

RIDEplayer™

Rugged On-Board Audio Player
Model RIDEPLAYER



ONBOARD AUDIO

RidePlayer™ provides an elegant solution to many of the unique challenges encountered with implementing vehicle-based (“on-board”) audio and show control for themed attractions.

FEATURES:

- ▶ No Moving Parts
- ▶ Compact Size
- ▶ Syncs w/off-board AV
- ▶ Built-in Control
- ▶ Seamless interface w/PLCs, animation control +
- ▶ Built-in advanced DSP
- ▶ Built-in 25Wx16 (bridgeable to 50W) amplifier
- ▶ Vibration-Resistant Design

APPLICATIONS:

- ▶ Theme Park Ride Vehicles
- ▶ Transportation Systems
- ▶ Parades

The most significant of those challenges is the ability to precisely synchronize on-board audio with wayside audio, video, lighting, animatronics, etc. RidePlayer accomplishes this by providing a state-of-the-art synchronization system that can use one of several methods to maintain lock between on-board and wayside systems. Those methods include GPS (which can be distributed with repeaters for indoor applications), SMPTE (which can be transmitted wirelessly), Video Genlock, and IEEE-1588 (CIP Sync).

Another significant challenge is the ability to trigger and monitor important sub-systems like animation controllers, PLCs, RFID scanners, and other miscellaneous equipment. RidePlayer overcomes this challenge by integrating the power of Alcorn McBride V-Series control into the same hardware platform. This means the capability to interface to just about any device including PLCs, animation controllers, sensors, lighting systems, video servers, and our ShowTouch panels.

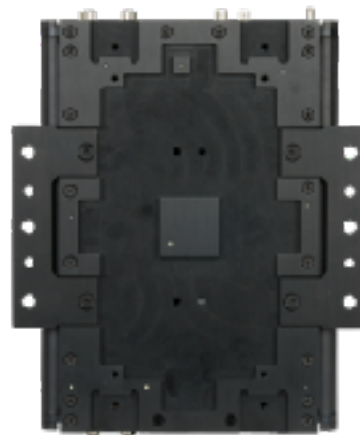
Of course, the primary purpose of this device is to provide high-quality audio playback so it has a wide-range of features to suit that requirement well. It will be capable of sourcing up to 16 outputs of 24-bit 96kHz uncompressed audio with the ability to route, mix, and crossfade between tracks. At 24-bit 96kHz, each output will have up to 4 layers of polyphonic playback capability.



Audio Connectors



Network Connectors



Mounting Brackets



RIDEplayer™

Rugged On-Board Audio Player
Model RIDEPLAYER



ONBOARD AUDIO

PRODUCT SPECIFICATIONS

CONTROL	
Show Control	Timeline Programming ShowTouch Touch Panel Integration PLC Integration Device Control
Display	42x8 character, user-programmable OLED w/navigation buttons
LED Indicators	Power, Sync, LTC, Live Mode, Serial, Ethernet, Inputs, Outputs, Audio Output Status
Ethernet	Primary - 10/100/100BT (M12 X-Coded)/Secondary - 10/100BT (M12 X-Coded)
Serial	2 x RS232/RS422 (12-pin Molex)
Digital Inputs	8 x Contact/Voltage (5-24VDC) Inputs (16-pin Molex)/1.2k Input Impedance (Voltage Mode)
Digital Outputs	4 x Dry-contact Relay Output w/900mA self-healing fuses (8-pin Molex)
Analog Inputs	1xPower Supply Voltage-Sense 0-28VDC (Internal)/ 1xGen Purpose 0-10VDC (4-pin Molex)
Show Memory	Removable SD card w/Captive Socket
AUDIO	
Playback	64 sources - 16 output channels x 4 layers of polyphony per channel 16-bit or 24 bit WAV 44.1kHz, 48kHz, *96kHz (*network audio only)
DSP	9-band Parametric EQ High-Pass, Low-Pass, Notch Filters Phase Shift/Treble Shelf, Bass Shelf Delay
Line Outputs	16 x unbalanced outputs (4 x 8-pin Molex) -17dBV (with 24VDC power)
Amplifier	16 x 25W (bridgeable to 50W) (2 x 16-pin Molex)
Network Audio	16 x 16 AES67/Dante Interface - (2x M12 X-Coded for Primary and Secondary)
Mic Input	16 x 16 AES67/Dante Interface - (2x M12 X-Coded for Primary and Secondary)
Media	128GB M.2 SSD (Internal)
SYNCHRONIZATION	
Sync Inputs	GPS In (Serial Port - 12-pin Molex) PTP In - IEEE1388/CIP-Sync (Primary Control Port - M12 X-Coded) NTP In (Primary Control Port - M12 X-Coded) Genlock In - Blackburst, C-Sync, Trv-Level (BNC) SMPTE LTC In (6-pin Molex)
Sync Outputs	PTP Out - IEEE1388/CIP-Sync (Primary Control Port - M12 X-Coded) NTP Out (Primary Control Port - M12 X-Coded) Genlock Out - Blackburst, C-Sync, Trv-Level (BNC) SMPTE LTC Out (6-pin Molex)
Frame Rates	23.976, 24, 25, 29.97, 30, 47.952, 48, 50, 59.94, 60
GPS Types	NMEA-0183 w/PPS Clock Input
Clock Accuracy	GPS - <1uS w/ <1ppB Free-run accuracy PTP - <1uS w/ <1ppB Free-run accuracy Genlock + NTP - <1mS w/ <10ppB Free-run accuracy
PHYSICAL	
Power	9-28VDC, 24VDC @ 3A w/Amplifiers Disabled, 24VDC @ 20A w/Amplifiers Enabled, 25A Circuit Breaker
Size	9" W x 14" L x 4.25" H (229mm x 356mm x 108mm)
Weight	12lbs (5.5kg)
Environment	0°C (32°F) to 38°C (100°F)
Compliance	0-90% relative humidity, non-condensing/20 g max vibration CE, UL, SA

