NB-2xIn

Digital Inputs to the Portal

The NB-2xIn connects 2× DI (Digital Input) to the Portal over NB-IoT cellular network.

Each DI reading 0/1 state (Dry Contact) and Portal can analyze that. Pulse outputs S0 for monitoring water or gas consumption can be also connected.

SensDesk Technology

NB-IoT   Int. BAT   3 years SIM

The NB-2xIn is IoT Monitoring device so Portal service is required. Paid portal service from several providers available (any SensDesk Technology portal). Portal centralizes device management, remote FW upgrades, graphs, and Alerts by email, SMS, or Voice-calls. Open API and PDF reports are also available. The device is connected to the portal via NB-IoT (NarrowBand IoT) cellular network.

Portal based services

Graphs   alert   Reports   Users MGMT   Open API   Device MGMT   € $ £ Billing

You can connect:

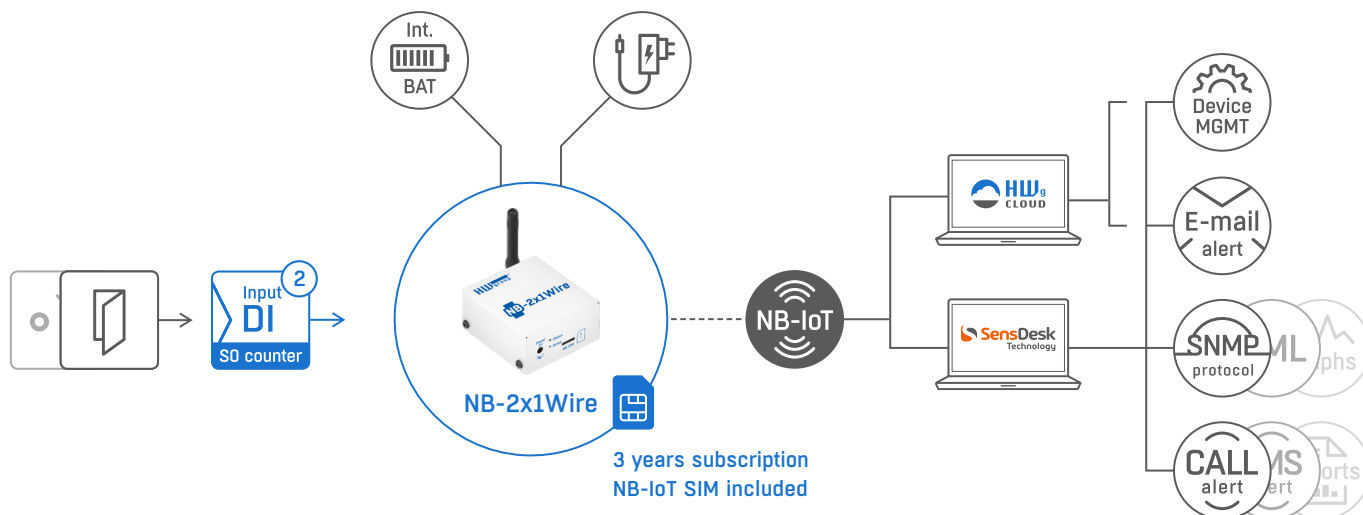|	
	Dry Contact
	Door contact
	Power detector/switch
kWh — S0 pulses	Electricity meter (pulses)
Water m³ — S0 pulses	Water meter [m³]

SIM card included

Subscribed version of this device is delivered with NB-IoT SIM card included. It provides 3 years of connectivity (3rd party SIM card for NB-IoT).

Internal batery

The NB-2xIn itself is powered by an internal battery or from an external power supply.

SensDesk Technology

- The NB-2xIn device and the portal are products of the HW group and are seamlessly integrated.
- Portal will alert you by email (SMS, Voice Call) if DI is switched On/Off.
- Portal will alert you if device is disconnected (not available).
- Alarm state (0 / 1) can be defined for each DI.
- Free cloud available (HWg-cloud.com) with device management.
- HWg Monitor mobile App can show you all DI states in your portal account.
- SMS, Voice call alerts, or graphs & PDF reports can be used with paid portal services.

Typical application

- Remote monitoring of simple detectors (door contact, smoke, power and others)
- Metering water consumption (meter with SO pulse output)
- Metering electricity (kWh) consumption from meter with pulse output

Related products

Door contact MK4

Security Door contact MK4 with 2m connection wiring.

Water meter (SO output)

Any 3rd party meter with pulse output (SO) can be connected to the Portal.

Optical Smoke Detector

Optical Smoke Detector FDR26 for smoke detection and fire alarm signalisation.

Power detector

Detector of 110/230V voltage failure, which can be connected directly to a wall plug. Galvanic insulated relay output (NO) can be connected to any digital input (DI) of any HW grup product.

Technical specifications

External power	5V DC / 120 mA / Jack Ø 3.5 × 1.35 / 10 mm
Internal battery	Lithium 3V model CR123A (primary cell)
Battery lifetime	Up to 3 years / 20 °C
Operating temperature	-10 to +60 °C (for device)
Dimensions / weight	67×78×33mm / 250 g
Electromagnetic radiation / EMC	CE/FCC Part 15, Class B / EN 55022, EN 55024, EN 61000

External sensors

Sensor ports	2× DI (Digital Input) for dry contact
Type	Digital Input (Dry contact) with SO pulse counter
Pulse counter	SO output compatible, 32-bit pulse counter, min. pulse width 20 ms
Sensitivity	1 (On) = 0-500 Ohm
Max. distance	10 m

NB-IoT connectivity

Supported bands	B1/B2/B3/B4/B5/B8/B12/B13/B17/B18/B19/B20/B25/B28/B66
Carrier(s)	Vodafone (global) (HWg SIM card). Other operators on request
"Subscribed" version	SIM card with Vodafone NB-IoT 3 years connectivity included
Device certifications	GCF (Global), CE (Europe), FCC/PTCRB (North America), IC, KC, NCC. JATE/TELEC, RCM, NBTC, IMDA
Radio Output power	23 dBm ±2 dB
Antenna / Sensitivity	External, SMA / 129dBm
Supported protocols	IP: UDP/IP (COAP)
Compatible portals	Any portal based on SensDesk Technology