



KGC-320, KGC-320-HP



Managed 10/100/1000Base-T to Dual-speed Fiber Media Converters with PoE+ Support

Product Highlights:

- Tri-speed copper to dual-speed fiber conversion
- SFP fiber port flexibility
- Fiber link loop back test
- Remote Copper link monitoring
- Web and SNMP management support
- Traffic control functions
 - Port control and monitoring
 - Flow control
 - Packet type filtering
 - 802.1Q VLAN support
 - Tag stripping
 - Tag insertion
 - IGMP snooping
 - Q-in-Q support
- SNMP trap for port link change
- Firmware update
- High power PoE PSE

Key Features:

- Tri-speed 10/100/1000Mbps copper to dual-speed 100/1000Mbps fiber conversion
- Comply with IEEE 802.3, 802.3u, 802.3ab, 802.3z standard
- Support full wire speed copper to fiber Gigabit conversion
- Support Jumbo frame conversion
- Support auto-negotiation with link partners
- Provide one 100M and one 1000M SFP slots for mounting variety of fiber options
- Provide loop back test function with link partner over fiber link
- Provide monitoring function for remote link partner's copper link status
- Ideal solution for multimode, short reach up to long reach single mode fiber, Bi-Di applications
- Provide high power PoE PSE function on copper port to support PoE-enable Ethernet device
- Web-based and SNMP configuration management support
- Port operating mode, flow control and status monitoring functions
- Tagged or untagged packet filtering
- 802.1Q VLAN tag stripping and tagging
- Provide IGMP snooping
- Support Q-in-Q application with double tag capability
- Support SNMP trap for port link change

Specifications:

Standard	IEEE 802.3, 802.3u, 802.3ab, 802.3z
Copper Port	Shielded RJ-45 10/100/1000Mbps, Full/Half duplex, Auto-negotiation, Auto-MDI/MDI-X
Fiber Port	Two SFP connectors with pre-configured SFP fiber transceiver 100/1000Mbps Full duplex, Auto-negotiation, Far End Fault support
Network Cables	Copper port: Cat.5e recommended or higher up to 100m Fiber port: MMF 50/125μm, 62.5/125μm, SMF 9/125μm
DIP Switches	Copper port operating mode, Flow control, Auto report for remote copper link status
LED Indication	Power status, Local copper port status - link, speed, duplex Remote copper port status - link, speed, duplex Loop back test status, Local fiber port status - link, speed
Jumbo Frame size	Support 9600 bytes max.
Loop Back Test	Push button to start loop back test with link partner over fiber link
PoE PSE	IEEE 802.3at standard (Optional on copper port) PSE pin 4/5 -Positive DC, Pin 7/8 -Negative DC Power delivery 56V/30W max. at port output 2-Event classification support
DC Power Input	Operating voltage range for PoE applications: +45 ~ +57VDC Operating voltage range for Non-PoE applications: +6.5 ~ +60VDC



Ordering Information:

KGC-320-HP-xxx, KGC-320-xxx

Model Ext.	1000M Fiber			Distance
-SX	LC	850	50/125 62.5/125	500m 200m
-LX	LC	1310	MMF SMF	550m 10km
-LX20	LC	1310	SMF	20km
-LX30	LC	1310	SMF	30km
-LX50	LC	1550	SMF	50km
-LX70	LC	1550	SMF	70km
-W3510	LC	Tx1310 Rx1550	Bi-Di SMF	10km
-W5310	LC	Tx1550 Rx1310	Bi-Di SMF	10km
-W3520	LC	Tx1310 Rx1550	Bi-Di SMF	20km
-W5320	LC	Tx1550 Rx1310	Bi-Di SMF	20km

Model Ext.	100M Fiber			Distance
-FM	LC	1310	MMF	2km
-FS30	LC	1310	SMF	30km
-FS60	LC	1310	SMF	60km
-FS100	LC	1550	SMF	100km
-FW3520	LC	Tx1310 Rx1550	Bi-Di SMF	20km
-FW5320	LC	Tx1550 Rx1310	Bi-Di SMF	20km



FCC Part 15, Class A
CISPR 22 Class A

Katron Technologies Inc.

15F-7, No. 79, Sec. 1, Hsin Tai Wu Rd.,
Hsi-chih District, New Taipei City, Taiwan
Tel: 886-2-2698-3878
Fax: 886-2-2698-3873
E-mail: kti@ktinet.com.tw
URL: http://www.ktinete.com.tw

KTI Networks Inc.

10415-A Westpark Drive, Houston,
TX 77042, U.S.A.
Tel: 1-713-266-3891
Fax: 1-713-914-0555
E-mail: contact@ktinet.com
URL: http://www.ktinete.com

Trademarks: All brand names are trademarks or registered
trademarks of their respective holders.
This information is subject to change without prior notice.

Power Consumption	3.7W@7.5V, 5.4W@56V (No PoE use)
Power Supply	External type AC-DC power adapter Rated input voltage 100~240 VAC Rated input frequency 50/60Hz Output voltage 56VDC (+1%/-3%) Output current 1.16A max. IEC320 AC power cord (attachable)
Mounting	Desktop, wall, Din-Rail
Environment	Operating Temperature: -10°C ~ 50°C Storage Temperature: -40°C ~ 85°C Relative Humidity: 10% ~ 90% non-condensing
Dimension	144 x 104.5 x 26 mm (WxDxH)
Approval	FCC Class A, CE mark Class A, C-Tick, IEC60950-1 safety
Management:	
Management	Web-based browser interface, SNMP
Port Control	Operating mode, Flow control
Packet Filtering	802.1Q tagged packet filtering, Untagged packet filtering
802.1Q VLAN	Ingress 802.1Q tag stripping, Egress 802.1Q tagging (tag insertion)
IGMP Snooping	Configuration, status
Monitoring	Local Port status, Remote Port status, Port statistics
Maintenance	Restore factory default, reboot, firmware update
SNMP Trap	Trap events: Boot up, Login failure, Copper port link change, Fiber port link change

Ordering Information:

KGC-320-HP-xxx Media conveter with PoE+ PSE function

KGC-320-xxx Media converter with no PoE function

Fiber Optical Specifications:

Model Ext.	1000M Fiber	Wavelength	Tx Power*	Rx Sens.	Rx Max.
-SX	LC MMF	850nm	-9.5 ~ -4dBm	-18dBm	0dBm
-LX	LC SMF	1310nm	-9.5 ~ -3dBm	-20dBm	-3dBm
-LX20	LC SMF	1310nm	-8 ~ -2dBm	-23dBm	-1dBm
-LX30	LC SMF	1310nm	-4 ~ +1dBm	-24dBm	-3dBm
-LX50	LC SMF	1550nm	-4 ~ +1dBm	-24dBm	-3dBm
-LX70	LC SMF	1550nm	0 ~ +5dBm	-24dBm	-3dBm
-W3510	Bi-Di LC SMF	Tx 1310nm Rx 1550nm	-9 ~ -3dBm	-21dBm	-1dBm
-W5310	Bi-Di LC SMF	Tx 1550nm Rx 1310nm	-9 ~ -3dBm	-21dBm	-1dBm
-W3520	Bi-Di LC SMF	Tx 1310nm Rx 1550nm	-8 ~ -2dBm	-23dBm	-1dBm
-W5320	Bi-Di LC SMF	Tx 1550nm Rx 1310nm	-8 ~ -2dBm	-23dBm	-1dBm
Model Ext.	100M Fiber	Wavelength	Tx Power*	Rx Sens.	Rx Max.
-FM	LC MMF	1310nm	-20 ~ -14dBm	-31dBm	-8dBm
-FS30	LC SMF	1310nm	-15 ~ -8dBm	-34dBm	0dBm
-FS60	LC SMF	1310nm	-5 ~ 0dBm	-35dBm	0dBm
-FS100	LC SMF	1550nm	-5 ~ 0dBm	-35dBm	0dBm
-FW3520	Bi-Di LC SMF	TX 1310nm RX 1550nm	-14 ~ -8dBm	-32dBm	0dBm
-FW5320	Bi-Di LC SMF	TX 1550nm RX 1310nm	-14 ~ -8dBm	-32dBm	0dBm

* Data for 62.5/125μm MMF, 9 /125μm SMF