KID Made for iPod

Krell Interface Dock

Papa Dock

Owner's Reference

KID SPECIFICATIONS

Inputs
1 30-pin iPod-device type
1 3-conductor 3.5 mm connector

Audio Outputs
1 pair balanced via XLR connectors
1 pair single-ended via RCA connectors

Video Outputs
1 S-Video via a DIN connector
1 Composite via a RCA connector

Control Inputs
1 RS-232 input via a 9-pin D-subminiature connector

Control Outputs
1 12 VDC trigger output via 2-conductor
3.5 mm connectors (500 milliamps maximum
per output)

Input impedance
Single-ended: 47.5 k Ohms

Output impedance
Balanced: 50 Ohms
Single-ended: 25 Ohms

Volume Control
256-step Digital Control

Input Overload
Single-ended: 4 Vrms

Output Overload
Balanced: 16 Vrms
Single-ended: 8 Vrms

Frequency Response
20 Hz to 20 kHz +0.7 dB, -0.0 dB
0.1 Hz to 90 kHz +0.7, -3 dB

Tone Control Range
Bass: +8 dB, -7 dB
Treble: +6 dB, -6 dB

Total Harmonic Distortion Plus Noise
Balanced Output: <0.002%, 20 Hz to 20 kHz,
4 V RMS or 4 mA rms

Signal-to-noise Ratio
Wideband, Unweighted: >94 dB
"A" Weighted: >97 dB

Power Consumption
Standby: 10 W
Power on: 25 W

Dimensions
Inches: 13 W x 2.8 H x 10.9 D
Centimeters: 33.0 W x 7.0 H x 27.7 D

Weight
Unit Only: 10 lb., 4.5 kg
Shipped: 14 lb., 6.4 kg

All operational features, functions, specifications, and policies are subject to change without notification.

PAPA DOCK SPECIFICATIONS

Frequency Response
20 Hz to 20 kHz, +0, -0.15 dB
<0.2 Hz to 110 kHz,+0 dB, -3 dB

Signal-to-noise Ratio
Wideband, unweighted, referred to full power output:
>108 dB
"A" weighted: >116 dB

Gain: 26.2 dB

Total Harmonic Distortion (THD)
< 0.03%@ 1 kHz, at 150 W, 8 Ohms
< 0.20%@ 20 kHz, at 150 W, 8 Ohms

Input Impedance
90 kOhms

Input Sensitivity
1.70 Vrms

Output Power, each channel driven:
150 Wrms @ 8 Ohms
300 Wrms @ 4 Ohms

Output voltage
98 V peak-to-peak, 35 Vrms

Output current: 15 A peak

Slew Rate: 50 V/µs

Output Impedance
<0.073 Ohms at 20 Hz
<0.084 Ohms, 20 Hz to 20 kHz<

Dampening Factor
110 at 20 Hz, referred to 8 Ohms
95, 20 Hz to 20 kHz, referred to 8 Ohms

Power Consumption
Stand-by: 25 W, **Idle:** 55 W, **Maximum:** 900 W

Heat Output, BTU/hr.
Stand-by: 85, **Idle:** 190, **Maximum:** 1100

Inputs
1 40-pin KID connector
1 RS-232 (to control KID) via a 9-pin
D-subminiature connector

Outputs
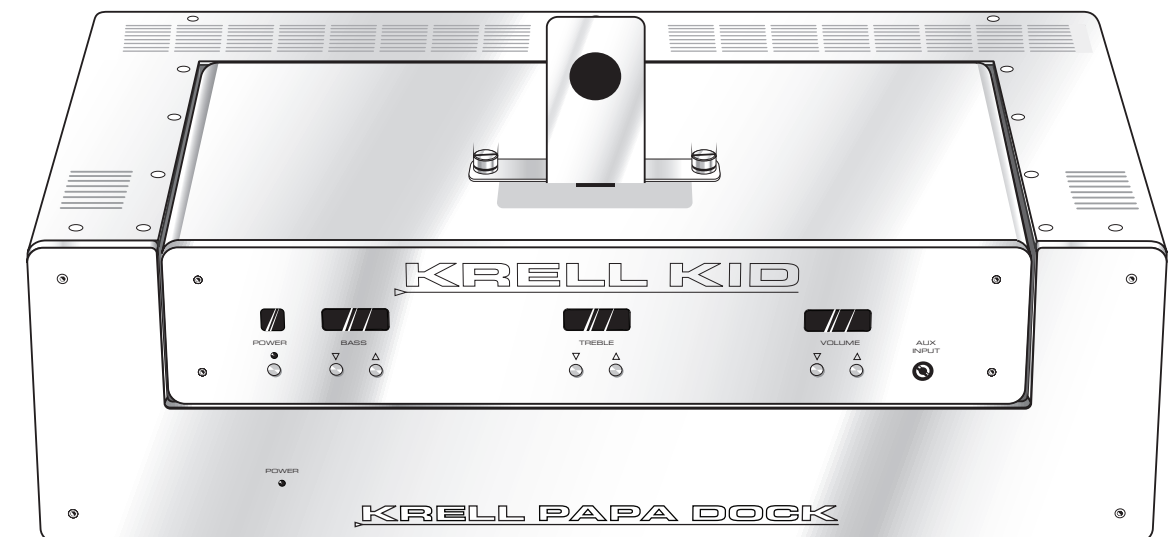2 channel via 5-way binding posts

Remote Connectors
One 12 VDC output (12 V trigger), 30 mA maxi-
mum, via a 3.5 mm connector
S-Video (from KID) via mini-DIN connector
1 composite video (from KID) via RCA connector

Dimensions
Inches: 17.3 W x 5.7 H x 16.3 D
Centimeters: 43.8 W x 14.5 H x 41.3 D

Weight
Unit Only: 39 lb., 17.6 kg
Shipped: 49 lb., 22.2 kg

Your KID product serial number is:

KRELL
THE LEADER IN AUDIO ENGINEERING

Owner's Reference, v 08.0

CONTACT INFORMATION

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IMPORTANT SAFETY INSTRUCTIONS

1. *Read Instructions.*
2. *Keep these Instructions.*
3. *Heed all Warnings.*
4. *Follow all Instructions.*
5. *Do not use this apparatus near water.*
6. *Clean only with dry cloth.*
7. *Do not install near any heat sources such as radiators, heat registers, stoves, or other apparatus (including amplifiers) that produce heat.*
8. *Unplug this apparatus during lightning storms or when unused for long periods of time.*
9. *Refer all servicing to qualified service personnel. Servicing is required when the apparatus has been damaged in any way, such as a 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.*

10. *The KID and the Papa Dock must be placed on a firm, level surface where it is not exposed to dripping or splashing.*
11. *The ventilation grids on the bottom of the KID, and the ventilation grids on the top and bottom of the Papa Dock must be unobstructed at all times during operation. Do not place flammable material above or beneath the KID or the Papa Dock.*
12. *Before making connections to the KID or the Papa Dock, ensure that the power is off and other components are in mute or stand-by mode. Make sure all cable terminations are of the highest quality, free from frayed ends, short circuits, or cold solder joints.*
13. *THERE ARE NO USER SERVICEABLE PARTS INSIDE THE KID OR THE PAPA DOCK.*

Please contact Krell if you have questions not addressed in this guide.

CE

These products comply with the EMC directive (89/336/EEC) and the low-voltage directive (73/23/EEC).

TOP AND FRONT PANEL ONLY

22 iPod-device docking station
Connect the iPod-device to the KID by plugging it into the dock connector. The iPod-device takes the KID in and out of stand-by.

When an iPod-device is connected to the dock connector, the KID automatically moves to the operational mode from stand-by.

When an iPod-device is removed from the dock connector, the KID automatically reverts to the stand-by mode.

23 Aux Input
Use this input instead of the dock connector to connect any audio source via a 3.5 mm stereo phone cable.

FRONT PANEL AND REMOTE

24 Power Button
Press the power button or key to take the KID in and out of stand-by.

Power LED Color Guide
When the KID is plugged into AC power, the power LED illuminates:

Red   The KID is in stand-by mode.

Blue   The KID is on, in the operational mode, indicating that an iPod-device is connected.

Purple The KID is on, in the operational mode, and an iPod-device is not connected.

25 Bass Control
Two buttons or keys control the bass tone control + or - 6 dB. The bass control is within the KID and not in the iPod-device.

26 Treble Control
Two buttons or keys control the treble tone control + or - 6 dB. The treble control is within the KID and not in the iPod-device.

27 Volume Control
The iPod-device volume control is not active when the iPod-device is connected to the KID.

Two up or down buttons on the KID, or the two up or down keys on the KID remote, control the volume, from 0 to 151. Press and hold both volume buttons or keys at the same time for 3 seconds. The volume locks, and the KID can be used as a source in an A/V system. Press and hold both volume buttons or keys at the same time, for 3 seconds, to unlock the volume.

REMOTE ONLY

28 DISP Key
Turns on the iPod-device backlight.

29 Menu Key
Activates the iPod-device menu function. The remote menu key does not have a held function.

30 Up Directional Key
Performs the iPod-device up arrow function.

31 Down Directional Key
Performs the iPod-device down arrow function.

32 Left and Right Directional Keys or Track Keys
Activate the iPod-device previous and next track functions respectively.

33 Play Key
Performs the iPod-device play/resume function.

34 Stop Key
Performs the iPod-device stop function.

35 Repeat Key
Performs the iPod-device repeat function.

36 Shuffle Button
Performs the iPod-device shuffle function.

37 Pause Key
Performs the iPod-device pause function.

38 Mute Key
Performs the iPod-device mute function.

39 Search Up/Down Keys
Press and hold these keys to perform the iPod-device search function.
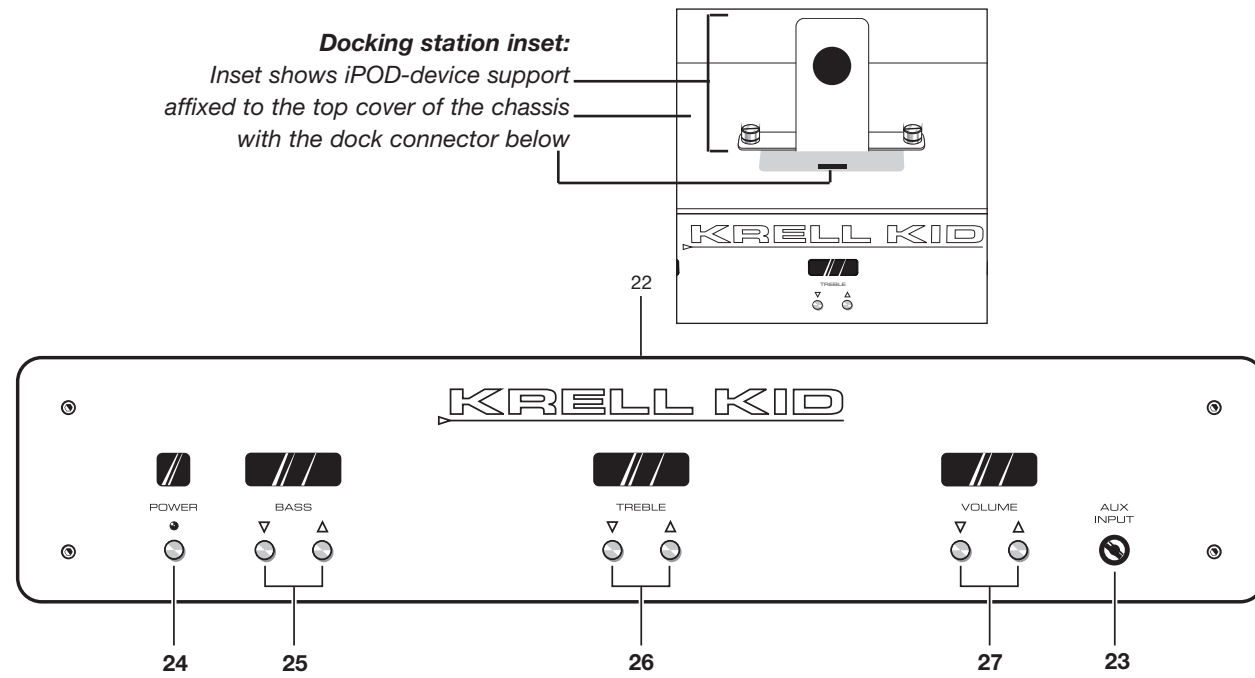
40 Album Up/Down Keys
Perform the iPod-device album up and down functions.

41 Playlist Up/Down Keys
Perform the iPod-device playlist up and down functions.

FIGURE 6 KID Front Panel

Docking station inset:
Inset shows iPOD-device support
affixed to the top cover of the chassis
with the dock connector below

TOP ONLY

22 Docking station (see inset above)

FRONT PANEL ONLY

23 Auxiliary input

FRONT PANEL AND REMOTE
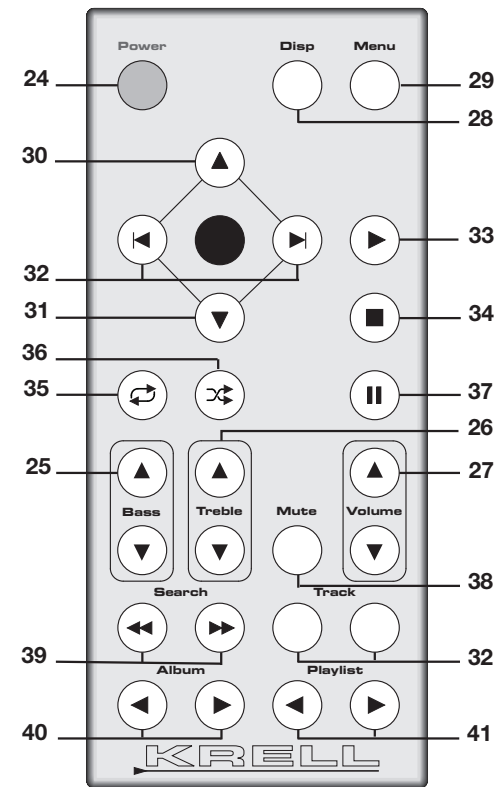
24 Power button/key
25 Bass control button/keys and display window
26 Treble control button /keys and display window
27 Volume level button/keys and display window

REMOTE ONLY

28 DISP key (turns on iPod-device backlight)
29 Menu key
30 Up directional keys: iPod-device up arrow key
31 Down directional keys: iPod-device down arrow key
32 Left and right directional keys/Track keys
    (These keys correspond to iPod-device Previous
    and Next keys)
33 Play/Resume key
34 Stop key
35 Repeat key
36 Shuffle key
37 Pause key
38 Mute key
39 Search keys
40 Album keys
41 Playlist keys

Button = front panel mechanism

Key = remote function mechanism

FIGURE 7 KID Remote Control

INTRODUCTION

Thank you for your purchase of the KID, the Krell Interface Dock, and/or the Papa Dock. The KID can be operated alone, or docked in the optional Papa Dock, a dedicated 150 W power amplifier designed specifically by Krell for use with the KID.

KID. The KID is designed to deliver maximum sonic performance from an iPod-device, and is the first product of its kind to utilize the fully differential output of the internal DAC for iPod-devices.

Additional features include opto-isolated digital connections between the iPod-device and the KID, and balanced differential Class A circuitry. Ultra low noise volume control, with digitally-controlled analog bass and treble controls fine tune your listening experience. A full-function remote control makes operation flexible. Balanced and single-ended outputs, composite and S-Video outputs, and an RS-232 control allow for a variety of connection options.

Papa Dock. The Papa Dock is engineered to drive virtually any loudspeaker to realistic listening levels. The amplifier has a proprietary connection for the KID, enabling all KID output functions to route through the Papa Dock back panel. It features a substantial 450 W, 40,000 microfarad power supply. Left and right channels incorporate discrete, direct coupled topology, 12 high current output devices, and terminate in WBT loudspeaker connectors.

This owner's reference contains important information on the placement, installation, and operation of the KID and the Papa Dock. Please read this information carefully. A thorough understanding of these details will help ensure satisfactory operation and long life for your KID, the Papa Dock, and related system components.

OVERVIEW

To prepare the KID and the Papa Dock for operation, follow the steps below:

LIST OF ILLUSTRATIONS

1 UNPACK THE KID

One person can remove the KID from its shipping box safely and easily.

1. Open the shipping carton top flap. You see the literature pack containing:
   1 Owner's Reference
   1 Warranty Registration Card

2. Remove the literature pack and the top layer of foam to view:
   1 KID
   1 Accessory tray containing:
     1 AC power cord
     1 KID remote control
     1 CR2025 lithium battery
   1 iPod-device support (under the accessory tray)

3. Face the front of the shipping box and remove the foam insert containing the AC power cord by pulling the insert straight out of the box.

4. Set the remote and the AC power cord aside, for later use.

5. Insert your hands below the left and right foam inserts surrounding the KID.

6. Lift the KID with the foam inserts straight out of the box.

7. Place the KID on a safe, clean work surface, on its side, resting on a foam insert.

8. Remove the other foam insert.

9. Reposition the KID on the work surface, with the remaining attached foam insert tilted up.

10. Remove the second foam insert.

11. Remove the foam enclosing the component.

12. Place the KID on its feet, right side up, on the work surface. You are now ready to affix the iPod-device support to the chassis.
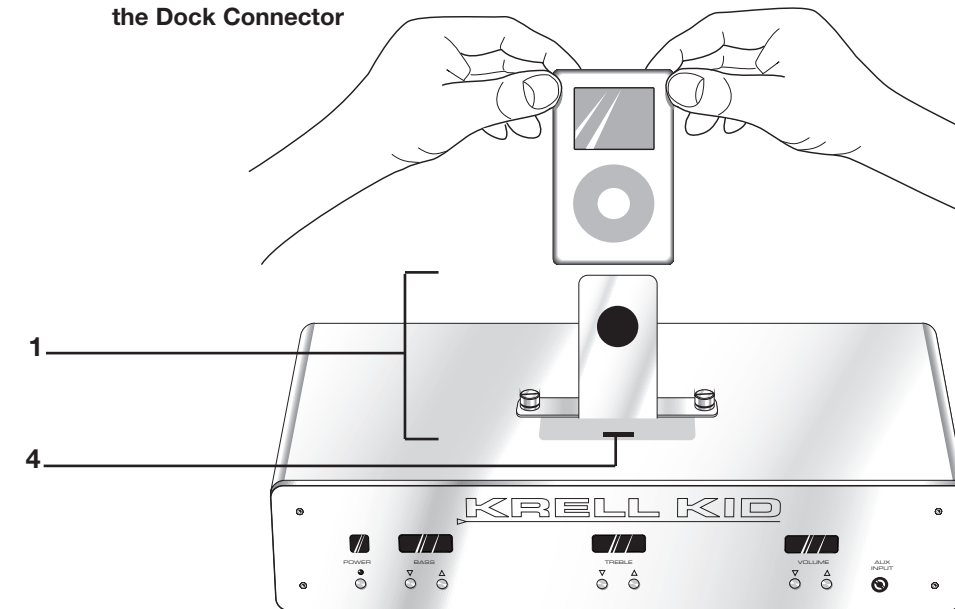
UNPACK THE PAPA DOCK

One person can remove the Papa Dock from its shipping box safely and easily.

1. Open the shipping carton top flap. You see a protective cardboard sheet.

2. Remove the protective cardboard sheet to view:
   1 Papa Dock
   1 Accessory box containing:
     1 AC power cord
     1 12 VDC (12 V trigger) cable
     1 T-10 Torx wrench
     1 Literature pack containing the Owner's Reference and Warranty Registration Card

3. Remove the accessory box by pulling it straight out of the box.

4. Insert your hands below the left and right foam inserts surrounding the Papa Dock.

5. Lift the Papa Dock with the foam inserts straight out of the box.

6. Place the Papa Dock on a safe, clean work surface, on its side, resting on a foam insert.

7. Remove the other foam insert.

8. Reposition the Papa Dock on the work surface, with the remaining attached foam insert tilted up.

9. Remove the second foam insert.

10. Remove the foam wrapper from the component.

12. Position the Papa Dock in the listening area.

ITEMS NOT IN THE SHIPPING BOX. If any of the items listed above are not included in the shipping box, please contact your authorized Krell dealer or distributor.

PACKING MATERIALS. Save all packing materials. To ship the KID or the Pap Dock in the future, repack the unit in its original packaging to prevent shipping damage. For more information, see the Return Authorization procedure, in the Service section of the Krell website at www.krellonline.com.

FIGURE 4 Inserting the iPod-device Into the Dock Connector

7 INSERT THE IPOD-DEVICE INTO THE KID DOCK CONNECTOR

When the KID or the Papa Dock are plugged into AC power, connect the iPod-device:

1. Hold the iPod-device in both hands as shown in the illustration above, using the iPod-device support (1) as a guide.

2. Center the iPod-device connector against the KID dock connector (4).

3. Push down on the top of the iPod-device gently but firmly until its connector plugs into the KID dock connector.

KID Power LED Color Guide. When the KID is plugged into AC power, the power LED illuminates as follows:

Red   The KID is in stand-by mode.
Blue   The KID is on, in the operational mode, indicating that an iPod-device is connected.
Purple The KID is on, in the operational mode, and an iPod-device is <u>not</u> connected.

Papa Dock Power LED Color Guide. When the Papa Dock is plugged into AC power, the power LED on the front panel illuminates as follows:

Red   The Papa Dock is in stand-by mode.
Blue   The Papa Dock is on, in the operational mode, when the KID is connected to the Papa Dock and the iPod-device is inserted into the KID dock connector.

8 OPERATION

When the iPod-device is connected to the KID, you are ready to play music. When the KID is connected to the Papa Dock and an iPod-device is inserted into the KID dock connector, the KID powers on the Papa Dock.

1. Press the play key (33) on the remote.

2. Adjust the volume (27) using the buttons on the KID front panel or the keys on the remote. Numerical values indicating the volume level appear in the display window.

3. Adjust the bass tone control (25) using the buttons on the KID front panel or the keys on the remote. Numerical values indicating the bass tone level appear in the display window.

4. Adjust the treble tone control (26) using the buttons on the KID front panel or the keys on the remote. Numerical values indicating the treble tone level appear in the display window.

5. Press the stop key (34) to end playback.

6. Press the play button or key to begin playback again.

For a complete list of functions, see page 10.

Connecting the Papa Dock to Your System
AC Power Guidelines for the Papa Dock
Papa Dock Back Panel Connections

CONNECTING TO YOUR SYSTEM, *continued*

Connect the Papa Dock to Your System

With the KID docked onto the Papa Dock:

1. Connect the loudspeaker cables to the Papa Dock amplifier channel output binding posts (16) located on the back panel.

   The binding post terminals accept spade lugs, bare wire, or pins. Use the red terminal for the positive connection and the black terminal for the negative connection.
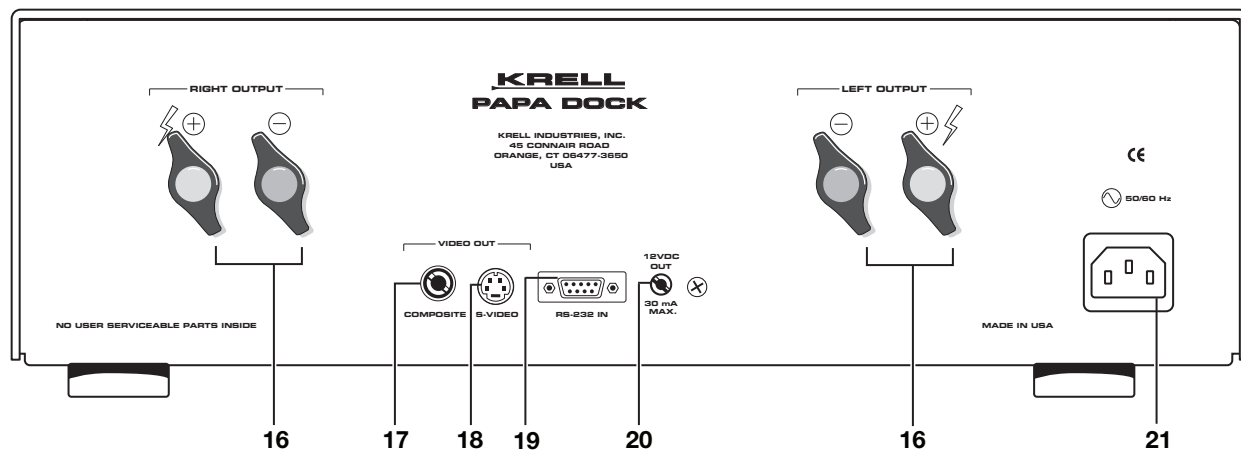
   IMPORTANT: Tighten loudspeaker binding posts by hand only.

5. Plug the AC power cord into the amplifier's IEC connector (21).

6. Plug the other end of the AC power cord into the AC wall outlet.

The amplifier is now ready for operation.

AC Power Guidelines for the Papa Dock. Krell recommends operating the Papa Dock amplifier from a dedicated 15-amp AC power line. Please contact your Krell dealer, distributor, or Krell before using any devices designed to alter or stabilize the AC power for the Papa Dock.

FIGURE 7 Papa Dock Back Panel Connections

AMPLIFIER CHANNEL OUTPUTS

16 Left and Right Outputs
Two channel outputs via 5-way binding posts.

VIDEO OUTPUTS

17 Composite Video Output
One composite video output with an RCA connector.

18 S-Video Output
One S-Video output with a DIN connector.

REMOTE CONNECTIONS

19 Comm Port RS-232 Connector
Sends software updates directly to the KID using an external computer control system.

20 12 VDC Out
Sends a 12 V power on/off signal via a 12 V trigger cable to other Krell components and to other devices that incorporate 12 V power on/off trigger input.

When the Papa Dock is in the operational mode and a trigger is enabled, the 12 VDC Out provides 12 V of DC output. When the Papa Dock is in the stand-by mode or off, or if a trigger is not enabled, the DC output is 0 V.

POWER CONNECTION

21 IEC Connector
A standard male IEC power connector, for use with the AC power cord.

Affix the iPod-device Support to the KID Top Cover
Install the Battery in the KID Remote
Placement Considerations

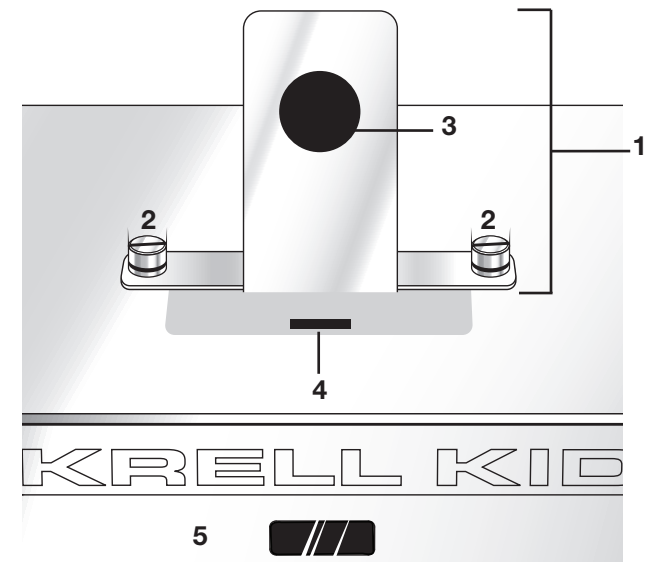## 2 AFFIX THE iPOD-DEVICE SUPPORT TO THE KID TOP COVER

IMPORTANT:

Affix the iPod-device support before inserting the iPod-device into the dock connector (4).

1. Remove the iPod-device support (1) from its bubble wrap package.

2. The bracket bar has two thumbscrews (2). Position these screws over the thumbscrew holes in the KID top cover.

   Orientation: The round black rubber pad (3) on the iPod-device support faces the front of the chassis (5).

4. Screw the iPod-device support thumbscrews into the thumbscrew holes by hand.

FIGURE 1 The iPod-device Support

3 INSTALL THE BATTERY IN THE KID REMOTE

The KID remote control uses one CR2025 lithium battery which is included with the shipment.

To open the battery compartment on the back of the remote control:

1. Place the remote face down on the table.

2. Use your thumbnail or a small jeweler's or eyeglass screwdriver to move the small tab toward the center of the remote, while using your index fingernail or screwdriver to pull down gently on the slot to the right of the tab. The battery compartment slides out.

3. Place the battery plus side up in the battery tray.

4. Slide battery compartment back into the remote until you hear a click.

The remote control is ready for operation.

Notes. Do not use a knife or other sharp objects to open the battery compartment; to avoid scratching the remote control finish.

Replace batteries when the remote control functions becomes intermittent. Remove batteries if the remote control is not to be used for a long period of time. Battery leakage can damage the remote control.

4 PLACEMENT CONSIDERATIONS

Before installing the KID or the Papa Dock into your system, please review the following guidelines for the proper location of the components. This will facilitate a clean, trouble-free installation.

Positioning the components in the listening area

Place the KID and the Papa Dock on a firm, level surface, away from excessive heat, humidity, or moisture. These components do not require a special rack or cabinet for installation.

Place the Papa Dock as close to the loudspeakers as possible and keep the loudspeaker cable

length to a minimum. Loudspeaker cable adds impedance to the load that the amplifier must drive, regardless of the cable's gauge. Krell amplifiers drive the lowest impedances with ease, but long loudspeaker cables reduce the maximum power that is delivered to the loudspeakers.

Component Ventilation

The KID requires ventilation clearance:

— at least eight inches (20 cm) above (to accommodate the iPod-device)

— the ventilation grids on the bottom of the KID chassis must be unobstructed.

PLACEMENT CONSIDERATIONS, *continued*

Component Ventilation, continued

If the KID is placed in a closed cabinet, more than eight inches (20 cm) of clearance may need to be provided above and below the component, or small fans may be needed to increase ventilation.

The air space between the chassis and shelf must be unobstructed.

The Papa Dock requires ventilation clearance:
— at least two inches (5 cm) above, below, and on each side.
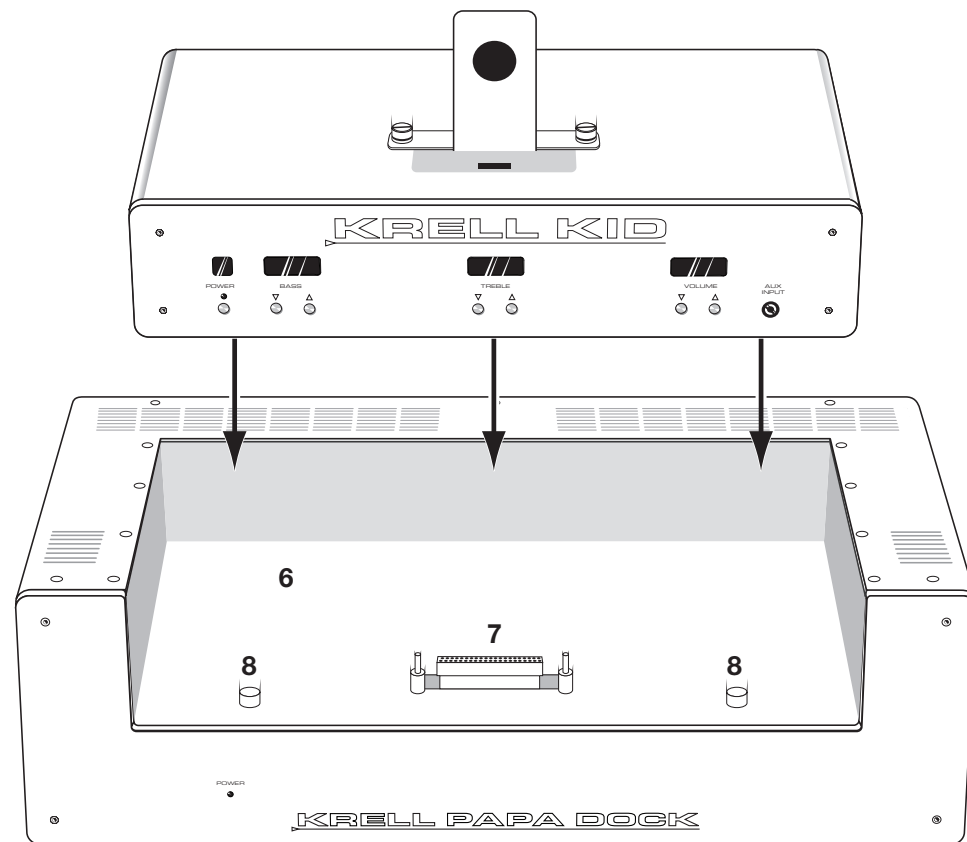
5 THE KID / PAPA DOCK CONNECTION

To connect the KID to the Papa Dock:

1. Remove the connector plate from the bottom of the KID, using the T-10 Torx wrench provided in the Papa Dock accessory box.

2. Place the KID and the Papa Dock side-by-side, with the front panel facing toward you.

3. Lift the KID up and position it over the connection well (6) in the Papa Dock.

4. Lower the KID gently but firmly onto the Papa Dock docking connector (7).

To disconnect the KID from the Papa Dock:

1. Facing the front of the two components, insert your fingers in the plunger holes on the bottom panel of the Papa Dock.

2. Push up both plungers (8) simultaneously. The plungers elevate the KID, disconnecting it from the Papa Dock.

3. Lift the KID out of the connection well on the Papa Dock, and set the KID aside.

FIGURE 2 Connecting the KID to the Papa Dock

6 CONNECT TO YOUR SYSTEM

Krell recommends using balanced interconnect cables. Balanced interconnect cables not only can minimize sonic loss but also are immune to induced noise, especially for installations using long cables. Balanced connections have 6 dB more gain than single-ended connections. When level matching is critical, keep this specification in mind. Krell recommends using balanced inputs for components that use the preamplifier mode.

1. Make sure all power sources and components are off before connecting inputs and outputs.

2. Neatly arrange and organize wiring between the KID, the Papa Dock, and all system components. Separate AC wires from audio cables to prevent hum or other unwanted noise from being introduced into the system.

Connect the KID to Your System

The KID connects to a preamplifier, processor, or amplifier as an A/V source, and is equipped with a balanced and single-ended analog audio output, an S-Video, and a composite video output. The Papa Dock is a 150 W amplifier specifically designed by Krell for use with the KID.
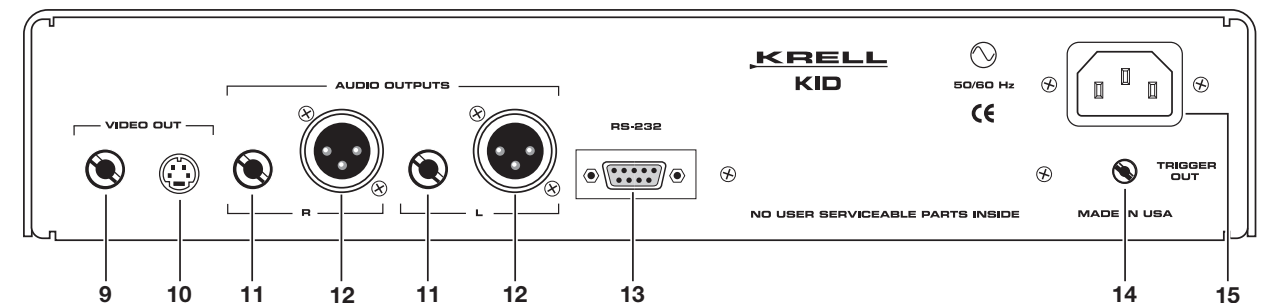
Maintain the correct left/right orientation: balanced outputs use three-pin XLR connectors. Single-ended outputs use RCA connectors.

1. Connect the balanced (12) or single-ended (11) analog audio outputs to the corresponding inputs on the preamplifer or processor, or to the Papa Dock or other amplifier in your system.

2. Connect the S-Video (10) or composite video (9) outputs to the corresponding input on the monitor in your system.

3. Plug the AC power cord into the IEC power connector (15) on the back panel. Then plug the AC power cord into the wall socket.

The KID is now ready for the iPod-device connection.

AC Power Guidelines for the KID. Use only the power cord provided with the KID. The use of the KID with devices designed to alter or stabilize the AC power may impair the ability of the interface dock to perform optimally.

FIGURE 3 KID Back Panel Connections

VIDEO OUTPUTS

9 Composite Video Output
One composite video output with an RCA connector.

10 S-Video Output
One S-Video output with a DIN connector.

ANALOG OUTPUTS

11 Single-ended Audio Outputs
Two single-ended analog audio channel outputs with RCA connectors.

12 Balanced Analog Audio Outputs
Two balanced analog audio channel outputs with XLR connectors.

REMOTE CONNECTIONS

13 Comm Port RS-232 Connector
Sends software updates directly to the KID using an external computer control system.

14 12 VDC Out
Sends a 12 V power on/off signal via a 12 V trigger cable to other Krell components and to other devices that incorporate 12 V power on/off trigger input.

When the KID is in the operational mode and a trigger is enabled, the 12 VDC Out provides 12 V of DC output. When the KID is in the stand-by mode or off, or if a trigger is not enabled, the DC output is 0 V.

POWER CONNECTION

15 IEC Connector
A standard male IEC power connector, for use with the AC power cord.