

HID® DigitalPersona® 4500 Module

Optical USB OEM Fingerprint Module

The HID DigitalPersona 4500 Module is a miniature USB fingerprint reader designed for integration into OEM equipment where fingerprint verification or identification is needed – quickly.

This self-contained module optically scans the fingerprint when the user touches the glowing window. Optical technology gives the highest quality fingerprint scans and reliability. Even difficult fingerprints can be authenticated accurately and rapidly.

The DigitalPersona 4500 Module is designed to simplify OEM integration. The module is sealed from dust and includes convenient mounting features. The on-board electronics automatically control image capture, encryption and data transfer over the USB interface.

THREE MODULE VERSIONS ARE AVAILABLE:

- **Standard size with coating:** silicon coating on platen, designed for usability
- **Standard size with no-coating:** platen without coating, designed for durability
- **Small PCB form factor with coating:** ideal for space-constrained applications such as keyboards, touchscreens and point-of-sale (POS) terminals

Developers can integrate the DigitalPersona 4500 Modules into their hardware using the DigitalPersona Biometric Software Development Kit (SDK).



FEATURES:

- Small form factor
- Blue LED (in idle mode)
- Excellent image quality
- Encrypted fingerprint data
- Latent print rejection
- Counterfeit finger rejection
- Rugged design
- Works well with dry, moist, or rough fingerprints
- Compatible with DigitalPersona SDKs

APPLICATIONS:

- PC peripherals, keyboards
- Kiosks
- Point-of-sale (POS) terminals
- Physical entry devices
- Time and attendance terminals

HID DigitalPersona 4500 Module



	Standard size with coating V1.03	Standard size with no-coating V1.03	Small PCB form factor with coating V1.03
Part Number	50012-001-103	50012-NC1-103	50012-F01-103
Dimensions	60.2 x 32.4 x 11 mm	60.2 x 32.4 x 11 mm	54.6 x 32.4 x 13.2 mm
Weight	14.5 g	14.27 g	14.25 g
Pixel resolution	500 dpi (average x, y over the scan area)		
Scan capture area	14.6 mm (nom. width at center); 18.1 mm (nom. length)		
Supply Voltage	5.0V ±5%		
Supply Current - Scanning	< 100 mA (Typical)		
Supply Current - Idle Mode	120 mA (Typical)		
Supply Current - Suspend Mode	< 0.5 mA (Maximum)		
ESD Susceptibility	>15 kV		
Environmental	Indoor, home and office use		
Operating Temperature	0°- 40° C		
Operating Humidity	20% - 80% non-condensing		
Storage Temperature	-30°- 70° C		
Storage Humidity	10% - 90% non-condensing		
Scan Data	8-bit grayscale (256 levels of gray)		
Compatibility	USB 1.0, 1.1 and 2.0 (Full Speed) specifications		
Image Distortion	< 1% (Typical)		
Speed of Image Transfer	< 0.17s		
Interface	USB 2.0 Full-speed High Power Device		
Encryption	Proprietary 32-bit polynomial encryption with rolling key		
Connector Type	Top Mounting Hirose DF13-5P-1.25DS/ equivalent	Top Mounting Hirose DF13-5P-1.25DS/ equivalent	Bottom Mounting Hirose DF13-5P-1.25DSA/ equivalent
Standards Compliance	RoHS, UL, USB, WHQL		

Data subject to change without notice.



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