

PRODUCT SHEET

Document verification for government authorities

VISOCORE® Professional



VISOTEC® Expert 800



VISOCORE® Inspect

Advantages at a glance

01

Secure

Automated verification of the authenticity of ID documents

02

Low maintenance

Many years in use at national and international level

03

Up to date

Continuous updating of verification parameters

04

Flexible

Easy to extend and integrate

Document verification with VISOCORE® Professional

VISOCORE® Professional is the key to reliable confirmation of the authenticity of all kinds of ID documents, focusing particularly on the following areas of use:

- Document verification at the border during entry and exit
- Establishing identity at police stations
- Document verification during police, customs and other operations conducted by government authorities
- Re-examination of conspicuous documents by document experts

Automated document verification ensures reliable detection of anomalies. The document characteristics and properties to be checked are stored in the document-specific verification parameters, which are continuously updated by Bundesdruckerei's document experts. New documents and amendments to existing documents by the issuing governments are promptly included in the verification parameters and distributed.

“In 2019, 78,297 cases of document forgery were recorded.”

Source: PKS Jahrbuch 2019 (annual police crime statistics), Volume 4, Version 2.0, page 124

Used for many years by national and international customers, VISOCORE® Professional has proven itself in document verification under a vast range of operating conditions. Thanks to its integrated interfaces, the system can be easily connected to external systems (for instance, police information systems) while additional components can be integrated, for example, for biometric identification.

Solution description

The VISOCORE® Professional document verification system comprises the VISOTEC® Expert 800 document reader, VISOCORE® Inspect document verification software and the VISOCORE® verification parameters, including reference images of the documents.

VISOTEC® Expert 800 document reader

VISOTEC® Expert 800 is a compact, robust device that reads ID documents in ID1, ID2 and ID3 formats (ID cards and passports). It comes with a unit for optical detection of the documents to be checked under white, infrared and UV light. Any disruptive reflections, which can be caused by foils or security features, are removed during image capture. A high image resolution of 430 ppi guarantees reliable classification of the document's optical features.

An integrated contactless card reader allows the data to be read from the chips inside electronic ID documents. The card reader is certified according to BSI TR-03105 Part 4.

VISOTEC® Expert 800 has a user-friendly document holder where the ID cards and passports can be easily placed, while at the same time shielding them from disturbing extraneous light.

VISOCORE® Inspect document verification software

VISOCORE® Inspect verification software is installed on the workstation PC to which the reader is connected. It offers the following functionalities:

- Controls image capture and displays instructions for the user on how to correctly place the document
- Identifies the document to be checked and loads the document-specific verification parameters
- Reads and checks the machine-readable zone (MRZ) and the visual inspection zone (VIZ) using OCR
- Checks the document-specific security features as specified in the verification parameters
- Combined verification: comparison of data from the MRZ and VIZ, chip data and, if available, barcode data

- Biometric comparison: printed passport photo versus image taken from the chip
- Displays reference images for the document to be verified under all three types of light (VIS, IR and UV)
- Visualizes anomalies in the document images
- Convenient functions for zooming in and displaying suspicious areas
- Executes the necessary protocols for authenticating and reading chip data:
 - Access modes: Plain, Basic Access Control (BAC), Password Authenticated Connection Establishment (PACE)/ Supplemental Access Control (SAC) and Extended Access Control (EAC)
 - Protocols supported: Passive Authentication (PA), Chip Authentication (CA), Terminal Authentication (TA), Active Authentication (AA) in all relevant versions
- Reads and displays all data groups according to ICAO:
 - MRZ data (data group 1)
 - Facial image (data group 2)
 - Fingerprints (data group 3)
 - Display of contents of further data groups
- Compares the MRZ data with data group 1 on the chip
- Detailed display of all partial results and read-out data
- Clear results page
- Conformity to BSI TR-03135 and TR-03105 Part 5
- Reads boarding passes
- Web interface for connection to external systems
- Can be expanded to include biometric verification using facial image or fingerprint comparison

VISOCORE® verification parameters

The VISOCORE® verification parameters contain specifications for checking the security features and reference images of documents from over 200 countries worldwide, including all types of ID documents (passports, ID cards), visas, residence permits, driving licences, etc. The verification parameters are continuously updated by Bundesdruckerei's trained document experts.