

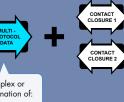
# FT/FR-1U2C1G/1P2C1G-x

DigiCool™

Digitaly Encoded One 10-Bit 10MHz Video Mux with Two Bi-directional Contact Closure, One Full Duplex Multiprotocol Data and One Return Channel of Extended Range Pelco or Panasonic "up-the-coax" Control Data

# **EXTENDED RANGE CAMERA CONTROL**





Full Duplex or Combination of: RS 232 RS 422 RS 485 (2 OR 4 wire) BI-PHASE MANCHESTER

#### FEATURES

- One Digitally Encoded 10-bit 10 MHz Video Signal with Integrated Pelco® / Panasonic® "up-the-coax" PTZ Camera Control
- 10 MHz Video Bandwidth
- Model supports both Pelco® Coaxitron and Panasonic® "up-the-coax" PTZ Camera Control
- Integrated Pelco® / Panasonic® "up-the-coax" PTZ Camera Control is Time Base Corrected for long-distance operation
- Meets RS-250C Short Haul Transmission Specifications
- NTSC, PAL, SECAM Compatible
- Two Channels of Bi-Directional Contact Closure and One Channel of Bi-Directional Multi-protocol Data
- Wide Optical Dynamic Range: Eliminates Need For Optical Attenuators
- SpectraSmart<sup>™</sup> PC Based Network Management
- SpectraView<sup>™</sup> Fault / Setup Firmware
- Local LED Status Indicators to Monitor Critical System Diagnostics for Performance Parameters
- ST, FC Optical Connector
- Hot Swappable Cards
- 75 Ohm BNC Video Connector (Gold Center Pin)
- Meets EIA RS-170, RS-343A Formats
- Screw terminal connectors for Data and Contact closures

#### DESCRIPTION

The FT/FR-1U2C1G/1P2C1G-x series fiber optic transmission system that takes advantage of Meridian's new digital encoding technology to transport the following signals:

- 1. One real-time, high quality, 10-bit 10 MHz video with Pelco or Panasonic up-the-coax PTZ control data.
- 2. Two full duplex contact closure channels
- 3. One user selectable, full duplex RS-232, RS-485 (2 or 4 wire), RS-422, Manchester, Bi-Phase or in combination

Time Base Correction feature provides transmission distances of:

- up to 3Km for multimode
- up to 50Km for singlemode

Both, multimode and singlemode, one fiber versions are available. The functionality of FT/FR-1U2C1G/1P2C1G-x series is further enhanced by its compatibility with Meridian's PC based SpectraSmart, Network Management and Remote Diagnostic Software System. SpectraSmart supervises the operating parameters of the transmission system such as status on video levels, sync, carrier detect, voltage, temperature, optical levels, data present etc. See the SpectraSmart brochure for more details.

#### CONFIGURATIONS

The FT/FR-1U2C1G/1P2C1G-x products are available as rack mount cards that can be installed in Meridian's card chassis, desk chassis and 19" racking frames. These systems can be made a standalone system by using the SR-500/s, 1 slot desk / wall mount chassis (87VAC-264VAC).

#### MARKETS

- $\sqrt{}$  Security and Surveillance
- $\sqrt{}$  Intelligent Transportation System (ITS)
- $\sqrt{}$  Access Control Systems

# **SPECIFICATIONS:**

# Video

Format
Voltage/Impedance
Bandwidth
Differential Gain
Differential Phase
SNR
Return Loss
Field Tilt

## Data

Formats .....

Data Rate (RS-232)..... Data Rate (RS-422, RS-485).. Bit Error Rate .....

# **Contact Closure**

Rate
Contact Rating
Contact Bounce Time

**Optical** 

```
Fiber Data Rate .....
```

## **Connectors**

```
Video .....
Optical .....
Power (module) .....
Data/Audio/Contact closure ...
```

NTSC, PAL, SECAM 1 Vp-p, 75 Ohm, 1.5 Vp-p max. 5 Hz to 10 MHz @ -3 dB <0.6% < 0.3° >67 dB (weighted)\* >30 dB < 0.5%

RS-232 w/ full speed handshake, RS-485, RS-422, Manchester or Bi-Phase DC to 125 Kb/s DC to 250 Kb/s 10-9\*

75 Ohm BNC (Gold Center Pin)

10 Hz.(Per Channel)

0.3A, 30V AC / DC

5 ms

350 Mb/s

#### Power \*\*

Card .....

## Indicators (LEDs)

1 - Green
1 - Bi-color
2 - Green
4 - Green

#### Power On TX Carrier/ Laser Over Current RX Carrier - Present / Error Video Present / Overload Sync. Present / Load Absent Data Present Contact Closure Present

5 Watts

#### **Physical**

Dimensions (Card) .....

Weight (Card)							
No. of Slots							
Module							

160 mm (6.3") L, 127 mm (5") W 20mm (0.80") W 450 gms (16 Oz)

See SR-500 Brochure

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# **Enviromental**

Quality

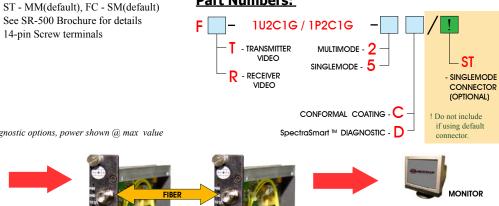
Operating Temperature ... Storage Temperature ...... Relative Humidity .....

MTBF .....

-34°C to +74°C -55°C to +85°C 0 to 95% Non-condensing

>170,000 hours @ Ground Fix 35°C per MIL217F

# Part Numbers:



\* measured @ max. optical budget

CAMERA

\*\* Due to variations of drivers and diagnostic options, power shown @ max value





FT-1U2C1G/1P2C1G-x Transmitter

FR-1U2C1G/1P2C1G-x Reciever

"UP-THE-COAX Control IN ONE DATA CHANNEL BY ATION OF RS 232, RS 485, RS 422

BI-PHASE, MANCHESTER

TWO Contact Closure

# **OPTICAL:**

Meridian optic code	Fiber Type/Size (um)	Optical Output (dBm)	Receiver Sensitivity (dBm)	Optical Budget (dB)	Wavelength (nm)	Optical Connector	Optical Dynamic Range (dB)	Max Distance (Km)
2	Multimode (FP Laser) 62.5 / 125	-5	-25	20	1300 / 850	ST	25	3
5	Singlemode (FP Laser) 9 / 125	-5	-25	20	1310 / 1550	ST, FC	25	55

Singlemode DFB lasers available on request

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ver. 04/2014 D