

### **iConverter 100Fx/Tx**

#### **100BASE-TX to 100BASE-FX Managed Ethernet Media Converter**

The *iConverter* 100Fx/Tx managed media converters are members of the modular *iConverter* product family, and provide 100BASE-TX UTP to 100BASE-FX fiber conversion.

The *iConverter* 100Fx/Tx models are available with multimode, single-mode and single-fiber options. They support ST, SC and LC connectors. The UTP port supports 100BASE-TX in either Half or Full-Duplex mode. A UTP crossover switch eliminates the need for a crossover cable and facilitates connectivity to network equipment such as hubs, switches and workstations.

The 100Fx/Tx features user-selectable Link Propagate, Link Segment, Remote Fault Detection and Symmetrical Fault Detection modes to facilitate quick fault detection, isolation and reporting.

*iConverter* 100Fx/Tx modules are hot-swappable and can be mounted in a 19-Module (2U high) or 5-Module (1U high) rack-mountable chassis (19-inch or 23-inch) with any combination of redundant AC, 24VDC or 48VDC power supplies. They can also be mounted in a 2-Module AC or 18 to 60VDC powered chassis, or in a 1-Module AC/DC powered chassis.



### **KEY FEATURES**

- The *iConverter* 100Fx/Tx is an IEEE 802.3 compatible 100BASE-TX UTP to 100BASE-FX fiber converter
- Supports multimode, single-mode, and single-fiber with ST, SC and LC connectors
- UTP port supports Half or Full-Duplex 100Mbps Ethernet
- UTP crossover switch eliminates the need for a crossover cable
- User-selectable link fault detection modes facilitate quick fault detection, isolation and reporting
- Management is available with the addition of a management module to the chassis
- SNMP management via *NetOutlook*® provides real-time port and module information, remote parameter configuration and trap notification
- Modules are hot-swappable in 19-Module, 5-Module, 2-Module or 1-Module chassis
- LED displays for immediate visual status of each port
- Lifetime Warranty and free 24/7 Technical Support



The *iConverter* Multi-Service Platform consists of Network Interface Devices, T1/E1 multiplexers, CWDM multiplexers and managed media converters that combine to deliver Carrier Ethernet and TDM services over fiber or CWDM wavelengths. This flexible architecture supports a wide variety of configurations for scalable and reliable fiber connectivity in Service Provider and Enterprise networks.

# SPECIFICATIONS

<b>Model Type</b>	100Fx/Tx	
<b>Protocols</b>	100BASE-FX, 100BASE-TX	
<b>Copper Connectors</b>	RJ-45	
<b>Fiber Connectors</b>	SC, ST, LC, Single-Fiber SC	
<b>Controls</b>	UTP X-over, LS/LP, RFD, SFD UTP FDX/HDX, UTP A/N	
<b>LED Displays</b>	Power, FO link, UTP link, Auto, FDX/HDX	
<b>Dimensions</b>	W: 0.85" x D: 4.5" x H: 2.8"	
<b>Weight</b>	8 oz.	
<b>Compliance</b>	UL, CE, FCC Class A, NEBS Level 3	
<b>Power Requirement</b>	0.7 @ 3.3VDC (typical)	
<b>Temperature</b>	Standard:	0 to 50° C
	Wide:	-40 to 60° C
	Storage:	-40 to 80° C
<b>Humidity</b>	5 to 95% (non-condensing)	
<b>Altitude</b>	-100m to 4000m	
<b>MTBF (hrs)</b>	730,000	

# MANAGEMENT

Management is accomplished by using a Network Management Module (NMM2) or a media converter with integrated management (such as an *iConverter* 10/100M2) that provides monitoring, remote configuration and trap notification. The management module can be accessed via SNMP, Telnet and via a serial port. The SNMP-based management is accomplished via Omnitron's intuitive, graphic-oriented *NetOutlook* management software or third party SNMP management software. Management via the Telnet and the serial interfaces have an easy-to-use, menu-driven interface.

Some of the real-time 100Fx/Tx parameters that can be monitored include power, link and data receive status. Other parameters include module type and model, hardware and software revisions, serial numbers and a user-defined identifier.

The user can override the 100Fx/Tx module's physical DIP-switch settings by using SNMP or Telnet to remotely configure DIP-switch-selectable parameters such as Link Propagate, Link Segment, Remote Fault Detection and Symmetrical Fault Detection.

In addition to all standard *iConverter* SNMP traps such as module insertion and removal, the 100Fx/Tx modules can generate traps on port state changes including link-up and link-down. Trap monitoring of specific events can be selectively enabled or disabled by the network administrator.

# ORDERING INFORMATION

Type	Distance	Connector Type			Tx [nm]	Rx [nm]	Min. Tx Power [dBm]	Max. Tx Power [dBm]	Min. Rx Power [dBm]	Max. Rx Power [dBm]	Min. Attenuation (dB)	Link Budget [dB]
		ST	SC	LC								
MM/DF	5km	<b>8360-0</b>	<b>8822-0</b>	-	1310	1310	-24	-14	-31	-14	-	7
SM/DF	30km	<b>8361-1</b>	<b>8823-1</b>	<b>8367-1</b>	1310	1310	-15	-8	-31	-8	-	16
SM/DF	60km	<b>8361-2</b>	<b>8823-2</b>	<b>8367-2</b>	1310	1310	-5	0	-31	-3	3	26
SM/DF	120km	-	<b>8823-3</b>	<b>8367-3</b>	1550	1550	-5	0	-31	-3	3	26
SM/SF	20km	-	<b>8370-1</b>	-	1310	1550	-15	-5	-30	-3	-	15
SM/SF	20km	-	<b>8371-1</b>	-	1550	1310	-15	-5	-30	-3	-	15
SM/SF	40km	-	<b>8370-2</b>	-	1310	1550	-8	0	-30	-3	3	22
SM/SF	40km	-	<b>8371-2</b>	-	1550	1310	-8	0	-30	-3	3	22

For wide temperature (-40 to 60° C), add a "W" to the end of the model number. Consult factory for extended temperature (-40 to 75° C) models.

When using single-fiber (SF) media converter models, the Tx wavelength on one end has to match the Rx wavelength on the other.