MAXIMUM POWER SPECTRAL DENSITY

element
TbtTx 2024.05.24.1
WTD.2024.01.16.0

TEST DESCRIPTION

Testing was performed using the mode(s) of operation and configuration(s) noted within the report. The individuals and/or the organization requesting the test provided the modes, configurations and settings used to complete the evaluation. The actual test parameters are specified in the test data, this includes items such as investigated frequency range (scanned) and test levels. The testing methods and performance specifications, as well as the test site used for the evaluation are indicated in the test data.

The measurement was made using a direct connection between the RF output of the EUT and a spectrum analyzer.

The transmit frequency was set to the required channels in each band. The transmit power was set to its default maximum. The radio was operated in the modes as shown in the following data sheets.

The maximum power spectral density was measured using ANSI C63.10:2013, Clause 12.3.2.3, Method SA-2 (RMS detection and trace averaging across the on and off times of the EUT transmission and use of a duty cycle correction factor), consistent with the method used for maximum conducted output power.

The spectrum analyzer settings were set to:

- Span set to encompass the entire 99% OBW of the signal
- RBW = 1 MHz (500 kHz in the 5.725-5.85 GHz band)
- VBW = 3 MHz (1.5 MHz in the 5.725-5.85 GHz band)
- RMS Detector
- Trace average 100 traces in power averaging mode

The marker peak search function of the analyzer as used to determine to be the highest level found across the emission in any 1 MHz/500kHz segment after 100 sweeps of power averaging (not video averaging).

A duty cycle correction factor was added to the measurement using the results of the formula of 10*LOG(1/D) where D is the duty cycle.

- In the 5.15 – 5.25GHz, the maximum permissible power spectral density is 11dBm/MHz for the FCC and not applicable for ISED.
- In the 5.25 – 5.35GHz, 5.47 – 5.725GHz bands, the maximum permissible power spectral density is 11dBm/MHz
- In the 5.725 – 5.850GHz band, the maximum permissible power spectral density is 30dBm/500kHz.

The worst case limits are shown on the following datasheet.

TEST EQUIPMENT

Description	Manufacturer	Model	ID	Last Cal.	Cal. Due
Analyzer - Spectrum Analyzer	Keysight	N9010A	AFM	2024-05-22	2025-05-22
Generator - Signal	Agilent	N5183A	TIK	2022-01-24	2025-01-24
Cable	Micro-Coax	UFD150A-1-0720-200200	MNL	2023-09-05	2024-09-05
Block - DC	Fairview Microwave	SD3379	ANH	2023-09-05	2024-09-05
Attenuator	Fairview Microwave	SA4014-20	AQI	2023-09-05	2024-09-05

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EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005204	Date:	2024-07-23
Customer:	Ademco, Inc.	Temperature:	21.9°C
Attendees:	None	Relative Humidity:	57.2%
Customer Project:	None	Bar. Pressure (PMSL):	1016 mbar
Tested By:	Christopher Heintzelman, Arnauld Dedry	Job Site:	MN11
Power:	110VAC/60Hz	Configuration:	ADEM0044-1

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

COMMENTS

Reference level offset includes attenuator, measurement cable, and DC block.

DEVIATIONS FROM TEST STANDARD

None

CONCLUSION

Pass

Tested By

TEST RESULTS

	Power (dBm/Ref BW)	Duty Cycle Factor (dB)	Density (dBm/Ref BW)	Limit ≤ (dBm/Ref BW)	Results
5150 - 5250 MHz Band, UNII-1, 20 MHz					
Mid Channel, Ch 40 - 5200 MHz					
802.11(a) 6 Mbps	5.219	0.3	5.5	11	Pass
802.11(a) 36 Mbps	2.316	1.3	3.6	11	Pass
802.11(a) 54 Mbps	1.133	1.8	2.9	11	Pass
802.11(n) MCS0	4.072	0.3	4.4	11	Pass
802.11(n) MCS7	-0.299	2	1.7	11	Pass
High Channel, Ch 48 - 5240 MHz					
802.11(a) 6 Mbps	6.146	0.3	6.4	11	Pass
802.11(a) 36 Mbps	2.715	1.3	4	11	Pass
802.11(a) 54 Mbps	1.432	1.8	3.2	11	Pass
802.11(n) MCS0	4.338	0.3	4.6	11	Pass
802.11(n) MCS7	-0.292	2	1.7	11	Pass
5250 - 5350 MHz Band,UNII-2A, 20 MHz					
Low Channel, Ch 52 - 5260 MHz					
802.11(a) 6 Mbps	6.101	0.3	6.4	11	Pass
802.11(a) 36 Mbps	2.699	1.3	4	11	Pass
802.11(a) 54 Mbps	1.34	1.8	3.1	11	Pass
802.11(n) MCS0	4.012	0.3	4.3	11	Pass
802.11(n) MCS7	-0.165	2	1.8	11	Pass
Mid Channel, Ch 60 - 5300 MHz					

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	Power (dBm/Ref BW)	Duty Cycle Factor (dB)	Density (dBm/Ref BW)	Limit ≤ (dBm/Ref BW)	Results
802.11(a) 6 Mbps	5.172	0.3	5.5	11	Pass
802.11(a) 36 Mbps	3.042	1.3	4.3	11	Pass
802.11(a) 54 Mbps	1.72	1.8	3.5	11	Pass
802.11(n) MCS0	4.453	0.3	4.8	11	Pass
802.11(n) MCS7	0.213	2	2.2	11	Pass
High Channel, Ch 64 - 5320 MHz					
802.11(a) 6 Mbps	4.566	0.3	4.9	11	Pass
802.11(a) 36 Mbps	2.769	1.3	4.1	11	Pass
802.11(a) 54 Mbps	1.595	1.8	3.4	11	Pass
802.11(n) MCS0	3.822	0.3	4.1	11	Pass
802.11(n) MCS7	0.118	2	2.1	11	Pass
5470 - 5725 MHz Band,UNII-2C, 20 MHz					
Low Channel, Ch 100 - 5500 MHz					
802.11(a) 6 Mbps	5.009	0.3	5.3	11	Pass
802.11(a) 36 Mbps	2.961	1.3	4.3	11	Pass
802.11(a) 54 Mbps	1.44	1.8	3.2	11	Pass
802.11(n) MCS0	4.359	0.3	4.7	11	Pass
802.11(n) MCS7	0.246	2	2.2	11	Pass
Mid Channel, Ch 116 - 5580 MHz					
802.11(a) 6 Mbps	4.524	0.3	4.8	11	Pass
802.11(a) 36 Mbps	1.94	1.3	3.2	11	Pass
802.11(a) 54 Mbps	0.78	1.8	2.6	11	Pass
802.11(n) MCS0	3.722	0.3	4	11	Pass
802.11(n) MCS7	-0.513	2	1.5	11	Pass
High Channel, Ch 140 - 5700 MHz					
802.11(a) 6 Mbps	2.091	0.3	2.4	11	Pass
802.11(a) 36 Mbps	1.419	1.3	2.7	11	Pass
802.11(a) 54 Mbps	0.599	1.8	2.4	11	Pass
802.11(n) MCS0	2.323	0.3	2.6	11	Pass
802.11(n) MCS7	-0.728	2	1.3	11	Pass
5725 - 5785 MHz Band					
Low Channel, Ch 149 - 5745 MHz					
802.11(a) 6 Mbps	2.5	0.3	2.8	30	Pass
802.11(a) 36 Mbps	-0.958	1.3	0.3	30	Pass
802.11(a) 54 Mbps	-2.246	1.8	-0.4	30	Pass
802.11(n) MCS0	0.276	0.3	0.6	30	Pass
802.11(n) MCS7	-3.76	2	-1.8	30	Pass
Mid Channel, Ch 157 - 5785 MHz					
802.11(a) 6 Mbps	1.884	0.3	2.2	30	Pass
802.11(a) 36 Mbps	-2.018	1.3	-0.7	30	Pass
802.11(a) 54 Mbps	-2.799	1.8	-1	30	Pass
802.11(n) MCS0	-0.191	0.3	0.1	30	Pass

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	Power (dBm/Ref BW)	Duty Cycle Factor (dB)	Density (dBm/Ref BW)	Limit ≤ (dBm/Ref BW)	Results
802.11(n) MCS7	-4.277	1.9	-2.4	30	Pass
High Channel, Ch 165 - 5825 MHz					
802.11(a) 6 Mbps	2.782	0.3	3.1	30	Pass
802.11(a) 36 Mbps	-0.402	1.3	0.9	30	Pass
802.11(a) 54 Mbps	-2.034	1.8	-0.2	30	Pass
802.11(n) MCS0	0.54	0.3	0.8	30	Pass
802.11(n) MCS7	-3.367	2	-1.4	30	Pass

MAXIMUM POWER SPECTRAL DENSITY

element
TbtTx 2024.05.24.1
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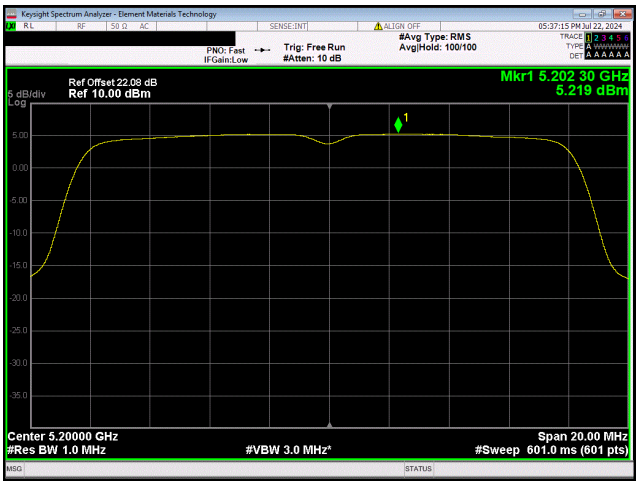
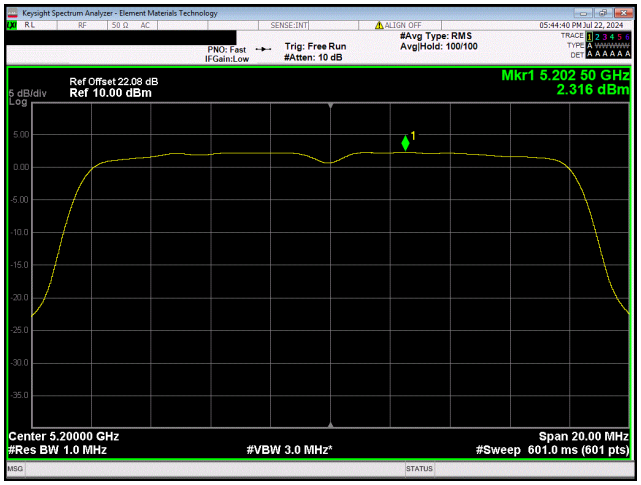
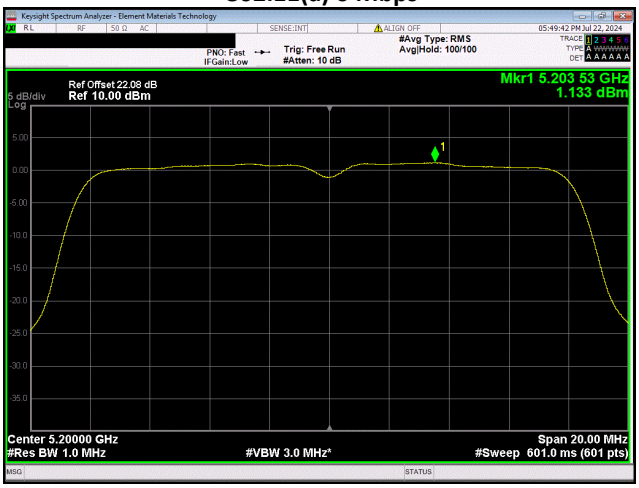


5150 - 5250 MHz Band, UNII-1, 20 MHz
Mid Channel, Ch 40 - 5200 MHz
802.11(a) 6 Mbps



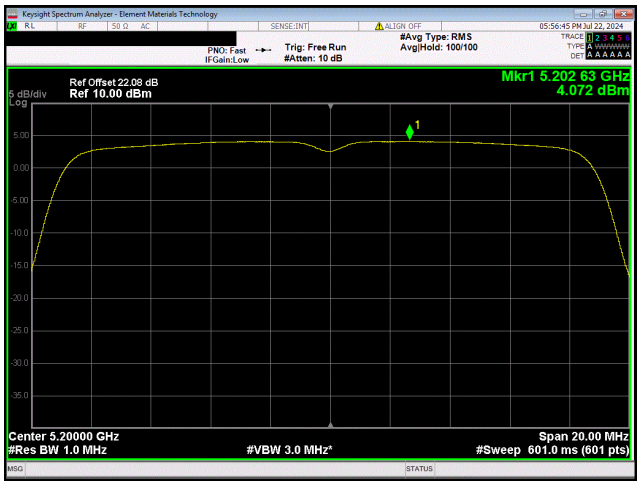
5150 - 5250 MHz Band, UNII-1, 20 MHz
Mid Channel, Ch 40 - 5200 MHz
802.11(a) 36 Mbps



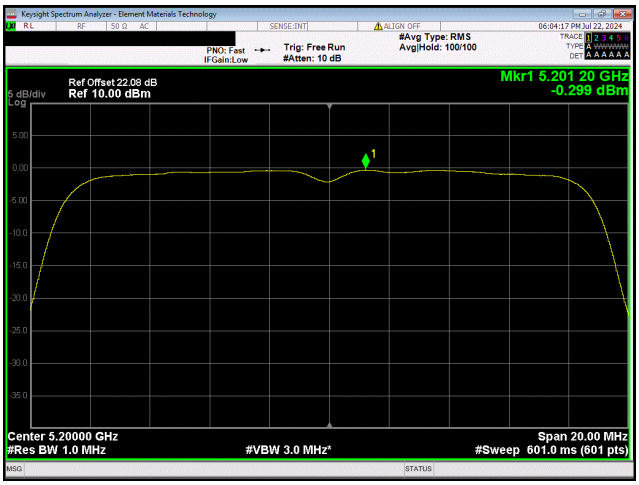
5150 - 5250 MHz Band, UNII-1, 20 MHz
Mid Channel, Ch 40 - 5200 MHz
802.11(a) 54 Mbps

MAXIMUM POWER SPECTRAL DENSITY

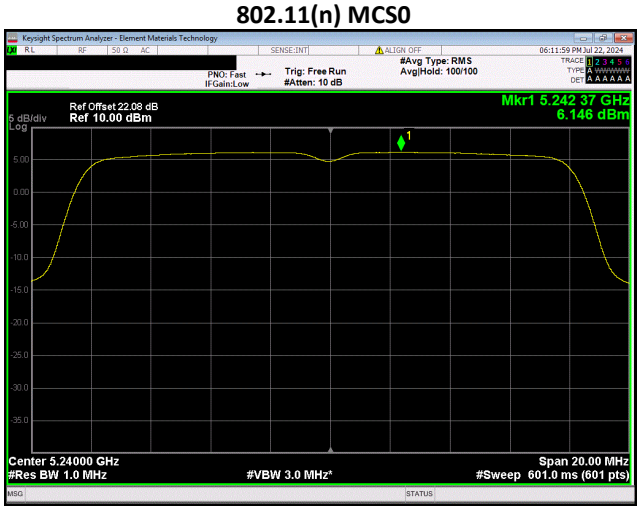
element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



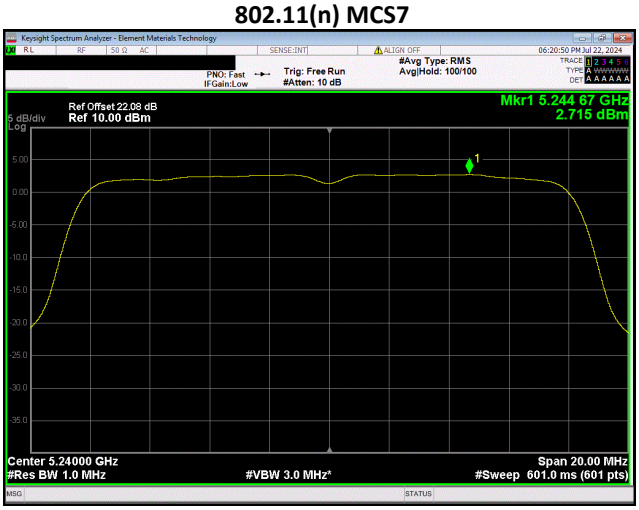
5150 - 5250 MHz Band, UNII-1, 20 MHz
Mid Channel, Ch 40 - 5200 MHz
802.11(n) MCS0



5150 - 5250 MHz Band, UNII-1, 20 MHz
Mid Channel, Ch 40 - 5200 MHz
802.11(n) MCS7



5150 - 5250 MHz Band, UNII-1, 20 MHz
High Channel, Ch 48 - 5240 MHz
802.11(a) 6 Mbps



5150 - 5250 MHz Band, UNII-1, 20 MHz
High Channel, Ch 48 - 5240 MHz
802.11(a) 36 Mbps

MAXIMUM POWER SPECTRAL DENSITY

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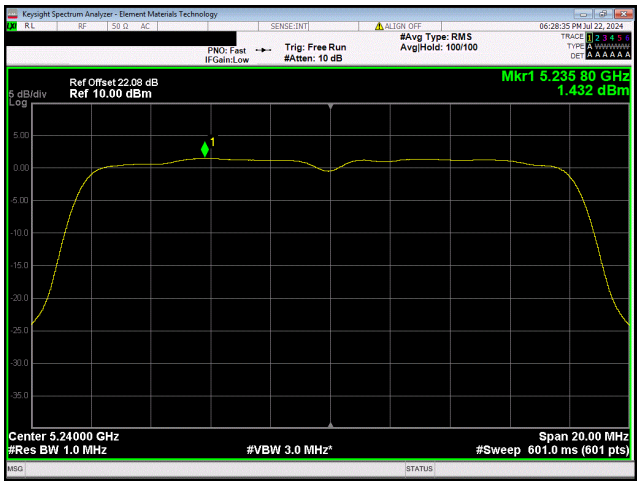
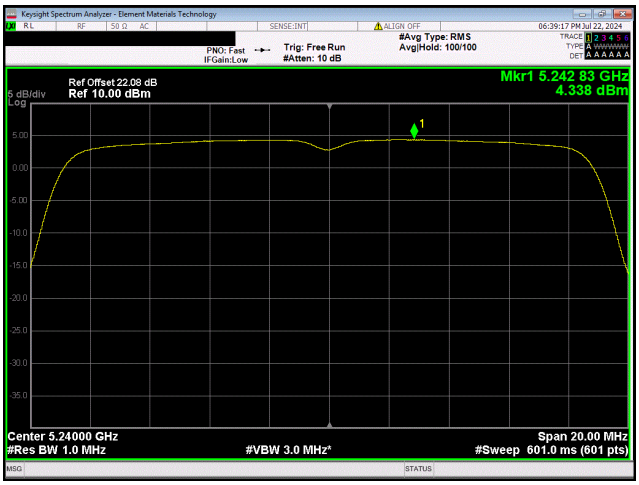
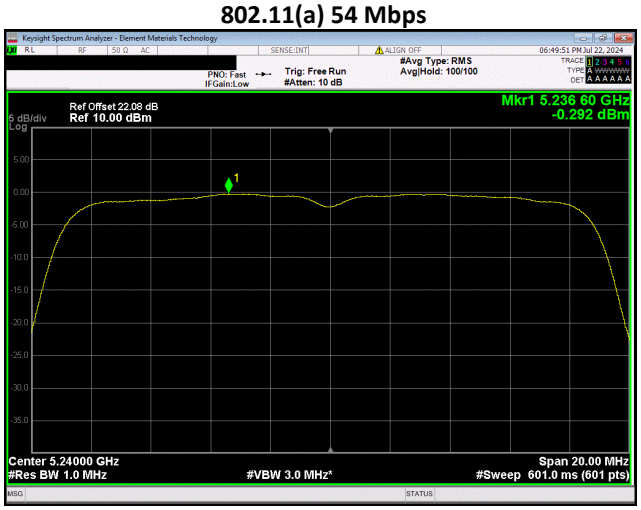


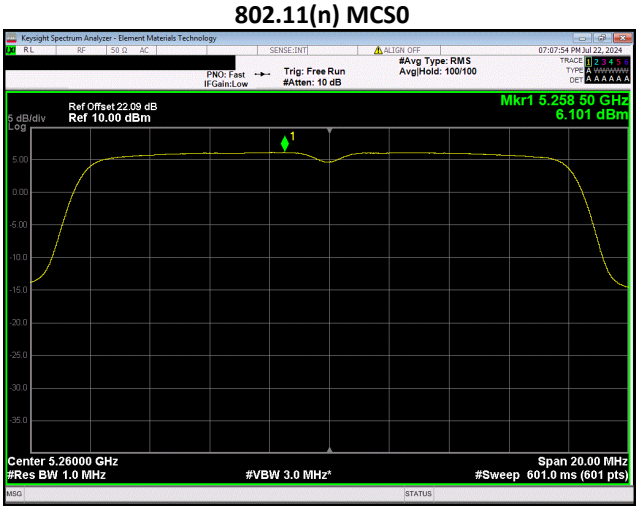
5150 - 5250 MHz Band, UNII-1, 20 MHz
High Channel, Ch 48 - 5240 MHz
802.11(a) 54 Mbps



5150 - 5250 MHz Band, UNII-1, 20 MHz
High Channel, Ch 48 - 5240 MHz
802.11(n) MCS0



5150 - 5250 MHz Band, UNII-1, 20 MHz
High Channel, Ch 48 - 5240 MHz
802.11(n) MCS7



5250 - 5350 MHz Band,UNII-2A, 20 MHz
Low Channel, Ch 52 - 5260 MHz
802.11(a) 6 Mbps

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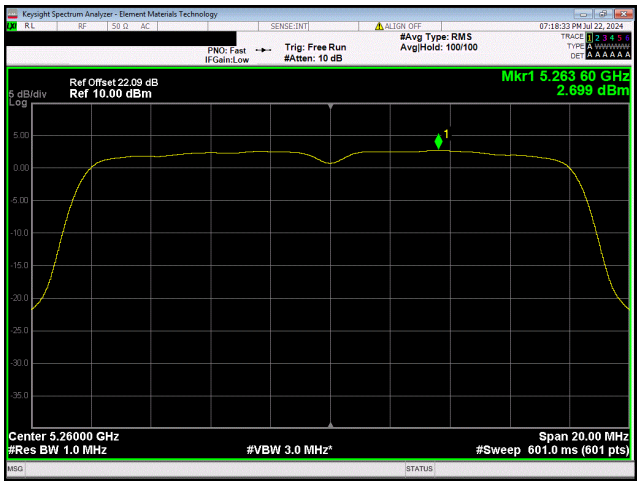
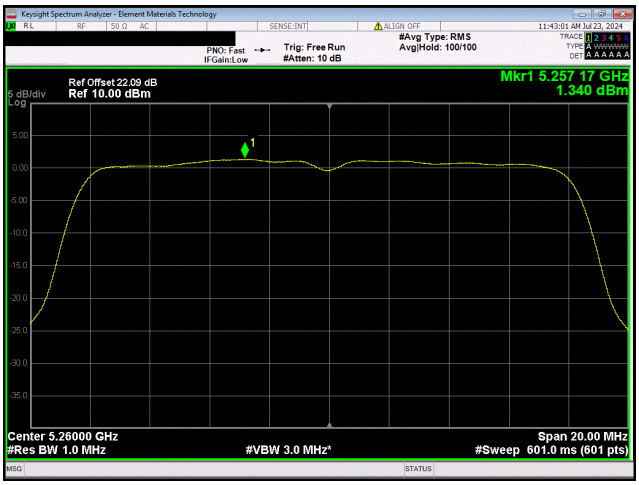
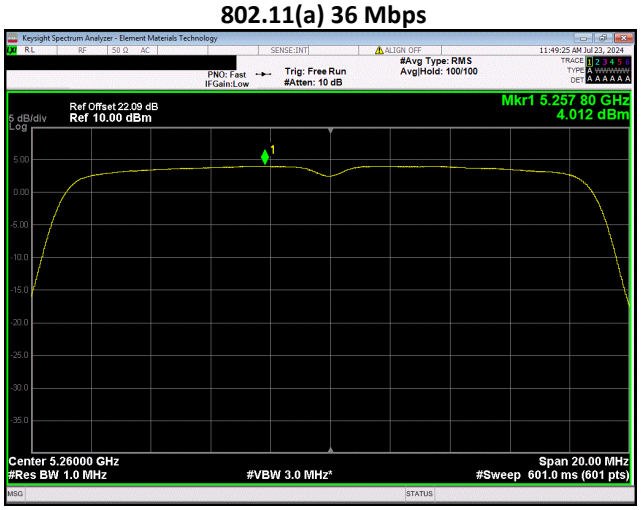


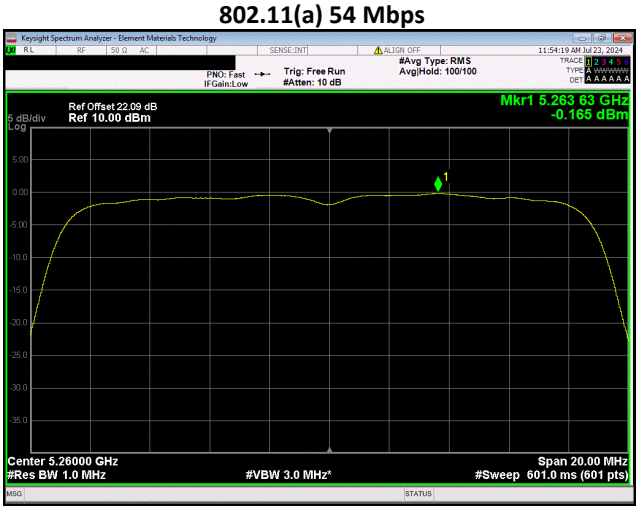
5250 - 5350 MHz Band,UNII-2A, 20 MHz
Low Channel, Ch 52 - 5260 MHz
802.11(a) 36 Mbps



5250 - 5350 MHz Band,UNII-2A, 20 MHz
Low Channel, Ch 52 - 5260 MHz
802.11(a) 54 Mbps



5250 - 5350 MHz Band,UNII-2A, 20 MHz
Low Channel, Ch 52 - 5260 MHz
802.11(n) MCS0



5250 - 5350 MHz Band,UNII-2A, 20 MHz
Low Channel, Ch 52 - 5260 MHz
802.11(n) MCS7

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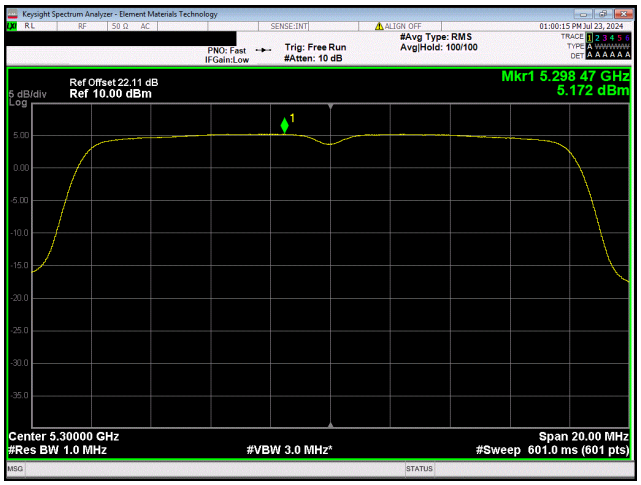
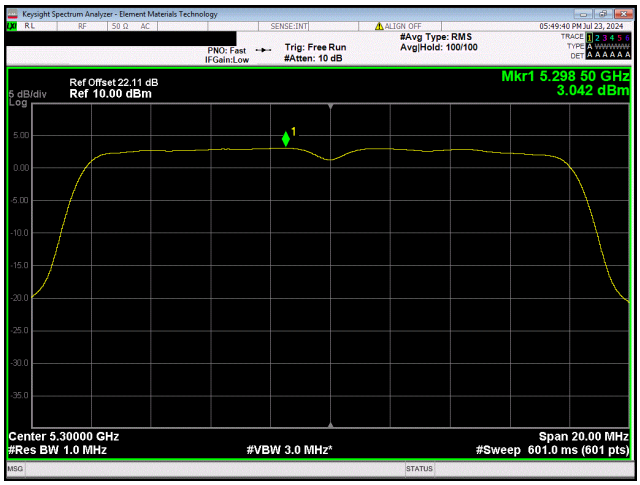
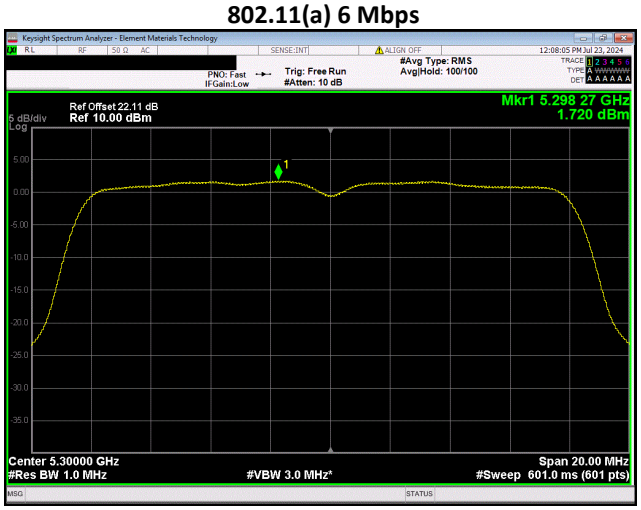


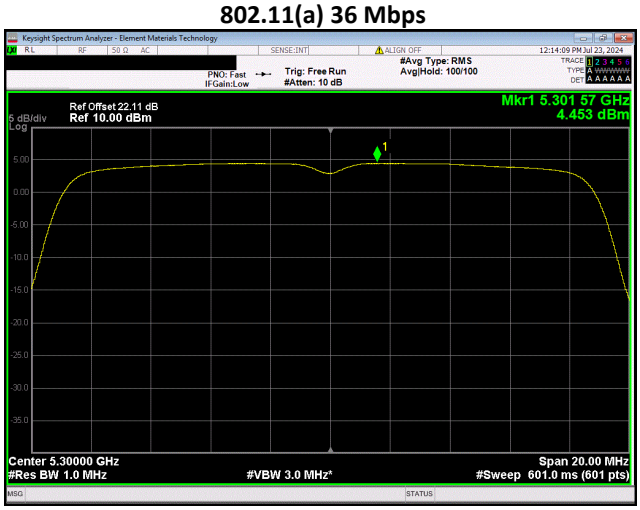
5250 - 5350 MHz Band,UNII-2A, 20 MHz
Mid Channel, Ch 60 - 5300 MHz
802.11(a) 6 Mbps



5250 - 5350 MHz Band,UNII-2A, 20 MHz
Mid Channel, Ch 60 - 5300 MHz
802.11(a) 36 Mbps



5250 - 5350 MHz Band,UNII-2A, 20 MHz
Mid Channel, Ch 60 - 5300 MHz
802.11(a) 54 Mbps



5250 - 5350 MHz Band,UNII-2A, 20 MHz
Mid Channel, Ch 60 - 5300 MHz
802.11(n) MCS0

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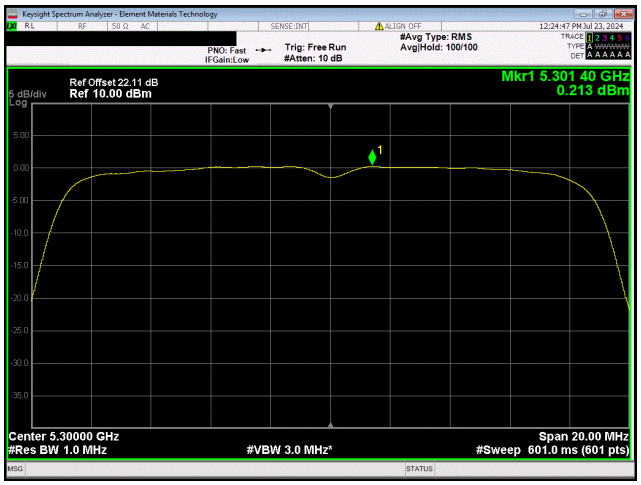
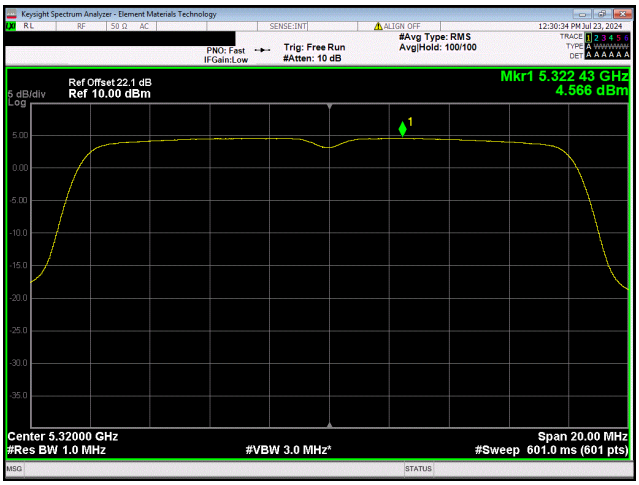
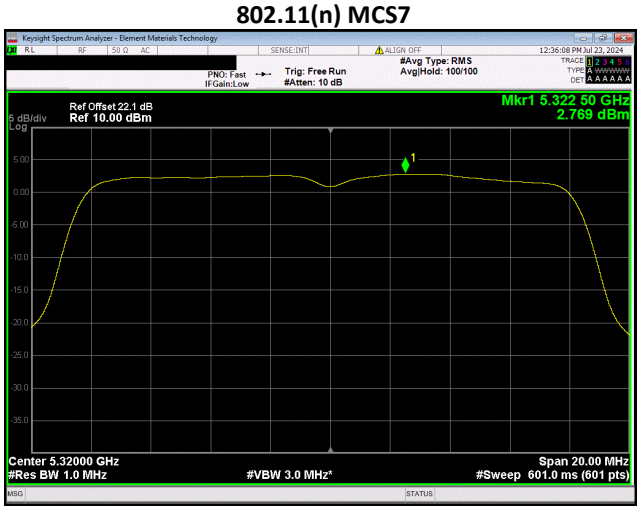


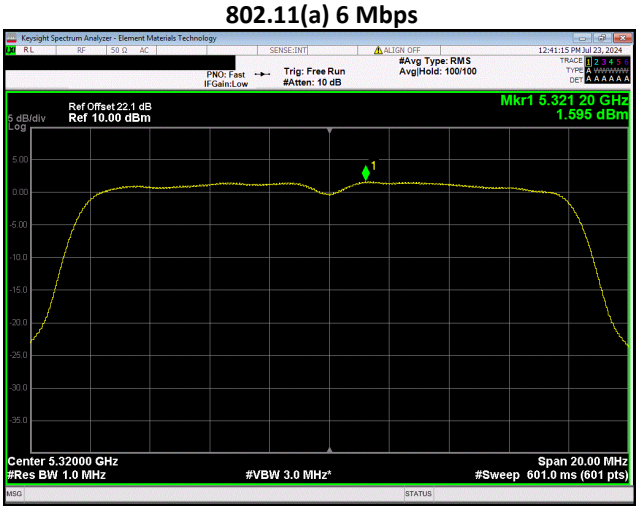
5250 - 5350 MHz Band,UNII-2A, 20 MHz
Mid Channel, Ch 60 - 5300 MHz
802.11(n) MCS7



5250 - 5350 MHz Band,UNII-2A, 20 MHz
High Channel, Ch 64 - 5320 MHz
802.11(a) 6 Mbps



5250 - 5350 MHz Band,UNII-2A, 20 MHz
High Channel, Ch 64 - 5320 MHz
802.11(a) 36 Mbps



5250 - 5350 MHz Band,UNII-2A, 20 MHz
High Channel, Ch 64 - 5320 MHz
802.11(a) 54 Mbps

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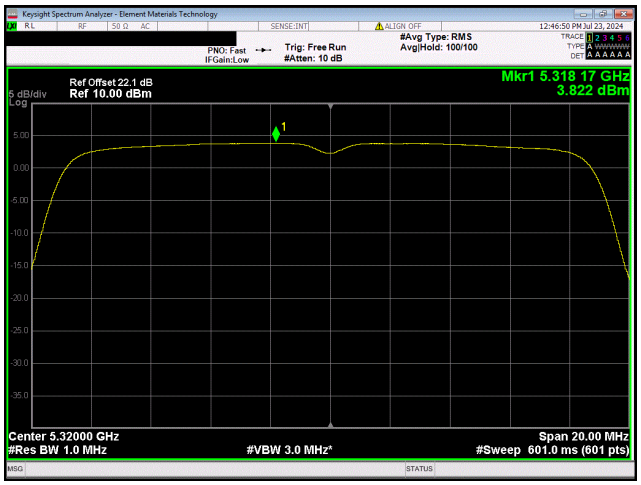
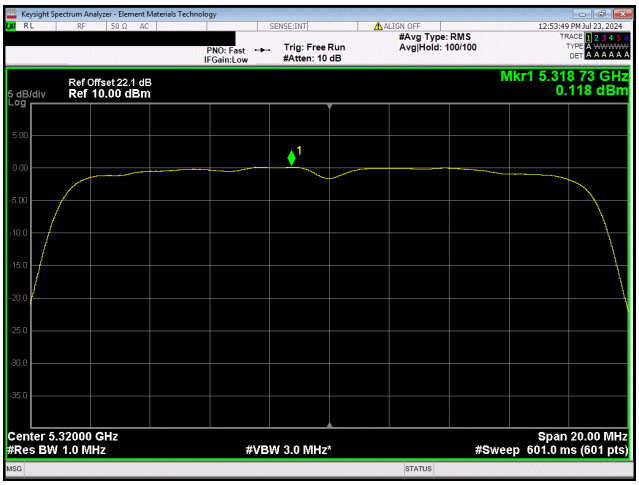
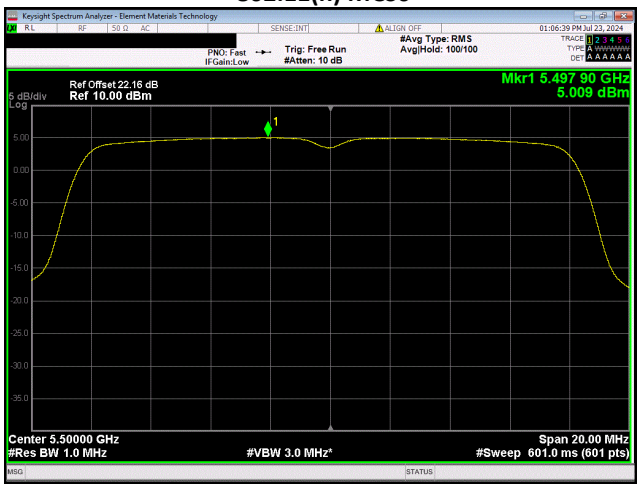


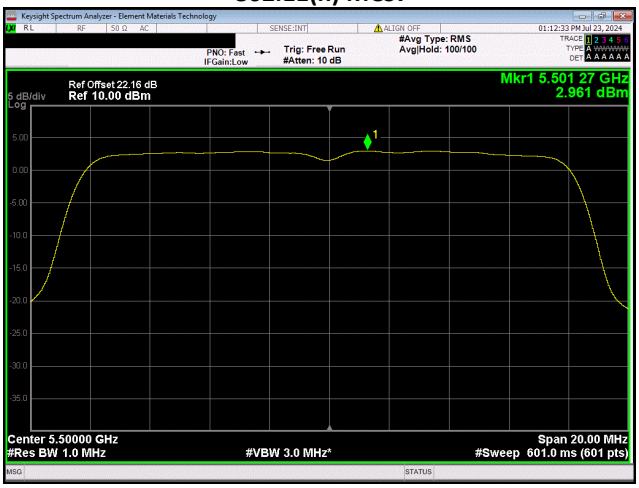
5250 - 5350 MHz Band,UNII-2A, 20 MHz
High Channel, Ch 64 - 5320 MHz
802.11(n) MCS0



5250 - 5350 MHz Band,UNII-2A, 20 MHz
High Channel, Ch 64 - 5320 MHz
802.11(n) MCS7



5470 - 5725 MHz Band,UNII-2C, 20 MHz
Low Channel, Ch 100 - 5500 MHz
802.11(a) 6 Mbps



5470 - 5725 MHz Band,UNII-2C, 20 MHz
Low Channel, Ch 100 - 5500 MHz
802.11(a) 36 Mbps

MAXIMUM POWER SPECTRAL DENSITY

element
TbtTx 2024.05.24.1
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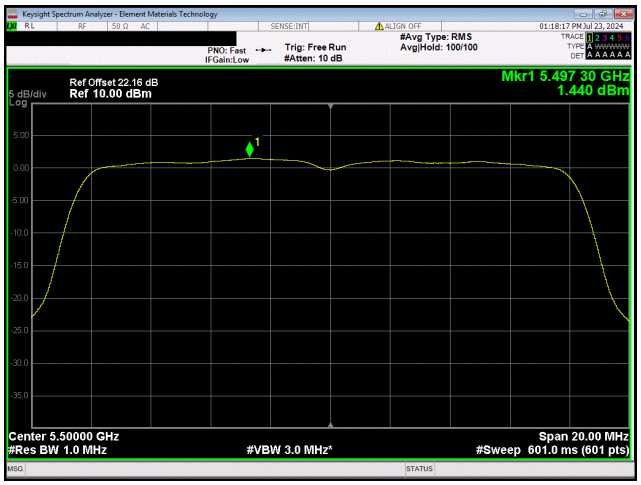
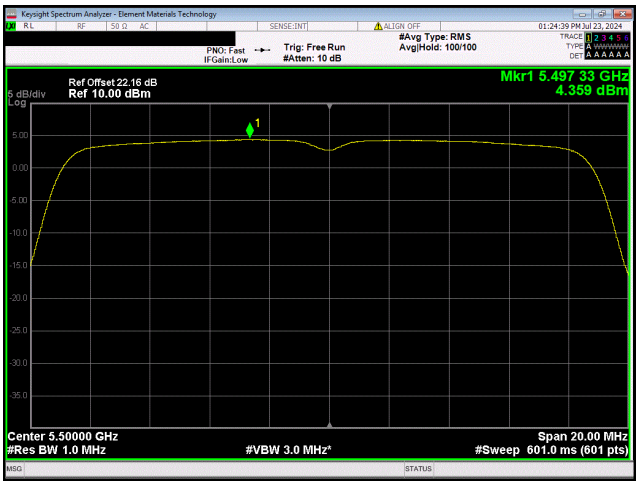
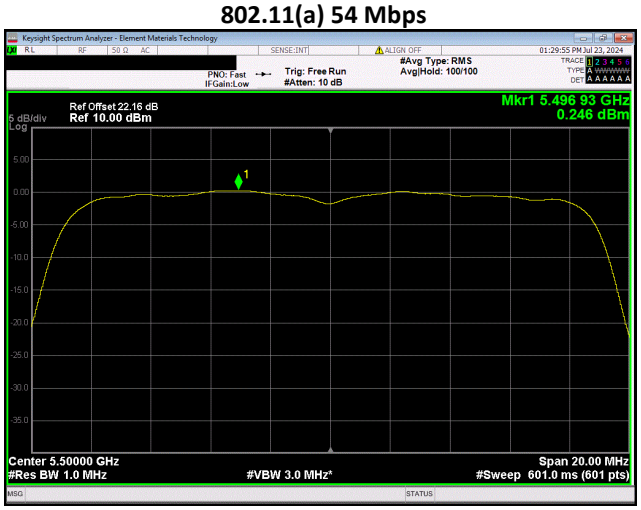


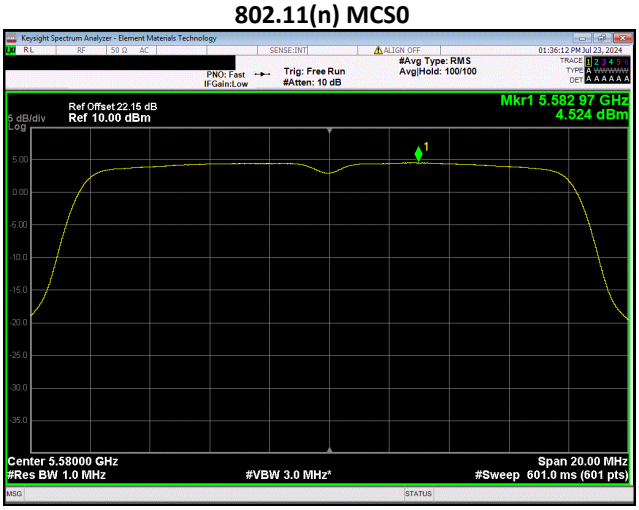
5470 - 5725 MHz Band,UNII-2C, 20 MHz
Low Channel, Ch 100 - 5500 MHz
802.11(a) 54 Mbps



5470 - 5725 MHz Band,UNII-2C, 20 MHz
Low Channel, Ch 100 - 5500 MHz
802.11(n) MCS0



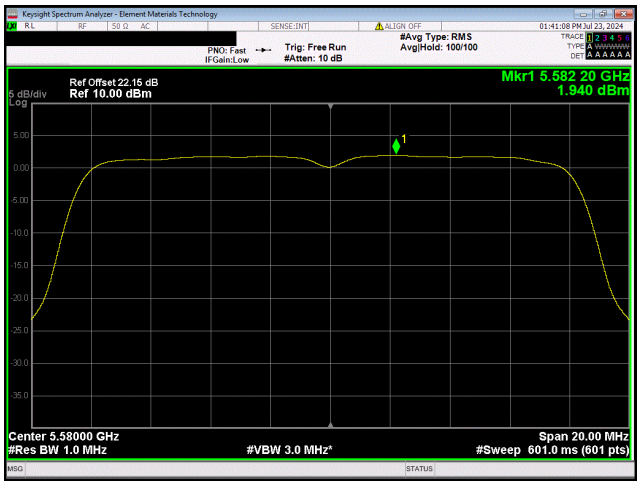
5470 - 5725 MHz Band,UNII-2C, 20 MHz
Low Channel, Ch 100 - 5500 MHz
802.11(n) MCS7



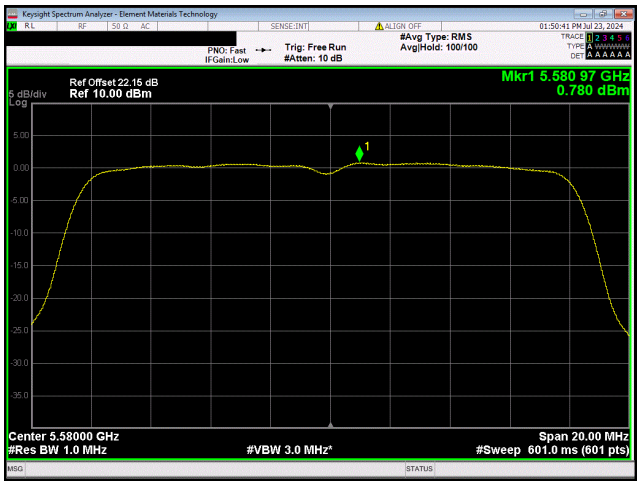
5470 - 5725 MHz Band,UNII-2C, 20 MHz
Mid Channel, Ch 116 - 5580 MHz
802.11(a) 6 Mbps

MAXIMUM POWER SPECTRAL DENSITY

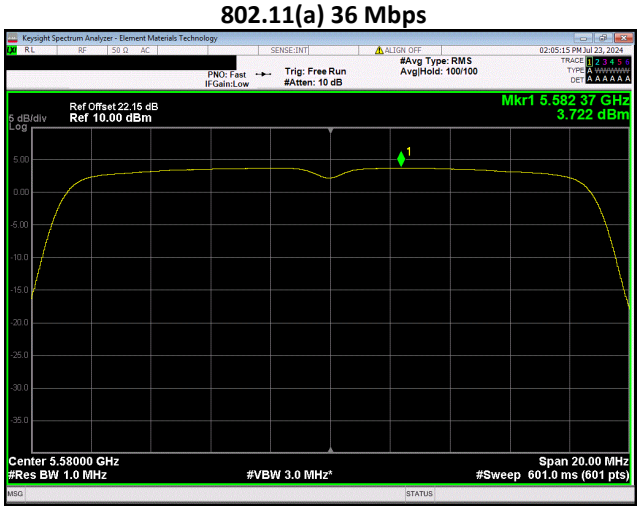
element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



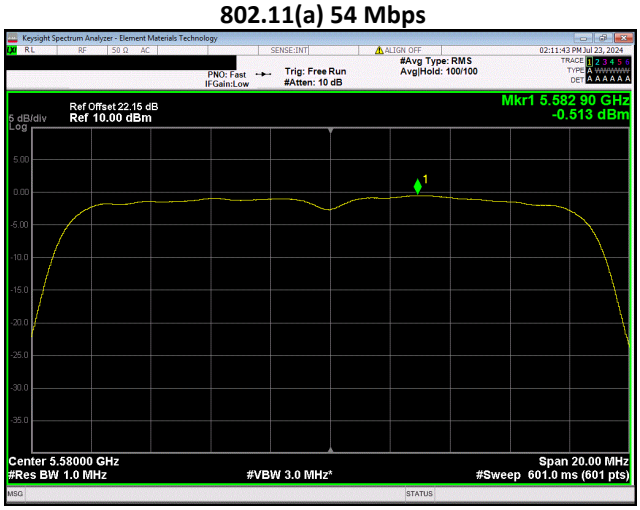
5470 - 5725 MHz Band,UNII-2C, 20 MHz
Mid Channel, Ch 116 - 5580 MHz
802.11(a) 36 Mbps



5470 - 5725 MHz Band,UNII-2C, 20 MHz
Mid Channel, Ch 116 - 5580 MHz
802.11(a) 54 Mbps



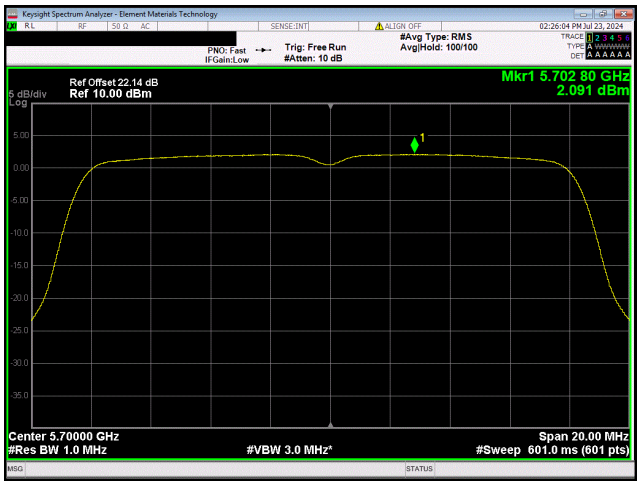
5470 - 5725 MHz Band,UNII-2C, 20 MHz
Mid Channel, Ch 116 - 5580 MHz
802.11(n) MCS0



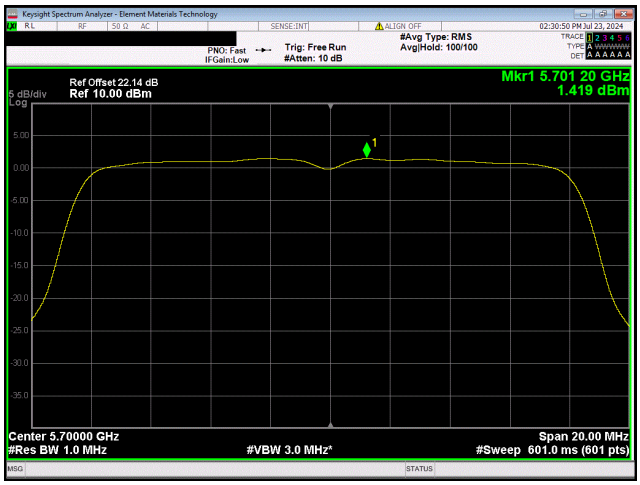
5470 - 5725 MHz Band,UNII-2C, 20 MHz
Mid Channel, Ch 116 - 5580 MHz
802.11(n) MCS7

MAXIMUM POWER SPECTRAL DENSITY

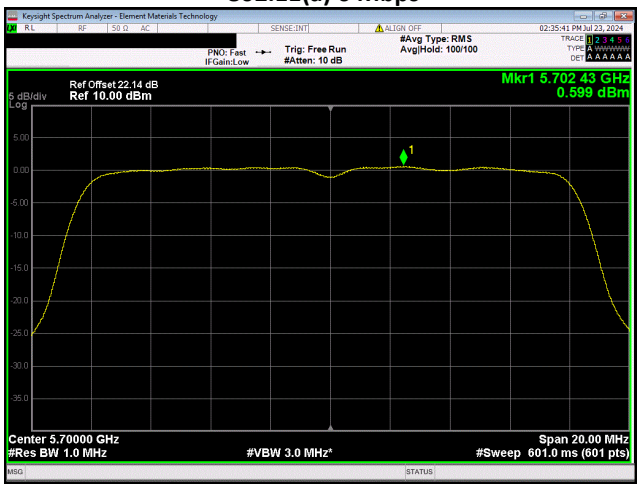
element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



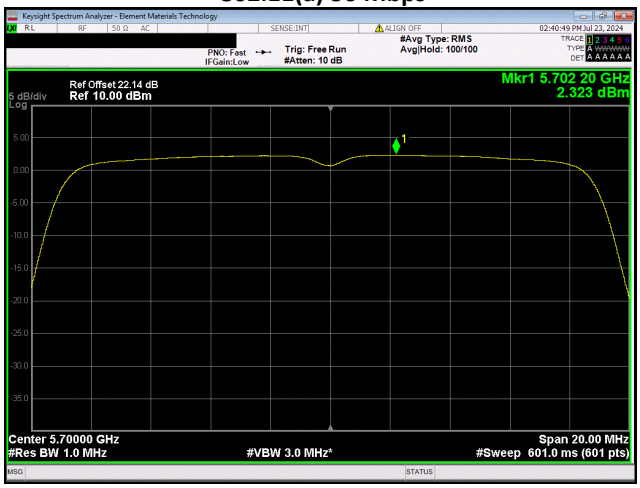
5470 - 5725 MHz Band,UNII-2C, 20 MHz
High Channel, Ch 140 - 5700 MHz
802.11(a) 6 Mbps



5470 - 5725 MHz Band,UNII-2C, 20 MHz
High Channel, Ch 140 - 5700 MHz
802.11(a) 36 Mbps



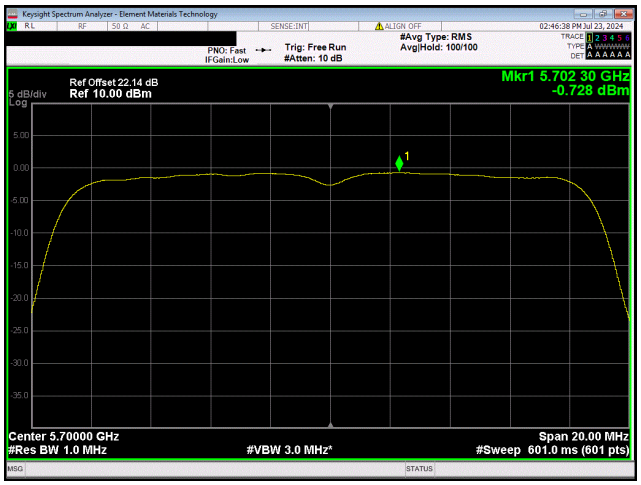
5470 - 5725 MHz Band,UNII-2C, 20 MHz
High Channel, Ch 140 - 5700 MHz
802.11(a) 54 Mbps



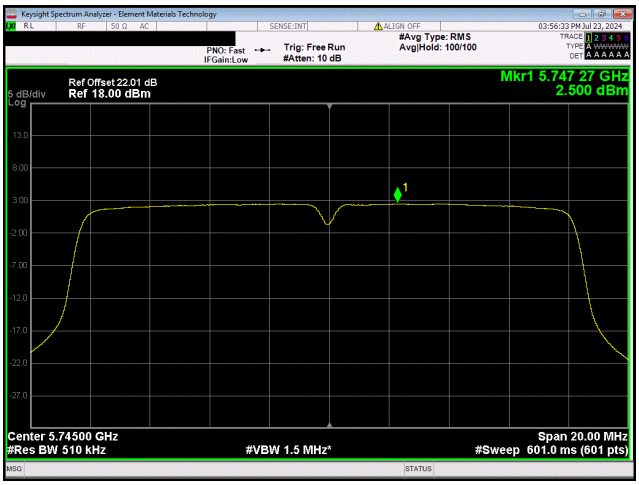
5470 - 5725 MHz Band,UNII-2C, 20 MHz
High Channel, Ch 140 - 5700 MHz
802.11(n) MCS0

MAXIMUM POWER SPECTRAL DENSITY

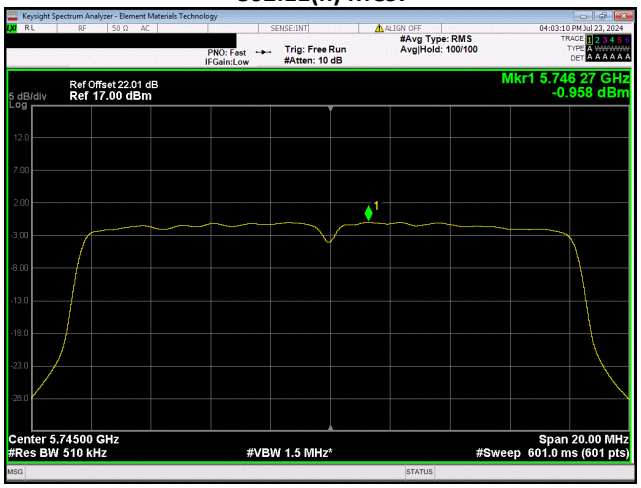
element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



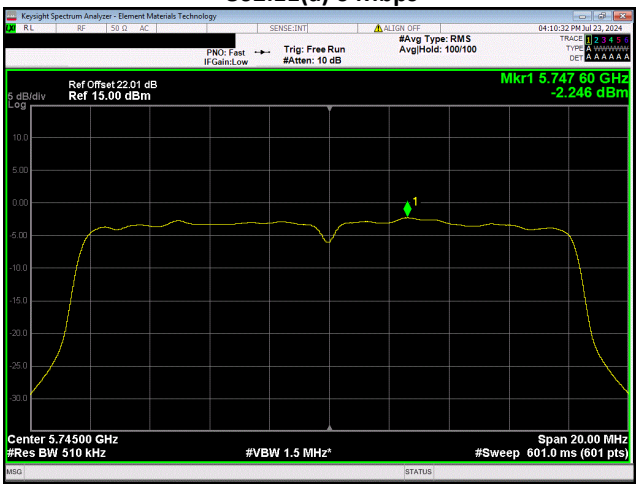
5470 - 5725 MHz Band,UNII-2C, 20 MHz
High Channel, Ch 140 - 5700 MHz
802.11(n) MCS7



5725 - 5785 MHz Band
Low Channel, Ch 149 - 5745 MHz
802.11(a) 6 Mbps



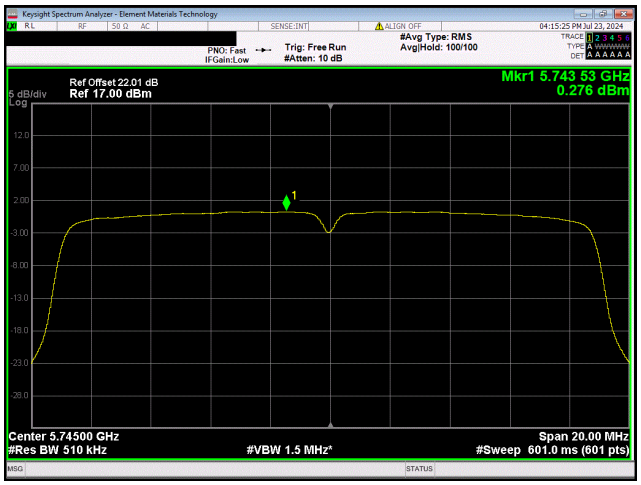
5725 - 5785 MHz Band
Low Channel, Ch 149 - 5745 MHz
802.11(a) 36 Mbps



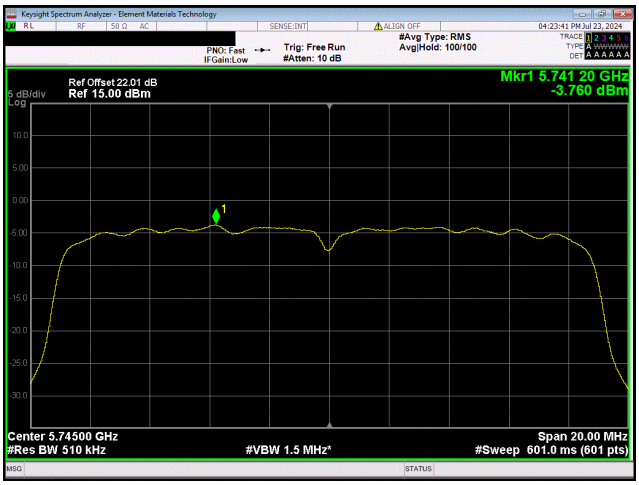
5725 - 5785 MHz Band
Low Channel, Ch 149 - 5745 MHz
802.11(a) 54 Mbps

MAXIMUM POWER SPECTRAL DENSITY

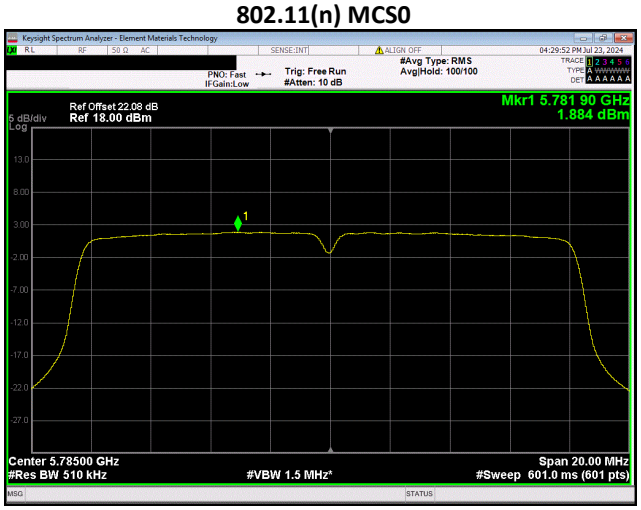
element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



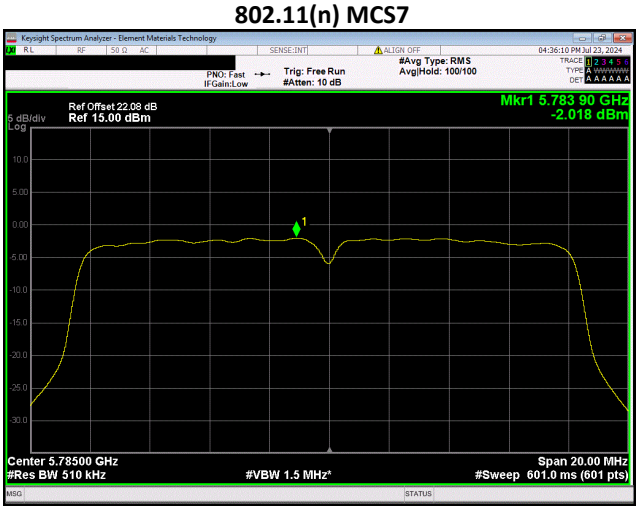
5725 - 5785 MHz Band
Low Channel, Ch 149 - 5745 MHz
802.11(n) MCS0



5725 - 5785 MHz Band
Low Channel, Ch 149 - 5745 MHz
802.11(n) MCS7



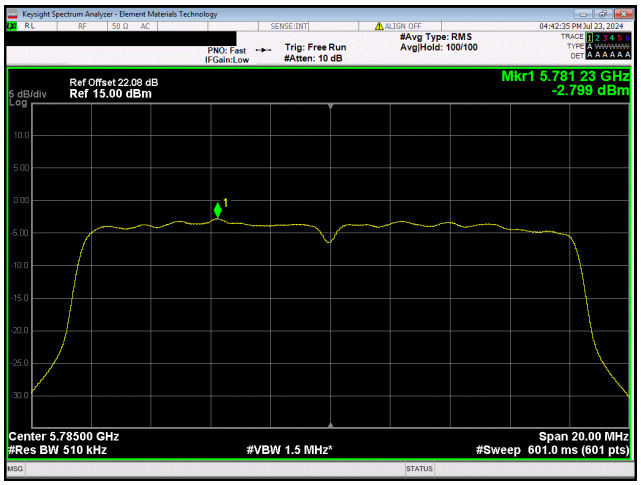
5725 - 5785 MHz Band
Mid Channel, Ch 157 - 5785 MHz
802.11(a) 6 Mbps



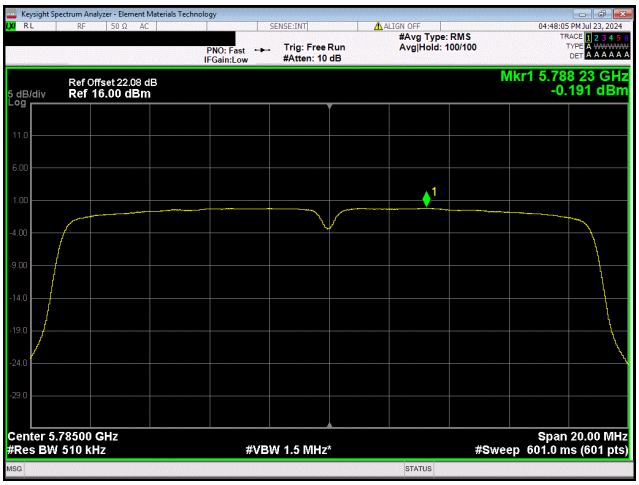
5725 - 5785 MHz Band
Mid Channel, Ch 157 - 5785 MHz
802.11(a) 36 Mbps

MAXIMUM POWER SPECTRAL DENSITY

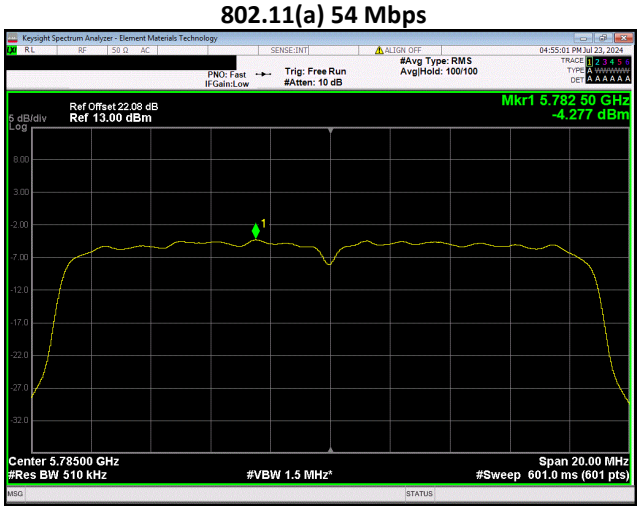
element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



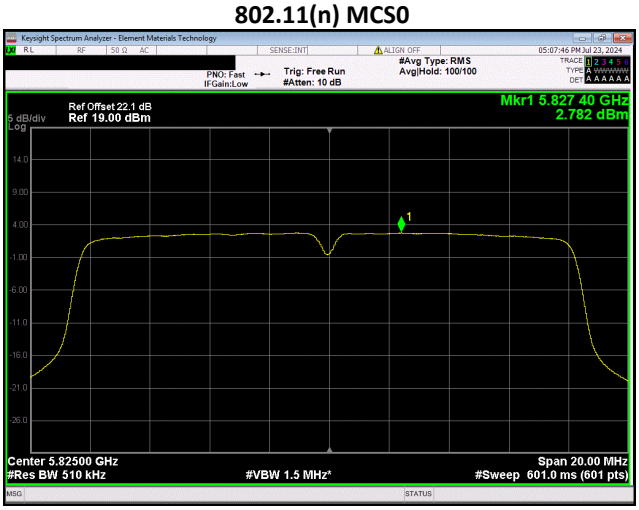
5725 - 5785 MHz Band
Mid Channel, Ch 157 - 5785 MHz
802.11(a) 54 Mbps



5725 - 5785 MHz Band
Mid Channel, Ch 157 - 5785 MHz
802.11(n) MCS0



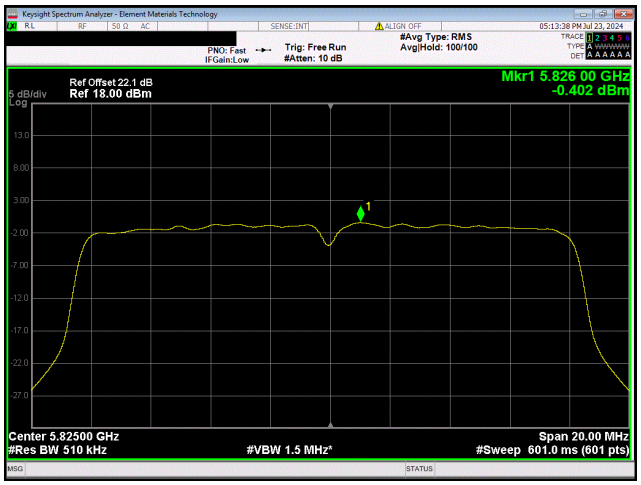
5725 - 5785 MHz Band
Mid Channel, Ch 157 - 5785 MHz
802.11(n) MCS7



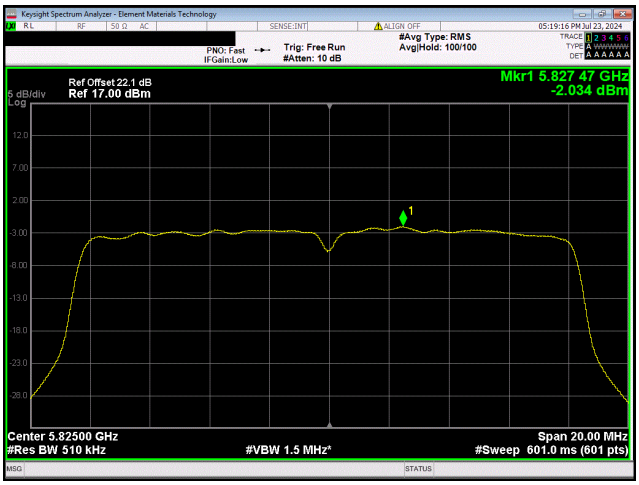
5725 - 5785 MHz Band
High Channel, Ch 165 - 5825 MHz
802.11(a) 6 Mbps

MAXIMUM POWER SPECTRAL DENSITY

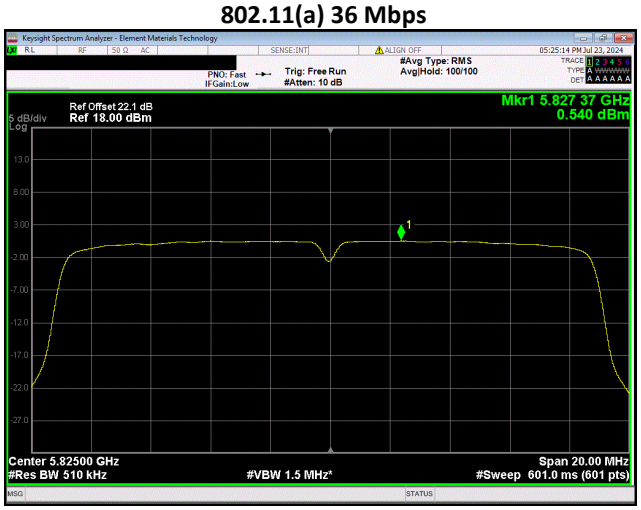
element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



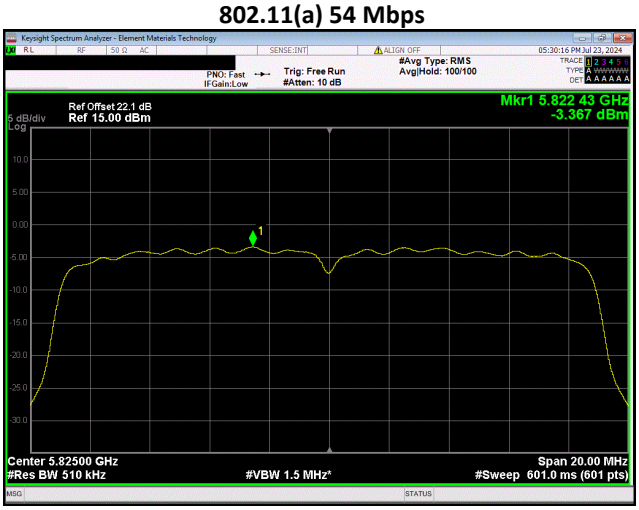
5725 - 5785 MHz Band
High Channel, Ch 165 - 5825 MHz
802.11(a) 36 Mbps



5725 - 5785 MHz Band
High Channel, Ch 165 - 5825 MHz
802.11(a) 54 Mbps



5725 - 5785 MHz Band
High Channel, Ch 165 - 5825 MHz
802.11(n) MCS0



5725 - 5785 MHz Band
High Channel, Ch 165 - 5825 MHz
802.11(n) MCS7

MAXIMUM POWER SPECTRAL DENSITY

element
TbtTx 2024.05.24.1
WTD.2024.01.16.0

TEST DESCRIPTION

Testing was performed using the mode(s) of operation and configuration(s) noted within the report. The individuals and/or the organization requesting the test provided the modes, configurations and settings used to complete the evaluation. The actual test parameters are specified in the test data, this includes items such as investigated frequency range (scanned) and test levels. The testing methods and performance specifications, as well as the test site used for the evaluation are indicated in the test data.

The measurement was made using a direct connection between the RF output of the EUT and a spectrum analyzer.

The transmit frequency was set to the required channels in each band. The transmit power was set to its default maximum. The radio was operated in the modes as shown in the following data sheets.

The maximum power spectral density was measured using ANSI C63.10:2013, Clause 12.3.2.3, Method SA-2 (RMS detection and trace averaging across the on and off times of the EUT transmission and use of a duty cycle correction factor), consistent with the method used for maximum conducted output power.

The spectrum analyzer settings were set to:

- Span set to encompass the entire 99% OBW of the signal
- RBW = 1 MHz (500 kHz in the 5.725-5.85 GHz band)
- VBW = 3 MHz (1.5 MHz in the 5.725-5.85 GHz band)
- RMS Detector
- Trace average 100 traces in power averaging mode

The marker peak search function of the analyzer as used to determine to be the highest level found across the emission in any 1 MHz/500kHz segment after 100 sweeps of power averaging (not video averaging).

A duty cycle correction factor was added to the measurement using the results of the formula of 10*LOG(1/D) where D is the duty cycle.

- In the 5.15 – 5.25GHz, the maximum permissible power spectral density is 11dBm/MHz for the FCC and not applicable for ISED.
- In the 5.25 – 5.35GHz, 5.47 – 5.725GHz bands, the maximum permissible power spectral density is 11dBm/MHz
- In the 5.725 – 5.850GHz band, the maximum permissible power spectral density is 30dBm/500kHz.

The worst case limits are shown on the following datasheet.

TEST EQUIPMENT

Description	Manufacturer	Model	ID	Last Cal.	Cal. Due
Analyzer - Spectrum Analyzer	Keysight	N9010A	AFM	2024-05-22	2025-05-22
Generator - Signal	Agilent	N5183A	TIK	2022-01-24	2025-01-24
Cable	Micro-Coax	UFD150A-1-0720-200200	MNL	2023-09-05	2024-09-05
Block - DC	Fairview Microwave	SD3379	ANH	2023-09-05	2024-09-05
Attenuator	Fairview Microwave	SA4014-20	AQI	2023-09-05	2024-09-05

MAXIMUM POWER SPECTRAL DENSITY

element
TbtTx 2024.05.24.1
WTD.2024.01.16.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005143	Date:	2024-08-26
Customer:	Ademco, Inc.	Temperature:	21.8°C
Attendees:	None	Relative Humidity:	67.9%
Customer Project:	None	Bar. Pressure (PMSL):	1015 mbar
Tested By:	Christopher Heintzelman	Job Site:	MN11
Power:	110VAC/60Hz	Configuration:	ADEM0044-8

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

COMMENTS

Power setting 107.

DEVIATIONS FROM TEST STANDARD

None

CONCLUSION

Pass

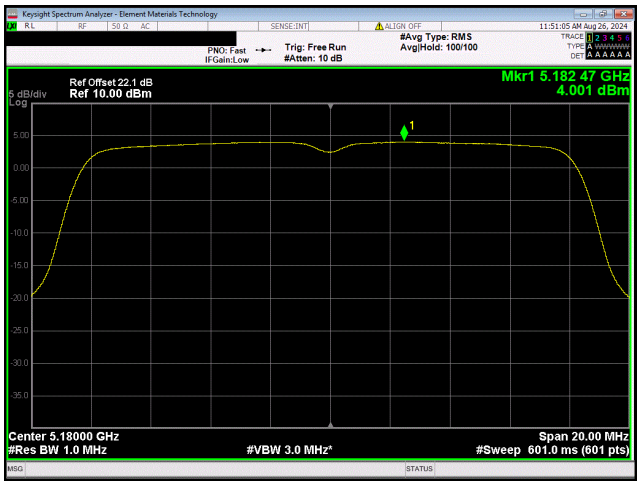
Tested By

TEST RESULTS

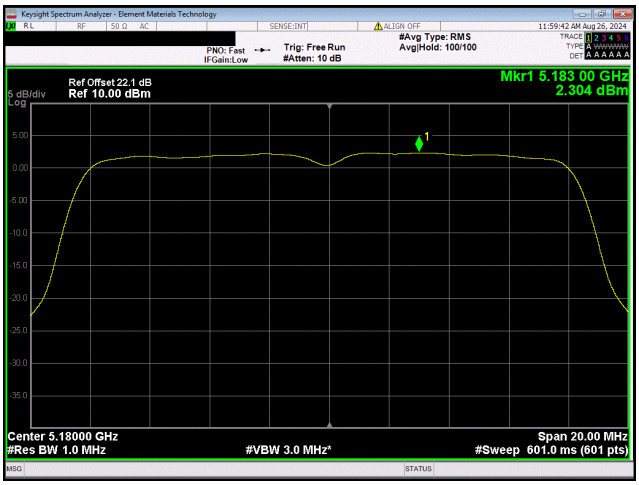
	Power (dBm/Ref BW)	Duty Cycle Factor (dB)	Density (dBm/Ref BW)	Limit ≤ (dBm/Ref BW)	Results
5150 - 5250 MHz Band, UNII-1, 20 MHz					
Low Channel, Ch 36 - 5180 MHz					
802.11(a) 6 Mbps	4.001	0.3	4.3	11	Pass
802.11(a) 36 Mbps	2.304	1.3	3.6	11	Pass
802.11(a) 54 Mbps	0.844	1.8	2.6	11	Pass
802.11(n) MCS0	3.983	0.3	4.3	11	Pass
802.11(n) MCS7	-0.667	2	1.3	11	Pass

MAXIMUM POWER SPECTRAL DENSITY

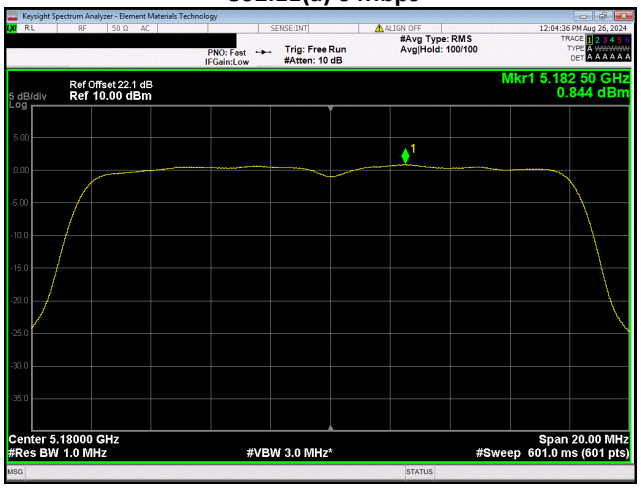
element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



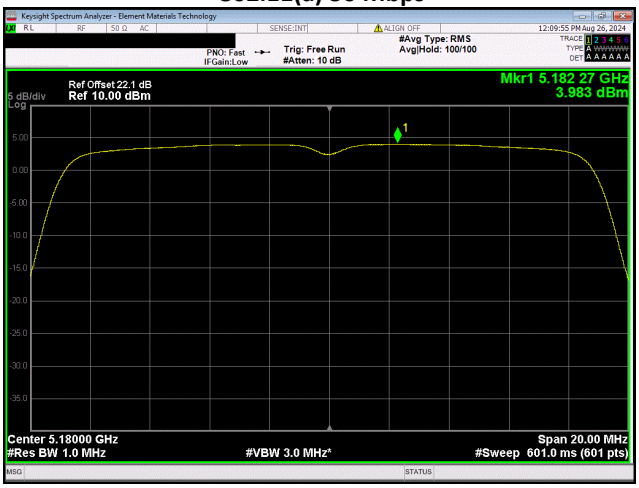
5150 - 5250 MHz Band, UNII-1, 20 MHz
Low Channel, Ch 36 - 5180 MHz
802.11(a) 6 Mbps



5150 - 5250 MHz Band, UNII-1, 20 MHz
Low Channel, Ch 36 - 5180 MHz
802.11(a) 36 Mbps



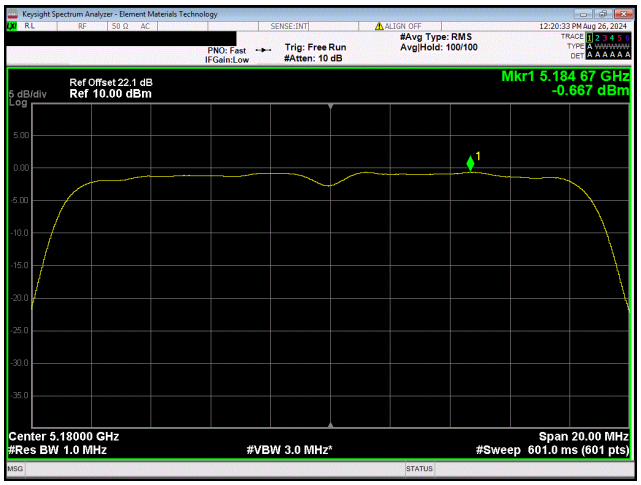
5150 - 5250 MHz Band, UNII-1, 20 MHz
Low Channel, Ch 36 - 5180 MHz
802.11(a) 54 Mbps



5150 - 5250 MHz Band, UNII-1, 20 MHz
Low Channel, Ch 36 - 5180 MHz
802.11(n) MCS0

MAXIMUM POWER SPECTRAL DENSITY

element
TbtTx 2024.05.24.1
WTD.2024.01.16.0



5150 - 5250 MHz Band, UNII-1, 20 MHz
Low Channel, Ch 36 - 5180 MHz
802.11(n) MCS7

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

TEST DESCRIPTION

The highest gain antenna of each type to be used with the EUT was tested. The EUT was configured for the required transmit frequencies in each operational band and the modes as showed in the data sheets.

For each configuration, the spectrum was scanned throughout the specified range as part of the exploratory investigation of the emissions. A reference preview scan (pre-scan) is included in the report. Final measurements on individual emissions were then made and included in this test report.

The individual emissions from the EUT were maximized by rotating the EUT on a turntable, adjusting the position of the EUT and EUT antenna in three orthogonal axis if required, and adjusting the measurement antenna height and polarization (per ANSI C63.10:2013). A preamp and high pass filter (and notch filter) were used for this test in order to provide sufficient measurement sensitivity.

Measurements were made with the required detectors and annotated on the data for each individual point using the following annotation:

QP = Quasi-Peak Detector
PK = Peak Detector
AV = RMS Detector

Measurements were made to satisfy the specific requirements of the test specification for out of band emissions as well as the restricted band requirements.

If there are no detectable emissions above the noise floor, the data included may show noise floor measurements for reference only.

Measurements at the edges of the allowable band may be measured using the Marker Delta or Integration method as outlined in FCC KDB 789033 G.3.(d)(i) or (d)(ii) respectfully. When either method is employed it is called out in the data tables.

Where the radio test software does not provide for a duty cycle at continuous transmit conditions (> 98%) and the RMS (power average) measurements were made across the on and off times of the EUT transmissions, a duty cycle correction is added to the measurements using the formula of 10*log(1/dc).

TEST EQUIPMENT

Description	Manufacturer	Model	ID	Last Cal.	Cal. Due
Antenna - Double Ridge	ETS Lindgren	3115	AIB	2022-09-01	2024-09-01
Cable	Element	Double Ridge Guide Horn Cables	MNV	2024-01-30	2025-01-30
Amplifier - Pre-Amplifier	Miteq	AMF-3D-00100800-32-13P	AVX	2024-01-30	2025-01-30
Attenuator	Coaxicom	3910-20	AXY	2023-09-10	2024-09-10
Analyzer - Spectrum Analyzer	Keysight	N9010A	AFN	2024-02-29	2025-02-28
Filter - High Pass	Micro-Tronics	HPM50111	HFM	2023-09-10	2024-09-10
Antenna - Standard Gain	ETS-Lindgren	3160-07	AJJ	NCR	NCR
Cable	Element	Standard Gain Cable	MNW	2024-01-30	2025-01-30
Amplifier - Pre-Amplifier	Miteq	AMF-6F-08001200-30-10P	AVC	2024-01-30	2025-01-30
Antenna - Standard Gain	ETS-Lindgren	3160-08	AJP	NCR	NCR
Amplifier - Pre-Amplifier	L-3 Narda-Miteq	AMF-6F-12001800-30-10P	PAP	2024-08-21	2025-08-21
Filter - Band Reject	Micro-Tronics	BRC50703	LFQ	2023-09-10	2024-09-10
Filter - Band Reject	Micro-Tronics	BRC50704	LFR	2023-09-10	2024-09-10
Filter - Band Reject	Micro-Tronics	BRC50705	LFS	2023-09-10	2024-09-10
Antenna - Biconilog	ETS Lindgren	3142D	AXN	2023-08-16	2025-08-16
Cable	ESM Cable Corp.	MN04 Bilog Cables	MND	2024-01-28	2025-01-28
Amplifier - Pre-Amplifier	Miteq	AM-1551	PAC	2024-06-08	2025-06-08
Receiver	Rohde & Schwarz	ESR26	ARP	2024-05-23	2025-05-23

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

Description	Manufacturer	Model	ID	Last Cal.	Cal. Due
Cable	ESM Cable Corp.	TTBJ141 KMKM-72	MNO	2023-08-23	2024-08-23
Antenna - Standard Gain	ETS Lindgren	3160-09	AHG	NCR	NCR
Cable	ESM Cable Corp.	TTBJ141 KMKM-72	MNP	2023-09-05	2024-09-05
Amplifier - Pre-Amplifier	Miteq	JSD4-18002600-26-8P	APU	2023-09-05	2024-09-05
Antenna	A.H. Systems, Inc.	SAS-588	AJO	NCR	NCR
Cable	Fairview Microwave	FMCA1975-200CM	MN1	2024-04-15	2025-04-15
Amplifier - Pre-Amplifier	Narda Miteq	JSW45-26004000-40-5P	PBC	2024-04-15	2025-04-15
Antenna - Biconilog	Ametek	CBL 6141B	AYS	2023-03-28	2025-03-28
Cable	Element	Biconilog Cable	MNX	2024-01-30	2025-01-30
Amplifier - Pre-Amplifier	Miteq	AM-1064-9079 and SA18E-10	AOO	2024-01-30	2025-01-30
Filter - Low Pass	Micro-Tronics	LPM50004	HGG	2023-09-10	2024-09-10
Antenna - Loop	ETS Lindgren	6502	AOB	2023-06-12	2025-06-12
Cable	ESM Cable Corp.	Bilog Cables	MNH	2023-10-08	2024-10-08
Analyzer - Spectrum Analyzer	Agilent	E4446A	AAQ	2024-03-13	2025-03-13
Antenna - Standard Gain	ETS Lindgren	3160-07	AXP	NCR	NCR
Cable	ESM Cable Corp.	Standard Gain Horn Cables	MNJ	2024-01-28	2025-01-28
Amplifier - Pre-Amplifier	Miteq	AMF-6F-08001200-30-10P	AVV	2024-01-08	2025-01-08
Antenna - Double Ridge	ETS Lindgren	3115	AIP	2024-08-02	2026-08-02
Cable	ESM Cable Corp.	Double Ridge Guide Horn Cables	MNI	2024-01-08	2025-01-08
Amplifier - Pre-Amplifier	Miteq	AMF-3D-00100800-32-13P	AVT	2024-01-08	2025-01-08
Attenuator	Fairview Microwave	SA18H-20	VAF	2024-08-25	2025-08-25
Filter - High Pass	Micro-Tronics	HPM50111	LFN	2024-08-25	2025-08-25
Antenna - Standard Gain	ETS Lindgren	3160-08	AIQ	NCR	NCR
Amplifier - Pre-Amplifier	Miteq	AMF-6F-12001800-30-10P	AVW	2024-01-08	2025-01-08
Antenna - Double Ridge	ETS Lindgren	3115	AJA	2023-09-06	2025-09-06

FREQUENCY RANGE INVESTIGATED

9 kHz TO 40 GHz

POWER INVESTIGATED

110VAC/60Hz

CONFIGURATIONS INVESTIGATED

ADEM0044-3

MODES INVESTIGATED

Transmitting Wifi 20 MHz BW

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-09-20
Customer:	Ademco, Inc.	Temperature:	21.8°C
Attendees:	None	Relative Humidity:	51.9%
Customer Project:	None	Bar. Pressure (PMSL):	1009 mb
Tested By:	Arnauld Dedry	Job Site:	MN05
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

TEST PARAMETERS

Run #:	90	Test Distance (m):	1	Ant. Height(s) (m):	1 to 4(m)

COMMENTS

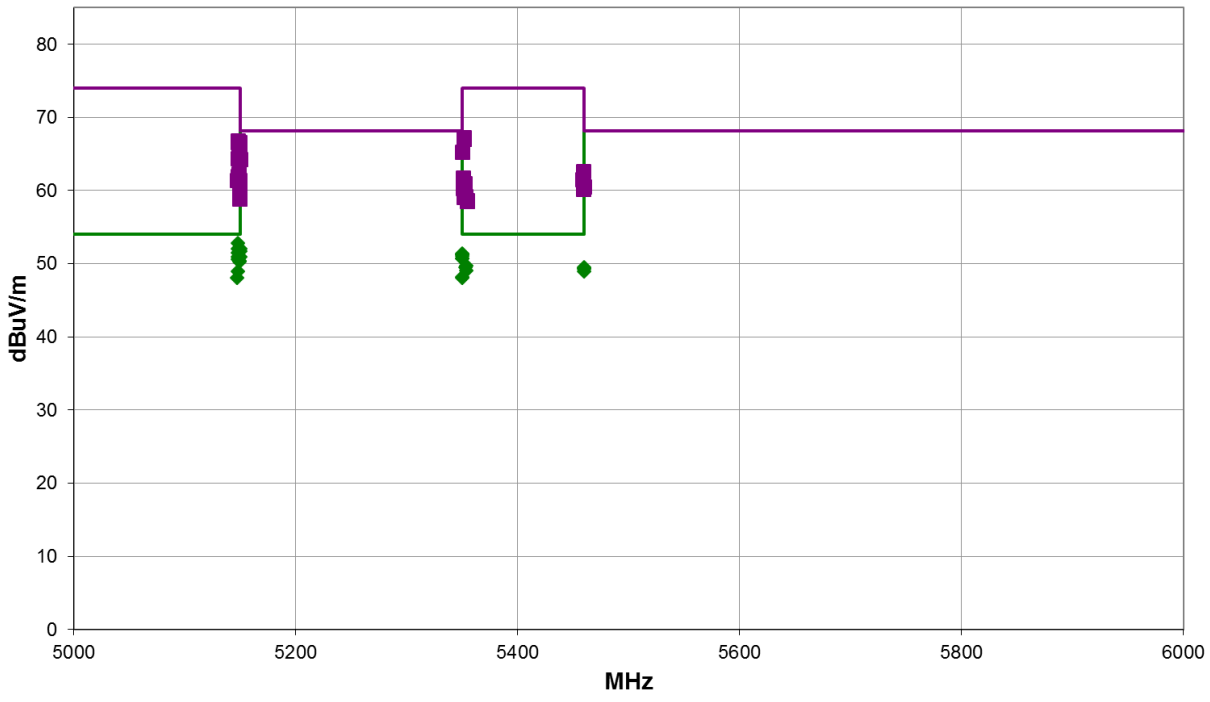
DCCF Determined using 10*log10(1/DC). 6 Mbps (DC = .941, DCCF = .26), 36 Mbps (DC = .738, DCCF = 1.3), 54 Mbps (DC = .657, DCCF = 1.8), MCS0 (DC = .937, DCCF = .28), MCS7 (DC = .638, DCCF = 1.95). Power was manually set for CH 36 to 107
Reference data comments below for EUT orientation, Channel, and Data Rate
INT in the comments below references using the integration method as stated in the test description above.

EUT OPERATING MODES

Transmitting Wifi UNII, 20 MHz Bandwidth

DEVIATIONS FROM TEST STANDARD

None



Run #: 165 ■ PK ◆ AV ● QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #90

Freq (MHz)	Amplitude (dBuV)	Factor (dB/m)	Antenna Height (meters)	Azimuth (degrees)	Duty Cycle Correction Factor (dB)	External Attenuation (dB)	Polarity/ Transducer Type	Detector	Distance Adjustment (dB)	Adjusted (dBuV/m)	Spec. Limit (dBuV/m)	Compared to Spec. (dB)	Comments
5148.413	26.5	35.5	1.6	243.9	0.3	0.0	Horz	AV	-9.5	52.8	54.0	-1.2	EUT Horz, Ch 36, 6 Mbps
5148.377	25.7	35.5	1.6	294.9	0.3	0.0	Vert	AV	-9.5	52.0	54.0	-2.0	EUT On Side, Ch 36, 6 Mbps, INT
5150.000	25.7	35.5	1.6	243.8	0.3	0.0	Horz	AV	-9.5	52.0	54.0	-2.0	EUT Horz, Ch 36, MCS0, INT
5149.983	24.4	35.5	1.6	294.9	1.3	0.0	Vert	AV	-9.5	51.7	54.0	-2.3	EUT On Side, Ch 36, 36 Mbps
5148.427	24.1	35.5	1.6	243.9	1.3	0.0	Horz	AV	-9.5	51.4	54.0	-2.6	EUT Horz, Ch 36, 36 Mbps
5350.033	23.0	35.8	1.6	286.0	2.0	0.0	Vert	AV	-9.5	51.3	54.0	-2.7	EUT On Side, Ch 64, MCS7
5350.000	23.1	35.8	1.6	285.9	1.8	0.0	Vert	AV	-9.5	51.2	54.0	-2.8	EUT On Side, Ch 64, 54 Mbps
5350.058	24.6	35.8	1.6	285.9	0.3	0.0	Vert	AV	-9.5	51.2	54.0	-2.8	EUT On Side, Ch 64, MCS0
5350.017	23.4	35.8	1.6	285.9	1.3	0.0	Vert	AV	-9.5	51.0	54.0	-3.0	EUT On Side, Ch 64, 36 Mbps
5148.393	24.6	35.5	1.6	192.9	0.3	0.0	Horz	AV	-9.5	50.9	54.0	-3.1	EUT On Side, Ch 36, 6 Mbps, INT
5150.000	23.1	35.5	1.6	294.9	1.8	0.0	Vert	AV	-9.5	50.9	54.0	-3.1	EUT On Side, Ch 36, 54 Mbps, INT
5350.000	24.1	35.8	1.6	286.0	0.3	0.0	Vert	AV	-9.5	50.7	54.0	-3.3	EUT On Side, Ch 64, 6 Mbps
5350.017	24.1	35.8	1.6	286.0	0.3	0.0	Vert	AV	-9.5	50.7	54.0	-3.3	EUT On Side, Ch 36, 6 Mbps
5149.033	24.4	35.5	1.6	250.0	0.3	0.0	Vert	AV	-9.5	50.7	54.0	-3.3	EUT Vert, Ch 36, 6 Mbps
5148.407	22.8	35.5	1.6	243.8	1.8	0.0	Horz	AV	-9.5	50.6	54.0	-3.4	EUT Horz, Ch 36, 54 Mbps, INT
5149.892	22.3	35.5	1.6	243.8	2.0	0.0	Horz	AV	-9.5	50.3	54.0	-3.7	EUT Horz, Ch 36, MCS7
5149.883	22.2	35.5	1.6	294.9	2.0	0.0	Vert	AV	-9.5	50.2	54.0	-3.8	EUT On Side, Ch 36, MCS7
5150.000	38.2	35.5	1.6	192.9		0.0	Horz	PK	-9.5	64.2	68.2	-4.0	EUT On Side, Ch 36, 6 Mbps
5354.050	21.4	35.8	1.6	326.9	2.0	0.0	Horz	AV	-9.5	49.7	54.0	-4.3	EUT Vert, Ch 64, MCS7
5353.142	21.4	35.8	1.6	326.9	1.8	0.0	Horz	AV	-9.5	49.5	54.0	-4.5	EUT Horz, Ch 64, 54 Mbps
5459.942	22.5	36.1	1.6	294.9	0.3	0.0	Vert	AV	-9.5	49.4	54.0	-4.6	EUT On Side, Ch 100, MCS0
5459.992	22.4	36.1	1.6	294.8	0.3	0.0	Vert	AV	-9.5	49.3	54.0	-4.7	EUT On Side, Ch 100, 6 Mbps
5459.983	22.3	36.1	1.6	319.9	0.3	0.0	Horz	AV	-9.5	49.2	54.0	-4.8	EUT Horz, Ch 100, 6 Mbps
5353.675	21.4	35.8	1.6	326.9	1.3	0.0	Horz	AV	-9.5	49.0	54.0	-5.0	EUT Horz, Ch 64, 36 Mbps
5148.370	22.6	35.5	1.6	224.0	0.3	0.0	Horz	AV	-9.5	48.9	54.0	-5.1	EUT Vert, Ch 36, 6 Mbps
5459.825	22.0	36.1	1.6	319.9	0.3	0.0	Horz	AV	-9.5	48.9	54.0	-5.1	EUT Horz, Ch 100, MCS0
5350.358	21.5	35.8	1.6	326.9	0.3	0.0	Horz	AV	-9.5	48.1	54.0	-5.9	EUT Horz, Ch 64, 6 Mbps
5350.167	21.4	35.8	1.6	326.9	0.3	0.0	Horz	AV	-9.5	48.0	54.0	-6.0	EUT Horz, Ch 64, MCS0
5147.453	21.7	35.5	1.6	20.9	0.3	0.0	Vert	AV	-9.5	48.0	54.0	-6.0	EUT Horz, Ch 36, 6 Mbps
5351.533	40.9	35.8	1.6	286.0		0.0	Vert	PK	-9.5	67.2	74.0	-6.8	EUT On Side, Ch 36, 6 Mbps
5351.450	40.7	35.8	1.6	286.0		0.0	Vert	PK	-9.5	67.0	74.0	-7.0	EUT On Side, Ch 64, 6 Mbps
5148.042	40.8	35.5	1.6	294.9		0.0	Vert	PK	-9.5	66.8	74.0	-7.2	EUT On Side, Ch 36, MCS0
5147.858	40.6	35.5	1.6	294.9		0.0	Vert	PK	-9.5	66.6	74.0	-7.4	EUT On Side, Ch 36, 6 Mbps
5149.700	40.5	35.5	1.6	243.9		0.0	Horz	PK	-9.5	66.5	74.0	-7.5	EUT Horz, Ch 36, 6 Mbps
5149.175	40.1	35.5	1.6	294.9		0.0	Vert	PK	-9.5	66.1	74.0	-7.9	EUT On Side, Ch 36, 36 Mbps
5149.500	39.9	35.5	1.6	243.9		0.0	Horz	PK	-9.5	65.9	74.0	-8.1	EUT Horz, Ch 36, 36 Mbps
5149.492	39.4	35.5	1.6	243.8		0.0	Horz	PK	-9.5	65.4	74.0	-8.6	EUT Horz, Ch 36, MCS0
5350.083	38.9	35.8	1.6	285.9		0.0	Vert	PK	-9.5	65.2	74.0	-8.8	EUT On Side, Ch 64, MCS0
5147.900	38.4	35.5	1.6	250.0		0.0	Vert	PK	-9.5	64.4	74.0	-9.6	EUT Vert, Ch 36, 6 Mbps
5459.500	36.0	36.1	1.6	294.8		0.0	Vert	PK	-9.5	62.6	74.0	-11.4	EUT On Side, Ch 100, 6 Mbps

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

Freq (MHz)	Amplitude (dBuV)	Factor (dB/m)	Antenna Height (meters)	Azimuth (degrees)	Duty Cycle Correction Factor (dB)	External Attenuation (dB)	Polarity/ Transducer Type	Detector	Distance Adjustment (dB)	Adjusted (dBuV/m)	Spec. Limit (dBuV/m)	Compared to Spec. (dB)	Comments
5148.717	36.2	35.5	1.6	243.8		0.0	Horz	PK	-9.5	62.2	74.0	-11.8	EUT Horz, Ch 36, 54 Mbps
5148.475	35.9	35.5	1.6	294.9		0.0	Vert	PK	-9.5	61.9	74.0	-12.1	EUT On Side, Ch 36, 54 Mbps
5351.217	35.4	35.8	1.6	285.9		0.0	Vert	PK	-9.5	61.7	74.0	-12.3	EUT On Side, Ch 64, 36 Mbps
5458.817	34.9	36.1	1.6	319.9		0.0	Horz	PK	-9.5	61.5	74.0	-12.5	EUT Horz, Ch 100, 6 Mbps
5147.458	35.4	35.5	1.6	224.0		0.0	Horz	PK	-9.5	61.4	74.0	-12.6	EUT Vert, Ch 36, 6 Mbps
5149.942	35.4	35.5	1.6	243.8		0.0	Horz	PK	-9.5	61.4	74.0	-12.6	EUT Horz, Ch 36, MCS7
5350.967	35.0	35.8	1.6	285.9		0.0	Vert	PK	-9.5	61.3	74.0	-12.7	EUT On Side, Ch 64, MCS7
5352.508	34.6	35.8	1.6	285.9		0.0	Vert	PK	-9.5	60.9	74.0	-13.1	EUT On Side, Ch 64, 54 Mbps
5149.308	34.7	35.5	1.6	294.9		0.0	Vert	PK	-9.5	60.7	74.0	-13.3	EUT On Side, Ch 36, MCS7
5459.900	33.9	36.1	1.6	294.9		0.0	Vert	PK	-9.5	60.5	74.0	-13.5	EUT On Side, Ch 100, MCS0
5351.217	34.0	35.8	1.6	326.9		0.0	Horz	PK	-9.5	60.3	74.0	-13.7	EUT Vert, Ch 64, MCS7
5459.275	33.5	36.1	1.6	319.9		0.0	Horz	PK	-9.5	60.1	74.0	-13.9	EUT Horz, Ch 100, MCS0
5353.425	32.9	35.8	1.6	326.9		0.0	Horz	PK	-9.5	59.2	74.0	-14.8	EUT Vert, Ch 64, 6 Mbps
5351.925	32.8	35.8	1.6	326.9		0.0	Horz	PK	-9.5	59.1	74.0	-14.9	EUT Horz, Ch 64, 36 Mbps
5149.558	32.8	35.5	1.6	20.9		0.0	Vert	PK	-9.5	58.8	74.0	-15.2	EUT Horz, Ch 36, 6 Mbps
5354.792	32.3	35.8	1.6	326.9		0.0	Horz	PK	-9.5	58.6	74.0	-15.4	EUT Horz, Ch 64, 54 Mbps
5354.800	32.2	35.8	1.6	326.9		0.0	Horz	PK	-9.5	58.5	74.0	-15.5	EUT Horz, Ch 64, MCS0

CONCLUSION

Pass

Tested By

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-07-30
Customer:	Ademco, Inc.	Temperature:	23.7°C
Attendees:	None	Relative Humidity:	53%
Customer Project:	None	Bar. Pressure (PMSL):	1008 mb
Tested By:	Arnauld Dedry	Job Site:	MN09
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

TEST PARAMETERS

Run #:	123	Test Distance (m):	3	Ant. Height(s) (m):	1 to 4(m)

COMMENTS

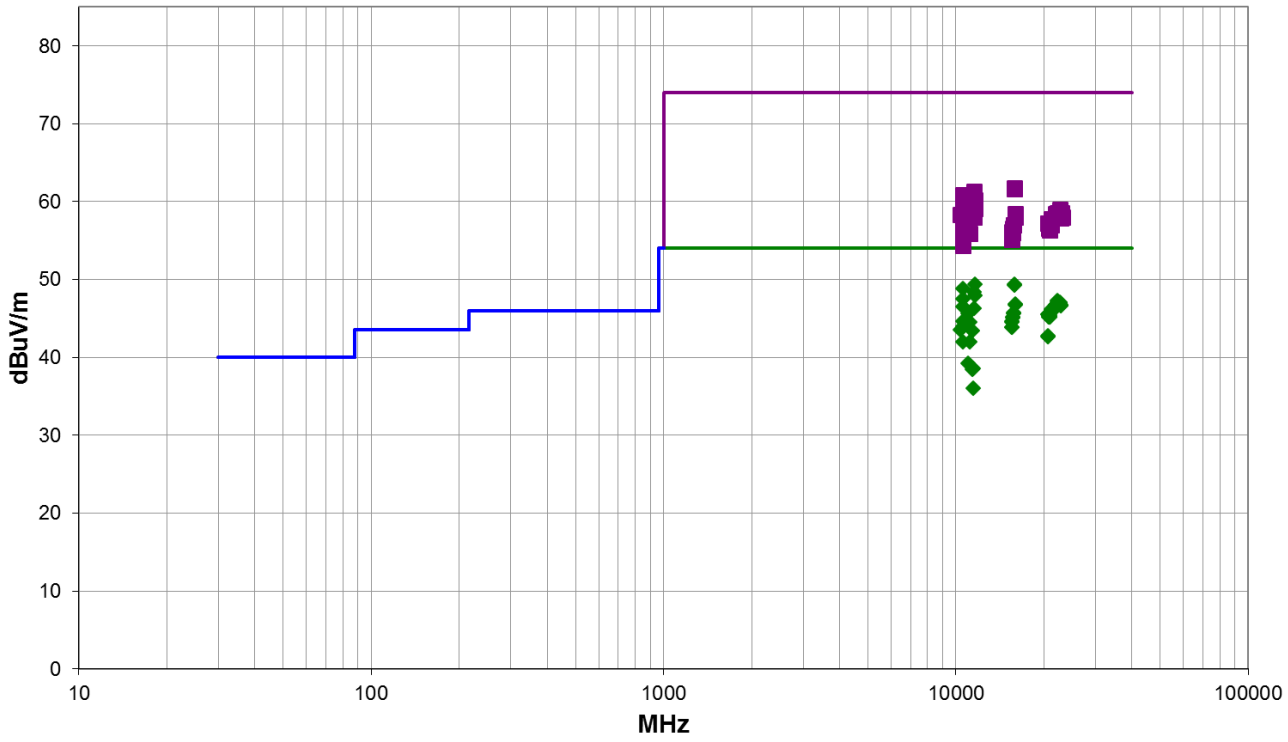
DCCF Determined using 10*log10(1/DC). 6 Mbps (DC = .941, DCCF = .26), 36 Mbps (DC = .738, DCCF = 1.3), 54 Mbps (DC = .657, DCCF = 1.8), MCS0 (DC = .937, DCCF = .28), MCS7 (DC = .638, DCCF = 1.95). Power was manually set for CH 36 to 107
Reference data comments below for EUT orientation, Channel, and Data Rate

EUT OPERATING MODES

Transmitting Wifi UNII, 20 MHz Bandwidth

DEVIATIONS FROM TEST STANDARD

None



Run #: 123 ■ PK ◆ AV ● QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #123

Freq (MHz)	Amplitude (dBuV)	Factor (dB/m)	Antenna Height (meters)	Azimuth (degrees)	Duty Cycle Correction Factor (dB)	External Attenuation (dB)	Polarity/ Transducer Type	Detector	Distance Adjustment (dB)	Adjusted (dBuV/m)	Spec. Limit (dBuV/m)	Compared to Spec. (dB)	Comments
15902.450	28.8	20.5	2.8	339.0	0.3	0.0	Vert	AV	0.0	49.6	54.0	-4.4	EUT Horz, Ch 60, 6 Mbps
11650.300	52.0	-2.7	2.0	107.0	0.3	0.0	Horz	AV	0.0	49.6	54.0	-4.4	EUT Vert, Ch 165, 6 Mbps
15900.960	28.8	20.4	1.2	252.0	0.3	0.0	Horz	AV	0.0	49.5	54.0	-4.5	EUT Vert, Ch 60, 6 Mbps
10600.280	57.1	-8.3	1.0	39.0	0.3	0.0	Vert	AV	0.0	49.1	54.0	-4.9	EUT Horz, 60 Ch, 6 Mbps
11570.000	51.7	-3.3	2.1	111.0	0.3	0.0	Horz	AV	0.0	48.7	54.0	-5.3	EUT Horz, Ch 157, 6 Mbps
11650.210	50.6	-2.7	2.5	84.0	0.3	0.0	Vert	AV	0.0	48.2	54.0	-5.8	EUT Horz, Ch 165, 6 Mbps
10601.670	55.8	-8.3	2.4	155.0	0.3	0.0	Vert	AV	0.0	47.8	54.0	-6.2	EUT On Side, 60 Ch, 6 Mbps
22321.420	27.7	19.5	1.3	224.0	0.3	0.0	Vert	AV	0.0	47.5	54.0	-6.5	EUT Vert, Ch 116, 6 Mbps
22322.130	27.6	19.5	1.3	192.0	0.3	0.0	Horz	AV	0.0	47.4	54.0	-6.6	EUT Horz, Ch 116, 6 Mbps
22798.640	27.4	19.6	1.3	187.0	0.3	0.0	Horz	AV	0.0	47.3	54.0	-6.7	EUT Vert, Ch 140, 6 Mbps
22801.180	27.3	19.6	1.3	239.0	0.3	0.0	Vert	AV	0.0	47.2	54.0	-6.8	EUT Horz, Ch 140, 6 Mbps
15962.420	25.7	21.1	1.5	159.0	0.3	0.0	Vert	AV	0.0	47.1	54.0	-6.9	EUT Horz, Ch 64, 6 Mbps
15961.120	25.7	21.0	1.5	142.0	0.3	0.0	Horz	AV	0.0	47.0	54.0	-7.0	EUT Vert, Ch 64, 6 Mbps
22980.480	26.9	19.8	1.3	249.0	0.3	0.0	Vert	AV	0.0	47.0	54.0	-7.0	EUT Horz, Ch 149, 6 Mbps
22001.840	27.9	18.8	1.3	234.0	0.3	0.0	Vert	AV	0.0	47.0	54.0	-7.0	EUT Horz, Ch 100, 6 Mbps
21999.280	27.9	18.8	1.3	53.0	0.3	0.0	Vert	AV	0.0	47.0	54.0	-7.0	EUT Horz, Ch 100, 6 Mbps
22981.420	26.8	19.8	1.3	35.0	0.3	0.0	Horz	AV	0.0	46.9	54.0	-7.1	EUT Vert, Ch 149, 6 Mbps
10599.480	54.8	-8.3	1.9	151.0	0.3	0.0	Vert	AV	0.0	46.8	54.0	-7.2	EUT Vert, 60 Ch, 6 Mbps
11569.900	49.6	-3.3	1.5	85.0	0.3	0.0	Vert	AV	0.0	46.6	54.0	-7.4	EUT Horz, Ch 157, 6 Mbps
21282.080	27.8	18.3	1.3	238.0	0.3	0.0	Horz	AV	0.0	46.4	54.0	-7.6	EUT Vert, Ch 64, 6 Mbps
21281.040	27.7	18.3	1.3	160.0	0.3	0.0	Vert	AV	0.0	46.3	54.0	-7.7	EUT Horz, Ch 64, 6 Mbps
21202.460	27.7	18.1	1.3	69.0	0.3	0.0	Horz	AV	0.0	46.1	54.0	-7.9	EUT Vert, Ch 60, 6 Mbps
21201.830	27.7	18.1	1.3	1.0	0.3	0.0	Vert	AV	0.0	46.1	54.0	-7.9	EUT Horz, Ch 60, 6 Mbps
15781.520	26.1	19.6	1.5	118.0	0.3	0.0	Horz	AV	0.0	46.0	54.0	-8.0	EUT Vert, Ch 52, 6 Mbps
15779.430	26.0	19.6	2.8	179.0	0.3	0.0	Vert	AV	0.0	45.9	54.0	-8.1	EUT Horz, Ch 52, 6 Mbps
11000.230	52.7	-7.1	2.0	207.0	0.3	0.0	Horz	AV	0.0	45.9	54.0	-8.1	EUT Vert, Ch 100, 6 Mbps
20721.490	27.3	18.2	1.3	151.0	0.3	0.0	Vert	AV	0.0	45.8	54.0	-8.2	EUT Horz, Ch 36, 6 Mbps
20720.890	27.3	18.2	1.3	38.0	0.3	0.0	Horz	AV	0.0	45.8	54.0	-8.2	EUT Vert, Ch 36, 6 Mbps
21041.640	27.6	17.8	1.3	126.0	0.3	0.0	Horz	AV	0.0	45.7	54.0	-8.3	EUT Vert, Ch 52, 6 Mbps
20960.980	27.3	17.9	1.3	48.0	0.3	0.0	Vert	AV	0.0	45.5	54.0	-8.5	EUT Horz, Ch 48, 6 Mbps
20958.680	27.3	17.9	1.3	52.0	0.3	0.0	Horz	AV	0.0	45.5	54.0	-8.5	EUT Vert, Ch 48, 6 Mbps
15718.380	25.7	19.4	1.5	290.0	0.3	0.0	Horz	AV	0.0	45.4	54.0	-8.6	EUT Vert, Ch 48, 6 Mbps
21040.650	27.3	17.8	1.3	67.0	0.3	0.0	Vert	AV	0.0	45.4	54.0	-8.6	EUT Horz, Ch 52, 6 Mbps
20800.800	27.1	18.0	1.3	92.0	0.3	0.0	Horz	AV	0.0	45.4	54.0	-8.6	EUT Vert, Ch 40, 6 Mbps
20801.980	27.1	18.0	1.3	108.0	0.3	0.0	Vert	AV	0.0	45.4	54.0	-8.6	EUT Horz, Ch 40, 6 Mbps
15718.510	25.6	19.4	3.9	110.0	0.3	0.0	Vert	AV	0.0	45.3	54.0	-8.7	EUT Horz, Ch 48, 6 Mbps
10601.820	52.9	-8.3	1.5	135.0	0.3	0.0	Horz	AV	0.0	44.9	54.0	-9.1	EUT Vert, 60 Ch, 6 Mbps
15602.020	25.9	18.7	1.5	194.0	0.3	0.0	Horz	AV	0.0	44.9	54.0	-9.1	EUT Vert, Ch 40, 6 Mbps
15600.930	25.8	18.7	2.6	311.0	0.3	0.0	Vert	AV	0.0	44.8	54.0	-9.2	EUT Horz, Ch 40, 6 Mbps
11159.950	50.2	-5.7	2.1	130.0	0.3	0.0	Horz	AV	0.0	44.8	54.0	-9.2	EUT Vert, Ch 116, 6 Mbps

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

Freq (MHz)	Amplitude (dBuV)	Factor (dB/m)	Antenna Height (meters)	Azimuth (degrees)	Duty Cycle Correction Factor (dB)	External Attenuation (dB)	Polarity/ Transducer Type	Detector	Distance Adjustment (dB)	Adjusted (dBuV/m)	Spec. Limit (dBuV/m)	Compared to Spec. (dB)	Comments
10601.630	52.2	-8.3	1.5	269.0	0.3	0.0	Horz	AV	0.0	44.2	54.0	-9.8	EUT On Side, 60 Ch, 6 Mbps
15541.650	25.6	18.2	2.2	240.0	0.3	0.0	Vert	AV	0.0	44.1	54.0	-9.9	EUT Horz, Ch 36, 6 Mbps
15541.530	25.6	18.2	1.5	353.0	0.3	0.0	Horz	AV	0.0	44.1	54.0	-9.9	EUT Vert, Ch 36, 6 Mbps
10359.770	52.9	-9.4	3.0	86.0	0.3	0.0	Vert	AV	0.0	43.8	54.0	-10.2	EUT Horz, Ch 36, 6 mbps
11399.830	47.8	-4.4	1.9	127.0	0.3	0.0	Horz	AV	0.0	43.7	54.0	-10.3	EUT Vert, Ch 140, 6 Mbps
20720.150	27.5	15.2	1.5	188.0	0.3	0.0	Vert	AV	0.0	43.0	54.0	-11.0	EUT Vert, Ch 36, 6 Mbps
20718.730	27.4	15.2	1.5	102.9	0.3	0.0	Horz	AV	0.0	42.9	54.0	-11.1	EUT Horz, Ch 36, 6 Mbps
10601.730	50.3	-8.3	1.5	320.0	0.3	0.0	Horz	AV	0.0	42.3	54.0	-11.7	EUT Horz, 60 Ch, 6 Mbps
11160.020	47.6	-5.7	1.6	1.0	0.3	0.0	Vert	AV	0.0	42.2	54.0	-11.8	EUT Horz, Ch 116, 6 Mbps
15898.350	41.3	20.4	1.2	252.0	0.0	0.0	Horz	PK	0.0	61.7	74.0	-12.3	EUT Vert, Ch 60, 6 Mbps
15899.420	41.2	20.4	2.8	339.0	0.0	0.0	Vert	PK	0.0	61.6	74.0	-12.4	EUT Horz, Ch 60, 6 Mbps
11570.330	64.6	-3.3	2.0	110.0	0.0	0.0	Horz	PK	0.0	61.3	74.0	-12.7	EUT Vert, Ch165, 6 Mbps
10600.480	69.1	-8.3	1.0	39.0	0.0	0.0	Vert	PK	0.0	60.8	74.0	-13.2	EUT Horz, 60 Ch, 6 Mbps
11652.500	62.8	-2.7	2.0	107.0	0.0	0.0	Horz	PK	0.0	60.1	74.0	-13.9	EUT Vert, Ch 165, 6 Mbps
10600.410	68.1	-8.3	2.4	155.0	0.0	0.0	Vert	PK	0.0	59.8	74.0	-14.2	EUT On Side, 60 Ch, 6 Mbps
11000.140	46.3	-7.1	1.5	195.0	0.3	0.0	Vert	AV	0.0	39.5	54.0	-14.5	EUT Horz, Ch 100, 6 Mbps
11647.860	61.9	-2.8	2.5	84.0	0.0	0.0	Vert	PK	0.0	59.1	74.0	-14.9	EUT Horz, Ch 165, 6 Mbps
22800.140	39.3	19.6	1.3	187.0	0.0	0.0	Horz	PK	0.0	58.9	74.0	-15.1	EUT Vert, Ch 140, 6 Mbps
11489.900	42.4	-3.9	2.9	121.0	0.3	0.0	Horz	AV	0.0	38.8	54.0	-15.2	EUT Vert, Ch 149, 6 Mbps
10999.930	65.8	-7.1	2.0	207.0	0.0	0.0	Horz	PK	0.0	58.7	74.0	-15.3	EUT Vert, Ch 100, 6 Mbps
11400.130	42.8	-4.4	1.5	80.0	0.3	0.0	Vert	AV	0.0	38.7	54.0	-15.3	EUT Horz, Ch 140, 6 Mbps
23139.030	38.8	19.7	1.3	107.0	0.0	0.0	Horz	PK	0.0	58.5	74.0	-15.5	EUT Vert, Ch 157, 6 Mbps
22321.760	39.0	19.5	1.3	192.0	0.0	0.0	Horz	PK	0.0	58.5	74.0	-15.5	EUT Horz, Ch 116, 6 Mbps
15960.000	37.4	21.0	1.5	159.0	0.0	0.0	Vert	PK	0.0	58.4	74.0	-15.6	EUT Horz, Ch 64, 6 Mbps
22001.310	39.6	18.8	1.3	234.0	0.0	0.0	Vert	PK	0.0	58.4	74.0	-15.6	EUT Horz, Ch 100, 6 Mbps
10360.430	67.6	-9.3	3.0	86.0	0.0	0.0	Vert	PK	0.0	58.3	74.0	-15.7	EUT Horz, Ch 36, 6 mbps
22980.820	38.5	19.8	1.3	249.0	0.0	0.0	Vert	PK	0.0	58.3	74.0	-15.7	EUT Horz, Ch 149, 6 Mbps
10600.300	66.5	-8.3	1.9	151.0	0.0	0.0	Vert	PK	0.0	58.2	74.0	-15.8	EUT Vert, 60 Ch, 6 Mbps
22001.400	39.4	18.8	1.3	53.0	0.0	0.0	Vert	PK	0.0	58.2	74.0	-15.8	EUT Horz, Ch 100, 6 Mbps
22797.800	38.5	19.6	1.3	239.0	0.0	0.0	Vert	PK	0.0	58.1	74.0	-15.9	EUT Horz, Ch 140, 6 Mbps
22320.430	38.6	19.5	1.3	224.0	0.0	0.0	Vert	PK	0.0	58.1	74.0	-15.9	EUT Vert, Ch 116, 6 Mbps
15961.010	37.0	21.0	1.5	142.0	0.0	0.0	Horz	PK	0.0	58.0	74.0	-16.0	EUT Vert, Ch 64, 6 Mbps
11570.250	61.3	-3.3	1.5	85.0	0.0	0.0	Vert	PK	0.0	58.0	74.0	-16.0	EUT Horz, Ch 157, 6 Mbps
23142.330	38.2	19.7	1.3	259.0	0.0	0.0	Vert	PK	0.0	57.9	74.0	-16.1	EUT Horz, Ch 157, 6 Mbps
22977.930	38.0	19.8	1.3	35.0	0.0	0.0	Horz	PK	0.0	57.8	74.0	-16.2	EUT Vert, Ch 149, 6 Mbps
21277.600	39.5	18.2	1.3	238.0	0.0	0.0	Horz	PK	0.0	57.7	74.0	-16.3	EUT Vert, Ch 64, 6 Mbps
21280.890	39.3	18.3	1.3	160.0	0.0	0.0	Vert	PK	0.0	57.6	74.0	-16.4	EUT Horz, Ch 64, 6 Mbps
21202.180	39.1	18.1	1.3	1.0	0.0	0.0	Vert	PK	0.0	57.2	74.0	-16.8	EUT Horz, Ch 60, 6 Mbps
20718.550	39.0	18.2	1.3	151.0	0.0	0.0	Vert	PK	0.0	57.2	74.0	-16.8	EUT Horz, Ch 36, 6 Mbps
20719.600	39.0	18.2	1.3	38.0	0.0	0.0	Horz	PK	0.0	57.2	74.0	-16.8	EUT Vert, Ch 36, 6 Mbps
15780.000	37.4	19.6	1.5	118.0	0.0	0.0	Horz	PK	0.0	57.0	74.0	-17.0	EUT Vert, Ch 52, 6 Mbps

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

Freq (MHz)	Amplitude (dBuV)	Factor (dB/m)	Antenna Height (meters)	Azimuth (degrees)	Duty Cycle Correction Factor (dB)	External Attenuation (dB)	Polarity/ Transducer Type	Detector	Distance Adjustment (dB)	Adjusted (dBuV/m)	Spec. Limit (dBuV/m)	Compared to Spec. (dB)	Comments
15777.540	37.5	19.5	2.8	179.0	0.0	0.0	Vert	PK	0.0	57.0	74.0	-17.0	EUT Horz, Ch 52, 6 Mbps
21202.260	38.8	18.1	1.3	69.0	0.0	0.0	Horz	PK	0.0	56.9	74.0	-17.1	EUT Vert, Ch 60, 6 Mbps
21041.940	39.0	17.8	1.3	67.0	0.0	0.0	Vert	PK	0.0	56.8	74.0	-17.2	EUT Horz, Ch 52, 6 Mbps
20958.360	38.8	17.9	1.3	48.0	0.0	0.0	Vert	PK	0.0	56.7	74.0	-17.3	EUT Horz, Ch 48, 6 Mbps
20961.670	38.7	17.9	1.3	52.0	0.0	0.0	Horz	PK	0.0	56.6	74.0	-17.4	EUT Vert, Ch 48, 6 Mbps
20802.120	38.6	18.0	1.3	108.0	0.0	0.0	Vert	PK	0.0	56.6	74.0	-17.4	EUT Horz, Ch 40, 6 Mbps
10600.270	64.8	-8.3	1.5	135.0	0.0	0.0	Horz	PK	0.0	56.5	74.0	-17.5	EUT Vert, 60 Ch, 6 Mbps
15721.230	37.1	19.4	3.9	110.0	0.0	0.0	Vert	PK	0.0	56.5	74.0	-17.5	EUT Horz, Ch 48, 6 Mbps
20799.820	38.5	18.0	1.3	92.0	0.0	0.0	Horz	PK	0.0	56.5	74.0	-17.5	EUT Vert, Ch 40, 6 Mbps
11489.990	39.9	-3.9	2.1	359.0	0.3	0.0	Vert	AV	0.0	36.3	54.0	-17.7	EUT Horz, Ch 149, 6 Mbps
21040.990	38.5	17.8	1.3	126.0	0.0	0.0	Horz	PK	0.0	56.3	74.0	-17.7	EUT Vert, Ch 52, 6 Mbps
15600.390	37.4	18.7	1.5	194.0	0.0	0.0	Horz	PK	0.0	56.1	74.0	-17.9	EUT Vert, Ch 40, 6 Mbps
10600.290	64.3	-8.3	1.5	269.0	0.0	0.0	Horz	PK	0.0	56.0	74.0	-18.0	EUT On Side, 60 Ch, 6 Mbps
15722.330	36.6	19.4	1.5	290.0	0.0	0.0	Horz	PK	0.0	56.0	74.0	-18.0	EUT Vert, Ch 48, 6 Mbps
15597.610	37.3	18.7	2.6	311.0	0.0	0.0	Vert	PK	0.0	56.0	74.0	-18.0	EUT Horz, Ch 40, 6 Mbps
11157.640	61.5	-5.7	2.1	130.0	0.0	0.0	Horz	PK	0.0	55.8	74.0	-18.2	EUT Vert, Ch 116, 6 Mbps
15542.130	37.1	18.2	2.2	240.0	0.0	0.0	Vert	PK	0.0	55.3	74.0	-18.7	EUT Horz, Ch 36, 6 Mbps
15540.830	36.9	18.2	1.5	353.0	0.0	0.0	Horz	PK	0.0	55.1	74.0	-18.9	EUT Vert, Ch 36, 6 Mbps
10600.230	62.6	-8.3	1.5	320.0	0.0	0.0	Horz	PK	0.0	54.3	74.0	-19.7	EUT Horz, 60 Ch, 6 Mbps

CONCLUSION

Pass

Tested By

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-08-07
Customer:	Ademco, Inc.	Temperature:	21.6°C
Attendees:	None	Relative Humidity:	54.7%
Customer Project:	None	Bar. Pressure (PMSL):	1017 mb
Tested By:	Arnauld Dedry	Job Site:	MN09
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

TEST PARAMETERS

Run #:	149	Test Distance (m):	3	Ant. Height(s) (m):	1 to 4(m)

COMMENTS

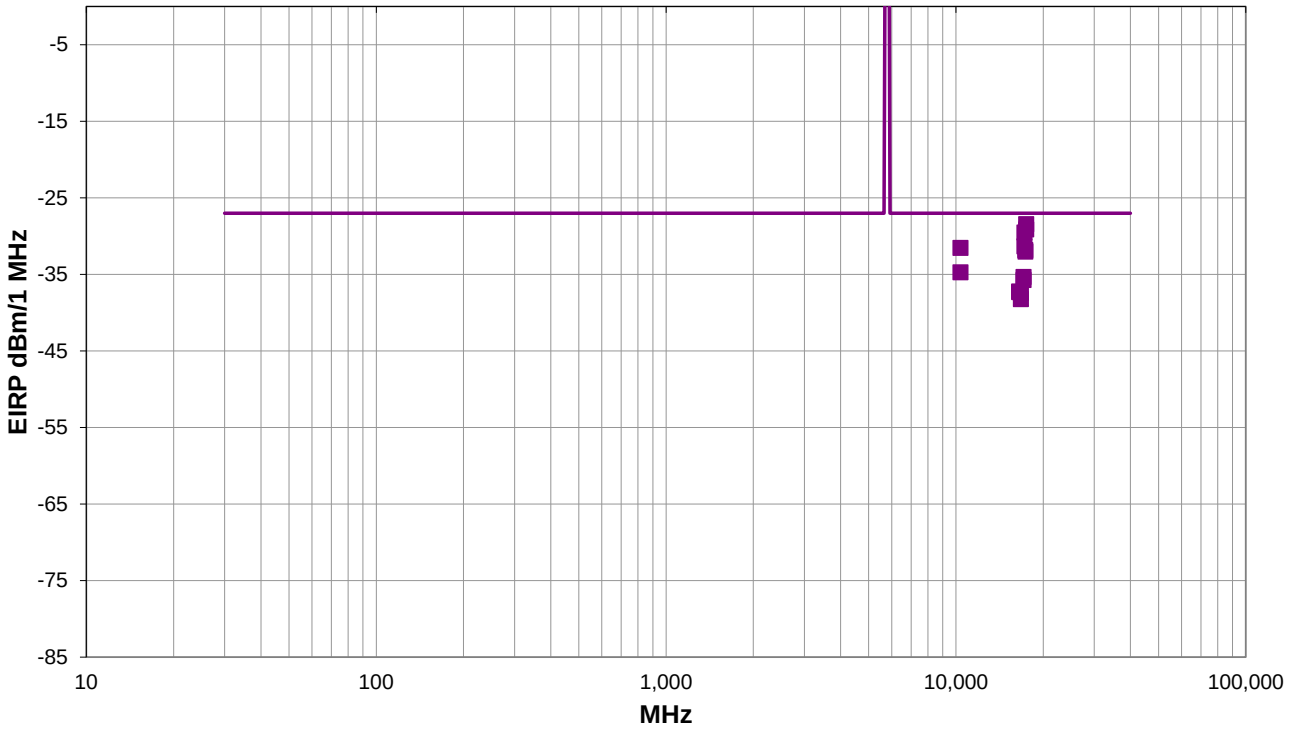
Power was manually set for CH 36 to 107
Reference data comments below for EUT orientation, Channel, and Data Rate

EUT OPERATING MODES

Transmitting Wifi UNII 2C, 6 Mbps, 20 MHz BW

DEVIATIONS FROM TEST STANDARD

None



Run #: 149 ■ PK ◆ AV ● QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #149

Freq (MHz)	Antenna Height (meters)	Azimuth (degrees)	Polarity/ Transducer Type	Detector	EIRP (Watts)	EIRP (dBm)	Spec. Limit (dBm)	Compared to Spec. (dB)	Comments
17473.230	1.5	169.0	Horz	PK	1.4E-6	-28.4	-27.0	-1.4	EUT Vert, Ch 157, 6 Mbps
17475.680	1.7	57.0	Vert	PK	1.2E-6	-29.1	-27.0	-2.1	EUT Horz, Ch 165, 6 Mbps
17233.330	2.3	243.0	Horz	PK	1.1E-6	-29.5	-27.0	-2.5	EUT Vert, Ch 149, 6 Mbps
17233.450	3.8	357.0	Vert	PK	736.4E-9	-31.3	-27.0	-4.3	EUT Horz, Ch 149, 6 Mbps
10362.160	3.3	159.0	Horz	PK	703.3E-9	-31.5	-27.0	-4.5	EUT Vert, Ch 36, 6 Mbps
17356.050	1.2	120.0	Horz	PK	656.3E-9	-31.8	-27.0	-4.8	EUT Vert, Ch 157, 6 Mbps
17356.730	1.1	259.0	Vert	PK	626.8E-9	-32.0	-27.0	-5.0	EUT Horz, CH 157, 6 Mbps
10360.760	1.3	72.0	Vert	PK	336.6E-9	-34.7	-27.0	-7.7	EUT Horz, Ch 36, 6 Mbps
17099.680	1.5	49.0	Vert	PK	293.2E-9	-35.3	-27.0	-8.3	EUT Horz, Ch 100, 6 Mbps
17100.320	1.8	26.0	Horz	PK	267.4E-9	-35.7	-27.0	-8.7	EUT Vert, Ch 100, 6 Mbps
16497.800	3.3	24.0	Horz	PK	189.3E-9	-37.2	-27.0	-10.2	EUT Vert, Ch 116, 6 Mbps
16498.530	1.5	304.0	Vert	PK	185.0E-9	-37.3	-27.0	-10.3	EUT Horz, Ch 116, 6 Mbps
16740.270	3.4	139.0	Horz	PK	180.8E-9	-37.4	-27.0	-10.4	EUT Vert, Ch 140, 6 Mbps
16741.050	1.6	177.0	Vert	PK	150.4E-9	-38.2	-27.0	-11.2	EUT Horz, Ch 140, 6 Mbps

CONCLUSION

Pass

Tested By

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-07-30
Customer:	Ademco, Inc.	Temperature:	24.2°C
Attendees:	None	Relative Humidity:	56.5%
Customer Project:	None	Bar. Pressure (PMSL):	1007 mb
Tested By:	Arnauld Dedry	Job Site:	MN09
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

TEST PARAMETERS

Run #:	126	Test Distance (m):	3	Ant. Height(s) (m):	1 to 4(m)

COMMENTS

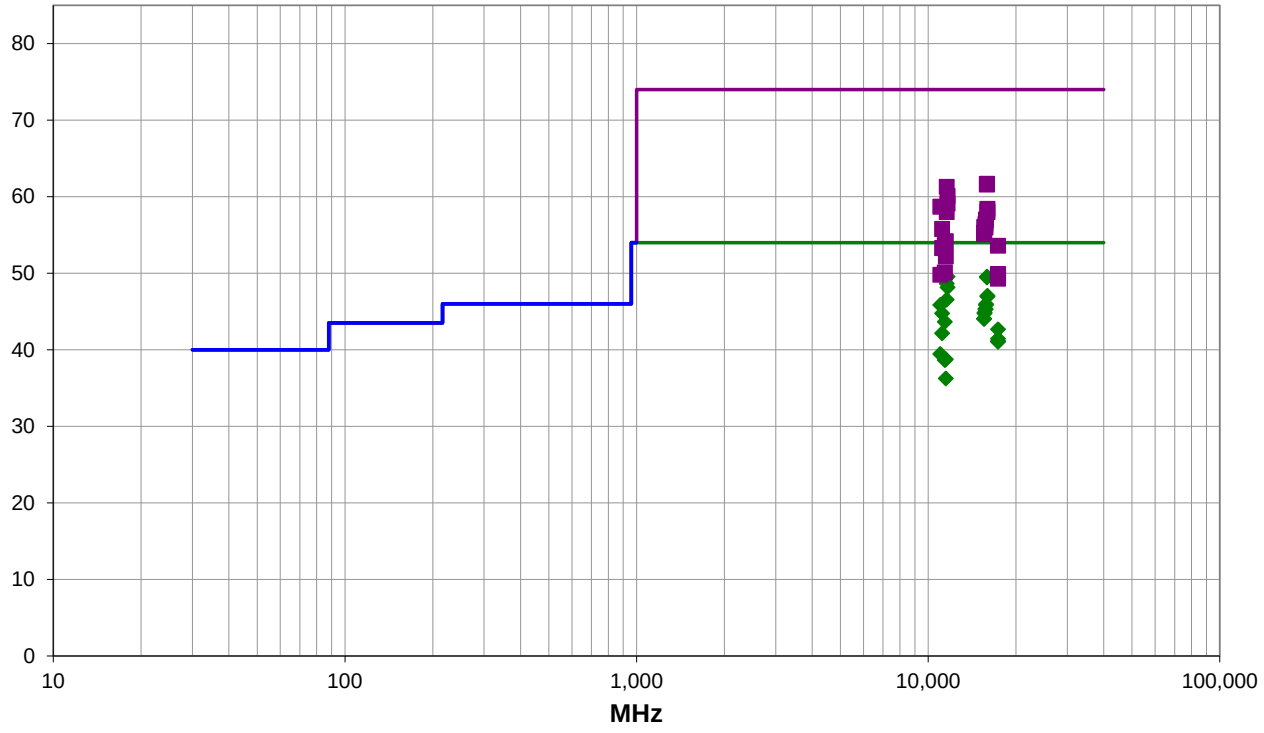
DCCF Determined using 10*log10(1/DC). 6 Mbps (DC = .941, DCCF = .26), 36 Mbps (DC = .738, DCCF = 1.3), 54 Mbps (DC = .657, DCCF = 1.8), MCS0 (DC = .937, DCCF = .28), MCS7 (DC = .638, DCCF = 1.95). Power was manually set for CH 36 to 107
Reference data comments below for EUT orientation, Channel, and Data Rate.

EUT OPERATING MODES

Transmitting Wifi UNII, 20 MHz Bandwidth

DEVIATIONS FROM TEST STANDARD

None



Run #: 126 ■ PK ◆ AV ● QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #126

Freq (MHz)	Amplitude (dBuV)	Factor (dB/m)	Antenna Height (meters)	Azimuth (degrees)	Duty Cycle Correction Factor (meters)	External Attenuation (dB)	Polarity/ Transducer Type	Detector	Distance Adjustment (dB)	Adjusted (dBuV/m)	Spec. Limit (dBuV/m)	Compared to Spec. (dB)	Comments
15902.450	28.8	20.5	2.8	339.0	0.3	0.0	Vert	AV	0.0	49.6	54.0	-4.4	EUT Horz, Ch 60, 6 Mbps
11650.300	52.0	-2.7	2.0	107.0	0.3	0.0	Horz	AV	0.0	49.6	54.0	-4.4	EUT Vert, Ch 165, 6 Mbps
15900.960	28.8	20.4	1.2	252.0	0.3	0.0	Horz	AV	0.0	49.5	54.0	-4.5	EUT Vert, Ch 60, 6 Mbps
11570.000	51.7	-3.3	2.1	111.0	0.3	0.0	Horz	AV	0.0	48.7	54.0	-5.3	EUT Horz, Ch 157, 6 Mbps
11650.210	50.6	-2.7	2.5	84.0	0.3	0.0	Vert	AV	0.0	48.2	54.0	-5.8	EUT Horz, Ch 165, 6 Mbps
15962.420	25.7	21.1	1.5	159.0	0.3	0.0	Vert	AV	0.0	47.1	54.0	-6.9	EUT Horz, Ch 64, 6 Mbps
15961.120	25.7	21.0	1.5	142.0	0.3	0.0	Horz	AV	0.0	47.0	54.0	-7.0	EUT Vert, Ch 64, 6 Mbps
11569.900	49.6	-3.3	1.5	85.0	0.3	0.0	Vert	AV	0.0	46.6	54.0	-7.4	EUT Horz, Ch 157, 6 Mbps
15781.520	26.1	19.6	1.5	118.0	0.3	0.0	Horz	AV	0.0	46.0	54.0	-8.0	EUT Vert, Ch 52, 6 Mbps
15779.430	26.0	19.6	2.8	179.0	0.3	0.0	Vert	AV	0.0	45.9	54.0	-8.1	EUT Horz, Ch 52, 6 Mbps
11000.230	52.7	-7.1	2.0	207.0	0.3	0.0	Horz	AV	0.0	45.9	54.0	-8.1	EUT Vert, Ch 100, 6 Mbps
15718.380	25.7	19.4	1.5	290.0	0.3	0.0	Horz	AV	0.0	45.4	54.0	-8.6	EUT Vert, Ch 48, 6 Mbps
15718.510	25.6	19.4	3.9	110.0	0.3	0.0	Vert	AV	0.0	45.3	54.0	-8.7	EUT Horz, Ch 48, 6 Mbps
15602.020	25.9	18.7	1.5	194.0	0.3	0.0	Horz	AV	0.0	44.9	54.0	-9.1	EUT Vert, Ch 40, 6 Mbps
15600.930	25.8	18.7	2.6	311.0	0.3	0.0	Vert	AV	0.0	44.8	54.0	-9.2	EUT Horz, Ch 40, 6 Mbps
11159.950	50.2	-5.7	2.1	130.0	0.3	0.0	Horz	AV	0.0	44.8	54.0	-9.2	EUT Vert, Ch 116, 6 Mbps
15541.650	25.6	18.2	2.2	240.0	0.3	0.0	Vert	AV	0.0	44.1	54.0	-9.9	EUT Horz, Ch 36, 6 Mbps
15541.530	25.6	18.2	1.5	353.0	0.3	0.0	Horz	AV	0.0	44.1	54.0	-9.9	EUT Vert, Ch 36, 6 Mbps
11399.830	47.8	-4.4	1.9	127.0	0.3	0.0	Horz	AV	0.0	43.7	54.0	-10.3	EUT Vert, Ch 140, 6 Mbps
17352.730	32.0	10.4	3.2	102.9	0.3	0.0	Horz	AV	0.0	42.7	54.0	-11.3	EUT Horz, Ch 157, MCS0
11160.020	47.6	-5.7	1.6	1.0	0.3	0.0	Vert	AV	0.0	42.2	54.0	-11.8	EUT Horz, Ch 116, 6 Mbps
15898.350	41.3	20.4	1.2	252.0	0.0	0.0	Horz	PK	0.0	61.7	74.0	-12.3	EUT Vert, Ch 60, 6 Mbps
15899.420	41.2	20.4	2.8	339.0	0.0	0.0	Vert	PK	0.0	61.6	74.0	-12.4	EUT Horz, Ch 60, 6 Mbps
17352.580	29.1	10.4	3.2	102.9	2.0	0.0	Horz	AV	0.0	41.5	54.0	-12.6	EUT Horz, Ch 157, MCS7
11570.330	64.6	-3.3	2.0	110.0	0.0	0.0	Horz	PK	0.0	61.3	74.0	-12.7	EUT Vert, Ch165, 6 Mbps
17352.540	28.8	10.4	1.5	91.0	2.0	0.0	Vert	AV	0.0	41.2	54.0	-12.9	EUT Vert, Ch 157, MCS7
17353.210	28.7	10.4	1.5	91.0	2.0	0.0	Vert	AV	0.0	41.1	54.0	-13.0	EUT Vert, Ch 157, MCS7
11652.500	62.8	-2.7	2.0	107.0	0.0	0.0	Horz	PK	0.0	60.1	74.0	-13.9	EUT Vert, Ch 165, 6 Mbps
11000.140	46.3	-7.1	1.5	195.0	0.3	0.0	Vert	AV	0.0	39.5	54.0	-14.5	EUT Horz, Ch 100, 6 Mbps
11647.860	61.9	-2.8	2.5	84.0	0.0	0.0	Vert	PK	0.0	59.1	74.0	-14.9	EUT Horz, Ch165, 6 Mbps
11489.900	42.4	-3.9	2.9	121.0	0.3	0.0	Horz	AV	0.0	38.8	54.0	-15.2	EUT Vert, Ch 149, 6 Mbps
10999.930	65.8	-7.1	2.0	207.0	0.0	0.0	Horz	PK	0.0	58.7	74.0	-15.3	EUT Vert, Ch 100, 6 Mbps
11400.130	42.8	-4.4	1.5	80.0	0.3	0.0	Vert	AV	0.0	38.7	54.0	-15.3	EUT Horz, Ch 140, 6 Mbps
15960.000	37.4	21.0	1.5	159.0	0.0	0.0	Vert	PK	0.0	58.4	74.0	-15.6	EUT Horz, Ch 64, 6 Mbps
15961.010	37.0	21.0	1.5	142.0	0.0	0.0	Horz	PK	0.0	58.0	74.0	-16.0	EUT Vert, Ch 64, 6 Mbps
11570.250	61.3	-3.3	1.5	85.0	0.0	0.0	Vert	PK	0.0	58.0	74.0	-16.0	EUT Horz, Ch 157, 6 Mbps
15780.000	37.4	19.6	1.5	118.0	0.0	0.0	Horz	PK	0.0	57.0	74.0	-17.0	EUT Vert, Ch 52, 6 Mbps
15777.540	37.5	19.5	2.8	179.0	0.0	0.0	Vert	PK	0.0	57.0	74.0	-17.0	EUT Horz, Ch 52, 6 Mbps
15721.230	37.1	19.4	3.9	110.0	0.0	0.0	Vert	PK	0.0	56.5	74.0	-17.5	EUT Horz, Ch 48, 6 Mbps
11489.990	39.9	-3.9	2.1	359.0	0.3	0.0	Vert	AV	0.0	36.3	54.0	-17.7	EUT Horz, Ch 149, 6 Mbps

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

Freq (MHz)	Amplitude (dBuV)	Factor (dB/m)	Antenna Height (meters)	Azimuth (degrees)	Duty Cycle Correction Factor (meters)	External Attenuation (dB)	Polarity/ Transducer Type	Detector	Distance Adjustment (dB)	Adjusted (dBuV/m)	Spec. Limit (dBuV/m)	Compared to Spec. (dB)	Comments
15600.390	37.4	18.7	1.5	194.0	0.0	0.0	Horz	PK	0.0	56.1	74.0	-17.9	EUT Vert, Ch 40, 6 Mbps
15722.330	36.6	19.4	1.5	290.0	0.0	0.0	Horz	PK	0.0	56.0	74.0	-18.0	EUT Vert, Ch 48, 6 Mbps
15597.610	37.3	18.7	2.6	311.0	0.0	0.0	Vert	PK	0.0	56.0	74.0	-18.0	EUT Horz, Ch 40, 6 Mbps
11157.640	61.5	-5.7	2.1	130.0	0.0	0.0	Horz	PK	0.0	55.8	74.0	-18.2	EUT Vert, Ch 116, 6 Mbps
15542.130	37.1	18.2	2.2	240.0	0.0	0.0	Vert	PK	0.0	55.3	74.0	-18.7	EUT Horz, Ch 36, 6 Mbps
15540.830	36.9	18.2	1.5	353.0	0.0	0.0	Horz	PK	0.0	55.1	74.0	-18.9	EUT Vert, Ch 36, 6 Mbps
11492.480	58.1	-3.9	1.5	359.0	0.0	0.0	Vert	PK	0.0	54.2	74.0	-19.8	EUT Horz, Ch 149, 6 Mbps
11401.690	58.2	-4.3	1.9	127.0	0.0	0.0	Horz	PK	0.0	53.9	74.0	-20.1	EUT Vert, Ch 140, 6 Mbps
17354.040	43.2	10.4	3.2	102.9	0.0	0.0	Horz	PK	0.0	53.6	74.0	-20.4	EUT Horz, Ch 157, MCS0
11157.730	59.0	-5.7	1.6	1.0	0.0	0.0	Vert	PK	0.0	53.3	74.0	-20.7	EUT Horz, Ch 116, 6 Mbps
11490.530	56.1	-3.9	2.9	121.0	0.0	0.0	Horz	PK	0.0	52.2	74.0	-21.8	EUT Vert, Ch 149, 6 Mbps
11402.000	54.4	-4.3	1.5	80.0	0.0	0.0	Vert	PK	0.0	50.1	74.0	-23.9	EUT Horz, Ch 140, 6 Mbps
17354.700	39.5	10.4	1.5	91.0	0.0	0.0	Vert	PK	0.0	49.9	74.0	-24.1	EUT Vert, Ch 157, MCS7
11000.860	56.9	-7.1	1.5	195.0	0.0	0.0	Vert	PK	0.0	49.8	74.0	-24.2	EUT Horz, Ch 100, 6 Mbps
17353.200	39.2	10.4	3.2	102.9	0.0	0.0	Horz	PK	0.0	49.6	74.0	-24.4	EUT Horz, Ch 157, MCS7
17356.400	38.9	10.4	1.5	91.0	0.0	0.0	Vert	PK	0.0	49.3	74.0	-24.7	EUT Vert, Ch 157, MCS7

CONCLUSION

Pass

Tested By

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-08-30
Customer:	Ademco, Inc.	Temperature:	22.1°C
Attendees:	None	Relative Humidity:	57.1%
Customer Project:	None	Bar. Pressure (PMSL):	1017 mb
Tested By:	Arnauld Dedry	Job Site:	MN05
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

TEST PARAMETERS

Run #:	56	Test Distance (m):	3	Ant. Height(s) (m):	1 to 4(m)

COMMENTS

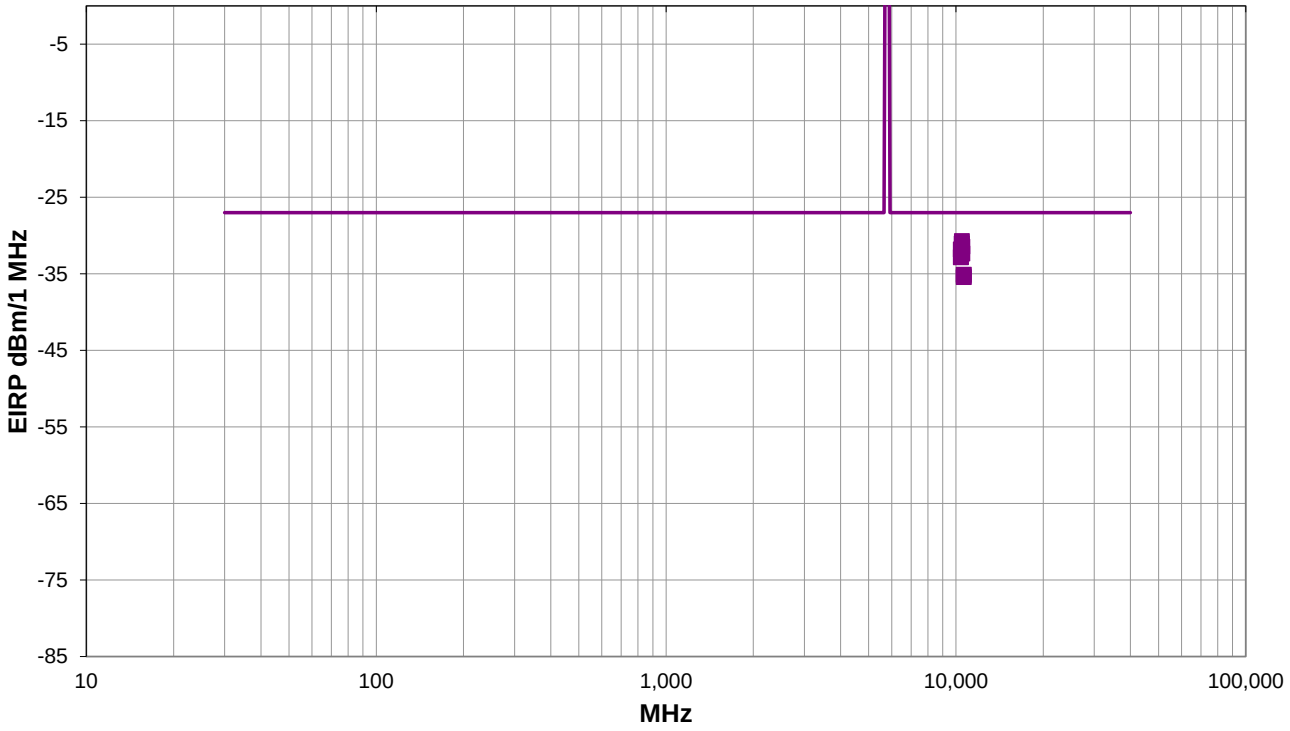
Reference data comments below for EUT orientation, Channel, and Data Rate

EUT OPERATING MODES

Transmitting Wifi UNII, 20 MHz Bandwidth

DEVIATIONS FROM TEST STANDARD

None



Run #: 56 PK AV QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #56

Freq (MHz)	Antenna Height (meters)	Azimuth (degrees)	Polarity/ Transducer Type	Detector	EIRP (Watts)	EIRP (dBm)	Spec. Limit (dBm)	Compared to Spec. (dB)	Comments
10479.230	2.58	218.9	Horz	PK	845.5E-9	-30.7	-27.0	-3.7	EUT Vert, Ch 48, 6 Mbps
10479.130	1.47	78.9	Vert	PK	789.1E-9	-31.0	-27.0	-4.0	EUT Horz, Ch 48, 6 Mbps
10520.400	2.6	209.0	Horz	PK	719.6E-9	-31.4	-27.0	-4.4	EUT Vert, Ch 52, 6 Mbps
10402.430	3.15	166.0	Horz	PK	656.3E-9	-31.8	-27.0	-4.8	EUT Vert, Ch 40, 6 Mbps
10517.520	2.55	78.9	Vert	PK	585.0E-9	-32.3	-27.0	-5.3	EUT Horz, Ch 52, 6 Mbps
10402.490	1.5	83.0	Vert	PK	521.3E-9	-32.8	-27.0	-5.8	EUT Horz, Ch 40, 6 Mbps
10637.580	2.48	210.9	Horz	PK	307.0E-9	-35.1	-27.0	-8.1	EUT Vert, Ch 64, 6 Mbps
10637.550	1.5	77.9	Vert	PK	286.5E-9	-35.4	-27.0	-8.4	EUT Horz, Ch 64, 6 Mbps

CONCLUSION

Pass

Tested By

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-09-10
Customer:	Ademco, Inc.	Temperature:	22.1°C
Attendees:	None	Relative Humidity:	50.4%
Customer Project:	None	Bar. Pressure (PMSL):	1009 mb
Tested By:	Arnauld Dedry, Christopher Heintzelman	Job Site:	MN05
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

TEST PARAMETERS

Run #:	62	Test Distance (m):	3	Ant. Height(s) (m):	1 to 4(m)

COMMENTS

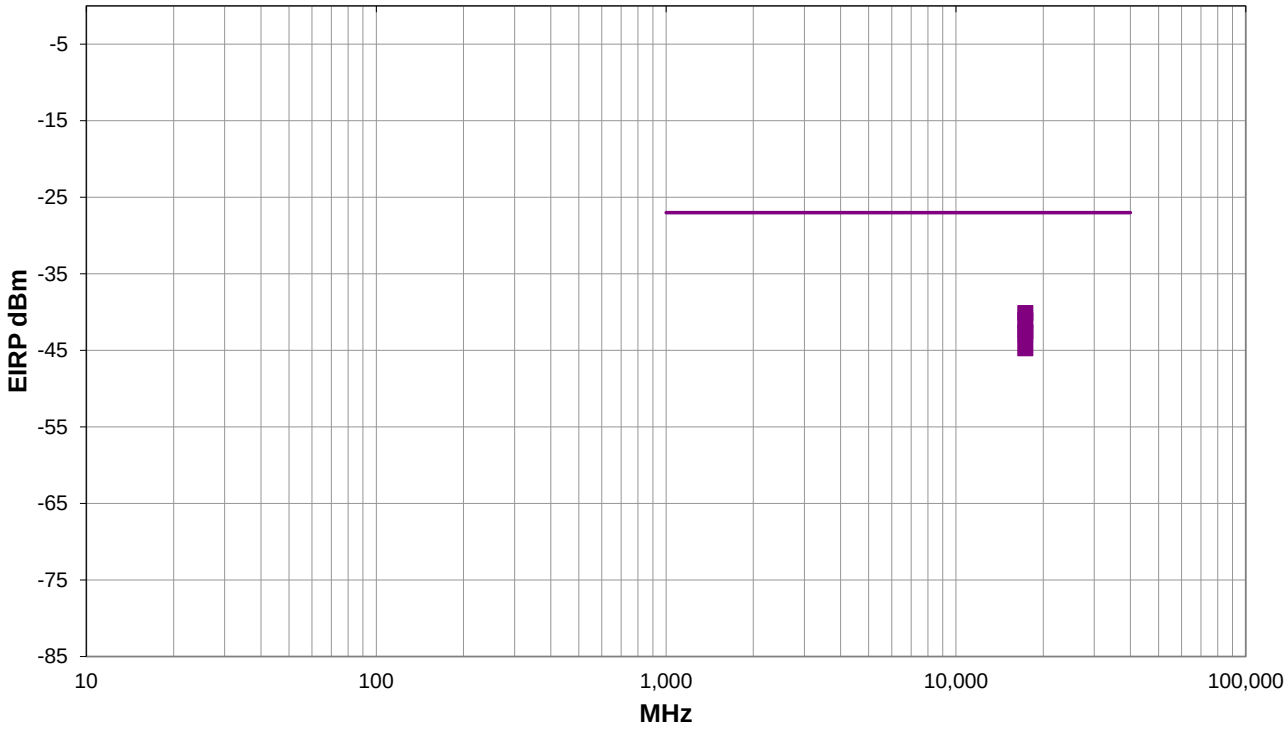
See comments for channel, EUT orientation, and data rate.

EUT OPERATING MODES

Transmitting Wifi UNII, 20 MHz Bandwidth

DEVIATIONS FROM TEST STANDARD

None



Run #: 62 ■ PK ◆ AV ● QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #62

Freq (MHz)	Antenna Height (meters)	Azimuth (degrees)	Polarity/ Transducer Type	Detector	EIRP (Watts)	EIRP (dBm)	Spec. Limit (dBm)	Compared to Spec. (dB)	Comments
17347.420	3.7	51.0	Horz	PK	97.1E-9	-40.1	-27.0	-13.1	EUT Vert, Ch 157, MCS0
17353.210	2.1	59.0	Vert	PK	78.9E-9	-41.0	-27.0	-14.0	EUT Horz, Ch 157, MCS0
17358.880	3.7	51.0	Horz	PK	55.9E-9	-42.5	-27.0	-15.5	EUT Vert, Ch 157, 36 Mbps
17352.210	3.7	51.0	Horz	PK	52.1E-9	-42.8	-27.0	-15.8	EUT Vert, Ch 157, 54 Mbps
17351.420	3.7	51.0	Horz	PK	33.7E-9	-44.7	-27.0	-17.7	EUT Vert, Ch 157, MCS7

CONCLUSION

Pass

Tested By

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-09-10
Customer:	Ademco, Inc.	Temperature:	22.1°C
Attendees:	None	Relative Humidity:	50.4%
Customer Project:	None	Bar. Pressure (PMSL):	1009 mb
Tested By:	Arnauld Dedry, Christopher Heintzelman	Job Site:	MN05
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013
RSS-247 Issue 3:2023	ANSI C63.10:2013

TEST PARAMETERS

Run #:	62	Test Distance (m):	3	Ant. Height(s) (m):	1 to 4(m)

COMMENTS

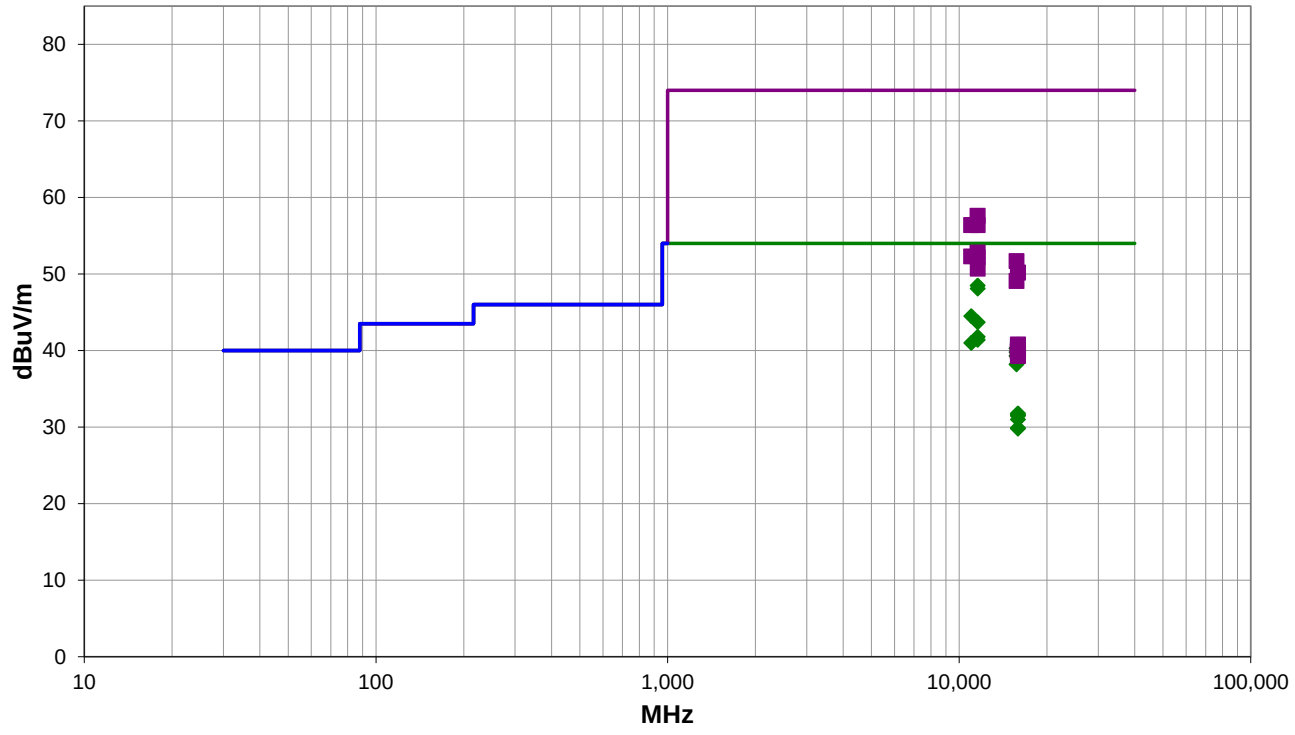
See comments for channel, EUT orientation, and data rate. A duty cycle correction factor was applied using 10*log(1/duty cycle). 36 Mbps (DC = .738, DCCF=1.3), 54 Mbps (DC=.657, DCCF=1.8), MCS0 (DC=.937, DCCF=0.28), and MCS7 (DC=.638, DCCF=1.95)

EUT OPERATING MODES

Transmitting Wifi UNII, 20 MHz Bandwidth.

DEVIATIONS FROM TEST STANDARD

None



Run #: 62 ■ PK ◆ AV ● QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #62

Freq (MHz)	Amplitude (dBuV)	Factor (dB/m)	Antenna Height (meters)	Azimuth (degrees)	Duty Cycle Correction Factor (dB)	External Attenuation (dB)	Polarity/ Transducer Type	Detector	Distance Adjustment (dB)	Adjusted (dBuV/m)	Spec. Limit (dBuV/m)	Compared to Spec. (dB)	Comments
11569.000	49.7	-2.5	3.0	249.0	1.3	0.0	Horz	AV	0.0	48.5	54.0	-5.5	EUT Vert, Ch 157, 36 Mbps
11569.950	48.8	-2.5	3.0	249.0	1.8	0.0	Horz	AV	0.0	48.1	54.0	-5.9	EUT Vert, Ch 157, 54 Mbps
11000.040	48.2	-4.0	3.6	27.0	0.3	0.0	Horz	AV	0.0	44.5	54.0	-9.5	EUT Vert, CH 100, MCS0
11571.180	44.4	-2.5	1.5	88.0	1.8	0.0	Vert	AV	0.0	43.7	54.0	-10.3	EUT Horz, Ch 157, 54 Mbps
11570.170	44.0	-2.5	1.5	116.0	0.3	0.0	Vert	AV	0.0	41.8	54.0	-12.2	EUT Horz, Ch 157, MCS0
11569.980	42.6	-2.5	1.5	88.0	1.3	0.0	Vert	AV	0.0	41.4	54.0	-12.6	EUT Horz, Ch 157, 36 Mbps
11000.960	43.0	-4.0	3.6	27.0	2.0	0.0	Horz	AV	0.0	41.0	54.0	-13.0	EUT Vert, CH 100, MCS7
15900.550	30.3	9.2	1.5	67.9	1.3	0.0	Vert	AV	0.0	40.8	54.0	-13.2	EUT Horz, Ch 60, 36 Mbps
15718.320	32.3	7.7	2.5	275.0	0.3	0.0	Horz	AV	0.0	40.3	54.0	-13.7	EUT Vert, Ch 48, MCS0
15721.950	30.1	7.7	2.5	275.0	2.0	0.0	Horz	AV	0.0	39.8	54.0	-14.2	EUT Vert, Ch 48, MCS7
15722.250	29.6	7.7	1.5	0.0	2.0	0.0	Vert	AV	0.0	39.3	54.0	-14.7	EUT Horz, Ch 48, MCS7
15721.300	30.2	7.7	1.5	-0.1	0.3	0.0	Vert	AV	0.0	38.2	54.0	-15.8	EUT Horz, Ch 48, MCS0
11567.760	60.1	-2.5	3.0	249.0	0.0	0.0	Horz	PK	0.0	57.6	74.0	-16.4	EUT Vert, Ch 157, 36 Mbps
11569.830	58.9	-2.5	3.0	249.0	0.0	0.0	Horz	PK	0.0	56.4	74.0	-17.6	EUT Vert, Ch 157, 54 Mbps
10997.620	60.4	-4.0	3.6	27.0	0.0	0.0	Horz	PK	0.0	56.4	74.0	-17.6	EUT Vert, CH 100, MCS0
11567.620	55.3	-2.5	1.5	116.0	0.0	0.0	Vert	PK	0.0	52.8	74.0	-21.2	EUT Horz, Ch 157, MCS0
10997.580	56.3	-4.0	3.6	27.0	0.0	0.0	Horz	PK	0.0	52.3	74.0	-21.7	EUT Vert, CH 100, MCS7
11569.940	54.7	-2.5	1.5	88.0	0.0	0.0	Vert	PK	0.0	52.2	74.0	-21.8	EUT Horz, Ch 157, 54 Mbps
15900.080	30.0	0.0	1.5	296.0	1.8	0.0	Horz	AV	0.0	31.8	54.0	-22.2	EUT Vert, Ch 60, 54 Mbps
15718.770	44.0	7.7	2.5	275.0	0.0	0.0	Horz	PK	0.0	51.7	74.0	-22.3	EUT Vert, Ch 48, MCS0
15901.630	29.8	0.0	1.5	67.9	1.8	0.0	Vert	AV	0.0	31.6	54.0	-22.4	EUT Horz, Ch 60, 54 Mbps
15900.950	29.5	0.0	1.5	309.0	2.0	0.0	Horz	AV	0.0	31.5	54.0	-22.5	EUT Vert, Ch 60, MCS7
15900.330	29.5	0.0	1.5	67.9	2.0	0.0	Vert	AV	0.0	31.5	54.0	-22.5	EUT Horz, Ch 60, MCS7
15900.880	29.7	0.0	1.5	309.1	1.3	0.0	Horz	AV	0.0	31.0	54.0	-23.0	EUT Vert, Ch 60, 36 Mbps
11571.510	53.2	-2.5	1.5	88.0	0.0	0.0	Vert	PK	0.0	50.7	74.0	-23.3	EUT Horz, Ch 157, 36 Mbps
15898.580	41.0	9.2	1.5	67.9	0.0	0.0	Vert	PK	0.0	50.2	74.0	-23.8	EUT Horz, Ch 60, 36 Mbps
15897.660	29.6	0.0	1.5	67.9	0.3	0.0	Horz	AV	0.0	29.9	54.0	-24.1	EUT Horz, Ch 60, MCS0
15900.550	29.5	0.0	1.5	309.0	0.3	0.0	Horz	AV	0.0	29.8	54.0	-24.2	EUT Vert, Ch 60, MCS0
15718.780	41.4	7.7	2.5	275.0	0.0	0.0	Horz	PK	0.0	49.1	74.0	-24.9	EUT Vert, Ch 48, MCS7
15900.850	40.8	0.0	1.5	67.9	0.0	0.0	Vert	PK	0.0	40.8	74.0	-33.2	EUT Horz, Ch 60, 54 Mbps
15898.490	40.5	0.0	1.5	296.0	0.0	0.0	Horz	PK	0.0	40.5	74.0	-33.5	EUT Vert, Ch 60, 54 Mbps
15898.150	40.1	0.0	1.5	309.1	0.0	0.0	Horz	PK	0.0	40.1	74.0	-33.9	EUT Vert, Ch 60, 36 Mbps
15901.210	39.9	0.0	1.5	309.0	0.0	0.0	Horz	PK	0.0	39.9	74.0	-34.1	EUT Vert, Ch 60, MCS7
15898.390	39.9	0.0	1.5	67.9	0.0	0.0	Vert	PK	0.0	39.9	74.0	-34.1	EUT Horz, Ch 60, MCS7
15899.940	39.8	0.0	1.5	309.0	0.0	0.0	Horz	PK	0.0	39.8	74.0	-34.2	EUT Vert, Ch 60, MCS0
15900.590	39.3	0.0	1.5	67.9	0.0	0.0	Horz	PK	0.0	39.3	74.0	-34.7	EUT Horz, Ch 60, MCS0

CONCLUSION

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

Pass

Tested By

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-08-13
Customer:	Ademco, Inc.	Temperature:	21.9°C
Attendees:	None	Relative Humidity:	53.2%
Customer Project:	None	Bar. Pressure (PMSL):	1020 mb
Tested By:	Arnauld Dedry	Job Site:	MN09
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013

TEST PARAMETERS

Run #:	166	Test Distance (m):	0.5	Ant. Height(s) (m):	1.5 (m)

COMMENTS

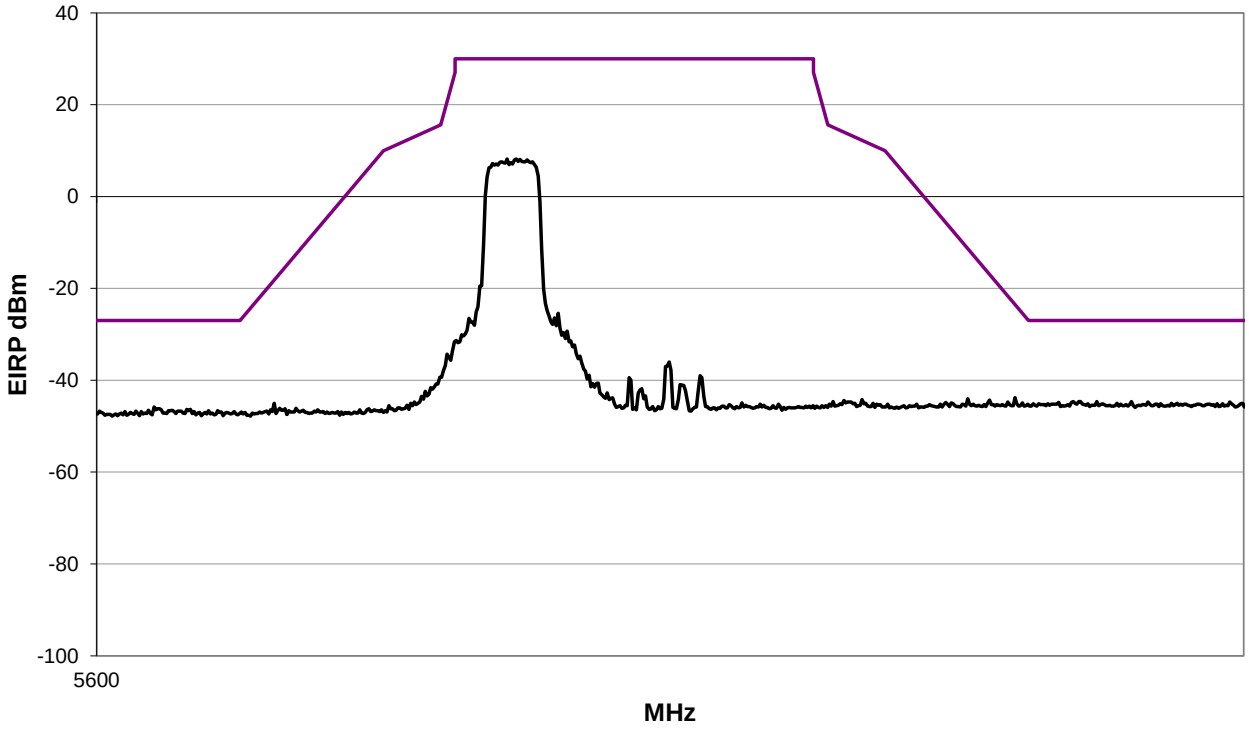
None

EUT OPERATING MODES

Transmitting Wifi UNII 3,Ch 149, MCS0, 20 MHz BW

DEVIATIONS FROM TEST STANDARD

None



Run #: 166 ■ PK ◆ AV ● QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #166
All emissions were below the limit (see graph above).

CONCLUSION
Pass

Tested By

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

EUT:	Fuji Thermostat	Work Order:	ADEM0044
Serial Number:	52202030005293	Date:	2024-08-13
Customer:	Ademco, Inc.	Temperature:	21.9°C
Attendees:	None	Relative Humidity:	53.2%
Customer Project:	None	Bar. Pressure (PMSL):	1020 mb
Tested By:	Arnauld Dedry	Job Site:	MN09
Power:	110VAC/60Hz	Configuration:	ADEM0044-3

TEST SPECIFICATIONS

Specification:	Method:
FCC 15.407:2024	ANSI C63.10:2013

TEST PARAMETERS

Run #:	167	Test Distance (m):	0.5	Ant. Height(s) (m):	1.5 (m)

COMMENTS

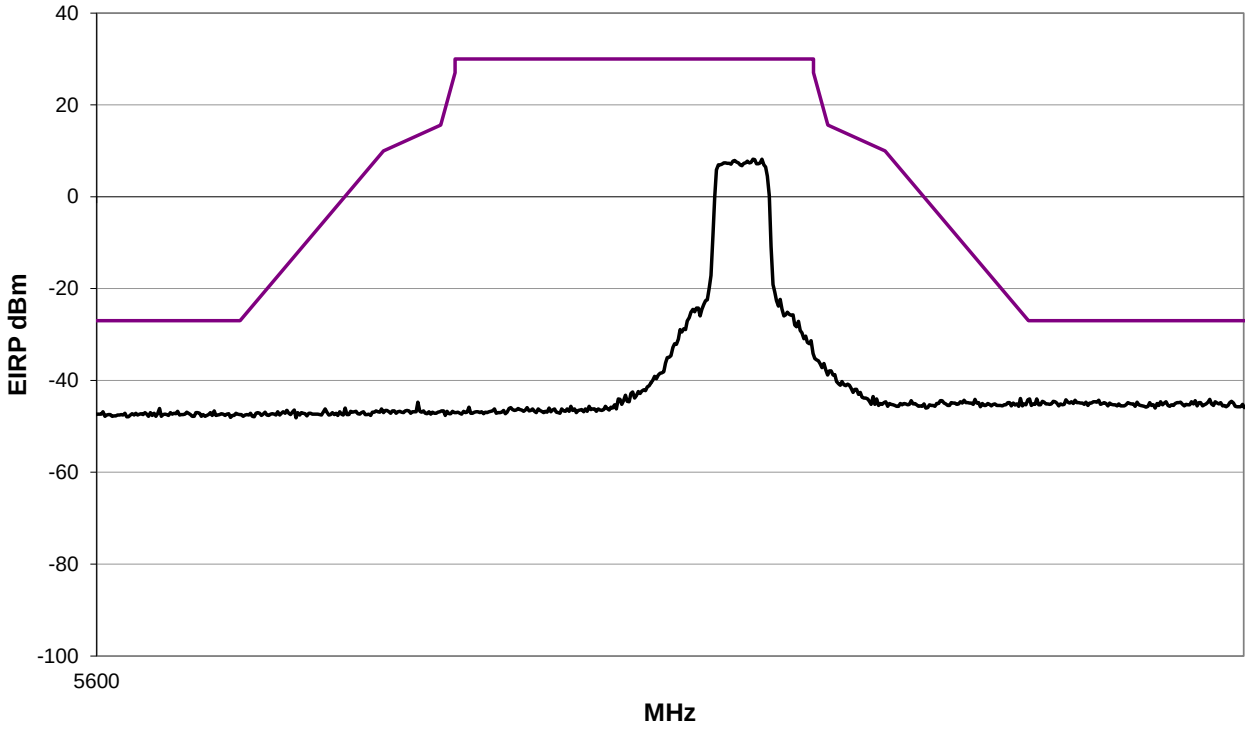
None

EUT OPERATING MODES

Transmitting Wifi UNII 3,Ch 165, MCS0, 20 MHz BW

DEVIATIONS FROM TEST STANDARD

None



Run #: 167 ■ PK ◆ AV ● QP

SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

RESULTS - Run #167
All emissions were below the limit (see graph above).

CONCLUSION
Pass

Tested By

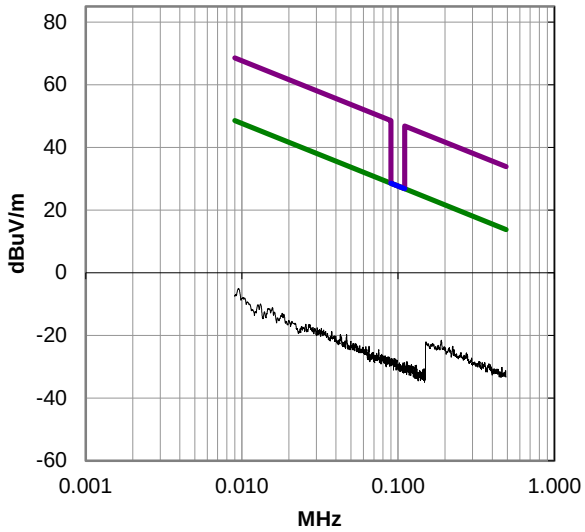
SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

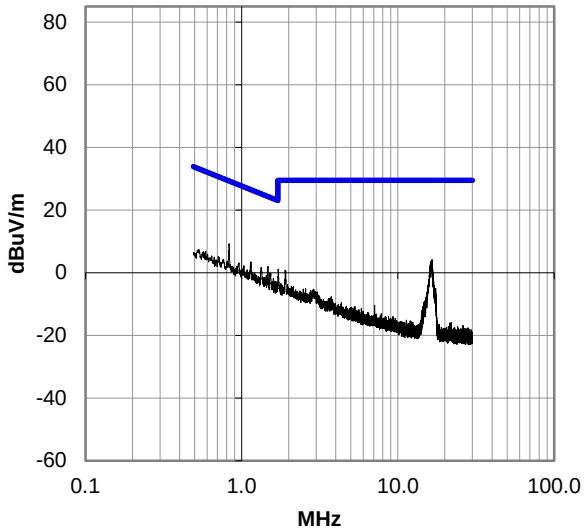
PRESCAN DATA

Radiated spurious emissions from the EUT are initially reviewed with Pre-scans (Preview scans). Pre-scans are performed, with the EUT transmitting on the lowest applicable data rate, for both vertical and horizontal polarizations. The Pre-scan plots below are shown with a peak detector and RBW for the following frequency ranges: 9 kHz RBW (< 30 MHz); 120 kHz RBW (30 - 1000 MHz); 1 MHz RBW (> 1 GHz). In the case where unintentional emissions are observed, an ambient or idle pre-scan with the radio off, will be shown for comparison.

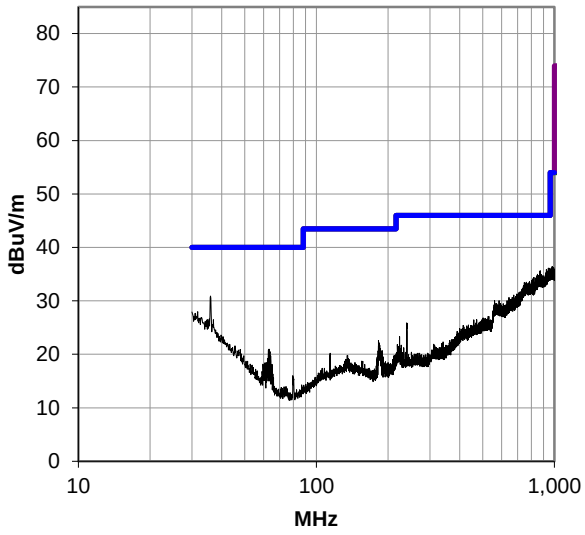
0.009-0.49 MHz, Run 21



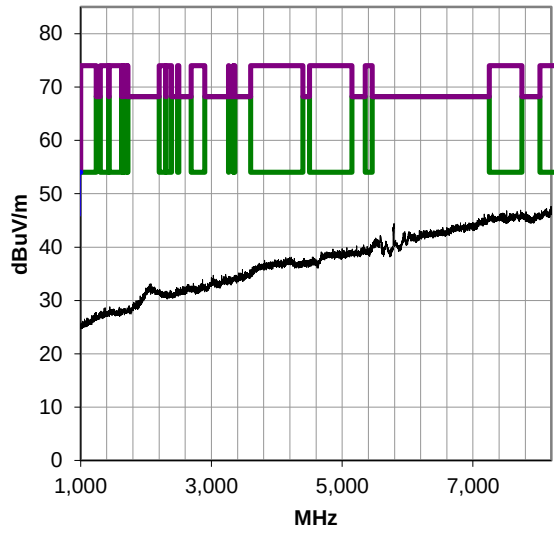
0.49-30 MHz, Run 22



30-1000 MHz, Run 237



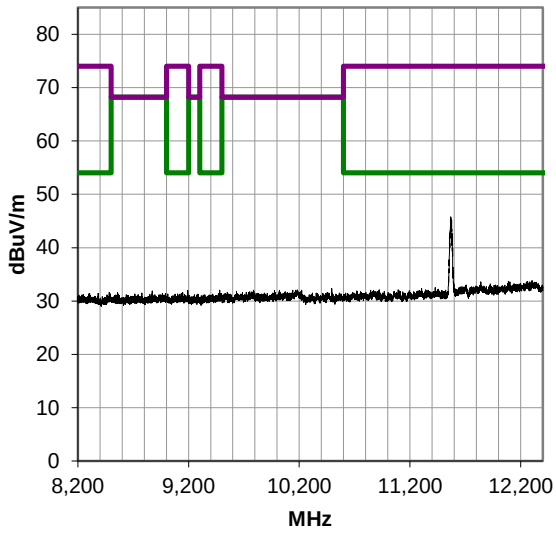
1000-8200 MHz, Run 91



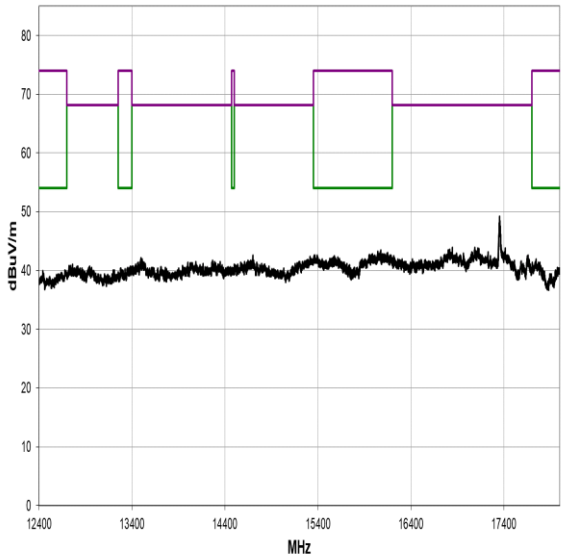
SPURIOUS RADIATED EMISSIONS

element
WTD.2024.01.16.0
EmiR5 2023.08.29.0
PSA-ESCI 2023.12.23.0

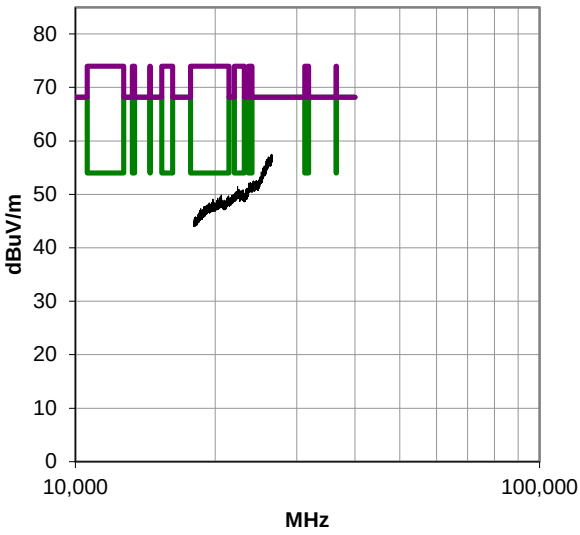
8200-12400 MHz, Run 92



12400-18000 MHz, Run 93



18000-26500 MHz, Run 178



26500-40000 MHz, Run 194