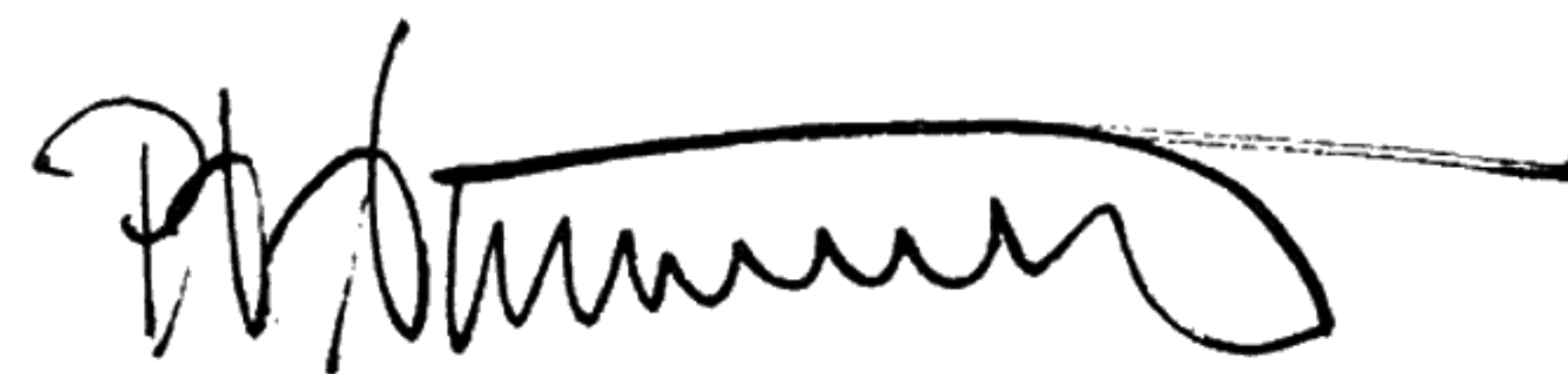

OWNER'S MANUAL

Symphonie

LA1/LA1S

VACUUM TUBE PREAMPLIFIER

This preamplifier represents five years of research in the audible effects of vacuum tube circuit design. Through careful execution of sound engineering principles and strong emphasis on quality of construction, we feel we have reached our design goal: To enhance your enjoyment of recorded music in the home.

A handwritten signature in black ink, appearing to read 'P.A. Annerstedt', with a long horizontal flourish extending to the right.

P.A. Annerstedt

Stockholm Oct. 27 1981

I N T R O D U C T I O N

This preamplifier has been designed as an instrument for reproducing recorded music with maximum fidelity. In order to derive peak performance of your unit, and to ensure safe operation, PLEASE READ THROUGH THIS INSTRUCTION MANUAL CAREFULLY AND COMPLETELY BEFORE OPERATING YOUR UNIT.

U N P A C K I N G

If unit shows any scratches or dents upon unpacking, your dealer should be contacted immediately. Save all packaging material. Should you need to ship the unit, the original packaging may save your from unnecessary damage.

C A U T I O N !

- Never place the unit in a confined space. Allow at least 10cm (4in) on either side and on top of the cabinet. Do not place the unit with its sides or top flush to any surface, as this will impede air flow through the side and top vents. Never cover the vents with foreign objects.
- Place the unit on a hard flat surface. Do not remove the elastomer feet.
- Do not operate the unit in moist, damp or excessively dusty locations.
- Do not operate the unit without cover. LETHAL VOLTAGES ARE PRESENT INSIDE.
- Always keep any equipment connected to the recording outlet fully off when powering up the unit.

I N S T A L L A T I O N

Place the unit at a location, near a convenient grounded outlet, that satisfies the above requirements. In order to avoid induced hum, the unit should be situated well away from equipment giving stray magnetic fields. We recommend that you place the preamplifier close to your turntable and well away from the power amplifier(s).

As the recording output has a comparably high output impedance, only short runs (1m) of low capacitance cable should be used at this output. The quality of the interconnection cables used at the in and outputs of your preamplifier, will affect the subjective performance of your system. Your dealer should be able to inform you on which cables to use for best results.

OPERATIONAL CONNECTORS & CONTROLS

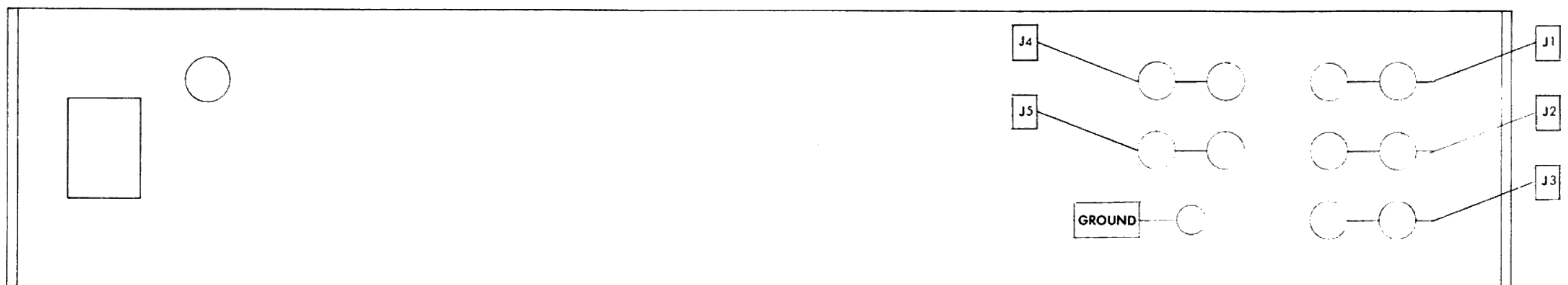
Only user adjustable controls & connectors are described below.

REAR PANEL CONNECTORS (see drawing # 1)

Inputs: J1 - Phono - for RIAA deemphasized disc replay
J2 - Tape - for tape or any line level source
J3 - Auxiliary - for any line level source

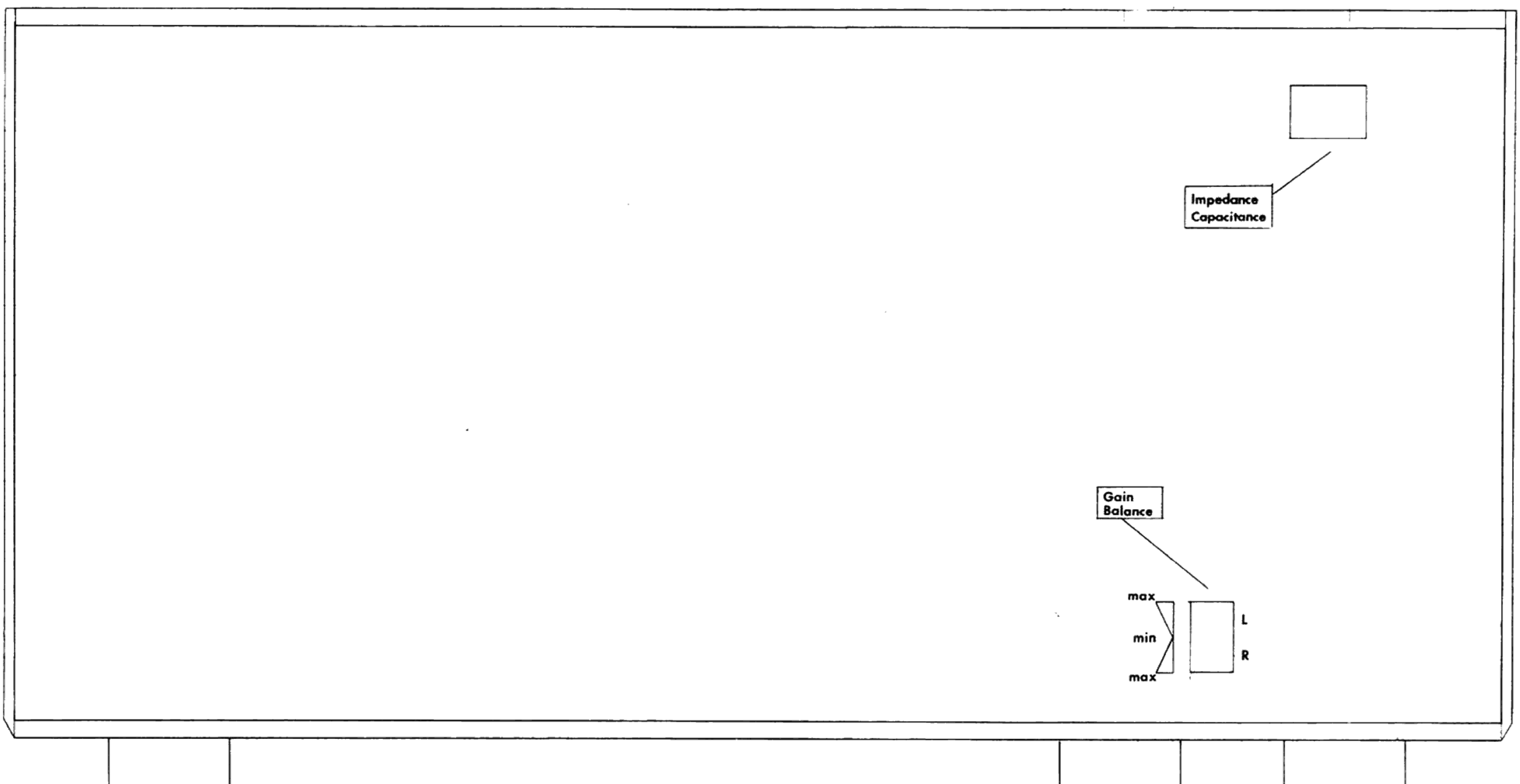
Outputs: J4 - Main Out - to poweramp and/or electronic crossover
J5 - Tape Out - recording outlet. To recording input of tape deck.

DRAWING n:o1



NOTE:
For all jacks above
Red = Right

DRAWING n:o2



BOTTOM CONTROLS (see drawing # 2)

1-Gain/Balance adjust-

Controls preamplifier input sensitivity. Full rotation outwards (see symbol) gives maximum gain. Full rotation inwards (see symbol) gives zero gain.
NOTE: Gain settings do not affect recording output.

Controls are used to set balance for correct stereo perspective, and to adjust for auxiliary equipment sensitivity to optimize S/N ratio and volume control action. Controls should be set so normal listening level occurs with volume control at 12 o'clock. Controls should be adjusted when first connecting the preamp to your system, and then be left until connecting other equipment or altering the speaker placement.

Please note that no balance control can overcome problems due to faulty speaker placement and/or troublesome room acoustics, as this is caused by a complex relationship between amplitude and differences in interaural arrival times. This is also true for recordings made with a predominant left or right image. To merely increase the amplitude of one channel, will inevitably distort the deep field focus of the stereo image.

THIS CONTROL IS MERELY TO TRIM THE AMPLITUDE OF EACH CHANNEL. CONTROLS ARE NOT TO BE USED TO OVERCOME PROBLEMS DUE TO FAULTY SPEAKER PLACEMENT AND/OR ROOM INTERACTIONS.

2-Phono input impedance/capacitance selector-

This control is used to optimize the input loading of the cartridge, head amp or transformer connected. Your dealer will be able to supply you with the correct settings. One can also experiment with loading to find an optimum value.

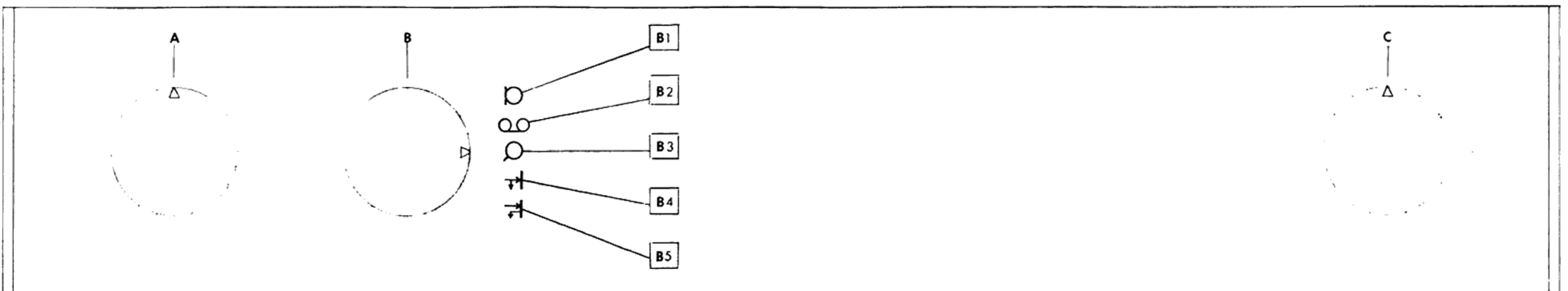
Impedance	Capacitance
1 - 47k	4 - 120pF
2 - 35k	5 - 120pF
3 - 10k	4+5 - 240pF
1+2 - 25k	
1+2+3 - 7k	
All off - 100k	All off - Capacitance of tonearm leads

Normal loading for moving magnet cartridges is 47k (1 on only). Please note that capacitance of tonearm leads and interconnects has to be added to above values.

FRONT PANEL CONTROLS (see drawing # 3)

- A - Volume - adjusts output level at the main outputs of both channels simultaneously.
- B - Select - selects any of three inputs, and between program source, tape monitor and tape output. In input modes tape output is disconnected.
- B1 - Auxiliary input - Selects auxiliary (high level) source replay.
- B2 - Tape - Selects tape replay.
- B3 - Phono - Selects phono replay.
- B4 - Recording - Selects recording from phono to tape while monitoring the input.
- B5 - Tape monitor - Selects recording from phono to tape while monitoring the recording.
- Recording from auxiliary to tape is possible only when selector is in pos. B1. When dubbing from one tape deck to another, the replay machine should be connected to the auxiliary input, and pos. B1 on the selector should be used.
- C - Power Switch - Main outputs are shorted for 1,30 min after turn-on to allow for circuits to fully stabilize. A front panel LED indicates when unit is ready for operation. The automatic muting circuitry also instantly shorts the outputs when power is switched off, or in case of a power failure.

DRAWING no3



S Y S T E M C O N N E C T I O N

You should by now be familiar with the controls and connectors of your preamplifier. Before powering up your unit please recheck the cautions under INSTALLATION in the beginning of this manual. You should also, by referring to the drawings, make shure that all connections are correctly made.

This preamplifier has been equipped with a very special type of female RCA (Phono) connector, allowing ground to be connected before the "hot" lead. In practice this means that connecting or disconnecting the in and outputs of the preamplifier can be done safely with units turned on. The automatic short circuiting effectively protects valuable equipment, otherwise easily damaged by the unsafe action of ordinary phono connectors. However to fully benefit from these gold plated, teflon insulated connectors, only gold plated male plugs of equal quality should be used. Special teflon insulated male connectors featuring the same high standards as our female connectors are available from all franchized dealers.

Please note that minimum load impedance for the preamplifier is 3k. For power amplifiers with an input impedance below 3k a modification (kits furnished by all franchized dealers) is needed.

P O W E R I N G U P

Before connecting the power cord, check that the attached rating corresponds with your AC voltage. The power cord should be connected to a grounded outlet of appropriate power rating (the preamp consumes 35 Watts). The unit should not be connected to the same fused outlet as equipment containing thermostats, motors (e.g. washing machines, refridgerators etc.), or any other equipment emitting high frequencies or transients on the AC line.

Upon turn-on the unit will require approx. 1,30 min of warmup before fully stabilized. During this time the outputs are automatically muted. A front panel LED indicates when unit is ready for operation. Should this LED lighten up instantaneonsly upon turn-on, immediately switch the unit off and thereafter switch on again.

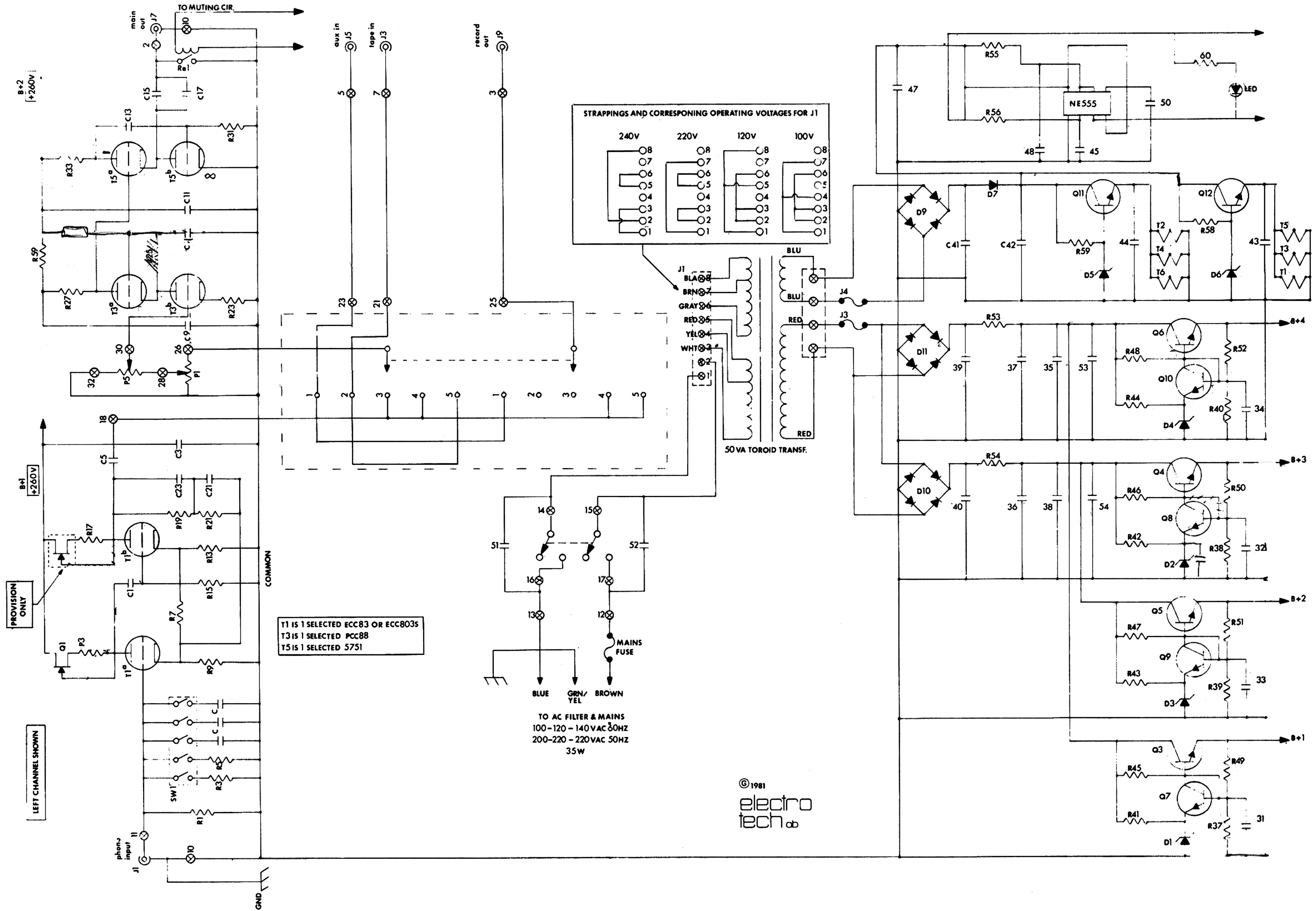
M A I N T E N A N C E

When properly operated no electrical routine maintenance is needed for the unit. The life expectancy for the vacuum tubes employed are around ten thousand hours, and during this time they need no attention. When tube replacement does become necessary, a replacement tube kit is available from your franchized dealer, who also will carry out the installation.

This installation also includes a general overhaul and trimming of the preamplifier. Every tube is matched and chosen to, when properly trimmed by the service technician, give optimum operating points in the specific circuit topology used.

NO TUBES OTHER THAN THOSE OBTAINED FROM A FRANCHIZED DEALER SHOULD BE USED. NO TUBE REPLACEMENTS SHOULD BE CARRIED OUT BY THE CUSTOMER.

The anodized all aluminium chassis should be cleaned with a damp cloth and mild detergent. No strong chemical cleaners should be used. To maintain the surface lustre, a cloth damped with furniture polish can be used.



N O T E

This unit will invert phase - the main output signal is 180° out of phase with the input signal. To obtain correct polarity, you should first check if all other units in your system are non-inverting (information on this should be supplied in the instruction manuals). If so is the case, invert the phase of the loudspeaker connections. If no such information is available, (please note that some cartridges of the same brand and type will invert phase, others not) you will have to use the trial and error method. The phono stage is non-inverting. All recordings from disc to tape will be in phase.

LIMITED THREE YEAR

WARRANTY

The LA 1 / LA 1S preamplifier is warranted by the manufacturer to the original purchaser to be free from defects in material and workmanship for a period of three (3) years from the date of purchase. The warranty does not apply to the vacuum tubes employed in the circuitry.

If faults in material and workmanship appears during this period, the preamplifier should be sent, through a franchized dealer, along with a return authorization (see below) in its original packaging material, to our service department. We will then repair or replace the unit under the conditions that:

1. The unit, in our sole opinion, not has been abused, misused or altered.
2. Any prior service or repair on the unit has been carried out by authorized personnel.

Return Authorization.

In the event that your unit has to be serviced, a return authorization has to be obtained through a franchized dealer. No equipment will be accepted that does not have this authorization attached.

The unit has to be packaged in its original packaging material. Shipments made in anything but the original carton and complete packaging material are the responsibility of the customer. The factory warranty does not cover damages which occur to the unit in shipment.

All shipments to the factory must be prepaid and insured for full value. All factory serviced equipment will be returned freight collect.

THERE IS NO OTHER WARRANTY ON THIS PREAMPLIFIER OTHER THAN THE ABOVE. NO RESPONSIBILITY IS ASSUMED FOR ANY INCIDENTAL OR CONSEQUENTIAL DAMAGES. WHERE LOCAL LAW DOES NOT ALLOW ANY OF THE ABOVE LIMITATIONS OR EXCLUSIONS, THESE DO NOT APPLY TO YOU.

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