SM61 IoT
- DATA LOGGER TO IoT

CAT III — Electrical safety

CE

Datenlogger für IoT-Anwendungen

SM61IoT

SM61IoT ist eine neue und praktische Lösung, die Ihnen eine kontinuierliche Visualisierung der Prozessparameter ermöglicht. Zur Kommunikation mit dem SM61IoT können Sie PC, Tablet oder Mobiltelefon mit einem Webbrowser verwenden.

- Cloud - dank MQTT-Protokoll (globales / verteiltes Montotoring)
- Webbrowser (globale Überwachung)
- SCADA-System - Protokoll TCP / IP (lokale Überwachung)

▶ Das MQTT-Protokoll ist ideal für die Kommunikation in verteilten Erfassungssystemdaten - IoT-Anwendungen.

▶ Modbus TCP-Protokoll für die Kommunikation in SCADA-Systemen.

▶ Präsentation der aktuellen und archivierten Daten nach Kundenkonfiguration (synoptische Karten, Diagramme, Tabellen) via beliebigen Internetbrowser,

▶ Ablesung von 2500 Werte von Geräten/Anlagen (bis zu 100 Geräte je 25 Register).

▶ benutzerfreundliche Konfigurationsapplikation SM61IoT CONFIG

▶ 8 GB flash memory.

▶ integrierter FTP-Server

▶ Alarme oder Binäreingänge zur Steuerung von Archivierung

▶ Echtzeituhr

▶ Möglichkeit der gleichzeitigen Arbeit von mehreren Benutzern
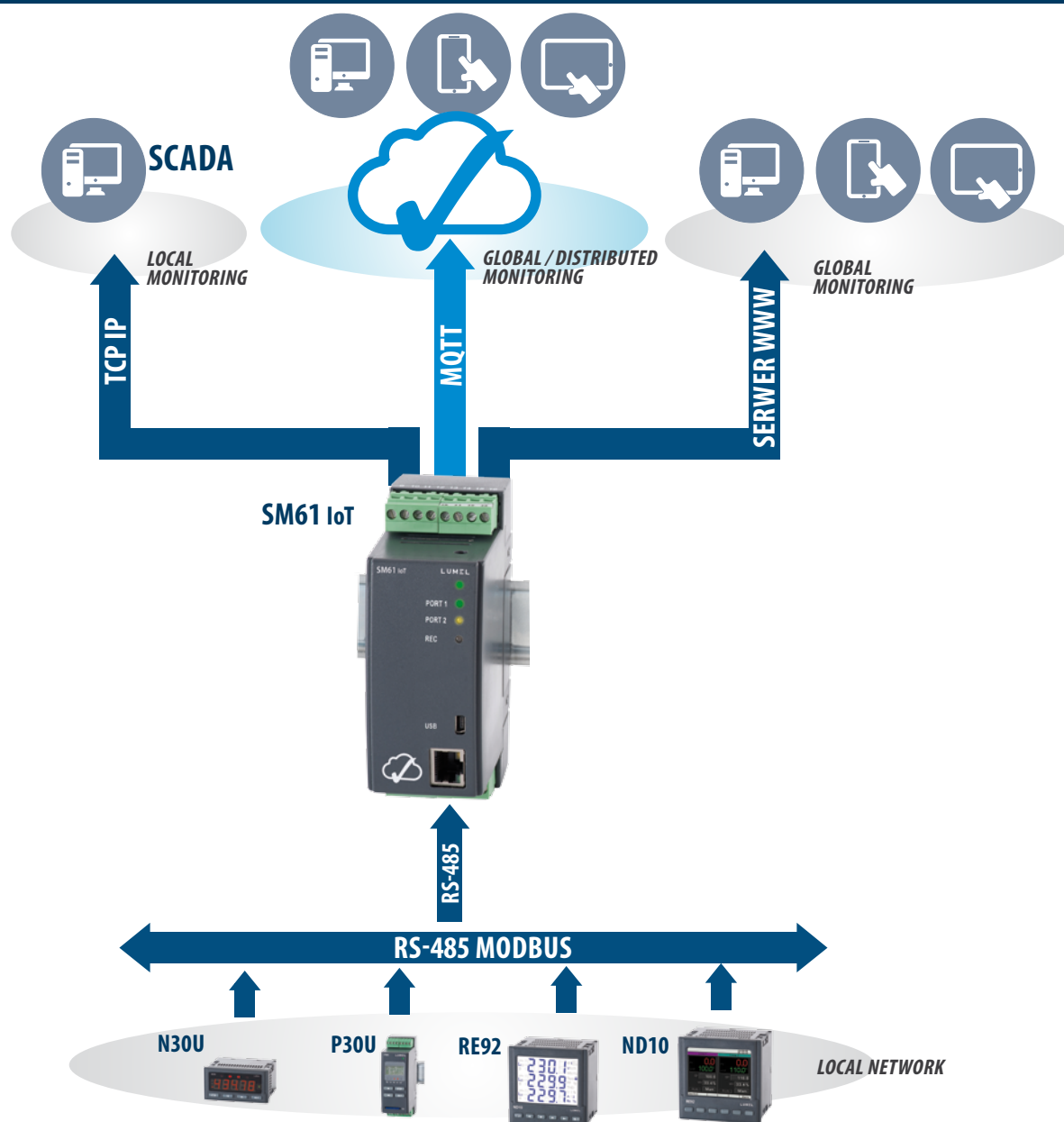
▶ passwortgeschützter Benutzerzugriff

SM61 IoT

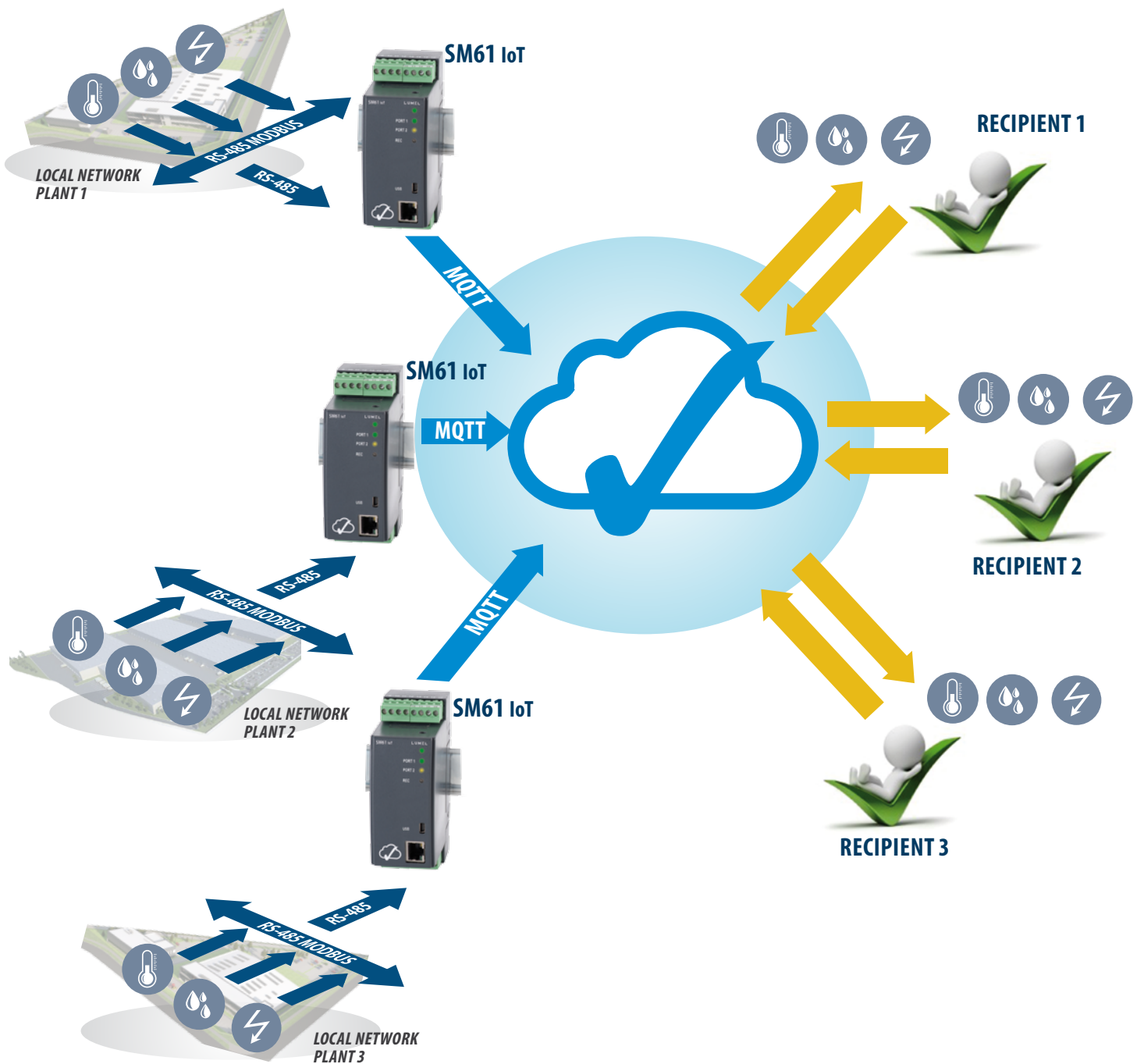## – DATA LOGGER TO IoT APPLICATIONS

- **The MQTT protocol is ideal for communication in distributed acquisition systems data (IoT applications).**
- **Modbus TCP protocol for communication in SCADA systems.**
- **Built-in WWW** for visualisation of current and archived data according to customer configuration (synoptic maps, charts, tables) by any web browser.
- Readout up to 2500 values from slave devices (up to 100 devices, each 25 registers).
- User-friendly application for data configuration (SM61IoT CONFIG).
- 8 GB Flash memory.
- Built-in FTP server.
- Alarms or binary inputs for control of archiving.
- RTC (real time clock).
- Possibility of simultaneously work by many users.
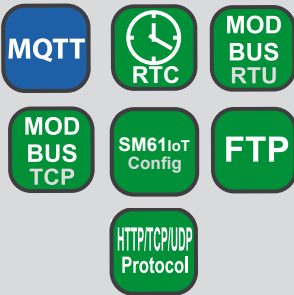- User's access control by a password.

APPLICATION EXAMPLES

SCADA

LOCAL MONITORING

GLOBAL / DISTRIBUTED MONITORING

GLOBAL MONITORING

TCP IP

MQTT

SERWER WWW

SM61 IoT

RS-485

RS-485 MODBUS

N30U   P30U   RE92   ND10   *LOCAL NETWORK*

APPLICATION EXAMPLES

LOCAL NETWORK PLANT 1

RS-485 MODBUS

RS-485

SM61 IoT

MQTT

RECIPIENT 1

SM61 IoT

MQTT

RECIPIENT 2

RS-485

RS-485 MODBUS

LOCAL NETWORK PLANT 2

MQTT

SM61 IoT

RECIPIENT 3

RS-485

RS-485 MODBUS

LOCAL NETWORK PLANT 3

SM61 IoT – DATA LOGGER FOR IoT APPLICATIONS

LUMEL
EVERYTHING COUNTS

FEATURES

- MQTT
- RTC
- MODBUS RTU
- MODBUS TCP
- SM61IoT Config
- FTP
- HTTP/TCP/UDP Protocol

INPUTS/OUTPUTS

- RS 485
- RS 232
- USB
- 2x
- or
- 2x
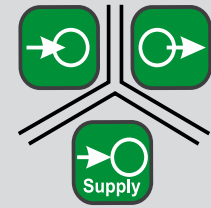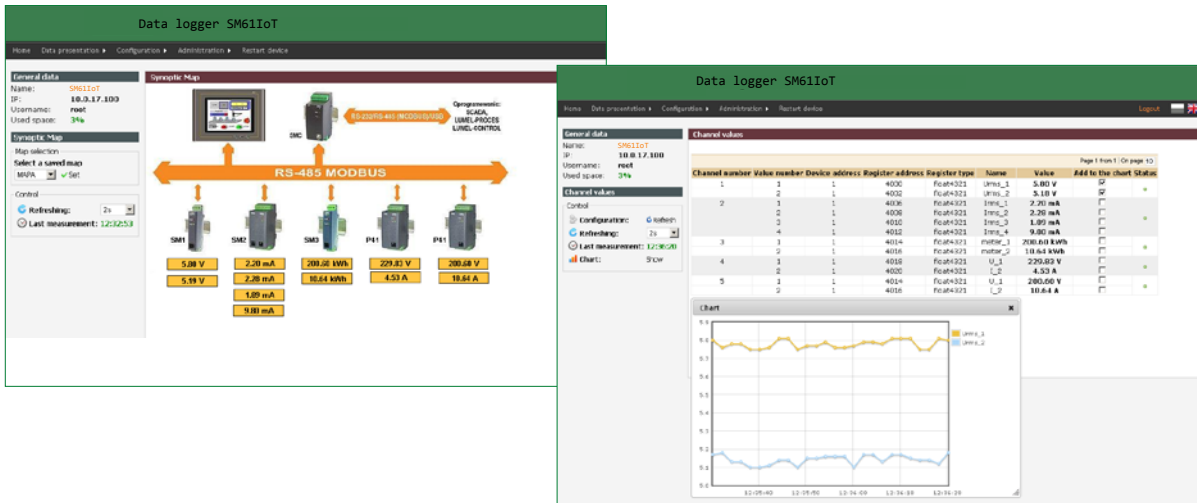
GALVANIC ISOLATION

Supply

SM61 IoT CONFIGURATION

Configuration web:
- configuration of IP settings and connection configuration of selected SM61 module,
- channels configuration of SM61 module,
- channels visualization of SM61 module.

TECHNICAL DATA

INTERFACE

Interface	Port 1:RS-485, RS-232,	Port 2: RS-485	USB	Ethernet 10/100 Base-T
Function	communication with PC and HMI panels and other Master devices	communication with Slave devices	device configuration	device communication and configuration
Baud rate	1200, 2400, 4800, 9600, 19200, 38400, 57600, 115200 bit/s		115200 bit/s	10, 100 Mbit/s
Information unit	1 start bit, 7 or 8 data bits, 1 odd/even parity bit, 1 or 2 stop bits		1 start bit, 8 data bits, 1 even parity bit, 1 stop bit	TCP/UDP
Transmission protocol	MODBUS RTU			MQTT, TCP/IP, HTTP, ICMP, DHCP, ARP, Modbus TCP
Remarks	max. cable lenght depends on the baud rate		max. cable lenght: up to 2 m	max. cable lenght: up to 100 m

EXTERNAL FEATURES

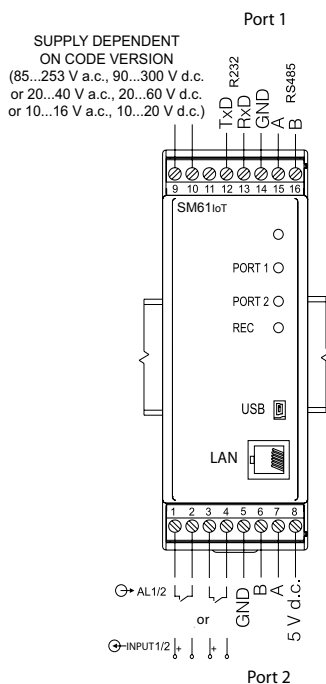|		
Weight	< 0.25 kg	
Overall dimensions	45 × 120 × 100 mm	
Protection grade (acc. to EN 60529)	from the housing side: IP40	from the terminal side: IP20
Fixing way	DIN rail 35 mm	

SM61 IoT – DATA LOGGER FOR IoT APPLICATIONS

RATED OPERATING CONDITIONS

Supply voltage	20...24...40 V a.c., 20...24...60 V d.c. 10...16 V a.c. , 10...20 V d.c. 85...230...253 V a.c., 90...300 V d.c.	power consumption: < 4 VA 40...50/60...440 Hz
Temperature	ambient: 0...23...55˚C	storage: - 20...70˚C
Relative humidity	< 95%	condensation inadmissible
Operating position	any	
External magnetic field	< 400 A/m	

SAFETY AND COMPATIBILITY REQUIREMENTS

Electromagnetic compatibility	noise immunity	acc. to EN 61000-6-2
	noise emissions	acc. to EN 61000-6-4
Pollution grade	2	acc. to EN 61010-1
Installation category	III	acc. to EN 61010-1
Maximal phase-to-earth operating voltage	• for supply circuits: 300 V • for other circuits: 50 V	acc. to EN 61010-1

CONNECTION DIAGRAM

ORDERING CODE

	SM61 IoT -	X	X	XX	X	X
Supply voltage:						
85...253 V a.c., 90...300 V d.c.	1					
20...40 V a.c., 20...60 V d.c.	2					
10...16 V a.c., 10...20 V d.c.	3					
Input/output:						
2 relay outputs		1				
2 binary outputs		2				
Version:						
standard version			00			
custom-made			XX			
language:						
Polish				P		
English				E		
other*				X		
Acceptance tests:						
without extra requirements					0	
with an extra quality inspection certificate					1	
acc. to customer's request					X	

Order example:
The code **SM61IoT - 1 2 00 E 1** means meter version with voltage supply 85...253 V a.c., 90...300 V d.c., with 2 binary inputs, standard version, user's manua in English, with an extra quality inspection certificate.

* - after agreeing with the manufacturer