## **ModGate 413**



## 4-Port Industrial Modbus Gateway

Hardware	
Processor	ARM 9 166 MHz
I/O Controller Memory	16C950 or compatible 16MB SDRAM, 2 MB Flash
Connector Type	DSUB 9 male for serial Port, RJ45 for Ethernet
 Interface	
Ethernet Interface	Auto-detecting 10BaseT/100BaseTx
Protocols Serial Interface	TCP/IP, DHCP, ICMP, HTTP, DNS RS232/422/485 selected by software
No. of Port	4, Speed up to 115200 bps
Available Modes	RS232 full duplex RS422 full duplex
	RS485 4 wire, full duplex
	RS485 2 wire, half duplex, with echo RS485 2 wire, half duplex, without echo
Signals	RS232: TxD, RxD, RTS, CTS, DTR, DSR, DCD, RI, GND
	RS422: Tx+/-, Rx+/-, GND RS485 2 wire: Data+/-, GND
	RS485 4 wire: Tx+/-, Rx+/-, GND
RS485 Data Control	Controlled by ART (Automatic Receive Transmit control)
Performance	LL - 445000 L
Speed Parity	Up to 115200 bps None, even, odd
Data Bits	7, 8
Stop Bits IRO	1, 2 None
I/O Address	None
Operating Modes	
Modbus RTU/ASCII	Modbus RTU or Modbus ASCII protocol selected for each serial port individually
DirectMappingMode PromiscousMode	Direct mapping of Modbus addresses to serial ports or TCP connections  Mapping of serial ports to TCP connections
Special Features	Mapping of sendi ports to Tell connections
Installation	Dip switches set a defined temporary IP Address to contact via WEB Browser
Operating Mode	Promiscous Mode:  Messages received from the network are sent to the serial port, messages from the serial port are
	sent to the connected network host.
	Mapped Mode: Received messages are scanned for their target address. This address is found in a table, the message
	is sent to the defined connection (serial or TCP).
Modbus Master Multiplexing	An extension to the standard. Slaves on serial lines may answer requests from multiple masters. The masters connect to ModGate 413 by Modbus/TCP or from other serial lines.
Configuration	Configuration over WEB Browser
Art DNS	Automatic Receive Transmit control for RS485  Domain Name Server support
Serial Interface	Serial Interface configurable by software
Firmware	Firmware update over WEB Browser
LEDs	LEDs for Power, serial Tx, Rx, Ethernet Link, Speed
Security Password Access	Webinterface is password protected. The password can be changed in the Webinterface.
Power and Environment	Tresmenace is passivora protected. The passivora can be changed in the viconitenace.
Power Requirements	9 - 30V DC, 350mA @ 12V
Power supply Adapter	12V DC, 1A. Connected by Terminal block
Operating Temp. Storage Temp.	0°C - 55°C − 20°C - 85°C
Case	SECC sheet metal 1mm
Dimension	$167 \times 99 \times 29$ mm³ (W×L×H); $189 \times 102 \times 30$ mm³ with DB9 connector and DIN-Rail mounting kit

Weight	400g
Approvals	
EMC	FCC Class A, CE Class A
Environment	RoHS
Ordering Information	
Art. No.	6701
Product Name	ModGate 413
Packing List	◆ ModGate 413
	Power supply adapter 12V, 1000mA
	CD-ROM with user manual
Optional Accessories	<ul> <li>DK 35A (Art No. 662) - DIN-Rail mounting kit</li> </ul>

## **Overview**

Modgate 413 is an industrial-strength Modbus-Network gateway for connecting four Modbus lines to a network running TCP/IP. It operates without platform and distance limitation.

ModGate 413 uses Modbus/TCP for communication on the network. The serial ports are configured for Modbus/ASCII or Modbus/RTU, while the serial lines are physically set for RS232, RS422 or RS485. The messages received on the network are sent to the serial lines, messages from the serial ports are sent via network.

Modbus Master Multiplexing is implemented as an extension to the standard. Slaves on serial lines may answer requests from multiple masters. The masters connect to ModGate 413 by Modbus/TCP or from other serial lines.

The configuration of ModGate 413 is done via HTTP. The user interface is based on Web 2.0 to provide an easy handling of the options. Besides typical serial parameters the configuration includes RS232/485 for serial physical parameters. Further a Modbus address mapping table is available, defining a target port for a certain Modbus address.

ModGate devices are available with 1 up to 8 serial ports, optional also with WLAN plus Ethernet.

©2013, VSCOM. The VSCOM logo is a trademark of VS Vision Systems GmbH. Other products and brand names mentioned herein may be trademarks or registered trademarks of their respective owners. The information contained herein is subject to change without notice.

You can purchase VSCOM's products easily from a wide variety of leading technology distributors or partners. Please contact us to find the best ordering method for your needs.

