AI Smart Managed 10G (3R) Repeater OEO Converter

Features

- ► Mobile APP / Web Management: Monitoring and control via self-developed Mobile APP or Web interface.
- ► Build-in Front Panel Screen Display: Front panel screen with buttons displays page by page the real-time information including current, voltage, temperature, TX/RX optical power, data rate.
- ► User-Friendly Interface: The simplified and visual design, as well as highlighting key parameters, makes it easy for even non professionals to operate and maintain devices.
- ► Type-C port for easy access to device.
- ► Support loop-back test.
- ► Support 1.25G/2.5G/3.125G/5G/8.5G/10.3125G/11.3G/ 12.5G (Software Option Acceptable)
- ► Support 3R function (Re-amplify, Re-shape and Re-time).



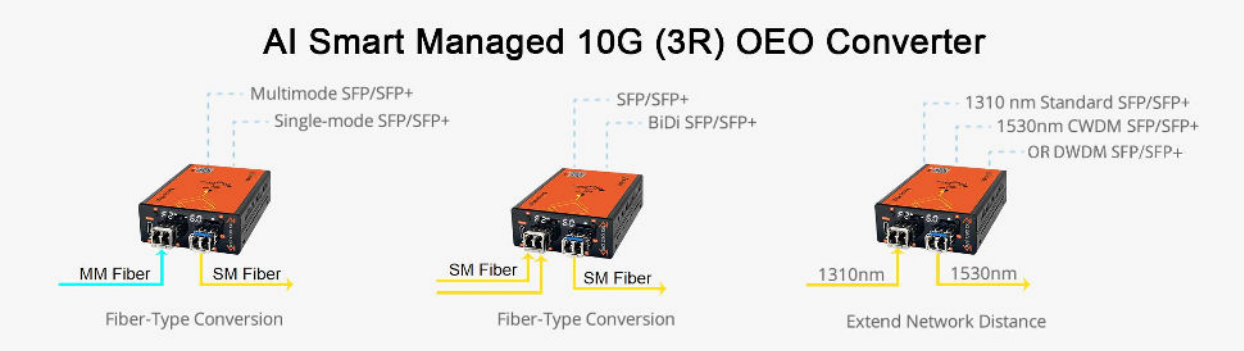
Overview

The **LNK-AI2402-OEO series** 10G (3R) OEO Converter — part of E-link's independently developed **AI NETWORK** series — redefines intelligent device management. It integrates built-in monitoring and remote configuration, eliminating the need for dedicated external test equipment.

This converter is engineered for operational simplicity and cost efficiency. It enables real-time status monitoring — including power, port conditions, and comprehensive SFP module diagnostics (optical power, wavelength, transmission distance, data rate, temperature) — directly via a mobile app or the local display. Multi-level alert systems and streamlined maintenance workflows significantly reduce both installation effort and long-term operational expenses, delivering a highly cost-effective line management solution for modern network demands.

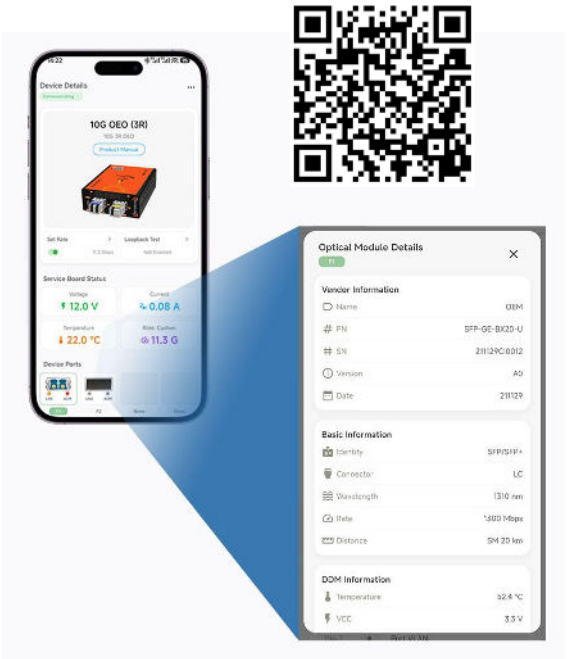
Designed for network backbone applications (SAN, LAN, MAN), the LNK-AI2402-OEO supports multiple 10G protocols, including SDH/SONET STM-64/OC-192, 10G Fiber Channel, and 10G Ethernet. It is suitable for deployment in R&D laboratories, data centers, and telecommunication rooms. The unit also supports optical wavelength conversion (1310nm/1550nm/CWDM/DWDM) and features loop-back capability for testing and troubleshooting.

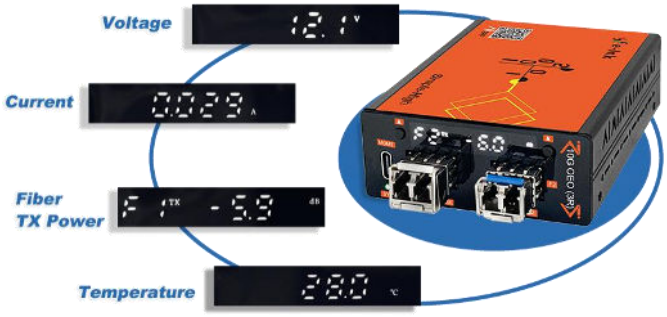
Application





E-link App and PC Web

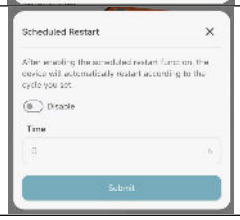
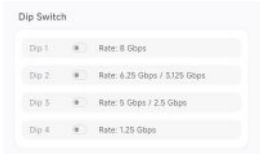






Technical Indexes

AI Smart Managed 10G(3R) OEO Converter		
Access Mode	Multi-rate 1.25G/2.5G/3.125G/5G/8.5G/10.3125G/11.3G/12.5G (Software Option Acceptable) SFP+ to SFP+ slot 10G(3R) OEO Converter Support 3R function	
Fiber Ports		
Transmission Speed	10G:1.25Gb/s- 10.3125Gb/s-/12.5Gb/s	
Protocols	1.25G	
	2.5G	
	3.125G	
	5G	
	8.5G	
	10.3125G	
	11.3G	
	12.5G	
Optical Port F1	1 x SFP/SFP+ 1.25G/2.5G/3.125G/5G/8.5G/10.3125G/11.3G/12.5G (Software Option Acceptable) Support 3R function	
Optical Port F2	1 x SFP/SFP+ 1.25G/2.5G/3.125G/5G/8.5G/10.3125G/11.3G/12.5G (Software Option Acceptable) Support 3R function	
Max Packet Forwarding Rate	14,880,950/s	
Interface port		
Management Port	Standard Type-C port for easy access to device	
Display Screen	Display voltage, current, temperature and two optical modules TX/RX power, data rate	
AI Smart Managed Functions		
Service Board Status	Temperature	
	Voltage	
	Current	
SFP Port F1 (Support 3R function)	Link Status	
	PN/SN	
	TX Power	
	RX Power	
	All DDM Information	
SFP Port F2 (Support 3R function)	Link Status	
	PN/SN	
	TX Power	
	RX Power	
	All DDM Information	

Fiber Port Alarm	Support		
Scheduled Reset	Support		
DIP Switch	Dip1	8.5G	 
	Dip2	3.125G	
	Dip3	2.5G	
	Dip4	1.25G	
Electrical and Mechanical			
Input Power	5~58V DC, 5.5 x 2.1 mm Power Socket		
	External AC-to-DC Adapter		
Power Consumption	1W (Not Including SFP modules).		
Dimensions (W x D x H)	93 x 71 x 29 mm		
Weight	100g		
Casing	Aluminum Case		
Mounting Options	Desktop or mounted on standard 14 slots rack		
LED Indicators			
SYSF1 (ALM)	Green LED Slow Blink: Operating normally		
	Orange LED Blink: USB data transmission		
F1 (LNK)	On: Signal Lock		
	Off: No Signal or Signal unlock		
F1 (ALM)	On: Signal Lock		
	Off: No Signal or Signal unlock		
	On(red): Optical power alarm		
F2 (LNK)	On: Signal Lock		
	Off: No Signal or Signal unlock		
F2 (ALM)	On: Signal Lock		
	Off: No Signal or Signal unlock		
	On(red): Optical power alarm		
Environmental			
Operating Temperature	-20° C to 70° C (-20° F to 162° F)		
Storage Temperature	-40° C to 85° C (-40° F to 185° F)		
Relative Humidity	5% to 95% non-condensing		
MTBF	> 200,000 hrs		
Regulatory Approvals			
ISO9001, CE, FCC Part 15 Class A, RoHS			

Ordering Information

Model	Description
LNK-AI2402-OEO-3R	AI Smart Managed 10G(3R) OEO Converter 1.25G/2.5G/3.125G/5G/8.5G/10.3125G/11.3G/12.5G (Software Option Acceptable) Support 3R function
SFP Options	► SFP option. Please select your SFP on our SFP Options Page.
	► SFP module is to be purchased separately.