



## MAGELLAN 800

ULTRA LIGHTWEIGHT 800 WATT BASS AMPLIFIER



## OWNER'S MANUAL

**PRODUCT DESCRIPTION** – The **MAGELLAN™ 800** represents the latest generation in lightweight, high-output, versatile bass amplification. With our years of research, design and manufacturing expertise, we developed this model utilizing stringent design parameters for form, function, fit and finish. The result is an 800 watt professional high-powered tour-class bass guitar amplifier weighing only 6.25 lbs!

Our circuitry and mechanical designs within the **MAGELLAN™ 800** deliver the most powerful, feature-laden, compact bass amplifier available. This is exactly what players have come to expect from the **GENZLER™** design team -- performance, versatility and reliability. From natural, pristine, transparent reproduction of the bass instrument to classic, vintage harmonic textures with “weighted, feel to the notes”, the **MG-800** provides the tonal pallet needed to cover all of the bassist's amplifier requirements. All of which is housed in an aircraft-grade, brushed aluminum chassis with a sleek custom extruded front panel.

The **MAGELLAN™ 800** is equipped with a ¼” unbalanced instrument input, preamp stage clip detector, mute switch, input pad switch, CLEAN and DRIVE preamps, dual curve CONTOUR network, 3 band active equalization with sweepable midrange frequency, master volume control, soft-clip power management circuitry, ¼” tuner output, aux. input, effects loop, balanced direct out with ground lift/pre-post/mic-line switches, head phone output, and 2 Neutrik NL-4 “Speak-On”™ speaker jacks.

The power amp is a robust, lightweight Class D design and is supported by a state-of-the-art high frequency switch-mode power supply (SMPS), which does away with the weight of a traditional power transformer. The **MAGELLAN'S™** power supply is an auto-sensing universal power supply usable from 100-240 volts, lending itself very well to international touring players.



## FRONT PANEL

**INPUT** – The **MAGELLAN™ 800** is equipped with a standard ¼” unbalanced input. The input stage contains an FET input amp circuit with an input impedance of 1Meg ohms, a precision high order active high pass filter, and an “RFI” filter (radio frequency interference) to eliminate unwanted noise.

**MUTE SWITCH** – With this switch, you can place the amplifier (and DIRECT OUTPUT) in MUTE mode between sets, without having to change any of your amp settings. This feature can also be used for silent tuning since the TUNER OUT stays active when the MUTE is engaged. A red LED indicates when the amp is in MUTE mode.

**PAD SWITCH** – This switch provides a -8.5dB pad to reduce the amp’s input level for instruments with high or “hot” output levels. This switch does not affect the tone or input impedance in any way, only the gain of the input stage.

**CLEAN CHANNEL OVERVIEW** – This channel provides natural, pristine, transparent reproduction of the bass instrument. The circuitry consists of a FET feedback type variable gain circuit that provides wide range, continuously variable gain with minimal noise.

**CLEAN VOLUME** -- This control sets the volume level for the FET CLEAN channel of the preamp.

**CHANNEL SWITCH** -- This switch selects between the CLEAN and DRIVE channels. This is also foot switch selectable with any single button foot switch (not included). Foot switch jack is on the rear panel.

**CLIP LED** -- This LED shows the operating status of the preamp channels and EQ stages. When this LED flashes, clipping of the preamp channels or EQ stages is occurring or about to occur. Adjusting the channel VOLUME controls down or engaging the PAD switch will remove the clip condition.

**DRIVE CHANNEL OVERVIEW** – This channel is voiced to provide a more “driven” tonal signature and harmonic content along with a softer top end and more relaxed low frequency response.

**DRIVE GAIN** – Provides increased amounts of overdrive and distortion as this control is increased. This control also rolls in a pre-distortion filter that rolls off lows and highs to specifically target a band of frequencies to generate harmonics from. This helps to create a smoother sound in the low end and keeps the high end from becoming too harsh or buzzy. This circuit also emulates tube distortion and offers various stages of overdriven harmonic tonal characteristics from vintage to classic to modern.

**DRIVE VOLUME** – This control sets the volume of the preamp after the DRIVE GAIN stage but before the CONTOUR filters, EQ, and MASTER VOLUME controls. Use this control in conjunction with the DRIVE GAIN control.

**CONTOUR** -- Our unique CONTOUR circuit offers continuously variable control of 2 vastly different response curves. In either CURVE position when the SHAPE control is all the way off (CCW) the response curves are completely FLAT.

**Curve A** (Blue)

Provides a variable pre-shaped curve that boosts lows and highs while simultaneously cutting Mids. The slopes are fairly gentle which keep the tone shaping very musical. This curve covers a wide range of sounds from flat to classic to modern depending on the position of the SHAPE control.

**Curve B** (Amber)

Provides a variable pre-shaped curve with attenuated high mids and highs, a low mid bump, and a slight roll-off of the lowest bass frequencies. Again, the slopes are fairly gentle which keep the tone shaping very musical. This curve is intended to provide sounds in the range of vintage amps and vintage cabinets that do not have tweeters.

**ACTIVE EQUALIZATION** – The **MAGELLAN™ 800** contains an active 3 band equalizer with a sweepable parametric mid-range frequency control. The mid-range filter is typically (but not always) used to reduce or remove offending frequencies in the instrument, speaker cabinet, or room response; or to boost response to achieve a particular voicing. Spend some time experimenting so that the process becomes creative as well as corrective.

**Bass**

+/-15dB boost/cut shelving curve with a corner frequency of 75Hz.

**Mid Freq.**

+/-15dB boost/cut with a variable center frequency from 150Hz-3K Hz.

**Treble**

+/-15dB boost/cut shelving curve with a corner frequency of 6K Hz.

**MASTER VOLUME** – This control adjusts the overall volume of the amplifier and also adjusts the input level of the EFX LOOP RECEIVE and AUX IN jacks. Typically, best results are obtained when this control is operated between the 9:00 and 3:00 positions.

**MASTER SECTION STATUS LED --**

**BLUE** -- Indicates that the low voltage power supplies are active and that the amplifier is ON and ready to operate.

**RED** -- Indicates that the amp is in either “standby” or “protect” mode. The RED light will illuminate during power turn-on and turn-off to indicate “standby” mode. This is normal. It will also illuminate temporarily to indicate “protect” mode during any fault condition such as overheating or a short on the speaker outputs. If the MASTER LED does not eventually switch to BLUE but remains RED continuously, turn the amp off and consult a repair technician.



## REAR PANEL

**DIRECT OUTPUT** – An XLR balanced direct output is provided for connection to a PA system or directly into a recording studio console or A/D converter. The DIRECT OUTPUT signal may be switched between mic and line level, pre and post EQ, and the audio signal ground may be connected or lifted from pin 1 to eliminate hum due to ground loops. This output is fully protected against 48 volt phantom power and may be used for driving microphone lines of up to 300 feet without problems.

**TUNER OUT** – The **MAGELLAN™ 800** is equipped with a fully isolated tuner output. This jack is located after the front end scaling preamplifier but is pre-signal shape and pre-EQ. This output may also be used to drive a separate direct box or high-impedance recording device. The TUNER OUT remains active when the amplifier is muted, allowing for silent tuning on stage.

**AUX IN** – A 1/4" stereo line level auxiliary input is provided that sums directly to the main output bus controlled by the master volume control. This input is ideal for practicing with recorded tracks from a CD player, IPOD, or MP-3 player. This input is a tip-ring-sleeve type jack with built-in summing resistors that sum left and right signals when used with a stereo cable. This input will also work with a mono tip-sleeve plug. Adjust the level of the playback source to balance with the bass guitar's volume.

**EFX LOOP** – A rear panel effects loop (SEND and RECEIVE jacks) is provided for connecting "serial" outboard devices such as compressors and may also be used for parallel type outboard devices (delays, reverbs, harmonizers, octavers etc.) by using the mix control located on the outboard device. This loop is located right before the MASTER VOLUME control and is also intended as a Preamp Out / Power Amp In connection for possible "chaining" of amplifiers in a Master / Slave configuration. The effects loop contains a "normal switch" in the RECEIVE jack that interrupts the signal path when a plug is inserted into the RECEIVE jack. The SEND jack may be used for an aux. output without breaking the signal path.

**PHONES** – A 1/4" TRS jack is provided for connection to headphones for silent practice use. A speaker load is not required. Do not connect this output to anything but headphones.

**FOOT SWITCH** – This 1/4" TS connector is for connecting any single button foot switch to the **MAGELLAN™ 800** and operates the CLEAN and DRIVE channel switching on the front panel. The front panel CHANNEL switch must be in the OUT position for the foot switch to engage. (Foot switch not included.)

**POWER AMPLIFIER** – The **MAGELLAN™ 800** uses a state of the art, class D power amplifier design and a high frequency auto-sensing universal switch-mode power supply (SMPS) to achieve unprecedented high performance and lightweight packaging. There are no Voltage Switches to change or jumpers to move. This SMPS senses the line voltage

from 100-240 Volts and automatically configures itself. The correct detachable mains IEC power cable with the proper plug configuration for the voltage source and country of operation is required.

**FAN COOLING** – The chassis is cooled via a thermal sensing fan design. The fan is normally ON and will increase in speed as demand on the amp increases. **Do not obstruct the left or right chassis vents.**

**SPEAKER OUTPUTS** – The **MAGELLAN™ 800** provides two Neutrik Speak-On™ connectors (wired 1+/1-). The speaker jacks are paralleled. The minimum speaker load is 2.67 ohms. **Do not ground either the “+” or the “-” outputs.**

**IMPEDANCE SELECTOR SWITCH** -- The design of the **MAGELLAN™ 800** incorporates a robust power section along with exceptional thermal management allowing for operation down to 2.67 ohms. This gives greater versatility when connecting different speaker cabinet configurations. Set this switch as follows:

#### IMPEDANCE OPTIONS

- 4 / 8 OHM selection: 1 x 8 ohm cabinet, **OR** 2 x 8 ohm cabinets, **OR** 1 x 4 ohm cabinet.
- 2.67 OHM selection: 3 x 8 ohm cabinets, **OR** 1 x 8 ohm cabinet + 1 x 4 ohm cabinet.

**IMPORTANT** – The **IMPEDANCE SELECTOR SWITCH** position must match the total speaker impedance used.

**POWER INLET CONNECTOR AND POWER SWITCH** -- The **MAGELLAN™ 800** utilizes a rear panel power switch and power inlet connector. Use the correct mains IEC power cord required for the country where the amp is to be used. The power supply auto-senses the correct voltage from 100V to 240 volts, 50 to 60 Hz for worldwide use.

**NOTE** -- There is no externally accessible AC mains (line) fuse. The internal fuse is integral to the SMPS power supply and is not user serviceable. This fuse will not fail except under very unlikely fault conditions to the SMPS. If this occurs a qualified service technician is required to correct the problem.

**CHASSIS DESIGN** – The **MAGELLAN™ 800** utilizes the highest quality aircraft grade, computer machined, brushed aluminum chassis. To clean the amplifier, nothing more than a damp cloth and a little bit of glass cleaner (like Glass Plus®) should be used.

**GIG-BAG** – A custom padded carry bag with shoulder strap is available as an optional accessory. This padded bag is ideal for convenient carrying of the amplifier. Do not operate the amplifier inside the carry bag, as the chassis' aluminum construction and cooling fan inlet vents are part of the amplifier's cooling mechanism.

## **SPECIFICATIONS**

### **MAGELLAN™ 800**

Rated Power: 400W/8ohms; 800W/4ohms; 800W/2.67 ohms.

Minimum Impedance: 2.67 ohms

Dimensions: 3”H X 11.25”W X 10.5”D (76.2mm H x 285.75mm W x 266.7mm D)

Weight: 6.25 LBS (2.83Kg)

Product Type:	Audio Amplifier
Product Name:	<b>MAGELLAN™ 800</b>
Model Number:	MG-800 (all versions)
Operating Power Condition:	100~240V, 50/60 Hz
Effective Date:	12/15/2015

### **SAFE OPERATING REQUIREMENTS:**

- Never set an amplifier on anything that will tip over or collapse under its weight.
- Provide a minimum distance of 1 inch (25.4mm) around all sides of the amplifier for sufficient ventilation. The Ventilation should not be impeded by covering the amplifier's vent openings with items such as newspapers, tablecloths, curtains, etc.
- No naked flame sources, such as lighted candles, should be placed on the **MAGELLAN™ 800** amplifier.
- This amplifier should not be exposed to dripping or splashing and no objects filled with liquids, such as vases or drinks, should be placed on this product.
- The **MAGELLAN™ 800** amplifier should be connected to a mains outlet (power receptacle) with a protective earth (ground) connection at all times.
- The amplifier's mains plug (power plug) is considered the disconnect device and the connection must remain accessible at all times.
- This amplifier is capable of producing sound pressure levels that may cause hearing loss.
- There are no user serviceable parts and hazardous operating voltages are present inside this unit. Always consult a qualified repair facility for service.

### **WARNING!**

- The use and operation of this device constitutes an agreement of full release of any and all liability connected with its use. Only persons familiar with the operation of high-powered professional audio equipment should attempt to operate this device.
- In addition, by use of this device, the user agrees to hold **GENZLER™ AMPLIFICATION** and its designers, sales agents and all other affiliates and related parties harmless in the event of any accident, injury, damage, or loss resulting from such use.
- Manufacturer's sole responsibility is to provide a warranty on the specified performance of the product under normal operating conditions for a period of 3 years.

### **WARRANTY:**

- **GENZLER™ AMPLIFICATION** warrants the model **MAGELLAN™ 800** to be free from defects in materials and workmanship for a period of 3 years from the date of purchase, when purchased from an authorized **GENZLER™ AMPLIFICATION** dealer.
- This warranty does not cover normal wear and tear incurred from the normal designed use of the product.
- This warranty is effective only if a copy of the original sales receipt is presented at the time of warranty service.
- All warranty service must be performed by a **GENZLER™ AMPLIFICATION** authorized service center.
- Before returning any unit for service, a returned merchandise authorization number (RMA#) must be obtained by emailing [support@genzleramps.com](mailto:support@genzleramps.com).
- This warranty is valid in the US & Canada only. For all products sold outside the USA, warranty is handled through our international dealer or distributor for each country. All warranty registration should be completed on our website. For complete warranty information visit: [www.GENZLERAMPLIFICATION.com](http://www.GENZLERAMPLIFICATION.com).

**GENZLER™ AMPLIFICATION LLC**

BROOKLYN, NY 11215 U.S.A.

Email: [info@genzleramps.com](mailto:info@genzleramps.com)

Form: MG800-OM-REV1