

251

POWERED ZONE CONTROLLER



OVERVIEW

Designed for in-room and in-rack systems, the 251 Powered Zone Controller contains all the functionality needed to create a great sounding and flexible Hi-Res Audio zone.

With two powerful, cool-running channels of on-board amplification, the Meridian 251 can comfortably drive a pair of loudspeakers or a sound bar with our trade mark fidelity and high resolution performance. With a pair of analogue outputs, you can also run a 2.1 system with a separate subwoofer.

With both digital and analogue inputs, the MQA-enabled Meridian 251 is a hub for distributed audio applications from simple single zone to whole-house distribution. Featuring IP and IR control, this versatile 1U, half-width unit can be easily installed behind a TV or in a rack.

Simple web-based setup page makes for easy, repeatable and quick configuration. Our 251 is also an endpoint for Roon, the high-quality streaming service.

PRODUCT HIGHLIGHTS

- 2 x 100W per channel into 4 Ohms (2 x 65W per channel into 8 Ohms), cool-running amplifiers with a high peak output current capability to drive difficult loads and 40kHz true Hi-Res bandwidth.
- Mounted in a half-width, 1U tall Aluminium enclosure and available with an optional rack-mount kit or VESA mount bracket, the 251 has multiple installation applications.
- Endpoint for Roon, the high-quality streaming service.

- Built-in MQA decoder, the Meridian 251 fully supports Master Quality Authenticated encoded music playback, guaranteeing a studio master quality experience.
- IP Control allows for seamless integration and flexibility within the home.
- Also includes digital and analogue inputs and line-level analogue outputs.
- Made in Britain and backed by our 5 year warranty.

USER FEATURES

- A significant number of control options are provided on the Meridian 251 Powered Zone Controller, including IP control, native iPad network control app, IR and third party control.
- In addition, the unit's front panel features multiple LEDs to indicate source selection, including one that signals MQA playback
- Configuration via in-built webpage to select all installation options.

TECHNOLOGIES

LIP SYNC

Video processing typically delays the picture. For installations where the audio and video are separated before video processing, the Meridian 251 has adjustable 80ms audio delay to realign the audio with the video.

FIFO RECLOCKING

Clock variations, known as jitter, are one the main causes of unpleasant “glare” in digital audio systems. The Meridian 251 solves this problem with our proprietary jitter reduction technique using a FIFO (first-in first-out) buffer that allows an independent output clock to deliver clock performance that does not rely upon on the incoming signal quality.

DSP UPSAMPLING AND APODISING FILTERS

Almost all audio has been digitally processed, even if it arrives at the Meridian 251 in analogue form. Upsampling allows the Meridian 251's DACs to run at a higher sample rate and achieve their full potential. Upsampling also provides the opportunity to apply apodising correction to ameliorate time-domain errors that have been introduced to the signal by the ADCs or other upstream processing.

MQA

Master Quality Authenticated (MQA) is a revolutionary end-to-end technology that delivers master quality audio in a file that's small enough to stream or download.



REAR PANEL LAYOUT

SPECIFICATION

AUDIO OUTPUTS	<ul style="list-style-type: none"> • Speaker outputs on Phoenix connectors • 24-12 AWG Compatible • 2 x 100w into 4Ω nominal load (2 x 65w into 8Ω) • 40kHz Bandwidth • 2-channel line-level analogue output on RCA phono connectors • Twin 192kHz 24-bit DACs
AUDIO INPUTS	<ul style="list-style-type: none"> • One 2-channel digital coaxial S/PDIF input. 44.1kHz to 192kHz sampling and up to 24-bit • One 2-channel Meridian SpeakerLink input. 44.1kHz to 192kHz sampling and up to 24-bit • One 2-channel digital optical TOSLINK input. 44.1kHz to 96kHz sampling and up to 24-bit • One 2-channel analogue input on RCA phono connectors • One network input (Ethernet) for use with Roon system or third-party control interface
CONTROL SIGNALS	<ul style="list-style-type: none"> • IP Control • IR on 3.5mm jack • Meridian Comms
DISPLAY	<ul style="list-style-type: none"> • LEDs to indicate source selection and MQA status
POWER	<ul style="list-style-type: none"> • Advanced linear power supply: 110–120V ac 50–60Hz 220-240V ac 50-60Hz
DIMENSIONS	<ul style="list-style-type: none"> • HEIGHT: 42mm (without feet) • WIDTH: 203mm • DEPTH: 221mm (226mm inc. connectors) • WEIGHT: 2.5kg (5.5kg)
PACKED DIMENSIONS	<ul style="list-style-type: none"> • HEIGHT: 100mm (3.9in) • WIDTH: 260mm (10.2in) • DEPTH: 340mm(13.4in) • PACKED WEIGHT: 3.0kg (6.6lbs)
RACK-MOUNTING	<ul style="list-style-type: none"> • 1U tall rack kit available with space for two units • Optional VESA mount brackets