7 EMISSION LIMITATIONS MEASUREMENT

7.1 Test Equipment

The following test equipment was used during the emission limitations test:

It	tem	Туре	Manufacturer	Model No.	Serial No.	Cal. Date	Cal. Interval
	1.	Spectrum Analyzer	Agilent	N9010A	MY52221182	2021.09.15	1 Year
	2.	Coaxial Cable	WOKEN	SFL402-105F LEX	F02-150819-0 45	2021.03.08	1 Year
	3.	20 dB Attenuator	Mini-Circuits	VAT-20+	001	2021.08.06	1 Year

7.2 Block Diagram of Test Setup

The Same as Section. 5.2.

7.3 Specification Limits (§15.247(d))

In any 100 kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement, provided the transmitter demonstrates compliance with the peak conducted power limits. If the transmitter complies with the conducted power limits based on the use of RMS averaging over a time interval, as permitted under paragraph (b)(3) of this section, the attenuation required under this paragraph shall be 30 dB instead of 20 dB. Attenuation below the general limits specified in §15.209(a) is not required.

In addition, radiated emissions which fall in the restricted bands, as defined in \$15.205(a), must also comply with the radiated emission limits specified in \$15.209(a) (see \$15.205(c)). (%This test result attaching to Section. 3.7)

7.4 Operating Condition of EUT

The switch ON/OFF was used to enable the EUT to change the channel one by one.

7.5 Test Procedure

The transmitter output was connected to the spectrum analyzer.

Establish a reference level by using the following procedure:

a) Set instrument center frequency to DTS channel center frequency.

- b) Set the span to ≥ 1.5 times the DTS bandwidth.
- c) Set the RBW = 100 kHz.
- d) Set the VBW \geq [3 × RBW].
- e) Detector = peak.
- f) Sweep time = auto couple.
- g) Trace mode = max hold.
- h) Allow trace to fully stabilize.

i) Use the peak marker function to determine the maximum PSD level. Note that the channel found to contain the maximum PSD level can be used to establish the reference level. Establish an emission level by using the following procedure:

a) Set the center frequency and span to encompass frequency range to be measured.

- b) Set the RBW = 100 kHz.
- c) Set the VBW \geq [3 × RBW].
- d) Detector = peak.
- e) Sweep time = auto couple.
- f) Trace mode = max hold.
- g) Allow trace to fully stabilize.

h) Use the peak marker function to determine the maximum amplitude level. Ensure that the amplitude of all unwanted emissions outside of the authorized frequency band (excluding restricted frequency bands) is attenuated by at least the minimum requirements specified in 11.11. Report the three highest emissions relative to the limit.

Scan up through 10th harmonic.

The test procedure is defined in ANSI C63.10-2013 (11.11.2 Reference level measurement and 11.11.3 Emission level measurement was used).

7.6 Test Results

PASSED.

The test data was attached in the next pages.

(Test Date: 2021.10.15 Temperature: 23°C Humidity: 51 %)

Modulation	Channel	Frequency (MHz)	Data Page
	1	2412 MHz	P48-P49
802.11b	6	2437 MHz	P50-P51
	11	2462 MHz	P52-P53
	1	2412 MHz	P54-P55
802.11g	6	2437 MHz	P56-P57
	11	2462 MHz	P58-P59
	1	2412 MHz	P60-P61
802.11n20	6	2437 MHz	P62-P63
	11	2462 MHz	P64-P65
	3	2422 MHz	P66-P67
802.11n20	6	2437 MHz	P68-P69
	9	2452 MHz	P70-P71

802.11b CH2412MHz



Reference level



IXI	RF 50	Ω DC		SEN	ISE:INT	A	ALIGN AUTO	10:26:35	PM Oct 15, 2021	Peak Search
Marker 1	14.694847	742371	PNO: Fast IFGain:Low	Trig: Free Atten: 10	e Run I dB	Avg Typ Avg Hold	e: Log-Pwr :>50/50			NextPeak
10 dB/div	Ref Offset 2 Ref 20.00	1 dB dBm					IVI	-53.5	41 dBm	
10.0										Next Pk Right
0.00										
-10.0		2								Next Pk Left
-20.0									-15.67 dBm	Marker Delta
-30.0										Marker Deita
-40.0										Mkr→CF
-50.0			و بالد		بالعام اد.		l de state	يور و فعلو		
-60.0	A STATES AND A STATES	alan an a	and the second secon	al a hair an	a a dan a da	an an a final state of the second	er den geweinen der Ber	h h h h h h h h h h h h h h h h h h h		Mkr→RefLvl
-70.0										More
Start 5.00 #Res BW	0 GHz 100 kHz		#VBW	300 kHz	~		Sweep	Stop 15	.000 GHz (2000 pts)	1 of 2
MSG							STATU	S		

1 11	RE 50.0 DC	SEI	ISEITINT		U IGN AUTO	10.28.02	MOct 15 2021	
Marker 1	1 23.62931465732	9 GHz PNO: Fast Trig: Free	Run	Avg Type Avg Hold:	: Log-Pwr >50/50	TRAC TYP	E 1 2 3 4 5 6 E MWWWW	Peak Search
10 dB/div	Ref Offset 21 dB Ref 20.00 dBm	IFGain:Low Atten: 10	dB		М	kr1 23.6 -50.3	29 GHz 52 dBm	Next Peak
10.0								Next Pk Right
-10.0							-15.67 dBm	Next Pk Left
-20.0								Marker Delta
-40.0					.1	1	Mi ali an	Mkr→CF
-60.0	in Life water for a grade law to a shi s _{in k} i ya waset to wit	an all an	algi tafpisia antij	ni f ^a rdini dan ya 19			Mandal Canadian Canadian	Mkr→RefLvl
Start 15. #Res BW	000 [°] GHz / 100 kHz	#VBW 30 <u>0 kHz</u>			Sweep	Stop 25 956 m <u>s (</u>	.000 GHz 2000 pt <u>s)</u>	More 1 of 2
MSG					STATUS	3		

802.11b CH2437MHz



Reference level



LXI	RF 50 9	2 DC		SEI	NSE:INT		ALIGN AUTO	10:19:22	M Oct 15, 2021	Deak Search
Marker 1	12.183591	79589	B GHz	Trig: Free	Run	Avg Typ Avg Hold	e: Log-Pwr I:>50/50	TRAC	E 1 2 3 4 5 6 E MWWWW	Feak Search
			IFGain:Low	Atten: 10	dB			DE		Next Deak
	Ref Offset 2	1 dB					М	kr1 12.1	84 GHz	NEXTFEAK
10 dB/div Log	Ref 20.00	dBm			1			-00.0		2
10.0										Next PK Right
KALAN										
0.00										
-10.0										Next Pk Left
									-16.25 dBm	8
-20.0						-				
										Marker Delta
-30.0										
40.0										
-40.0										Mkr→CF
-50.0							11			
and south	the second	اير بالورير	a shiele statist a letter	المراجبين والطريب	alter Laughter	يرور والأبطول الاسمان		alan beleville	the second water	
-60.0	an the second	ALL AND A REAL PROPERTY OF	An offer states							Mkr→RefLvl
-70.0										
										More
Start 5.00	0 GHz		^					Stop 15	.000 GHz	1 01 2
#Res BW	100 kHz		#VBW	300 kHz			Sweep	956 ms (2000 pts)	
MSG							STATUS	6		

Marker 1	23.61930965482	7 GHz	Free Run	Avg Type	LIGN AUTO Log-Pwr >50/50	10:21:30 F TRAC	DE 1 2 3 4 5 6 DE M WWWWW	Peak Search
10 dB/div	Ref Offset 21 dB Ref 20.00 dBm	IFGain:Low Atter	n: 10 dB		М	kr1 23.6 -48.8	19 GHz 89 dBm	Next Peak
10.0								Next Pk Right
-10.0							-16.25 dBm	Next Pk Left
-20.0								Marker Delta
-40.0					فالمعدان والمع		alatile to a	Mkr→CF
-60.0	gentettissensetationen alle and and a start and and a start and	يرية ^{شعرين} ة المحمد	an a					Mkr→RefLvl
Start 15.00 #Res BW	00 GHz 100 kHz	#VBW 300 F	(Hz		Sweep	Stop 25 956 m <u>s (</u>	.000 GHz 2000 pt <u>s)</u>	More 1 of 2
MSG					STATUS	6		

802.11b CH2462MHz



Reference level



LXI	RF 5	0Ω DC		SEI	NSE:INT		ALIGN AUTO	10:06:35	PM Oct 15, 2021	Peak Search
Marker 1	10.55277	638819	4 GHZ PNO: Fast	Trig: Free	Run	Avg Hold	:>50/50	TY	PE MWWWW FT P N N N N N	
	Pof Offect	21 48	IFGain:Low	Atten: 10	dB		М	kr1 10.	553 GHz	NextPeak
10 dB/div	Ref 20.0	0 dBm						-54.1	57 dBm	2
10.0										Next PK Right
0.00										
										Next Pk Left
-10.0									-16 10 dBm	
-20.0						-				
										Marker Delta
-30.0						9				
-40.0										Mkr→CF
50.0										
-30.0			مادي محرف والمعرف			at the state state of the		المالية الماري	allow have been	
-60.0	tent for an and the part	and the second second second				a la sulta d	arian animinikat	there will be a set of the set of		Mkr→RefLvi
-70.0										
										More
Start 5.00	0 GHz		~					Stop 15	.000 GHz	1 of 2
#Res BW	100 kHz		#VBW	300 kHz	2		Sweep	956 ms	(2000 pts)	
MSG							STATUS	5		

Mar	ker 1 23.644322161	081 GHz	Avg	ALIGN AUTO	10:07:46 PM Oct 15, 2021 TRACE 1 2 3 4 5 6	Peak Search
		PNO: Fast Frig: Free IFGain:Low Atten: 10	eRun Avg F)dB	101d:>50/50		
	Ref Offset 21 dB			M	(r1 23.644 GHz	NextPeak
10 di Log	3/div Ref 20.00 dBm				-50.771 0.511	2
1284						Next Pk Right
10.0						nowit integra
0.00						
						Next Pk Left
-10.0					-16.10 dBm	
-20.0						
						Marker Delta
-30.0			C.			
-40.0						Mkr→CF
					<mark>⊿</mark> 1	Miki Adi
-50.0	dans to at a miles to a second	and the second shear the second shear and the second of the second shear and the second se	whether whether whether	ality in the main in the	White and a start of the second	
-60.0	and a stand of the					Mkr→RefLvl
-/U.U						More
Star	t 15 000 CHz				Stop 25 000 CH-	1 of 2
#Re	s BW 100 kHz	#VBW 300 kHz		Sweep	956 ms (2000 pts)	
MSG				STATUS		

802.11g CH2412MHz



Reference level



🌉 Agilent Spec	trum Analyzer - Occupied BV	V							
LXI	RF 50 Ω DC		SEN	ISE:INT		ALIGN AUTO	06:36:53	M Oct 09, 2021	Peak Search
Marker 1	12.0500000000	000 GHz	Tria: Free	Run	Avg Type AvalHold:	: Log-Pwr >50/50	TYP	E 1 2 3 4 5 6 MWWWWW	
		IFGain:Low	Atten: 10	dB			DE	P NNNNN	
	B 600 101 10					М	kr1 12.0	50 GHz	Next Peak
10 dB/div	Ref 20.00 dBm						-51.0	69 dBm	
Log									
									New Dis District
10.0									Next PK Right
0.00									
									Next Pk Leff
-10.0									Next 1 K Len
								-13.86 dBm	
-20.0									
									Marker Delta
-30.0									
00.0									
40.0									
-40.0									Mkr→CF
50.0						1			
-50.0									
Mary Call	والمالية المراجع والمتحد والمتحد والمستحد والمالية	ومقامعه إدراجة المقالية الطالبة العليانية المانين	بهادها ويناده وأيته	فألجينها بملجم المبعه والم	an said a shirt of the said of the	Level Brady Apple	A Manual Manage	h-charles and the state	Min Defini
-6U.U									wikr→Rer Lvi
-70.0									
									More
Start 5 00	IN GHZ						Ston 15	000 GHz	1 of 2
#Res BW	100 kHz	#VBW	300 kHz			Sweep	956 ms (2001 pts)	
MSG						STATUS	5		
						0			

🚺 Agil	ent Spectru	ım Analyzer - Oc	cupied BW								
I <mark>XI</mark> Marl	cor 1 1	RF 50			SEN	ISE:INT		ALIGN AUTO	06:40:49 I	PM Oct 09, 2021	Peak Search
Wici i		23104000	000000	PNO: Fast IFGain:Low	Trig: Free Atten: 10	e Run I dB	Avg Hold	:>50/50	TYI Di		NextDeck
10 dE	3/div	Ref Offset 2 Ref 20.00	1 dB dBm					Μ	kr1 23.6 -49.3	640 GHz 06 dBm	NextPeak
10.0											Next Pk Right
0.0											
-10.0											Next Pk Left
-20.0										-13.86 dBm	
-30.0 -											Marker Delta
-40.0											Mkr⇒CE
-50.0						1.11.1	l alst a lad	a har an alasa		induced to be	
-60.0	taber faire be	and a state of the second s	ala la stand		a na						Mkr→RefLvl
-70.0											
Star	t 15.00	0 GH7							Stop 25	.000 GHz	More 1 of 2
#Res	5 BW 1	00 kHz		#VBW	/ 300 kHz			Sweep	956 ms (2001 pts)	
MSG								STATUS	5		

802.11g CH2437MHz



Reference level



🌉 Agilent Spe	ectrum Analyzer - Occupied BW						
<mark>.x</mark> Marker	RF 50 Ω DC 1 12.19000000000	00 GHz		ALIGN AUTO	06:53:36 P TRACI	M Oct 09, 2021	Peak Search
10 dB/div	Ref Offset 21 dB Ref 20.00 dBm	PNO: Fast Figure Ing: Free IFGain:Low Atten: 10	i dB	>50/50 M	kr1 12.1 -52.7	90 GHz 55 dBm	Next Peak
10.0							Next Pk Right
-10.0						-13.94 dBm	Next Pk Left
-20.0							Marker Delta
-40.0				▲1			Mkr→CF
-60.0	and the state of t	aine an	ىرىلىلى ئەلىرىدىلىرەيە ئەرىيە ئەلىرىمە ئەرىيە تەرىپىلىرى ئىلىلى ئەلىرىدىلىرىيە ئەرىيە ئەرىيە ئەرىيە ئەرىيە ئەرىپى	and writers an interest	and a stand and a stand	1	Mkr→RefLv
-70.0	000 GHz				Stop <u>15.</u>	000 GHz	More 1 of 2
#Res BV	V 100 kHz	#VBW 300 kHz		Sweep	956 ms (2	2001 pts)	
MSG				STATUS	5		

Agilent Spectrum Analyzer - Occupied BW					
IX RF 50 Ω DC Marker 1 23 62500000000 1 <td< th=""><th></th><th>NSE:INT Ava Type</th><th>ALIGN AUTO</th><th>06:54:50 PM Oct 09, 2021 TRACE 1 2 3 4 5 6</th><th>Peak Search</th></td<>		NSE:INT Ava Type	ALIGN AUTO	06:54:50 PM Oct 09, 2021 TRACE 1 2 3 4 5 6	Peak Search
Ref Offset 21 dB	PNO: Fast Trig: Free IFGain:Low Atten: 10	e Run AvgiHold: 0 dB	>50/50 Mkr	TYPE MWWWW DET P NNNNN 1 23.625 GHz -50.392 dBm	Next Peak
10.0					Next Pk Right
-10.0				-13.94 dBm	Next Pk Left
-20.0					Marker Delta
-40.0				∮ ¹	Mkr→CF
-60.0	Looper of the second	adipteria plant _{basil} yan <mark>di sisanya adipteria</mark>	Ağışı i Baryatindi İndeysi yaşı	in the second	Mkr→RefLvl
570.0 Start 15.000 GHz #Res BW 100 kHz	#VBW 300 kHz		Sween <u>9</u> 5	top 25.000 GHz	More 1 of 2
MSG			STATUS		

802.11g CH2462MHz



Reference level



🏬 Agil	ent Spectr	rum Analy	zer - Occu	pied BW									
L <mark>XI</mark>		RF	50 Ω	DC			SEI	NSE:INT		ALIGN AUTO	07:00:21	PM Oct 09, 2021	Deak Search
Mar	ker 1	12.31	50000	000000) GHz	— —	nine Engl	- D	Avg Typ	be: Log-Pwr	TRA		reak Scarch
					PNO: Fast	♀ ¦	rig: Free	e Run)dB	Avginoi	a:>50/50	D		
					IFGall.LOW		tetern. re	, ab		_			Next Peak
		Ref O	ffset 21	dB						IVI	Kr1 12.	S15 GHZ	Hoxer out
10 dE	3/div	Ref 2	20.00 d	Bm							-53.0	13 dBm	
													Novt Dk Dight
10.0												II	Next PK Right
0.00												I'	
0.00													
													Next Pk Left
-10.0												-14.41 dBm	
-20.0													
													Marker Delta
-30.0													
-30.0													
-40.0													Mkr→CF
-50.0										$+ \bullet^1$		I)	
					1			unter a contratta a		1	, here a	And all states to the state	
	and the state of t	and the second	بالبوده يهدانا	القهودة إلإمتنا تكتحنه	Carlo and the state of the stat	al a state			a service of the light	the gent we want the sto	AND SHOULD THE		Mkr⊸Refivi
-00.0													
-70.0												II	
													More
									_				1 of 2
Star	5.000	GHZ	_								Stop 1:	0.000 GHz	
#Res	S BW	100 ki	12		#VE	5W 30	U KHZ			Sweep	956 ms	(2001 pts)	
MSG										STATUS	3		

🔟 Agil	ent Spect	rum Analyzer - O	ccupied BW								
<mark>IXI</mark> Mar	kor 1	RF 50			SEI	ISE:INT		ALIGN AUTO	07:01:40 TRA	PM Oct 09, 2021	Peak Search
Mell		Ref Offset:	21 dB	PNO: Fast G	Trig: Free Atten: 10	eRun dB	Avg Hold	>50/50	kr1 23.	595 GHz	Next Peak
10 dE Log	3/div	Ref 20.00) dBm						-50.1	28 aBm	
10.0											Next Pk Right
0.00											
-10.0										-14 41 dBm	Next Pk Left
-20.0 -30.0											Marker Delta
-40.0									↓ ¹		Mkr→CF
-50.0	.				يە ^{ر بى} رىيانىيە بەربار	AND THE REAL	للجع والحاول والمراجلين والماله	- Herbergenstern	ومهامله فالمقاول والم	ahalindayahaha	
-60.0	and a state of the	yddad Tyyl, Bdirydau	alon alon bill a start and a start a st								Mkr→RefLvl
-70.0											
											More 1 of 2
star #Re	s BW	100 GHZ 100 kHz		#VBM	/ 300 kHz			Sween	956 ms	2001 pts)	
MSG								STATUS	5	pto/	

802.11n20 CH2412MHz



Reference level



🌉 Agilent Spectr	um Analyzer - Swept	t SA								_ 0 <u>_ x</u> _
🕅 Marker 1	RF 50 Ω 12.0600000	DC 000000 G	Hz	SEI		Avg Type	ALIGN AUTO : Log-Pwr :>50/50	04:05:28 F TRAC TYF	M Oct 11, 2021 E 1 2 3 4 5 6 E M WWWW	Peak Search
10 dB/div	Ref Offset 21 Ref 21.00 d	dB Bm	Gain:Low	#Atten: 1	0 dB		М	⊳⊧ kr1 12.0 -52.7	60 GHz 85 dBm	Next Peak
11.0										Next Pk Right
-9.00										Next Pk Left
-19.0									-14.56 dBm	Marker Delta
-39.0										Mkr→CF
-49.0 -59.0	Hadden and a star and a star	مرار والرين ركته بس رين	^{ورو} انی <i>اعان اور</i> ارا ^{ی ز} ر	and the second second	anter det the stranger	word g.g. with any strike	1 ////////////////////////////////	^{يور} يام ^ي رارين	in and the factor of the	Mkr→RefLvl
-69.0										More 1 of 2
Start 5.000 #Res BW	O GHZ 100 kHz		#VBW	300 kHz			Sweep	Stop 15 956 ms (.000 GHz 2001 pts)	

🌉 Agilent Spect	rum Analyzer - Swept SA								
Marker 1	RF 50 Ω DC 23.6600000000	00 GHz	SENSE	INT A	AI Vg Type:	IGN AUTO Log-Pwr	04:10:02 TRAC	PM Oct 11, 2021 CE 1 2 3 4 5 6	Peak Search
10 dB/div	Ref Offset 21 dB Ref 21.00 dBm	PNO: Fast 😱 IFGain:Low	Trig: Free R #Atten: 10 d	un A [:] IB	vg Hold:>	50/50 MI	kr1 23.6 -49.8	660 GHz 70 dBm	Next Peak
11.0									Next Pk Right
-9.00									Next Pk Left
-19.0								-14.56 dBm	Marker Delta
-39.0							↓ 1		Mkr→CF
-49.0 -59.0	an a	^{لى رى} مىلەرلىلىنىڭ ئىلىلەردىنىڭ مۇرىلەر يەرىزىن	unandrahi andreketika	Press Hillson & grift of good in	l, ja jast pilotikatikati	kilen og kante som	an a	lu ^{bl} ooglige/utper/tation	Mkr→RefLvl
-69.0 Start 15.0	00 GHz	#\/B\M	200 64-			Swoon	Stop 25	0.000 GHz	More 1 of 2
MSG	TOURNZ	#VBVV	JUU KHZ			STATUS	900 IIIS ((2001 pts)	

802.11n20 CH2437MHz



Reference level



🌉 Agilent Spec	trum Analyzer - Swept SA						
<mark>.x</mark> Marker 1	RF 50 Ω DC	000 GHz	SENSE:INT	ALIGN A	UTO 04:39:46 Pwr TRAG	PM Oct 11, 2021 CE 1 2 3 4 5 6	Peak Search
10 dB/div	Ref Offset 21 dB Ref 21.00 dBn	PNO: Fast 😱 👖 IFGain:Low ##	Atten: 10 dB	Avg Hold:>50/50	Mkr1 12.1 -52.5	190 GHz 65 dBm	Next Peak
11.0							Next Pk Right
-9.00							Next Pk Left
-19.0						-15.21 4001	Marker Delta
-39.0				1_			Mkr→CF
-59.0	kantre a firster in state and a	نيوراغاني الأميريويين المريانية ويوادد	laitean ^{n t} octabel d _{e n} at ^{ha} rdea	rovinger bandler of generative of the Arristop	alhh _{indan} aktiotanyop ^{(kaali} to	riselfindiyi, sepika	Mkr→RefLvl
-69.0 Start 5.00	00 GHz				Stop 15	5.000 GHz	More 1 of 2
#Res BW	100 kHz	#VBW 30	0 kHz	Swe	eep 956 ms	(2001 pts)	
MSG				s	TATUS		

🎩 Agil	ent Spectr	um Analyzer -	Swept SA								
<mark>IXI</mark> Mar	kor 1	RF : 23.5150	50 Ω DC		SEI	ISE:INT		ALIGN AUTO	04:44:01	PM Oct 11, 2021	Peak Search
me		23.3130	0000000	PNO: Fast IFGain:Low	Trig: Free #Atten: 1	eRun 0dB	Avg Hold	:>50/50	TY D		NextPeak
10 dE Log	3/div	Ref Offse Ref 21.0	t 21 dB 10 dBm						-49.7	22 dBm	
11.0											Next Pk Right
1.00											
-9.00											Next Pk Left
-0.00										-15.21 dBm	
-19.0											Marker Delta
-29.0											
-39.0									▲1		Mkr→CF
-49.0	Andrew	- Anter States	Marin Margella	han and the stand of the stand	hwalangesorby	pharic statistics	^{بېل} ىرورلىكىيەلوا ^{ر مۇر} لىرىلىرار	n sy ar an	Lad application	Vincensia linin	
-59.0											Mkr→RefLvi
-69.0											More
Star #Do	t 15.00			#) (D)A				Swoon	Stop 25	.000 GHz	1 of 2
#RC	5 6 7 9	IUU KHZ		#VDV	7 300 KHZ			sweep	900 MIS (200 Ppts)	
								onaroo			

802.11n20 CH2462MHz



Reference level



🌉 Agilent Spec	trum Analyzer -	Swept SA								_ 🖬 🗙
<mark>w</mark> Marker 1	^R 12.3100	50 Ω DC	00 GHz	SEN	NSE:INT	Avg Type	ALIGN AUTO	04:51:02 F	M Oct 11, 2021 E 1 2 3 4 5 6	Peak Search
10 dB/div	Ref Offse Ref 21.(t 21 dB 00 dBm	PNO: Fast 🖵 IFGain:Low	#Atten: 1	odB	Avg Hold:	.>50/50 M	kr1 12.3 -52.3	10 GHz 31 dBm	Next Peak
11.0										Next Pk Right
-9.00									-15.60 dBm	Next Pk Left
-19.0										Marker Delta
-39.0							1			Mkr→CF
-59.0	himatin a second	and the second second	ana	and a second	arthlefaiteraiteland	wreniski wige ver	aine Manipelipau	^{ييلو} يون ^ي بعد ويوندي	entrephasentisenty	Mkr→RefLvl
Start 5.00	10 ĜHz			000 111-			0	Stop 15	.000 GHz	More 1 of 2
#Res BW	TUU KHZ		#VBW	JUU KHZ			Sweep	950 ms (
							UNATUS			

🚺 Agil	ent Spectrum Analyze	r - Swept SA								
l <mark>x</mark> Marl	 ker 1 23 685	50 Ω DC		SEN	ISE:INT		ALIGN AUTO	05:13:55 F	MOct 11, 2021	Peak Search
meur		0000000	PNO: Fast IFGain:Low	Trig: Free #Atten: 1	e Run 0 dB	Avg Hold	>50/50	TYF DE		NextDeals
10 dE	Ref Offs 3/div Ref 21	set 21 dB .00 dBm					Μ	kr1 23.6 -49.4	85 GHz 45 dBm	NextPeak
Log										Next Pk Right
1.00 :										
-9.00										Next Pk Left
-19.0									-15.60 dBm	
-29.0 -										Marker Delta
-39.0										Mkr. CE
-49.0								↓ ¹		WIKI→CF
-59.0	had have been and the second second	Mentra-Jacobert Martin Stration	الاستبلغوم أير للأستحمل فطعوها لمعيد	loson de la desta de de la desta de la La desta de la d	elentre aller na Lig	and the second states	and the second	₩ _r lagio,Istri ^{ne} siada	and the same of the same of the	Mkr→RefLvl
-69.0										
										More 1 of 2
Stari #Res	t 15.000 GHz s BW 100 kHz	2	#VBW	/ 300 kHz			Sweep	Stop 25 956 ms (.000 GHz 2001 pts)	
MSG							STATUS	6		

802.11n40 CH2422MHz



Emission level



Reference level

🗾 Agilent Spectrum Analyzer - Swept SA				_ 🖬 🗾 📈
₩ RF 50Ω DC Marker 1 10.470000000	000 GHz	ALIGN AUTO Avg Type: Log-Pwr Avg Hold:>50/50	05:21:59 PM Oct 11, 2021 TRACE 1 2 3 4 5 6 TYPE M WWWWW	Peak Search
Ref Offset 21 dB	IFGain:Low #Atten: 10 d	MI	_{сет} римим kr1 10.470 GHz -53.768 dBm	Next Peak
11.0				Next Pk Right
-9.00				Next Pk Left
-19.0			-18.62 dBm	Marker Deita
-39.0				Mkr→CF
-49.0	المتعلم والمحالية وال	1 ni,st ^{lansi} oore Weslerholson, oheyderhonsige Utali	ينغيغ المعنية المكالية والمعالية المحاصلة المحاصلة المحاصلة المحاصلة المحاصلة المحاصلة المحاصلة المحاصلة المحاص	Mkr→RefLv
-69.0				More 1 of 2
Start 5.000 GHz #Res BW 100 kHz	#VBW 300 kHz	Sweep status	Stop 15.000 GHz 956 ms (2001 pts)	

🌉 Agilent Spectrum Analyzer - Swept SA				_ 0 _ ×
Marker 1 23.71500000000	0 GHz Trig: Free Bun	ALIGN AUTO Avg Type: Log-Pwr AvglHold:>50/50	05:23:26 PM Oct 11, 2021 TRACE 1 2 3 4 5 6 TYPE M WWWWW	Peak Search
Ref Offset 21 dB 10 dB/div Ref 21.00 dBm	IFGain:Low #Atten: 10 dB	M	ьет Р NNNN kr1 23.715 GHz -50.365 dBm	Next Peak
11.0				Next Pk Right
-9.00				Next Pk Left
-19.0			-18.62 dBm	Marker Delta
-39.0			↓ 1	Mkr→CF
-59.0	advent sa population de ser la serie de series de s	ing for a field of a large of a second and the	nayyaandir ^{ahan} anin bagtaningayahiiya.	Mkr→RefLvl
Start 15.000 GHz			Stop 25.000 GHz	More 1 of 2
MSG	#VOW 300 KH2	sweep	soo ms (2001 pts)	

802.11n40 CH2437MHz



Reference level



🎩 Agi	lent Spect	rum Analyzer - Swe	ept SA								- 0 ×
<mark>.xı</mark> Mar	ker 1	RF 50 9	DC) GHz	SEI	NSE:INT	Avg Typ	ALIGN AUTO e: Log-Pwr	05:26:35 TRAC	PM Oct 11, 2021 DE 1 2 3 4 5 6	Peak Search
<u>1</u> 0 dl	B/div	Ref Offset 2 Ref 21.00	1 dB dBm	PNO: Fast IFGain:Low	Trig: Free #Atten: 1	e Run 0 dB	Avg Hold	l:>50/50 M	۲۷ D kr1 10.6 -53.6	590 GHz 75 dBm	Next Peak
Log 11.0											Next Pk Right
1.00 -9.00											Next Pk Left
-19.0 -29.0										-18.29 dBm	Marker Delta
-39.0						. 1					Mkr→CF
-49.0	A.	diana dia mandra dia ma	haya faranga genedi	an a	lister(rates)sectedas	ANII Parage stated and a stati	ele, de a l'Angle a	and the station of the state	anahad ye ^{be} rdad	for a hoff where an a	Mkr→RefLvl
-69.0 Star	t 5.00	0 GHz							Stop 15	.000 GHz	More 1 of 2
#Re	s BW	100 kHz		#VBW	/ 300 kHz			Sweep	956 ms ((2001 pts)	
MSG								STATUS	5		

📜 Agil	ent Spectrun	n Analyzer - Swe	pt SA								- 0 - X -
<mark>.x</mark> Mar	ker 1 2	RF 50 G 3.640000	DC 000000	GHz	SEI			ALIGN AUTO	05:27:59 TRAC	PM Oct 11, 2021 CE 1 2 3 4 5 6 DE M MAAAAAAA	Peak Search
10 dE	3/div	Ref Offset 21 Ref 21.00	dB dBm	PNO: Fast IFGain:Low	#Atten: 1	0 dB	Avginoid	M	kr1 23.6 -50.2	40 GHz 41 dBm	Next Peak
Log 11.0											Next Pk Right
1.00 -9.00											Next Pk Left
-19.0 -29.0										-18.29 dBm	Marker Delta
-39.0 -49.0									1		Mkr→CF
-59.0	erados palitica	fritmennetingen	مر المعند المرومي المراجع	hannan an tha an tha an that the state of th	in for the state of the state o	and the second secon	a in dindinani an	ada Balay ka kan dan menangan sebagai ka kan dari kan sebagai ka kan sebagai ka kan sebagai kan sebagai kan se	errand and the second second	and a spenning of the second	Mkr→RefLvl
Star	t 15.000 s BW 10	GH2 00 kHz		#VBW	/ 300 kHz			Sweep	Stop 25 956 ms (.000 GHz 2001 pts)	More 1 of 2
MSG								STATUS	5		

802.11n40 CH2452MHz



Reference level



🔟 Agil	ent Specti	rum Analy:	zer - Swep	ot SA											
<mark>.x</mark> Marl	ker 1	^{RF} 14.21	50 Ω 5000	DC 00000)0 GI	lz	Т	SEI	NSE:INT	Av	rg Type alHold	ALIGN AUTO : Log-Pwr :>50/50	05:37:52 TRA	PM Oct 11, 2021 CE 1 2 3 4 5 6 (PE M WWWWW	Peak Search
10 dE	3/div	Ref Of Ref 2	fset 21 1 .00 (dB d B m	IFGa	in:Low	► #/	Atten: 1	0 dB		91	М	kr1 14. -53.6	215 GHz 88 dBm	Next Peak
11.0															Next Pk Right
1.00															Next Pk Lef
-19.0														-18.37 dBm	Marker Delta
-39.0															Mkr→CF
-49.0 -59.0	de la serie de	ويلتعجونهم	ناري <mark>ا</mark> پورېزواد	in the state of the	بالمراجع	الدوالليم المياء	d in all	Not de la Contra de	aladayya, ^{Mala}	halpelle finite	والمراد والم	ang the states	nuthalaise futhing	1 	Mkr→RefLv
-69.0															More 1 of 2
Start #Res	t 5.00 s BW	0 GHz 100 kł	Iz			#VB	W 30	0 kHz				Sweep	Stop 1: 956 ms	5.000 GHz (2001 pts)	
MSG												STATUS	3		

🗾 Agilent Spectrum Analyzer - Swept SA				
Marker 1 23.59500000000	0 GHz	ALIGN AUTO	05:40:45 PM Oct 11, 2021 TRACE 2 3 4 5 6	Peak Search
Ref Offset 21 dB 10 dB/div Ref 21.00 dBm	PNO: Fast Fig: Free Run IFGain:Low #Atten: 10 dB	Avg Hold:>50/50	kr1 23.595 GHz -48.687 dBm	Next Peak
11.0				Next Pk Right
-9.00				Next Pk Left
-19.0			-18.37 dBm	Marker Delta
-39.0			↓ 1	Mkr→CF
-59.0	start of the second	hajjanter skala ja sera na stali ka kana se kala ka	⁶ og _{agib} g ^{al di} sisprofetoyanikingan feto	Mkr→RefLvl
69.0 Start 15.000 GHz #Res BW 100 kHz	#VBW 300 kHz	Sweep	Stop 25.000 GHz 956 ms (2001 pts)	More 1 of 2
MSG		STATUS		

8 BAND EDGES MEASUREMENT

8.1 Test Equipment

The following test equipment was used during the band edges measurement:

Item	Type	Manufacturer	Model No.	Serial No.	Cal. Date	Cal. Interval
1.	Spectrum Analyzer	Agilent	N9010A	MY52221182	2021.09.15	1 Year
2.	Coaxial Cable	WOKEN	SFL402-105F LEX	F02-150819-0 45	2021.03.08	1 Year
3.	20 dB Attenuator	Mini-Circuits	VAT-20+	001	2021.08.06	1 Year

8.2 Block Diagram of Test Setup

The Same as section. 5.2.

8.3 Specification Limits (§15.247(d))

In any 100 kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement, provided the transmitter demonstrates compliance with the peak conducted power limits. If the transmitter complies with the conducted power limits based on the use of RMS averaging over a time interval, as permitted under paragraph (b)(3) of this section, the attenuation required under this paragraph shall be 30 dB instead of 20 dB. Attenuation below the general limits specified in §15.209(a) is not required.

8.4 Operating Condition of EUT

The switch ON/OFF was used to enable the EUT to change the channel one by one.

8.5 Test Procedure

The transmitter output was connected to the spectrum analyzer. Set RBW of Test Receiver to 100kHz and VBW to 300kHz with suitable frequency span including 100kHz bandwidth from band edge.

The test procedure is defined in ANSI C63.10-2013 (11.11.3 Emission level measurement was used).

8.6 Test Results

PASSED.

All the test results are attached in next pages.

Modulation	Location	Channel	Frequency (MHz)	Delta Marker (dB)	Result
202 11h	Below Band Edge	1	2412	53.423	More than 20 dB below the highest
802.110	Upper Band Edge	11	2462	53.16	level of the desired power
802 11σ	Below	1	2412	43.724	More than 20 dB below the highest
002.11g	Edge	11	2462	38.862	level of the desired power
802 11020	Below	1	2412	39.583	More than 20 dB below the highest
802.111120	Edge	11	2462	37.043	level of the desired power
<u>802 11n40</u>	Below	3	2422	32.537	More than 20 dB below the highest
002.111140	Edge	9	2452	30.092	level of the desired power

802.11b CH2412MHz (Below Edge 2390 MHz)

🌉 Agilent Sp	ectrum A	nalyzer - Swe	ept SA											
<mark>w</mark> Marker	RI 2 ∆ 2	50 g 6.4732	2 DC 36618	MHz		SENS	E:INT	Avg	Туре	ALIGN AUTO : Log-Pwr	10:37:53 TR/	ACE 1 2 3 4 5 (Marker
				PNO: Fast IFGain:Low	, ♀ ™	ig: Free F Atten: 10	Run dB	Avg	Hold:	:>50/50	T			Marker Table
	D.	08-10	4 -10							Δ	//kr2 26	.47 MHz	0	n Off
10 dB/div	Re	f 21.00	dBm								5	3.423 dB		
Log												2∆3		Marker Coupt
1.00														
-9.00												- "N		[]
-19.0											L /	<u>\</u>		Couple
-29.0														Markers
-39.0										<u> 1 . A.</u>	1		0	n <u>Off</u>
-49.0									X	Contraction of the second second	4. * *			
-59.0 -59 .0	Law and the	and the second second	alahar yang dan	*****	Lis enti, ingli tinging	MAR I MAR	alghad the second s							
-69.0														
Start 2.3	31000	GHz									Stop 2.4	2200 GHz		
#Res BV	V 100	kHz		#V	BW 30	0 kHz				Sweep	10.8 ms	(2000 pts)		
MKR MODE	TRC SCI	-	Х			Y	FUN	ICTION	FUN	ICTION WIDTH	FUNCT	ION VALUE	Ī	
1 Ν 2 Δ3	1 f 1 f	<u>(Δ)</u>	2.39	0 00 GHz 6.47 MHz	<u>-50</u> (Δ) ξ	822 dBr 3.423 dI	n 3							
3 E 4	<u>1 f</u>		2.38	6 00 GHz	-49	<u>.293 dBr</u>	n							All Markers Off
5														
7														
9														More
10														2 of 2
12														
MSG										STATU	S			

802.11b CH2462MHz (Upper Edge 2483.5 MHz)



802.11g CH2412MHz (Below Edge 2390 MHz)

🗾 Ag	lent Sp	pectru	ım An	alyzer - Oco	cupied BW											
. <mark>≫</mark> Mar	ker	2 /	RF	50 s 50 s	Ω DC	MHz		SENS	SE:INT	Avg	A Type:	LIGN AUTO	05:15:54 TR/	PM Oct 09, 202	1	Peak Search
10 d	B/div	1	Ref Ref	Offset 2 5 20.00	1 dB dBm	PNO: Fast IFGain:Lov	t () w	Atten: 10	dB		noiu.>	Δ	//kr2 23 43	.26 MHz 3.724 dE		Next Peak
Log 10.0 0.00 -10.0													ر بایامیارا را دار	203		Next Pk Right
-20.0 -30.0 -40.0										N. Jail March 1	Hrww ⁴	X3	ANT CONTRACT			Next Pk Left
-50.0 -60.0 -70.0	n gin	art-pur	u, , , , , , , , , , , , , , , , , , , 	muhaywar	gra-prof.L.n.s.	يورا ۽ مل ميرون مورا يونون مورا يونون	~~***	www.gaayah	Wagtess (Baseling							Marker Delta
Stai #Re	t 2.: s Bl	310 W 1	00 00 SCL	GHz kHz	X	#\	/BW	300 kHz	FUN	CTION	FUNC	Sweep	Stop 2.4 10.7 ms	2200 GH (1001 pts		Mkr→CF
1 2 3 4 5 6	N ∆3 F	1 1	f	<u>(</u> ∆)	2.39	90 00 GHZ 23.26 MHz 90 00 GHz	(<u>(</u>)	<u>-37.158 dBl</u> 43.724 d -37.158 dBi	m B m							Mkr→RefLvl
8 9 10 11 12																More 1 of 2
MSG												STATU	5			

802.11g CH2462MHz (Upper Edge 2483.5 MHz)

🗾 Agilent Spectrum Analyzer - Occupied BW			
Marker 2 Δ -20.220000000 MHz	SENSE:INT	ALIGN AUTO 05:5	7:19 PM Oct 09, 2021 TRACE 1 2 3 4 5 6
PNO: Fas IFGain:Lo Ref Offset 21 dB 10 dB/div Ref 20.00 dBm	st Ing: Free Run Av w Atten: 10 dB	ΔMkr2 -2	0.220 MHz 38.862 dB
10.0 0.00 -10.0	why		Next Pk Right
-20.0 ///		1 3.1 3.1	Next Pk Left
-50.0 -60.0 -70.0			Marker Delta
Start 2.45200 GHz #Res BW 100 kHz # MKR MODE TRC SCL X 2.493 500 CHz	VBW 300 kHz	Stop Sweep 4.60 n FUNCTION WIDTH FUI	2.50000 GHz 1s (1001 pts) Mkr→CF
2 Δ3 1 f Δ2.483 500 GHZ 3 F 1 f Δ2.220 GHZ Δ2.220 GHZ 3 F 1 f Δ2.483 500 GHZ 4 5 6 6 6 6 7 - - - - -	(Δ) 38.862 dB -32.770 dBm		Mkr→RefLvl
8 9 10 11 12 12			More 1 of 2
MSG		STATUS	

802.11n20 CH2412MHz (Below Edge 2390 MHz)

💵 Agilent Spectrum Analyzer - Occupied	BW		- 🖬 💌
<mark>₩</mark> RF 50 Ω C Marker 2 Δ 23.4880000	OOO MHZ	ALIGN AUTO 05:16:31 PM Oct 09, 2021 Avg Type: Log-Pwr TRACE 12.3.4.5.6 AvglHold:>50/50 Type Mwwwww	Peak Search
Ref Offset 21 dB 10 dB/div Ref 20.00 dB	IFGain:Low Atten: 10 dB	ΔMkr2 23.49 MHz 39.583 dB	Next Peak
10.0 0.00 -10.0			Next Pk Right
-20.0		1 Janet Haster and X31 Starten Mart	Next Pk Left
-50.0 -60.0 -70.0	dealer and an all for an all and an all following and a second by the second by the second by the second by the		Marker Delta
Start 2.31000 GHz #Res BW 100 kHz	#VBW 300 kHz	Stop 2.42200 GHz Sweep 10.7 ms (1001 pts)	Mkr→CF
1 N 1 f 2 Δ3 1 f (Δ) 3 F 1 f 4 - - - 5 - - - 6 - - - 7 - - -	2.390 00 GHz -34.854 dBm 23.49 MHz (Δ) 39.583 dB 2.389 78 GHz -33.767 dBm		Mkr→RefLvl
8 9 10 11 12			More 1 of 2
MSG		STATUS	

802.11n20 CH2462MHz (Upper Edge 2483.5 MHz)



- 0 × 📕 Agilent Spectrum Analyzer - Occupied BW 7 PM Oct 09, 202 Peak Search Avg Type: Log-Pwr Avg|Hold:>50/50 TRACE 1 2 3 4 5 TYPE MWWW Marker 2 Δ 41.308000000 MHz Trig: Free Run Atten: 10 dB PNO: Fast IFGain:Low Next Peak ΔMkr2 41.31 MHz 32.537 dB Ref Offset 21 dB Ref 20.00 dBm 10 dB/div og 2∆3 Next Pk Right մենուր 111 X310 uter 1040 Next Pk Left Humand Anton M . جرار ا Marker Delta Start 2.31000 GHz #Res BW 100 kHz Stop 2.44200 GHz 12.7 ms (1001 pts) #VBW 300 kHz Sweep Mkr→CF FUNCTION EUN CUM 2.390 00 GHz -35.255 dBm 41.31 MHz (Δ) 32.537 dB 2.384 46 GHz -30.388 dBm N 1 f Δ3 1 f (Δ) F 1 f 1 3 4 5 6 7 8 9 10 11 12 Mkr→RefLvl More 1 of 2 MSG STATUS

802.11n40 CH2422MHz (Below Edge 2390 MHz)

802.11n40 CH2452MHz (Upper Edge 2483.5 MHz)

💓 Agilent Spectrum Analyzer - Occupied BW				_ 🖬 🗾 📈
Marker 2 Δ -32.144000000	0 MHz	ALIGN AUTO Avg Type: Log-Pwr	05:55:37 PM Oct 09, 2021 TRACE 1 2 3 4 5 6	Peak Search
Ref Offset 21 dB	PNO: Fast () Ing. Free Ku IFGain:Low Atten: 10 dB		cr2 -32.144 MHz 30.092 dB	Next Peak
Log 10.0 0.00 	203			Next Pk Right
-20.0		1 Malushilm	and the first the second state of the second	Next Pk Left
-50.0				Marker Delta
Start 2.43200 GHz #Res BW 100 kHz	#VBW 300 kHz		Stop 2.50000 GHz 6.53 ms (1001 pts) FUNCTION VALUE	Mkr→CF
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	3 500 GHz -31.979 dBm 2.144 MHz (Δ) 30.092 dB 7 876 GHz -28.315 dBm			Mkr→RefLvl
8 9 10 11 12 12				More 1 of 2
MSG		STATU	s	

9 POWER SPECTRAL DENSITY MEASUREMENT

9.1 Test Equipment

The following test equipment was used during the power spectral density measurement:

Item	Туре	Manufacturer	Model No.	Serial No.	Cal. Date	Cal. Interval
1.	Spectrum Analyzer	Agilent	N9010A	MY52221182	2021.09.15	1 Year
2.	Coaxial Cable	WOKEN	SFL402-105F LEX	F02-150819-0 45	2021.03.08	1 Year
3.	20 dB Attenuator	Mini-Circuits	VAT-20+	001	2021.08.06	1 Year

9.2 Block Diagram of Test Setup

The Same as section 5.2.

9.3 Specification Limits (§15.247(e))

The peak power spectral density conducted from the intentional radiator to the antenna shall not be greater than 8 dBm in any 3 kHz band.

9.4 Operating Condition of EUT

The switch ON/OFF was used to enable the EUT to change the channel one by one.

9.5 Test Procedure

The transmitter output was connected to the spectrum analyzer.

- a) Set analyzer center frequency to DTS channel center frequency.
- b) Set the span to 1.5 times the DTS bandwidth.
- c) Set the RBW to 3 kHz \leq RBW \leq 100 kHz.
- d) Set the VBW \geq [3 × RBW].
- e) Detector = peak.
- f) Sweep time = auto couple.
- g) Trace mode = max hold.
- h) Allow trace to fully stabilize.

i) Use the peak marker function to determine the maximum amplitude level within the RBW.

j) If measured value exceeds requirement, then reduce RBW (but no less than 3 kHz) and repeat.

The test procedure is defined in ANSI C63.10-2013 (11.10.2 Measurement Procedure "Method PKPSD (peak PSD)" was used).

9.6 Test Results

PASSED.

All the test results are attached in next pages.

(Test Date: 2021.10.15	Temperature: 23°C	Humidity: 51 %)
------------------------	-------------------	-----------------

Modulation	Channel	Frequency (MHz)	Power Spectral Density (dBm)	Limit
802.11b	1	2412	-10.717	8 dBm
	6	2437	-10.957	8 dBm
	11	2462	-11.237	8 dBm
802.11g	1	2412	-8.88	8 dBm
	6	2437	-8.817	8 dBm
	11	2462	-9.311	8 dBm
802.11n20	1	2412	-9.253	8 dBm
	6	2437	-9.366	8 dBm
	11	2462	-9.918	8 dBm
802.11n40	3	2422	-11.592	8 dBm
	6	2437	-11.591	8 dBm
	9	2452	-11.847	8 dBm

802.11b CH2412 MHz



802.11b CH2437 MHz



802.11b CH2462 MHz



802.11g CH2412 MHz



802.11g CH2437 MHz



802.11g CH2462 MHz



802.11n20 CH2412 MHz



802.11n20 CH2437 MHz



802.11n20 CH2462 MHz



802.11n40 CH2422 MHz



802.11n40 CH2437 MHz



802.11n40 CH2452 MHz



10 DEVIATION TO TEST SPECIFICATIONS

None.

11 MEASUREMENT UNCERTAINTY LIST

The measurement uncertainty was estimated for test on the EUT according to CISPR 16-4-2. This uncertainty represents an expanded uncertainty expressed at approximately the 95% confidence level using a coverage of K=2.

The uncertainties value is not used in determining the PASS/FAIL results.

Test Items/Facilities	Frequency/Equipment/Unit	Uncertainty
Conducted Emission	9kHz~150kHz	±3.1 dB
No.1 Shielded Room	150kHz~30MHz	±2.6 dB
Conducted Emission	9kHz~150kHz	±3.1 dB
No.3 Shielded Room	150kHz~30MHz	±2.6 dB
	30MHz~200MHz, Horizontal	±3.8 dB
	30MHz~200MHz, Vertical	±4.1 dB
	200MHz~1000MHz, Horizontal	±3.6 dB
Radiated Emission	200MHz~1000MHz, Vertical	±5.1 dB
	1GHz~6GHz	±5.3 dB
	6GHz~18GHz	±5.3 dB
	18GHz~40GHz	±3.5 dB
Output Power Test	50MHz~18GHz	0.77 dB
Power Density Test	9kHz~6GHz	1.08 dB
RF Frequency Test	9kHz~40GHz	$6*10^{-4}$
Bandwidth Test	9kHz~6GHz	$1.5*10^{-3}$
RF Radiated Power Test	30MHz~1000MHz	3.06 dB
Conducted Output Power Test	50MHz~18GHz	0.83 dB
AC Voltage(<10kHz) Test	120V~230V	0.04 %
DC Power Test	0V~30V	0.4 %
Temperature	-40°C~+100°C	0.52 °C
Humidity	30%~95%	2.6 %

APPENDIX I

PHOTOGRAPHS OF TEST

Test Set-Up Photos 1. Conducted Test



2. Radiated Test



(BELOW 1GHZ)



(Above 1GHz)

3. Antenna-port Conducted Test



APPENDIX II

PHOTOGRAPHS OF EUT

Figure 1 Abode Color Bulb (M/N: 104062/A) General Appearance (General View)



Figure 2 Abode Color Bulb (M/N: 104062/A) General Appearance (Cover Removed)



FIGURE 3 Abode Color Bulb (M/N: 104062/A) LED (Front)



Figure 4 Abode Color Bulb (M/N: 104062/A) LED (Back)



Figure 5 Abode Color Bulb (M/N: 104062/A) Main Board (Component Side)



Figure 6 Abode Color Bulb (M/N: 104062/A) Main Board (Soldered Side)



FIGURE 7 Abode Color Bulb (M/N: 104062/A) Chip and Crystal on RF Board



Figure 8 Abode Color Bulb (M/N: 104062/A) Antenna

