

**Exhibit 8**

**TEST REPORT OF RADIATED AND  
CONDUCTED EMISSIONS**

## STATEMENT OF DATA MEASURED

### 1. General Information of EUT

The EUT, 19" super VGA color monitor :

Model No. : 19B2502H  
 FCC ID : A3KM085  
 Brand : PHILIPS

The monitor automatically scans horizontal frequencies between 30KHz and 95KHz , and vertical frequencies between 50Hz and 160Hz. This color monitor displays sharp and brilliant images of text and graphics with a maximum resolution up to 1600X1200 pixels. With microprocessor based digital controlled circuit and software control, the monitor can automatically adjust itself to the video card's scanning frequency and displays an image with the precise parameters you desire.

The monitor has 10 factory-preset modes as indicated in the following table:

	Resolution	H-Frequency	V-Frequency	Remark
M01	640 X 400	31.5KHz	70Hz	Non-interlaced
M02	640 X 480	31.5KHz	60Hz	Non-interlaced
M03	640 X 480	43.3KHz	85Hz	Non-interlaced
M04	800 X 600	46.9KHz	75Hz	Non-interlaced
M05	800 X 600	53.7KHz	85Hz	Non-interlaced
M06	1024 X 768	60.0KHz	75Hz	Non-interlaced
M07	1024 X 768	68.7KHz	85Hz	Non-interlaced
M08	1280 X 1024	80.0KHz	75Hz	Non-interlaced
M09	1280 X 1024	91.1KHz	85Hz	Non-interlaced
M10	1600 X 1200	93.8KHz	75Hz	Non-interlaced

### 2. Test Equipment and Procedure

Test was performed by:

PHILIPS ELECTRONICS INDUSTRIES (TAIWAN) LTD.  
 CONSUMER ELECTRONICS DIVISION  
 EMI - LAB

5, Tze Chiang 1 Road, Chungli Industrial Park  
 P.O. Box 123, Chungli, Taoyuan, Taiwan  
 R. O. C.

Tel : 886-3-4549862 Fax : 886-3-4549887

Internet: ronnie.yang@tw.cemail.philips.com

The test was performed in accordance with ANSI C63.4-1992, "AMERICAN NATIONAL STANDARD FOR MEASUREMENT OF RADIO-NOISE EMISSION FROM LOW-VOLTAGE ELECTRICAL AND ELECTRONIC EQUIPMENT IN THE RANGE OF 9KHz TO 40GHz"

Test equipment used for line Conducted and Radiated emissions as following. All equipment were calibrated according to ANSI C63.4-1992 and ISO-9000 requirement unless otherwise specified.

Test Equipment	Model No.	Serial No.	Calibrated Date
Spectrum	HP8568B	2403A06961	7/21/1998
RF Preselector	HP85685A	2901A00964	7/21/1998
QP Adapter	HP85650A	2043A00366	7/21/1998
EMI Receiver	HP85460A	3441A00199	8/27/1998
RFI Filter Section	HP85460A	3330A00177	8/27/1998
EMI Receiver	R & S ESVS30	8419977/066	8/21/1998
Biconical Antenna	EMCO 3110B	2863	3/10/1998
Biconical Antenna	EMCO 3110B	2864	3/10/1998
Log-Periodic Antenna	EMCO 3146A	1377	3/10/1998
Log-Periodic Antenna	EMCO 3146A	1378	3/10/1998
LISN	EMCO 3825/2	9311-2153	3/23/1998
LISN	EMCO 3825/2	9311-2154	3/23/1998
Turn Table	EMCO 1060	1068	4/16/1998
Antenna Tower	EMCO 1050	1113	4/16/1998
RF Cable	M17/75-RG214-NE	N/A	4/16/1998
Computer	HP9000/300	2614A78610	N/A
Printer	HP2225A	2728S02586	N/A
Plotter	HP7440A	2539A40856	N/A

Traceability to R.O.C. and international standards is assured by using calibrated all equipment.

For system measurement, the EUT "19B2502H" was connected to:

Item	Model No.	Serial No.	FCC ID
1. Computer	Compaq D6000	7751BSD40011	FCC Logo
2. Keyboard	Compaq RT-101	17171	AQ6-CYPRESSC15
3. Mouse	Compaq M-S34	1411189401	DZL211029
4. Printer	HP 2225C	3123S97227	DS16XU2225
5. Modem	USRobotics 268	0002680559278575	CJE-0318
6. Vide Card	Matrox II AGP	007449	FCC Logo
7. CD-ROM	Sony CDU31A	--	KGACDU31A2

The system was configured for testing in a typical fashion ( as a customer would normally use it ) according to ANSI C63.4-1992, please see the photographs for detail.

Both conducted and radiated testing were performed according to the procedure in ANSI C63.4-1992. Conducted testing was performed in screen room and radiated testing was performed in open site at an antenna to EUT distance of 3-meter on horizontal and vertical polarization.

First, pre-scan all modes in screen room then select 2 higher modes (worst case) were tested and reported.

The line conductive interference was tested with 110VAC and 220VAC receptively. Unshielded power cord was used during test.

Tested and reported modes as following:

Report No.	Resolution	Frequencies
EMC98-077	1280 X 1024	91.1KHz/85Hz
EMC98-077A	1600 X 1200	93.8KHz/75Hz

### 3. Test Program and Test Results

Set up the EUT and all peripherals as chapter 6 of ANSI C63.4-1992 for AC power line conducted emissions testing and radiated emissions testing.

Turn on the power of EUT and all peripherals, select an appropriate displaying mode using the “setup” software. Then run an EMI test program “HTEST.EMI” as a basic software to execute the EUT operating under test.


- Step 1 : Run the “HTEST.EMI” on personal computer then sends “H” character to monitor continuously until full screen.
- Step 2 : Personal computer sends a complete line of continuously repeating “H” to HP 2225C printer.
- Step 3 : Personal computer sends a file of “H” pattern to floppy disk then read a file of “H” pattern from floppy disk.
- Step 4 : Personal computer sends a file of “H” pattern to hard disk then read a file of “H” pattern from hard disk.
- Step 5 : Personal computer sends a file of “H” patten to USRobotics 268 modem.
- Step 6 : Return to step 1

All data in this report are "PEAK" value within 15dB margin unless otherwise noted.  
The radiated (open site) data has included antenna and cable factors, sample calculation:

Final Value (dB $\mu$ v/m) = Reading (dBuv) + Antenna Factor (dB) + Cable Loss (dB)

The measured data of radiated RF interference at open site and line conducted interference as attached.

**The subject device is in compliance with the limits for a class B digital device, pursuant to part 15, subpart B of the FCC rules.**



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Ronnie Yang - Manager, Safety/Dev. PEI-CED  
NVLAP Signatory

# EMI TEST REPORT

FCC ID : A3KM085  
 REPORT NO.: EMI98-077  
 TEST DATE : OCT/19/1998  
 TEST ENGL.: C.C.Wu

TEST PERFORMED BY  
 PHILIPS ELECTRONICS INDUSTRIES (TAIWAN) LTD.  
 CONSUMER ELECTRONICS DIVISION (PEI-CED)  
 EMI-LAB  
 P.O.BOX 123  
 CHUNGLI, TAoyUAN, TAIWAN, R.O.C.  
 TEL: 898-3-4549862 FAX: 895-3-4549887

MANUFACTURER : PEI-CED  
 TESTED SYSTEM:

1. EUT : 19B2502H COLOR MONITOR S/N.: TY9804077  
 FCC ID. : A3KM085
2. COMPUTER: COMPAQ DESKPRO DPG000 S/N.: 7751BSD40011  
 FCC ID. : FCC L060
3. PRINTER : HP 2225C S/N.: 3145302419  
 FCC ID. : D516XU2225
4. MODEM : USRobotics 268 S/N.: 0002680559278575  
 FCC ID. : CJE-0318
5. MOUSE : COMPAQ M-S34 S/N.: 1411189401  
 FCC ID. : DZL211029
6. KEYBOARD: COMPAQ RT101 S/N.: 17271  
 FCC ID. : A06-CYPRESS015
7. VIDEO CARD : MSA II AGP S/N.: 007449  
 FCC ID. : FCC L060
8. CD\_ROMD : SONY CDU31A S/N.: --  
 FCC ID. : K6ACDU31A2

NOTE: TEST WAS PERFORMED IN ACCORDANCE WITH FCC MEASUREMENT PROCEDURE  
 ANSI C63.4-1992 'AMERICAN NATIONAL STANDARD FOR MEASUREMENT OF  
 RADIO-NOISE EMISSION FROM LOW-VOLTAGE ELECTRICAL AND ELECTRONIC  
 EQUIPMENT IN THE RANGE OF 9KHz TO 406Hz'

MONITOR WAS CONNECTED TO FLOOR MOUNTED AC OUTLET.  
 93.9KHz MODE(1600X1200/75Hz) WAS TESTED.  
 INTERFACE CABLE WITH THREE FERRITE CORES(ONE INSIDE) WAS TESTED.  
 UNSHIELDED MAINS CORD WAS USED DURING TEST.  
 ONE UPSTREAM USB CABLE WAS CONNECTED TO COMPUTER

THE TEST EQUIPMENT PLEASE REFER TO EQUIPMENT LIST AS ATTACHED.

DEVIATION: NONE

## RADIATED RF LEVEL - PEAK VALUE

FREQUENCY (MHz)	HORIZONTAL (dBuV/m)	VERTICAL (dBuV/m)	FCC CLASS B LIMIT (dBuV/m)
50.7	27.91	31.41	40
64.5	25.95	31.05	40
84.5	32.85	32.75	40
135.2	30.35	AMBIENT	43.5
152.1	30.1	29.9	43.5
188.01	31.04	32.84	43.5
185.9	29.64	29.34	43.5
297.3	30.65	36.55	46

304.2	33.016	30.115	46
312.01	35.248	35.548	46
321.1	38.184	36.084	46
336.01	34.664	35.564	46
338	35.712	36.912	46
350.01	36.9	37	46
371.8	35.4	35	46
384.01	36.924	39.424	46
388.7	35.904	36.104	46
408.01	34.396	38.296	46
422.5	36.476	37.176	46
473.2	34.152	36.952	46
523.8	36.092	36.292	46
540.8	36.464	36.664	46
552.01	38.548	39.248	46
557.7	38.792	39.592	46
581.5	38.404	36.404	46
642	37.28	37.18	46
658.1	37.312	38.112	46

# ABOVE READINGS ARE PEAK READINGS WITH CABLE AND ANTENNA FACTORS INCLUDED.  
SPECTRUM ANALYZER SETTINGS:

RBW : 100KHz  
VBW : 100KHz

# QUASI-PEAK READINGS ARE TAKEN WITH RÖHDE & SCHWARZ EMI TEST RECEIVER  
20 - 1000MHz ESVS 30 :

RADIATED RF LEVEL - QUASI-PEAK VALUE

FREQUENCY (MHz)	HORIZONTAL (dBuV/m)	VERTICAL (dBuV/m)	FCC CLASS B LIMIT (dBuV/m)
33.8	28.04	35.04	40
118.3	34.88	33.38	43.5
158	33.57	31.87	43.5
192.01	AMBIENT	35.62	43.5
219.7	32.7	34.9	46
235.6	42.05	40.15	46
253.6	40.5	38.3	46
354.9	39.2	37.9	46
425.6	36.672	39.272	46
439.4	38.936	40.436	46
455.3	40.144	41.744	46
480.18	37.38	38.98	46
574.6	39.3	39.1	46
845	39.92	39.42	46
881.8	38.288	38.188	46

THE SPECTRUM WAS SCANNED FROM 30 TO 1000 MHz AND THE SIGNIFICANT EMISSIONS  
ARE RECORDED.  
TEST DISTANCE BETWEEN DEVICE UNDER TEST AND RECEIVING ANTENNA WAS 3-METER.

# SAMPLE CALCULATION :  
FINAL VALUE (dBuV/m) = ANTENNA FACTOR (dB) + CABLE (dB) + READING (dBuV/m)  
# THIS REPORT SHALL NOT BE REPRODUCED EXCEPT IN FULL, WITHOUT THE WRITTEN  
APPROVAL OF THE LABORATORY  
# THIS REPORT MUST NOT BE USED BY THE CLIENT TO CLAIM PRODUCT ENDORSEMENT  
BY NULAP OR ANY AGENCY OF THE U.S. GOVERNMENT  
THE TEST RESULT WAS PASS FCC CLASS B LIMIT.

CHECKED BY:

K. J. H.

TESTED BY:

*[Signature]*

# FCC TEST REPORT

FCC ID : A3KM085  
 REPORT NO.: EMI98-077A  
 TEST DATE : OCT/20/1998  
 TEST ENGI.: C.C.Wu

TEST PERFORMED BY  
 PHILIPS ELECTRONICS INDUSTRIES (TAIWAN) LTD.  
 CONSUMER ELECTRONICS DIVISION (PEI-CED)  
 EMI-LAB  
 P.O.BOX 123  
 CHUNG LI, TAOYUAN, TAIWAN, R.O.C.  
 TEL: 886-3-4549852 FAX: 886-3-4549887

MANUFACTURER : PEI-CED  
 TESTED SYSTEM:

1. EUT : 1982502H COLOR MONITOR S/N.: TY9804077  
 FCC ID. : A3KM085
2. COMPUTER: COMPAQ DESKPRO DP E000 S/N.: 7751BSD40011  
 FCC ID. : FCC L060
3. PRINTER : HP 2225C S/N.: 3145502419  
 FCC ID. : 0816XU2225
4. MODEM : USRobotics 288 S/N.: 0002680559278575  
 FCC ID. : OJE-0318
5. MOUSE : COMPAQ M-S34 S/N.: 1411189401  
 FCC ID. : DZL211029
6. KEYBOARD: COMPAQ RT101 S/N.: 17271  
 FCC ID. : AQ6-CYPRESS015
7. VIDEO CARD : MGA II AGP S/N.: 007449  
 FCC ID. : FCC L060
8. CD-ROM : SONY CDU31A S/N.: --  
 FCC ID. : KGACDU31A2

NOTE: TEST WAS PERFORMED IN ACCORDANCE WITH FCC MEASUREMENT PROCEDURE  
 ANSI C63.4-1992 "AMERICAN NATIONAL STANDARD FOR MEASUREMENT OF  
 RADIO-NOISE EMISSION FROM LOW-VOLTAGE ELECTRICAL AND ELECTRONIC  
 EQUIPMENT IN THE RANGE OF 9KHz TO 406Hz"

MONITOR WAS CONNECTED TO FLOOR MOUNTED AC OUTLET.  
 91.1KHz MODE(1280X1024/85Hz) WAS TESTED.  
 INTERFACE CABLE WITH THREE FERRITE CORES(ONE INSIDE) WAS TESTED.  
 UNSHIELDED MAINS CORD WAS USED DURING TEST.  
 ONE UPSTREAM USB CABLE WAS CONNECTED TO COMPUTER

THE TEST EQUIPMENT PLEASE REFER TO EQUIPMENT LIST AS ATTACHED.

DEVIATION: NONE

RADIATED RF LEVEL - PEAK VALUE

FREQUENCY (MHz)	HORIZONTAL (dBuV/m)	VERTICAL (dBuV/m)	FCC CLASS B LIMIT (dBuV/m)
39.42	28.24	32.84	40
52.55	26.93	28.93	40
65.68	27.18	31.08	40
118.23	30.28	32.28	43.5
131.34	30.31	31.91	43.5
157.61	28.8	31	43.5
158.01	31.34	33.04	43.5



236.42	35.2	33.7	46
249.55	38.6	35	46
262.7	35.22	34.32	46
275.82	38.14	35.84	46
302.09	31.608	30.008	46
312.01	34.948	35.448	46
315.22	38.96	35.06	46
328.36	33.272	32.272	46
335.01	34.954	35.554	46
341.49	35.084	33.884	46
354.63	22.9	34.2	46
358.01	35.1	35.3	46
367.78	33.2	32.7	46
380.9	35.516	38.416	46
384.01	39.424	39.124	46
407.17	35.684	37.584	46
408.01	35.096	37.896	46
420.3	34.24	35.44	46
433.44	37.592	38.692	46
446.57	38.128	38.428	46
459.71	35.44	34.84	46
472.84	36.852	38.352	46
489.11	36.068	37.768	46
505.38	35.1	35.6	46
538.52	37.356	37.656	46
551.65	34.748	33.948	46
552.01	39.048	38.548	46
564.79	35.16	37.06	46
591.04	36.292	37.892	46
630.45	38.2	38.7	46
751.8	38.892	38.392	46

\* ABOVE READINGS ARE PEAK READINGS WITH CABLE AND ANTENNA FACTORS INCLUDED.  
 SPECTRUM ANALYZER SETTINGS:

RBW : 100KHz

VBW : 100KHz

\* QUASI-PEAK READINGS ARE TAKEN WITH ROHDE & SCHWARZ EMI TEST RECEIVER  
 20 - 1000MHz ESV5 30 :

RADIATED RF LEVEL - QUASI-PEAK VALUE

FREQUENCY (MHz)	HORIZONTAL (dBuv/m)	VERTICAL (dBuv/m)	FCC CLASS B LIMIT (dBuv/m)
192.01	AMBIENT	35.12	43.5
197.02	33.67	31.47	43.5
210.15	31.7	32.4	43.5
223.28	35.16	36.26	46
288.95	40.45	36.75	46
653.72	38.595	38.595	46

THE SPECTRUM WAS SCANNED FROM 30 TO 1000 MHz AND THE SIGNIFICANT EMISSIONS  
ARE RECORDED.

TEST DISTANCE BETWEEN DEVICE UNDER TEST AND RECEIVING ANTENNA WAS 3-METER.

# SAMPLE CALCULATION :

FINAL VALUE (dBuv/m) = ANTENNA FACTOR (dB) + CABLE (dB) + READING (dBuv/m)

# THIS REPORT SHALL NOT BE REPRODUCED EXCEPT IN FULL, WITHOUT THE WRITTEN  
APPROVAL OF THE LABORATORY

# THIS REPORT MUST NOT BE USED BY THE CLIENT TO CLAIM PRODUCT ENDORSEMENT  
BY NULAP OR ANY AGENCY OF THE U.S. GOVERNMENT

THE TEST RESULT WAS PASS FCC CLASS B LIMIT.

CHECKED BY:

*K.J.H*

TESTED BY:

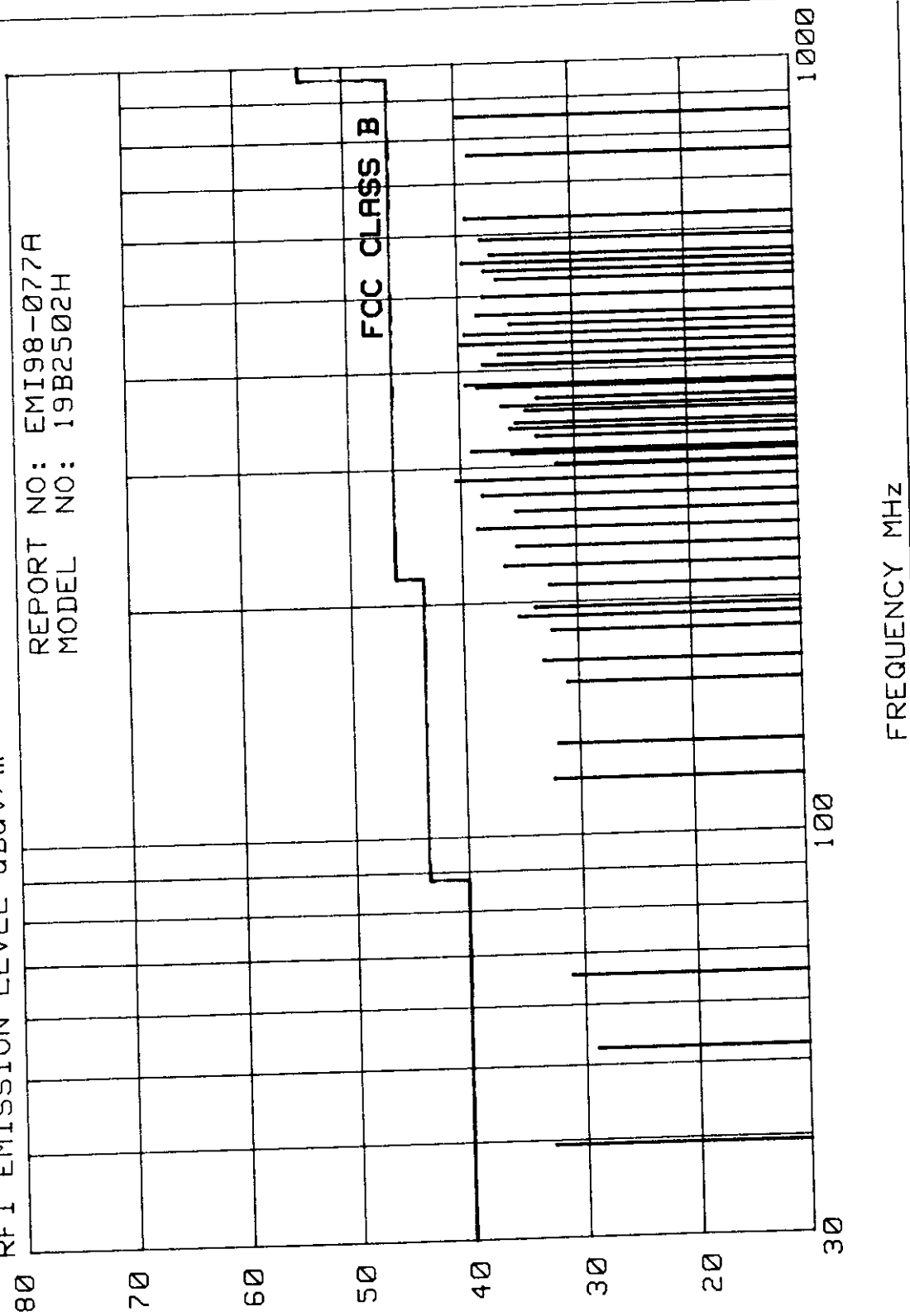
*Ally*

K.J.HSU, NULAP SIGNATORY

O.C.Wu

RFI EMISSION LEVEL dBuV/m

REPORT NO: EMI98-077A  
MODEL NO: 19B2502H

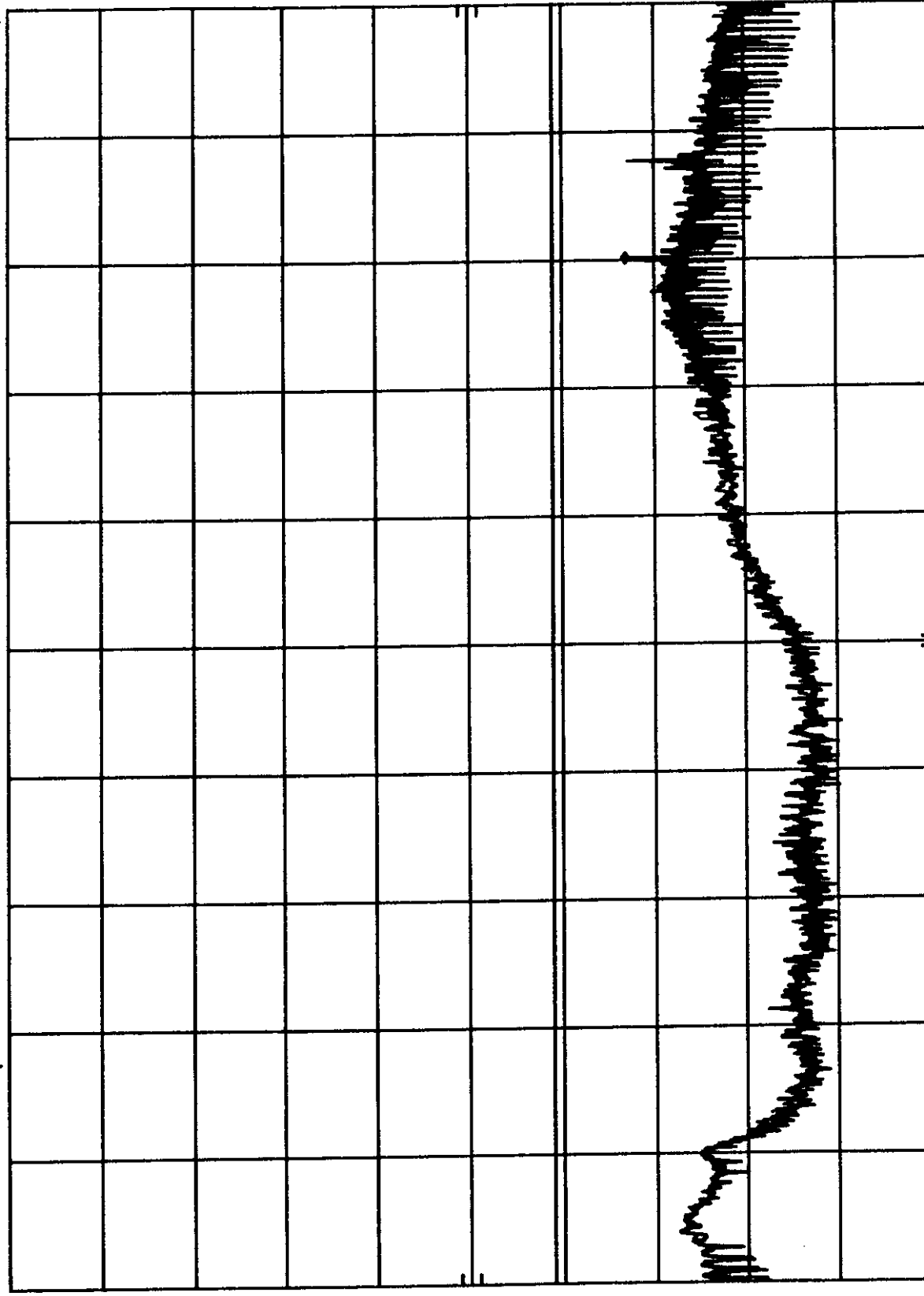


A3KM085 1280X1024/85Hz 91.1KHz 110VAC MKR 24.12 MHz  
REF 107.0 dBμV ATTN 10 dB 40.10 dBμV

HP

10 dB/

DL  
48.0  
dBμV



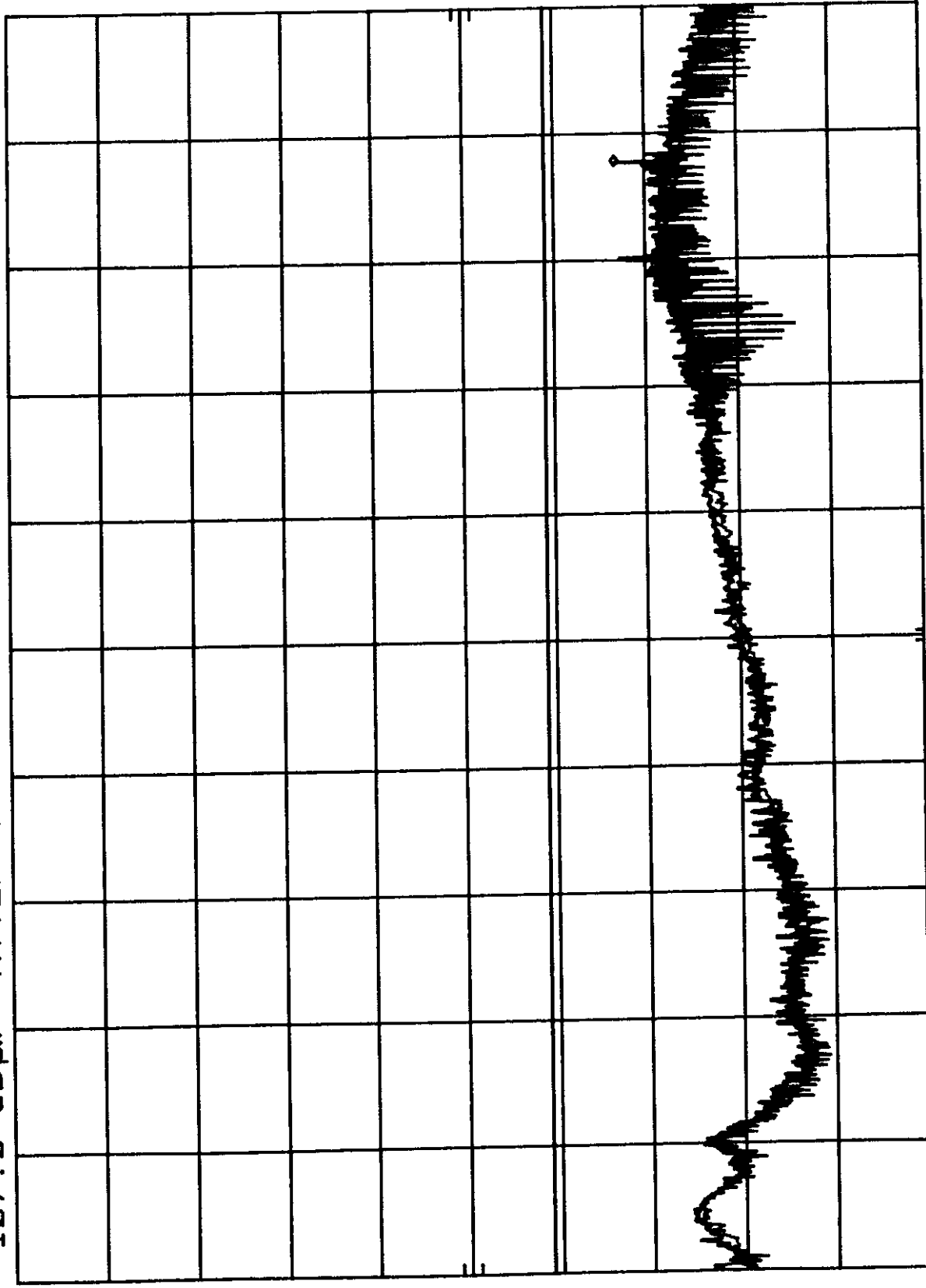
START 450 KHz RES BW 10 KHz VBW 10 KHz STOP 30.00 MHz  
SWP 750 msec

A3KM085 1280X1024/85Hz 91.1KHz 220VAC MKR 26.39 MHz  
REF 107.0 dBμV ATTN 10 dB 40.30 dBμV

HP

10 dB/

DL  
48.0  
dBμV



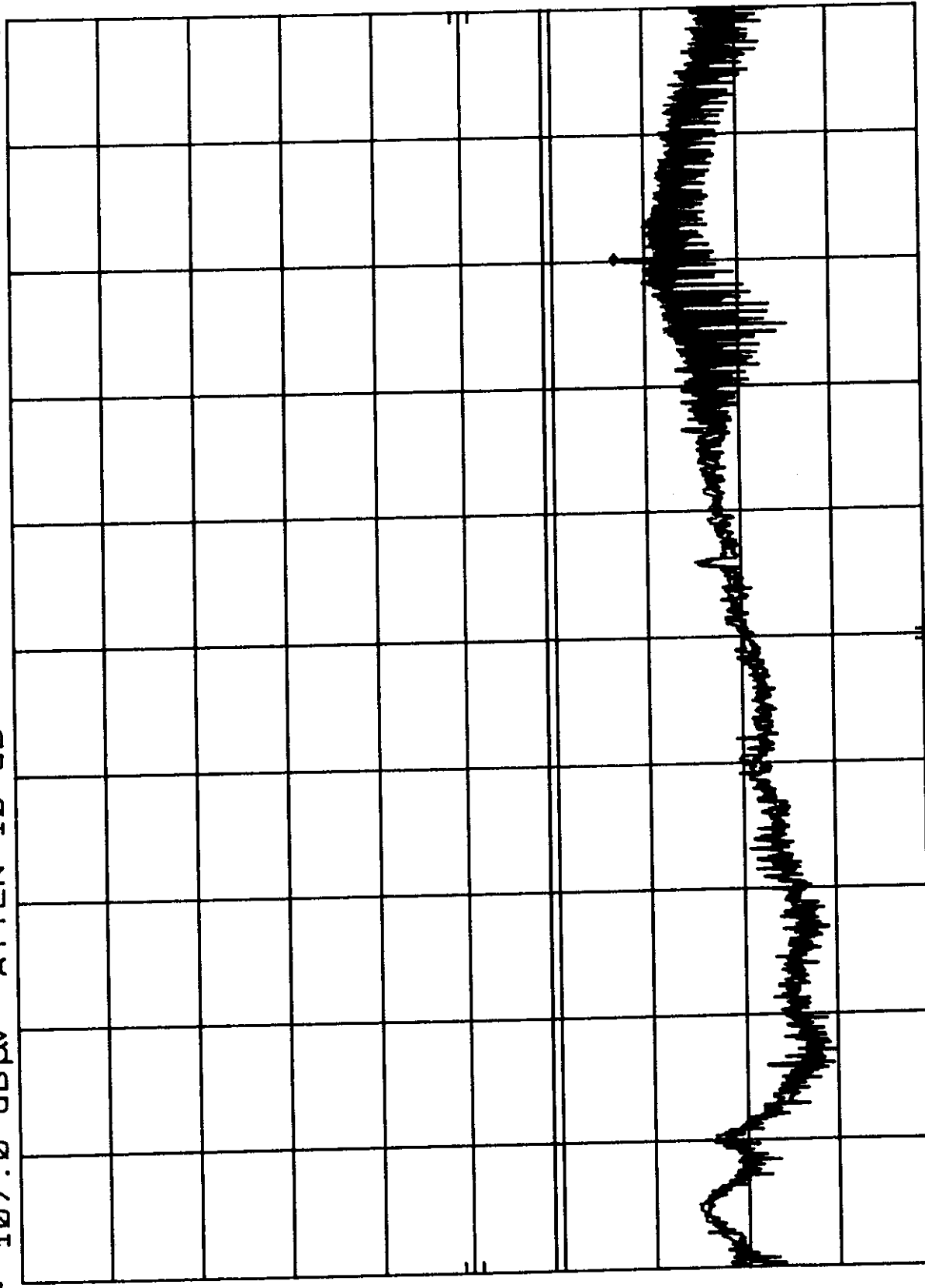
START 450 KHz RES BW 10 KHz VBW 10 KHz STOP 30.00 MHz  
SWP 750 msec

A3KM085 1600X1200/75Hz 93.8KHz 220VAC MKR 24.12 MHz  
REF 107.0 dBμV ATTN 10 dB 40.30 dBμV

h<sub>p</sub>

10 dB/

DL  
48.0  
dBμV



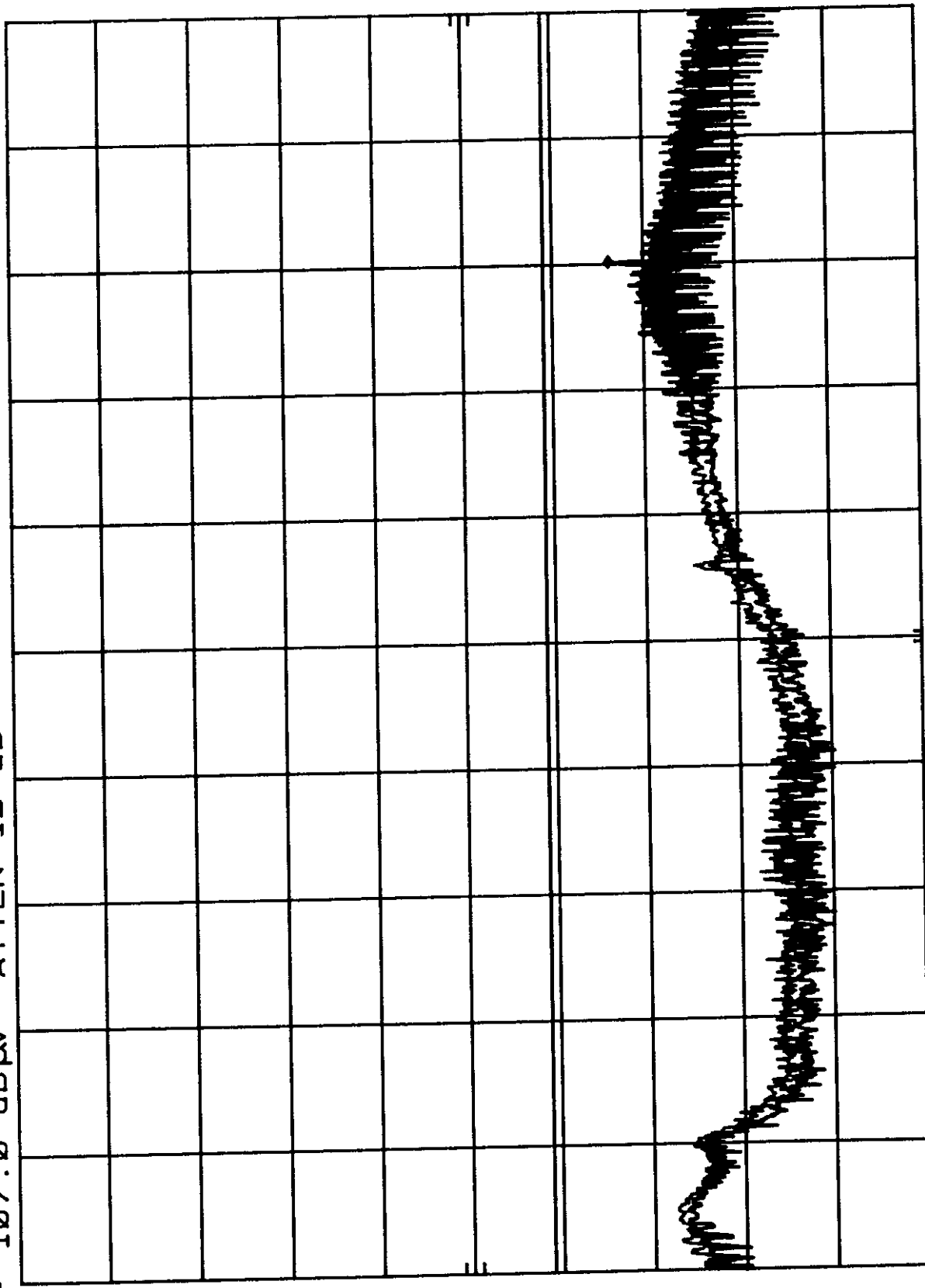
START 450 KHz RES BW 10 KHz VBW 10 KHz STOP 30.00 MHz  
SWP 750 msec

A3KM085 1600X1200/75Hz 93.8KHz 110VAC MKR 24.12 MHz  
REF 107.0 dBμV ATTN 10 dB 40.80 dBμV

hp

10 dB/

DL  
48.0  
dBμV



START 450 KHz RES BW 10 KHz VBW 10 KHz STOP 30.00 MHz  
SWP 750 msec

RFI EMISSION LEVEL dBuv/m

OCT/19/1998

REPORT NO: EMI98-077  
MODEL NO: 19B2502H

FCC CLASS B

FREQUENCY MHz

