OPN-3002n

2D CMOS Imager Bluetooth® Companion Scanner

Highlights

- 2D CMOS imager rapidly scans and decodes 1D and 2D barcodes

- Price point makes real-time barcode scanning with an Android™, Apple® or Windows® devices affordable

- Ready-to-go out of the box, just pair it with your Bluetooth device

- Supports SPP and HID Bluetooth profiles for added flexibility

- Memory: 1 MB Storage Flash, 96 KB RAM and 512 KB + 32 KB System Flash

- Small form factor: weighs only 2 oz, 3.27 x 1.42 x 0.85 in (LxWxD)

- Audible and visible feedback after a successful scan

- USB rechargeable, high capacity Lithium-Ion battery

- Extremely durable: IP42 rating against dust and moisture and survives 5 ft drop test

- Two year warranty protects your investment

≡ OPTICON

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Product Specifications

OPERATION

CPU: 32-bit CISC / 96 MHz

OS: Proprietary

RTC: Supports year, month, day, hour, minute, second (leap year supported)

MEMORY

FLASHROM: 1 MB

SRAM: 96 kB

OPERATING INDICATORS

VISUAL: 1 LED (red/green/blue)

AUDIBLE: Buzzer

OPERATING KEYS

ENTRY OPTIONS: 2 keys total, 1 function key, 1 scan key

COMMUNICATION

USB: mini USB

BLUETOOTH: Version 2.1, SPP, HID, 1 to 1 connection, master / slave mode, authentication and encryption

POWER

OPERATING TIME: 10 hours (2 scans / 10 sec incl Bluetooth communication)

2D IMAGER OPTICS

LIGHT SOURCE: Green aiming LED, 2 illumination red LEDs

SCAN METHOD: CMOS area sensor, 752 x 480 pixels

SCAN RATE: Up to 60 fps

READING PITCH ANGLE: -50 to 0°, 0 to +50°

READING SKEW ANGLE: -50 to 0°, 0 to +50°

READING TILT ANGLE: 360°

FOCAL DISTANCE: 4.91 in (124.8 mm) from front

CURVATURE: R>20 mm (12 digits) R>16 mm (10 digits)

MINIMUM RESOLUTION AT PCS 0.9: 5 mil (0.127 mm)

MINIMUM PCS VALUE: 0.30

FIELD OF VIEW: Horizontal 40.6°, Vertical 26.4°

DEPTH OF FIELD AT CODE 39:
5 mil (0.127 mm) 3.54 - 4.33 in (90 - 110 mm)
10 mil (0.254 mm) 2.56 - 7.28 in (65 - 185 mm)
20 mil (0.508 mm) 2.56 - 10.24 in (65 - 260 mm)

DEPTH OF FIELD AT QR CODE:
8.4 mil (0.212 mm) 3.54 - 4.33 in (90 - 110 mm)
15 mil (0.381 mm) 2.17 - 7.09 in (55 - 180 mm)

*The depth of field depends on the view angle and symbol length

SUPPORTED SYMBOLOGIES

BARCODE (1D): UPC-A, UPC-A Add-on, UPC-E, UPC-E Add-on, EAN -13, EAN -13 Addon, EAN -8, EAN -8 Add-on, JAN-8, JAN-13, Code 39, Tri-Optic, Codabar (NW-7), Industrial 2 of 5, Interleaved 2 of 5, S-Code, IATA , Code 93, Code 128, MSI/Plessey, UK/Plessey, TELEPEN, Matrix 2of5, Code 11, GS1 DataBar, GS1 DataBar Limited, GS1 DataBar Expanded, Composite GS1-DataBar, Composite GS1-128, Composite EAN , Composite UPC

BARCODE (2D): PDF417, MicroPDF417, Codablock F, QR Code , Micro QR Code, DataMatrix (ECC 0 - 140 / ECC 200), MaxiCode (Modes 2 to 5), Aztec Code, Chinese Sensible Code

BARCODE (POSTAL CODES): Chinese Post, Korean Postal Authority code

DURABILITY

TEMPERATURE:
Operation: 32 to 122 °F (0 to 50 °C)
Storage: -4 to 140 °F (-20 to 60 °C)

HUMIDITY:
Operation: 20 - 85% (noncondensing)
Storage: 20 - 85% (non-condensing)

AMBIENT LIGHT IMMUNITY:
Fluorescent: 10,000 lx max
Direct sun: 100,000 lx max
Incandescent: 10,000 lx max

DROP TEST: 5 ft (1.5 m) drop onto concrete surface

PHYSICAL

DIMENSIONS (WXHXD): 1.42 x 3.27 x 0.85 in (36 x 83 x 21.5 mm)

WEIGHT BODY: Ca. 2 oz (57 g) (incl. battery)

CASE: ABS, black or white

REGULATORY AND SAFETY

PRODUCT COMPLIANCE: CE, FCC, VCCI, RoHS, JIS-C-6802 Class 2, IEC 60825-1 Class 2, FDA CDRH Class II, IEC62471-1, EN60950-1, IEC60950-1, EN55022, EN55024

ENCLOSED ITEMS

USB cable, Neck strap