



Atlona HD/SD-SDI over Optical Fiber Extender

User Manual

AT-SDI10SR-LC



<http://www.atlona.com/>



Safety and Notice

Atlona **AT-SDI10SR-LC HD/SD-SDI over Optical Fiber Extender** has been tested for conformance to safety regulations and requirements, and has been certified for international use. However, like all electronic equipments, AT-SDI10SR-LC should be used with care. Please read and follow the safety instructions to protect yourself from possible injury and to minimize the risk of damage to the unit.

- Follow all instructions and warnings marked on this unit.
- Do not attempt to service this unit yourself, except where explained in this manual.
- Provide proper ventilation and air circulation and do not use near water.
- Keep away the objects that might damage the device and assure that the placement of this unit is on a stable surface.
- Use only the power adapter, power cords and connection cables designed for this unit.
- Do not use liquid or aerosol cleaners to clean this unit. Always unplug the power to the device before cleaning.

Atlona AT-SDI10SR-LC is an ideal and economic solution designed for transmission of multi-rate SDI video, with embedded audio and metadata over a multi-mode optical fiber cable.

The transmitter module receives one HD-SDI electrical input, perfectly converts SMPTE 292M, SMPTE 259M, or DVB-ASI electrical SDI signal to multi-mode optic SDI signals. The receiver module receives optical signal from input LC connector, and then perfectly converts it to electrical SDI signal. Both transmitter and receiver provide equalizing and re-clocking at input unit in order to re-construct the signal for consistent quality. The AT-SDI10SR-LC is perfect for today's broadcast applications, including video production, video editing, studio to studio and studio to CATV head end. In addition, since transmission of content is inherently secure and immune to outside interference, fiber applications are favored in government, military, and medical environments.

Features

- Enable transmission of digital video signal over optic fiber
- Automatic cable EQ up to 300m/1000ft at SD-SDI or 150m/500ft for HD-SDI
- Standard LC-type fiber optic connector
- Supports following protocols:
 - SMPTE 259M (270Mbps)
 - SMPTE 259M (360Mbps)
 - SMPTE 292M / HDTV (1.485Gbps and 1.485/1.001Gbps)
 - DVB ASI (270Mbps)
- Automatic reclocked
- HD/SDI Input signal detection LED

Package Contents

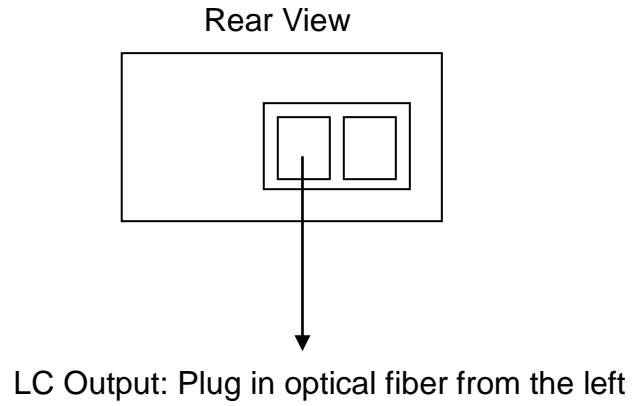
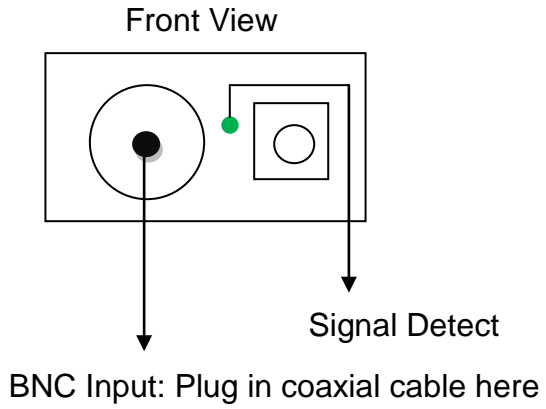
- 1x AT-SDI10SR-LC (Transmitter + Receiver)
- 2x 5V 4A DC power adapter
- 1x User Manual

Technical Specifications

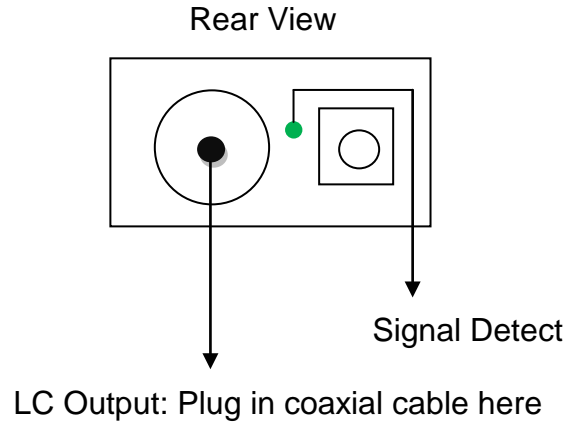
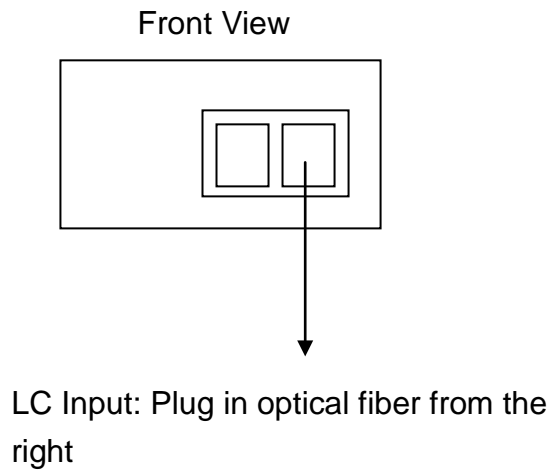
- Input connector:
 - Transmitter: 1x 75Ω BNC SDI
 - Receiver: 1x Optical LC
- Output connector:
 - Transmitter: 1x Optical LC
 - Receiver: 1x 75Ω BNC SDI
- SDI signal type: SMPTE-292M, SMPTE-259M, DVB-ASI
- Fiber optic: Wavelength: 850 nm
 - Type: Multi-mode
 - Optical power Better than -7.5 dBm
 - Rise/fall <500 pS
 - Extinction ratio 8-10
 - Overshoot < 10%
 - Jitter < 0.2 UI
- Data rates: 1485 / 1483 / 270 Mbps
- Cable equalization: up to 300m/1000ft for 270 Mbps; up to 150m/500ft for 1.485 Gbps
 - Automatic detection: 143Mbps / 270Mbps / 1.483Gbps / 1.485Gbps
 - Automatic bypass: 177Mbps / 360Mbps / 540Mbps
- Power supply: 5V 4A DC
- Operation temperature: 0°C~55°C / 32°F~131°F
- Dimensions: 105mm x 80mm x 25mm / 4.1"x3.2"x1" (L x W x H)
- Weight: 324g / 11.4oz

Hardware Installation

Transmitter



Receiver



Limited Warranty

Atlona warrants the AT-SDI10SR-LC **HD/SD-SDI over Optical Fiber Extender** to be free from defects in the material and workmanship for 1 year from the date of purchase from Atlona or an authorized dealer. Should this product fail to be in good working order within 1 year warranty period, Atlona, at its option, repair or replace the unit, provided that the unit has not been subjected to accident, disaster, abuse or any unauthorized modifications including static discharge and power surges.

Unit that fails under conditions other than those covered will be repaired at the current price of parts and labor in effect at the time of repair. Such repairs are warranted for 90 days from the day of reshipment to the buyer. If the unit is delivered by mail, customers agree to insure the unit or assume the risk of loss or damage in transit. Under no circumstances will a unit be accepted without a return authorization number.

The warranty is in lieu of all other warranties expressed or implied, including without limitations, any other implied warranty or fitness or merchantability for any particular purpose, all of which are expressly disclaimed.

The content of this manual has been carefully checked and is believed to be accurate. However, Atlona assumes no responsibility for any inaccuracies that may be contained in this manual. Atlona will NOT be liable for direct, indirect, incidental, special, or consequential damages resulting from any defect or omission in this manual, even if advised of the possibility of such damages. Also, the technical information contained herein regarding the AT-SDI10SR-LC features and specifications is subject to change without further notice.