

待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 2: SISO B: 發射器 802.11ac-80BW

視頻頻寬：300kHz

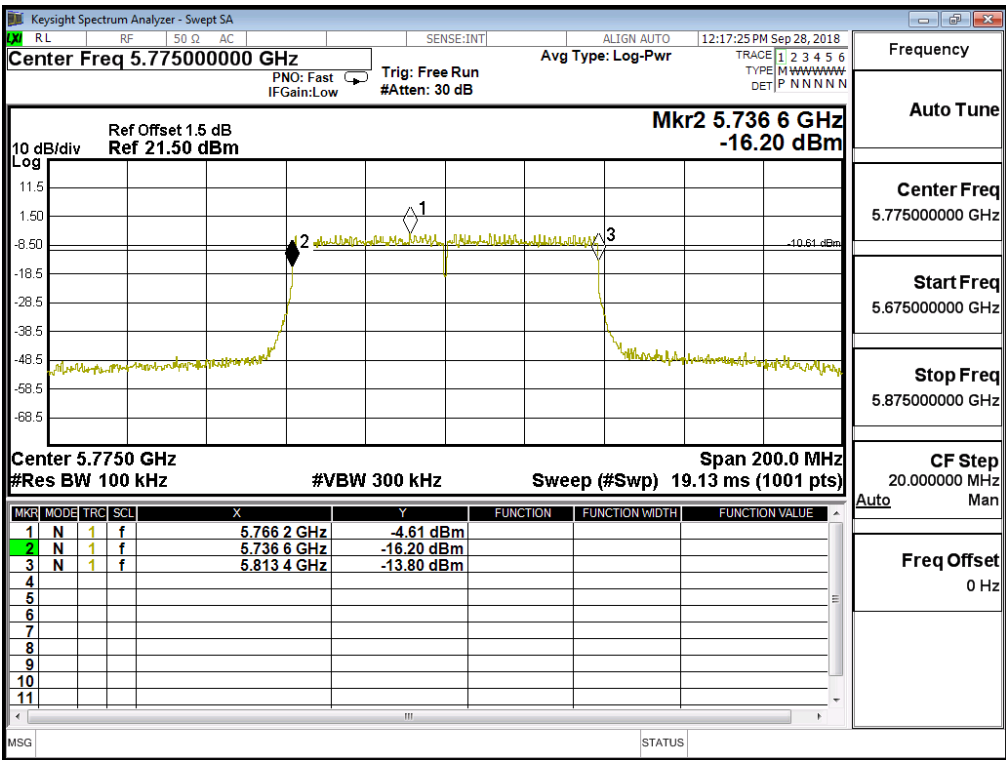
測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
155	5775	76800	>500	Pass

Figure Channel 155



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 3: MIMO: 發射器 802.11n-20BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Chain	Measurement Level (kHz)	Required Limit (kHz)	Result
149	5745	A	17800	>500	Pass
157	5785	A	17800	>500	Pass
165	5825	A	17800	>500	Pass
149	5745	B	17800	>500	Pass
157	5785	B	17850	>500	Pass
165	5825	B	17800	>500	Pass

Figure Channel 149 (Chain A)

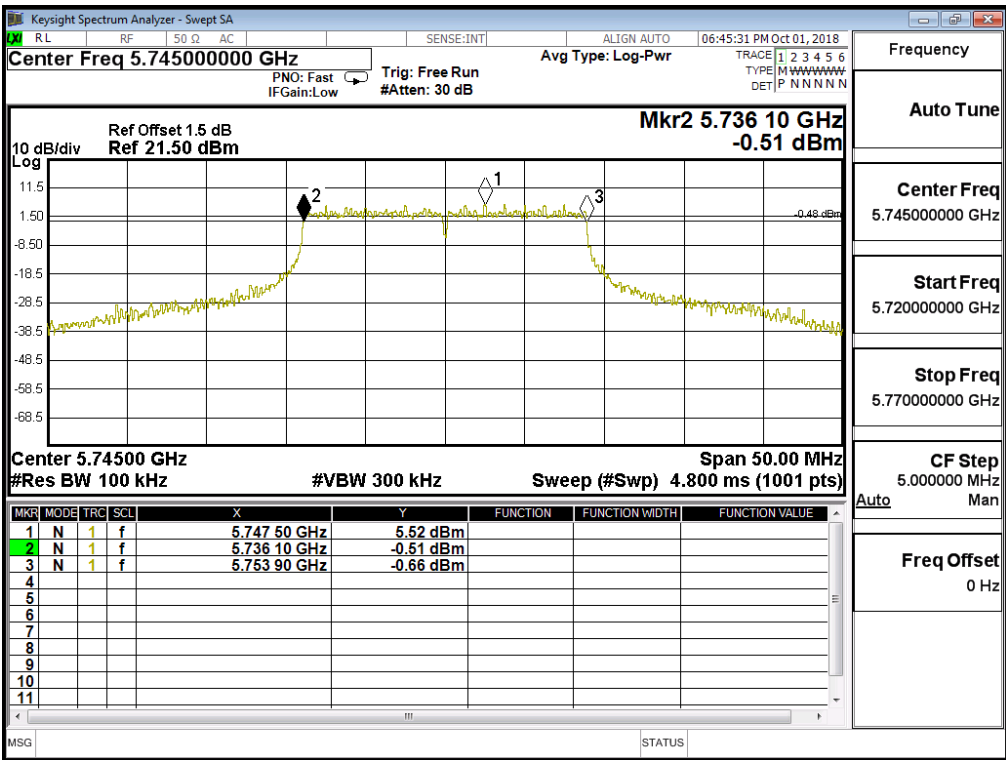


Figure Channel 149 (Chain B)

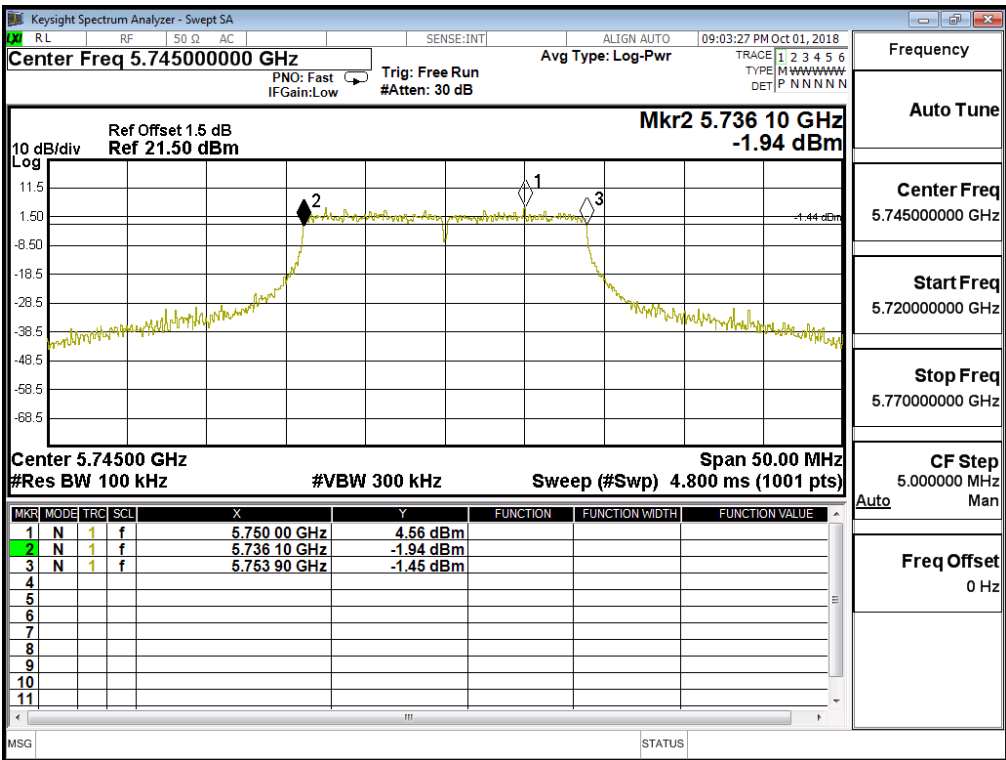


Figure Channel 157 (Chain A)

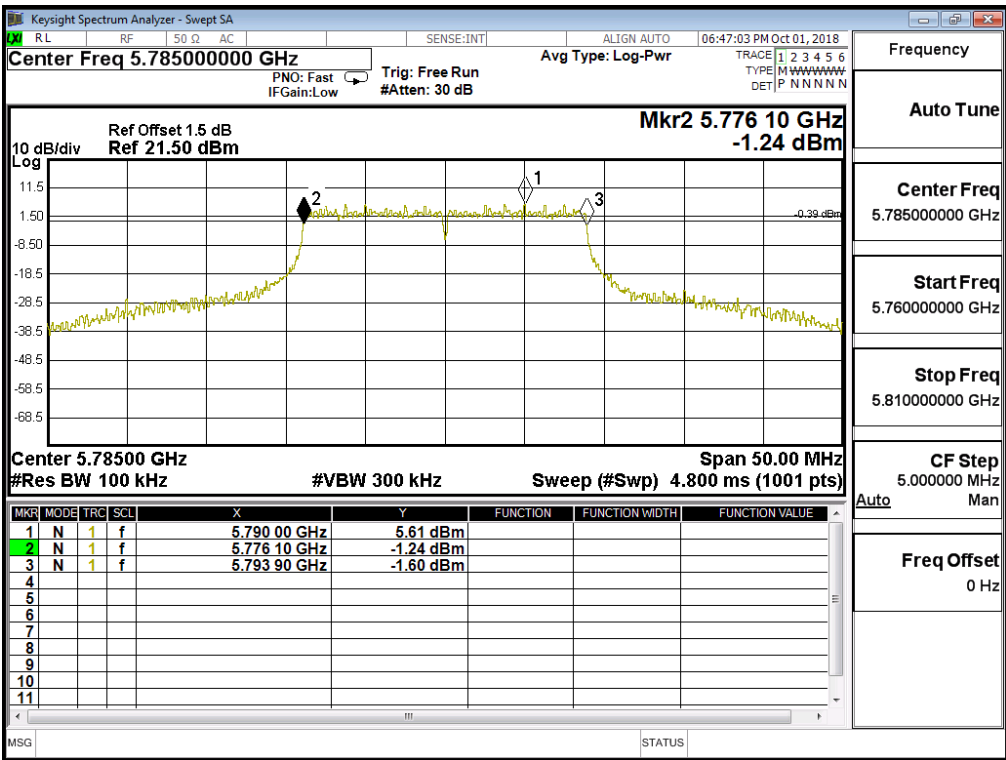


Figure Channel 157 (Chain B)

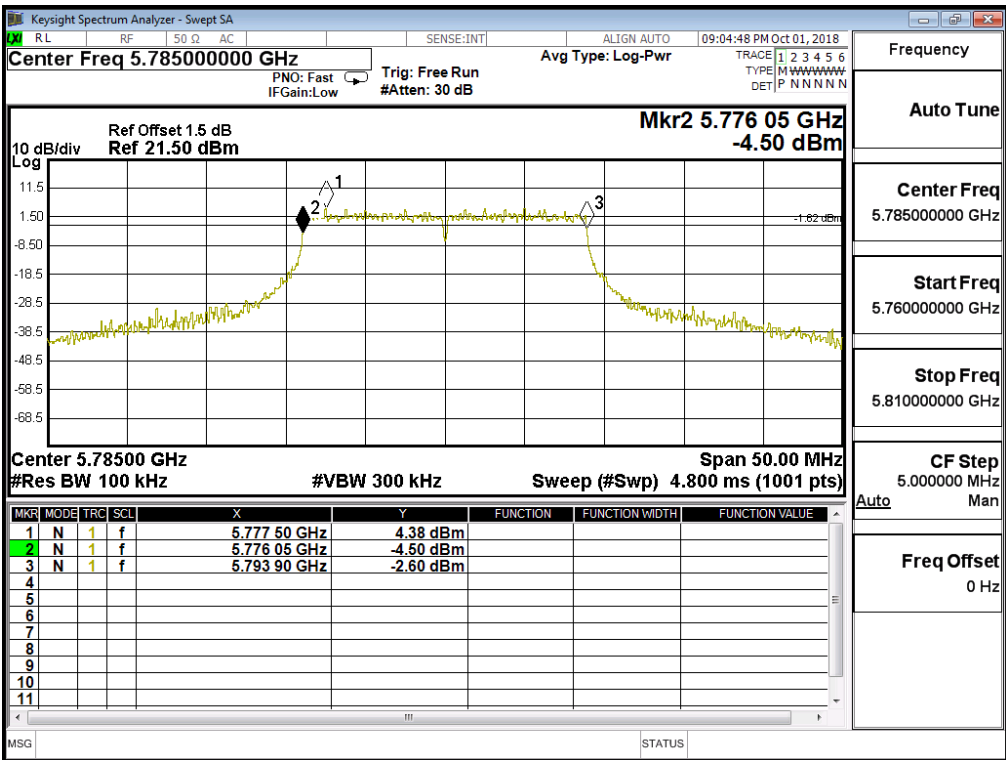


Figure Channel 165 (Chain A)

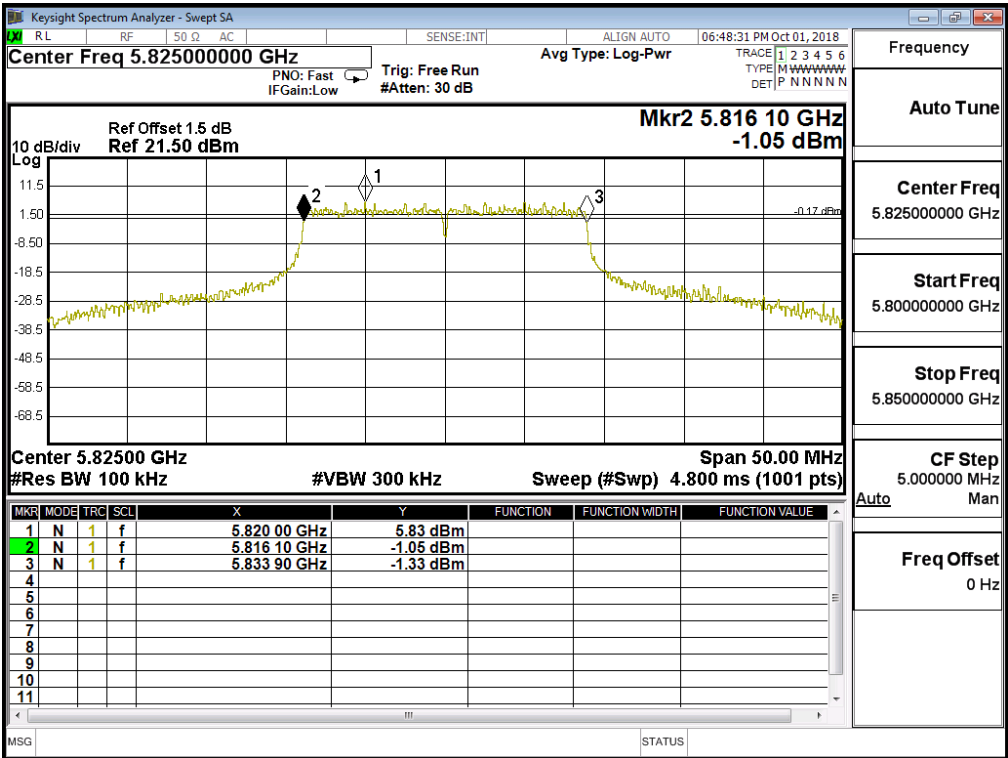
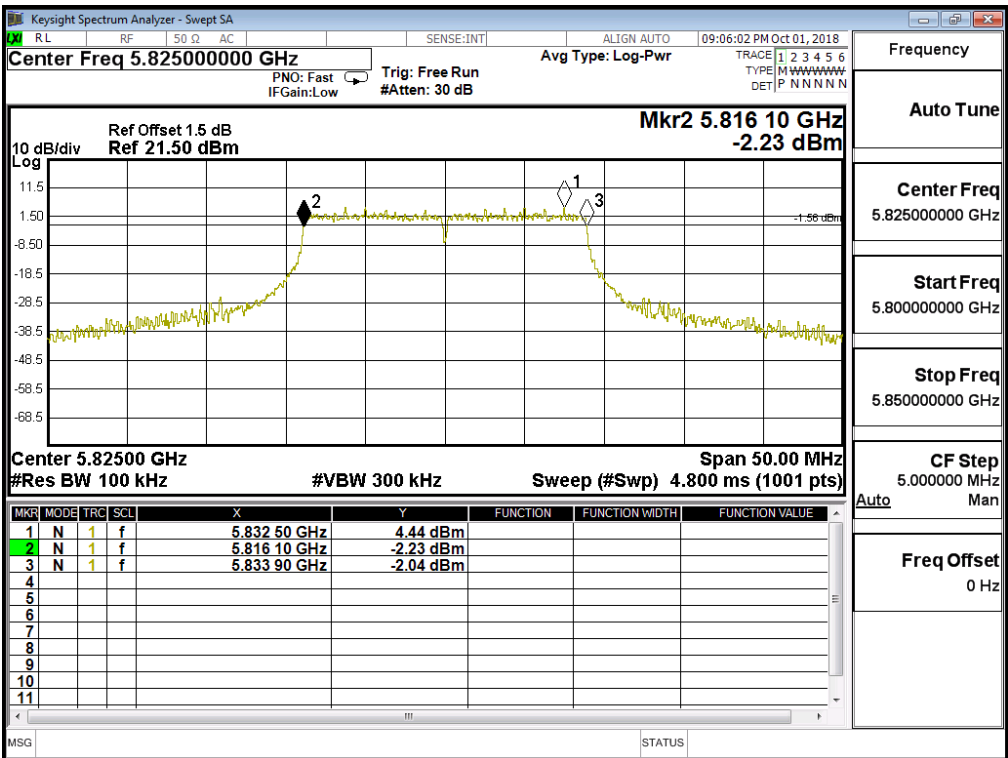


Figure Channel 165 (Chain B)



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 3: MIMO: 發射器 802.11n-40BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Chain	Measurement Level (kHz)	Required Limit (kHz)	Result
151	5755	A	36600	>500	Pass
159	5795	A	36600	>500	Pass
151	5755	B	36700	>500	Pass
159	5795	B	36600	>500	Pass

Figure Channel 151 (Chain A)

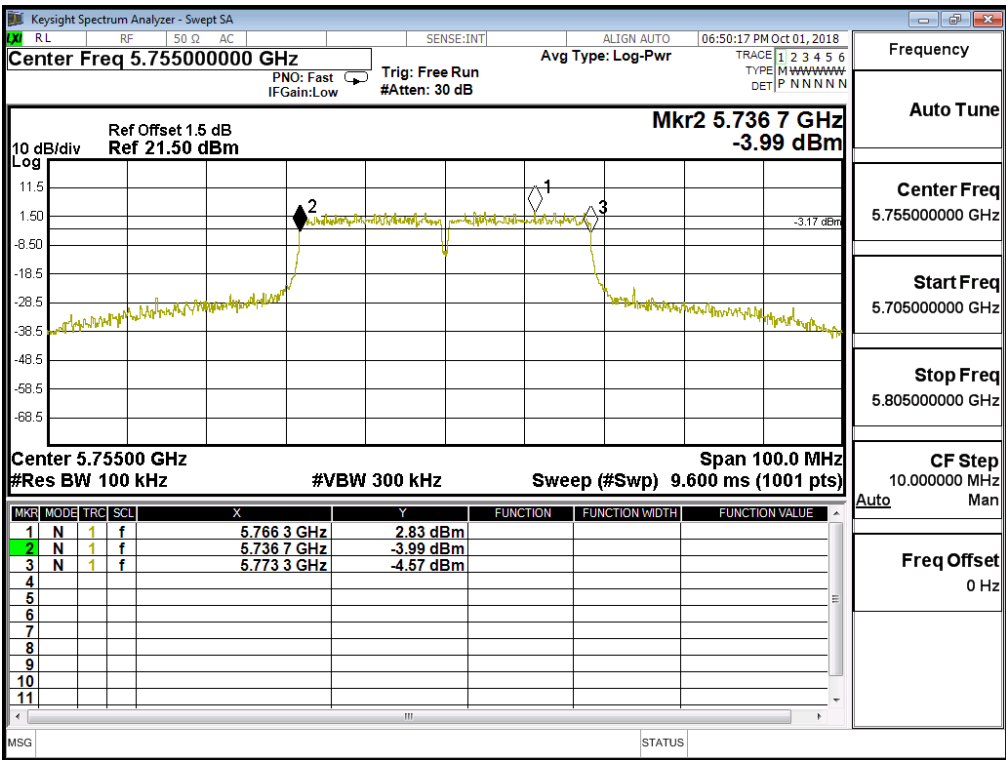


Figure Channel 151 (Chain B)

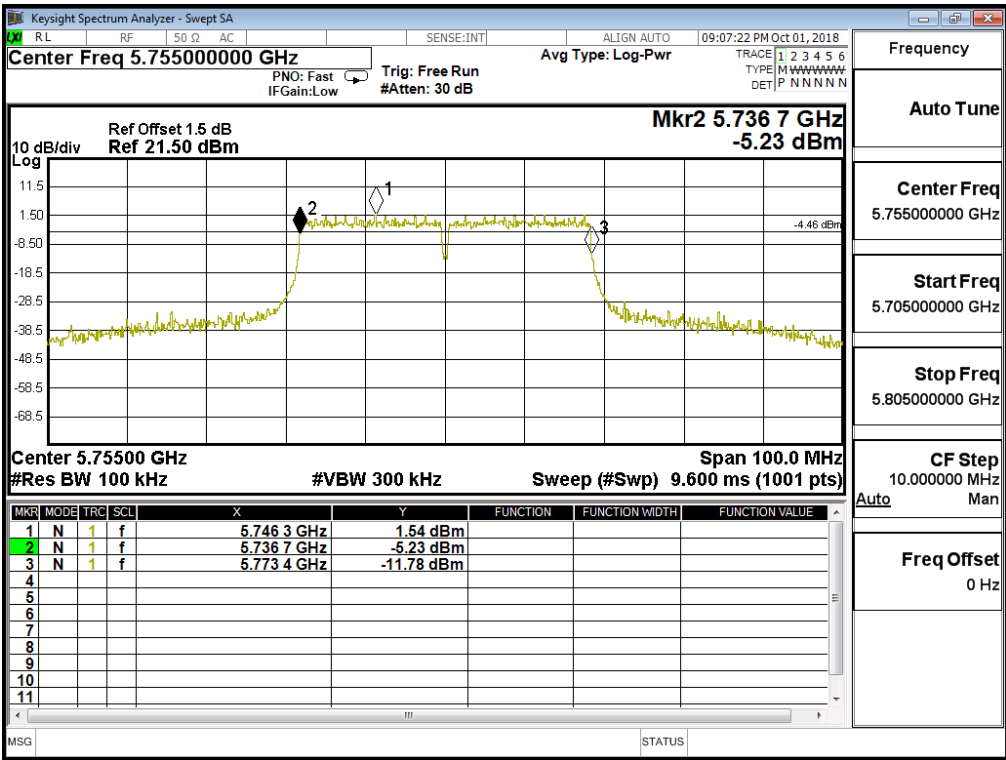


Figure Channel 159 (Chain A)

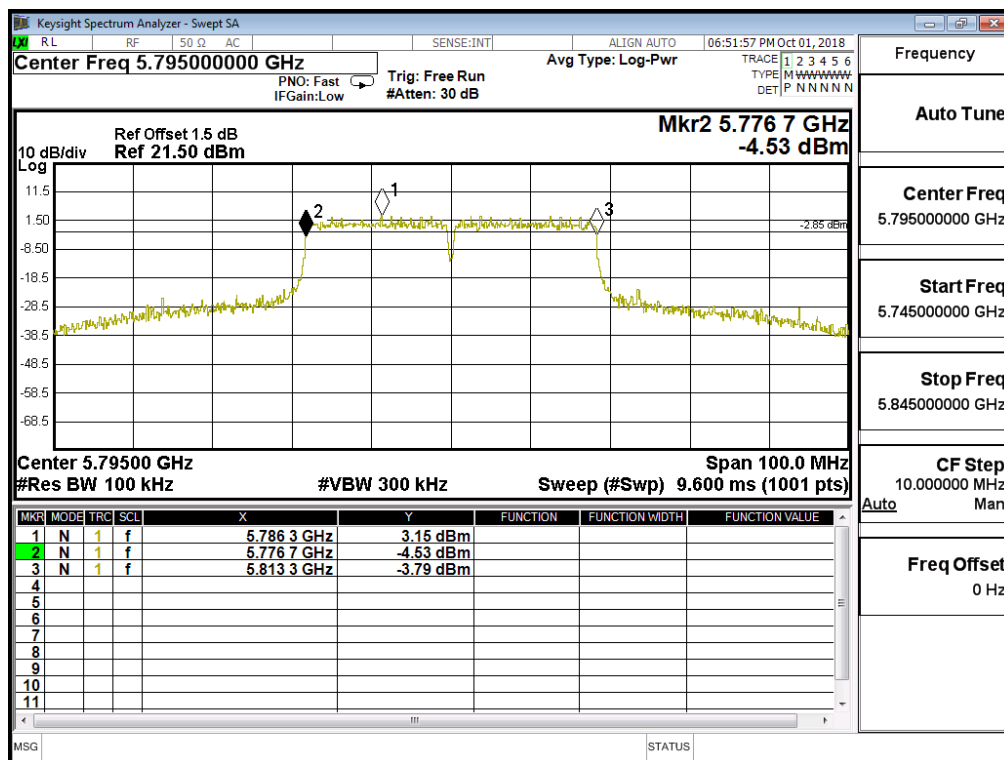
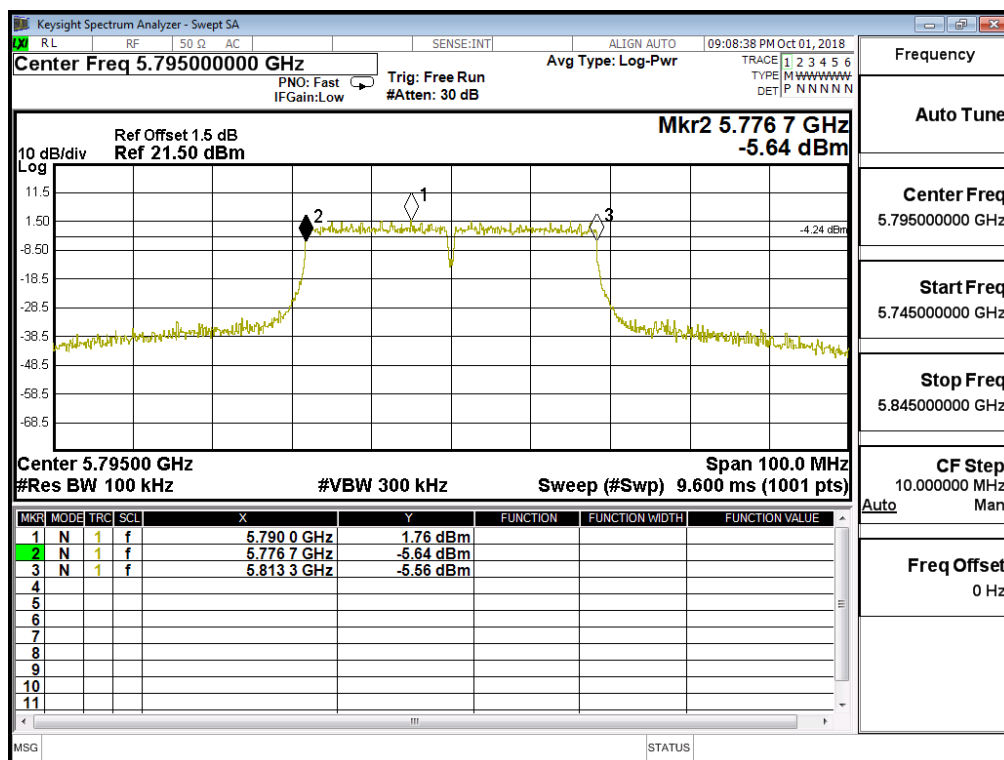


Figure Channel 159 (Chain B)



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 3: MIMO: 發射器 802.11ac-80BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Chain	Measurement Level (kHz)	Required Limit (kHz)	Result
155	5775	A	76800	>500	Pass
155	5775	B	76800	>500	Pass

Figure Channel 155 (Chain A)

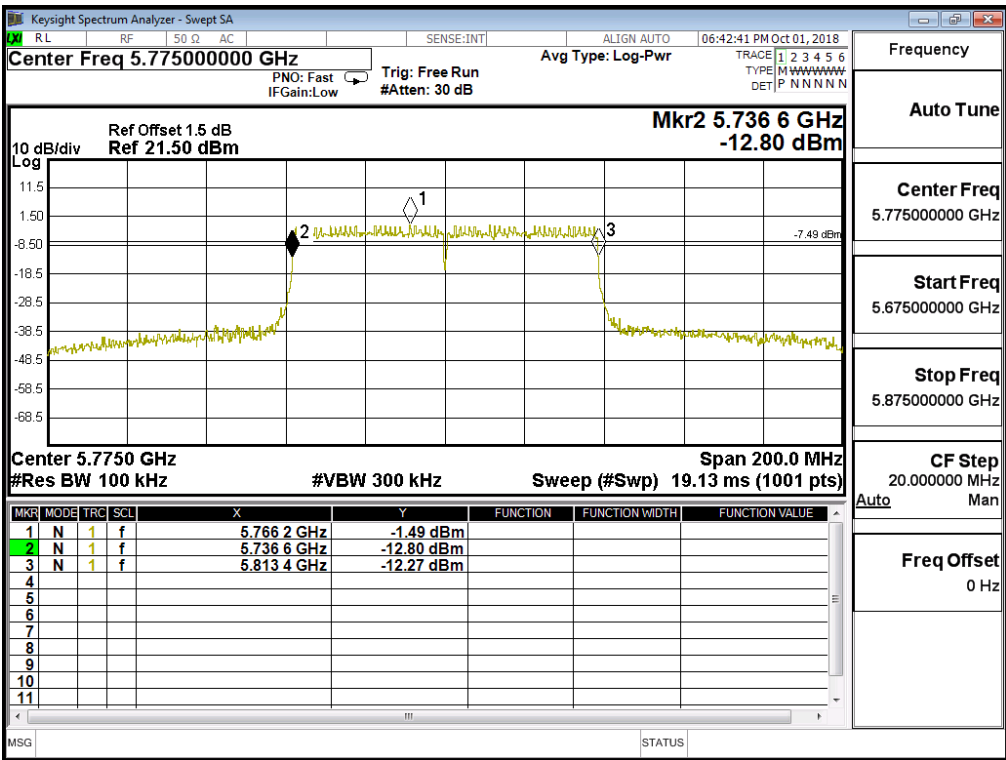
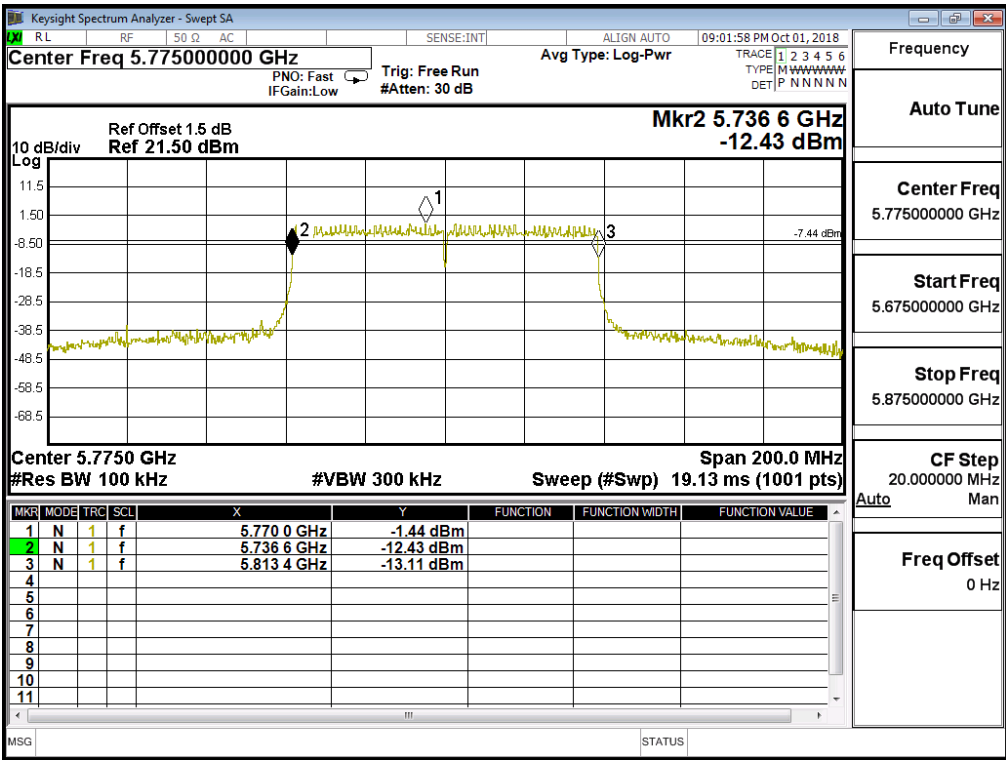


Figure Channel 155 (Chain B)



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 1: SISO A: 發射器 802.11ax-20BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
149	5745	19150	>500	Pass
157	5785	19050	>500	Pass
165	5825	19150	>500	Pass

Figure Channel 149

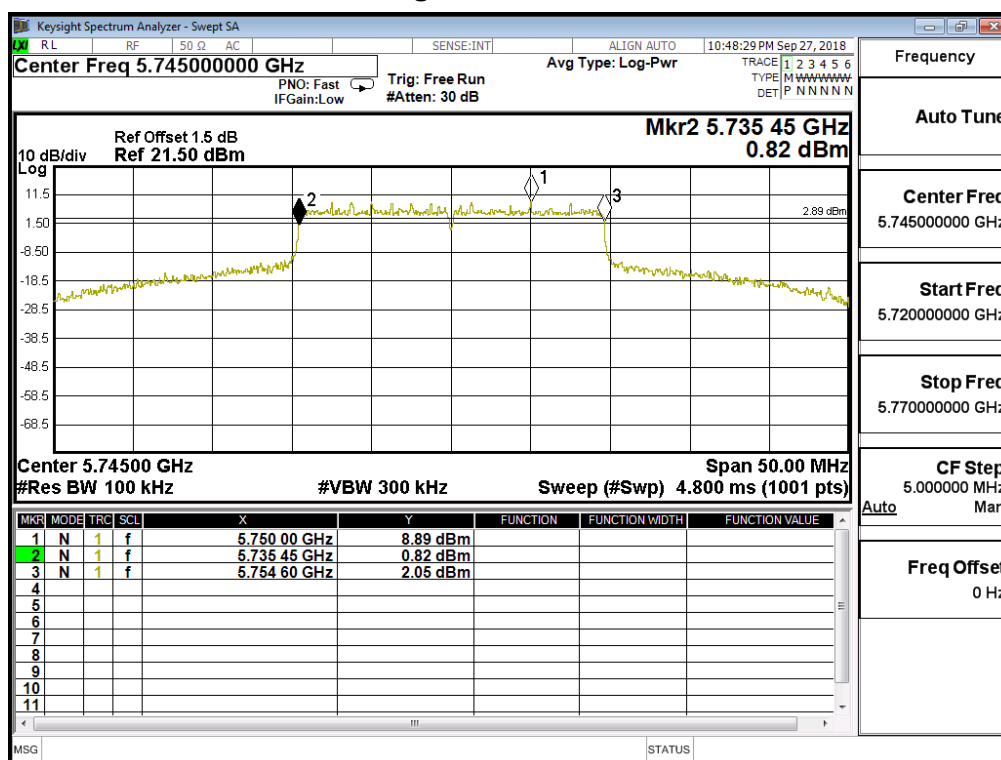


Figure Channel 157

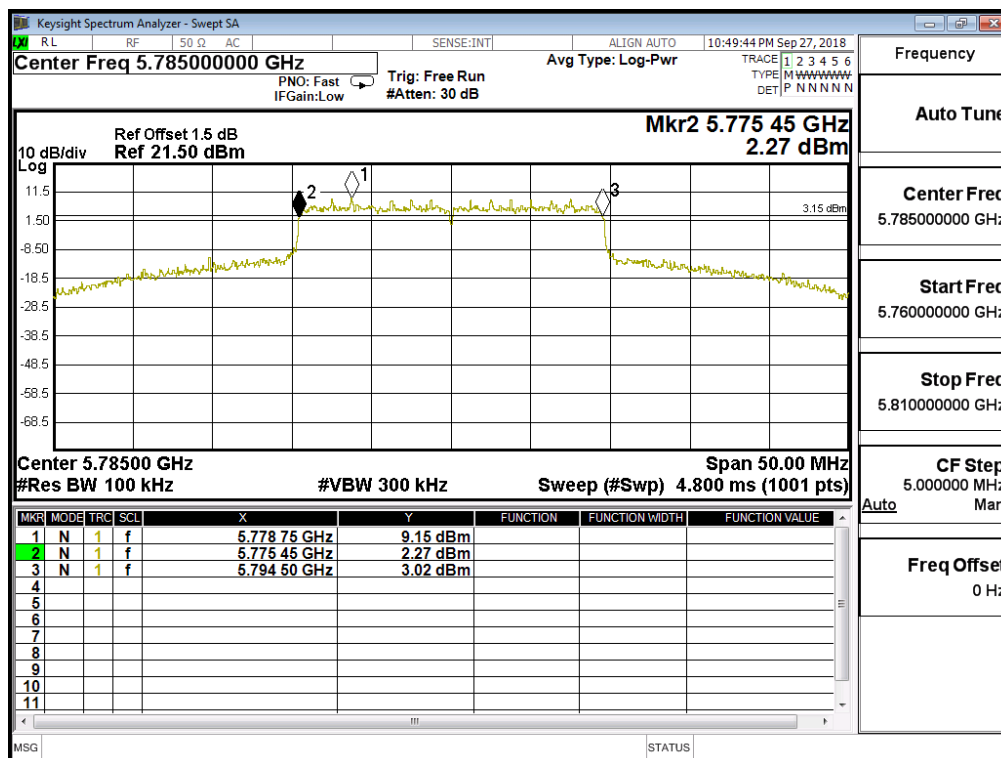
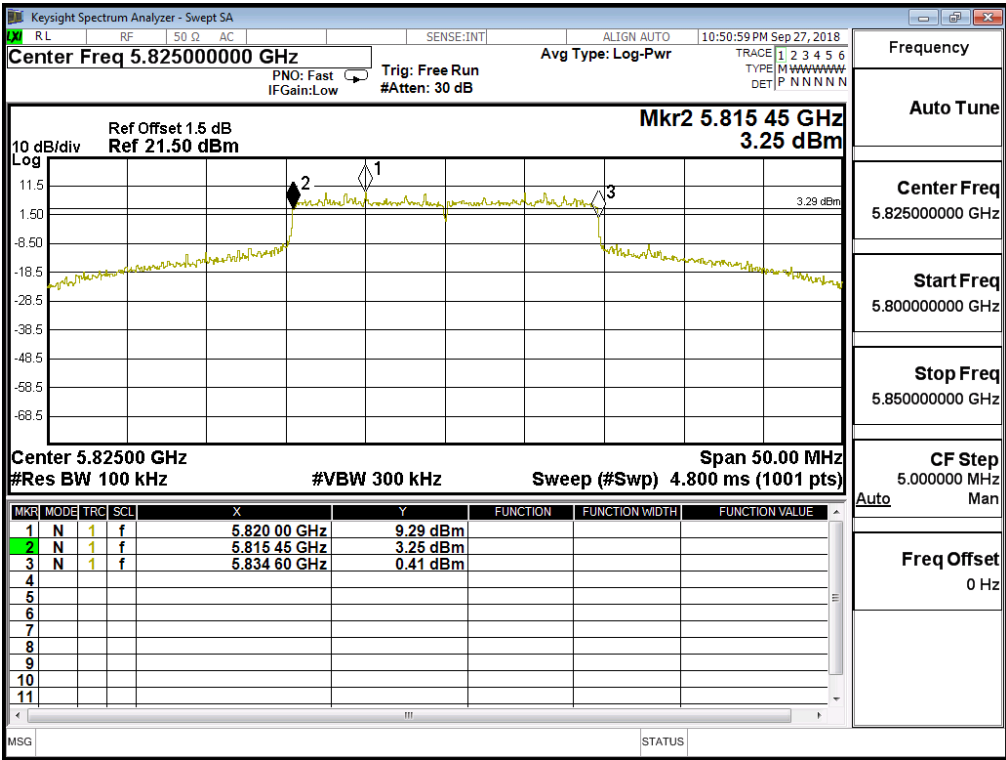


Figure Channel 165



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 1: SISO A: 發射器 802.11ax-40BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
151	5755	38200	>500	Pass
159	5795	38300	>500	Pass

Figure Channel 151

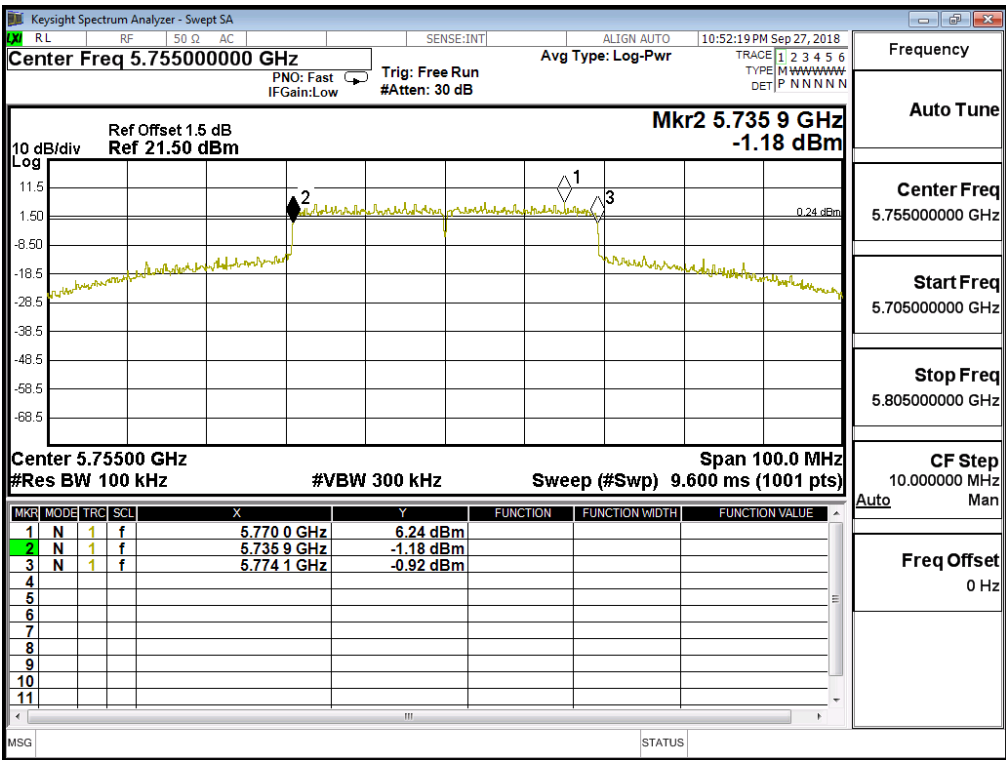
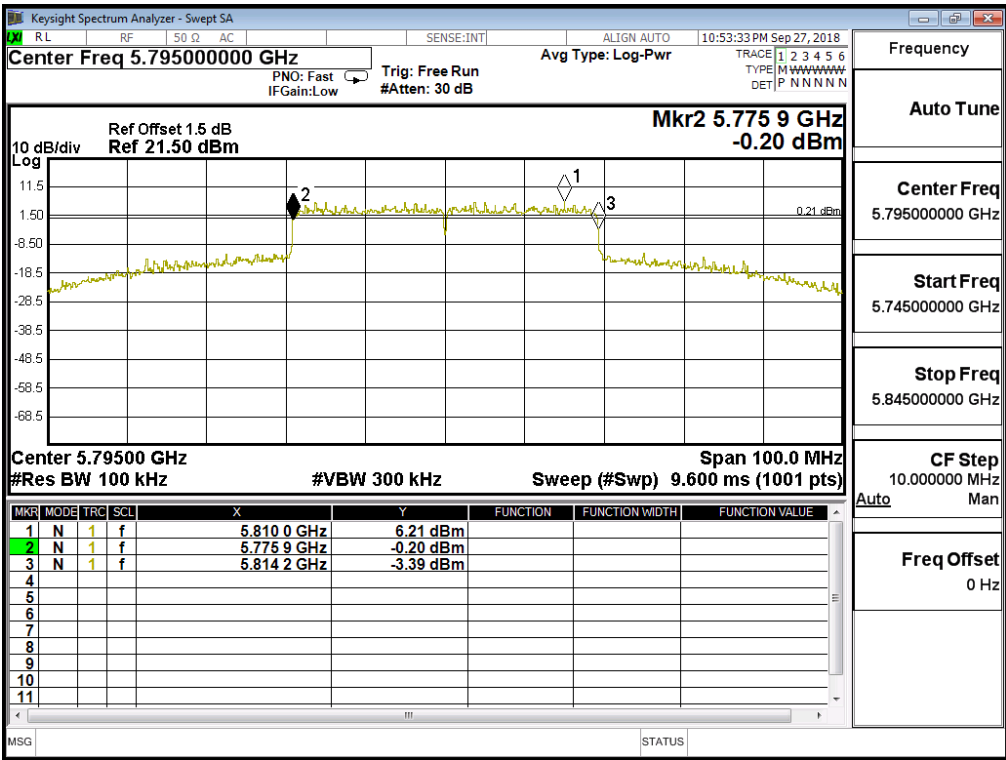


Figure Channel 159



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 1: SISO A: 發射器 802.11ax-80BW

視頻頻寬：300kHz

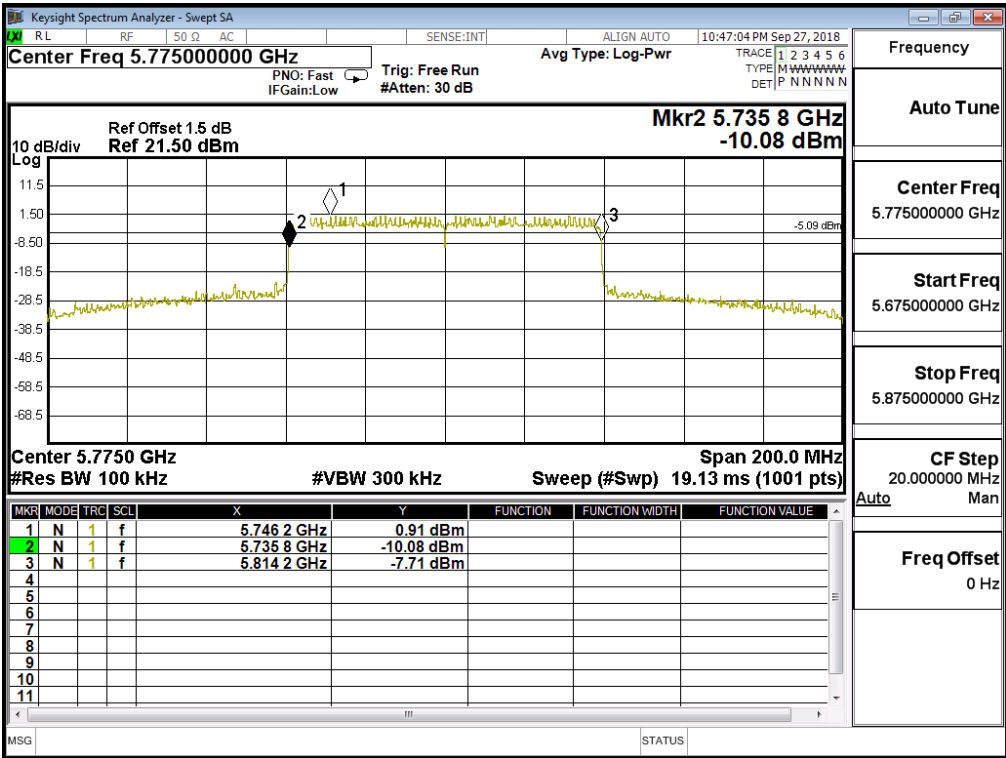
測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
155	5775	78400	>500	Pass

Figure Channel 155



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 2: SISO B: 發射器 802.11ax-20BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
149	5745	19100	>500	Pass
157	5785	19100	>500	Pass
165	5825	19150	>500	Pass

Figure Channel 149

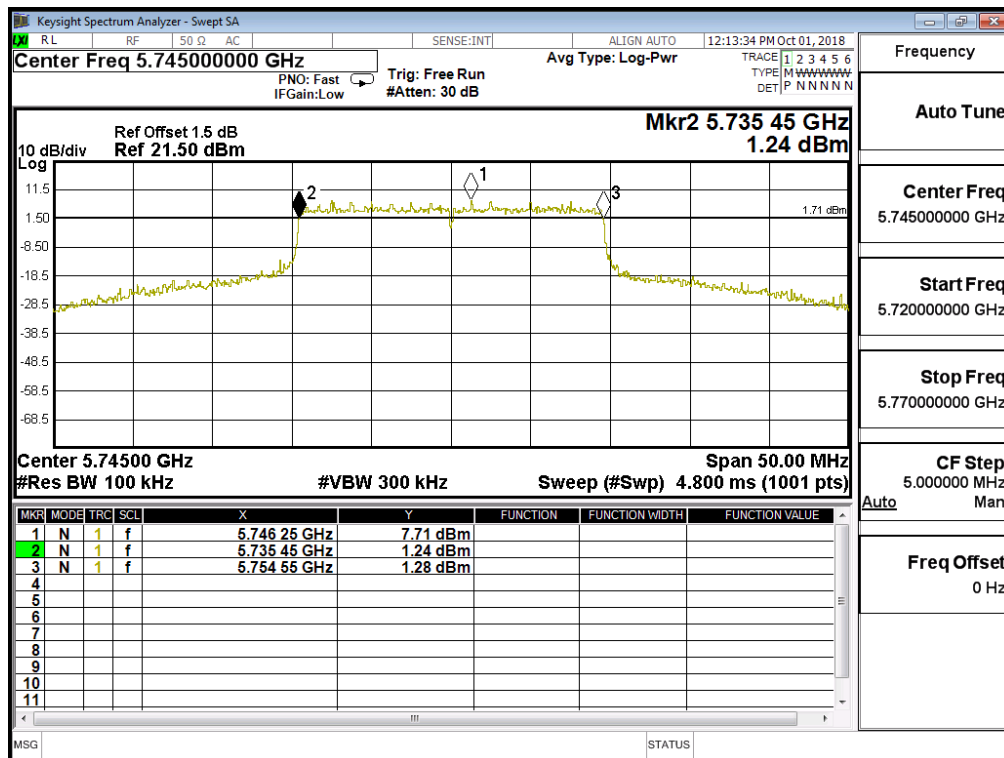


Figure Channel 157

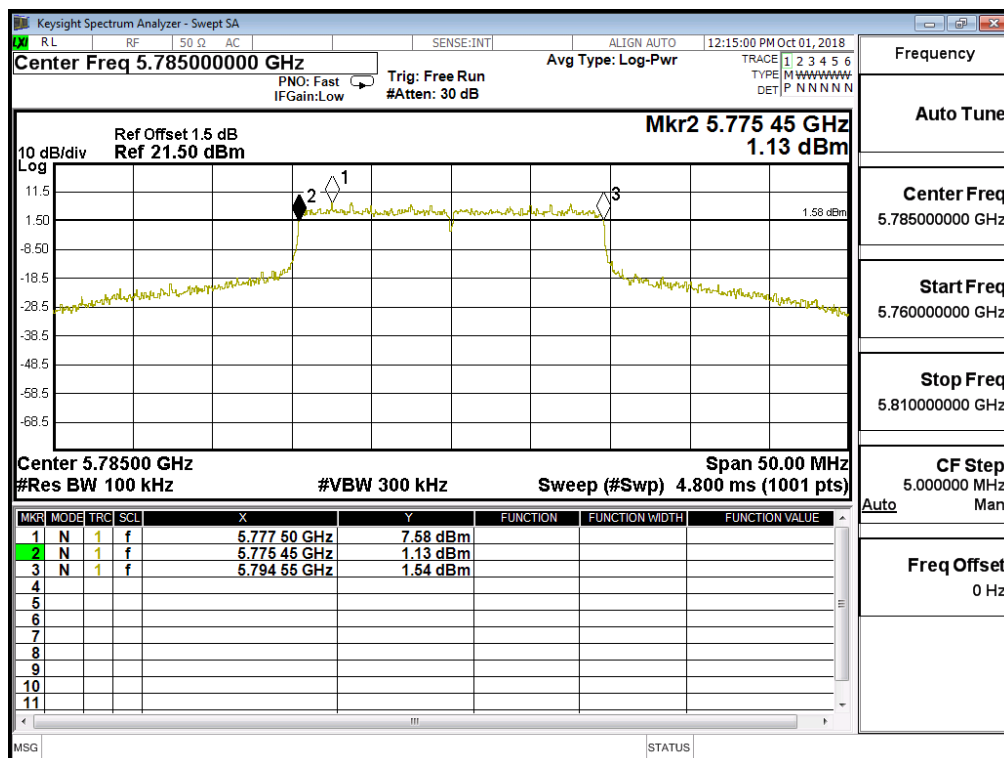
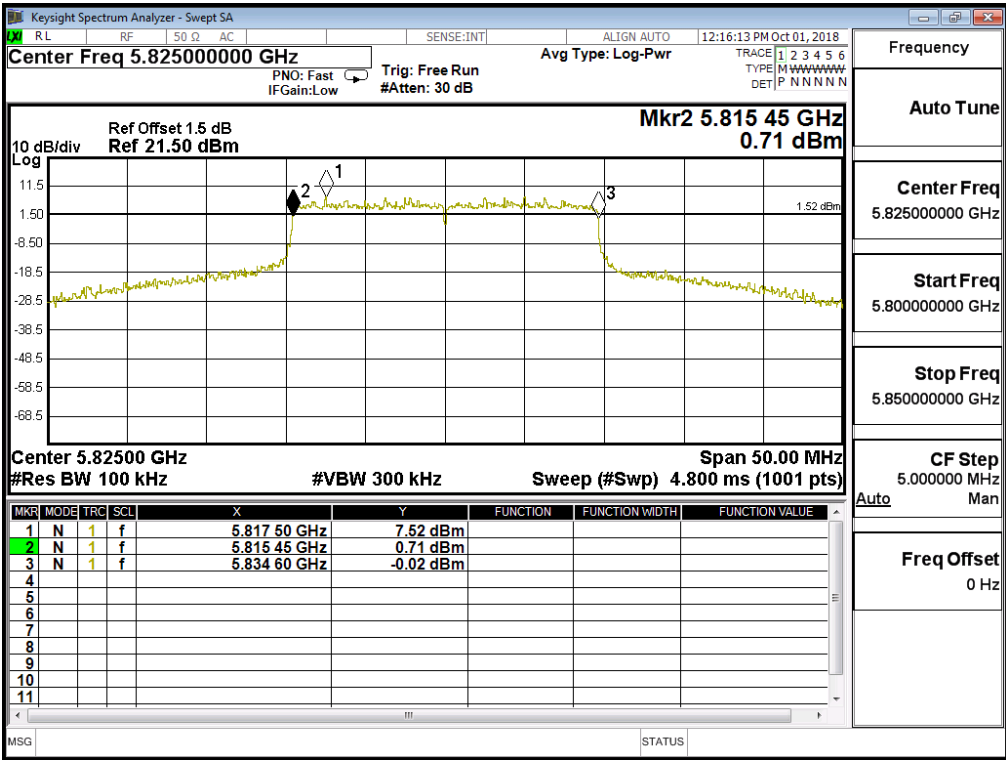


Figure Channel 165



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 2: SISO B: 發射器 802.11ax-40BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
151	5755	38200	>500	Pass
159	5795	38200	>500	Pass

Figure Channel 151

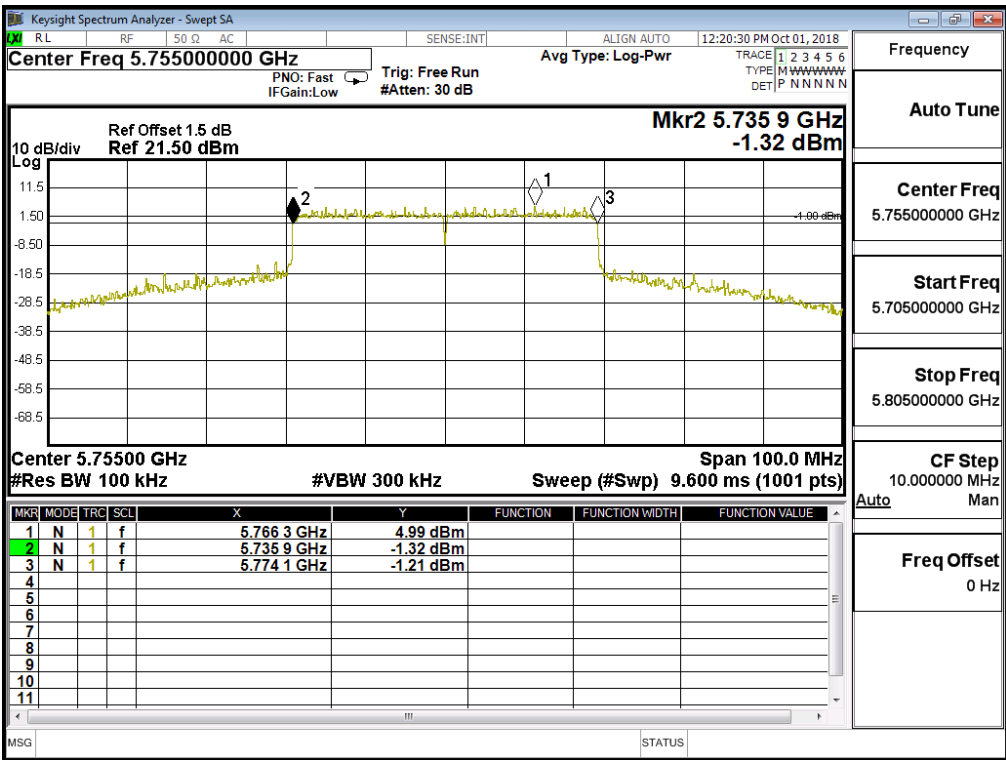
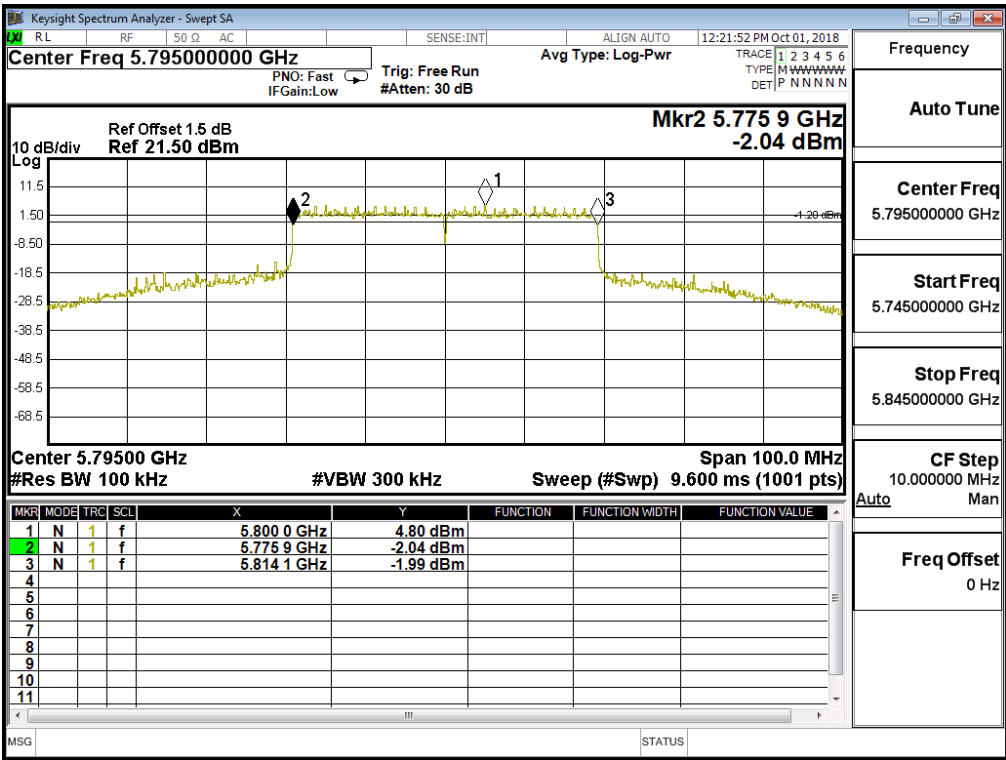


Figure Channel 159



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 2: SISO B: 發射器 802.11ax-80BW

視頻頻寬：300kHz

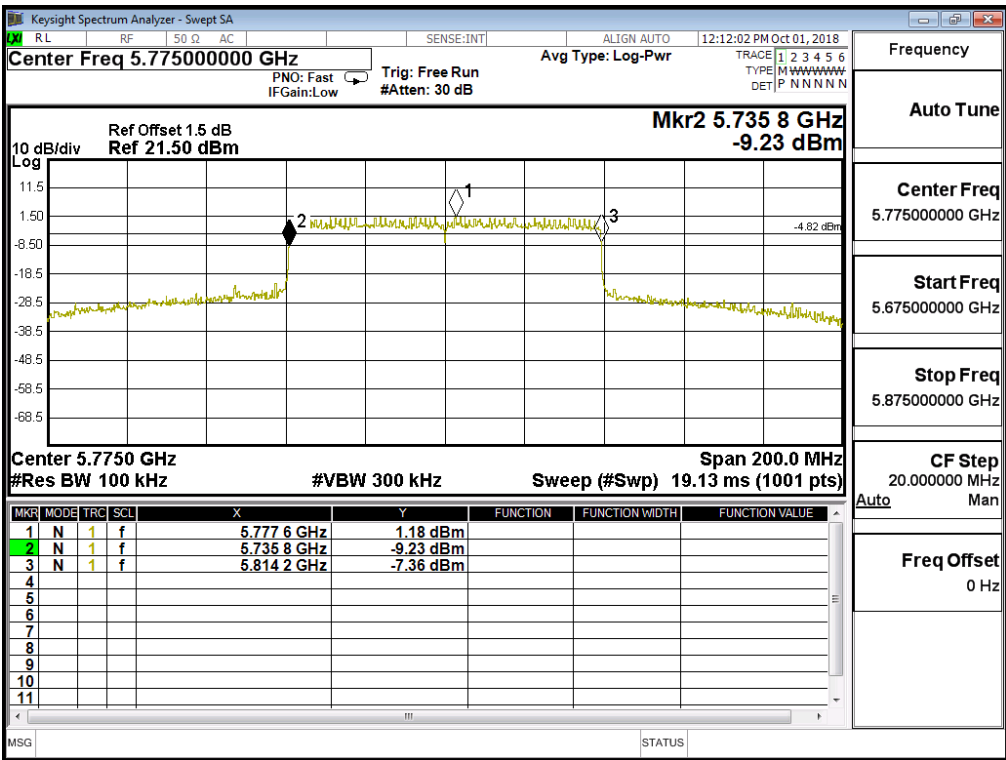
測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
155	5775	78400	>500	Pass

Figure Channel 155



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 3: MIMO: 發射器 802.11ax-20BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Chain	Measurement Level (kHz)	Required Limit (kHz)	Result
149	5745	A	19100	>500	Pass
157	5785	A	19150	>500	Pass
165	5825	A	19200	>500	Pass
149	5745	B	19150	>500	Pass
157	5785	B	19100	>500	Pass
165	5825	B	19100	>500	Pass

Figure Channel 149 (Chain A)

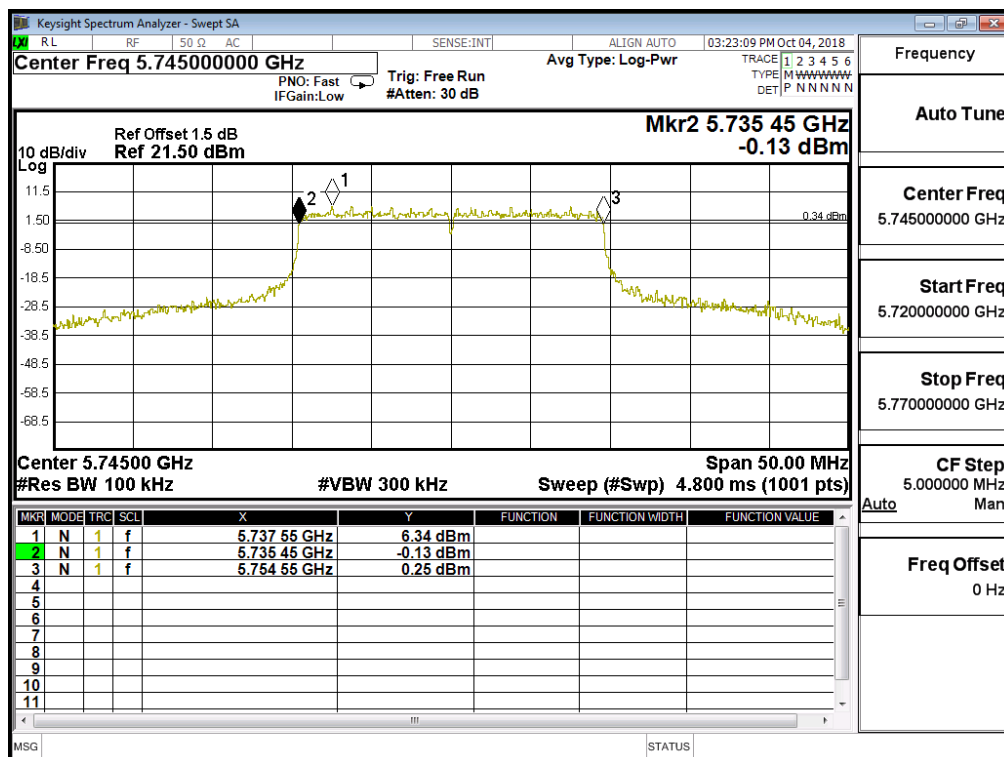


Figure Channel 149 (Chain B)

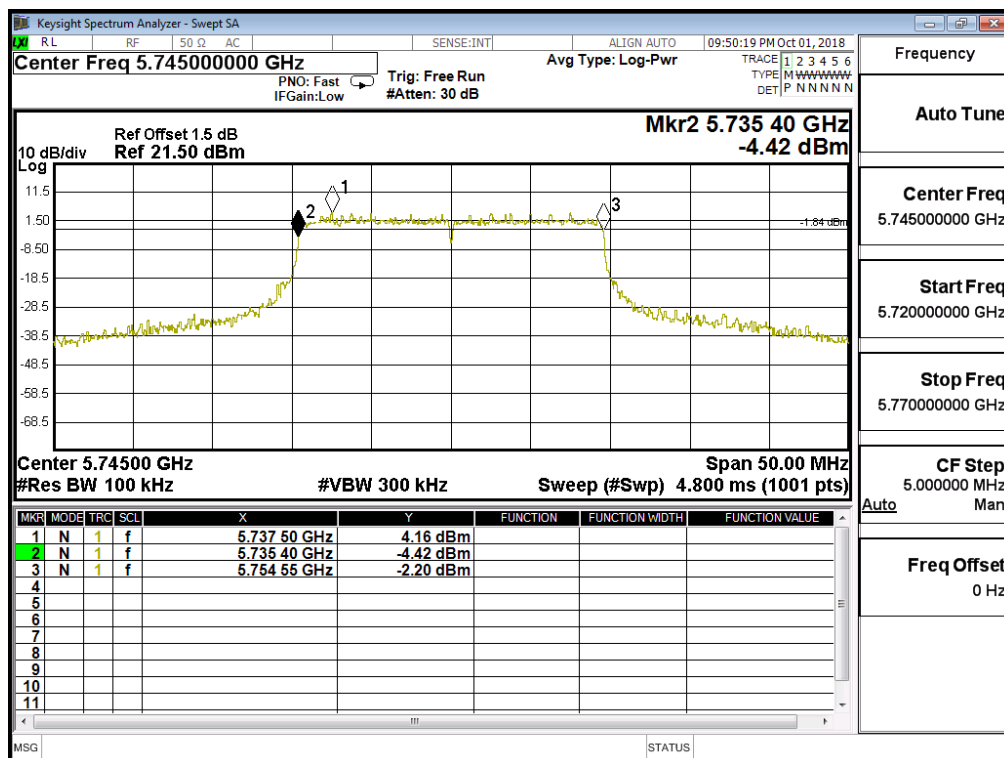


Figure Channel 157 (Chain A)

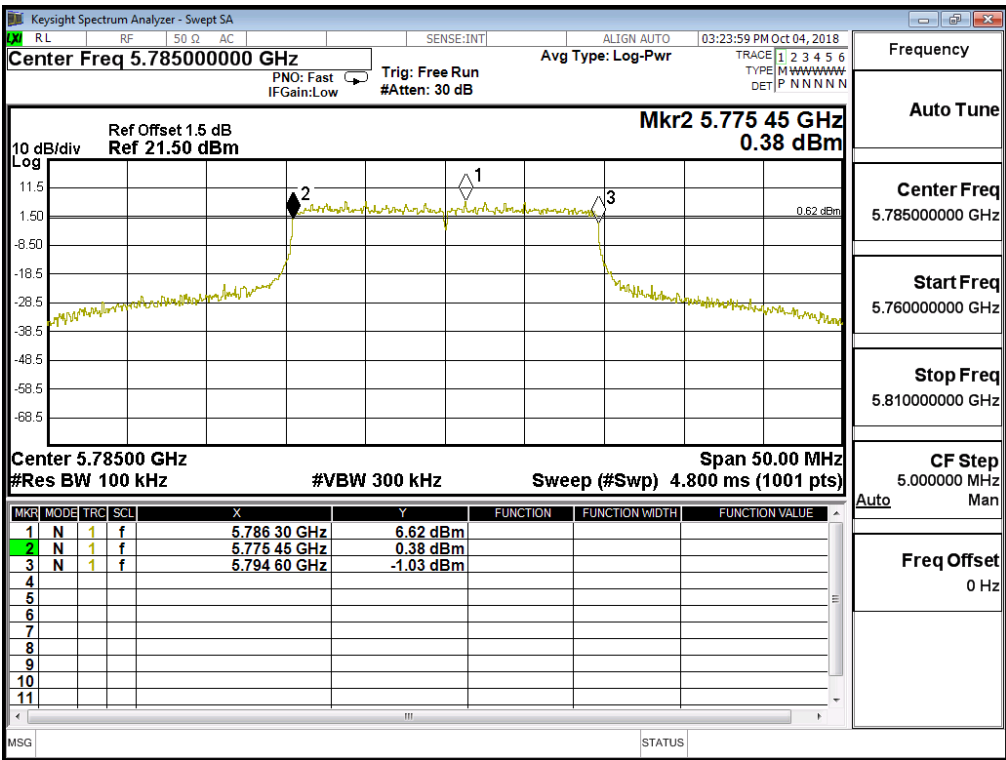


Figure Channel 157 (Chain B)

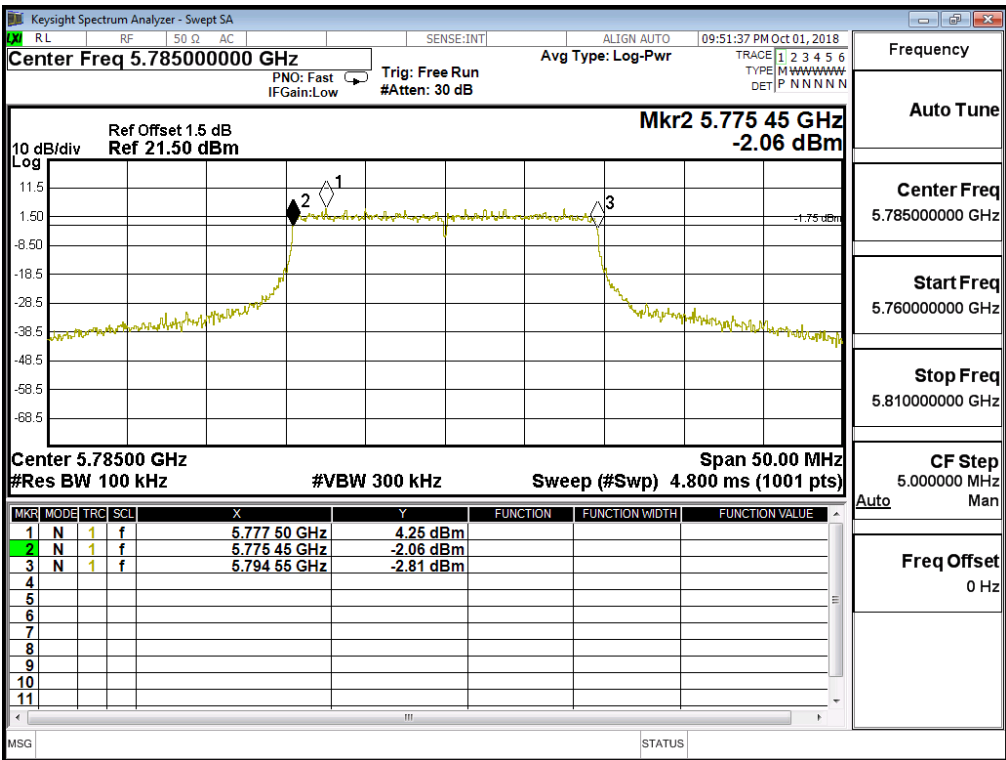


Figure Channel 165 (Chain A)

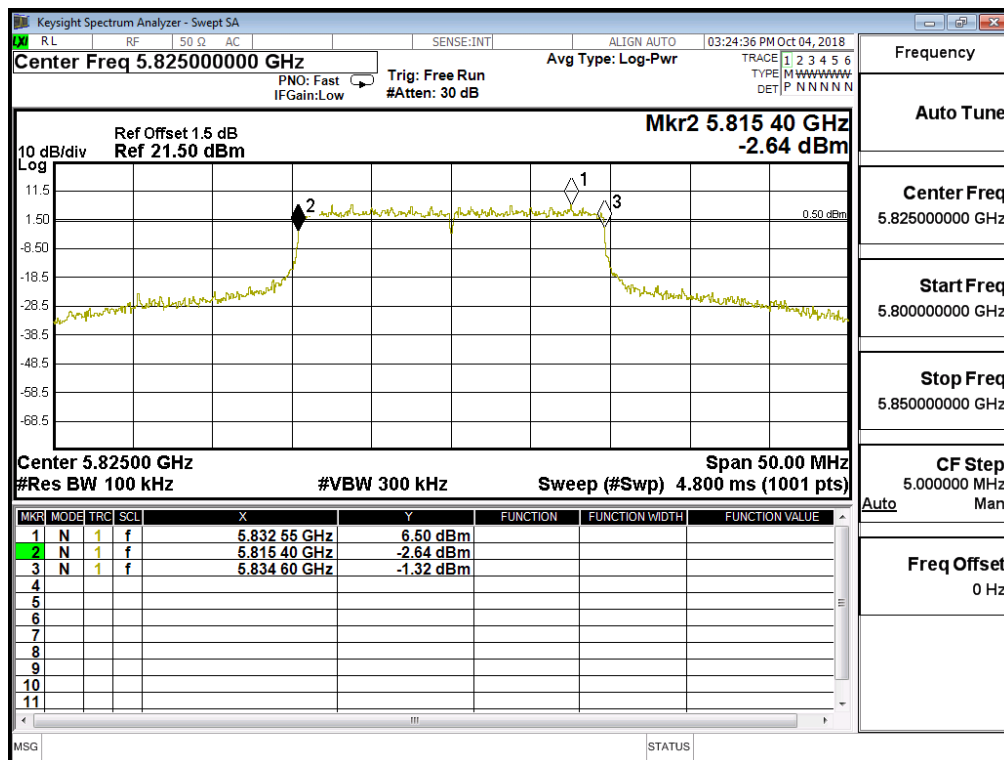
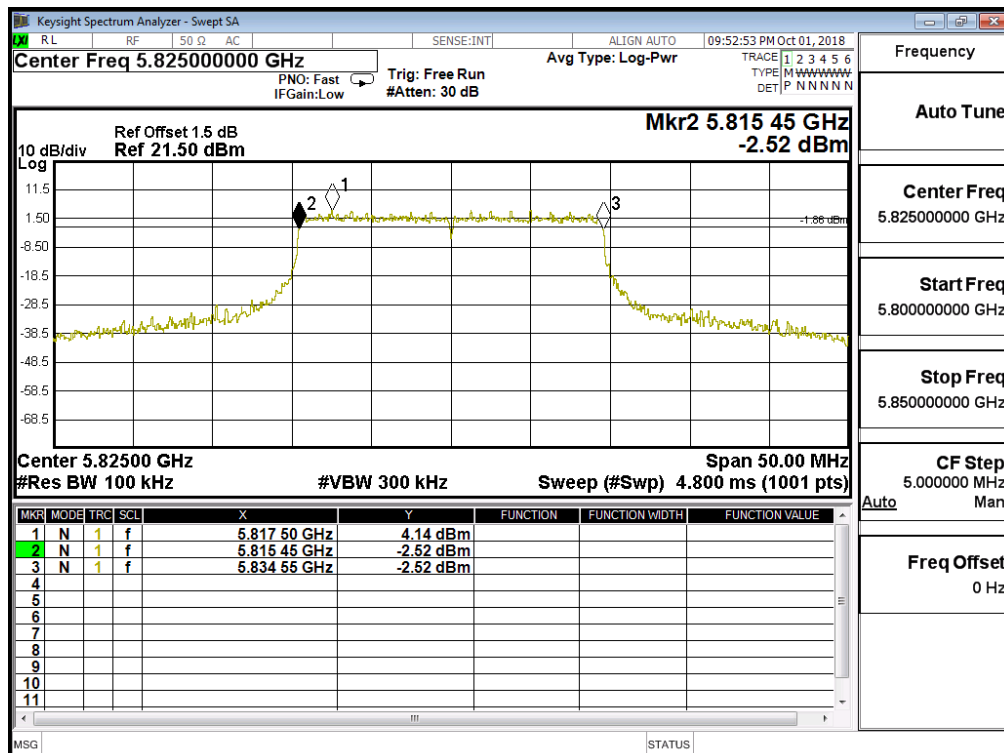


Figure Channel 165 (Chain B)



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 3: MIMO: 發射器 802.11ax-40BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Chain	Measurement Level (kHz)	Required Limit (kHz)	Result
151	5755	A	38200	>500	Pass
159	5795	A	38300	>500	Pass
151	5755	B	38200	>500	Pass
159	5795	B	38200	>500	Pass

Figure Channel 151 (Chain A)

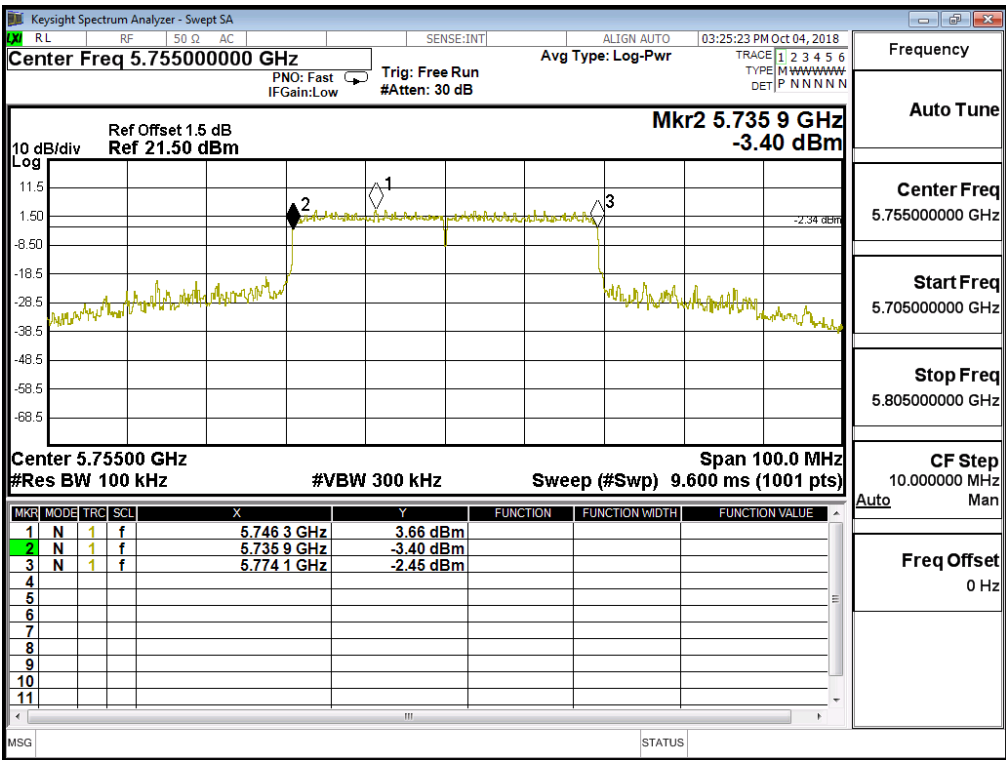


Figure Channel 151 (Chain B)

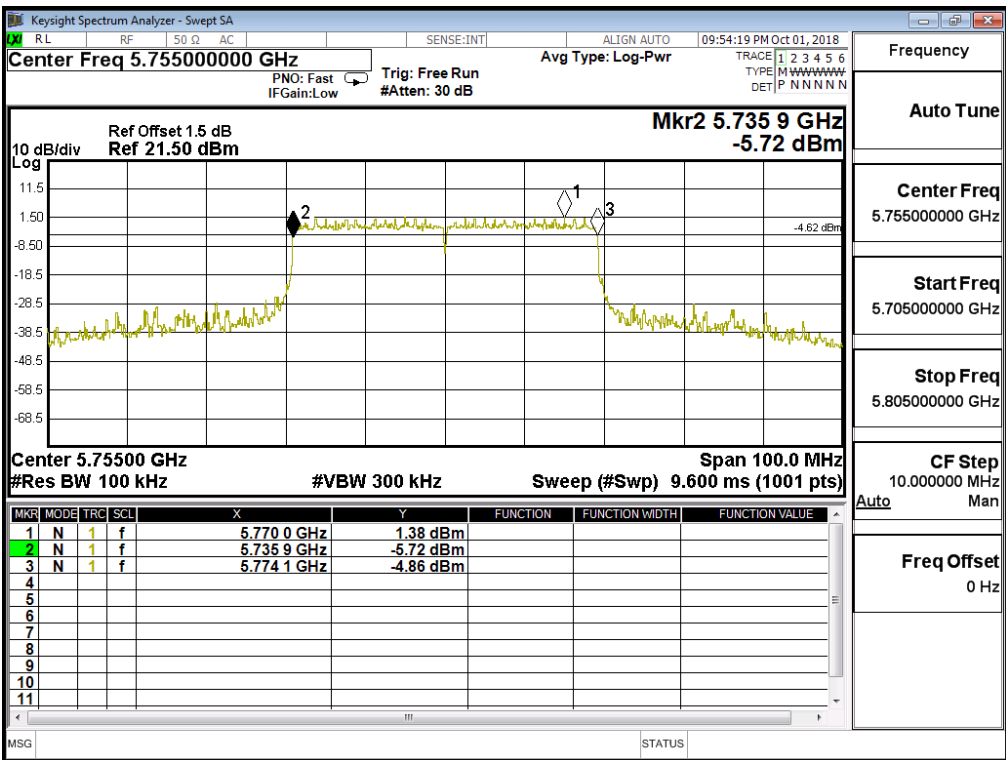


Figure Channel 159 (Chain A)

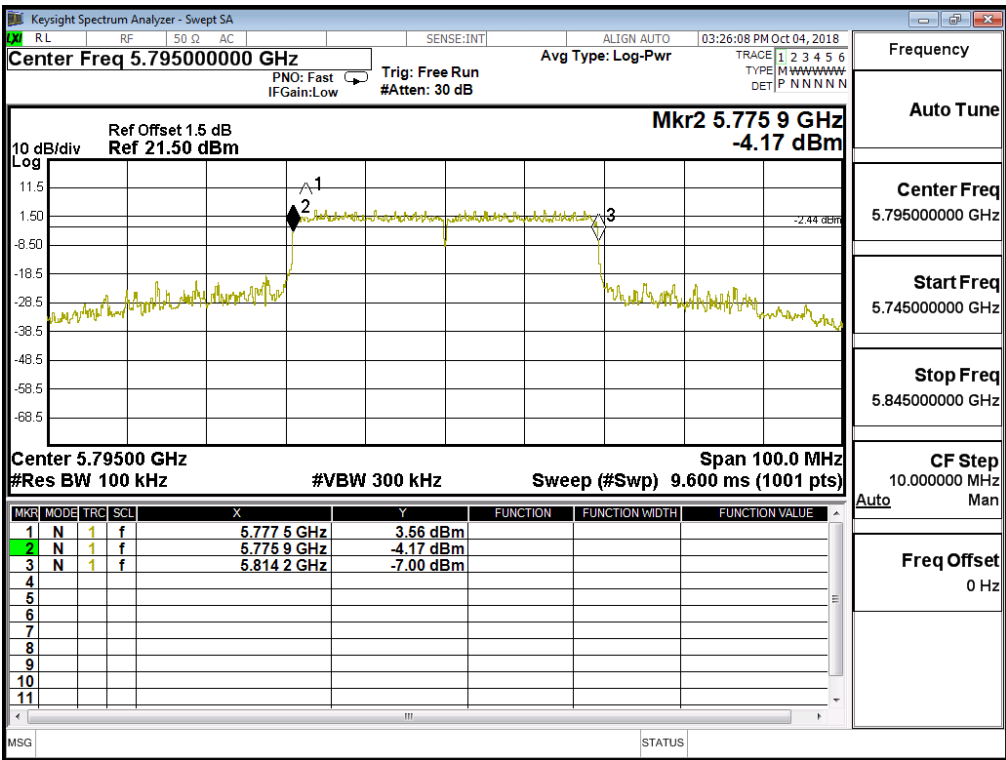
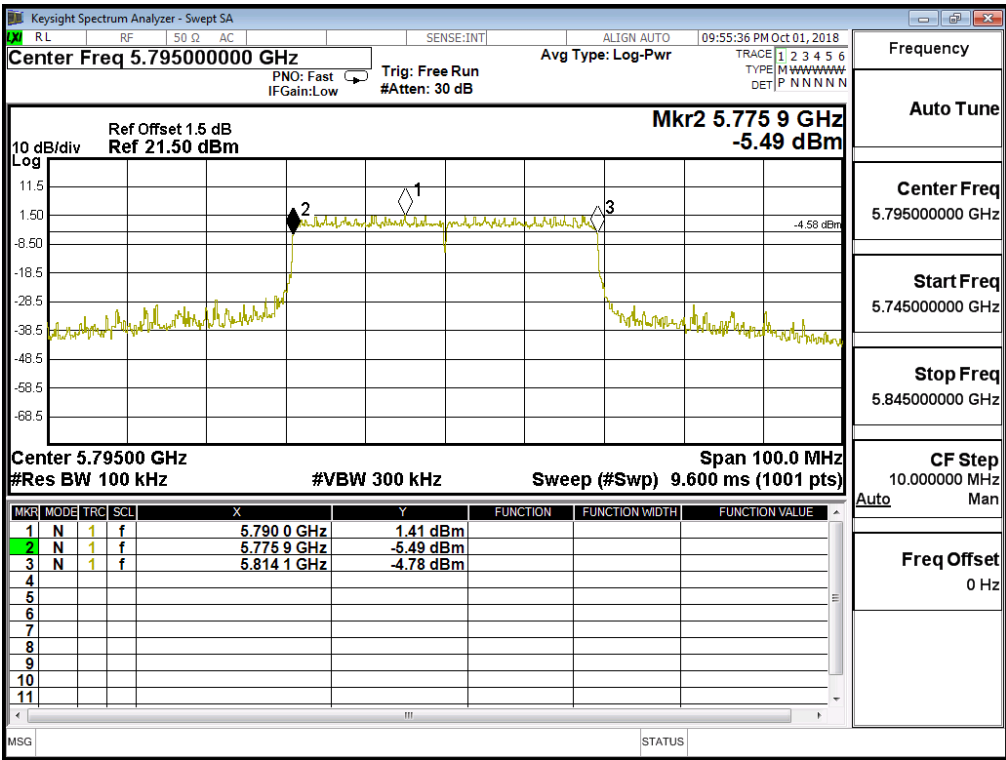


Figure Channel 159 (Chain B)



待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

6 dB 頻寬：100kHz

量測天線：--

檢測器：峰值

測試日期：107 年 09 月 27 日

測試項目：佔用頻帶寬度

測試模式：Mode 3: MIMO: 發射器 802.11ax-80BW

視頻頻寬：300kHz

測試距離：Conducted

環境溫度：20 °C

環境濕度：48 %

Channel No.	Frequency (MHz)	Chain	Measurement Level (kHz)	Required Limit (kHz)	Result
155	5775	A	78400	>500	Pass
155	5775	B	78400	>500	Pass

Figure Channel 155 (Chain A)

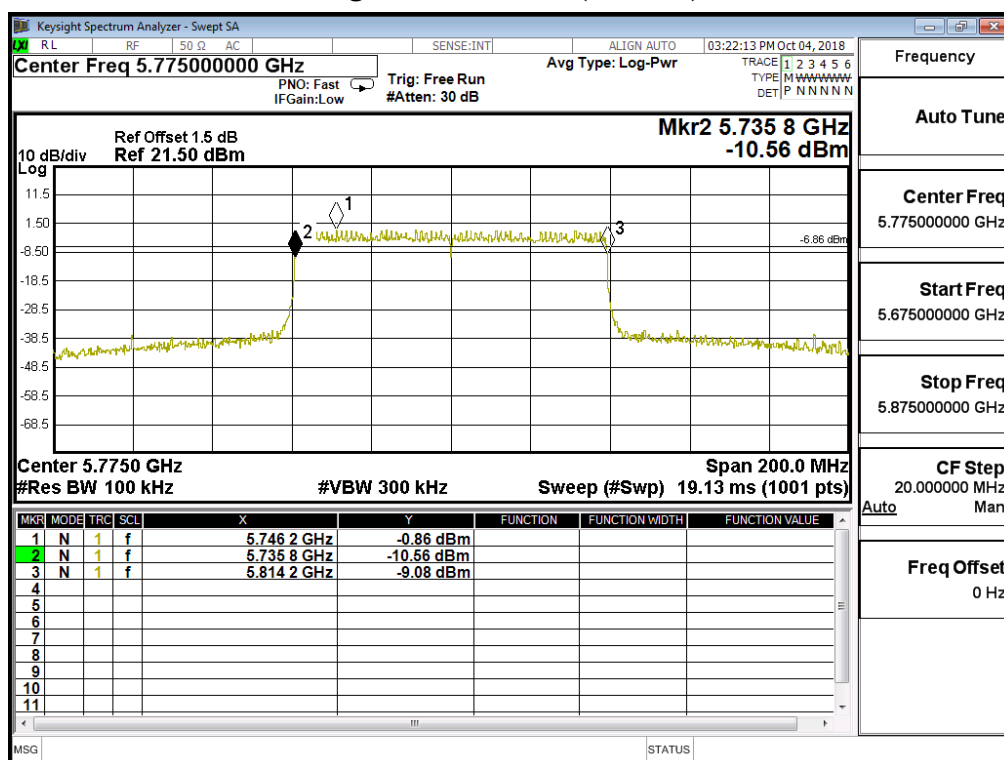
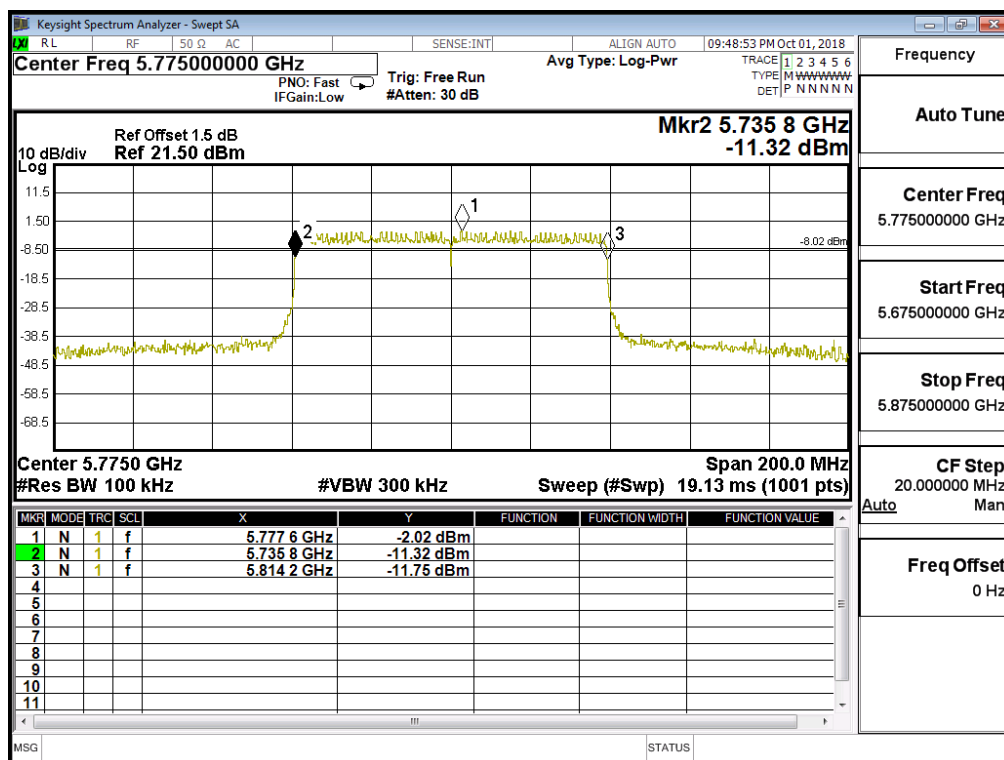


Figure Channel 155 (Chain B)



佔用頻帶寬度測試結果:

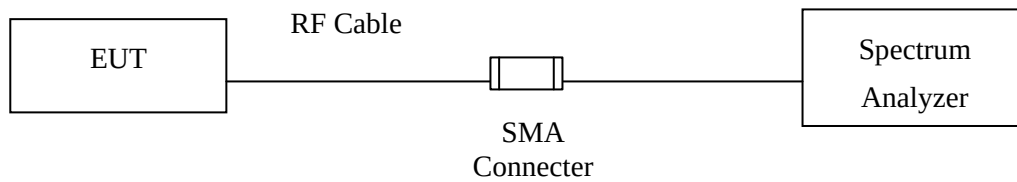
PASS

12. Duty Cycle

12.1. 量測方法

待測物之天線埠經由適當之衰減直接連至頻譜分析儀RF輸入端，
待測物應在正常發射狀態下量測。

12.2. 測試架構圖



12.3. 量測不確定度

此項測試之量測不確定度為 $\pm 2.31\text{msec}$

12.4. Duty Cycle 測試結果

待測物名稱：Intel® Wi-Fi 6 AX201

待測物型號：AX201NGW

測試頻道：--

量測天線：--

檢測器：峰值

測試日期：107 年 10 月 22 日

測試項目：Duty Cycle

測試模式：--

測試距離：Conducted

環境溫度：20 °C

環境濕度：50 %

Duty Cycle Formula:

Duty Cycle = Ton / (Ton + Toff)

Duty Factor = 10 Log (1/Duty Cycle)

Results:

SISO A

5GHz band	Ton (ms)	Ton + Toff (ms)	Duty Cycle (%)	Duty Factor (dB)
802.11a	2.0870	2.3478	88.89	0.51
802.11n20	24.7681	25.1014	98.67	0.06
802.11n40	17.8116	18.1449	98.16	0.08
802.11ac80	10.9275	11.2609	97.04	0.13
802.11ac160	5.5217	5.8116	95.01	0.22
802.11ax20	24.6323	24.8986	98.93	0.05
802.11ax40	19.8116	20.1014	98.56	0.06
802.11ax80	9.4638	9.7826	96.74	0.14
802.11ax160	4.7681	5.0290	94.81	0.23

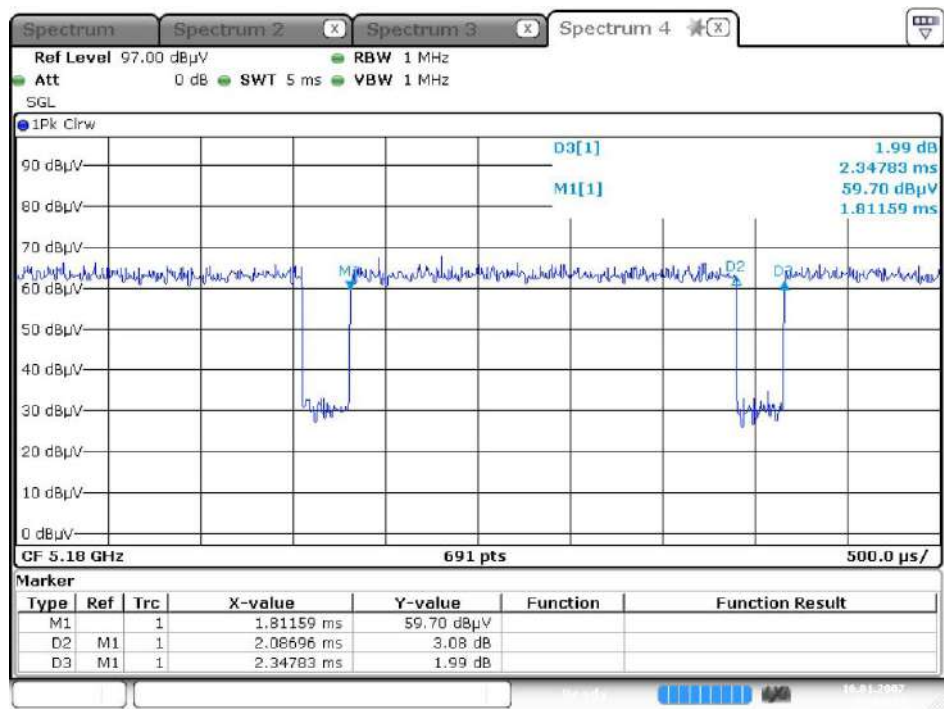
SISO B

5GHz band	Ton (ms)	Ton + Toff (ms)	Duty Cycle (%)	Duty Factor (dB)
802.11a	2.0725	2.3623	87.73	0.57
802.11n20	24.8841	25.1449	98.96	0.05
802.11n40	17.7826	18.0870	98.32	0.07
802.11ac80	10.9130	11.2609	96.91	0.14
802.11ac160	5.4928	5.7971	94.75	0.23
802.11ax20	24.7391	24.9710	99.07	0.04
802.11ax40	19.7391	20.0435	98.48	0.07
802.11ax80	9.4638	9.7536	97.03	0.13
802.11ax160	4.7536	5.0290	94.52	0.24

MIMO

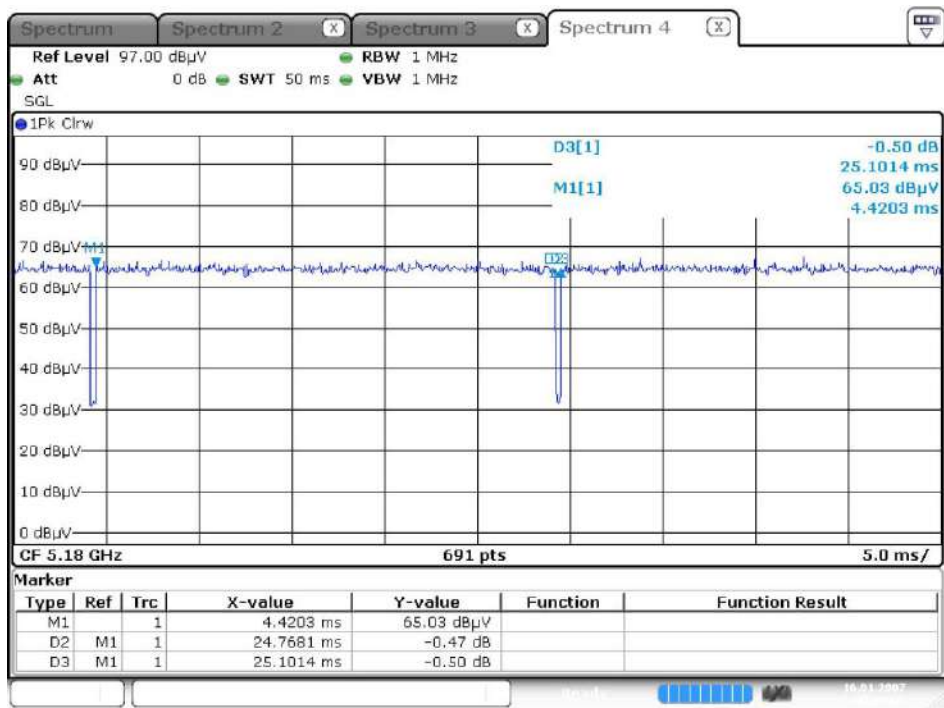
5GHz band	Ton (ms)	Ton + Toff (ms)	Duty Cycle (%)	Duty Factor (dB)
802.11n20	18.5217	18.7116	98.99	0.04
802.11n40	8.8986	9.2174	96.54	0.15
802.11ac80	5.5072	5.7971	95.00	0.22
802.11ac160	2.7826	3.0435	91.43	0.39
802.11ax20	19.6087	19.9710	98.19	0.08
802.11ax40	9.8551	10.2319	96.32	0.16
802.11ax80	4.7246	5.0435	93.68	0.28
802.11ax160	2.4203	2.6957	89.78	0.47

802.11a (SISO A)



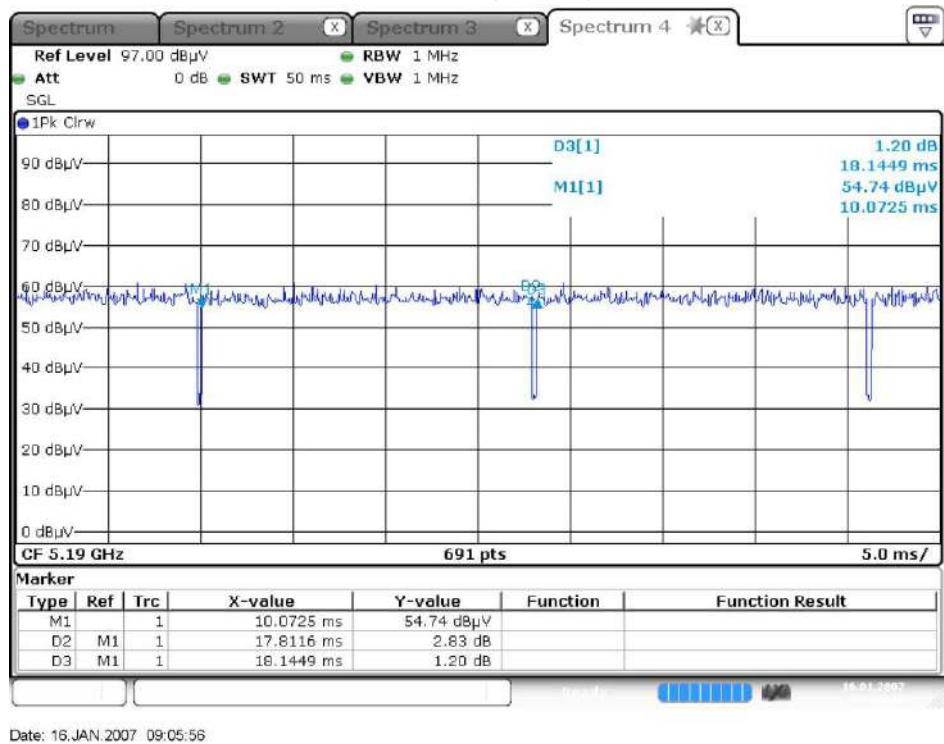
Date: 16.JAN.2007 09:03:34

802.11n20 (SISO A)

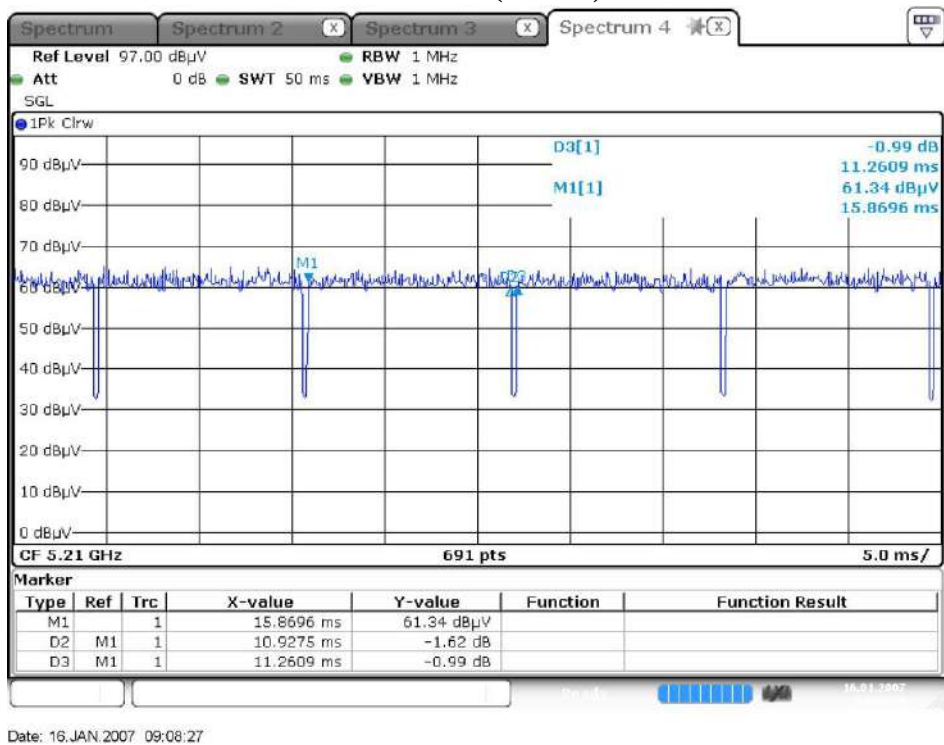


Date: 16.JAN.2007 09:04:51

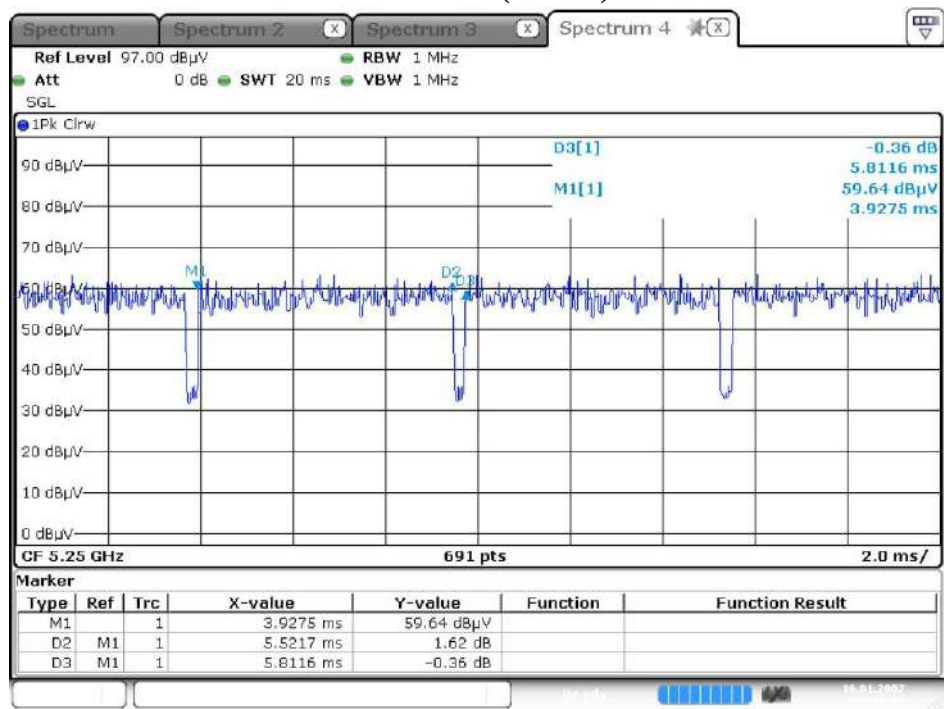
802.11n40 (SISO A)



802.11ac80 (SISO A)

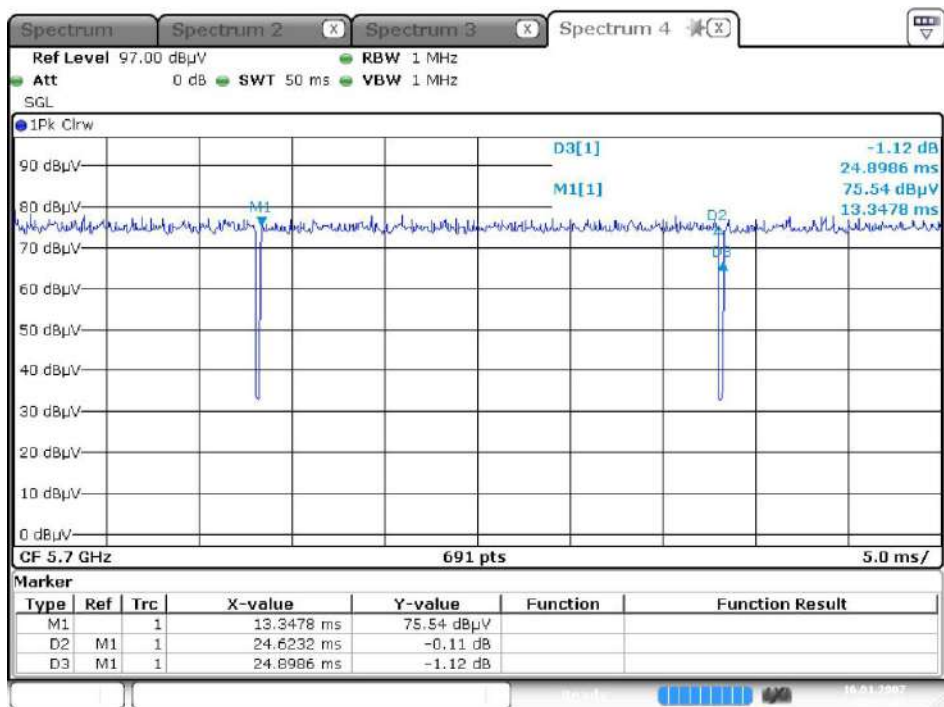


802.11ac160 (SISO A)



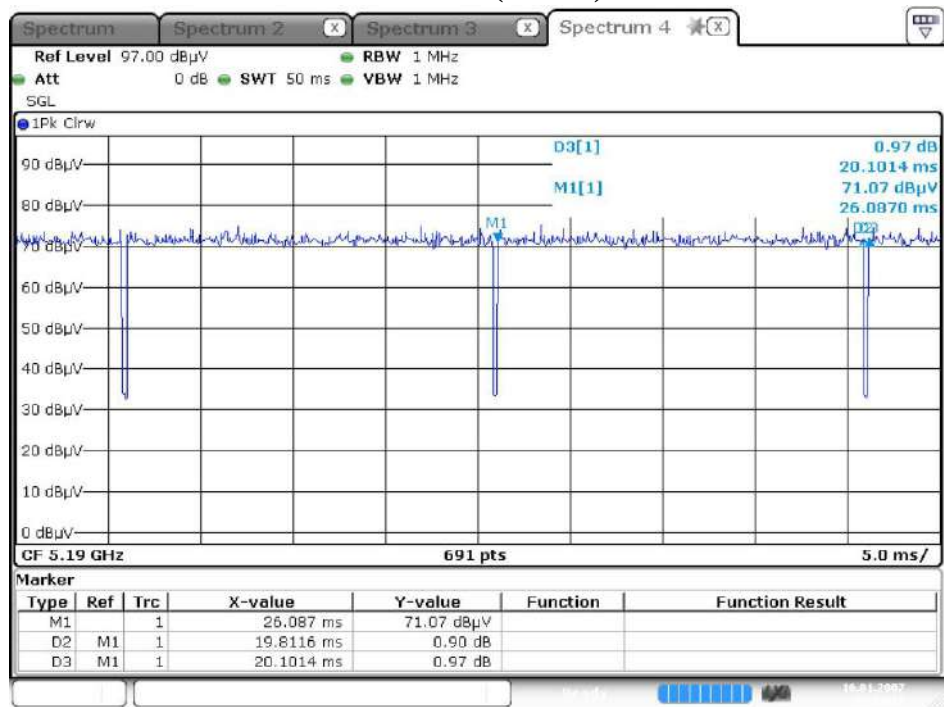
Date: 16.JAN.2007 09:11:11

802.11ax20 (SISO A)

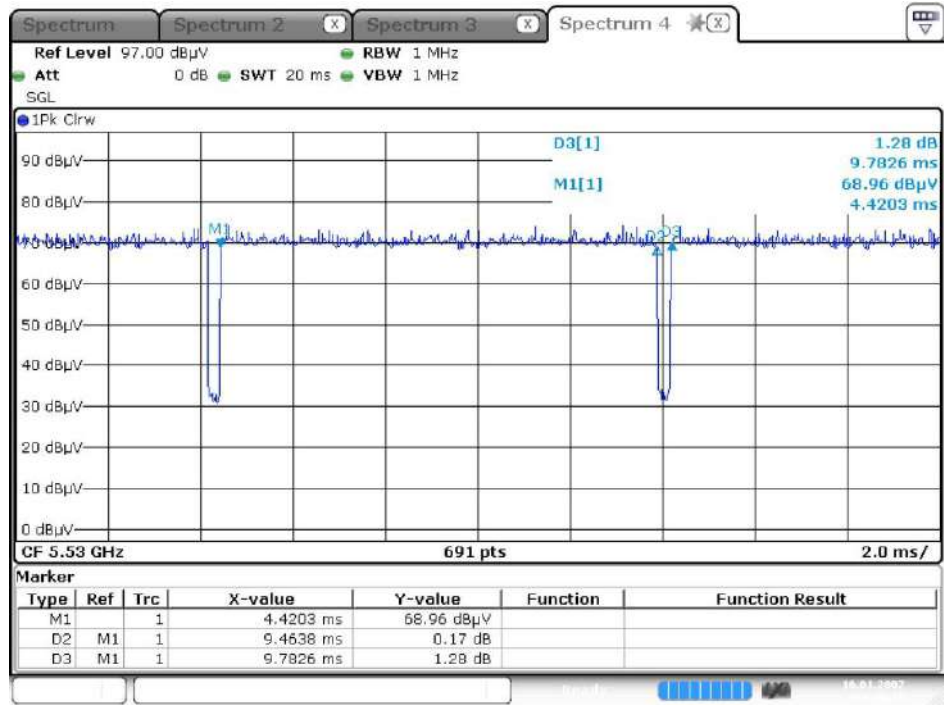


Date: 16.JAN.2007 07:02:03

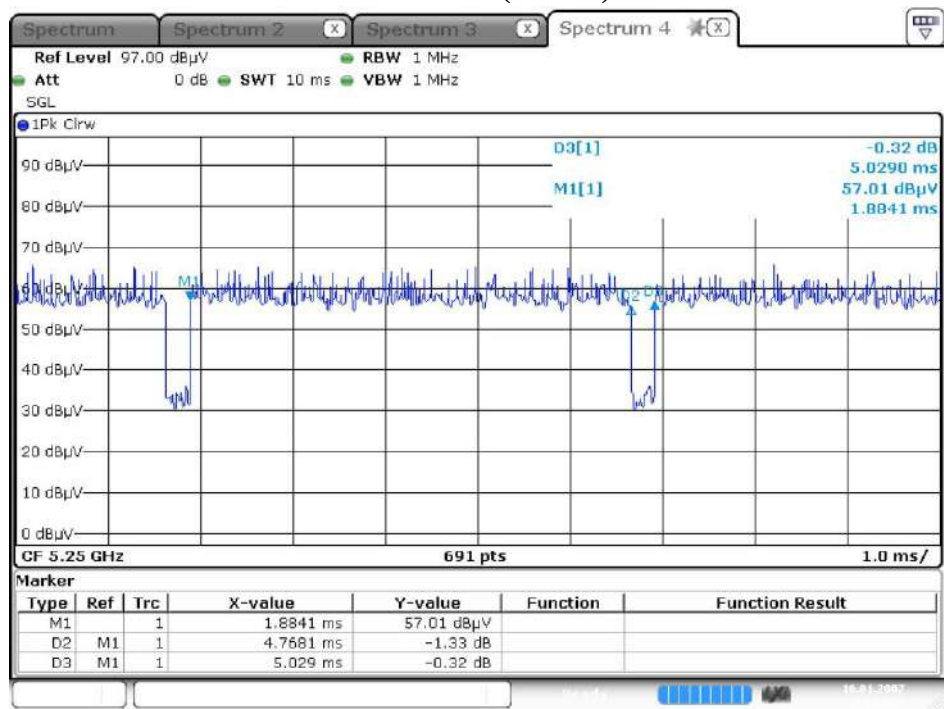
802.11ax40 (SISO A)



802.11ax80 (SISO A)

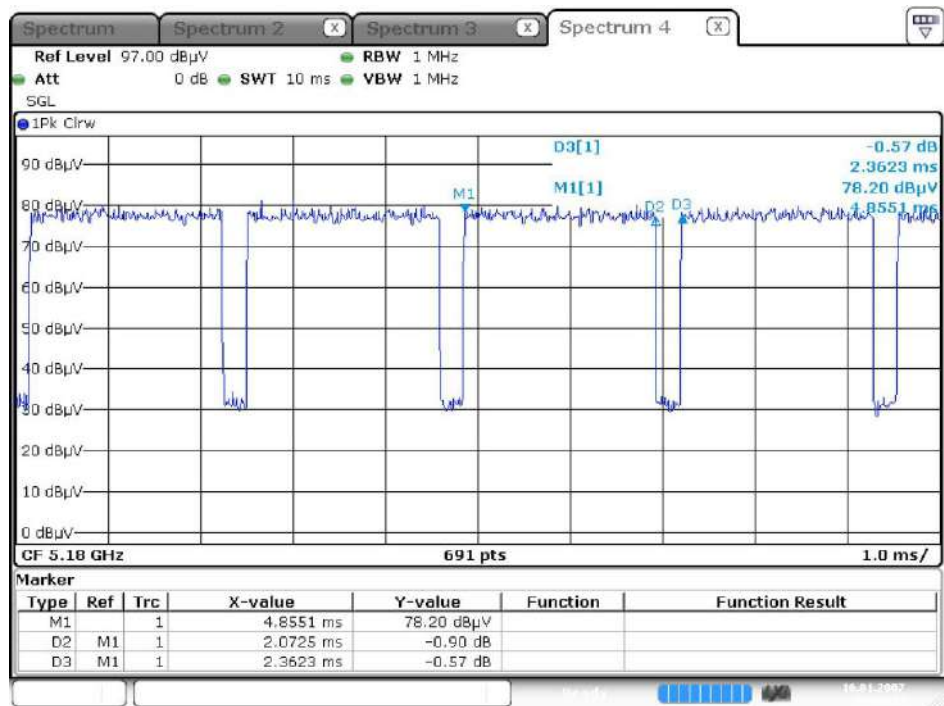


802.11ax160 (SISO A)



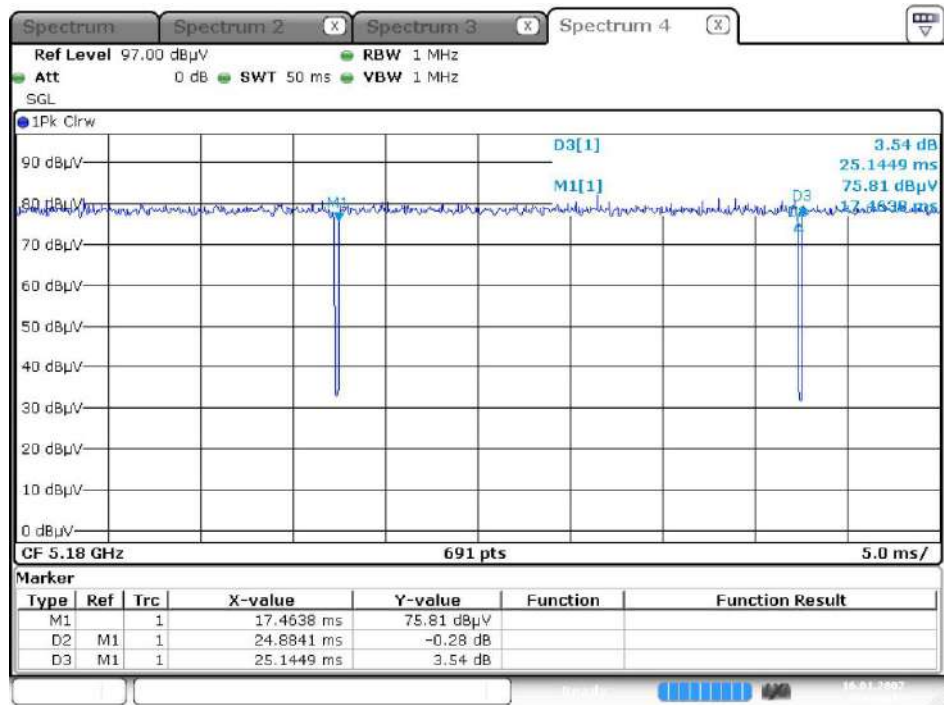
Date: 16.JAN.2007 09:13:37

802.11a (SISO B)



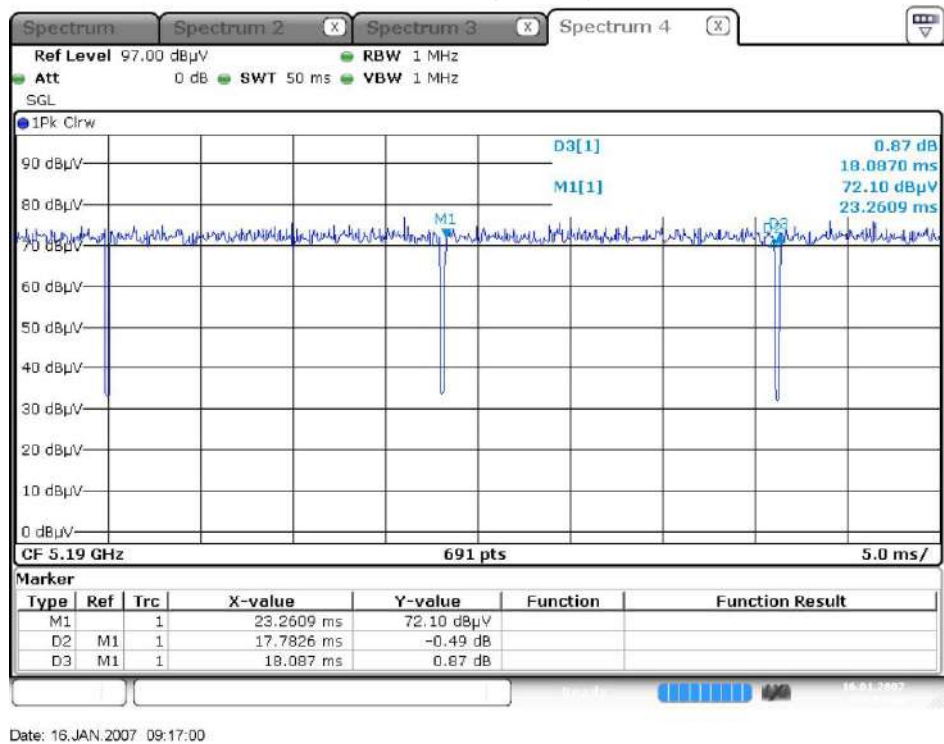
Date: 16 JAN 2007 09:20:34

802.11n20 (SISO B)

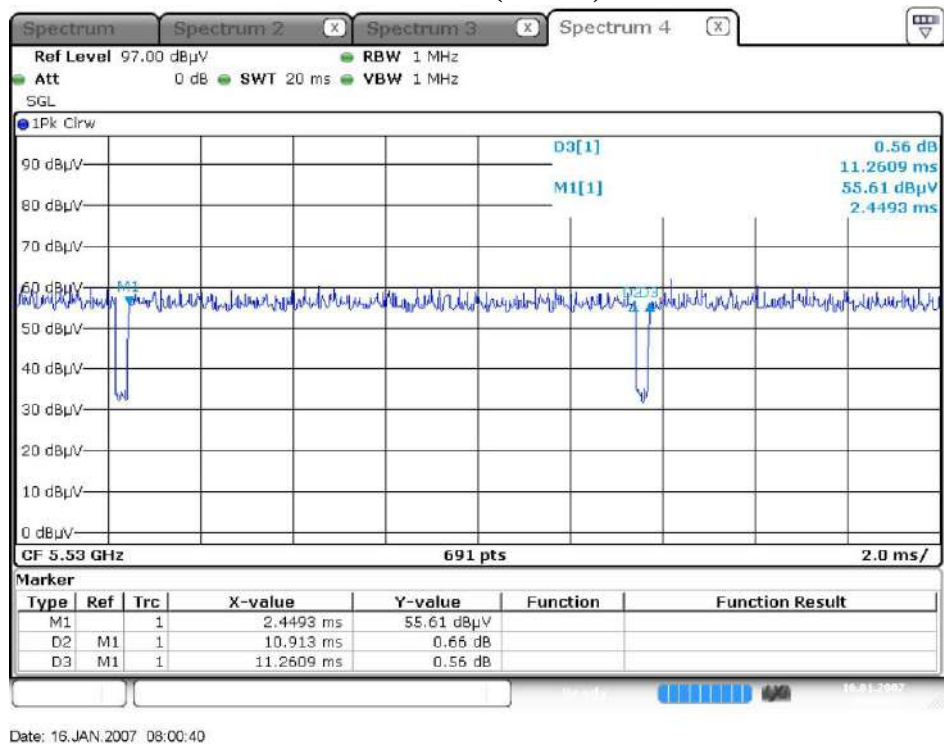


Date: 16 JAN 2007 09:19:43

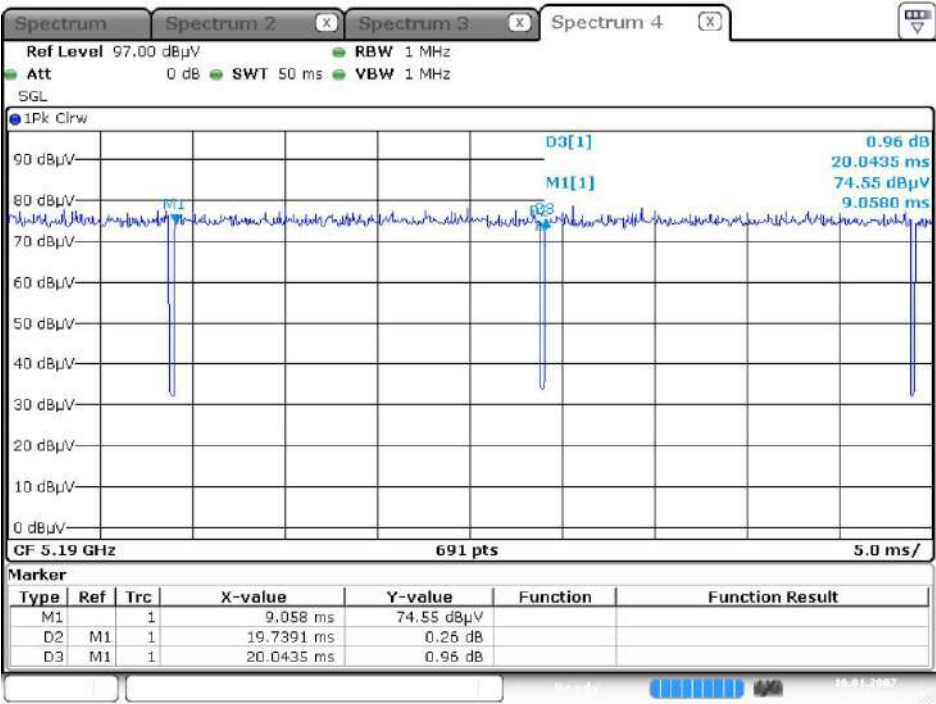
802.11n40 (SISO B)



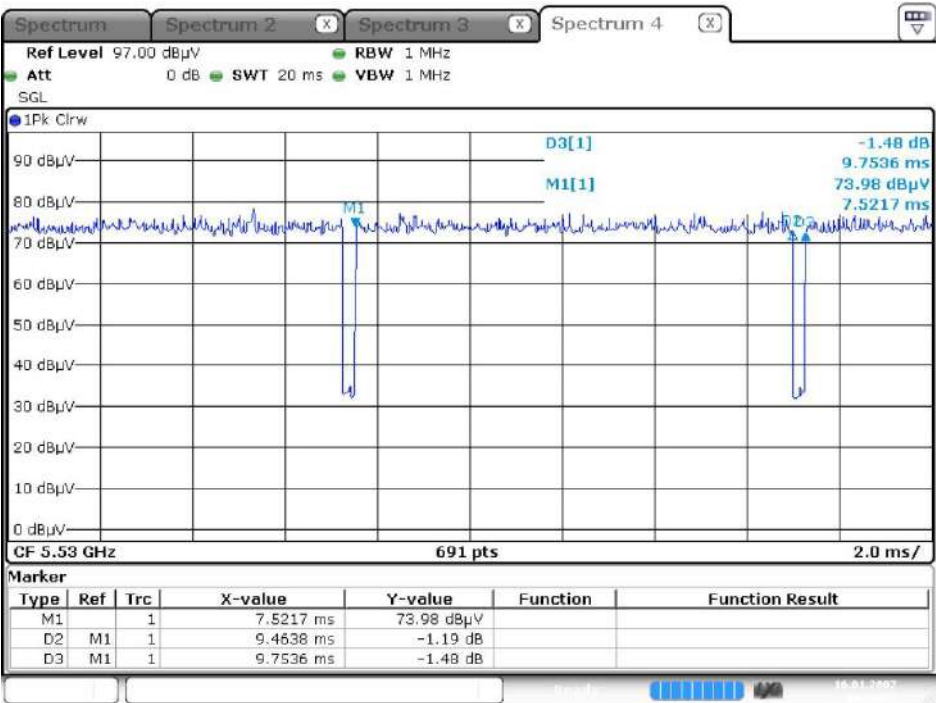
802.11ac80 (SISO B)



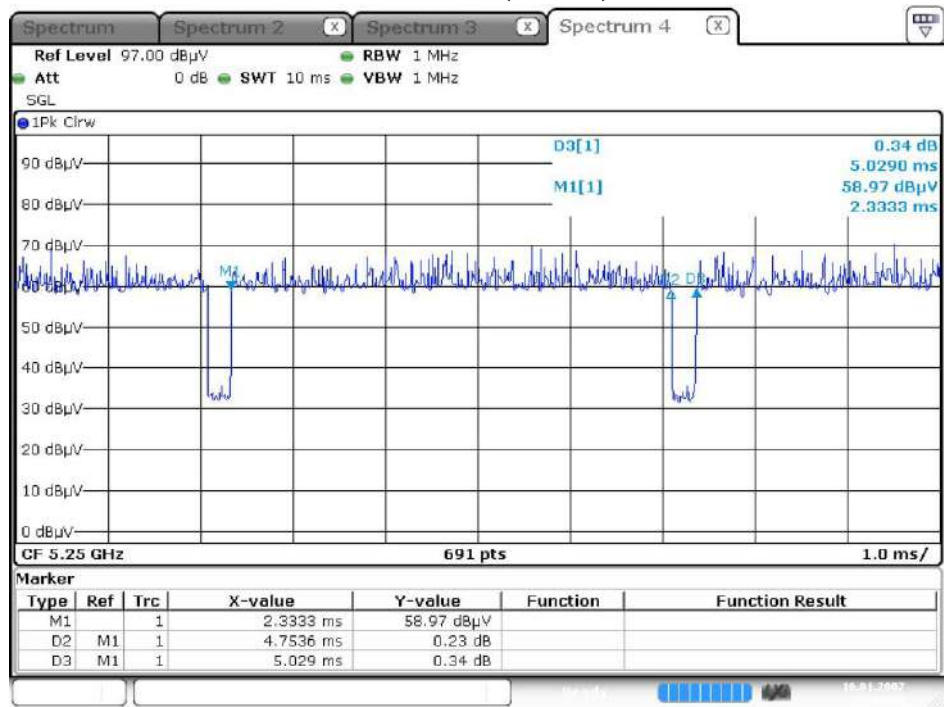
802.11ax40 (SISO B)



802.11ax80 (SISO B)

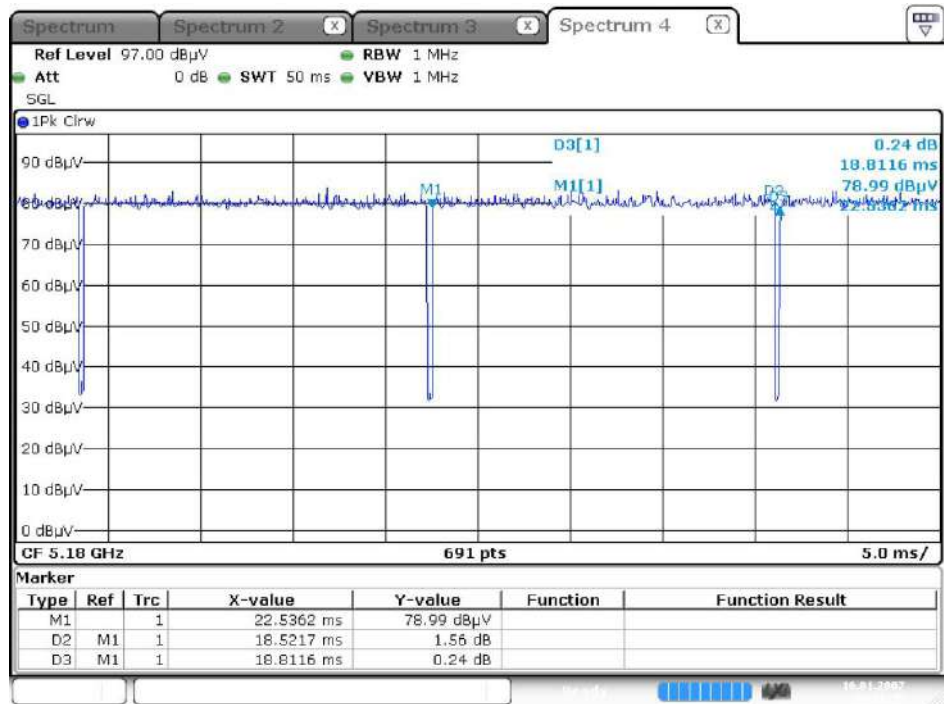


802.11ax160 (SISO B)



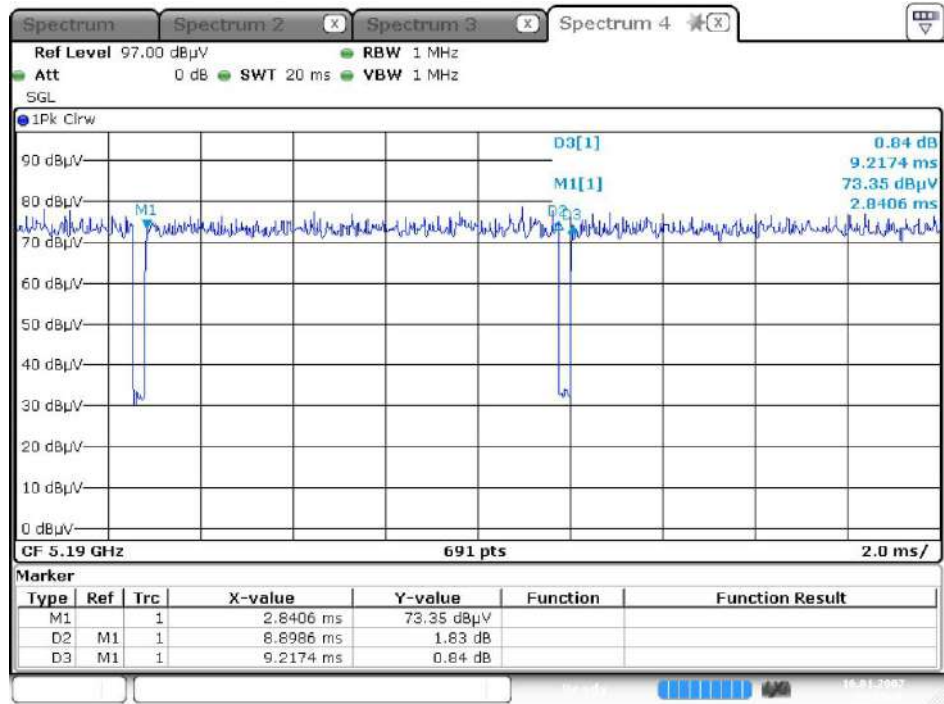
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802.11n20 (MIMO)



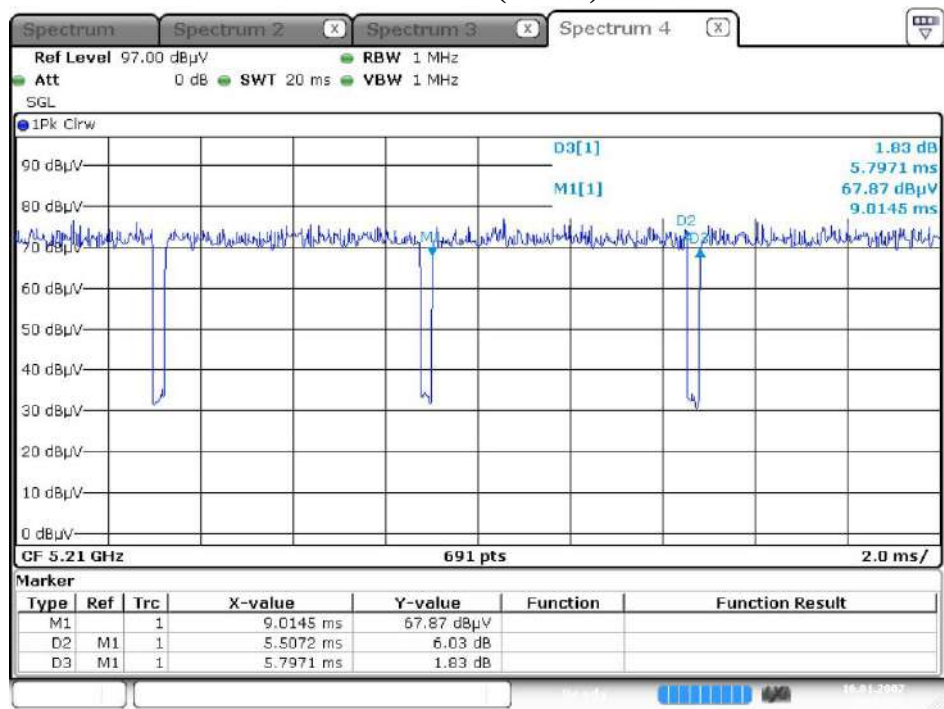
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802.11n40 (MIMO)



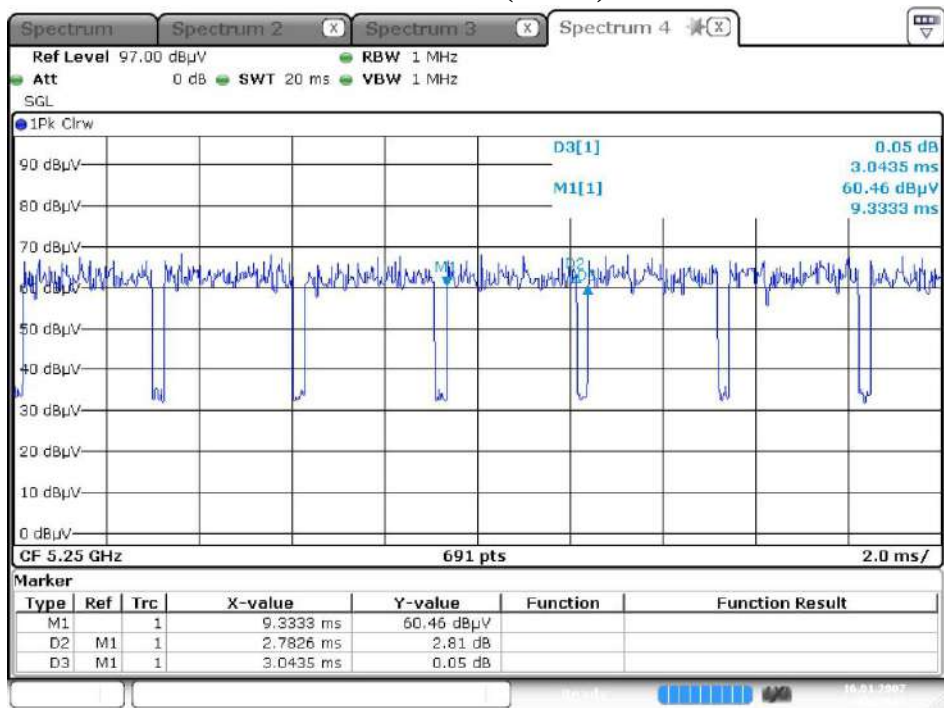
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802.11ac80 (MIMO)



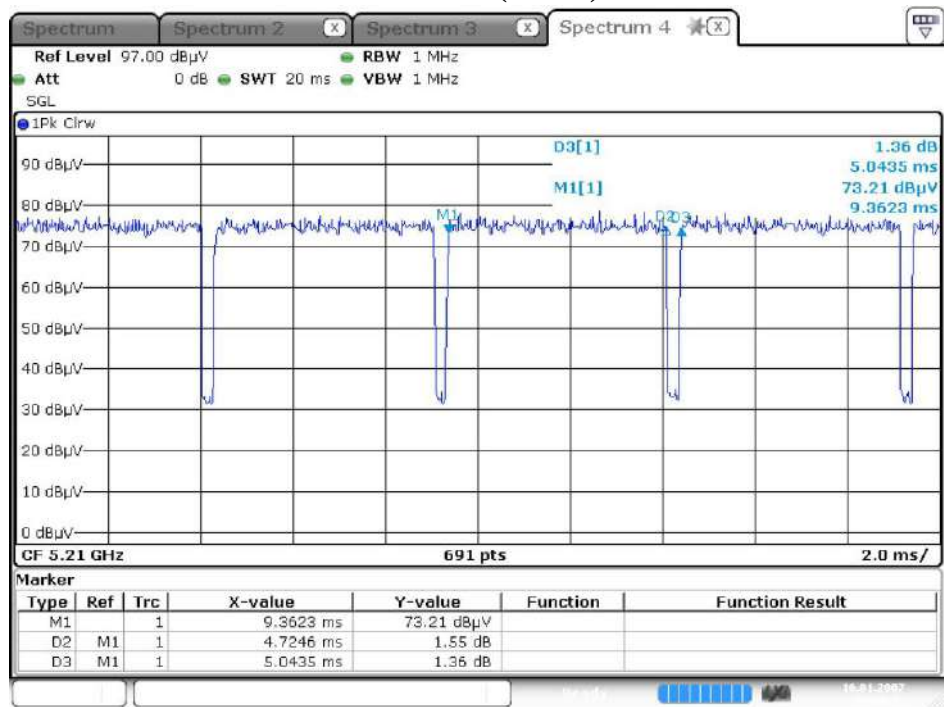
Date: 16.JAN.2007 09:27:22

802.11ac160 (MIMO)



Date: 16.JAN.2007 09:28:11

802.11ax80 (MIMO)



802.11ax160 (MIMO)

