Radial Smart Sheet



The Radial J48 direct box is the world's finest phantom-powered active DI. It has been optimized to handle extreme transients using only the 5 milliamps of available current from typical 48-Volt phantompower. The J48 features a unique digital switch-mode power supply that steps up the internal rail voltage to an amazing 9-Volts.

Most battery-powered guitars and basses are active and will produce as much as 7-Volts when played at maximum volume. Since typical direct boxes are only able to handle about 3 volts, they choke. The trouble is caused when the input signal is greater than the internal rail voltage. This creates all types of distortion: bass sounds thin and lacks punch, guitars sound scratchy and tend to have sporadic peaks, and they lose their natural body resonance.

Because the J48 has more 'horse-power' (current to work with), it is able to handle these transients without choking. This extra headroom significantly reduces harmonic, phase and inter-modulation distortion. And when you fix all of the problems, a funny thing occurs... you get great sound!

Features

- · Superior dynamic headroom
- · High input impedance reduces loading
- · Merge switch sums stereo instruments to mono
- Low-cut filter, -15 dB PAD, and polarity reverse

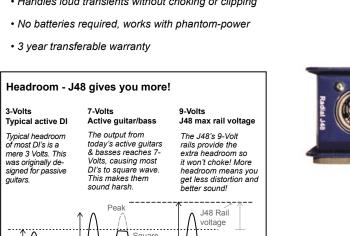
Applications

- Provides extra 'reach' and 'air' in your sound!
- · Ideal for active acoustic guitars and basses
- · Great for keyboards and drum modules
- · Equally wonderful for live or studio

Cool stuff

Rail voltage

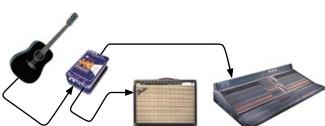
- · Huge 9-Volt internal rail voltage for extra headroom
- Handles loud transients without choking or clipping



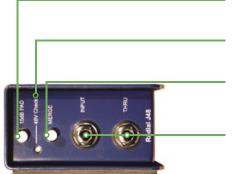
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Extra

Headroom



wave 9V

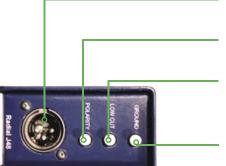


-15dB PAD allows super-hot inputs such as from a CD player to be connected and balanced for long runs.

MOMENTARY LED will flash once to tell you phantom-power is present. This saves power for the audio circuit.

MERGE FUNCTION turns the input and thru jacks into a passive mixer to sum stereo signals to mono. This saves valuable inputs on the mixer!

INPUT connects from instrument. the THRU to the amplifier. High input impedance reduces loading.



XLR OUT 600 Ohm balanced, mic-level output will drive 1000 feet without appreciable noise.

POLARITY REVERSE flips the polarity from the AES standard pin-2 to pin-3 on the XLR.

80HZ LOW-CUT (high-pass) filter gently reduces excessive bass for more headroom and clarity. Eliminates run-away resonant feedback from acoustics!

GROUND-LIFT disconnects the internal ground path between the input and the output.



HEAVY-DUTY WELDED I-BEAM

enclosure of 14 gauge steel makes it impossible to torque the PC board. Eliminates cold solder joints.

BAKED ENAMEL finish for excellent durability and great looks for

MILITARY-GRADE PCB with full surface ground plane to reduce susceptibility to RF noise.

DIGITAL SWITCHING PSU steps up the internal rail voltage to 9-Volts. The J48 will not choke like other DI's when hit with loud transients