

## DESKO PENTA Scanner® 4X

High-quality scanner as desktop unit or for OEM applications



Whether airlines and airports, border control and immigration environments, public authorities, businesses and retailers or banks and insurance companies - every industry has its unique objectives and requirements, like e.g. OEM integration within self-service applications. To fulfill these customized concepts, we at DESKO developed the DESKO PENTA Scanner® 4X, a flexible fullpage scanner platform solution for ID data entry and verification as well as document authentication. The multifunctional housing design is optimized for both usage as a table-top device, as well as the convenient integration in gates, kiosks and counters. With its small footprint and compact design, the PENTA Scanner® 4X requires only a minimum of space. The innovative PENTA Scanner 4X with multifunctional housing is by default equipped with high-class scan technology delivering excellent images with a resolution of up to 900 dpi, a value which even exceeds the official requirements of most law

enforcement agencies of 600 dpi. An included state-of-the-art image sensor ensures an improved image capturing and a better image definition. The super-fast USB 3.0 connection accelerates workflows by an increased data transfer rate. For a better usability, the scanner is available with a document hold clip, allowing for an easier document guidance and operation. Furthermore, the PENTA Scanner 4X is powered via USB so you can operate the device independently from an external power supply. Of course, the PENTA Scanner 4X includes well-proven DESKO OCR technology for MRZ and VIZ reading and an RFID module. For document authentication, it is equipped with visible, IR and UV-A light sources. Additionally available features comprise an illumination package for in-depth document verification including coaxial and oblique light sources, as well as a barcode reader and an IP54 certification for OEM usage.



### Your Advantages

- Full-page, passport and ID document reader with a resolution of up to 900 dpi under different light sources
- Included sensors for enhanced image correction
- USB powered – USB 3.0 connection for increased data transfer rate and simplified installation
- Extended illumination package for in-depth document inspection: coaxial and oblique light, OVD (optional)
- Scanning pane of glass can be exchanged by the user
- Barcode engine for efficient barcode reading (optional)
- Housing design optimized for integration
- Water and dust resistant for integration according to IP54 standards
- Document hold clip improves document guidance

for  
OEM  
and  
desktop  
use

# “ONE HOUSING FOR ALL PURPOSES”



## TECHNICAL DATA

### Footprint:

L 190 mm (7.48 inches) ×  
W 143 mm (5.63 inches) ×  
H 93 mm (3.66 inches)

### Scan Window:

L 94 mm (3.7 inches) ×  
W 131 mm (5.2 inches)

### Light sources:

IR, visible light and UV-A, extended illumination package for in-depth security checks (coaxial light, oblique light, OVD)

### Image formats:

JPG, BMP, PNG

### Resolution:

Up to 900 dpi

### Interface:

USB 3.0 host interface  
USB powered  
LAN (Rest API) (optional)

### Status Indicator:

Audible and visible  
Display (optional)



## Scan Features

- ID and passport image scanning under visible, IR and UV-A light
- Extended illumination package: coaxial and oblique light, OVD (optional)
- Scan without full cover for all light sources possible for easier user handling
- Optimized for OCR data collection
- RFID & NFC Reading Module: integrated RFID module is a dual antenna design that is especially designed for ePassport and NFC reading
- Document size detection (e.g. for ID1 cards additional scan for backside necessary)
- Passport or ID card portrait available as separate image
- Reflection removal scan technology prevents spots caused by laminate or holographic print
- Automatic scan trigger based on document detection
- Automatic crop and rotate including background elimination of scanned image
- Move Detection: ensures that only non-blurred scans are processed
- Rugged Design: solid box and security glass on scan area
- OEM Solution: perfect for integration into gates or kiosks

## Optional Features

- Barcode Recognition Module: embedded barcode engine with 1D/2D barcode reader
- China ID Reading Module: integrated RFID module specifically designed for reading China National ID Card
- Chip Card Module: integrated chip card reader for reading contact chip and smart cards
- SAM Module: integrated secure access module
- Light Sources: coaxial and oblique light

## Basic Authentication Features

- B900 Ink Check: detect if MRZ was printed using B900 ink
- ICAO MRZ Compliancy: check if MRZ complies with ICAO regulations

- Checksum Verification: see if MRZ is reasonable and valid
- UV Dullness Check: use integrated UV light (optional) source to check if data page is made of optical unresponsive material (UV security printings)
- Age Verification: find out age of passport holder
- Document Expiry Date: verify if document is still valid or if it has already been expired

## User Feedback and Guidance

- Light: integrated & programmable multicolor LED
- Sound: programmable buzzer with adjustable volume and pitch
- Display (optional, requires power supply)
- Document clip for enhanced user guidance (optional)

## Certifications

- CE, FCC, WEEE, RoHS, BSI
- IP54 (only for OEM usage)
- Country-specific reports available upon request

## Interfaces

- Host Interface: USB 3.0 super-speed
- USB powered
- LAN (Rest API) (optional)

## Documents

- Machine-readable zone of OCR documents acc. to ISO/IEC 7501-1 and ICAO 9303 (e.g. ID cards, passports, visas)
- RFID documents acc. to ISO 14443 (A/B), ISO 7816 (incl. US passport), ICAO 9303 (BAC, EAC, EAC2.0, PACE, AA, PA, TA, CA), ISO 18013 (BAP, EAP), PKI (BSI TR-03129)
- 1D/2D barcode documents printed on paper or presented on displays
- Chip cards acc. to ISO 7816
- China national ID Card according ISO/IEC 14443 (Type B)
- SAM cards acc. to standard ISO/IEC 7810:2003