

SecuGen Hamster Pro Trio is suitable for any smart card application where multifactor authentication is needed for higher security without sacrificing convenience. The Trio features the industry's most accurate, rugged, and affordable USB fingerprint reader to give you what the SecuGen brand is known for, the highest quality in fingerprint biometrics.

**Accurate   Durable   Maintenance-Free   Cost-Effective**

## Features

- Accurate, patented optical USB fingerprint sensor with 500 DPI resolution
- Auto-On™ automatic finger detection and Smart Capture™ for quality scanning of dry, moist, aged, scarred, and difficult-to-scan fingers
- Fake Finger Rejection for enhanced security\*
- Contact smart card reader
- Contactless smart card reader with built-in NFC antenna
- Convenient, ergonomic design
- Fingerprint sensor FBI Certified for FIPS 201 (PIV) and Mobile ID FAP 20



## Benefits

- Improved security with convenience and reduced password reset requests because fingerprints act like digital passwords that cannot be lost, forgotten or stolen
- Improved accountability by allowing users to quickly and easily prove their identities with their fingerprints
- Reliable and consistent performance for an ever-increasing number of applications designed for mobile, desktop, network, enterprise, and Internet environments

## The Highest Quality in Fingerprint Biometrics at Affordable Prices

### Accurate

SecuGen sensors are very accurate thanks to an ultra-compact, patented optic design that produces high quality images for greater precision, less false rejections/false acceptances, and better overall performance compared to competing fingerprint sensors.

### Durable

With a virtually indestructible sensor prism, the SecuGen sensor is extremely rugged. SecuGen sensors are designed to be strong for dependable and consistent scanning even outdoors and under harsh or high traffic environments.

### Maintenance-free

Unlike semiconductor-based sensors and other optical sensors, SecuGen sensors are made with hardened glass that needs no coatings or special protection. SecuGen sensors resist scratches, ESD, corrosion, and other stresses and can be easily wiped clean without fear of damage.

### Cost-effective

SecuGen designs, develops, and manufactures its own fingerprint sensors that are built to last and deliver solid performance for years, making SecuGen sensors the most cost effective choice.

### Typical Applications

- Physical Access Control
- Personal Identity Verification (PIV)
- National ID Cards
- Any smart card / fingerprint application

### Free SDKs

With a variety of free Software Development Kits to choose from, SecuGen readers are easy to integrate into almost any kind of application.

Request a free SDK at [www.secugen.com](http://www.secugen.com) today!

\* Fake Finger Rejection currently supported on Windows only; support for Android and Linux coming soon.

## Specifications

<b>Product Name</b>	<b>Hamster Pro Trio</b>
<b>Model</b>	XU20ASCL
<b>Dimensions / Weight</b>	80.0 x 100.0 x 45.5 mm / 186 g
<b>Operating Temp / Humidity</b>	0° ~ 55°C / 10 ~ 90%, non-condensing
<b>USB Interface</b>	2.0 Full-Speed, Hi-Speed (fingerprint)
<b>Supply Voltage / Max Current</b>	5 V DC (via USB) / 300 mA
<b>Compliance</b>	FCC, CE, KCC, RoHS, WHQL, PIV, FIPS 201
<b>Warranty</b>	One year limited
<b>Supported OS</b>	Windows 11, 10, 8.1, 8, 7, Windows Server 2022, 2019, 2016, 2012, 2008 R2, Android 3.1+, Linux

<b>Fingerprint Sensor</b>	<b>U20-A</b>
<b>Image Resolution / Size</b>	500 DPI / 300 x 400 pixels
<b>Platen Size / Sensing Area</b>	18.2 mm x 23.1 mm / 15.2 mm x 20.3 mm
<b>Image Gray Scale / Light Source</b>	256 levels (8-bit) / LED
<b>Smart Capture Speed</b>	0.2 ~ 0.5 seconds
<b>Features</b> (when used with SecuGen Pro SDKs)	Auto-On, Smart Capture, 360 Degree Fingerprint Rotation
<b>Biometric Standards/Specs</b>	FIPS 201 (PIV-071006), INCITS 378, ISO/IEC 19794-2, 19794-4, FBI FAP 20, MINEX, WSQ

<b>Contact Card Reader</b>	<b>Identiv CLOUD 2100R (uTrust 2700 R)</b>
<b>Standards</b>	ISO/IEC 7816 ID-1, Class A/B/C support, EMV 2011 v4.3 Level 1
<b>Protocol</b>	T=0, T=1
<b>Smart Card Interface</b>	ID-1 8 pin sliding contact, Card Present switch, C4/C8 support
<b>Data Transfer Rate</b>	Up to 600 kbps (depends on card), TA1=97
<b>Supported APIs</b>	PC/SC, CT* M-Card* (*through wrapper on top of PC/SC)
<b>Compliance / Certifications</b>	EMV 2008 v4.2 Level 1, ISO/IEC 7816, USB 2.0, CCID, WHQL, FIPS 201, FCC Class B, CE, UL94, UL 60950, VCCI, ICES, ANZ, HBCI, GSA APL, RoHS2, REACH, WEEE

<b>Contactless Card Reader</b>	<b>AB Circle CIM315F-01</b>
<b>Standards</b>	ISO/IEC 18092, 15693, 14443 Type A & B
<b>Protocol</b>	T=CL (translated to T=1, PC/SC compliant)
<b>Card Types</b>	ISO/IEC 14443-4 Type A & B, ISO/IEC 15693-3 cards, MIFARE series, FeliCa, Calypso, NFC Forum Type Tags
<b>Frequency / Reading Distance</b>	13.56 MHz / Up to 50 mm
<b>Data Transfer Rate</b>	Up to 848 kbps
<b>SAM Card Interface</b>	ISO/IEC 7816, T=0, T=1 protocols
<b>Supported API</b>	PC/SC
<b>Compliance / Certifications</b>	ISO/IEC 14443, ISO/IEC 18092, ISO/IEC 15693, ISO/IEC 7816 (SAM slot), USB 2.0 Full Speed, CCID, WHQL



### What's Inside a Hamster Pro?

At the heart of Hamster Pro Duo and Trio readers are SecuGen's flagship ultra-compact fingerprint sensors with advanced features including:

**Auto-On™** automatically detects the presence of a finger when placed on the reader for quick and easy authentication

**Smart Capture™** captures high quality fingerprints from dry, moist, aged, scarred and difficult-to-scan fingers for greater accuracy and reliability

**High durability and ruggedness** with proven resistance to electrostatic shock, impact, drops, scratches, extreme temperatures, humidity, and contaminants such as sweat, dirt, and oil

**Patented optical technologies for clear, accurate imaging** with high contrast, high signal-to-noise ratio and low distortion

**Reliable performance** even under challenging conditions and tough environments

**Rejection of false fingerprints** such as latent prints and 2-D images

**Fingerprint data protection** with templates that cannot be used to reconstruct fingerprint images

**Greater sensor-to-sensor consistency** for high accuracy when matching fingerprints enrolled with different fingerprint readers at different locations

# SecuGen

*Open the World with Your Fingertip!®*

Founded in 1998, SecuGen is a leading provider of advanced optical fingerprint recognition technology for physical and information security. Our high quality biometric sensors have been used all around the world in diverse areas such as government, finance, health care, law enforcement, education, retail, manufacturing, and transportation.

[www.secugen.com](http://www.secugen.com)