

netTAP

Gateway Solutions



The netTAP gateway family converts two protocols simply and efficiently into each other. Whether it's a simple serial bus, a classic Fieldbus or one of the many Real-Time-Ethernet protocols, netTAP provides a common platform for a transparent conversion of any protocol of the industrial automation. For plants recently upgraded with Fieldbus or modernized with Real-Time-Ethernet netTAP enables the use of existing and proven field devices still by simply interfacing between the new and old technology.

The modular device design combines the two network interfaces in a DIN-rail mountable housing. netTAP is configured and diagnosed by an universal FDT/DTM based configuration tool suite. LED indicators are visualizing status information for rapid on-site diagnostics. The protocol conversion are pre-programmed and are loaded as firmware into the device on demand. Because of the same physical network interface all Real-Time-Ethernet protocols can be managed by one single device variant.

netTAP 50 – the low-cost Gateway

netTAP 50 is a protocol converter for simple conversions. It supports conversions of 1-port Real-Time-Ethernet to Fieldbus to serial automation protocols and realizes slave to slave and slave to master combinations. As a master netTAP 50 provides full master functionality to a single slave. This enables an effortless integration of a single field device into the superordinated network.

The design impresses with a cost-optimized, compact hardware reduced to the very basic needs of a protocol converter. The converter addresses a market segment that sets the focus on cost savings rather than on a fully-featured functionality. The cost reduced design combined with its countless conversion possibilities is making netTAP 50 an attractive gateway in terms of price and universality. The gateway is predestined for brand labeling, OEM and reseller business for a simple and cost-efficient system solution.

netTAP 100 – Gateway without limits

netTAP 100 is the protocol converter for sophisticated conversions and manages next to serial to Fieldbus to 2-port Real-Time-Ethernet also Fieldbus to Fieldbus conversions. It supports slave and master functionality in any combination. There is no restriction on the master functionality.

Integrated is a memory card slot allowing the user to save the firmware and configuration data on a removable card. In the case of a field failure all that is necessary to bring the plant back on line in seconds is to move the memory card from the old netTAP 100 onto a spare unit.

netTAP 100 also allows the user to create their own serial protocols with netSCRIPT. netSCRIPT is based on the popular scripting language Lua allowing the integration of custom serial protocols and the data exchange with the open Fieldbus networks. A full featured development platform with debugger is included with netTAP 100, making netSCRIPT a comprehensive and powerful instrument for the implementation of any own serial and proprietary protocol.

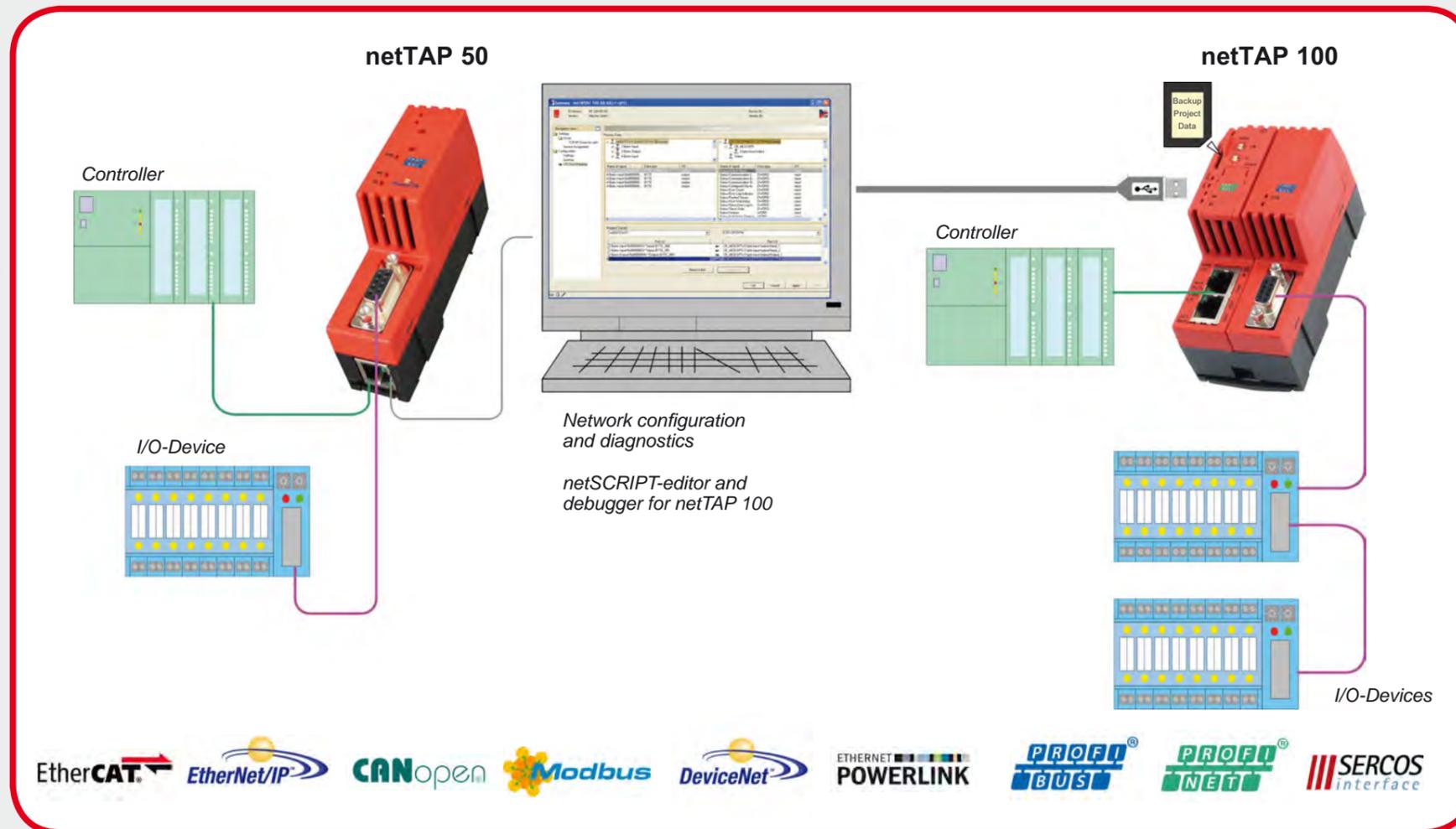
广州虹科电子科技有限公司 广州市五山华南理工大学国家科技园 2 号楼 504-505 室 (510640)

电话 : 020-3874 4528; 3874 4538 e-mail: sales@hkaco.com 网站: www.hkaco.com



Highlights

- Cost optimized, compact design
- 1-port-Real-Time-Ethernet to Fieldbus, serial RS232/422/485 to Fieldbus or 1-port Real-Time-Ethernet
- Ethernet service port
- Integrated FDT/DTM based configuration tool
- Suitable for OEMs or reseller
- Slave to Slave, Slave to Master conversions



Highlights

- Fieldbus to Fieldbus conversion
- 2-port-Real-Time-Ethernet to Fieldbus conversion
- RS232/422/485 to Fieldbus or 2-port-Real-Time-Ethernet conversion
- Master and Slave functionality in any combination
- Own serial protocols with netSCRIPT language
- Memory card option for saving firmware and configuration
- One single configuration tool
- USB service port



Technical Data

Protocol	Cyclic data max.		
	Master*	Slave	
ASCII	2024		Bytes I/O-Data
CANopen	1024	1024	Bytes I/O-Data
DeviceNet	510	510	Bytes I/O-Data
PROFIBUS	488	488	Bytes I/O-Data
Ethernet/IP	1008	1008	Bytes I/O-Data
Modbus RTU		11520	Bytes I/O-Data
Modbus TCP		11520	Bytes I/O-Data
PROFINET-IO	2048	2048	Bytes I/O-Data
CC-Link		736	Bytes I/O-Data

The maximum number of useable I/O data results from the lower number of the two protocols being converted.

* Master functionality to exactly one slave

Parameter	Value
Diagnostic Interface	Ethernet
Display	SYS, COM, LINK, Rx/Tx, protocol spec.
Configuration	SYCON.net
Power Supply	18 ... 30 V / 130 mA @ 24 V
Connector	Mini-COMBICON 2-pin
Operating Temperature	0 ... 60 °C
Size (L x W x H)	100 x 25 x 70 mm (without connector)
Mounting	DIN-Rail, DIN EN 60715
RS232/485/422	not electrically isolated
Weight	80 g
CE-Sign	yes
Emission	CISPR 11 class A
Noise Immunity	EN 61131-2:2003

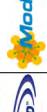
Technical Data

Protocol	Cyclic data max.		
	Master	Slave	
ASCII	2024		Bytes I/O-Data
CANopen	7168	1024	Bytes I/O-Data
CC-LINK		736	Bytes I/O-Data
DeviceNet	7168	510	Bytes I/O-Data
PROFIBUS	7168	488	Bytes I/O-Data
EtherCAT		400	Bytes I/O-Data
Ethernet/IP	11520	1008	Bytes I/O-Data
Modbus RTU		11520	Bytes I/O-Data
Modbus TCP		11520	Bytes I/O-Data
netSCRIPT	2048		Bytes I/O-Data
Powerlink		2980	Bytes I/O-Data
PROFINET-IO	11520	2048	Bytes I/O-Data
SERCOS III		396	Bytes I/O-Data

The maximum number of useable I/O data results from the lower number of the two protocols being converted.

Parameter	Value
Diagnostic Interface	Mini-USB
Display	SYS, COM, LINK, Rx/Tx, protocol spec.
Configuration	SYCON.net
Power Supply	18 ... 30 V / 130 mA @ 24 V
Connector	Mini-COMBICON 2-pin
Operating Temperature	0 ... 60 °C
Size (L x W x H)	100 x 52 x 70 mm (without connector)
Mounting	DIN-Rail, DIN EN 60715
Weight	150 g
CE-Sign	yes
UL	pending
Emission	CISPR 11 class A
Noise Immunity	EN 61131-2:2003
Card slot	MMC memory card compatible

Protocol Conversions

													
		Master/Slave Slave/Slave Slave/Master			Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave	
		Slave/Slave Slave/Master			Slave/Slave Slave/Master	Slave/Slave Slave/Master	Slave/Slave Slave/Master	Slave/Slave Slave/Master	Serial/Slave Serial/Master	Slave/Slave	Serial/Slave Serial/Master	Slave/Slave	
		Master/Slave Slave/Slave Slave/Master			Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave	
		Master/Slave Master/Master Slave/Slave Slave/Master			Master/Slave Master/Master Slave/Slave Slave/Master	Master/Slave Master/Master Slave/Slave Slave/Master	Master/Slave Master/Master Slave/Slave Slave/Master	Master/Slave Master/Master Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave	
		Master/Slave Slave/Slave Slave/Master			Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave	Master/Slave Slave/Slave Slave/Master	Master/Slave Slave/Slave	
ASCII		Serial/Slave Serial/Master			Serial/Slave Serial/Master	Serial/Slave Serial/Master	Serial/Slave Serial/Master	Serial/Slave Serial/Master	Serial/Slave Serial/Master	Serial/Slave	Serial/Slave Serial/Master	Serial/Slave	
netSCRIPT		Custom Serial/ Slave Custom Serial/ Master			Custom Serial/ Slave Custom Serial/ Master	Custom Serial/ Slave Custom Serial/ Master	Custom Serial/ Slave Custom Serial/ Master	Custom Serial/ Slave Custom Serial/ Master	Custom Serial/ Slave Custom Serial/ Master	Custom Serial/ Slave	Custom Serial/ Slave Custom Serial/ Master	Custom Serial/ Slave	

Available on netTAP 50 and netTAP 100

Master license for netTAP 100 needs to be ordered separately

netTAP 50-Master functionality to exactly one slave