

EUT	2.4GHz Wireless LAN Card	MODEL	XI-325
MODE	Channel 6	FREQUENCY RANGE	Above 1000 MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	30 deg. C, 60 % RH, 1050 hPa	TESTED BY: Gary Chang	

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2063.40	50.2 PK	74.00	-23.80	1.00H	307	19.24	27.61	3.31	0.00	-30.92
2	*2438.40	106.3 PK	-	-	1.26H	144	74.24	28.38	3.64	0.00	-32.03
3	*2438.40	100.1 AV	-	-	1.26H	144	68.10	28.38	3.64	0.00	-32.03
4	4126.10	53.0 PK	74.00	-21.00	1.65H	335	15.80	32.40	4.79	0.00	-37.19
5	4874.30	52.5 PK	74.00	-21.50	1.79H	304	14.20	33.07	5.25	0.00	-38.31

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2062.40	51.3 PK	74.00	-22.70	1.40V	9	20.40	27.61	3.31	0.00	-30.92
2	*2437.20	100.2 PK	-	-	1.77V	354	68.20	28.38	3.64	0.00	-32.02
3	*2437.20	93.4 AV	-	-	1.77V	354	61.40	28.38	3.64	0.00	-32.02
4	4126.10	52.6 PK	74.00	-21.40	1.37V	181	15.40	32.40	4.79	0.00	-37.19
5	4874.40	53.0 PK	74.00	-21.00	1.52V	297	14.70	33.07	5.25	0.00	-38.31

NOTE:

1. Emission level = Raw value - Correction Factor
2. Correction Factor = Pre-Amp. Factor - Ant. Factor - Cable loss
(Pre-Amp. Factor = 0, when a Pre-Amplifier is not used for the test.)
3. Margin value = Emission level - Limit value
4. " * " : Fundamental frequency
5. The other emission levels were very low against the limit.

EUT	2.4GHz Wireless LAN Card	MODEL	XI-325
MODE	Channel 11	FREQUENCY RANGE	Above 1000 MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	30 deg. C, 60 % RH, 1050 hPa	TESTED BY: Gary Chang	

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M											
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2088.40	47.8 PK	74.00	-26.20	1.26H	54	16.80	27.66	3.33	0.00	-30.99
2	*2464.30	104.6 PK	-	-	1.58H	3	72.50	28.42	3.66	0.00	-32.08.
3	*2464.30	97.3 AV	-	-	1.58H	3	65.20	28.42	3.66	0.00	-32.08.
4	2486.50	55.5 PK	74.00	-18.50	1.09H	54	23.40	28.47	3.68	0.00	-32.15.
5	2486.50	51.5 AV	54.00	-2.50	1.09H	54	19.40	28.47	3.68	0.00	-32.15
6	4176.20	52.6 PK	74.00	-21.40	2.01H	287	15.40	32.40	4.81	0.00	-37.21
7	4924.20	52.9 PK	74.00	-21.10	1.10H	172	14.50	33.15	5.28	0.00	-38.43

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M											
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2088.00	49.9 PK	74.00	-24.10	1.08V	162	18.90	27.66	3.33	0.00	-30.99
2	*2464.20	102.2 PK	-	-	1.02V	101	70.16	28.42	3.66	0.00	-32.09
3	*2464.20	96.4 AV	-	-	1.02V	101	64.30	28.42	3.66	0.00	-32.09
4	2495.60	57.4 PK	74.00	-16.60	1.05V	43	25.30	28.47	3.68	0.00	-32.15
5	2495.60	51.5 AV	54.00	-2.50	1.05V	43	19.33	28.47	3.68	0.00	-32.16
6	4176.40	51.7 PK	54.00	-22.30	1.03V	12	14.50	32.40	4.81	0.00	-37.22
7	4924.10	52.9 PK	54.00	-21.10	1.07V	122	14.50	33.15	5.28	0.00	-38.43

NOTE:

1. Emission level = Raw value - Correction Factor
2. Correction Factor = Pre-Amp. Factor - Ant. Factor - Cable loss
(Pre-Amp. Factor = 0, when a Pre-Amplifier is not used for the test.)
3. Margin value = Emission level - Limit value
4. " * " : Fundamental frequency
5. The other emission levels were very low against the limit.

4.2.7 TEST RESULTS(B)

EUT	2.4GHz Wireless LAN Card	MODEL	XI-325B
MODE	Channel 11	FREQUENCY RANGE	30-1000 MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	30 deg. C, 60 % RH, 1050 hPa	TESTED BY: Gary Chang	

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M											
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	132.41	30.7 QP	43.50	-12.80	1.06H	190	18.40	11.16	1.13	0.00	-12.29
2	264.74	32.8 QP	46.00	-13.20	1.34H	120	18.40	12.75	1.70	0.00	-14.45
3	352.48	34.2 QP	46.00	-11.80	1.25H	250	17.80	14.31	2.05	0.00	-16.36
4	396.47	33.9 QP	46.00	-12.10	1.02H	346	15.70	15.96	2.22	0.00	-18.18
5	440.27	34.9 QP	46.00	-11.10	1.16H	313	16.20	16.32	2.38	0.00	-18.69
6	528.70	34.5 QP	46.00	-11.50	1.73H	283	14.20	17.66	2.61	0.00	-20.26
7	748.17	37.2 QP	46.00	-8.80	1.51H	280	13.80	20.14	3.26	0.00	-23.41
8	924.01	33.1 QP	46.00	-12.90	1.26H	211	8.40	21.00	3.68	0.00	-24.70

NOTE:

1. Emission level = Raw value - Correction Factor
2. Correction Factor = Pre-Amp. Factor - Ant. Factor - Cable loss
(Pre-Amp. Factor = 0, when a Pre-Amplifier is not used for the test.)
3. Margin value = Emission level - Limit value
4. The other emission levels were very low against the limit.

EUT	2.4GHz Wireless LAN Card	MODEL	XI-325B
MODE	Channel 11	FREQUENCY RANGE	30-1000 MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	30 deg. C, 60 % RH, 1050 hPa	TESTED BY: Gary Chang	

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M											
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	132.47	30.7 QP	43.50	-12.80	1.40V	309	18.40	11.16	1.13	0.00	-12.29
2	220.47	29.4 QP	46.00	-16.60	2.13V	27	17.60	10.26	1.52	0.00	-11.80
3	264.02	32.8 QP	46.00	-13.20	1.81V	226	18.40	12.75	1.70	0.00	-14.45
4	396.04	35.8 QP	46.00	-10.20	1.48V	168	17.60	15.96	2.22	0.00	-18.18
5	528.04	37.1 QP	46.00	-8.90	2.12V	20	16.90	17.62	2.60	0.00	-20.22
6	748.14	39.2 QP	46.00	-6.80	1.11V	257	15.80	20.14	3.26	0.00	-23.41
7	880.63	35.9 QP	46.00	-10.10	1.72V	32	11.70	20.68	3.55	0.00	-24.24

NOTE:

1. Emission level = Raw value - Correction Factor
2. Correction Factor = Pre-Amp. Factor - Ant. Factor - Cable loss
(Pre-Amp. Factor = 0, when a Pre-Amplifier is not used for the test.)
3. Margin value = Emission level - Limit value
4. The other emission levels were very low against the limit.

EUT	2.4GHz Wireless LAN Card	MODEL	XI-325B
MODE	Channel 1	FREQUENCY RANGE	Above 1000 MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	30 deg. C, 60 % RH, 1050 hPa	TESTED BY: Gary Chang	

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2037.80	48.0 PK	74.00	-26.00	2.23H	12	19.47	25.27	3.29	0.00	-28.57
2	*2413.50	93.2 PK	-	-	1.55H	176	62.40	27.19	3.62	0.00	-30.82
3	*2413.50	87.9 AV	-	-	1.55H	176	57.10	27.19	3.62	0.00	-30.82
4	4075.50	50.3 PK	74.00	-23.70	1.69H	57	15.40	30.18	4.77	0.00	-34.95
5	4826.00	54.7 PK	74.00	-19.30	1.75H	214	18.07	31.43	5.21	0.00	-36.65
6	4826.00	42.5 AV	54.00	-11.50	1.75H	214	5.89	31.43	5.21	0.00	-36.64
7	6113.10	52.0 PK	74.00	-22.00	1.62H	346	13.15	32.83	5.98	0.00	-38.81
8	9647.90	49.8 AV	54.00	-4.20	1.08H	189	4.50	38.08	7.21	0.00	-45.29
9	9647.90	61.5 PK	74.00	-12.50	1.08H	189	16.19	38.08	7.21	0.00	-45.29

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2037.00	50.0 PK	74.00	-24.00	1.21V	38	21.40	25.27	3.29	0.00	-28.57
2	*2412.50	93.2 PK	-	-	1.36V	13	62.40	27.19	3.62	0.00	-30.82
3	*2412.50	87.0 AV	-	-	1.36V	13	56.20	27.19	3.62	0.00	-30.82
4	4075.50	51.1 PK	74.00	-22.90	1.31V	293	16.20	30.18	4.77	0.00	-34.95
5	4824.20	52.0 PK	74.00	-22.00	1.19V	273	15.40	31.43	5.21	0.00	-36.64
6	9467.80	58.6 PK	74.00	-15.40	1.10V	235	13.60	37.96	7.08	0.00	-45.04
7	9467.80	46.4 AV	54.00	-7.60	1.10V	235	1.40	37.96	7.08	0.00	-45.04

NOTE:

1. Emission level = Raw value - Correction Factor
2. Correction Factor = Pre-Amp. Factor - Ant. Factor - Cable loss
(Pre-Amp. Factor = 0, when a Pre-Amplifier is not used for the test.)
3. Margin value = Emission level - Limit value
4. " * " : Fundamental frequency
5. The other emission levels were very low against the limit.

EUT	2.4GHz Wireless LAN Card	MODEL	XI-325B
MODE	Channel 6	FREQUENCY RANGE	Above 1000 MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	30 deg. C, 60 % RH, 1050 hPa	TESTED BY: Gary Chang	

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2063.50	48.1 PK	74.00	-25.90	1.10H	22	19.40	25.39	3.31	0.00	-28.70
2	*2437.50	93.3 PK	-	-	1.04H	6	62.40	27.30	3.64	0.00	-30.94.
3	*2437.50	88.1 AV	-	-	1.04H	6	57.20	27.30	3.64	0.00	-30.94.
4	4125.20	50.3 PK	74.00	-23.70	1.43H	157	15.20	30.28	4.79	0.00	-35.07
5	4873.20	42.2 AV	54.00	-11.80	1.45H	207	5.48	31.47	5.25	0.00	-36.72
6	4873.20	58.2 PK	74.00	-15.80	1.45H	207	21.48	31.47	5.25	0.00	-36.72.
7	9747.50	57.9 PK	74.00	-16.10	1.11H	118	12.40	38.15	7.32	0.00	-45.47.
8	9747.50	49.0 AV	54.00	-5.00	1.11H	118	3.50	38.15	7.32	0.00	-45.47

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2062.80	50.5 PK	74.00	-23.50	1.13V	59	21.80	25.39	3.31	0.00	-28.70
2	*2438.40	88.1 AV	-	-	1.22V	123	57.20	27.30	3.64	0.00	-30.94
3	*2438.40	94.3 PK	-	-	1.22V	123	63.40	27.30	3.64	0.00	-30.94
4	4125.10	51.8 PK	74.00	-22.20	1.97V	313	16.70	30.28	4.79	0.00	-35.07
5	4874.10	51.5 PK	74.00	-22.50	1.63V	129	14.80	31.47	5.25	0.00	-36.72
6	6188.20	54.5 PK	74.00	-19.50	1.78V	304	15.28	33.19	6.01	0.00	-39.20.
7	6188.20	45.7 AV	54.00	-8.30	1.78V	304	6.47	33.19	6.01	0.00	-39.20

NOTE:

1. Emission level = Raw value - Correction Factor
2. Correction Factor = Pre-Amp. Factor - Ant. Factor - Cable loss
(Pre-Amp. Factor = 0, when a Pre-Amplifier is not used for the test.)
3. Margin value = Emission level - Limit value
4. " * " : Fundamental frequency
5. The other emission levels were very low against the limit.

EUT	2.4GHz Wireless LAN Card	MODEL	XI-325B
MODE	Channel 11	FREQUENCY RANGE	Above 1000 MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	30 deg. C, 60 % RH, 1050 hPa	TESTED BY: Gary Chang	

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2087.80	49.5 PK	74.00	-24.50	1.27H	95	20.70	25.50	3.33	0.00	-28.83
2	2483.50	48.3 PK	74.00	-25.70	1.18H	308	17.11	27.52	3.68	0.00	-31.20
3	*2462.00	98.5 PK	-	-	1.03H	24	67.32	27.52	3.68	0.00	-31.20.
4	*2462.00	91.3 AV	-	-	1.03H	24	60.10	27.52	3.68	0.00	-31.20.
5	4175.50	51.6 PK	74.00	-22.40	2.02H	305	16.40	30.38	4.81	0.00	-35.19
6	4924.10	51.6 PK	74.00	-22.40	1.84H	320	14.80	31.51	5.28	0.00	-36.80
7	6226.30	52.7 PK	74.00	-21.30	1.50H	340	13.38	33.28	6.01	0.00	-39.29
8	9874.90	61.8 PK	74.00	-12.20	2.09H	219	16.20	38.22	7.43	0.00	-45.66
9	9874.90	49.3 AV	54.00	-4.70	2.09H	219	3.70	38.22	7.43	0.00	-45.66

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Antenna Factor (dB)	Cable Factor (dB)	Pre-Amp. Factor (dB)	Correction Factor (dB)
1	2087.50	49.5 PK	74.00	-24.50	1.16V	313	20.70	25.50	3.33	0.00	-28.83
2	*2461.50	91.5 PK	-	-	1.11V	66	60.40	27.41	3.66	0.00	-31.07.
3	*2461.50	86.3 AV	-	-	1.11V	65	55.20	27.41	3.66	0.00	-31.07.
4	2483.50	47.0 PK	74.00	-27.00	1.33V	320	15.80	27.52	3.68	0.00	-31.20
5	4175.50	51.0 PK	74.00	-23.00	1.55V	158	15.80	30.38	4.81	0.00	-35.19
6	4924.50	52.0 PK	74.00	-22.00	1.41V	204	15.20	31.51	5.28	0.00	-36.80
7	6263.50	53.9 PK	74.00	-20.10	1.01V	276	14.44	33.46	6.03	0.00	-39.49
8	6263.50	44.9 AV	54.00	-9.10	1.01V	276	5.40	33.46	6.03	0.00	-39.50
9	9848.00	62.0 PK	74.00	-12.00	1.61V	320	16.40	38.21	7.41	0.00	-45.61
10	9848.00	46.8 AV	54.00	-7.20	1.61V	320	1.20	38.21	7.41	0.00	-45.62

NOTE:

1. Emission level = Raw value - Correction Factor
2. Correction Factor = Pre-Amp. Factor - Ant. Factor - Cable loss
(Pre-Amp. Factor = 0, when a Pre-Amplifier is not used for the test.)
3. Margin value = Emission level - Limit value
4. " * " : Fundamental frequency
5. The other emission levels were very low against the limit.

4.3 6DB BANDWIDTH MEASUREMENT

4.3.1 LIMITS OF 6dB BANDWIDTH MEASUREMENT

The minimum of 6dB Bandwidth Measurement is 0.5 MHz.

4.3.2 TEST INSTRUMENTS

Description & Manufacturer	Model No.	Serial No.	Calibrated Until
ROHDE & SCHWARZ TEST RECEIVER	ESMI	839379/002	Dec. 28, 2001
HP ATTENUATOR	8496B	3247A18505	Cal. on use
HP PLOTTER	7475A	2641V27755	N/A

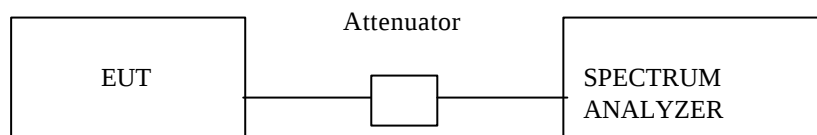
NOTE:

- 1.The measurement uncertainty is less than +/- 2.6dB, which is calculated as per the NAMAS document NIS81.
- 2.The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

4.3.3 TEST PROCEDURE

The transmitter output was connected to the spectrum analyzer through an attenuator. The bandwidth of the fundamental frequency was measured by spectrum analyzer with 100 kHz RBW and 100 kHz VBW. The 6 dB bandwidth is defined as the total spectrum the power of which is higher than peak power minus 6 dB.

4.3.4 TEST SETUP



For the actual test configuration, please refer to the related Item – Photographs of the Test Configuration.

4.3.5 EUT OPERATING CONDITIONS

The software provided by client to enable the EUT under transmission condition continuously at lowest, middle and highest channel frequencies individually.

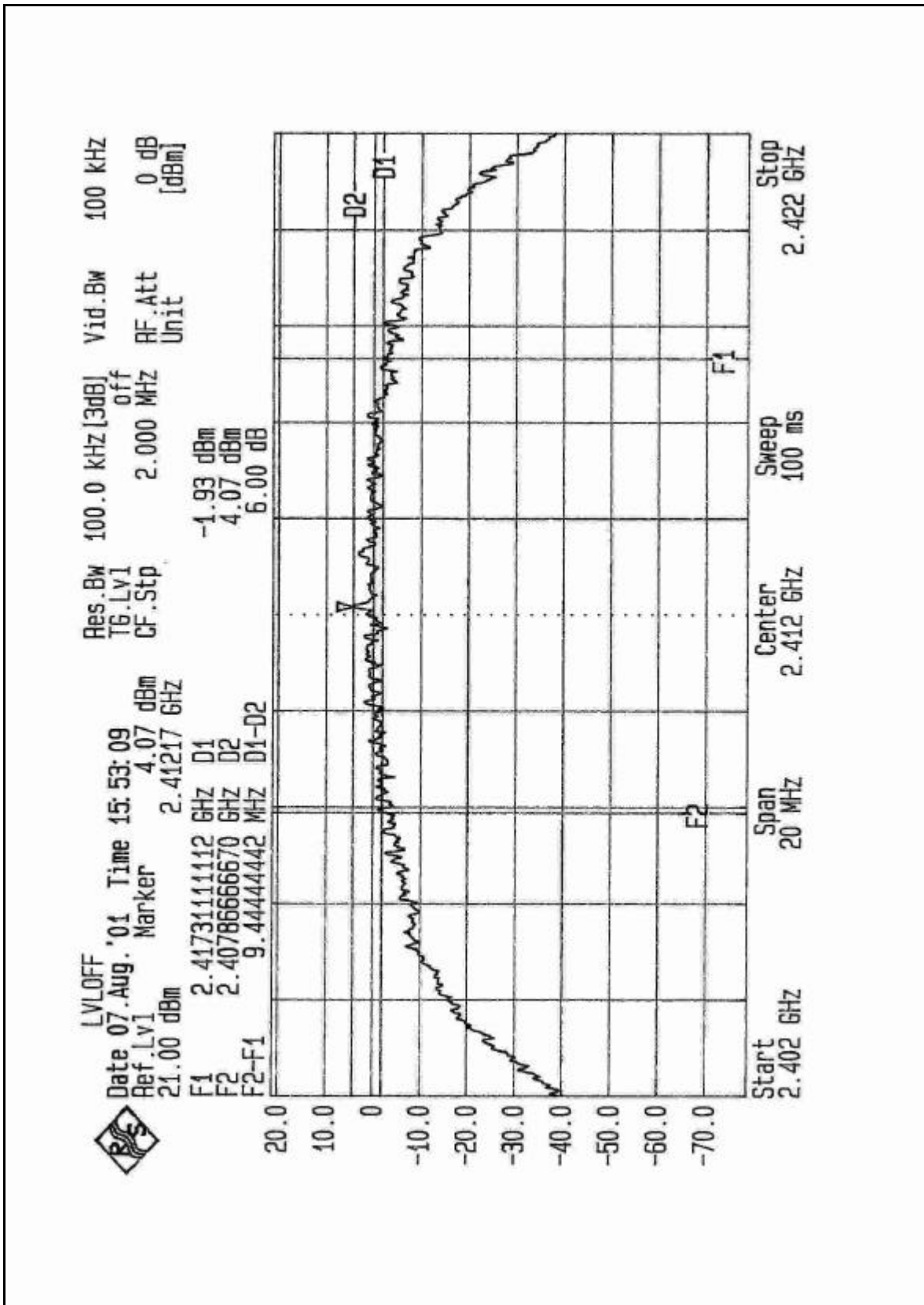


4.3.6 TEST RESULTS

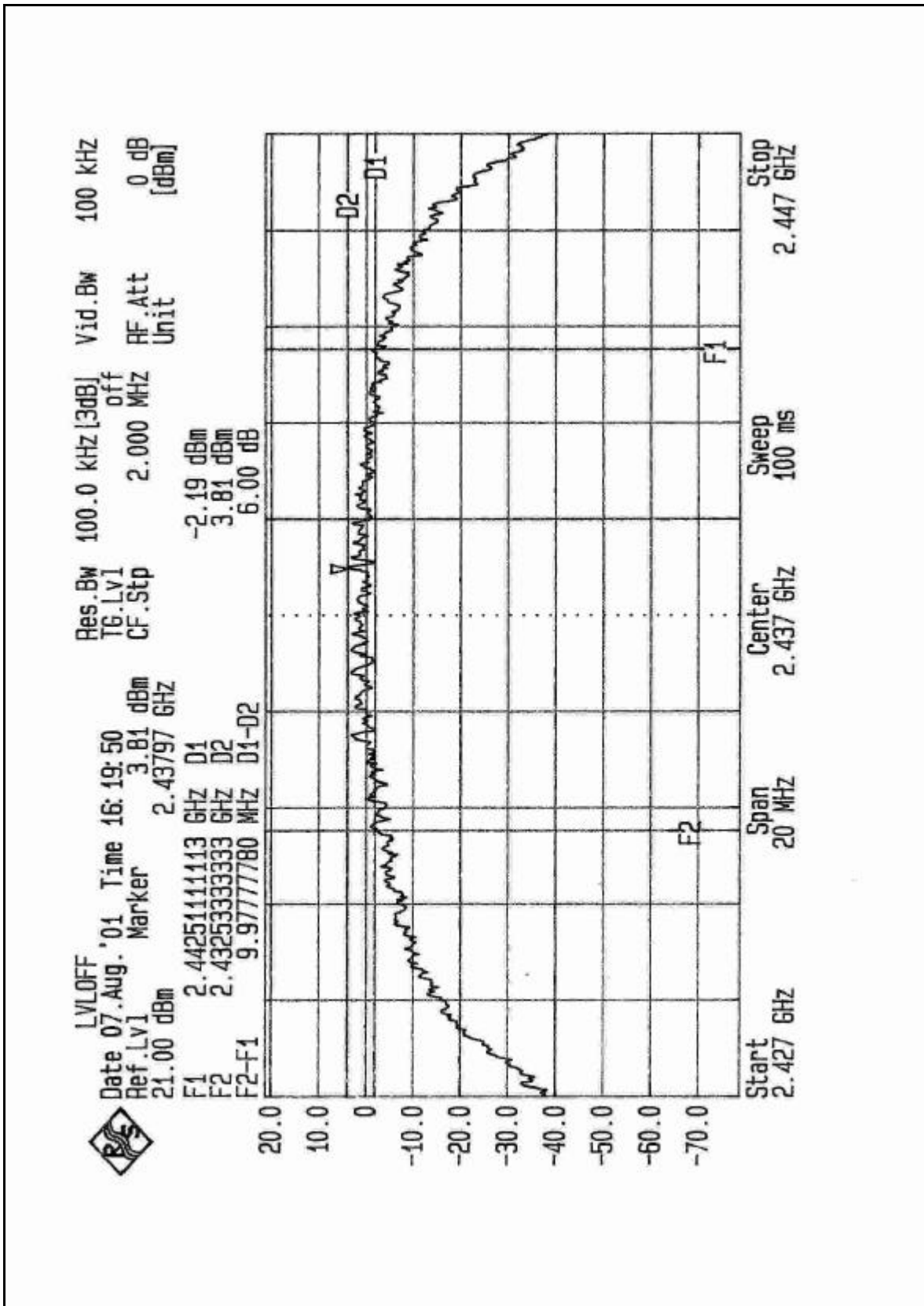
EUT	2.4GHz Wireless LAN Card	MODEL	XI-325, XI-325B
INPUT POWER (SYSTEM)	120Vac, 60 Hz	ENVIRONMENTAL CONDITIONS	27 deg. C, 75%RH, 1005 hPa
TESTED BY: Gary Chang			

CHANNEL	CHANNEL FREQUENCY (MHz)	6 dB BANDWIDTH (MHz)	MINIMUM LIMIT (MHz)	PASS/FAIL
1	2412	9.44	0.5	PASS
6	2437	9.98	0.5	PASS
11	2462	9.60	0.5	PASS

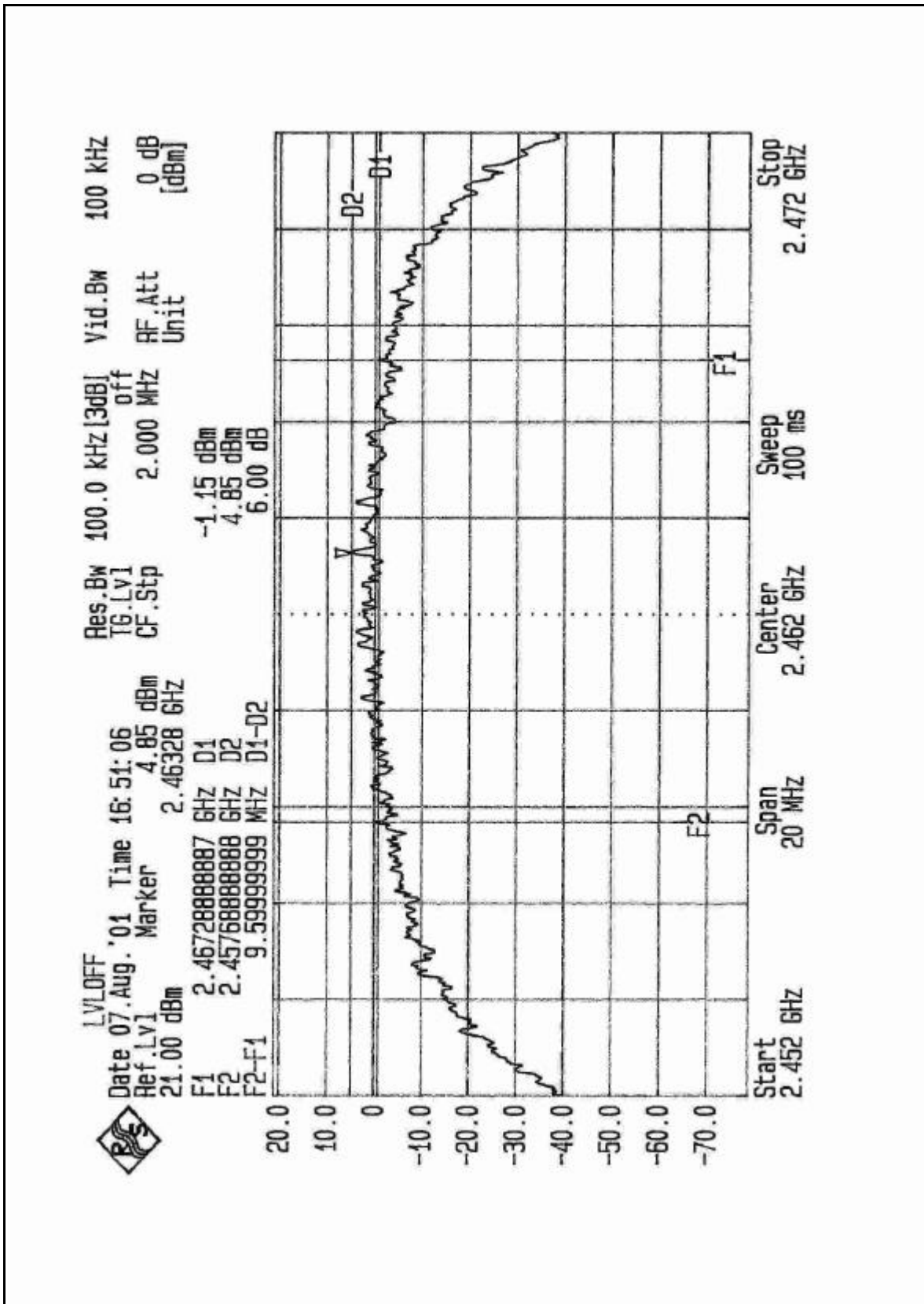
CH1



CH6



CH11



4.4 MAXIMUM PEAK OUTPUT POWER

4.4.1 LIMITS OF MAXIMUM PEAK OUTPUT POWER MEASUREMENT

The Maximum Peak Output Power Measurement is 30dBm.

4.4.2 TEST INSTRUMENTS

Description & Manufacturer	Model No.	Serial No.	Calibrated Until
ROHDE & SCHWARZ TEST RECEIVER	ESMI	839379/002	Dec. 28, 2001
HP ATTENUATOR	8496B	3247A18505	Cal. on use
HP PLOTTER	7475A	2641V27755	N/A

NOTE:

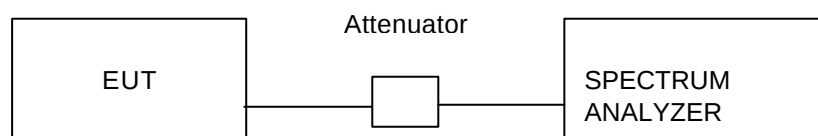
1. The measurement uncertainty is less than +/- 2.6dB, which is calculated as per the NAMAS document NIS81.
2. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

4.4.3 TEST PROCEDURES

- a. The transmitter output was connected to the spectrum analyzer through an attenuator.
- b. The center frequency of the spectrum analyzer was set to the fundamental frequency and using 3 MHz RBW and 3 MHz VBW.
- c. The span of the spectrum analyzer should be larger than 6dB BandWidth plus 10MHz.
- d. Used Peak Search to read the peak power after Maximum Hold function was activated.
- e. Shifted the marker to +/- 3MHz and +/-6MHz, and recorded the reading.
- f. The Maximum Peak Output Power was the linear summation of the 5 readings in (4) and (5).

NOTE: This measurement is the total power of 15MHz bandwidth which is far more wider than 6dB bandwidth.

4.4.4 TEST SETUP



4.4.5 EUT OPERATING CONDITIONS

Same as Item 4.3.5

4.4.6 TEST RESULTS

EUT	2.4GHz Wireless LAN Card	MODEL	XI-325, XI-325B
INPUT POWER (SYSTEM)	120Vac, 60 Hz	ENVIRONMENTAL CONDITIONS	27 deg. C, 75%RH, 1005 hPa
TESTED BY: Gary Chang			

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (dBm)	PEAK POWER LIMIT (dBm)	PASS/FAIL
1	2412	18.10	30	PASS
6	2437	18.15	30	PASS
11	2462	18.12	30	PASS

4.5 POWER SPECTRAL DENSITY MEASUREMENT

4.5.1 LIMITS OF POWER SPECTRAL DENSITY MEASUREMENT

The Maximum of Power Spectral Density Measurement is 8dBm.

4.5.2 TEST INSTRUMENTS

Description & Manufacturer	Model No.	Serial No.	Calibrated Until
ROHDE & SCHWARZ TEST RECEIVER	ESMI	839379/002	Dec. 28, 2001
HP ATTENUATOR	8496B	3247A18505	Cal. on use
HP PLOTTER	7475A	2641V27755	N/A

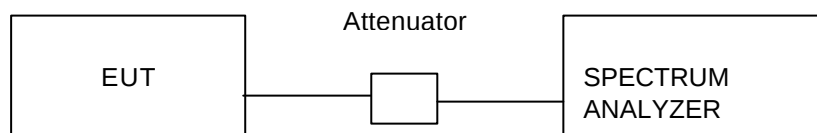
NOTE:

1. The measurement uncertainty is less than +/- 2.6dB, which is calculated as per the NAMAS document NIS81.
2. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

4.5.3 TEST PROCEDURE

The transmitter output was connected to the spectrum analyzer through an attenuator, the bandwidth of the fundamental frequency was measured with the spectrum analyzer using 3 kHz RBW and 30 kHz VBW, set sweep time=span/3kHz. The power spectral density was measured and recorded. The sweep time is allowed to be longer than span/3KHz for a full response of the mixer in the spectrum analyzer.

4.5.4 TEST SETUP



4.5.5 EUT OPERATING CONDITIONS

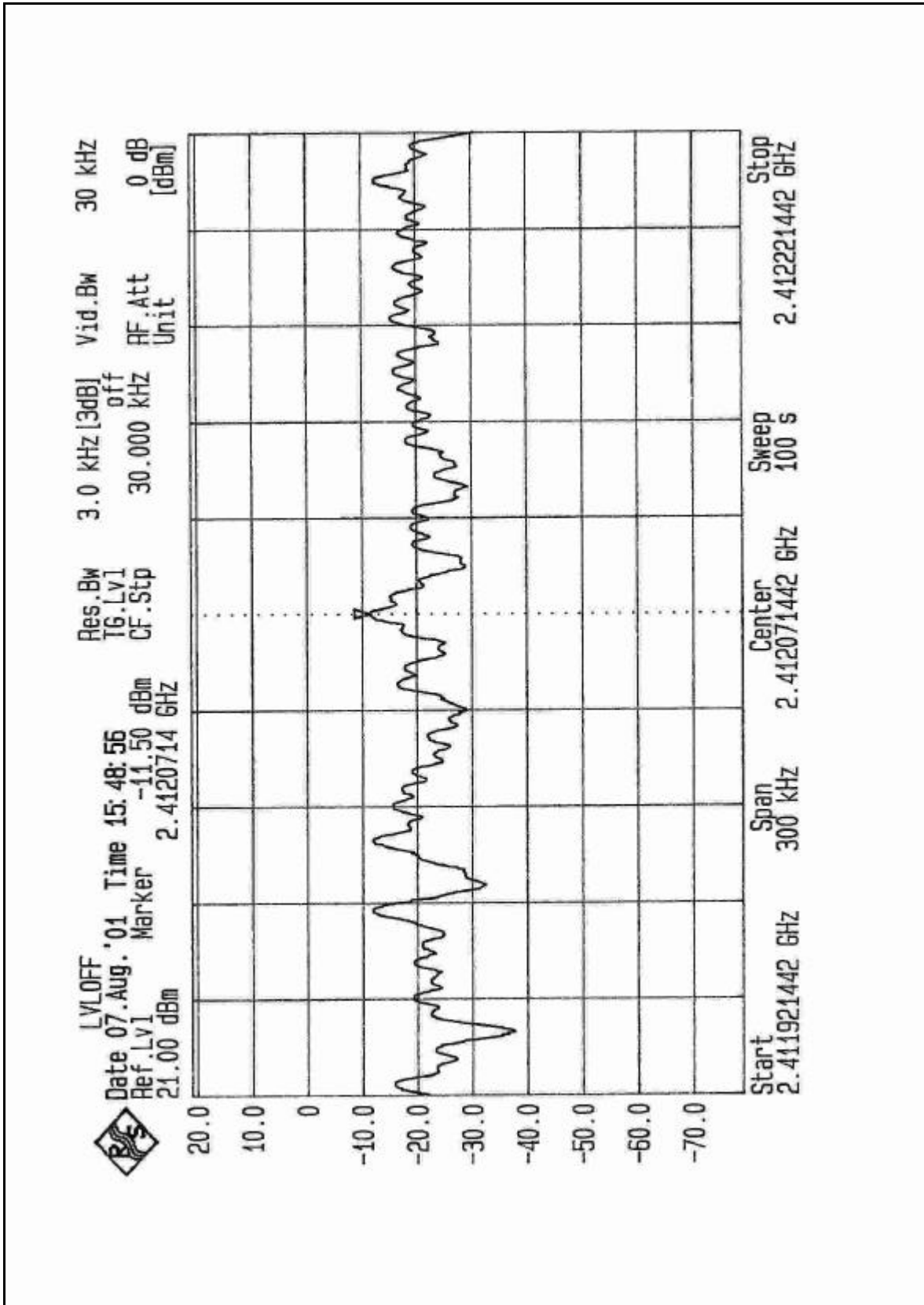
Same as 4.3.5

4.5.6 TEST RESULTS

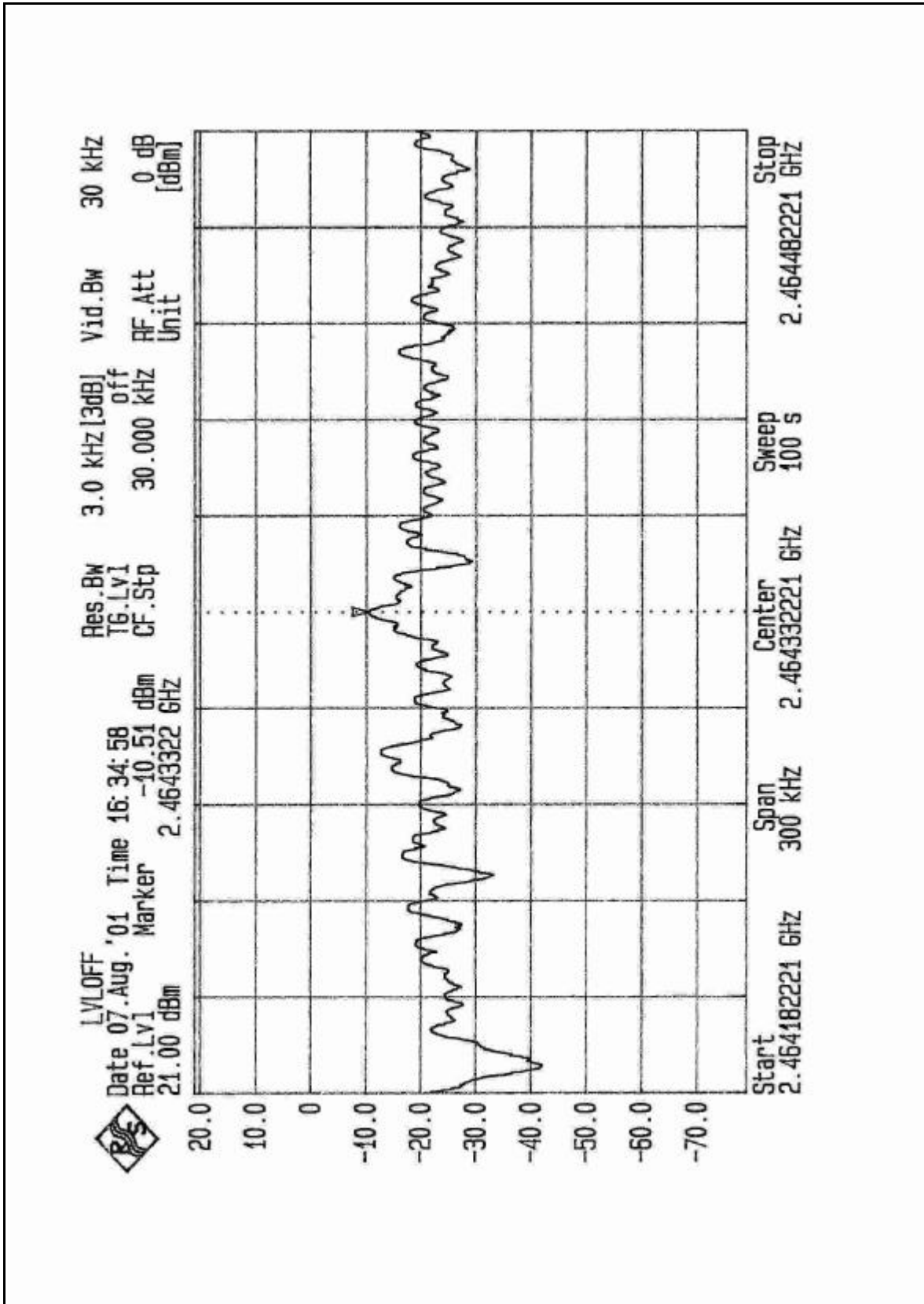
EUT	2.4GHz Wireless LAN Card	MODEL	XI-325, XI-325B
INPUT POWER (SYSTEM)	120Vac, 60 Hz	ENVIRONMENTAL CONDITIONS	27 deg. C, 75%RH, 1005 hPa
TESTED BY: Gary Chang			

CHANNEL NUMBER	CHANNEL FREQUENCY (MHz)	RF POWER LEVEL IN 3 KHz BW (dBm)	MAXIMUM LIMIT (dBm)	PASS/FAIL
1	2412	-11.50	8	PASS
6	2437	-11.37	8	PASS
11	2462	-10.51	8	PASS

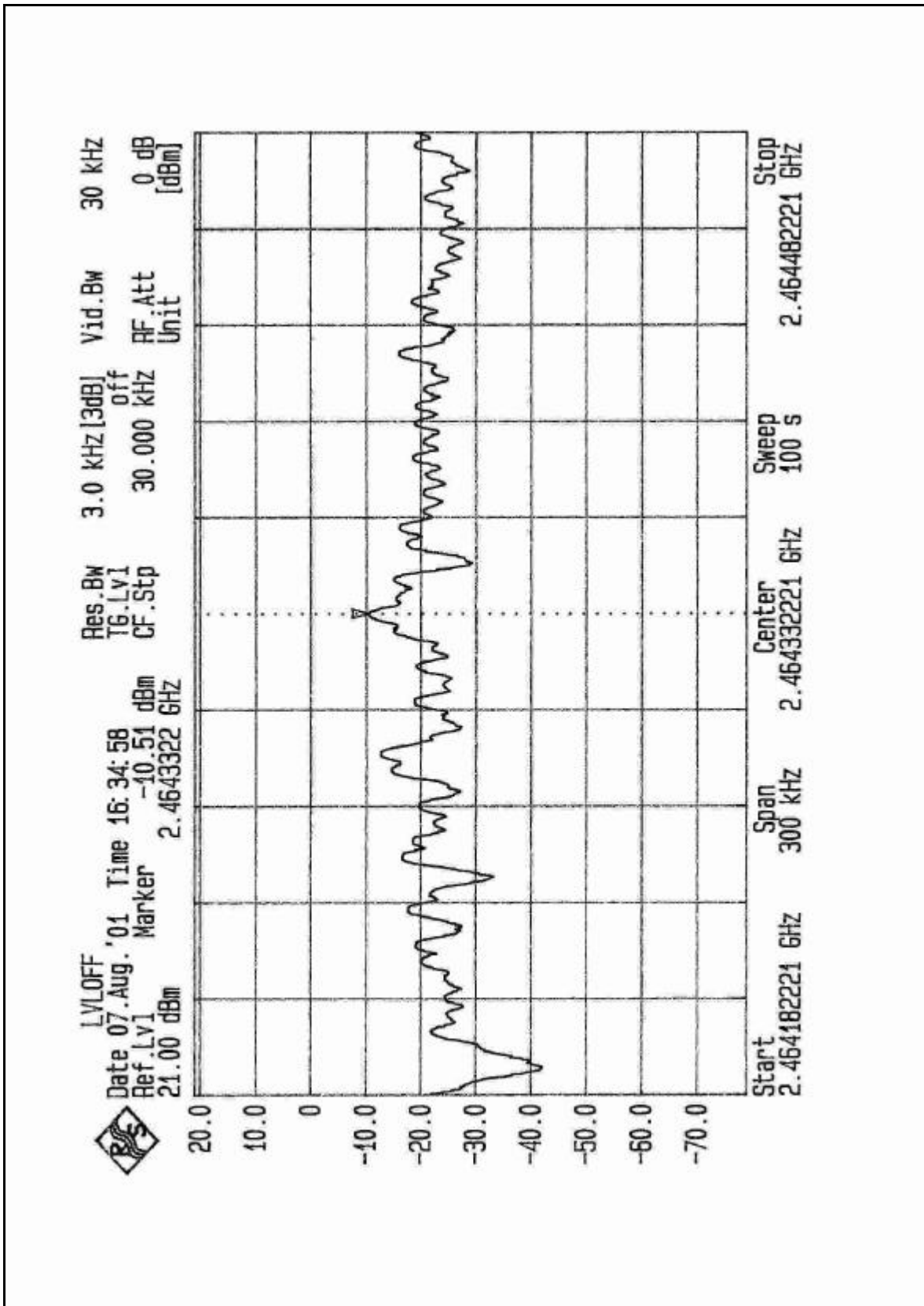
CH1



CH6



CH11



4.6 BAND EDGES MEASUREMENT

4.6.1 LIMITS OF BAND EDGES MEASUREMENT

Below -20dB of the highest emission level of operating band (in 100KHz Resolution Bandwidth).

4.6.2 TEST INSTRUMENTS

Description & Manufacturer	Model No.	Serial No.	Calibrated Until
ROHDE & SCHWARZ TEST RECEIVER	ESMI	848926/005 846839/018	Dec 28, 2001
HP ATTENUATOR	8496B	3247A18505	Cal. on use
HP PLOTTER	7475A	2641V27755	N/A

NOTE:

1. The measurement uncertainty is less than +/- 2.6dB, which is calculated as per the NAMAS document NIS81.
2. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

4.6.3 TEST PROCEDURE

The transmitter output was connected to the spectrum analyzer via a low lose cable. Set both RBW and VBW of spectrum analyzer to 100 kHz with suitable frequency span including 100 kHz bandwidth from band edge. The band edges was measured and recorded.



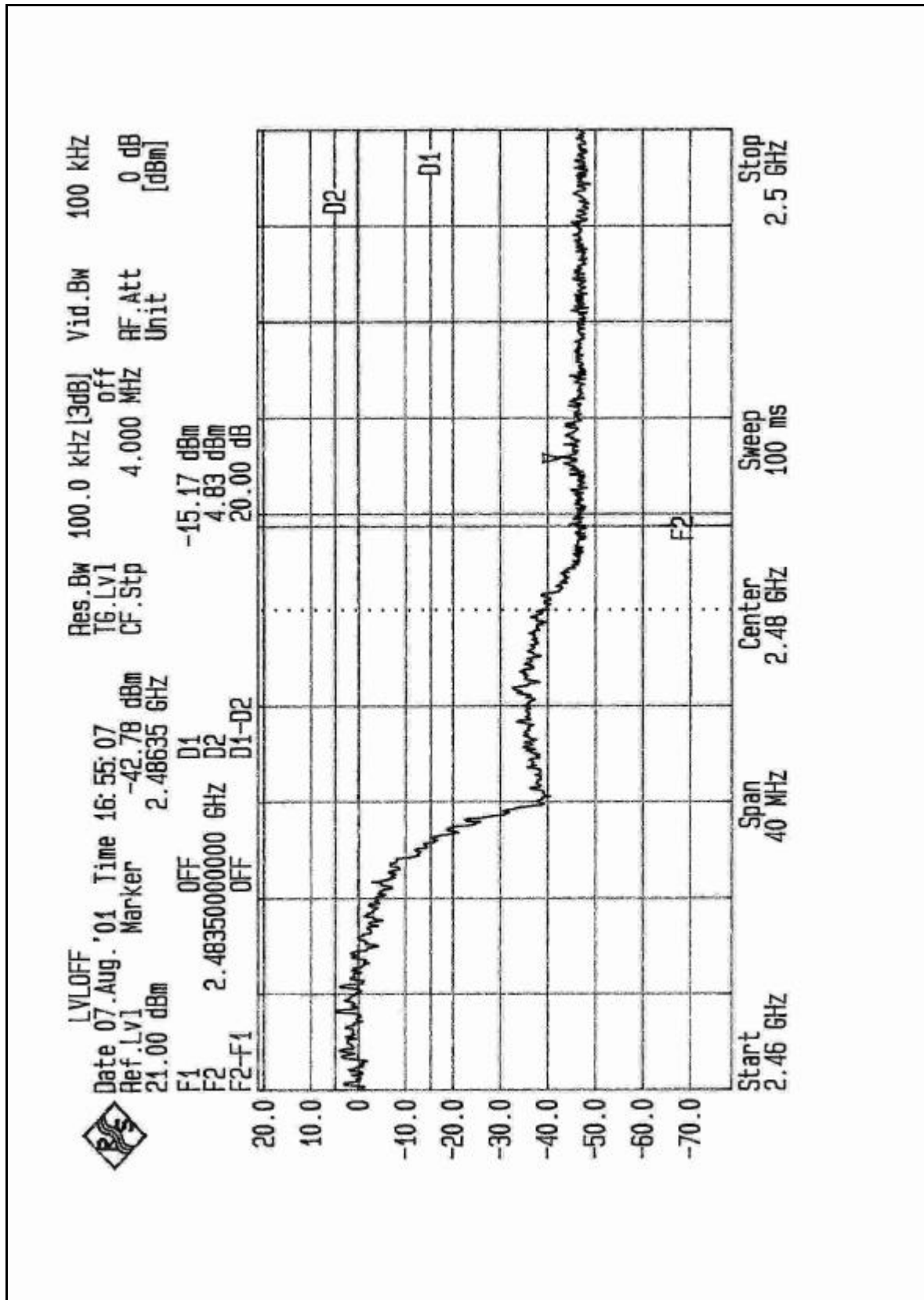
4.6.4 EUT OPERATING CONDITION

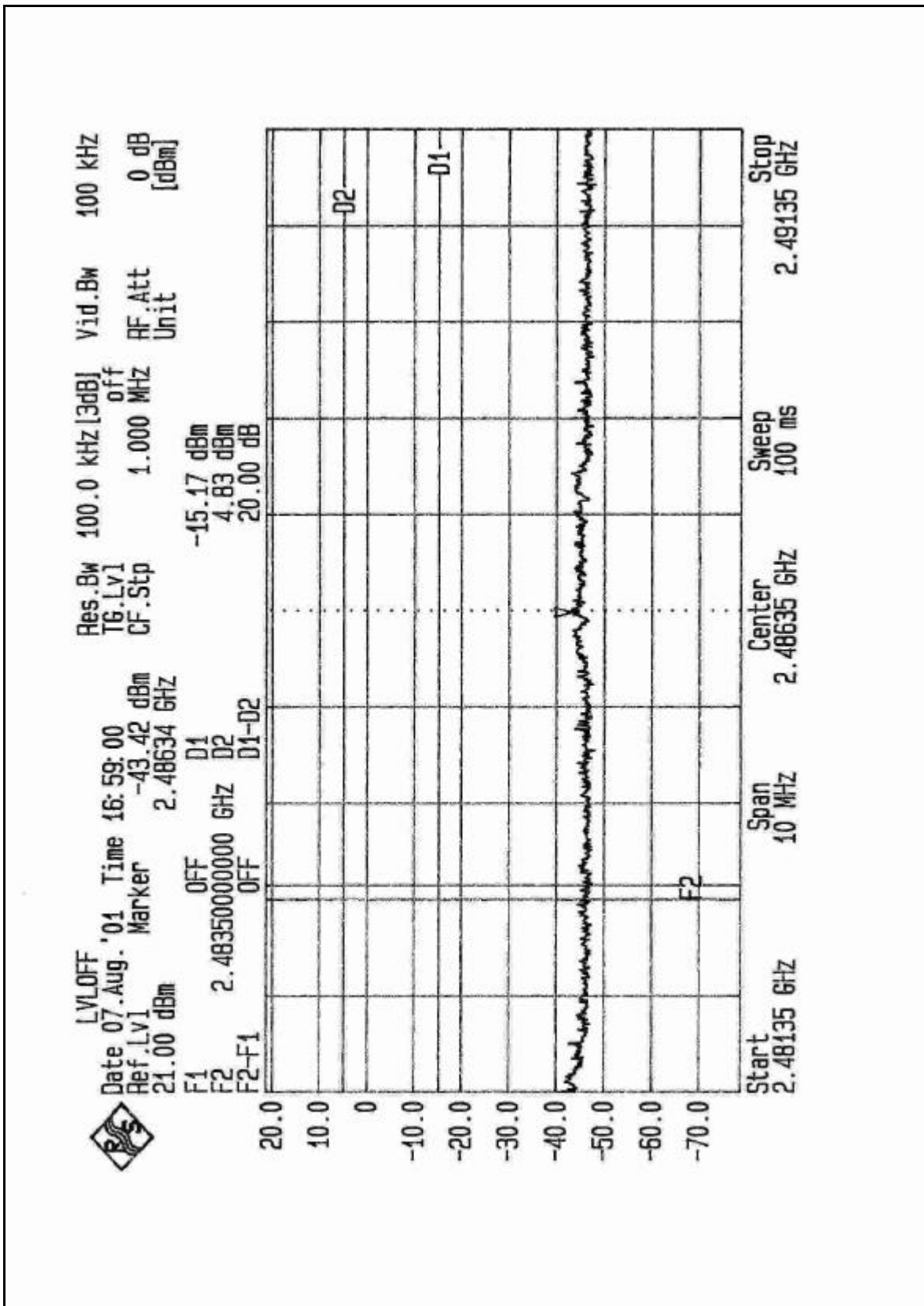
Same as Item 4.3.5

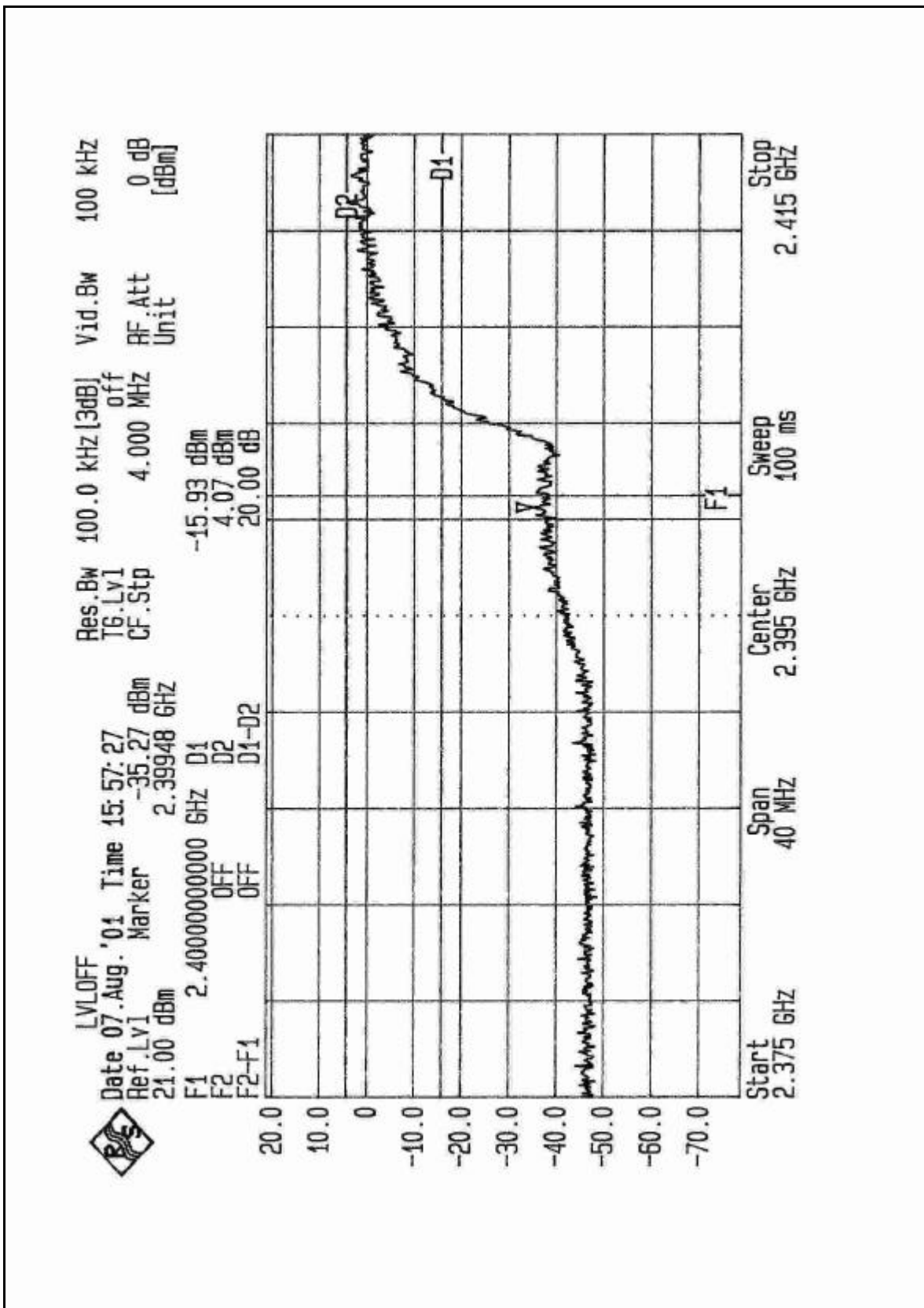
4.6.5 TEST RESULTS

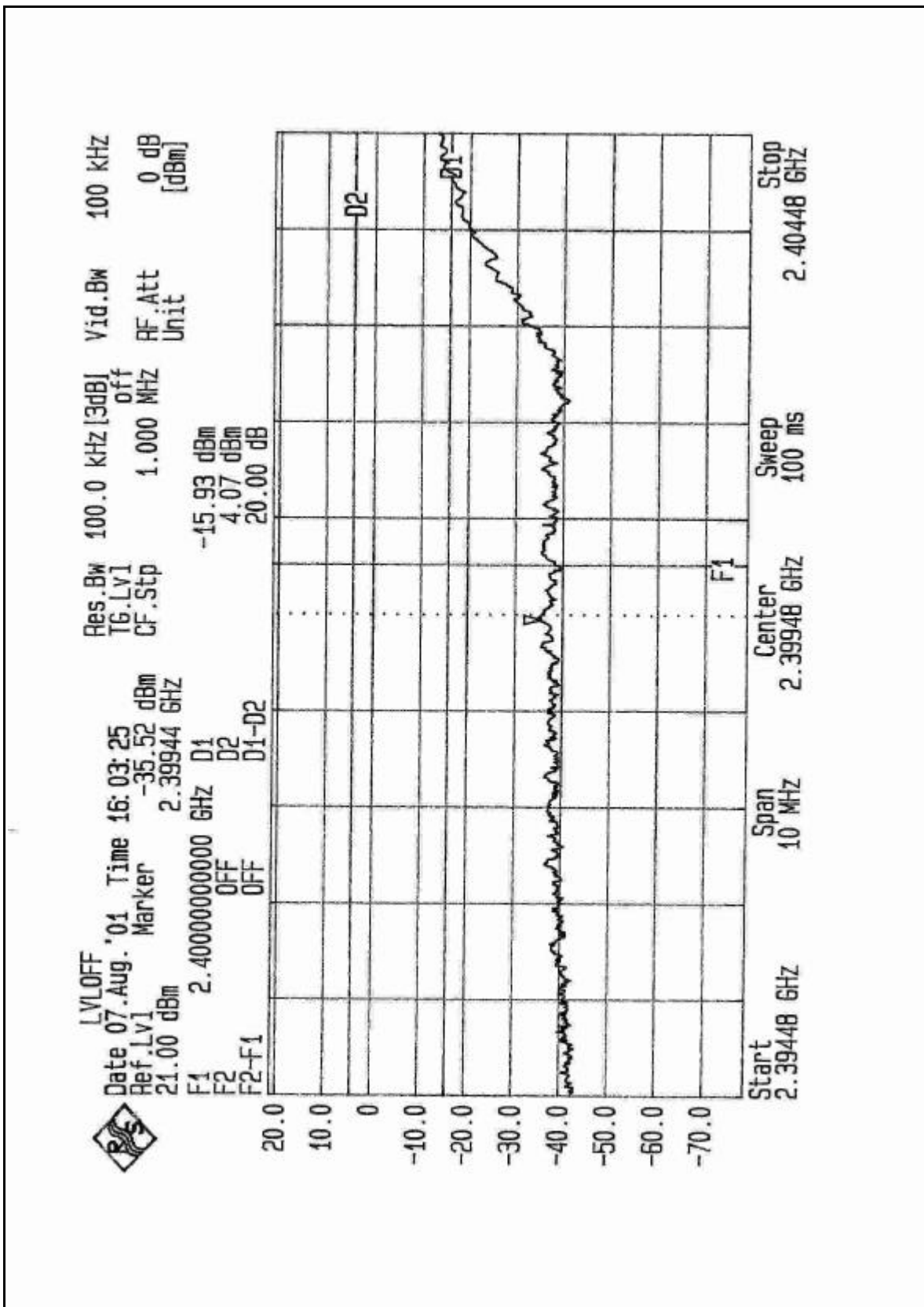
The spectrum plots are attached on the following 2 pages. D2 line indicates the highest level, D1 line indicates the 20dB offset below D2. It shows compliance with the requirement in part 15.247(C).

NOTE: The band edge emission plot on the following 4 pages shows 20.0dB delta between carrier maximum power and local maximum emission in restrict band (2.48635GHz). The emission of carrier strength list in the test result of channel 11 at the item 4.2.6 (Page 28) is 97.3dBuV/m, so the maximum field strength in restrict band is $97.3 - 47.61 = 49.69$ dBuV/m which is under 54 dBuV/m limit.











4.7 ANTENNA REQUIREMENT

4.7.1 STANDARD APPLICABLE

For intentional device, according to FCC 47 CFR Section 15.203, an intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device.

And according to FCC 47 CFR Section 15.247 (b), if transmitting antennas of directional gain greater than 6dBi are used, the power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6dBi.

4.7.2 ANTENNA CONNECTED CONSTRUCTION

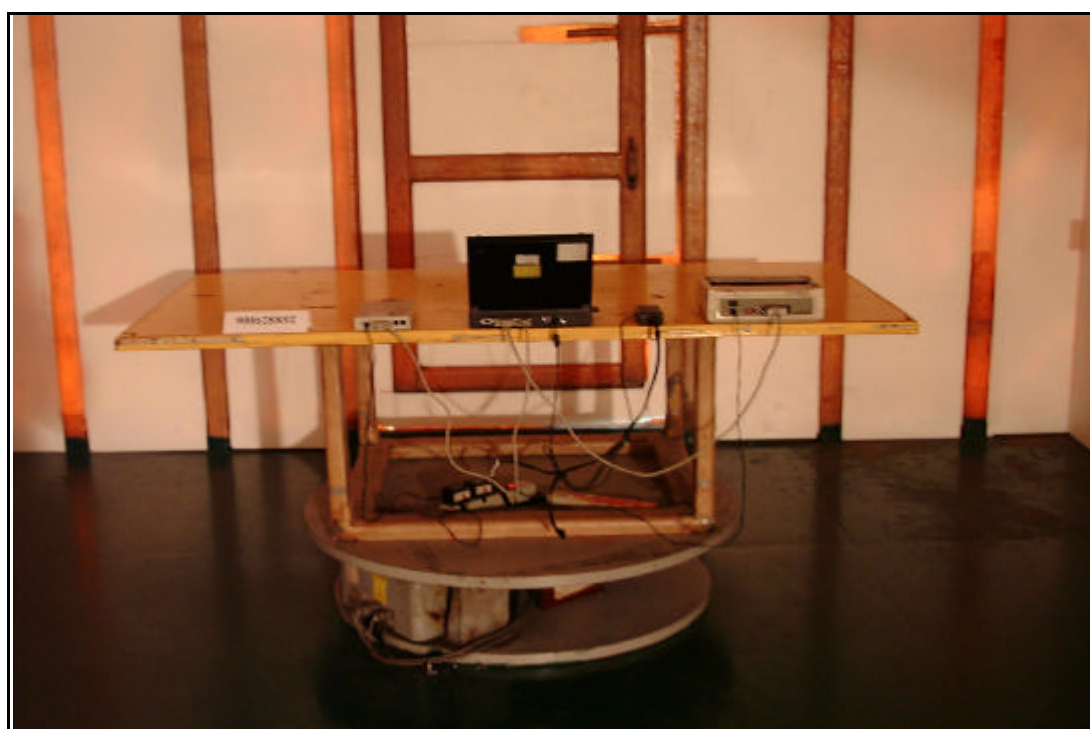
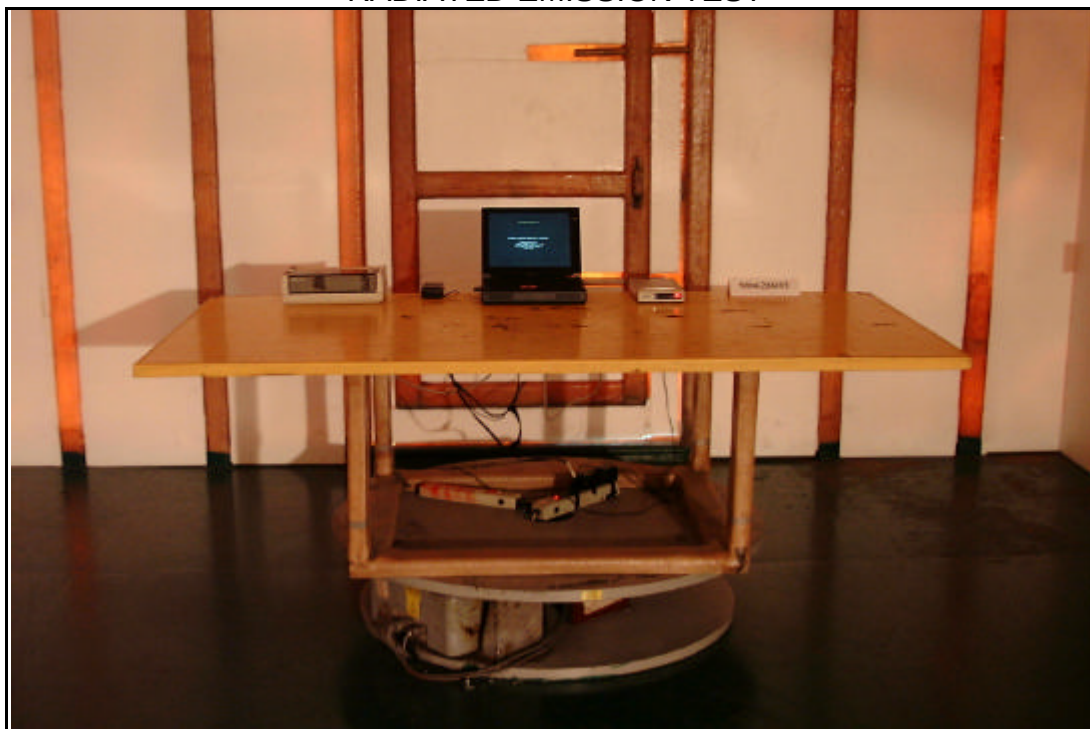
The antenna used in this product is printed antenna. There is no antenna connector for model XI-325, and MMCX antenna connector is used for model XI-325B. The maximum Gain of this antenna is only -1dBi.

5 PHOTOGRAPHS OF THE TEST CONFIGURATION

CONDUCTED EMISSION TEST



RADIATED EMISSION TEST





6 INFORMATION ON THE TESTING LABORATORIES

We, ADT Corp., were founded in 1988 to provide our best service in EMC and Safety consultation. Our laboratories are accredited and approved by the following approval agencies according to ISO/IEC 17025, Guide 25 or EN 45001:

USA	FCC, NVLAP
Germany	TUV Rheinland
Japan	VCCI
New Zealand	MoC
Norway	NEMKO
R.O.C.	BSMI, DGT, CNLA

Copies of accreditation certificates of our laboratories obtained from approval agencies can be downloaded from our web site:

www.adt.com.tw/index.5/phtml.

If you have any comments, please feel free to contact us at the following:

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Tel: 886-35-935343

Fax: 886-35-935342

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Tel: 886-3-3270910

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Email: service@mail.adt.com.tw

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The address and road map of all our labs can be found in our web site also.