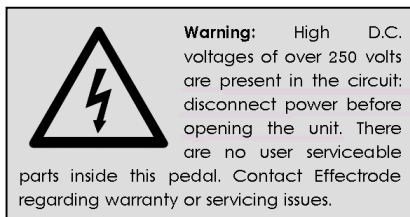


# Specifications

- Operates anywhere in the world from 110-250V AC
- Supplied with country-appropriate IEC mains power cable and 4 pedal leads
- 4 x 12VDC isolated outputs @ 1250mA completely eliminates earth loops
- One of the outputs can be configured to power 9VDC center negative pedals
- Short circuit/overload protection protects your tube pedals
- Power requirements: 110 — 240V AC IEC 3 pin connector
- Dimensions: width 7.5"; depth 4.8"; height 1.5"
- Weight: 1lb14oz (on Earth)
- Construction: Solid die-cast aluminum box
- Finish: titanium-silver powder coat



## Owner's Manual



Serial # **AT-1A**



# Introduction

Thank you for purchasing the *Atomic Isolated Power Supply* model AT-1A. The AT-1A is specially designed to meet the demanding power requirements of our tube effects pedals. Properly designed tube pedals require much more power than solid-state effects because of the tube heaters and high voltage operation. To get an idea, take a look at the size of the transformers inside a typical vintage tube amp. The Atomic generates enough amps to power up to 4 of our miniature triode tube pedals without compromising tone quality .

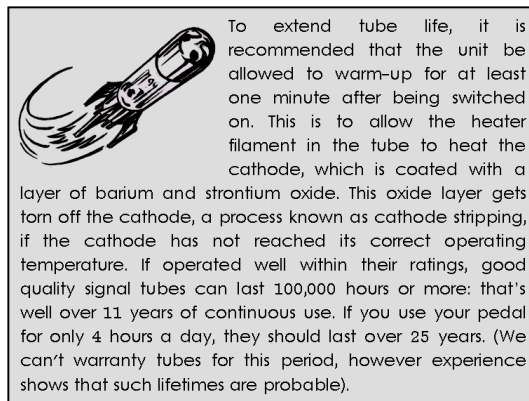


Thank you for trusting *Effectrode* to be your effects pedal company . We wish you many years of musical enjoyment from this very special, hand-built unit.

*Phil Taylor — Designer*

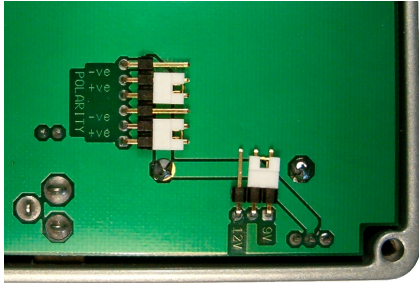
# Notes

When installing the Atomic, ensure adequate ventilation around the enclosure and do not obscure the ventilation holes. *Effectrode* miniature tube pedals typically draw just over 1 amp (1000mA) each when they have warmed up and this unit will also get warm when powering several pedals. On power up, the LEDs on the front panel will flash for a few seconds while the tube heaters warm up. Current draw is higher for tube pedals during initial start-up conditions, as the heater filament resistance is lower when they are cold. As the filament warms up, the resistance increases and the tube heaters begin to glow orange. It typically takes a few seconds or this to happen and a further few seconds is required for the heater to begin warming the cathode to the required temperature.



To extend tube life, it is recommended that the unit be allowed to warm-up for at least one minute after being switched on. This is to allow the heater filament in the tube to heat the cathode, which is coated with a layer of barium and strontium oxide. This oxide layer gets torn off the cathode, a process known as cathode stripping, if the cathode has not reached its correct operating temperature. If operated well within their ratings, good quality signal tubes can last 100,000 hours or more: that's well over 11 years of continuous use. If you use your pedal for only 4 hours a day, they should last over 25 years. (We can't warranty tubes for this period, however experience shows that such lifetimes are probable).

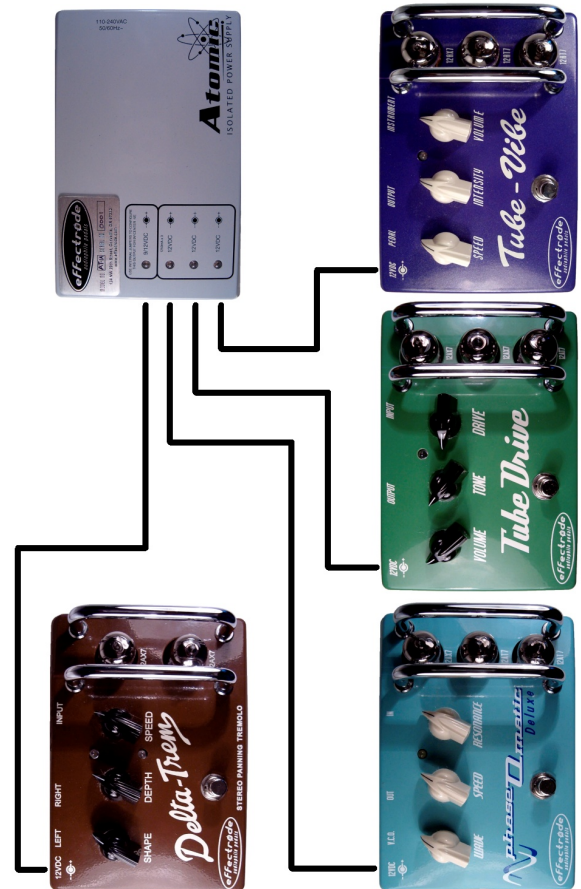
And finally, here are the jumper settings for 9V center positive pedals.



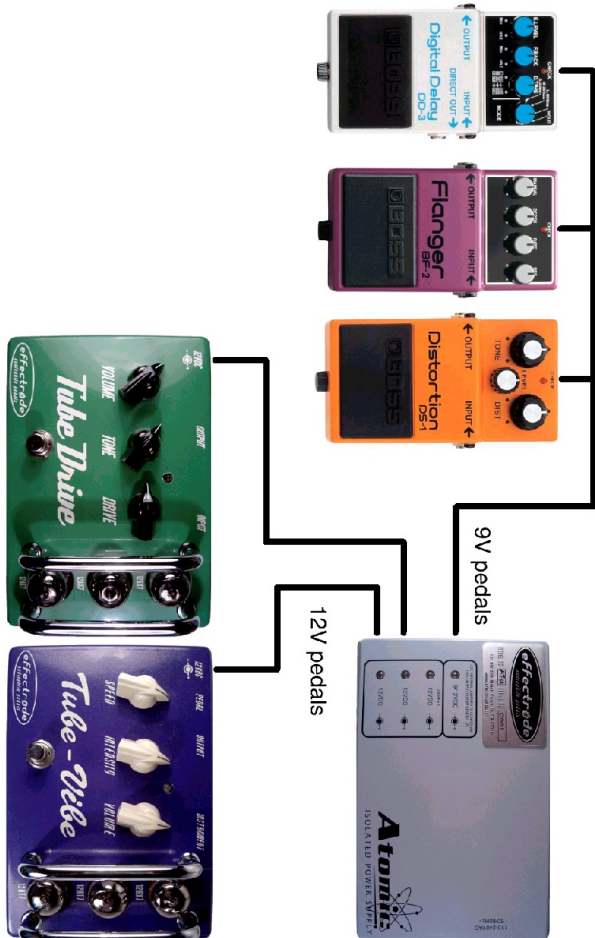
**WARNING!!!** Before removing the rear panel of this unit, completely isolate it from the mains by disconnecting the mains power cable as there are hazardous voltages within this unit which could cause injury or death. If you are uncertain about what you are doing please seek advice from a qualified electrical engineer.

## Setups

The Atomic powering four *Effectrode* tube pedals.

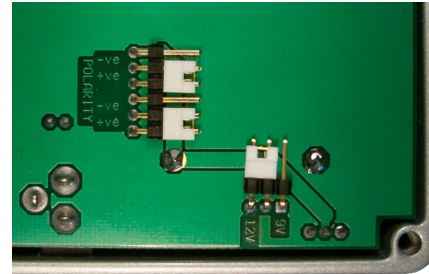


The first power output can be used to power 9V center negative pedals in a daisy-chain as shown below.



## Configuration

The *Atomic* can be configured to power 9V center negative or center positive pedals using internal jumpers. To access the jumpers first **make sure the unit is disconnected from mains power outlet** to avoid the possibility of a lethal electric shock. Remove the six screws on the base of the pedal and remove the baseplate. The *Atomic* ships in standard configuration of 12V center positive as shown in the figure below.



To configure for 9V center negative pedals set the jumpers as shown below

