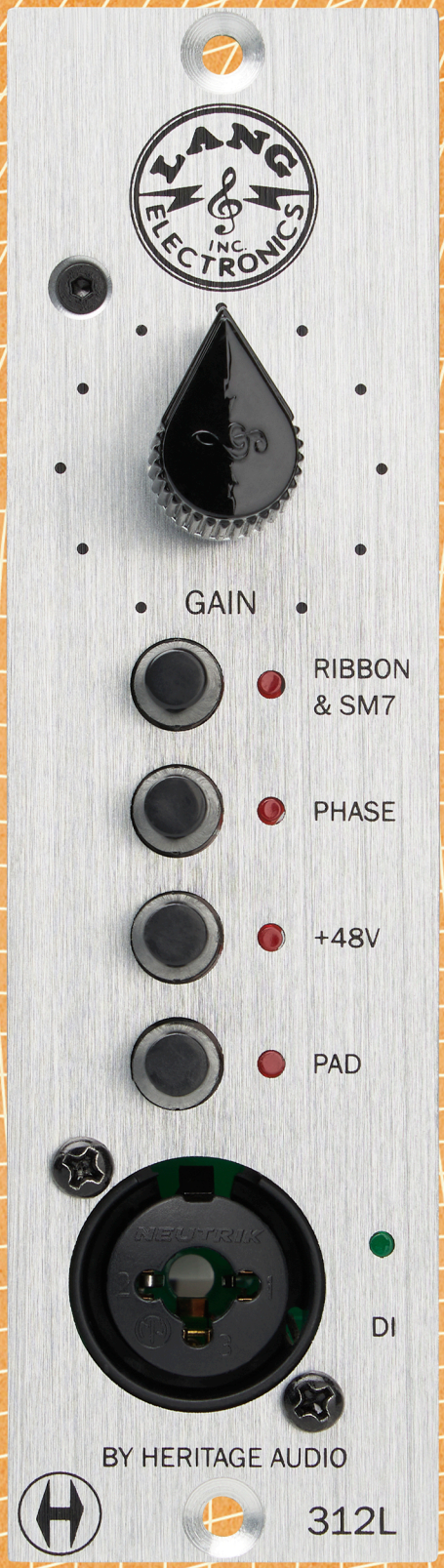
500 series NY style preamp with built-in lifter



312L

USER MANUAL

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Thank you for choosing the LANG 312L 500 series preamp. After several years studying where the true sound of New York lies, the inmediacy, the fast response, the in your face vibrant sound of the capital of the world, we believe that we have nailed it with the 312L and, as with every new LANG Electronics Inc. product, at a really affordable price that even the most modest studios will be able to justify.

Despite the low price of the preamp, we have taken all neccessary steps to make that New York sound available at a never seen before price. From the proprietary LANG Electronics Inc. input transformer, designed by the Heritage Audio team in Madrid, Spain, a new, built from the ground up footprint compatible op amp, to the custome US made Cinemag output tranfromer, this preamp breathes that cherished 70's New York sound.

But we didn't want to leave it there so we've added an extra +25 dB lifter that eliminates the need for any external gain boosters for gain hungry mics and accomodates the signal to any vintage ribbon mic making this preamp a one for all mic preamp with an unbeatable gain range that goes from +15 dB to +90 dB at an unbeatable price...like we say....it's less than 4 bucks per dB!!!

Peter Rodríguez
CEO
LANG Electronics Inc. - Madrid, Spain

2024
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LANG Electronics Inc.reserves the right to alter specifications without notice. The information in this manual has been carefully checked and is believed to be accurate at the time of publication. However, no responsibility is taken by us for inaccuracies, errors or omissions nor any liability assumed for any loss or damage resulting either directly or indirectly from use of the information contained within it.

THE BRAND LANG ELECTRONICS INC. AND THE LANG LOGO ARE REGISTERED TRADEMARKS OWNED BY HERITAGE AUDIO S.L.

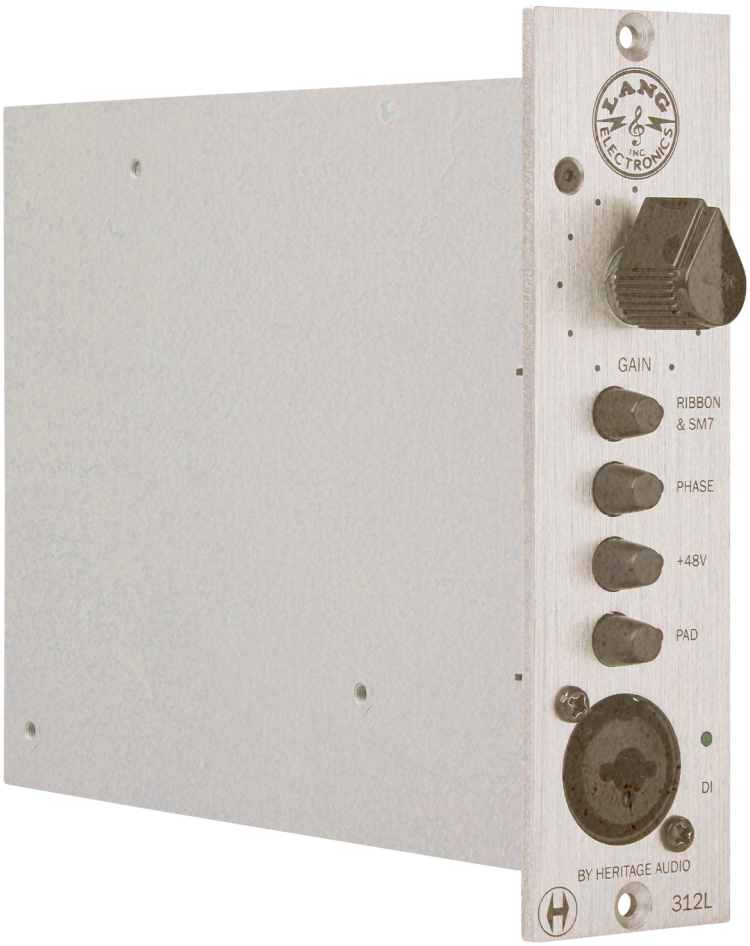
The new LANG 312L is simply bursting with dBs…. With up to 90dBs of gain, it's equipped with more power than almost any other Preamp out there. Now, you'll be able to use each and every microphone in your collection without the need for any external boosting, and not even break a sweat.

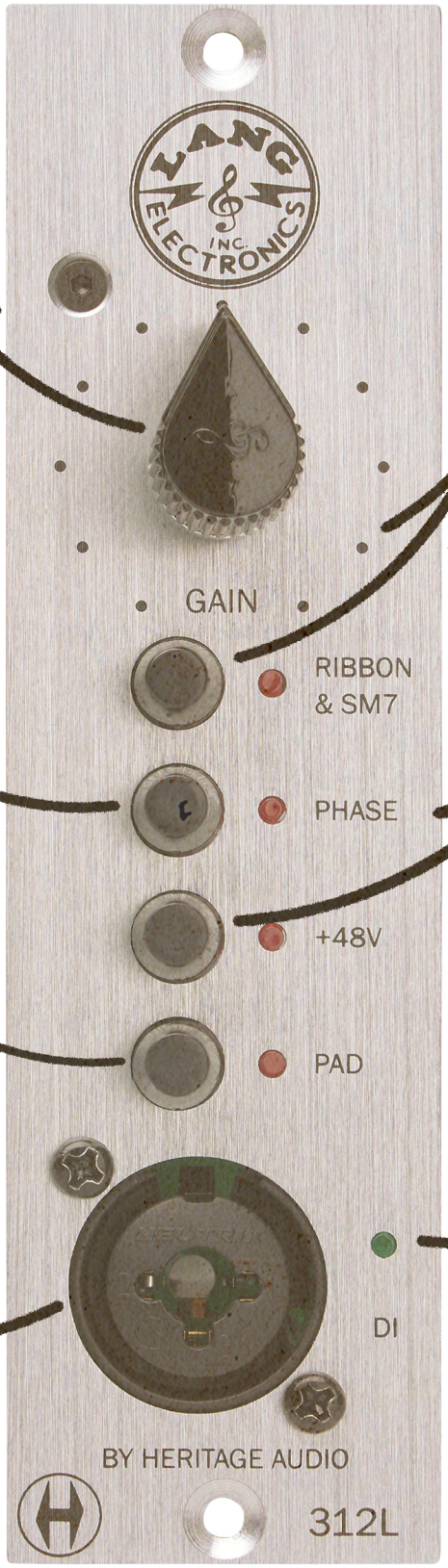
Especially useful for all you Ribbon and Vintage Mic users that never seem to be able to get the most from them… Thanks to its extremely low internal noise and impressively fast response, you'll actually hear dynamics you never new existed.

Time to hear your Mics as they've never sounded before!!!

Bring all the energy and excitement that has made New York City the capital of the world into your recordings.

With our custom made HA-880 OP-Amp and transformer balanced Inputs & Outputs (CineMag & LANG) you can be sure that a thick, solid and professional signal will be produced to ensure all of your broadcasting and recording needs are addressed. All of this at an unheard of price that is less than 1/3 of what a unit of this calibre tends to go for.





INPUT GAIN KNOB

GAIN RANGE FROM +15 dB TO +90 dB.

RIBBON & SM7

+ 25 dB BUILT-IN LIFTER THAT ALSO ACCOMODATES THE SIGNAL FOR VINTAGE MICS

PHASE

FLIPS PHASE 180°

+48V

ACTIVATES +48V OF PHANTOM POWER

MIC PAD

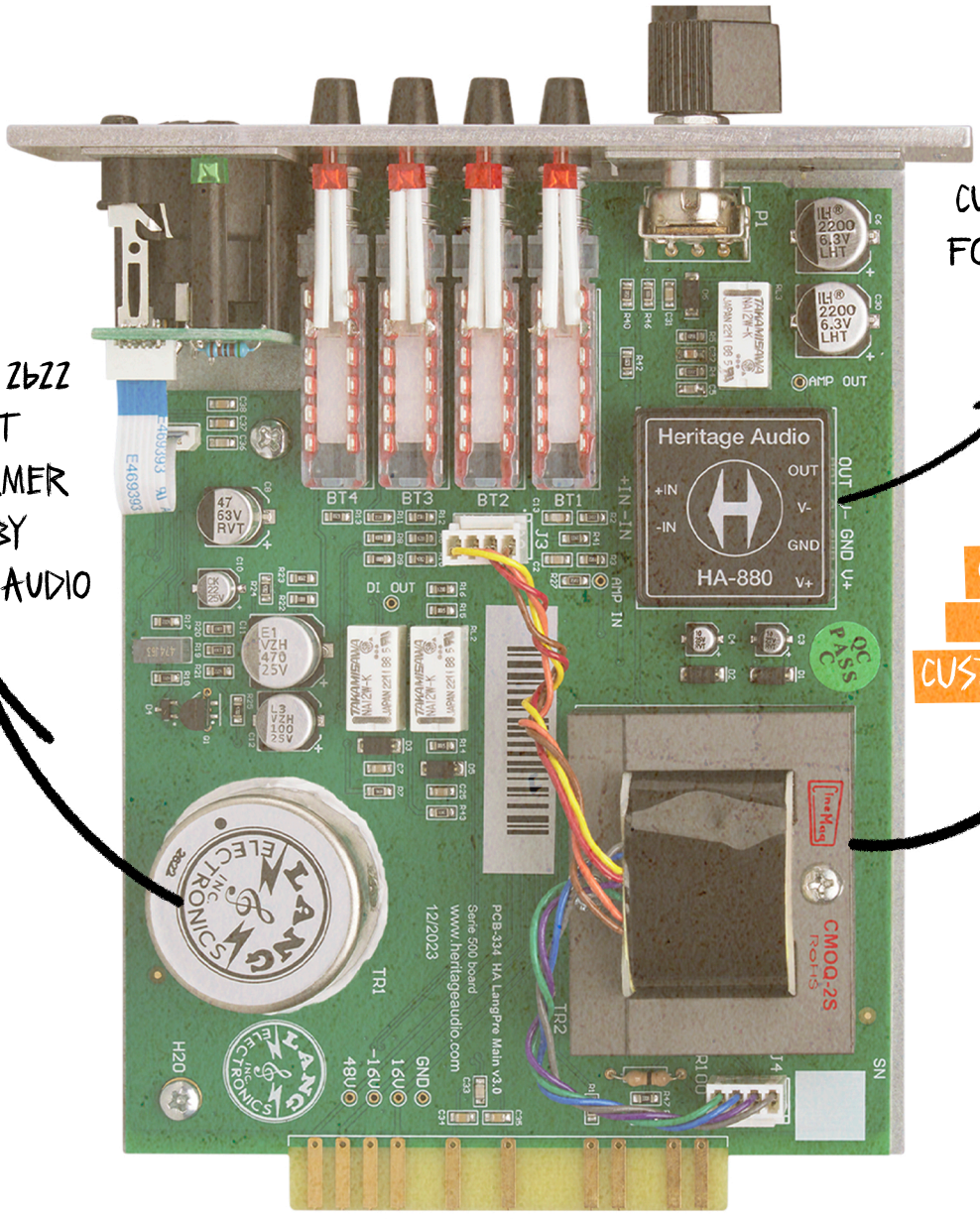
ACTIVATES 20 dB REDUCTION AHEAD OF THE INPUT TRANSFORMER

D.I. INDICATOR

WHEN ON, THE D.I. IS ACTIVE.

COMBO INPUT

XLR FOR MIC
TS JACK FOR D.I.



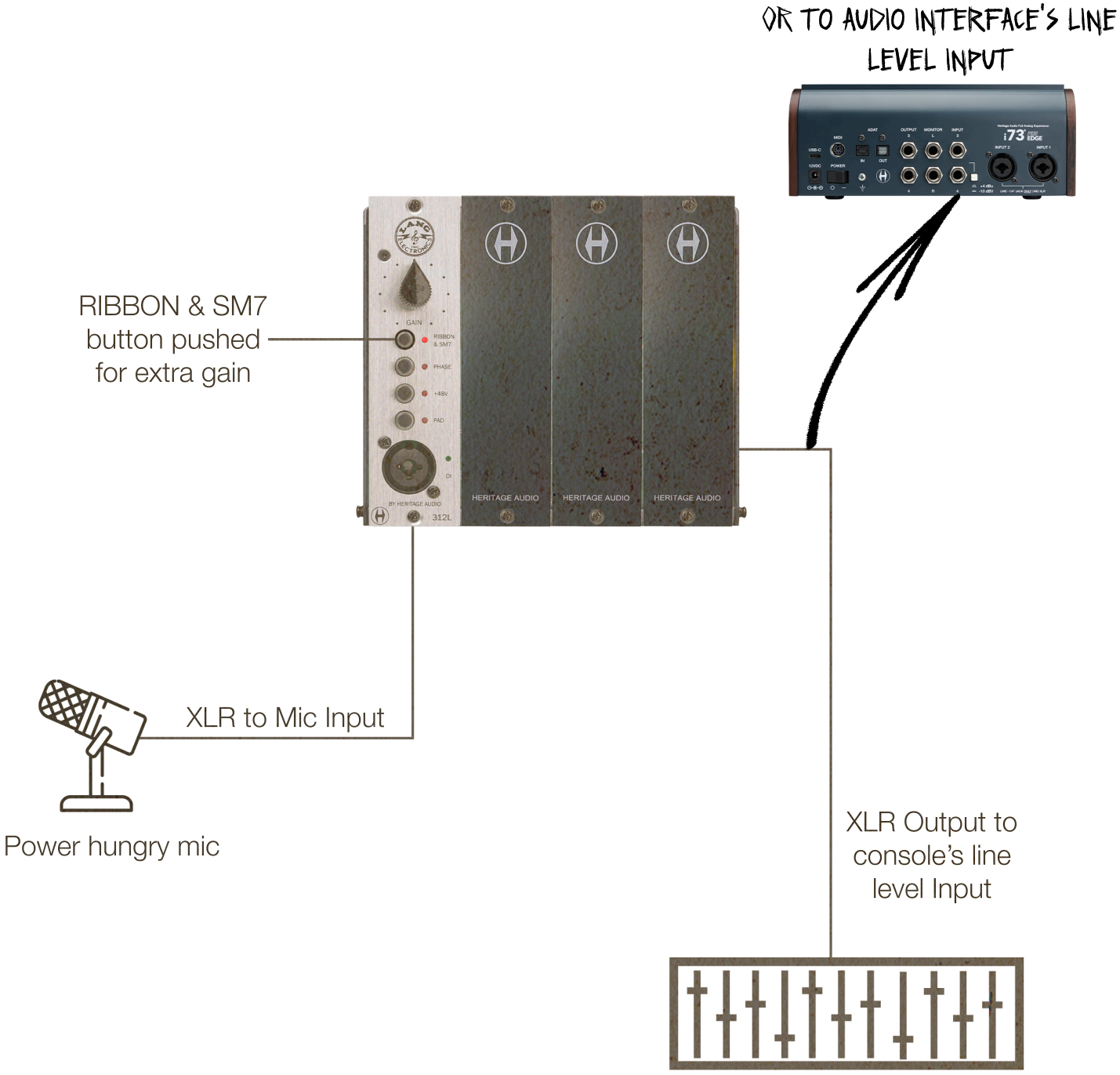
CUSTOM MADE HA-880 FOOTPRINT COMPATIBLE OP-AMP.

EXCLUSIVE 2622 LANG INPUT TRANSFORMER DESIGNED BY HERITAGE AUDIO

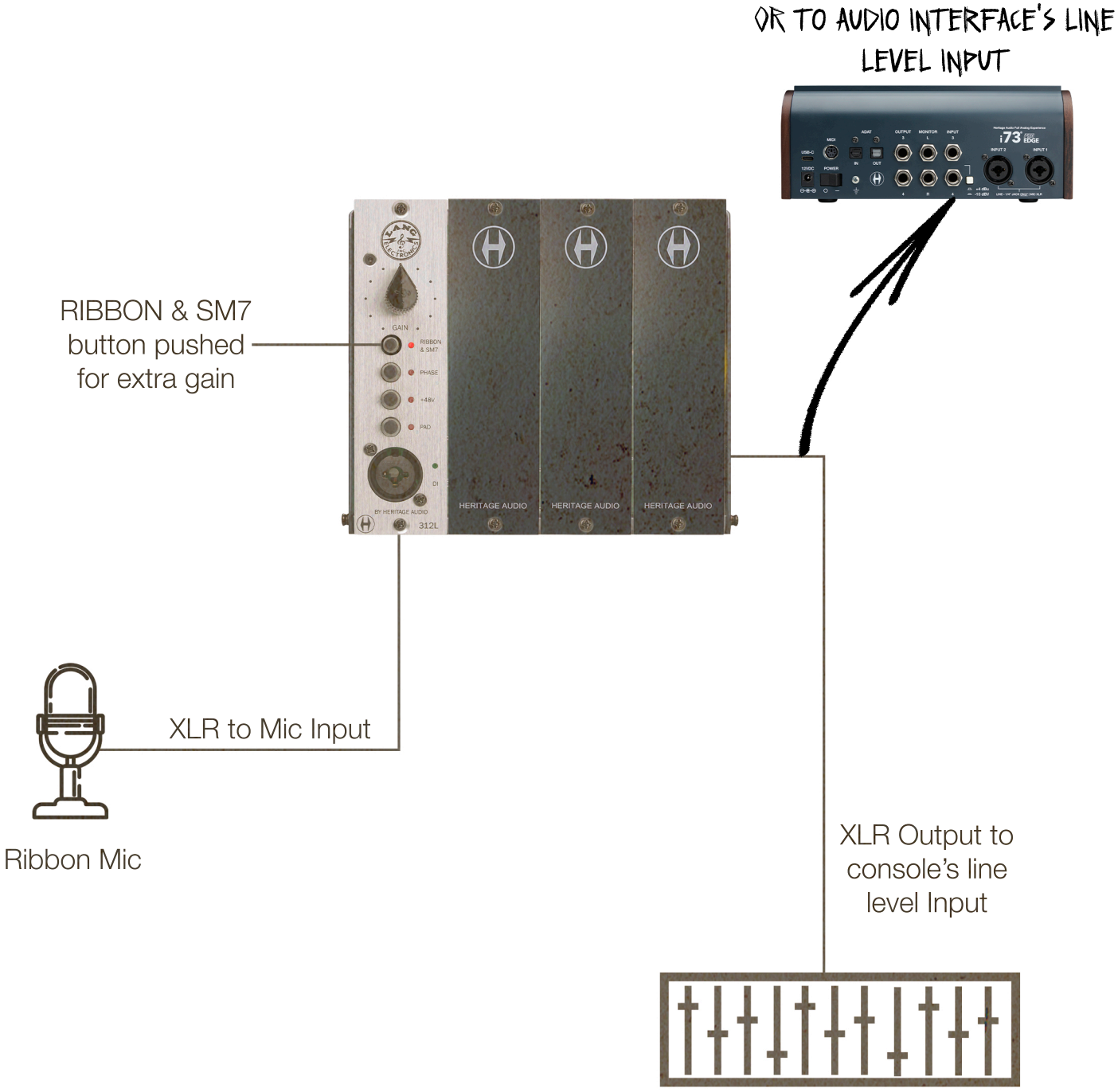
CINEMAG OUTPUT TRANSFORMER CUSTOM MADE IN THE US.

GOLD PLATED 500 SERIES SLOT CONNECTOR

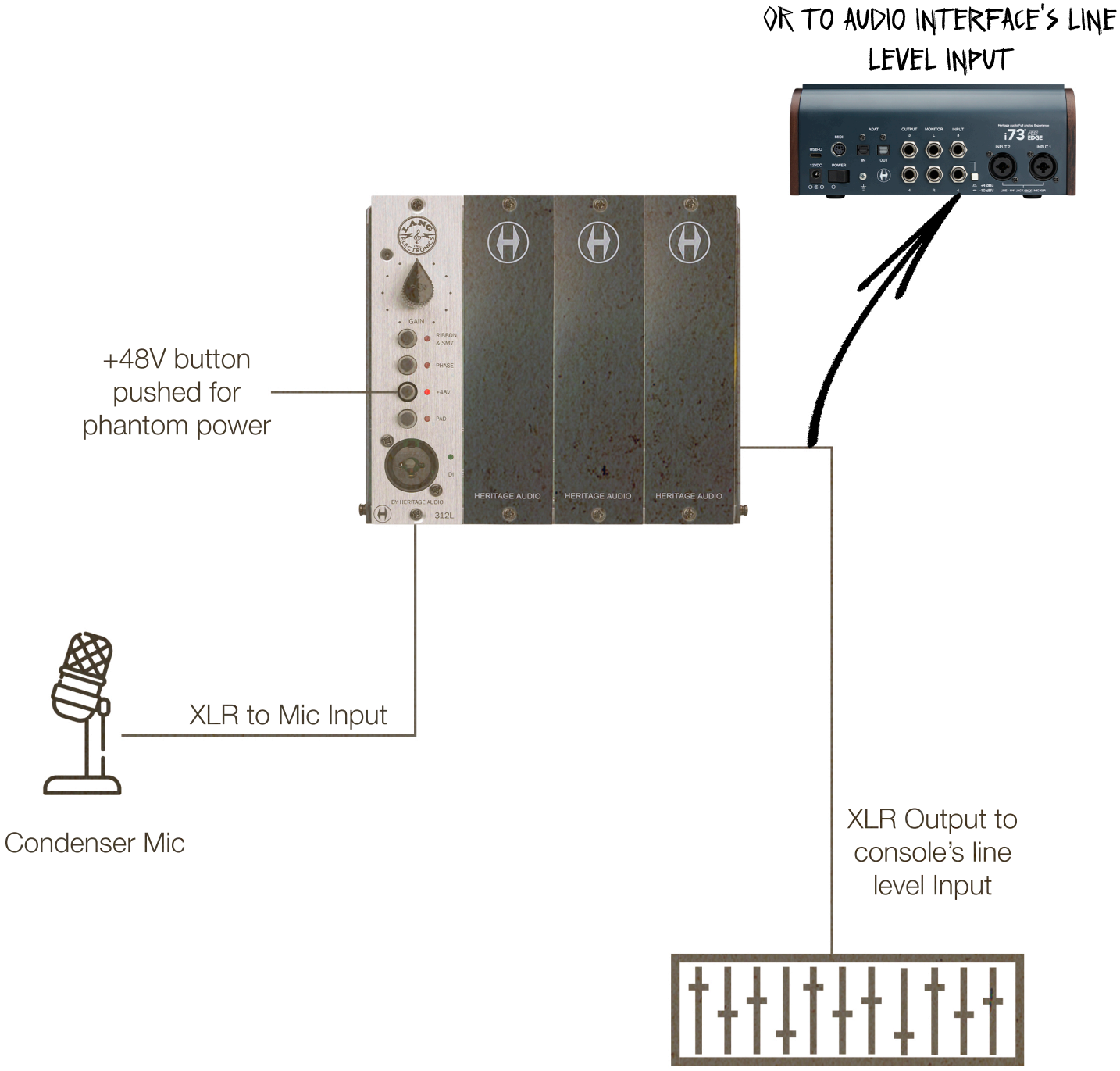
Using a power hungry mic for recording through the LANG 312L



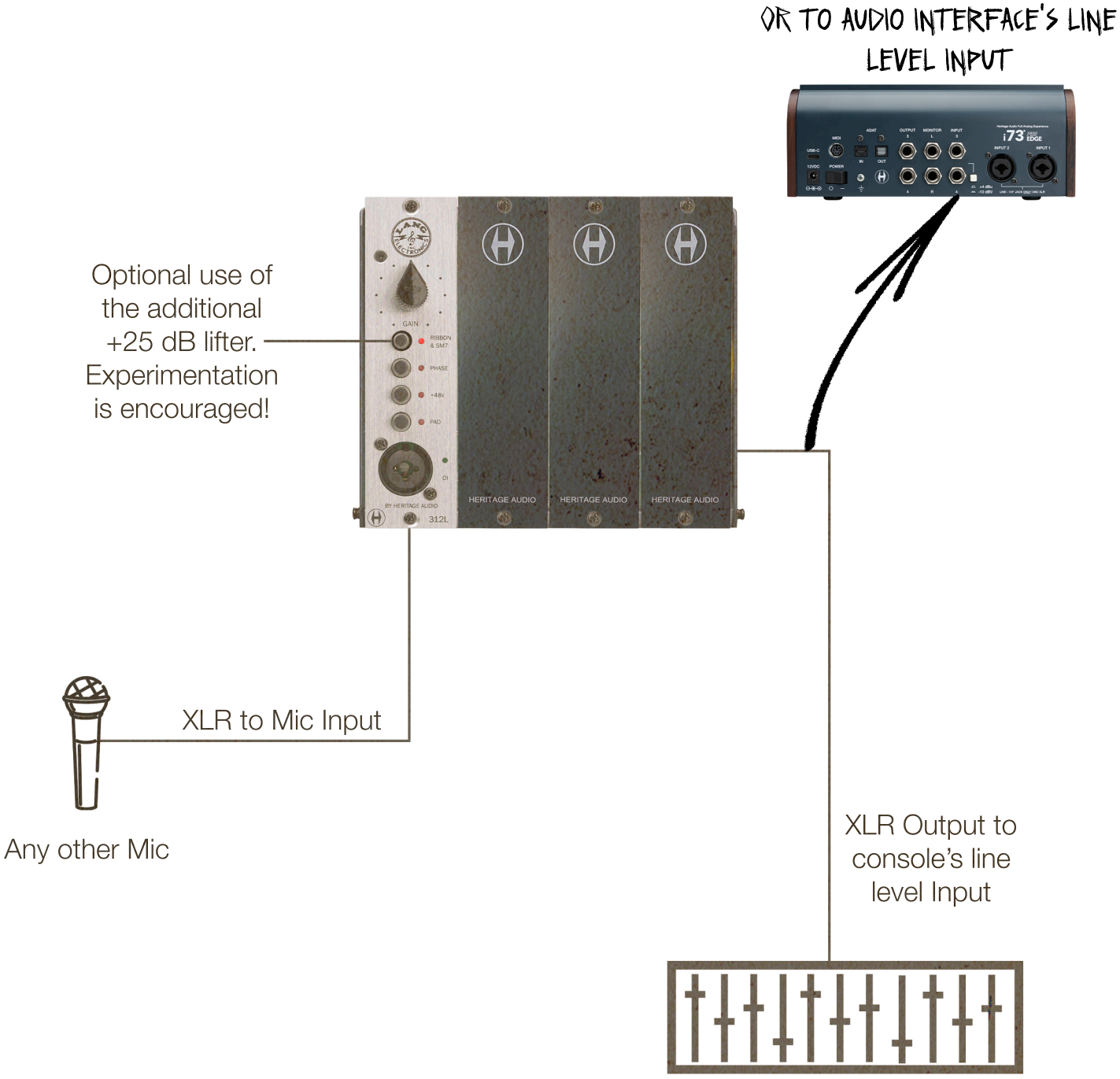
Using a ribbon mic for recording through the LANG 312L



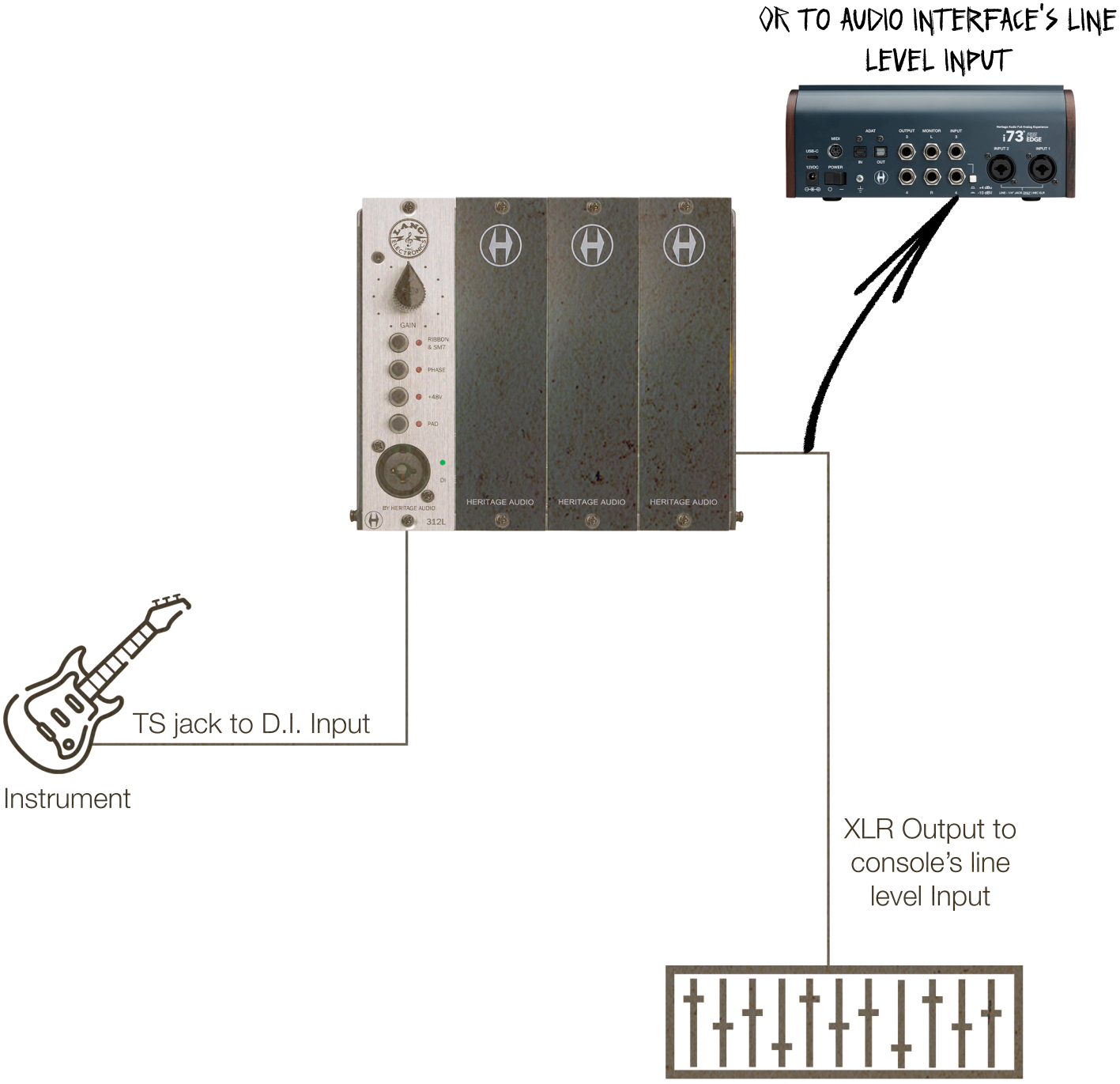
Using a condenser mic for recording through the LANG 312L



Using any other mic for recording through the LANG 312L



Recording an instrument through the LANG 312L's D.I.



Microphone input impedance: 1200 Ω , 10KΩ with lifter engaged, perfect for lo gain ribbon mics. Input is transformer balanced and floating.

Line input impedance: 10 kΩ bridging, transformer balanced and floating.

DI input impedance: Greater than 2 MΩ, unbalanced.

Output impedance: Less than 75 Ω, transformer balanced and floating, to drive a load of 600 Ω (factory unterminated).

Maximum output: Greater than +30 dBu into 600 Ω.

THD: Less than 0.005 % at 1 kHz, less than 0.01 % at 100 Hz.

Frequency response: 20 Hz (+0.3 dB) to 20 kHz (-0.2 dB).

Maximum gain: 90 dB.

Noise: Less than -130 dBu EIN unweighted.

Power consumption: 50 mA per rail ±16 V DC.

PROBLEMS	SOLUTIONS
There doesn´t appear to be any signal at all arriving at the back XLR.	Make sure the GAIN knob is not in the ´Off´ position.
There still doesn´t appear to be any signal at all arriving at the back XLR.	Check to see if a jack cable has been left plugged into the front panel D.I.
Even at the lowest position on the GAIN knob I still have too much gain.	Activate the PAD button. This will reduce the input by 20 dB ahead of the input transformer.
Condenser microphones don´t seem to work with the LANG 312L.	Make sure the +48 V button is pressed in to activate the phantom power.

FOR ANY FURTHER DOUBTS OR QUESTIONS PLEASE GET IN CONTACT WITH US AT:
SUPPORT@HERITAGEAUDIO.COM

LIMITED 2 YEAR WARRANTY

The LANG 312L is warranted by LANG Electronics Inc. to be free from defects in materials and workmanship for the period of 2 years to the original purchaser. In the event of such defects, the product will be repaired without charge or, at our option, replaced with a new one if delivered to LANG Electronics Inc. prepaid, together with a copy of the sales slip or other proof of purchase date. The warranty excludes problems due to normal wear, abuse, shipping damage or failure to use the product in accordance with the specifications. LANG Electronics Inc. shall not be liable for damages based upon inconvenience, loss of use of the product, loss of time, interrupted operation or commercial loss or any other damages, whether incidental, consequential or otherwise.

This warranty is not transferable.

WE ENCOURAGE YOU TO REGISTER YOUR NEW LANG 312L IN OUR WEB IN ORDER TO BETTER MANAGE ANY WARRANTY RELATED ISSUES AT: HTTPS://HERITAGEAUDIO.COM/REGISTRATION/

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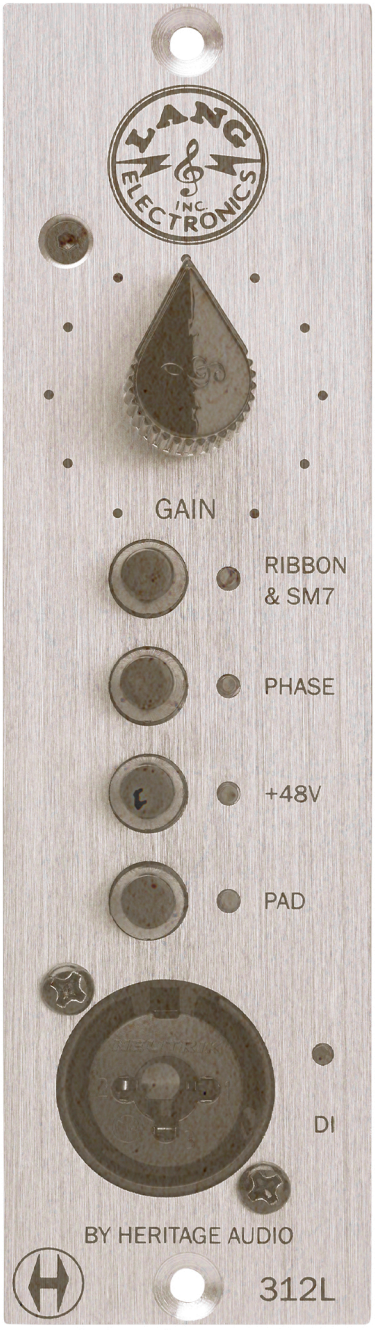

Session / Title:_____ Track:_____Connected Equipment:_____
Date:_____ Instrument: _____ Notes:_____



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