LUX CORPORATION, JAPAN

REALTIME PROCESSED DC HEAD AMPLIFIER

CX-1

OWNER'S MANUAL

CONTENTS

Thank you for your purchase of the CX-1

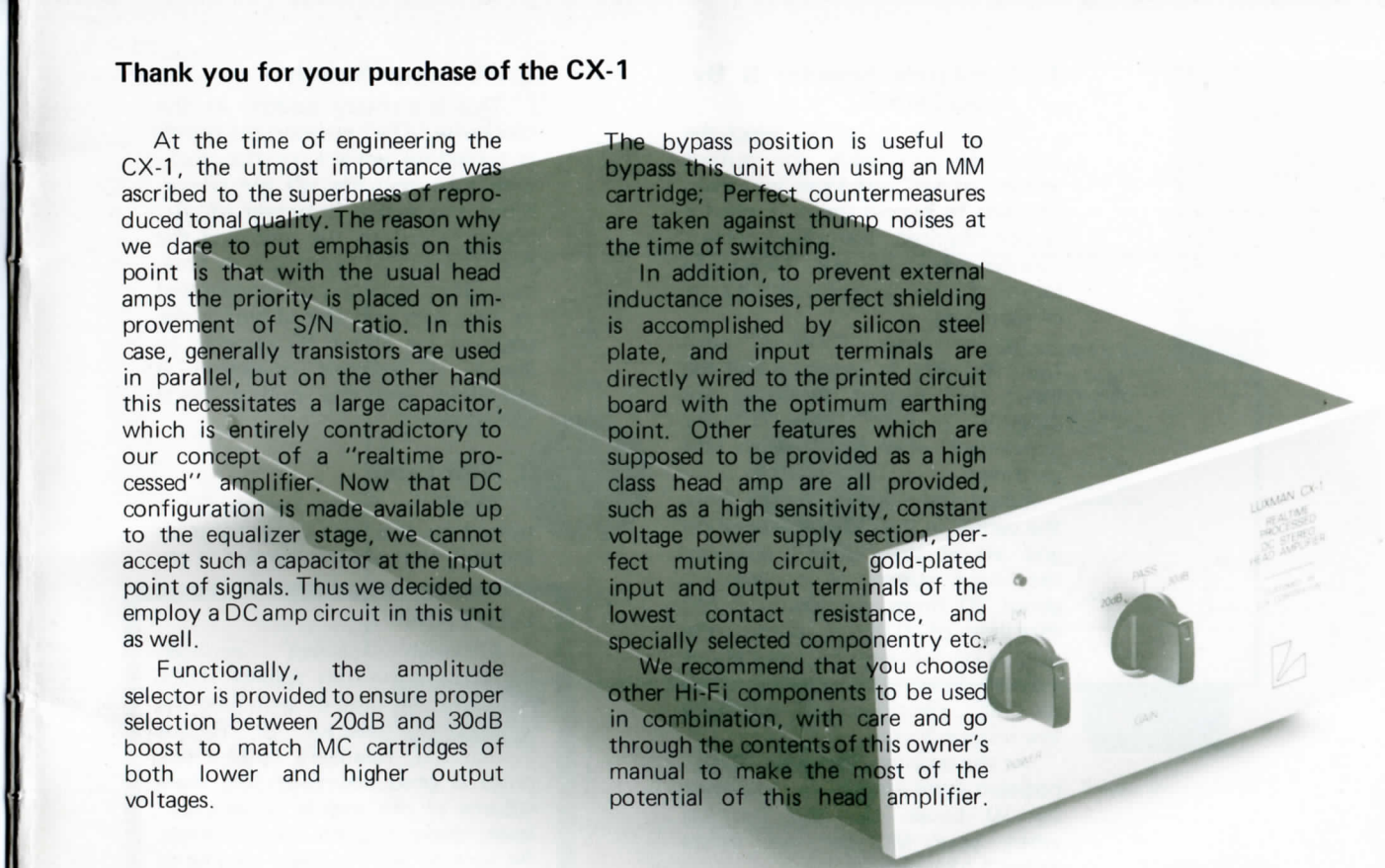
At the time of engineering the CX-1, the utmost importance was ascribed to the superbness of reproduced tonal quality. The reason why we dare to put emphasis on this point is that with the usual head amps the priority is placed on improvement of S/N ratio. In this case, generally transistors are used in parallel, but on the other hand this necessitates a large capacitor, which is entirely contradictory to our concept of a "realtime processed" amplifier. Now that DC configuration is made available up to the equalizer stage, we cannot accept such a capacitor at the input point of signals. Thus we decided to employ a DC amp circuit in this unit as well.

Functionally, the amplitude selector is provided to ensure proper selection between 20dB and 30dB boost to match MC cartridges of both lower and higher output voltages.

The bypass position is useful to bypass this unit when using an MM cartridge; Perfect countermeasures are taken against thump noises at the time of switching.

In addition, to prevent external inductance noises, perfect shielding is accomplished by silicon steel plate, and input terminals are directly wired to the printed circuit board with the optimum earthing point. Other features which are supposed to be provided as a high class head amp are all provided, such as a high sensitivity, constant voltage power supply section, perfect muting circuit, gold-plated input and output terminals of the lowest contact resistance, and specially selected componentry etc.

We recommend that you choose other Hi-Fi components to be used in combination, with care and go through the contents of this owner's manual to make the most of the potential of this head amplifier.



Switches & Controls

1. Amplitude Selector & By-pass Switch

This switch is used to select the amplitude to match the output voltage of MC cartridges you own, and also to bypass the unit when it is not required. Naturally, perfect counter-measures are taken to reduce the shock noises at the time of switching.

At the center "BYPASS" position, this amp is bypassed and the input and output terminals are directly coupled. This is very convenient when you use an MM cartridge.

When the knob is turned from the center in the clockwise position and set at the "30dB" position, the input voltage is boosted by about 30 times, e.g., with an MC cartridge of 0.05mV output the output of this amp becomes about 1.5mV. Select this position when an MC cartridge of relatively low output is used.

At the counter-clockwise"20dB" position, the input is amplified by 10 times. Use this position when your MC cartridge offers rather a high output.

2. AC Power Switch

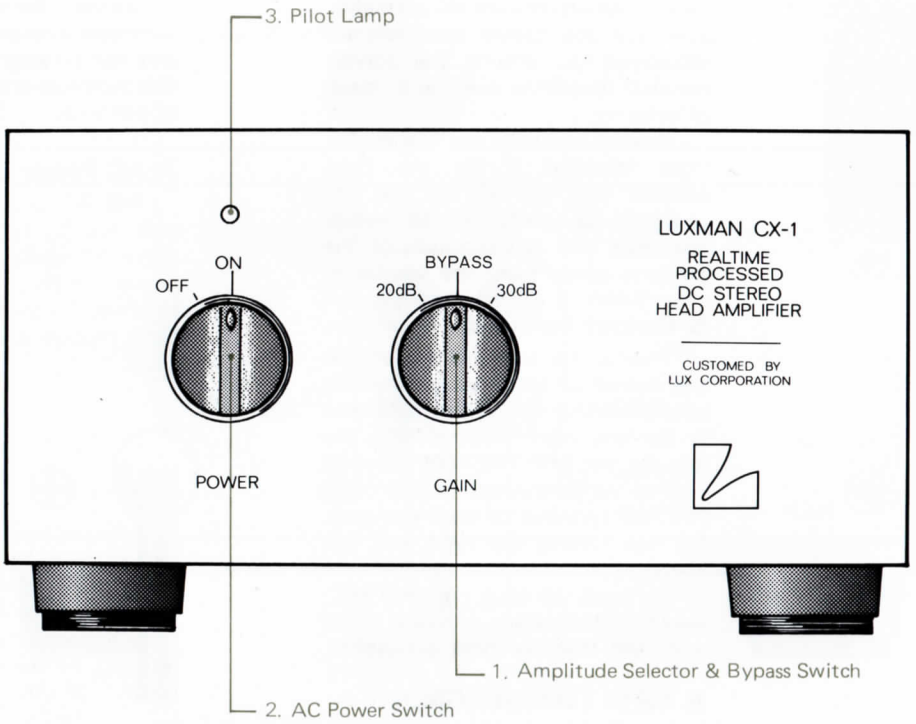
This is a rotary switch. At the clockwise "ON" position the power is turned on, while a counter-clockwise turn switches off the power. When the switch is turned on, AC power is fed to the amp and the Pilot Lamp (3) lights up. A time-delay muting circuit is incorporated in this amp and the output is decoupled for about 10 seconds. In about 10 seconds operation is stabilized and the output starts to function.

3. Pilot Lamp

When the Power Switch (2) is turned on, this Pilot Lamp lights up showing that electric current is on.

CAUTION

Although perfect counter-measures are taken against shock noises at the time of switching the Amplitude Selector & Bypass Switch (1), relatively large shock noise is produced when the main volume of pre amp is left at a high level, depending on the pre amps. Be sure to set the main volume of pre amp at minimum level when this switch is used.


3. Pilot Lamp
LUXMAN CX-1
REALTIME
PROCESSED
DC STEREO
HEAD AMPLIFIER
CUSTOMED BY
LUX CORPORATION
OFF
ON
POWER
BYPASS
20dB
30dB
GAIN
1. Amplitude Selector & Bypass Switch
2. AC Power Switch

Input & Output Terminals

4. Input Terminal

This is the input terminal to receive signals from an MC cartridge. Specially gold-plated terminals are employed to ensure the lowest contact resistance even with lapse of time.

Viewed from the rear panel, the right terminal is for the right channel and the left for the left channel. Be careful not to reverse the right and left channels of the pin-jack cords from the turntable.

5. Output Terminal

This is the terminal to retrieve the output of this head amp, and is gold-plated as well. The right one is for the right channel and the left for the left. The right terminal has to be connected to the right PHONO terminal of your pre amp. Do not reverse the right and left channels.

To hook up to a pre amp etc., select high quality pin-jack cords and keep them as short as possible.

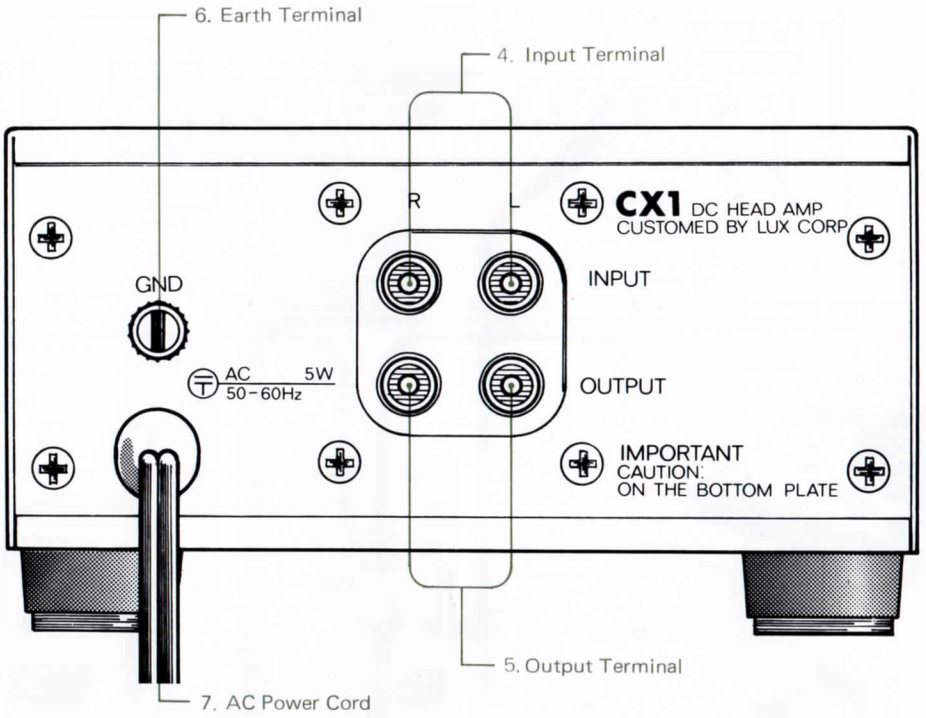
6. Earth Terminal (GND)

The earthing treatment is perfect inside the unit, but it is important to provide an external ground in the case of a head amp that deals with extremely small signals.

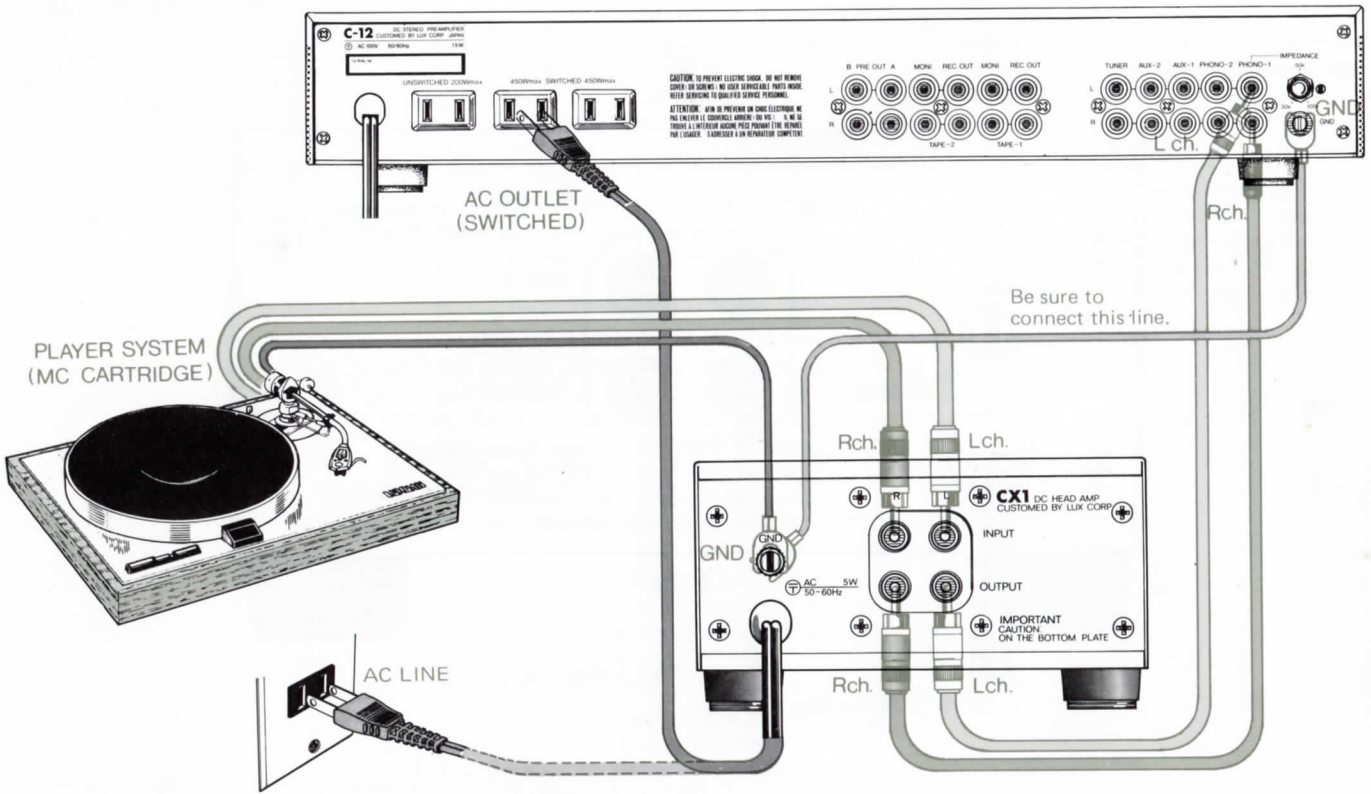
Usually, the earthing wire of the turntable is coupled to this terminal, and also be sure to contact between this terminal and the earth terminal of pre amp.

7. AC Power Cord

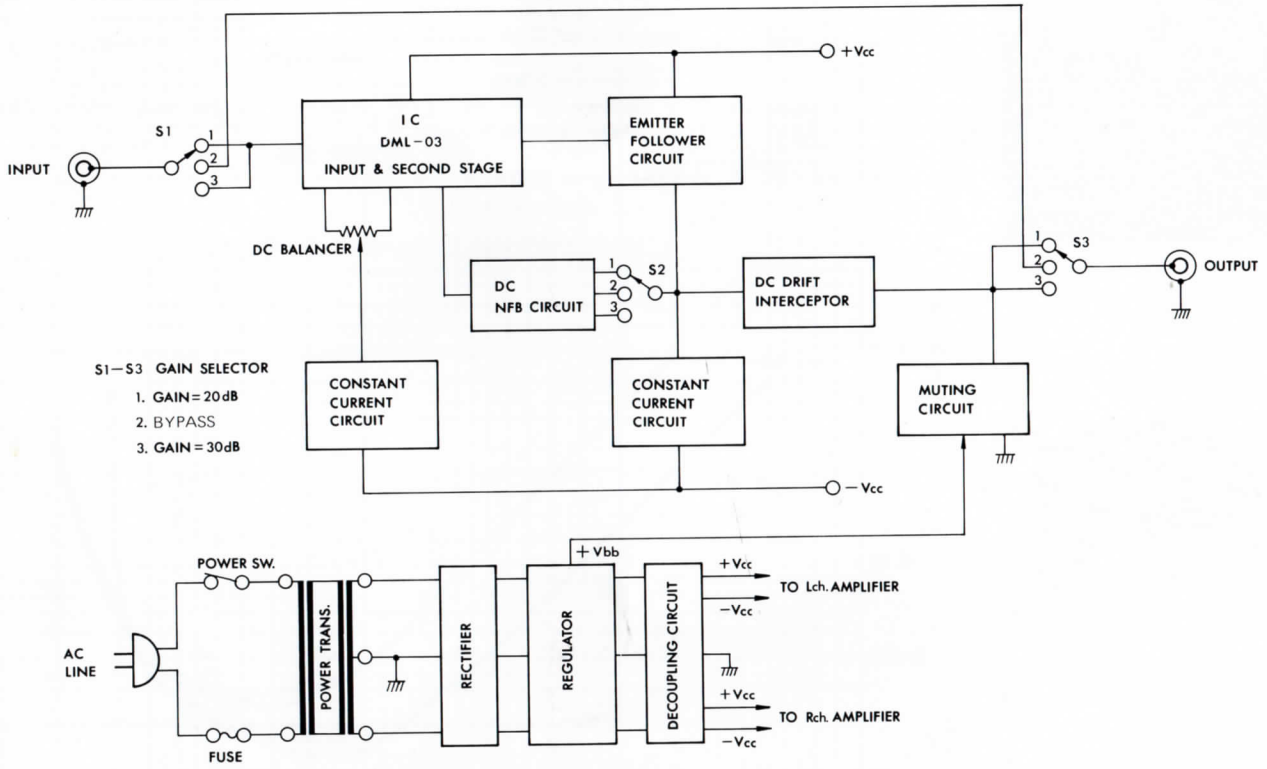
The AC plug at the end of this cord has to be connected to the extra AC outlet of pre amp or the power supply socket in your listening room. Rated power consumption is 5W.


6. Earth Terminal
4. Input Terminal
R
L
CX1 DC HEAD AMP
CUSTOMED BY LUX CORP
GND
INPUT
AC 5W
50-60Hz
OUTPUT
IMPORTANT
CAUTION:
ON THE BOTTOM PLATE
5. Output Terminal
7. AC Power Cord

CONNECTION DIAGRAM

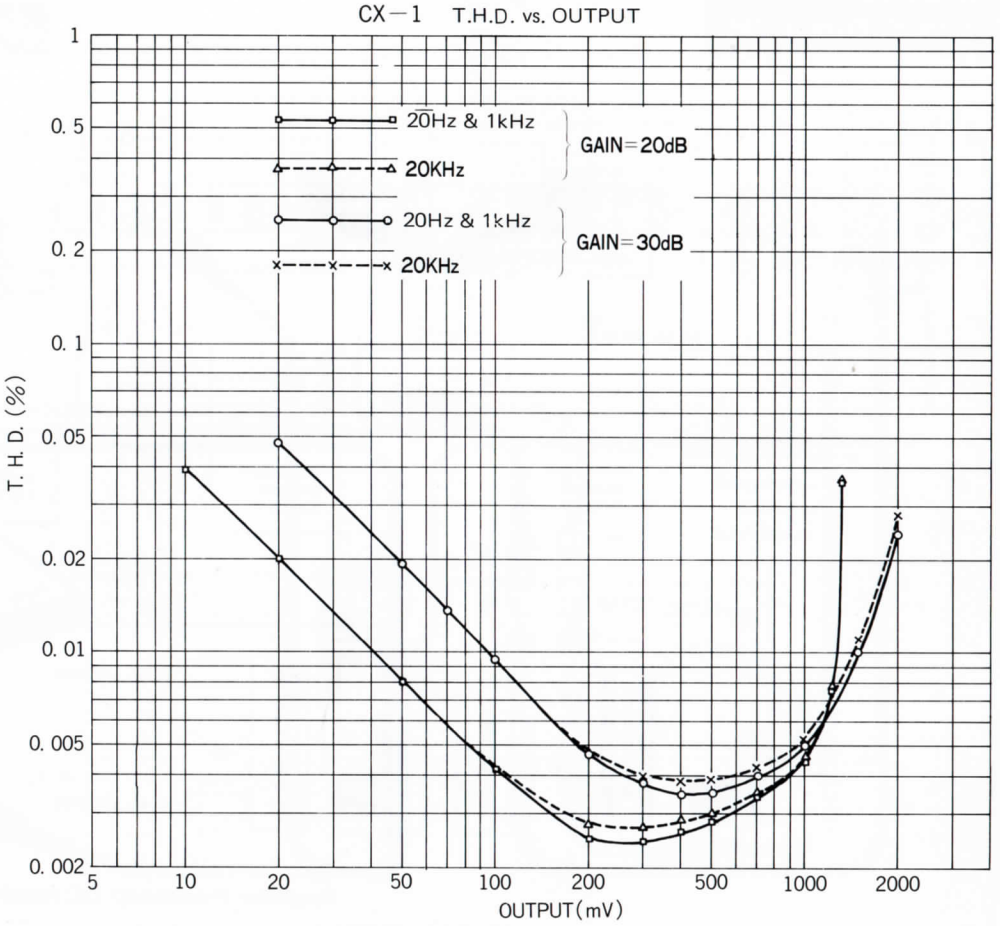


BLOCK DIAGRAM

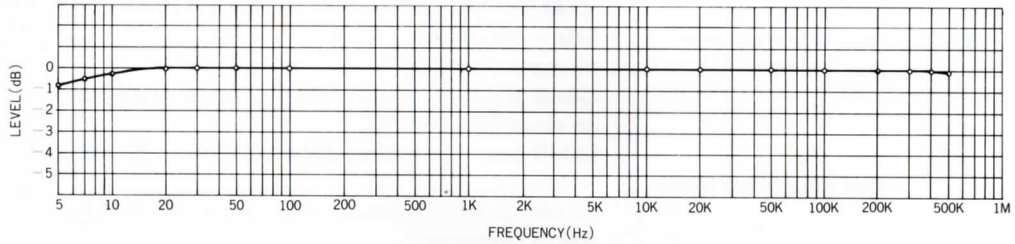


Realtime Processed DC Head Amplifier CX-1 Block Diagram

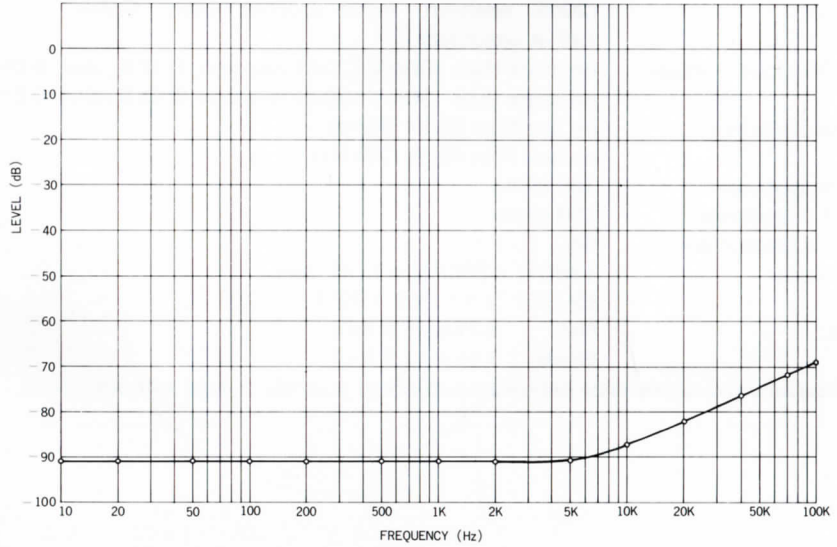
Standard Curves



CX-1 Frequency Response (GAIN=20dB, 30dB)



CX-1 Channel Separation (GAIN=20dB, 30dB)



Specifications

Voltage Gain:	20dB (for MC cartridges of middle output type)
	30dB (for MC cartridges of low output type)
Frequency Response:	5Hz – 500,000Hz (–1dB)
Total Harmonic Distortion:	no more than 0.003% (20dB position, output 300mV, 20Hz – 20kHz) no more than 0.005% (30dB position, output 300mV, 20Hz – 20kHz)
Input Equivalent Noise:	–150dBV (30dB position, input short-circuited, RIAA, IHF-A weighted) –148dBV (20dB position, input short-circuited, RIAA, IHF-A weighted)
Input Overload Voltage:	no more than 100mV (20dB position, R.M.S., dist. 0.01%) no more than 30mV (30dB position, R.M.S., dist. 0.01%)
Channel Separation:	no less than 90dB (1kHz) no less than 80dB (20kHz)
Input Impedance:	100 ohms
Output Impedance:	100 ohms
Power Consumption:	5W
Dimensions:	138(W) x 305(D) x 77(H) mm (5-7/16" x 12" x 3-1/32")
Weight:	Net 2.7kgs (5.9 lbs.) Gross 3.5kgs (7.7 lbs.)

Specifications and appearance design are subject to possible change without notice.

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