	1	0	2	20.45	20.43	20.00	
			1	12	2	20.73	20.50	20.07	
			1	24	2	20.78	20.29	20.06	
			12	0	3	19.39	19.29	18.75	
			12	7	3	19.52	19.30	18.97	
			12	13	3	19.47	19.25	18.92	
		25	0	3	19.55	19.37	18.99		
		10	QPSK	1	0	0	22.15	22.18	21.91
				1	25	0	22.22	22.29	22.14
				1	49	0	22.26	22.25	22.17
	25			0	1	21.29	21.39	21.15	
	25			12	1	21.39	21.45	21.25	
	25			25	1	21.39	21.42	21.23	
	50			0	1	21.46	21.48	21.26	
	1			0	1	21.27	21.38	21.18	
	1			25	1	21.45	21.38	21.19	
	1			49	1	21.49	21.33	21.44	
	25			0	2	20.38	20.41	20.21	
	25			12	2	20.45	20.45	20.28	
	25		25	2	20.47	20.43	20.27		
	50		0	2	20.46	20.47	20.28		
	16QAM		1	0	2	20.60	20.38	19.86	
			1	25	2	20.81	20.51	20.07	
			1	49	2	20.82	20.44	20.06	
			25	0	3	19.53	19.23	18.75	
			25	12	3	19.50	19.46	19.02	
			25	25	3	19.56	19.33	18.98	
			50	0	3	19.70	19.34	19.12	
			64QAM	1	0	2	20.60	20.38	19.86
				1	25	2	20.81	20.51	20.07
				1	49	2	20.82	20.44	20.06
		25		0	3	19.53	19.23	18.75	
		25		12	3	19.50	19.46	19.02	
	25	25		3	19.56	19.33	18.98		
50	0	3		19.70	19.34	19.12			

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power		
						Frequency (MHz)		
						Low	Middle	High
LTE Band 7	15	QPSK	1	0	0	22.10	22.18	22.01
			1	36	0	22.26	22.30	22.00
			1	74	0	22.24	22.29	22.06
			36	0	1	21.41	21.50	21.30
			36	18	1	21.45	21.52	21.34
			36	37	1	21.40	21.48	21.33
			75	0	1	21.49	21.56	21.40
		16QAM	1	0	1	21.22	21.35	21.27
			1	36	1	21.49	21.58	21.19
			1	74	1	21.42	21.60	21.15
			36	0	2	20.43	20.47	20.25
			36	18	2	20.44	20.54	20.26
			36	37	2	20.42	20.49	20.27
			75	0	2	20.54	20.52	20.34
		64QAM	1	0	2	20.50	20.45	19.91
			1	36	2	20.86	20.37	19.96
			1	74	2	20.84	20.38	20.09
			36	0	3	19.47	19.22	18.82
			36	18	3	19.42	19.46	18.95
			36	37	3	19.49	19.21	18.84
			75	0	3	19.67	19.31	19.01
	20	QPSK	1	0	0	22.56	22.58	22.49
			1	49	0	22.65	22.65	22.51
			1	99	0	22.65	22.68	22.57
			50	0	1	21.67	21.71	21.56
			50	24	1	21.76	21.88	21.66
			50	50	1	21.79	21.82	21.62
			100	0	1	21.69	21.75	21.58
		16QAM	1	0	1	21.69	21.50	21.78
			1	49	1	21.84	21.86	21.85
			1	99	1	21.86	21.78	21.89
			50	0	2	20.88	20.93	20.77
			50	24	2	20.97	20.88	20.84
			50	50	2	20.96	20.91	20.79
			100	0	2	20.93	20.92	20.77
		64QAM	1	0	2	20.69	20.52	20.11
			1	49	2	20.92	20.57	20.20
			1	99	2	20.91	20.54	20.15
			50	0	3	19.58	19.46	18.97
			50	24	3	19.67	19.53	19.15
			50	50	3	19.68	19.43	19.05
			100	0	3	19.75	19.49	19.20

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 12	1.4	QPSK	1	0	0	23.38	23.31	23.48	
			1	3	0	23.20	23.20	23.26	
			1	5	0	23.24	23.26	23.47	
			3	0	0	23.29	23.41	23.46	
			3	1	0	23.31	23.40	23.45	
			3	3	0	23.32	23.45	23.39	
		6	0	1	22.32	22.37	22.45		
		16QAM	1	0	1	22.52	22.63	22.51	
			1	3	1	22.41	22.49	22.15	
			1	5	1	22.47	22.61	22.43	
			3	0	1	22.37	22.65	22.51	
			3	1	1	22.51	22.31	22.54	
			3	3	1	22.41	22.38	22.50	
		6	0	2	21.70	21.77	21.72		
		64QAM	1	0	2	21.78	21.72	21.87	
			1	3	2	21.54	21.83	21.82	
			1	5	2	21.80	21.78	21.97	
			3	0	2	21.79	21.75	21.82	
	3		1	2	21.80	21.71	21.84		
	3		3	2	21.64	21.73	21.88		
	6	0	3	20.61	20.79	20.79			
	3	QPSK	1	0	0	23.26	23.25	23.34	
			1	8	0	23.24	23.28	23.38	
			1	14	0	23.16	23.27	23.35	
			8	0	1	22.67	22.72	22.75	
			8	4	1	22.65	22.70	22.79	
			8	7	1	22.64	22.69	22.72	
			15	0	1	22.64	22.74	22.79	
			16QAM	1	0	1	22.74	22.91	22.72
				1	8	1	22.83	22.90	22.76
		1		14	1	22.65	22.85	22.57	
		8		0	2	21.76	21.59	21.75	
		8		4	2	21.73	21.57	21.87	
		8		7	2	21.73	21.72	21.79	
		15	0	2	21.71	21.73	21.83		
		64QAM	1	0	2	21.77	21.92	21.78	
			1	8	2	21.58	21.46	21.70	
			1	14	2	21.67	21.46	21.73	
			8	0	3	20.67	20.82	20.71	
	8		4	3	20.70	20.86	20.73		
	8		7	3	20.65	20.73	20.67		
	15	0	3	20.70	20.72	20.75			

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 12	5	QPSK	1	0	0	23.21	23.24	23.20	
			1	12	0	23.29	23.22	23.29	
			1	24	0	23.21	23.20	23.30	
			12	0	1	22.70	22.73	22.81	
			12	7	1	22.69	22.71	22.76	
			12	13	1	22.68	22.69	22.75	
		25	0	1	22.66	22.76	22.81		
		16QAM	1	0	1	22.57	22.74	23.02	
			1	12	1	22.94	22.81	22.82	
			1	24	1	22.67	22.86	22.79	
			12	0	2	21.75	21.71	21.86	
			12	7	2	21.69	21.74	21.81	
			12	13	2	21.69	21.70	21.78	
		25	0	2	21.71	21.75	21.83		
		64QAM	1	0	2	21.74	21.78	21.81	
			1	12	2	21.72	21.59	21.65	
			1	24	2	21.65	21.74	21.84	
			12	0	3	20.82	20.77	20.91	
			12	7	3	20.71	20.78	20.84	
			12	13	3	20.67	20.68	20.79	
		25	0	3	20.76	20.76	20.82		
		10	QPSK	1	0	0	23.18	23.14	23.20
				1	25	0	23.17	23.45	23.32
				1	49	0	23.13	23.22	23.27
	25			0	1	22.63	22.65	22.71	
	25			12	1	22.67	22.78	22.81	
	25			25	1	22.66	22.73	22.72	
	50			0	1	22.71	22.76	22.81	
	16QAM			1	0	1	22.79	22.89	22.55
				1	25	1	22.87	22.89	23.01
				1	49	1	23.09	23.01	22.65
				25	0	2	21.67	21.65	21.73
				25	12	2	21.67	21.74	21.76
			25	25	2	21.68	21.69	21.81	
	50		0	2	21.77	21.79	21.87		
	64QAM		1	0	2	21.67	21.46	21.59	
			1	25	2	21.41	21.75	21.78	
			1	49	2	21.65	21.76	21.28	
			25	0	3	20.76	20.71	20.82	
			25	12	3	20.74	20.77	20.70	
			25	25	3	20.70	20.75	20.69	
	50		0	3	20.76	20.72	20.83		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 13	5	QPSK	1	0	0	23.06	23.12	23.10	
			1	12	0	23.14	23.10	23.18	
			1	24	0	23.10	23.16	23.16	
			12	0	1	22.53	22.56	22.60	
			12	7	1	22.53	22.56	22.56	
			12	13	1	22.50	22.53	22.54	
		25	0	1	22.54	22.60	22.64		
		16QAM	1	0	1	22.77	22.66	22.65	
			1	12	1	22.63	22.77	22.66	
			1	24	1	22.88	22.75	22.60	
			12	0	2	21.47	21.57	21.68	
			12	7	2	21.47	21.54	21.65	
			12	13	2	21.43	21.50	21.61	
		25	0	2	21.60	21.57	21.66		
		64QAM	1	0	2	21.49	21.65	21.75	
			1	12	2	21.50	21.68	21.66	
			1	24	2	21.47	21.69	21.64	
			12	0	3	20.48	20.57	20.65	
			12	7	3	20.46	20.62	20.58	
			12	13	3	20.43	20.50	20.59	
		25	0	3	20.55	20.53	20.64		
		10	QPSK	1	0	0	-	22.96	-
				1	25	0	-	23.35	-
				1	49	0	-	22.96	-
	25			0	1	-	22.49	-	
	25			12	1	-	22.65	-	
	25			25	1	-	22.52	-	
	50			0	1	-	22.63	-	
	50			0	1	-	23.05	-	
	16QAM		1	0	1	-	22.71	-	
			1	25	1	-	22.71	-	
			1	49	1	-	22.62	-	
			25	0	2	-	21.55	-	
			25	12	2	-	21.56	-	
			25	25	2	-	21.53	-	
			50	0	2	-	21.65	-	
			50	0	2	-	21.60	-	
	64QAM		1	0	2	-	21.70	-	
			1	25	2	-	21.70	-	
			1	49	2	-	21.58	-	
			25	0	3	-	20.50	-	
			25	12	3	-	20.54	-	
			25	25	3	-	20.45	-	
			50	0	3	-	20.59	-	
			50	0	3	-	20.59	-	

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 17	5	QPSK	1	0	0	23.25	23.24	23.37	
			1	3	0	23.37	23.39	23.35	
			1	5	0	23.27	23.30	23.34	
			3	0	0	22.82	22.79	22.92	
			3	1	0	22.80	22.77	22.87	
			3	3	0	22.78	22.74	22.90	
		16QAM	6	0	1	22.77	22.79	22.90	
			1	0	1	22.72	22.55	22.85	
			1	3	1	22.83	22.93	22.86	
			1	5	1	23.14	22.64	22.84	
			3	0	1	21.81	21.79	21.93	
			3	1	1	21.77	21.80	21.90	
		64QAM	3	3	1	21.75	21.75	21.90	
			6	0	2	21.81	21.77	21.96	
			1	0	2	22.00	21.80	22.00	
			1	12	2	22.00	21.97	22.00	
			1	24	2	22.00	22.06	22.00	
			12	0	3	21.00	20.85	21.00	
			12	7	3	21.00	20.92	21.00	
			12	13	3	21.00	20.84	21.00	
	10	QPSK	25	0	3	21.00	20.88	21.00	
			1	0	0	23.23	23.22	23.27	
			1	8	0	23.48	23.40	23.36	
			1	14	0	23.25	23.27	23.34	
			8	0	1	22.78	22.72	22.81	
			8	4	1	22.80	22.85	22.86	
			8	7	1	22.81	22.76	22.84	
			15	0	1	22.85	22.81	22.90	
			16QAM	1	0	1	23.15	22.93	22.69
				1	8	1	22.90	23.05	22.81
		1		14	1	23.38	22.89	22.77	
		8		0	2	21.74	21.76	21.76	
		8		4	2	21.81	21.80	21.84	
		8		7	2	21.81	21.83	21.81	
		64QAM	15	0	2	21.88	21.84	21.94	
			1	0	2	22.05	21.92	21.62	
			1	25	2	22.03	21.92	21.66	
			1	49	2	22.01	21.95	21.65	
			25	0	3	20.88	20.85	20.55	
			25	12	3	20.95	20.90	20.52	
25	25		3	20.89	20.83	20.53			
50	0		3	20.85	20.80	20.53			

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 25	1.4	QPSK	1	0	0	24.03	24.20	24.07	
			1	3	0	24.14	23.96	24.04	
			1	5	0	24.16	24.19	24.07	
			3	0	0	24.01	24.02	23.94	
			3	1	0	24.03	24.06	23.97	
			3	3	0	23.97	24.09	24.02	
		16QAM	6	0	1	22.80	22.89	23.11	
			1	0	1	22.86	22.92	22.88	
			1	3	1	22.75	22.83	22.90	
			1	5	1	22.71	22.91	22.69	
			3	0	1	23.12	23.08	23.14	
			3	1	1	23.08	23.07	22.93	
		64QAM	3	3	1	23.07	23.08	23.05	
			6	0	2	21.94	22.03	22.04	
			1	0	2	21.97	21.95	21.63	
			1	3	2	21.68	21.99	21.57	
			1	5	2	22.02	21.73	21.54	
			3	0	2	21.76	21.68	21.49	
		3	QPSK	3	1	2	21.68	21.74	21.47
				3	3	2	21.68	21.57	21.43
				6	0	3	20.81	20.81	20.65
				1	0	0	24.09	24.14	24.03
				1	8	0	24.02	24.15	24.11
				1	14	0	23.98	24.15	24.11
	16QAM		8	0	1	23.08	23.06	22.94	
			8	4	1	23.00	23.11	23.17	
			8	7	1	23.06	23.08	22.96	
			15	0	1	22.82	22.88	23.03	
			1	0	1	22.99	23.02	23.14	
			1	8	1	22.89	22.91	22.91	
	64QAM	1	14	1	22.89	22.90	22.97		
		8	0	2	22.07	22.13	22.01		
		8	4	2	22.05	22.13	22.19		
		8	7	2	22.06	22.07	22.17		
		15	0	2	21.94	22.07	22.03		
		1	0	2	21.99	21.83	21.60		
	QPSK	16QAM	1	8	2	21.76	21.99	21.48	
			1	14	2	22.02	21.75	21.55	
			8	0	3	20.83	20.78	20.52	
			8	4	3	20.87	20.72	20.44	
			8	7	3	20.78	20.69	20.47	
			15	0	3	20.68	20.86	20.56	

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 25	5	QPSK	1	0	0	24.11	24.20	24.10	
			1	12	0	24.08	24.02	24.13	
			1	24	0	24.05	24.20	24.01	
			12	0	1	23.11	23.11	22.91	
			12	7	1	23.08	23.09	23.15	
			12	13	1	23.04	23.07	23.14	
		25	0	1	22.89	22.87	22.96		
		16QAM	1	0	1	22.76	22.64	22.69	
			1	12	1	22.95	23.00	22.66	
			1	24	1	22.84	23.12	22.69	
			12	0	2	22.01	22.11	22.03	
			12	7	2	22.03	22.07	22.19	
			12	13	2	21.96	22.03	22.11	
		25	0	2	21.96	21.94	22.07		
		64QAM	1	0	2	21.93	21.90	21.44	
			1	12	2	21.66	21.97	21.43	
			1	24	2	21.99	21.79	21.42	
			12	0	3	20.79	20.73	20.51	
			12	7	3	20.68	20.73	20.47	
			12	13	3	20.83	20.57	20.40	
		25	0	3	20.73	20.84	20.54		
		10	QPSK	1	0	0	24.02	23.97	24.13
				1	25	0	24.08	24.04	24.03
				1	49	0	24.04	24.09	24.01
	25			0	1	23.05	23.04	23.00	
	25			12	1	23.08	23.11	23.11	
	25			25	1	23.05	23.08	23.10	
	50			0	1	22.93	22.93	22.92	
	16QAM			1	0	1	22.92	22.73	22.78
				1	25	1	22.88	23.14	22.90
				1	49	1	22.86	23.08	22.83
				25	0	2	22.04	22.06	22.07
				25	12	2	22.15	22.11	22.14
			25	25	2	22.09	22.10	22.10	
	50		0	2	21.98	22.03	22.02		
	64QAM		1	0	2	21.93	21.84	21.53	
			1	25	2	21.67	21.82	21.45	
			1	49	2	21.99	21.68	21.39	
			25	0	3	20.66	20.68	20.45	
			25	12	3	20.82	20.67	20.53	
			25	25	3	20.67	20.60	20.35	
	50		0	3	20.70	20.81	20.64		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 25	15	QPSK	1	0	0	23.89	24.01	23.96	
			1	36	0	24.06	24.11	24.01	
			1	74	0	24.03	24.12	24.12	
			36	0	1	23.01	23.13	23.18	
			36	18	1	23.03	23.15	23.07	
			36	37	1	22.96	23.10	23.18	
			75	0	1	22.86	23.00	23.05	
		16QAM	1	0	1	22.72	22.60	22.85	
			1	36	1	22.84	22.89	22.88	
			1	74	1	22.88	22.73	22.78	
			36	0	2	21.94	22.12	22.09	
			36	18	2	22.03	22.14	22.14	
			36	37	2	21.96	22.08	22.13	
			75	0	2	21.93	22.07	22.10	
		64QAM	1	0	2	21.87	21.82	21.48	
			1	36	2	21.82	21.79	21.45	
			1	74	2	21.90	21.74	21.46	
			36	0	3	20.66	20.74	20.40	
			36	18	3	20.86	20.79	20.56	
			36	37	3	20.82	20.71	20.39	
			75	0	3	20.80	20.73	20.48	
		20	QPSK	1	0	0	24.25	24.38	24.33
				1	49	0	24.26	24.41	24.37
				1	99	0	24.32	24.36	24.42
	50			0	1	23.18	23.34	23.31	
	50			24	1	23.31	23.31	23.41	
	50			50	1	23.30	23.21	23.33	
	100			0	1	23.14	23.24	23.28	
	1			0	1	23.14	23.05	23.39	
	16QAM		1	49	1	23.17	23.16	23.46	
			1	99	1	23.27	23.06	23.47	
			50	0	2	22.22	22.38	22.40	
			50	24	2	22.31	22.47	22.45	
			50	50	2	22.31	22.42	22.43	
			100	0	2	22.24	22.39	22.40	
			1	0	2	22.12	22.00	21.69	
			1	49	2	21.91	22.04	21.68	
	64QAM		1	99	2	22.07	21.89	21.60	
			50	0	3	20.89	20.84	20.59	
			50	24	3	20.93	20.87	20.68	
			50	50	3	20.91	20.77	20.60	
			100	0	3	20.91	20.93	20.71	

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 26	1.4	QPSK	1	0	0	23.94	23.84	23.76	
			1	3	0	23.59	23.50	23.91	
			1	5	0	23.66	23.67	23.86	
			3	0	0	23.59	23.47	23.60	
			3	1	0	23.43	23.31	23.61	
			3	3	0	23.49	23.34	23.68	
		6	0	1	22.27	22.22	22.47		
		16QAM	1	0	1	22.76	22.67	22.73	
			1	3	1	22.67	22.54	22.47	
			1	5	1	22.47	22.41	22.63	
			3	0	1	22.63	22.56	22.54	
			3	1	1	22.57	22.49	22.54	
			3	3	1	22.57	22.47	22.56	
		6	0	2	21.46	21.39	21.52		
		64QAM	1	0	2	21.59	21.46	21.57	
			1	3	2	22.02	21.98	21.68	
			1	5	2	21.76	21.72	21.51	
			3	0	2	21.80	21.65	21.43	
			3	1	2	21.72	21.66	21.59	
			3	3	2	21.72	21.61	21.55	
		6	0	3	20.63	20.59	20.54		
		3	QPSK	1	0	0	23.93	23.88	23.93
				1	8	0	23.82	23.80	23.90
				1	14	0	23.74	23.74	23.94
	8			0	1	22.84	22.83	22.85	
	8			4	1	22.77	22.76	22.85	
	8			7	1	22.84	22.80	22.88	
	15			0	1	22.68	22.67	22.68	
	16QAM			1	0	1	23.00	23.02	22.96
				1	8	1	22.94	22.96	22.96
				1	14	1	22.84	22.85	22.83
				8	0	2	21.72	21.77	21.78
				8	4	2	21.76	21.72	21.73
			8	7	2	21.73	21.77	21.76	
	15		0	2	21.84	21.84	21.74		
	64QAM		1	0	2	21.64	21.62	21.57	
			1	8	2	21.85	21.87	21.54	
			1	14	2	21.61	21.55	21.40	
			8	0	3	20.48	20.53	20.37	
			8	4	3	20.69	20.72	20.55	
			8	7	3	20.65	20.68	20.60	
			15	0	3	20.57	20.65	20.50	

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 26	5	QPSK	1	0	0	23.77	23.74	23.69	
			1	12	0	23.79	23.74	23.83	
			1	24	0	24.06	24.02	23.89	
			12	0	1	22.75	22.68	22.89	
			12	7	1	22.80	22.77	22.84	
			12	13	1	22.70	22.66	22.80	
		25	0	1	22.47	22.44	22.65		
		16QAM	1	0	1	22.40	22.47	22.54	
			1	12	1	22.66	22.63	22.64	
			1	24	1	22.62	22.58	22.57	
			12	0	2	21.57	21.49	21.75	
			12	7	2	21.58	21.54	21.79	
			12	13	2	21.60	21.53	21.78	
		25	0	2	21.64	21.61	21.72		
		64QAM	1	0	2	21.76	21.70	21.58	
			1	12	2	21.92	21.78	21.66	
			1	24	2	21.61	21.56	21.54	
			12	0	3	20.59	20.58	20.54	
			12	7	3	20.82	20.68	20.43	
			12	13	3	20.71	20.69	20.49	
		25	0	3	20.69	20.59	20.51		
		10	QPSK	1	0	0	23.82	23.85	23.74
				1	25	0	24.16	24.19	23.91
				1	49	0	23.92	23.95	23.93
	25			0	1	22.89	22.92	22.78	
	25			12	1	22.96	22.99	22.84	
	25			25	1	22.90	22.93	22.86	
	50			0	1	22.76	22.79	22.69	
	16QAM			1	0	1	23.07	23.10	22.97
				1	25	1	23.06	23.09	22.96
				1	49	1	22.96	22.99	22.90
				25	0	2	21.78	21.81	21.70
				25	12	2	21.89	21.92	21.74
			25	25	2	21.85	21.88	21.75	
	50		0	2	21.90	21.93	21.76		
	64QAM		1	0	2	21.89	21.96	21.62	
			1	25	2	21.86	22.05	21.49	
			1	49	2	21.75	21.88	21.53	
			25	0	3	20.66	20.71	20.41	
			25	12	3	20.74	20.86	20.60	
			25	25	3	20.73	20.85	20.56	
	50		0	3	20.70	20.81	20.50		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power		
						Frequency (MHz)		
						Low	Middle	High
LTE Band 26	15	QPSK	1	0	0	24.19	24.14	24.15
			1	36	0	24.21	24.19	24.26
			1	74	0	24.29	24.33	24.22
			36	0	1	23.24	23.28	23.21
			36	18	1	23.32	23.28	23.26
			36	37	1	23.25	23.26	23.24
			75	0	1	23.10	23.13	23.09
		16QAM	1	0	1	22.83	23.10	22.91
			1	36	1	22.99	23.11	22.95
			1	74	1	22.91	23.18	23.02
			36	0	2	21.91	21.96	21.89
			36	18	2	21.93	21.98	21.93
			36	37	2	21.90	21.94	21.93
			75	0	2	21.90	22.00	21.94
		64QAM	1	0	2	21.72	21.85	21.72
			1	36	2	21.81	21.86	21.74
			1	74	2	21.73	21.80	21.63
			36	0	3	20.64	20.74	20.59
			36	18	3	20.69	20.71	20.65
			36	37	3	20.68	20.76	20.67
			75	0	3	20.67	20.72	20.68

KCTL

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power			
						Frequency (MHz)			
						Low	Middle	High	
LTE Band 41 (PC2)	5	QPSK	1	0	0	25.26	25.21	25.26	
			1	12	0	25.23	25.23	25.19	
			1	24	0	25.28	25.12	25.46	
			12	0	1	24.84	24.73	24.90	
			12	7	1	24.76	24.73	24.83	
			12	13	1	24.65	24.71	24.85	
		25	0	1	24.91	24.68	24.84		
		16QAM	1	0	1	24.83	25.04	25.22	
			1	12	1	24.82	24.83	25.27	
			1	24	1	24.89	24.85	24.83	
			12	0	2	23.96	23.84	23.77	
			12	7	2	23.87	23.74	23.78	
			12	13	2	23.83	23.69	23.77	
		25	0	2	23.80	23.63	23.85		
		64QAM	1	0	2	23.80	23.21	23.35	
			1	12	2	23.89	23.23	23.40	
			1	24	2	23.94	23.17	23.41	
			12	0	3	22.90	22.21	22.43	
			12	7	3	22.95	22.36	22.33	
			12	13	3	22.83	22.32	22.24	
		25	0	3	22.90	22.36	22.32		
		10	QPSK	1	0	0	25.21	25.10	25.25
				1	25	0	25.26	25.17	25.39
				1	49	0	25.27	25.17	25.23
	25			0	1	24.72	24.67	24.79	
	25			12	1	24.78	24.75	24.81	
	25			25	1	24.79	24.70	24.85	
	50			0	1	24.84	24.75	24.81	
	16QAM			1	0	1	24.88	24.33	24.60
				1	25	1	25.07	24.56	24.91
				1	49	1	24.92	24.67	24.95
				25	0	2	23.78	23.67	23.79
				25	12	2	23.83	23.72	23.79
			25	25	2	23.80	23.71	23.76	
	50		0	2	23.82	23.73	23.84		
	64QAM		1	0	2	23.73	23.35	23.39	
			1	25	2	23.90	23.33	23.38	
			1	49	2	23.99	23.26	23.41	
			25	0	3	22.89	22.29	22.38	
			25	12	3	23.06	22.24	22.37	
			25	25	3	22.84	22.39	22.40	
	50		0	3	22.97	22.44	22.11		

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power		
						Frequency (MHz)		
						Low	Middle	High
LTE Band 41 (PC2)	15	QPSK	1	0	0	25.15	25.02	25.16
			1	36	0	25.19	25.13	25.37
			1	74	0	25.33	25.20	25.33
			36	0	1	24.83	24.74	24.98
			36	18	1	24.85	24.79	25.01
			36	37	1	24.94	24.78	24.91
			75	0	1	24.92	24.78	25.01
		16QAM	1	0	1	24.55	24.55	24.81
			1	36	1	24.72	24.56	24.84
			1	74	1	24.68	24.66	24.91
			36	0	2	23.93	23.70	23.85
			36	18	2	23.82	23.73	23.90
			36	37	2	23.91	23.68	23.91
			75	0	2	23.94	23.73	23.99
		64QAM	1	0	2	23.78	23.36	23.32
			1	36	2	23.92	23.26	23.25
			1	74	2	23.90	23.24	23.26
			36	0	3	22.86	22.16	22.42
			36	18	3	22.87	22.34	22.46
			36	37	3	22.81	22.41	22.32
			75	0	3	22.97	22.37	22.38
	20	QPSK	1	0	0	25.17	24.98	25.20
			1	49	0	25.30	25.12	25.29
			1	99	0	25.32	25.14	25.39
			50	0	1	24.78	24.60	24.79
			50	24	1	24.83	24.72	24.88
			50	50	1	24.84	24.73	24.90
			100	0	1	24.86	24.75	24.88
		16QAM	1	0	1	24.98	24.99	24.48
			1	49	1	25.13	25.12	24.61
			1	99	1	25.16	25.19	24.67
			50	0	2	23.80	23.65	23.73
			50	24	2	23.84	23.75	23.81
			50	50	2	23.80	23.76	23.80
			100	0	2	23.89	23.78	23.87
		64QAM	1	0	2	23.91	23.43	23.51
			1	49	2	24.09	23.41	23.49
			1	99	2	24.09	23.41	23.47
			50	0	3	22.95	22.36	22.45
			50	24	3	23.06	22.48	22.48
			50	50	3	23.05	22.47	22.49
			100	0	3	23.10	22.54	22.41

Test Band	Bandwidth (MHz)	Test mode	RB size	RB offset	MPR	Maximum power				
						Frequency (MHz)				
						Low (FCC)	Low (IC)	Middle	High	
LTE Band 41 (PC3)	5	QPSK	1	0	0	23.43	23.63	23.02	23.67	
			1	12	0	23.41	23.77	23.09	23.63	
			1	24	0	23.51	23.53	23.02	23.71	
			12	0	1	22.91	23.03	22.51	23.18	
			12	7	1	22.90	23.10	22.49	23.13	
			12	13	1	22.80	23.18	22.49	23.06	
		25	0	1	22.81	23.14	22.51	23.13		
		1	0	1	22.64	22.95	22.54	23.05		
		1	12	1	22.71	23.04	22.57	22.99		
		1	24	1	22.91	22.81	22.53	23.14		
		12	0	2	21.82	22.09	21.58	22.09		
		12	7	2	21.77	22.14	21.50	22.15		
		12	13	2	21.69	22.11	21.52	22.18		
		25	0	2	21.88	22.26	21.50	22.27		
		1	0	2	21.68	21.84	21.30	21.84		
		1	12	2	21.89	21.66	21.24	21.60		
		1	24	2	21.87	22.00	21.39	21.79		
		12	0	3	20.75	21.01	20.43	20.83		
		12	7	3	20.78	21.21	20.63	20.89		
		12	13	3	20.85	20.95	20.37	20.76		
		25	0	3	20.89	21.10	20.59	21.07		
		1	0	0	23.36	23.53	23.09	23.64		
		1	25	0	23.30	23.52	23.10	23.60		
		1	49	0	23.41	23.57	23.08	23.77		
	25	0	1	22.85	22.95	22.49	22.98			
	25	12	1	22.84	23.16	22.51	23.08			
	25	25	1	22.77	22.97	22.47	23.04			
	50	0	1	22.81	23.20	22.55	23.10			
	1	0	1	22.74	23.11	22.23	23.01			
	1	25	1	23.05	23.11	22.31	22.94			
	1	49	1	22.98	23.11	22.27	23.06			
	25	0	2	21.94	22.09	21.50	22.07			
	25	12	2	21.90	21.96	21.50	22.00			
	25	25	2	21.91	22.06	21.53	22.16			
	50	0	2	21.80	22.04	21.59	22.07			
	1	0	2	21.52	21.87	21.35	21.88			
	1	25	2	21.66	21.86	21.29	21.61			
	1	49	2	21.77	22.06	21.48	21.72			
	25	0	3	20.52	21.06	20.54	21.01			
	25	12	3	20.69	21.03	20.54	20.81			
	25	25	3	20.89	21.02	20.60	20.97			
	50	0	3	20.76	21.09	20.62	20.97			
	10	10	QPSK	1	0	0	23.36	23.53	23.09	23.64
	1			25	0	23.30	23.52	23.10	23.60	
	1			49	0	23.41	23.57	23.08	23.77	
	25			0	1	22.85	22.95	22.49	22.98	
	25			12	1	22.84	23.16	22.51	23.08	
	25			25	1	22.77	22.97	22.47	23.04	
50	0		1	22.81	23.20	22.55	23.10			
1	0		1	22.74	23.11	22.23	23.01			
1	25		1	23.05	23.11	22.31	22.94			
1	49		1	22.98	23.11	22.27	23.06			
25	0		2	21.94	22.09	21.50	22.07			
25	12		2	21.90	21.96	21.50	22.00			
25	25		2	21.91	22.06	21.53	22.16			
50	0		2	21.80	22.04	21.59	22.07			
1	0		2	21.52	21.87	21.35	21.88			
1	25		2	21.66	21.86	21.29	21.61			
1	49		2	21.77	22.06	21.48	21.72			
25	0		3	20.52	21.06	20.54	21.01			
25	12		3	20.69	21.03	20.54	20.81			
25	25		3	20.89	21.02	20.60	20.97			
50	0		3	20.76	21.09	20.62	20.97			