nConnect™

PUMP CONTROL

General

nConnect™ is a simple control device for pumpcontrolling. It controls smaller wastewater pump stations, potable water and raw water pump stations, and suits applications that does not need control based on more advanced functions or remote control.

The device is delivered ready-to-install and includes input and output for level transmitters, power coils for power masurement on connected pumps, operating and alarm signals, serial RS485 for communication on private lines.

nConnect is configured via Connect Link™, connect locally using the USB port or via external communication RS485 to e.g. a Mμ Connect®, this type of connection can also be used to transfer data to a SCADA system.

Features

nConnect provides the well-known MJK control functions such as:
• Pump control including monitoring via pumpword function
• Input terminals for power coils for meauring power on pumps
• Logical functions
• Connection options to e.g. HMI Display.

Applications
• Open land pump stations
• Drainage pump stations
• Extraction pump stations
• Raw water borings
• Standalone pump stations
• Retrofit installations

Communication

The optional build-in Wi-Fi module will provide an easy accessible overview of the operational status of the pump station, as well as simple configurational options such as start/stop levels, history and alarms, by using the MJK APP for smartphones.

Communicating on longer distances is assisted by the RS 485 Repeater, that will enhance and correct the signals that travels more than 300 meters.
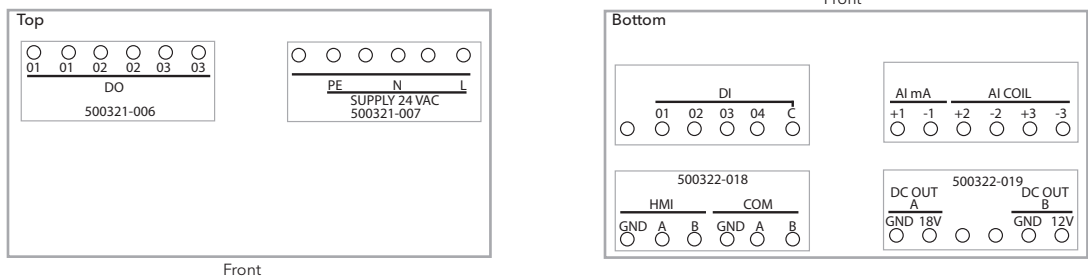
DATASHEET
EN 6.08 nCONNECT DATASHEET 1507

mjk
a **xylem** brand

nConnect™ Pump Control Unit

Electrical Connections

Top

DO 01 01 02 02 03 03
500321-006

PE N L
SUPPLY 24 VAC
500321-007

Front

Front

Bottom

DI 01 02 03 04 C
500322-018

AI mA +1 -1 AI COIL +2 -2 +3 -3
500322-019

HMI GND A B COM GND A B

DC OUT A GND 18V DC OUT B GND 12V

Specifications

nConnect®	
Power supply	24V AC ±10%
Power Consumption	6 VA
Clock	Realtime clock with build-in lithium battery
Memory	Flash memory
Communications	1 pcs RS 485 for communication
HMI Communication	1 pcs RS-485 for HMI Display **OPTIONAL** WiFi 802.11b/g (2,4 GHz), Max 25Mbps (64/128 bit WEP, WPA, WPA2(AES)*
Internal Communication	Modbus® RTU-mode
External Communication	Modbus® RTU-mode or COMLI®
USB Interface	1 pcs. USB 1,1 Type mini B, female
Enclosure	IP 20
Cabinet Material	PC (Polycarbonate)
Operating Conditions	- 20 … 60 °C
Weight	0,35 kg
CE Approval	EN 61000-6-4:2007, EN 61000-6-2:2005

Input and Output Pump Control Unit 4DI/3DO/1AI/2AI(Current Input)	
Digital input	4 pcs. 10 - 30 V DC
Digital output	3 pcs. Relays (max. 24 V AC / 2 A)
Analog input	1 pcs. Galvanically separated, 12 bit resolution, 4-20 mA, accuracy ± 1 % of FS
Analog Input Current Input	2 pcs. For current transformer input 10 bit resolution 0-10/0-33A ±5%
Power supply for AI	18 V DC 30 mA
Power supply for DI	12 V DC 30 mA

Order numbers

nConnect®	
205220	nConnect™ RS485 4DI / 1AI / 2 current transformer input / 3DO
205221	nConnect® RS485 WIFI 4DI / 3DO / 1AI / 2 CI
205215	nConnect™ RS485 repeater

Accesssories	
691095	USB-cable for PC communication
840150	Connect Link™
200162	10/30A transformer
200163	33/100A transformer

*Note that the Connect app does not match all smartphones, read information on the individual app store regarding compability

INTERTEK ISO 9001:2008