



Mats Gunnmarker

Partner, exida.com

Fields of Competence

Functional and Safety of (Programmable) Electronic Systems:

- Hardware
- Software Safety, Operating systems
- Safety of data communication

Safety Assessments – IEC 61508

Experience Summary

Mr. Gunnmarker has more than 20 years of professional experience with hardware and software development, test, control and safety system engineering.

After graduating in 1984 from Chalmers University of Technology, he began working with SW & HW design for remote controlled maritime radio transmitters at the Swedish telecom company, Televerket. After one year he moved to Spine Robotics where he worked with software development and later on, installation of robot painting cells. When Spine Robotics was bought by the consultant company Benima in 1998, he continued to work in the application field with programming in ABB Master safety- and control systems and in the UNIX based HMI system of ABB.

For a one year period he was also working with software development in a telecommunication system for Ericsson in Sweden.

In 1994 he left Benima and moved to Norway and started working for ABB Energy with SCADA system engineering and installation. After one year he was transferred to ABB A/S and started implementing communication protocols for Fire & Gas panel interfaces in ABB Master Safeguard. In 1997-1999 he was designer and responsible for a safety I/O development project for the ABB Master Safeguard system.

In 1999 he became responsible for defining the architecture, safety concept and requirements for ABBs latest safety system, 800xA. In parallel he worked with implementation of an IEC 61508 compliant quality management system for ABB. After the initial design phase he was working as a safety coach for the three main development sites of this distributed development project in ABB. The safety coach responsibility included compilation of the Safety Case and managing the TÜV certification.

After 12 years in ABB and with over 10 years of experience and knowledge in safety and high availability system design he decided to join *exida.com* as a partner in May 2007. In *exida*, he has been working as safety coach, defining safety requirements and safety concepts, and performing assessments for concept approvals.

Professional Profile

Key Assignments and Projects

- Safety coach in field device development projects
- Safety coach for safety control equipment development in automotive project
- Safety coach for development of DCS Safety System
- Assessments of SW and HW development projects
- Certifying Assessor at *exida* Certification S.A.

Affiliations

Member of the NEK, Norwegian Electrotechnical Committee for standardization, and part of the maintenance team for IEC 61508.

Publications / Patents

Three patents related to safety system design.

Credentials

Graduated from Chalmers University of Technology in Gothenburg, Sweden, with M.Sc. in Electrical engineering.