

## BAR GRAPH PEAK PROGRAMME METER 177-800B

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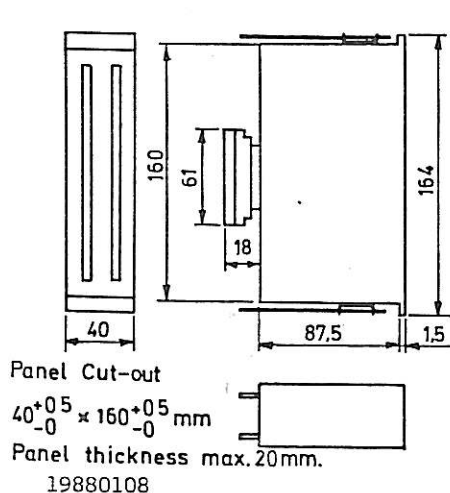
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Supply voltage	variable 22-32V																			
Max. ripple voltage	0.1Vpp																			
Current consumption	appr. 200mA at 24V																			
Temperature range	0 to +45° amb.temp.																			
Frequency range	20Hz to 16kHz																			
Input impedance in freq.range	20kOhm +/-15% symmetrical 1)																			
Input voltage for 0dB (05dB) reading	1.55Vrms sine (+6dBu)																			
Input overload level	8.6Vrms sine (+21dBu)																			
Dynamic measuring range	55dB																			
Measuring errors	<table><tr><td></td><td><u>+5 to -10dB</u></td><td><u>below -10dB</u></td></tr><tr><td>1kHz steady signal, 25°C</td><td>+/- 0.5dB</td><td>+/- 1dB</td></tr><tr><td>within freq.range, 25°C</td><td>+ 0.5/-1dB</td><td>+0.5/-2dB</td></tr><tr><td>within temp.range, 1kHz</td><td>+/- 1 dB</td><td>+/- 2dB</td></tr><tr><td>polarity shift of asymmetrical wave</td><td>0.5dB</td><td>1dB</td></tr><tr><td>10% change of supply voltage</td><td>0.2dB</td><td>0.2dB</td></tr></table>			<u>+5 to -10dB</u>	<u>below -10dB</u>	1kHz steady signal, 25°C	+/- 0.5dB	+/- 1dB	within freq.range, 25°C	+ 0.5/-1dB	+0.5/-2dB	within temp.range, 1kHz	+/- 1 dB	+/- 2dB	polarity shift of asymmetrical wave	0.5dB	1dB	10% change of supply voltage	0.2dB	0.2dB
	<u>+5 to -10dB</u>	<u>below -10dB</u>																		
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within temp.range, 1kHz	+/- 1 dB	+/- 2dB																		
polarity shift of asymmetrical wave	0.5dB	1dB																		
10% change of supply voltage	0.2dB	0.2dB																		
Tracking between channels	0.5dB																			
Integration time	10mS for -1dB +0.5dB																			
conforming to DIN 45406	5mS for -2dB +/-1dB																			
and IEC proposal of September 1970	3ms for -4dB +/-1dB																			
Fall-back time (adjustable)	0.4ms for -15dB +2dB																			
Overload indication	0 - -20dB : 1.5 secs.																			
	0 - -40dB : 2.5 secs. +/- 0.1																			
	a six times increase of the light intensity																			
Scale length	127 mm																			
Number of elements per channel	101																			
Colour	neon orange																			
Standard scales:	+5 to -50dB DIN																			
All types are available	+9 to -36dB "Nordic"																			
for horizontal or vertical mounting	1-7 "BBC" (4 = 0.775V)																			
Mechanical outline	see below																			
Colour	black																			
Accessories	10 pole edge connector type CCL10DV																			
	Spacing: 3.96 mm																			
	Two fasteners for panelmounting																			

If the dual.log. amplifier is removed, the 177-800 can be used as a dc-voltmeter with a sensitivity of 1 volt for full-scale-deflection (10mV resolution). See below for connection.

**Note 1:** Because of the internal floating supply voltage, no input transformers are needed. 40dB common-mode rejection is obtained by differential Op-amp. technique.

#### Mechanical Outline.



#### Connections.

P.P.M - Mode		dc - Voltmeter - Mode	
Term No.		Term No.	
1	Power Supply Pos.	1	Power Supply Pos.
2	Power Supply Neg.	2	Power Supply Neg.
3	Chassis	3	Chassis
4	Not Connected	4	Not Connected
5	Input Ground	5	" "
6	Bal. Input Left	6	" "
7		7	" "
8	Input Ground	8	Input Ground
9	Bal. Input Right	9	dc Input Left
10		10	dc Input Right

Normally the PPM will stay correctly adjusted, except when a component has failed and been replaced; then it may be necessary to make certain adjustment. Before attempting to make any adjustments, note the permissible indication errors stated in Technical Specifications.

Voltmeter adjustment (Removed Log. Amplifier)

C3 calibrates the stair-case-waveform generator to 10 mV per step.

P1 adjusts the starting point of the overload area.

Turn P1 fully CW.

Connect a dc-source of 1,005V between Term. 8 (Input Ground) and Terminals 9/10 (dc-input Left/Right).

Terminal 8 negative. Adjust C3 until cathode number 101 just starts glowing.

Then P1 is adjusted so that the overload area starts at cathode number 83.

Log. amplifier adjustment

Apply input signal 1 kHz (ref. level) and adjust P2 Ref. Level to ref. reading.

Reduce input signal 40 dB and adjust P1 Low Level to ref. level - 40 dB reading.

Adjust P3 Fall-Back to correct fall-back time.