

IDENTIFICATION

MORPHOSMART™ 300 SERIES

MULTI APPLICATION OPTICAL FINGERPRINT SENSOR



Excellent fingerprint image quality: large capture surface, FBI PIV IQS certification

Enrollment, 1:1 verification and 1:N identification capabilities

High accuracy: embedded FIPS 201 and MINEX compliant algorithms

Large internal database capacity: up to 5000 users (2 templates each)

Options: fake finger detection, smartcard reader, security features

MORPHOSMART™ 300 SERIES

MULTI APPLICATION OPTICAL FINGERPRINT SENSOR



The MorphoSmart™ 300 Series - or MSO 300 Series - is a family of high-end optical sensors, based on Morpho's unrivalled experience in the fields of electro-optics and forensic quality fingerprint processing algorithms.

The MSO 300 Series covers a wide range of applications: enrollment, authentication and identification in industrial/commercial and governmental environments.

- A versatile device that carries out **both enrollment and comparison** (1:1 authentication and 1:N identification)
- **Excellent fingerprint capture and processing performance** with the largest single fingerprint optical sensor on the market (23x23mm, 500 dpi, 256 grey levels)
 - Authentication < 0.7 sec⁽¹⁾
 - Identification < 0.9 sec in 1:1000 mode⁽¹⁾
 - Top grade solution to register young or elderly people, manual laborers (mining, textile, etc.)
- **Overall performance certified at the highest levels:**
 - FBI PIV IQS (image quality)
 - MINEX compliant algorithms
 - FIPS 201
 - STQC
 - Common Criteria for fingerprint spoof detection (certified by BSI⁽²⁾)
- **Accurate:** the false acceptance rate (FAR) is configurable down to 10⁻⁸ - depending on the security requirements - and maintained regardless of number of users in database
- **Guides the user and automatically controls the image quality** during fingerprint capture

- **Large internal database:** standard capacity of 500 users (2 fingerprints each), extendable to 3000 (with MSO IDENTLITE license) or 5000 (with MSO IDENTPLUS license)
- **Multiple template & image formats:**
 - ISO 19794-2, ANSI/INCITS 378, Morpho Proprietary
 - ISO 19794-4, WSQ compressed image
- **Options:**
 - Smartcard reader
 - Fake finger detection (Common Criteria certified)
 - Security features to protect the communication channel between host and device (integrity check, data encryption)

Software packages

- The **MorphoSmart™ SDK** is available to integrate easily the MSO 300 Series into various applications and use its embedded capabilities:
 - Available for Windows, Linux and Android Platforms
 - Includes a BioAPI interface
 NB: Low level protocol (ILV) is also available
- The MSO 300 Series can also be used with **MorphoKit™**, advanced SDK for the capture and processing of fingerprint images, authentication and identification



		MSO 200	MSO 300	MSO 301	MSO 350	MSO 351
Interface		Serial	USB	USB	USB	USB
Internal database		From 500 to 5000 users (with licenses)				
Fake finger detection		-	-	Yes	-	Yes
Smartcard reader		-	-	-	Yes	Yes
Security layer		Optional				
Certifications	FBI PIV IQS	Yes				
	MINEX compliant algorithms	Yes				
	FIPS 201	-	-	-	Yes	-
	Common Criteria by BSI ⁽²⁾	-	-	Yes	-	-
	STQC	-	Yes	Yes	Yes	Yes

⁽¹⁾ Includes detection, encoding and matching

⁽²⁾ BSI = Bundesamt für Sicherheit in der Informationstechnik (German Federal Agency for the Security of Information Technologies)