

# NVITE

multi-technology reader

## Key features:

- ✓ Reads multiple credential technologies
- ✓ Supports RFID Smartcards, RFID Proximity cards, QR codes, Bluetooth and NFC
- ✓ Enables contactless identification
- ✓ Mobile ID Protocol for BLE and NFC implementation with third party Apps
- ✓ OSDP v2 supported including secure channel protocol

NVITE is a multi-technology reader that enables contactless identification. The reader supports reading a wide range of credential technologies:

- RFID Smartcard (13,56 MHz): LEGIC advant and prime, MIFARE (DESFire), HID iClass, Sony Felica;
- RFID Proximity card (125 kHz): Nedap, HID Prox, EM4200, AWID;
- QR: Quick Response and most mainstream 1D and 2D barcodes;
- BLE and NFC: Secure communication with third party mobile Apps, based on Nedap Mobile ID protocol.

## Applications

NVITE is the perfect match when enabling multiple identification technologies for variety of users, such as staff, tenants and visitors. Identification is depending on the user-enabled technologies: presenting a card, scanning a barcode or activating a smartphone credential. Typical applications are access control to car parks, perimeter gates, office buildings and warehouses.

## Mobile ID Protocol

Secure communication between the NVITE reader and a third party mobile application can be enabled by implementing the Nedap Mobile ID Protocol into the app. Nedap Mobile ID secure wireless communication is based upon BLE (Bluetooth Low Energy) and NFC (Near Field Communication).



The NVITE reader and third party app will perform secure 3-pass authentication to ensure that both reader and mobile app are authentic. The authentication is based upon the AES 128-bit encryption algorithm. This Nedap Mobile ID Protocol is available on request and easy to implement.

## Communication interfaces

NVITE ensures seamless integration and supports a variety of well-established industry-standard protocols, such as Wiegand, clock & data and serial connections like RS485. NVITE also supports the Open Supervised Device Protocol (OSDP) for advanced and secure communication between the NVITE reader and the access control panel.

## LED and beeper indication

The built-in high intensity red, green and blue LED's provide the user with visual feedback that the credential has been read or authorized. The LED and beeper functionality can be controlled by the access control panel, but can also be reconfigured.

## Easy installation

The NVITE reader is ideal for mounting at a height of about 1,5 meters (5 feet). The reader is IP65 rated, so it can be used indoors as well as outdoors. The reader features a tamper switch to immediately provide tamper indication.

Technical specifications	NVITE
Part number	9566945 NVITE Model: NVR2001
Dimensions	150 x 50 x 40 mm (5.9 x 2 x 1.6 inch)
Color	RAL9006 cover and RAL7016 chassis
Weigh	0,5 kg (1.1 lbs)
Protection class	IP65 (approx.NEMA4x)
Material	Aluminium (Zamak5) chassis with polycarbonate cover
Operating temperature	-20 ... +60°C (-4 ... +140°F)
Storage temperature	-20 ... +60°C (-4 ... +140°F)
Relative humidity	10% ... 93% relative humidity, non-condensing
Power supply	12 ... 24 VDC (from power-limited UL294 or UL603 Listed power source)
Power consumption	0.4A@12VDC, 0.2@24VDC
Read range	Bluetooth Low Energy: up to 15 meters (may be restricted by mobile app) NFC, LF proximity card and smartcards: up to 5cm (depending on type)
Barcode scanner	Reads QR-code (QR1, QR2, QR micro), as well as most mainstream 1D and 2D barcodes. With integrated illuminator to read in darkness (red or white LED depending on availability)
Operating frequency	Bluetooth Low Energy 2.402 - 2.480 GHz NFC & smartcards: 13.56 MHz Proximity cards: 120/125 kHz
Supported RFID cards	120 kHz: Nedap + EM4200 + HID-PROX + AWID-LF 13.56 MHz: ISO14443A, LEGIC advant, LEGIC prime, HID iCLASS, MIFARE DESFire (EV1/EV2), MIFARE Classic, MIFARE Ultralight (C), MIFARE Plus (SL3), ISO15693 and Sony Felica
Communication interfaces	RS485 and USB2 service interface, additional interfacing options exist. Please consult your representative.
Communication protocols	CR/LF and OSDP. Mobile ID Protocol available on request; please consult your representative.
Relay output	No relay output
Input	2 TTL digital inputs for LED control (RED/GREEN), 1 TTL digital input for beeper control
Output	2 open-collector outputs (OSDP) Wiegand, Magstripe ISO7811/2 (clock & data)
Max. cable length	Fixed pigtail cable length of 5 meter (16.4 ft) Wiegand 150 meter (500 ft) 22 AWG RS485 1.200 meter (4,000 ft) when installed properly
Tamper switch	Magnetic switch, normally closed
Standards	Europe Directive 2014/53/EU (RED) USA: FCC Title 47 Part 158 and 15C Canada: ISSED ICES-003 and RSS210 Safety: EN62368 EMC: EN301489 Telecom: EN330 330 and EN300 328 Human Exposure assessment: ICNIRP Guidelines, EN62369 and EN50364 UL294
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