



## AnaGate CAN X8 Ethernet / CAN Gateway

### Product overview

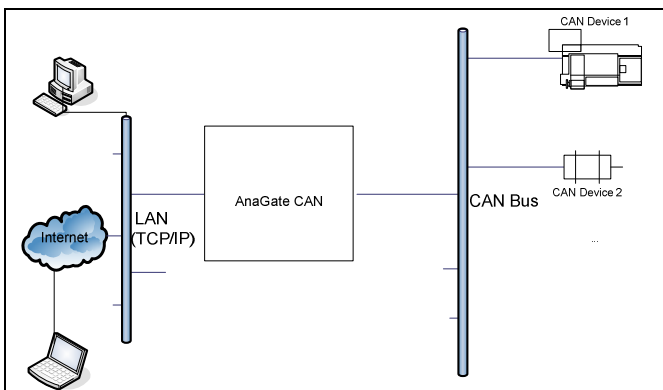
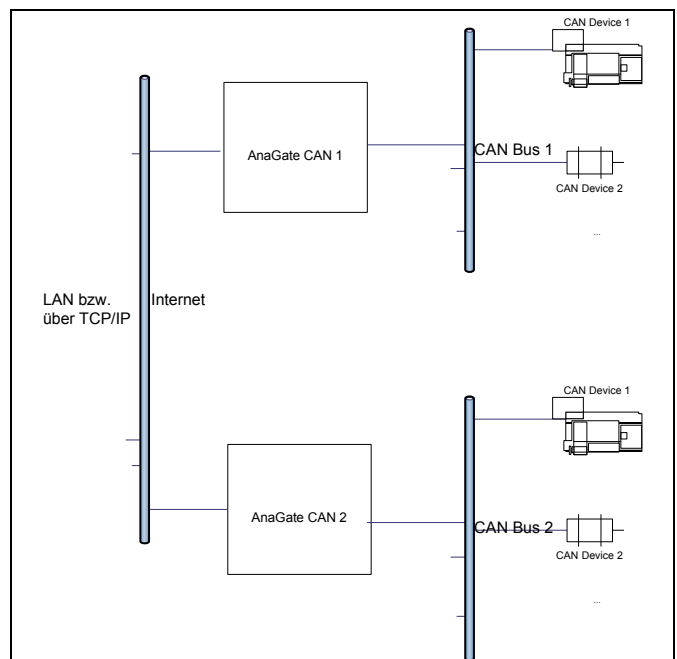
The AnaGate CAN X8 gateway connects a PC, an embedded PC or other general device to up to 8 CAN buses via the TCP/IP network protocol (Ethernet). The AnaGate CAN X8 works as a device with no own CAN identifier on the bus.

The CAN messages are transparently embedded in TCP/IP telegrams to enable communication with any CAN device on the CAN network. This means that a CAN network can be addressed over the Internet or from multiple different PC's over a network. Higher protocol layers e.g. CANopen, Devicenet or J1939 can be used by the host system too.

### Gateway mode

In the gateway mode the CAN messages are transferred transparently over TCP/IP between the CAN network and the host platform (e.g. PC) in both directions.

additional AnaGate CAN model.



### Listen mode

In the listen mode messages can be recorded without influencing the CAN bus.

### Bridge mode

In the bridge mode two arbitrary CAN networks are bridged together internally.

### LAN Bridge mode

In the LAN bridge mode each CAN interface can be interconnected to an arbitrary CAN network by an

### Software interface

The application protocol is based on the TCP/IP protocol and is described in detail in the documentation.

Thus the access to the AnaGate CAN X8 device can be programmed via native calls to the TCP/IP socket interface. This means that any communication partner with a LAN (TCP/IP) interface is able to communicate with the AnaGate CAN X8.

Accessing the device with the supplied windows application library (DLL) is much more comfortable and can be used with a conventional programming language.



## Technical specifications

Measurements:	L x W x H	200 mm x 128 mm x 50 mm
	Weight	approx. 452 g
Power supply	Input voltage	9 ..28 V DC
Temperature	Operating/Storage	-20 .. +70°C / -40 .. +85°C
System	Processor	ARM9 (32bit ,400MHz), 64Mb RAM DDR2, 256Mb NAND Flash
	Operating system	Linux kernel 3.9
CAN bus:	Baud rate	50, 100, 125, 250, 500, 800 kbps or 1 Mbps configurable with software or web interface
	CAN controller	8x FPGA (similar to SJA1000)
	CAN interface	8x ISO 11898-2, galvanically decoupled
	Interface	8x 4-pole plug incl. CAN_H, CAN_L (Pitch 3.81)
Modes of operation	Gateway mode	Multiple host controllers can receive/transmit CAN messages.
	Listen mode	Recording of CAN message without CAN bus influences..
	Bridge mode	2 CAN networks are connected internally.
	LAN Bridge mode	Both CAN interfaces can be interconnected to an arbitrary CAN network via LAN or internet.
LAN interface:	Baud rate	10/100 Mbps
	TCP/IP	Static or dynamic IP address (DHCP), configurable via web interface.
	Interface	RJ45 plug
Analogue IO:	Inputs	4 (0-24V , R <sub>i</sub> ~ 500kΩ)
	Outputs	4 (0-V <sub>input</sub> , I <sub>max</sub> =250mA), short-circuit-safe
EC directives:		CE, RoHS.
Software:	Configuration	Via HTTP interface.
	CAN Monitor	Windows program to access CAN bus via AnaGate CAN.
Programming:	Native	Via socket interface using a documented application protocol.
	Windows (PC)	Via application library (32/64-bit DLL) using a standard programming language (e.g. C/C++, Delphi).
	Linux (PC)	Via static library ( g++ V4.6, 32/64bit) or socketCAN.
	CANopen	OpenSource driver for CANFestival.
	Embedded Linux	Support (e.g. ARM9) is available upon request.
	Simatic S7	Support is available upon request.

## Ordering information

Order number	Scope of delivery
GT-CAN-X8	AnaGate CAN X8 including CD-ROM with documentation, software API as a DLL for Windows 7/8 (32/64bit)