



BlueDriver-M3™
Wireless Audio Interface
User Guide

JK Audio

Welcome

Thank You

Thank you for purchasing the JK Audio BlueDriver-M3 Wireless Audio Interface. Please read this guide for instructions on setting up and using your new product.

Getting Assistance

If you have any questions, call us **M-F: 8:30am-5:00pm (CT)**

In the US & Canada (Toll-Free)

800-552-8346

All other countries dial:

815-786-2929

Email us at:

support@jkaudio.com

Or, check out our FAQ section for answers to common questions.

Limited Warranty

BlueDriver-M3 is covered by a 2 year warranty to be free from defective workmanship and materials. To obtain service, contact JK Audio by phone or email for return authorization.

Once authorized, you will carefully pack and ship the faulty product and all accessories to us. You will pay for shipping to us and we will pay for return back to you.

This warranty does not cover damages due to accident, weather, fire, flood, earthquake, misuse, unauthorized repairs or modifications, or damages occurred in shipping, only defective workmanship or materials.

There are no expressed or implied warranties which extend beyond the warranty here made.

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Features

HD Voice*

Mini USB Power Jack

>6 Hours on Internal Li-Ion Battery

3 Pin Male XLR Output

1/8" (3.5 mm) Line Level Input

In the Box

USB Charger Cable (CN108)

1m Stereo 3.5mm Cable (CN104)

Introducing the BlueDriver-M3.

The BlueDriver-M3 wireless audio interface uses Bluetooth® wireless technology to add wireless possibilities to your audio mixing console. Model M3 provides 2-way, full duplex voice band audio path when connected to a device using the Hands Free profile.

HD Voice is available on many third party headsets and cell phones. The 7 kHz audio bandwidth produces rich, natural voice clarity.

Additionally, music bandwidth stereo audio can be heard using the A2DP profile. Be aware that the standard A2DP music profile includes a 150 millisecond transmission latency.

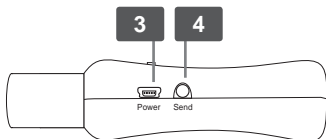
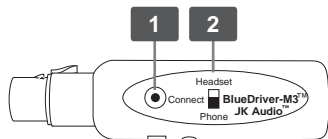
HD Voice

While standard phone calls have a narrow bandwidth of 300 Hz to 3.4 kHz, HD Voice calls offer 50 Hz to 7 kHz bandwidth. The additional 1.5 octaves on the low end gives voice a more natural sound, while the additional upper octave dramatically improves speech clarity and intelligibility.

Wireless HD Calls

HD Voice is available on many third party headsets and cell phones. To take advantage of this extended bandwidth, both phones on the call must support HD Voice, and both phones must be on the same carrier, in coverage areas that support HD Voice.

Getting to know your BlueDriver-M3



1. Connect Button

The <Connect> button is used to turn on the BlueDriver and initialize connections (Pages 6-7). This button is also used to disconnect and turn off the BlueDriver (Page 8).

2. Role Select Switch

Before you turn the BlueDriver on, be sure to set the Role Select Switch to the correct position.

If you change this switch while the unit is on, you will need to power the unit off, then power the unit back on before the change takes effect.

Select <Headset> if you will be using your BlueDriver with a Bluetooth enabled headset or any device that emulates a headset.

Select <Phone> if you will be using your BlueDriver with a cell phone or other master device. Please note that wireless phones typically cannot receive A2DP stereo audio.

3. Power

BlueDriver should be fully charged before its first use. While this battery will normally charge in about 2½ hours, please allow 4-5 hours for this first charge, or until the LED turns off.

Getting to know your BlueDriver-M3

Connect the USB cable to the mini USB connector on your BlueDriver and a USB power source to charge the battery. The red LED will flash to indicate that the battery is charging, once charging is complete, the LED will turn off.

If the battery becomes completely discharged for an extended period of time, the red LED will not flash until it can begin its charge cycle. This may take several minutes.

If the USB cable is connected when the unit is shut down, the blue LED will stay lit. If the unit is in use, the blue LED will indicate the current connect mode. Feel free to use your BlueDriver while it is charging.

Note: BlueDriver-F3 draws very little power when charging. Unfortunately, some portable power banks automatically turn off if the target device does not draw enough power.

4. Send Input

A 3.5 mm stereo line level input jack enables you to add audio from another source to this device. Both channels of this input will be sent to the Bluetooth device and not to the XLR jack. If you are connected in A2DP as the Master, you will be able to send stereo audio to a slave device. If you are connected as the Slave in Hands-Free mode, the two channels will be mixed together for transmission.

Bluetooth Wireless Technology

Pairing Mode

From the **powered-off** state*, hold the **<Connect>** button for **6** seconds, then release to activate *Pairing Mode*.

In *Pairing Mode*, any *Bluetooth* enabled device within range can pair with your BlueDriver. When you're first connecting to a new device, you should be in an environment with no other *Bluetooth* wireless technology enabled devices within range that might also be in *Pairing Mode*.

Once the pairing process is complete the unique device ID is stored in Connection History. Subsequent connections can be made from *Idle Mode*.

Idle Mode

From the **powered-off** state*, hold the **<Connect>** button for **3** seconds, then release to activate *Idle Mode*.

In *Idle Mode*, BlueDriver searches for paired devices.

Connected Mode

After bonding is complete, the connection to that device is secure. BlueDriver returns to *Idle Mode* when a connection is dropped or terminated.

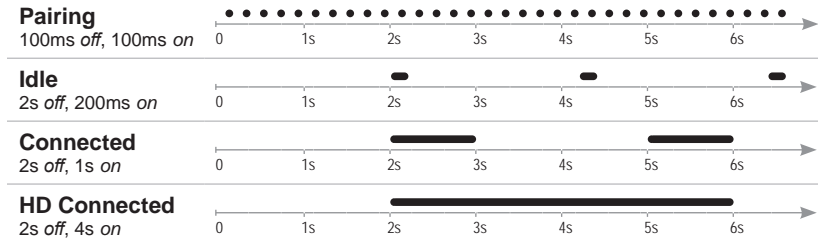
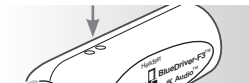
*See page 8 for instructions on how to turn off BlueDriver-M3.

For instructions on how to pair to a cell phone or headset, see pages 6-7.

Bluetooth Wireless Technology

Bluetooth Status LED

The blue LED on the front of the unit flashes in different sequences to indicate the current connection status.



Bluetooth Wireless Technology

Pairing to a Cell Phone

1. While BlueDriver is off, set the **Role Select Switch** to **<Phone>**.
2. From the **powered-off** state*, hold the **<Connect>** button on the BlueDriver for at least **6** seconds. Upon release, the blue LED should flash rapidly as the BlueDriver enters *Pairing Mode*.

* See page 8 for instructions on how to turn off BlueDriver-M3.

3. On your device, find and select the option to set up a connection. When the cell phone has found the new device, select from the list the device ID. Depending on the gender of model, the device ID is "**JKBDRVM3xxxx**" where: **xxxx** = last four digits of the serial number.

Note: Connecting via *Bluetooth* wireless technology varies with different cell phones.

4. If asked for a pin, enter "**0000**".
5. When bonding is complete, the blue LED will flash at a rate of **2** seconds *off*, **1** second *on*. (**2s off, 4s on** for HD Voice). Subsequent connections can be made more quickly from *Idle Mode* by holding the **<Connect>** button for only **2** seconds before releasing.

Bluetooth Wireless Technology

Pairing to a Headset

1. While BlueDriver is off, set the **Role Select Switch** to **<Headset>**.
2. Following manufacturer's instructions, set your headset to *Pairing Mode*.
3. From the **powered-off** state*, hold the **<Connect>** button on the BlueDriver for at least **6** seconds. After you release it, the blue LED should flash rapidly if the BlueDriver is in *Pairing Mode*.
4. When bonding is complete, the blue LED will flash at a rate of **2** seconds *off*, **1** second *on*. (**2s off, 4s on** for HD Voice). Subsequent connections can be made more quickly from *Idle Mode* by holding the **<Connect>** button for only **2** seconds before releasing.

* See page 8 for instructions on how to turn off BlueDriver-M3.

Bluetooth Wireless Technology

Disconnecting from a Device

To disconnect from a device, turn off *Bluetooth* on your phone or power off the connected headset/device. Alternatively, turn off the BlueDriver.

If left unused in *Idle* or *Pairing Mode*, the BlueDriver will automatically disconnect in two minutes and power off.

Turning off BlueDriver-F3

From the **powered-on** state, hold the **<Connect>** button for **5** seconds, then release to turn off BlueDriver-F3.

If the blue LED continues to flash or blink after releasing, then the **<Connect>** button was:

- released too early.
- held more than 10 seconds.
- pressed after BlueDriver-F3 was left unused and powered off automatically.

Connection History

BlueDriver retains a history of the 16 most recent devices. To clear connection history and return to factory default, with the BlueDriver powered off, set the switch to the **<Headset>** or **<Phone>** position, then hold the **<Connect>** button in for at least **20** seconds. After resetting, the BlueDriver will return to *Pairing Mode*.

Reconnect to Paired Devices

To reconnect to a device saved in **Connection History**, the BlueDriver should be in *Idle Mode* (see **page 4**) and the **Role Select Switch** in the correct position. BlueDriver-F3 will automatically connect to a paired device that is Bluetooth-enabled, powered-on and within range.

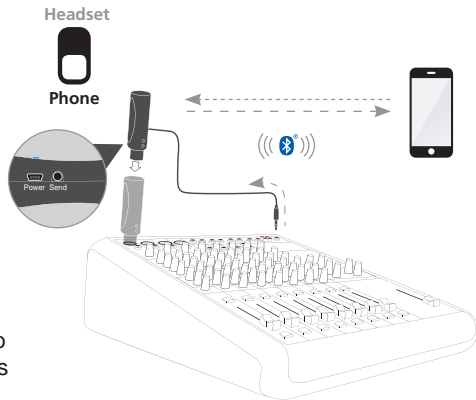
Note: Connecting via *Bluetooth* wireless technology varies with different cell phones.

Wireless Applications

Take Calls During a Live Event or Remote Broadcast

Simply plug BlueDriver-M3 into any mic level input of your mixer or console. Pair to your cell phone and get ready to take calls as you normally would. This setup allows voice band bi-directional audio from your cell phone.

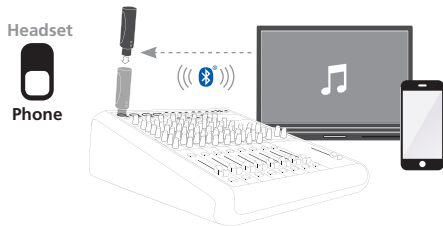
The mini cable provided with your BlueDriver allows you to connect an aux output of your mixer to the **<Send>** jack on the BlueDriver-M3. This signal goes back to the caller, so make sure you don't send the Caller's voice back to the caller. See page 13 for a "Mix-Minus" setup.



Wireless Applications

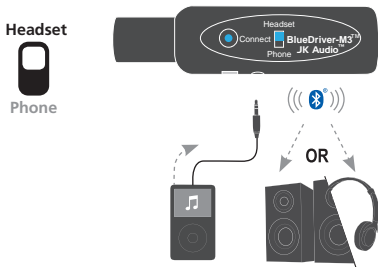
Receive A2DP Audio from your Bluetooth Device

Simply plug the BlueDriver-M3 XLR into any mic level input of your mixer or PA system. Pair the BlueDriver in **<Phone>** mode to your device and enjoy full bandwidth, Bluetooth A2DP audio.



Send A2DP Audio to your Bluetooth Device

Simply connect the supplied cord between the **<Send>** mini jack on your BlueDriver-M3 and the line level or headphone output jack of your audio source, then pair to your Bluetooth headphones or speakers in **<Headset>** mode.



A2DP is a one-way transmission, with nothing coming back on the return channel.

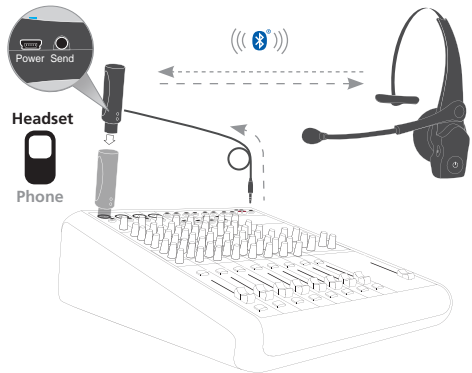
Be aware that the standard A2DP music profile includes a 150 millisecond transmission latency.

Wireless Applications

Bluetooth Headset as a Talkback Intercom

Need a short range point-to-point intercom during your next live event? Simply plug BlueDriver-M3 into any mic level input of your mixer or console. Pair to your favorite Bluetooth Headset. This setup allows voice-band bi-directional audio up to 66 ft from the BlueDriver.

The mini cable provided with your BlueDriver allows you to connect an aux output of your mixer to the **<Send>** jack on the BlueDriver-M3. This signal goes back to the headset, so make sure you don't send your voice back to yourself. See page 13 for a "Mix-Minus" setup.



Wireless Applications

Broadcast High Quality Audio Through Our Wireless Link

Our BlueDriver-F3 (<Headset> mode) and BlueDriver-M3 (<Phone> mode) can be paired together to create a full A2DP music bandwidth wireless link. Range is limited to 66 feet, but this may be just enough for your application.

A2DP is a one-way transmission, with nothing coming back on the return channel.

Note: Be aware that the standard A2DP music profile includes a 150 millisecond transmission latency.

BlueDriver-F3

Headset



Phone



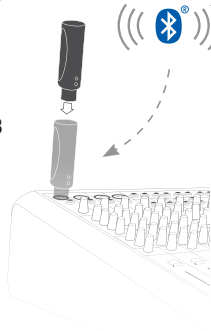
BlueDriver-M3

Sold Separately

Headset



Phone



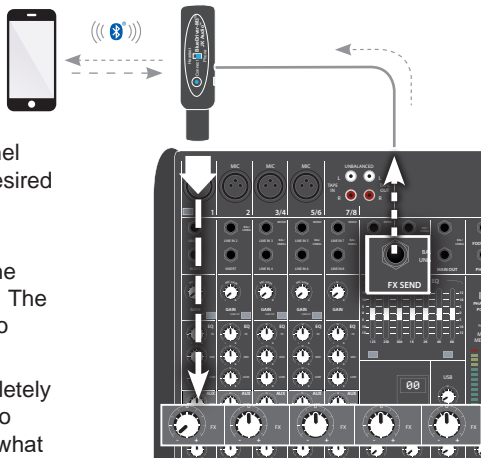
Wireless Applications

Mix-Minus Setup

On whichever input channel you have the BlueDriver-M3 connected, turn the corresponding Aux or FX control to minimum. All other input channel Aux controls should be at their desired settings for the “Mix-Minus” feed returning to the BlueDriver-M3.

Connect the FX Send output to the Send input on the BlueDriver-M3. The FX Send output will send all audio except the caller audio.

The Aux or FX Send bus is completely separate from all other outputs, so these Aux controls will not affect what is heard on the Main outputs or on any other Aux or FX buses.



FAQ's

What is the range of the transmitter/receiver?

BlueDriver-M3 transmits and receives audio signals up to 66 feet from your *Bluetooth* wireless technology enabled device. The maximum range of this product is achieved when a clear line of sight is maintained between connected devices, but may also be limited by interference due to the environment. While this product offers extended range capabilities, maximum usable range is limited by the weaker of the two paired/connected devices. Transmitting signals over longer distances will require more power, therefore you should keep BlueDriver-M3 as close as possible to your *Bluetooth* device to conserve battery power.

Why won't the BlueDriver-M3 pair with my phone?

If this is the first time you are trying to pair to this cell phone, you might be in *Idle Mode* instead of *Pairing Mode* and your BlueDriver-M3 is not being recognized.

Make certain that the **Role Select** switch is set to **<Phone>**. If the BlueDriver is set to **<Headset>**, it might be discovered by the phone, but will be unable to connect when selected.

Why won't BlueDriver connect to my device?

Ideally, the master device will search for the headset device. If the BlueDriver isn't pairing with your device, try turning the second device on first from your initial attempt to connect.

Why doesn't the BlueDriver change connections when I move the switch from Headset to Phone?

If you change this switch while the unit is on, you will need to power the unit off (see **page 8**), then power the unit back on before the change takes effect.

How long will the charge on the battery last?

Based on tests with BlueDriver-M3 about 1 meter from a *Bluetooth* device, the battery should last for >6 hours under normal use. As an indicator of low battery, the blue LED will grow dim and then extinguish a short while before the battery is completely exhausted and the unit shuts down.

How long does it take to recharge the battery?

BlueDriver-M3 can fully charge the internal battery in about 2 ½ hours. These batteries do not have a “charging memory” and they can be recharged at any time without changing their life expectancy.

How do I replace the battery in this unit?

This is not a user replaceable battery. Please contact JK Audio or a factory authorized service center for battery replacement.

Technical Information

Battery Information

BlueDriver contains a rechargeable Lithium-Ion battery. These batteries do not have a “charging memory” and can be recharged at any time without changing their life expectancy. All rechargeable batteries have a limited life and will gradually lose their capacity to hold a charge. This loss of capacity is irreversible. To get the most from your BlueDriver, the battery should not be allowed to fully discharge. If this unit is not in use, the battery should be recharged at least every 90 days. The Lithium-Ion battery in this device is not user replaceable. Please contact JK Audio or a factory authorized service center for battery replacement.

Safety Precautions

While BlueDriver was designed to be very rugged and durable, it is not waterproof and care should be taken to keep the unit dry.

To maintain quality performance and prolong battery life, this device should be charged, operated and stored within the temperature ranges below.

45°C (113°F)	45°C (113°F)	45°C (113°F)
▲	▲	▲
Charging Temp.	Operating Temp.	Storing Temp.
▼	▼	▼
0°C (32°F)	-10°C (14°F)	-20°C (-4°F)

Technical Information

Input

Connection: 1/8" (3.5 mm) stereo

Impedance: 20k ohms

Level: -10 dBu nom.

Output

Connection: 3 pin male XLR

Impedance: 1k ohms

Level: -34 dBu nom.

Power

Connector: Mini-USB Series B

Battery: (250 mAh) Internal Lithium-Ion
Polymer rechargeable

What is the Difference between Bluetooth Profiles?

Headset: Facilitates mono, full-duplex audio between two paired devices.

Hands-Free: Similar to Headset profile, but allows the receiving device more control over the call, such as volume, accept/reject/end a call.

Dimensions

Size: 1.1" x 4.4" (2.8 cm x 11.2 cm)

Weight: 2.1 oz (60 g)

Bluetooth Wireless Technology

Standard: Bluetooth 3.0

Range: 66 feet (20 meters)

Frequency Response: **Hands-Free (Full Duplex):**
300 Hz–3.4 kHz
Hands-Free (Full Duplex HD):
50 Hz–7 kHz
A2DP (Master » Headset):
30 Hz–17 kHz

Audio Recording:
End-to-End 25 ms using HD Voice Profile.
Latency: **Streaming Full Bandwidth Audio:**
150 ms using Bluetooth A2DP Profile.

A2DP (Advanced Audio Distribution Profile):
Simplex stereo music streaming.

BlueDriver will first attempt to connect using the Hands-Free Profile. If the Hands-Free Profile is not available, BlueDriver will attempt to connect using the A2DP streaming Profile.

Declaration of Conformity

Manufacturer's Name: JK Audio, Inc.
Manufacturer's Address: 1311 E 6th Street
Sandwich, Illinois 60548 USA

Declares that the product:

Product Name: BlueDriver M3™ Wireless Audio Interface
Model Numbers: BlueDriver M3

Conforms to the following Product Specifications:

ESD: EN 55024:1998; EN 61000-3-2; EN 61000-3-3

Emissions: EN 55022:2006
AS/NZS CISPR 22 (2002)
FCC Part 15, Subpart B
ICES-003

Bluetooth Radio: EN 300.328
FCC Part 15.247
FCC ID QOQWT32AE
IC 5132A-BGTWT32AE

FCC Compliance Notice

The product herewith complies with the requirements of the following Directives and carries the CE marking accordingly:

LVD 2006/95/EC (Safety)
EMC 04/108/EEC (EMC)
RoHS Directive 2002/95/EC

The Technical File containing supporting documentation is maintained at:

JK Audio, Inc (Corporate Headquarters)
Compliance Manager
1311 E 6th Street
Sandwich, Illinois 60548 USA
+1-815-786-2929 phone
+1-815-786-8502 fax

FCC Part 15 Compliance

This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used

in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense. Changes or modifications not expressly approved by JK Audio can void the user's authority to operate the equipment.

BlueDriver-M3™

Wireless Audio Interface



User Guide Version 12/8/18

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