www.rc1.audio





# RED ALERT

\*\*\*PROVISIONAL BROCHURE\*\*\*

© RC Audio Systems Ltd 2023

Unit 25F Sunrise Business Park, Blandford Forum, Dorset DT11 8ST United Kingdom

email jon@rc1.audio

# Introducing the RED ALERT

Some DJs struggle to keep their levels "out of the red" during their sets. Often they are super focussed on performing and don't always notice when mixing in a few louder tracks that the mixer levels are creeping high into the red. By the time they notice there is already the risk of distortion, and to combat excessive levels an engineer may well have gained back the PA to compensate thereby making it difficult for the DJ to be able to just reduce back to better signal levels. This is a regular source of frustration for DJs and engineers alike, as well as a cause of many overloaded and/or distorted sound systems. Up until now there has been very little in the way of solutions to this.

The RED ALERT is a totally new type of product that is aimed at helping DJs to avoid this situation.

When the DJ mixer output goes into the red a big red lamp will flash on the RED ALERT reminding the DJ to take the level back slightly. It is just one big red unmistakeable lamp - when it flashes the DJ just needs to gain it back a bit. Simple.

If the DJ doesn't notice the lamp (or ignores it) then after it has flashed for a sustained period the RED ALERT will temporarily mute just the booth monitor output to get the DJ's attention. As soon as the level is reduced out of the red the booth monitor will become un-muted again.

There is a downlighter mounted above the RED ALERT front panel lighting up the text, so even in the dark the unit can easily be understood.

RED ALERT has proven to be an effective way of preventing DJs running their levels into the red, and is a unique solution, we do not know of any other product that is so simple and effective at solving this universal issue.



# What does it do?

The RED ALERT is inserted into the main and booth output lines from the DJ mixer.

#### • It monitors the DJ mixer main output levels

There is a preset adjustment that can be set to calibrate the RED ALERT to the required trigger threshold, typically the point at which the DJ mixer output goes into red, but the threshold can be set to suit the application.

#### When this threshold level is exceeded the red lamp will flash

The red lamp is big and bright and flashes conspicuously, so it will attract attention from the DJ and remind him to reduce the level.

## • If the level isn't soon reduced the booth monitor output will mute

If the red lamp flashes for a sustained period without the level being reduced then the RED ALERT will temporarily mute the booth monitor output from the DJ mixer to get the DJ's attention. A small indicator will also light to display this status. The main output is not affected at all, so this will not be noticeable by anyone listening to the show through the main PA. As soon as the level is reduced the red lamp will extinguish and the booth monitor output will un-mute.

### Booth monitor mute facility can be disabled

There is a key switch on the rear of the RED ALERT that can be set to enable or disable the booth monitor mute facility as required. With this facility disabled the RED ALERT will still flash the big red lamp when excessive levels are present, but will not mute any signals.

#### There is an auxiliary output contactor

There is an auxiliary contactor relay, which can be used as either normally open or normally closed, which will activate when the booth monitor mute circuit is triggered. This has various possible uses, including being able to remotely monitor any excessive level status. This contactor is not disabled by the key switch.

#### • Connections & mounting

Main inputs are on a pair of balance XLR and booth inputs are on a pair of balanced 1/4 inch jacks. These were chosen as they match the output connectors of most professional DJ mixers and also it makes it hard to confuse which signal is which.

All outputs are on balanced XLR connectors, two for main and two for booth.

Power in is via a standard IEC C14 inlet. The Auxiliary contactor has a special dedicated three pin connector.

The RED ALERT can be placed on a table or shelf in front of the DJ and has a mounting flange at each end of the base through which screws can be used to secure the unit to the table/shelf/etc.

#### Optional extras

We can provide the special three pin connector for the auxiliary relay contactor output, and can assist with technical advice on use of this output.

We can also supply blank front panel self adhesive labels which can be used to customise the message accompanying the big red lamp.

We can supply XLR output cables with a locking XLR connector that cannot be easily removed from the RED ALERT, thereby making the unit tamper resistant and difficult to bypass without tools.

# Results of trials

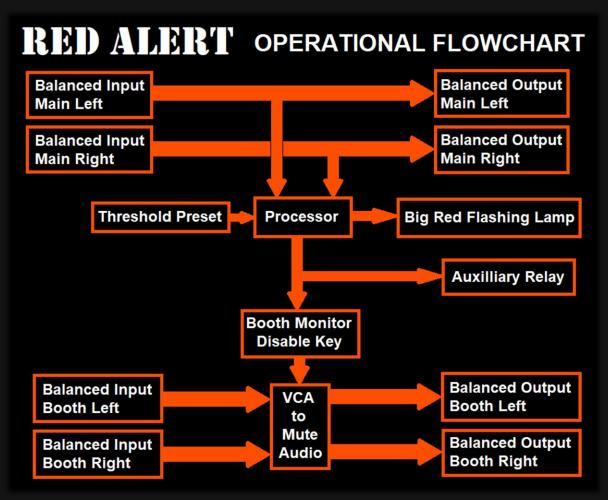
We were initially a bit sceptical that the RED ALERT might not be appreciated by DJs, but following extended trials at a top UK nightclub we can confirm that the RED ALERT was a complete success, both in terms of keeping the mixer levels out of the red, but also in that DJs actually liked the unit too.

DJs seem to appreciate that they no longer need to keep checking their levels all the time and worrying about creeping into the red - every time the RED ALERT flashes they simply need to take a little off their gain and then their output levels always remain perfect, much to the appreciation also of the venue/event engineer.

# **Technical Information**

Dimensions:	300mm wide (330 inc mounting flanges) 120mm deep and 150mm high
Power requirement:	90-264V AC, 47-63 Hz, maximum 60mA current
Stereo Audio Inputs:	Balanced XLR for main & balanced 1/4 Jack for booth, for each channel.
Stereo Audio Outputs:	Balanced XLR for both main and booth, for each channel.
Power Connection:	Standard IEC power inlet type C14
Auxiliary Contact:	SPDT relay connected to special three pin connector
Booth mute disable:	Activated by key switch on rear of unit
Display:	Excessive Signal Indicator and Booth Mute Active indicators on front panel





© RC Audio Systems Ltd 2023 - email jon@rc1.audio