REDGUM Audio

E. amplifolia
Integrated Amplifier
range

Stellulata Aquilina Articulata

Owner's manual

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Why REDGUM?

The River Red Gum is Australia's most widespread and recognised tree, and it produces a wood that is truly unique. It yields the second hardest timber in the world, and this strength saw its widespread use in the railway lines that sprang up to connect the rapidly expanding colonies of early 20th century Australia. Its resistance to termites also made it the natural choice for building foundations, and to this day it continues to support some of our most historic structures.

The River Red Gum can be found on most river banks in mainland Australia, where its roots tap into water stored in the sands and its leaves provide food for the indigenous wildlife. Its presence is synonymous with the Australian outback, at once a symbol of life sustaining water and the struggle against a harsh climate. When conditions turn dry, the Red Gum will adapt by shedding huge branches from its trunk in an effort to conserve moisture. As anyone familiar with camping in the Australian bush will tell you... don't ever pitch your tent underneath a Red Gum tree!

A celebrated part of our culture, it has perhaps been made most famous through the landscape paintings of Hans Heysen and Ronald Bull.

And while Red Gum wood was in wide use throughout Australia's history, it was not until the invention of the carbide saw that it was possible to cut the wood accurately. And only then could the real beauty of this unique hardwood be unveiled.

When polished it reveals a deep red lustre, highlighted by an intertwining and tightly packed grain structure. Fine irregularities add to this beauty, and it is highly sought after as a decorative wood for these unique aesthetic properties. No two pieces of Red Gum will match exactly, and this is as it should be. Like our products, each piece is outstanding and unique.

Now that you've heard the story of the Australian River Red Gum, it's time to listen to your very own REDGUM. We've carefully selected and lovingly crafted each piece before coupling it to some of the finest audio engineering that money can buy. The results? *Stunning!*

Once heard on a REDGUM, such expectations cannot be unheard!

Unpacking

Carefully unpack and inspect your new amplifier.

In the carton there should be:

- an Owner's manual
- 2 remote control handsets, 1 as a spare
- the amplifier
- a power cord

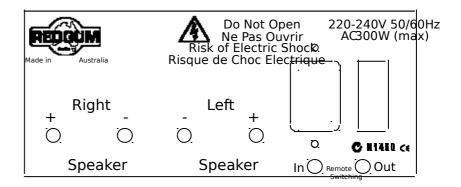
If there is any damage to the amplifier, contact your dealer immediately. It is a good idea to keep the shipping carton and packing materials, as they can be used to protect your amplifier whenever you need to move it again in the future. An illustration of how to safely repack is attached to the inside of the carton.

Connecting your amplifier to other components

For safety reasons, always ensure that your amplifier and other components are turned off and disconnected from mains power before making any connections. Failure to do so may result in an electrical shock and/or damage to your equipment.

Loudspeakers

The loudspeaker terminals at the rear of your amplifier are colour coded red (+) and black (-).



Follow the steps below to connect your amplifier to your speakers.

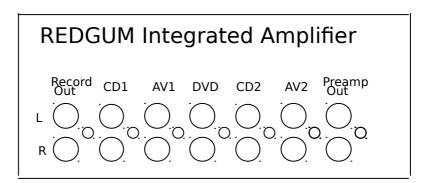
Step	Action					
1	Connect the:					
	 red (+) amplifier terminals to the respective red speaker (+) terminals; and 					
	 black (-) amplifier terminals to the respective black (-) speaker terminals. 					
	Make sure when doing this that you connect the Left/Right speakers to the Left /Right channel outputs on the amplifier.					
2	Ensure that all connections points are clean, and that all connections are secure. Check that wiring terminations look neat and that no loose strands of wires are touching any other terminals. Failure to make neat connections may result in poor sound, or amplifier damage.					



Note: We recommend using heavy gauge speaker cable for the best quality sound (the heavier, the better, and with a 2mm minimum). (e.g. REDGUM **RGAEL** - 7AWG/10mm² high Damping Factor speaker cable)

Disc Players and other components

There are five input connections at the rear of your amplifier labelled CD1, AV1, DVD, CD2 and AV2. Each of these inputs has a Left and Right channel jack, and these are colour coded white (Left channel) and red (Right channel).



Connect the output jacks of each of your components to the corresponding input jacks at the rear of the amplifier. When doing this, be careful to ensure that the correct Left/Right channel connections have been made. RCA connectors are colour coded to help you, so use the white plugs for the Left channel and the red plug for the Right channel. We recommend the use of high quality RCA interconnects wherever possible, for the best quality sound. (e.g. REDGUM's **RGAP 05 & RGAP 1**)

The amplifier inputs are all the same sensitivity, and will accept a signal from any line-level source (Media servers, Tuner, MP3, etc.). Therefore, any unused inputs may be used by other components. If you wish to connect a Turntable, you will need to purchase a separate Phono Preamplifier. REDGUM Audio produces a stand-alone Phono Preamplifier, **RGPH** models. If in any doubt, consult your dealer.

External power amplifier

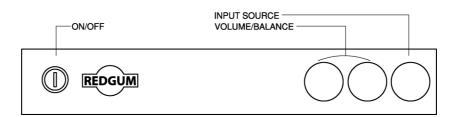
Your REDGUM amplifier comes with 'Preamp Out' sockets. This allows the amplifier's pre-amp stage to be connected to an external power amplifier if desired. To do this, connect your REDGUM amplifier's outputs marked Left/Right Pre-amp Out to the corresponding Left/Right Pre-amp Inputs on the external power amplifier using high quality RCA interconnects.

Record Out

The Record Out/Tape Out sockets allow you to record a signal coming in through any of the input sockets (for example, your CD player). This signal is unprocessed, and fed directly from the input sockets to the Record Out sockets to allow the best quality "straight through" recording. Use RCA connectors to connect the Record Out sockets to your recording device.

How to use your REDGUM amplifier

At the front of your amplifier is an on/off switch, and three controls - two rotary controls and a *fixed* input control. The switch enables the remote control data, and the controls indicate the input source, or adjust the volume, thereby achieving the Dual Mono balance. (These volume controls can still be used manually with care.)



Turning the amplifier on and off

Insert the key provided into the lock. When the key is vertical (Off), the infra-red data is locked out. To activate the remote, rotate the key clockwise a quarter turn (On).

Power-On Self-Test when power is first applied to the amplifier:

When switched on at the power point, a beep will be heard after 2 seconds, once the MEPS (Minimum Energy Performance Standards) power supply has stabilised. This is followed by a rising 'whoop' sound; a number of beeps indicating its Firmware version; if set higher than ½ way, Left then Right volume controls are 'run down' till both are set at ¼; a quick series of clicks from the Power-On Self-Test of all relays and indicating lights; concluded by a rising "ta-dah" tone, indicating that all is well. (See "Firmware" page at end of manual for a complete listing.)

N.B. For the remote control to operate, *the key* must be in the *On* position, and then Power On/Off is via the remote control handset only. (If mislaid, check in Troubleshooting.) Toggling the Amp Power button returns unit to Standby.



Note

Always make sure that the volume is turned down before turning on your amplifier, to protect your equipment.

Why do I hear sounds when turning my amplifier on and off?

Instead of a very intrusive relay in the speaker line to mask these noises, you can expect to hear sounds from your loudspeakers when turning your REDGUM amplifier on and off for a listening session. (N.B. These are different sounds to the first "boot up" cycle with the Power-On-Self Test. See "Firmware" page at end of manual.)

Usually, you will hear a slight 'pop' sound when turning on, and several low 'thunk' sounds when turning off the amplifier. These sounds are caused by electrical energy increasing and decreasing within the amplifier. They are a sign that your amplifier is operating normally, and are not a cause for concern.

More about 'thunks'

In greater detail, REDGUM amplifiers make audible 'thunks' when powered up and down, but usually only the latter ones are noticeable to people. A REDGUM amplifier has no need to mask this sound with a troublesome relay in the speaker line. In fact, customers can be reassured that this sound is a healthy sign that the amplifier is flexible enough to cope with such rapid changes in the power supply.

What actually causes the 'thunks' is best explained for the process during the powering down of a REDGUM Integrated amplifier (e.g. 60W, 120W or 200W), which has both channels run from a shared power supply. When the system is turned off, the first and weaker 'thunk' comes from both speakers together, as the power in the supply (which is common to both channels) "settles" below the voltage required for stable operation. The voltage available to the amplifier continues to fall till eventually the output stage of one of the channels goes into conduction, thus grabbing and dumping the remaining stored power into the speaker line of that channel. This dumping causes the remaining supply of power to collapse, causing the third and loudest 'thunk', but only through the channel where the power was dumped.

As a result, the second channel is left with virtually no power to access from the shared supply. Since the separate output stages of the channels have reached their critical cut-off voltages sequentially, the second channel is deprived of the power required to produce a sound of the same proportions as the loud 'thunk' from the first channel. Because of component tolerances, the final 'thunk' sound is usually heard from the same channel.

This same process occurs with REDGUM Monoblock amplifiers (>250WRMS/ch), but with both channels producing their final 'thunks', each in their own time. Each channel has its own power supply, so the fall in voltage affects only that channel, causing it to collapse as described above.

Input source selection

Select your input only via the remote control handset as the display control DOES NOT ROTATE.



Note

To protect your equipment, always check that the volume is turned down before changing the input source.

Volume and Balance control

Your REDGUM amplifier's remote control is quite unique as it uses Dual Mono volume controls.

The Left rotary control affects the volume of the Left speaker and the Right rotary control affects the volume of the Right speaker.

The actual Left-Right volume adjustment is made via the remote's Left-Right Arrow buttons. All other functions are as commonly used in remotes of all kinds, except for the "Bal" (Balance) and "Mute" buttons.

The simplest way to **alter the volume level** is **by ear rather than by eye**. Begin by setting the volume for one channel at the generally desired level. Then by focusing on the other channel, bring its volume up till the image appears central. In this way, the setting chosen has at the same time automatically adjusted for your room's acoustic.

N.B. The "**Mute**" button cuts the volume by approximately 15dB, i.e. it is a *partial rather than total Mute*. Pressing the "**Bal**" (Balance) button is the quick way to match the volume levels of both channels. This results by recalibrating the levels up to 200 times within 2 seconds to achieve +-0.1dB balance.

For greater detail about the basic functions of the Dual Mono Remote Control, please see the separate "*Firmware*" page (at end of manual).

N.B. Using the Dual Mono remote control handset, each amplifier can be personalised using REDGUM's own *Control Options* software (see *Technical Information Section* at end of manual). For example, these options provide choices of a Professional Fade, "Memory Select" of volume level previously set, and "Volume Control Movement" to help maintain the customer's balance differential intentionally set.

In addition, and for your convenience, the dual volume controls can be adjusted manually, and if wished using only one hand. Place the outer side of your hand onto the top of the two controls. With a slight downward pressure to maintain a "grip" on them, slide your hand to the left or right to adjust the volume. Just as done via the remote, further fine adjustments can be made by hand using the individual controls once the volume level and image position has been chosen.

Using your unique Dual Mono remote control



Dual Mono remote control functions

Amp Power Toggles Power On/Off from StandBy

(N.B. Key must be in the ON/"3 o'clock" position)

(Retrieves last used input from memory, then adjusts its

Volume & Balance to those stored values.)

CD1 Input 1 (sets volume & Balance to previous level used)
 AV1 Input 2 (sets volume & Balance to previous level used)
 DVD Input 3 (sets volume & Balance to previous level used)
 CD2 Input 4 (sets volume & Balance to previous level used)
 AV2 Input 5 (sets volume & Balance to previous level used)
 HT Home Theatre mode - not accessible from Stereo units

Up arrow Volume Up **Down arrow** Volume Down

Left arrow Moves Image Balance towards Left **Right arrow** Moves Image Balance towards Right

Bal To match volume levels of both channels, achieving a balance by raising the lower & lowering the higher volume controls.

(Within 2 seconds, checks & recalibrates up to 200 times to achieve 0.1dB, balance between channels.

Magic When held down, flashes red Mute light & beeps continuously indicating remote control battery level is sufficient

Mute Red light indicates volume cut by approximately 15dB. i.e. is a partial rather than total Mute

N.B. For finer control of your Menu Options (e.g. setting Professional Fade), please see the separate Menu Options Technical Information Section.

Achieving the best sound from your system

This section is provided to offer some general assistance to those seeking to get the very best performance from their system. You will be surprised by just how much improvement can be had by experimenting with a few simple factors. The following advice is based on our own years of trial and error, and we hope that checking through it makes a positive difference to the sound of your system.

Where to put your speakers

Deciding on the best placement for speakers is a very individual thing, as each of us has our own listening preferences. Try moving your speakers around while listening to some favourite tracks until you find the result which suits you best.

Distance from the surrounding walls

Placing your speakers right in the corners of the room can result in bass which sounds 'boomy' and unclear. Try to keep your speakers at least 30cm (12in) from both the rear and side walls. Bigger distances will usually bring about an additional improvement in the sound.

Distance between the speakers themselves

The correct distance between the speakers will depend on the size of your listening room, and your personal taste. Start by experimenting with the speakers from two to four metres (six to twelve feet) apart.

Distance between the speakers and the listening position

The best stereo imaging will be achieved when the listening position creates the point of a triangle, where the other two points are formed by the speakers themselves. Start with your listening position making an isosceles triangle, and experiment by moving forwards and backwards.

The angle ("toe-in") of the speakers

At REDGUM Audio we recommend a 30 degree "toe in" angle between the speakers. This provides a strong central image in Stereo, as well as suitable 'timing' to provide good rear projection for Home Theatre. You should experiment, however, to find the sound that suits you best.

Your listening room

Strange as this may sound, the room itself will have a profound affect on how your audio system responds. In fact, many experts consider the room to be as important to the sound as any other component in your system!

Did you ever notice how it's difficult to talk in some restaurants because you can't hear each other over all the other conversations going on around you? Yet another similarly sized restaurant is perfectly suited to intimate romantic murmuring. The difference lies in the surfaces around you. Here is a simple test – go into your bathroom and clap your hands; then clap them again in a room with carpet, curtains and other soft furnishings. Notice the difference? In a room with many hard reflective surfaces, sound waves bounce around a lot before dying out. Not even the most expensive stereo in the world is capable of sounding good in such a challenging acoustic environment.

When it comes to your listening room the same principles apply. Wooden floorboards, polished concrete and slate tiles are all highly reflective surfaces. In a room without curtains or other wall furnishings the sound may be overly 'bright' or aggressive.

Similarly, it is possible for a room to be too 'damped' or absorptive. Where there are no reflective surfaces at all, the sound may seem 'dead' or lacking in energy and excitement.

Luckily for us, most household rooms are a combination of the two. And, generally speaking, a combination of the two will bring about the best results.

Too many hard surfaces?

If your room is too 'bright', try placing a large rug on the floor between your listening position and the speakers. Or hang some soft furnishings from the walls.

Too many soft surfaces?

If your room is too damped, try removing some of the soft furnishings from the walls or rugs from the floor.

Managing the bass

Sometimes, low frequency waves can also bounce around and cause problems in a listening environment. This may be the result of the shape of the room, or the materials it is constructed from. Large pieces of furniture in a room can often help to break up these 'standing waves'.

While few of us will feel the need to totally redesign a room to improve its sonic properties, sometimes a small change, like placing a rug on the floor, can make a big improvement to the sound.

Other helpful hints

Corrosion and sound system terminals

Atmospheric corrosion can build up on speaker cable and interconnect terminals over time. Should this occur, removing and re-inserting wires and cables will improve the contact and hence the quality of signal transmission. Always remember to turn off all equipment before connecting or disconnecting any wires or cables.

Doing it annually, at the very least, make it your New Year's Resolution.

Placement of components in your sound system

Lots of fresh air is important to the health of your electronics. The louder you play your music, the more important it is to ensure that components receive adequate ventilation. Amplifiers, in particular, will generate a lot of heat. Placing the amplifier at the top of the stack, and ensuring adequate ventilation, will help to ensure that the heat can be dissipated as it should.

Ably assisting in this is REDGUM's SignWave heat sink. Though being placed underneath the product may seem counter-intuitive to promoting effective convection currents, this is balanced out by its immense thermal mass combined with not using deep fins that would trap too much heat.

Troubleshooting

The following troubleshooting guide is designed to assist you in identifying and rectifying any problems you may experience with your speakers.

Symptom	Likely cause	Recommended action	
No sound	The amplifier is not turned on, or is not connected to the power outlet	Check that the amplifier is plugged into the power outlet, and turned on	
The sound of a particular input source is not heard	Improper connections. Otherwise, check Mute button status.	Make sure that the external component is connected correctly	
Stereo image is vague/bass response is lacking	Speakers out of phase	Check that the correct + to + and - to - connections have been made between the amplifier and your speakers	
Buzzing or crackling sound when connecting wires	Equipment is turned on	Turn off all equipment before making any cable connections	
Distortion at low volumes	Speaker wires are touching each other, or another terminal, and shorting the signal	Ensure that all cable connections are clean with no loose wires	
	Amplifier is damaged	Check/repair amplifier	
Distortion at high volumes	Amplifier is overloaded	Turn down the volume to avoid damage to your speakers and amplifier	

If the problem cannot be resolved by any of these recommended actions you should make certain that the problem lies with the amplifier, as malfunction within other components may also be the cause of the symptoms. You can do this by borrowing a CD player and speakers that you are certain are working, and replace your normal components with these to test the amplifier in isolation. If the problem persists, please see your local REDGUM Audio dealer.

Stand-by Power consumption

Should I leave my amplifier powered on all the time, or is it better to turn it off at the power point after each listening session? There is no technical basis to insist on either action. But from a power consumption point of view, it is worth noting that since 2008, all REDGUM amplifiers have used a StandBy power system incorporating a highly efficient miniature power supply that powers a microprocessor using 'nanowatt' technology. In the worst case scenario (when voltage variations are at their greatest), it uses 0.25W. More typically, the **StandBy power is 0.1W. To achieve StandBy, toggle Amp Power button on remote control.**

Lost key

Lost keys can be replaced, as information is kept on file at the REDGUM factory about every product we manufacture. If you provide us with the Serial Number of your product (look under the amplifier, on the carton, or on the final test report included in the product manual), we can provide you with another key. Just contact the factory with the details and a replacement key will be posted next business day.

(Email lostkey@redgumaudio.com)

Remote lost, mislaid or not working

Until the remote handset (or a new battery) is found, your amplifier can still be operated. For detailed instructions, see page 1 of the **Technical Information Section** at the end of the manual.

Thermal cut-off

For your convenience, there are *no* replaceable fuses in any REDGUM amplifiers. Rather than the typical 'one shot' thermal fuses widely used, the only internal overload device in your amplifier is a thermal sensor. It will shut down the amplifier if the heat sink reaches the hot-to-touch temperature of approx 60°C (140°F). This would usually only happen if the speaker leads remain 'shorted' for a period of time.

The warning of such an event is given by the behaviour of the blue power-on indicator light seen down through the SignWave heat sink base).

Near thermal cut-off: The amplifier's blue power-on indicator light will start to flash at 50°C (122°F), indicating the temperature is rising. Starting slowly, the frequency of flashes increases as the temperature approaches thermal cut-off as set at 60°C (140°F) approx.

After thermal cut-off: The cause of the shut down is verified by a repeating sequence of **flashes+beeps**.

A sequence of 4 **flashes+beeps** repeated every 4 seconds indicates you should power down the amplifier. Once the amplifier has returned to a safe operating temperature, its operation can be resumed by using the remote hanset to power-off then power-on the amplifier.

A sequence of **5 flashes+beeps** repeated every 5 seconds indicates that the thermal sensor is not able to reset itself, and that you should contact your local REDGUM dealer for a service call.

Circuit breaker rocker switch

Additional protection for your equipment is built into all REDGUM amplifiers in the form of a Circuit Breaker. Found on the rear panel of the chassis, it is a red **rocker switch** with **RESET** and **OFF** positions.

In the (unlikely) event of a power overload or an internal malfunction, the Circuit Breaker on the rear will activate ('trip'). The switch will automatically rock to the OFF position, and a **red light** will show from within the rocker.

In the case of a power overload, rocking the switch to the RESET position will turn on your amplifier again. Once reset, the red light will turn off and if a manual unit, you will hear a 'thunk' sound as the amplifier powers up. The full Power-Up Self-test "boot up" cycle of sounds and actions will start (see section - Turning the amplifier on and off)

However, in the event of an internal malfunction, resetting the switch will not be possible. When the switch is rocked to the RESET position, it will instantly flick back to the OFF position, and the red light will stay 'on'. Should this occur, the amplifier will need professional service.

If in any doubt whatsoever, please consult your local REDGUM dealer.

Not enough volume?

If you have pressed the Up/Down Volume buttons on your remote handset, but the resultant change in volume does not match previous adjustments, consider whether the amplifier's volume is already set to "Mute".

A quick visual check of the Input Selector display (right hand control) will indicate your current setting. If the "Mute" is On, a very bright red LED will be seen at the bottom centre of the display. If the "Mute" is Off, no light is visible in this position.

REDGUM has chosen a *partial rather than total Mute* as a matter of convenience. This allows the listener/viewer to quickly attain background music levels whilst talking, or hear the sound clues of a TV programme returning without needing to watch a silent screen throughout an ad break.

N.B. The "Mute" button cuts the volume by approximately 15dB.

Is my Remote battery working?

If you suspect that the battery in your remote control is due for replacement, a quick test using the "Magic" button on your handset will give you an indication of its condition. Your amplifier *must* be powered on, but need not be running for the test.

Hold the "Magic" button down while looking at the Input Selector display. With a healthy battery, the "Mute" indicator (the very bright red LED at the bottom centre) should flash and click continuously as long as the button is held down. If this is not the result, replace the battery.

Specifications

Stellulata

(Dual Mono Remote Control, SignWave heat sink))

Power Output: 60+60 Watt/Ch RMS

(Transient 140 +140 WRMS)
Harmonic Distortion: 0.009% (below clipping)
Intermodulation Distortion: < 0.005% (below clipping)

Signal to Noise: > 100dB

Input Impedance: 10K (Matches 600 ohms – 50K) Frequency Response: 0.8Hz – 80KHz (-3dB points)

Peak Current: > 120 amp

Audio Inputs: 5 inputs:- CD1, AV1, DVD, CD2 & AV2

Suggested Speakers: REDGUM RGS Manna

Cabinet Finish: 1.6mm/ 1/16th inch steel chassis Dimensions: 420mm (W) x 360mm (D) x 93mm (H)

16.5in (W) x 14.2in (D) x 3.7in (H)

Shipping weight: 9.5 kg/21lb (8.2 kg cubic)

Aquilina

(Dual Mono Remote Control, SignWave heat sink))

Power Output: 120+120 Watt/Ch RMS

(Transient 265 +265 WRMS)
Harmonic Distortion: 0.009% (below clipping)
Intermodulation Distortion: < 0.005% (below clipping)

Signal to Noise: > 100dB

Input Impedance: 10K (Matches 600 ohms – 50K) Frequency Response: 0.8Hz – 80KHz (-3dB points)

Peak Current: > 150 amp

Audio Inputs: 5 inputs:- CD1, AV1, DVD, CD2 & AV2
Suggested Speakers: REDGUM RGS Manna or RGS Lucens
Cabinet Finish: 1.6mm/ 1/16th inch steel chassis
Dimensions: 420mm (W) x 360mm (D) x 93mm (H)
16.5in (W) x 14.2in (D) x 3.7in (H)

Shipping weight: 10 kg/22lb (8.2 kg cubic)

Articulata

(Dual Mono Remote Control, SignWave heat sink)

Power Output: 200+200 Watt/Ch RMS

(Transient 320 +320 WRMS)
Harmonic Distortion: 0.009% (below clipping)
Intermodulation Distortion: < 0.005% (below clipping)

Signal to Noise: > 100dB

Input Impedance: 10K (Matches 600 ohms – 50K) Frequency Response: 0.8Hz – 80KHz (-3dB points)

Peak Current: > 150 amp

Audio Inputs: 5 inputs:- CD1, AV1, DVD, CD2 & AV2
Suggested Speakers: REDGUM RGS Lucens or RGS Regnans
Cabinet Finish: solid Red Gum wood fascia, EDP-coated

2mm/ 5/64th inch steel chassis

Dimensions: 420mm (W) x 360mm (D) x 145mm (H)

16.5in (W) x 14.2in (D) x 5.7in (H)

Shipping weight: 19.5 kg/43lb (16.5 kg cubic)

Warranty

REDGUM amplifiers are warranted to be free of defects in material and workmanship, subject to the following conditions and limitations, for SEVEN (7) years from the date of purchase by the original owner. Warranty claims must be accompanied by proof of purchase, including date.

This warranty is subject to the following conditions and limitations. This warranty is void and inapplicable if the amplifier has:-

not been used in accordance with the instructions contained in the manual:

been subject to misuse or abuse, one example of which would be damage consistent with speaker terminals being hooked to another electrical source:

been modified, repaired or tampered with by anyone not specifically authorised in writing to do so by REDGUM or its agents:

been damaged by accident, intent, neglect or transportation.

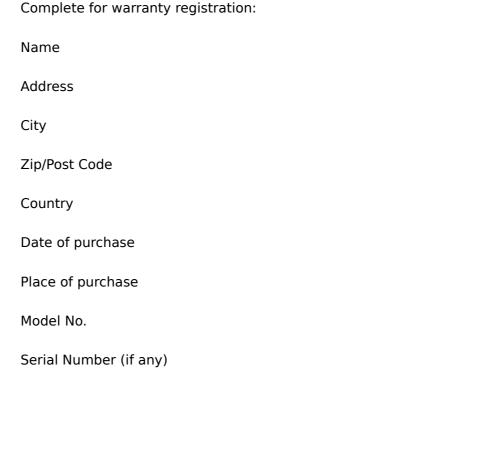
N.B. As per industry standard, fuses, lamps (LEDs) or batteries are not covered under warranty.

Should the product be faulty, the owner is liable for the cost of freight to the nearest REDGUM repair agent, or the REDGUM Audio factory. Should the product be found to be without fault, the owner will be liable for the return freight

Addendum: It should be noted that from a technical point of view, any amplifier used in a **multi-amplifier or bi/tri-wiring hook-up** is extremely likely to have its MOSFETs shorted due to mis-wiring of any part of the system during hook-up.

Thus, burnt-out MOSFETs in REDGUM amplifiers that are due to this cause are **not covered by this warranty**.

Warranty Registration



Scan and/or email the details on this page (including Serial Number) to warranty@redgumaudio.com.

(Not required for Factory Direct purchases.)

If you are not the original owner of this REDGUM product, feel free to send your unit's details to owners@redgumaudio.com so that you can be placed on the REDGUM Owner's Register. We welcome your feedback and would be happy to include you on our REDGUM Updates email list.