

Annex 1: Measurement diagrams to TESTREPORT No.: 18-1-0248301T08a

According to:

CFR Title 47, Part 15, Subpart C §15.247 (FHSS)

> **ISED-Regulations** RSS-Gen, Issue 5 RSS-247, Issue 2

> > for

## Robert Bosch Car Multimedia GmbH

# AIVIV10 Multimedia device with Bluetooth and WLAN

FCC ID: YBN-AIVIV10 ISED: 9595A-AIVIV10

## Laboratory Accreditation



#### accredited according to DIN EN ISO/IEC 17025

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# 1. Conducted RF Measurements on Antenna Port

## 1.1. Peak Power Conducted

Modulation	DUT Frequency (MHz)	Peak Power (dbm)	Antenna Gain (dBi)	EIRP (dBm)
	2402	-1.6	-8.2	-9.8
DH1	2441	-2.2	-7.6	-9.8
	2480	-2.4	-6.4	-8.8
	2402	-2.2	-8.2	-10.4
2DH1	2441	-2.7	-7.6	-10.3
	2480	-2.9	-6.4	-9.3
	2402	-1.9	-8.2	-10.1
3DH1	2441	-2.2	-7.6	-9.8
	2480	-2.4	-6.4	-8.8

Modulation	DUT Frequency (MHz)	Peak Power (dbm)	Antenna Gain (dBi)	EIRP (dBm)
	2402	-1.7	-8.2	-9.9
DH3	2441	-2.3	-7.6	-9.9
	2480	-2.5	-6.4	-8.9
	2402	-2.2	-8.2	-10.4
2DH3	2441	-2.6	-7.6	-10.2
	2480	-2.7	-6.4	-9.1
	2402	-1.8	-8.2	-10
3DH3	2441	-2.2	-7.6	-9.8
	2480	-2.4	-6.4	-8.8

Modulation	DUT Frequency (MHz)	Peak Power (dbm)	Antenna Gain (dBi)	EIRP (dBm)
	2402	-1.5	-8.2	-9.7
DH5	2441	-2.2	-7.6	-9.8
	2480	-2.4	-6.4	-8.8
	2402	-2.1	-8.2	-10.3
2DH5	2441	-2.6	-7.6	-10.2
	2480	-2.7	-6.4	-9.1
	2402	-1.7	-8.2	-9.9
3DH5	2441	-2.2	-7.6	-9.8
	2480	-2.3	-6.4	-8.7



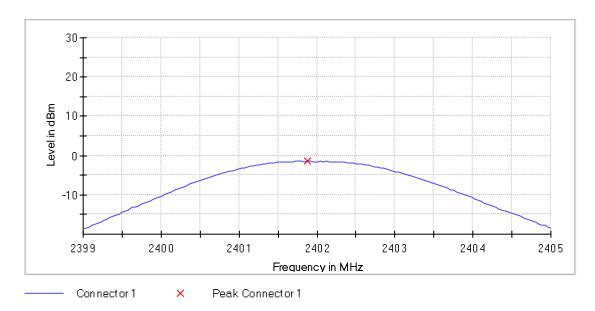
## DH5

# Peak output power (Sweep) (2402 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 \$15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

DUT Frequency	Peak Power	Limit Max	Result
(MHz)	(dBm)	(dBm)	
2402.000000	-1.5	21.0	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.39900 GHz	2.39900 GHz
Stop Frequency	2.40500 GHz	2.40500 GHz
Span	6.000 MHz	6.000 MHz
RBW	2.000 MHz	>= 1.000 MHz
VBW	10.000 MHz	>= 6.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.06 dB	0.50 dB

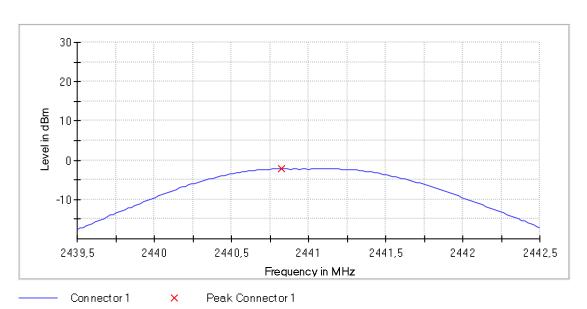


# Peak output power (Sweep) (2441 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 §15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

DUT Frequency	Peak Power	Limit Max	Result
(MHz)	(dBm)	(dBm)	
2441.000000	-2.2	21.0	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.43950 GHz	2.43950 GHz
Stop Frequency	2.44250 GHz	2.44250 GHz
Span	3.000 MHz	3.000 MHz
RBW	1.000 MHz	>= 935.001 kHz
VBW	3.000 MHz	>= 3.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.08 dB	0.50 dB

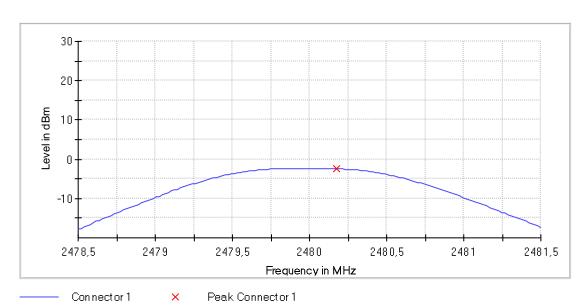


# Peak output power (Sweep) (2480 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 §15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

DUT Frequency	Peak Power	Limit Max	Result
(MHz)	(dBm)	(dBm)	
2480.000000	-2.4	21.0	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.47850 GHz	2.47850 GHz
Stop Frequency	2.48150 GHz	2.48150 GHz
Span	3.000 MHz	3.000 MHz
RBW	1.000 MHz	>= 935.001 kHz
VBW	3.000 MHz	>= 3.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.07 dB	0.50 dB

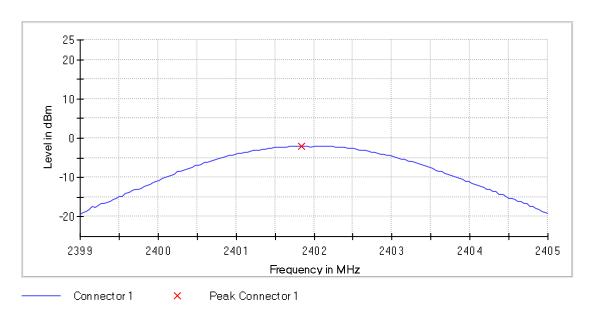


# 2-DH5 Peak output power (Sweep) (2402 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 \$15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

DUT Frequency	Peak Power	Limit Max	Result
(MHz)	(dBm)	(dBm)	
2402.000000	-2.1	21.0	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.39900 GHz	2.39900 GHz
Stop Frequency	2.40500 GHz	2.40500 GHz
Span	6.000 MHz	6.000 MHz
RBW	2.000 MHz	>= 1.000 MHz
VBW	10.000 MHz	>= 6.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.11 dB	0.50 dB

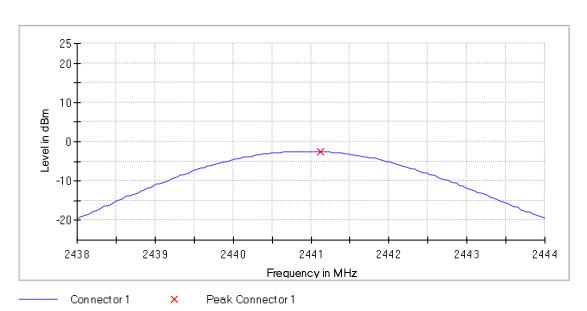


# Peak output power (Sweep) (2441 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 §15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

DUT Frequency	Peak Power   Limit Max		Result	
(MHz)	(dBm)	(dBm)		
2441.000000	-2.6	21.0	PASS	



Setting	Instrument Value	Target Value
Start Frequency	2.43800 GHz	2.43800 GHz
Stop Frequency	2.44400 GHz	2.44400 GHz
Span	6.000 MHz	6.000 MHz
RBW	2.000 MHz	>= 1.330 MHz
VBW	10.000 MHz	>= 6.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.19 dB	0.50 dB

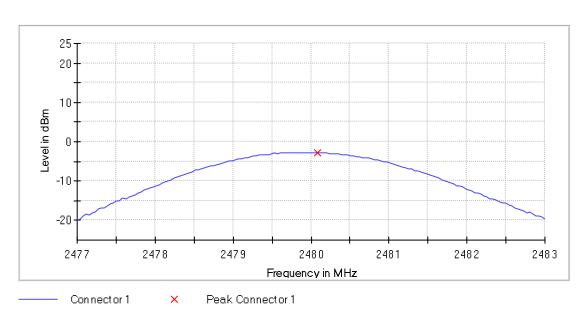


# Peak output power (Sweep) (2480 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 §15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

DUT Frequency	Peak Power		
(MHz)	(dBm)	(dBm)	
2480.000000	-2.7	21.0	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.47700 GHz	2.47700 GHz
Stop Frequency	2.48300 GHz	2.48300 GHz
Span	6.000 MHz	6.000 MHz
RBW	2.000 MHz	>= 1.330 MHz
VBW	10.000 MHz	>= 6.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.14 dB	0.50 dB



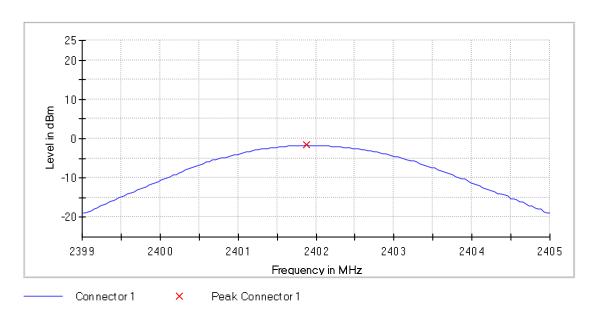
## 3-DH5

# Peak output power (Sweep) (2402 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 §15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

DUT Frequency (MHz)	Peak Power Limit Max (dBm) (dBm)		Result
2402.000000	-1.7	21.0	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.39900 GHz	2.39900 GHz
Stop Frequency	2.40500 GHz	2.40500 GHz
Span	6.000 MHz	6.000 MHz
RBW	2.000 MHz	>= 1.000 MHz
VBW	10.000 MHz	>= 6.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.17 dB	0.50 dB

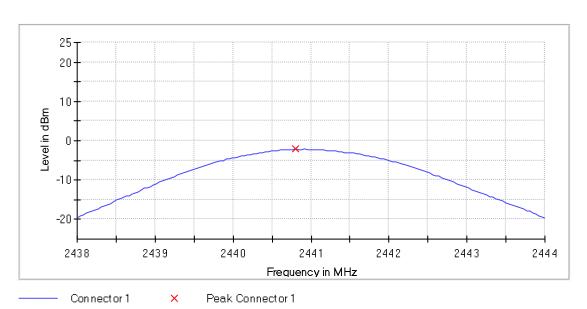


# Peak output power (Sweep) (2441 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 §15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

DUT Frequency	Peak Power Limit Max		Result
(MHz)	(dBm)	(dBm)	
2441.000000	-2,2	21.0	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.43800 GHz	2.43800 GHz
Stop Frequency	2.44400 GHz	2.44400 GHz
Span	6.000 MHz	6.000 MHz
RBW	2.000 MHz	>= 1.270 MHz
VBW	10.000 MHz	>= 6.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.15 dB	0.50 dB

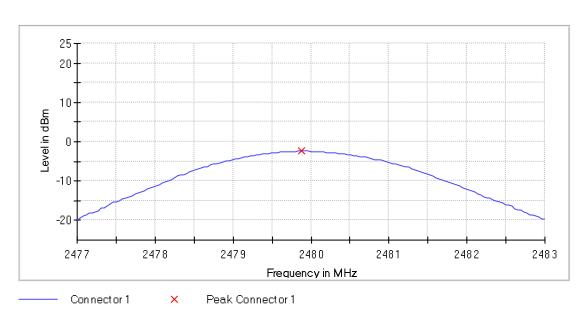


# Peak output power (Sweep) (2480 MHz; 10,000 dBm; 1 MHz; Test Mode)

Test according to FCC title 47 part 15 §15.247(b), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

## Result

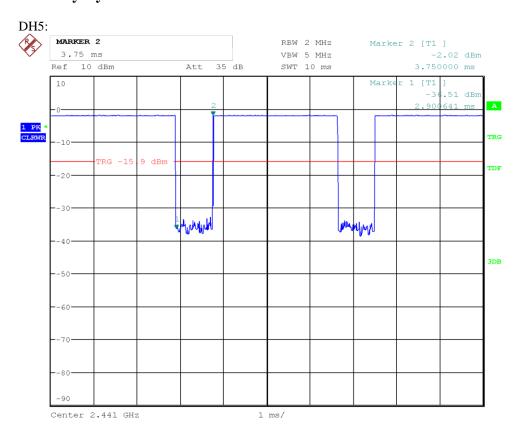
DUT Frequency	Peak Power Limit Max		Result
(MHz)	(dBm)	(dBm)	
2480.000000	-2.3	21.0	PASS

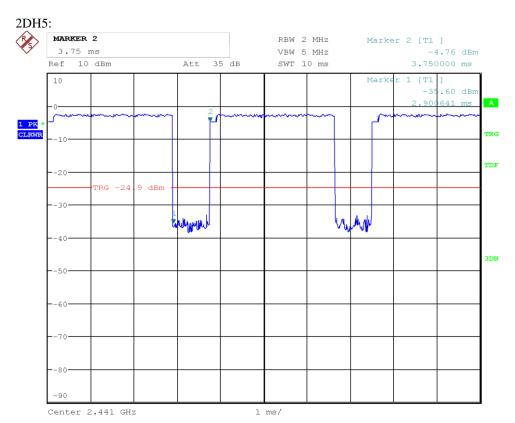


Setting	Instrument Value	Target Value
Start Frequency	2.47700 GHz	2.47700 GHz
Stop Frequency	2.48300 GHz	2.48300 GHz
Span	6.000 MHz	6.000 MHz
RBW	2.000 MHz	>= 1.270 MHz
VBW	10.000 MHz	>= 6.000 MHz
SweepPoints	155	~ 101
Sweeptime	2.500 ms	AUTO
Reference Level	10.000 dBm	10.000 dBm
Attenuation	35.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	100	100
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.19 dB	0.50 dB



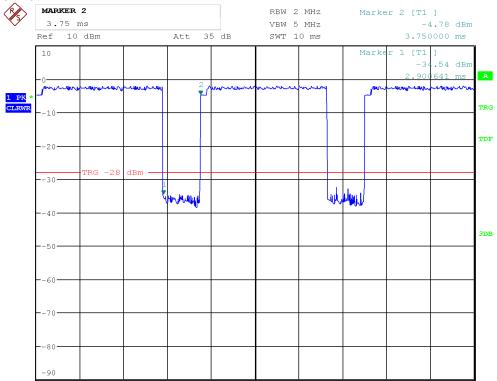
## 1.2. Duty Cycle











1 ms/

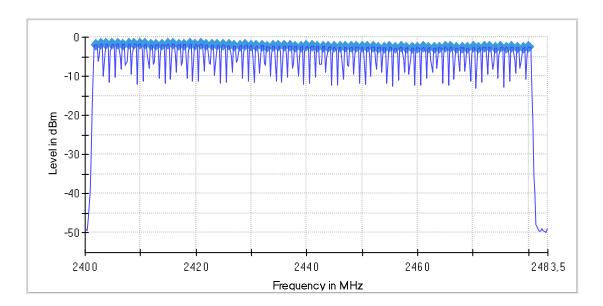
Center 2.441 GHz



# **1.3. Number of Hopping Frequencies**

# **Channels**

Channels	Limit Min	Limit Max	Result
79	15		PASS





#### 1.4. 20dB Emission Bandwidth

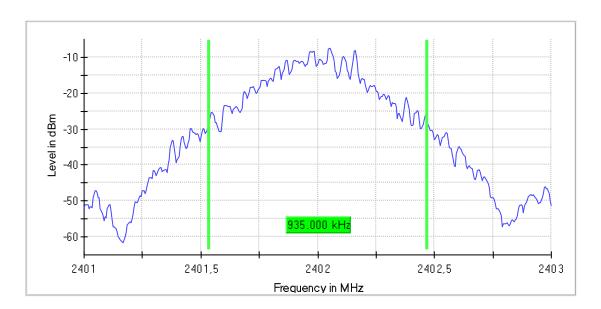
## 1.4.1. DH5 Emission Bandwidth 20 dB (2402 MHz; 10,000 dBm; 1 MHz)

## 20 dB Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2402.000000	0.935000			2401.535000	

(continuation of the "20 dB Bandwidth" table from column  $\ 6 \ldots$ )

DUT Frequency (MHz)	Max Level (dBm)	Result
2402.000000	-7.4	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.40100 GHz	2.40100 GHz
Stop Frequency	2.40300 GHz	2.40300 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	7 / max. 150	max. 150
Stable	5/5	5
Max Stable Difference	0.05 dB	0.50 dB

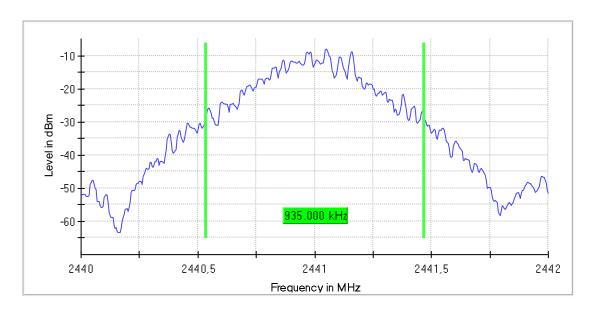


## Emission Bandwidth 20 dB (2441 MHz; 10,000 dBm; 1 MHz; Test Mode)

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2441.000000	0.935000			2440.535000	2441.470000

#### (continuation of the "20 dB Bandwidth" table from column $\ 6 \ldots$ )

DUT Frequency (MHz)	Max Level (dBm)	Result
2441.000000	-8.1	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.44000 GHz	2.44000 GHz
Stop Frequency	2.44200 GHz	2.44200 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	6 / max. 150	max. 150
Stable	5/5	5
Max Stable Difference	0.07 dB	0.50 dB

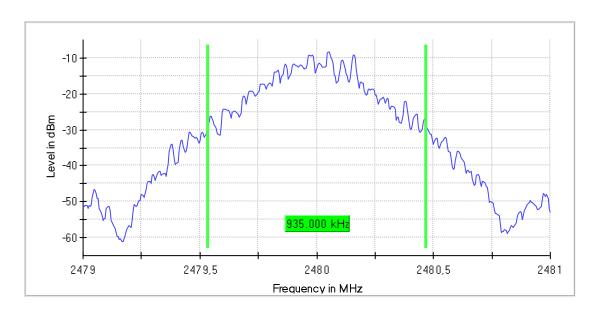


## Emission Bandwidth 20 dB (2480 MHz; 10,000 dBm; 1 MHz)

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2480.000000	0.935000			2479.535000	

#### (continuation of the "20 dB Bandwidth" table from column $\ 6 \ldots$ )

DUT Frequency (MHz)	Max Level (dBm)	Result
2480.000000	-8.3	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.47900 GHz	2.47900 GHz
Stop Frequency	2.48100 GHz	2.48100 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	6 / max. 150	max. 150
Stable	5/5	5
Max Stable Difference	0.04 dB	0.50 dB



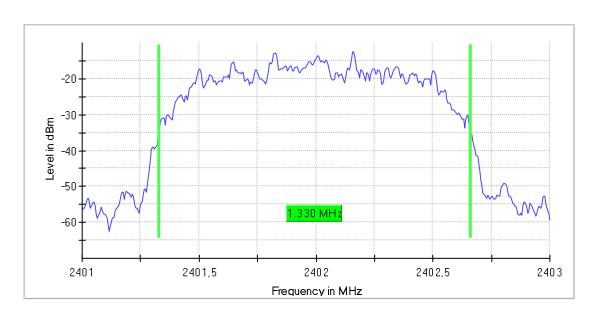
## 1.4.2. 2-DH5Emission Bandwidth 20 dB (2402 MHz; 10,000 dBm; 1 MHz; Test Mode)

## 20 dB Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2402.000000	1.330000	•	!	2401.330000	2402.660000

(continuation of the "20 dB Bandwidth" table from column 6 ...)

DUT Frequency (MHz)	Max Level (dBm)	Result
2402.000000	-12.6	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.40100 GHz	2.40100 GHz
Stop Frequency	2.40300 GHz	2.40300 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	7 / max. 150	max. 150
Stable	5/5	5
Max Stable Difference	0.07 dB	0.50 dB

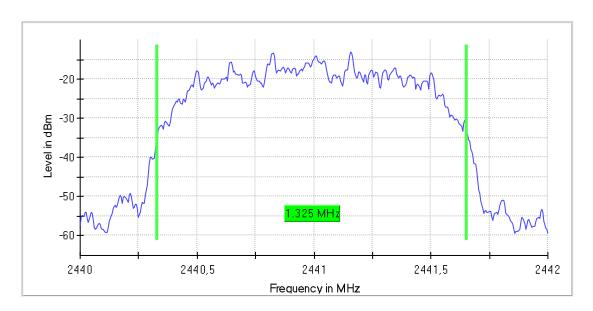


## Emission Bandwidth 20 dB (2441 MHz; 10,000 dBm; 1 MHz)

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2441.000000	1.325000			2440.330000	2441.655000

#### (continuation of the "20 dB Bandwidth" table from column $\ 6 \ldots$ )

DUT Frequency (MHz)	Max Level (dBm)	Result
2441.000000	-13.2	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.44000 GHz	2.44000 GHz
Stop Frequency	2.44200 GHz	2.44200 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	6 / max. 150	max. 150
Stable	5/5	5
Max Stable Difference	0.19 dB	0.50 dB



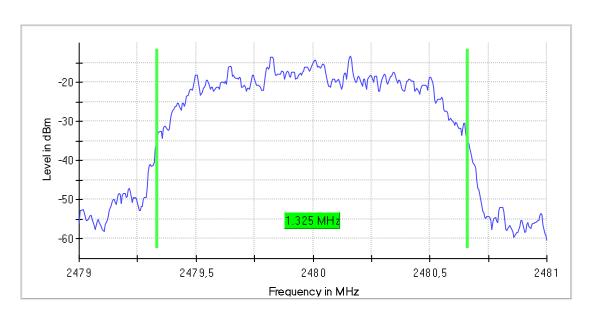
# Emission Bandwidth 20 dB (2480 MHz; 10,000 dBm; 1 MHz; Test Mode)

## 20 dB Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2480.000000	1.325000			2479.335000	2480.660000

(continuation of the "20 dB Bandwidth" table from column 6 ...)

DUT Frequency (MHz)	Max Level (dBm)	Result
2480.000000	-13.4	PASS



Setting	Instrument Value	Target Value	
Start Frequency	2.47900 GHz	2.47900 GHz	
Stop Frequency	2.48100 GHz	2.48100 GHz	
Span	2.000 MHz	2.000 MHz	
RBW	10.000 kHz	>= 10.000 kHz	
VBW	30.000 kHz	>= 30.000 kHz	
SweepPoints	401	~ 400	
Sweeptime	80.000 ms	AUTO	
Reference Level	-10.000 dBm	-10.000 dBm	
Attenuation	15.000 dB	AUTO	
Detector	MaxPeak	MaxPeak	
SweepCount	200	200	
Filter	3 dB	3 dB	
Trace Mode	Max Hold	Max Hold	
Sweeptype	Sweep	AUTO	
Preamp	off	off	
Stablemode	Trace	Trace	
Stablevalue	0.50 dB	0.50 dB	
Run	7 / max. 150	max. 150	
Stable	5/5	5	
Max Stable Difference	0.04 dB	0.50 dB	

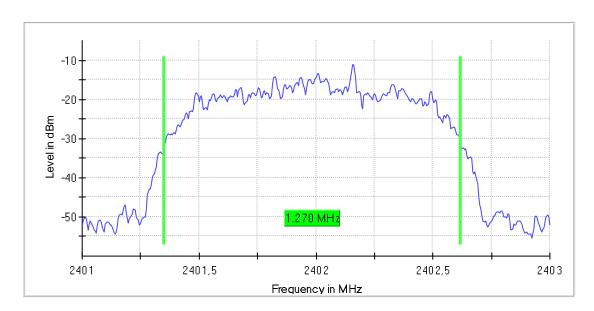


## 1.4.3. 3-DH5 Emission Bandwidth 20 dB (2402 MHz; 10,000 dBm; 1 MHz; Test Mode)

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2402.000000	1.270000			2401.350000	

(continuation of the "20 dB Bandwidth" table from column  $\ 6 \ldots$ )

DUT Frequency (MHz)	Max Level (dBm)	Result
2402.000000	( , ,	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.40100 GHz	2.40100 GHz
Stop Frequency	2.40300 GHz	2.40300 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	7 / max. 150	max. 150
Stable	5/5 5	
Max Stable Difference	0.05 dB	0.50 dB

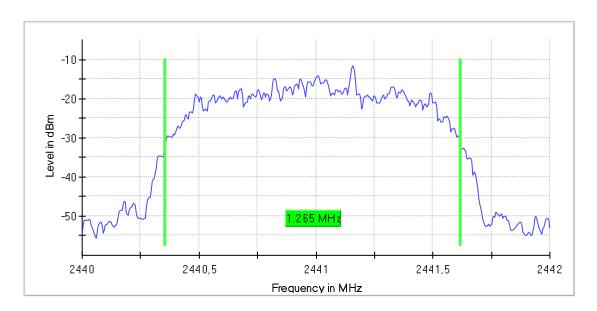


## 3-DH5 Emission Bandwidth 20 dB (2441 MHz; 10,000 dBm; 1 MHz; Test Mode)

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2441.000000	1.265000			2440.355000	

(continuation of the "20 dB Bandwidth" table from column  $\ 6 \ldots$ )

DUT Frequency	Max Level	Result
(MHz)	(dBm)	
2441.000000	-11.7	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.44000 GHz	2.44000 GHz
Stop Frequency	2.44200 GHz	2.44200 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	6 / max. 150	max. 150
Stable	5/5	5
Max Stable Difference	0.07 dB	0.50 dB

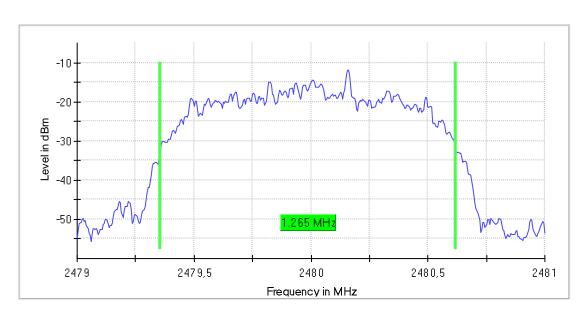


## Emission Bandwidth 20 dB (2480 MHz; 10,000 dBm; 1 MHz)

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2480.000000	1.265000			2479.355000	

#### (continuation of the "20 dB Bandwidth" table from column $\ 6 \ldots$ )

DUT Frequency (MHz)	Max Level (dBm)	Result
2480.000000	-12.0	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.47900 GHz	2.47900 GHz
Stop Frequency	2.48100 GHz	2.48100 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	6 / max. 150	max. 150
Stable	5/5	5
Max Stable Difference	0.09 dB	0.50 dB



# 1.5. 99 % Occupied Bandwidth

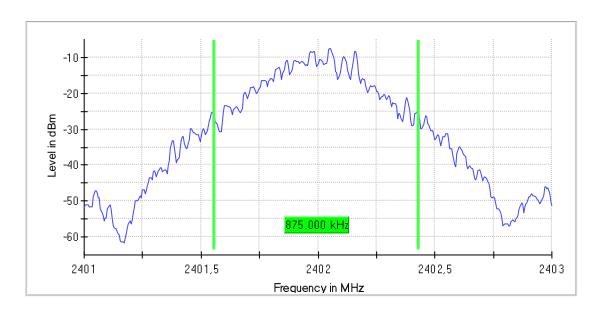
## 1.5.1. DH5 Occupied Channel Bandwidth 99% (2402 MHz; 10,000 dBm; 1 MHz)

## 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2402.000000	0.875000			2401.555000	

(continuation of the "99 % Bandwidth" table from column  $\ 6 \dots$ )

DUT Frequency (MHz)	Result
2402.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.40100 GHz	2.40100 GHz
Stop Frequency	2.40300 GHz	2.40300 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.09 dB	0.30 dB



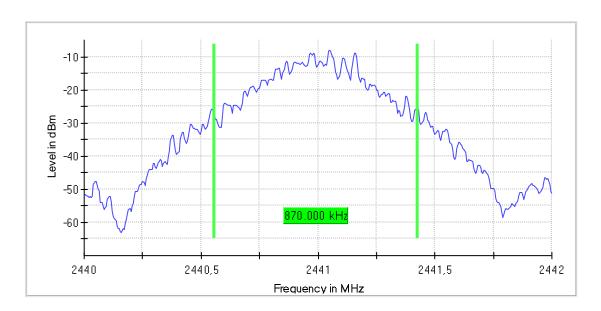
# Occupied Channel Bandwidth 99% (2441 MHz; 10,000 dBm; 1 MHz; Test Mode)

# 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2441.000	0.870000			2440.555000	2441.425000

(continuation of the ''99 % Bandwidth'' table from column 6 ...)

DUT Frequency (MHz)	Result
2441.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.44000 GHz	2.44000 GHz
Stop Frequency	2.44200 GHz	2.44200 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.02 dB	0.30 dB



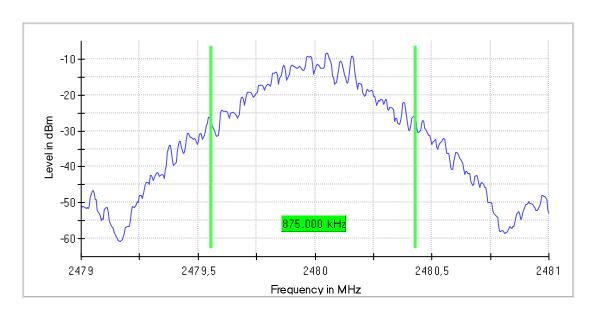
# Occupied Channel Bandwidth 99% (2480 MHz; 10,000 dBm; 1 MHz; Test Mode)

# 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2480.000000	0.875000	-	-	2479.555000	2480.430000

(continuation of the ''99 % Bandwidth'' table from column 6 ...)

DUT Frequency (MHz)	Result
2480.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.47900 GHz	2.47900 GHz
Stop Frequency	2.48100 GHz	2.48100 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.03 dB	0.30 dB



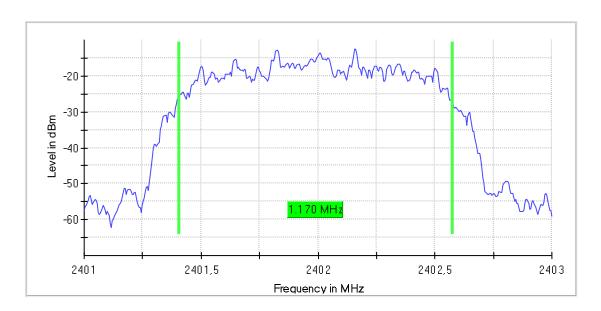
## 1.5.2. 2-DH5 Occupied Channel Bandwidth 99% (2402 MHz; 10,000 dBm; 1 MHz; Test Mode)

# 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2402.000000	1.170000	-		2401.405000	2402.575000

(continuation of the ''99 % Bandwidth'' table from column  $\ 6 \ldots$ )

DUT Frequency (MHz)	Result
2402.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.40100 GHz	2.40100 GHz
Stop Frequency	2.40300 GHz	2.40300 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.08 dB	0.30 dB



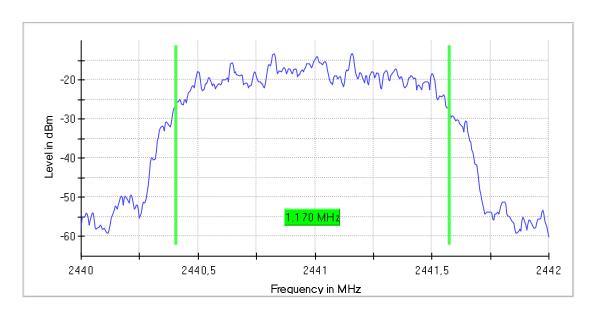
# Occupied Channel Bandwidth 99% (2441 MHz; 10,000 dBm; 1 MHz; Test Mode)

# 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2441.000000	1.170000		•	2440.405000	2441.575000

(continuation of the ''99 % Bandwidth'' table from column  $\ 6 \ldots$ )

DUT Frequency (MHz)	Result
2441.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.44000 GHz	2.44000 GHz
Stop Frequency	2.44200 GHz	2.44200 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.06 dB	0.30 dB



# Occupied Channel Bandwidth 99% (2480 MHz; 10,000 dBm; 1 MHz; Test Mode)

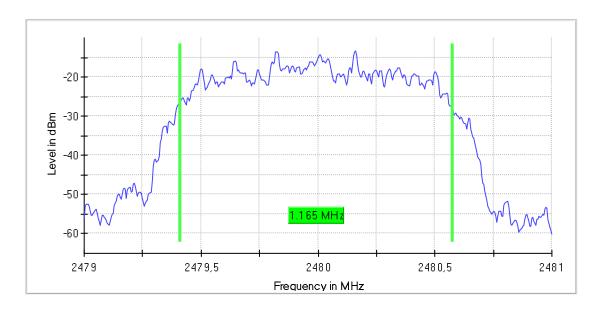
Test according to FCC title 47 part 15 \$15.247(a), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

# 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2480.000000	1.165000			2479.410000	2480.575000

(continuation of the "99 % Bandwidth" table from column 6 ...)

DUT Frequency	Result
(MHz)	
2480.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.47900 GHz	2.47900 GHz
Stop Frequency	2.48100 GHz	2.48100 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.07 dB	0.30 dB



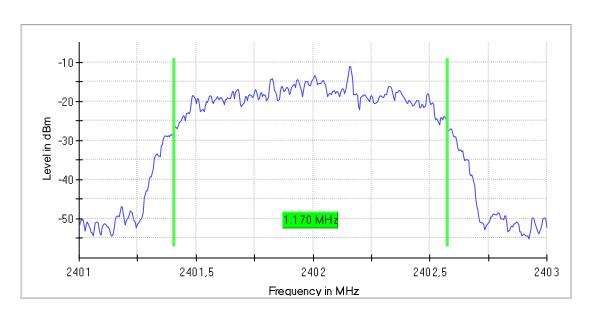
## 1.5.3. 3-DH5 Occupied Channel Bandwidth 99% (2402 MHz; 10,000 dBm; 1 MHz)

# 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2402.000000	1.170000			2401.405000	2402.575000

(continuation of the ''99 % Bandwidth' table from column  $\ 6 \dots$ )

DUT Frequency (MHz)	Result
2402.000000	PASS



Setting	Instrument	Target Value
	Value	
Start Frequency	2.40100 GHz	2.40100 GHz
Stop Frequency	2.40300 GHz	2.40300 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	5 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.05 dB	0.30 dB



# Occupied Channel Bandwidth 99% (2441 MHz; 10,000 dBm; 1 MHz; Test Mode)

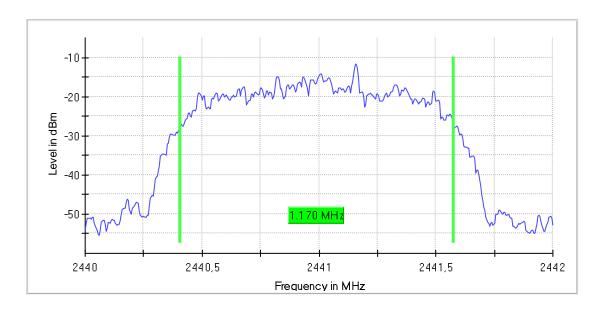
Test according to FCC title 47 part 15 \$15.247(a), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

# 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2441.000000	1.170000			2440.405000	2441.575000

(continuation of the "99 % Bandwidth" table from column 6 ...)

DUT Frequency (MHz)	Result
2441.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.44000 GHz	2.44000 GHz
Stop Frequency	2.44200 GHz	2.44200 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.10 dB	0.30 dB



# Occupied Channel Bandwidth 99% (2480 MHz; 10,000 dBm; 1 MHz; Test Mode)

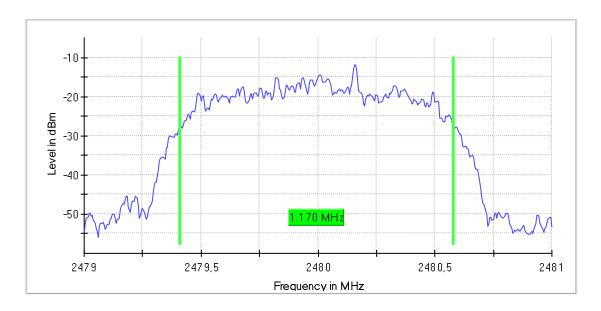
Test according to FCC title 47 part 15 \$15.247(a), KDB 558074 D01 DTS Meas Guidance v04 and ANSI C63.10-2013

# 99 % Bandwidth

DUT Frequency	Bandwidth	Limit Min	Limit Max	Band Edge Left	Band Edge Right
(MHz)	(MHz)	(MHz)	(MHz)	(MHz)	(MHz)
2480.000000	1.170000			2479.410000	2480.580000

(continuation of the "99 % Bandwidth" table from column 6 ...)

DUT Frequency	Result
(MHz)	
2480.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.47900 GHz	2.47900 GHz
Stop Frequency	2.48100 GHz	2.48100 GHz
Span	2.000 MHz	2.000 MHz
RBW	10.000 kHz	>= 10.000 kHz
VBW	30.000 kHz	>= 30.000 kHz
SweepPoints	401	~ 400
Sweeptime	80.000 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	500	500
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	AUTO
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.30 dB	0.30 dB
Run	4 / max. 150	max. 150
Stable	3/3	3
Max Stable Difference	0.04 dB	0.30 dB



## 1.6. Carrier Frequency Separation

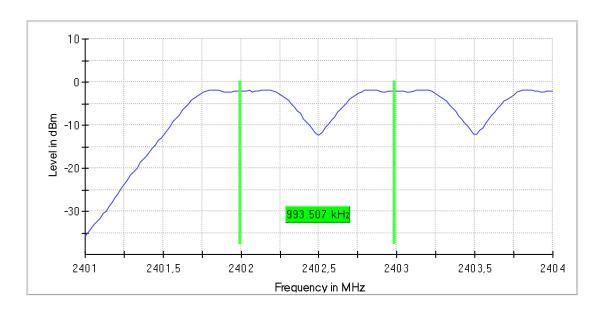
Carrier Frequency Separation (2402 MHz; 10,000 dBm; 1 MHz)

## Result

DUT Frequency (MHz)	Frequency Separation (MHz)	Limit Min (MHz)	Limit Max (MHz)	Center Frequency low Channel (MHz)	Center Frequency high Channel (MHz)
2402.000000	0.993507	0.623333		2401.993506	2402.987013

(continuation of the "Result" table from column 6 ...)

DUT Frequency (MHz)	Result
2402.000000	PASS



Setting	Instrument Value	Target Value
Start Frequency	2.40100 GHz	2.40100 GHz
Stop Frequency	2.40400 GHz	2.40400 GHz
Span	3.000 MHz	3.000 MHz
RBW	300.000 kHz	<= 300.000 kHz
VBW	300.000 kHz	>= 300.000 kHz
SweepPoints	155	~ 10
Sweeptime	2.500 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	Sweep
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	15 / max. 150	max. 150
Stable	10 / 10	10
Max Stable Difference	0.06 dB	0.50 dB



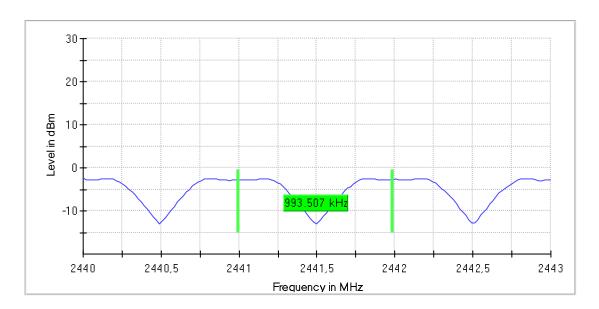
## Carrier Frequency Separation (2441 MHz; 10,000 dBm; 1 MHz)

## Result

DUT Frequency (MHz)	Frequency Separation (MHz)	Limit Min (MHz)	Limit Max (MHz)	Center Frequency low Channel (MHz)	Center Frequency high Channel (MHz)
2441.000000	0.993507	0.623333		2440.993506	2441.987013

(continuation of the ''Result'' table from column 6 ...)

DUT Frequency (MHz)	Result
2441.000000	PASS



Setting	Instrument	Target Value
~	Value	
Start Frequency	2.44000 GHz	2.44000 GHz
Stop Frequency	2.44300 GHz	2.44300 GHz
Span	3.000 MHz	3.000 MHz
RBW	300.000 kHz	<= 300.000 kHz
VBW	300.000 kHz	>= 300.000 kHz
SweepPoints	155	~ 10
Sweeptime	2.500 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	Sweep
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	12 / max. 150	max. 150
Stable	10 / 10	10
Max Stable Difference	0.00 dB	0.50 dB



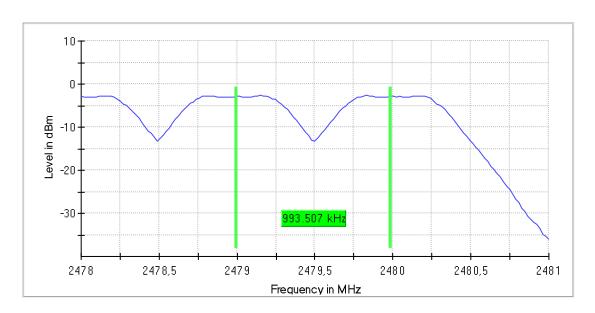
## Carrier Frequency Separation (2480 MHz; 10,000 dBm; 1 MHz)

#### Result

DUT Frequency (MHz)	Frequency Separation (MHz)	Limit Min (MHz)	Limit Max (MHz)	Center Frequency low Channel (MHz)	Center Frequency high Channel (MHz)
2480.000000	0.993507	0.623333		2478.993506	2479.987013

(continuation of the "Result" table from column 6 ...)

DUT Frequency (MHz)	Result
2480.000000	PASS

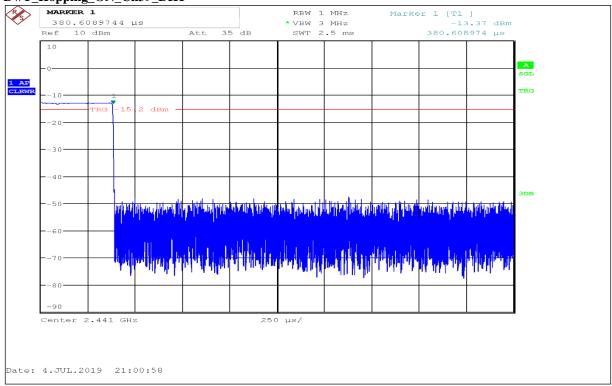


Setting	Instrument Value	Target Value
Start Frequency	2.47800 GHz	2.47800 GHz
Stop Frequency	2.48100 GHz	2.48100 GHz
Span	3.000 MHz	3.000 MHz
RBW	300.000 kHz	<= 300.000 kHz
VBW	300.000 kHz	>= 300.000 kHz
SweepPoints	155	~ 10
Sweeptime	2.500 ms	AUTO
Reference Level	-10.000 dBm	-10.000 dBm
Attenuation	15.000 dB	AUTO
Detector	MaxPeak	MaxPeak
SweepCount	200	200
Filter	3 dB	3 dB
Trace Mode	Max Hold	Max Hold
Sweeptype	Sweep	Sweep
Preamp	off	off
Stablemode	Trace	Trace
Stablevalue	0.50 dB	0.50 dB
Run	13 / max. 150	max. 150
Stable	10 / 10	10
Max Stable Difference	0.21 dB	0.50 dB

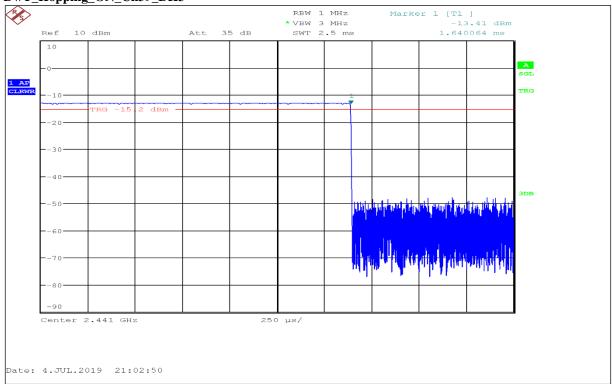


## 1.7. Time of Channel occupancy

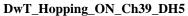
## DwT\_Hopping\_ON\_Ch39\_DH1

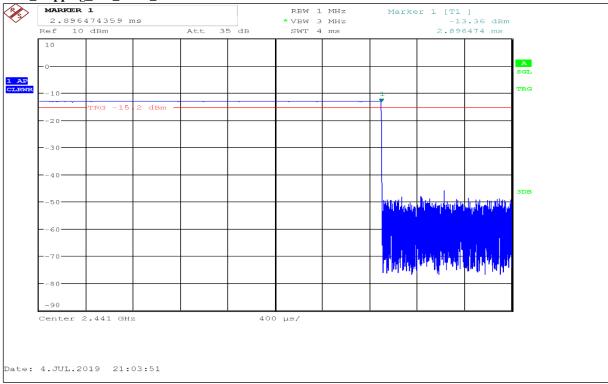


## $DwT\_Hopping\_ON\_Ch39\_DH3$





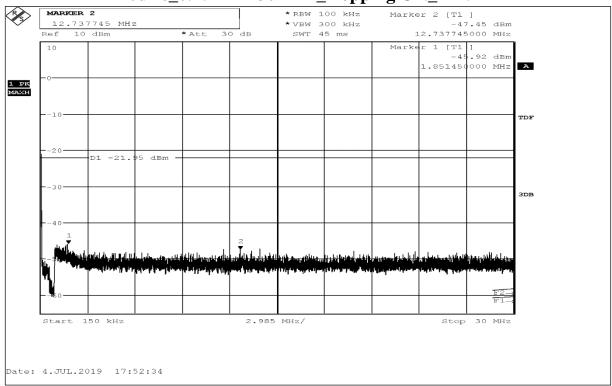




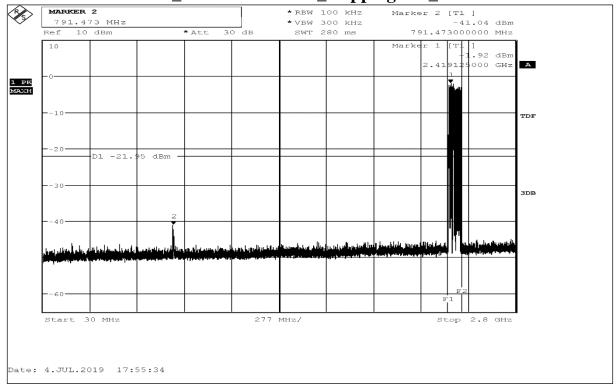


# **1.8. 20dBc Conducted Spurious Emissions 1.8.1. Hopping ON**

## 20dBc\_0.15MHz-30MHz\_Hopping ON\_DH5

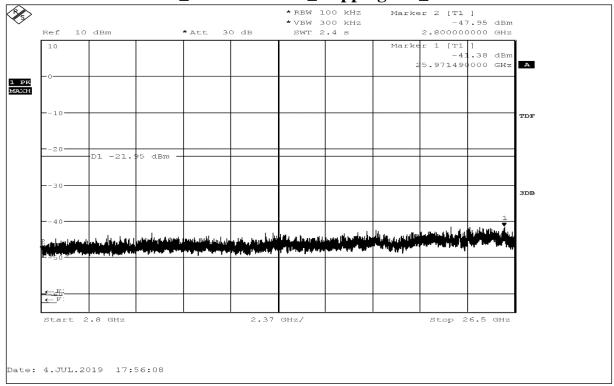


## $20dBc\_0.30MHz\text{-}2.8Ghz\_Hopping\ ON\_DH5$

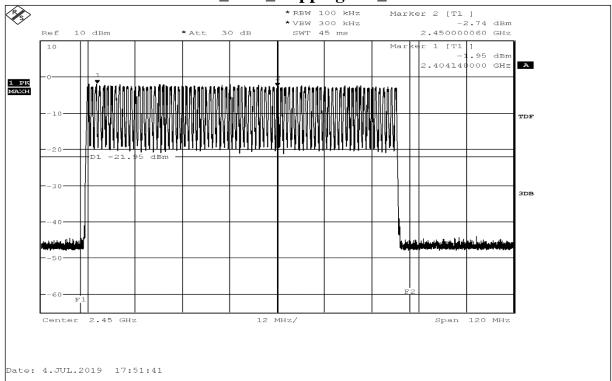




## 20dBc\_2.8GHz-26Ghz\_Hopping ON\_DH5



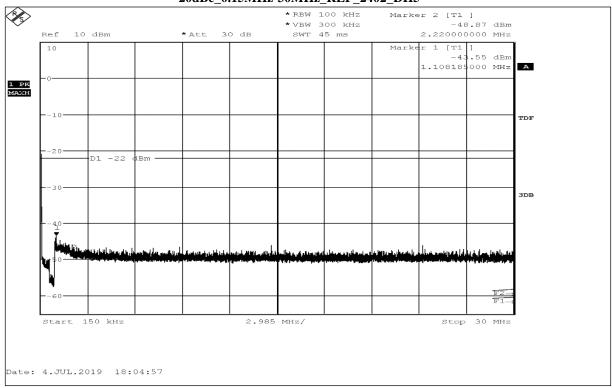
## $20 dBc\_REF\_Hopping\ ON\_DH5$



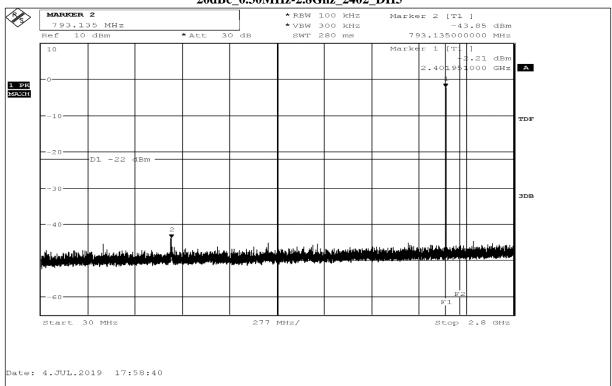


## 1.8.2. Hopping OFF

**DH5**20dBc\_0.15MHz-30MHz\_REF\_2402\_DH5

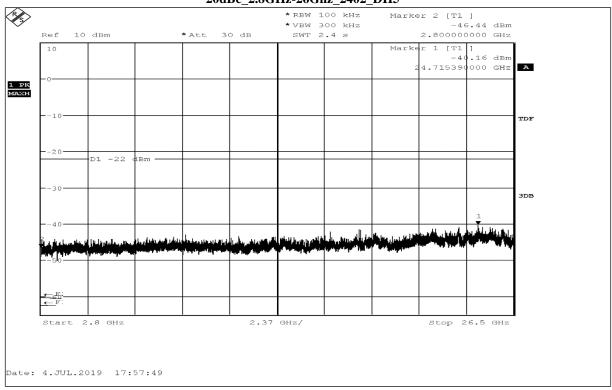


## $20dBc\_0.30MHz\hbox{-}2.8Ghz\_2402\_DH5$

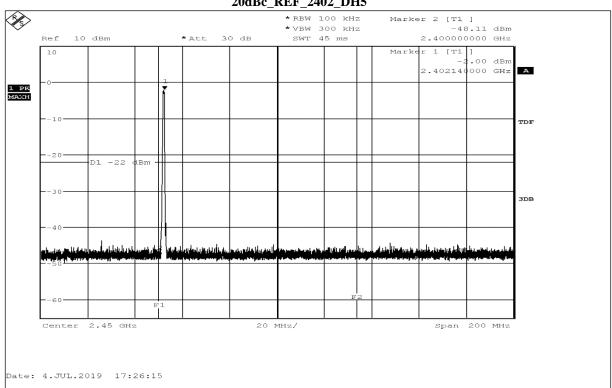




## $20dBc\_2.8GHz-26Ghz\_2402\_DH5$



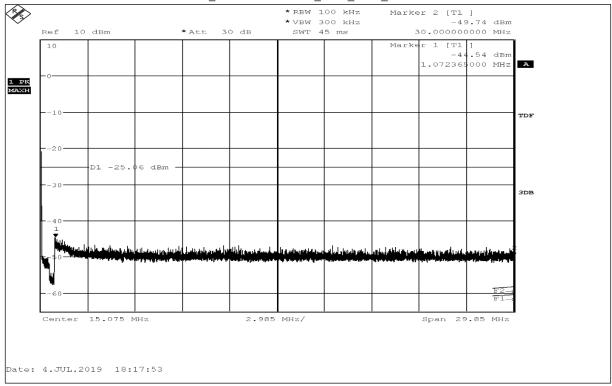
## 20dBc\_REF\_2402\_DH5



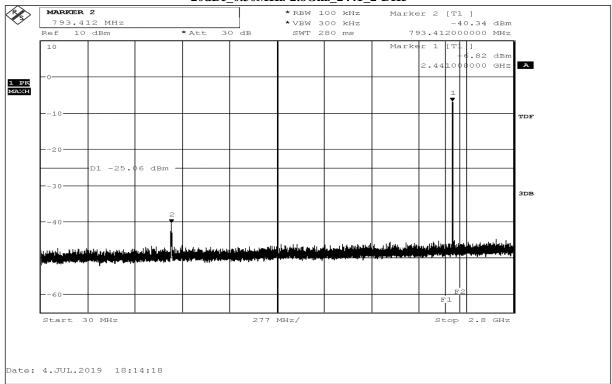


## 2-DH5

## $20dBc\_0.15MHz-30MHz\_REF\_2441\_2-DH5$

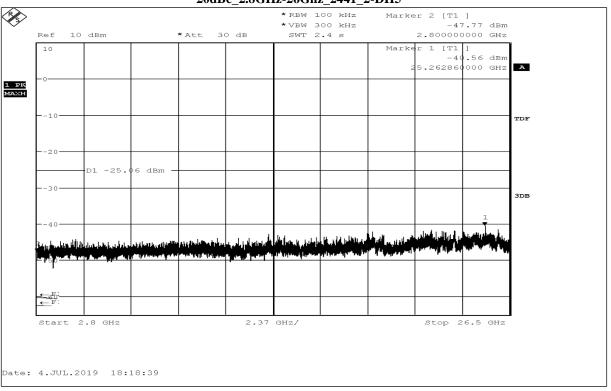


## $20dBc\_0.30MHz\text{-}2.8Ghz\_2441\_2\text{-}DH5$

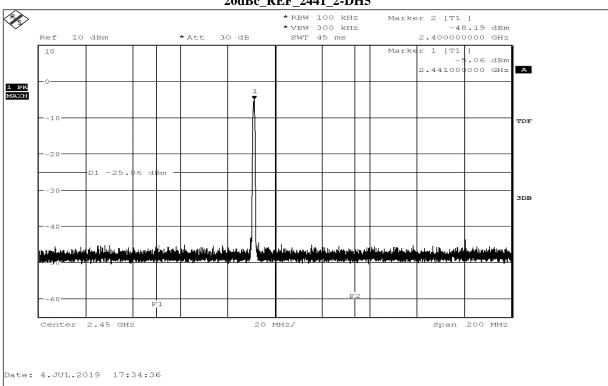




## $20dBc\_2.8GHz-26Ghz\_2441\_2-DH5$



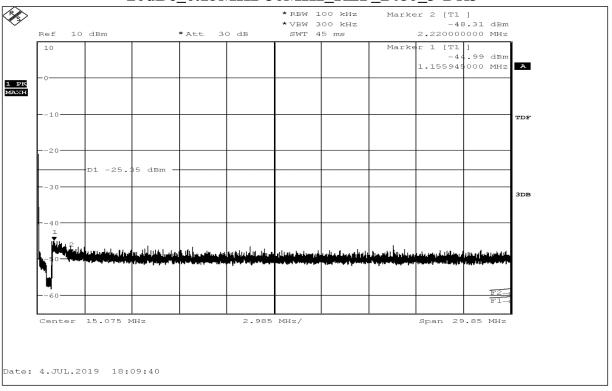
## 20dBc\_REF\_2441\_2-DH5



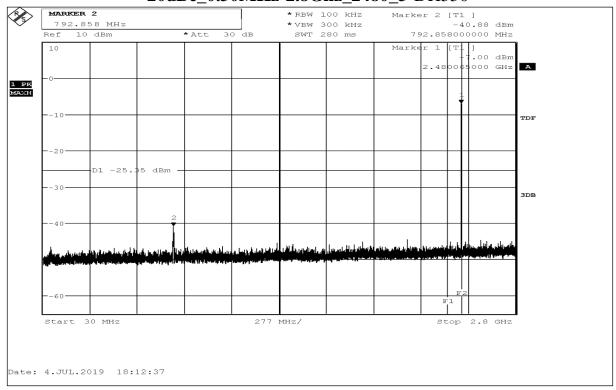


3-DH5

## 20dBc 0.15MHz-30MHz REF 2480 3-DH5

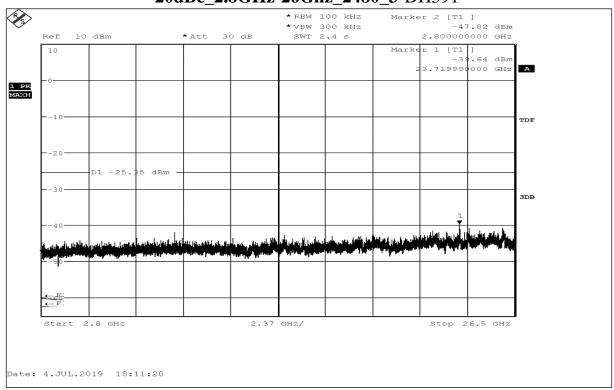


## 20dBc\_0.30MHz-2.8Ghz\_2480\_3-DH550

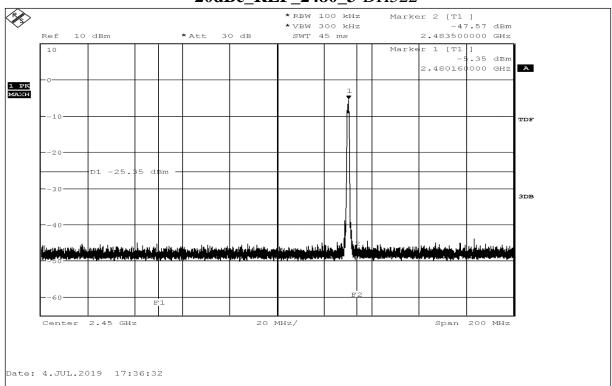




## 20dBc\_2.8GHz-26Ghz\_2480\_3-DH591



## 20dBc\_REF\_2480\_3-DH522





# 1.9. Frequency Stability 1.9.1. Tmin – Vnom

			Tnom -	- Vnom	Tmin	- Vnom
Modulation	Channel	99% OBW	left	right	left	right
			Bandedge	Bandedge	Bandedge	Bandedge
	MHz	in MHz	in Hz	in Hz	in Hz	in Hz
DH5	2402	0.875000	2401.550000	2402.430000	2401.550000	2402.425000
	2441	0.870000	2440.555000	2441.425000	2440.550000	2441.420000
	2480	0.875000	2479.555000	2480.430000	2479.550000	2480.420000
2-DH5	2402	1.170000	2401.405000	2402.575000	2401.400000	2402.570000
	2441	1.170000	2440.405000	2441.575000	2440.400000	2441.570000
	2480	1.165000	2479.410000	2480.575000	2479.400000	2480.570000
3-DH5	2402	1.170000	2401.405000	2402.575000	2401.400000	2402.570000
	2441	1.170000	2440.405000	2441.575000	2440.400000	2441.570000
	2480	1.170000	2479.410000	2480.580000	2479.400000	2480.570000

## 1.9.2. Tmax - Vnom

			Tnom	- Vnom	Tmax	- Vnom
Modulation	Channel	99% OBW	left	right	left	right
			Bandedge	Bandedge	Bandedge	Bandedge
	MHz	in MHz	in Hz	in Hz	in Hz	in Hz
DH5	2402	0.875000	2401.550000	2402.430000	2401.510000	2402.385000
	2441	0.870000	2440.555000	2441.425000	2440.505000	2441.380000
	2480	0.875000	2479.555000	2480.430000	2479.510000	2480.380000
2-DH5	2402	1.170000	2401.405000	2402.575000	2401.360000	2402.530000
	2441	1.170000	2440.405000	2441.575000	2440.360000	2441.530000
	2480	1.165000	2479.410000	2480.575000	2479.360000	2480.535000
3-DH5	2402	1.170000	2401.405000	2402.575000	2401.360000	2402.530000
	2441	1.170000	2440.405000	2441.575000	2440.360000	2441.530000
	2480	1.170000	2479.410000	2480.580000	2479.365000	2480.535000

## 1.9.3. Tnom - Vmin

1.7.5. 1110111	¥ 111111					
			Tnom	- Vnom	Tnom	- Vmin
Modulation	Channel	99% OBW	left	right	left Bandedge	right
			Bandedge	Bandedge	icit Dandeuge	Bandedge
	MHz	in MHz	in Hz	in Hz	in Hz	in Hz
DH5	2402	0.875000	2401.550000	2402.430000	2401.520000	2402.395000
	2441	0.870000	2440.555000	2441.425000	2440.520000	2441.390000
	2480	0.875000	2479.555000	2480.430000	2479.520000	2480.390000
2-DH5	2402	1.170000	2401.405000	2402.575000	2401.370000	2402.540000
	2441	1.170000	2440.405000	2441.575000	2440.370000	2441.540000
	2480	1.165000	2479.410000	2480.575000	2479.370000	2480.540000
3-DH5	2402	1.170000	2401.405000	2402.575000	2401.370000	2402.540000
	2441	1.170000	2440.405000	2441.575000	2440.370000	2441.540000
	2480	1.170000	2479.410000	2480.580000	2479.375000	2480.545000



## **1.9.4.** Tnom – Vmax

			_		_	
		99%	Tnom	- Vnom	Tnom	- Vmax
Modulation	Channel		left	right	1 C D 1 1	right
		OBW	Bandedge	Bandedge	left Bandedge	Bandedge
	MHz	in MHz	in Hz	in Hz	in Hz	in Hz
DH5	2402	0.875000	2401.550000	2402.430000	2401.520000	2402.385000
	2441	0.870000	2440.555000	2441.425000	2440.510000	2441.390000
	2480	0.875000	2479.555000	2480.430000	2479.515000	2480.385000
2-DH5	2402	1.170000	2401.405000	2402.575000	2401.365000	2402.535000
	2441	1.170000	2440.405000	2441.575000	2440.365000	2441.535000
	2480	1.165000	2479.410000	2480.575000	2479.370000	2480.540000
3-DH5	2402	1.170000	2401.405000	2402.575000	2401.365000	2402.535000
	2441	1.170000	2440.405000	2441.575000	2440.365000	2441.540000
	2480	1.170000	2479.410000	2480.580000	2479.370000	2480.540000



## 2. Radiated Field Strength Measurements

## 2.1. Magnetic field emissions radiated Bluetooth BDR below 30 MHz

# 2.01a\_BT BR\_DH5\_ch 00

#### **Common Information**

Test description: Magnetic Field Strength Measurement related to 30/300 m distance

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Test software: EMC32 V9.25.0

Distance correction: used accord. table, pls. see test report

Technical Data: Please see page 2 for detailed data of measurement setup Rec. antenna (pre-scan): height 1.00 m, parallel and 90° to EUT polarisation

Used filter: bypass

Test specification: FCC 15.205 § 15.209; RSS-Gen: Issue 4

Operator: HEl

Operating Mode: BT BR | DH5 | ch00
Comment 1: Eut is Laying

Environmental Conditions:: Humidity: 56,1%rH; Temperature: 21,8°C

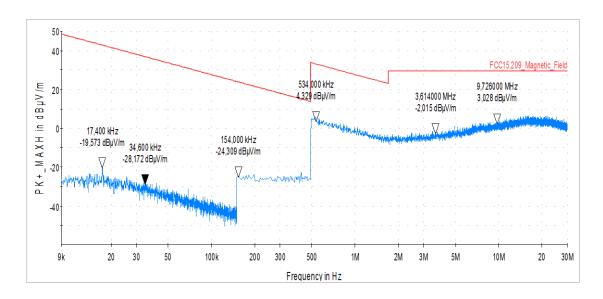
EUT Setup: 1
Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN





# 2.01b\_BT BR\_DH5\_ch 00

## **Common Information**

Test description: Magnetic Field Strength Measurement related to 30/300 m distance

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC32 V9.25.0

Distance correction: used accord. table, pls. see test report

Technical Data: Please see page 2 for detailed data of measurement setup Rec. antenna (pre-scan): height 1.00 m, parallel and 90° to EUT polarisation

Used filter: bypass

Test specification: FCC 15.205 § 15.209; RSS-Gen: Issue 4

Operator: HEi

Operating Mode: BT BR | DH5 | ch00
Comment 1: Eut is Standing

Environmental Conditions:: Humidity: 58,6%rH; Temperature: 21,9°C

EUT Setup:

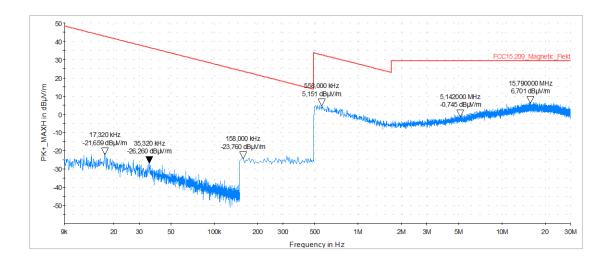
Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN





## 2.02a\_BT EDR\_2-DH5\_ch 39

#### **Common Information**

Test description: Magnetic Field Strength Measurement related to 30/300 m distance

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC32 V9.25.0

Distance correction: used accord. table, pls. see test report

Technical Data: Please see page 2 for detailed data of measurement setup Rec. antenna (pre-scan): height 1.00 m, parallel and 90° to EUT polarisation

Used filter: bypass

Test specification: FCC 15.205 § 15.209; RSS-Gen: Issue 4

Operator: HEl

Operating Mode: BT EDR | 2-DH5 | ch39

Comment 1: Eut is Laying

Environmental Conditions:: Humidity: 61,0%rH; Temperature: 22,1°C

EUT Setup: 1

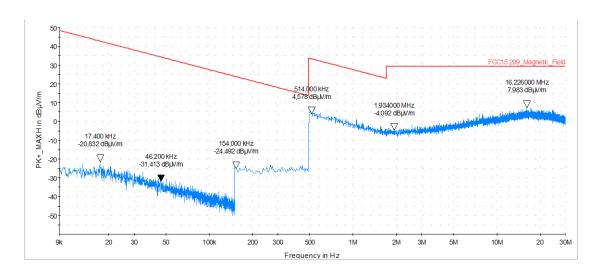
Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN





## 2.02b\_BT EDR\_2-DH5\_ch 39

#### **Common Information**

Test description: Magnetic Field Strength Measurement related to 30/300 m distance

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC32 V9.25.0

Distance correction: used accord. table, pls. see test report

Technical Data: Please see page 2 for detailed data of measurement setup Rec. antenna (pre-scan): height 1.00 m, parallel and 90° to EUT polarisation

Used filter: bypass

Test specification: FCC 15.205 § 15.209; RSS-Gen: Issue 4

Operator: HEl

Operating Mode: BT EDR | 2-DH5 | ch39

Comment 1: Eut is Standing

Environmental Conditions:: Humidity: 59,3%rH; Temperature: 22,0°C

EUT Setup: 1

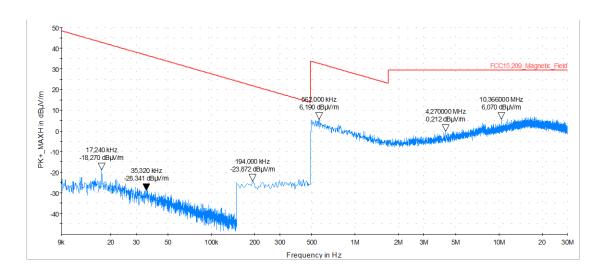
Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN





## 2.03a\_BT EDR\_3-DH5\_ch 78

#### **Common Information**

Test description: Magnetic Field Strength Measurement related to 30/300 m distance

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC32 V9.25.0

Distance correction: used accord. table, pls. see test report

Technical Data: Please see page 2 for detailed data of measurement setup Rec. antenna (pre-scan): height 1.00 m, parallel and 90° to EUT polarisation

Used filter: bypass

Test specification: FCC 15.205 § 15.209; RSS-Gen: Issue 4

Operator: HE

Operating Mode: BT EDR | 3-DH5 | ch78

Comment 1: Eut is Laying

Environmental Conditions:: Humidity: 62,3%rH; Temperature: 22,4°C

EUT Setup:

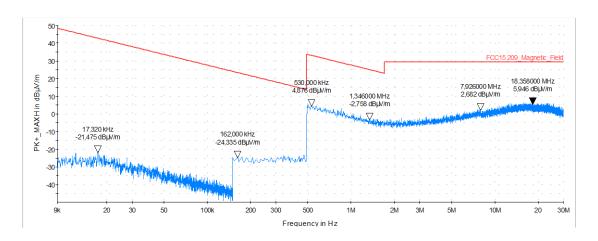
Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN





## 2.03b\_BT EDR\_3-DH5\_ch 78

#### **Common Information**

Test description: Magnetic Field Strength Measurement related to 30/300 m distance

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC32 V9.25.0

Distance correction: used accord. table, pls. see test report

Technical Data: Please see page 2 for detailed data of measurement setup Rec. antenna (pre-scan): height 1.00 m, parallel and 90° to EUT polarisation

Used filter: bypass

Test specification: FCC 15.205 § 15.209; RSS-Gen: Issue 4

Operator: HE

Operating Mode: BT EDR | 3-DH5 | ch78

Comment 1: Eut is Standing

Environmental Conditions:: Humidity: 64,6%rH; Temperature: 22,4°C

EUT Setup:

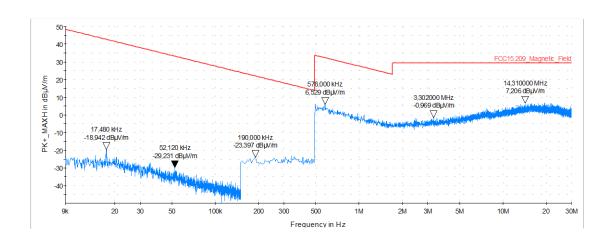
Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN





# 2.30a\_ W-LAN5GHz+BT \_Laying

#### **Common Information**

Test description: Magnetic Field Strength Measurement related to 30/300 m distance

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC32 V9.25.0

Distance correction: used accord. table, pls. see test report

Technical Data: Please see page 2 for detailed data of measurement setup Rec. antenna (pre-scan): height 1.00 m, parallel and 90° to EUT polarisation

Used filter: bypass

Test specification: FCC 15.205 § 15.209; RSS-Gen: Issue 4

Operator: MKh

Operating Mode: SImultaneousTransmissions\_W-LAN5GHZ+BT

Comment 1: Eut is Laying

Environmental Conditions:: Humidity: 63,5%rH; Temperature: 21,7°C

EUT Setup: Standing Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

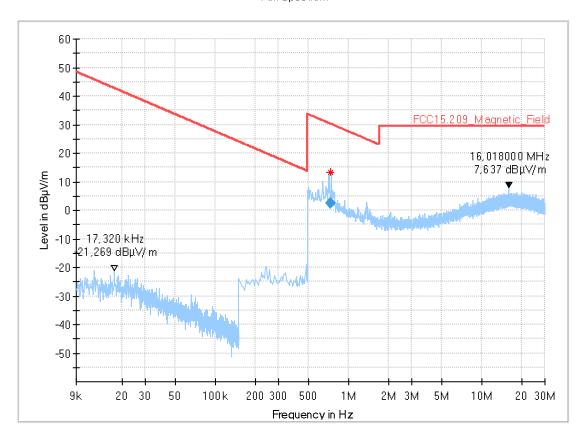
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





# 2.30b\_W-LAN5GHz+BT\_Standing

#### **Common Information**

Test description: Magnetic Field Strength Measurement related to 30/300 m distance

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC32 V9.25.0

Distance correction: used accord. table, pls. see test report

Technical Data: Please see page 2 for detailed data of measurement setup Rec. antenna (pre-scan): height 1.00 m, parallel and 90° to EUT polarisation

Used filter: bypass

Test specification: FCC 15.205 § 15.209; RSS-Gen: Issue 4

Operator: MKh

Operating Mode: SImultaneousTransmissions\_W-LAN5GHZ+BT

Comment 1: Eut is Standing

Environmental Conditions:: Humidity: 63,3%rH; Temperature: 21,8°C

EUT Setup: Laying Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

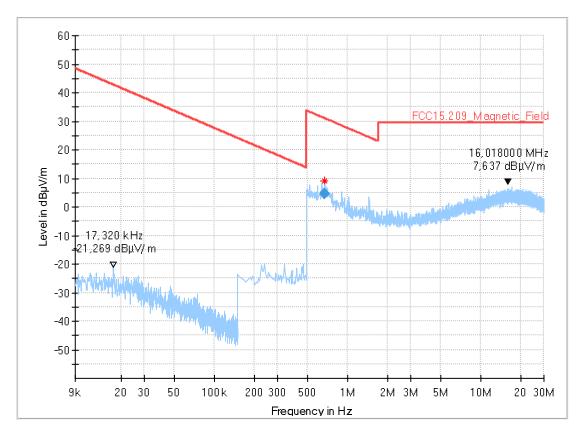
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





## 2.2. Spurious emissions radiated Bluetooth BDR 30 MHz to 1 GHz

## 3.01a

## **Common Information**

Test description: Electric Field Strength Measurement

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC.V9.25.00

Technical Data: Please see page 2 for detailed data of measurement setup

Test specification.: FCC 15.209; RSS-Gen: Issue 3

Operator: TFra

Operating Mode: BT BR | DH5 | ch00

Power during tests: 13,5V DC

Environmental Conditions:: Humidity: 31,3%rH; Temperature: 20,4°C

Comments: EUT is laying

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

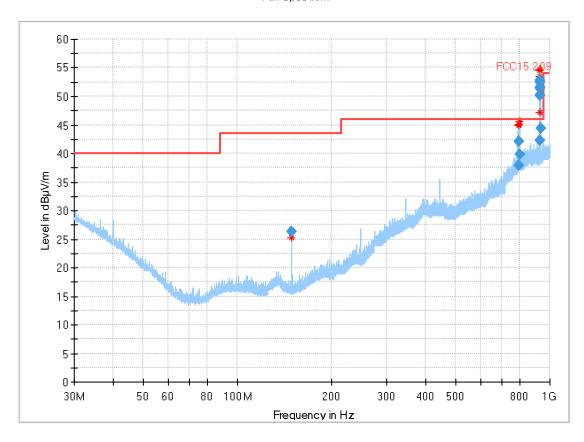
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





## Final\_Result

Frequency (MHz)	QuasiP eak (dBµV	Limit (dBµV /m)	Margin (dB)	Bandwid th (kHz)	Heig ht (cm)	Pol	Azimu th (deg)	Cor r. (dB)	Remarks
	/m)	/111)		(KIIZ)	(CIII)		(deg)	(ub)	
148.500000	26.38	43.50	17.12	120.000	105.0	V	3.0	8.6	EUT interferer
792.896000	42.14	46.00	3.86	120.000	299.0	V	152.0	25.1	Temporar external broadband interferer
796.272000	37.85	46.00	8.15	120.000	247.0	V	268.0	25.2	LTE Band 8 -> not due EUT
799.484000	39.91	46.00	6.10	120.000	185.0	Н	134.0	25.3	LTE Band 8 -> not due EOT
926.816000	50.09	46.00	-4.09	120.000	221.0	Н	332.0	27.0	
926.852000	52.39	46.00	-6.39	120.000	336.0	V	225.0	27.0	
927.180000	52.87	46.00	-6.87	120.000	109.0	V	89.0	27.0	
927.816000	50.20	46.00	-4.20	120.000	234.0	V	326.0	27.0	Temporar external broadband interferer
928.280000	51.45	46.00	-5.45	120.000	224.0	V	289.0	27.0	LTE or W-CDMA Band 1 -> not due EUT
928.720000	51.66	46.00	-5.66	120.000	303.0	Н	53.0	27.0	
931.740000	42.34	46.00	3.66	120.000	269.0	Н	117.0	27.0	
933.408000	44.32	46.00	1.68	120.000	178.0	V	69.0	26.9	

External interferers visible on diagram -> not relevant for results



## 3.01b

## **Common Information**

Test description: Electric Field Strength Measurement

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC.V9.25.00

Technical Data: Please see page 2 for detailed data of measurement setup

Test specification.: FCC 15.209; RSS-Gen: Issue 3

Operator: TFra

Operating Mode: BT BR | DH5 | ch00

Power during tests: 13,5V DC

Environmental Conditions:: Humidity: 31,3%rH; Temperature: 20,4°C

Comments: EUT is standing

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

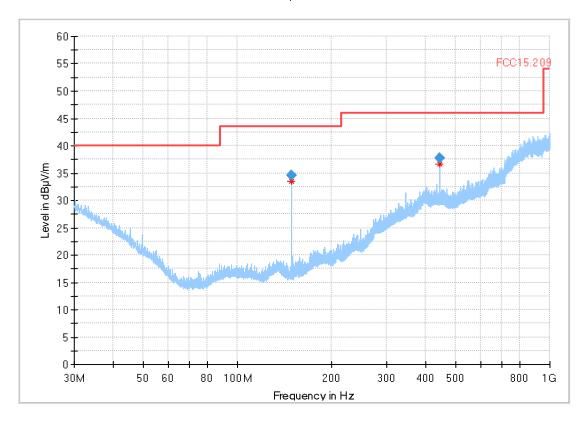
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

Full Spectrum



Frequency (MHz)	QuasiP eak (dBµV /m)	Limit (dBµV /m)	Margin (dB)	Bandwid th (kHz)	Heig ht (cm)	Pol	Azimu th (deg)	Cor r. (dB)
1.10 =00000								
148.500000	34.48	43.50	9.02	120.000	105.0	V	0.0	8.6



## 3.02a

## **Common Information**

Test description: Electric Field Strength Measurement

Test site and distance: Ref.-Nr. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC.V9.25.00

Technical Data: Please see page 2 for detailed data of measurement setup

Test specification.: FCC 15.209; RSS-Gen: Issue 3

Operator: TFra

Operating Mode: BT BR | 2-DH5 | ch39

Power during tests: 13,5V DC

Environmental Conditions:: Humidity: 31,3%rH; Temperature: 20,4°C

Comments: EUT is laying

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

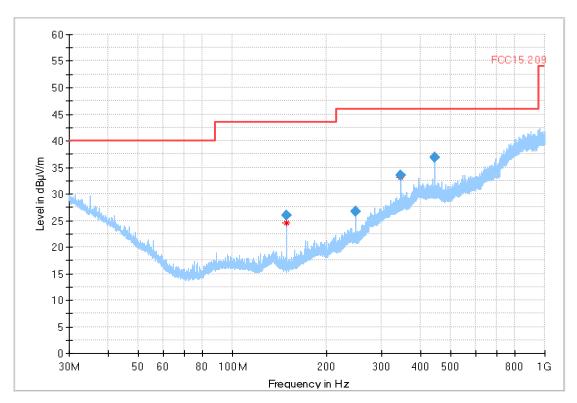
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

#### Full Spectrum



I IIIui_Itobu								
Frequency	QuasiP	Limit	Margin	Bandwid	Heig	Pol	Azimu	Cor
(MHz)	eak	(dBµV	(dB)	th	ht		th	r.
	(dBµV	/m)		(kHz)	(cm)		(deg)	(dB)
	/m)							
148.500000	25.98	43.50	17.52	120.000	105.0	V	0.0	8.6
247.500000	26.69	46.00	19.31	120.000	105.0	Н	81.0	13.1
346.500000	33.54	46.00	12.46	120.000	109.0	Н	25.0	16.6
445.500000	36.92	46.00	9.08	120.000	170.0	Н	75.0	19.4



## 3.02b

## **Common Information**

Test description: Electric Field Strength Measurement

Test site and distance: Ref.-Nr. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC.V9.25.00

Technical Data: Please see page 2 for detailed data of measurement setup

Test specification.: FCC 15.209; RSS-Gen: Issue 3

Operator: TFra

Operating Mode: BT BR | 2-DH5 | ch39

Power during tests: 13,5V DC

Environmental Conditions:: Humidity: 31,3%rH; Temperature: 20,4°C

Comments: EUT is standing

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

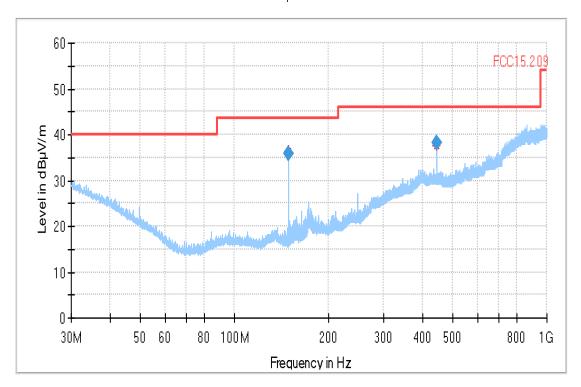
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

Full Spectrum



Frequency (MHz)	QuasiP eak (dBµV /m)	Limit (dBµV /m)	Margin (dB)	Bandwid th (kHz)	Heig ht (cm)	Pol	Azimu th (deg)	Cor r. (dB)
148.500000	35.71	43.50	7.79	120.000	105.0	V	14.0	8.6
445.500000	38.08	46.00	7.92	120.000	118.0	V	60.0	19.4



## 3.03a

## **Common Information**

Test description: Electric Field Strength Measurement

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC.V9.25.00

Technical Data: Please see page 2 for detailed data of measurement setup

Test specification.: FCC 15.209; RSS-Gen: Issue 3

Operator: TFra

Operating Mode: BT BR | 3-DH5 | ch78

Power during tests: 13,5V DC

Environmental Conditions:: Humidity: 31,3%rH; Temperature: 20,4°C

Comments: EUT is Laying

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

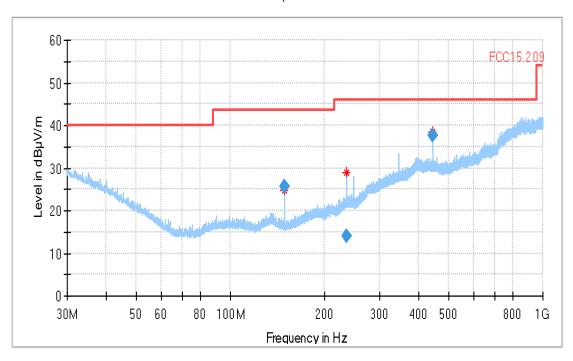
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

#### Full Spectrum



Frequency (MHz)	QuasiP eak (dBµV /m)	Limit (dBµV /m)	Margin (dB)	Bandwid th (kHz)	Heig ht (cm)	Pol	Azimu th (deg)	Cor r. (dB)
148.500000	25.56	43.50	17.94	120.000	109.0	V	0.0	8.6
235.196000	13.93	46.00	32.07	120.000	261.0	Н	173.0	13.1
445.500000	37.50	46.00	8.50	120.000	179.0	Н	83.0	19.4



## 3.03b

## **Common Information**

Test description: Electric Field Strength Measurement

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC.V9.25.00

Technical Data: Please see page 2 for detailed data of measurement setup

Test specification.: FCC 15.209; RSS-Gen: Issue 3

Operator: TFra

Operating Mode: BT BR | 3-DH5 | ch78

Power during tests: 13,5V DC

Environmental Conditions:: Humidity: 31,3%rH; Temperature: 20,4°C

Comments: EUT is standing

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

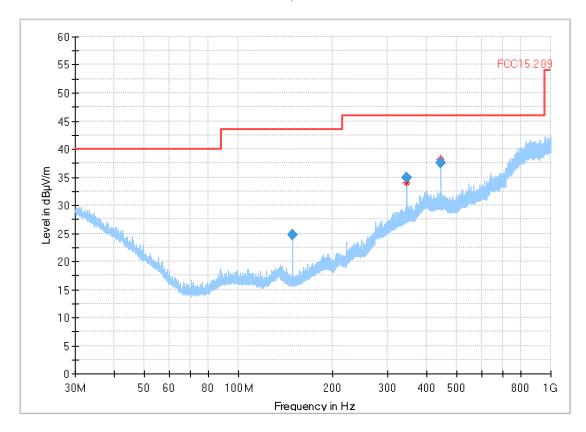
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

Full Spectrum



Frequency (MHz)	QuasiP eak (dBµV /m)	Limit (dBµV /m)	Margin (dB)	Bandwid th (kHz)	Heig ht (cm)	Pol	Azimu th (deg)	Cor r. (dB)
148.500000	24.79	43.50	18.71	120.000	118.0	V	259.0	8.6
346.500000	34.96	46.00	11.04	120.000	136.0	V	6.0	16.6
445.500000	37.54	46.00	8.46	120.000	109.0	V	63.0	19.4



# 3.30a\_W-LAN5GHz+BT\_standing

## **Common Information**

Test description: Electric Field Strength Measurement

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC.V9.25.00

Technical Data: Please see page 2 for detailed data of measurement setup

Test specification.: FCC 15.209; RSS-Gen: Issue 3

Operator: MKh

Operating Mode: SimultaneousTransmissions\_W-LAN5GHZ+BT

Power during tests: 13,5V DC

Environmental Conditions:: Humidity: 65,1%rH; Temperature: 21,2°C Comment: mobilephoneON\_WLANRouter\_Iperf

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

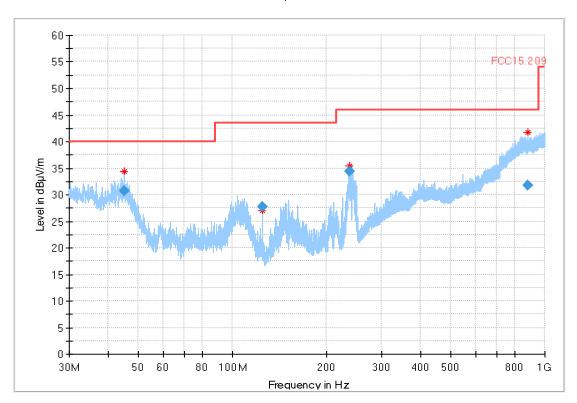
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

#### Full Spectrum



r mai_ixcsu	11							
Frequency (MHz)	QuasiP eak (dBµV /m)	Limit (dBµV /m)	Margin (dB)	Bandwid th (kHz)	Heig ht (cm)	Pol	Azimu th (deg)	Cor r. (dB)
45.048000	30.71	40.00	9.29	120.000	105.0	V	329.0	15.0
124.996000	27.75	43.50	15.75	120.000	153.0	V	276.0	8.2
237.400000	34.43	46.00	11.57	120.000	161.0	Н	207.0	13.1
884.128000	31.80	46.00	14.20	120.000	360.0	V	293.0	26.9



# 3.30a\_W-LAN5GHz+BT\_laying

## **Common Information**

Test description: Electric Field Strength Measurement

Test site and distance: Ref.-No. 441 Semi Anechoic Room (SAR) with 3 m measurement distance

Version of Testsoftware: EMC.V9.25.00

Technical Data: Please see page 2 for detailed data of measurement setup

Test specification.: FCC 15.209; RSS-Gen: Issue 3

Operator: Mkh/Mah

Operating Mode: SImultaneousTransmissions\_W-LAN5GHZ+BT

Power during tests: 13,5V DC

Environmental Conditions:: Humidity: 66,0%rH; Temperature: 21,2°C Comment: MobilephoneON\_WLANRouter\_Iperf

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

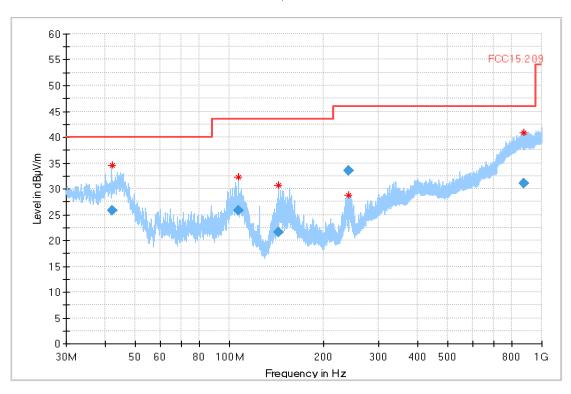
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

#### Full Spectrum



Frequency (MHz)	QuasiP eak (dBµV /m)	Limit (dBµV /m)	Margin (dB)	Bandwid th (kHz)	Heig ht (cm)	Pol	Azimu th (deg)	Cor r. (dB)
42.060000	25.77	40.00	14.23	120.000	299.0	Н	11.0	16.3
106.752000	25.80	43.50	17.70	120.000	297.0	Н	177.0	8.1
143.240000	21.66	43.50	21.85	120.000	249.0	Н	332.0	8.7
240.000000	33.54	46.00	12.46	120.000	120.0	Н	215.0	13.1
877.260000	31.12	46.00	14.88	120.000	333.0	Н	68.0	26.2



## 2.3. Spurious emissions radiated Bluetooth BDR 1 GHz to 18 GHz

## 4.01a

#### **Common Information**

Test Description: Radiated field strength emission in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT BR | DH5 | ch00

Operator: npe

Comment: Channel no. low
Comment2: Modulation Type: DH5

EUT Setup: 1
Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

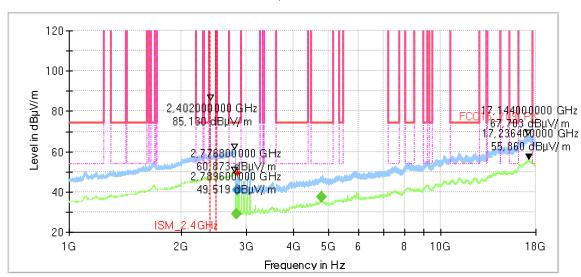
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

#### Full Spectrum



Frequency (MHz)	MaxPeak (dBμV/m)	Limit (dBµV/ m)	Margin (dB)	Meas. Time (ms)	Bandwidth (kHz)	Pol	Azimuth (deg)	Elevation (deg)	Corr. (dB/m)
2810.400000		54.00	25.23	100.0	1000.000	Н	-2.0	0.0	2
2829.200000	40.94	74.00	33.06	100.0	1000.000	Н	210.0	0.0	1
4784.400000		54.00	16.38	100.0	1000.000	V	160.0	0.0	6



## 4.02a

## **Common Information**

Test Description: Radiated field strength emission in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT TX 2-DH5

Operator: npe

Comment: Channel 39

Comment2: Modulation Type: 3-DH5

EUT Setup: 1

Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

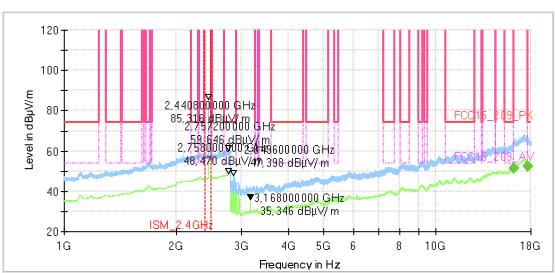
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

#### Full Spectrum



Frequency (MHz)	MaxPeak (dBμV/m)	Limit (dBµV/ m)	Margin (dB)	Meas. Time (ms)	Bandwidth (kHz)	Pol	Azimuth (deg)	Elevation (deg)	Corr. (dB/m)
16200.000000		54.00	2.76	100.0	1000.000	V	341.0	90.0	28
17705.200000		54.00	1.49	100.0	1000.000	Н	100.0	90.0	29



## 4.03a

## **Common Information**

Test Description: Radiated field strength emission in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT TX 3-DH5

Operator: npe

Comment: Channel 78

Comment2: Modulation Type: 3-DH5

EUT Setup: 1

Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

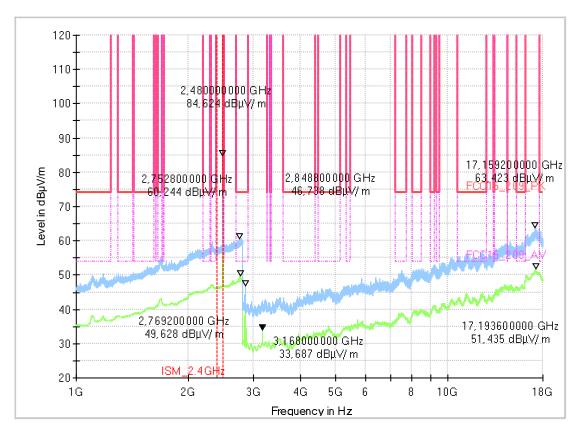
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





# 4.30a\_BT\_WLAN5

## **Common Information**

Test Description: Radiated field strength emission in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.407&15.209 Intentional Radiator

Antenna polarisation: horizontal/vertical

Software Version: #Ver

Operating Mode: BT + WLAN 5GHz

Operator: TFra
Comment: 1
EUT Setup: 1
Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

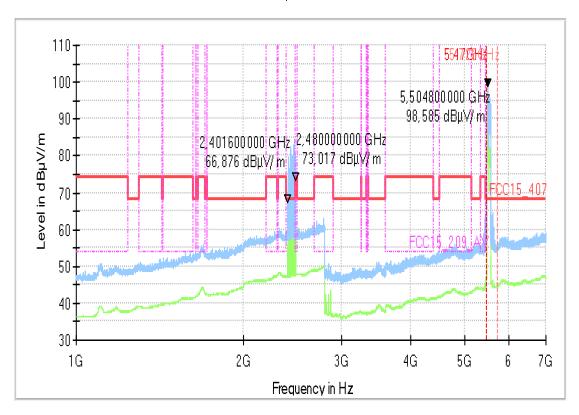
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





# 4.31a\_BT\_WLAN5

## **Common Information**

Test Description: Radiated field strength emission in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.407&15.209 Intentional Radiator

Antenna polarisation: horizontal/vertical

Software Version: #Ver

Operating Mode: BT + WLAN 5GHz

Operator: TFra
Comment: 1
EUT Setup: 1
Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

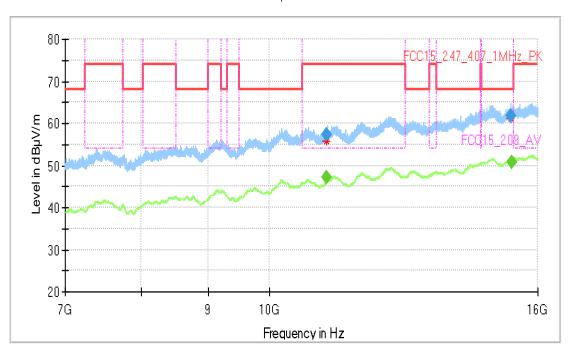
 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

## Full Spectrum

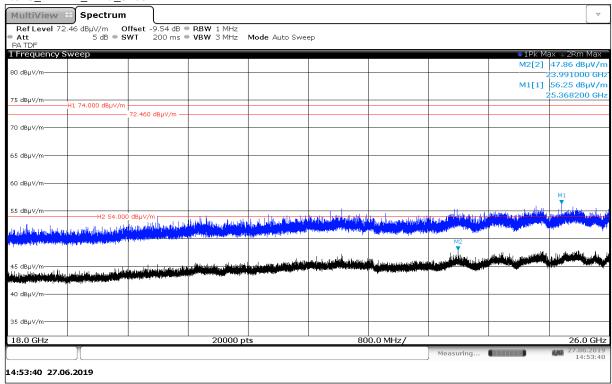


Frequency (MHz)	MaxPeak (dBµV/m)	Limit (dBµV/ m)	Margin (dB)	Meas. Time (ms)	Bandwidth (kHz)	Pol	Azimuth (deg)	Elevation (deg)	Corr. (dB/m)
11059.800000		54.00	6.92	100.0	1000.000	Н	42.0	0.0	25
11065.000000	57.26	74.00	16.74	100.0	1000.000	V	69.0	90.0	25
15267.800000	61.73	68.00	6.27	100.0	1000.000	V	10.0	0.0	31
15290.600000		150.00	99.34	100.0	1000.000	Н	291.0	0.0	31

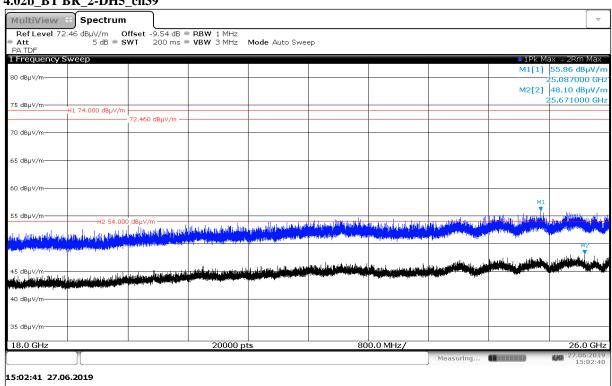


## 2.4. Spurious emissions radiated Bluetooth 18 GHz to 26.5 GHz

#### 4.01b\_BT BR\_DH5\_ch00

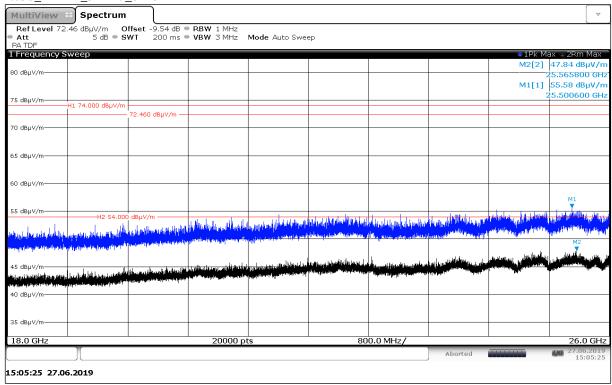


#### 4.02b BT BR 2-DH5 ch39

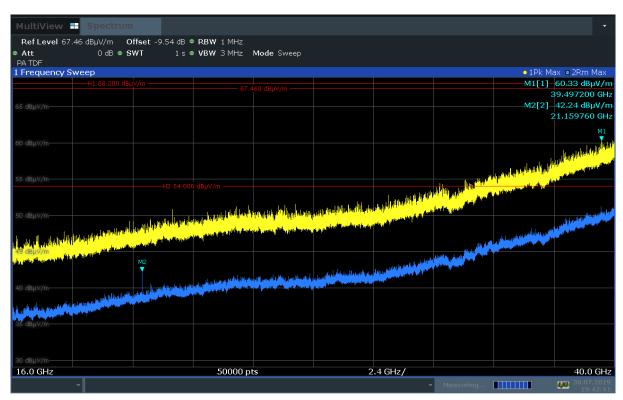




#### 4.03b\_BT BR\_3-DH5\_ch78



### 4.30b\_BT-WLAN5



19:42:42 30.07.2019



## 3. Radiated Band Edge Measurements

## 3.1. Radiated emissions on Bluetooth BDR band-edge low

# 9.01a\_BT\_EDR\_ch00

#### **Common Information**

Test Description: Band-Edge: Radiated Field Strength Emissions in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT TX 2-DH5 ch00

Operator: npe

Comment: Channel 00

Comment2: Modulation Type: 2-DH5

EUT Setup:

Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

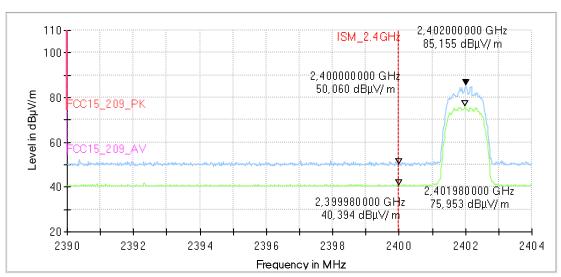
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





# 9.02a\_BT\_EDR\_ch00

#### **Common Information**

Test Description: Band-Edge: Radiated Field Strength Emissions in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BCTX3-dh5
Operator: RAbdurrahi
Comment: Channel no. low

Comment2: Modulation Type: 3-dh5

EUT Setup: 1

Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

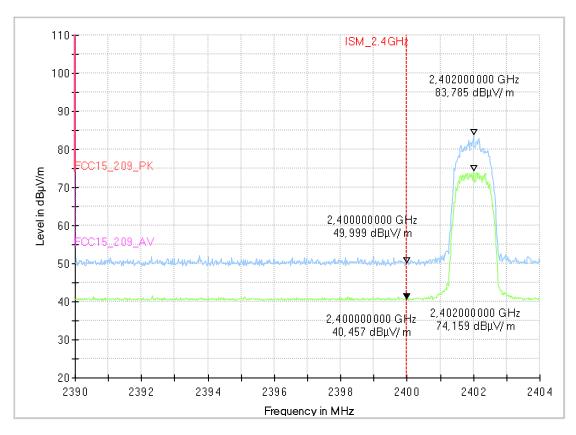
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





# 9.03a\_BT\_BDR\_ch00

#### **Common Information**

Test Description: Band-Edge: Radiated Field Strength Emissions in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT TX DH5 ch00

Operator: npe

Comment: Channel no. 00

Comment2: Modulation Type: DH5

EUT Setup:

Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

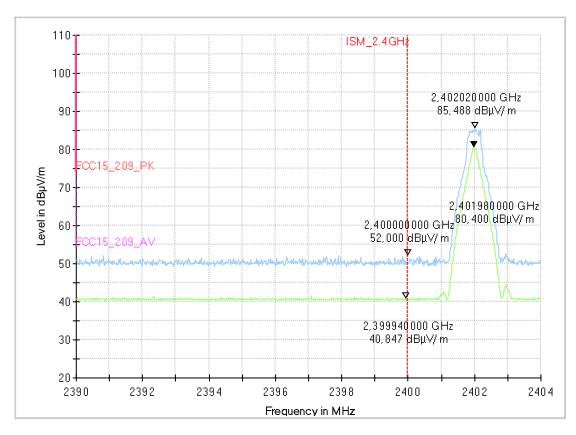
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





# 9.04a\_BT\_EDR\_ch00

#### **Common Information**

Test Description: Band-Edge: Radiated Field Strength Emissions in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT EDR DH-5 Hopping
Operator: RAbdurrahi/TFra
Comment: Channel no. low

EUT Setup:

Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

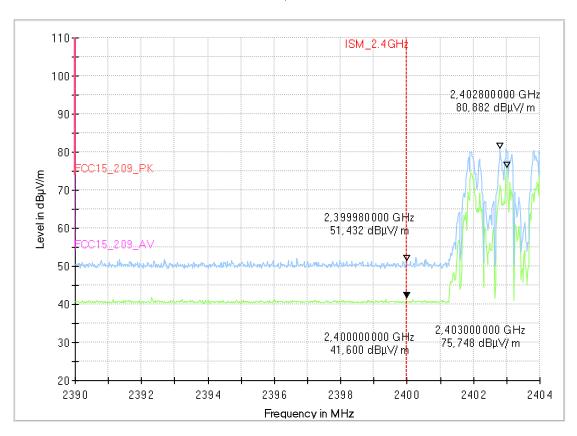
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





## 3.2. Radiated emissions on Bluetooth EDR band-edge high

# 9.01b\_BT\_EDR\_ch78

#### **Common Information**

Test Description: Band-Edge: Radiated Field Strength Emissions in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT TX 2-DH5 ch78

Operator: npe

Comment: Channel no. low/high

Comment2: Modulation Type: xxx Data Rate: yyy Environmental Conditions::

EUT Setup:

Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

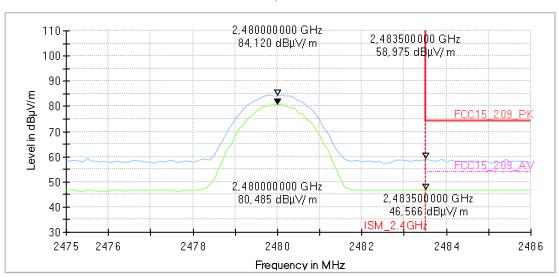
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





# 9.02b\_BT\_EDR\_ch78

#### **Common Information**

Test Description: Band-Edge: Radiated Field Strength Emissions in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT EDR 3-dh5
Operator: RAbdurrahi/TFra
Comment: Channel no. high

EUT Setup: 1

Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

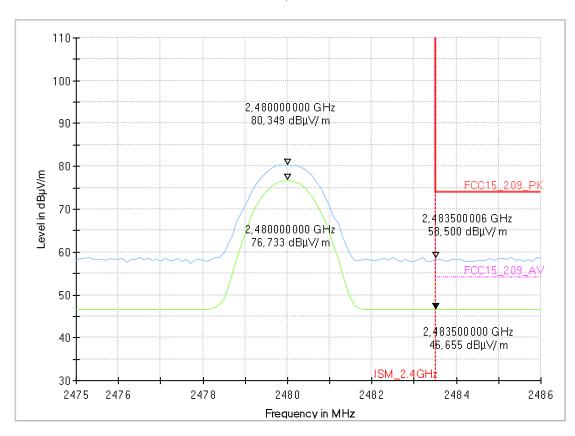
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





## 9.03b\_BT\_BDR\_ch78

#### **Common Information**

Test Description: Band-Edge: Radiated Field Strength Emissions in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode: BT TX DH5 ch78

Operator: npe

Comment: Channel 78

Comment2: Modulation Type: DH5

EUT Setup: 1

Verdict: Passed

## **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

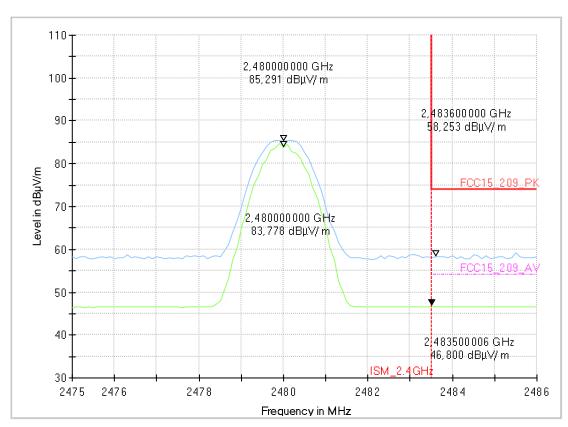
Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC





# 9.04b\_BT\_EDR\_ch78

## **Common Information**

Test Description: Band-Edge: Radiated Field Strength Emissions in 3m distance

Test Site: CETECOM GmbH Essen

Test Standard: FCC 15.247&15.209 Intentional Radiator / RSS-Gen, Issue 4

Antenna polarisation: horizontal/vertical

Operating Mode:

Operator:

Comment:

BT EDR DH-5 Hopping
RAbdurrahi/TFra
Channel no. high

EUT Setup: 1

Verdict: Passed

#### **EUT Information**

Manufacturer: Robert Bosch Car Multimedia GmbH

Model: AIVIV10

Type: Multimedia device with Bluetooth and WLAN

 HW-Version
 001

 SW-Version
 1049

 Comment:
 0005057

 Power Supply:
 13.5 V DC

