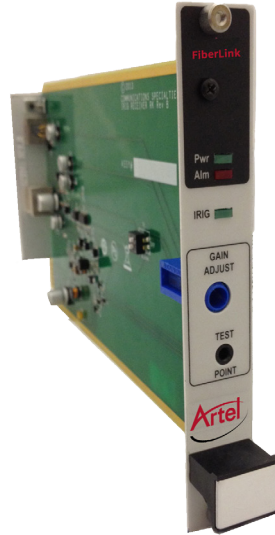
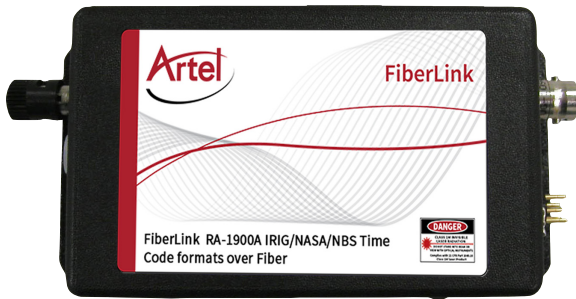




FiberLink® XA/RA-1900, XA-1903 IRIG/NASA/NBS Time Code Formats over Fiber



FEATURES

Ideal applications for Military and the Aerospace Industries

Transmits IRIG and similar NASA and NBS standard instrumentation time-code formats up to 100 kHz

Combinations of three different units may be configured to provide point-to-point, point-to-multipoint

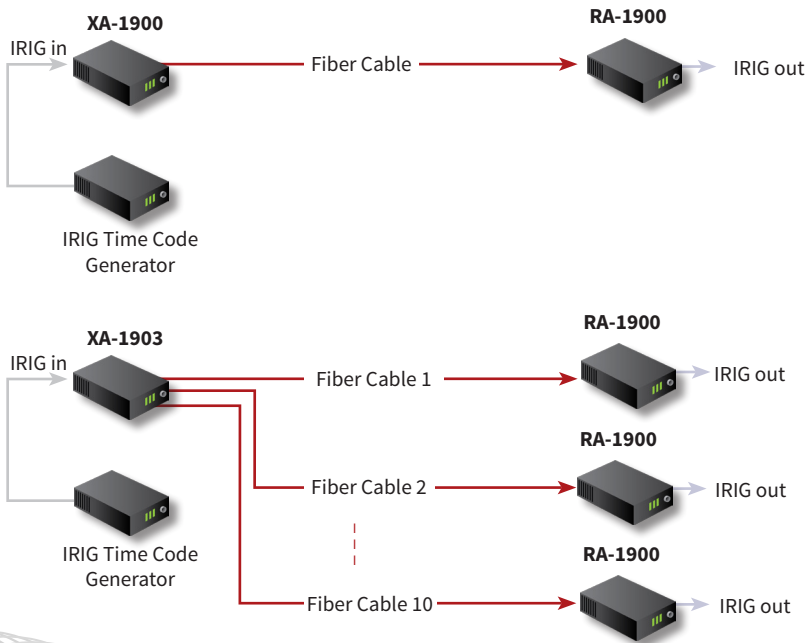
Built-in regulated power supplies allow operation from unregulated AC or DC sources

Transmits at 850 nm or 1310 nm over standard multimode or single mode fiber

XA/RA-1900 cards fit the 6000A card cage. The XA-1903 is provided in a 19" rackmountable enclosure

Fiber optic transmission of IRIG time-code signals, configured for point-to-point, point-to-multipoint signal distribution

The FiberLink XA/RA-1900A and XR-1900 fiber optic systems transmit IRIG and similar NASA and NBS standard instrumentation time-code formats over standard multimode or single mode fiber at 850 nm or 1310 nm.



SPECIFICATIONS

Data Specifications

| | |
|-------------------------------|-----------------------------------|
| Number of Channels | 1 |
| Number of Outputs per Channel | XA-1900 & RA-1900: 1, XA-1903: 10 |
| IRIG Compatibility | A through H |
| System Bandwidth (+0, -3 dB) | 20 Hz to 100 kHz |
| Input/Output Load Impedance | 600 Ohms nominal |
| Input/Output Signal Voltage | 1 volt rms |
| Signal/Noise Ratio | 67 dB typical |
| Noise Floor (full bandwidth) | 1.3 mv rms maximum |

General Specifications

| | |
|-----------------------------|--|
| Number of Fibers: | |
| XA-1900 & RA-1900: | 1 fiber |
| XA-1903: | 10 fibers |
| Operating Temperature: | |
| | -20 to +60o C |
| Operating Power (per unit): | |
| | +15 to +25 volts DC @ 250 mA or 14 to 18 volts AC, 50/60 Hz |
| Dimensions: | |
| XA-1900 & RA-1900: | 5 W x 1.25 H x 2.5 L (inches) 127 W x 32 H x 64 L (mm) |
| XA-1903: | 19 W x 1.75 H x 6.5 L (inches) 483 W x 45 H x 165 L (mm) |
| Weight: | |
| XA-1900 & RA-1900: | Approx. 1 lb; 0.45 kg |
| XA-1903: | Approx. 3 lbs; 1.36 kg |
| Optical Connectors: | |
| | ST: Multimode ST or FCPC: Single Mode |
| Optical Wavelength: | |
| | 850 nm or 1310 nm MM 1310 nm SM |
| Optical Fiber: | |
| | 50 or 62.5 micron multimode fiber 8/10 micron single mode |
| System Delay: | |
| | < 5 uSec; Measured from a Transmitter input to a Receiver output with 1 meter of fiber. Does not include any additional length of fiber. Consult fiber cable manufacturer for specific propagation delay. An approximate fiber cable propagation delay is approximately 5 uSec/km. |
| MTBF: | |
| | XA-1900 series: 195,000 hours RA-1900 series: 181,000 hours XA-1903 series: 74,000 hours |

Operating Loss Budget & Maximum Usable Distance*

| Wavelength | Loss (dB) | Distance (km) |
|------------|-----------|---------------|
| 850nm MM | 0-10dB | 0-3.5 (62.5u) |
| 850nm MM | 0-10dB | 0-4 (50u) |
| 1310nm MM | 0-13dB | 0-10 (62.5u) |
| 1310nm MM | 0-13dB | 0-12 (50u) |
| 1310nm SM | 0-13dB | 0-20 |

For system to operate properly, operating loss budget must not be exceeded.



UPDATED 11/01/2016

All specifications subject to change without notice. ©2016



Ordering Information

| Part Number | Description | Fibers |
|--------------|---|--------|
| XA-1900-1 | Transmitter, 850 nm, Multimode, Box, ST | 1 |
| XA-1900-C1S | Transmitter, 850 nm, Multimode, Card, ST | 1 |
| XA-1900-3 | Transmitter, 1310 nm, Multimode, Box, ST | 1 |
| XA-1900-C3S | Transmitter, 1310 nm, Multimode, Card, ST | 1 |
| XA-1900-7-ST | Transmitter, 1310 nm, Single Mode, Box, ST | 1 |
| XA-1900-C7S | Transmitter, 1310 nm, Single Mode, Card, ST | 1 |
| RA-1900-1 | Receiver, 850 nm, Multimode, Box, ST | 1 |
| RA-1900-C1S | Receiver, 850 nm, Multimode, Card, ST | 1 |
| RA-1900-3 | Receiver, 1310 nm, Multimode, Box, ST | 1 |
| RA-1900-C3S | Receiver, 1310 nm, Multimode, Card, ST | 1 |
| RA-1900-7-ST | Receiver, 1310 nm, Single Mode, Box, ST | 1 |
| RA-1900-C7S | Receiver, 1310 nm, Single Mode, Card, ST | 1 |
| XA-1903-1 | Transmitter, 850 nm, Multimode, ST | 10 |
| XA-1903-3 | Transmitter, 1310 nm, Multimode, ST | 10 |
| XP-1000A | 115 volts AC, 50/60 Hz plug-in adaptor | |
| XP-1001 | 230 volts AC, 50/60 Hz plug-in adaptor | |

Please note that the card versions of these products are compatible with the model 6000A card cage used with most FiberLink products and use 1 slot. Box versions require the XP-1000A power supply. Box versions can be adapted for use with the discontinued MCR-1000 rack by ordering the AP-1000 adapter plate. XA/RA-1900-7 are available with FCPC optical connectors at no additional cost. The XA-1903 is provided in a 19" rackmountable enclosure.

Sales



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