Technical data	ELS Software V 5.6

Operating systems supported:	• Windows 7, 8, 10 • Windows Server 2003/2008/2012/2016
System prerequisites:	• PC with 1,000 MHz processor or higher • Minimum of 100 MB available hard disk space • CD-ROM drive • 1 free (USB) COM interface • Recommended additional software components: Microsoft Excel Office 97-2016
User languages:	• German, English, French, Dutch, Spanish, Italian
Users:	• 10 users, can be extended by a further 10 users • Flexible rights: View, New, Change, Delete
Database:	• SAP SQL Anywhere 12 (OEM version) • Login through name and password • Optional: SAP SQL Anywhere 17 (client/server version) for simultaneous access to the database by several clients via the network

Event memory
- Storage of the released device events
- Selection via groups or single events
- Scope depending on the hard disk space available

Journal memory
- User actions are stored
- Selection via user, date/time, action
- Scope depending on the hard disk space available

Modules:		

Module size	Devices	Transponders
S	25	100
M	125	500
L	750	3,000
XL	9,500	32,000

Client module
- System with up to 10 clients (can be extended by a further 10 clients)
- Distribution of devices and locking media among the clients

Client-server module
- Multi-user version
- Simultaneous access to the software by several users

Online module
- Networking of the end devices via Ethernet / TCP / UDP
- Central programming and monitoring of all end devices
- Max. online devices: Depending on the licence purchased, the system structure and the PC hardware used by the customer.

	Intelligent transponder module
	• Management and programming of intelligent transponders (Hitag S)
	• Central programming of authorisations

Authorisation assignment:	Management possible through group and areas
	• Organisation of the end devices in areas
	• Organisation of the transponders in groups
	• Assignment of area and individual authorisations for intelligent transponders
	Possible time-related restrictions:
	• 31 freely definable week-related time zones with 3 intervals per day (time zone 32 = without time limit)
	• Public holiday calendar for 32 public holidays
	• Public holiday calendar for 15 holiday intervals

Devices and transponders supported:	Programming media:
	• ELSmobile software
	• USB RF radio stick for offline programming
	• Old devices: Serial IR adapter for offline programming
	• Old devices: Pocket PC (PDA)
	• Old devices: Programming device (PG1)
	End devices:
	• ELS Pro (type: 47)
	• ELS Protector®
	• ELS Guardian
	• ELS AccessManager , ELS AccessManager Terminal
	• ELS ITT (intelligent transponder terminal)
	• ELS desktop reader (serial)
	• ELS-P, MFS, LSE, ELS999, (butler)
	• ELS Pro (type: 48)
	• ELS AccessManager V7 , ELS AccessManager Terminal V7, ELS AccessManager ITT V7
	• ELS RF-NetManager
	• ELS desktop reader (USB)
	End devices (from October 2019):
	• ELS Guard
	Device import through CSV file prepared by DOM (must always be specified on order)
	Transponders
	• Hitag 1, 2, S
	• EM 4100, 4102, 4150, 4450
	• (Deister)
	• (butler ID device)

Technical data	ELS Software V 5.6

Master data management:	• 5 freely definable master data types (e.g. employees, visitors, external companies) • 3 definable field names (e.g. personnel number, function, department) • Addition of an image file • Blocking option, validity from to • Field for remarks or other entries • Copy and search function • Master data import/export via CSV file
Interfaces:	• ODBC database interface • Optional: OEM interface: Remote control of the ELS software running in the background via TCP/IP

Technical data	ELS Software V 5.6

Protocols:	• TCP • UDP
Ports TCP connection:	TCP server (old devices): • Port 9601 (incoming: events) • (ELS Software MultiLine or Client/Server: 9601 … 9608) TCP Client (old devices direct (ELS software)): • 19000 (outgoing: configuration)
Ports UDP connection:	UDP Client (old devices): • Port 10002 (outgoing: communication with the end devices, 1: 1) UDP Client (old devices direct (ELS software)): • Port 19001 (outgoing: broadcast for the configuration) UDP Client/Server: • Port 9601 (outgoing: communication with the end devices ELS AccessManager V7 and ELS Pro type: 48) • Port 9601 (incoming: events and alive-dialogues from the end devices ELS AccessManager V7, ELS RF-NetManager and ELS Pro type:48) UDP Client/Server (ELS software): • Port 47138 (outgoing: configuration of the end devices ELS AccessManager V7 and ELS Pro type:48) • Port 47138 (incoming: alive-dialogues of the end devices not yet configured)
Scope of supply:	• DVD with software and instructions

All specifications correspond to the current development status. We reserve the right to make technical changes at any time.