Conducted test results

No.1-7077/23-01-05_TR1-A206-R1

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Test Standard(s) FCC 15.407

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FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:03:18
Ambit temp [°C] | humidity [rel%]	21.2 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5190 MHz

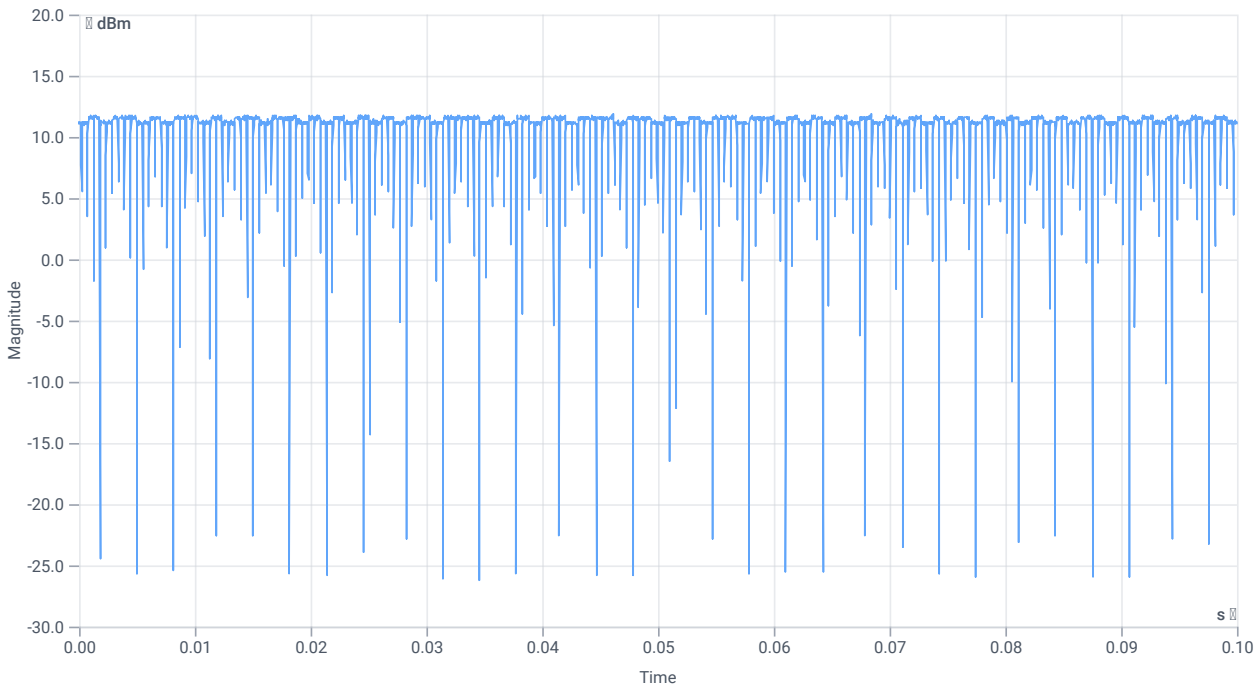
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	9.93	dBm	INFO
Ref. Frequency	---	---	5185.800	MHz	INFO

Evaluation max. Duty Cycle

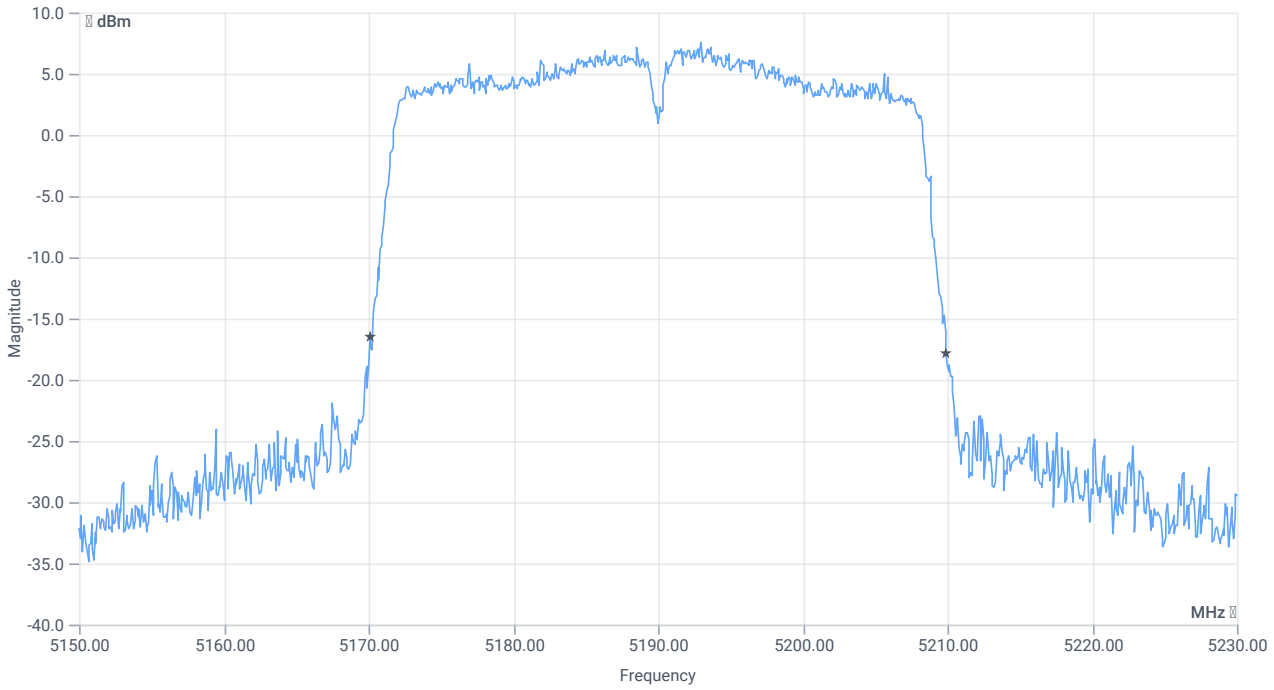
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:78					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

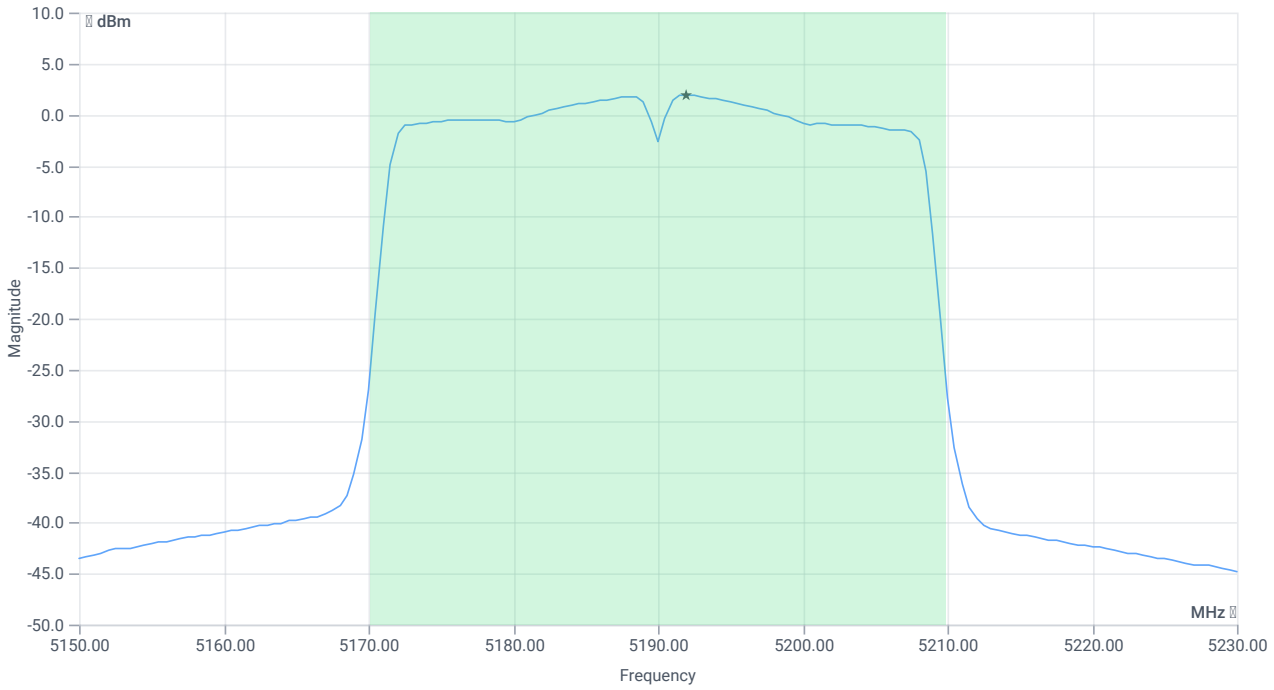
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.84	MHz	INFO
T1 26dB	---	---	5170.0800	MHz	INFO
T2 26dB	---	---	5209.9200	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	21.93 | 16.45 | 20
Start [MHz] | Stop [MHz]	5150.000 | 5230.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	15.47	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	16.14	dBm	PASS
Limit: 11 dBm + 10 log 39.84					
Max Output Power DC corrected	---	27	16.14	dBm	na

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	1.87	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	2.54	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:04:49
Ambit temp [°C] | humidity [rel%]	21.2 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

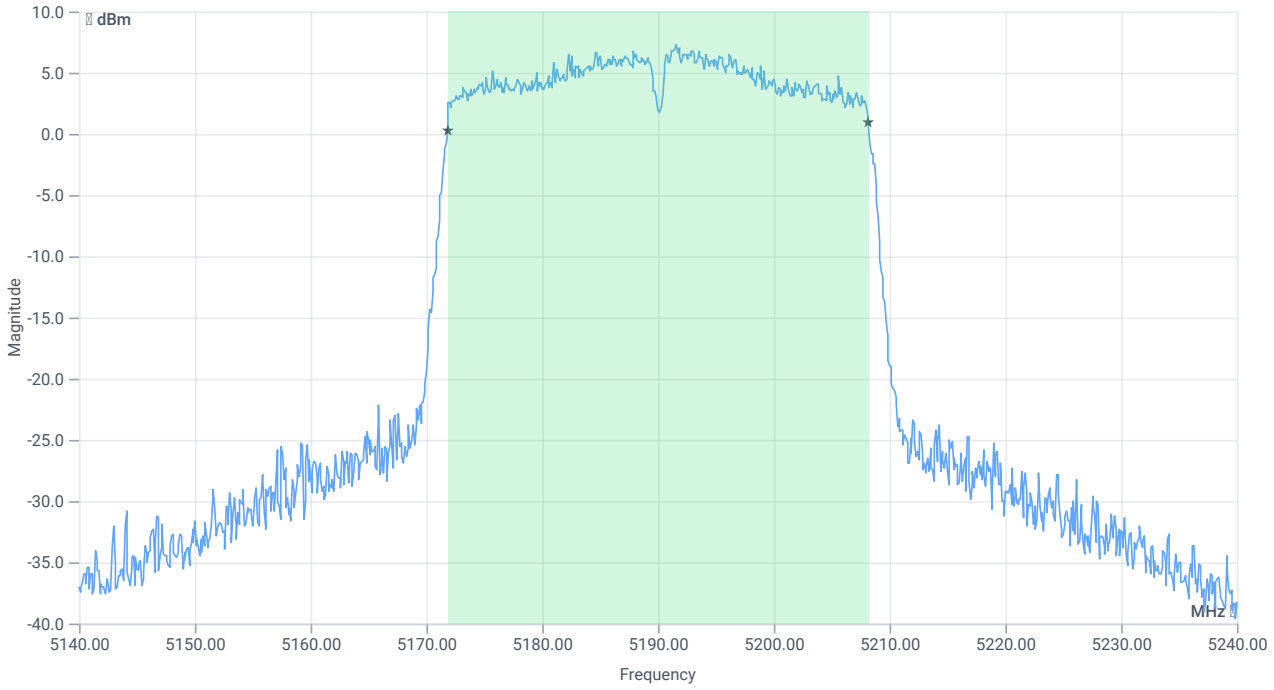
Test at TX 5190 MHz

RESULT: Reference Power cond.

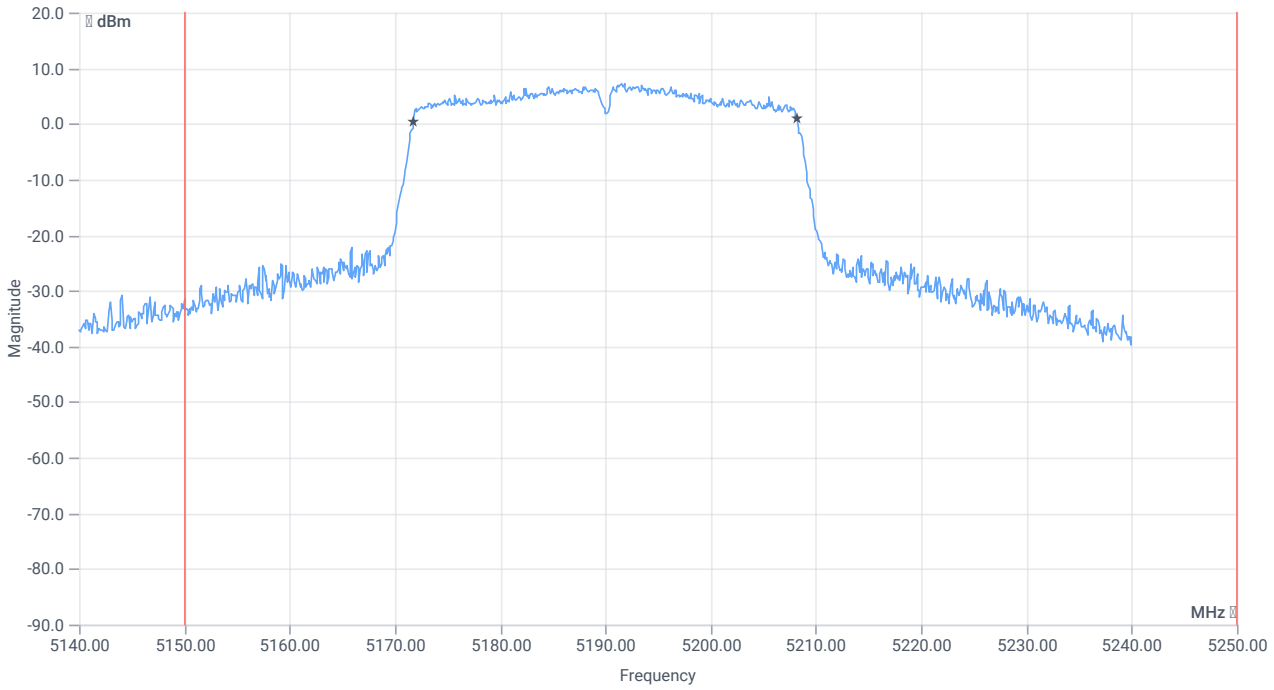
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	10.45	dBm	INFO
Ref. Frequency	---	---	5191.800	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	18.45 | 16.45 | 20
Start [MHz] | Stop [MHz]	5140.000 | 5240.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



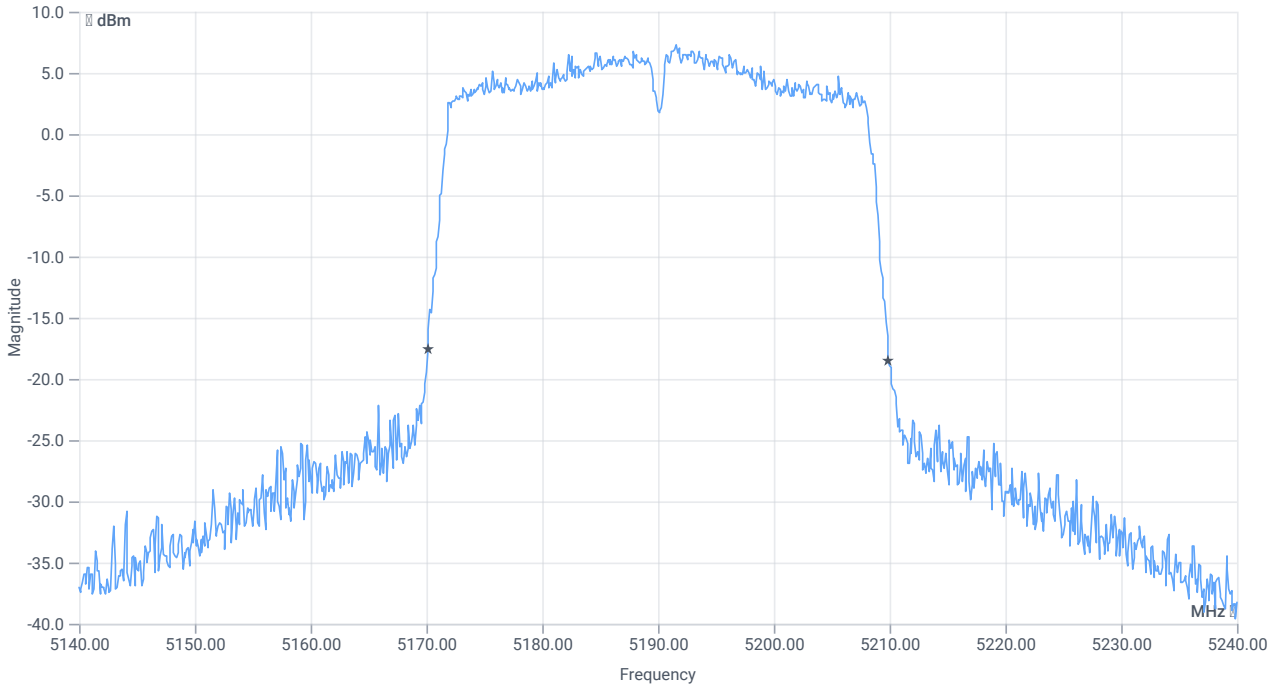
BW 99PCT



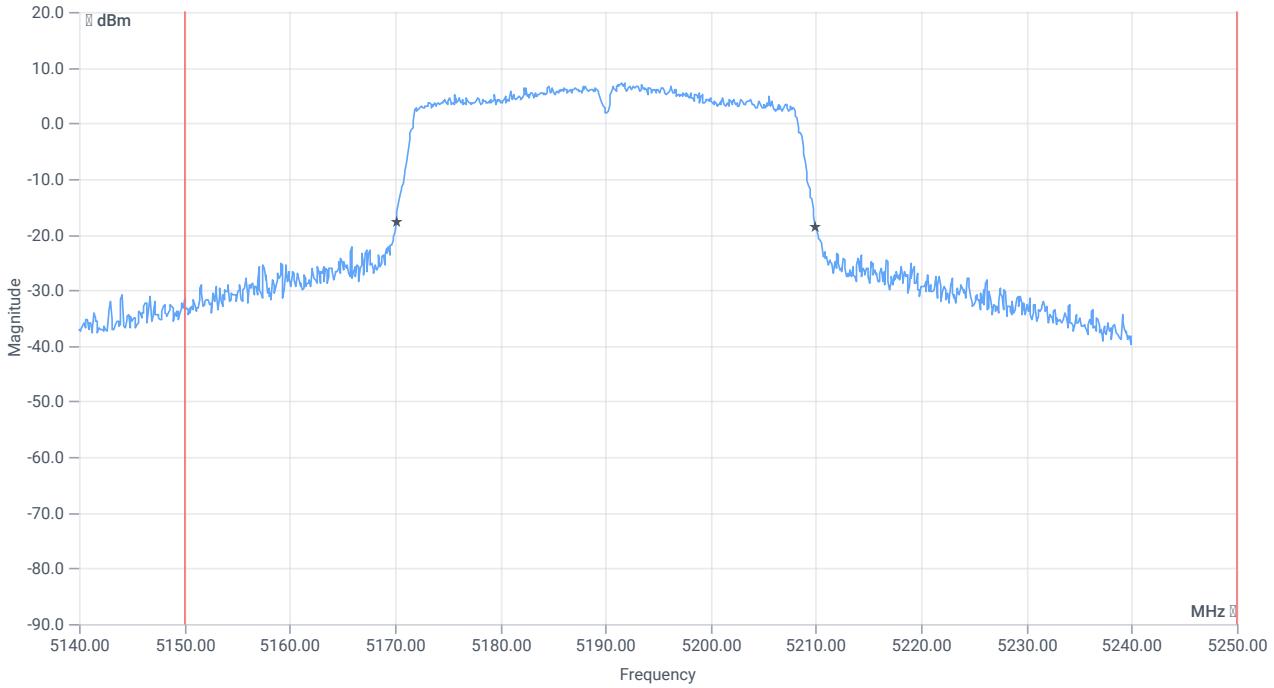
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.364	MHz	INFO
T1 99%	5150.000000	---	5171.8182	MHz	PASS
T2 99%	---	5250.000000	5208.1818	MHz	PASS



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.8	MHz	INFO
T1 26dB	5150.000000	---	5170.1000	MHz	PASS
T2 26dB	---	5250.000000	5209.9000	MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:05:27
Ambit temp [°C] | humidity [rel%]	21.2 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5190 MHz

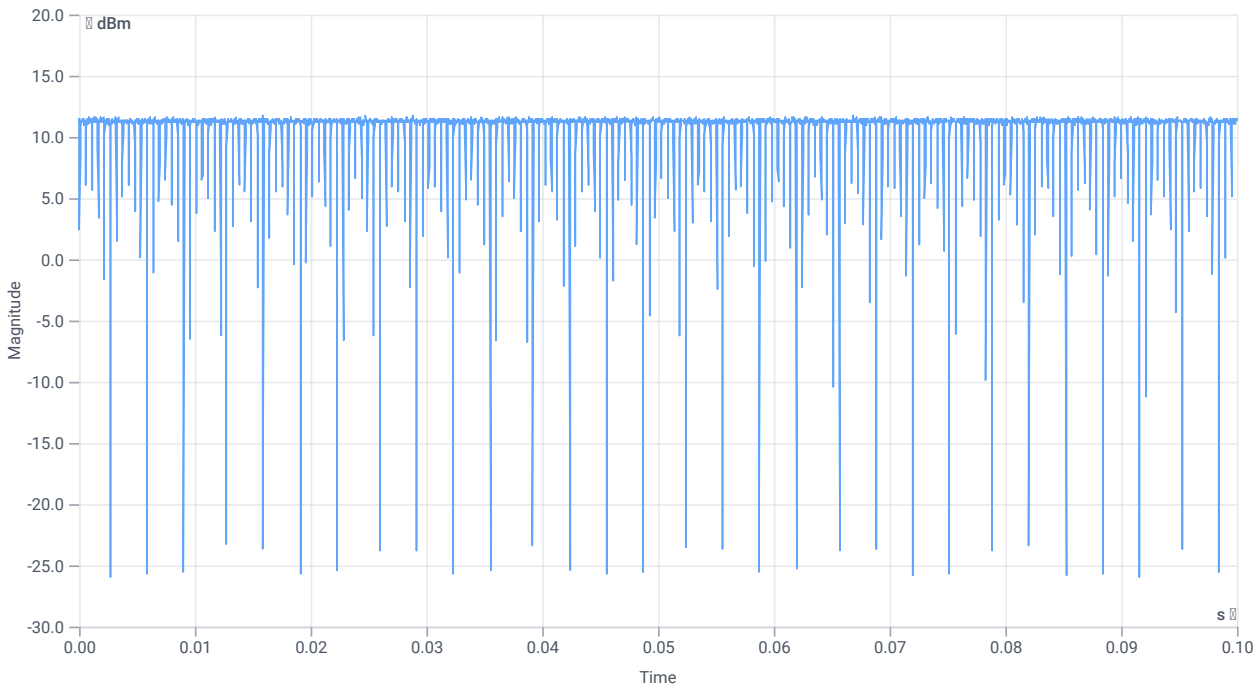
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	10.55	dBm	INFO
Ref. Frequency	---	---	5193.600	MHz	INFO

Evaluation max. Duty Cycle

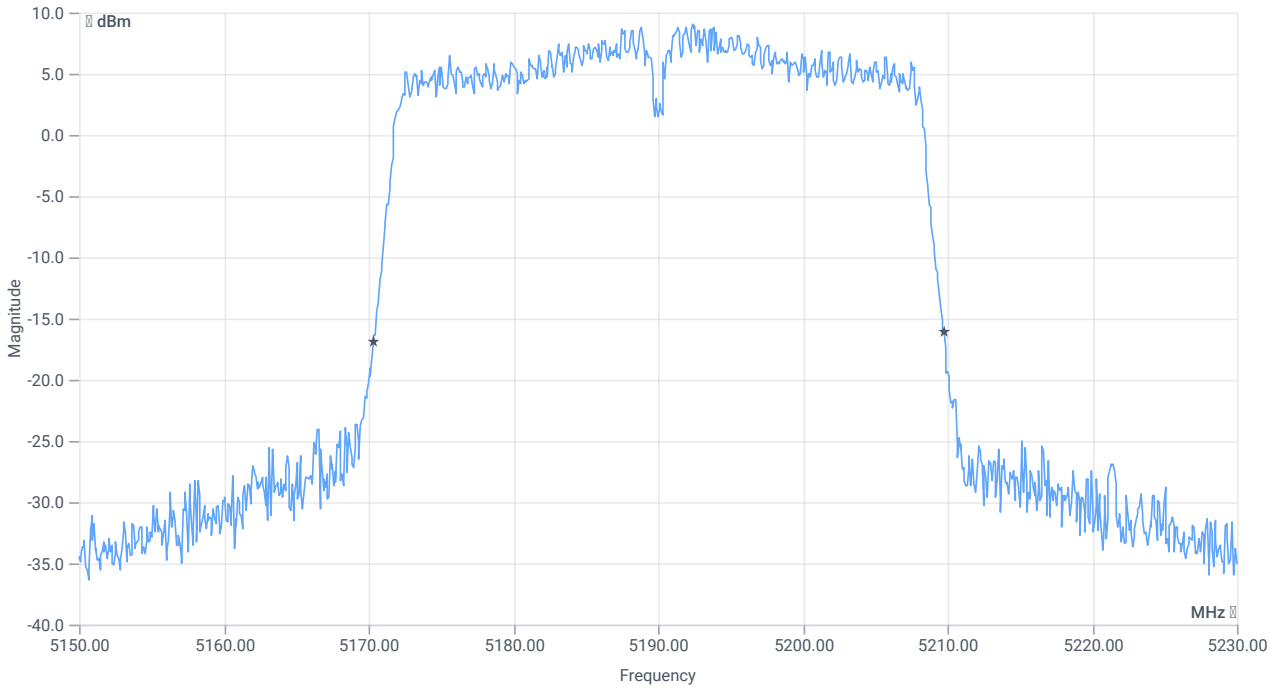
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:78					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

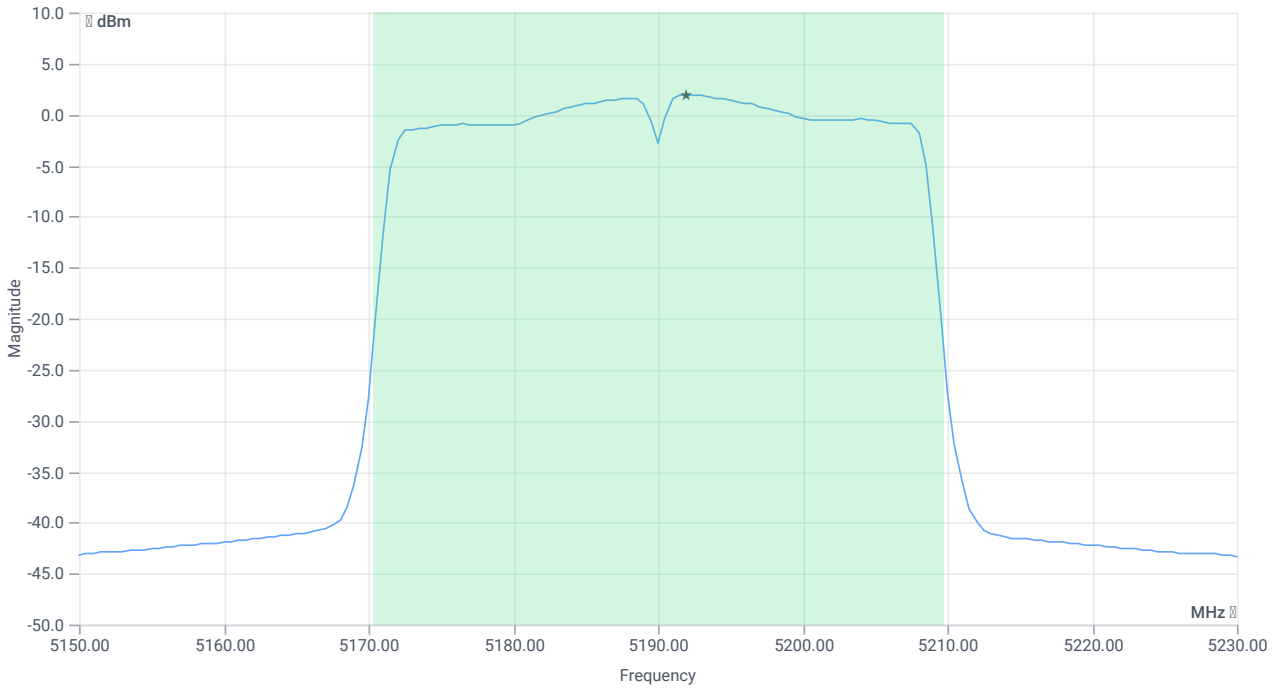
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.44	MHz	INFO
T1 26dB	---	---	5170.3200	MHz	INFO
T2 26dB	---	---	5209.7600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	22.55 | 16.45 | 25
Start [MHz] | Stop [MHz]	5150.000 | 5230.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	15.5	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	16.17	dBm	PASS
Limit: 11 dBm + 10 log 39.44					
Max Output Power DC corrected	---	26.96	16.17	dBm	na

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	1.96	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	2.63	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:06:58
Ambit temp [°C] | humidity [rel%]	21.1 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

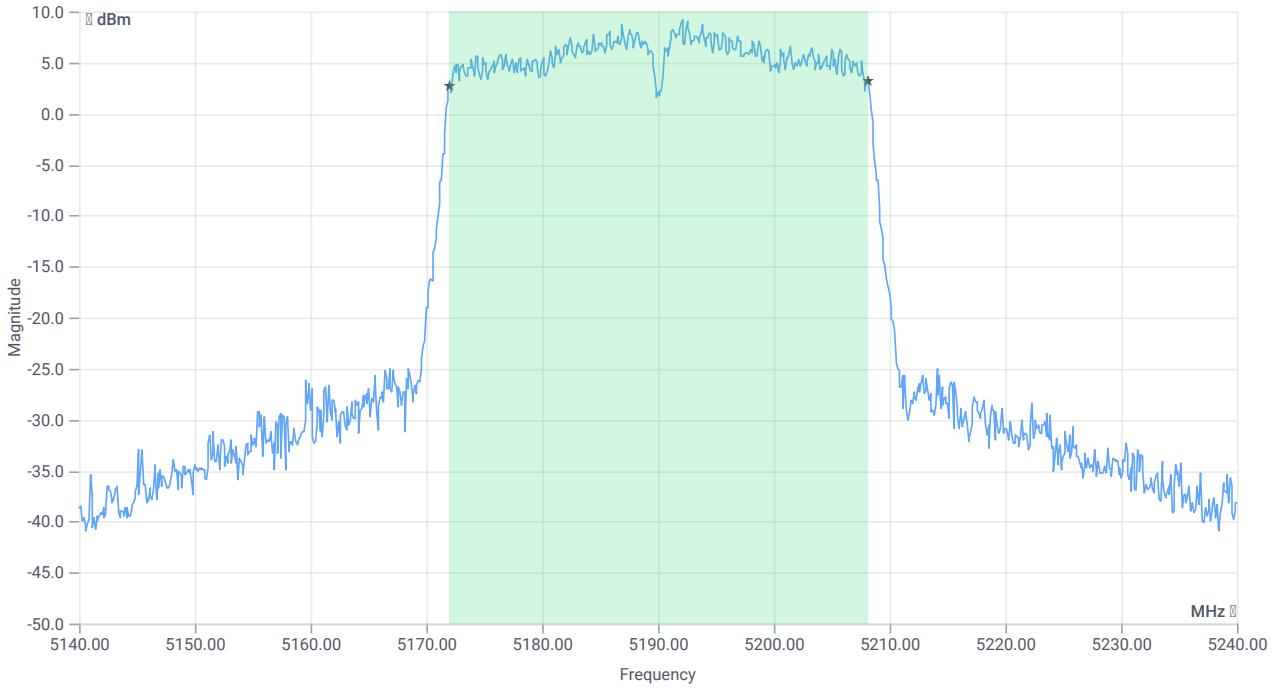
Test at TX 5190 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	11.19	dBm	INFO
Ref. Frequency	---	---	5192.600	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	19.19 | 16.45 | 20
Start [MHz] | Stop [MHz]	5140.000 | 5240.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE

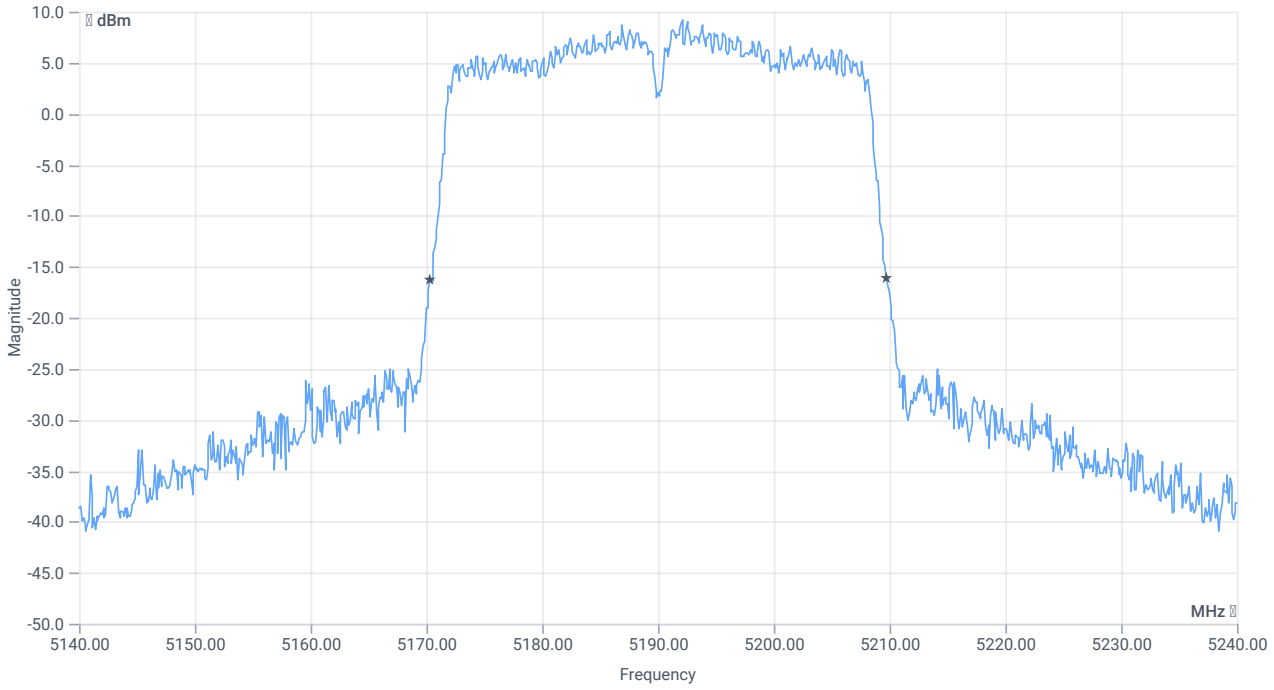


BW 99PCT

BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.164	MHz	INFO
T1 99%	5150.000000	---	5172.0180	MHz	PASS
T2 99%	---	5250.000000	5208.1818	MHz	PASS



BW 26dB

BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.4	MHz	INFO
T1 26dB	5150.000000	---	5170.3000	MHz	PASS
T2 26dB	---	5250.000000	5209.7000	MHz	PASS

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:07:36
Ambit temp [°C] | humidity [rel%]	21.1 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5190 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	16.14	dBm	INFO
Ant:1 BW 26dB	---	---	39.840	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	16.17	dBm	INFO
Ant:2 BW 26dB	---	---	39.440	MHz	INFO
∑ Limit absolute	---	24	19.17	dBm	PASS
∑ Limit: 11 dBm + 10 log 39.44	---	26.96	19.17	dBm	na

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	2.54	dBm/1MHz	INFO
Ant:2 PSD	---	---	2.63	dBm/1MHz	INFO
∑	---	11	5.6	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:09:03
Ambit temp [°C] | humidity [rel%]	21.1 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5230 MHz

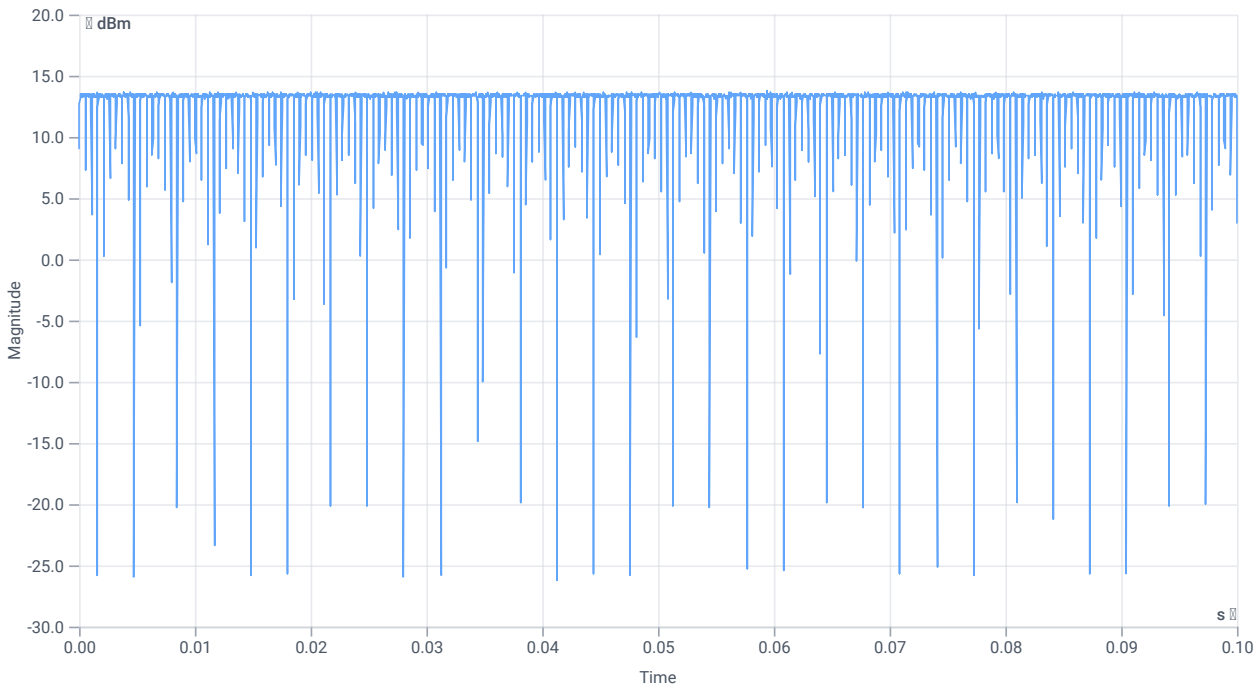
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.05	dBm	INFO
Ref. Frequency	---	---	5233.400	MHz	INFO

Evaluation max. Duty Cycle

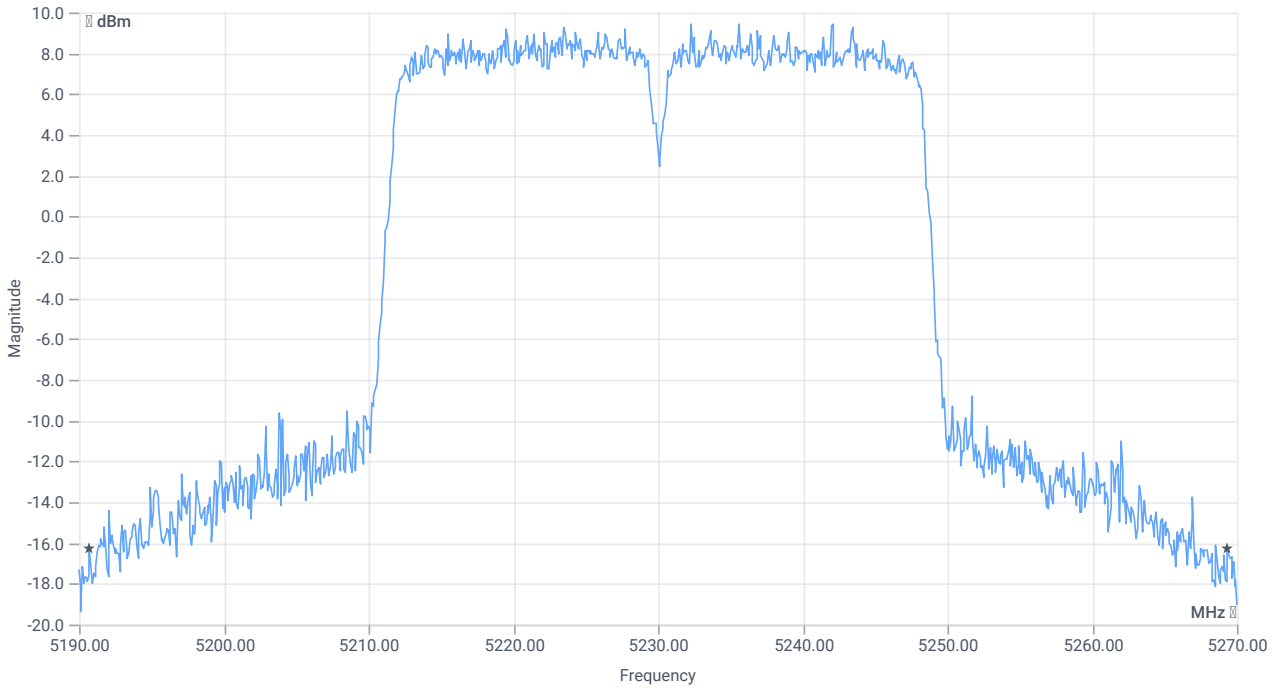
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:70					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

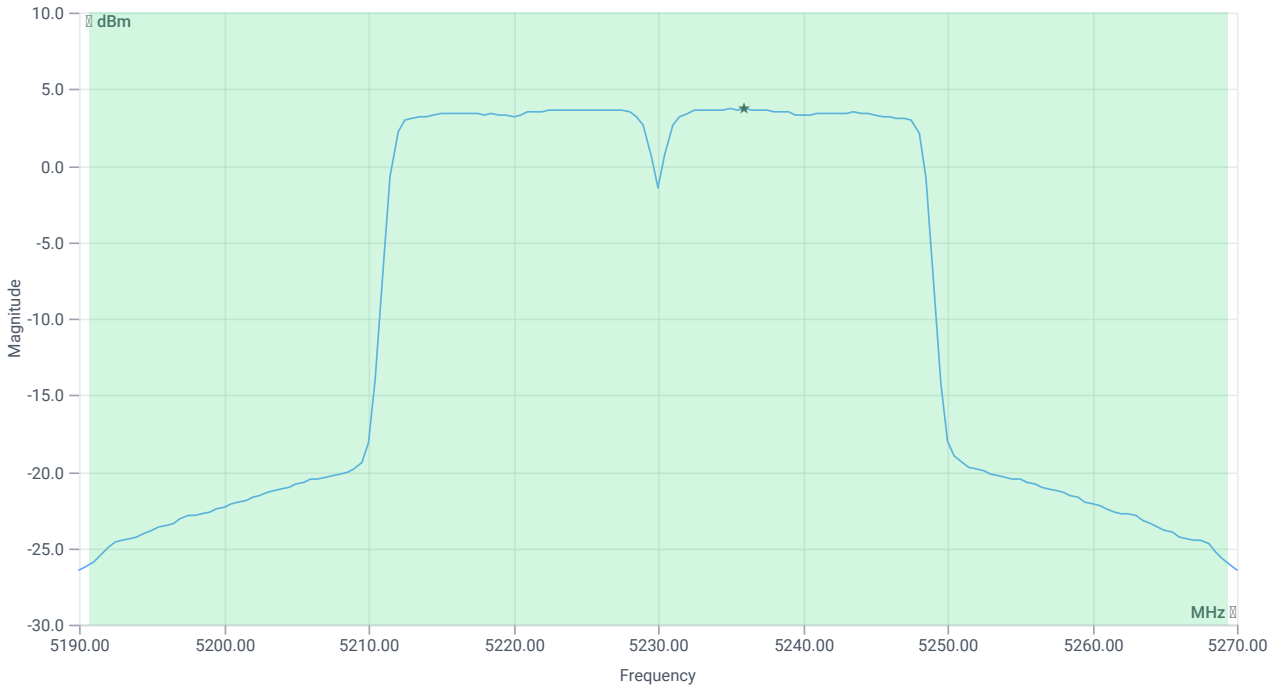
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	78.64	MHz	INFO
T1 26dB	---	---	5190.7200	MHz	INFO
T2 26dB	---	---	5269.3600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.05 | 16.45 | 25
Start [MHz] | Stop [MHz]	5190.000 | 5270.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	18.68	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	19.35	dBm	PASS
Limit: 11 dBm + 10 log 78.64					
Max Output Power DC corrected	---	29.96	19.35	dBm	na

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	3.7	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	4.37	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:10:34
Ambit temp [°C] | humidity [rel%]	21.1 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

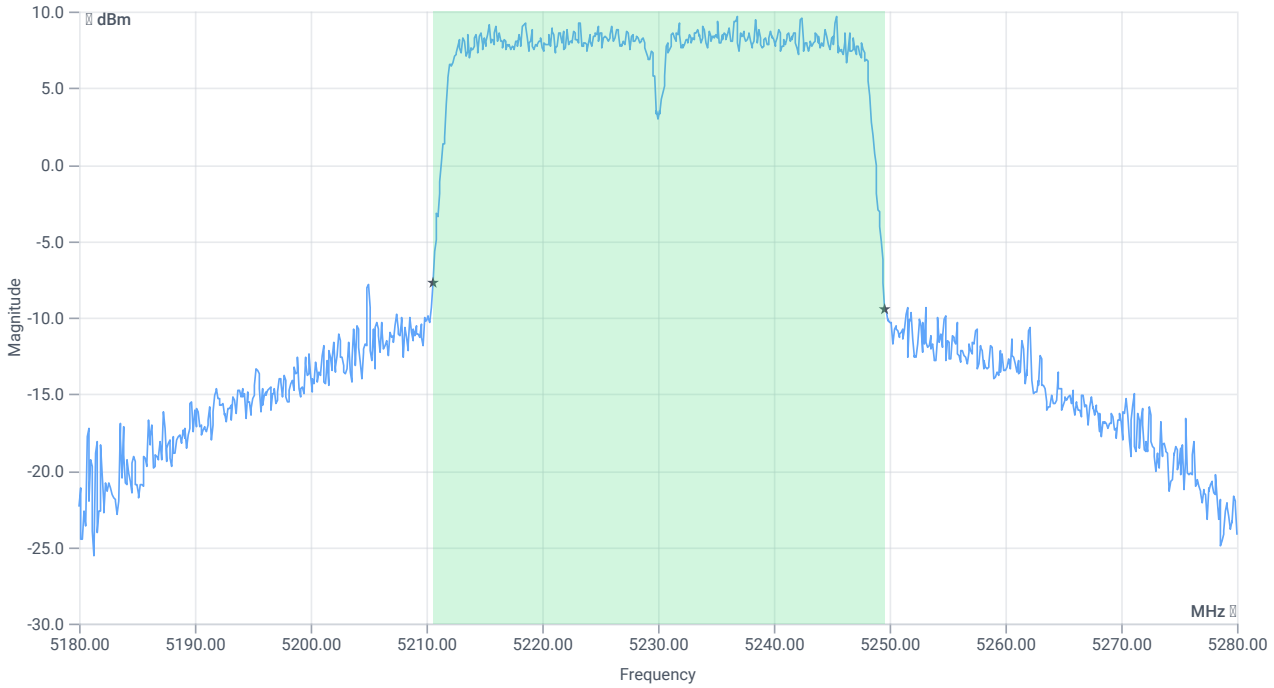
Test at TX 5230 MHz

RESULT: Reference Power cond.

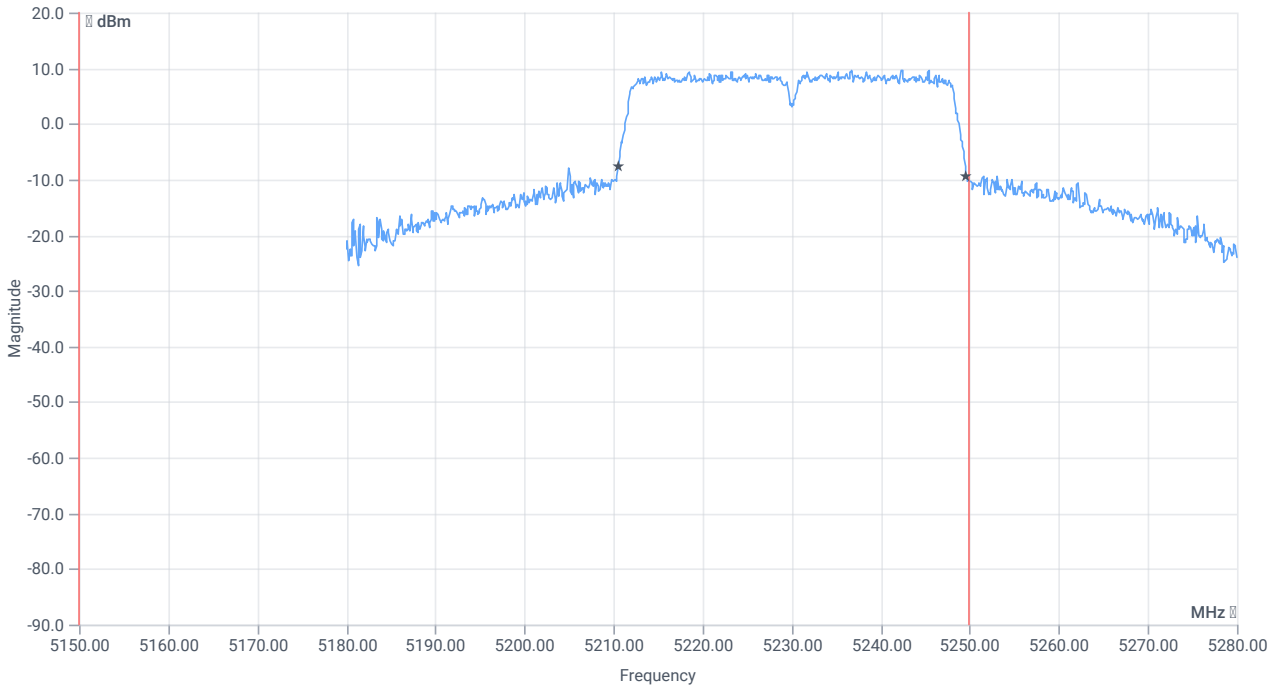
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	11.89	dBm	INFO
Ref. Frequency	---	---	5227.000	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	19.89 | 16.45 | 20
Start [MHz] | Stop [MHz]	5180.000 | 5280.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



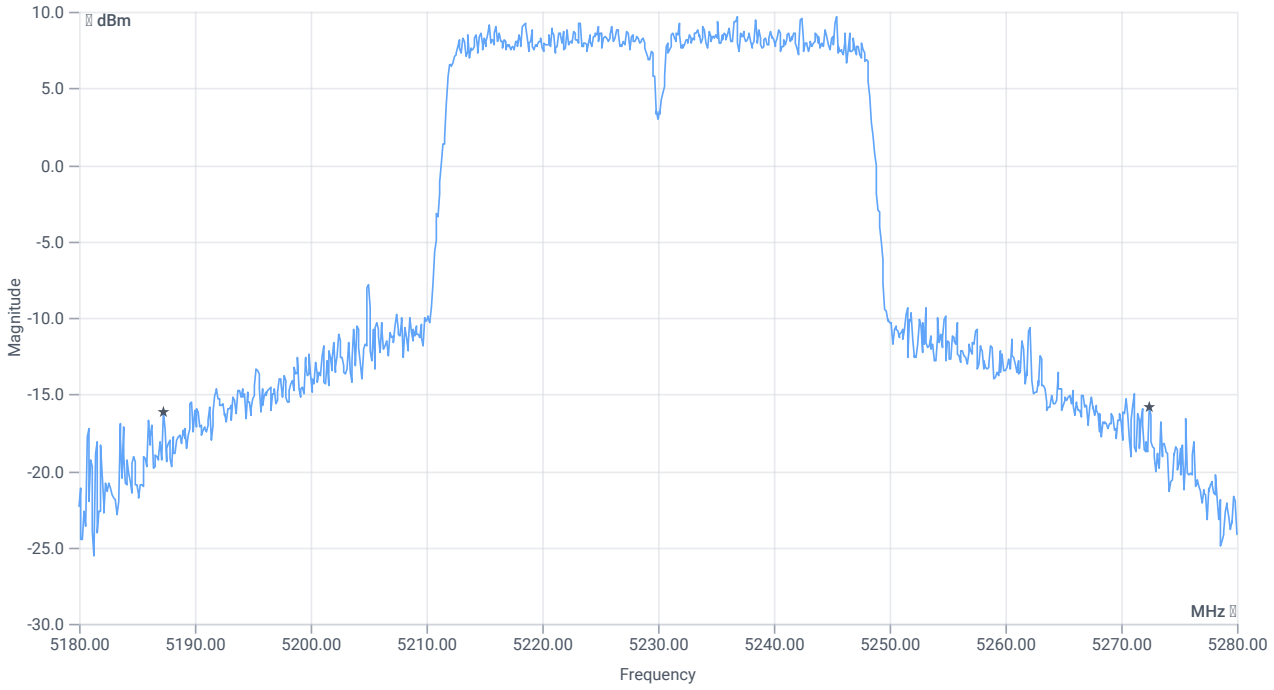
BW 99PCT



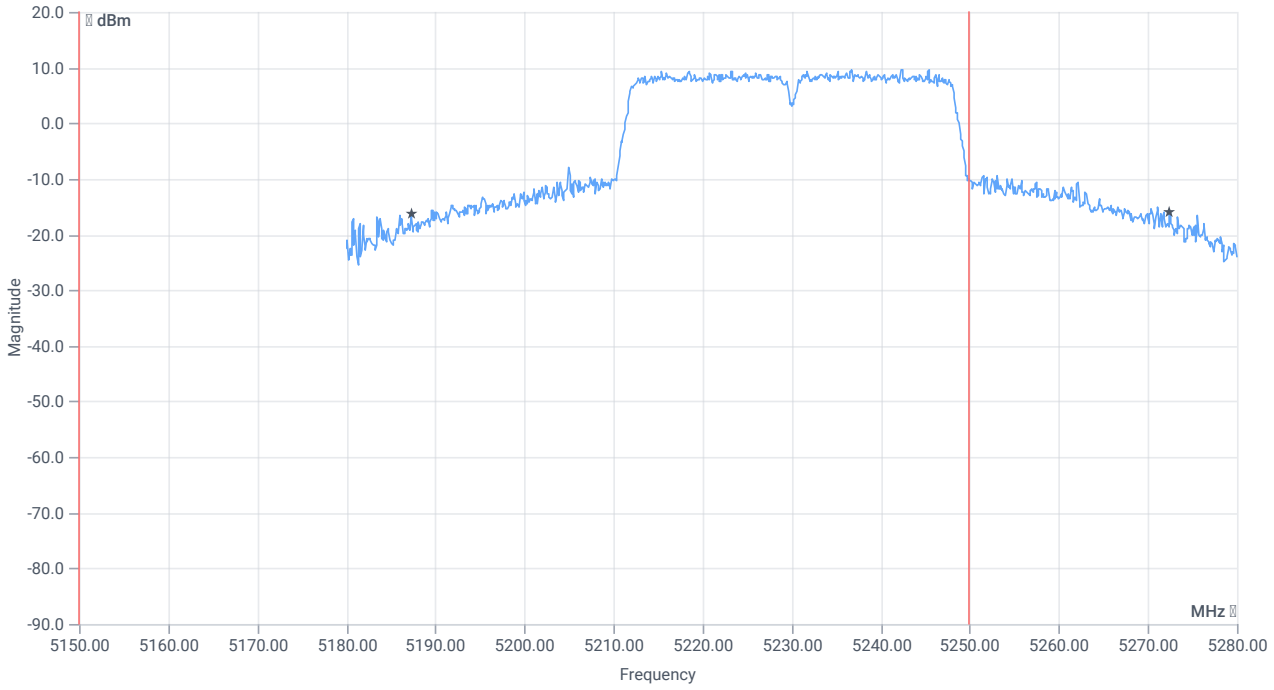
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	38.961	MHz	INFO
T1 99%	5150.000000	---	5210.6194	MHz	PASS
T2 99%	---	5250.000000	5249.5804	MHz	PASS



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	85.1	MHz	INFO
T1 26dB	5150.000000	---	5187.3000	MHz	PASS
T2 26dB	---	5250.000000	5272.4000	MHz	DFS required

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:11:12
Ambit temp [°C] | humidity [rel%]	21.1 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5230 MHz

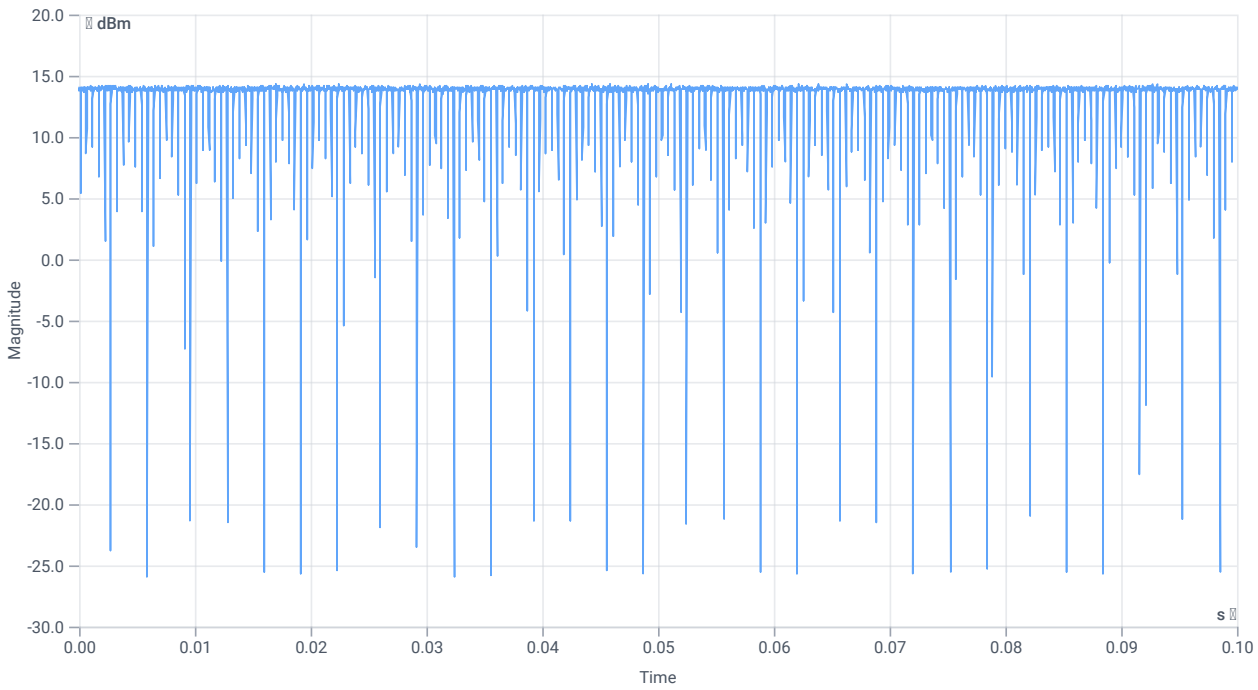
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.70	dBm	INFO
Ref. Frequency	---	---	5234.800	MHz	INFO

Evaluation max. Duty Cycle

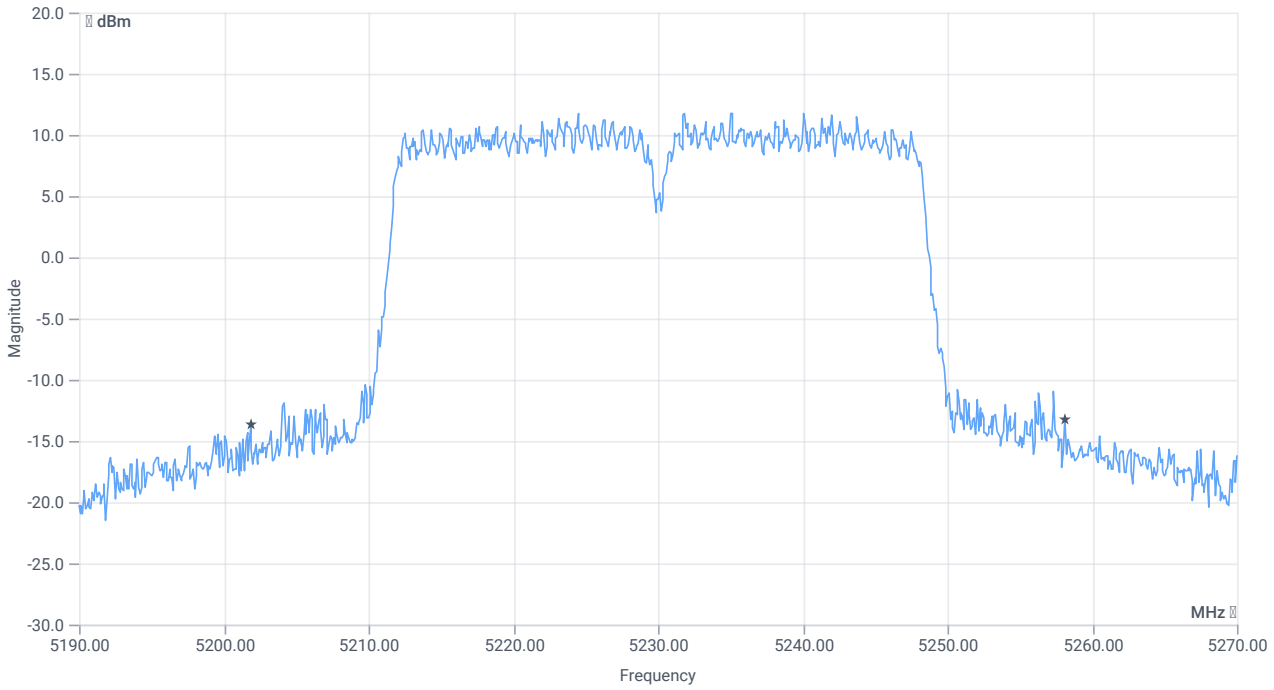
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:73					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

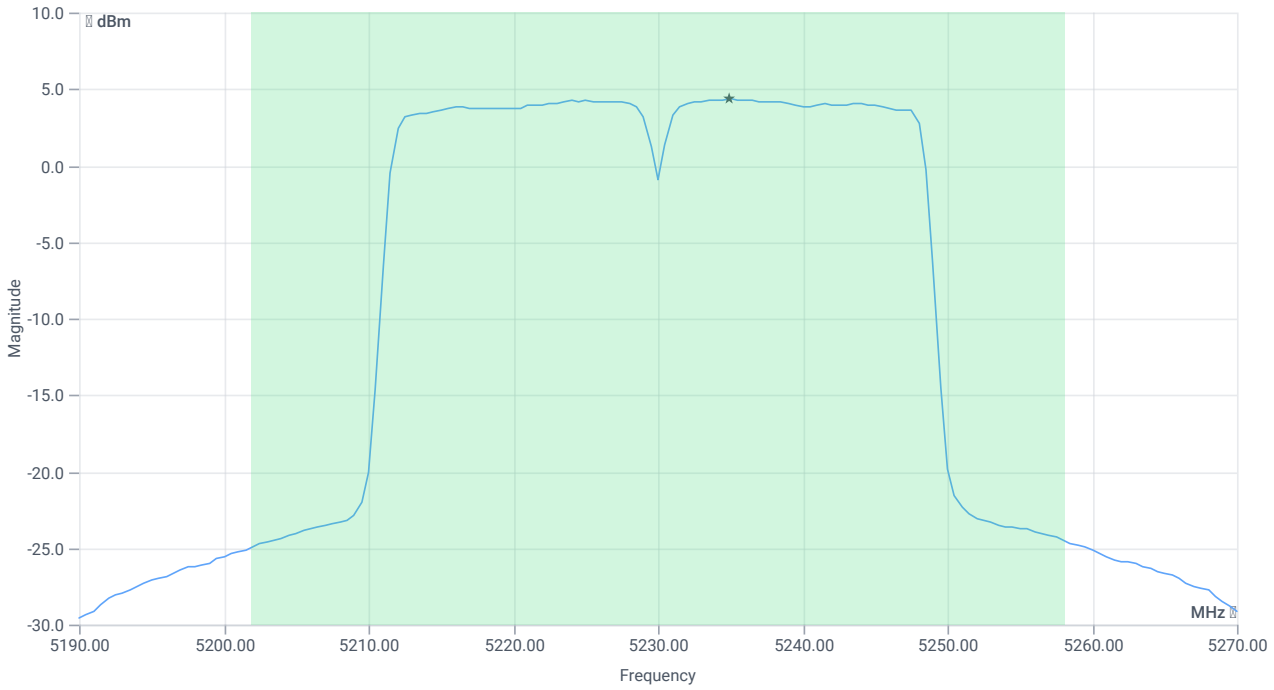
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	56.32	MHz	INFO
T1 26dB	---	---	5201.8400	MHz	INFO
T2 26dB	---	---	5258.1600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.70 | 16.45 | 25
Start [MHz] | Stop [MHz]	5190.000 | 5270.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.19	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	19.86	dBm	PASS
Limit: 11 dBm + 10 log 56.32					
Max Output Power DC corrected	---	28.51	19.86	dBm	na

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	4.33	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	5	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:12:43
Ambit temp [°C] | humidity [rel%]	21.1 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

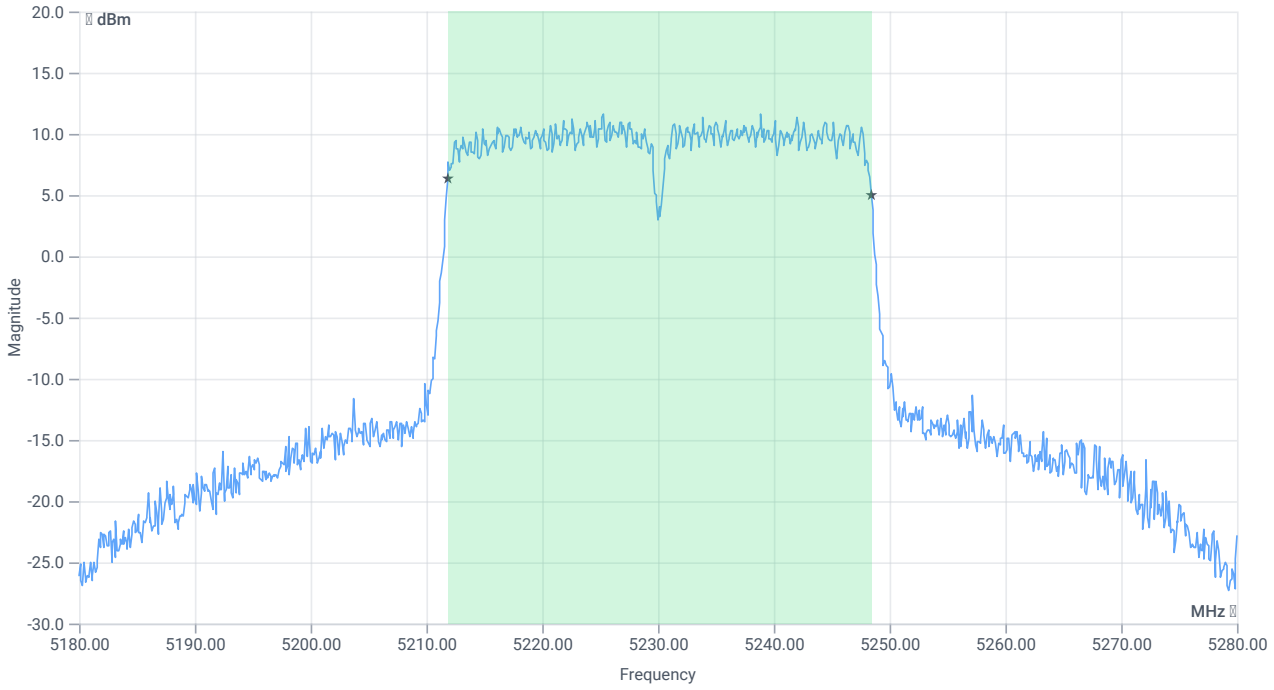
Test at TX 5230 MHz

RESULT: Reference Power cond.

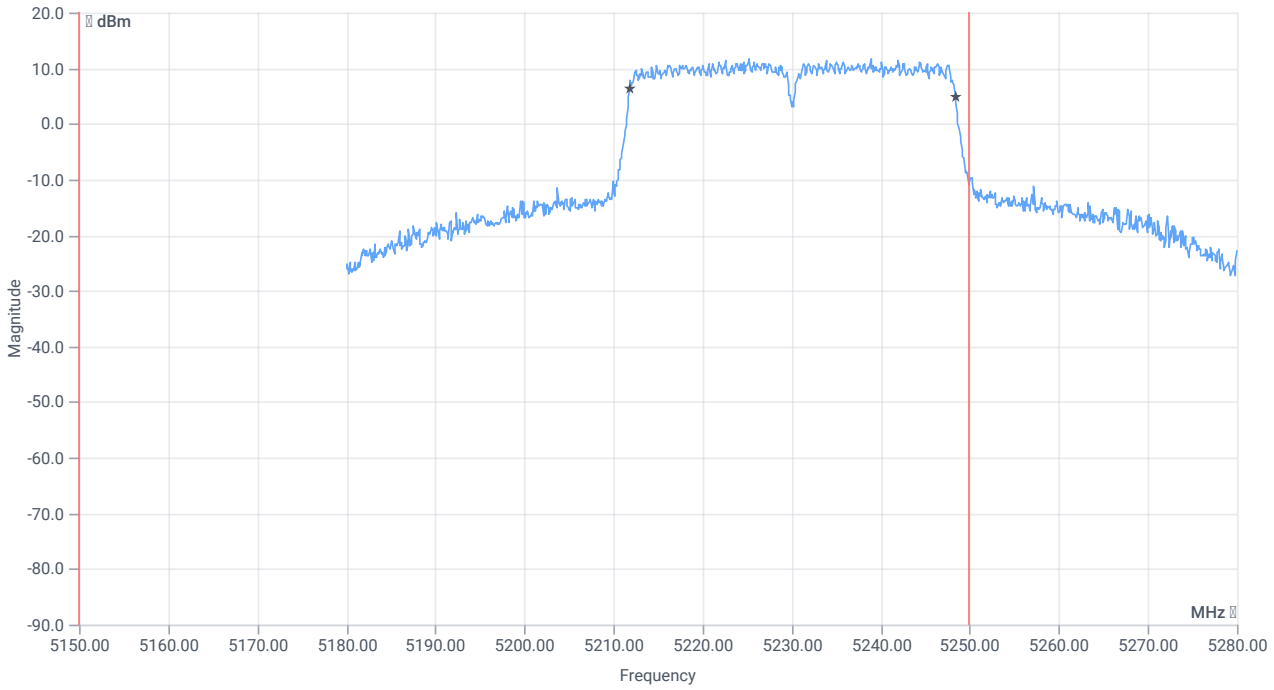
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.31	dBm	INFO
Ref. Frequency	---	---	5240.190	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	21.31 | 16.45 | 20
Start [MHz] | Stop [MHz]	5180.000 | 5280.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



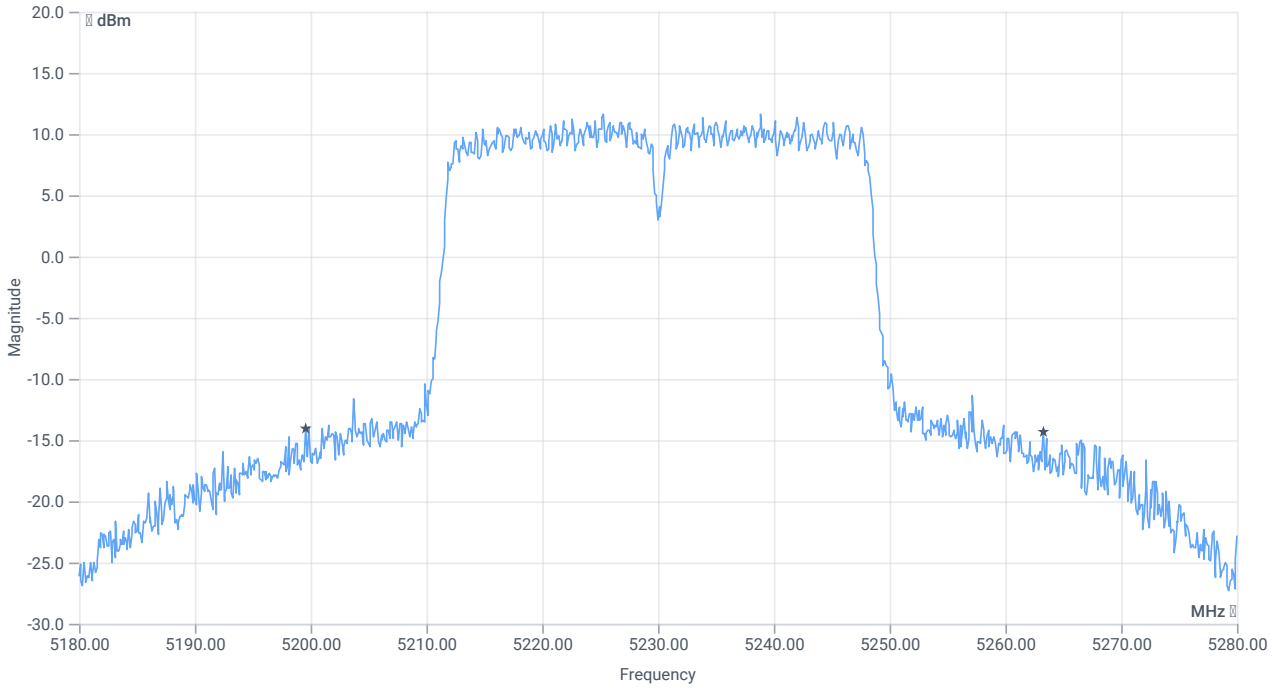
BW 99PCT



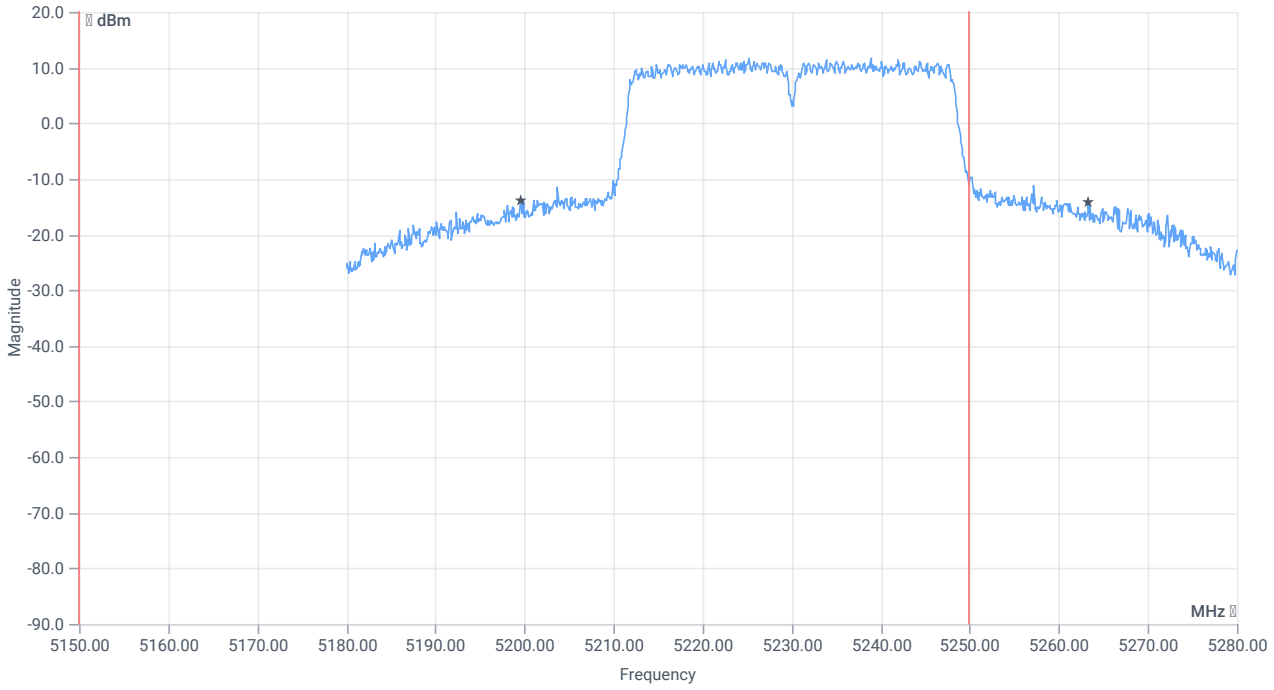
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.563	MHz	INFO
T1 99%	5150.000000	---	5211.8182	MHz	PASS
T2 99%	---	5250.000000	5248.3816	MHz	PASS



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	63.8	MHz	INFO
T1 26dB	5150.000000	---	5199.5000	MHz	PASS
T2 26dB	---	5250.000000	5263.3000	MHz	DFS required

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-1

References

TC start	19.01.2024 09:13:21
Ambit temp [°C] | humidity [rel%]	21.1 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-1
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5190
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5230
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5230 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	19.35	dBm	INFO
Ant:1 BW 26dB	---	---	78.640	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	19.86	dBm	INFO
Ant:2 BW 26dB	---	---	56.320	MHz	INFO
∑ Limit absolute	---	24	22.62	dBm	PASS
∑ Limit: 11 dBm + 10 log 56.32	---	28.51	22.62	dBm	na

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	4.37	dBm/1MHz	INFO
Ant:2 PSD	---	---	5	dBm/1MHz	INFO
∑	---	11	7.71	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:14:39
Ambit temp [°C] | humidity [rel%]	21.1 | 30
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5270 MHz

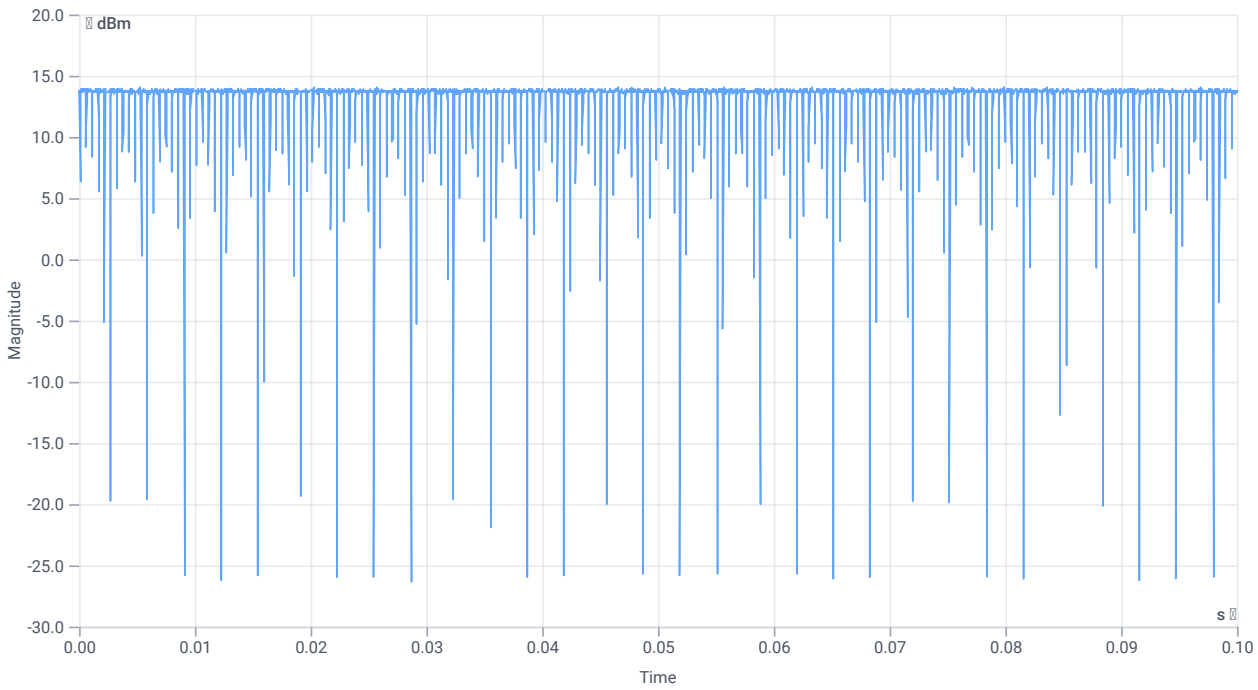
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.16	dBm	INFO
Ref. Frequency	---	---	5268.200	MHz	INFO

Evaluation max. Duty Cycle

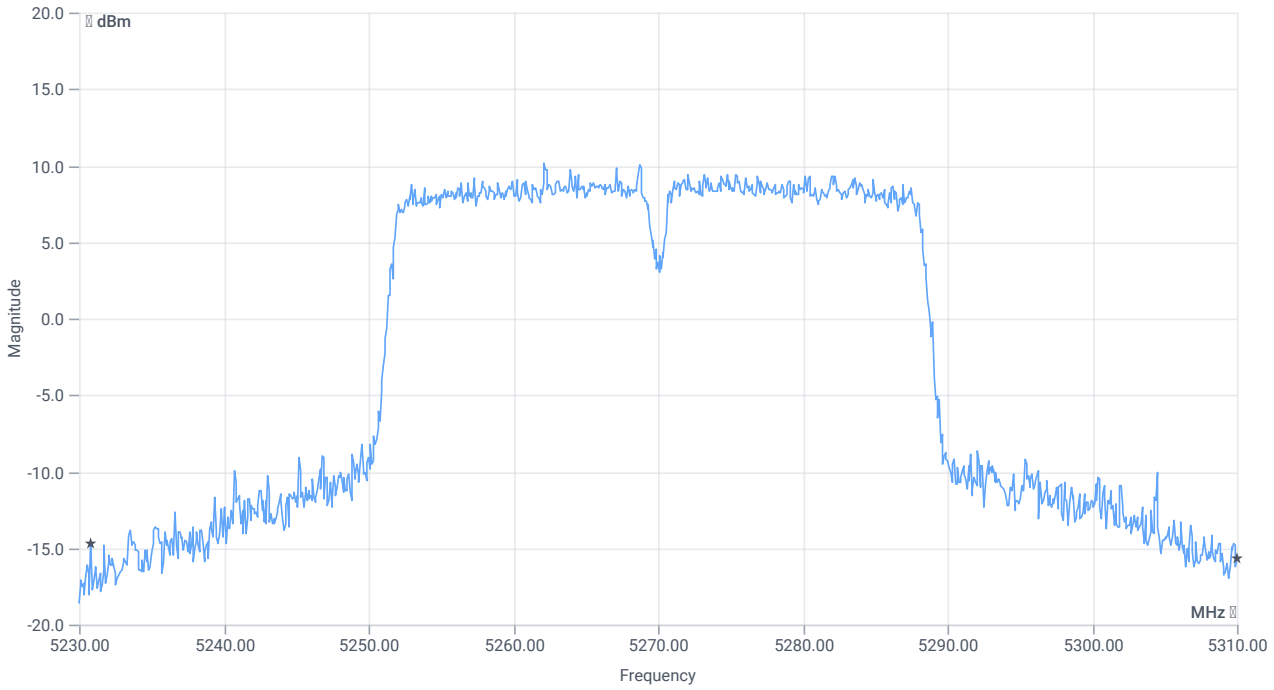
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:72					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

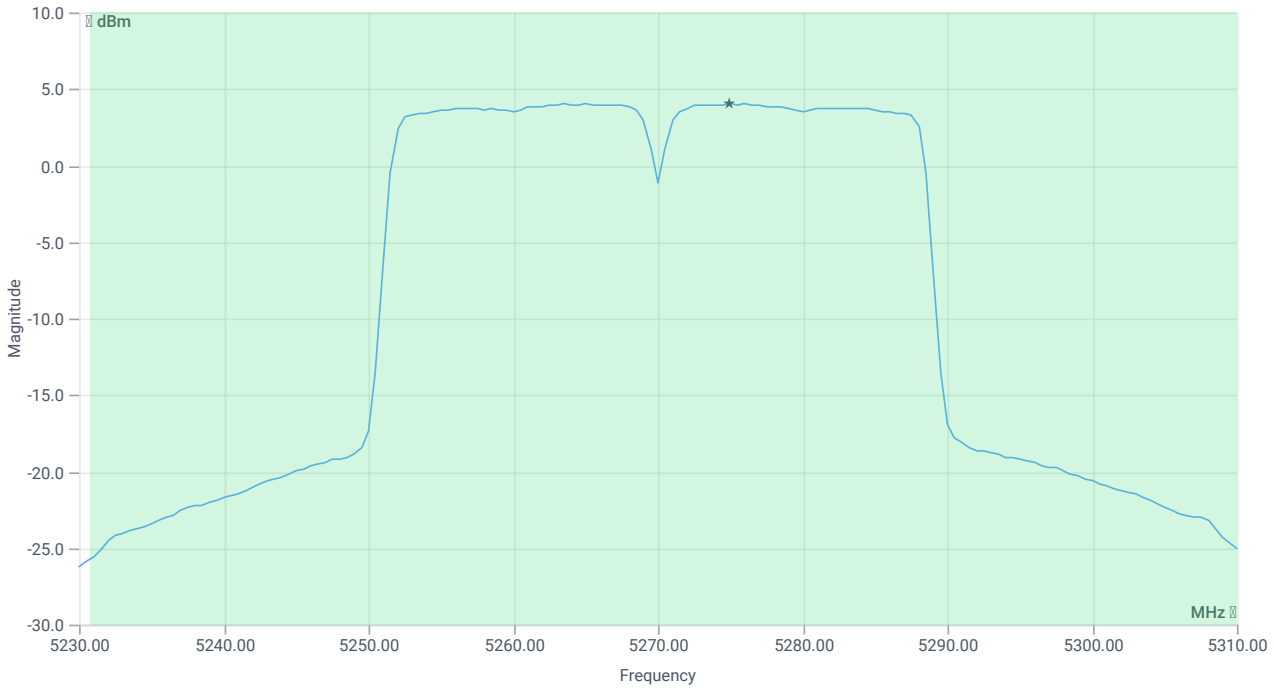
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	79.2	MHz	INFO
T1 26dB	---	---	5230.8000	MHz	INFO
T2 26dB	---	---	5310.0000	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.16 | 16.32 | 25
Start [MHz] | Stop [MHz]	5230.000 | 5310.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	19.67	dBm	PASS
Limit: 11 dBm + 10 log 79.2					
Max Output Power DC corrected	---	29.99	19.67	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	4.02	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	4.69	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:16:12
Ambit temp [°C] | humidity [rel%]	21.2 | 30
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

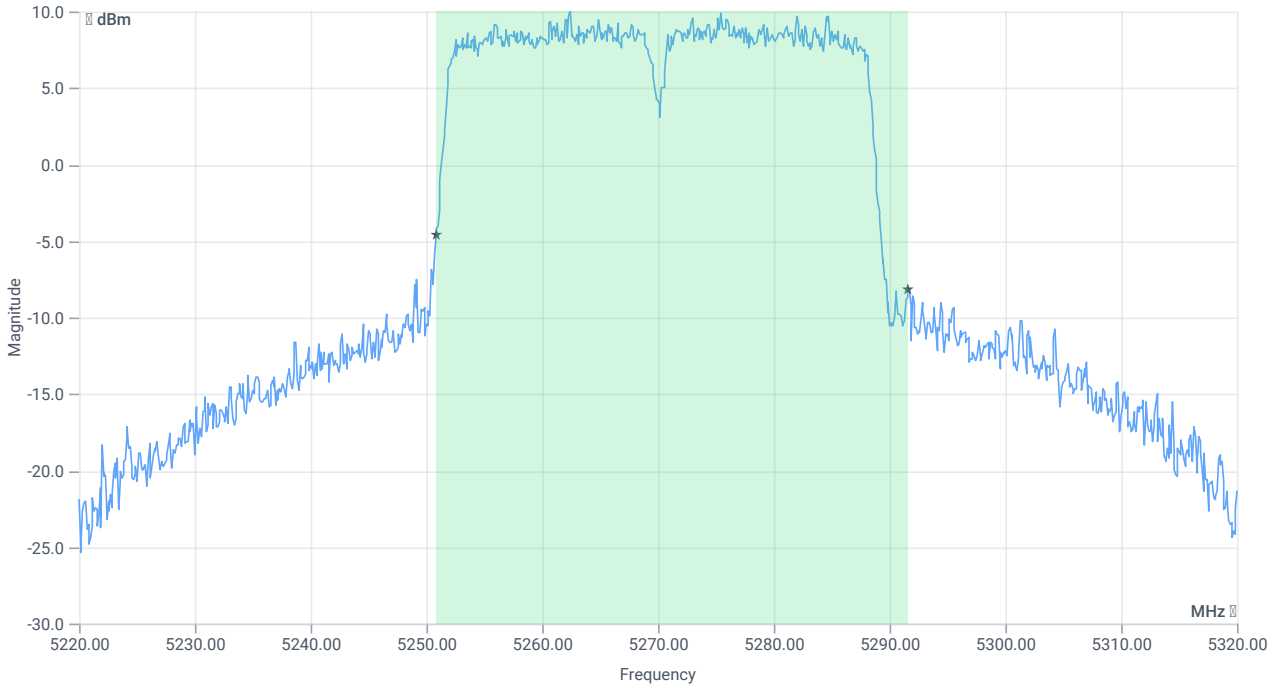
Test at TX 5270 MHz

RESULT: Reference Power cond.

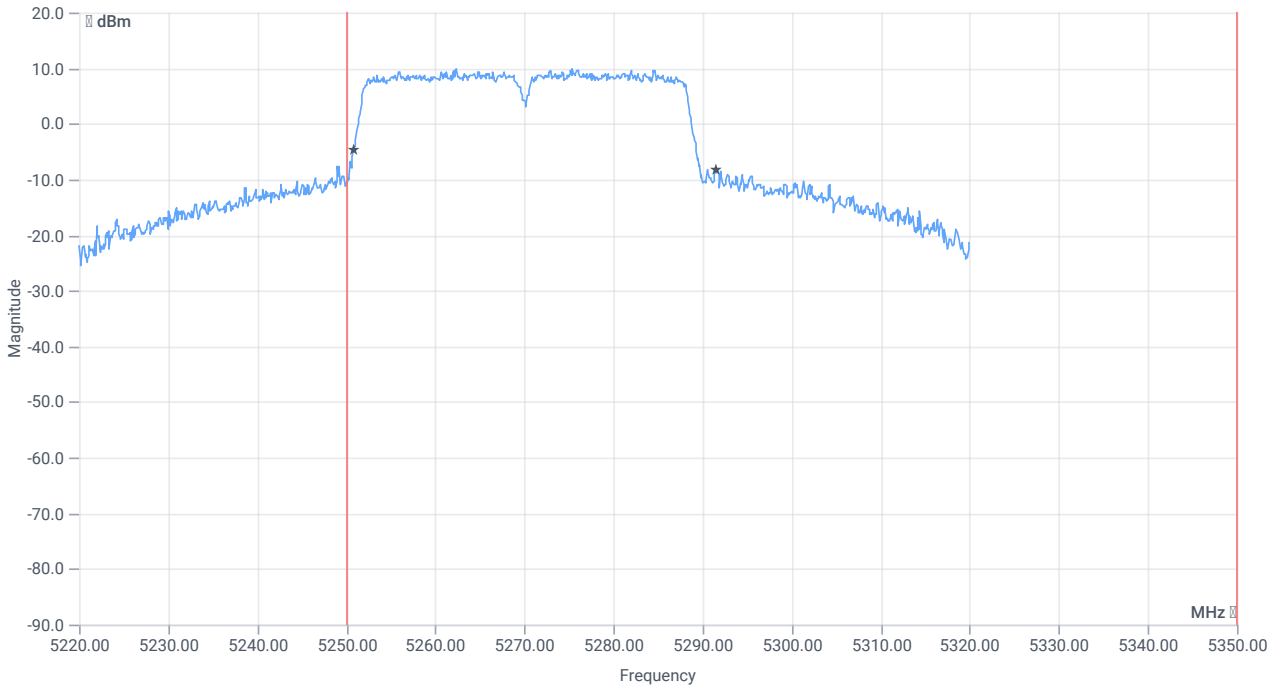
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.22	dBm	INFO
Ref. Frequency	---	---	5267.600	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	20.22 | 16.32 | 20
Start [MHz] | Stop [MHz]	5220.000 | 5320.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



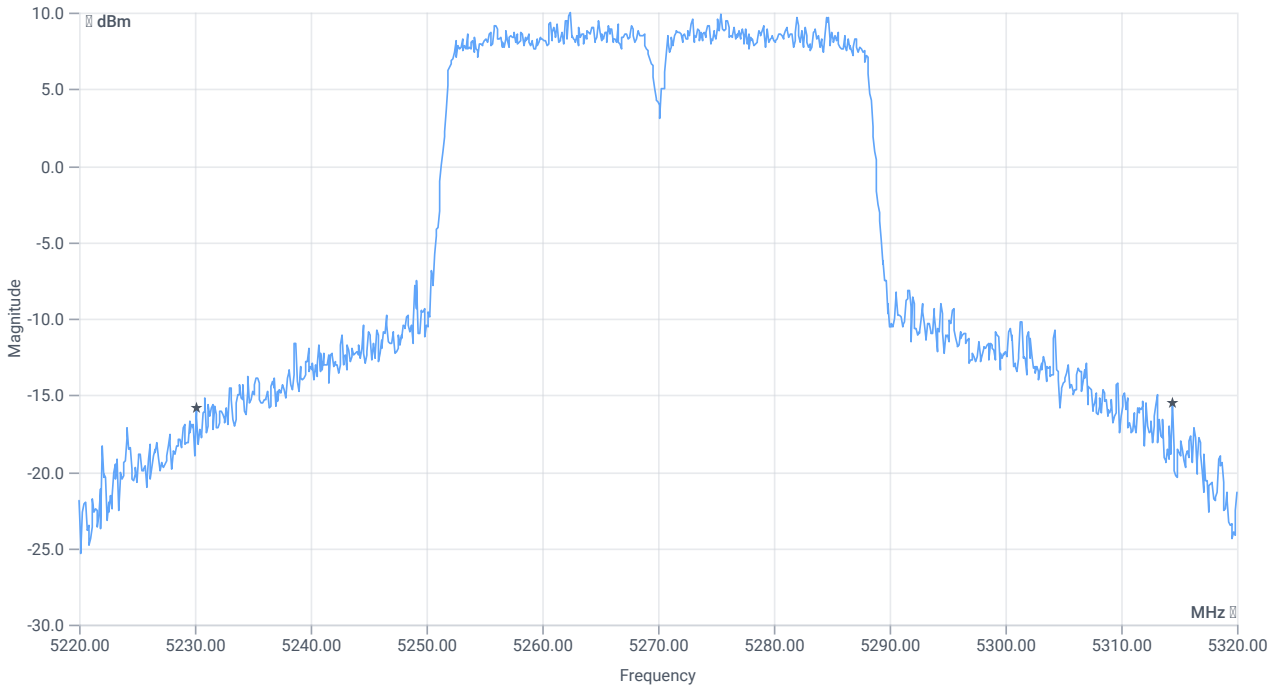
BW 99PCT



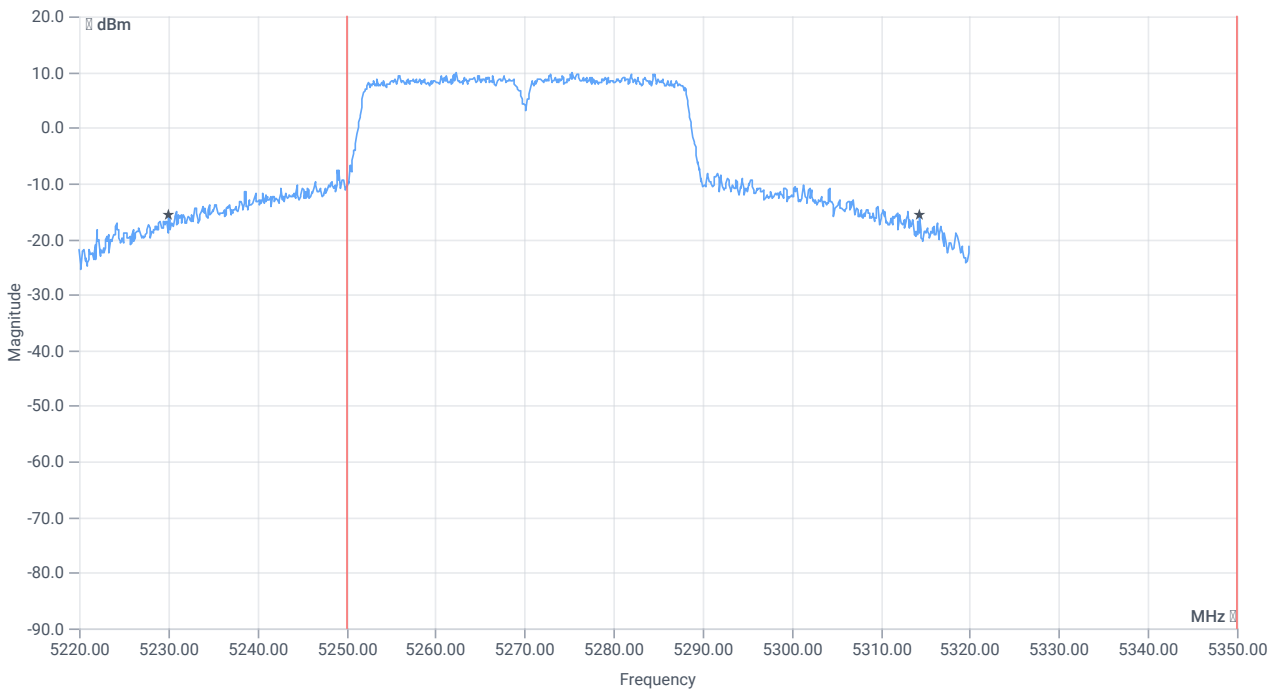
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	40.759	MHz	INFO
T1 99%	5250.000000	---	5250.8192	MHz	PASS since U-NII-1 is supported
T2 99%	---	5350.000000	5291.5784	MHz	PASS



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	84.3	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5250.000000	---	5230.1000	MHz	PASS since U-NII-1 is supported
T2 26dB	---	5350.000000	5314.4000	MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:16:48
Ambit temp [°C] | humidity [rel%]	21.2 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5270 MHz

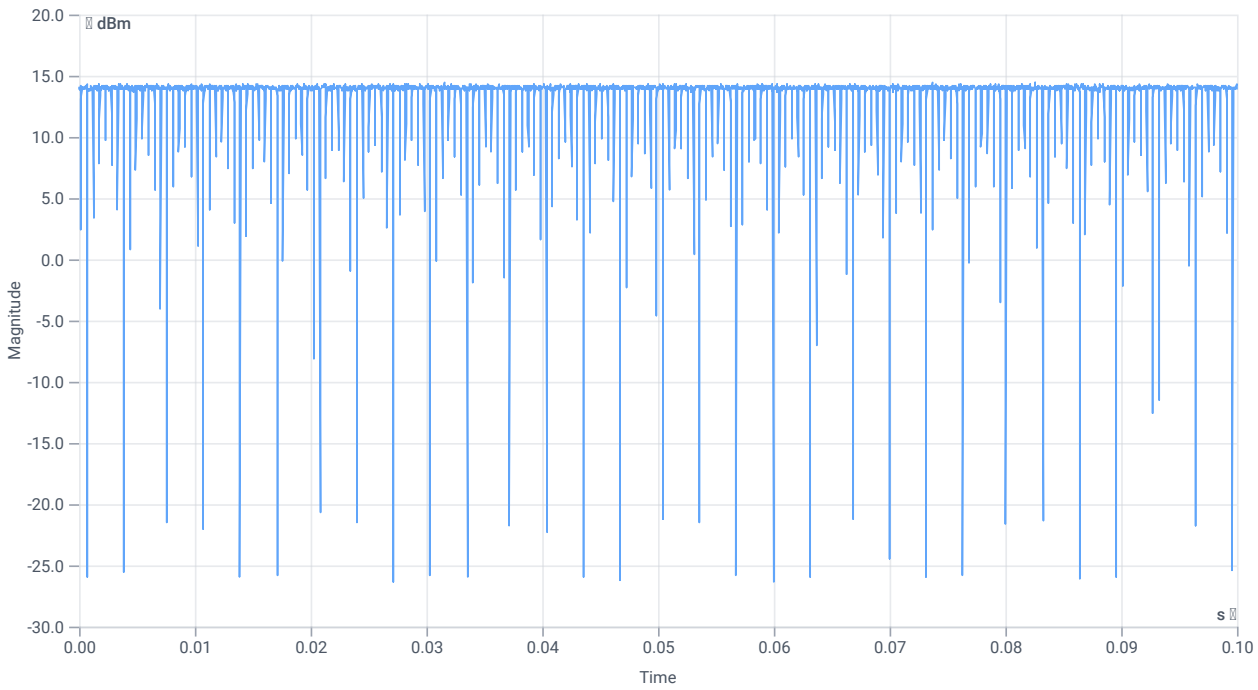
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	14.25	dBm	INFO
Ref. Frequency	---	---	5280.790	MHz	INFO

Evaluation max. Duty Cycle

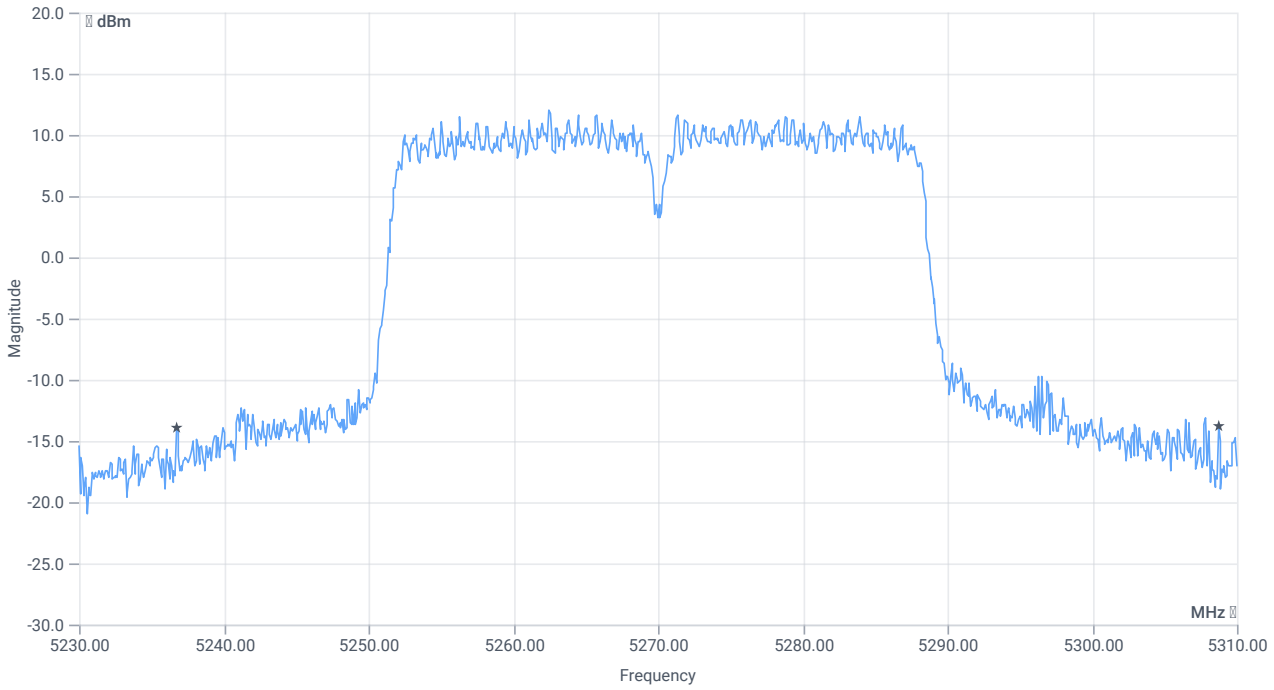
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:74					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

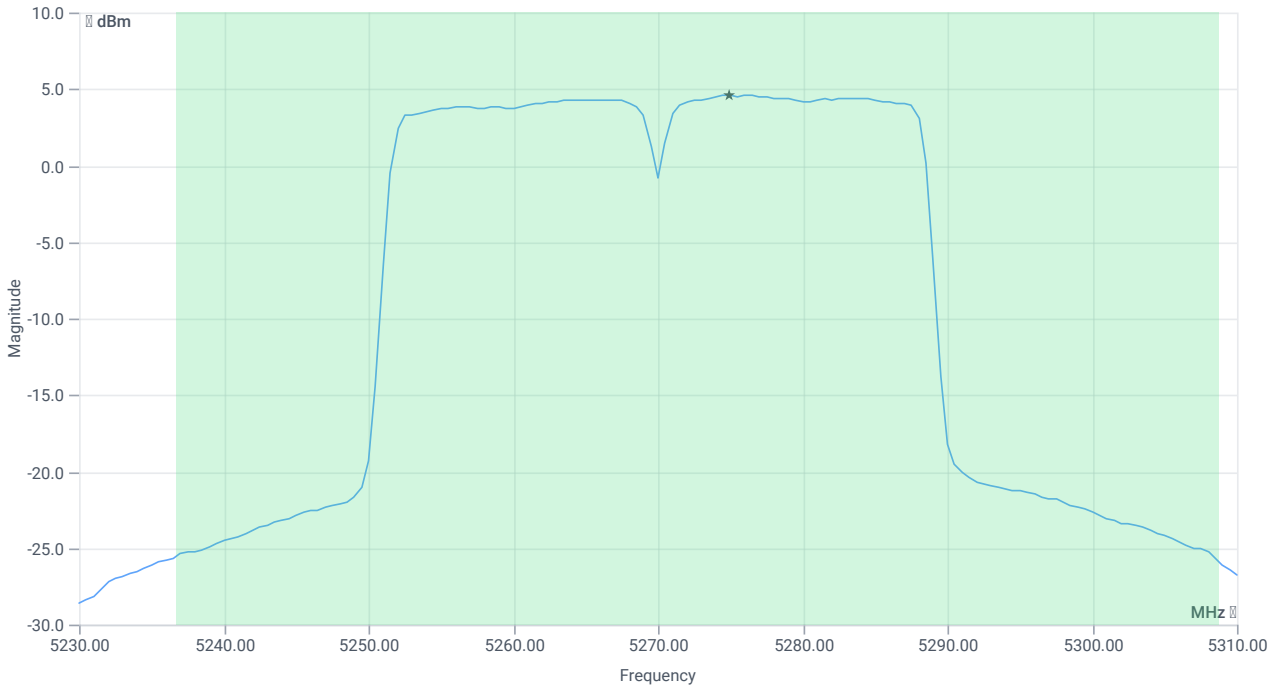
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	72	MHz	INFO
T1 26dB	---	---	5236.7200	MHz	INFO
T2 26dB	---	---	5308.7200	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	26.25 | 16.32 | 25
Start [MHz] | Stop [MHz]	5230.000 | 5310.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.37	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	20.04	dBm	PASS
Limit: 11 dBm + 10 log 72					
Max Output Power DC corrected	---	29.57	20.04	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	4.59	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	5.26	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:18:21
Ambit temp [°C] | humidity [rel%]	21.2 | 30
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

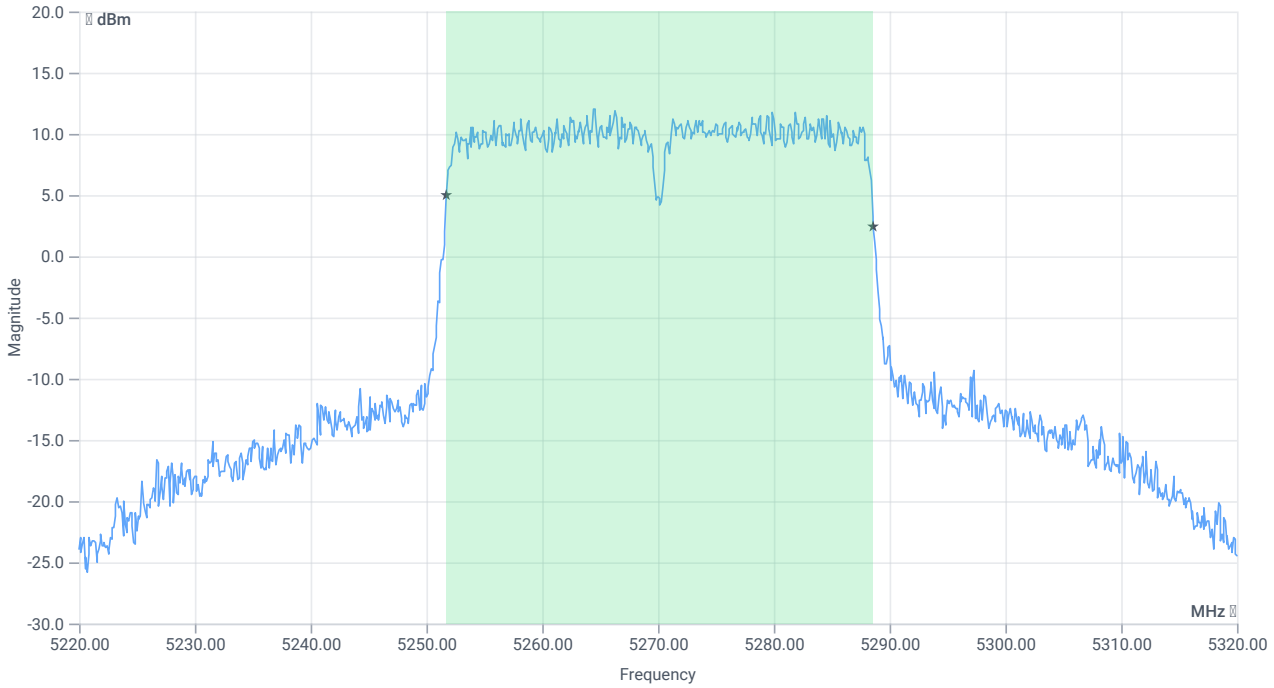
Test at TX 5270 MHz

RESULT: Reference Power cond.

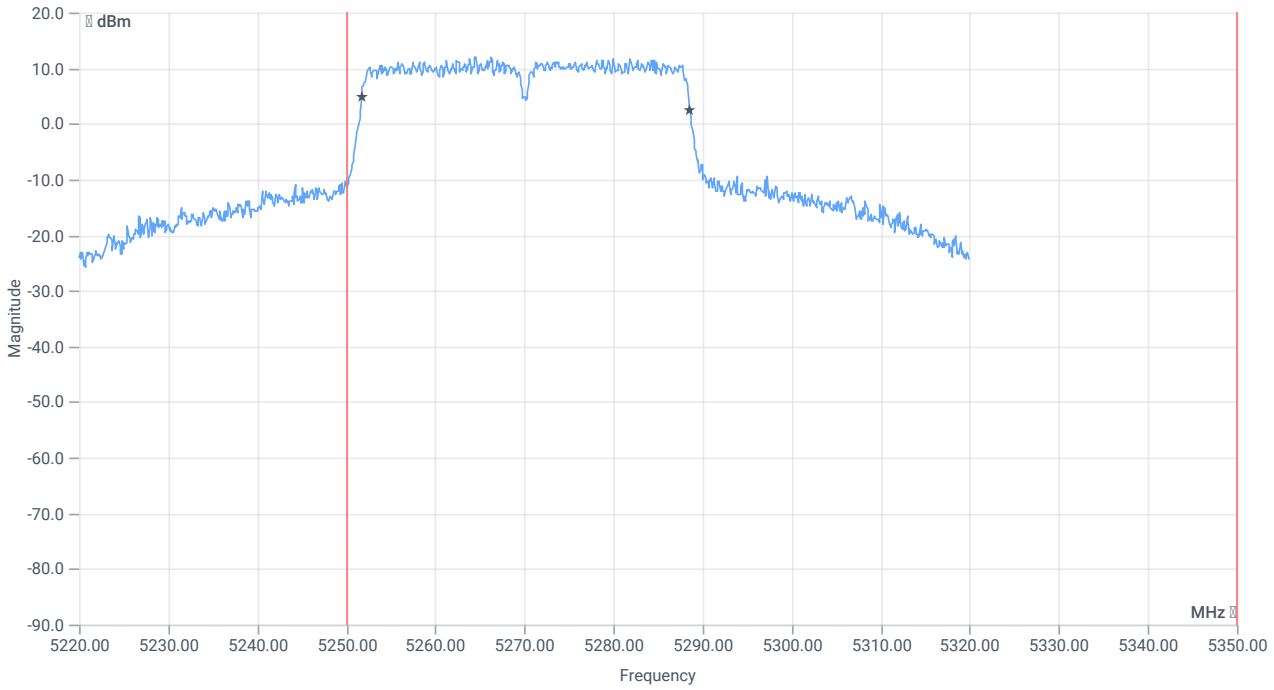
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.65	dBm	INFO
Ref. Frequency	---	---	5264.410	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	21.65 | 16.32 | 25
Start [MHz] | Stop [MHz]	5220.000 | 5320.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



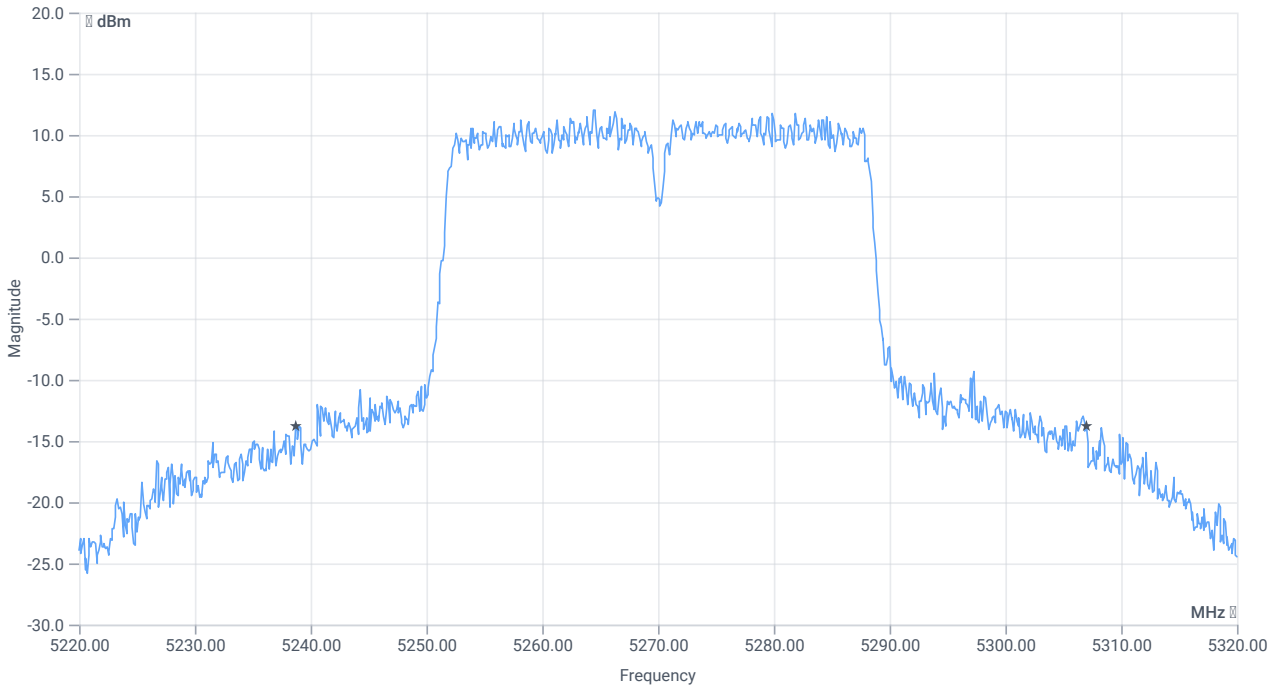
BW 99PCT



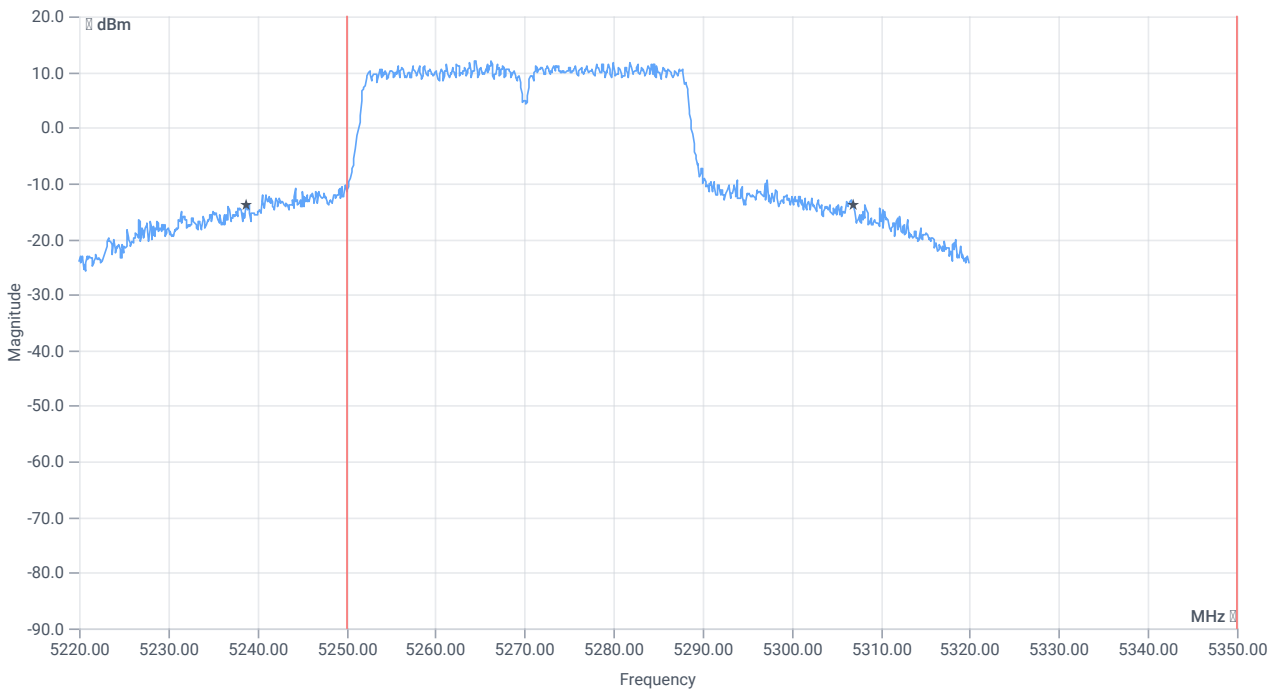
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.863	MHz	INFO
T1 99%	5250.000000	---	5251.7183	MHz	PASS since U-NII-1 is supported
T2 99%	---	5350.000000	5288.5814	MHz	PASS



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	68.3	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5250.000000	---	5238.7000	MHz	PASS since U-NII-1 is supported
T2 26dB	---	5350.000000	5307.0000	MHz	PASS

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:18:57
Ambit temp [°C] | humidity [rel%]	21.2 | 30
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5270 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	19.67	dBm	INFO
Ant:1 BW 26dB	---	---	79.200	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	20.04	dBm	INFO
Ant:2 BW 26dB	---	---	72.000	MHz	INFO
∑ Limit absolute	---	24	22.87	dBm	PASS
∑ Limit: 11 dBm + 10 log 72	---	29.57	22.87	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	4.69	dBm/1MHz	INFO
Ant:2 PSD	---	---	5.26	dBm/1MHz	INFO
∑	---	11	7.99	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:23:21
Ambit temp [°C] | humidity [rel%]	21.2 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5310 MHz

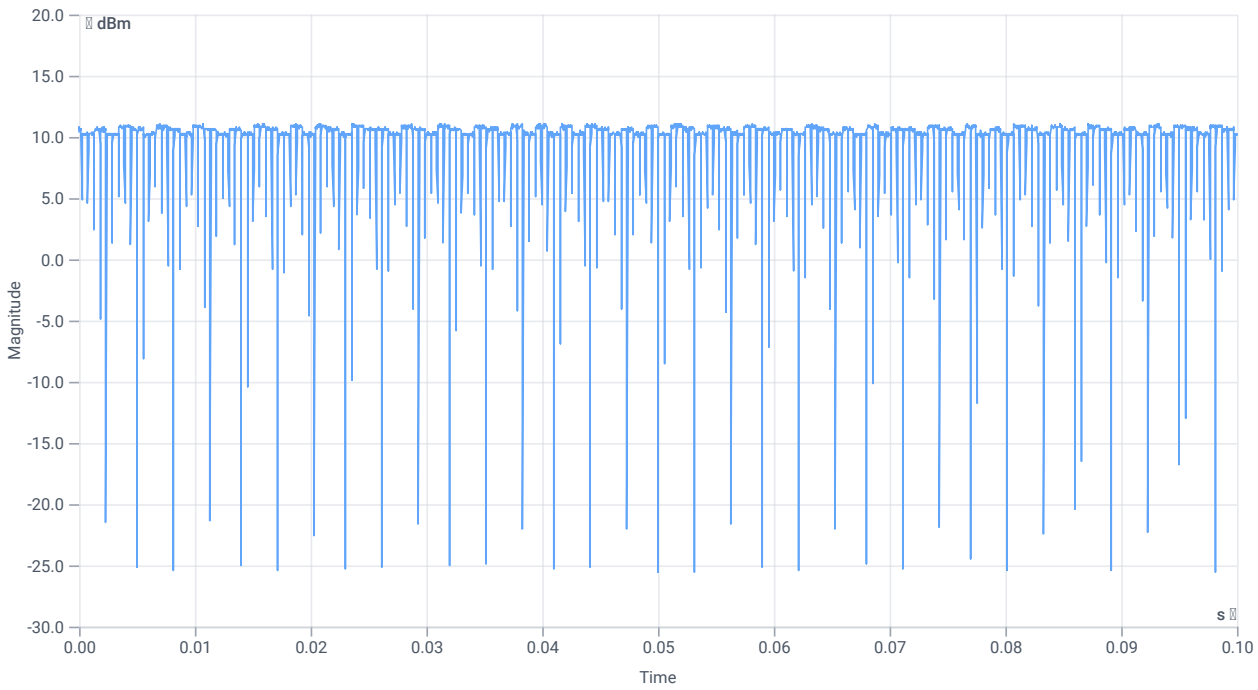
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	9.61	dBm	INFO
Ref. Frequency	---	---	5307.800	MHz	INFO

Evaluation max. Duty Cycle

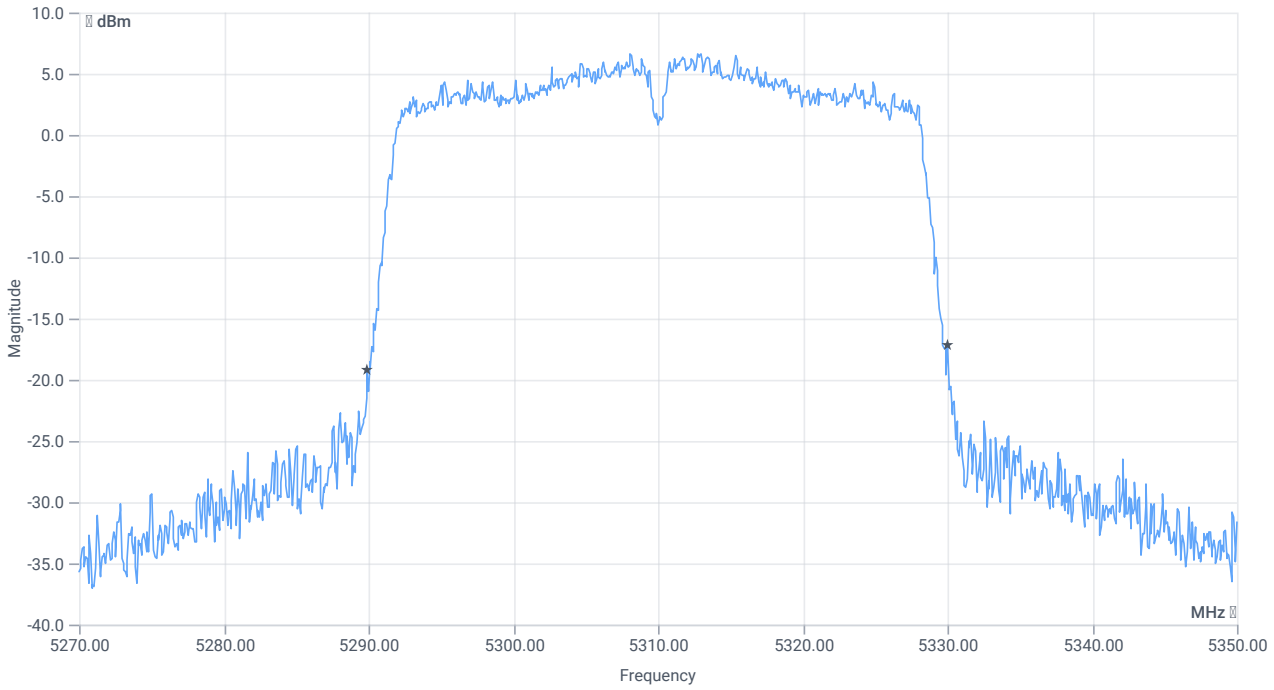
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:79					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

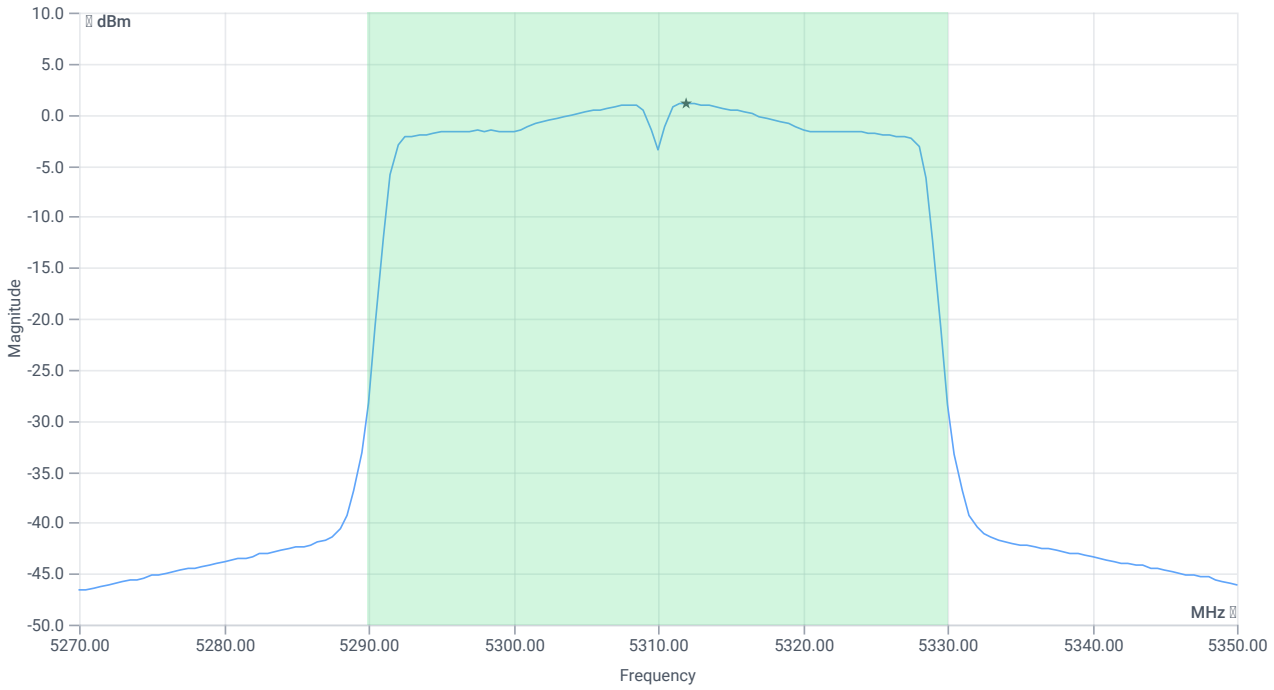
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	40.08	MHz	INFO
T1 26dB	---	---	5289.9200	MHz	INFO
T2 26dB	---	---	5330.0000	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	21.61 | 16.22 | 20
Start [MHz] | Stop [MHz]	5270.000 | 5350.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	14.64	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	15.31	dBm	PASS
Limit: 11 dBm + 10 log 40.08					
Max Output Power DC corrected	---	27.03	15.31	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	1.11	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	1.78	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:24:53
Ambit temp [°C] | humidity [rel%]	21.3 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

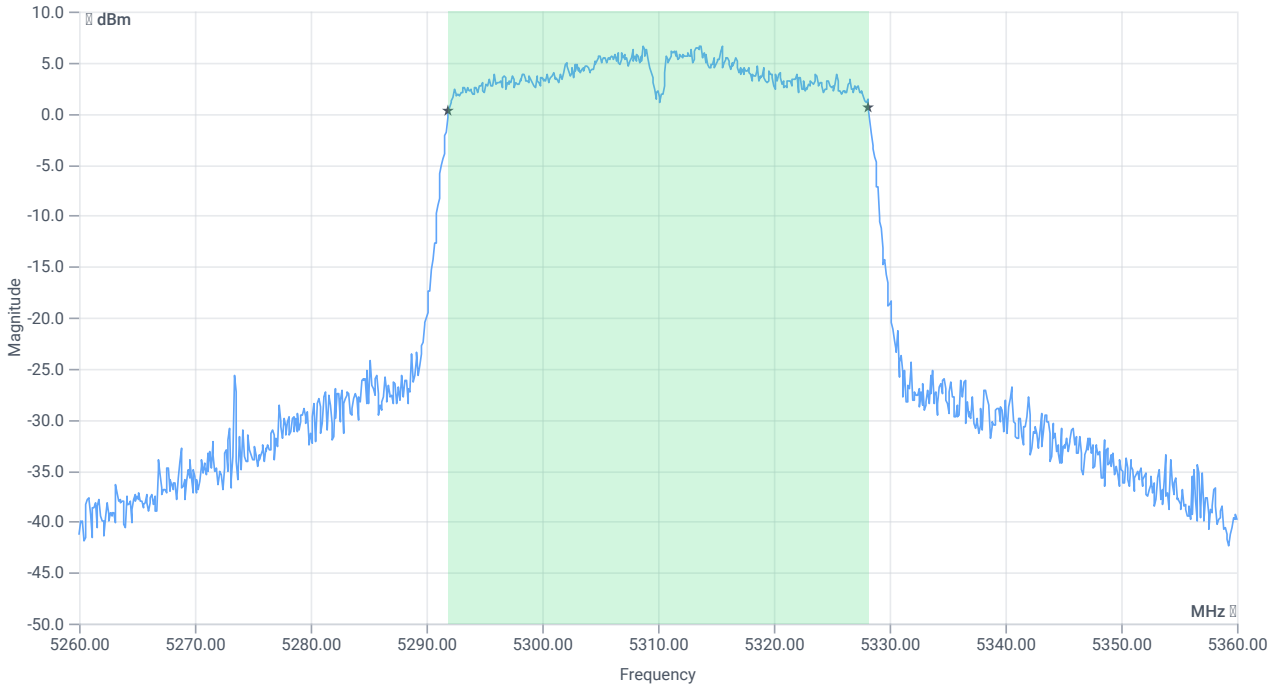
Test at TX 5310 MHz

RESULT: Reference Power cond.

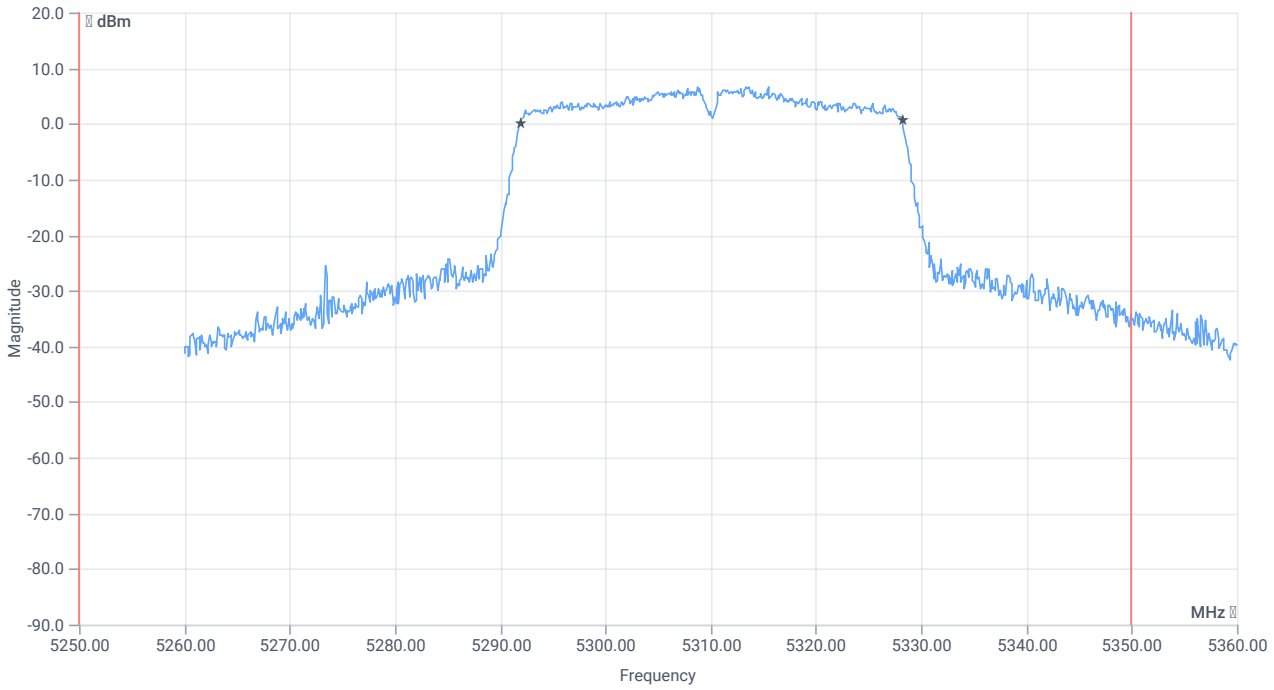
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	9.54	dBm	INFO
Ref. Frequency	---	---	5306.000	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	17.54 | 16.22 | 20
Start [MHz] | Stop [MHz]	5260.000 | 5360.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



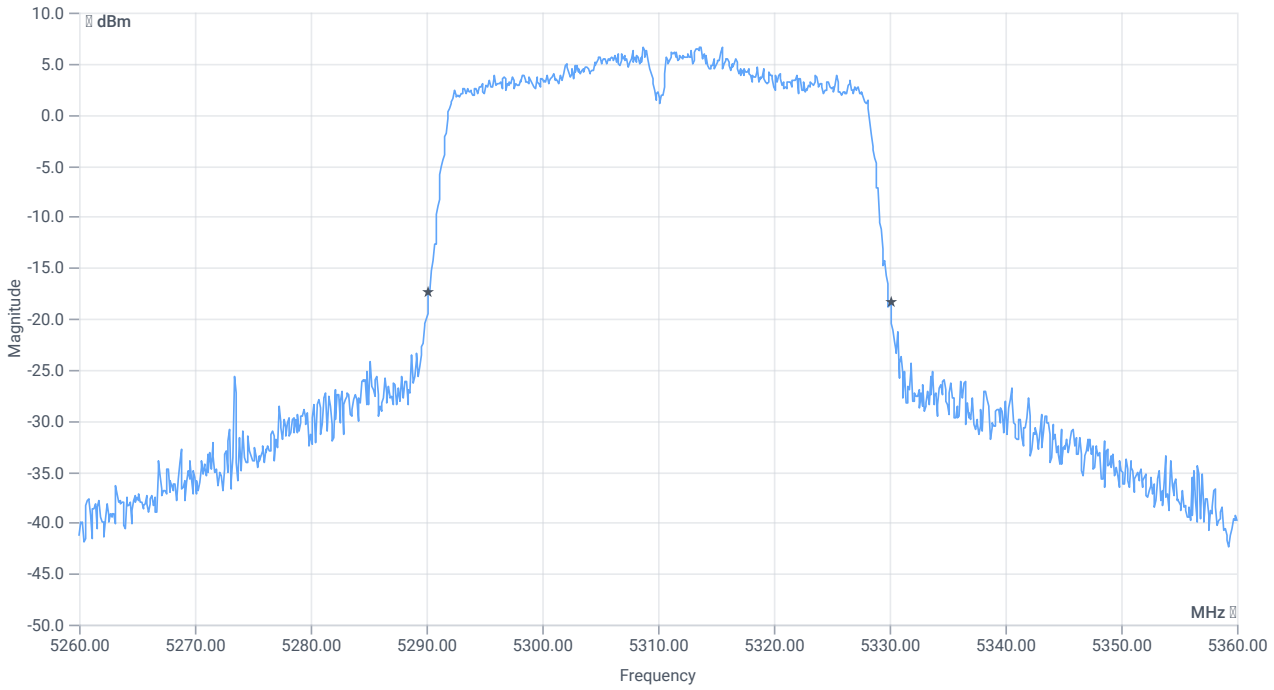
BW 99PCT



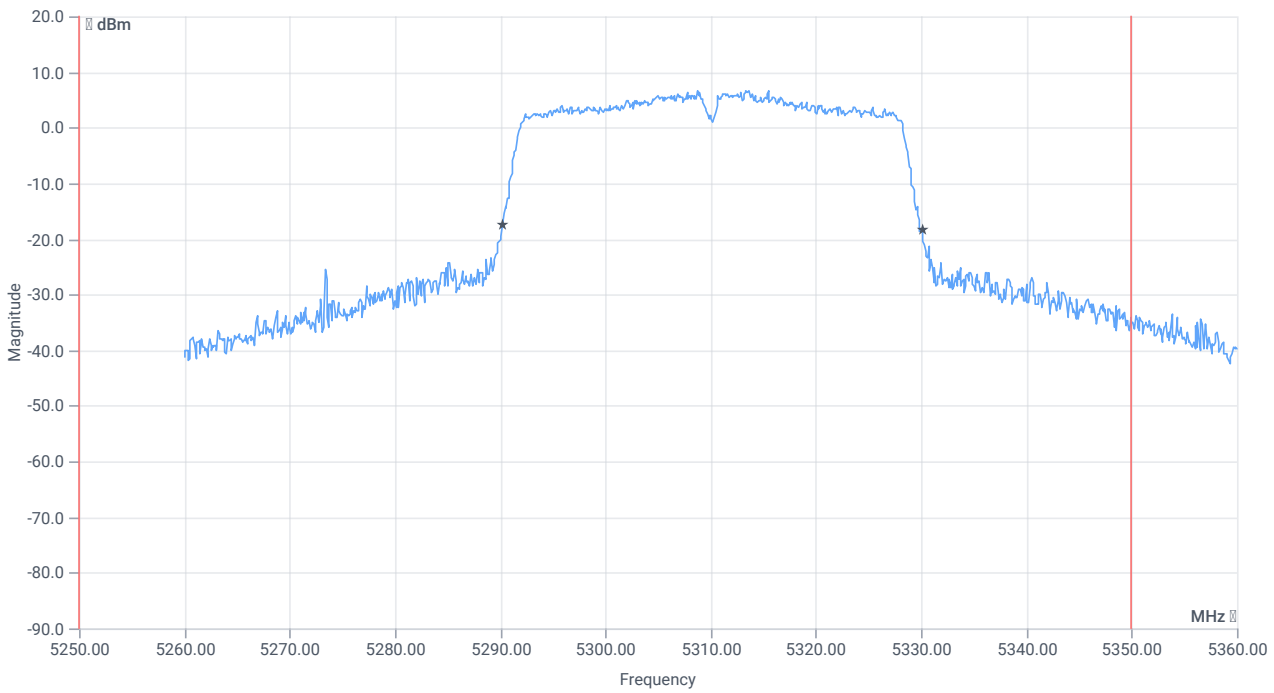
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.264	MHz	INFO
T1 99%	5250.000000	---	5291.9181	MHz	PASS since U-NII-1 is supported
T2 99%	---	5350.000000	5328.1818	MHz	PASS



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.9	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5250.000000	---	5290.2000	MHz	PASS since U-NII-1 is supported
T2 26dB	---	5350.000000	5330.1000	MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:25:30
Ambit temp [°C] | humidity [rel%]	21.3 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5310 MHz

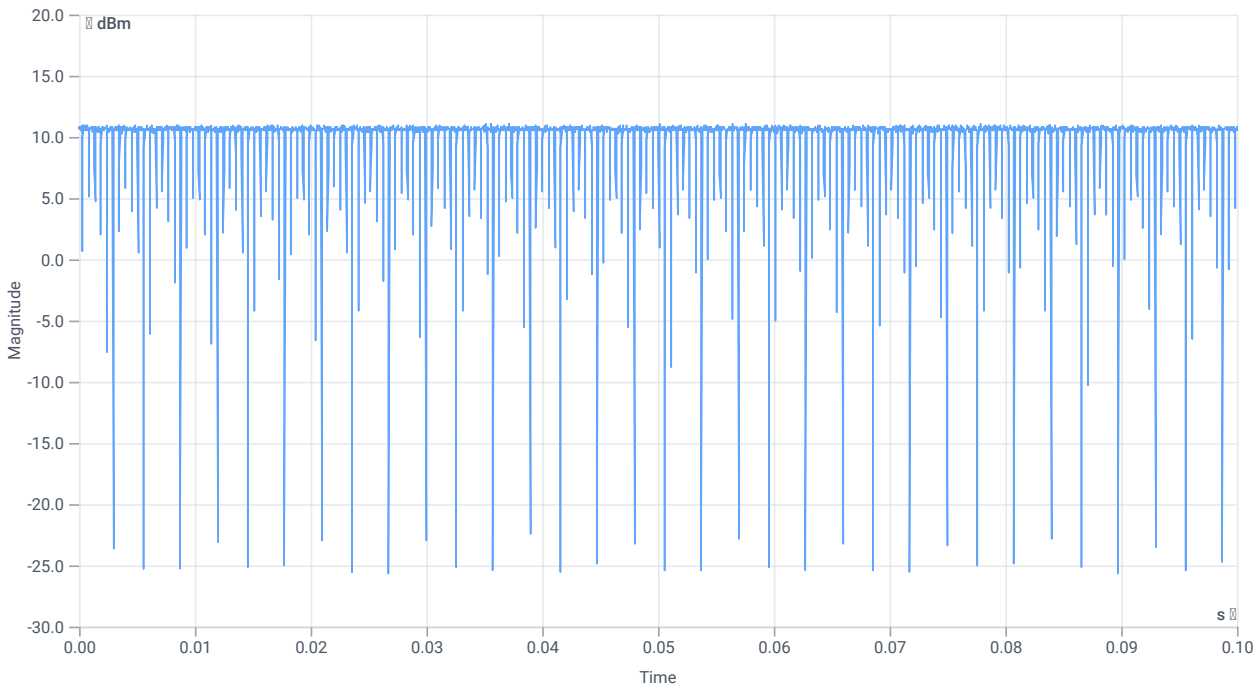
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	10.72	dBm	INFO
Ref. Frequency	---	---	5311.800	MHz	INFO

Evaluation max. Duty Cycle

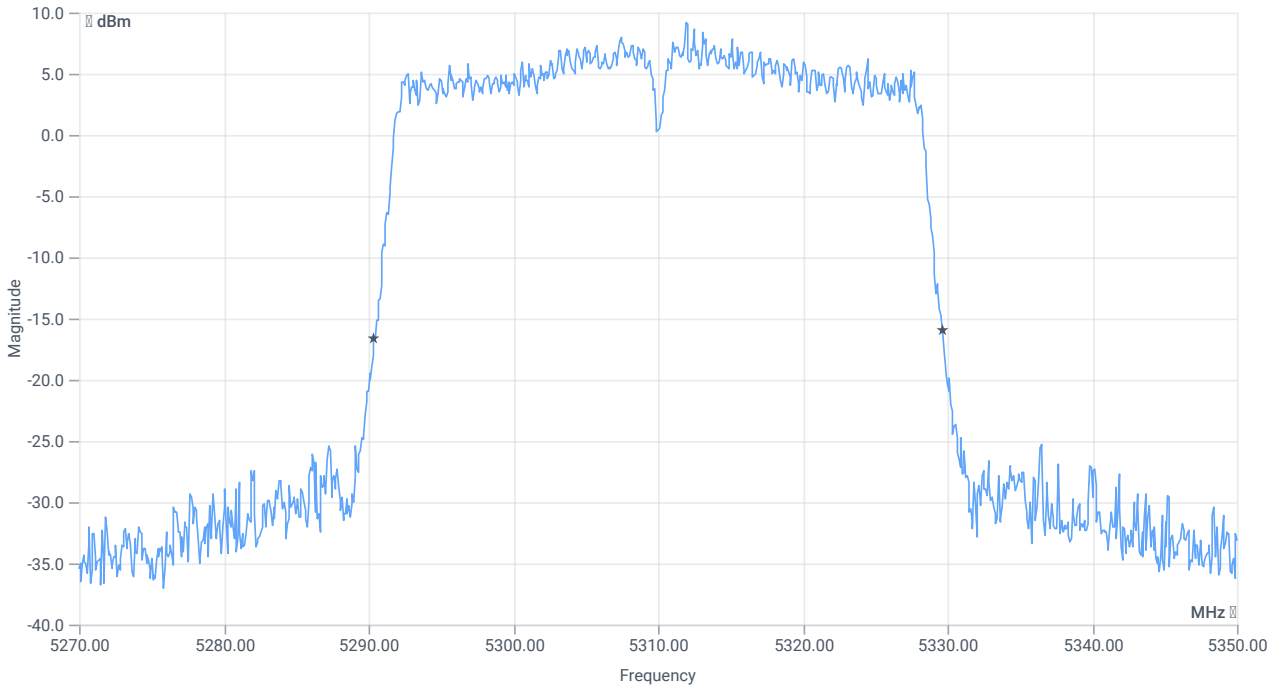
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:86					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

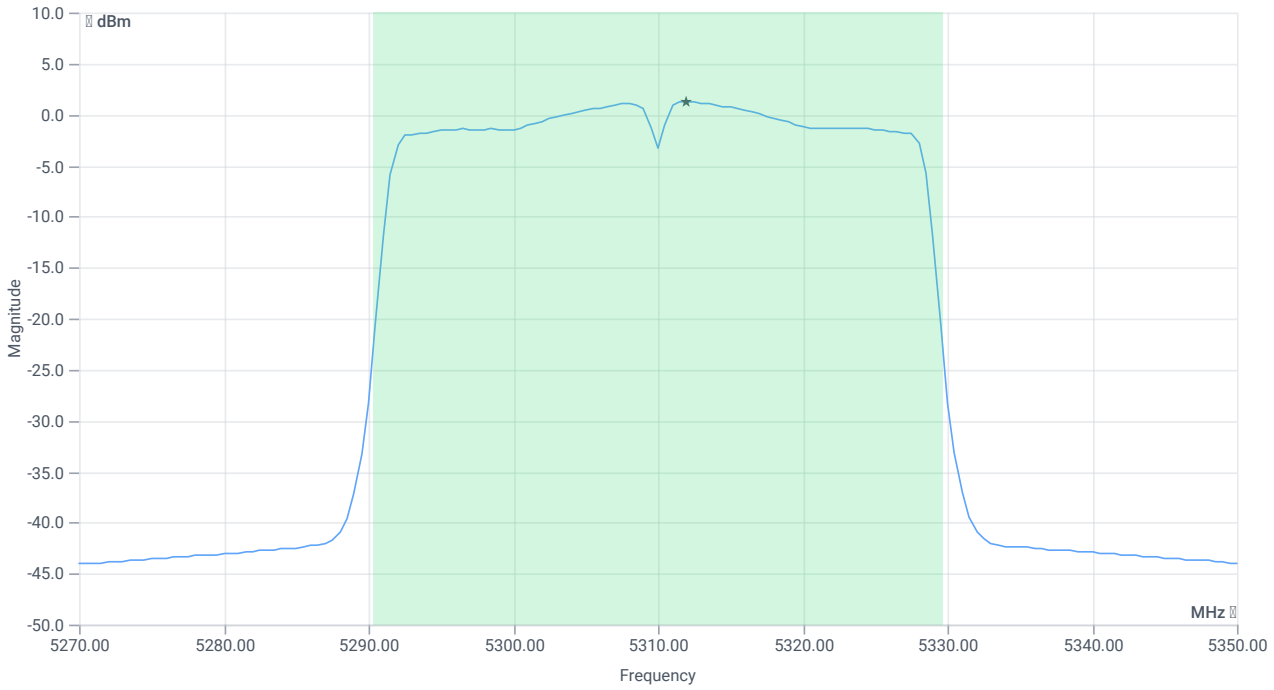
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.28	MHz	INFO
T1 26dB	---	---	5290.4000	MHz	INFO
T2 26dB	---	---	5329.6800	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	22.72 | 16.22 | 25
Start [MHz] | Stop [MHz]	5270.000 | 5350.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	14.83	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	15.5	dBm	PASS
Limit: 11 dBm + 10 log 39.28					
Max Output Power DC corrected	---	26.94	15.5	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	1.29	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	1.96	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:27:02
Ambit temp [°C] | humidity [rel%]	21.2 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

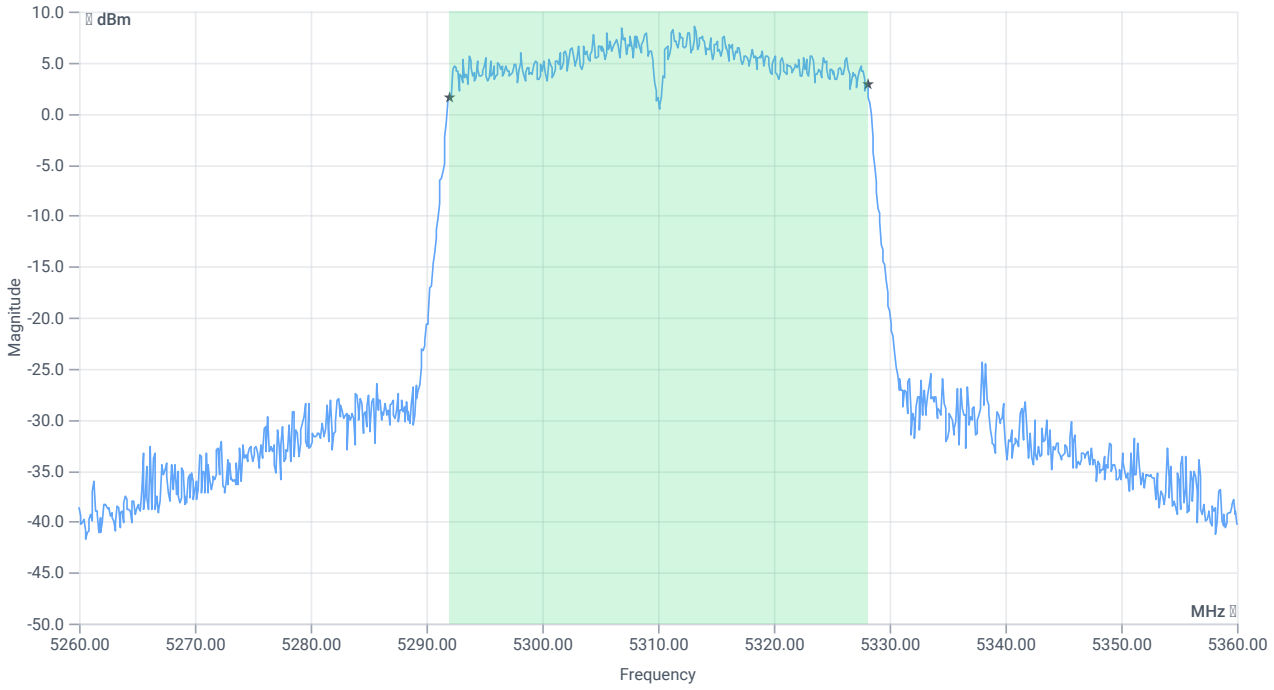
Test at TX 5310 MHz

RESULT: Reference Power cond.

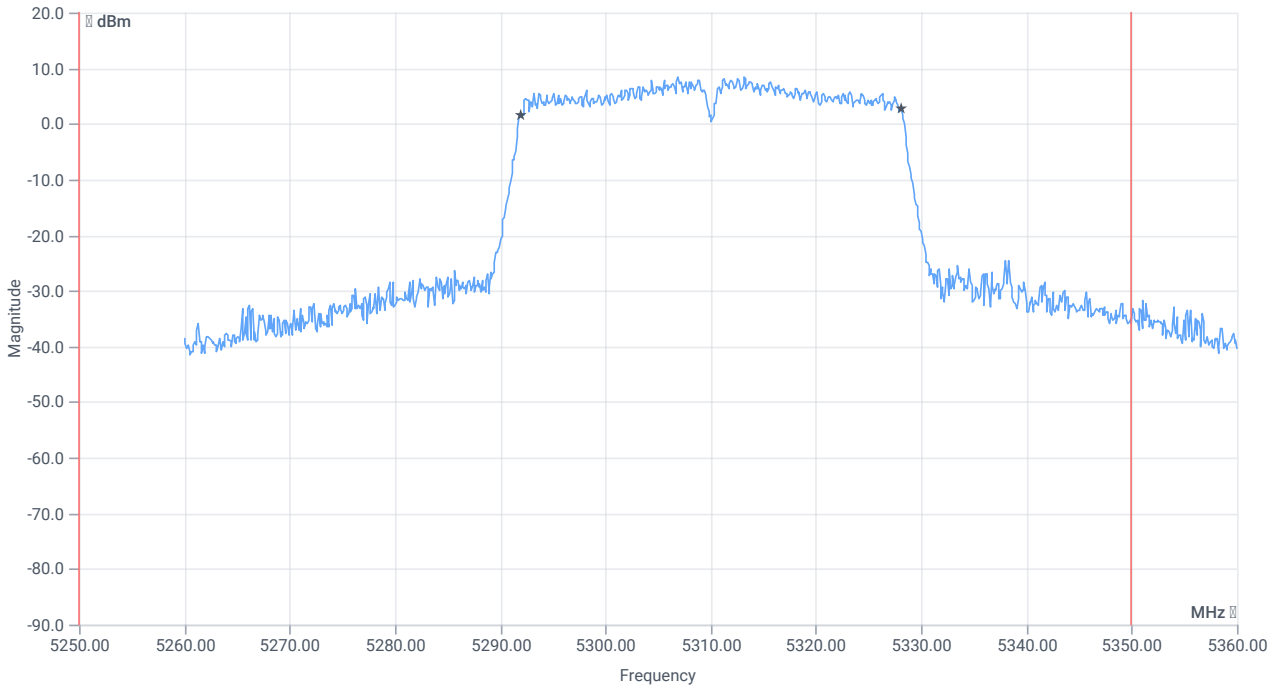
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	9.52	dBm	INFO
Ref. Frequency	---	---	5304.410	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	17.52 | 16.22 | 20
Start [MHz] | Stop [MHz]	5260.000 | 5360.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



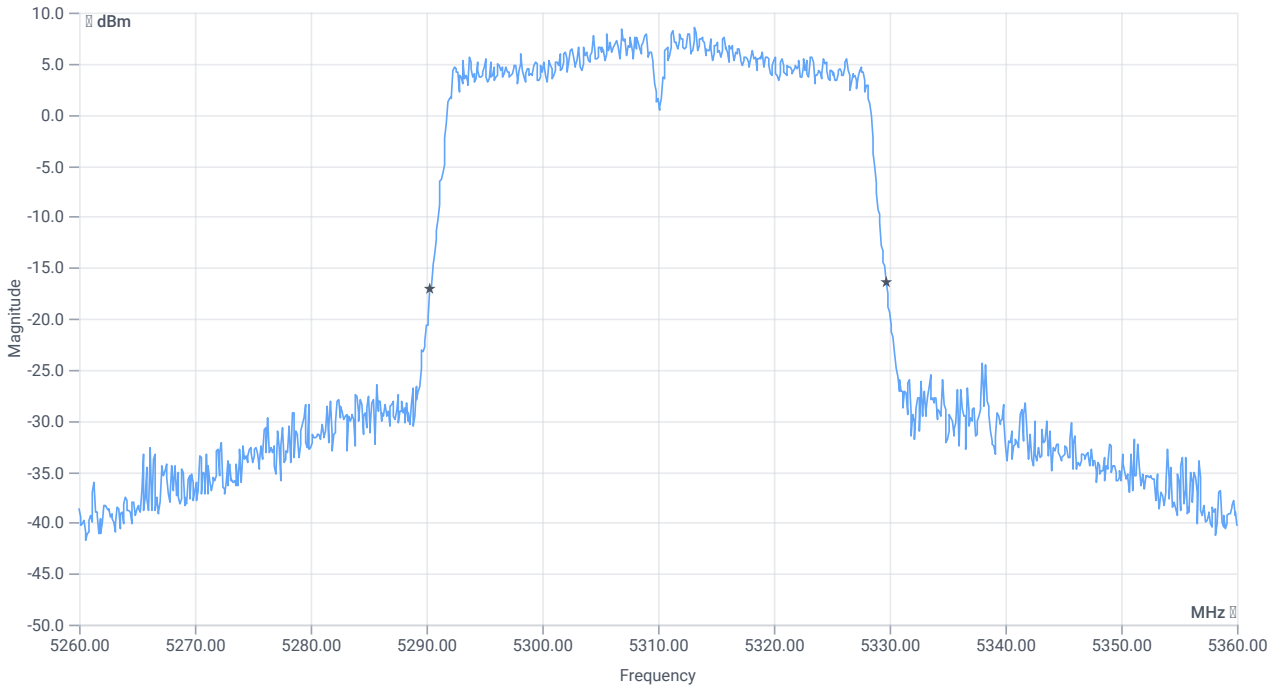
BW 99PCT



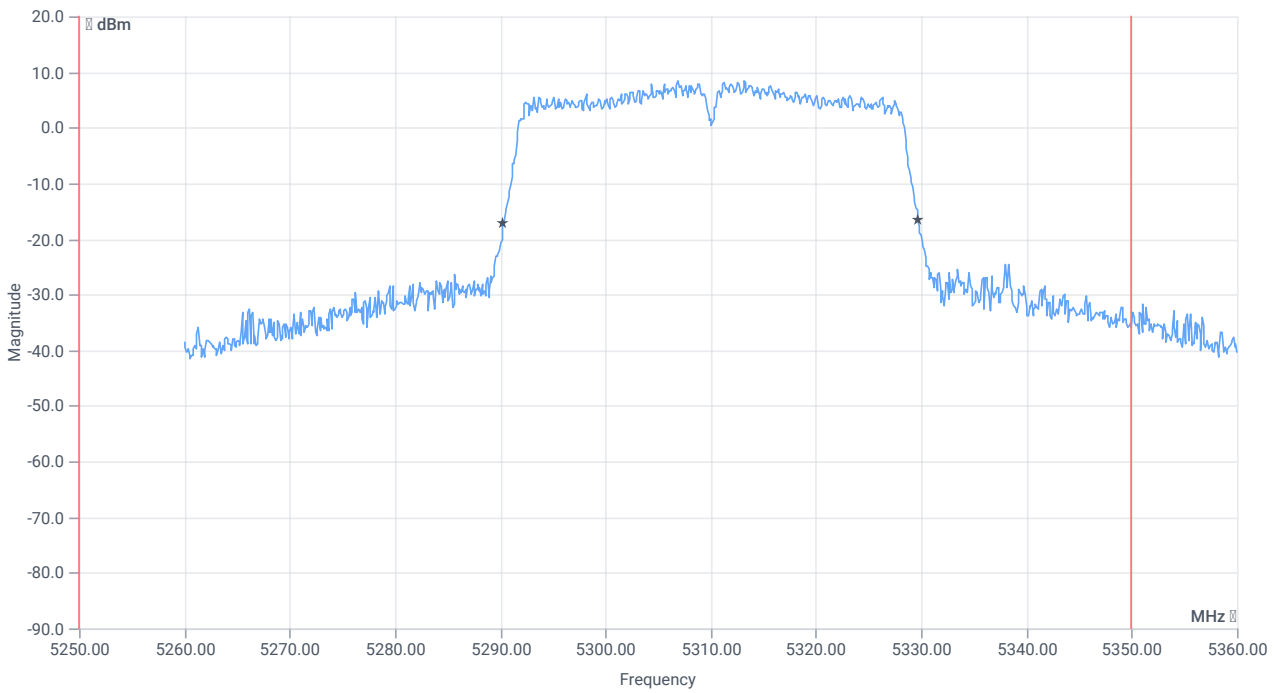
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.064	MHz	INFO
T1 99%	5250.000000	---	5292.0180	MHz	PASS since U-NII-1 is supported
T2 99%	---	5350.000000	5328.0819	MHz	PASS



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.4	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5250.000000	---	5290.3000	MHz	PASS since U-NII-1 is supported
T2 26dB	---	5350.000000	5329.7000	MHz	PASS

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2A

References

TC start	19.01.2024 09:27:39
Ambit temp [°C] | humidity [rel%]	21.3 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-2A
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5270
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5310
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5310 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	15.31	dBm	INFO
Ant:1 BW 26dB	---	---	40.080	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	15.5	dBm	INFO
Ant:2 BW 26dB	---	---	39.280	MHz	INFO
∑ Limit absolute	---	24	18.42	dBm	PASS
∑ Limit: 11 dBm + 10 log 39.28	---	26.94	18.42	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	1.78	dBm/1MHz	INFO
Ant:2 PSD	---	---	1.96	dBm/1MHz	INFO
∑	---	11	4.88	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:32:53
Ambit temp [°C] | humidity [rel%]	21.3 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5510 MHz

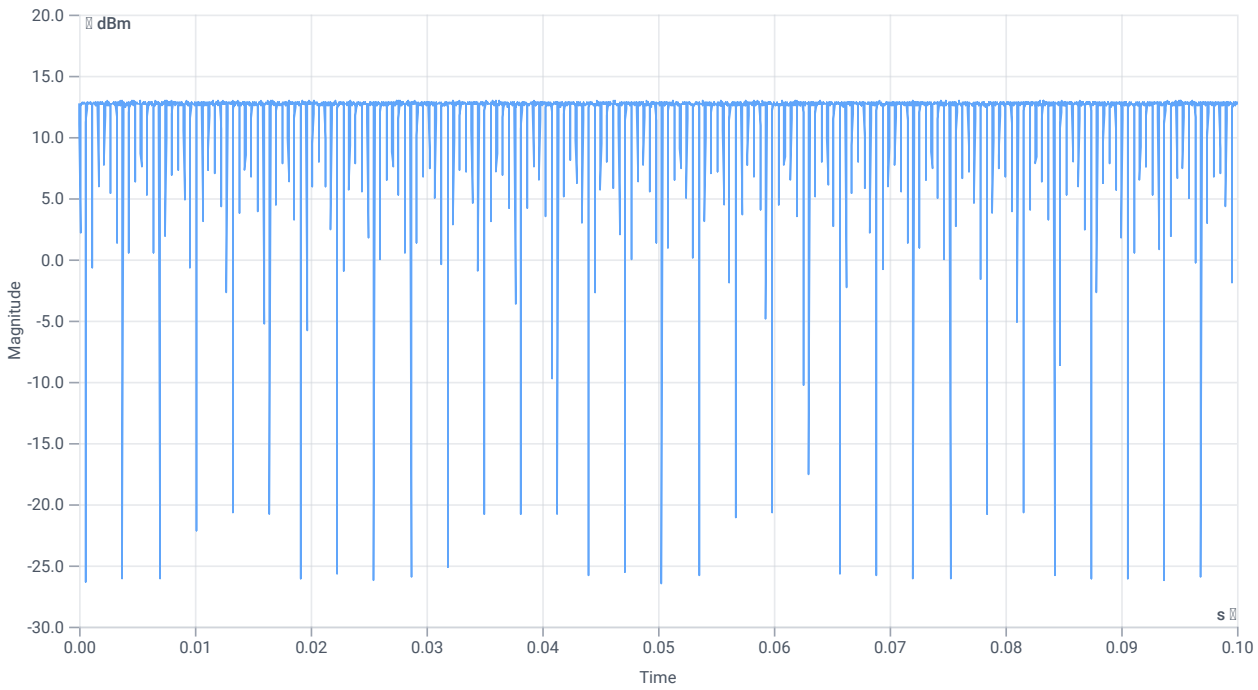
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	11.49	dBm	INFO
Ref. Frequency	---	---	5512.800	MHz	INFO

Evaluation max. Duty Cycle

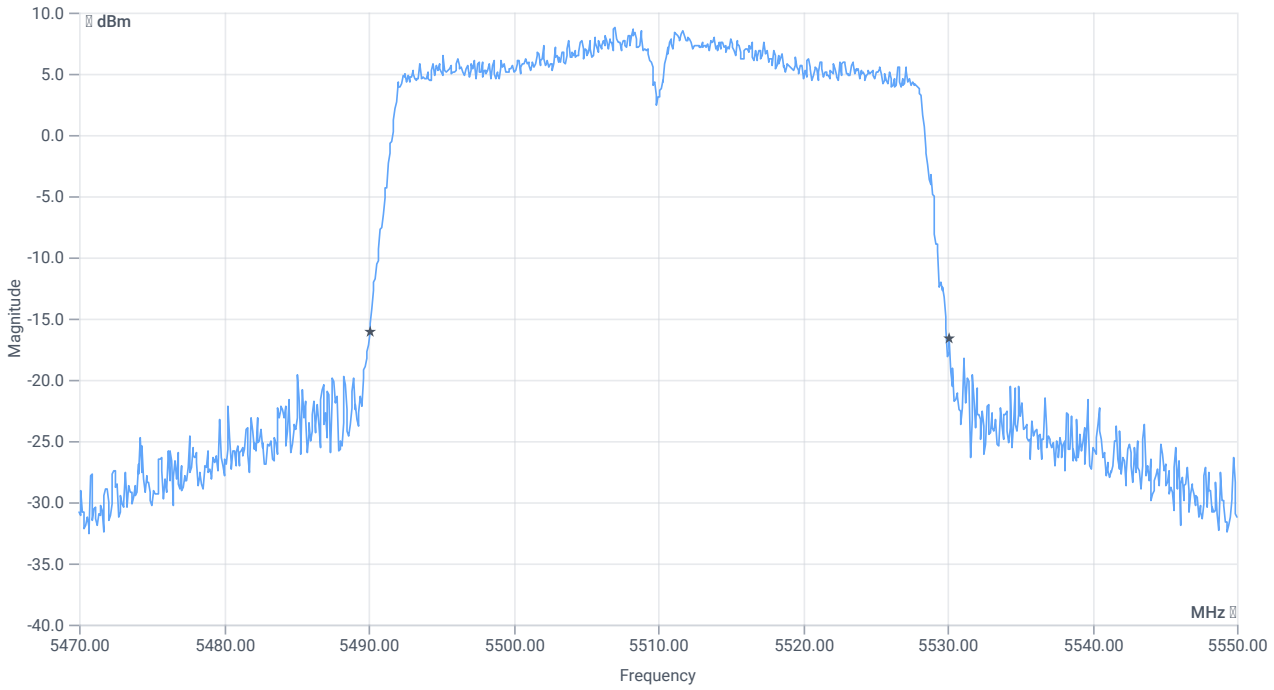
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:82					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

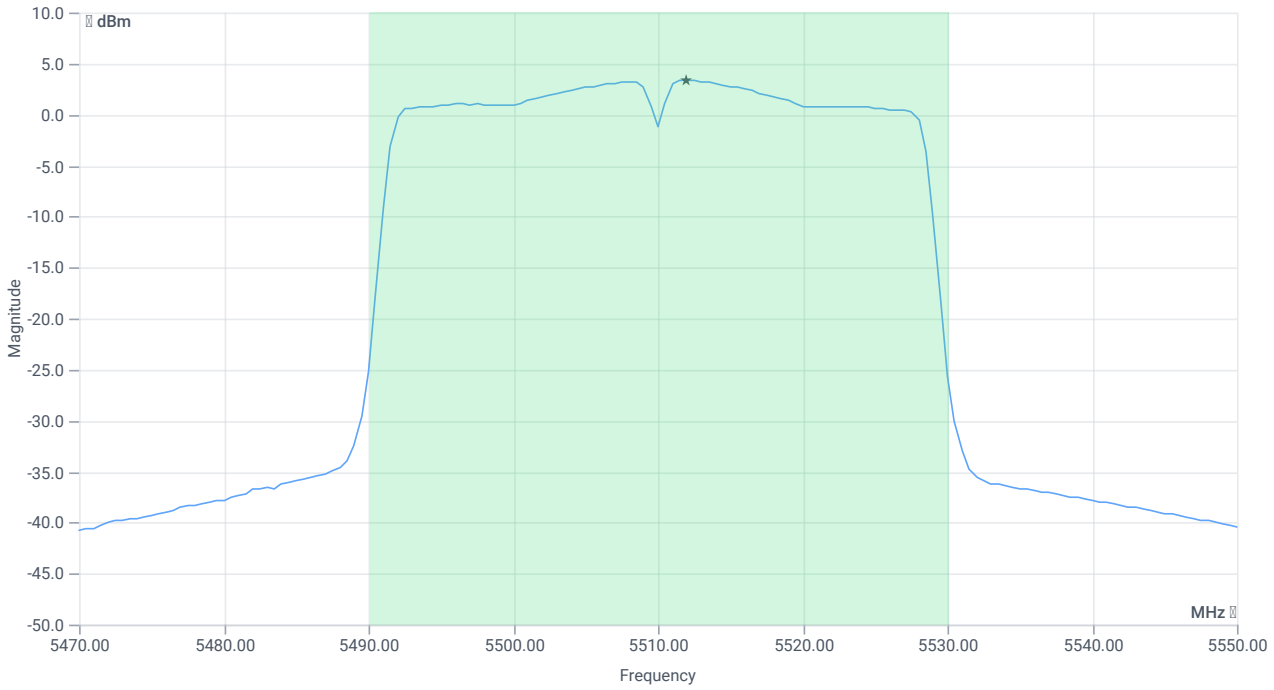
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	40.08	MHz	INFO
T1 26dB	---	---	5490.0800	MHz	INFO
T2 26dB	---	---	5530.1600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	23.49 | 16.69 | 25
Start [MHz] | Stop [MHz]	5470.000 | 5550.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	17.05	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	17.72	dBm	PASS
Limit: 11 dBm + 10 log 40.08					
Max Output Power DC corrected	---	27.03	17.72	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	3.37	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	4.04	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:34:21
Ambit temp [°C] | humidity [rel%]	21.3 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

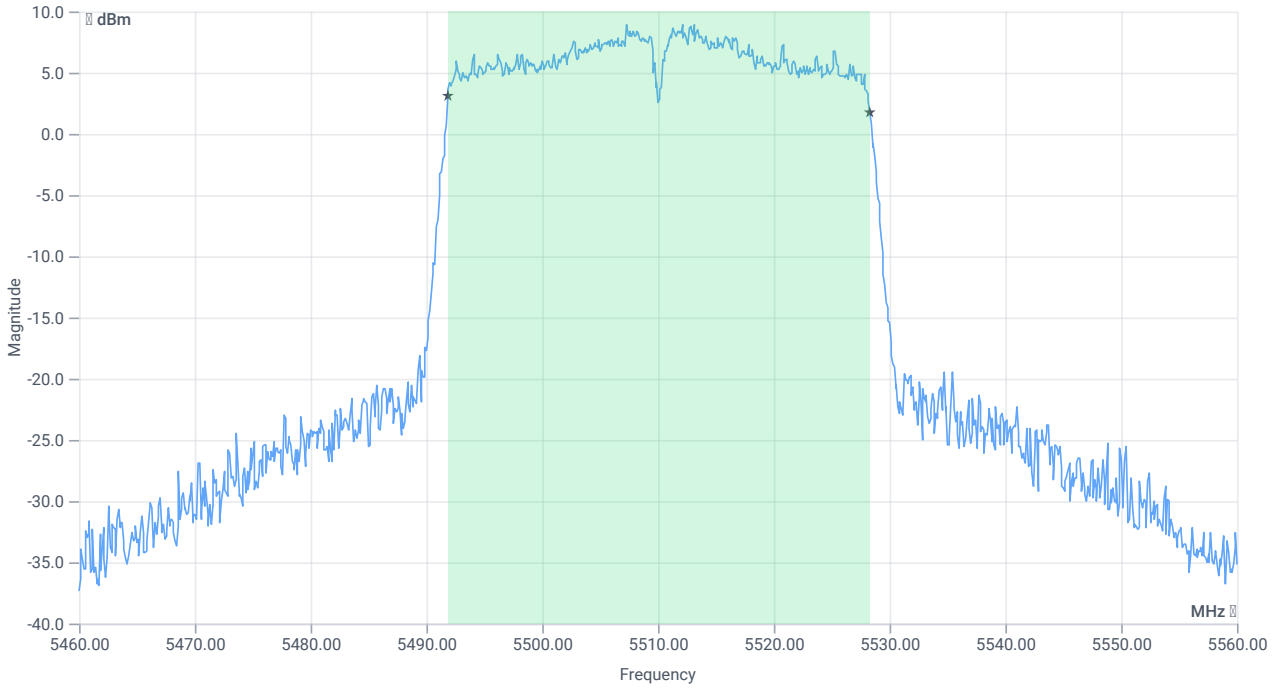
Test at TX 5510 MHz

RESULT: Reference Power cond.

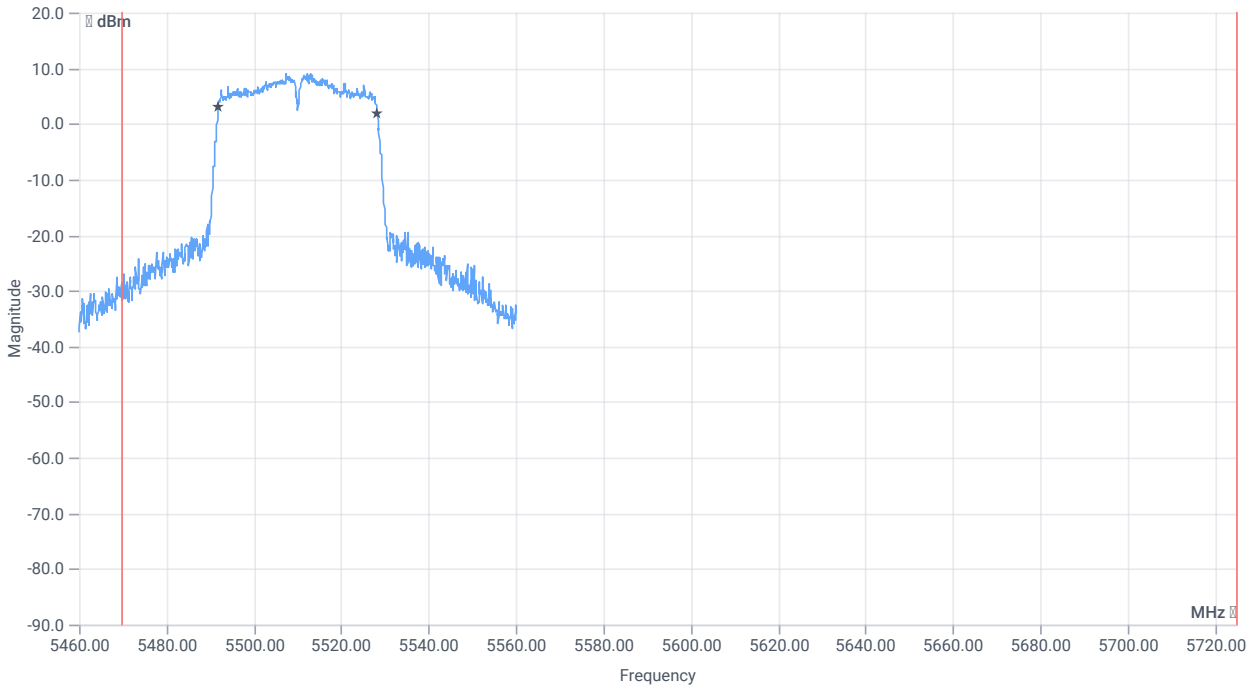
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	11.49	dBm	INFO
Ref. Frequency	---	---	5511.600	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	19.49 | 16.69 | 20
Start [MHz] | Stop [MHz]	5460.000 | 5560.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



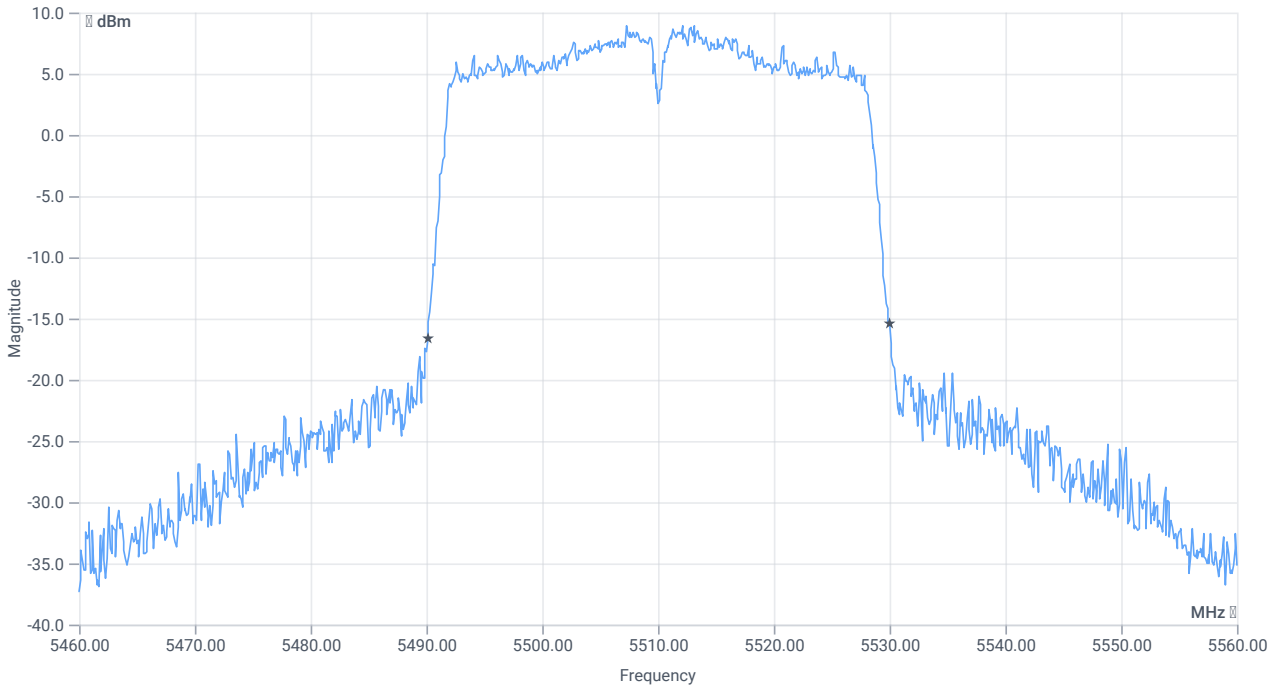
BW 99PCT



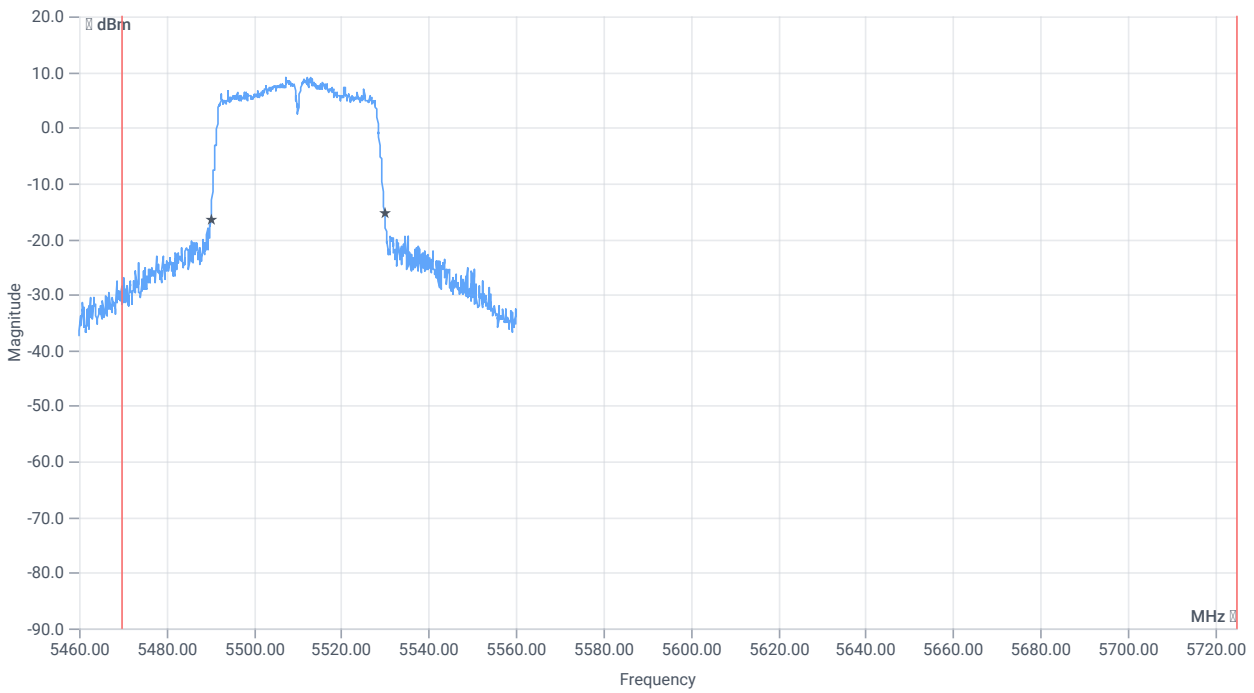
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.464	MHz	INFO
T1 99%	5470.000000	---	5491.8182	MHz	PASS since U-NII-3 is supported
T2 99%	---	5725.000000	5528.2817	MHz	



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.9	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5470.000000	---	5490.1000	MHz	PASS since U-NII-3 is supported
T2 26dB	---	5725.000000	5530.0000	MHz	

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:34:51
Ambit temp [°C] | humidity [rel%]	21.3 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5510 MHz

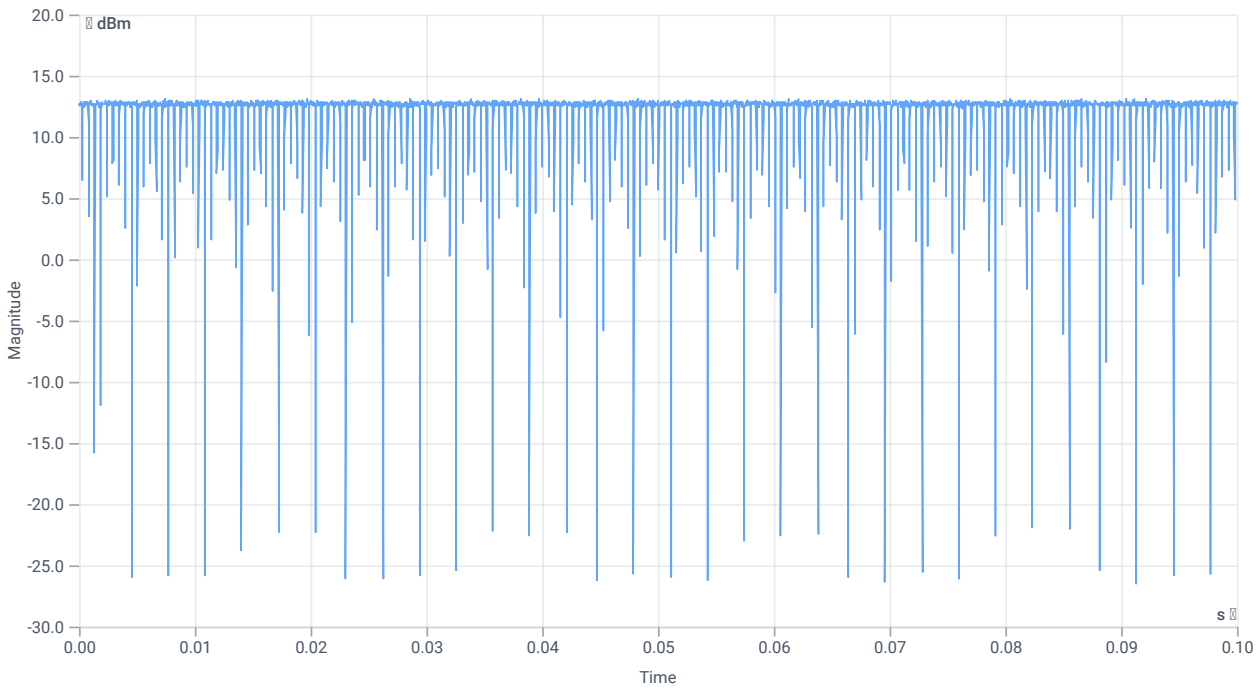
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.26	dBm	INFO
Ref. Frequency	---	---	5508.400	MHz	INFO

Evaluation max. Duty Cycle

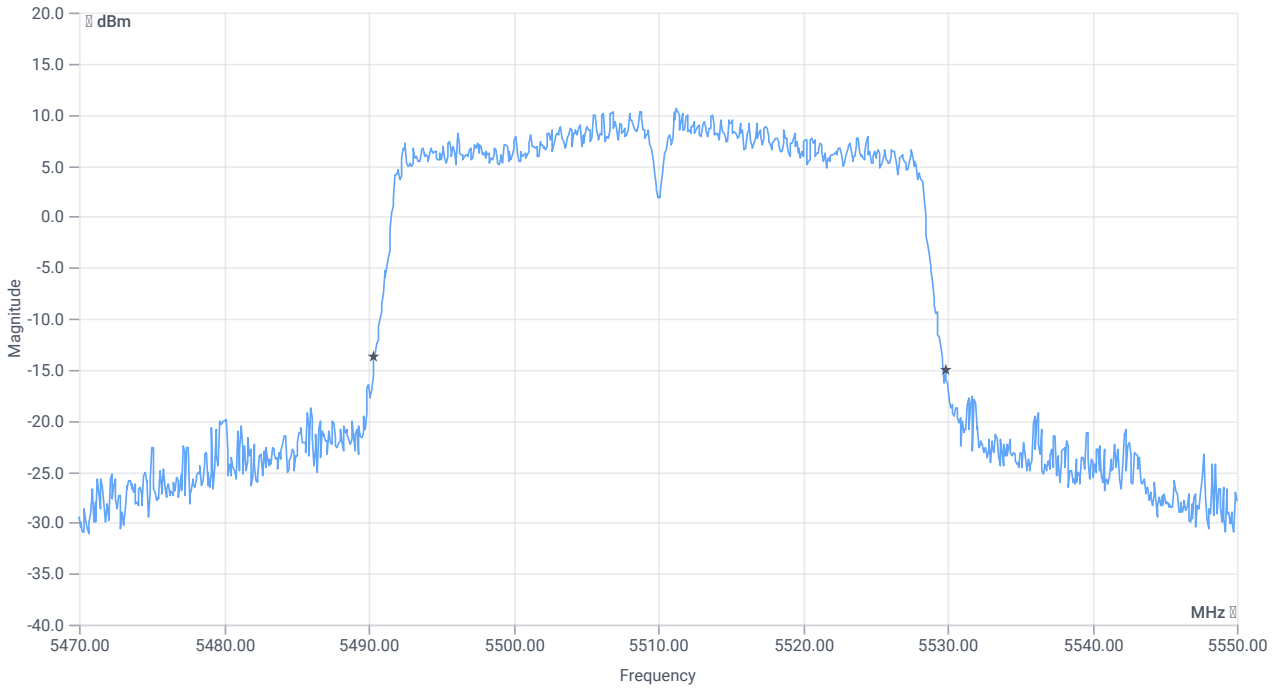
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:80					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

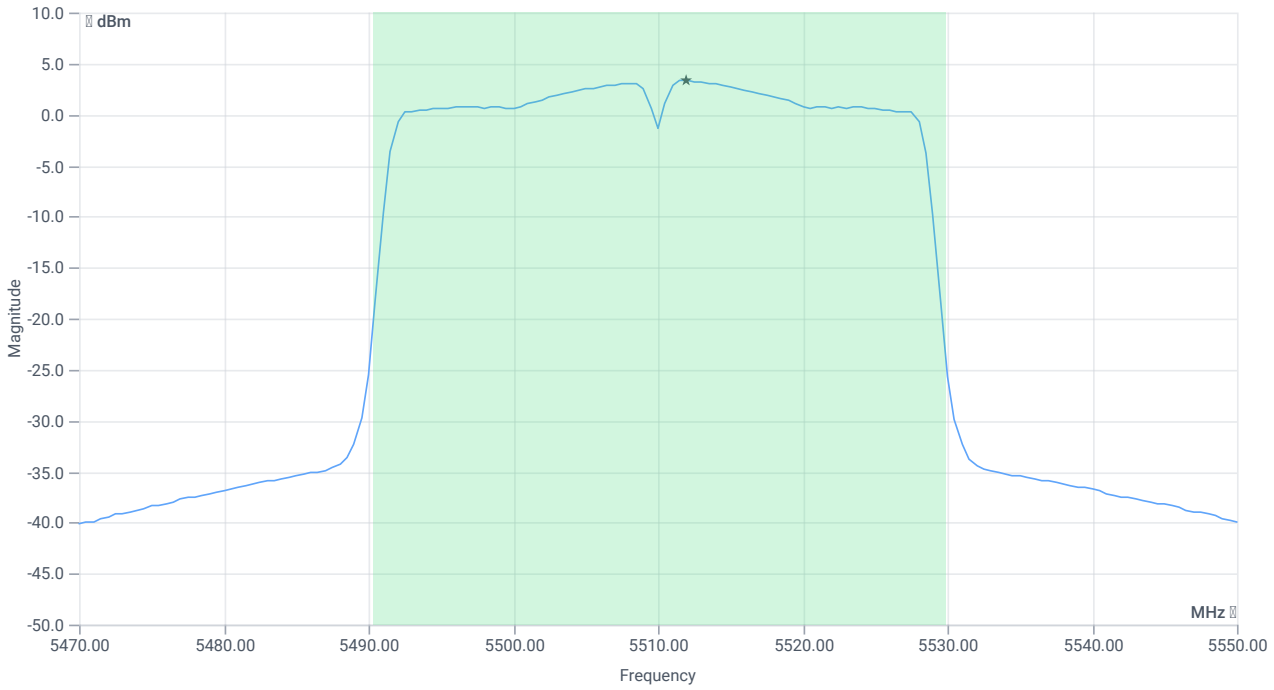
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.44	MHz	INFO
T1 26dB	---	---	5490.4000	MHz	INFO
T2 26dB	---	---	5529.8400	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.26 | 16.69 | 25
Start [MHz] | Stop [MHz]	5470.000 | 5550.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	16.9	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	17.57	dBm	PASS
Limit: 11 dBm + 10 log 39.44					
Max Output Power DC corrected	---	26.96	17.57	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	3.29	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	3.96	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:36:19
Ambit temp [°C] | humidity [rel%]	21.4 | 27
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

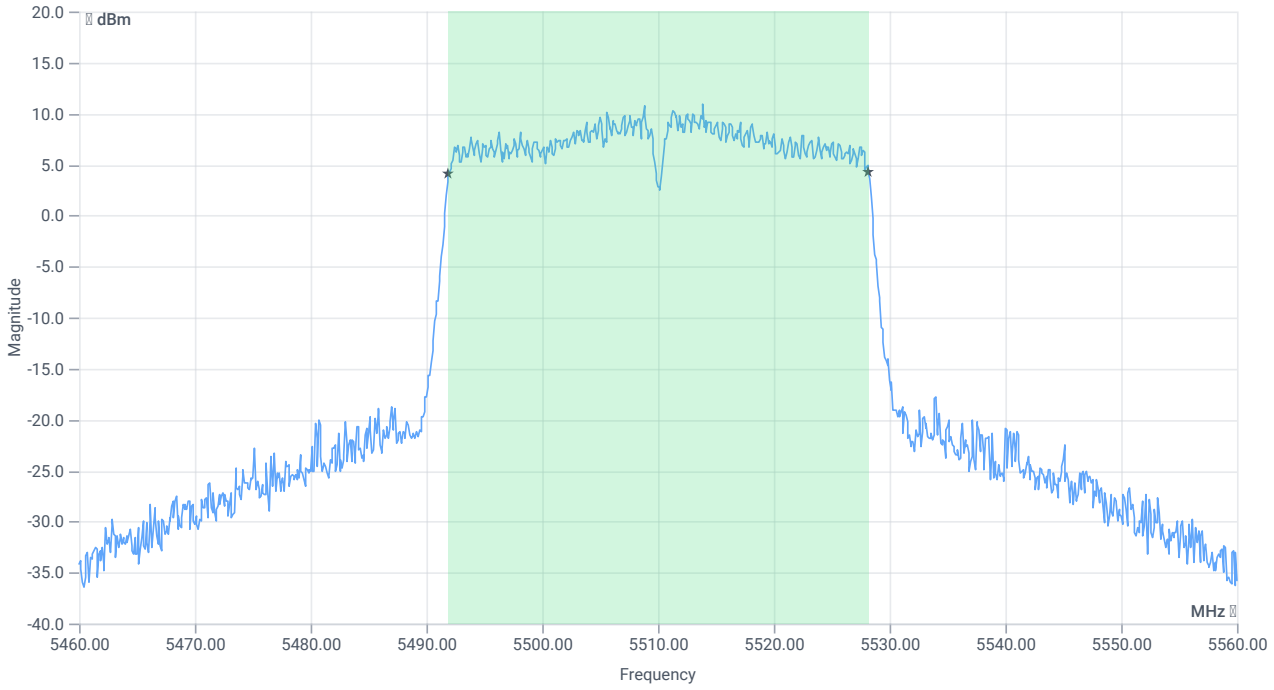
Test at TX 5510 MHz

RESULT: Reference Power cond.

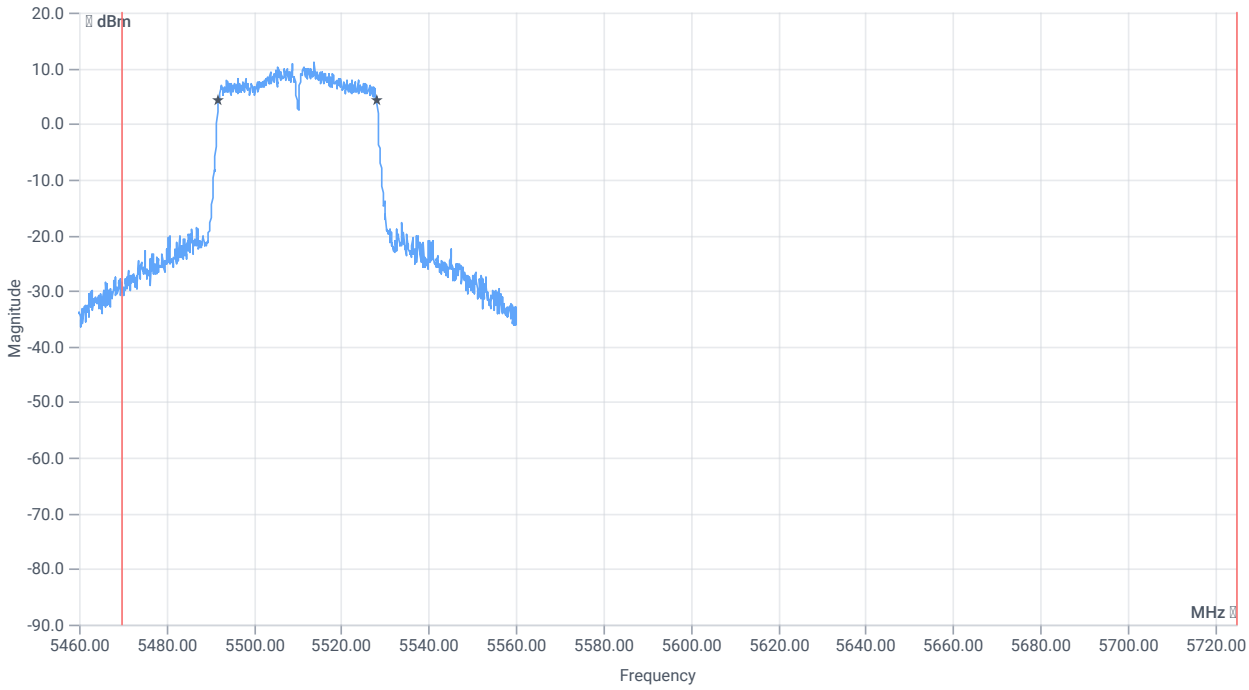
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.15	dBm	INFO
Ref. Frequency	---	---	5511.600	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	20.15 | 16.69 | 20
Start [MHz] | Stop [MHz]	5460.000 | 5560.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



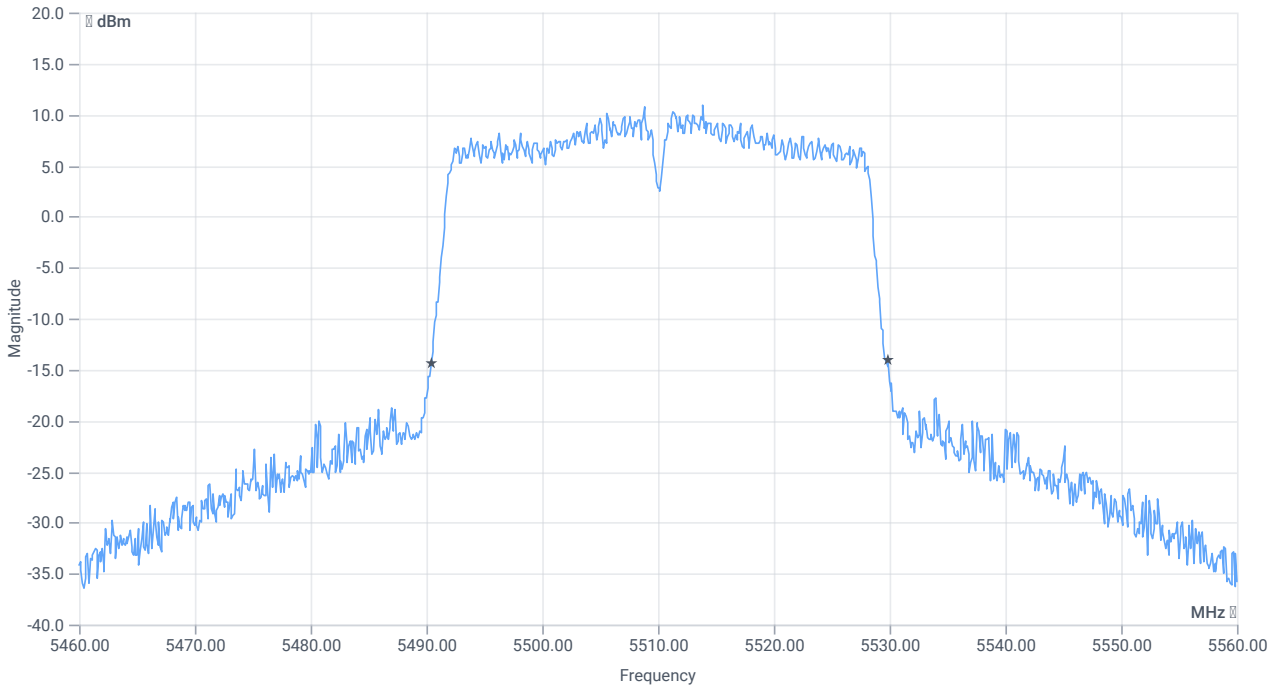
BW 99PCT



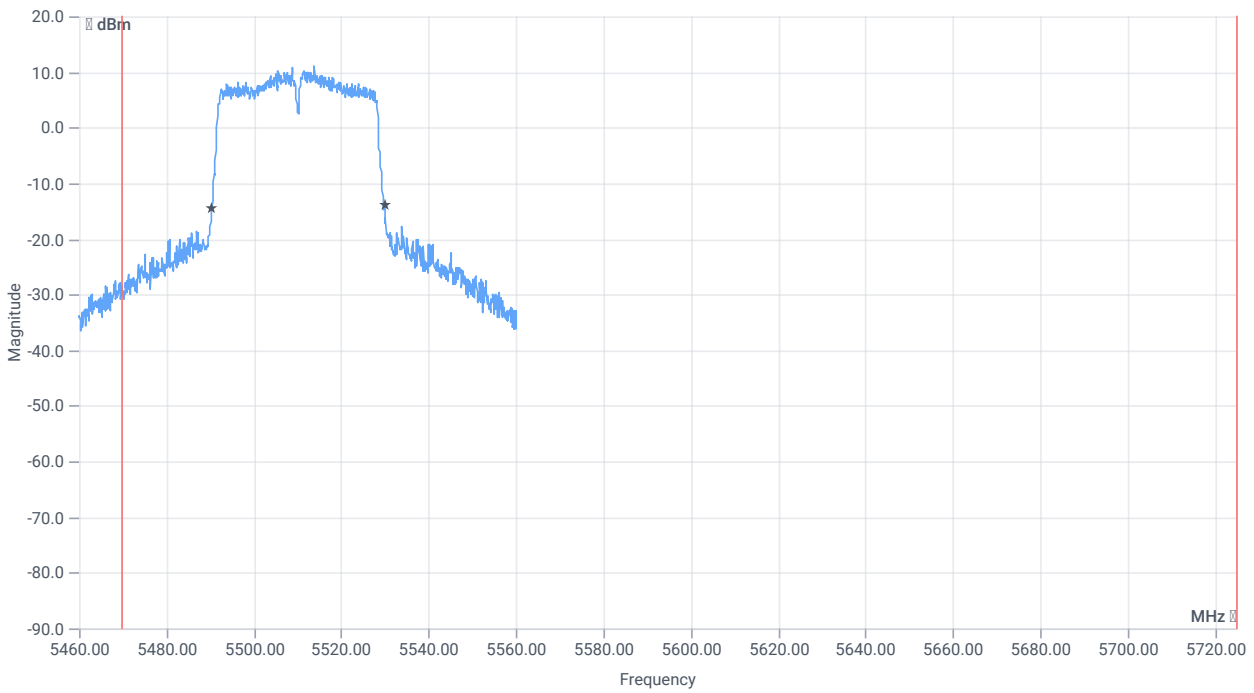
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.264	MHz	INFO
T1 99%	5470.000000	---	5491.9181	MHz	PASS since U-NII-3 is supported
T2 99%	---	5725.000000	5528.1818	MHz	



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	39.5	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5470.000000	---	5490.4000	MHz	PASS since U-NII-3 is supported
T2 26dB	---	5725.000000	5529.9000	MHz	

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:36:49
Ambit temp [°C] | humidity [rel%]	21.4 | 27
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5510 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	17.72	dBm	INFO
Ant:1 BW 26dB	---	---	40.080	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	17.57	dBm	INFO
Ant:2 BW 26dB	---	---	39.440	MHz	INFO
∑ Limit absolute	---	24	20.66	dBm	PASS
∑ Limit: 11 dBm + 10 log 39.44	---	26.96	20.66	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	4.04	dBm/1MHz	INFO
Ant:2 PSD	---	---	3.96	dBm/1MHz	INFO
∑	---	11	7.01	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:38:46
Ambit temp [°C] | humidity [rel%]	21.4 | 26
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	True | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5590 MHz

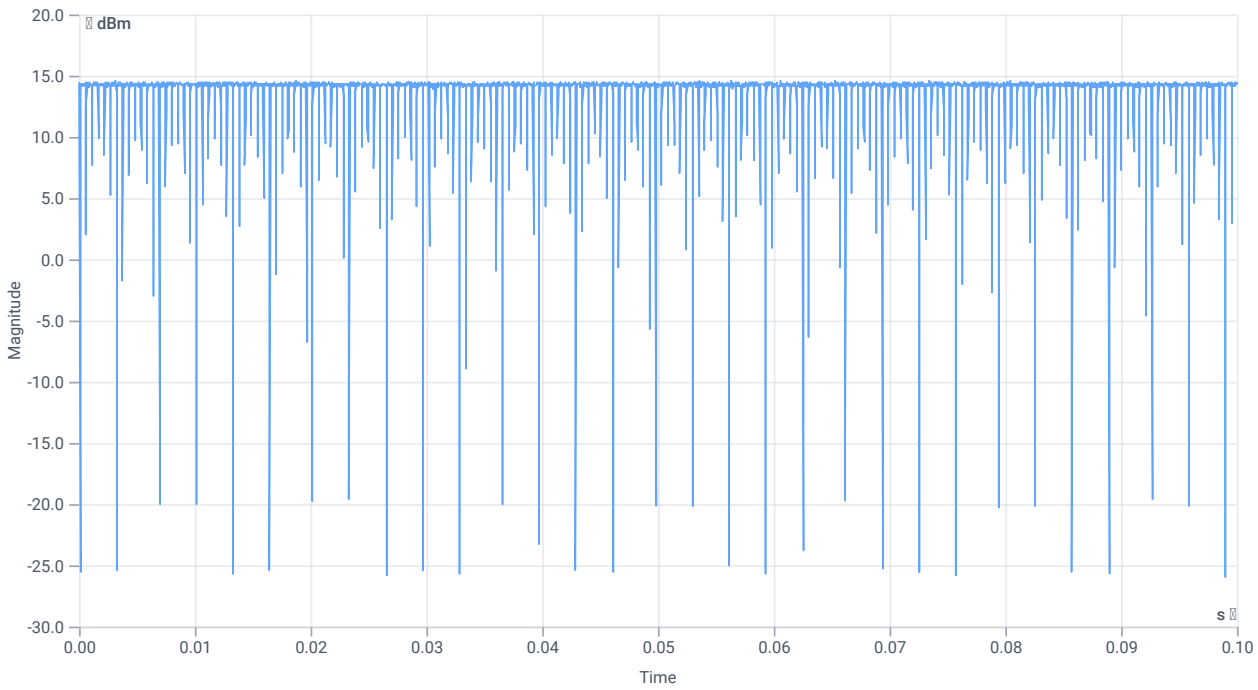
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.76	dBm	INFO
Ref. Frequency	---	---	5586.000	MHz	INFO

Evaluation max. Duty Cycle

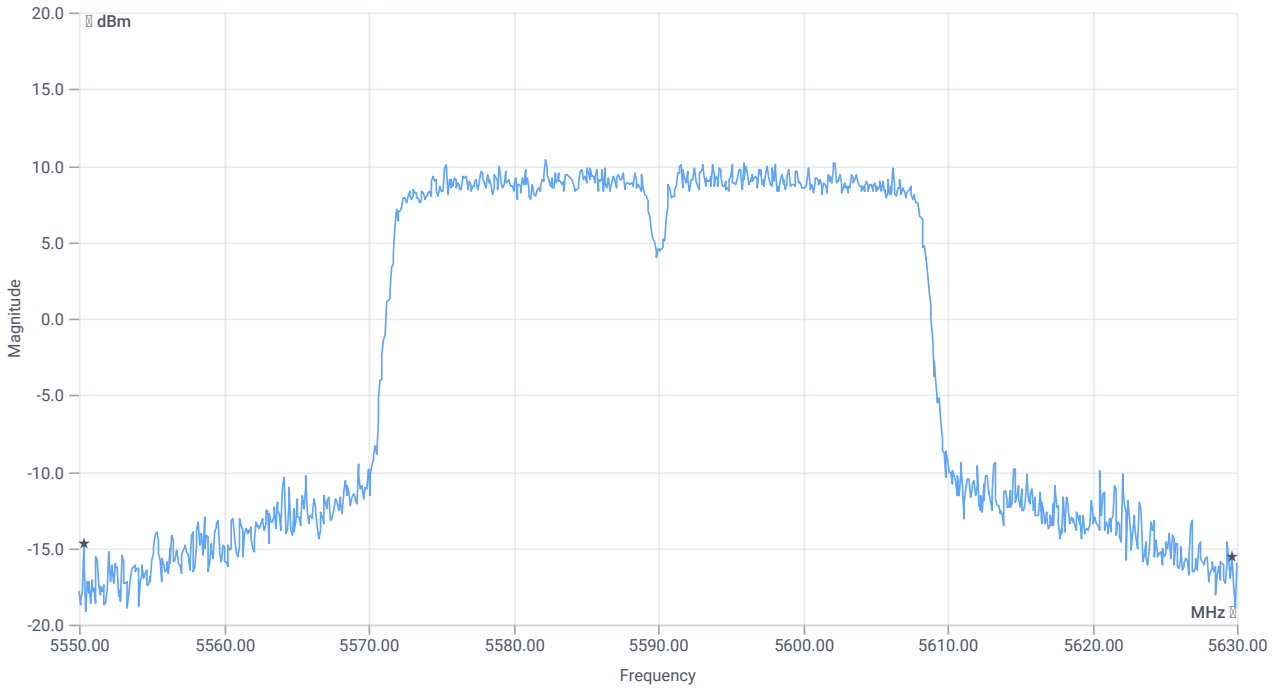
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:73					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

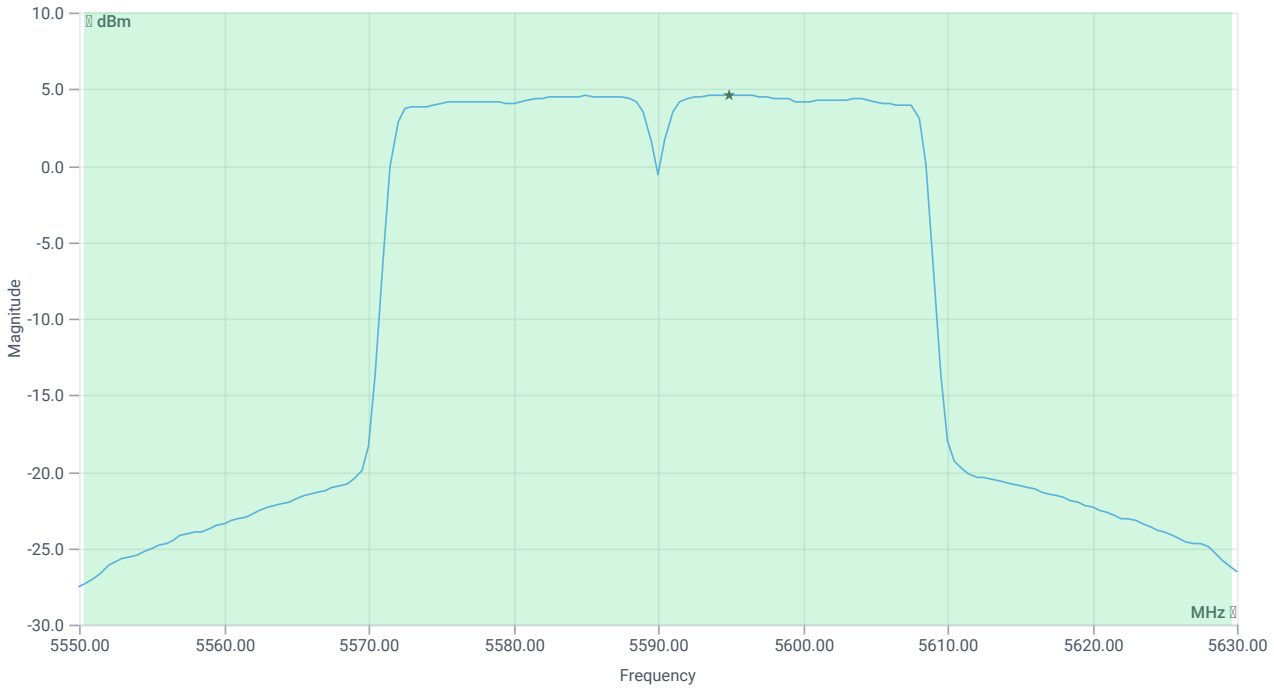
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	79.36	MHz	INFO
T1 26dB	---	---	5550.3200	MHz	INFO
T2 26dB	---	---	5629.6800	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.76 | 16.82 | 25
Start [MHz] | Stop [MHz]	5550.000 | 5630.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.54	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	20.21	dBm	PASS
Limit: 11 dBm + 10 log 79.36					
Max Output Power DC corrected	---	30	20.21	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	4.6	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	5.27	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:40:12
Ambit temp [°C] | humidity [rel%]	21.4 | 26
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	True | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

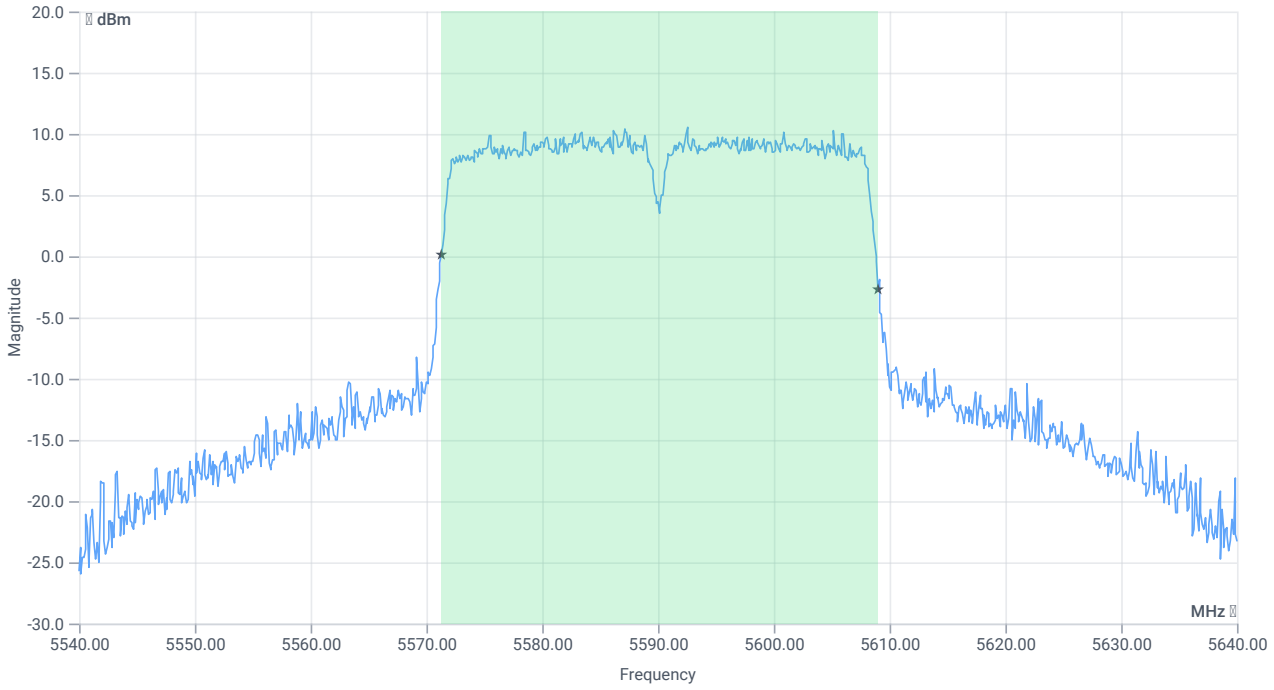
Test at TX 5590 MHz

RESULT: Reference Power cond.

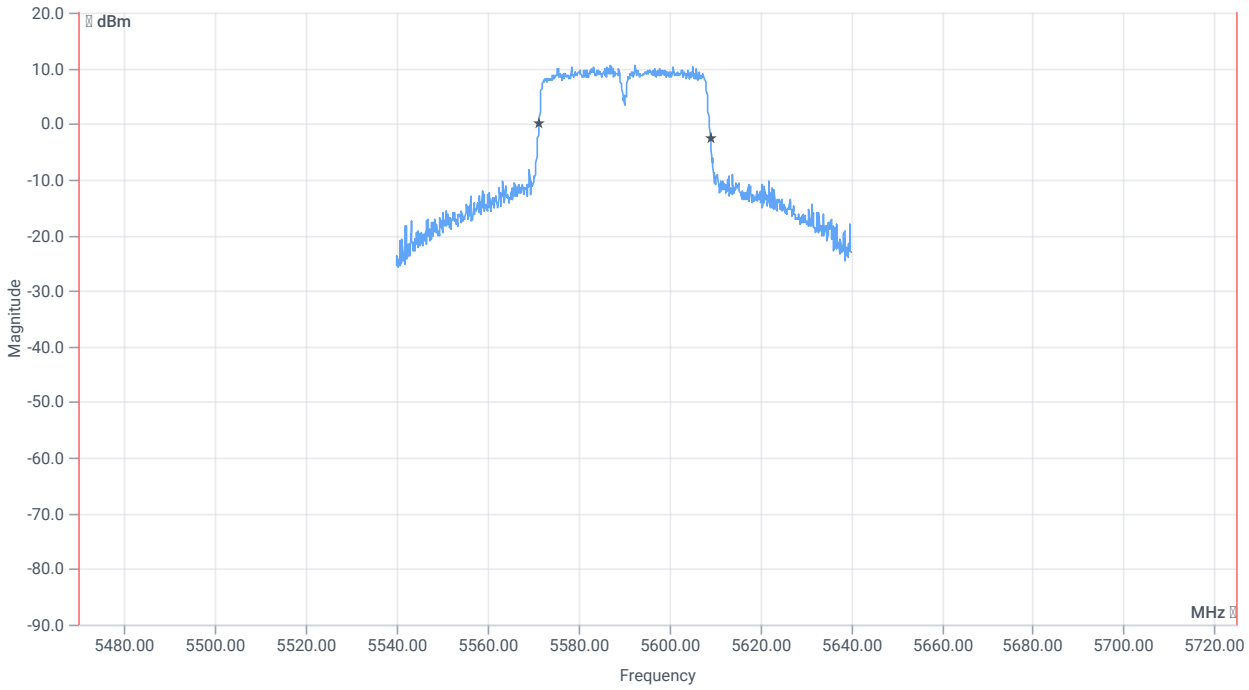
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.88	dBm	INFO
Ref. Frequency	---	---	5597.190	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	20.88 | 16.82 | 20
Start [MHz] | Stop [MHz]	5540.000 | 5640.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



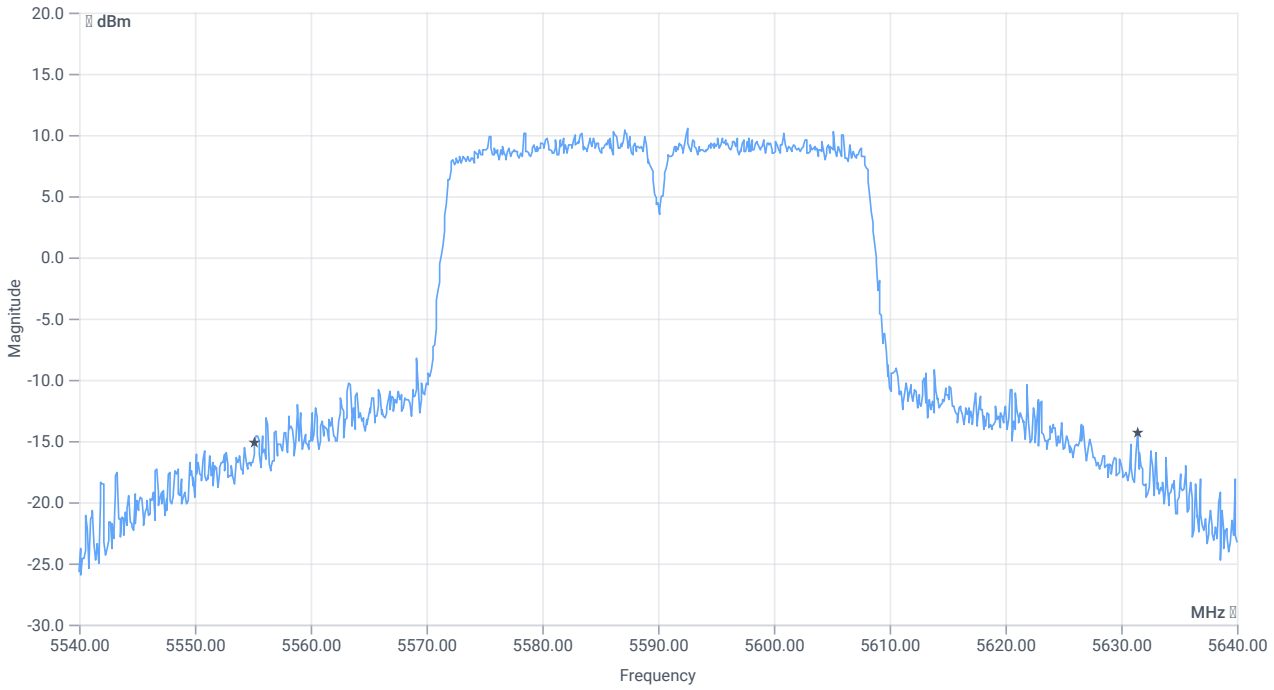
BW 99PCT



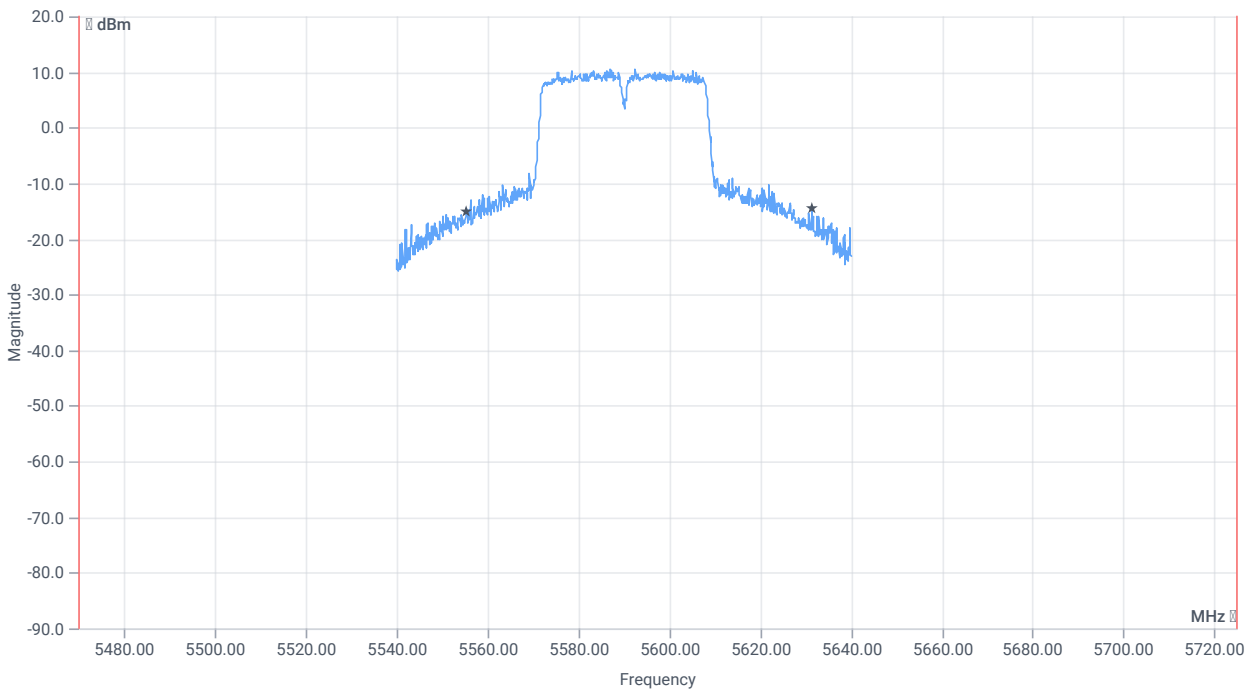
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	37.662	MHz	INFO
T1 99%	5470.000000	---	5571.3187	MHz	PASS since U-NII-3 is supported
T2 99%	---	5725.000000	5608.9810	MHz	



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	76.2	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5470.000000	---	5555.2000	MHz	PASS since U-NII-3 is supported
T2 26dB	---	5725.000000	5631.4000	MHz	

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:40:43
Ambit temp [°C] | humidity [rel%]	21.4 | 26
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	True | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5590 MHz

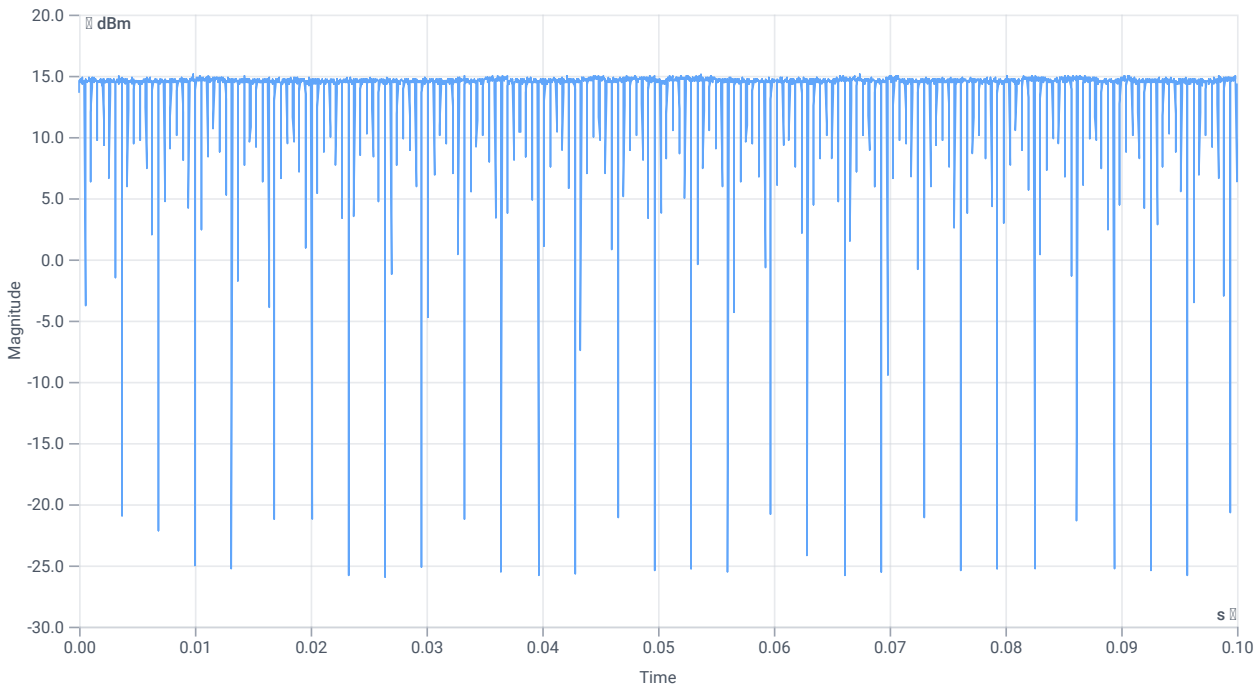
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.70	dBm	INFO
Ref. Frequency	---	---	5602.390	MHz	INFO

Evaluation max. Duty Cycle

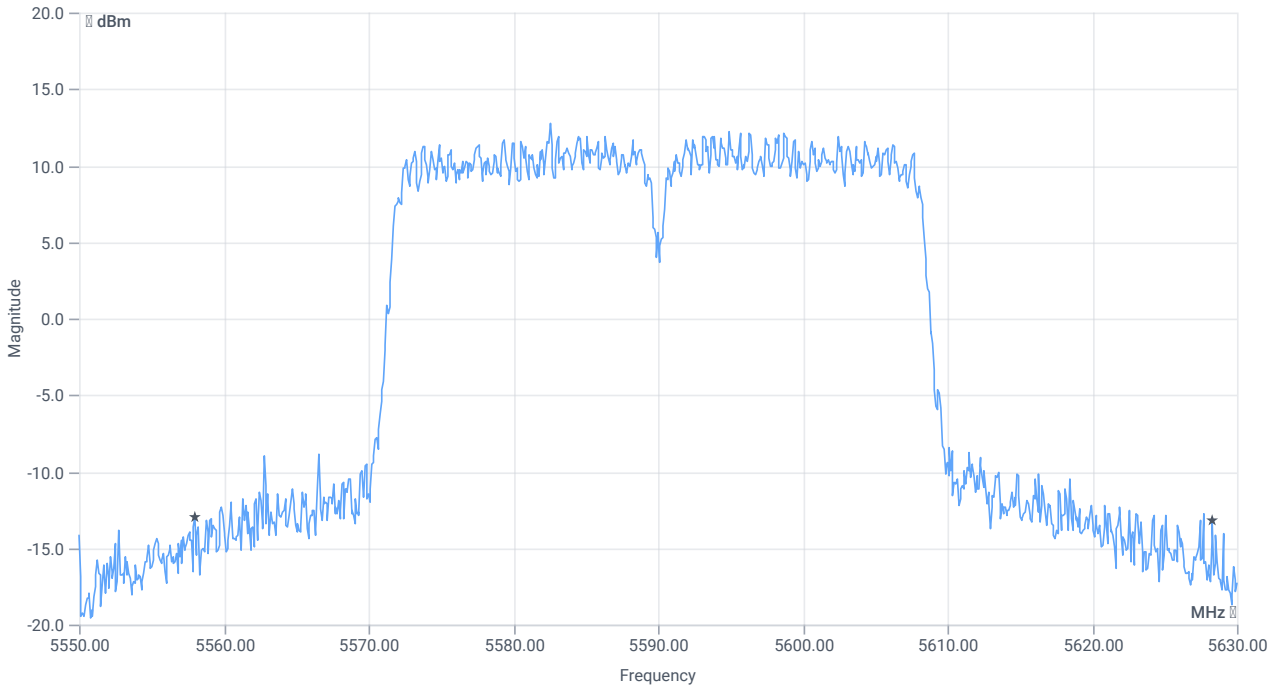
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:74					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

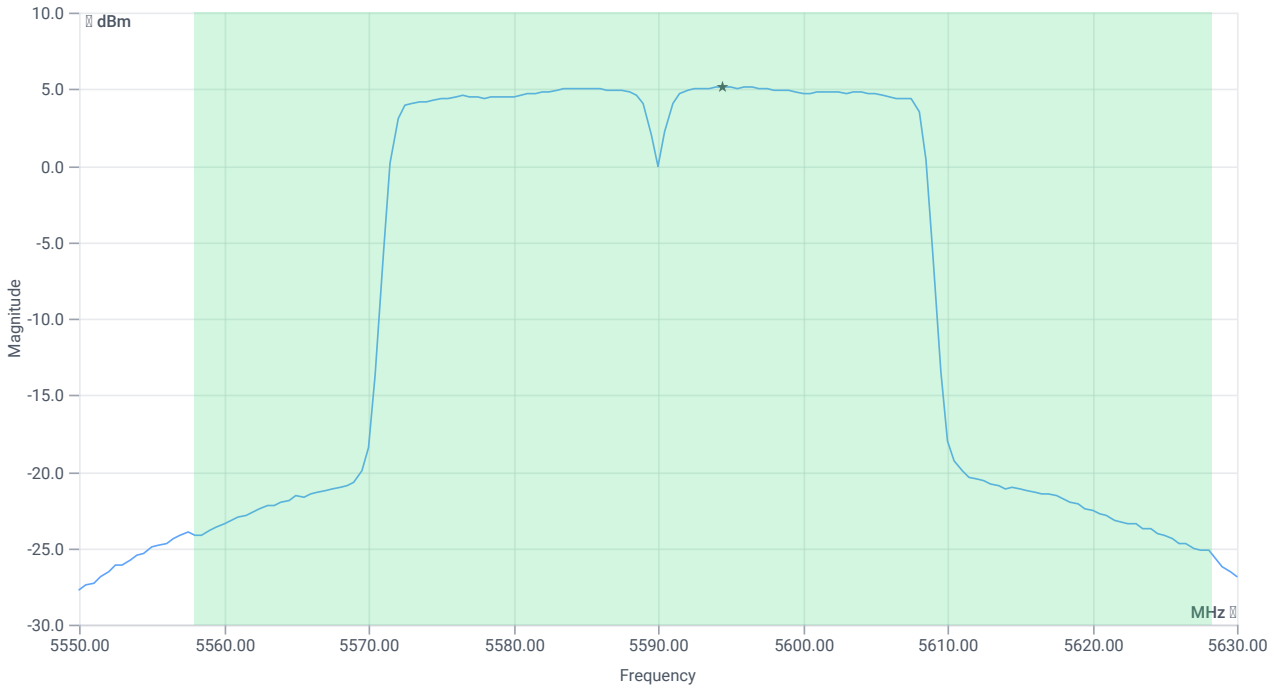
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	70.32	MHz	INFO
T1 26dB	---	---	5558.0000	MHz	INFO
T2 26dB	---	---	5628.3200	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	25.70 | 16.82 | 25
Start [MHz] | Stop [MHz]	5550.000 | 5630.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.98	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	20.65	dBm	PASS
Limit: 11 dBm + 10 log 70.32					
Max Output Power DC corrected	---	29.47	20.65	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	5.13	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	5.8	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:42:09
Ambit temp [°C] | humidity [rel%]	21.4 | 26
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	True | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

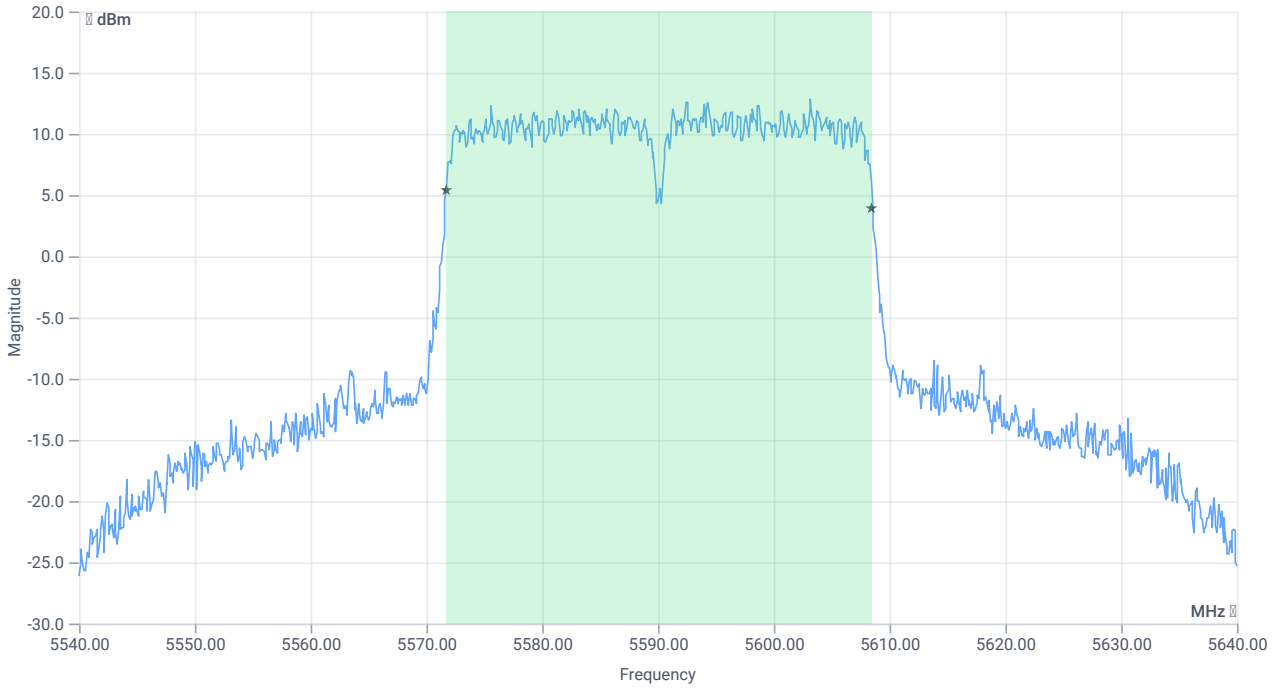
Test at TX 5590 MHz

RESULT: Reference Power cond.

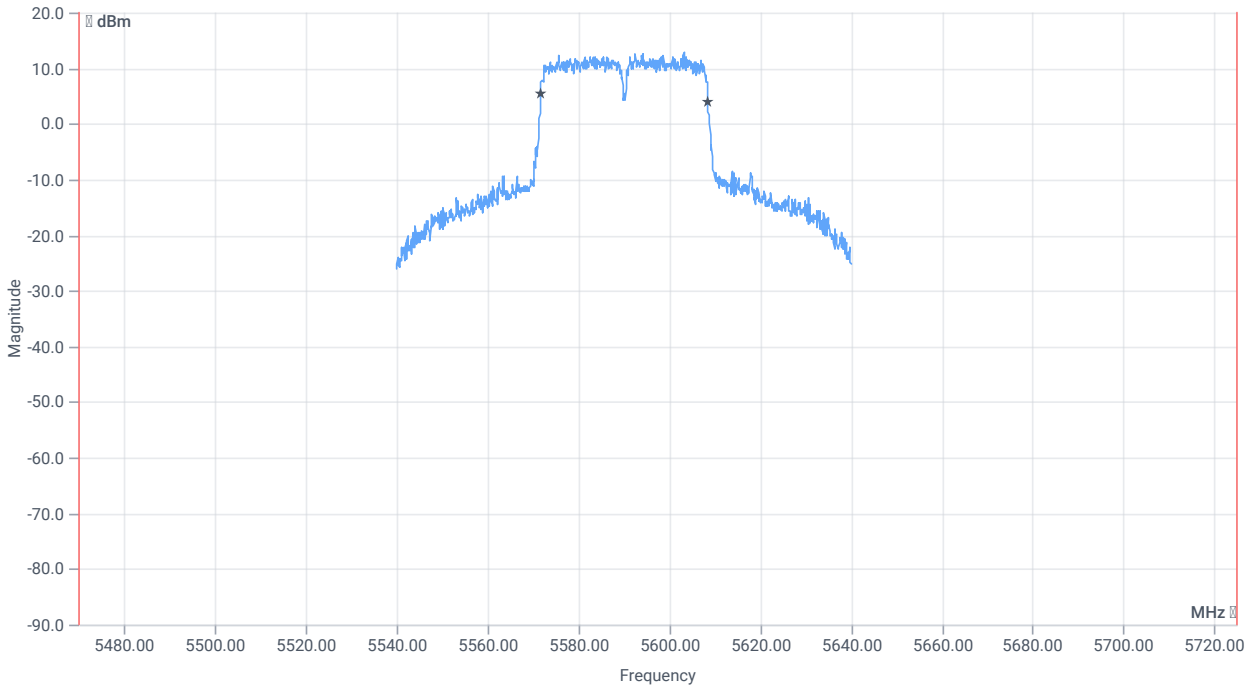
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	14.51	dBm	INFO
Ref. Frequency	---	---	5594.200	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	22.51 | 16.82 | 25
Start [MHz] | Stop [MHz]	5540.000 | 5640.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



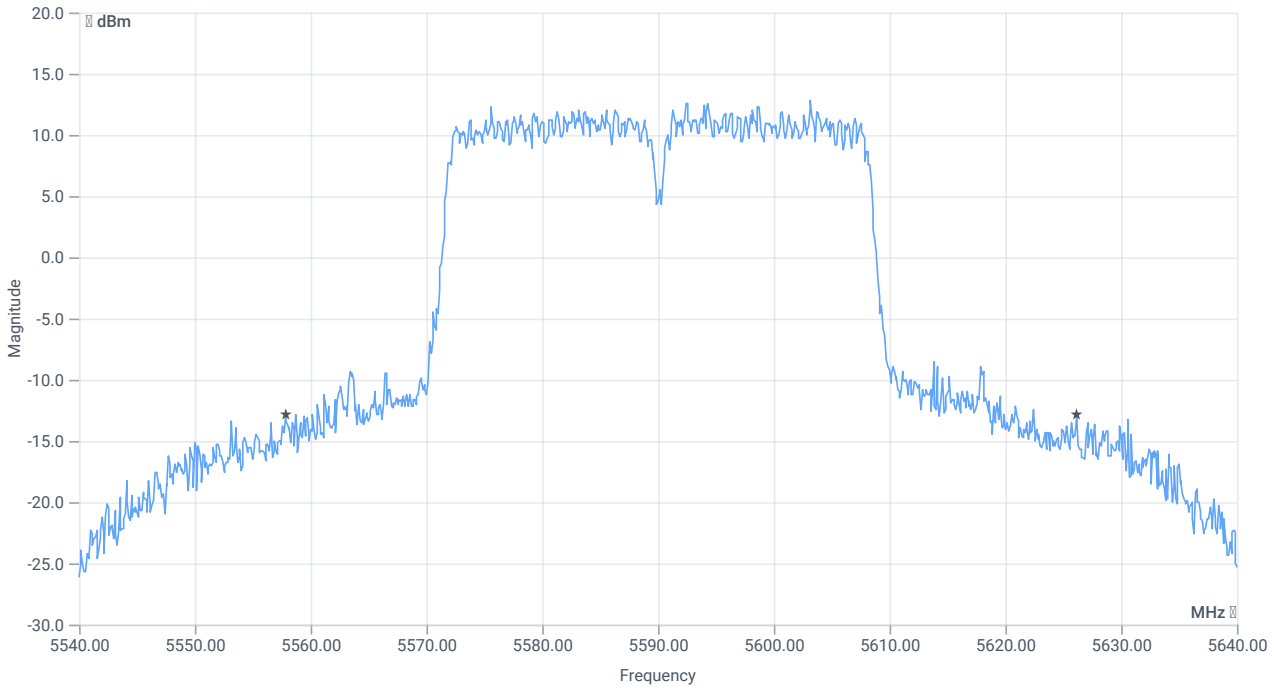
BW 99PCT



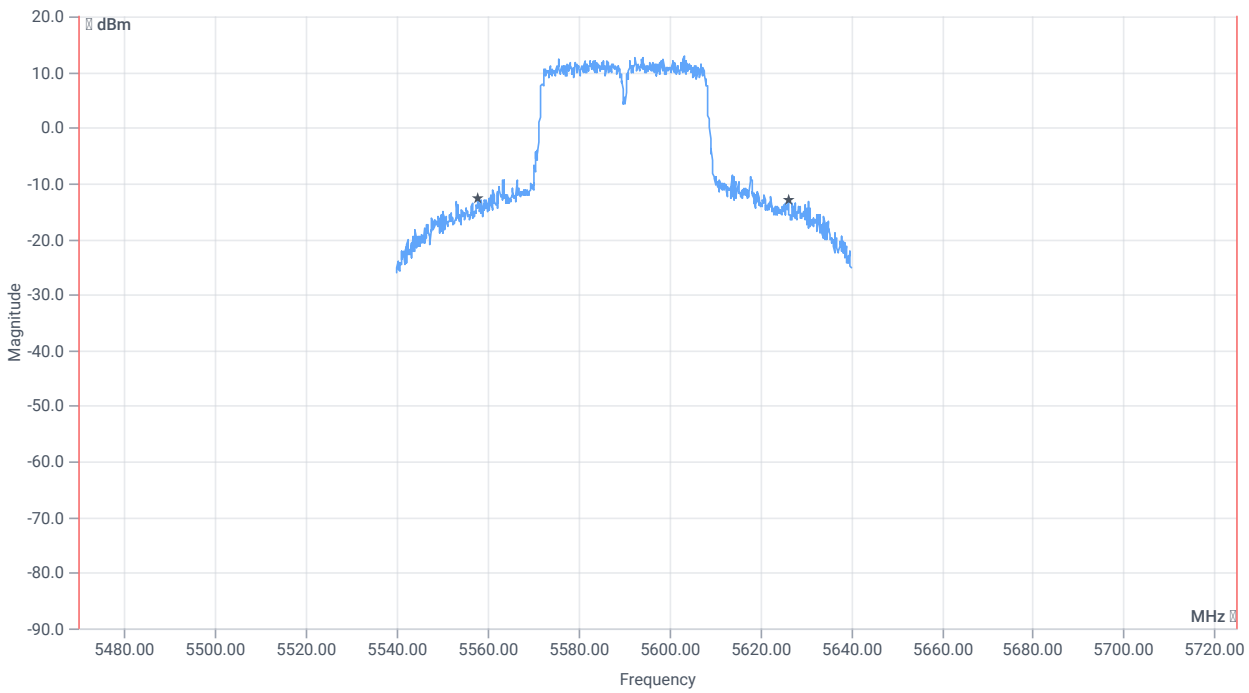
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.763	MHz	INFO
T1 99%	5470.000000	---	5571.7183	MHz	PASS since U-NII-3 is supported
T2 99%	---	5725.000000	5608.4815	MHz	



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	68.4	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5470.000000	---	5557.8000	MHz	PASS since U-NII-3 is supported
T2 26dB	---	5725.000000	5626.2000	MHz	

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:42:41
Ambit temp [°C] | humidity [rel%]	21.4 | 25
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	True | Freq [MHz] 5590
Frequency high to test	False | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5590 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	20.21	dBm	INFO
Ant:1 BW 26dB	---	---	79.360	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	20.65	dBm	INFO
Ant:2 BW 26dB	---	---	70.320	MHz	INFO
∑ Limit absolute	---	24	23.45	dBm	PASS
∑ Limit: 11 dBm + 10 log 70.32	---	29.47	23.45	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	5.27	dBm/1MHz	INFO
Ant:2 PSD	---	---	5.8	dBm/1MHz	INFO
∑	---	11	8.55	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:45:19
Ambit temp [°C] | humidity [rel%]	21.5 | 26
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	True | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5670 MHz

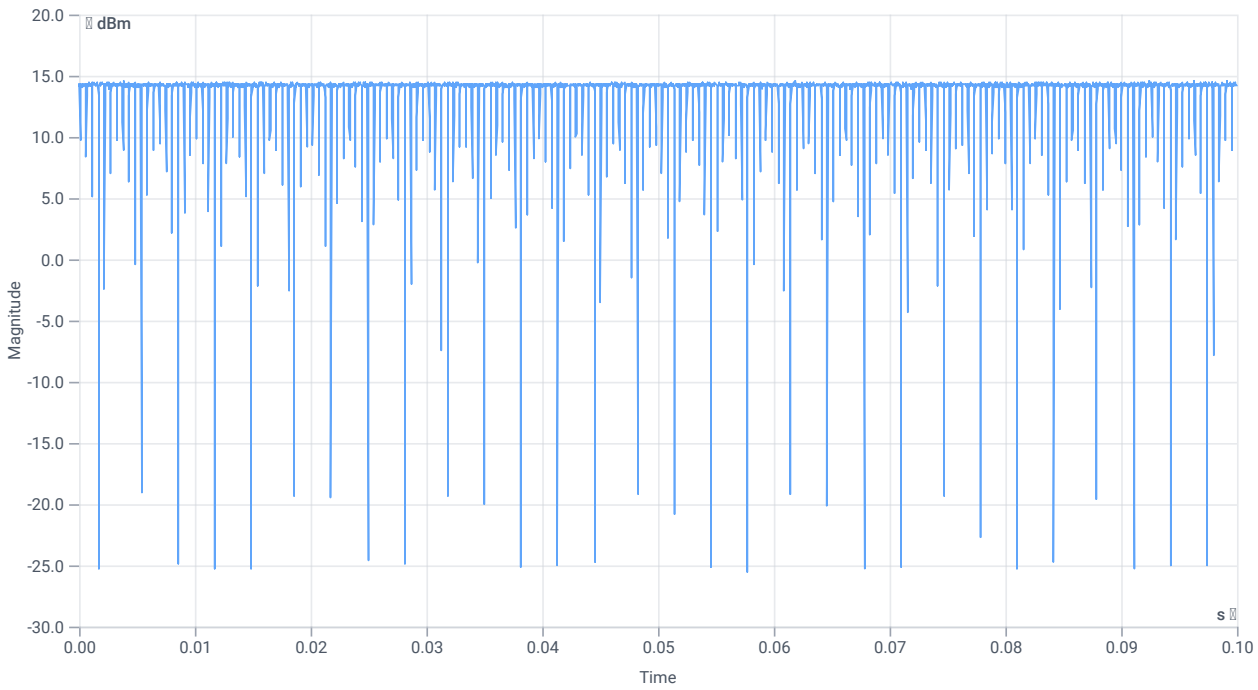
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.53	dBm	INFO
Ref. Frequency	---	---	5655.810	MHz	INFO

Evaluation max. Duty Cycle

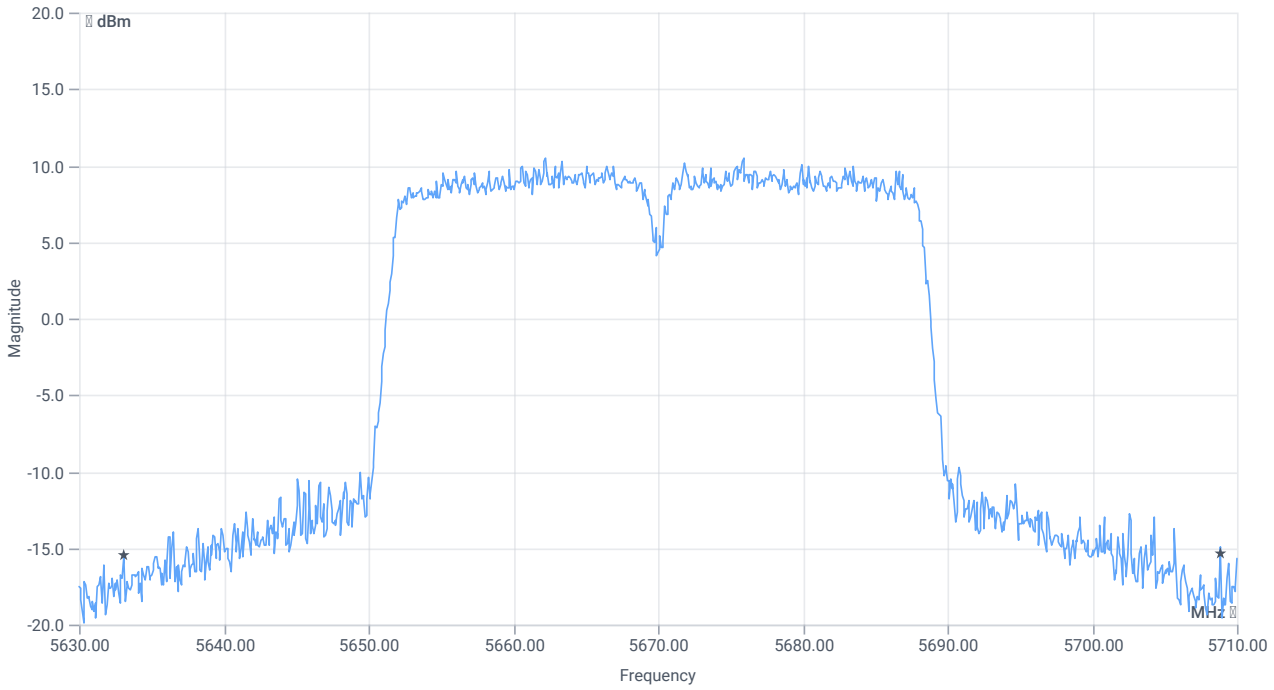
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:70					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

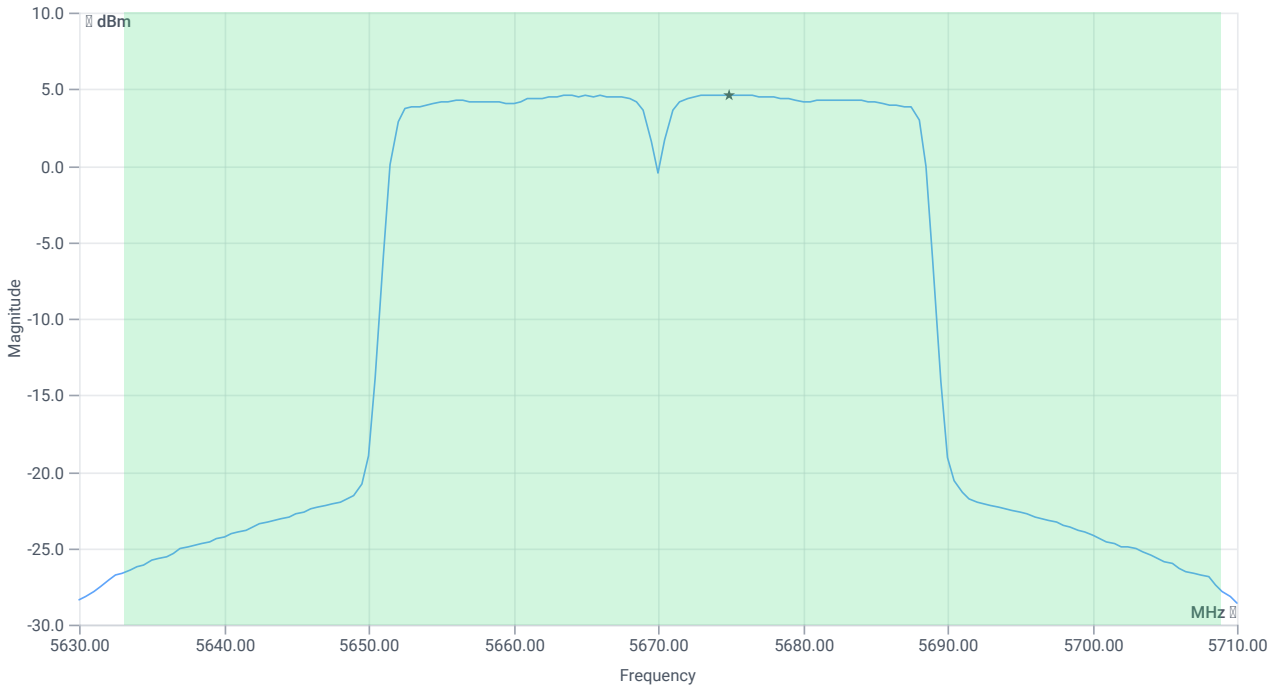
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	75.76	MHz	INFO
T1 26dB	---	---	5633.1200	MHz	INFO
T2 26dB	---	---	5708.8800	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.53 | 16.78 | 25
Start [MHz] | Stop [MHz]	5630.000 | 5710.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.55	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	20.22	dBm	PASS
Limit: 11 dBm + 10 log 75.76					
Max Output Power DC corrected	---	29.79	20.22	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	4.64	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	5.31	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:46:47
Ambit temp [°C] | humidity [rel%]	21.5 | 26
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	True | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

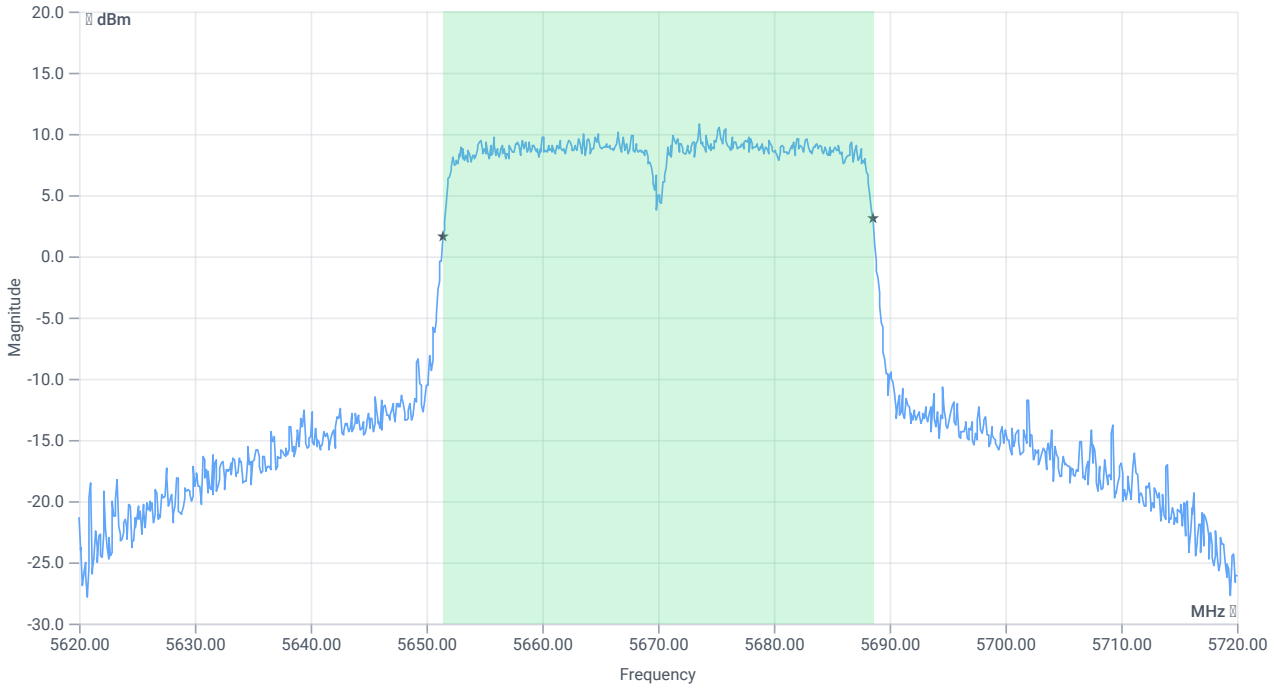
Test at TX 5670 MHz

RESULT: Reference Power cond.

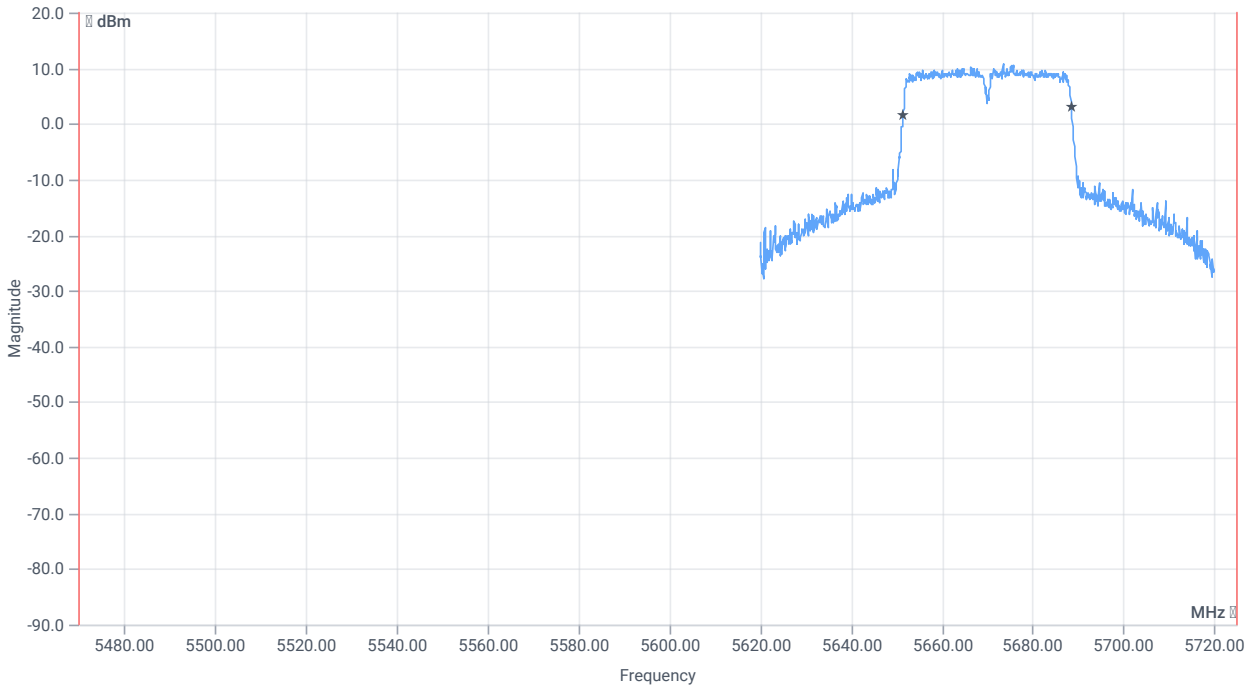
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.78	dBm	INFO
Ref. Frequency	---	---	5666.600	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	20.78 | 16.78 | 20
Start [MHz] | Stop [MHz]	5620.000 | 5720.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



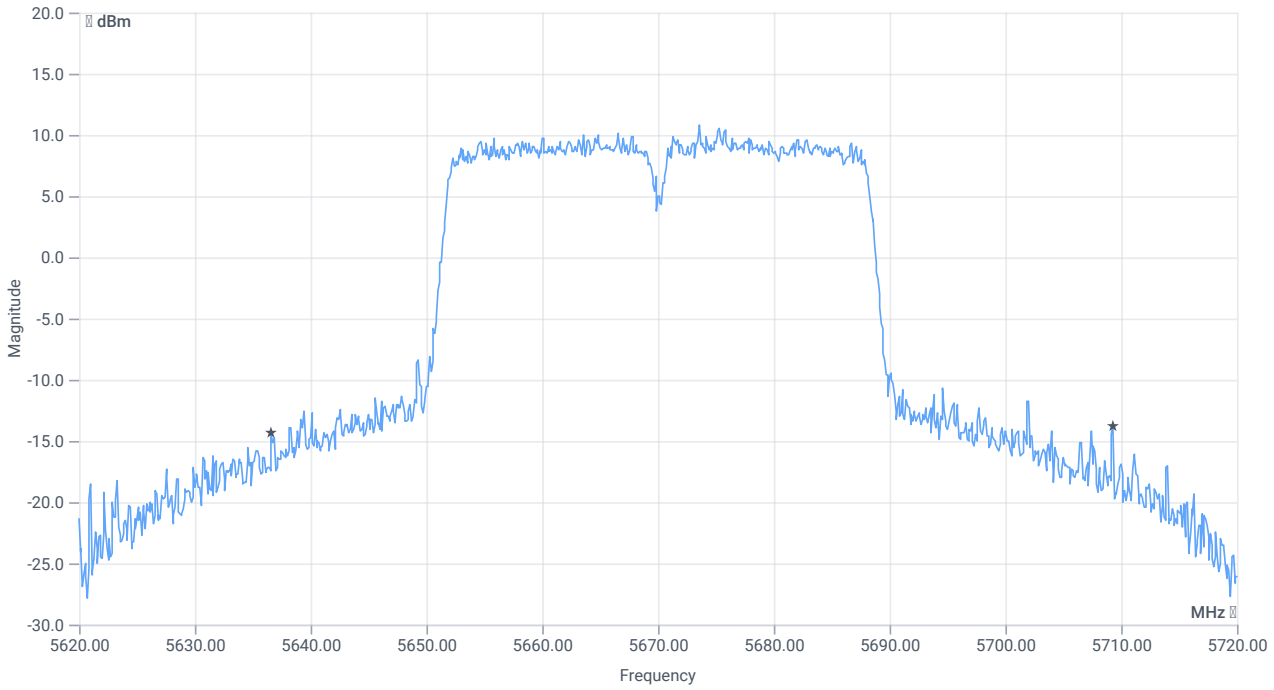
BW 99PCT



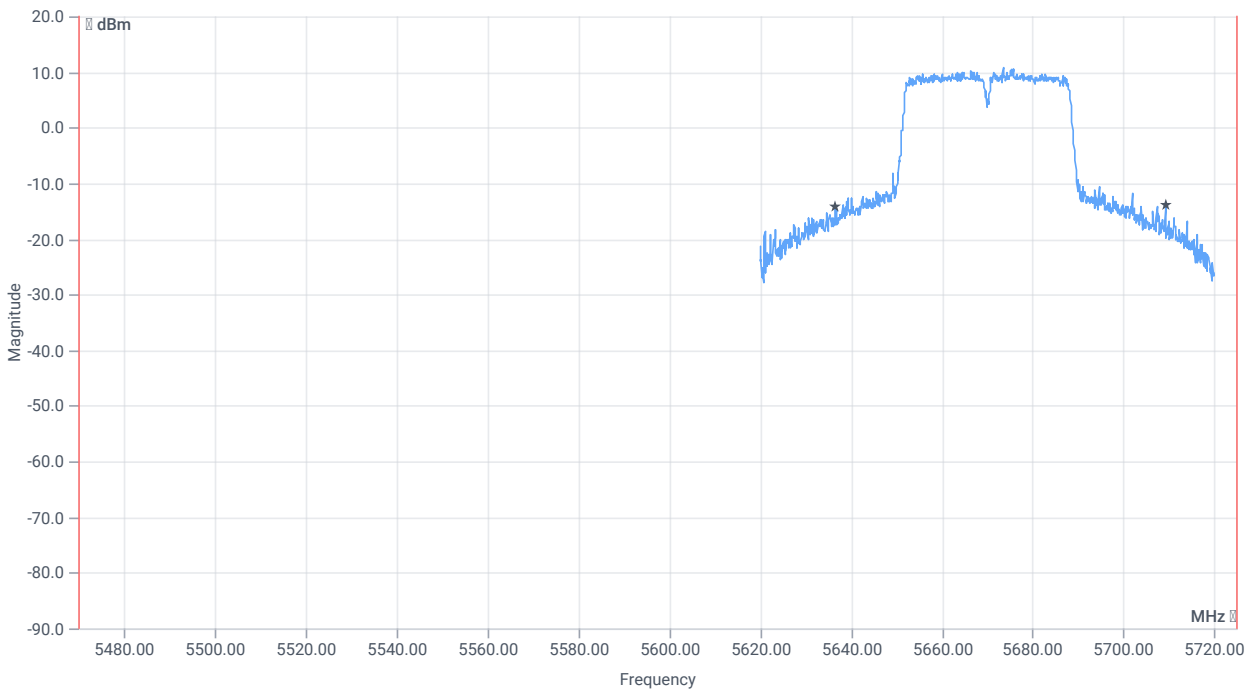
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	37.163	MHz	INFO
T1 99%	5470.000000	---	5651.4186	MHz	PASS since U-NII-3 is supported
T2 99%	---	5725.000000	5688.5814	MHz	



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	72.7	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5470.000000	---	5636.6000	MHz	PASS since U-NII-3 is supported
T2 26dB	---	5725.000000	5709.3000	MHz	

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:47:17
Ambit temp [°C] | humidity [rel%]	21.5 | 26
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	True | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5670 MHz

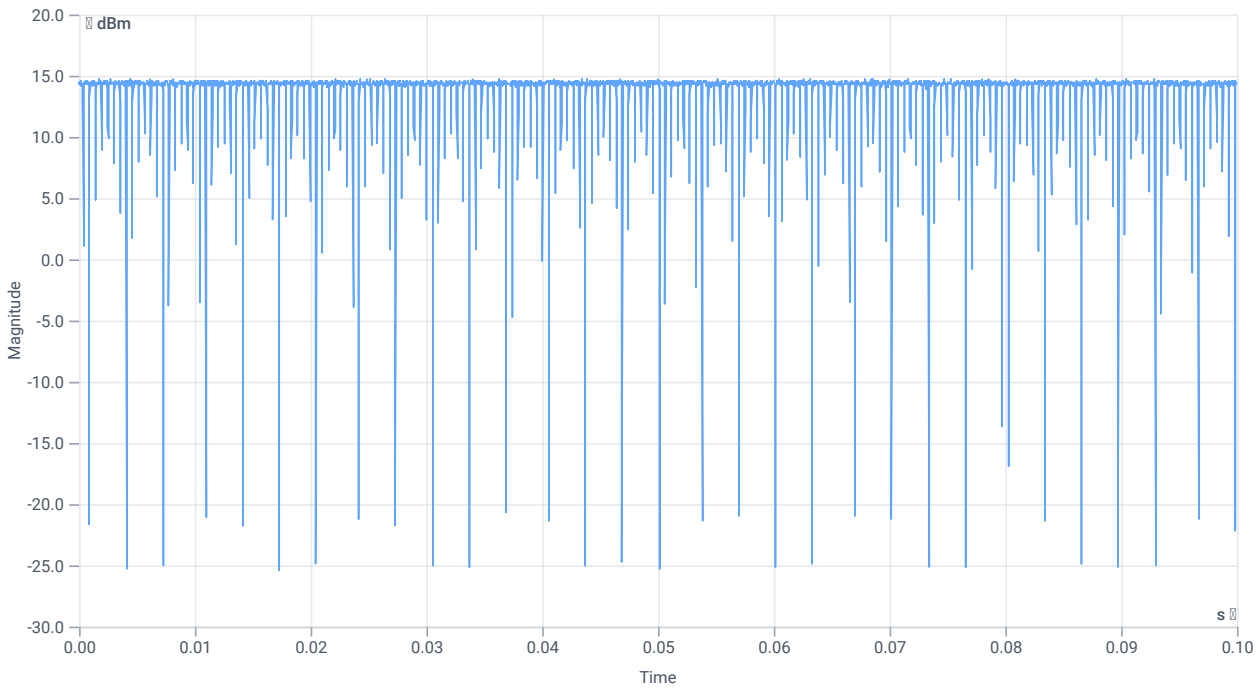
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	14.01	dBm	INFO
Ref. Frequency	---	---	5665.800	MHz	INFO

Evaluation max. Duty Cycle

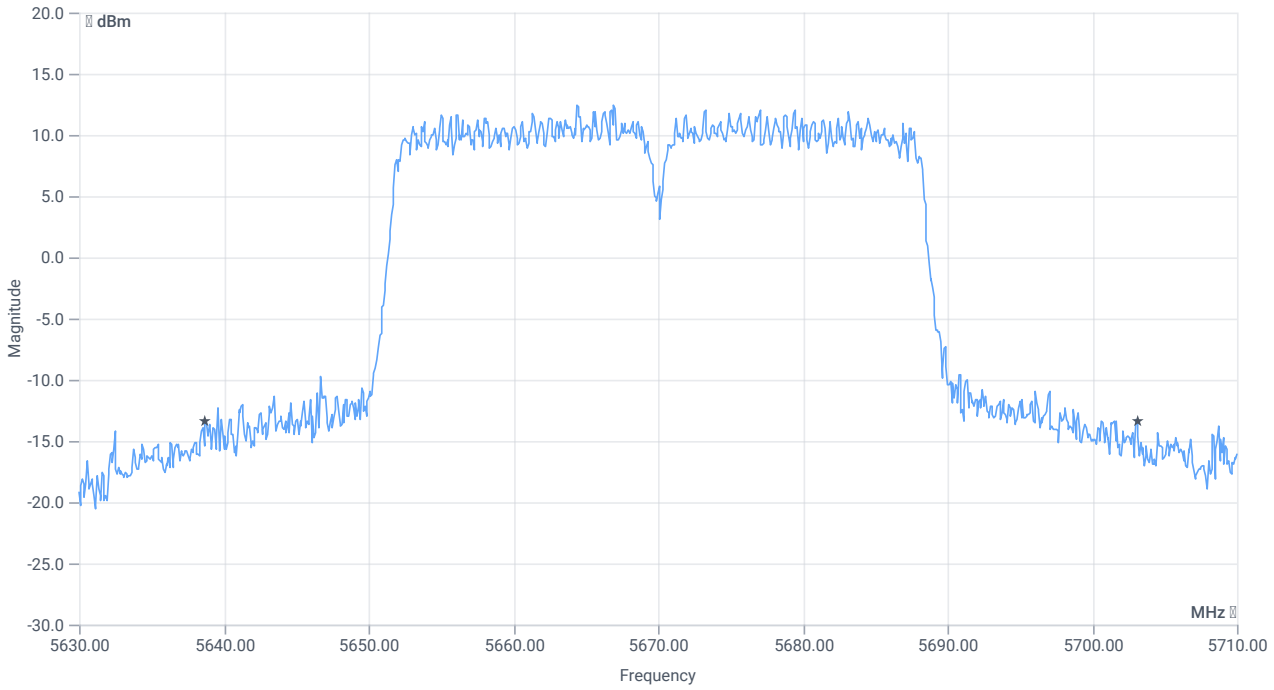
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:71					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

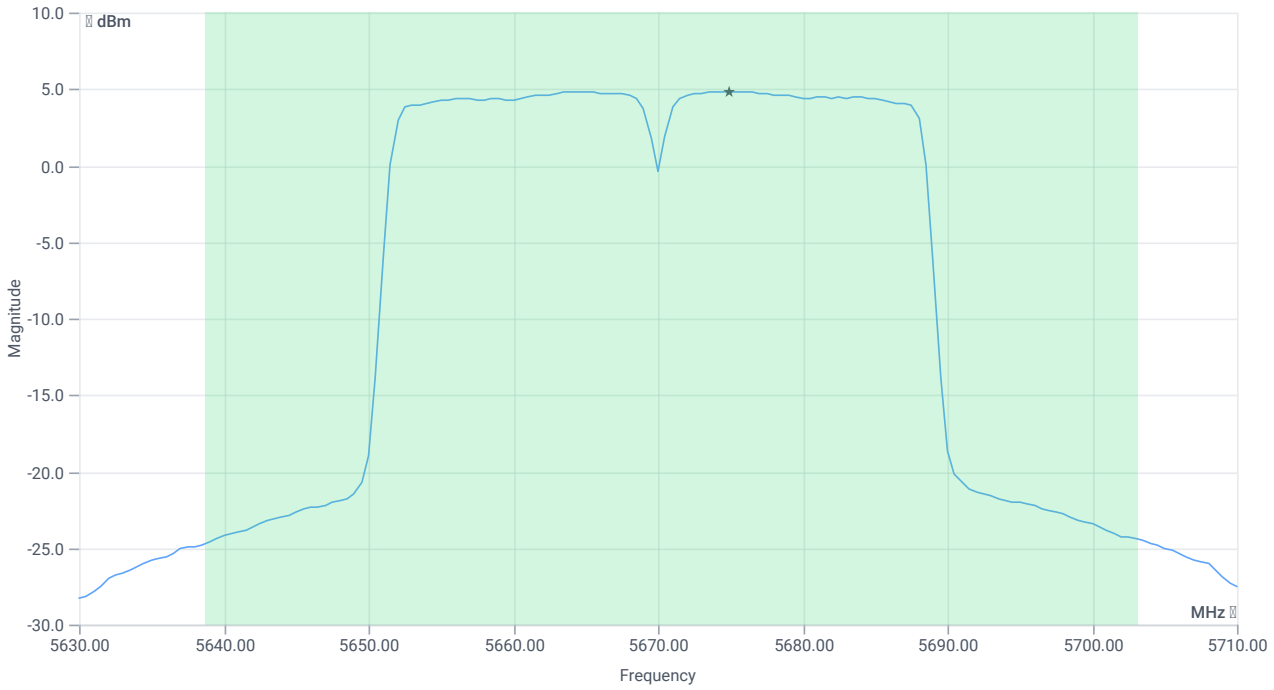
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	64.4	MHz	INFO
T1 26dB	---	---	5638.7200	MHz	INFO
T2 26dB	---	---	5703.1200	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	26.01 | 16.78 | 25
Start [MHz] | Stop [MHz]	5630.000 | 5710.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.72	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	24	20.39	dBm	PASS
Limit: 11 dBm + 10 log 64.4					
Max Output Power DC corrected	---	29.09	20.39	dBm	PASS

Power Spectral Density

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	4.86	dBm/1MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	11	5.53	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:48:44
Ambit temp [°C] | humidity [rel%]	21.5 | 27
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	True | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

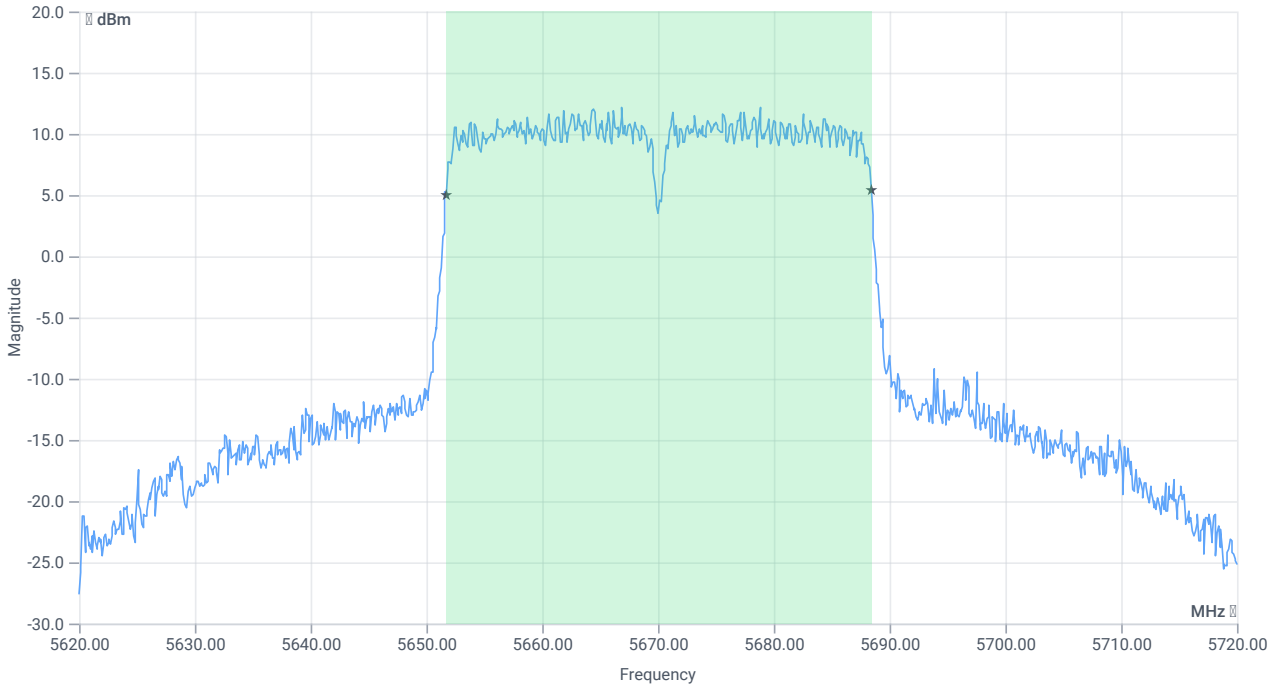
Test at TX 5670 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.32	dBm	INFO
Ref. Frequency	---	---	5665.000	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	21.32 | 16.78 | 20
Start [MHz] | Stop [MHz]	5620.000 | 5720.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE

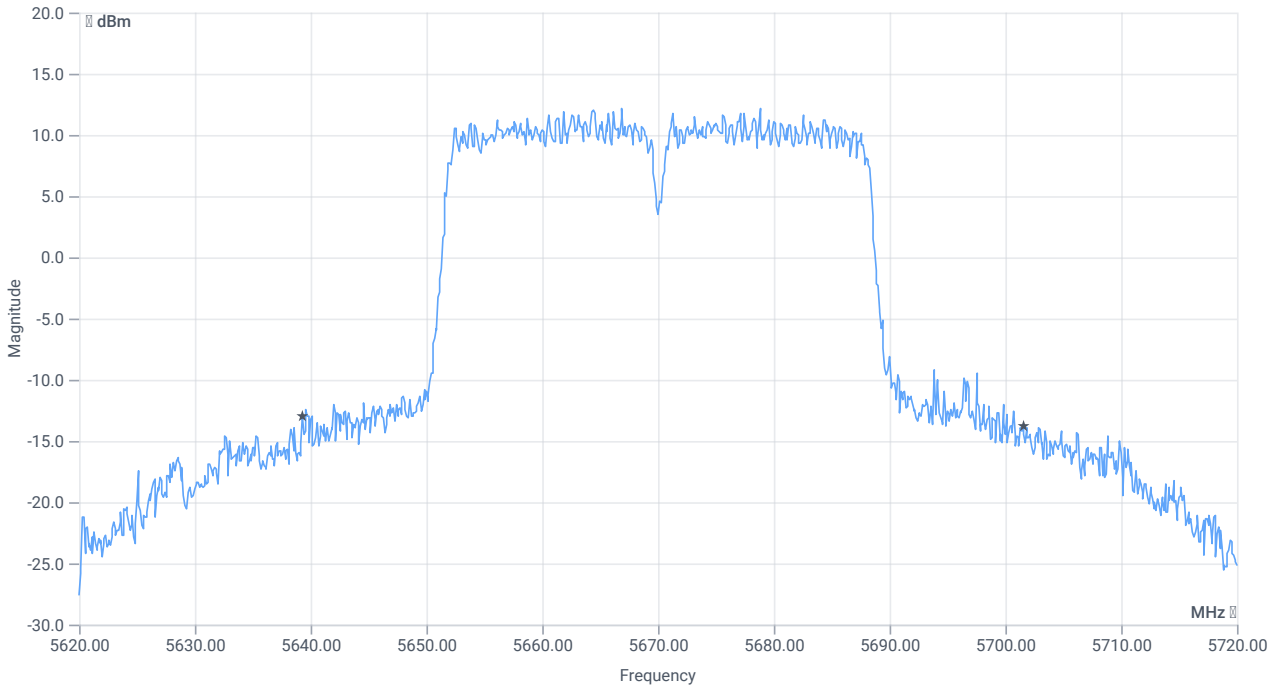


BW 99PCT

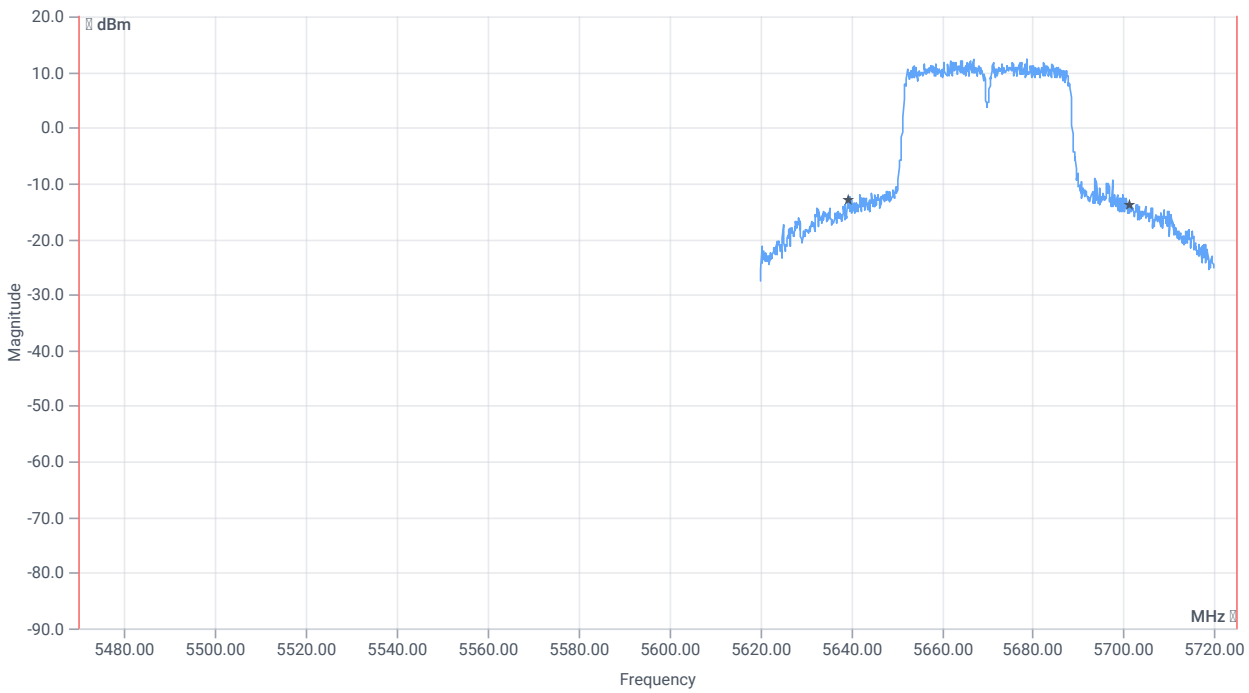
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.663	MHz	INFO
T1 99%	5470.000000	---	5651.7183	MHz	PASS since U-NII-3 is supported
T2 99%	---	5725.000000	5688.3816	MHz	



BW 26dB



BW within Band 26dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	62.2	MHz	INFO

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
T1 26dB	5470.000000	---	5639.3000	MHz	PASS since U-NII-3 is supported
T2 26dB	---	5725.000000	5701.5000	MHz	

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-2C

References

TC start	19.01.2024 09:49:14
Ambit temp [°C] | humidity [rel%]	21.5 | 27
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-2C
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5510
Frequency mid to test	False | Freq [MHz] 5590
Frequency high to test	True | Freq [MHz] 5670
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5670 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	20.22	dBm	INFO
Ant:1 BW 26dB	---	---	75.760	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	20.39	dBm	INFO
Ant:2 BW 26dB	---	---	64.400	MHz	INFO
∑ Limit absolute	---	24	23.32	dBm	PASS
∑ Limit: 11 dBm + 10 log 64.4	---	29.09	23.32	dBm	PASS

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	5.31	dBm/1MHz	INFO
Ant:2 PSD	---	---	5.53	dBm/1MHz	INFO
∑	---	11	8.43	dBm/1MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 09:52:16
Ambit temp [°C] | humidity [rel%]	21.5 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5755 MHz

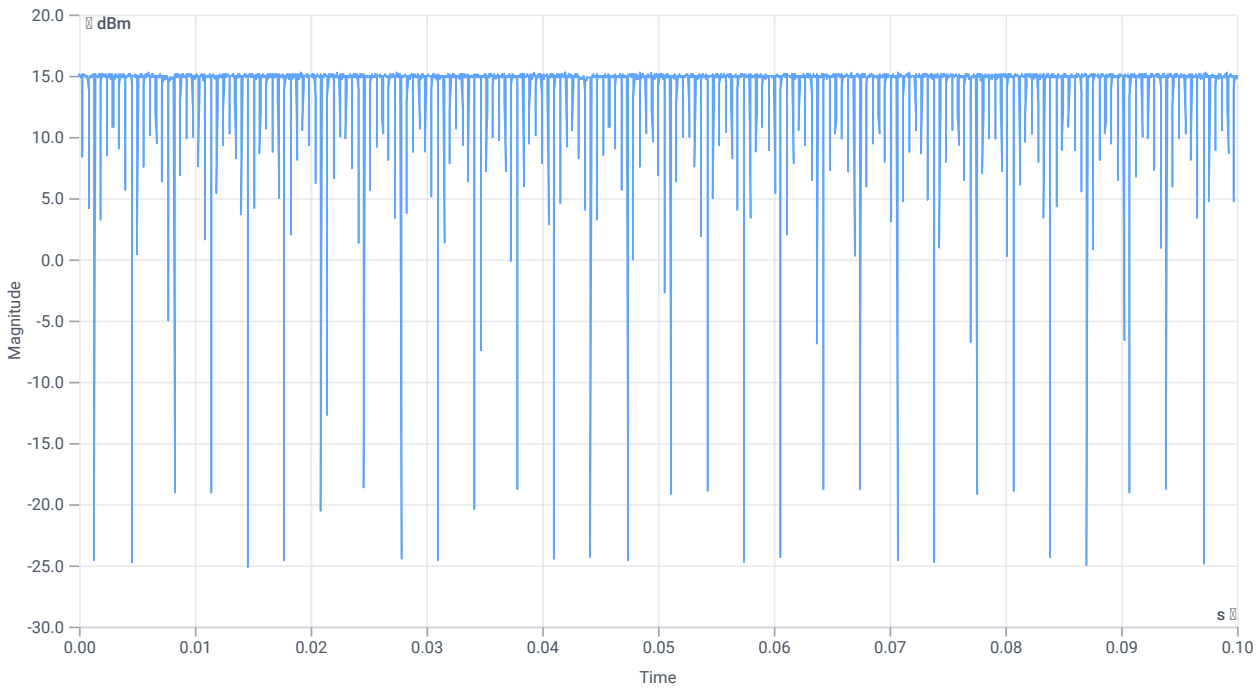
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.65	dBm	INFO
Ref. Frequency	---	---	5742.210	MHz	INFO

Evaluation max. Duty Cycle

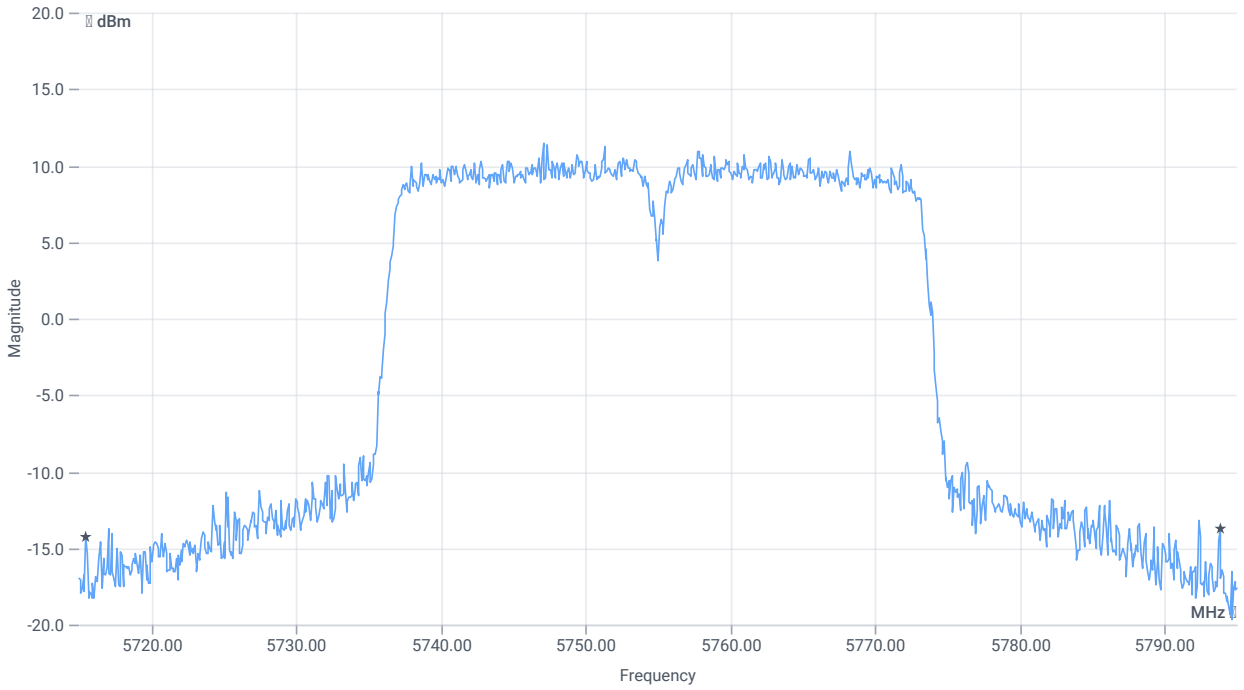
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:73					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

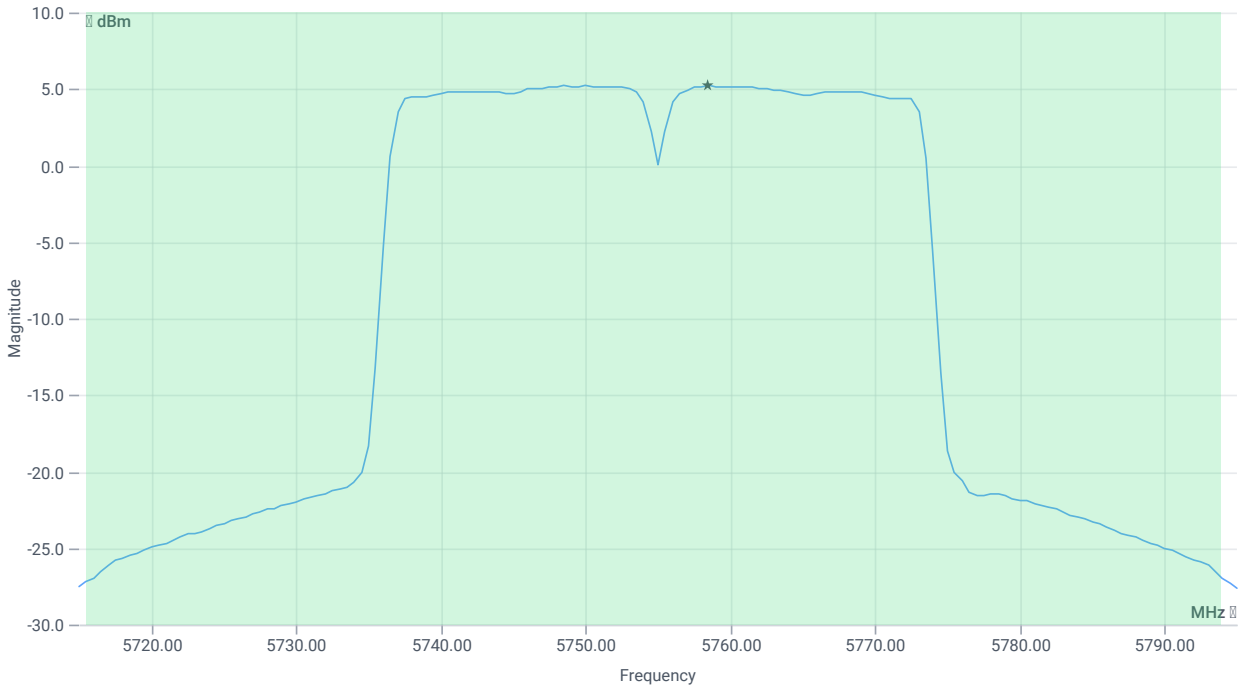
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	78.32	MHz	INFO
T1 26dB	---	---	5715.4800	MHz	INFO
T2 26dB	---	---	5793.8000	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	25.65 | 16.87 | 25
Start [MHz] | Stop [MHz]	5715.000 | 5795.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

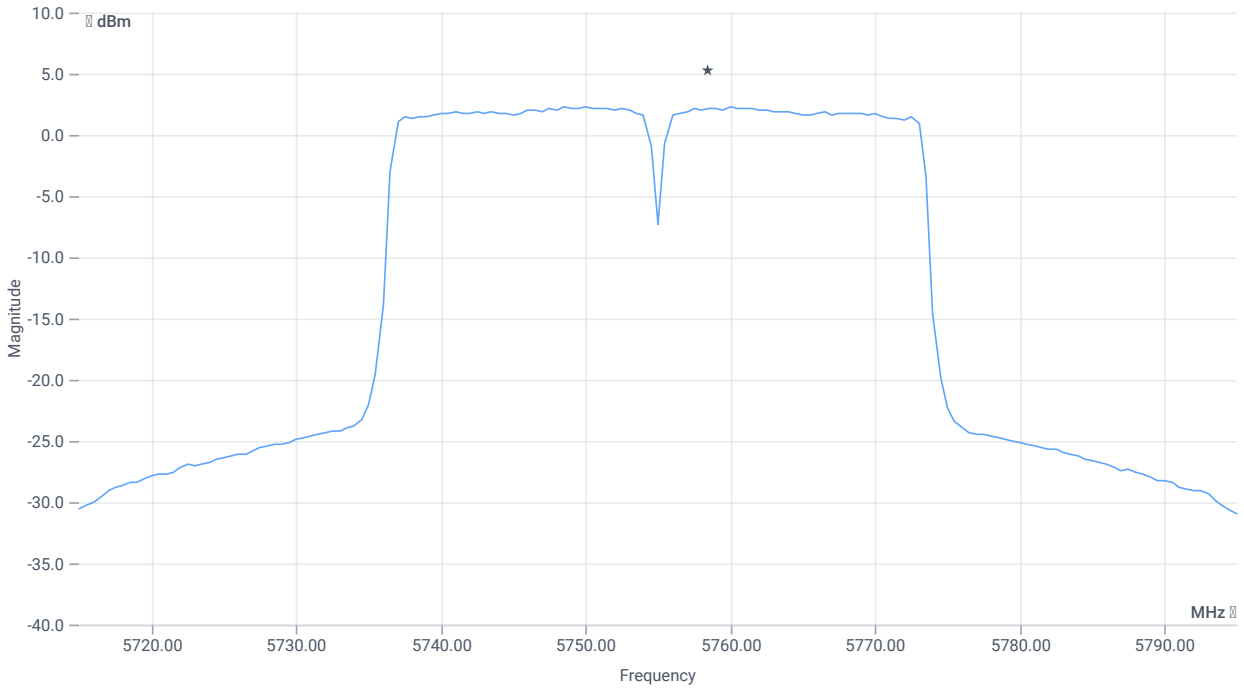
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	20.12	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	30	20.79	dBm	PASS
Limit: 11 dBm + 10 log 78.32					
Max Output Power DC corrected	---	29.94	20.79	dBm	na

Power Spectral Density U-NII-3

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	25.65 | 16.87 | 25
Start [MHz] | Stop [MHz]	5715.000 | 5795.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



PSD UNII-3

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	2.28	dBm/0.5MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	30	2.95	dBm/0.5MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 09:54:42
Ambit temp [°C] | humidity [rel%]	21.5 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

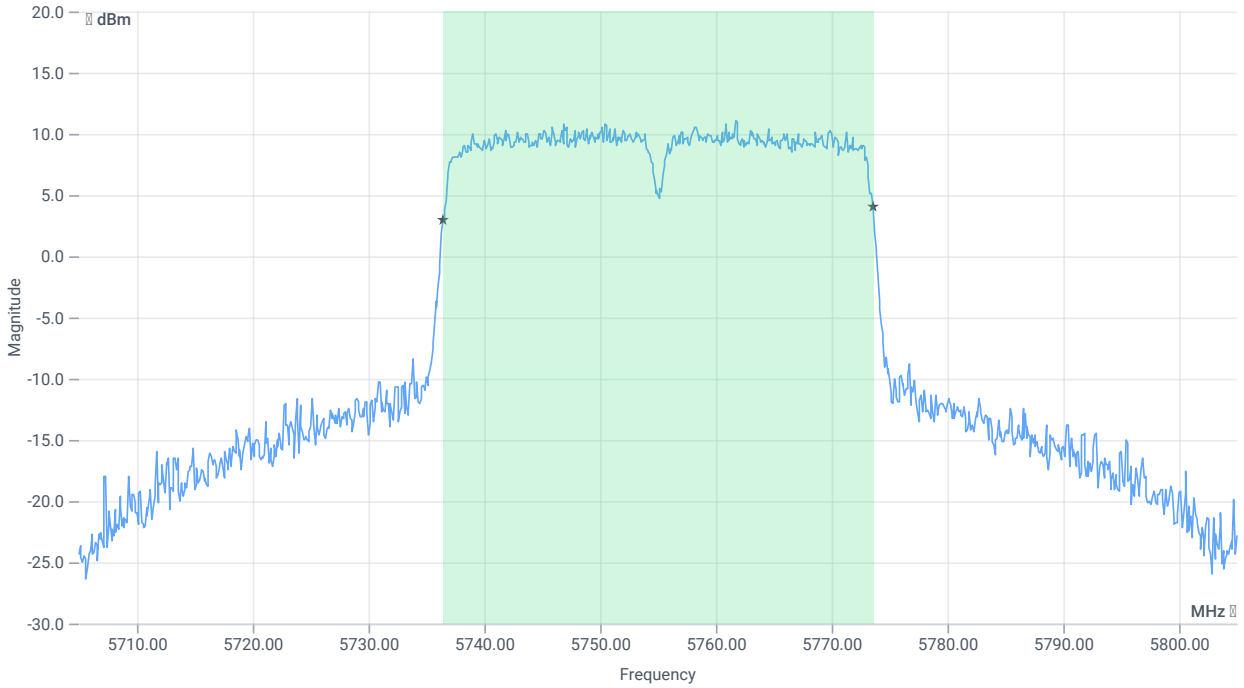
Test at TX 5755 MHz

RESULT: Reference Power cond.

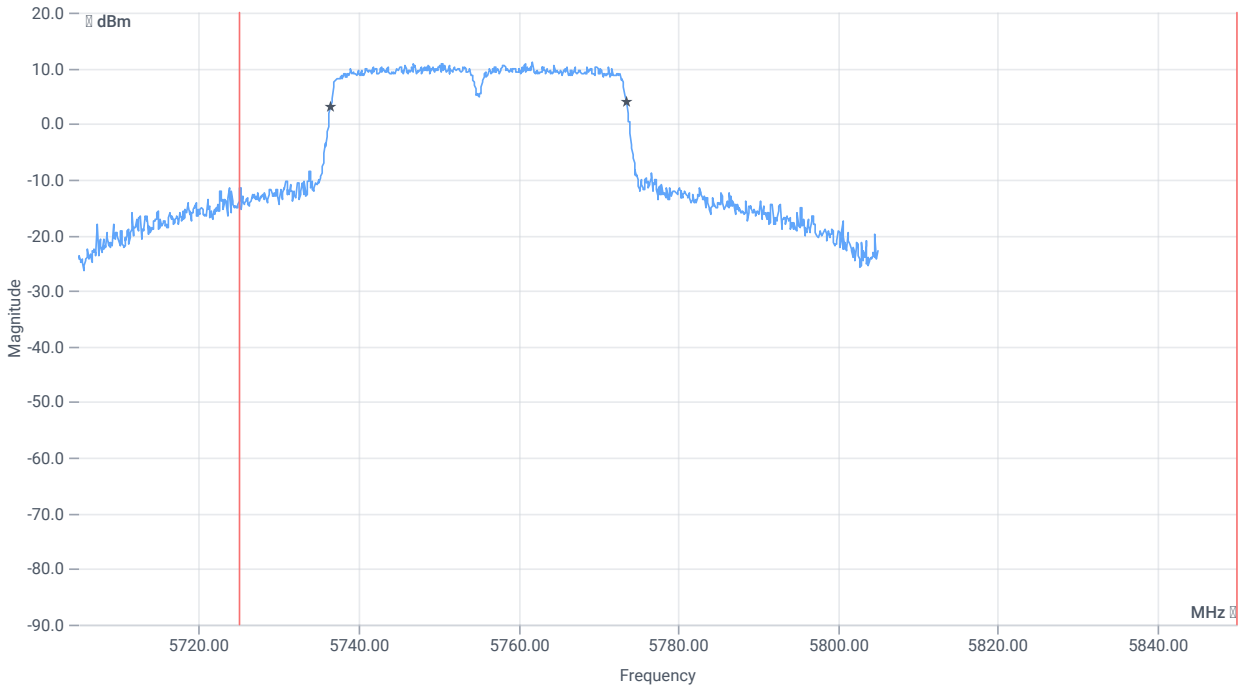
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.46	dBm	INFO
Ref. Frequency	---	---	5752.400	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	21.46 | 16.87 | 20
Start [MHz] | Stop [MHz]	5705.000 | 5805.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



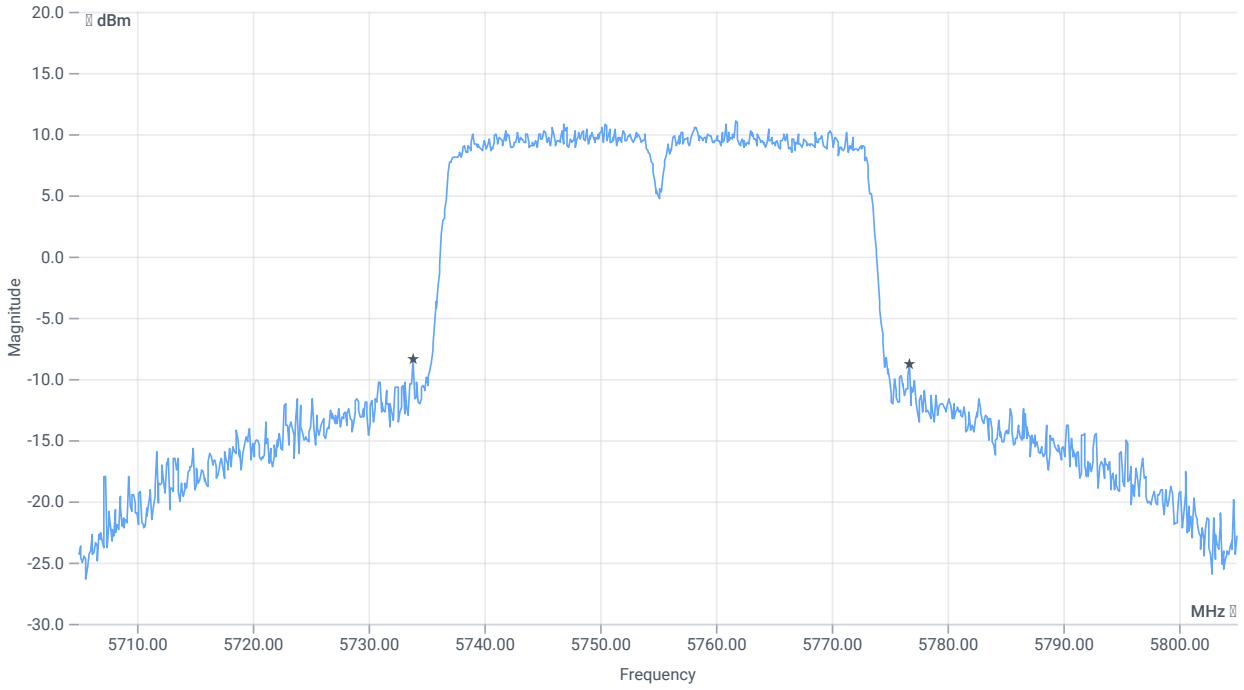
BW 99PCT



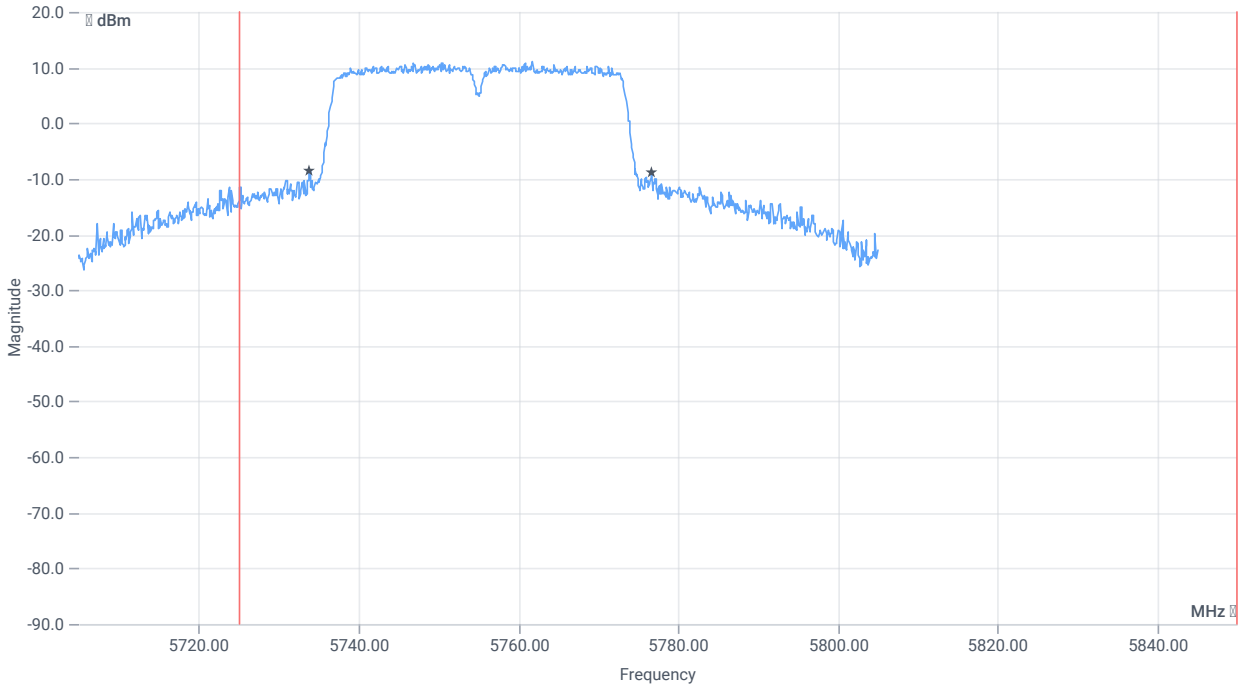
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	37.163	MHz	INFO
T1 99%	5725.000000	---	5736.4186	MHz	PASS
T2 99%	---	5850.000000	5773.5814	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	42.9	MHz	INFO
T1 20dB	5725.000000	---	5733.8000	MHz	PASS
T2 20dB	---	5850.000000	5776.7000	MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Minimum emission bandwidth ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 09:55:12
Ambit temp [°C] | humidity [rel%]	21.5 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	KDB789033 D02, C.2.
Description	FCC 15.407 Min Emission Bandwidth - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

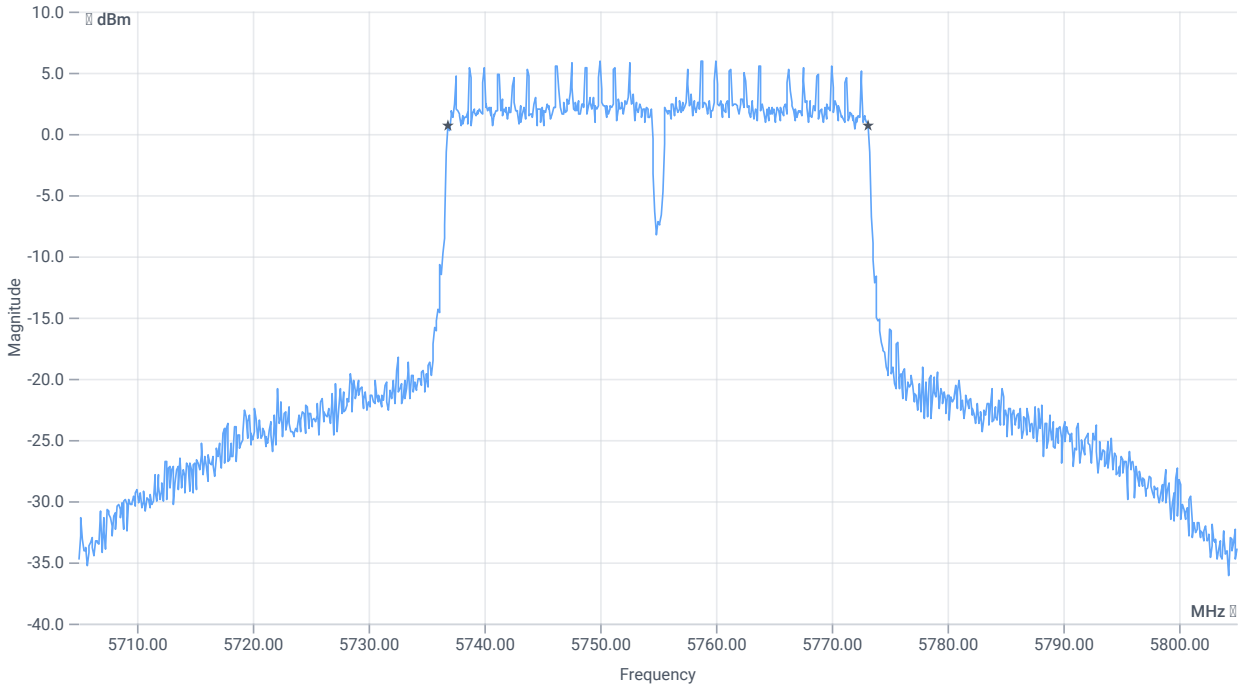
Test at TX 5755 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.82	dBm	INFO
Ref. Frequency	---	---	5742.610	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	25.82 | 16.87 | 25
Start [MHz] | Stop [MHz]	5705.000 | 5805.000
RBW [MHz] | VBW [MHz]	0.100000 | 0.300000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	2 | 1500 | 1001 | SWE



BW 6dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth (6dB)	0.500	---	36.4	MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 09:55:36
Ambit temp [°C] | humidity [rel%]	21.5 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5755 MHz

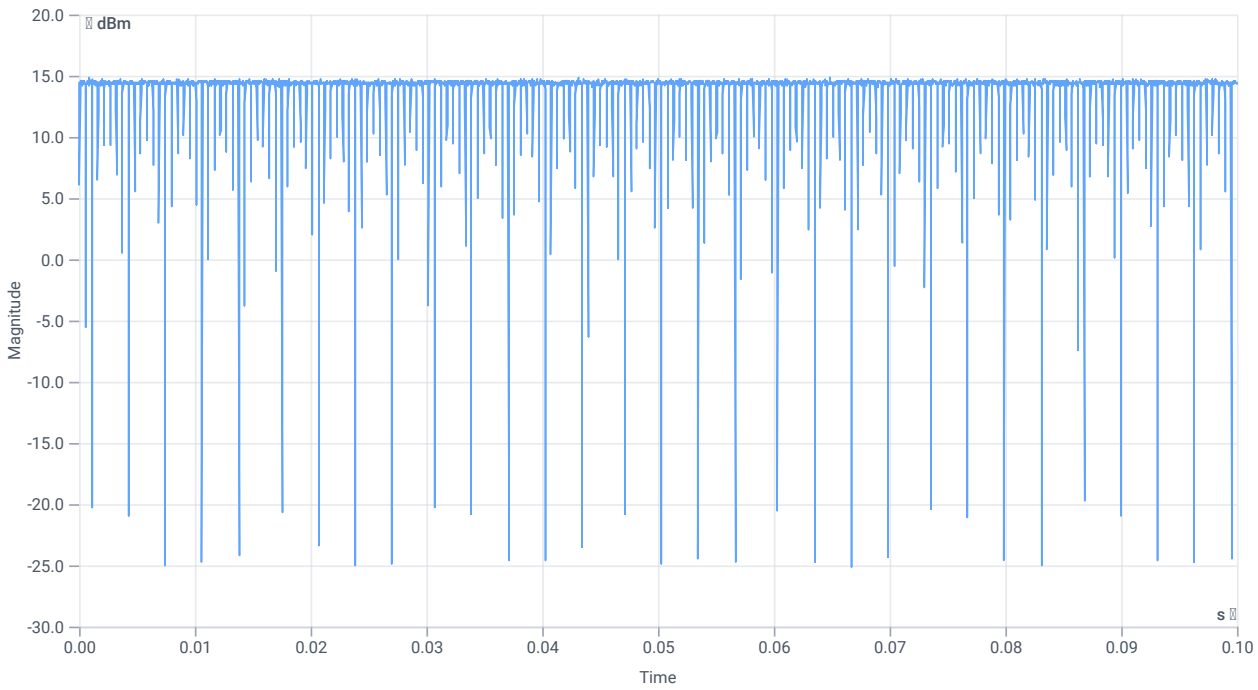
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	14.18	dBm	INFO
Ref. Frequency	---	---	5747.610	MHz	INFO

Evaluation max. Duty Cycle

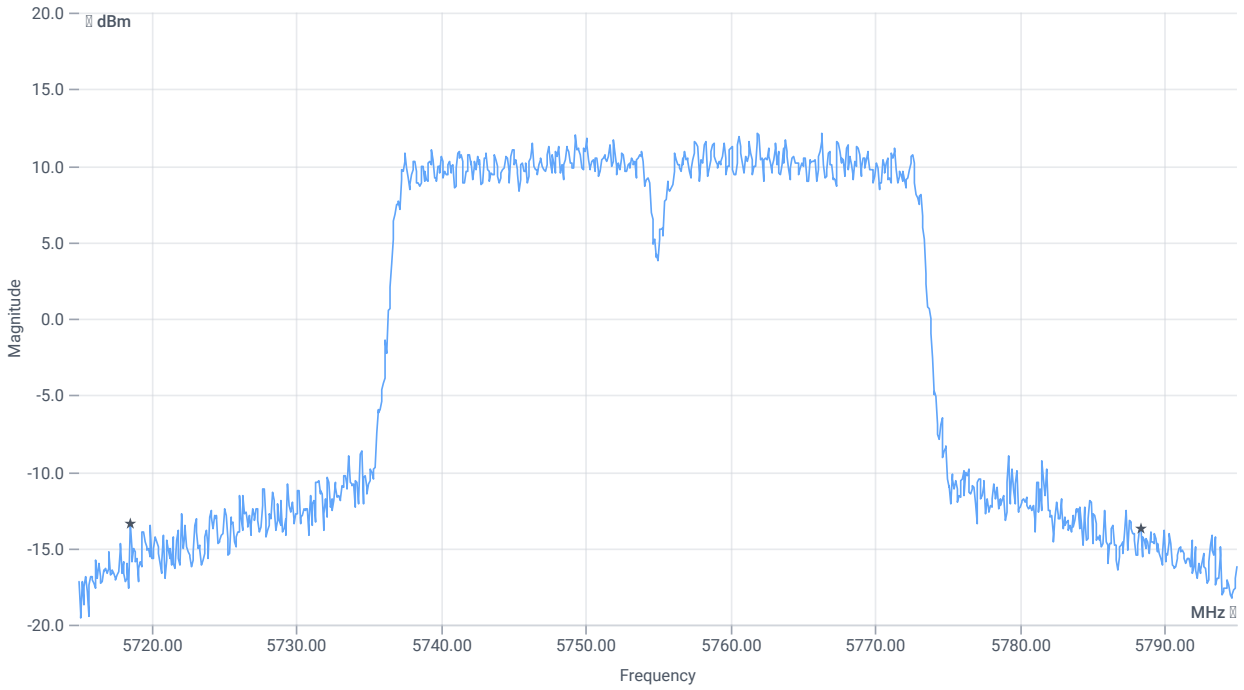
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:74					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

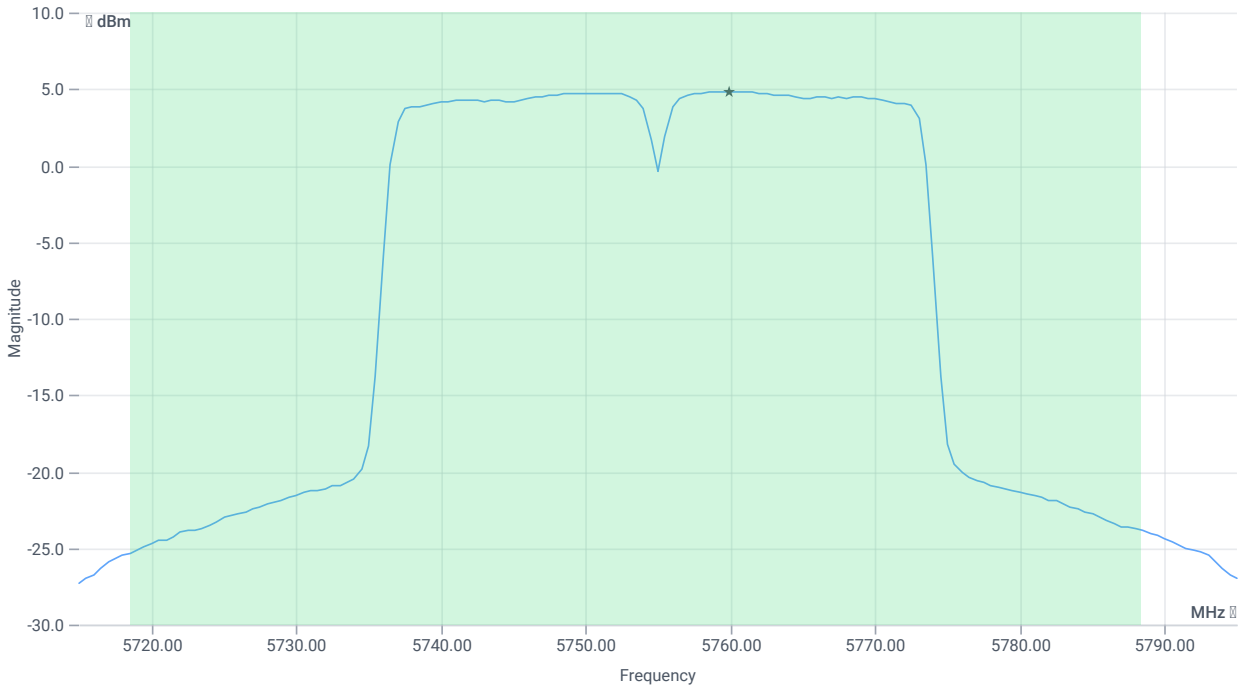
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	69.84	MHz	INFO
T1 26dB	---	---	5718.5200	MHz	INFO
T2 26dB	---	---	5788.3600	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	26.18 | 16.87 | 25
Start [MHz] | Stop [MHz]	5715.000 | 5795.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

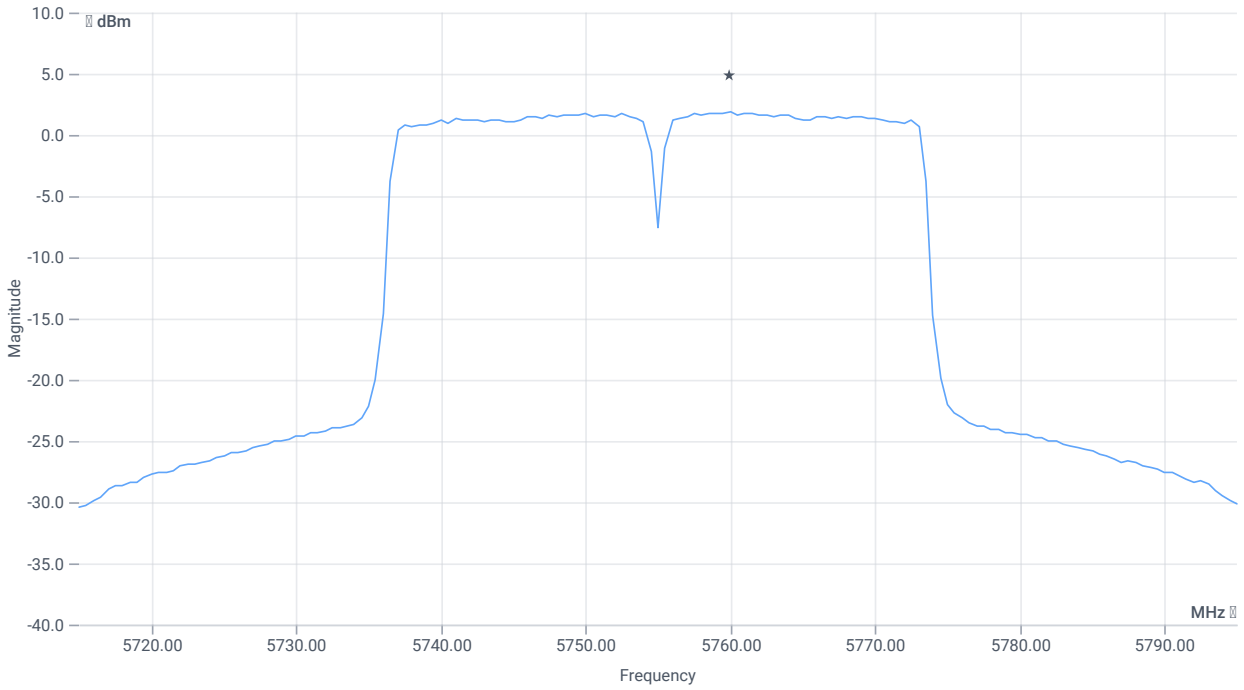
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.68	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	30	20.35	dBm	PASS
Limit: 11 dBm + 10 log 69.84					
Max Output Power DC corrected	---	29.44	20.35	dBm	na

Power Spectral Density U-NII-3

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	26.18 | 16.87 | 25
Start [MHz] | Stop [MHz]	5715.000 | 5795.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



PSD UNII-3

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	1.92	dBm/0.5MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	30	2.59	dBm/0.5MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 09:58:01
Ambit temp [°C] | humidity [rel%]	21.5 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

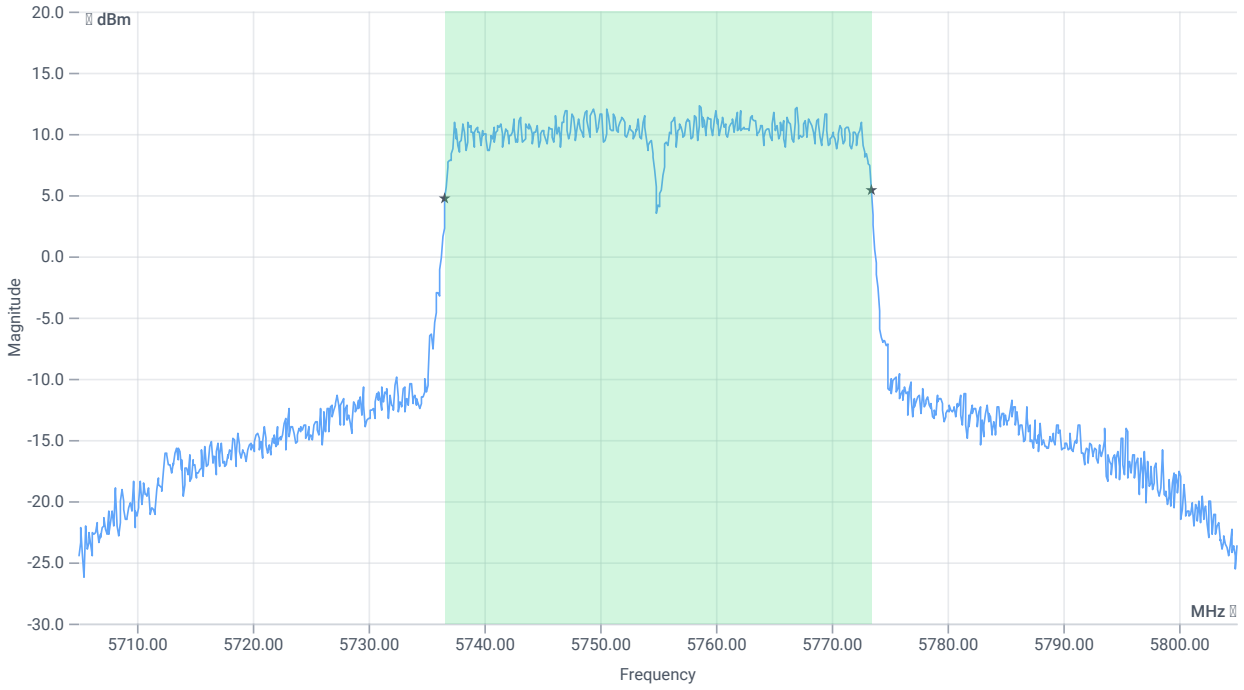
Test at TX 5755 MHz

RESULT: Reference Power cond.

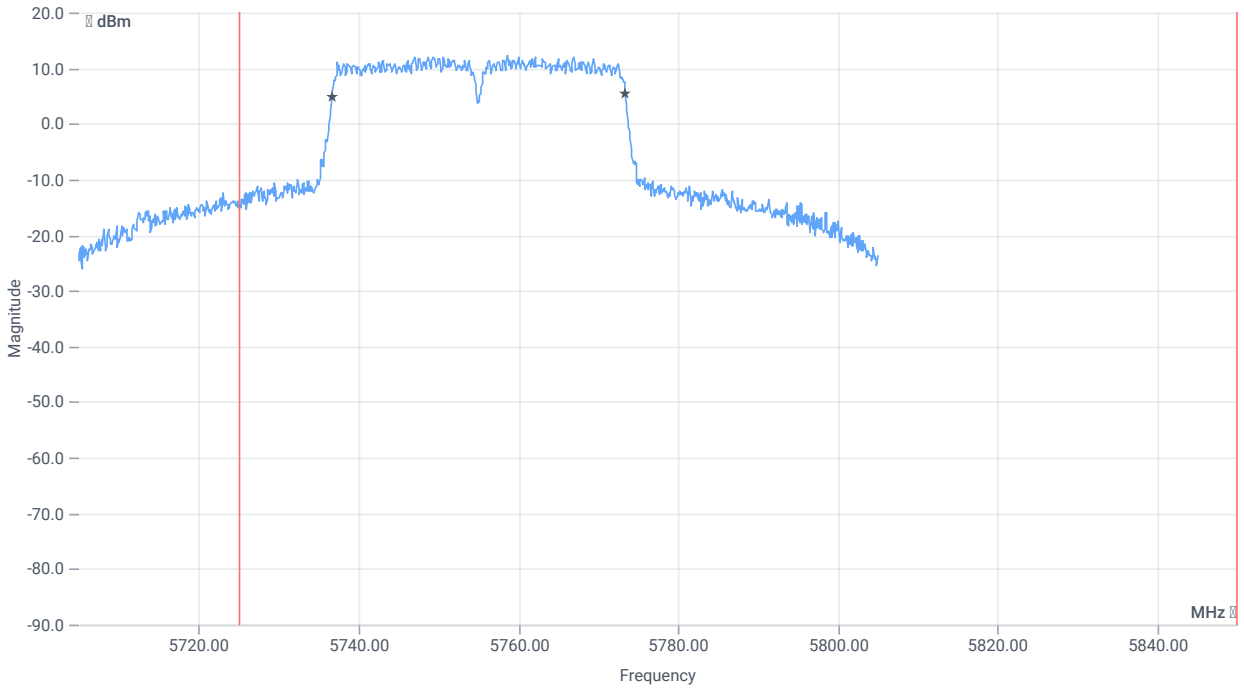
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.91	dBm	INFO
Ref. Frequency	---	---	5759.200	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	21.91 | 16.87 | 25
Start [MHz] | Stop [MHz]	5705.000 | 5805.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



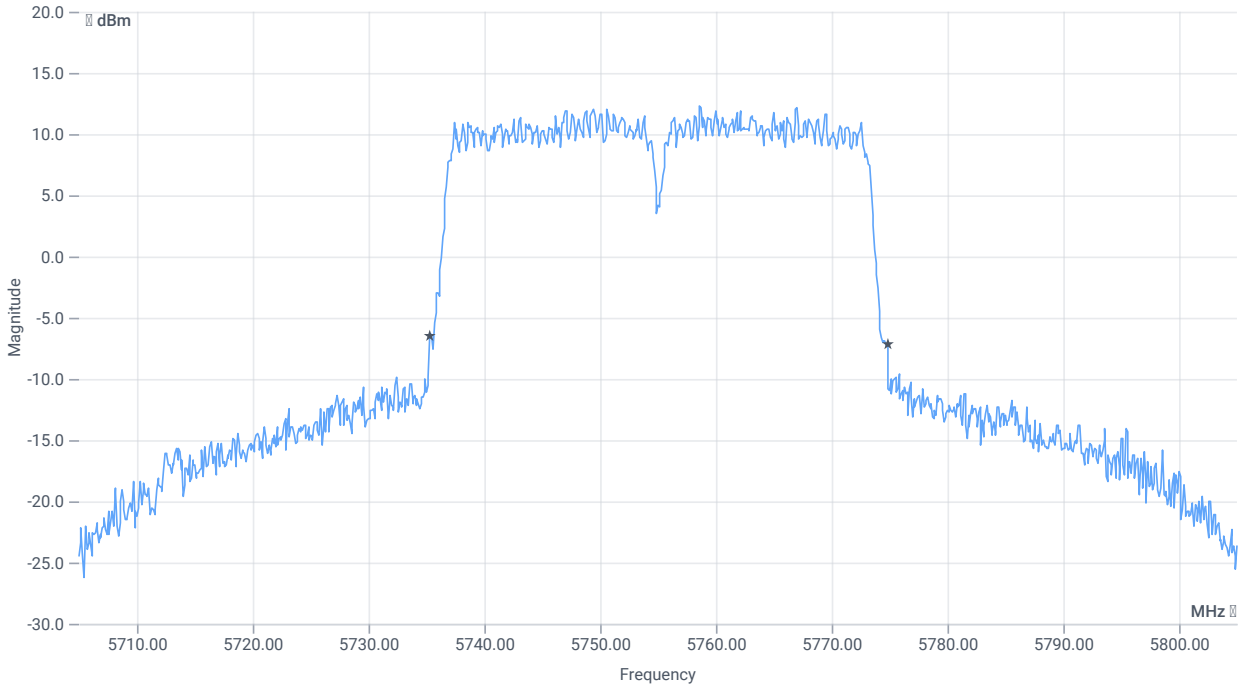
BW 99PCT



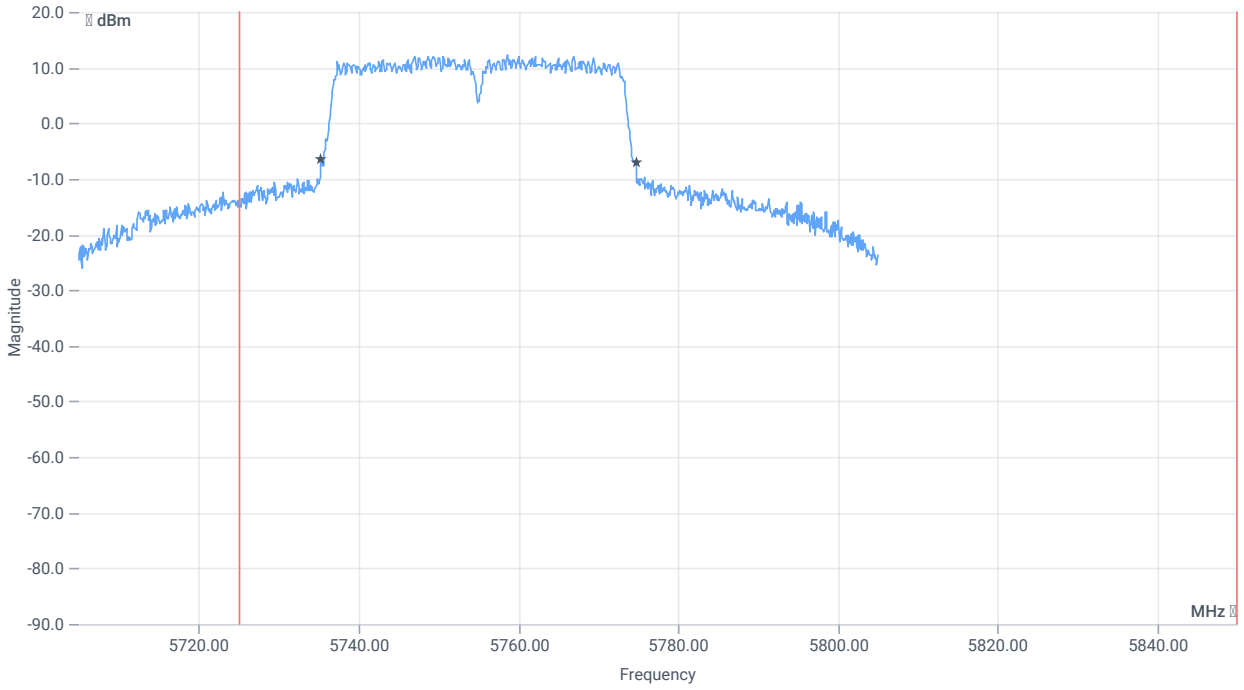
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.763	MHz	INFO
T1 99%	5725.000000	---	5736.6184	MHz	PASS
T2 99%	---	5850.000000	5773.3816	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	39.5	MHz	INFO
T1 20dB	5725.000000	---	5735.3000	MHz	PASS
T2 20dB	---	5850.000000	5774.8000	MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Minimum emission bandwidth ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 09:58:32
Ambit temp [°C] | humidity [rel%]	21.5 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	KDB789033 D02, C.2.
Description	FCC 15.407 Min Emission Bandwidth - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

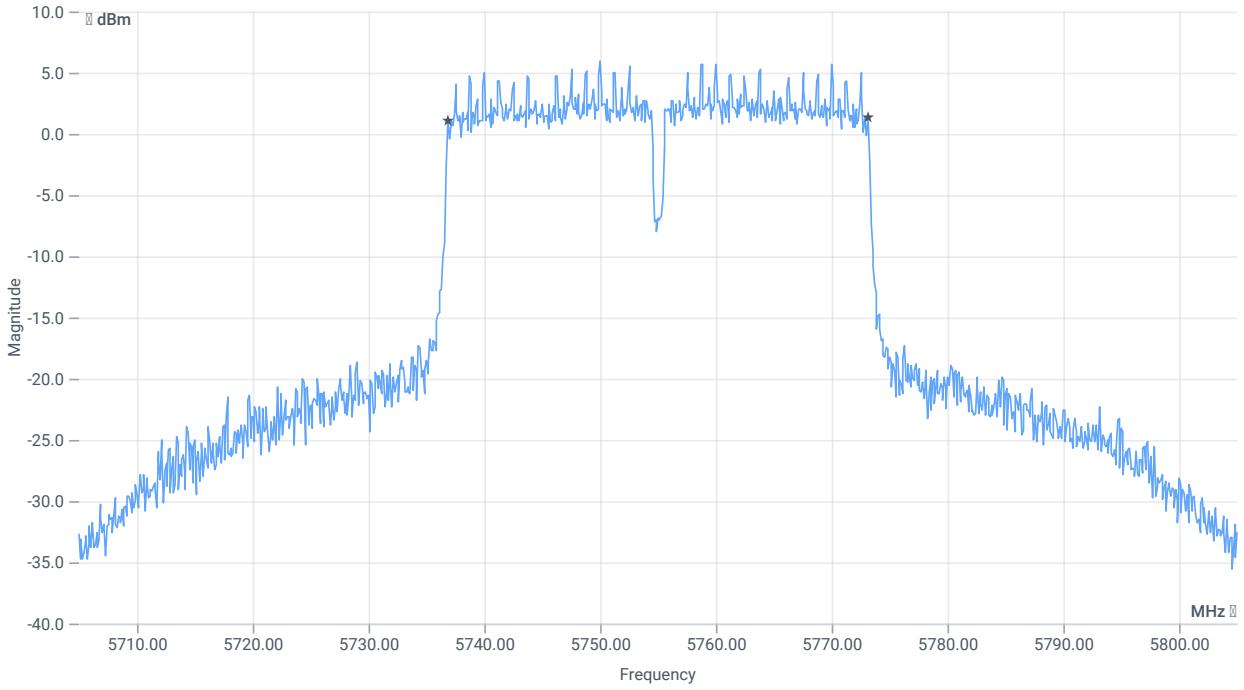
Test at TX 5755 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.29	dBm	INFO
Ref. Frequency	---	---	5739.020	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	25.29 | 16.87 | 25
Start [MHz] | Stop [MHz]	5705.000 | 5805.000
RBW [MHz] | VBW [MHz]	0.100000 | 0.300000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	2 | 1500 | 1001 | SWE



BW 6dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth (6dB)	0.500	---	36.4	MHz	PASS

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 09:58:57
Ambit temp [°C] | humidity [rel%]	21.5 | 28
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5755 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	20.79	dBm	INFO
Ant:1 BW 26dB	---	---	78.320	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	20.35	dBm	INFO
Ant:2 BW 26dB	---	---	69.840	MHz	INFO
∑ Limit absolute	---	30	23.59	dBm	PASS
∑ Limit: 11 dBm + 10 log 69.84	---	29.44	23.59	dBm	na

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	2.95	dBm/0.5MHz	INFO
Ant:2 PSD	---	---	2.59	dBm/0.5MHz	INFO
∑	---	30	5.78	dBm/0.5MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Emission mask (eirp) ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 14:09:42
Ambit temp [°C] | humidity [rel%]	22.8 | 23
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	NI
Description	FCC 15.407 Emission mask - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	3.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5755 MHz

RESULT: Reference Power cond.

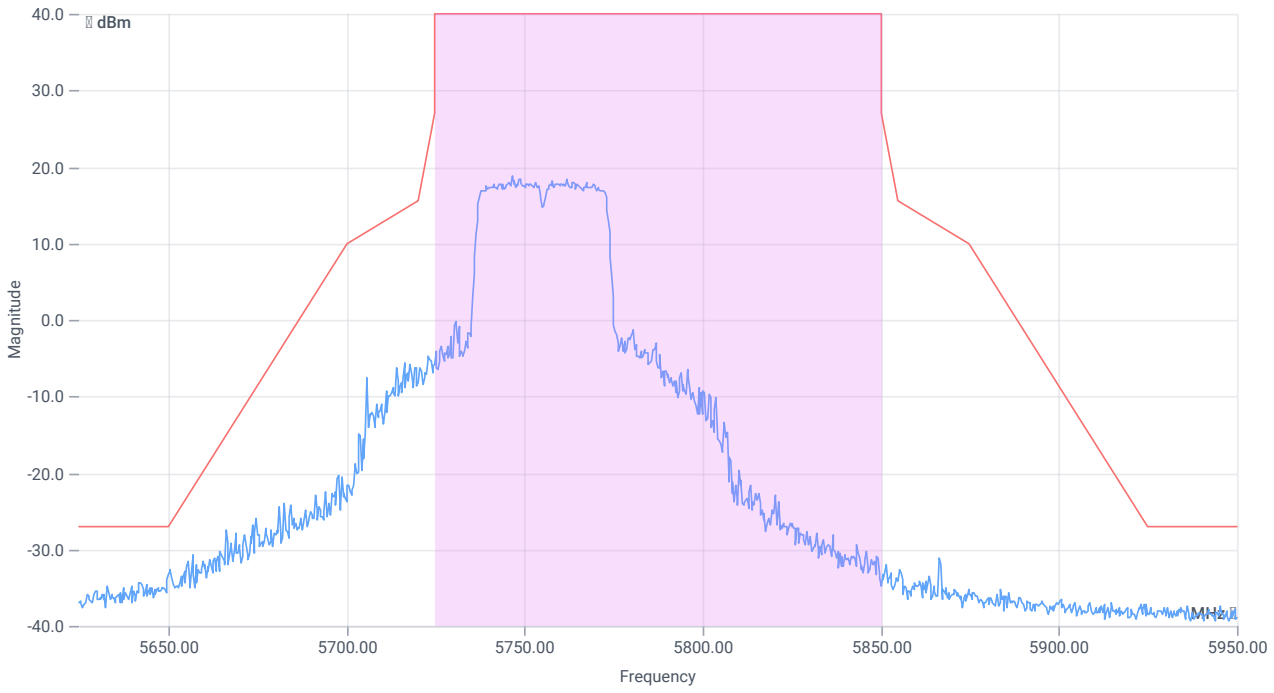
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	15.45	dBm	INFO
Ref. Frequency	---	---	5751.600	MHz	INFO

Antenna gain

Considered antenna gain [dBi]:	2 / max found in range 5625 to 5950 MHz

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	18.45 | 18.87 | 15
Start [MHz] | Stop [MHz]	5625.000 | 5950.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



Emission Mask (e.i.r.p)

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT

Verdict
PASS

FCC 15.407, ISED RSS247 # Emission mask (eirp) ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 14:10:19
Ambit temp [°C] | humidity [rel%]	22.8 | 23
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	NI
Description	FCC 15.407 Emission mask - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	True | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	False | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	3.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5755 MHz

RESULT: Reference Power cond.

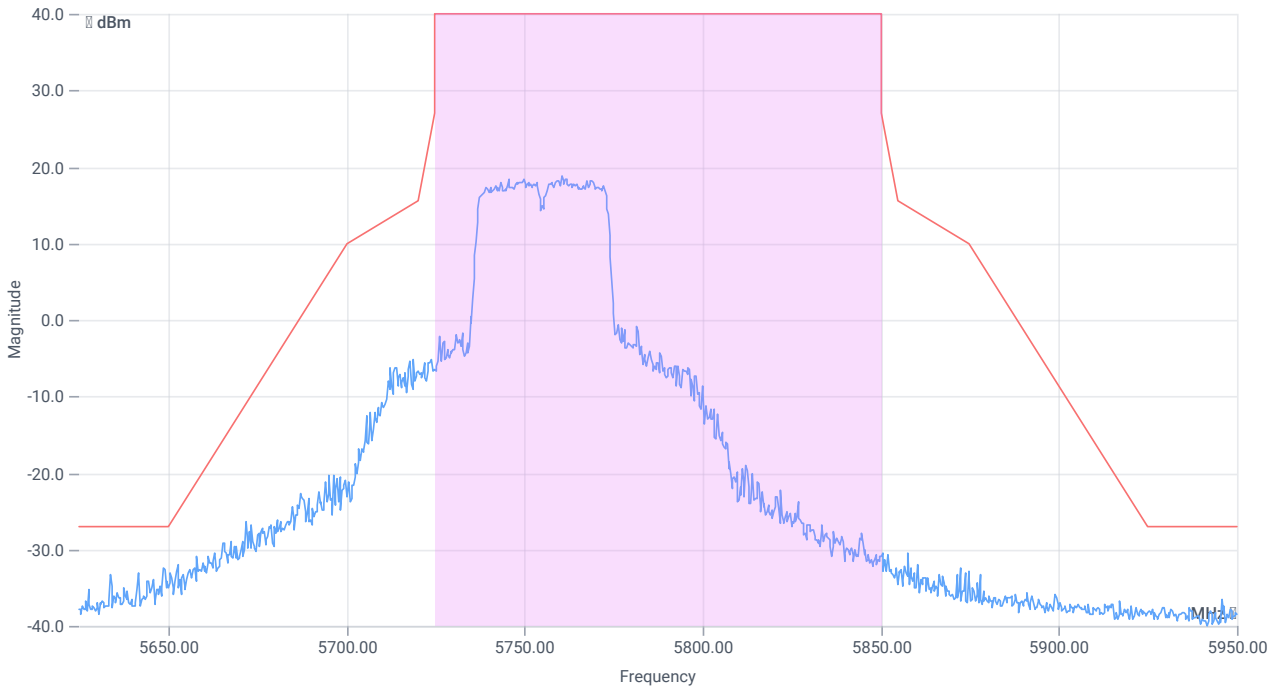
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	15.80	dBm	INFO
Ref. Frequency	---	---	5757.200	MHz	INFO

Antenna gain

Considered antenna gain [dBi]:	2 / max found in range 5625 to 5950 MHz

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	18.80 | 18.87 | 15
Start [MHz] | Stop [MHz]	5625.000 | 5950.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



Emission Mask (e.i.r.p)

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 10:00:27
Ambit temp [°C] | humidity [rel%]	21.5 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5795 MHz

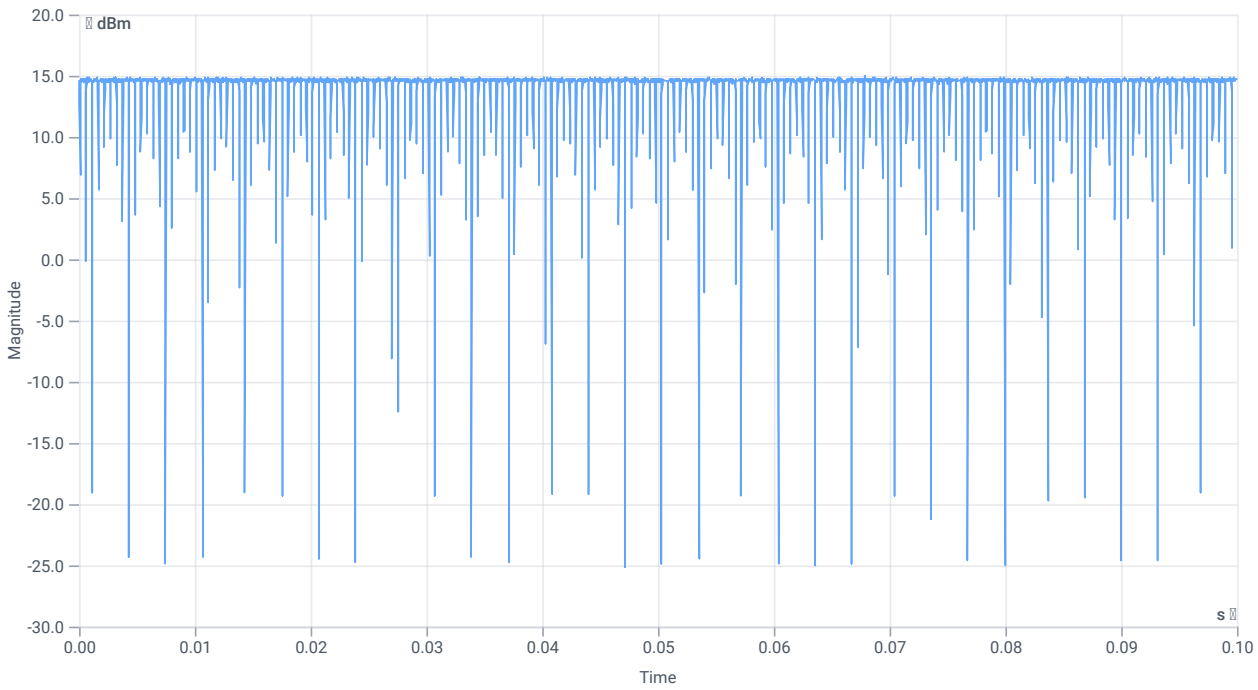
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.92	dBm	INFO
Ref. Frequency	---	---	5800.390	MHz	INFO

Evaluation max. Duty Cycle

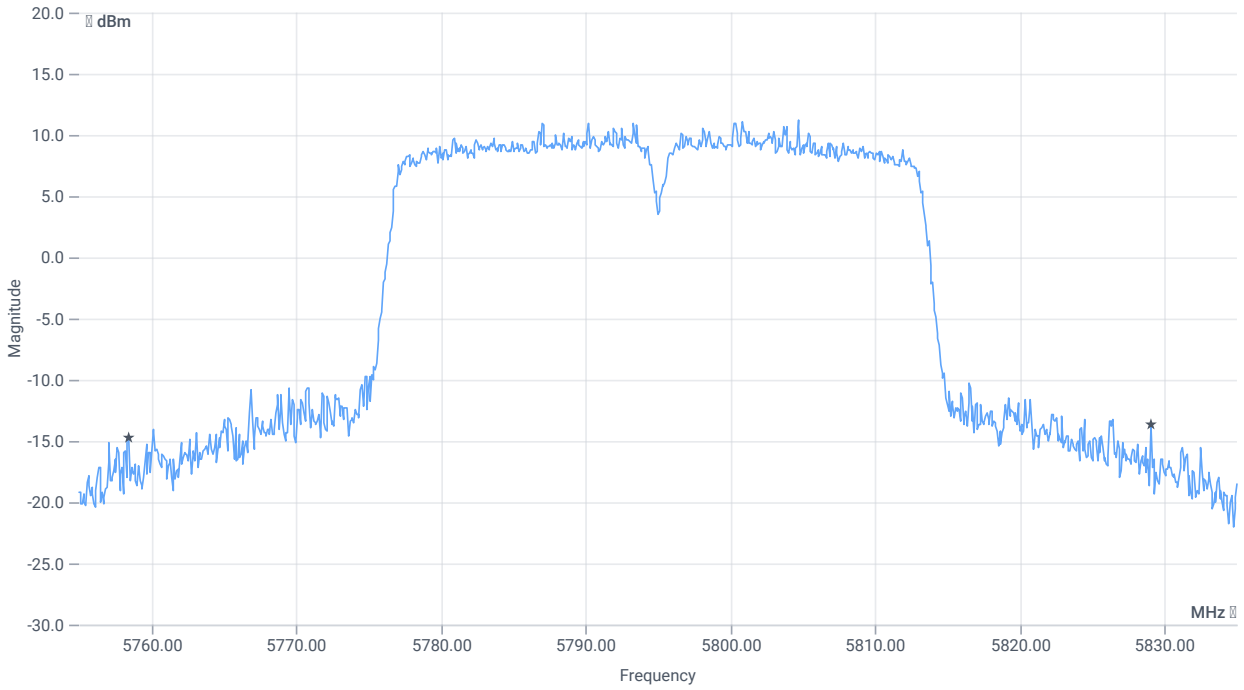
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:72					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

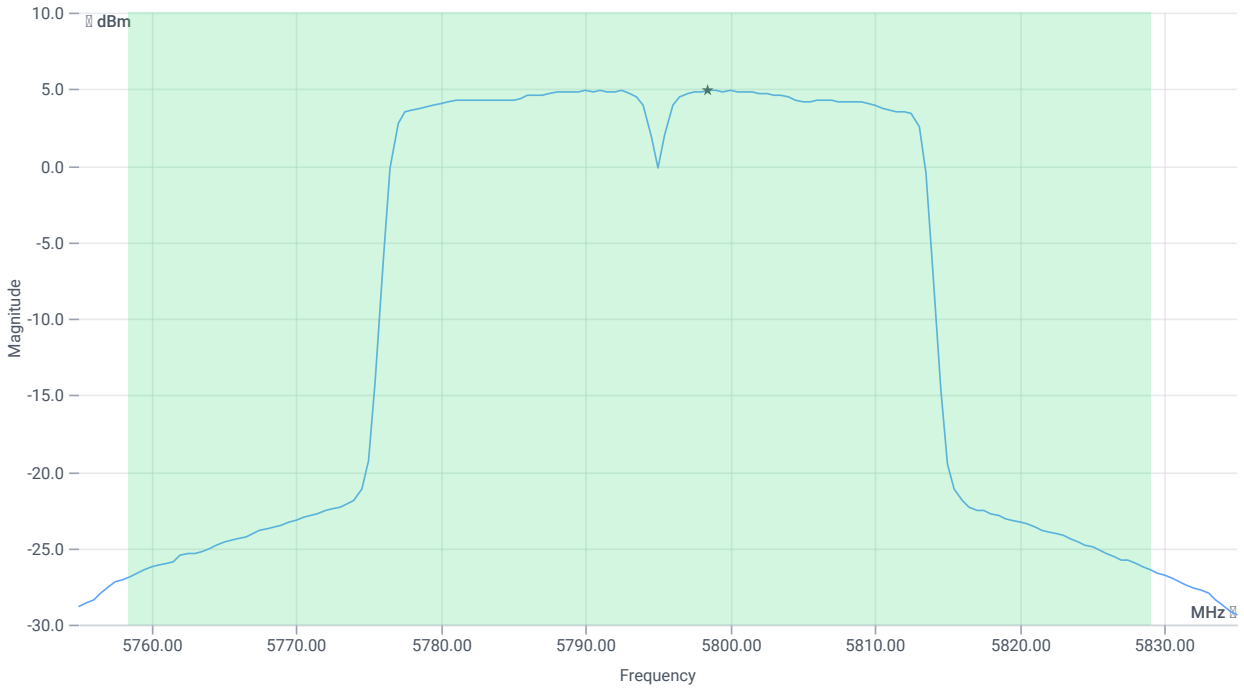
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	70.64	MHz	INFO
T1 26dB	---	---	5758.4400	MHz	INFO
T2 26dB	---	---	5829.0800	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.92 | 16.77 | 25
Start [MHz] | Stop [MHz]	5755.000 | 5835.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

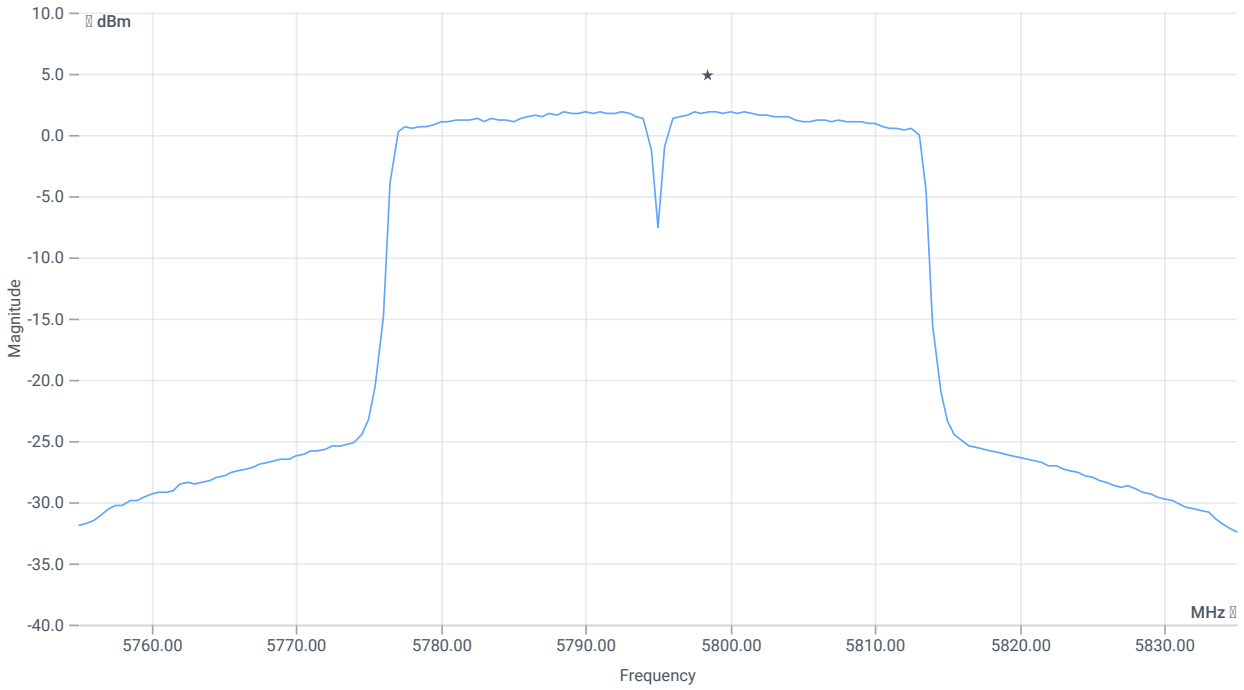
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.65	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	30	20.32	dBm	PASS
Limit: 11 dBm + 10 log 70.64					
Max Output Power DC corrected	---	29.49	20.32	dBm	na

Power Spectral Density U-NII-3

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.92 | 16.77 | 25
Start [MHz] | Stop [MHz]	5755.000 | 5835.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



PSD UNII-3

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	1.92	dBm/0.5MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	30	2.59	dBm/0.5MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 10:02:53
Ambit temp [°C] | humidity [rel%]	21.5 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

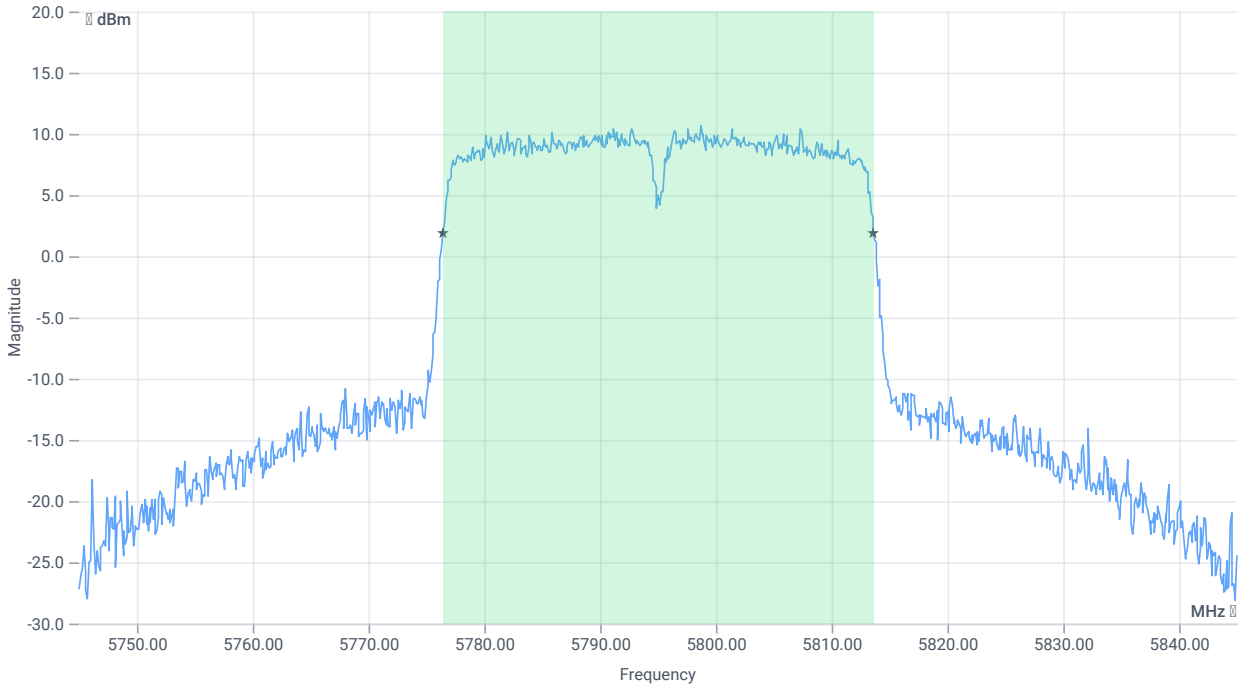
Test at TX 5795 MHz

RESULT: Reference Power cond.

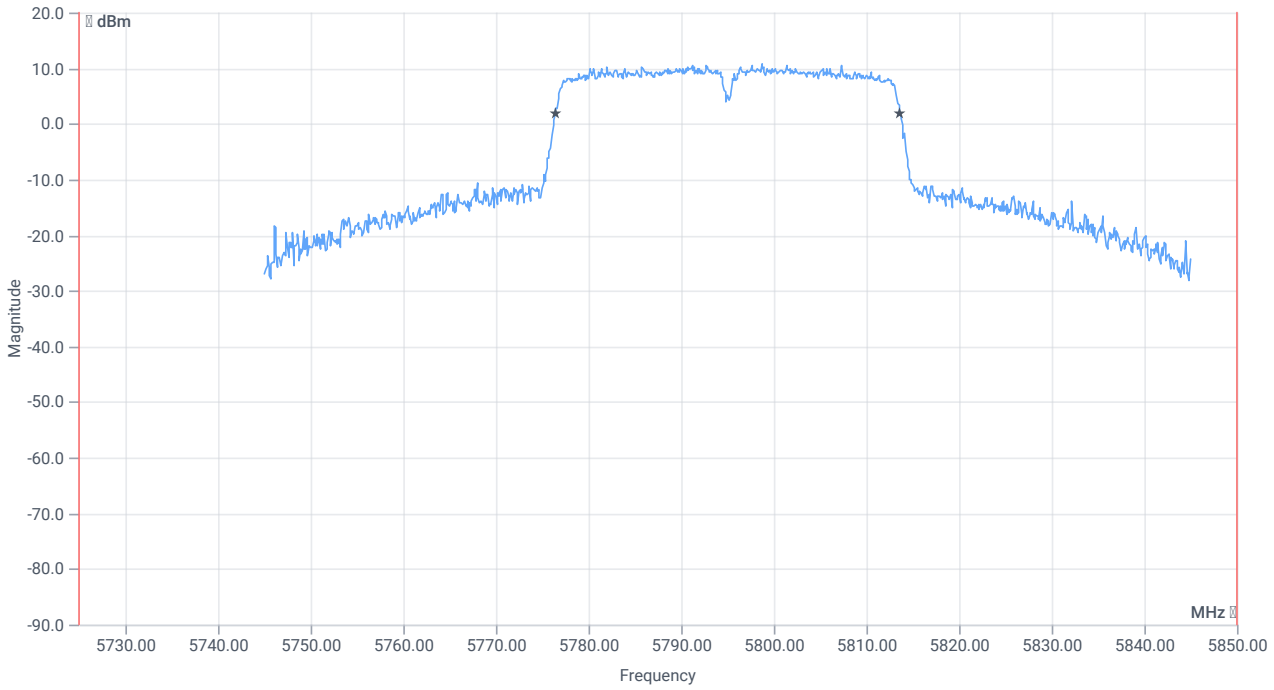
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.82	dBm	INFO
Ref. Frequency	---	---	5800.990	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	20.82 | 16.77 | 20
Start [MHz] | Stop [MHz]	5745.000 | 5845.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



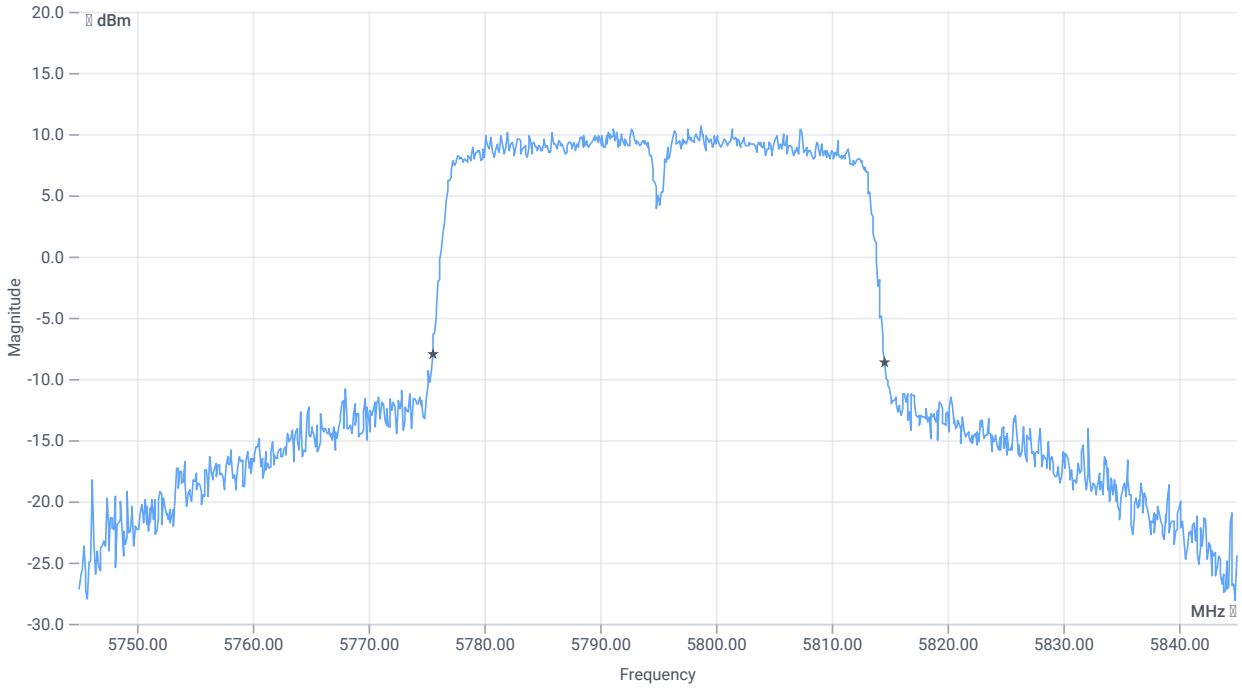
BW 99PCT



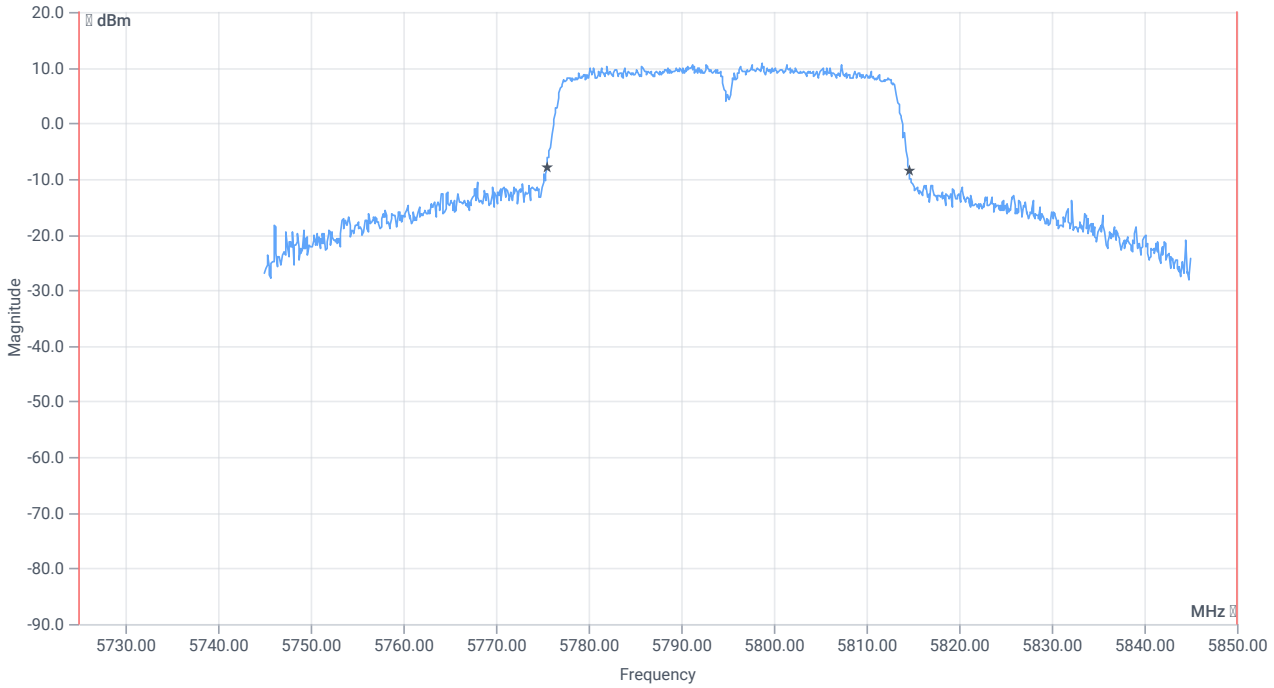
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	37.163	MHz	INFO
T1 99%	5725.000000	---	5776.4186	MHz	PASS
T2 99%	---	5850.000000	5813.5814	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	39.1	MHz	INFO
T1 20dB	5725.000000	---	5775.5000	MHz	PASS
T2 20dB	---	5850.000000	5814.6000	MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Minimum emission bandwidth ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 10:03:23
Ambit temp [°C] | humidity [rel%]	21.5 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	KDB789033 D02, C.2.
Description	FCC 15.407 Min Emission Bandwidth - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

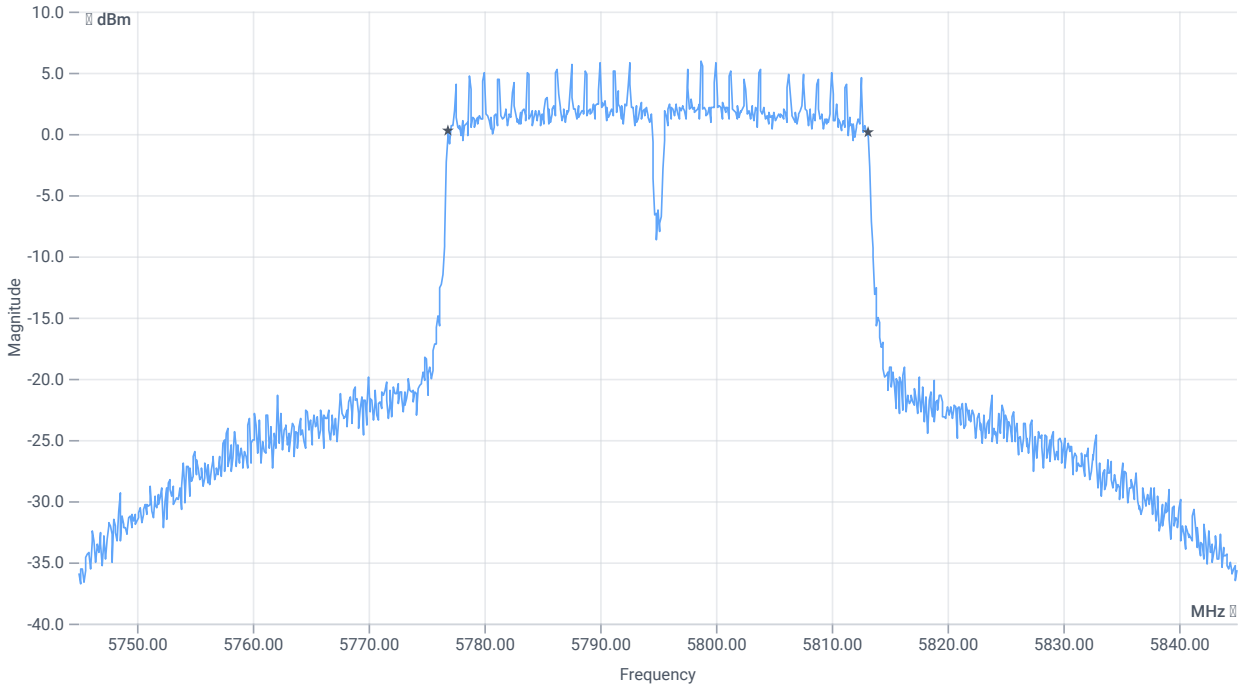
Test at TX 5795 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.15	dBm	INFO
Ref. Frequency	---	---	5789.210	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	25.15 | 16.77 | 25
Start [MHz] | Stop [MHz]	5745.000 | 5845.000
RBW [MHz] | VBW [MHz]	0.100000 | 0.300000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	2 | 1500 | 1001 | SWE



BW 6dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth (6dB)	0.500	---	36.3	MHz	PASS

Verdict
PASS

FCC 15.407 # Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 10:03:49
Ambit temp [°C] | humidity [rel%]	21.5 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	KDB789033 D02, F., E.2.e.
Description	FCC 15.407 Max Output Power & PSD - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5795 MHz

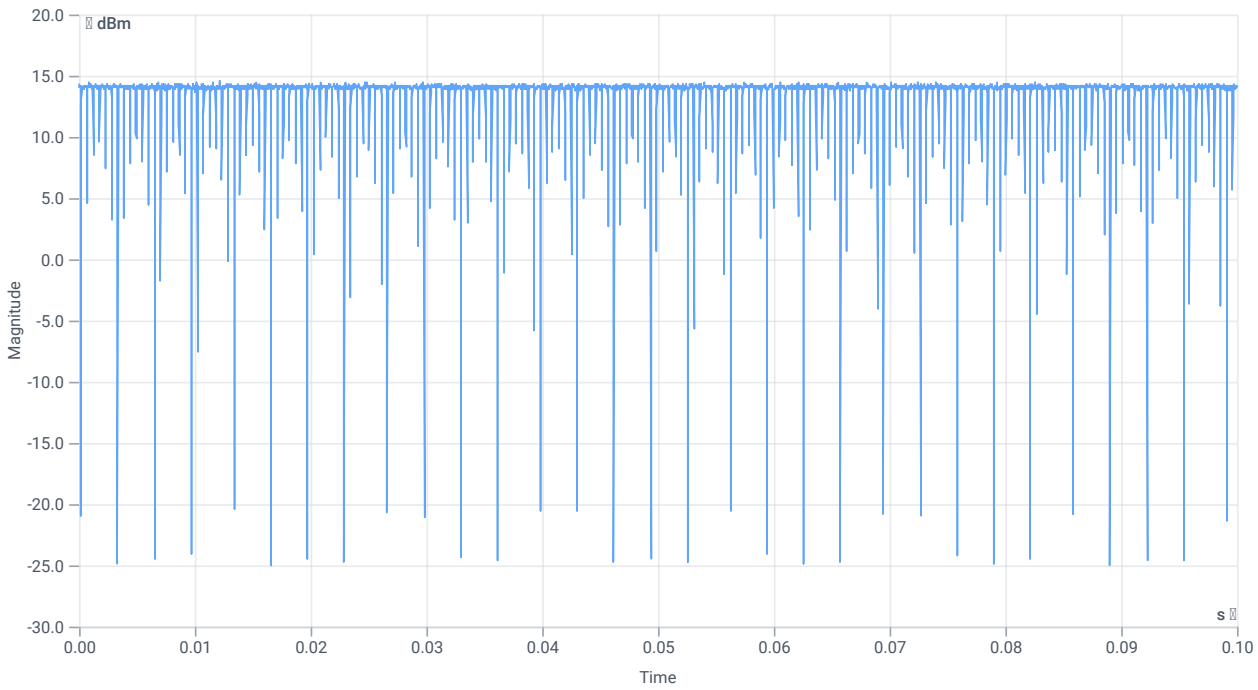
RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	13.64	dBm	INFO
Ref. Frequency	---	---	5793.600	MHz	INFO

Evaluation max. Duty Cycle

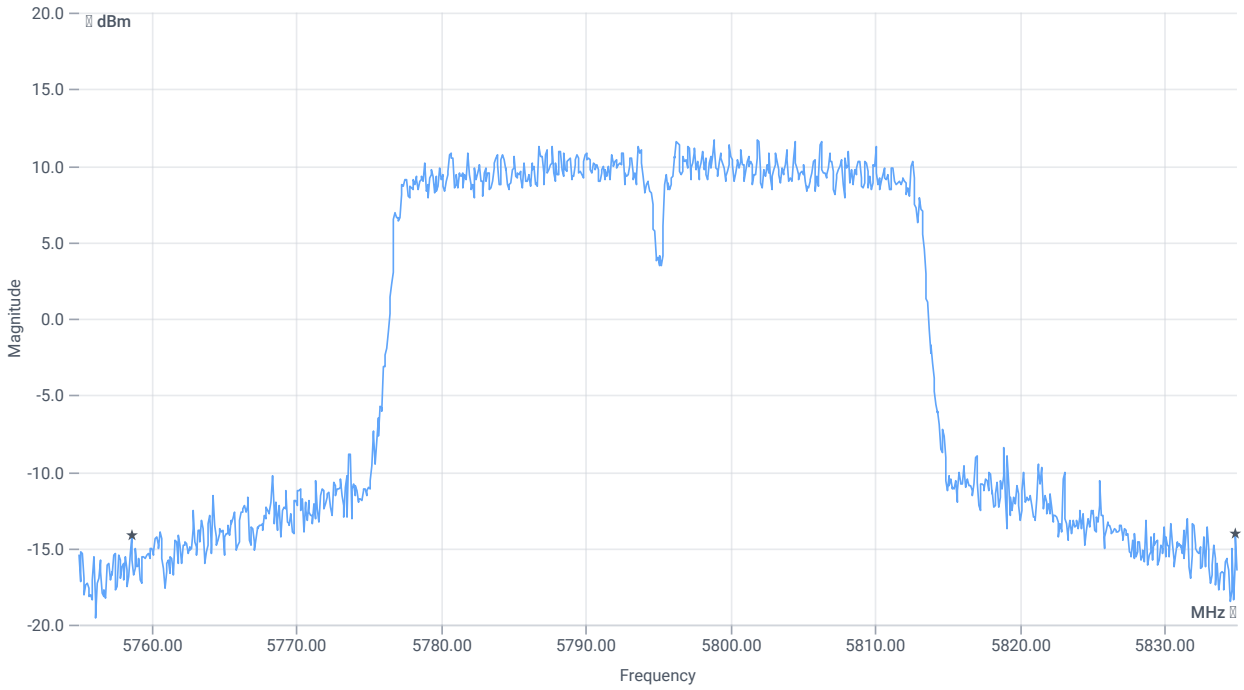
Duty Cycle evaluation

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Result Summary					
Number of detected Bursts:74					
Duty Cycle (Burst Ratio) max	---	---	0.972	---	INFO
Duty Cycle max	---	---	0.123	dB	INFO
Duty Cycle (Burst Ratio) min	---	---	0.857	---	INFO
Duty Cycle min	---	---	0.67	dB	INFO
Max TX Burst Length	---	---	2.575	ms	INFO
Min Gap Length	---	---	0.075	ms	INFO
Max Gap Length	---	---	0.075	ms	INFO



Duty cycle

Evaluation Bandwidth



BW 26dB

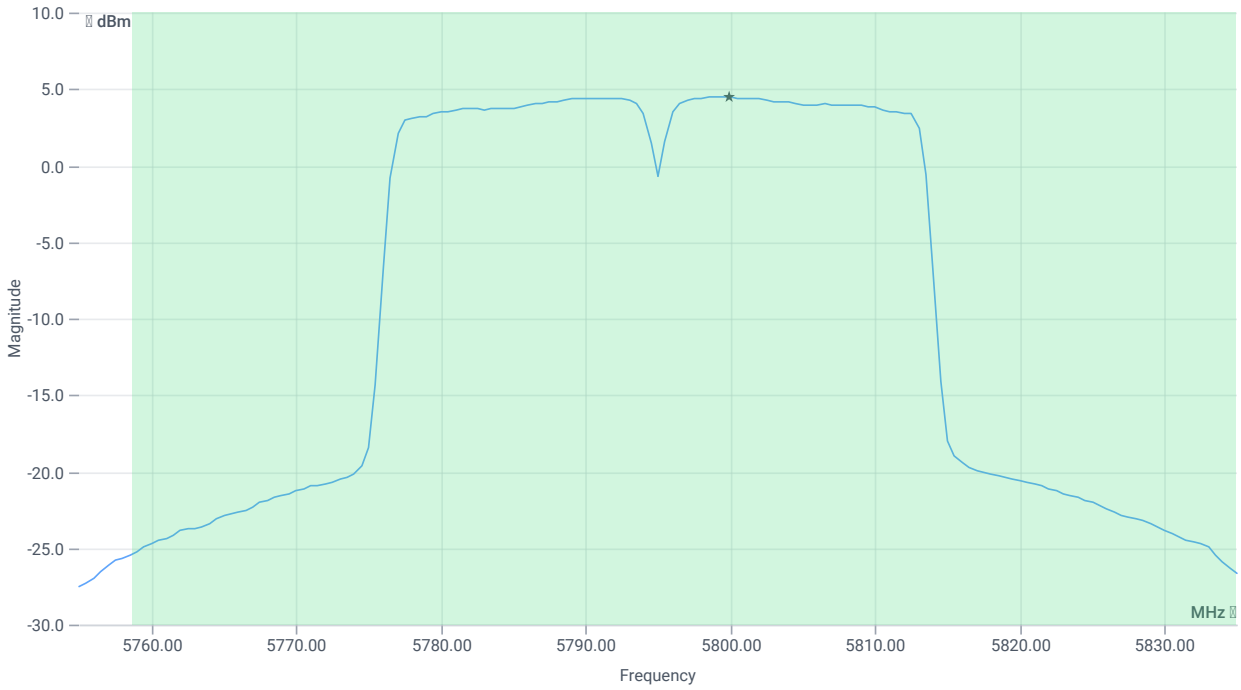
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 26dB	---	---	76.32	MHz	INFO
T1 26dB	---	---	5758.6000	MHz	INFO
T2 26dB	---	---	5834.9200	MHz	INFO

Maximum Output Power

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	25.64 | 16.77 | 25
Start [MHz] | Stop [MHz]	5755.000 | 5835.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



Max OP and PSD

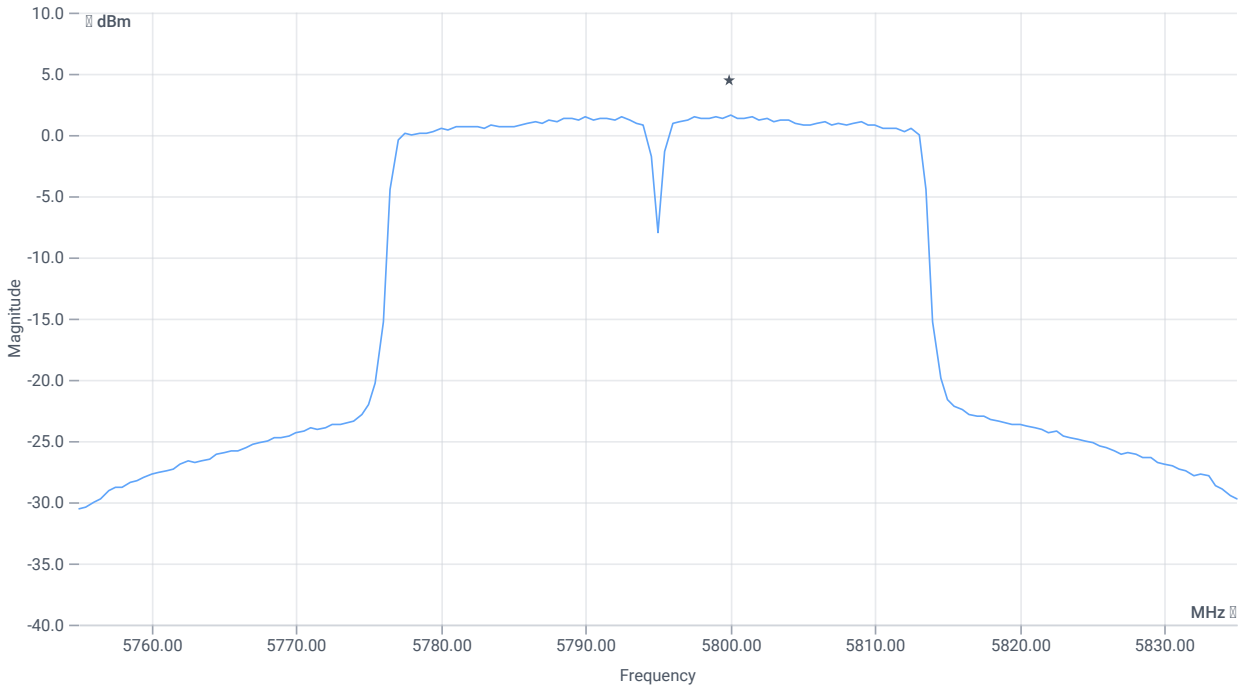
RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Max Output Power	---	---	19.23	dBm	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Limit absolute					
Max Output Power DC corrected	---	30	19.9	dBm	PASS
Limit: 11 dBm + 10 log 76.32					
Max Output Power DC corrected	---	29.83	19.9	dBm	na

Power Spectral Density U-NII-3

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	25.64 | 16.77 | 25
Start [MHz] | Stop [MHz]	5755.000 | 5835.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	RMS | MAXH
Sweep: time [ms] | count | points per Section | type	53700 | 1 | 161 | SWE



PSD UNII-3

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Power Spectral Density	---	---	1.6	dBm/0.5MHz	INFO
Duty Cycle Correction	---	---	0.67	dB	INFO
Power Spectral Density DC corrected	---	30	2.27	dBm/0.5MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Bandwidths 99PCT and 20dB ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 10:06:14
Ambit temp [°C] | humidity [rel%]	21.5 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	26dB Bandwidth KDB789033 D02, C.1 / ISED RSS-GEN
Description	FCC 15.407 Bandwidths - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

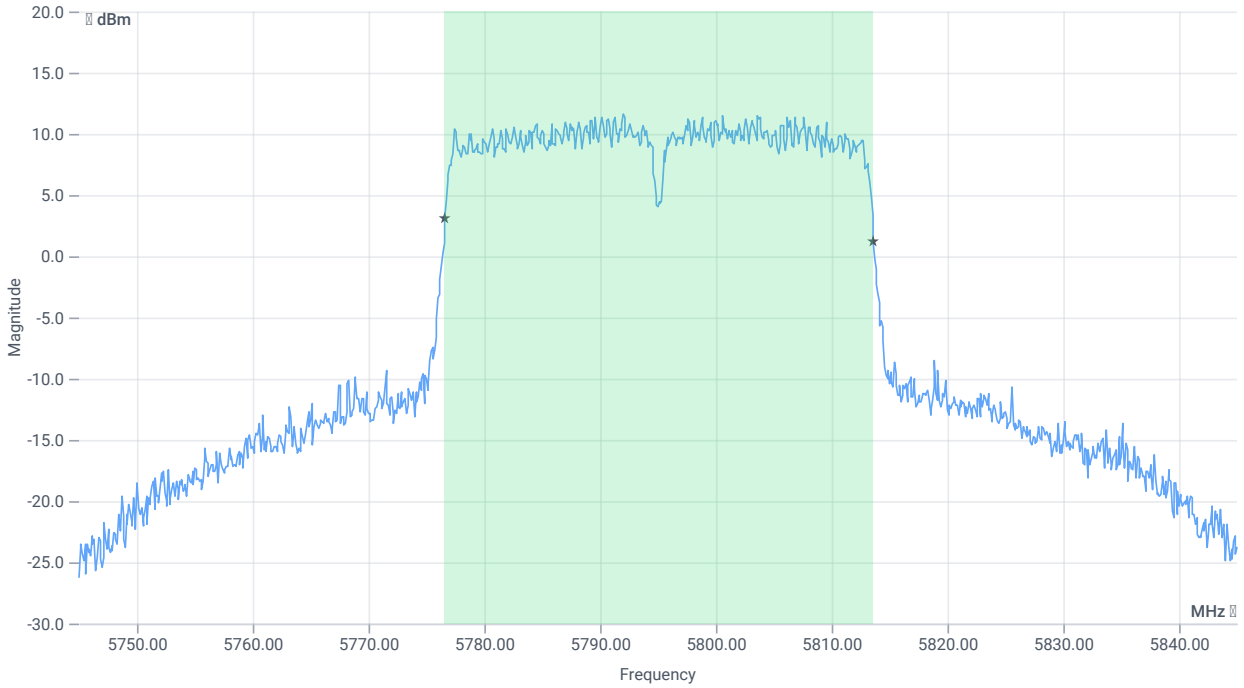
Test at TX 5795 MHz

RESULT: Reference Power cond.

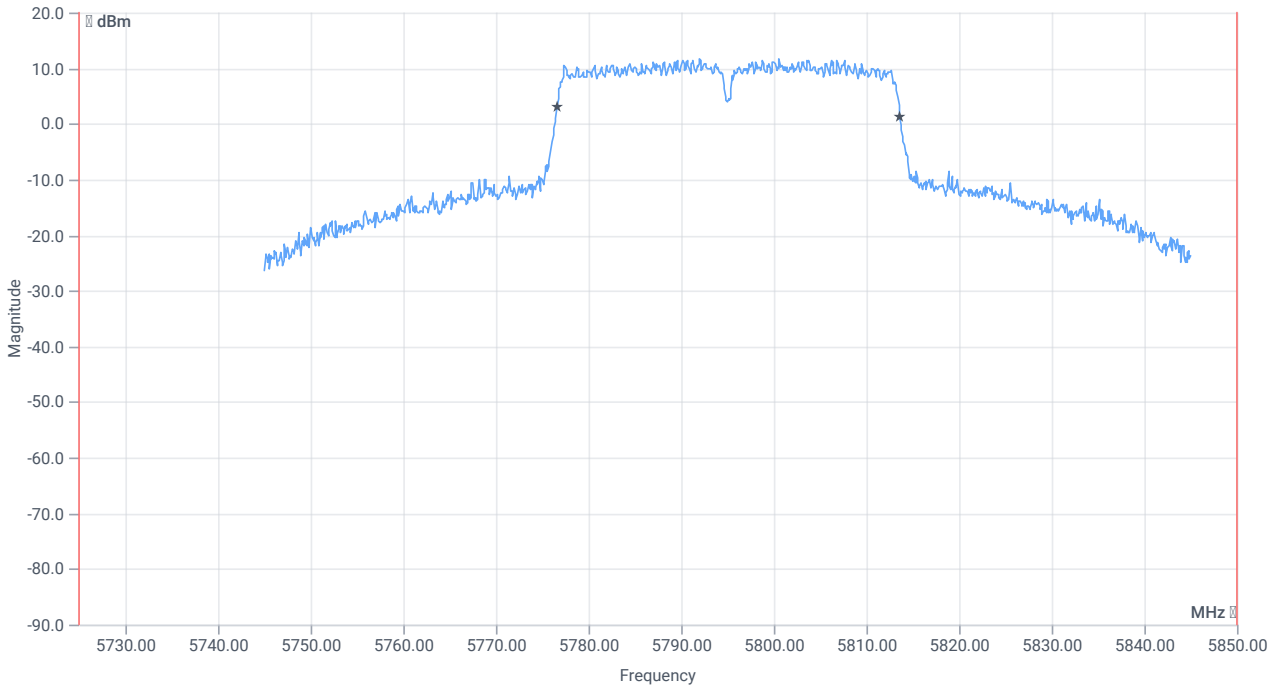
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.94	dBm	INFO
Ref. Frequency	---	---	5796.600	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	20.94 | 16.77 | 20
Start [MHz] | Stop [MHz]	5745.000 | 5845.000
RBW [MHz] | VBW [MHz]	0.500000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



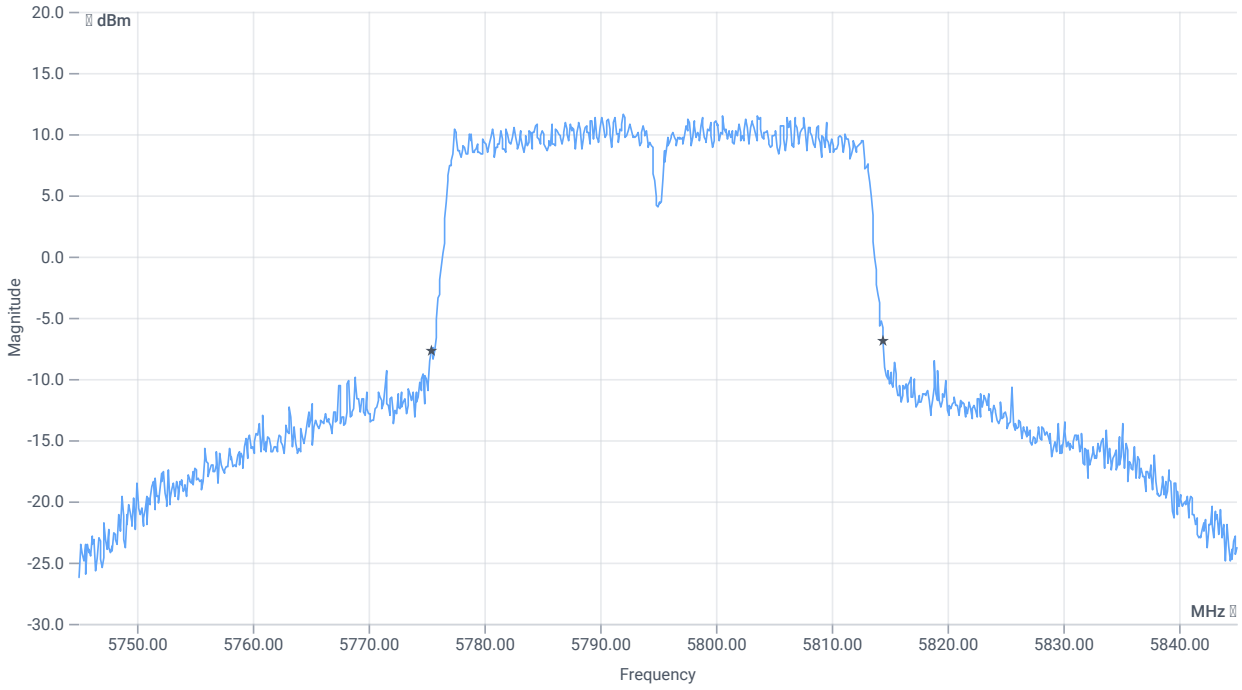
BW 99PCT



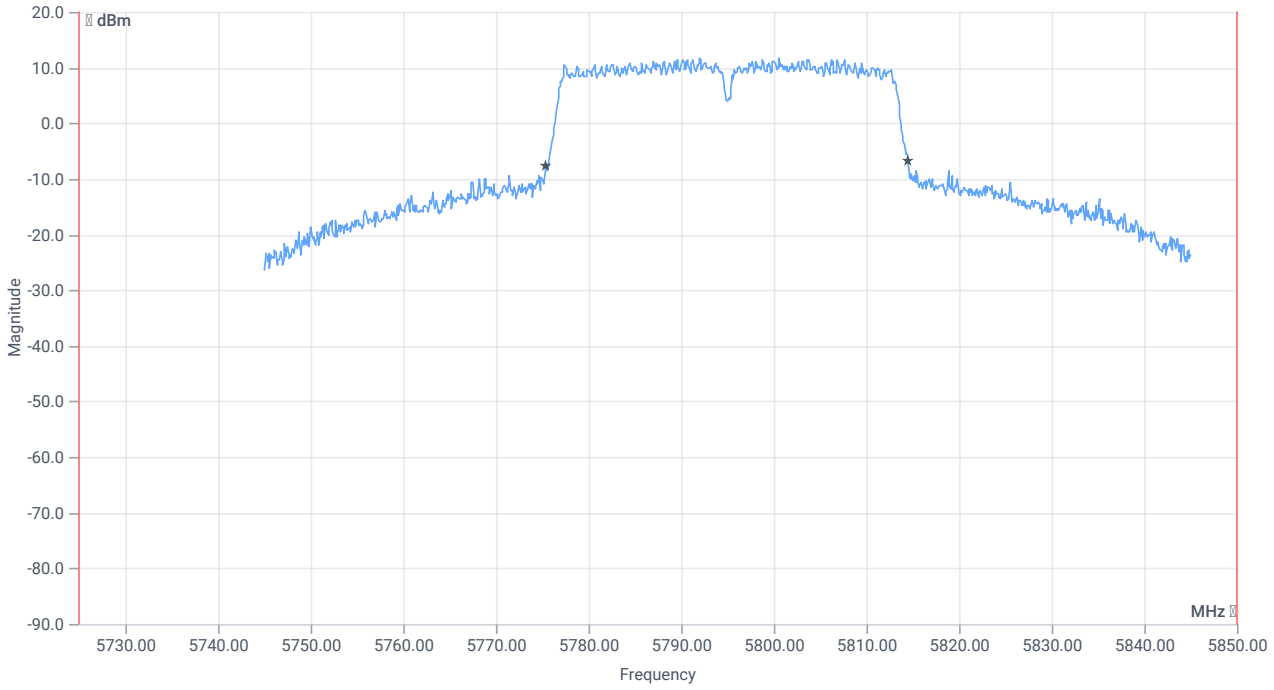
BW within Band 99PCT

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 99%	---	---	36.963	MHz	INFO
T1 99%	5725.000000	---	5776.6184	MHz	PASS
T2 99%	---	5850.000000	5813.5814	MHz	PASS



BW 20dB



BW within Band 20dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth 20dB	---	---	39.1	MHz	INFO
T1 20dB	5725.000000	---	5775.4000	MHz	PASS
T2 20dB	---	5850.000000	5814.5000	MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Minimum emission bandwidth ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 10:06:44
Ambit temp [°C] | humidity [rel%]	21.5 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	KDB789033 D02, C.2.
Description	FCC 15.407 Min Emission Bandwidth - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

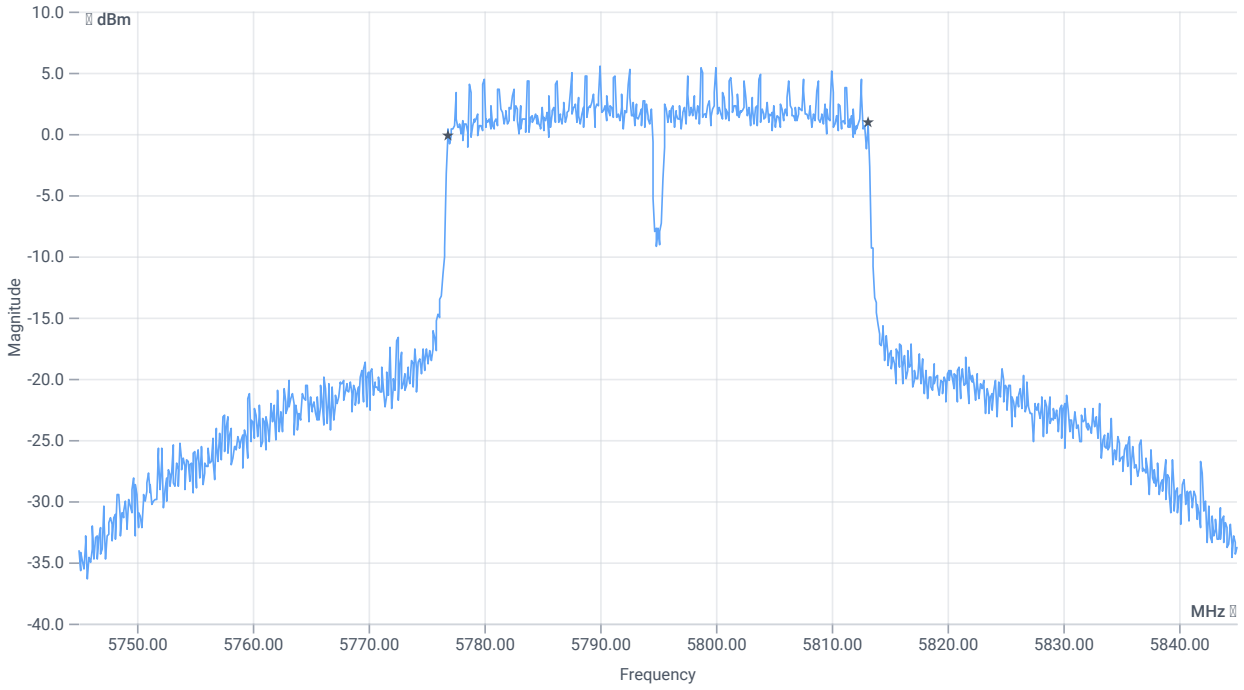
Test at TX 5795 MHz

RESULT: Reference Power cond.

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	12.78	dBm	INFO
Ref. Frequency	---	---	5798.800	MHz	INFO

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	24.78 | 16.77 | 25
Start [MHz] | Stop [MHz]	5745.000 | 5845.000
RBW [MHz] | VBW [MHz]	0.100000 | 0.300000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	2 | 1500 | 1001 | SWE



BW 6dB

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Bandwidth (6dB)	0.500	---	36.4	MHz	PASS

Verdict
PASS

FCC 15.407 # MIMO ∑ Max output power and psd ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 10:07:08
Ambit temp [°C] | humidity [rel%]	21.5 | 29
System version	4.7.1.5
Standard | Version	FCC 15.407 | NI
Method	
Description	MIMO ∑ FCC Power & psd - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	several
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	1.4
Full path name | type	None

Equipment

Test at TX 5795 MHz

RESULT Power

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 Max Output Power DC corrected	---	---	20.32	dBm	INFO
Ant:1 BW 26dB	---	---	70.640	MHz	INFO
Ant:2 Max Output Power DC corrected	---	---	19.9	dBm	INFO
Ant:2 BW 26dB	---	---	76.320	MHz	INFO
∑ Limit absolute	---	30	23.13	dBm	PASS
∑ Limit: 11 dBm + 10 log 70.64	---	29.49	23.13	dBm	na

RESULT PSD

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ant:1 PSD	---	---	2.59	dBm/0.5MHz	INFO
Ant:2 PSD	---	---	2.27	dBm/0.5MHz	INFO
∑	---	30	5.44	dBm/0.5MHz	PASS

Verdict
PASS

FCC 15.407, ISED RSS247 # Emission mask (eirp) ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 14:11:37
Ambit temp [°C] | humidity [rel%]	22.8 | 23
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	NI
Description	FCC 15.407 Emission mask - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	1
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	3.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5795 MHz

RESULT: Reference Power cond.

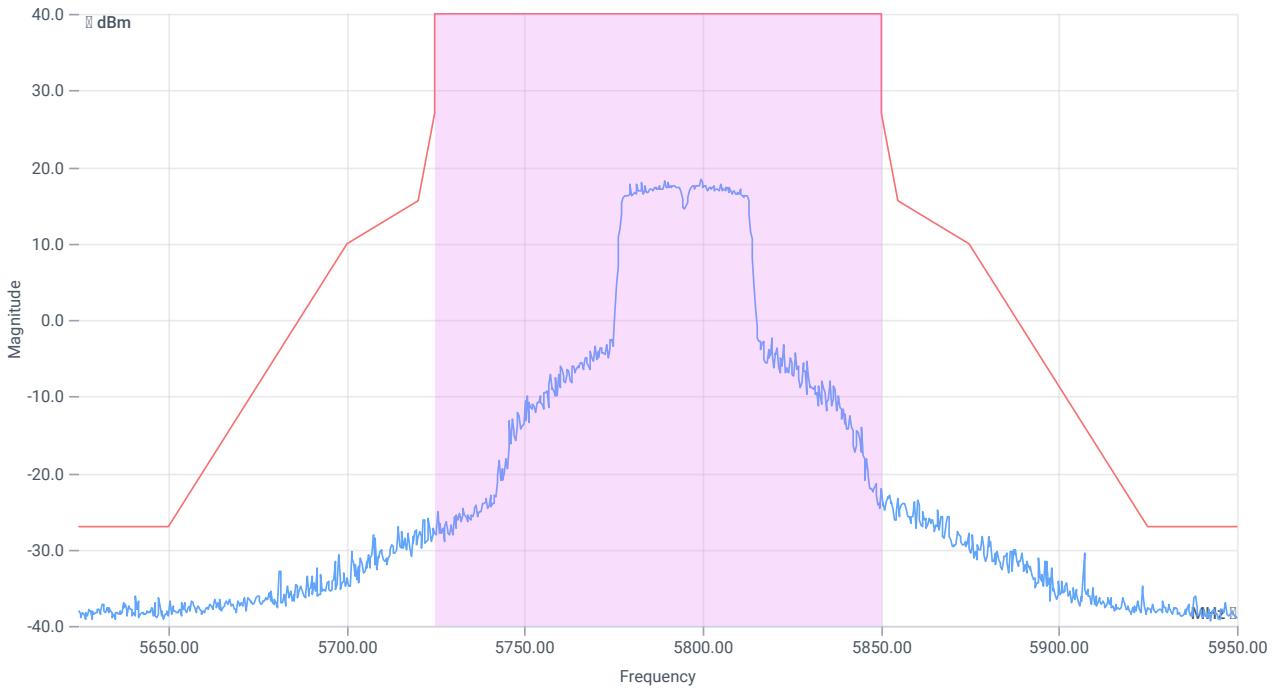
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	15.03	dBm	INFO
Ref. Frequency	---	---	5799.000	MHz	INFO

Antenna gain

Considered antenna gain [dBi]:	2 / max found in range 5625 to 5950 MHz

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	18.04 | 18.77 | 15
Start [MHz] | Stop [MHz]	5625.000 | 5950.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



Emission Mask (e.i.r.p)

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT

Verdict
PASS

FCC 15.407, ISED RSS247 # Emission mask (eirp) ~ WLAN5Gx ac-VHT40 mode U-NII-3

References

TC start	19.01.2024 14:12:15
Ambit temp [°C] | humidity [rel%]	22.8 | 23
System version	4.7.1.5
Standard | Version	FCC 15.407, ISED RSS247 | NI
Method	NI
Description	FCC 15.407 Emission mask - WLAN5Gx ac-VHT40 mode U-NII-3
Information	

EUT Common Settings WLAN5Gx

Number of Antenna Ports	2
User Interaction	No
Device Class UNII_1	Client
Limit W52 Japan	Standard

Test Parameter

Technology to test	WLAN5Gx ac-VHT40 mode
Antenna port used	2
Temperature	nom
Voltage	nom
Frequency low to test	False | Freq [MHz] 5755
Frequency mid to test	False | Freq [MHz] 0
Frequency high to test	True | Freq [MHz] 5795
Auto control enabled power supply | Climatic Box	No | No
Additional path loss [dB]	3.4
Full path name | type	EUT - SignalingUnit - SpectrumAnalyzer

Equipment

Signal analyzer,Rohde&Schwarz,FSV-40,1307.9002K40/101042,3.70
Switch matrix,CTCadvanced,SPM-4 NI DAQ,28016133,NI

Test at TX 5795 MHz

RESULT: Reference Power cond.

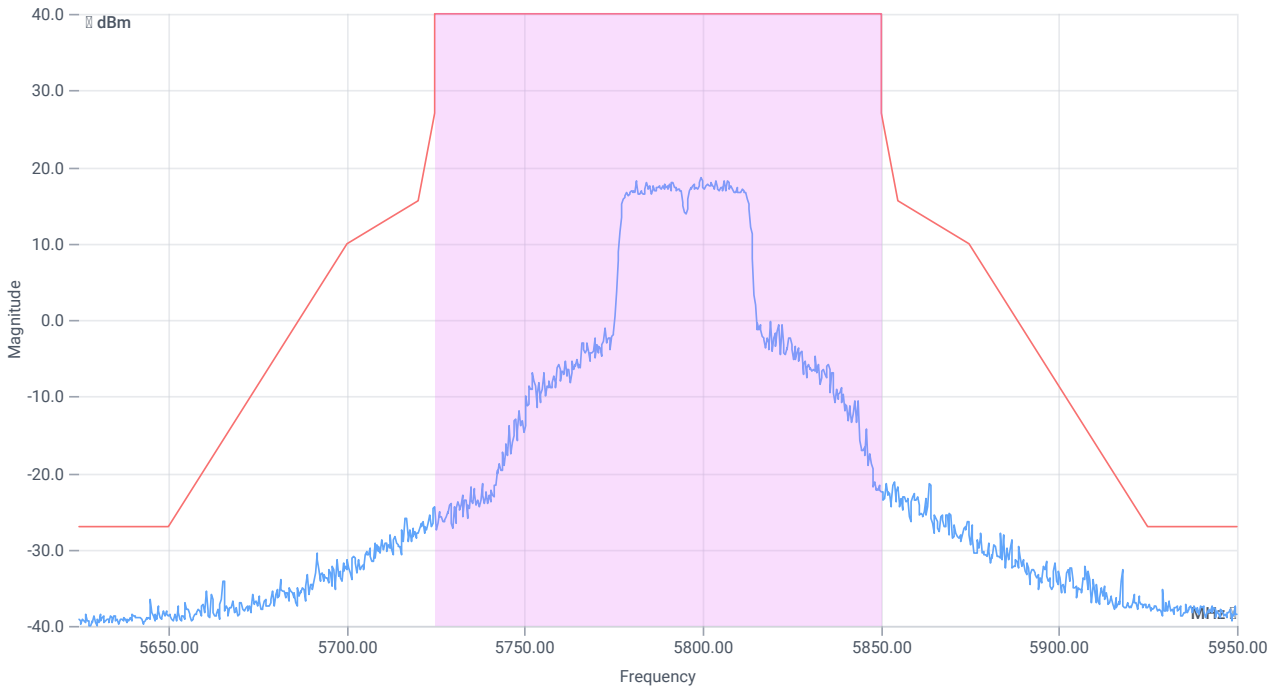
DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT
Ref. Power 1MHz/1MHz cond.	---	---	14.37	dBm	INFO
Ref. Frequency	---	---	5802.390	MHz	INFO

Antenna gain

Considered antenna gain [dBi]:	2 / max found in range 5625 to 5950 MHz

READ SA SETTINGS:

RefLevel [dBm] | RefLevelOffset [dB] | InpAtt [dB]	17.37 | 18.77 | 15
Start [MHz] | Stop [MHz]	5625.000 | 5950.000
RBW [MHz] | VBW [MHz]	1.000000 | 3.000000
Detector | TraceMode	POS | MAXH
Sweep: time [ms] | count | points per Section | type	1 | 2500 | 1001 | SWE



Emission Mask (e.i.r.p)

RESULT

DESCRIPTION	LOWER LIMIT	UPPER LIMIT	MEASURED	UNIT	VERDICT

Verdict
PASS

- END OF DOCUMENT -