MICHI

P5 Series 2

Stereo Control Amplifier
Préamplificateur Stéréo
Stereo-Vorverstärker
Preamplificador Estereofónico
Stereo-regelversterker
Preamplificatore Stereo
Stereokontrollförstärkare
Предварительный стерео усилитель

Owner's Manual
Manuel de l'utilisateur
Bedienungsanleitung
Manual de Instrucciones
Gebruikershandleiding
Manuale di istruzioni
Instruktionsbok
Инструкция пользователя

Important Safety Instructions

Notice

The RS232 connection should be handled by authorized persons only.

WARNING: There are no user serviceable parts inside. Refer all servicing to qualified service personnel.

WARNING: To reduce the risk of fire or electric shock, do not expose the unit to moisture or water. Do not expose the unit to dripping or splashing. Do not place objects filled with liquids, such as vases, on the unit. Do not allow foreign objects to get into the enclosure. If the unit is exposed to moisture, or a foreign object gets into the enclosure, immediately disconnect the power cord from the wall. Take the unit to a qualified service person for inspection and necessary repairs.

Read these instructions.

Keep these instructions.

Heed all warnings.

Follow all instructions.

Do not use this apparatus near water.

Clean only with dry cloth.

Do not block any ventilation openings. Install in accordance with the manufacturer's instructions.

Do not install near any heat sources such as radiators, heat registers, stoves, or other apparatus (including amplifiers) that produce heat.

Do not defeat the safety purpose of the polarized or grounding-type plug. A polarized plug has two blades with one wider than the other. A grounding type plug has two blades and a third grounding prong. The wide blade or the third prong are provided for your safety. If the provided plug does not fit into your outlet, consult an electrician for replacement of the obsolete outlet.

Protect the power cord from being walked on or pinched particularly at plugs, convenience receptacles, and the point where they exit from the apparatus.

Only use attachments/accessories specified by the manufacturer.

Use only with the cart, stand, tripod, bracket, or table specified by the manufacturer, or sold with the apparatus. When a cart is used, use caution when moving the cart/apparatus combination to avoid injury from tip-over.

Unplug this apparatus during lightning storms or when unused for long periods of time.

Refer all servicing to qualified service personnel. Servicing is required when the apparatus has been damaged in any way, such as power supply cord or plug is damaged, liquid has been spilled or objects have fallen into the apparatus, the

apparatus has been exposed to rain or moisture, does not operate normally, or has been dropped.

The apparatus should be used in non tropical climate.

The ventilation should not be impeded by covering the ventilation openings with items, such as newspapers, table-cloths, curtains, etc.

No naked flame sources, such as lighted candles, should be placed on the apparatus.

Touching uninsulated terminals or wiring may result in an unpleasant sensation.

You must allow a minimum 10 cm or 4 inches of unobstructed clearance around the unit.
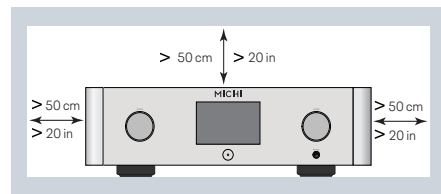
WARNING: The rear panel power cord connector is the mains power disconnect device. The device must be located in an open area that allows access to the cord connector.

The unit must be connected to a power supply only of the type and voltage specified on the rear panel. (USA: 120 V/60Hz, EC: 230V/50Hz)
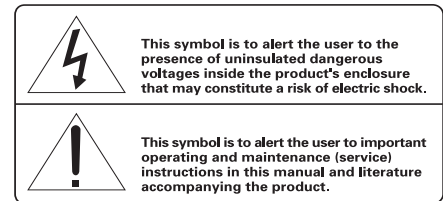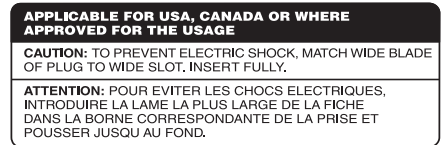
Connect the component to the power outlet only with the supplied power supply cable or an exact equivalent. Do not modify the supplied cable. Do not use extension cords.

The mains plug is the disconnect of the unit. In order to completely disconnect the unit from the supply mains, remove the main plug from the unit and the AC power outlet. This is the only way to completely remove mains power from the unit.

The batteries in the remote control should not be exposed to excessive temperature such as sunshine, fire or other heat sources. Batteries should be recycled or disposed as per state and local guidelines.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following to conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

WARNING: The master power switch is located on the rear panel. The unit must allow unobstructed access to the main power switch.

APPLICABLE FOR USA, CANADA OR WHERE APPROVED FOR THE USAGE

CAUTION: TO PREVENT ELECTRIC SHOCK, MATCH WIDE BLADE OF PLUG TO WIDE SLOT. INSERT FULLY.

ATTENTION: POUR EVITER LES CHOCS ELECTRIQUES, INTRODUIRE LA LAME LA PLUS LARGE DE LA FICHE DANS LA BORNE CORRESPONDANTE DE LA PRISE ET POUSSER JUSQU AU FOND.

This symbol is to alert the user to the presence of uninsulated dangerous voltages inside the product's enclosure that may constitute a risk of electric shock.

This symbol is to alert the user to important operating and maintenance (service) instructions in this manual and literature accompanying the product.

Michi products are designed to comply with international directives on the Restriction of Hazardous Substances (RoHS) in electrical and electronic equipment and the disposal of Waste Electrical and Electronic Equipment (WEEE). The crossed wheelie bin symbol indicates compliance and that the products must be appropriately recycled or processed in accordance with these directives.
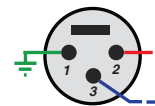
This symbol means that this unit is double insulated. An earth connection is not required.

Pin Assignments

Balanced Audio (3 pole XLR):
Pin 1: Ground / Screen
Pin 2: In phase / +ve / Hot
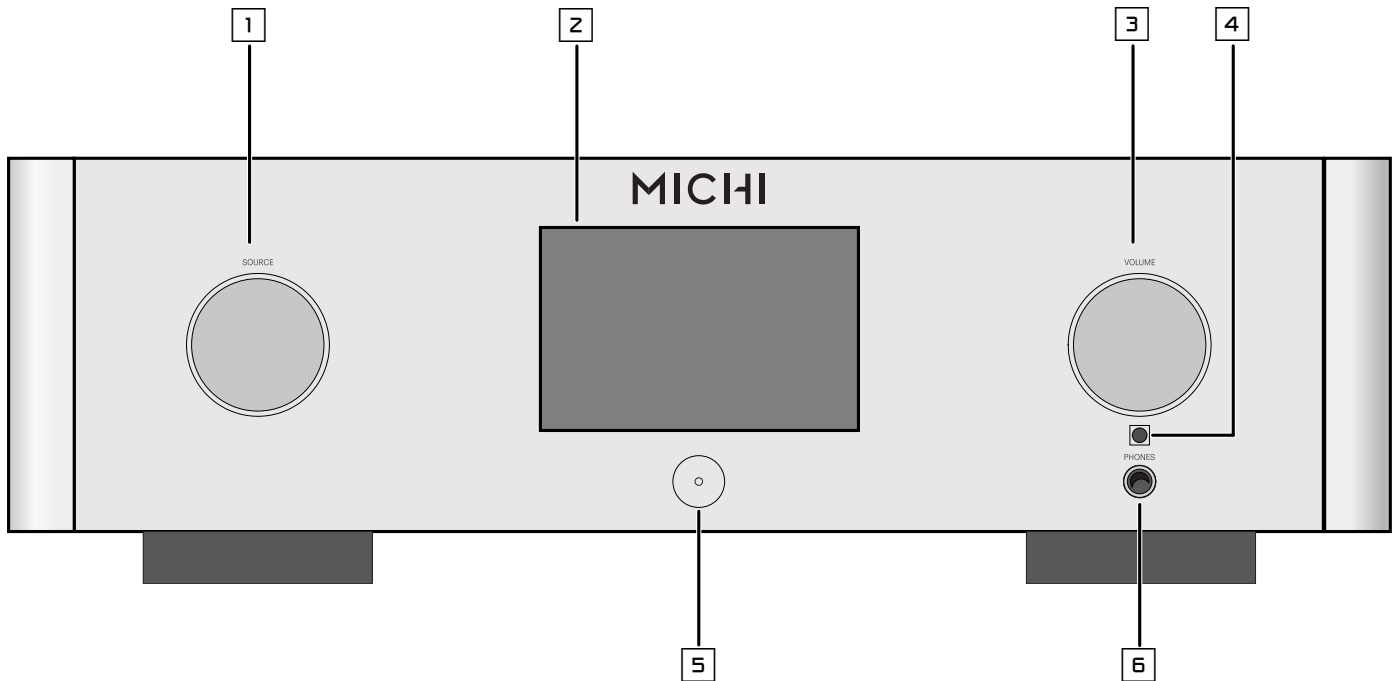Pin 3: Out of phase / -ve / Cold

AC symbol, Alternating current

Direct current

Figure 1: Controls and Connections   **Bedieningselementen en aansluitingen**
            Commandes et Branchements   **Controlli e connessioni**
            Bedienelemente und Anschlüsse **Kontroller och anslutningar**
            Controles y Conexiones   **Органы управления и разъемы**

1 : Source Knob
Selects the input signal source.

2 : Display

3 : Volume Knob
Adjust the volume output level.

4 : Remote Sensor
Receives IR commands from the remote control.

5 : Power Button
Activate the unit or put it into standby mode.

6 : Headphone Output
Connect headphones for private listening.

Figure 2: **Controls and Connections**
Commandes et Branchements
Bedienelemente und Anschlüsse
Controles y Conexiones

Bedieningselementen en aansluitingen
Controlli e connessioni
Kontroller och anslutningar
Органы управления и разъемы
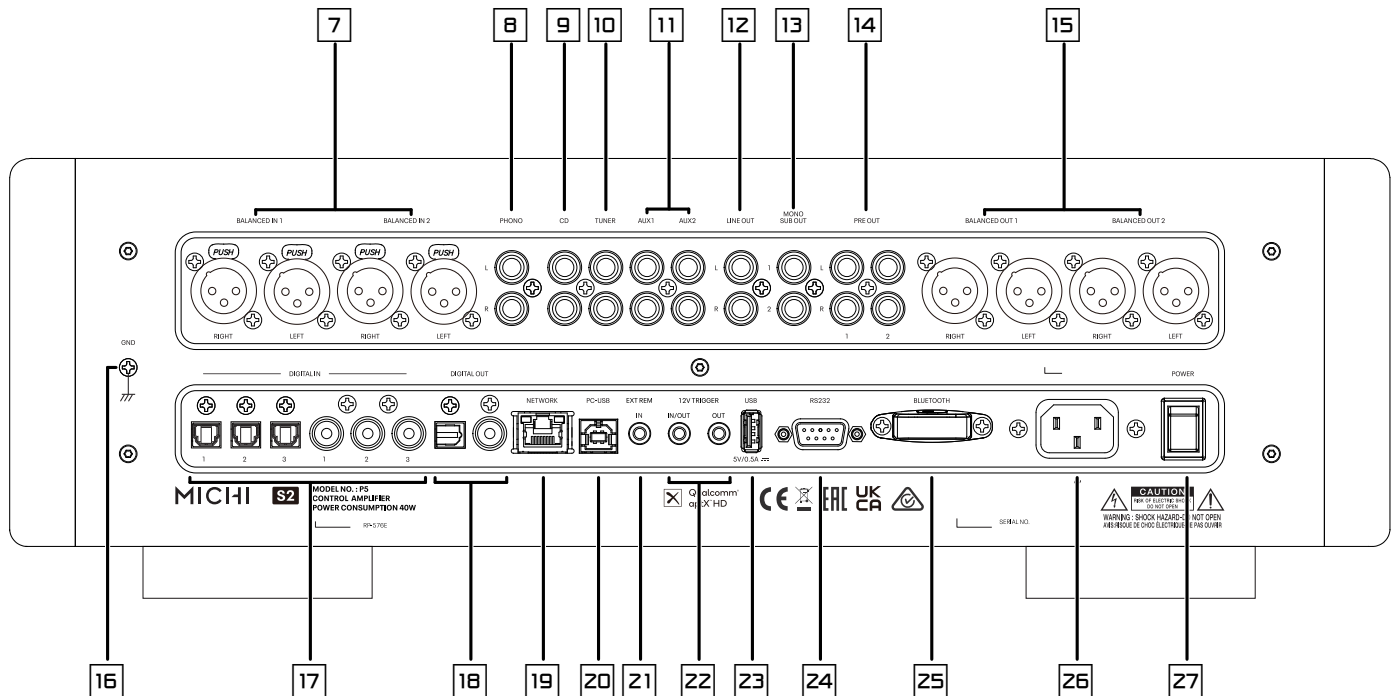
7 : Balanced (XLR) Inputs

8 :Phono Input
Connect to a turntable.

9 : CD Input
10 : Tuner Input
11 : Aux Inputs
Analog "line level" inputs.

12 : Line Out

13 : Mono Sub Output
Connect to a subwoofer.

14 : Preamplifier Output
Connect to the integrated amplifier or power
amplifier.

15 : Balanced (XLR) outputs

16 : Ground Connection (GND)
Connect with a "ground" wire from the turntable.

17 : Digital Inputs
Connect to coaxial or optical PCM outputs of your
source component.

18 : Digital outputs

19 : Network Port

20 : PC-USB Input

21 : EXT REM Input Jack
Receive command codes from industry-standard
infrared receivers via hard-wired connections.

22 : 12V Trigger Connections
Send or receive a 12V trigger signal.

23 : USB Power Port
Use for software update and powering USB devices.

24 : RS232
Use for integration with automation systems.

25 : aptX™ HD Bluetooth
Use for wireless streaming via Bluetooth.

26 : AC Power Inlet

27 : Master Power Switch

Figure 3: RR-RH6 Remote Control   **Afstandsbediening RR-RH6**
           Télécommande infrarouge RR-RH6   **Telecomando RR-RH6**
           Fernbedienung RR-RH6   **RR-RH6 fjärrkontroll**
           Mando a Distancia RR-RH6   **Пульт ДУ RR-RH6**

Ⓖ: DISPLAY Button
Dims the front display.

Ⓗ: AUDIO Button
Temporary adjustments to the
Balance, Bass and Treble settings.

Ⓚ: Enter Button
Confirm the selected and desired
settings.
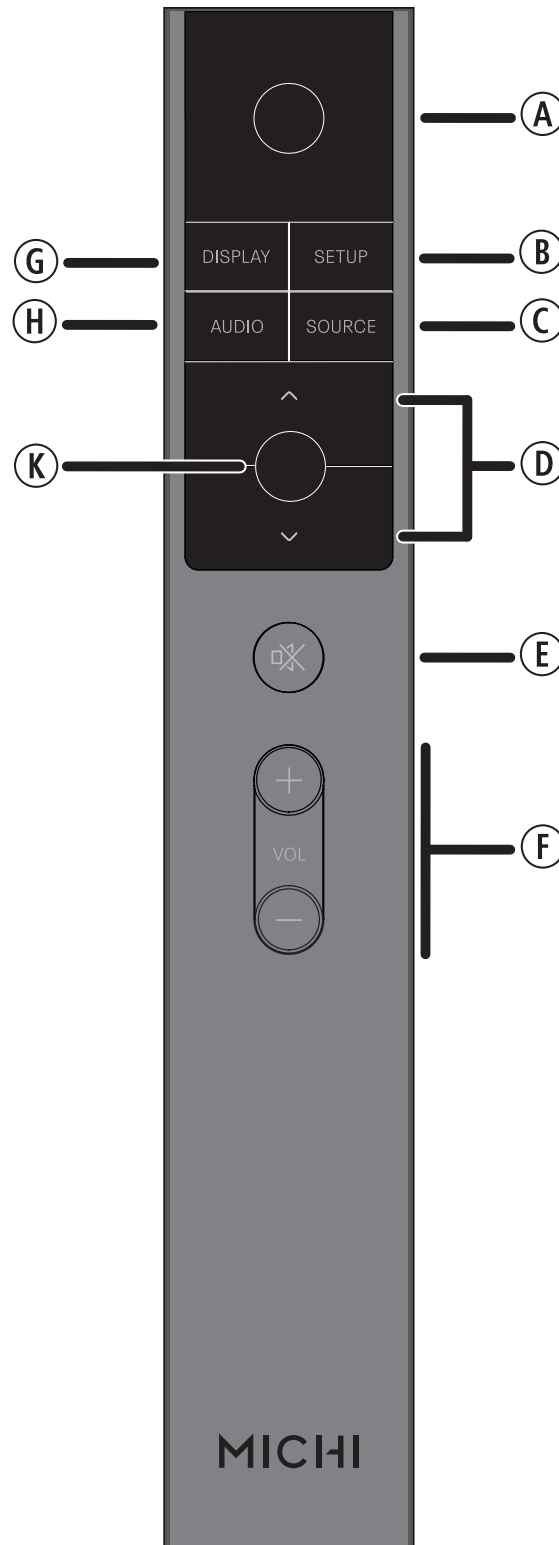
Ⓐ: Power Button
Activate the unit or put it into
standby mode.

Ⓑ: SETUP
Activates the OSD setup screen
on the front display.

Ⓒ: SOURCE
Selects the input signal source.

Ⓓ: Navigation Buttons
Access the various menus and
operate the Amplifier settings.

Ⓔ: Mute Button ⓧ
Mute the audio.

Ⓕ: Volume Buttons
Adjust the volume output level.

Figure 4: **Analog Input and Output Connections**
Branchements des entrées et sorties analogiques
Analoge Ein- und Ausgangsanschlüsse
Entradas y Salidas Analógicas
Analoge ingangen en uitgangen
Collegamenti ingressi ed uscite analogici
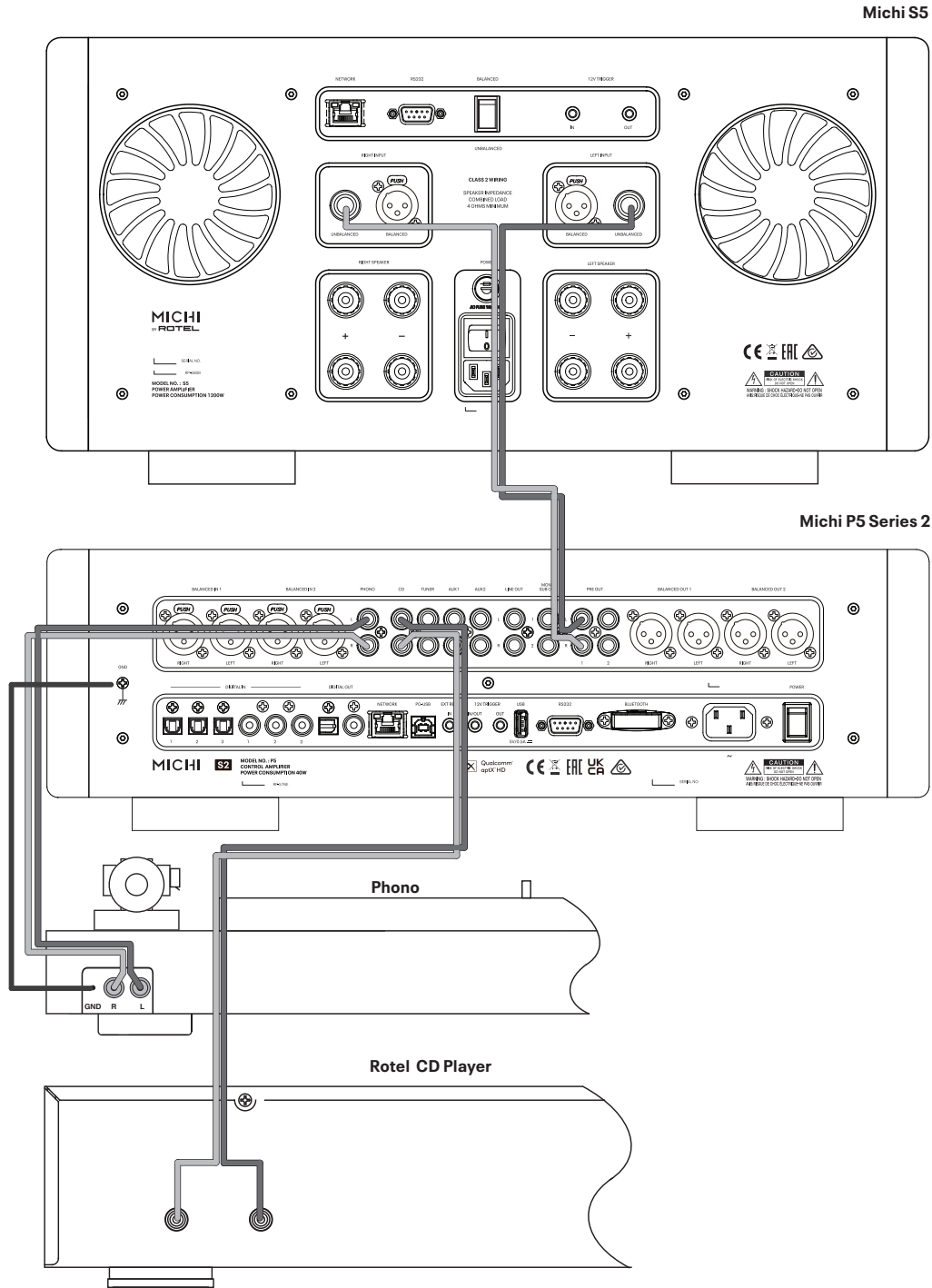**Anslutningar för analoga in- och utgångar**
Аналоговые входы и выходы

Figure 5: **Balanced (XLR) Input and Output Connections**
Branchements des entrées et sorties symétriques (XLR)
Symmetrische Ein- und Ausgangsanschlüsse (XLR)
Entradas y Salidas Balanceadas (XLR)
Gebalanceerde ingangen (XLR) en uitgangen
Collegamenti ingressi ed uscite bilanciati (XLR)
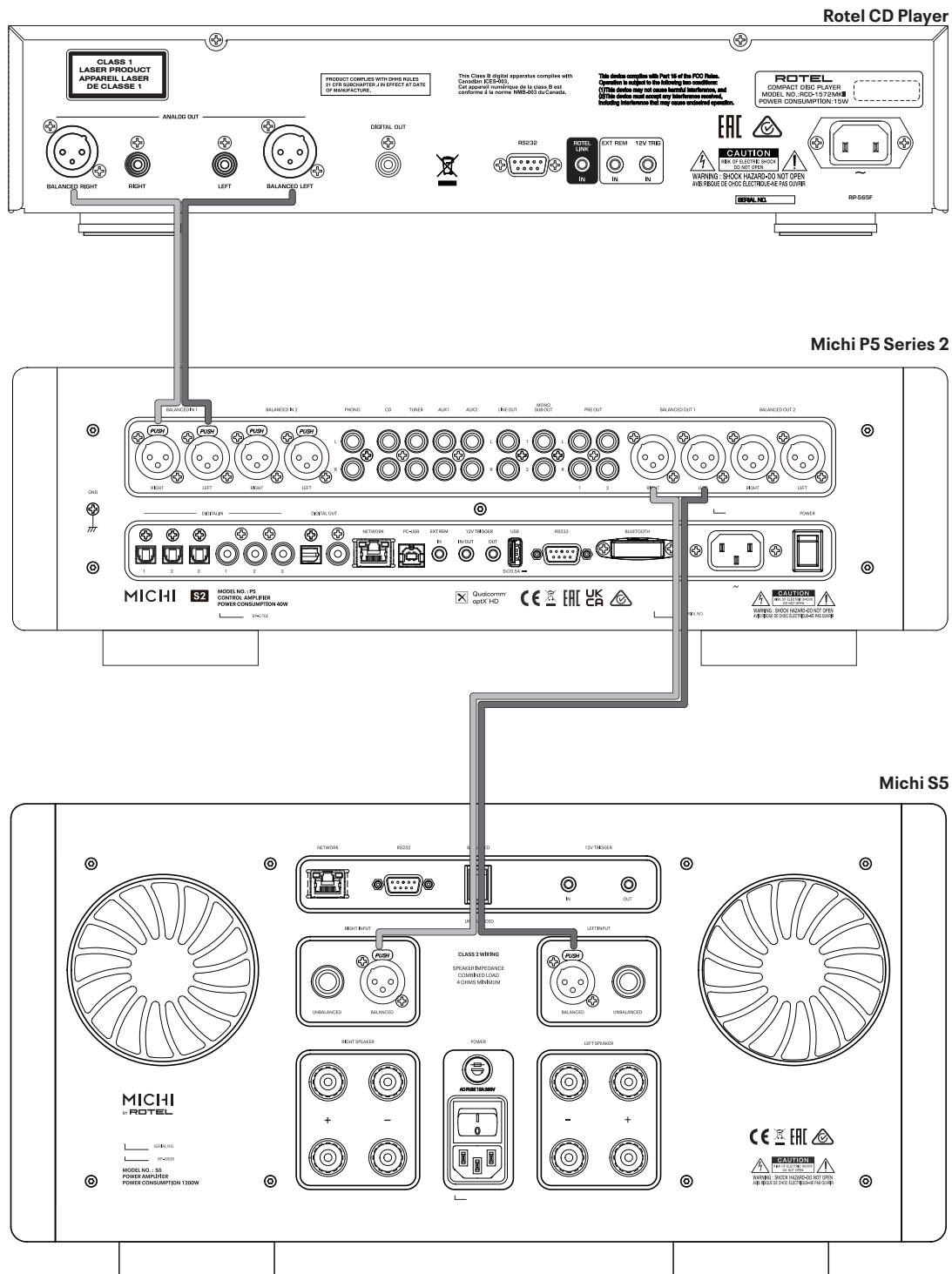**Balanserade in- och utgångar (XLR)**
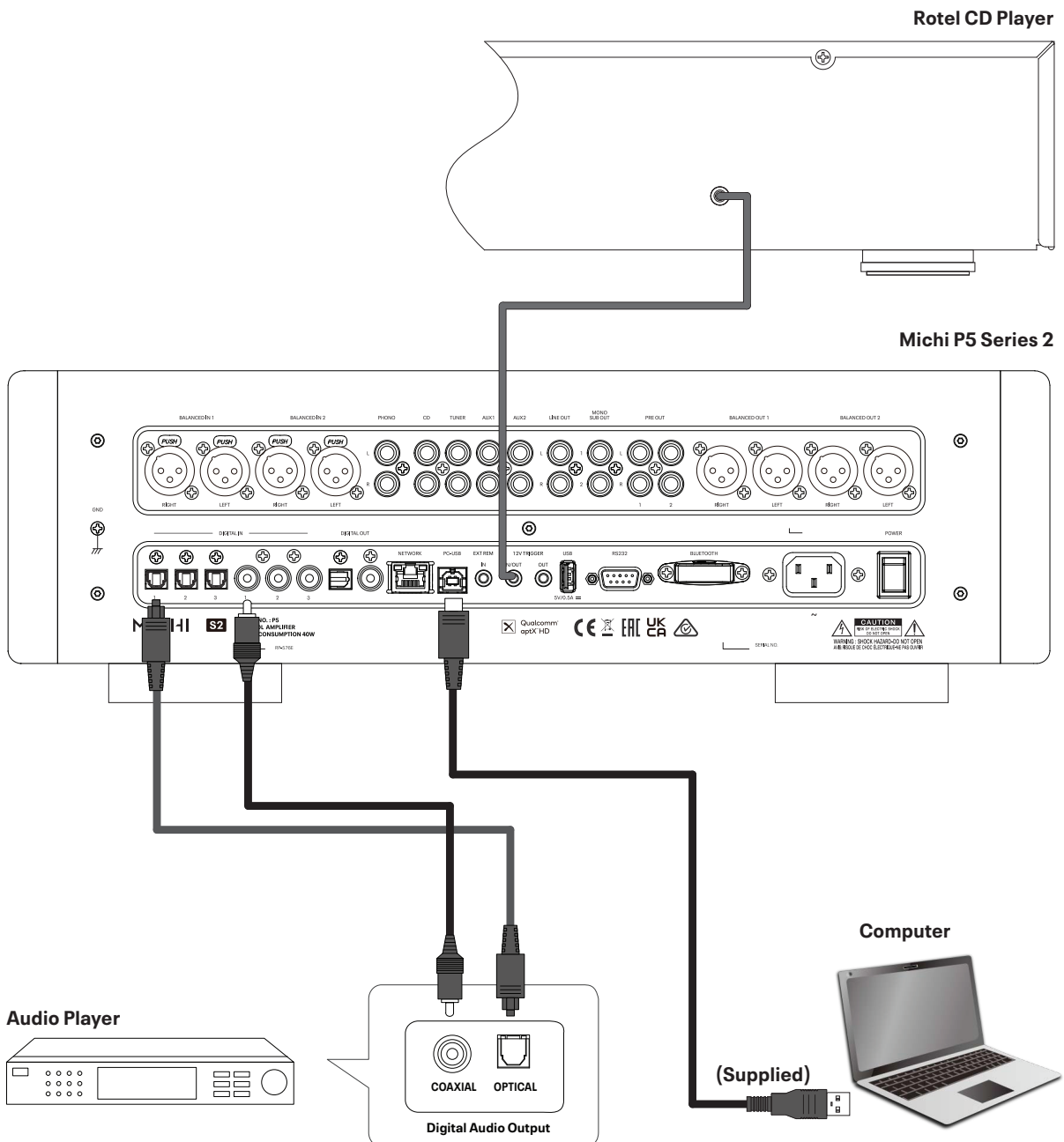**Балансные (XLR) входы и выходы**

Figure 6: **Digital Inputs and 12V Trigger**
Entrées numériques et Branchements des trigger 12 V
Digitaleingänge und 12V TRIG
Entradas Digitales y Señal de Disparo de 12V
Digitale ingangen en 12V trigger
Collegamenti ingressi digitali e segnali Trigger 12 V
Anslutningar för digitala ingångar och 12-volts styrsignaler
Цифровые входы и 12-В триггерный

Rotel CD Player

Michi P5 Series 2

Computer

(Supplied)

Audio Player

COAXIAL   OPTICAL

Digital Audio Output

Important Notes
When making connections be sure to:
✔ Turn off **all** the components in the system **before** hooking up **any** components, including loudspeakers.
✔ Turn off **all** components in the system **before** changing **any** of the connections to the system.
It is also recommended that you:
✔ Turn the volume control all the way down **before** the amplifier is turned **on or off.**

Remarques importantes
Pendant les branchements, assurez-vous que :
✔ **Tous** les maillons sont éteints **avant** leur branchement, **quels qu'ils soient**, y compris les enceintes acoustiques.
✔ Éteignez **tous** les maillons **avant** de modifier **quoi que ce soit** au niveau de leurs branchements, quels qu'ils soient.
Il est également recommandé de :
✔ Toujours baissez le niveau sonore via le contrôle de volume, **avant d'allumer ou d'éteindre** l'amplificateur.

Wichtige Hinweise
Achten Sie beim Herstellen der Verbindungen auf Folgendes:
✔ Schalten Sie **alle** Komponenten im System ab, **bevor** Sie Geräte (einschließlich Lautsprecher) anschließen.
✔ Schalten Sie **alle** Komponenten im System ab, **bevor** Sie Anschlüsse im System verändern.
Ferner empfehlen wir, dass
✔ Sie die Lautstärke herunterdrehen, **bevor** Sie die Endstufe **ein-** oder **ab**schalten.

Notas Importantes
Cuando realice las conexiones, asegúrese de que:
✔ Desactiva **todos** los componentes del equipo, cajas acústicas incluidas, **antes** de conectar **cualquier nuevo componente** en el mismo.
✔ Desactiva **todos** los componentes del equipo **antes** de cambiar **cualquier conexión del mismo.**
También le recomendamos que:
✔ Reduzca el nivel de volumen a cero **antes** de **activarlo o desactivarlo.**

Héél belangrijk
Bij het maken van de verbindingen:
✔ Zorg dat niet alleen de P5 Series 2, maar de **gehele** installatie uitstaat, als nog niet **alle** verbindingen gemaakt zijn.
✔ Zorg dat niet alleen de P5 Series 2, maar de **gehele** installatie ook uitstaat, **als** u verbindingen gaat **wijzigen.**
Wij raden u ook aan om
✔ de volumeregelaar geheel dicht te draaien (volkomen naar links) **wanneer** u uw eindversterker **aan- of uitzet.**

Note importanti
Quando effettuate i collegamenti assicuratevi di:
✔ Spegnere **tutti** i componenti del sistema **prima** di collegare **qualsiasi** componente, inclusi i diffusori.
✔ Spegnere **tutti** i componenti del sistema **prima** di modificare **qualsiasi** connessione nel sistema.
Vi raccomandiamo inoltre di:
✔ Portare il volume a zero **prima** di **accendere o spegnere** l'amplificatore.

Viktigt
Tänk på följande när du gör anslutningar:
✔ Stäng av **alla** komponenter i anläggningen **innan** du ansluter nya komponenter, inklusive högtalare.
✔ Stäng av **alla** komponenter i anläggningen **innan** du ändrar någon anslutning **i anläggningen**.
Vi rekommenderar också följande::
✔ Vrid ner volymen helt och hållet **innan** förstärkaren slås **på eller av.**

Важные замечания
Перед подсоединением:
✔ Выключите **все** компоненты, включая колонки.
✔ Выключите **все** компоненты в вашей системе, прежде чем что-то в ней **менять.**
Рекомендуется также:
✔ Вывести громкость на **минимум**, перед тем как **включать или выключать** его.

Contents

Getting Started

Thank you for purchasing the Michi P5 Series 2 Stereo Control amplifier. When used in a high-quality music audio system, your Michi product will provide years of musical enjoyment.

The unit is a full featured, high performance component. All aspects of the design have been optimized to retain the full dynamic range and subtle nuances of your music. The unit has a highly regulated power supply incorporating a Michi custom-designed toroidal power transformer and patented high effeciency slit foil capacitors. This low impedance power supply has ample power reserves, which enables the unit to easily reproduce the most demanding audio signals.

The printed circuit boards (PCB) are designed with Symmetrical Circuit Traces. This ensures that the precise timing of the music is maintained and faithfully recreated. The unit circuitry uses metal film resistors and polystyrene or polypropylene capacitors in important signal paths. All aspects of this design have been examined to ensure the most accurate music reproduction.

The main functions of the unit are easy to install and use. If you have experience with other stereo systems, you shouldn't find anything perplexing. Simply plug in the associated components and enjoy.

A Few Precautions

WARNING: *To avoid potential damage to your system, turn off ALL the components in the system when connecting or disconnecting the loudspeakers or any associated components. Do not turn the system components back on until you are sure all the connections are correct and secure. Pay particular attention to the speaker wires. There must be no loose strands that could contact the other speaker wires, or the chassis of the control amplifier.*

Please read this manual carefully. In addition to basic installation and operating instructions, it provides valuable information on various system configurations as well as general information that will help you get optimum performance from your system. Please contact your authorized Michi dealer for answers to any questions you might have. In addition, all of us at Michi welcome your questions and comments.

Save the unit shipping carton and all enclosed packing material for future use. Shipping or moving the unit in anything other than the original packing material may result in severe damage to your audio components.

If included in the box please complete the owner's registration card or register online. Also be sure to keep the original sales receipt. It is your best record of the date of purchase, which you will need in the event warranty service is ever required.

Placement

Like all audio components that handle low-level signals, the unit can be affected by its environment. Avoid placing the unit on top of other components. Also avoid routing audio signal cables near power cords. This will minimize the chance it will pick up hum or interference.

The unit is supplied with an RR-RH6 remote control and must be placed where the infrared signal from the remote can reach the front panel Remote Sensor.

Cables

Be sure to keep the power cords, digital signal cables and regular audio signal cables in your installation away from each other. This will minimize the chance

of the regular audio signal cables picking up noise or interference from the power cords or digital cables. Using only high quality, shielded cables will also help to prevent noise or interference from degrading the sound quality of your system. If you have any questions see your authorized Michi dealer for advice about the best cable to use with your system.

The RR-RH6 Remote Control

Operations with the remote control are described in this manual showing the function keys with encircled letters.

Remote Control Batteries

Two AAA size batteries must be installed before the remote control can be used. To install the batteries, follow the steps as below:

1. Lift the ribbon under the remote control and remove it out of the box.
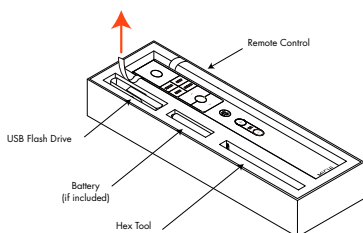
2. Remove the screw on the back of the remote using the hex tool (18x86 x3 mm Torx) provided with the remote. Use only the hex tool supplied to avoid damaging the attaching screw.
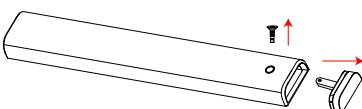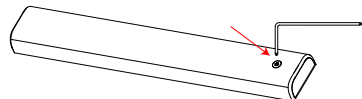
3. Install the batteries as shown in the illustration in the battery well (Figure 2). Please note there are negative and positive marks shown on the battery cover (Figure 1). Reassemble the battery cover and tighten the screw then test the control for proper operation.
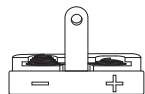

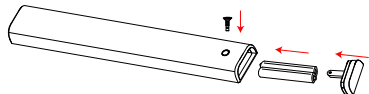| Figure 1 | Figure 2 |

When the batteries become weak the remote control won't operate the device consistently. Installing fresh batteries should eliminate the problem.

NOTE: *Use only the tool* (18x86x3 mm) *supplied with the unit to remove the screw to avoid damage to the hex screw.*

NOTE: *Do NOT over-tighten the screw to avoid damage to the screw or remote control.*

AC Power and Control

AC Power Input 　26

Your unit is configured at the factory for the proper AC line voltage in the country where you purchased it (either 120 volts AC or 230 volts AC with a line frequency of either 50 Hz or 60 Hz). The AC line configuration is noted on a decal on the back panel.

NOTE: *Should you move your unit to another country, it may be possible to reconfigure it for use on a different line voltage. Do not attempt to perform this conversion yourself. Opening the enclosure of the unit exposes you to dangerous voltages. Consult a qualified service person or the Michi factory service department for information.*

NOTE: *Some products are intended for sale in more than one country and as such are supplied with more than one AC cord. Please only use the one appropriate for your country/region.*

The unit should be plugged directly into a 3-pin polarized wall outlet. Do not use an extension cord. A heavy duty multi-tap power outlet strip may be used if it (and the wall outlet) is rated to handle the current demanded by the unit and all the other components connected to it.

If you are going to be away from home for an extended period of time such as a month long vacation, it is a sensible precaution to unplug the unit (as well as other audio and video components) while you are away.

Master Power Switch 　27

The large rocker switch on the rear panel is a master power switch. When it is in the OFF position, power to the unit is completely off. When it is in the ON position, the front panel POWER 　5　 and remote control Standby button Ⓐ can be used to activate the unit or put it into standby mode.

12V TRIGGER Connection 　22

See Figure 5
Some audio components can be turned on automatically when they receive a 12V turn on "signal". The two 12V Trigger Outputs on the unit provide the required signal. Connect compatible components to the unit with a conventional 3.5 mm mini mono plug cable. When the unit is in standby mode, the trigger signal is disabled, so the components controlled by it will be turned off.

The 12V Trigger connection labeled as IN/OUT can be configured as either a trigger INPUT or OUTPUT. When the HT BYPASS mode is enabled in the Setup Menu the IN/OUT trigger is automatically configured as a 12V Trigger Input. When this trigger input receives a HIGH signal the unit will automatically Power On and the HT Bypass Source Input (AUX1 or XLR1) will be selected. The volume level will set to a FIXED level as configured in HT BYPASS LEVEL. This option is ideal when the unit is connected to a Home Theater Receiver or Surround Processor allowing the home theater Left and Right speakers to route directly through the unit.

NOTE: *If HT BYPASS is set to DISABLED the IN/OUT 12V Trigger will be configured as an OUTPUT.*

Input Signal Connections

NOTE: *To prevent loud noises that neither you nor your speakers will appreciate, make sure the system is turned off when you make any signal connections.*

Phono Input ⑧ and Ground Connection (GND) ⑯

See Figure 3

Plug the cable from the turntable into the appropriate left and right phono inputs. If the turntable has a "ground" wire, connect it to the screw terminal to the left of the Phono inputs. This will help prevent hum and noise.

Line Level Inputs ⑨ ⑩ ⑪

See Figure 3

The CD, Tuner, and Aux inputs of the control amplifier are analog "line level" inputs. These inputs are for connecting components such as CD players or other audio playback devices with an analog audio output.

The left and right channels are clearly labeled and should be connected to the corresponding channels of the source component. The Left connectors are white, the Right connectors are red. Use high quality RCA cables for connecting input source components to the unit. Ask your authorized Michi dealer for advice about cables.

Balanced (XLR) Inputs ⑦

See Figure 4

Two pairs of balanced XLR inputs accept audio signals from CD player, Blu-ray player or other source components with XLR outputs.

NOTE: You should choose only one method of analog connection from a source component to unit. Do not connect both the RCA and XLR outputs of a source component to the unit at the same time.

Digital Inputs ⑰

See Figure 5

There are three sets of digital inputs labeled 1, 2 and 3, for COAXIAL and OPTICAL respectively. Connect the COAXIAL or OPTICAL PCM outputs of your source component into these sockets. The digital signals will be decoded and played by the unit. The unit is capable of decoding PCM signals up to 24 bit, 192kHz.

Output Connections

Line Output ⑫

The line output connectors can be used to send the analog audio to a separate processor device. These outputs bypass the volume encoder and are full line level output. They should be connected to the analog inputs of the processor. As with other sources be sure to connect the Left and Right channels of each device to the proper channels on the associated components. Use high quality connecting cables to prevent loss of sound quality.

MONO SUB Output ⑬

There are 2 connectors for mono subwoofer output to connect to a subwoofer. These mono outputs are summed with both the left and right audio signal. They are parallel outputs allowing 2 subwoofers to be connected to the unit.

Preamp Output ⑭

See Figure 3

The RCA-type output connectors are compatible with most power control amplifiers. As always, select high quality audio interconnect cables. Connect the left and right channel outputs of the unit to the corresponding inputs on the amplifier or other component.

NOTE: There are two sets of RCA outputs on the unit. The second set of outputs may be used in custom system configurations to drive a second power amplifier or to supply a signal to a special signal processor.

Balanced (XLR) Output ⑮

See Figure 4

Two pairs of XLR balanced connectors supply an analog output signal from the unit to a power amplifier with XLR balanced input connectors.

NOTE: Do not connect both the RCA and XLR to the same control amplifier at the same time.

Digital output ⑱

If you are using an outboard D/A converter or other digital processor, you will need an unprocessed digital data stream from the unit. Using a standard 75 ohm coax/optical digital cable, connect the unit's digital output to the digital input connector on the outboard D/A converter.

Headphone Output ⑥

The headphone output allows you to connect headphones for private listening. This output accepts a standard 6.3 mm (1/4") stereo headphone connector. Plugging in a set of headphones does not cut off the signal to the preamp outputs. In most instances you should turn off the power control amplifier when listening to headphones.

NOTE: Because the sensitivity of speakers and headphones can vary widely, always reduce the volume level before connecting or disconnecting headphones.

Bluetooth Connection ㉕

The Bluetooth Antenna ㉕ on the unit's back panel is for wireless streaming via Bluetooth from your device (i.e. mobile phones). From your mobile device, look for "Michi Bluetooth" and connect to it. Connection is normally automatic, but if prompted for a password, please press "0000" on your device. The unit's supports traditional Bluetooth, AAC and aptX™ HD Bluetooth audio streaming.

Rear USB Power Port ㉓

The rear USB port is only used for software update.

NOTE: This port does not allow playback of audio but will provide charging or powering USB devices.

EXT REM IN Jack ㉑

This 3.5 mm mini-jack receives command codes from industry-standard infrared receivers via hard-wired connections. This feature could prove useful when the unit is installed in a cabinet and the front-panel sensor is blocked. Consult your authorized Michi dealer for information on these external repeaters and the proper wiring of a jack to fit the mini-jack receptacle.

RS232 ㉔

The unit can be controlled via RS232 for integration with automation systems. The RS232 input accepts a standard straight DB-9 Male-to-Female cable.

For additional information on the connections, software, and operating codes for computer control of the unit, contact your authorized Michi dealer.

PC-USB Input ⌷20⌷

See Figure 5

Connect this input using the supplied USB cable to the PC-USB socket of your computer.

The unit supports both USB Audio Class 1.0 and USB Audio Class 2.0 modes. Windows computers do not require installation of a driver for USB Audio Class 1.0 and support playback of audio up to 96k Hz sampling rates. The Factory Default setting is USB Audio Class 1.0.

To take advantage of USB Audio Class 2.0 audio playback supporting up to 384k Hz sampling rates you will need to install the Windows driver supplied in the USB Flash Drive included with the unit. You will also need to switch the unit to USB Audio Class 2.0 playback mode with the following:

• Press SETUP on the remote control to enter the SETUP Menu and use the ∧/ ∨ Ⓓ buttons to select the Source menu then press the Enter Ⓚ button. Use the ∧/∨ Ⓓ arrow buttons and the Enter Ⓚ button on the remote control to select "PC-USB" as INPUT SOURCE.

• Press SETUP on the remote control to enter the SETUP Menu and use the ∧/∨ Ⓓ buttons to select the AUDIO menu then press the Enter Ⓚ button. Use ∧/∨ Ⓓ arrow buttons and the Enter Ⓚ button on the remote control to select "USB Audio 2.0" as PC-USB Option.

• Power cycle the unit and reboot your PC after changing the USB Audio mode to ensure both units are properly configured.

Many audio playback applications do not support 384k Hz sampling rate. Please confirm your audio player supports 384k Hz audio and you have 384k Hz audio files to properly playback this sample rate. Also, you may need to configure the audio driver in your PC to output 384k Hz or your computer may "down sample" to a lower audio sample rate. For more information please refer to your audio player or operating system information.

The unit has been certified as Roon Tested and compatible with Roon software via PC-USB.

Being Roon Tested means that Rotel and Roon have collaborated to ensure you have the best experience using Roon software and the unit together, so you can just enjoy the music.

For the best user experience it is suggested to use USB Audio Class 2.0 when using Roon.

NOTE: USB Audio Class 2.0 requires installation of the Windows PC driver on the USB Flash Drive included with the unit.

NOTE: MAC computers do not require a driver to support PC-USB 1.0 or 2.0 audio.

NOTE: Upon successful installation of the driver, you may need to select the Michi audio driver from the audio/speaker setup of your computer.

NOTE: The unit supports both DSD and DOP audio playback in 1X and 2X formats. Consult your audio player to confirm proper operation for playback of these audio formats.

NOTE: Support for MQA and MQA Studio requires USB Audio Class 2.0. Please select USB Audio 2.0 to support MQA.

Network Connection ⌷19⌷

The unit can be attached to a network using the rear panel NETWORK socket. The NETWORK configurations allow both static and DHCP IP addressing. See the Network Setup section of this manual under Setup Menu for IP address configuration information.

The NETWORK connections allows software updates to be downloaded from the Internet. The Network connection also allows IP control for integration with automation systems.

For additional information on the IP connection please contact your authorized Michi dealer.

Setup Menu

The Michi unit features the information display to help operate the system. A more comprehensive ON-SCREEN DISPLAY (OSD) menu system is available at any time by pressing the SETUP button on the remote. These OSD menus guide you through the configuration and setup of the unit. The settings made in the configuration process are memorized as default settings and need not be made again for normal operation of the unit.

Front Panel Overview

The following is a brief overview of the controls and features on the front panel of the unit.

Remote Sensor ⌷4⌷
This remote sensor window receives IR commands from the remote control. Please do not block this sensor.

Display ⌷2⌷
The front panel display shows the source selected, volume level and tone settings. The display can be dimmed using the unit setup menu or the IR remote controller. See the Display Configuration section of this manual for details.

Overview of Buttons and Controls

This section provides a basic overview of the buttons and controls on the remote control. Detailed instructions on the use of these buttons are provided in the more complete operating instructions in the following sections.

Navigating Ⓓ and Enter Ⓚ Buttons Ⓘ: Use the navigation buttons ∧/ ∨ Ⓓ and the Enter Ⓘ on the remote control to access the various menus and operate the unit settings.

Power ⑤ Ⓐ**:** The Power button on the front panel and on the remote control activate or deactivate the unit. There is an LED light in the middle of the Power button on the remote control, which will be illuminated when you pick up the remote control. To power on the unit, the rear panel master POWER switch must be in the ON position for the front panel and the remote standby function to operate.

Power On - To power on the unit push and release the Power button ⑤ on the front panel or the IR remote control.

Power Off/Standby - To power off the unit to standby push and release the front panel Power button ⑤ or PUSH-HOLD the remote control Power button Ⓐ **for 1.5 seconds**.

NOTE: All Michi products will respond to the same Power On and Off commands to simplify the power control when multiple products are installed. To control the power using the IR remote follow the instructions above and point the remote control at the Michi products. If a unit does not respond to a power on or off from the IR remote simply PUSH or PUSH-HOLD the power button again to resend the desired command.

SETUP Ⓑ**:** The SETUP button activates the OSD setup screen on the front display. Push the SETUP button again to move to the previous setup menu as a "back" key or exit setup menu if on the first level of setup menu.

SOURCE ① Ⓒ**:** The SOURCE knob on the front panel and the SOURCE button on the remote control selects the input signal source. From the front panel turn the SOURCE knob to select the source. After 1 second of no action the listed source will be selected as the active source.

On the IR remote push the SOURCE button and navigate to the desired source using the ⌃/⌄ Ⓓ buttons and push the Enter Ⓚ button to activate the source.

NOTE: Only sources that are configured as ACTIVE in the setup menu will be displayed as options.

DISPLAY Ⓖ**:** Dims the front display. To dim the display PUSH-HOLD the DISPLAY Ⓖ button on the remote control **for 3 seconds**. To turn on the display to the level of brightness configured in the setup menu push and release the DISPLAY Ⓖ button.

NOTE: The DISPLAY button is common for all Michi models. To Dim or enable the display PUSH or PUSH-HOLD the button and point to the Michi products. If a unit does not respond to a DISPLAY command simply send the command again using a PUSH or PUSH-HOLD.

AUDIO Ⓗ**:** The AUDIO button allows temporary adjustments to the Balance, Bass and Treble settings. To change these settings push the AUDIO button on the remote control and navigate to the desired setting using the ⌃/⌄ Ⓓ button and push the Enter Ⓚ button. Use the ⌃/⌄ Ⓓ button to change the value. Push the AUDIO button again to exit the menu or to exit the Audio menu.

NOTE: A properly setup Hi-Fi system should not require changes to the Bass or Treble setting. Use these adjustments sparingly.

NOTE: These settings are temporary and not saved when the unit is powered off to Standby. For permanent changes, configure the audio settings in the setup menu.

⊏⊐✕ **Button** Ⓔ**:** Push the ⊏⊐✕ button once to mute the audio. An indication appears in the front panel on-screen display. Press the button again to restore the previous volume level.

VOLUME Knob ③ **and VOL +/- Buttons** Ⓕ**:** The VOLUME +/- buttons on the remote and the rotary control on the front panel provide the master VOLUME control, adjusting the output level.

Main Menu

The Setup menu provides access to OSD screens for various configuration options. Setup menu is reached by pressing the SETUP Ⓑ button on the remote. To select the desired menu, move the highlight using the ⌃/⌄ Ⓓ arrow buttons and press the Enter Ⓚ button on the remote control. Press the SETUP Ⓑ button again to return to the previous menu or select "EXIT" on the OSD to end setup and return to normal operation.

Source Configuration
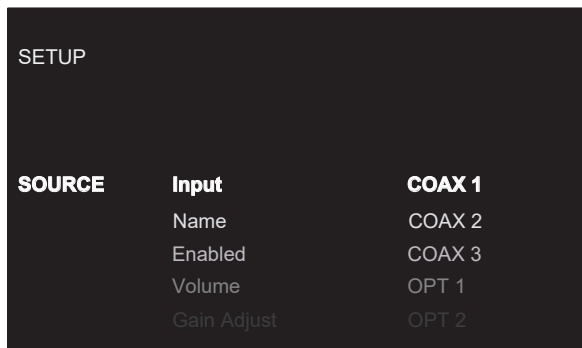
A key step in setting up the unit, is to configure each source input using the Source Setup screens. Configuring the inputs allows you to set defaults for a number of settings including the type of input connector, the desired audio mode, custom labels that appear in the displays when a source is selected, and many more options.

This Source menu in the Setup menu, provides the following options, selected by placing the highlight on the desired line using the ⌃/⌄ Ⓓ arrow buttons and pressing the Enter Ⓚ button. This action displays the right side options allowing changes. Change the options using the ⌃/⌄ Ⓓ arrow buttons and press the Enter Ⓚ button to confirm.

Input: Changing this input allows you to select a specific input for configuring. (COAX 1-3, OPT 1-3, PC-USB, BLUETOOTH, COMPACT DISC, PHONO, TUNER, AUX 1-2, XLR 1-2)

Name: The name of the source can be customized. For example Aux 1 can be named "TV" for easier reference. The default NAME is the same as the SOURCE. Place the highlight on this option and use the ⌃/⌄ Ⓓ arrow buttons on the remote control to select "Custom" then press the Enter Ⓚ button to enter the source name edit sub menu as below.

```
SETUP


                   Input
SOURCE          Name              _____
                   Enabled              Esc
                   Volume           - 0 1 2 3 4 5 6 7
                   Gain Adjust      8 9 A B C D E F G
                   Audio Mode       H I J K L M N O P
                                    Q R S T U V W X Y
                                    Z
```
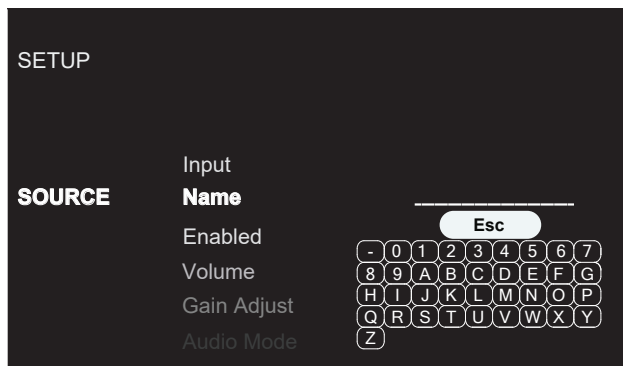
1. Press the ⌃/⌄ Ⓓ arrow buttons on the remote control to change the first letter, scrolling through the list of available characters.

2. Press the Enter Ⓚ button on the remote control to confirm that letter and move to the next position.

3. Repeat steps 1 and 2 until all ten characters have been completed. The final press of the Enter Ⓚ button saves the new name. Or select the "Esc " button on the OSD to confirm if you have less than ten characters to enter.

Enabled: Allows a source input to be enabled and appear in the list of source input options when using the source selection on the front panel or IR remote control. Unused sources should be set to disabled by selecting the "No" option.

Options include: Yes(Default), No.

Volume: Configures a Fixed Volume level for a specified input. This volume level is immediately set when this source input is selected and cannot be changed using the front panel or IR remote. This is useful for input sources that include their own volume setting like common Apps on phones or tablets.

Options include: Variable (Default), 30 - 90.

Gain Adjust: Configure the output levels to get a more consistent level of output at the same numerical volume level. Lower output such as MM or MC input need the higher volume while a CD input may only require the lower volume to get the sound "loudness". This adjustment can be set uniquely for each supported input.

Options include: -10 to 10 (Default 0).

Audio Mode: Configures audio mode to Direct Bypass or Tone Enabled.

Options include: Direct Bypass (Default), Tone Enabled.

Bass: Bass setting is enabled when Audio Mode is set to Tone Enabled.

Options include: +10 to -10 (Default 0).

Treble: Treble setting is enabled when Audio Mode is set to Tone Enabled.

Options include: +10 to -10 (Default 0).

Press the SETUP button Ⓑ on the remote control to exit the setup menu or select "Back" on the OSD to return to the main menu.
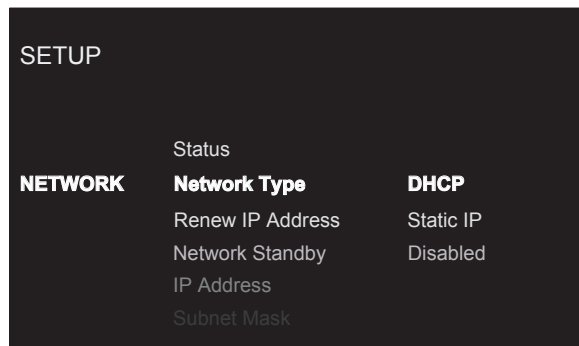
Network Configuration

```
SETUP


                   Status
NETWORK          Network Type         DHCP
                   Renew IP Address    Static IP
                   Network Standby     Disabled
                   IP Address
                   Subnet Mask
```

This Network menu in the Setup menu, provides the following options, selected by placing the highlight on the desired line using the ⌃/⌄ Ⓓ arrow buttons and pressing the Enter Ⓚ button. This action displays the right side options allowing changes. Change the options using the ⌃/⌄ Ⓓ buttons and press the Enter Ⓚ button to confirm.

Status: If the network is properly configured and attached to the network then "Connected" will be displayed. If the network is not properly configured or not connected to a network, "Disconnected" will be displayed.

Network Type: In most systems, set the IP ADDRESS MODE to DHCP. This setting will allow your router to assign an IP address to the unit automatically. If your network uses fixed IP addresses, set the IP ADDRESS MODE to Static. To disable the IP connection set this option to DISABLED.

Options include: DHCP (Default), Static IP, Disabled.

Renew IP Address: Disabled if Network Type is Static or Disabled. If Network Type is DHCP then select Yes and press the Enter Ⓚ button to renew the IP address.

Network Standby: When set to Enabled the unit will maintain the Ethernet IP connection even in Standby Mode allowing the unit to be powered on via IP. If Disabled the unit will not power on from the IP connection and must use either the front panel, IR remote or RS232 to power on the unit.

Options Include: Disabled (Default), Enabled

NOTE: When Network Standby is enabled the unit will consume additional power.

IP Address/Subnet Mask/Gateway/DNS: Disabled if Network Type is DHCP or Disabled. If STATIC mode is selected you must configure all settings for the network including IP Address, Subnet Mask, Gateway and DNS Server. Press the Enter Ⓚ button to activates the first digit in the line you want to change, then use the ⌃/⌄ arrow Ⓓ buttons to adjust the values and press the Enter Ⓚ button to cycle to the next digit. When the proper IP information is configured press the Enter Ⓚ button to move the cursor back to the previous menu and accept the settings. After entering the STATIC IP address information the network will be tested and connection status reported.

NOTE: For more information regarding network connection please contact your authorized Michi dealer.

NOTE: A network connection is not required for the unit to operate.

Press the SETUP Ⓑ button on the remote control to exit the setup menu or select Back to return to the main menu.

Audio Configuration

```
SETUP

                              When Selected
AUDIO        Bluetooth LED    Always on
             Power On Max Volume
             PC-USB Option
             PC-USB Decoding
             Phono Stage
```
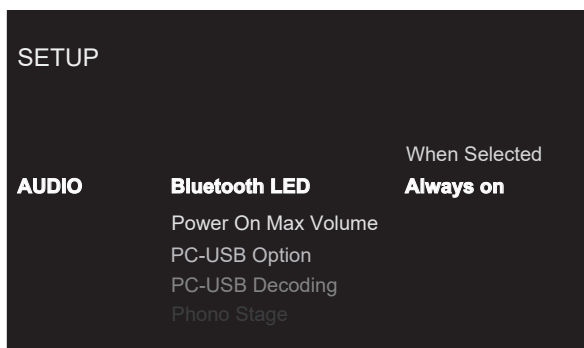
This Audio menu in the Setup menu, provides the following options, selected by placing the highlight on the desired line using the ⌃/⌄ Ⓓ arrow buttons and pressing the Enter Ⓚ button. This action displays the right side options allowing changes. Change the options using the ⌃/⌄ Ⓓ arrow buttons and press the Enter Ⓚ button to confirm.

Bluetooth LED: The Bluetooth LED will be powered on only when Bluetooth is the selected input or will always be powered on when the unit is ON.

Options include: Always on (Default), On When Selected

Power on Max Volume: This sets the max volume level for when the unit powers on to reduce the chance of the previous listening session set too loud.

Options include: Max 20 - Max 90, Max 50 (Default).

PC-USB Option: Configures PC-USB mode to Audio Class 1.0 or Audio Class 2.0. Default is Audio Class 1.0.

Options include: Audio Class 1.0 (Default), Audio Class 2.0.

PC-USB Decoding: Change PC-USB Audio mode to support MQA, DSD and PCM Audio up to 24 bit or PCM Audio Only up to 32 bit. When "PCM 32B ONLY" is selected DSD / MQA audio is not supported. To playback DSD / MQA the "DSD/MQA/PCM/24B" option must be selected.

Options include: DSD/MQA/PCM 24B (Default), PCM 32B ONLY.

Phono Stage: Relay selectable turntable source input type of Moving Magnet or Moving Coil cartridge.

Options include: Moving Magnet (Default), Moving Coil.

Balance: The Balance Setting adjusts the left-to-right balance of the sound output. The factory default is the center position or "0". The value can change from -10 to +10.

Automute: This function detects when there is no audio from the selected source and mutes the output after 30 seconds. To disable this function set Automute to OFF. Default is ON.

Signal Sense: Monitors if an audio signal is present on the configured Signal Sense input. The unit monitors the data stream to determine if there is audio. If there is no audio detected for 10 minutes, the unit will enter Signal Sense Power Mode. When in Signal Sense Power Mode and the unit detects audio on the Signal Sense input, the unit will automatically power on. When the Signal Sense mode is set to AUTO the unit will monitor all Coaxial, Optical, Bluetooth and PC-USB source input, and will power on and automatically select the active signal sense source when a signal is detected. To disable this function, select the "Disabled" option which is the factory default setting.

Options include: Disabled (Default), Auto, COAX 1-3, OPT 1-3, PC-USB, BLUETOOTH.

NOTE: When the unit enters standby mode via the remote control, the Signal Sense function will not operate until the unit detects the audio has stopped for the minimum 10 minute time-out period. This prevents the unit from immediately powering back on if there is still active audio playing.

NOTE: When the Signal Sense function is activated, the unit will consume additional power in signal sense standby mode.

NOTE: Due to local power consumption regulations the Signal Sense function is not available in all markets.

HT Bypass: This option enables the Home Theater Bypass mode allowing audio signals to be routed directly through the unit from a Surround Sound Processor or Receiver output. Typical use is to connect the analog output RCA Preoutput Front Left and Front Right signals from the processor or receiver to the AUX1 INPUT or XLR1 INPUT on the unit. The audio is routed on the most direct path disabling Tone control at a unity gain setting or fixed level. To active the Home Theater Bypass select the desired source input connection in the setup menu then select the specified source using the front panel or remote control. When the HT BYPASS source is selected the volume controller is disabled allowing the volume to be controlled by the Home Theater Processor or Receiver. When HT Bypass is enabled the 12V Trigger labeled IN/OUT is configured as an INPUT. This allows the Home Theater Receiver or Surround Processor to automatically power on the unit and select the HT Bypass source input. Connect the 12V Trigger IN/OUT to the 12V Trigger Output of the Receiver or Processor to enable automatic power control.

Options include: Disabled (Default), AUX1, XLR1.

HT Bypass Level: This option allows customization of the amplification level used in the Home Theater Bypass mode. Select the ⌃/⌄ amplifier gain levels if needed to match the home theater processor or receiver output levels.

NOTE: Most level adjustments are done in the Home Theater Processor or Receiver so these adjustments should only be used if the amplifier gain output cannot be matched with the Home Theater source.

Press the SETUP Ⓑ button on the remote control to exit the setup menu or select "Back" on the OSD to return to the main menu.

Display Configuration

```
SETUP

DISPLAY     Brightness          High
            Temporary Display   Medium High
            LED Brightness      Medium
            Back                Medium Low
                                Low
```
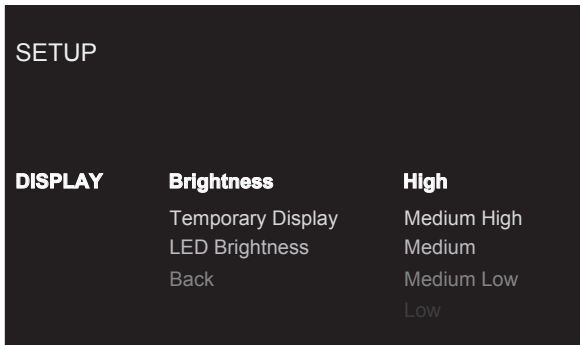
This Display menu in the Setup menu, provides the following options, selected by placing the highlight on the desired line using the ∧/∨ Ⓓ arrow buttons and pressing the Enter Ⓚ button. This action displays the right side options allowing changes. Change the options using the ∧/∨ Ⓓ arrow buttons and press the Enter Ⓚ button to confirm.

Brightness: This function sets the brightness of the front display. The setting is activated during normal operation by a PUSH RELEASE of the DISPLAY button Ⓖ on the remote control. The OSD will always activate at the most bright level regardless of the Brightness setting to ensure the unit configuration options can easily be accessed and modified.

Options include: High (Default), Medium High, Medium, Medium Low, Low.

NOTE: *To dim the front display PUSH-HOLD the DISPLAY Ⓖ button on the remote control or 3 seconds.*

Temporary Display: This function allows the front display to temporarily show changes to the unit for the time-out period before the display turns off again. An example would be to turn on the display to show changes to the source or volume levels then turn off the display after the time-out period expires. To disable the temporary display and have the unit display always on set this function to Disable.
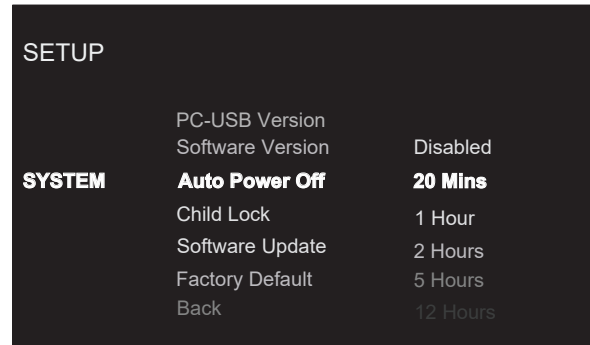
Options include: Disabled (Default), 5 seconds, 10 seconds, 15 seconds.

LED Brightness: Sets the brightness of the ON level of the front panel Power LED.

Options include: High (Default), Medium High, Medium, Medium Low, Low.

Press the SETUP Ⓑ button on the remote control to exit the setup menu or select "Back" on the OSD to return to the main menu.

System Configuration

```
SETUP

            PC-USB Version
            Software Version    Disabled
SYSTEM      Auto Power Off      20 Mins
            Child Lock          1 Hour
            Software Update     2 Hours
            Factory Default     5 Hours
            Back                12 Hours
```

This System menu in the Setup menu, provides the following options, selected by placing the highlight on the desired line using the ∧/∨ Ⓓ arrow buttons and pressing the Enter Ⓚ button. This action displays the right side options allowing changes. Change the options using the ∧/∨ Ⓓ arrow buttons and press the Enter Ⓚ button to confirm.

PC-USB Version: This shows current loaded software version for PC-USB processor.

Software Version: This shows the current software version loaded into the unit.

Auto Power Off: Set the amount of time the units stays powered on when there is no audio signal. The unit will automatically go to standby mode if audio is not detected for the specified timer period. Default: 20 Mins.

Options include: Disabled, 20 Mins, 1 Hour, 2 Hours, 5 Hours, 12 Hours.

Child Lock: This option allows "locking" and disabling front panel controls of the unit to avoid inadvertent changes to the Volume, Source and Power controls. When ENABLED the front panel volume knob, source selector and power button functions are disabled. All functions operate properly from the remote control.

To temporarily disable the Child Lock function push and hold the front panel POWER button for 6 seconds. This activates the volume, source and power buttons until the unit enters standby mode or is powered off.

To enable all front panel controls set the Child Lock function to DISABLED.

Options include: Disabled (Default), Enabled.

Software Update: Select the desired update method to update the unit.

Options include: No (Default), USB, Internet.

Factory Default: This option sets the unit back to the original setting as when it left the factory. All user settings will be erased.

NOTE: *Use caution when resetting the unit to factory defaults as all user configured options will be erased and reset to original factory settings.*

Press the SETUP Ⓑ button on the remote control to exit the setup menu or select "Back" on the OSD to return to the main menu.

Troubleshooting

Most difficulties in audio systems are the result of incorrect connections, or improper control settings. If you encounter problems, isolate the area of the difficulty, check the control settings, determine the cause of the fault and make the necessary changes. If you are unable to get sound from the unit, refer to the suggestions for the following conditions:

Power Indicator Is Not Illuminated

The front power indication will be illuminated anytime the unit is connected to AC power and the rear power switch is set to the ON position. The indication will be RED for standby mode and WHITE in normal operation. If the indication is not illuminated, test the power outlet with another electrical device, such as a lamp. Be sure the power outlet being used is not controlled by a switch that has been turned off. And check all AC power including the rear power switch to ensure the unit is receiving power.

Fuse Replacement

If another electrical device works when plugged into the power outlet, but the Power Indicator still will not light when the unit is plugged into the wall outlet, it indicates that the internal power fuse may have blown. If you believe this has happened, contact your authorized Michi dealer to get the fuse replaced.

No Sound

Check the signal source to see if it is functioning properly. Make sure the cables from the signal source to the unit inputs are connected properly. Check all the wiring between the unit and the power control amplifier, and the speakers.

Cannot Connect via Bluetooth

If you cannot pair your Bluetooth enabled device to the amplifier, delete the memory of the previous connection on your device. On your device this is often listed as "Forget this Device". Then try to make the connection again.

Playable Audio Format

aptX™ HD Bluetooth

Format	Notes
Any format supported by the sending device.	May exclude Apps designed to play formats not originally supported by the sending device.

PC-USB

Format	Notes
Format determined by the Media Player/ Server software that you use.	Any supported format by the PC software PCM Audio: 44.1k, 48k, 88.2k, 96k, 176.4k, 192k, 384k (16 bit, 24 bit and 32 bit) DSD64, DSD128 and DSD256 MQA, MQA Studio Roon Tested

Coax/Optical

Format	Notes
SPDIF LPCM	44.1k, 48k, 88.2k, 96k, 176.4k, 192k 16 bit, 24 bit

Specifications

Total Harmonic Distortion *(20 Hz - 20 kHz)*	< 0.002%	**Digital Section**	
Intermodulation Distortion *(60 Hz : 7 kHz, 4:1)*	< 0.002%	**Frequency Response**	20 Hz - 20 kHz (±0.3 dB, Max)
Input Sensitivity / Impedance		**Signal to Noise Ratio** *(IHF "A" weighting)*	100 dB
Phono Input *(MM)*	2.5 mV / 47k ohms	**Input Sensitivity / Impedance**	0dBFS / 75 ohms
Phono Input *(MC)*	250 uV / 100 ohms	**Digital Output**	0.75 V, Peak to Peak
Line Level Inputs *(RCA)*	160 mV / 47k ohms	**Load Impedance**	75 ohms
Line Level Inputs *(XLR)*	250 mV / 100k ohms	**Digital Inputs**	SPDIF LPCM
Input Overload			(up to 192 kHz 24 bit)
Phono Input *(MM)*	199 mV	**PC-USB**	USB Audio Class 1.0
Phono Input *(MC)*	22 mV		(up to 96 kHz 24 bit)
Line Level *(RCA)*	12 V		USB Audio Class 2.0
Balanced *(XLR)*	12 V		(up to 384 kHz 32bit)*
Output Level			*Driver installation required
Line Level *(RCA)*	1 V / 470 ohms		DSD (up to 11.2MHz 1 bit)
Balanced *(XLR)*	2 V / 100 ohms		and DoP support
Frequency Response:			MQA and MQA Studio support
Phono Input	20 Hz - 20 kHz, 0 ± 0.3 dB		Roon Tested support
Line Level Inputs	10 Hz - 100 kHz, 0 ± 0.3 dB	**General**	
Tone Controls		**Power Requirements:**	
Bass	± 10 dB at 100 Hz	USA:	120 Volts, 60 Hz
Treble	± 10 dB at 10k Hz	EC:	230 Volts, 50 Hz
Signal to Noise Ratio *(IHF"A" weighting)*		**Power Consumption**	40 watts
Phono Input	80 dB	**Standby**	
Line Level Inputs	116 dB	Normal	< 0.5 watts
Channel Separation		Network Wakeup	< 2 watts
Phono Input	> 55 dB	**BTU**	87 BTU/h
Line Level Inputs	> 85 dB	**Dimensions** *(W x H x D)*	485 x 150 x 452 mm
			(19 x 6 x 17 $^3/_4$ ins.)
		Front Panel Height	132 mm, 5 $^1/_4$ ins.
		Weight *(net)*	22.9 kg, 50.5 lb.

All specifications are accurate at the time of printing.

Michi reserves the right to make improvements without notice.

'MQA' or 'MQA.' indicates that the product is decoding and playing an MQA stream or file, and denotes provenance to ensure that the sound is identical to that of the source material. 'MQA.' indicates it is playing an MQA Studio file, which has either been approved in the studio by the artist/producer or has been verified by the copyright owner.

'OFS' confirms that the product is receiving an MQA stream or file. This deliers the final unfold of the MQA file and displays the original sample rate.

MICHI