

PCI Express x4 Single Port 10G Copper Ethernet Network Adapter (Aquantia AQtion AQC107 based)

10G-PA4-T

Overview

10G-PA4-T is a PCI Express x4 single port 10 Gigabit Ethernet network adapter based on the Aquantia AQtion AQC107 chip solution. It is also compatible with PCIe x8 and x16 channels. A high performance, five rate NIC adapter that integrates PCIe, MAC, and PHY to provide power and space efficient connectivity to client systems. The PCIe x4 universal interface gives this product great flexibility.



The integrated PHY can be routed through Cat 6a at speeds up to 10 Gbps over a distance of 100 meters. It also supports 5 Gbps network connections over traditional Cat 5e or Cat 6 cabling. The 10G-PA4-T is IEEE 802.3an & IEEE 802.3bz compliant and enables 2.5GBASE-T, 5GBASE-T, 10GBASE-T, 1000BASE-T and 100BASE-TX transmission over 100m twisted pair cabling. MSI, MSI-X, LSO, RSS and IPv4/IPv6 checksum offload for high performance and low CPU utilization with up to 16 KB of massive data frame support.

Key Features

- ✓ Low cost, low power, energy-efficient Ethernet.
- ✓ 1 Gbps to 10 Gbps, 5 Gbps, 2.5 Gbps and 100M data rates.
- ✓ Jumbo frame support up to 16 KB.
- ✓ Extensive software support: Windows and Linux drivers; UEFI and PXE remote boot.
- ✓ PCI Express (Pcle) v2.1 x4 lanes.
- ✓ MSI, MSI X, LSO, RSS and IPv4/IPv6 checksum offload.

Specifications

Controller	Aquantia AQtion AQC107
Transmission medium	Copper
Baffle Height	Low Profile & Full Height
Power Consumption	4.7W



Copper Type OS Support	10GBase-T, Cat 6 or higher up to 100m
	5GBase-T, Cat 5e or higher up to 100m
	2.5GBase-T, Cat 5e or higher up to 100m
	1GBase-T, Cat 5e or higher up to 100m
	100MBase-T, Cat 5 or higher up to 100m
	Windows 7/8/8.1/10
	Windows Server 2008 R2/2012 R2/2016 R2/2019 R2
	Linux Stable Kernel version 2.6.32/3.x/4.x or later
	Linux CentOS/RHEL 6.5/7.x or later
	Ubuntu 14.x/15.x/16.x or later
Bus Type	PCle v2.1 x4 , compatible with x8 , x16
Data rate per port	100/1000/2500/5000/10000Mbps
Connector	1*10G RJ45

■ Technical Features

Standards compliant	IEEE 802.3an 10 Gbit/s Ethernet over unshielded twisted pair
	IEEE 802.3bz 2.5/5GBASE-T
	IEEE 802.3ab 1000BASE-T Gigabit Ethernet
	IEEE 802.3u 100BASE-TX Fast Ethernet
	IEEE 802.1Q VLANs
	IEEE 802.3x Full Duplex and flow contro
	IEEE 802.3az Energy Efficient Ethernet (EEE)
iSCSI	No
WoL	Yes
Jumbo Frames	Yes
DPDK	Yes
PXE	Yes
FCoE	No

■ Environment Features

Operating Temperature	32°F to 131°F (0°C to 55°C)
Storage Temperature	-40°F to 158°F (-40°C to 70°C)
Storage Humidity	Maximum: 90% non-condensing relative humidity at 35°C
Certifications	FCC, RoHS, CE



Physical Features

Size (mm ±0.5mm)	117*120*21
Weight (g ±2g)	200

■ LED Indication

LED indication	1000Mbps, Green bright + Green flashing
	5G/2.5G/1000M/100M, Orange bright + Green flashing

Order Information

Part Number	Description
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