ITS Intertek Testing Services
ETL SEMKO

# *FCC Parts 22 and 24 Test Report*

**For**
**Sharp Labs of America**

Performed on the

**CDMA/AMPS Cellular and PCS (CDMA) Telephone**
**Model: TQ-CX1**
**FCC ID: APYHRO00022**

Date of Test: April 25-26 & Jun 10-15, 2001

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FCC Parts 22, 24 Certification, Ver 7/98

| | | |
|---|---|---|
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## 1.0 Introduction

### 1.1 Test Summary

| FCC RULE | DESCRIPTION OF TEST | RESULT | PAGE |
|---|---|---|---|
| 2.1046 | RF Power Output | Passed | 5 |
| 22.913, 24.232 | ERP, EIRP | Passed | 16 |
| 2.1047 | Modulation Requirements | Passed | 18 |
| 22.915(d)(1) | Audio Filter Characteristics | Passed | 21 |
| 2.1049<br>22.917(b)(d) | Emission Limitation, Occupied Bandwidth | Passed | 27 |
| 2.1051, 22.917(e)<br>22.917(f), 24.238(a) | Out of Band Emissions at Antenna Terminals<br>Mobile Emissions In Base Frequency Range | Passed | 43 |
| 2.1053 | Field Strength of Spurious Radiation | Passed | 94 |
| 15.107 | Line Conducted Emissions | Not* Applicable | 115 |
| 2.1055 | Frequency Stability vs. Temperature | Passed | 116 |
| 2.1055 | Frequency Stability vs. Voltage | Passed | 118 |
| 2.1091, 2.1093 | Specific Absorption Rate | Passed | ** |

* Not Applicable as EUT is battery Operated,
** Separate Report

Tested By: Suresh Kondapalli — Date: 06/29/01

Approved By: David Chernomordik — Date: 6/30/01

1.2 Product Description

The Wireless Link Corporation Model TDM - 3100 is a dual mode, dual band CDMA and AMPS cellular radio telephone.

For more information, please refer to the attached product description.

| | |
|---|---|
| Use of Product | Portable Cellular and PCS Phone |
| Whether quantity (>1) production is planned | [X] Yes, [ ] No |
| Cellular Phone standards | [X ] AMPS<br>[X] CDMA |
| Type(s) of Emission | 40K0F8W, 40K0F1D, 30K0G7D |
| Allowed Deviation | 12± 10% (AMPS mode) |
| RF Output Power | 824-849 MHz: 24.4 dBm - AMPS<br>824-849 MHz: 27.0 dBm - CDMA<br>1850-1910 MHz: 24.4 dBm - CDMA |
| Frequency Range | 824 - 849 (AMPS & CDMA), 1850 - 1910 (CDMA) |
| Antenna(e) & Gain | 0 dBi |
| Detachable antenna ?<br>Receiver L.O. frequency<br>External input | [ ]Yes [X] No<br><br>[X] Audio [ ] Digital Data |

1.3 Related Submittal(s) Grants

[X] None

[ ] DOC for computer section, a separate DOC is prepared.

## 2.0 RF Power Output, FCC 2.1046

### 2.1 Test Procedure

The transmitter output was connected to a calibrated coaxial attenuator, the other end of which was connected to a spectrum analyzer. Transmitter output was read off the spectrum analyzer in dBm. The power output at the transmitter antenna port was determined by adding the value of the attenuator to the spectrum analyzer reading. An HP power meter was also used to measure the RF power.
Tests were performed at three frequencies (low, middle, and high channels) and on all power levels, which can be setup on the transmitters.

### 2.2 Test Equipment

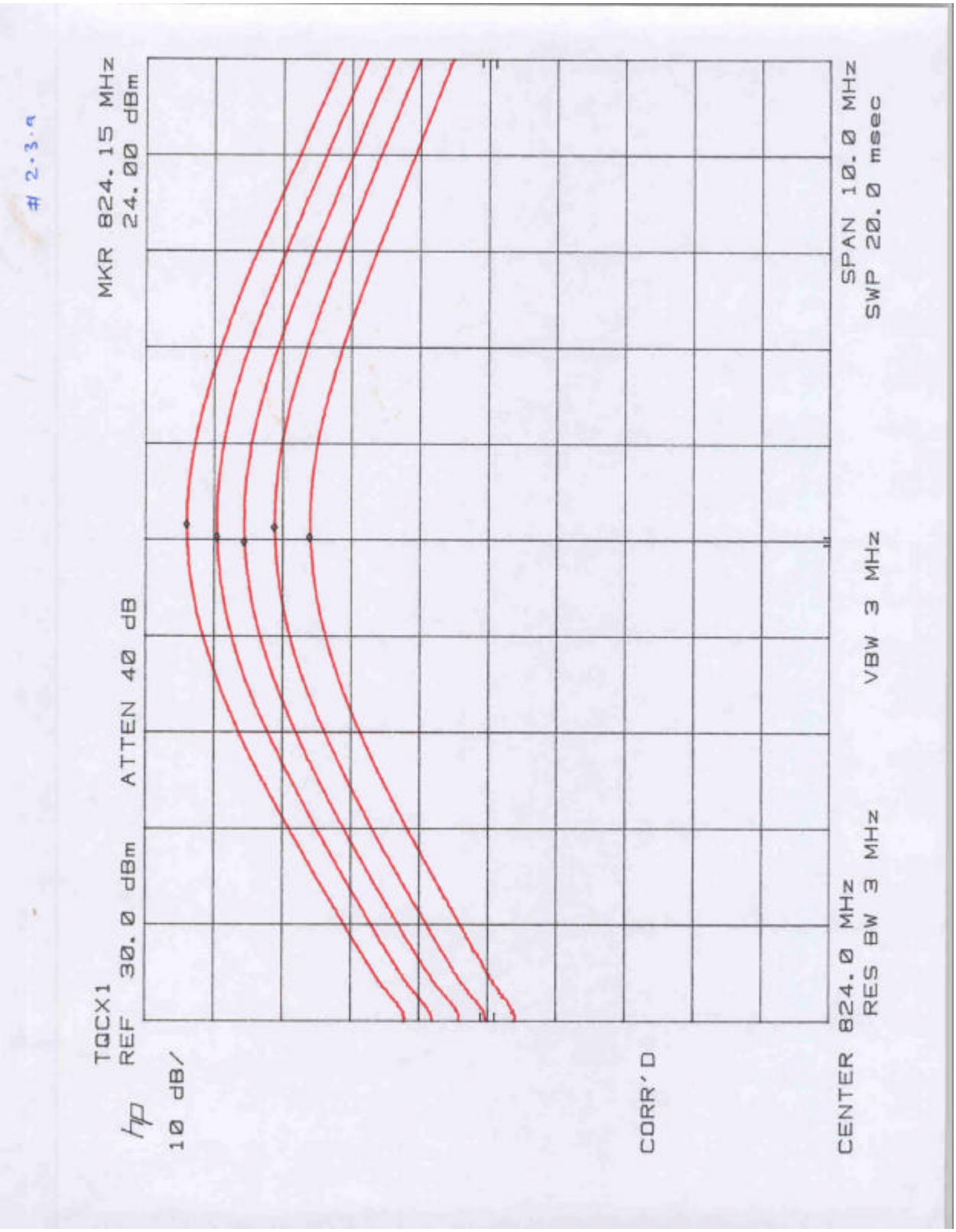
Hewlett Packard 8481A Power Sensor, 435B Power Meter
Hewlett Packard HP8566B Spectrum Analyzer, 100 Hz - 22 GHz
Tektronix 2784 Spectrum Analyzer, 100 Hz – 40 GHz

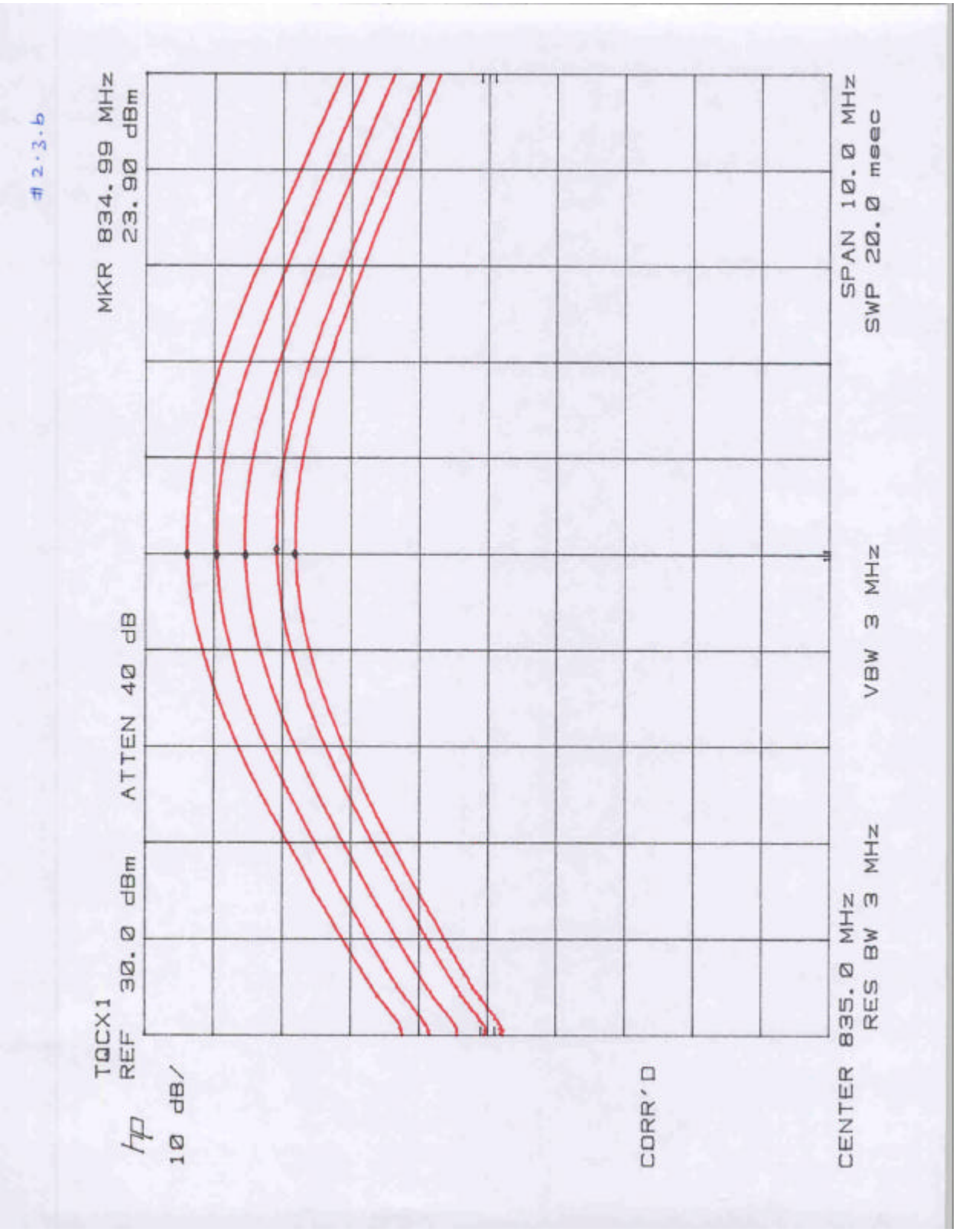
### 2.3 Test Results

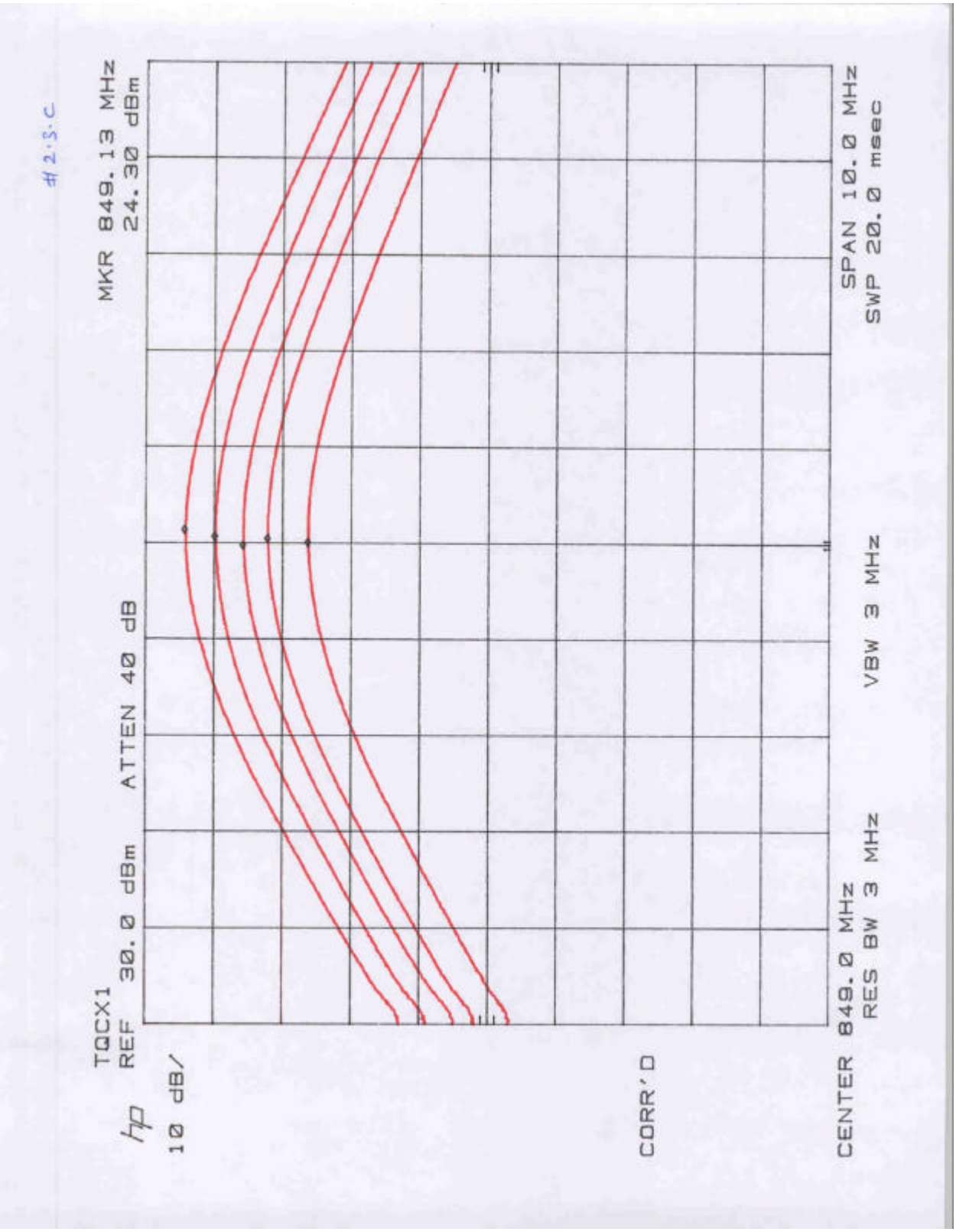
| Frequency (MHz) | Measured Power (dBm) |
|---|---|
| 824.04 (AMPS) | 24.4 |
| 835.02 (AMPS) | 24.2 |
| 848.97 (AMPS) | 24.3 |
| 824.04 (CDMA) | 26.9 |
| 835.02 (CDMA) | 27.0 |
| 848.97 (CDMA) | 26.9 |
| 1851.2 (CDMA) | 23.9 |
| 1880.0 (CDMA) | 24.4 |
| 1909.9 (CDMA) | 24.3 |

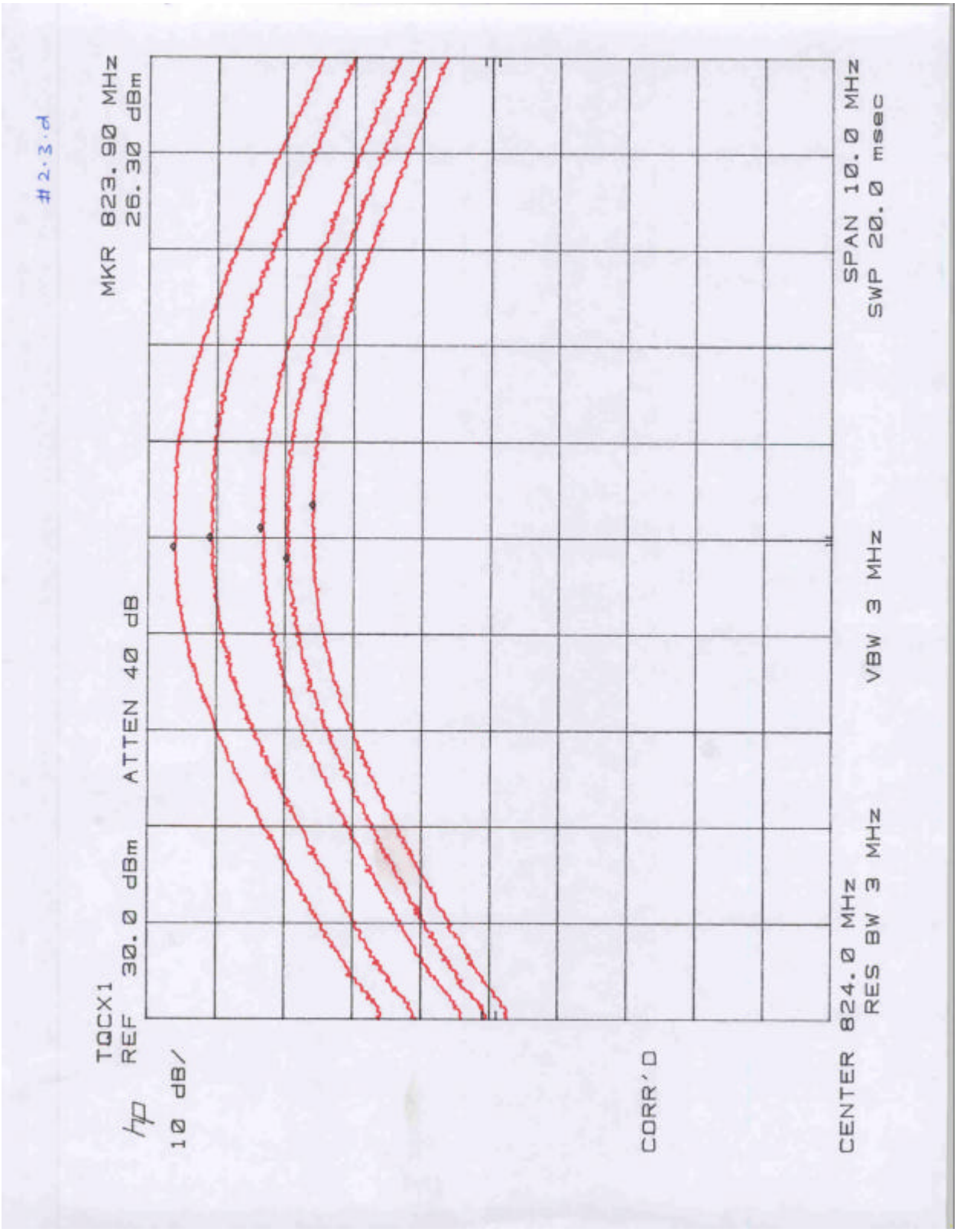
For more details refer to the attached plots:

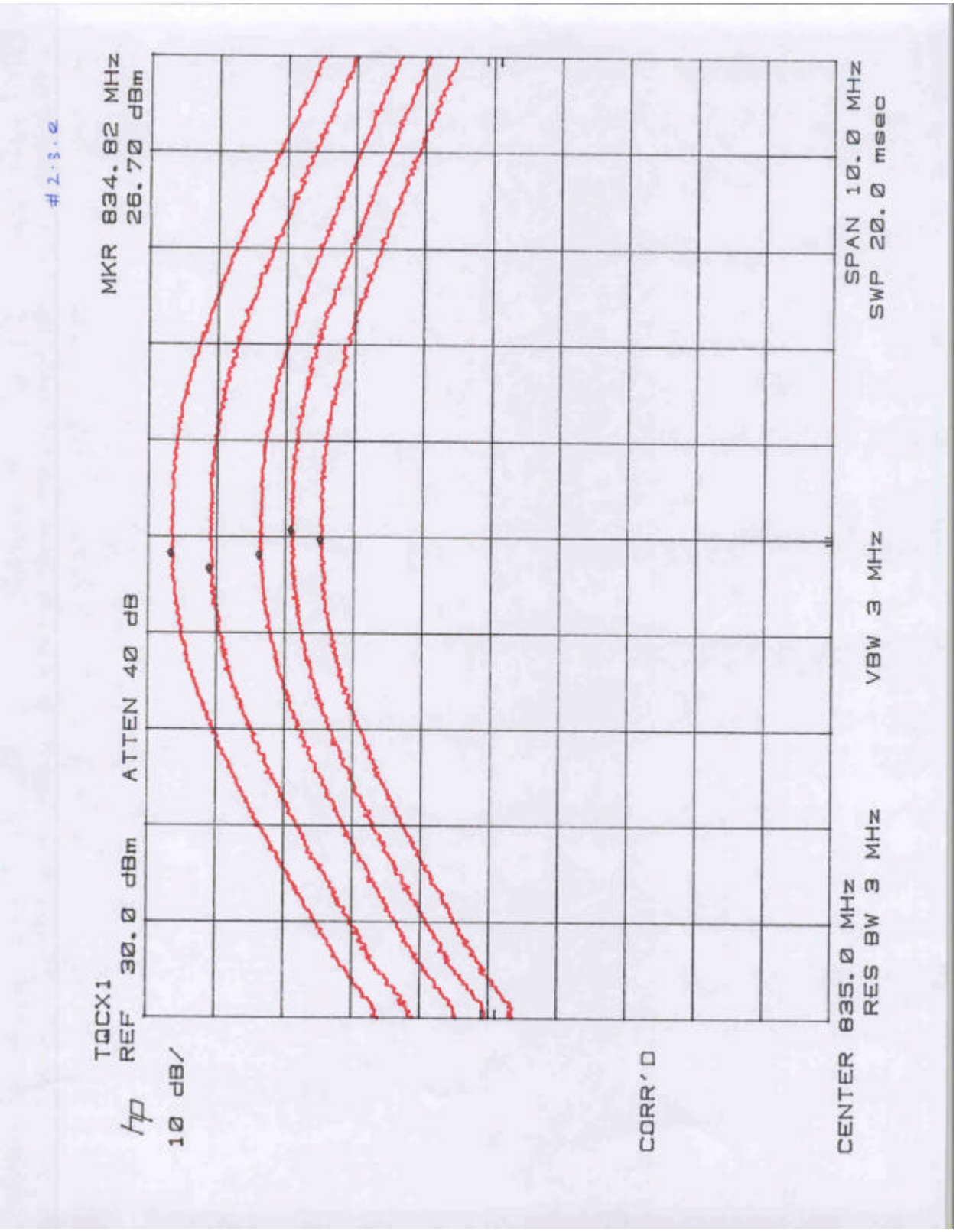
| AMPS Mode | |
|---|---|
| Plot Number | Description |
| 2.3.a | Low Channel |
| 2.3.b | Middle Channel |
| 2.3.c | High Channel |
| CDMA Mode | |
| Plot Number | Description |
| 2.3.d | Low Channel |
| 2.3.e | Middle Channel |
| 2.3.f | High Channel |
| PCS Band (CDMA Mode) | |
| Plot Number | Description |
| 2.3.g | Low Channel |
| 2.3.h | Middle Channel |
| 2.3.j | High Channel |

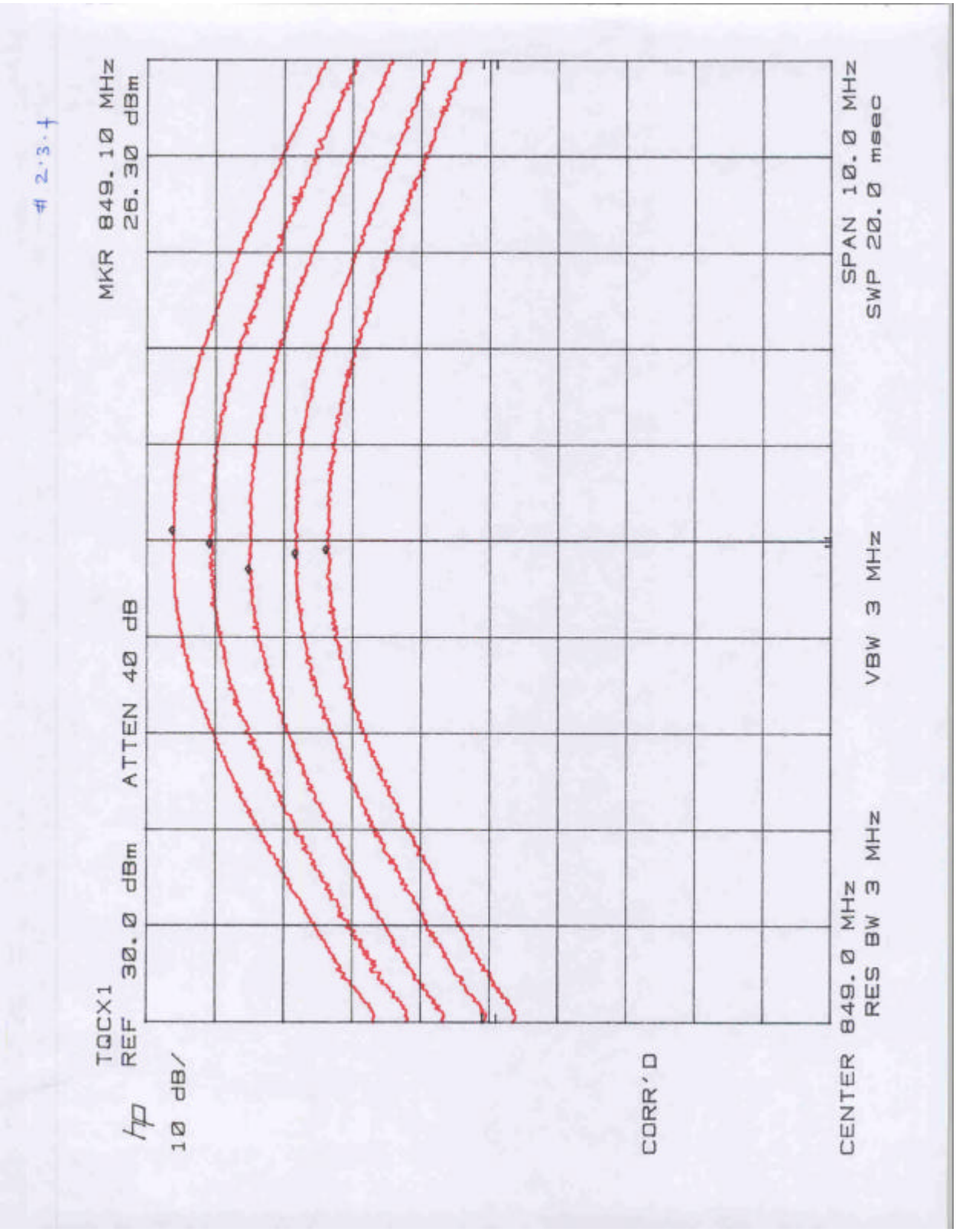

TQCX1
REF 30.0 dBm
ATTEN 40 dB
MKR 824.15 MHz
24.00 dBm
10 dB/
CORR'D
CENTER 824.0 MHz
RES BW 3 MHz
VBW 3 MHz
SPAN 10.0 MHz
SWP 20.0 msec

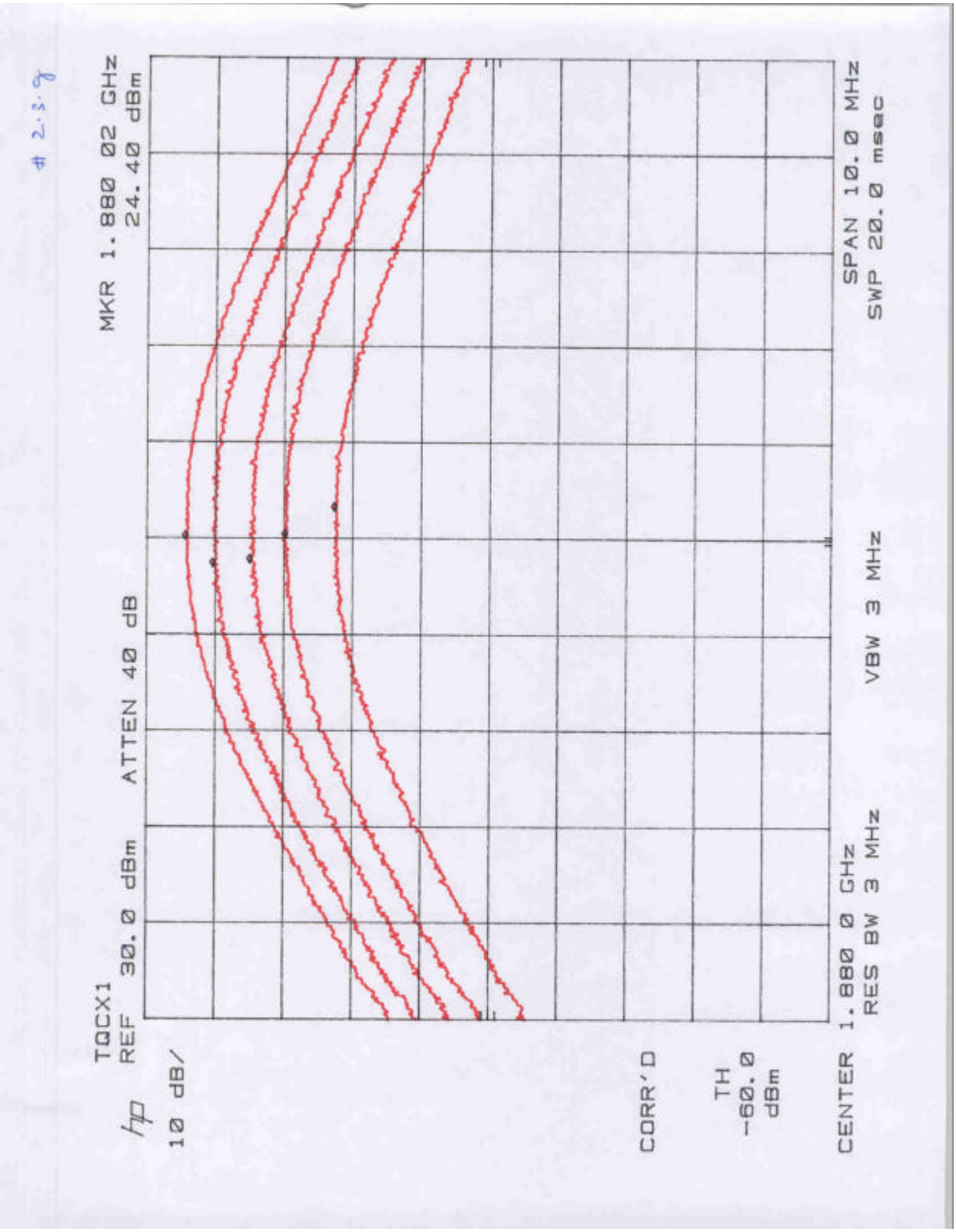

#2.3.b
TQCX1
REF 30.0 dBm
ATTEN 40 dB
MKR 834.99 MHz
23.90 dBm
10 dB/
CORR'D
CENTER 835.0 MHz
RES BW 3 MHz
VBW 3 MHz
SPAN 10.0 MHz
SWP 20.0 msec

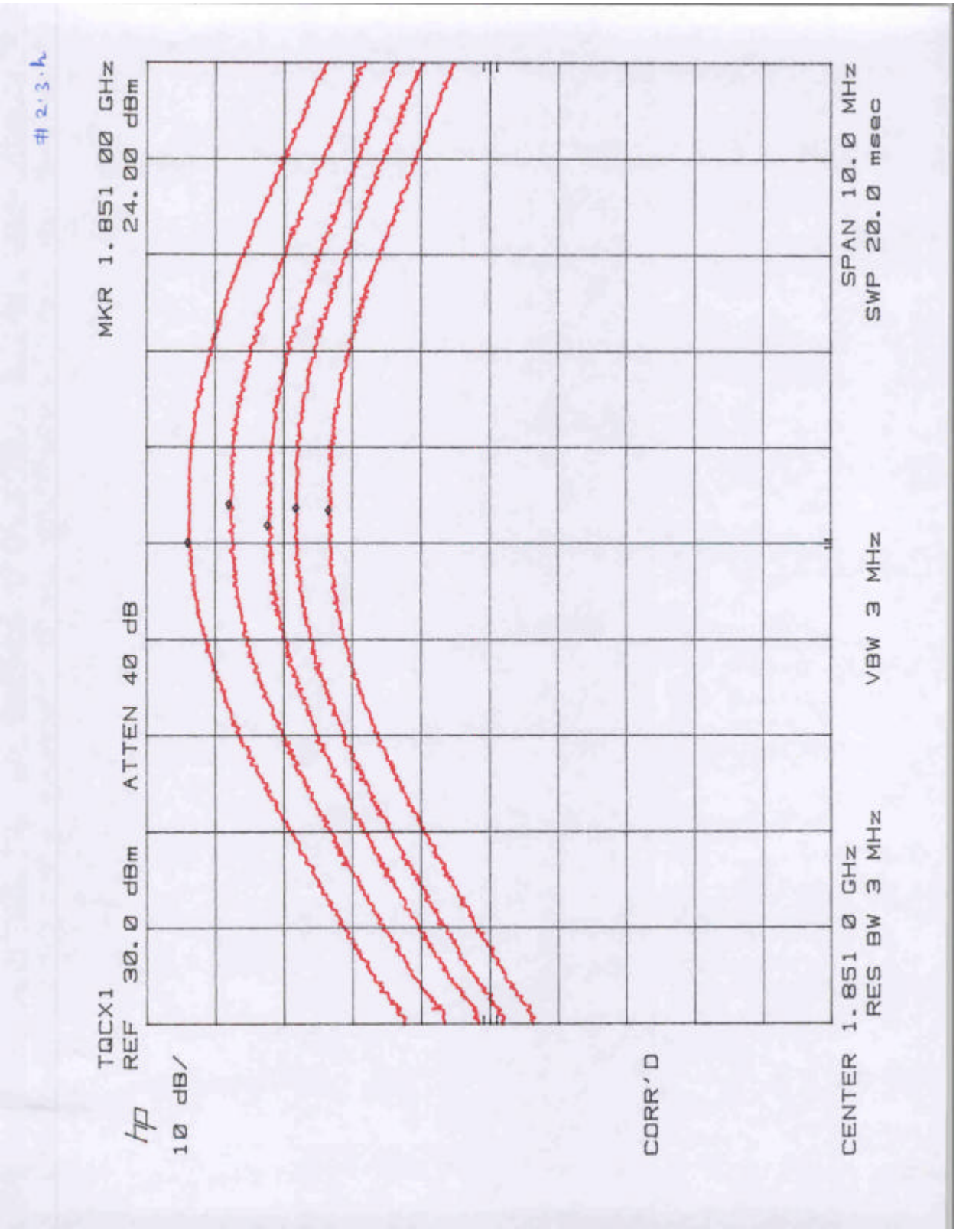

#2-3-C
TQCX1
REF 30.0 dBm ATTEN 40 dB
MKR 849.13 MHz
24.30 dBm
10 dB/
CORR'D
CENTER 849.0 MHz
RES BW 3 MHz
VBW 3 MHz
SPAN 10.0 MHz
SWP 20.0 msec

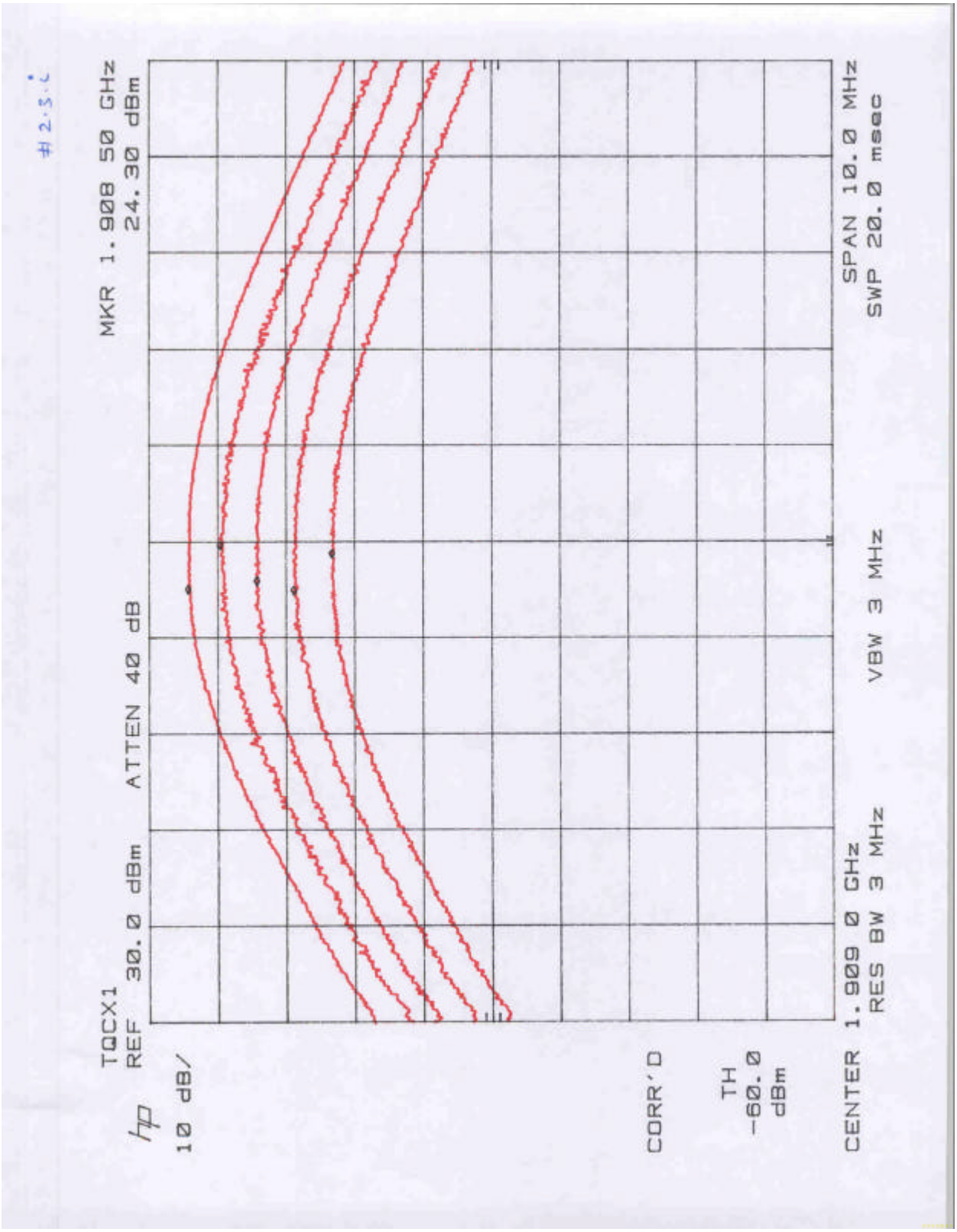

#2.3.d
MKR 823.90 MHz
26.30 dBm
TQCX1
REF 30.0 dBm ATTEN 40 dB
10 dB/
CORR'D
CENTER 824.0 MHz
RES BW 3 MHz
VBW 3 MHz
SPAN 10.0 MHz
SWP 20.0 msec


#2.3.a
TQCX1
REF 30.0 dBm
ATTEN 40 dB
MKR 834.82 MHz
26.70 dBm
10 dB/
CORR'D
CENTER 835.0 MHz
RES BW 3 MHz
VBW 3 MHz
SPAN 10.0 MHz
SWP 20.0 msec


#2-3-4
MKR 849.10 MHz
26.30 dBm
TQCX1
REF 30.0 dBm
ATTEN 40 dB
10 dB/
CORR'D
SPAN 10.0 MHz
SWP 20.0 msec
VBW 3 MHz
CENTER 849.0 MHz
RES BW 3 MHz


#2.3.g
TQCX1
REF 30.0 dBm
ATTEN 40 dB
MKR 1.880 02 GHz
24.40 dBm
10 dB/
CORR'D
TH
-60.0
dBm
CENTER 1.880 0 GHz
RES BW 3 MHz
VBW 3 MHz
SPAN 10.0 MHz
SWP 20.0 msec


#2·3·h
TQCX1
REF 30.0 dBm
ATTEN 40 dB
MKR 1.851 00 GHz
24.00 dBm
10 dB/
CORR'D
CENTER 1.851 0 GHz
RES BW 3 MHz
VBW 3 MHz
SPAN 10.0 MHz
SWP 20.0 msec


#2.3.c
TQCX1
REF 30.0 dBm
ATTEN 40 dB
MKR 1.908 50 GHz
24.30 dBm
10 dB/
CORR'D
TH
-60.0
dBm
CENTER 1.909 0 GHz
RES BW 3 MHz
VBW 3 MHz
SPAN 10.0 MHz
SWP 20.0 msec

## 3.0 Radiated Power

FCC 22.913

The Effective Radiated Power (ERP) of mobile transmitters and auxiliary test transmitters must not exceed 7 Watts.

FCC 24.232

The equivalent Isotropic Radiated Power (EIRP) must not exceed 2 Watts.

### 3.1 Test Procedure

The EUT was positioned on a non-conductive turntable, 0.8m above the ground plane on an open test site. The radiated emission at the fundamental frequency was measured at 3m distance with a test antenna and spectrum analyzer. During the measurement, the resolution and video bandwidths of the spectrum analyzer were set to 100 kHz (for frequencies below 1 GHz) and 1 MHz (for frequencies above 1 GHz).

Worst case emission was recorded with the rotation of the turntable and the raising and lowering of the test antenna. The spectrum analyzer reading was recorded and the field strength (E in dBuV/m) was calculated.

ERP in frequency band 824-849 MHz, and EIRP in frequency band 1851.25-1910 MHz were measured using a substitution method. The EUT was replaced by half-wave dipole (824-849 MHz) or horn antenna (1851.25-1910 MHz) connected to a signal generator. The spectrum analyzer reading was recorded and ERP/EIRP was calculated as follows:

$$ERP = E_1 - E_2 + V_g, ; \quad EIRP = E_1 - E_2 + V_g + G$$

where $E_1$ & $E_2$ are spectrum analyzer readings in dBuV/m when measured field strength from EUT & generator accordingly; $V_g$ is the generator output in dBm; G is the transmitting antenna gain.

### 3.2 Test Equipment

Hewlett Packard HP8566B Spectrum Analyzer
EMCO 3148 Log Periodic Antenna
EMCO 3115 Horn Antenna
CDI Robert's Antenna
Rohde & Schwarz SMH 44 signal generator

3.3 Test Results

| | |
|---|---|
| **Passed** | Refer to the attached data sheets. |

**Field Strength of fundamental**

| Frequency MHz | Antenna Polarity | Detector | SA Reading dB(µV) | Antenna Factor dB(1/m) | Cable Loss dB | Field Strength dB(µV/m) |
|---|---|---|---|---|---|---|
| **AMPS Mode** | | | | | | |
| 824.04 | V | Peak | 102.4 | 23.0 | 2.0 | 127.4 |
| 835.02 | V | Peak | 100.8 | 23.3 | 2.0 | 126.1 |
| 848.97 | V | Peak | 100.6 | 23.3 | 2.0 | 125.9 |
| **CDMA Mode** | | | | | | |
| 824.04 | V | Peak | 103.3 | 23.0 | 2.0 | 128.3 |
| 835.02 | V | Peak | 102.9 | 23.3 | 2.0 | 128.2 |
| 848.97 | V | Peak | 100.9 | 23.3 | 2.0 | 126.2 |
| **CDMA Mode** | | | | | | |
| 1851.2 | V | Peak | 97.1 | 30.1 | 2.7 | 129.9 |
| 1879.9 | V | Peak | 96.5 | 30.1 | 2.7 | 129.3 |
| 1909.9 | V | Peak | 94.0 | 30.1 | 2.8 | 126.9 |

**Radiated Power (Substitution Method)**

| Frequency MHz | Antenna Polariz. | Field Strength (EUT) dBµV/m | Field Strength (Sig. Gen. +Tuned Dipole) dBµV/m | Signal Generator Output dBm | ERP dBm |
|---|---|---|---|---|---|
| **AMPS Mode** | | | | | |
| 824.04 | V | 127.4 | 111.4 | 10.0 | 26.0 |
| 835.02 | V | 126.1 | 111.3 | 10.0 | 24.8 |
| 848.97 | V | 125.9 | 111.2 | 10.0 | 24.7 |
| **CDMA Mode** | | | | | |
| 824.04 | V | 128.3 | 111.4 | 10.0 | 26.9 |
| 835.02 | V | 128.2 | 111.3 | 10.0 | 26.9 |
| 848.97 | V | 126.2 | 111.2 | 10.0 | 25.0 |

**Radiated Power (Substitution Method)**

| Frequency MHz | Antenna Polariz. | Field Strength (EUT) dBµV/m | Field Strength (Sig. Gen. + horn ant.) dBµV/m | Signal Generator output + ant. gain* dBm | EIRP dBm |
|---|---|---|---|---|---|
| **CDMA Mode** | | | | | |
| 1851.2 | V | 129.9 | 118.7 | 17.0 | 28.2 |
| 1879.9 | V | 129.3 | 118.7 | 17.0 | 27.6 |
| 1909.9 | V | 126.9 | 118.8 | 17.0 | 25.1 |

*Antenna gain equals 7.0 dBi

## 4.0 Modulation Deviation Limiting, FCC 2.1047, 22.915(b)(c)

### 4.1 Test Procedure

The RF output of the transceiver was connected to the input of an FM deviation meter through sufficient attenuation so as not to overload the meter or distort the readings. An audio signal generator with a variable attenuator on the output was coupled into the external microphone jack of the transceiver, or alternatively, the microphone element was removed and the generator output was connected to the microphone wires by clip leads.

At three different modulating frequencies, the output level of the audio generator was varied and the FM deviation level was recorded (Table 4.1a).

In addition, the audio signal was adjusted to obtain 8 kHz deviation at 1 kHz modulation frequency. Then the input signal was increased in 1 step by 20 dB and the peak deviation and steady state deviation were recorded. This test was performed at modulation frequencies from 300 Hz to 3 kHz.

### 4.2 Test Equipment

Marconi 2955A Radio Communication Test Set
Leader LFG-1300S Function Generator
LMV-182 AC Millivoltmeter

4.3 Test Results

The deviation is not to exceed 12 kHz. The EUT passed the test. See test data in table 4.1a.

| Table 4.1a Modulation Deviation Limiting | | | |
|---|---|---|---|
| **Ouput Level (mV)** | **FM Deviation in kHz at Indicated Modulating Frequency** | | |
| | **3000 Hz** | **1000 Hz** | **300 Hz** |
| 1.0 | 1.4 | 0.7 | 0.1 |
| 2.0 | 2.7 | 1.3 | 0.2 |
| 3.0 | 4.0 | 1.9 | 0.3 |
| 5.0 | 6.4 | 3.1 | 0.4 |
| 10.0 | 8.1 | 6.1 | 0.8 |
| 15.0 | 8.6 | 9.1 | 1.1 |
| 20.0 | 8.8 | 10.6 | 1.5 |
| 30.0 | 8.9 | 11.9 | 2.1 |
| 40.0 | 9.0 | 11.8 | 2.2 |
| 50.0 | 8.9 | 9.7 | 2.9 |
| 60.0 | 8.7 | 9.7 | 3.5 |
| 70.0 | 8.7 | 10.0 | 4.2 |
| 80.0 | 8.7 | 11.5 | 5.9 |
| 90.0 | 8.7 | 12.4 | 6.6 |
| 100.0 | 8.7 | 13.0 | 6.7 |
| 110.0 | 8.7 | 13.1 | 6.8 |
| 150.0 | 8.7 | 13.1 | 6.9 |
| 160.0 | 8.7 | 13.1 | 7.9 |
| 170.0 | 8.7 | 13.2 | 8.0 |
| 180.0 | 8.7 | 13.2 | 8.2 |
| 190.0 | 8.7 | 13.2 | 8.4 |
| 200 | 8.7 | 13.2 | 10.2 |
| 250 | 8.7 | 13.2 | 11.4 |
| 300 | 8.7 | 13.2 | 11.7 |
| 400 | 8.7 | 13.2 | 11.7 |
| 450 | 8.7 | 13.2 | 11.7 |
| 500 | 8.7 | 13.2 | 11.7 |
| 600 | 8.7 | 13.2 | 11.5 |
| 650 | 8.7 | 13.2 | 11.4 |
| 700 | 8.7 | 13.2 | 11.3 |
| 800 | 8.7 | 13.2 | 11.0 |
| 900 | 8.7 | 13.2 | 10.8 |
| 1000 | 8.7 | 13.2 | 10.6 |

Middle Channel: 835.02 MHz

**Table 4.1b**
**Frequency Deviation**

| Frequency kHz | Initial Deviation | Peak Deviation | Steady State Deviation |
|---|---|---|---|
| 0.3 | 1.0 | 7.6 | 7.3 |
| 0.5 | 3.1 | 11.0 | 10.9 |
| 0.7 | 5.3 | 10.4 | 10.3 |
| 0.9 | 7.1 | 11.5 | 11.4 |
| 1.0 | 8.0 | 13.1 | 13.0 |
| 1.2 | 9.4 | 13.1 | 12.8 |
| 1.4 | 9.8 | 13.1 | 12.1 |
| 1.6 | 9.9 | 11.2 | 11.0 |
| 1.8 | 9.9 | 13.2 | 11.3 |
| 2.0 | 9.9 | 13.2 | 10.1 |
| 2.4 | 10.1 | 12.0 | 12.0 |
| 2.8 | 9.8 | 10.2 | 10.0 |
| 3.0 | 8.7 | 9.0 | 8.8 |

Test Conditions:

$V_{inp}$ = 13.2 mV
Deviation = 8 kHz at 1 kHz modulation frequency
Middle Channel = 835.02 MHz

## 5.0 Audio Filter Characteristics, FCC 22.915(d)

For mobile stations, these signals must be attenuated, relative to the level at 1 kHz, as follows:

(i) In the frequency ranges of 3.0 to 5.9 kHz and 6.1 to 15.0 kHz, signals must be attenuated by at least 40 log (f/3) dB, where f is the frequency of the signal in kHz.

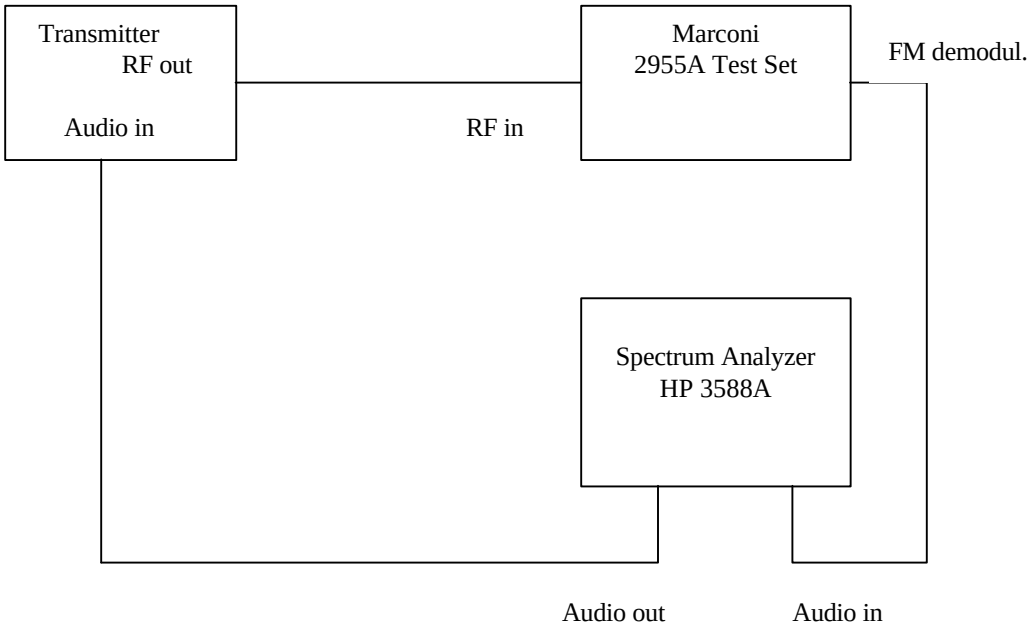
(ii) In the frequency range of 5.9 to 6.1 kHz, signals must be attenuated at least 35 dB.

(iii) In the frequency range above 15 kHz, signals must be attenuated at least 28 dB.

### 5.1 Test Procedure

The RF output of the transceiver was connected to the input of an FM deviation meter through sufficient attenuation so as not to overload the meter or distort the readings. An audio signal generator with a variable attenuator on the output was coupledl into the external microphone jack of the transceiver, or alternatively, the microphone element was removed and the generator output was connected to the microphone wires by clip leads.

The test was performed according to the block diagram shown below.




On that block diagram, the HP 3885A spectrum analyzer having the tracing generator, and the Marconi 2955A Radio Communication Test Set having an output of a demodulator, are used. After the calibration was made (the -20 dBm reading of the spectrum analyzer corresponds to the 9 kHz deviation) the spectrum analyzer was set to

scan the frequency from 300 Hz to 30 kHz, with the same audio input level as described above, and with compressor OFF and expander OFF.
The audio filter response was plotted directly from the spectrum analyzer (Refer to Plots # 5.1.a, 5.1.b. Using the level measured at 1 kHz as a reference (0 dB), the audio filter response was calculated (See Table 5-1).

## 5.2 Test Equipment

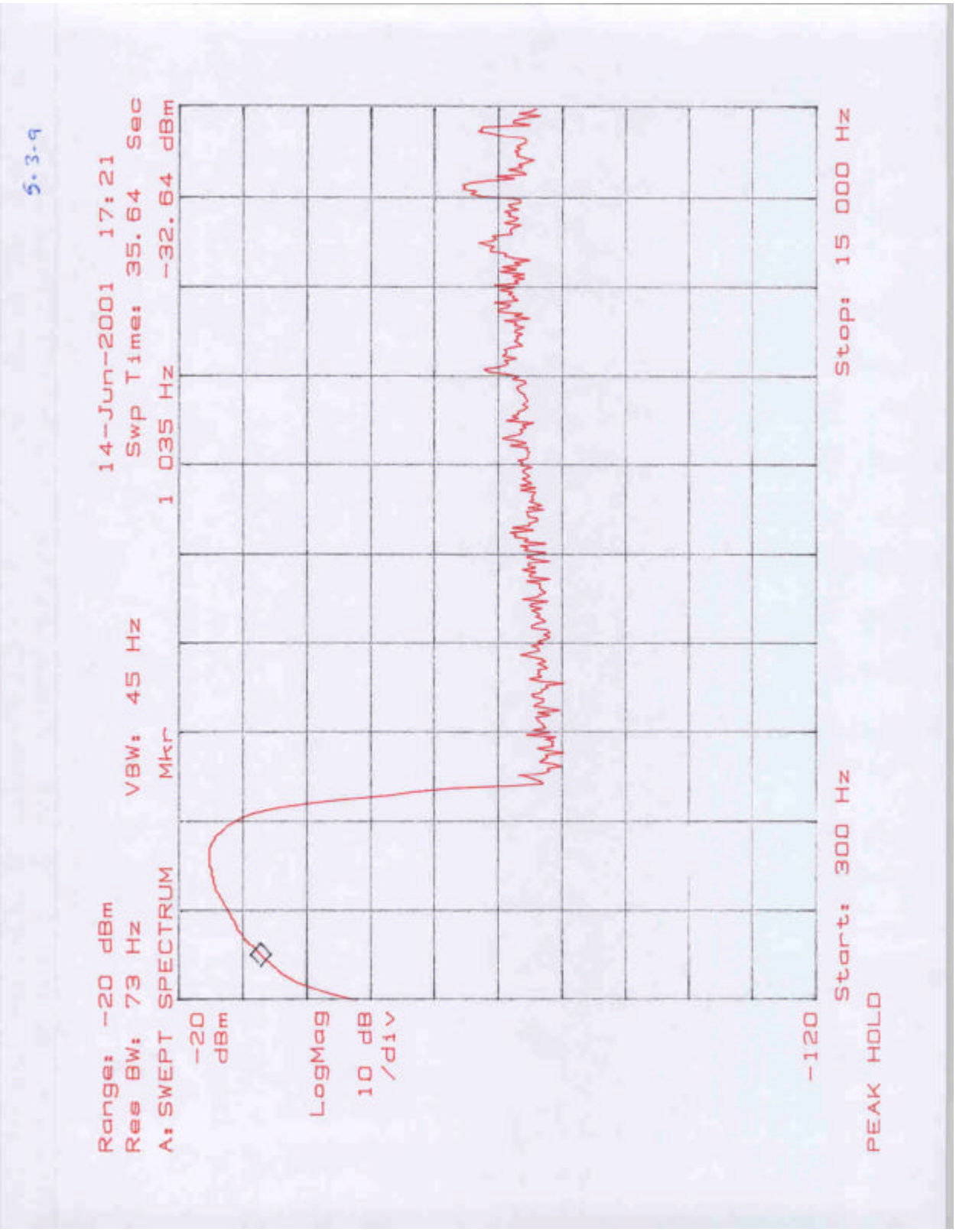
Marconi Instruments 2955A Radio Communications Test Set
HP 3588A Spectrum Analyzer
HP 7470A Plotter
Leader LFG-1300S Function Generator
LMV-182 AC Millivoltmeter

5.3 Test Results

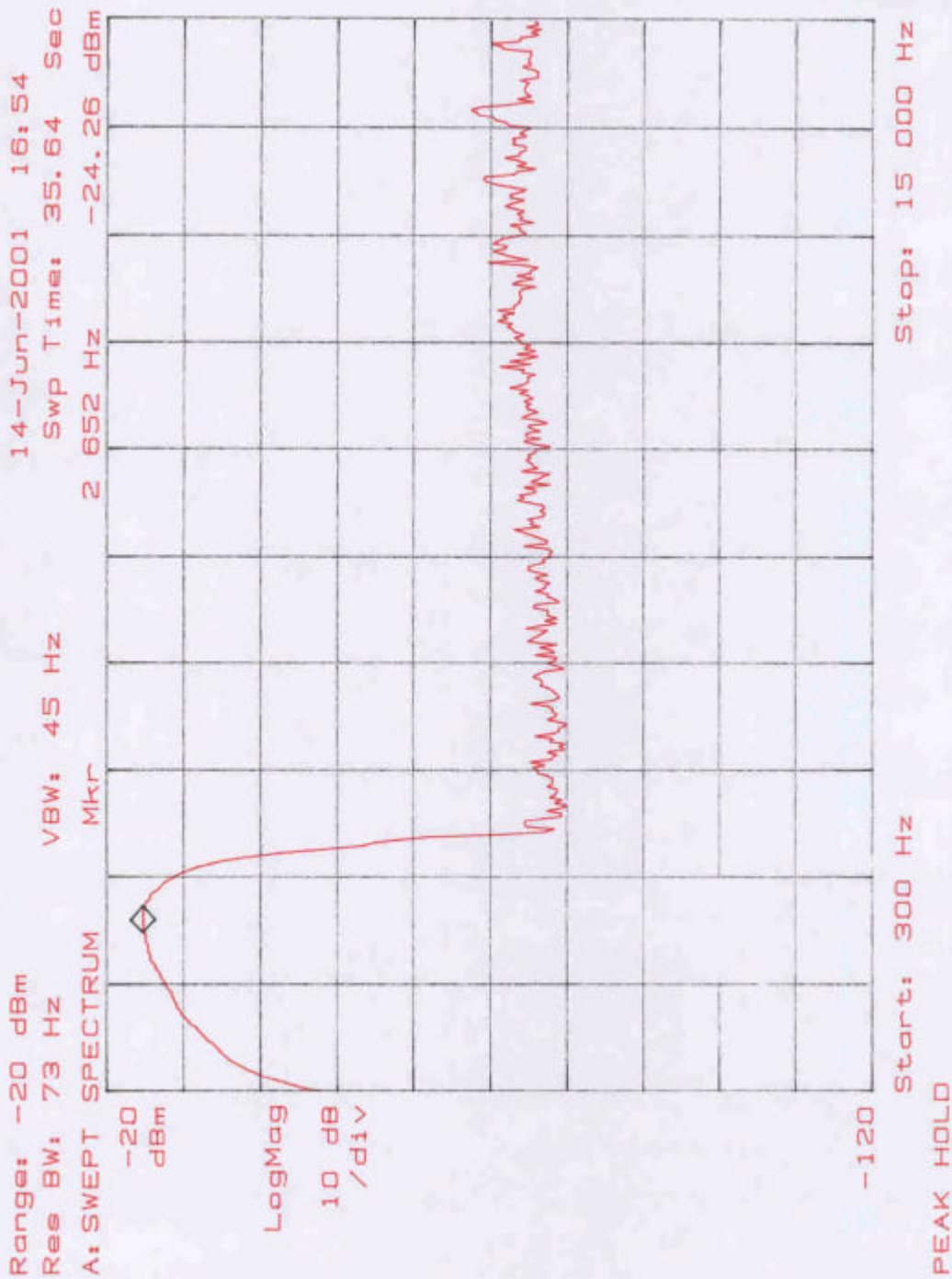
| Audio Filter Characteristics | |
|---|---|
| Plot Number | Description |
| 5.3.a | 300Hz to 15KHz, Marker at 1KHz |
| 5.3.b | 300Hz to 15KHz, Marker at Peak Deviation |
| 5.3.c | 300Hz to 15KHz, Marker at 5.99KHz |

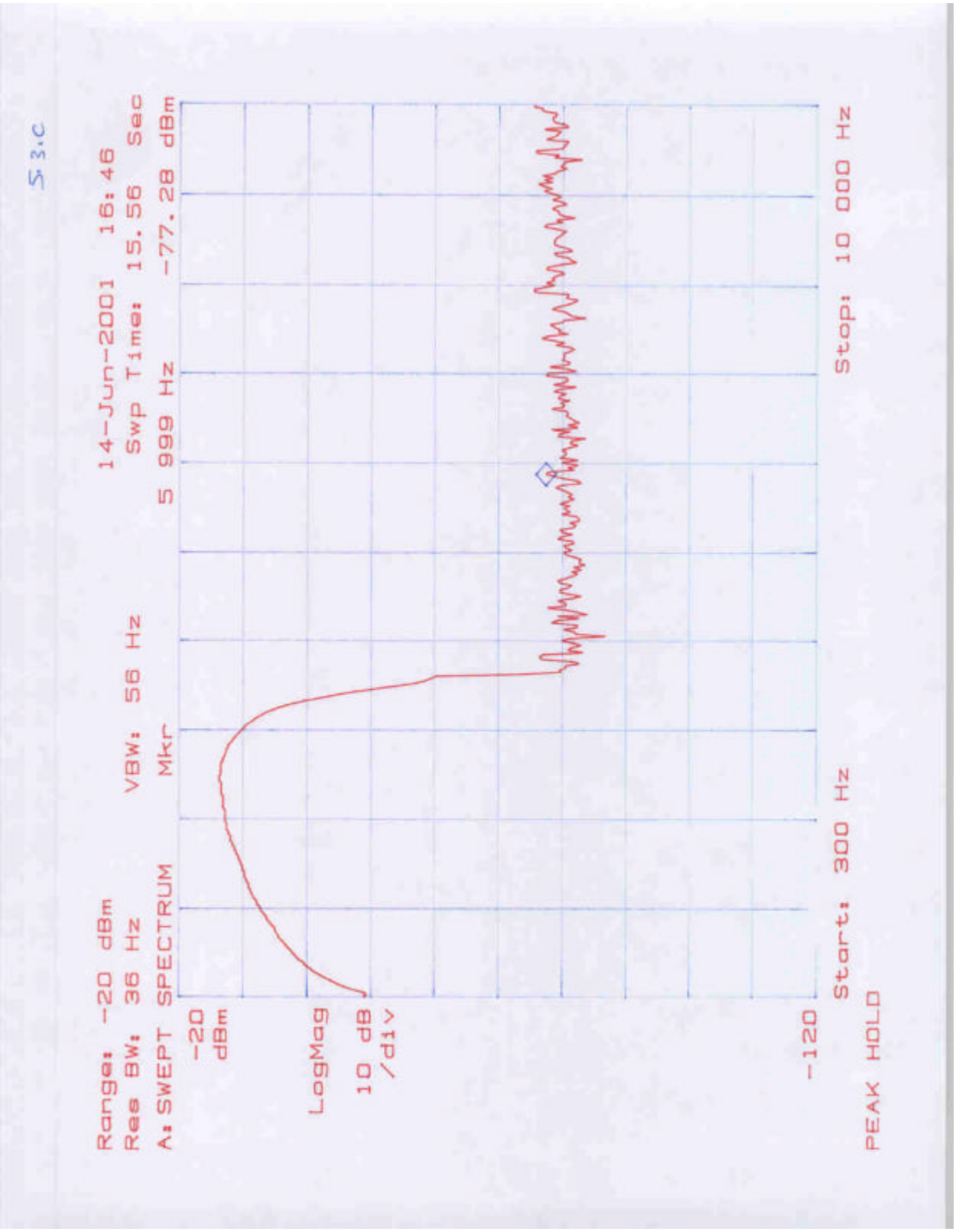
Table 5.1
Audio Filter Characteristics

| Modulation Frequency kHz | Relative Level dBm | Attenuation |
|---|---|---|
| 0.3 | -45.6 | 12.6 |
| 0.4 | -43.0 | 10.0 |
| 0.5 | -39.9 | 6.9 |
| 0.6 | -38.2 | 5.2 |
| 0.7 | -36.3 | 3.3 |
| 0.8 | -34.9 | 1.9 |
| 0.9 | -33.9 | 0.9 |
| 1.0 | -32.9 | 0 |
| 1.2 | -30.8 | -2.1 |
| 1.4 | -29.3 | -3.6 |
| 1.6 | -27.8 | -5.1 |
| 1.8 | -26.7 | -6.2 |
| 2.0 | -25.7 | -7.2 |
| 2.2 | -25.0 | -7.9 |
| 2.5 | -24.4 | -8.5 |
| 3.0 | -25.7 | -7.2 |
| 3.5 | -34.7 | 1.7 |
| 4.0 | -78.6 | 45.6 |
| 4.5 | -77.2 | 44.2 |
| 5.0 | -76.2 | 43.3 |
| 5.5 | -77.1 | 44.1 |
| 5.9 | -75.0 | 42.0 |
| 6.0 | -75.3 | 42.3 |
| 6.1 | -78.1 | 45.1 |
| 8.0 | -71.8 | 38.8 |
| 10.0 | -73.7 | 40.7 |
| 15.0 | -73.6 | 40.6 |


5-3-9
Range: -20 dBm
Res BW: 73 Hz
A: SWEPT SPECTRUM
VBW: 45 Hz
Mkr
1 035 Hz
14-Jun-2001 17:21
Swp Time: 35.64 Sec
-32.64 dBm
-20 dBm
LogMag
10 dB /div
-120
Start: 300 Hz
Stop: 15 000 Hz
PEAK HOLD

5.3.b


Range: -20 dBm
Res BW: 73 Hz
A: SWEPT SPECTRUM
VBW: 45 Hz
Mkr
14-Jun-2001 16:54
Swp Time: 35.64 Sec
2 652 Hz
-24.26 dBm
-20 dBm
LogMag
10 dB /div
-120
Start: 300 Hz
Stop: 15 000 Hz
PEAK HOLD


S3.C
14-Jun-2001 16:46
Swp Time: 15.56 Sec
-77.28 dBm
Range: -20 dBm
Res BW: 36 Hz
VBW: 56 Hz
A: SWEPT SPECTRUM
Mkr
5 999 Hz
-20 dBm
LogMag
10 dB /div
-120
Start: 300 Hz
Stop: 10 000 Hz
PEAK HOLD

## 6.0 Emission Limitations, Occupied Bandwidth, FCC 2.1049, 22.917(b)(d)

For F3E/F3D emission mask uses with audio filter, the mean power of emissions must be attenuated below the mean power of the unmodulated carrier wave (P) as follows:

(1) On any frequency removed from the carrier frequency by more than 20 kHz but not more than 45 kHz: at least 26 dB;

(2) On any frequency removed from the carrier frequency by more than 45 kHz, up to the first multiple of the carrier frequency: at least 60 dB or 43 + 10 log P dB, whichever is the lesser attenuation.

For F1D emission mask, the mean power of emissions must be attenuated below the mean power of the unmodualted carrier (P) as follows:

(1) On any frequency removed from the carrier frequency by more than 20 kHz but no more than 45 kHz: at least 26 dB;

(2) On any frequency removed from the carrier frequency by more than 45 kHz but not more than 90 kHz: at least 45 dB;

(2) On any frequency removed from the carrier frequency by more than 90 kHz, up to the first multiple ofthe carrier frequency: at least 60 dB or 43 +10 log P db, whichever is the lesser attenuation.

### 6.1 Test Procedure

The RF output of the transceiver was connected to the input of the spectrum analyzer through sufficient attenuation. The audio generator was connected to the audio input of the transceiver.

The spectrum with no modulation was recorded. The audio input signal was adjusted to obtain the frequencies deviation equal 6 kHz at the audio frequency of maximum response which was determined measuring deviation versus frequency from 300 Hz to 3.5 kHz and was found 2.8 kHz. The audio input level was increased by 16 dB. The audio frequency was set to the frequency 2.5 kHz.

The resolution bandwidth of the spectrum analyzer was set at 300 Hz and the spectrum was recorded in the frequency band 50 kHz and 100 kHz from the carrier frequency. The same plots has been done for wideband emissions, SAT, ST, DTMF9, Voice, some of the combinations of these modulating signals and in CDMA mode.

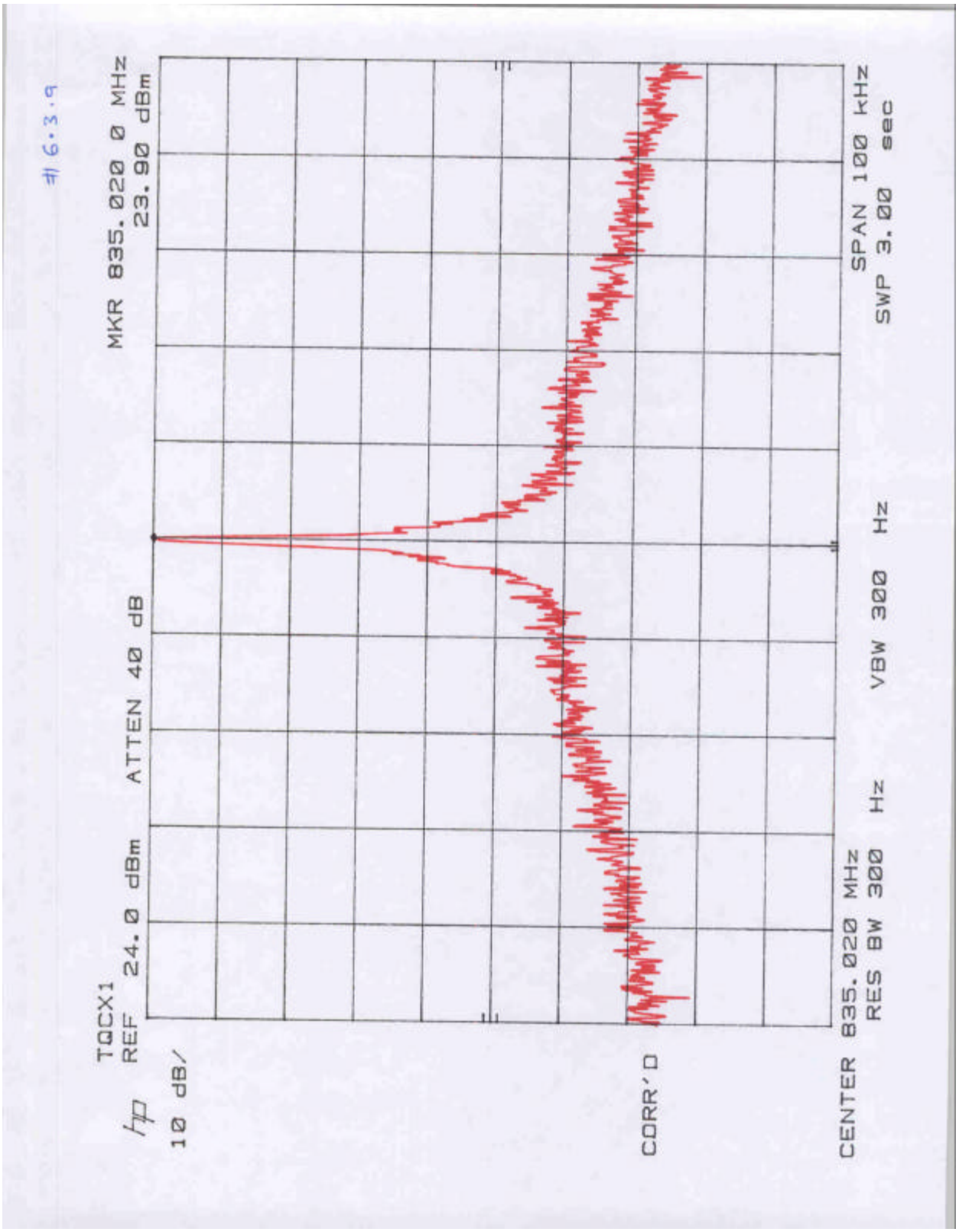
## 6.2 Test Equipment

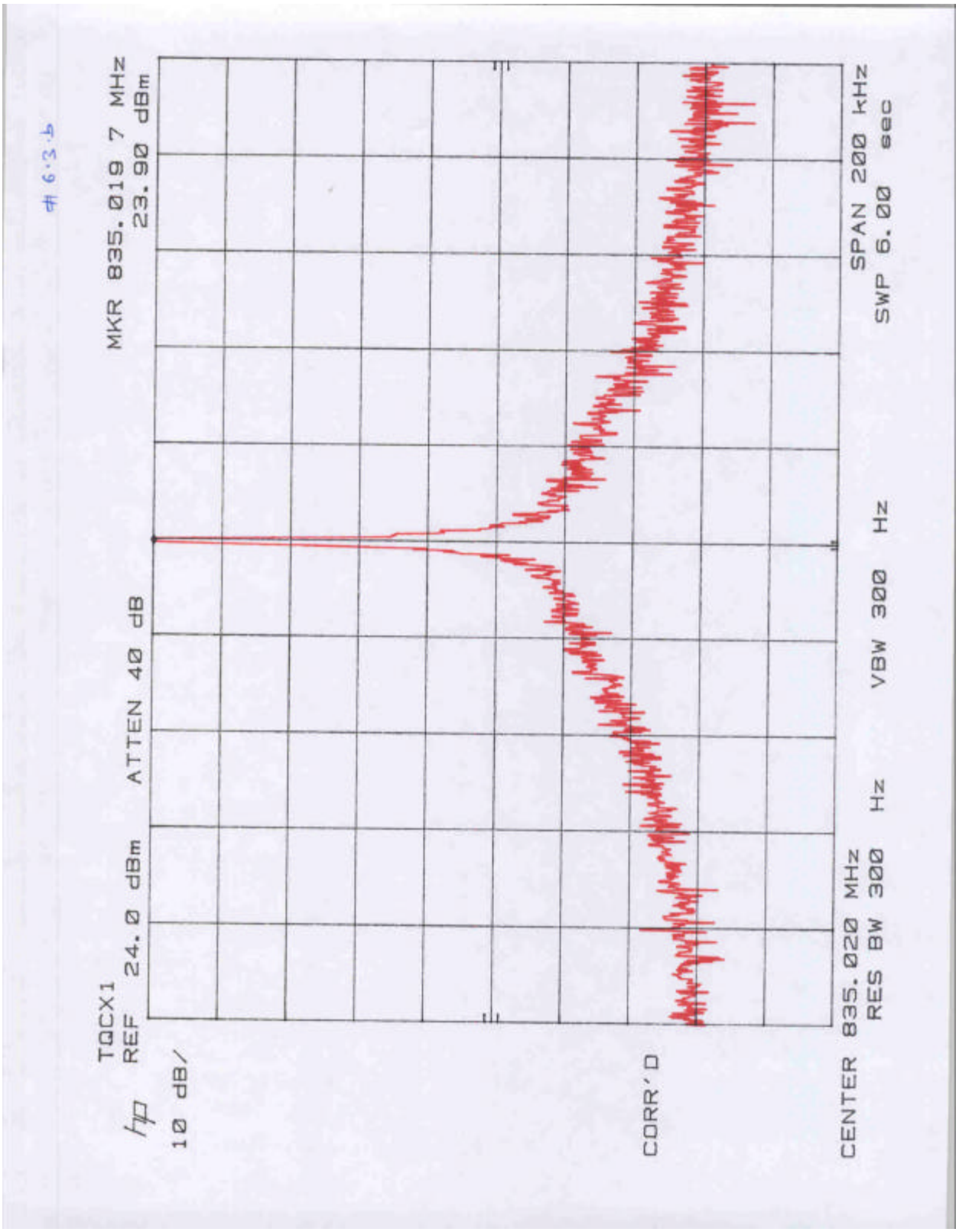
HP 8566B Spectrum Analyzer
Leader LFG-1300S Function Generator
Leader LMV-182 AC Millivoltmeter
Marconi 2955A Radio Communication Test Set
HP 7470A Plotter

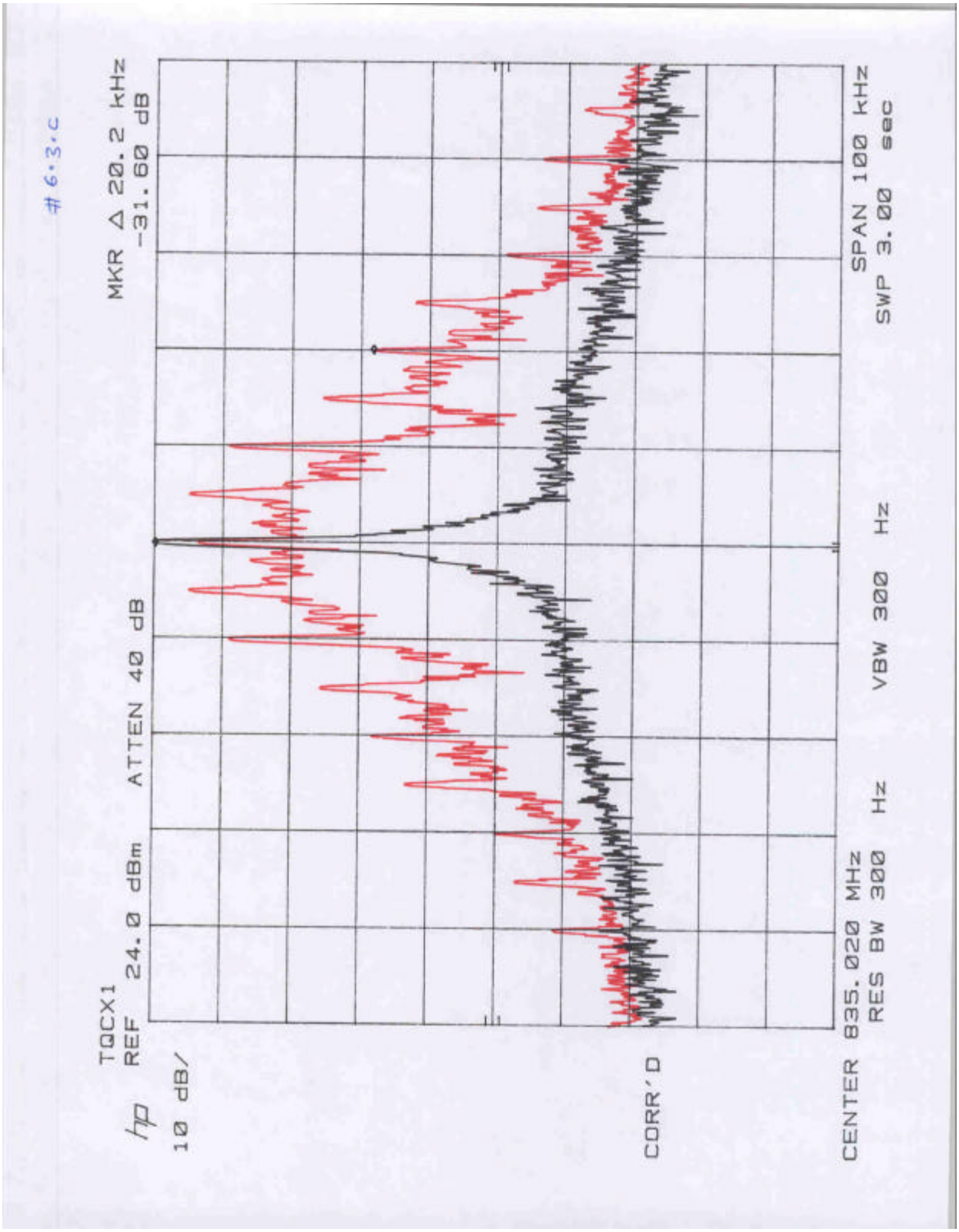
## 6.3 Test Results

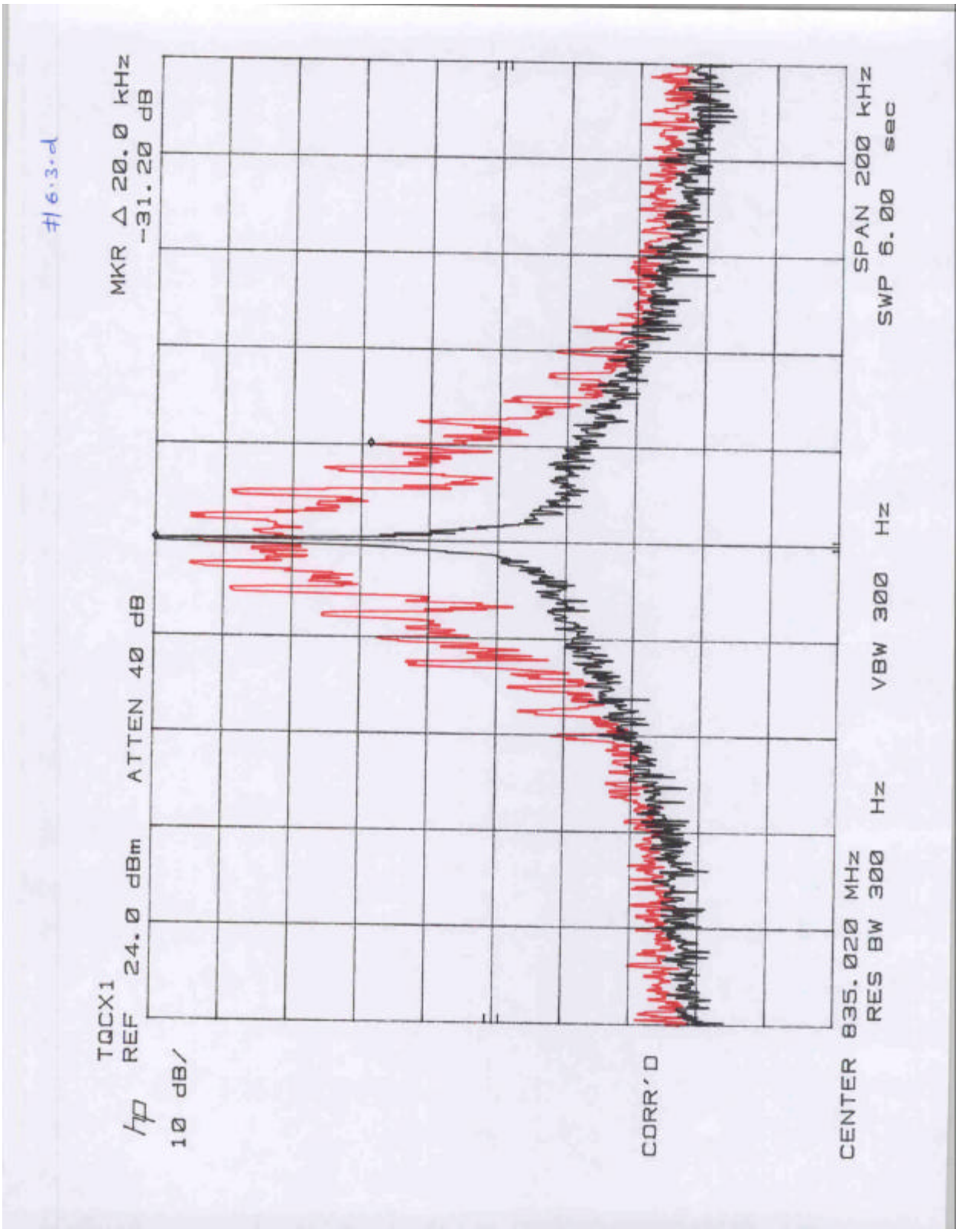
| | |
|---|---|
| **Passes** | Refer to the attached plots. |

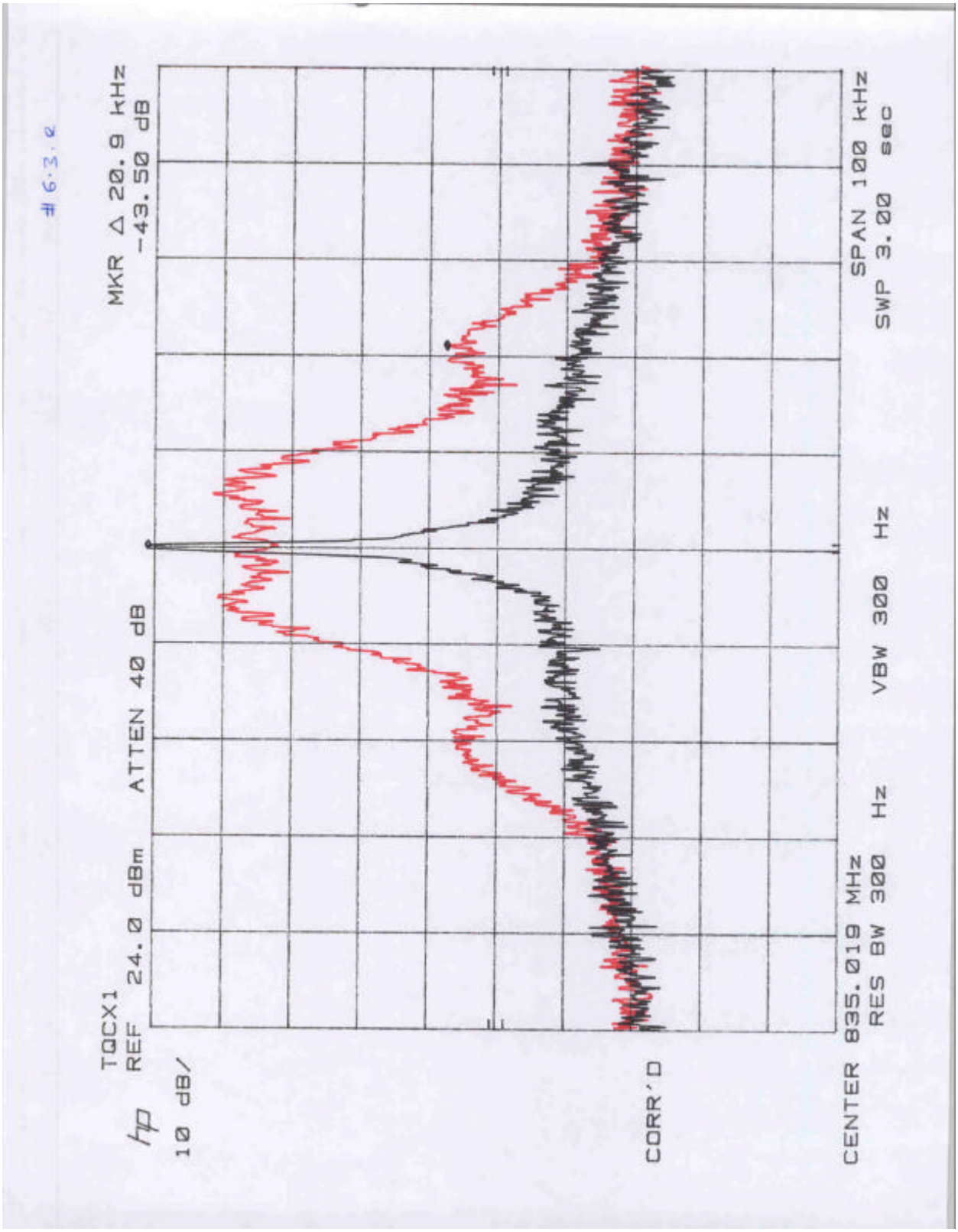
| Plot Number | Description |
|---|---|
| 6.3.a | Carrier Frequency, no modulation, scan 100kHz |
| 6.3.b | Carrier Frequency, no modulation, scan 200kHz |
| 6.3.c | Wideband Emissions (0, 1, 0, 1), scan 100 kHz |
| 6.3.d | Wideband Emissions (0, 1, 0, 1), scan 200 kHz |
| 6.3.e | DTMF "9" |
| 6.3.f | SAT (6 kHz, 2 kHz deviation) |
| 6.3.g | ST (10 kHz, 8 kHz deviation), scan 100 kHz |
| 6.3.h | ST (10 kHz, 8 kHz deviation), scan 100 kHz |
| 6.3.i | ST & SAT (6 kHz & 10 kHz), scan 100 kHz |
| 6.3.j | ST & SAT (6 kHz & 10 kHz), scan 200 kHz |
| 6.3.k | DTMF & SAT, scan 100 kHz |
| 6.3.l | Voice (2.5 kHz), scan 100 kHz |
| 6.3.m | Voice (2.5 kHz) & SAT (6 kHz), scan 100 kHz |
| 6.3.n | Voice (2.5 kHz) & SAT (6 kHz), low power |

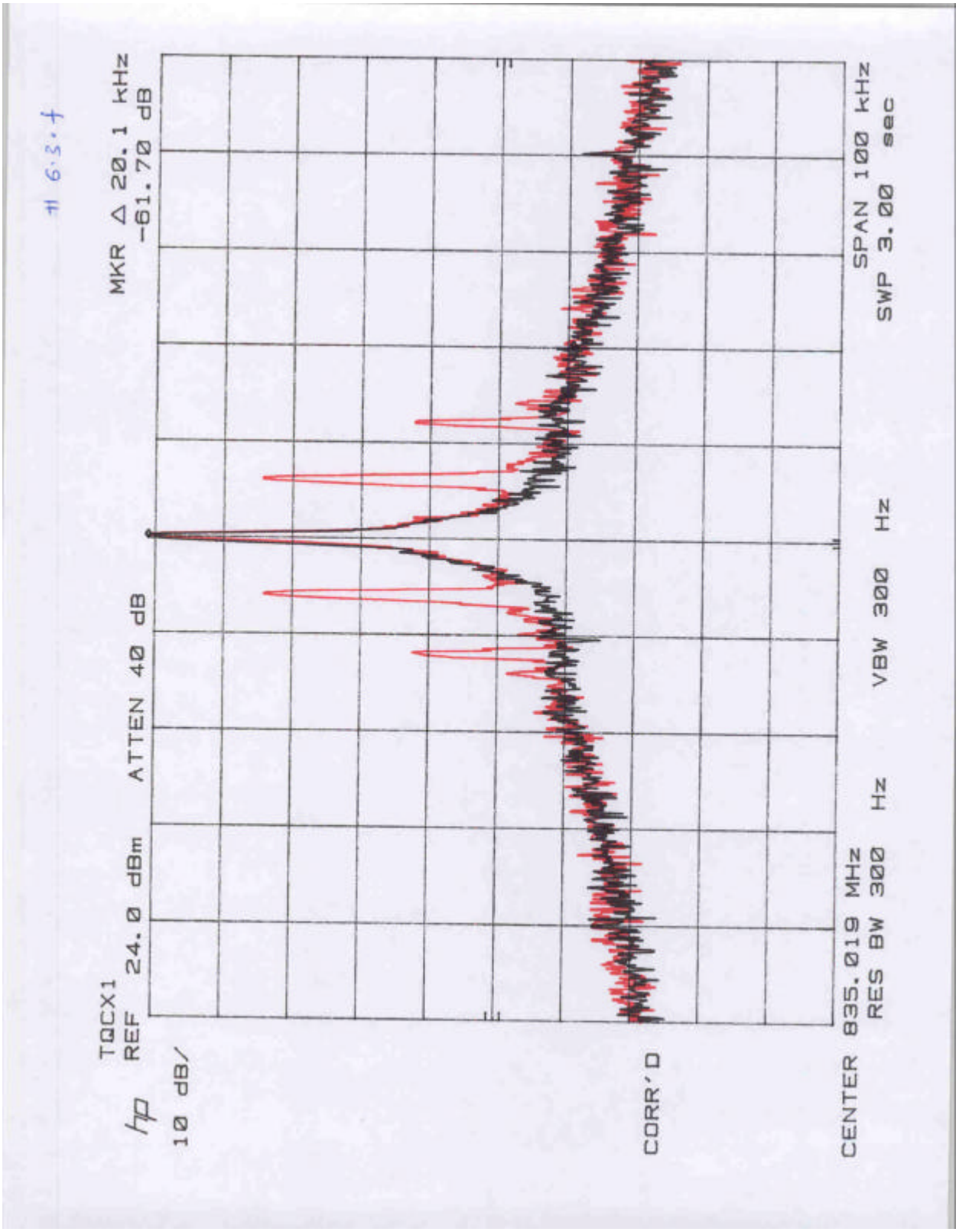

#6.3.9
TQCX1
REF 24.0 dBm
ATTEN 40 dB
MKR 835.020 0 MHz
23.90 dBm
10 dB/
CORR'D
CENTER 835.020 MHz
RES BW 300 Hz
VBW 300 Hz
SPAN 100 kHz
SWP 3.00 sec

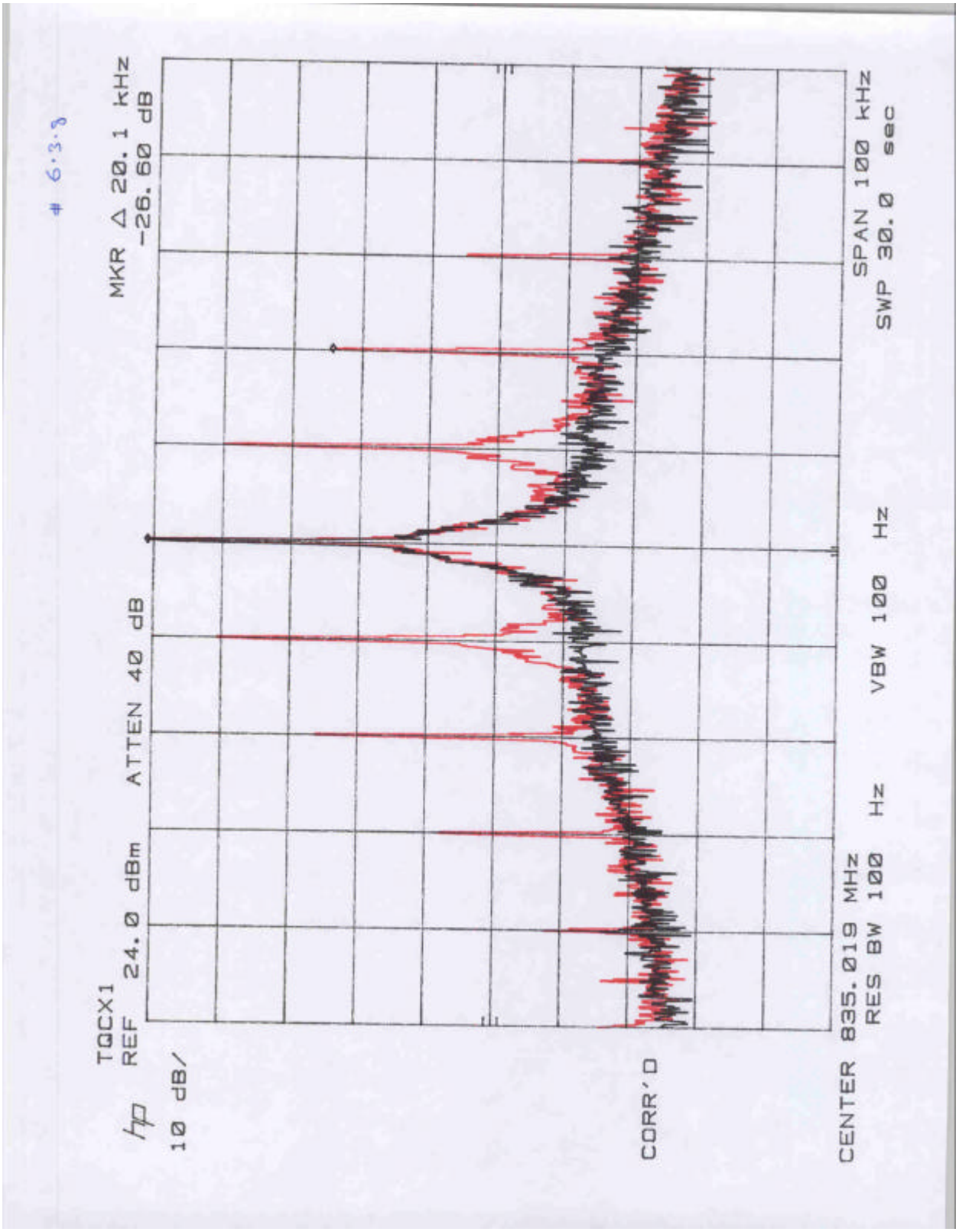

#6.3.6
TQCX1
REF 24.0 dBm
ATTEN 40 dB
MKR 835.019 7 MHz
23.90 dBm
10 dB/
CORR'D
CENTER 835.020 MHz
RES BW 300 Hz
VBW 300 Hz
SPAN 200 kHz
SWP 6.00 sec

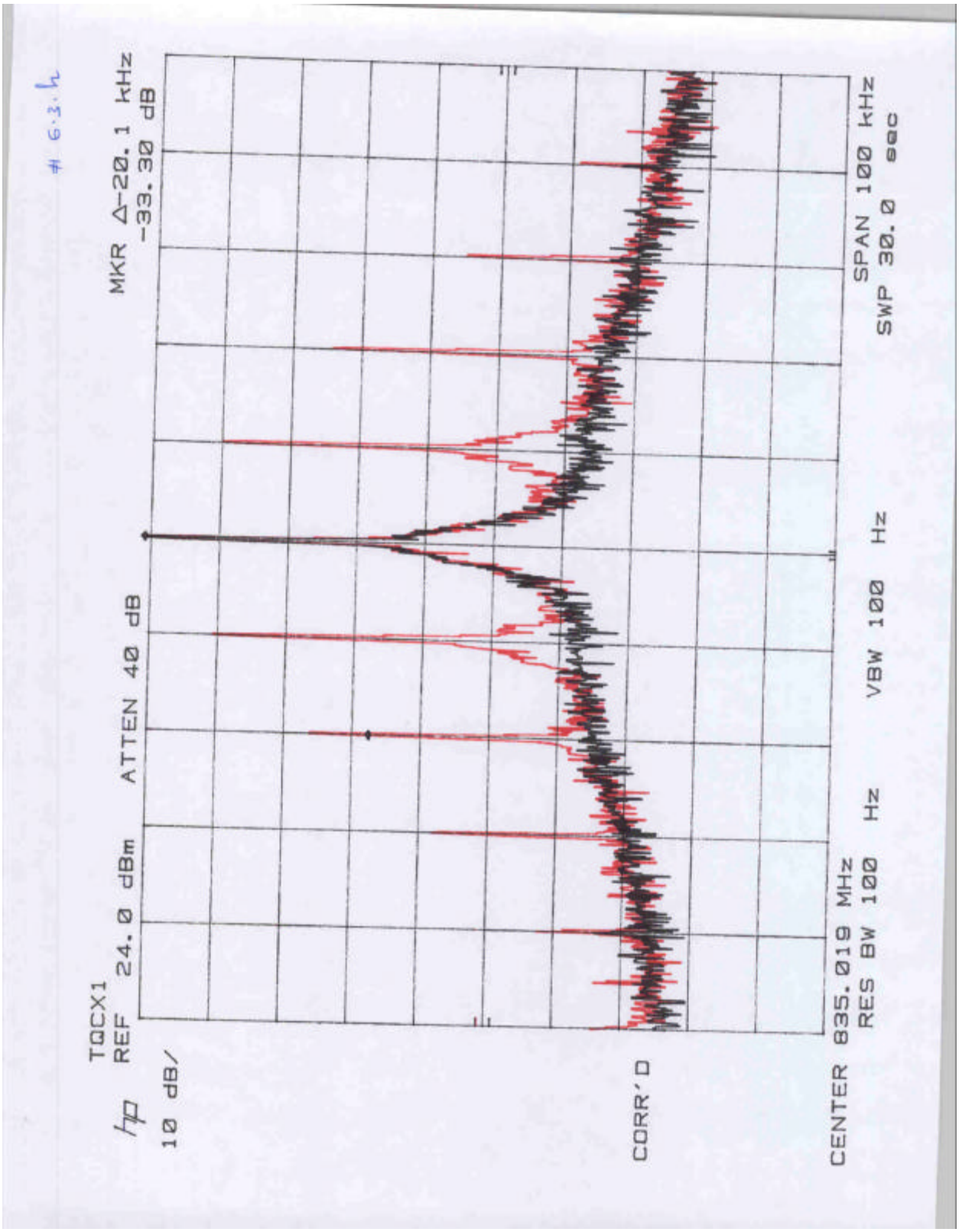

#6.3.c
TQCX1
hp
REF 24.0 dBm
ATTEN 40 dB
10 dB/
MKR Δ 20.2 kHz
-31.60 dB
CORR'D
CENTER 835.020 MHz
RES BW 300 Hz
VBW 300 Hz
SPAN 100 kHz
SWP 3.00 sec

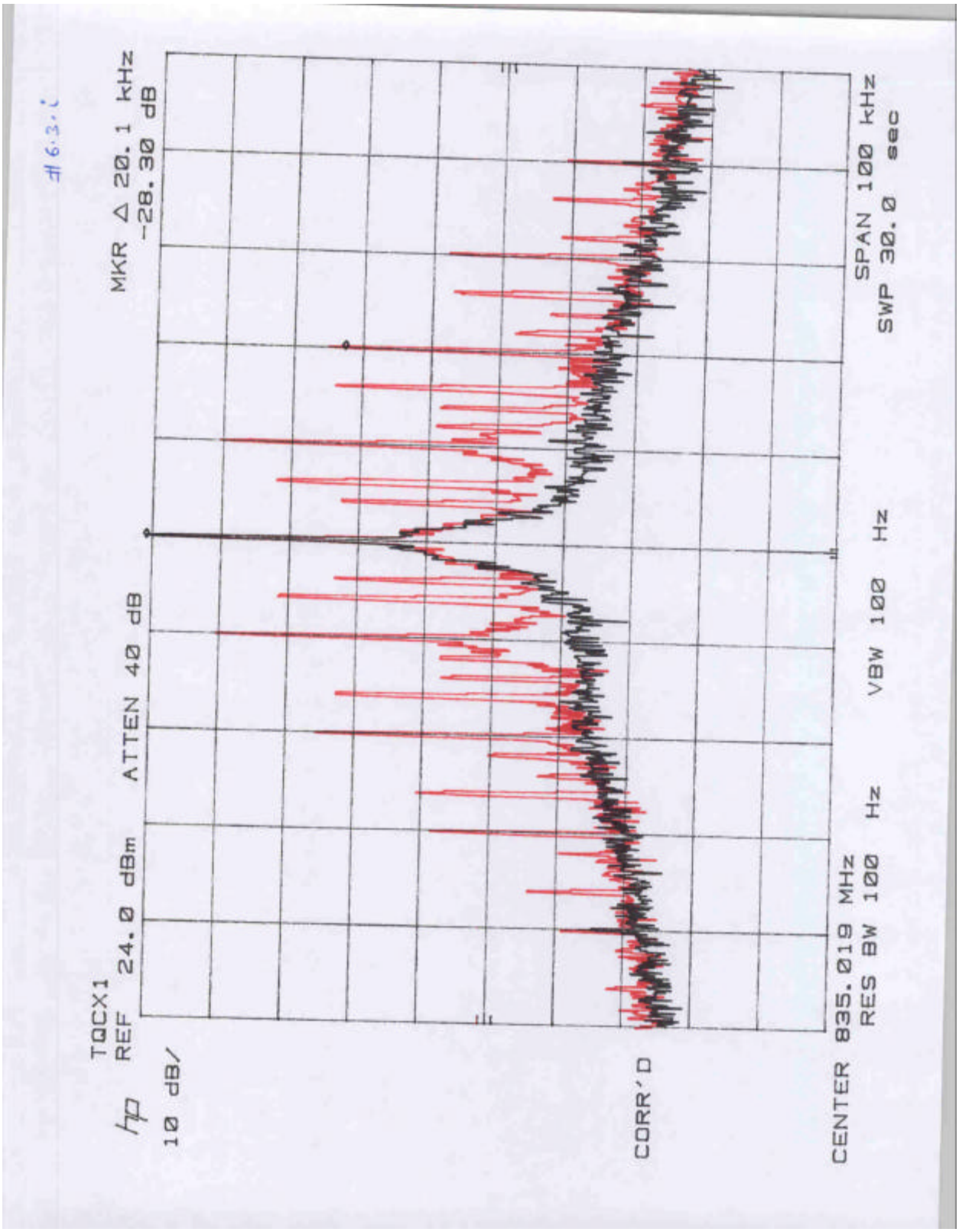

#6.3.d
hp
10 dB/
TQCX1
REF 24.0 dBm
ATTEN 40 dB
MKR Δ 20.0 kHz
-31.20 dB
CORR'D
CENTER 835.020 MHz
RES BW 300 Hz
VBW 300 Hz
SPAN 200 kHz
SWP 6.00 sec

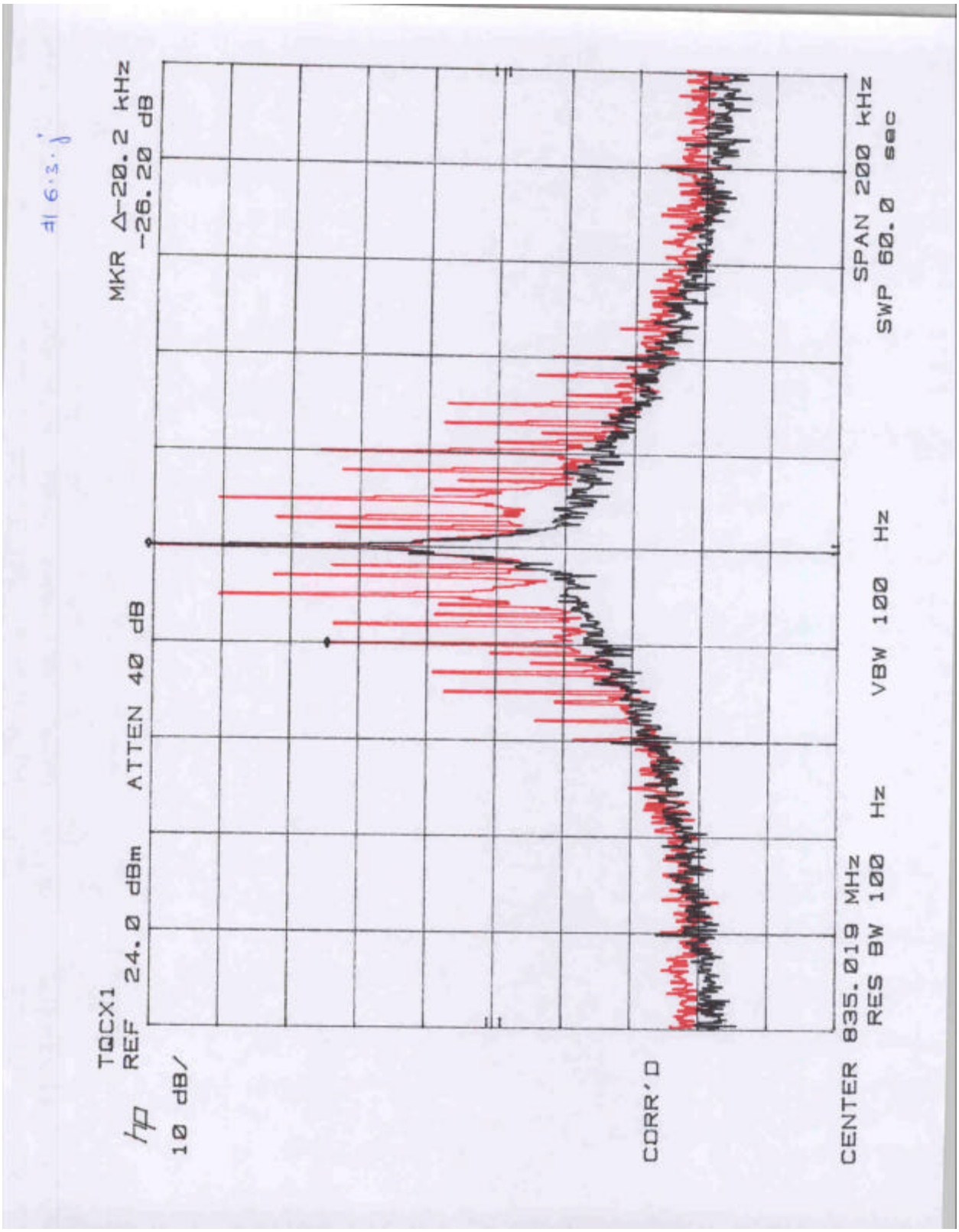

#6.3.2
MKR Δ 20.9 kHz
-43.50 dB
TQCX1
REF 24.0 dBm
ATTEN 40 dB
10 dB/
CORR'D
CENTER 835.019 MHz
RES BW 300 Hz
VBW 300 Hz
SPAN 100 kHz
SWP 3.00 sec

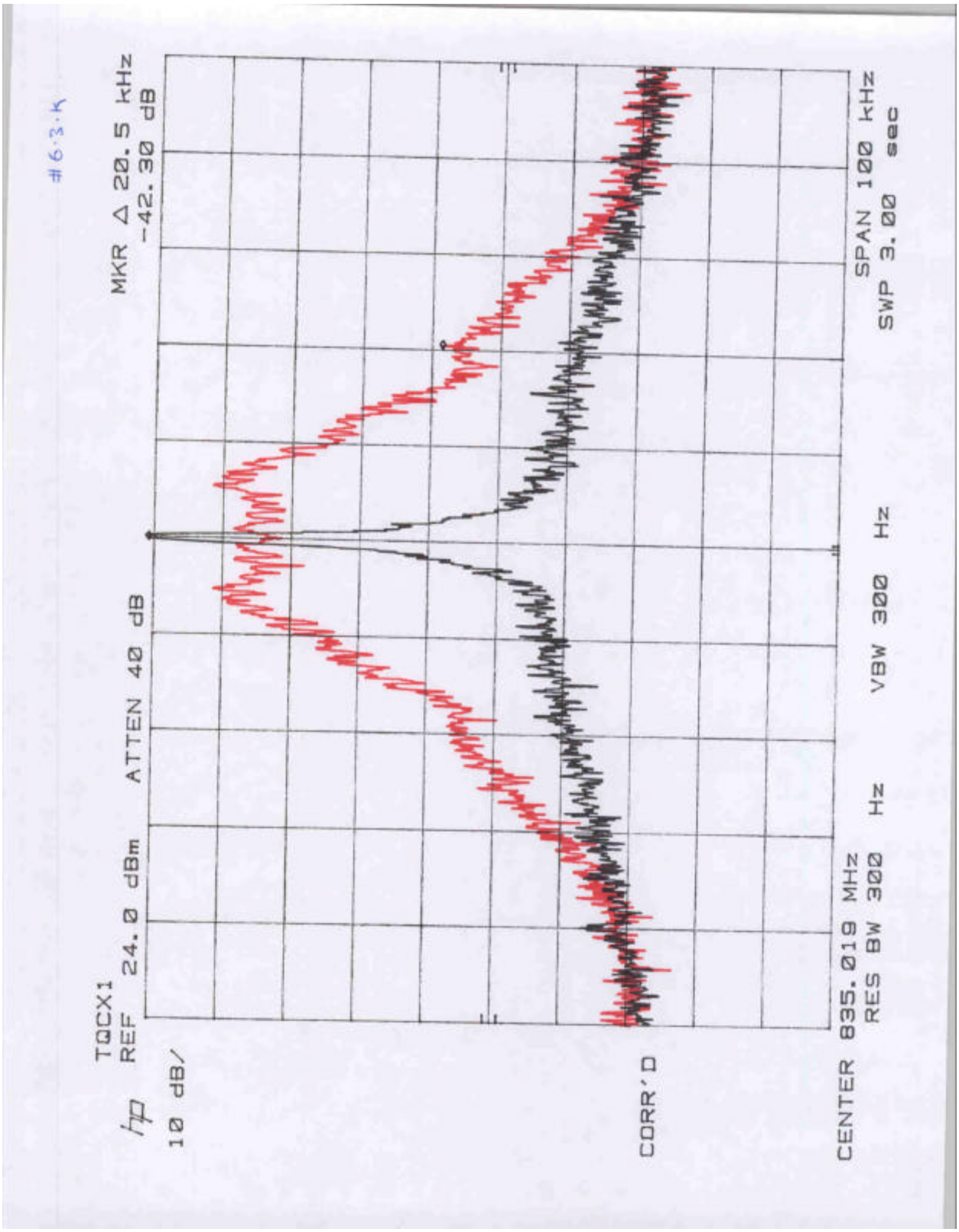

hp
TQCX1
REF 24.0 dBm
ATTEN 40 dB
10 dB/
MKR Δ 20.1 kHz
-61.70 dB
CORR'D
CENTER 835.019 MHz
RES BW 300 Hz
VBW 300 Hz
SPAN 100 kHz
SWP 3.00 sec


TQCX1
REF 24.0 dBm
ATTEN 40 dB
10 dB/
MKR Δ 20.1 kHz
-26.60 dB
CORR'D
CENTER 835.019 MHz
RES BW 100 Hz
VBW 100 Hz
SPAN 100 kHz
SWP 30.0 sec


#6.3.h
TQCX1
REF 24.0 dBm
ATTEN 40 dB
MKR Δ-20.1 kHz
-33.30 dB
10 dB/
CORR'D
CENTER 835.019 MHz
RES BW 100 Hz
VBW 100 Hz
SPAN 100 kHz
SWP 30.0 sec


#6.3.i
MKR Δ 20.1 kHz
-28.30 dB
TQCX1
REF 24.0 dBm
ATTEN 40 dB
10 dB/
CORR'D
CENTER 835.019 MHz
RES BW 100 Hz
VBW 100 Hz
SPAN 100 kHz
SWP 30.0 sec


TQCX1
REF 24.0 dBm
ATTEN 40 dB
MKR Δ-20.2 kHz
-26.20 dB
10 dB/
CORR'D
CENTER 835.019 MHz
RES BW 100 Hz
VBW 100 Hz
SPAN 200 kHz
SWP 60.0 sec


#6.3.K
TQCX1
REF 24.0 dBm
ATTEN 40 dB
MKR Δ 20.5 kHz
-42.30 dB
10 dB/
CORR'D
CENTER 835.019 MHz
RES BW 300 Hz
VBW 300 Hz
SPAN 100 kHz
SWP 3.00 sec