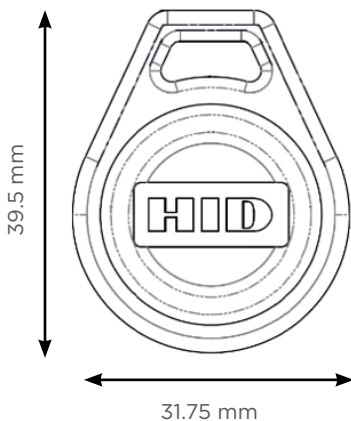




## HID® Seos® 8K Key Fob

### DIMENSIONS



### COMPACT AND CONVENIENT CREDENTIAL FOR KEY RING APPLICATIONS

- **Compact and convenient** - All the power of iCLASS® Seos® technology packed into a convenient, pocket-size key fob, designed to be neatly attached to a key ring. Enabling secure, versatile, and open standards-based access control.
- **Security** - Seos is Secure Identity Object (SIO)-enabled, allowing for multi-layered security beyond the card technology and protecting identity data from unauthorized access.
- **Certified** - Based on Common Criteria (CC) EAL 5+ hardware platform, helping ensure a clear chain of evidence that the platform's security attributes have been rigorously tested and independently verified.
- **Multi-application** - Part of the iCLASS SE® platform, an open and standards-based solution that supports data storage for multiple applications beyond traditional access control such as secure printing, time and attendance, cashless vending and biometric templates.
- **Privacy Protection** - Seos offers enhanced data and privacy protection by incorporating mutual authentication and secure messaging mechanisms into data protection practices
- **Greater durability** - Molded housing for maximum protection in harsh environments, capable of withstanding elevated operating temperatures when compared with cards.
- **Compatibility** - Supports iCLASS SE single-technology and iCLASS SE Express reader deployments.

HID Global's Seos® Key Fob is a credential that delivers the same level of security as a smart card, but offers portability where a key fob form factor is desired for convenience.

The Seos® Key Fob is powered by Seos, the next generation of credential technology that provides enhanced security, privacy and functionality. Additional features enabled through advanced technology include secure access via mobile devices and the ability to efficiently manage multiple applications.



## SPECIFICATIONS

### Seos 8K Key Fob

<b>Operating Frequency</b>	13.56 MHz
<b>Communication Protocol Compliance</b>	ISO14443A-4
<b>Communication Speed</b>	Up to 848kbps
<b>Memory Type</b>	EEPROM
<b>Memory Size</b>	8 Kbytes
<b>Multiple Applications Support</b>	Yes (using Open Data Profile)
<b>SIO Data Object Support</b>	Yes (Enabled by default)
<b>HID Format Support</b>	Yes (wrapped in SIO)
<b>Write Endurance / Data Retention</b>	Min 100,000 cycles / 10 years
<b>Typical Transaction Time</b>	Data size dependent
<b>Extended Privacy Support</b>	Yes
<b>Security Features</b>	Mutual authentication (compliant to ISO/IEC 24727-3), key diversification (based on NIST SP800-108 using AES 128), secure messaging (compliant to EN14890-1:2009). Session key derivation based on NIST SP 800-56A.
<b>Security Certification</b>	Common Criteria (CC) EAL 5+ HW certified platform
<b>UID</b>	Random UID (default), 7 byte static UID (optional, not recommended)

### COMPATIBILITY AND PERFORMANCE<sup>1</sup>

<b>HID Signo Readers</b>	Up to 4 cm (1.57")
<b>iCLASS SE<sup>2</sup> Readers (non-keypad variants)</b>	Up to 3 cm (1.18")
<b>iCLASS SE<sup>2</sup> Readers (keypad variants)</b>	Up to 1 cm (0.3")
<b>iCLASS SE Express</b>	Up to 3 cm (1.18")
<b>CP1000D Desktop Encoder</b>	Read/ Write (SIO) / R/W to custom ADF
<b>iCLASS SE Biometric Reader</b>	Template R/W up to 2cm (0.78")
<b>iCLASS SE RB25F Fingerprint Reader</b>	Template R/W up to 2cm (0.78")
<b>Omnikey Readers<sup>3</sup></b>	Read SIO and R/W to Open Data or custom ADF
<b>Embedded SE devices<sup>4</sup></b>	Read SIO and R/W to Open Data or custom ADF

### MECHANICAL, ENVIRONMENTAL AND COMPLIANCE

<b>Card Construction</b>	Ultrasonically welded ABS Shell with TPE insert
<b>Weight</b>	0.13 oz (3.8g)
<b>Operating Temperature</b>	-13° F to 185° F (-25° C to + 85° C)
<b>Storage Temperature</b>	-13° F to 185° F (-25° C to + 85° C) for 1000h
<b>Thermal Shock</b>	-31° F to 185° F (-35° C to + 85° C) 100 cycles (soaking time 5 min, transition time 30 s)
<b>Chemical Resistance</b>	The card can withstand exposure salt water (5%) salt mist, acetic acid water (5%), carbonated sodium water (5%), sugared water (10%), ethylene glycol (50%) for at least 24 hours
<b>Standards Compliance</b>	ISO14443-4, ISO/IEC 24727-3:2008, EN 14890-1:200
<b>Environmental Compliance</b>	IP67 (1m /1 hour), RoHS, China RoHS, REACH, Halogen Free
<b>Warranty</b>	Lifetime Warranty



[hidglobal.com](http://hidglobal.com)

North America: +1 512 776 9000

Toll Free: 1 800 237 7769

Europe, Middle East, Africa: +44 1440 714 850

Asia Pacific: +852 3160 9800

Latin America: +52 55 9171 1108

<sup>1</sup> HID Global testing occurs in open air. Some environmental conditions, including metallic mounting surface, can significantly degrade read range and performance; plastic or ferrite spacers are recommended to improve performance on metallic mounting surfaces. Spacers for iCLASS SE readers are available at [hidglobal.com](http://hidglobal.com).

<sup>2</sup> multiCLASS SE readers are not supported

<sup>3</sup> See Logical Access HTOG for Seos compatible Omnikey products

<sup>4</sup> Read performance is dependent on antenna design and environment

ผู้นำเข้าอย่างเป็นทางการในประเทศไทย

บริษัท เบนนิซิส จำกัด

117/8 ซอยแจ้งวัฒนะ 10 ถนนแจ้งวัฒนะ แขวงทุ่งสองห้อง เขตหลักสี่ กรุงเทพมหานคร 10210  
โทรศัพท์ +66-2-094-0800 [www.bainisys.com](http://www.bainisys.com)

