

AG 500SC

Owners Manual

Manual Version 1.7

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I. Getting Started

A. Safety Instructions

Please follow these guidelines:

- A) Vents are provided for heat dissipation at the rear of the amplifier. Maintain at least a 1" space around these vents to provide sufficient ventilation. If you decide to rack mount the amplifier make sure you do not block the vents.
- B) Keep all sources of fire, such as lighted candles, away from the amplifier.
- C) This product is approved for use in any climate.
- D) Do not expose the product to dripping or splashing. Do not place objects filled with fluid on the amplifier.
- E) Amplifier must be connected to a mains socket outlet with a protective earthing connection.
- F) The appliance coupler (AC cord) is the disconnect device. The disconnect device shall remain readily operable at all times.

B. Manual Conventions

In this manual, words that appear in *italics* represent actual physical controls on the AG 500SC.

C. Basic Setup

Plug in your instrument. The amount of power this amplifier will produce varies with the impedance rating of your cabinets.

One 8 ohm cabinet – 250 watts Two 8 ohm cabinets – 500 watts One 4 ohm cabinet – 500 watts

With the *Master* volumes down, turn on your amplifier. Adjust as follows:

Preamp:

- 1. Turn the *Gain* up while playing. Turn up until the *Clip* light flashes and then back off until the light stops flashing. You have now optimized your signal to noise ratio.
- 2. If you have a particularly high output instrument it may be necessary to push the -10dB button in to prevent clipping of the input buffer. This button is located next to the Input jack and when pushed in it lowers your input signal by 10dB.
- 3. Turn up the *Master* control until you reach the volume you need.

D. Protection Modes

Overcurrent Mode:

In this mode the preamp remains active, but the power amp mutes. The *Status* light does not flash. Power cycle the amp to reset. This may happen if the load is too low, or if you plug and unplug cabinets while playing.

Thermal/DC Mode:

In this mode both the preamp and the power amp mute. The *Status* light flashes. Power cycle the amp to reset. This may happen if the AC line power is not correct, if the amp is overheating, or if there is risk of damage to the amp or speakers.

II. Features and Functions

A. Front Panel Features

Input Pad:

-10dB

Preamp Section:

Bright: +5dB >4kHz shelving
Treble: +/- 13dB @ 4kHz shelving
High Mid: +/- 14dB @ 800Hz peaking
Low Mid: +/- 14dB @ 400Hz peaking
Bass: +/- 18dB @ 40Hz shelving
Deep: +6dB <100Hz shelving

Effects Loop Section:

Send: Output level = -infinity to +22dBu Adjust the level of the *Send* output to get the maximum performance from your effects unit.

Return: Sensitivity = -20dBu to +infinity

(This range of signals can be adjusted to get the nominal output level at the speaker output.) Adjust this knob to optimize the signal level returning from the Effects Loop. If it is turned up too high, you can clip the return circuitry of the AG 500. If it is turned down too low you might not be able to get loud enough.

Pull –20dB: Boosts the level of the *Return* signal by 8dB. This allows you to use a studio effects unit (line level) or a stomp box (instrument level) in the Effects Loop. If the signal returning from the Effects Loop is too quiet, pull this knob to boost the Return signal.

Pull Series: Removes any "dry" (un-effected) signal from the signal path.

When this knob is pushed in the Effects Loop is configured in "parallel" and you can mix your "dry" signal with the signal from the Effects Loop. When this knob is pulled out the Effects Loop is configured in "series" and all of your signal will pass through the Effects Loop. If you do not have anything plugged into the Effects Loop pulling this knob will cut off your signal completely.

D.I. Section:

D.I. Nominal Output Level: -20dBu

D.I. *Pre/Post* Button:

Pre - Your signal goes to the D.I. XLR output jack before your *Gain* and EQ settings, but after the -10dB input pad.

Post - Gain, EQ, Master settings and effects will be sent to the D.I. XLR output jack.

Lift/Ground: If there is a hum when using the D.I. there may be a ground loop. In many cases pushing in the *Lift/Ground* button can fix this problem.

* **Note**: The AG 500SC will not be harmed by phantom power through the D.I. Phantom power is a power supply that can be switched on at the channel input of some mixing consoles. It is used to power some types of microphones. Use of phantom power (usually labeled as 48V) will have no effect on the D.I. or the amplifier in general.

B. Rear Panel Features

Speaker Outputs: Two Speakon outputs and two ¼" outputs are provided. Any combination may be used as long as the load does not exceed 4 ohms.

Tuner Output: One ¼" Tuner output is provided. When the amplifier is muted your signal will still reach the tuner.

III. Warranty Information

Please send in your Warranty Registration card or register online upon receipt of your amplifier. Your original receipt is also necessary for warranty repairs. The AG 500SC has a 3 year limited warranty against manufacturing defects. If you experience a problem with your amplifier, please contact techsupport@aguilaramp.com to receive a Return Authorization number or for information on the nearest authorized repair center.