# **ARTIST**

## OWNER'S MANUAL



#### POWER AMP:

OUTPUT POWER @ 1 KHZ @ 120 VAC Line Rated Power: 120 W RMS at rated load: 4 OHMS / 2 OHMS Power vs. Load: 90 W RMS @ 5% THD into 8 Ohms 120 W RMS @ 5% THD into 4 Ohms 120 W RMS @ 5% THD into 2 Ohms PEAK OUTPUT @ RATED LOAD: 8 Amps & 20V, 240 Watts MUSIC POWER OUTPUT @ RATED LOAD: 150 W RMS @ 5% THD



INPUT CHARACTERISTICS (Tone controls full cw, Volume @ 12:00, master full cw) Sensitivity: 20 mV @ 1 KHZ/Input Impedance: 330 K Ohms Noise: 50 DB Open Ckt., 55 DB 50 K Ohms, 60 DB Short Ckt.\* DISTORTION @ 1 KHZ: Less than 0.5% THD @ Rated Output FREQUENCY RESPONSE: 3 DB Down @ 40 HZ & 25 KHZ TONE CONTROLS:  $\pm$  10 DB @ 50 HZ  $\pm$  20 DB @ 5 KHZ MIDDLE CONTROL:  $\pm$  10 DB @ 300 HZ REVERB CONTROL: Continuously variable with footswitch cut off

MASTER GAIN: Used in conjunction with input volume to produce overdrive

<sup>\*</sup>Signal-to-noise ratio in DB below rated output

The "ARTIST" features an extremely compact enclosure containing either a 12" or a 15" super heavy duty professional grade speaker and is powered by a TUBE TYPE 120 watt RMS (@ 5% THD) amplifier. A full complement of Equalization controls is featured and includes low, middle and high frequency controls for total tonal balance between these frequency bands. We have built into this series a new type of reverberation circuit that delivers over 14 volts RMS to the built in reverberation unit. The preamplifiers, equalization, and reverb circuitry is complemented by a MASTER VOLUME CONTROL for even greater control of sustain, dynamics and sensitivity for recording studio applications. Our exclusive "AUTOMIX" ciruitry is built into this series for even greater flexibilty and "on stage" versatility.

Your new Artist features two channels, "Bright" and "Normal" with four inputs that function along with the Automix footswitch to allow you to play through either channel, both channels in parallel, or both channels in series. Please read the explanation of each input and become familiar with the effects possible with the Automix footswitch.

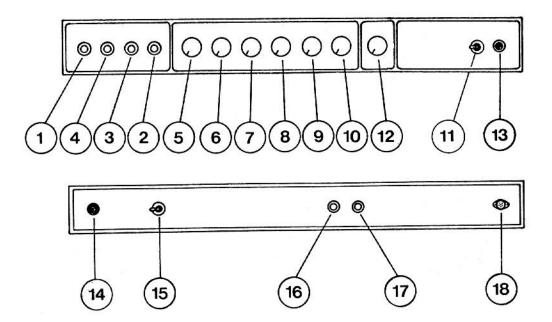
- 1 The **Bright input** places the signal from your instrument into the bright channel only. This channel provides treble boost for a "brighter" sound from your guitar.
- 2 The **Normal input** places the signal from your instrument into the normal channel only.
- 3 The **Parallel input** places the signal from your instrument into **both** channels. Plugging into this parallel jack is the same as using a patch cord to bridge into the normal and bright channels, except that the internal circuitry automatically performs the patching function. When plugged into this jack, both normal and bright channel volume controls are active and the desired blend of each can be found by varying the level of each, relative to the other.
- 4 The **Series input** places the signal from your instrument into both channels **in series**. By placing the channels in series incredible sustain and overload harmonics can be generated. Experimentation with various combinations of volume control settings will yield an infinite variety of harmonic characteristics and sustain durations. These functions can be used in conjunction with the master volume control to avoid driving the power amplifier to full output while seeking the desired effects enabling the operator to obtain sustain and overload effects at very low volume levels, such as those required in some recording studio applications.
- **5,6** Both the bright and normal channels have separate **volume controls**. These volume controls set the gain of the input preamp, thereby controlling the **sensitivity** of the preamp, **not the power** of the amp. It is entirely possible for the amp to be driven to full power output on very low volume settings if the signal from your instrument is extremely high. Please remember that the volume control does not indicate power output, but the gain of the preamp.

- **7** The **bass control** varies the amount of bass response in the system and is very effective in achieving a balanced tonal blend.
- **8** The **middle control** enables the musician to tailor the vital mid-range response. Experimentation with the unique middle circuit will show that it is much more effective than conventional circuits.
- **9** The **treble control** varies the high end response of the amplifier.
- **10** The **reverb control** determines the amount of delayed signal (reverb) blended into the output. This circuit is able to produce tremendous sustain and clarity by properly damping the driver coils of the reverb unit. The reverb is effective in **both** channels.
- 11 The **Standby Switch** removes the B+ supply from the output tubes while leaving the filament voltage on. This function keeps the tubes at operating temperature and allows for instant operation when the Standby switch is thrown.
- 12 The **master volume** control is very useful for obtaining a number of effects. The most common use of this control is for obtaining overdrive and sustain at low sound levels.

The master volume control is the final gain determining element before the signal is fed into the output amplifier and could more accurately be called a "sensitivity" control. To obtain maximum overdrive and sustain, the individual channel volume controls should be set near maximum, and the output of the system should be adjusted with the master volume control. You will discover that many different and pleasing harmonic effects can be obtained by trying different settings of the tone, volume, and master volume controls. It has been found that when operating the amp in the overdriven condition, lower settings of the treble control tend to give a smoother "natural distortion characteristic." The normal background noise (hiss, hum, etc.) can be very effectively controlled for recording studio applications by use of the master volume control. To reduce these noises, reduce the setting of the master volume control.

- 13 The **pilot light** indicates when the electrical supply (mains) is supplying power to the amplifier.
- 14 The fuse is located within the cap of the fuse holder and should be replaced with one of the proper value if it should fail. It is necessary that the proper value fuse be used to avoid damage to the equipment and to avoid voiding the warranty. If your amplifier repeatedly blows fuses, the unit should be taken to a qualified service center for repair.
- 15 The line power switch is of the three position type with the center position being off. The three position switch has two ON positions, one of which is used to ground the amplifier properly. One of the ON positions will yield the least hum or popping when the instrument is touched and this is the position that should be used.

For your safety, we have incorporated a 3 wire line (mains) cable with a grounding lug. It is not advisable to



remove the ground pin under any circumstances. If it is necessary to use the amp with the old two prong sockets, a suitable adaptor should be used. Much less noise and greatly reduced shock hazard exists when the amp is operated with the proper grounded receptacle.

- 16 The main speaker output jack is where the main speaker must be plugged in. The output impedance of this jack is 4 ohms.
- 17 The external speaker jack is designed to allow use of an additional speaker system with the Artist. This jack does not become operational until the main jack has been connected to a speaker. Due to a special switching jack which connects a separate 2 ohm tap on the output transformer, a 4 ohm load may also be connected into this jack—thus allowing the amp to put out full power into a total impedance of 2 ohms when an extension speaker is desired. The output impedance of the Artist is 4 ohms when the main speaker jack is used and 2 ohms when both are used. NOTE: No less than a 4 ohm speaker system should ever be connected to either speaker jack.

These and all other high power tube type amplifiers must be used in the proper manner to avoid damage to tubes and other internal components. Below are several instructions that **must** be followed when operating high powered tube type equipment.

A. NEVER OPERATE THE AMPLIFIER WITHOUT A SPEAKER LOAD!! This amp is equipped with a shorting system on the main output jack to help protect against accidentally turning on the amp without a load. If the speaker patch cord is plugged into the amp, but not connected to the speakers, the amp is NOT loaded and could cause problems if the amp is turned on and operated in this manner. The natural inductance of the output transformer can store energy that normally is transferred to the speaker and is capable of developing

tremendous voltages. These voltages can cause serious internal arcing between the elements of the output tubes and their related circuitry. This is the MOST important consideration in the safe operation of your tube amp. B. The 6L6GC output tubes are the most rugged audio power tubes on the market and should provide long service in the output circuit. Each tube has a keying pin moulded into the base to index the pins into their proper positions. When installing or removing the tubes, it is possible to break off these index pins by bending the tube too much in its socket. Use extreme caution when handling the tubes. UNDER NO CIRCUMSTANCES SHOULD TUBES WITH BROKEN OR MISSING INDEX PINS BE INSERTED IN THE SOCKETS. If a tube is inserted in the improper manner (wrong indexing), the output stage will instantly be damaged when the unit is turned on. Use of tubes with broken or missing index pins voids the warranty.

**18** A "Din" Socket is located on the back panel for the Automix footswitch. Care should be taken to properly mate the connectors of the footswitch plug with the respective socket holes.

### **FOOTSWITCH**

#### Selector Button

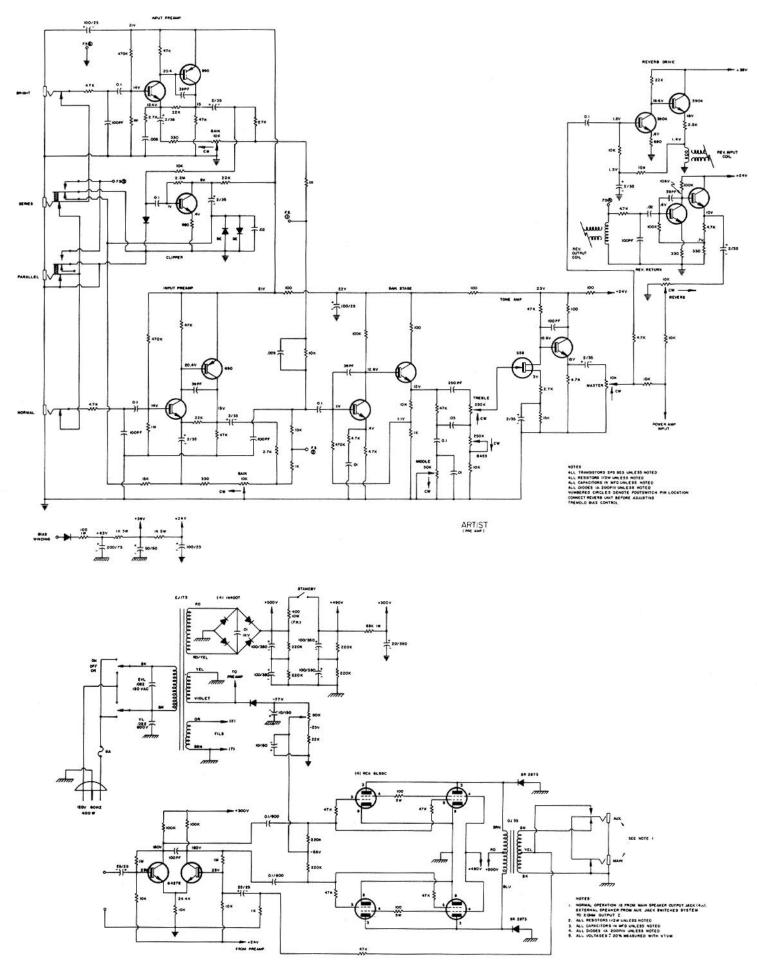
As the name implies, the **selector button** allows you to select between the normal and bright channels. This button is functional with your instrument plugged into either the **series** or **parallel** input.

### **Combiner Button**

The **combiner button** deactivates the selector button and allows both channels to be in the circuit at one time. The selector button becomes **inoperative** as soon as the combiner button is depressed.

#### Reverb

The reverb button activates reverb on both channels.



ARTIST