SIEMENS
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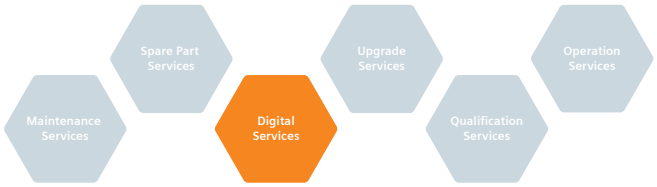
Siemens Mobility Services (SIMOS®)

SIMOS® Smart Security

Ensuring sustainable rail security

Availability, maximum reliability and security: These are the challenges every rail operator is faced with – concerning both rail infrastructure and rolling stock. Gaps in cyber security can prevent these targets from being met or even damage the operator's reputation. For this reason, ensuring sustainable cyber security for rail systems is a fundamental requirement for smooth and safe operation. With SIMOS® Smart Security, we help you to analyze your systems, identify potential vulnerabilities, and define and implement measures to protect your assets.

Cyber attacks on industrial systems are becoming increasingly common, and can cause devastating damage. Also rail systems are potential targets for hackers. Their typical lifecycles of 20 years or more make them even more vulnerable. Only a regular review of the security status can protect them. Governments and public institutions have recognized the importance of cyber security for critical infrastructures and therefore also for rail transport. Laws and initiatives that stipulate minimum standards and regular reviews have already been adopted by many countries. New international standards (such as IEC 62443 and ISO 27001) lay the foundations for cyber security in systems and organizations.



Our service – your benefits

- **Proactive:** detect and close security gaps before they become a problem
- **Knowledge-based:** unique rail domain and cyber security expertise
- **Customer-specific:** modular solutions that can be adapted to individual requirements
- **Seamless:** comprehensive rail security concept without third-party involvement

To ensure sustainable cyber security for rail operators, we've developed Smart Security. The multilevel service comprises the following modules:

Rail security gap analysis

- Assessment of the current system architecture and processes
- Identification of security gaps
- Risk evaluation
- Recommendation of measures to minimize the risks
- Optional: penetration tests

We assess the status quo using a test catalog specially tailored to rail systems in accordance with IEC 62443. As well as technical systems, we also consider internal operational workflows.

If required, we perform penetration tests to simulate cyber attacks. This means that our security specialists carry out a hacker attack in agreement with our customers. Based on the results of the analysis, we propose measures to improve cyber security.

Rail security concepts and implementation

- Implementation of measures such as system hardening
- Optimization of processes, etc.

We work with you to implement the tailored rail security concept.

Continuous monitoring of rail security

- Ongoing review of the rail security status
- Proactive threat reporting
- Support if incidents occur

The system data flows are monitored automatically in real time. Irregularities and potential threats are detected quickly and reported reliably.

Rail security training

- Standardized training courses, e.g. as web-based trainings
- Customer-specific training

Employee conduct is a decisive factor in rail security. We train your staff and turn them into key allies in the fight against cyber attacks.

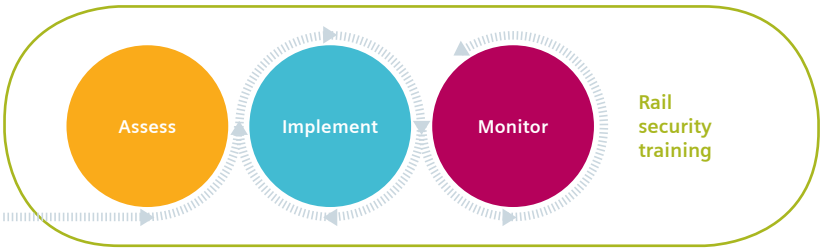
Please contact us – we will be happy to advise you.

Seamless service from a single source

Cyber security is a highly sensitive area in which trust plays a major role. Our rail systems expertise and our modular service portfolio enable us to offer a seamless rail security concept without the need to involve any third parties. This reduces the cost to the operator and limits the disclosure of sensitive information.

Our service for rail security

Every rail operator is different. There can and should be no standard solution for rail security in this area. It is more important to provide optimum protection for the existing infrastructure and tailor all measures specifically to it. This is what we are able and willing to do.



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Siemens Mobility GmbH
Otto-Hahn-Ring 6
81739 Munich
Germany

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