

Composite/Stereo Balun Specifications:

Models and Dimensions:

UB-Receive (black enclosure): 1.1" x 2.6"w x 2.8"d (28 x 66 x 71 mm).

UB-Send (black enclosure): 1.1" x 2.6"w x 2.8"d (28 x 66 x 71 mm).

UTP-Receive (in-wall Decora™ version): 4.1"h x 1.4" w x 2.0"d.

UTP-Send (in-wall Decora™ version): 4.1"h x 1.4" w x 2.0"d.

UTP-Hub: Wall mount 6.5" x 3.4" x 1.75" d (16.5 x 8.6 x 4.5 cm)

Input and Outputs:

Send Unit: two stereo input RCA jacks, one composite input RCA jack, one RJ-45 out-jack, one-DC power input.

Receive Unit: two stereo output RCA jacks, one composite video output RCA jack, one-DC power input.

Video Bandwidth: 100 MHz +/- 3 dB.

Video Input and Output: 0.5 V to 2V p-p.

Audio Input Impedance:

Receive Unit: 20k ohms, max 3 Vp-p.

Frequency Response: 10Hz-50kHz +/- 3 dB

Power:

Send Unit: 12 VDC unregulated (one PS1202 will power one each send and receive). Suggest Knoll PS1202.

Receive Unit: 12 VDC unregulated (one PS1202 will power one each send and receive).

Warranty

Knoll Systems warrants balun products sold in the USA and Canada by authorized Knoll dealers to be free of defects in materials and workmanship. This warranty extends for three full years from the date of purchase by the original consumer. Any products returned to Knoll Systems and found to be defective by Knoll Systems within the warranty period will be repaired or replaced at Knoll System's option, at no charge. Knoll Systems will not be responsible for the actual cost of installation or removal of the product, nor for any incidental or consequential damages. Some states do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation may not apply to you. This warranty gives you specific legal rights. You may have additional legal rights that vary from state to state.

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UB-Composite/Stereo Receiver
UB-Composite/Stereo Sender
UTP-Composite/Stereo Receiver
UTP-Composite/Stereo Sender



Installation Instructions v2.0

Warning: To be installed and/or used in accordance with local electrical codes and regulations. If you are not sure about any part of these instructions, consult a qualified electrician.

Caution: Do not install this product in an electrical junction box with 110V or higher unless an approved barrier separates the high and low voltage sections.

Introduction: Thank you for your purchase of a Knoll active balun system. This system is specifically designed to send a stereo line level and an composite video signal safely down a cat 5 or cat 5e wire up to 1000 feet without encountering noise problems. Balun is an acronym for:

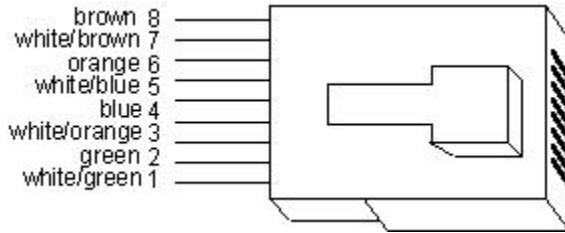
BALance – **UN**balance

The send module takes a conventional stereo line level signal and a composite video signal and balances it (signal is not tied to a ground reference) then sends it via cat 5 to the receive module (with power from the send module). The receive module unbalances the signal back to its former state. This process does not allow any stray magnetism of any sort to contaminate the signal while it is being transported.

Features:

- Tabletop box design or Decora™ style available.
- Safely sends stereo and video up to 1000' (300 m).
- Six output hub available.
- PS1202 power supply required on send or receive only.
- Mix and match tabletop and decora style.

Wiring: A send module (UB-Send or UTP-Send) needs to be connected to a Knoll receive module (UB-Receive or UTP-Receive) to work correctly. The send and receive module



are connected using a single cat 5 wire using all 8 conductors. Connection is made with the RJ45 connector (RJ45 plug not supplied). Always use standard cat 5 wiring practices. Using the correct wire pairs and polarity is **VERY** important.

Connection to Stereo Video Equipment: Connect the UB-Send or UTP-Send gold RCA jacks to the appropriate **outputs** on your TV, VCR, stereo or other equipment. If your system audio is mono, connect the left connector only.

When connecting a video output to a TV **and** the UB-Send or UTP-Send with a Y-cord, the video signal may exhibit poor picture quality. If this is the case, on the UTP-Send move the shunt next to the right (gold) connector from "75" position to the "Lp" or loop position (see figure below). The UB-Send has a switch on it. Normally it is in the in position.

Make sure a good quality RJ45 8-8 crimper is used to connect the RJ45 connector to the cat 5 wire. Poor crimping and mismatched wires are the most frequent cause of installation problems.

Connection to the amplifier, TV or other components: Connect the two gold RCA jacks on the UB-Receive or the UTP-Receive with a good quality gold connector RCA jumper cable to the appropriate **stereo input** jacks on your amplifier, receiver, TV or other component. Make sure the correct stereo input is selected. Connect the gold video jack (yellow center) with a good quality video RCA jumper to the video input on the TV or other unit.

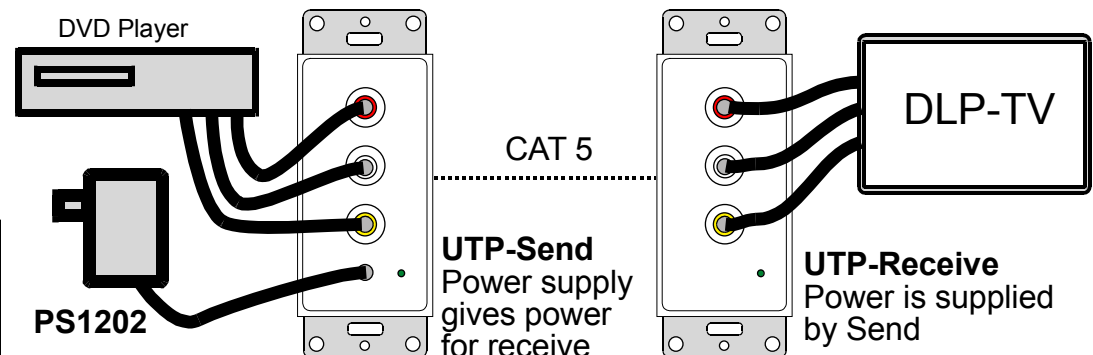
Multiple Connection(s): If the stereo/video signal needs to be sent to more than one receiver, this can easily be accomplished by paralleling or Y cording the composite and video inputs to the send unit. Depending on the source components output, it should be acceptable to Y cord up to ten send baluns. Each Knoll composite/stereo send balun is connected to one stereo receive balun. Each stereo send unit

requires a PS1202 power supply. The video needs to have its impedance corrected. On ALL BUT ONE UB-Send the switch needs to be in the out position. (One switch has to be IN and the rest are out.) On UTP-Sends the jumper near the right RCA connector on ALL BUT ONE unit move the shunt from the 75 side to the loop side.

A six outlet hub model UTP-Hub is available for this system.

Power Requirements: The whole UB or UTP system requires a single power supply. If you are using a UTP-Hub, the hub always supplies the power for the UB-Send or UTP-Send, so **do not connect another power supply**. If you are using a UB-Receive or UTP-Receive with this send, connect only one 12-15 VDC power supply on either the UTP-Send **OR** the UTP-Receive but not both.

The Knoll send receive system does not have any user adjustments and is completely automatic. If need be, please call our tech line for details at 1 800 566 5579.



The UTP-Send uses very little power and is normally left on. A led lamp shows if power is connected properly to the UTP-Send.

This product may contain lead that some states have determined are harmful. Wash you hands after touching this product.

Decora™ is a trademark of Leviton

Shunt in this position.
UTP-Send side view

