

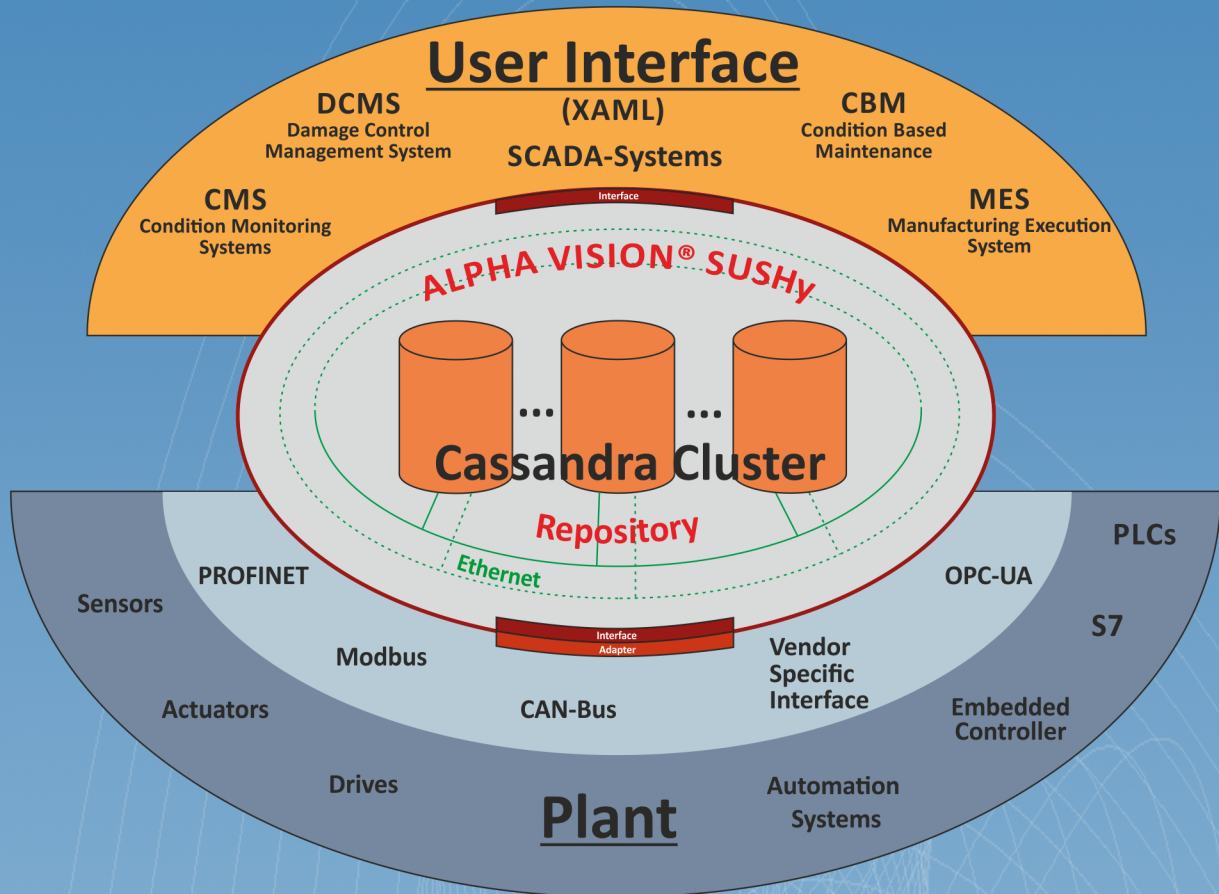


**bit by bit
keeping pace with the future**

**innovative solutions from
plant monitoring
to
total automation**



ALPHA VISION® SUSHy



SUSHy Framework

The SUSHy framework provides a great number of functionalities to develop HMI-, SCADA-, IPMS- and Damage Control applications in an easy way. Some of these features are:

Key Features

- Message System (Alarms and Events)
- Reports
- Archiving and backtracking (replay) of data
- Highly scalable from small to almost infinite amount of measuring points (only limited by hardware constraints)
- Fulfills all Security requirements: from User access management to station in control
- Trends (y-t and y-x charts) with state of the art trend controls
- Personnel- and Material Management (e.g. equipment)
- Plant/Building Damage and Incident Management
- Integrated CCTV
- Training and Simulation System
- Predictive Maintenance algorithm

User Interface

- Build modern visualization solutions with state of the art technologies such as Microsoft WPF offering advanced graphics, rich media, animations, 2D and 3D vector graphics, custom styles which can be switched at runtime, touch/multitouch and gesture support, easy integration and wide availability of 3rd party controls

SUSHy Repository

- Handle large quantities of data and high frequency data easily with the SUSHy Repository built on top of state of the art big data technologies
- Distributed server architecture providing high availability, performance and scalability with no single point of failure
- Support of redundant busses
- No need for dedicated server PCs or expensive server hardware
- No additional license costs for database software
- Support of different communication drivers preferred OPC UA, fieldbusses or proprietary drivers

DCMS - Damage Control

Propulsion

0

Electrical

0

Miscellaneous

0

Damage-Control

4

System

0

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Plant.DC.FireSensor1JZ0

FIRE SENSOR HANGAR 1J Z0

21.08.2014 14:20:35

Fire

1JZ0

Displays

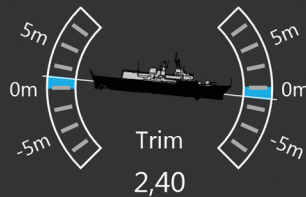
Plotting

Side View

Incident Board



0	0	0	0	1	0	0	0	0	0	0	0	0	0	0
0	0	1	0	0	0	0	0	0	0	0	0	1	1	0
0	0	0	0	0	0	0	0	0	0	0	0	0	0	0



Context Menu

Damage List

Object List

Fire in 1JZ0

Extend

Divide

Connect

Notes

Status

Time

Reported

14:20

False Alarm

Contained

HH:mm



Not Contained

Completed

HH:mm



Reflash

Class of Fire:

A



Team:

Team 1



Priority:

Containment



Exting. Agent:

AFFF



Reset



Room

Killcard

CCTV

The DCMS is a fully integrated system designed to provide full support in managing emergency situations (incidents) and maintenance and repair tasks (such as failures and damages of equipment).

Incident types (such as fire, flood, smoke, gas, explosions, NBC-hazards, etc.) can be fully customized and extended to meet the specific needs of the operators. Due to usability and design, the system facilitates the plotting, entering and tracking of information in an intuitive, efficient and user-friendly manner.

All data is logged, archived and distributed across all operator stations, ensuring that all personnel can base their actions and decisions on the same information. Incidents can be plotted directly on the Incident Board, on which the general arrangement plan of the ship is displayed using scalable vector graphics. Damage control measures can be prioritized, assigned and coordinated quickly and efficiently.

The progress can be tracked at a glance thanks to informative plot symbols.

Incident specific "killcards" are interactive check-off cards which guide the operator through the necessary steps for a specific incident. This ensures that operators can react correctly and rapidly even when facing the stress of emergency situations.

All actions and events affecting the watertight integrity of the ship (such as watertight door and hatch states) can be coordinated, tracked and logged.

Other features include:

- Blanket Search
- Resource management (personnel and equipment)
- Casualty management
- Integrated CCTV
- Drawings directly on the incident board
- Onboard exercises and training

Management System

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Messages

0

Mode

Attended

Station in Command

Readiness State



Logout

TestUser

CRITICAL

FIRE ALARM

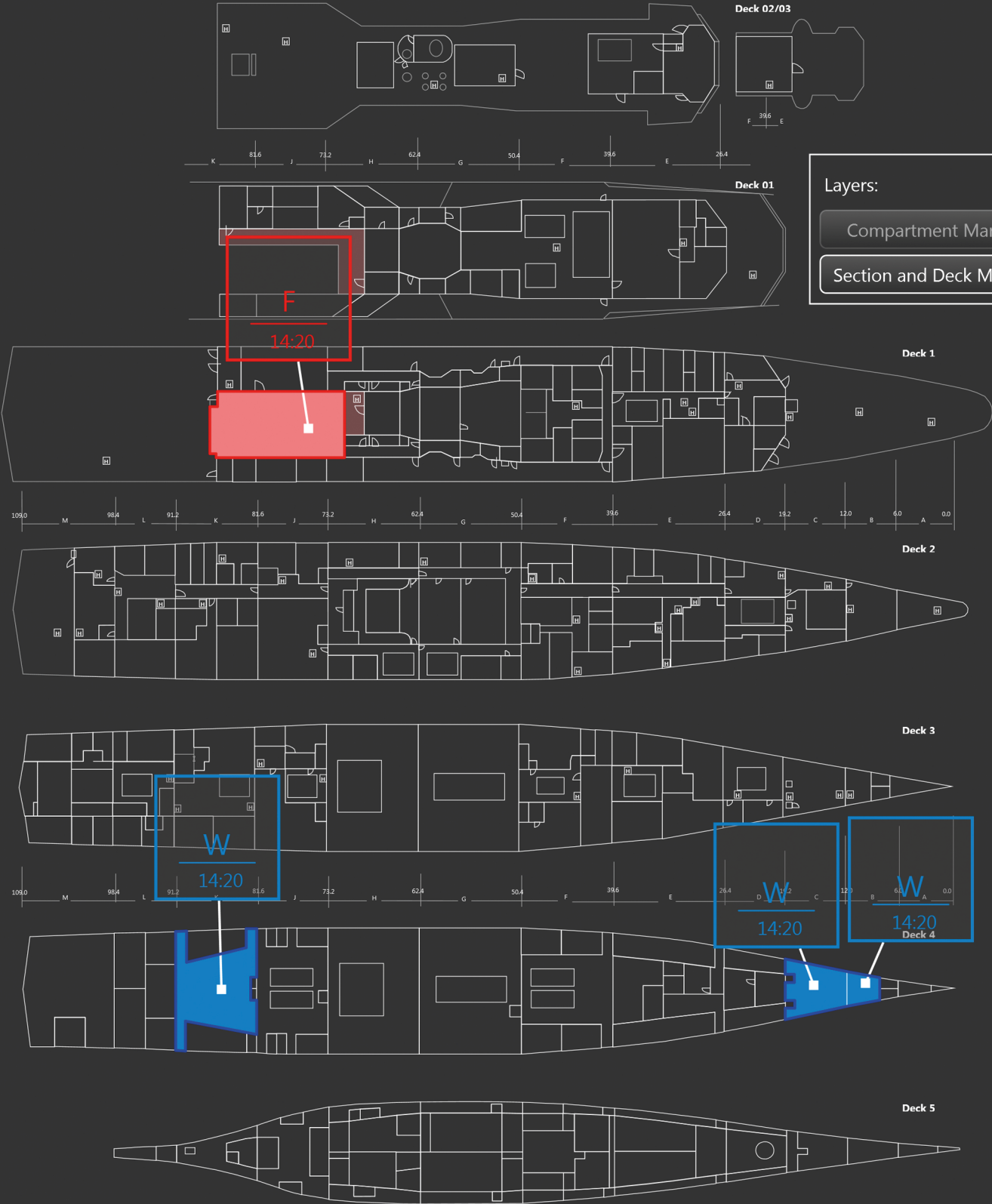
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Fire in 1JZ0 reported

1JZ0

TestUser

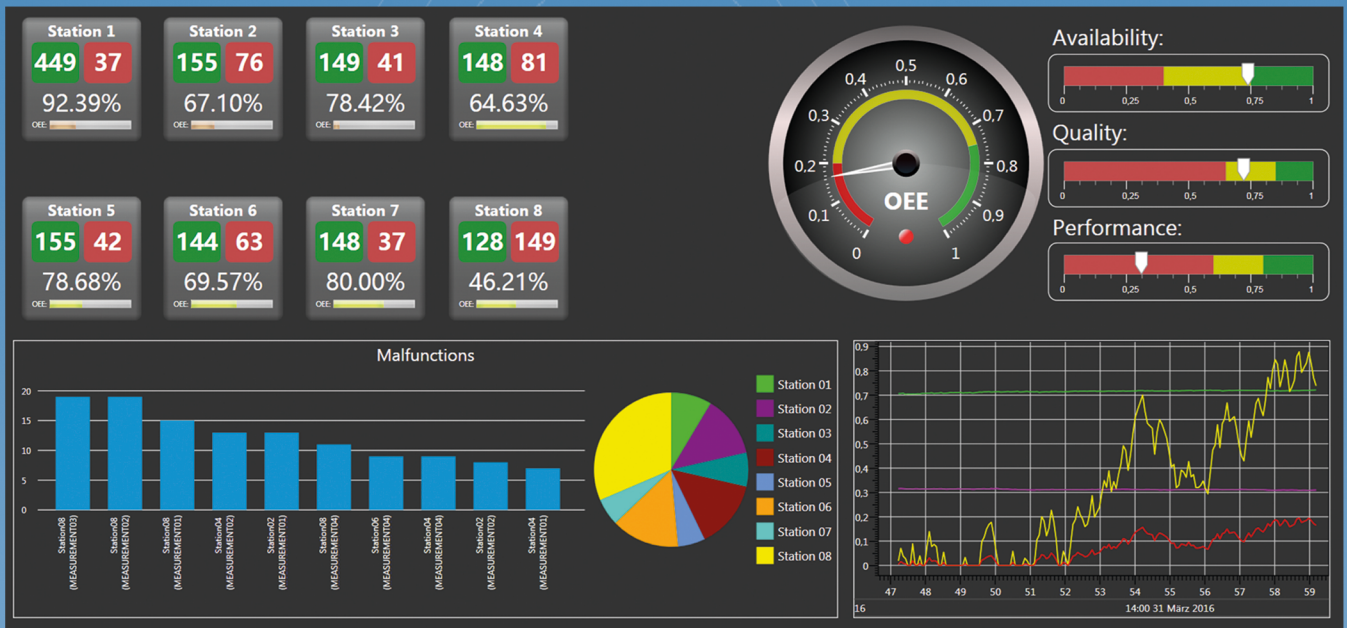


Layers:

Compartment Markings

Section and Deck Markings

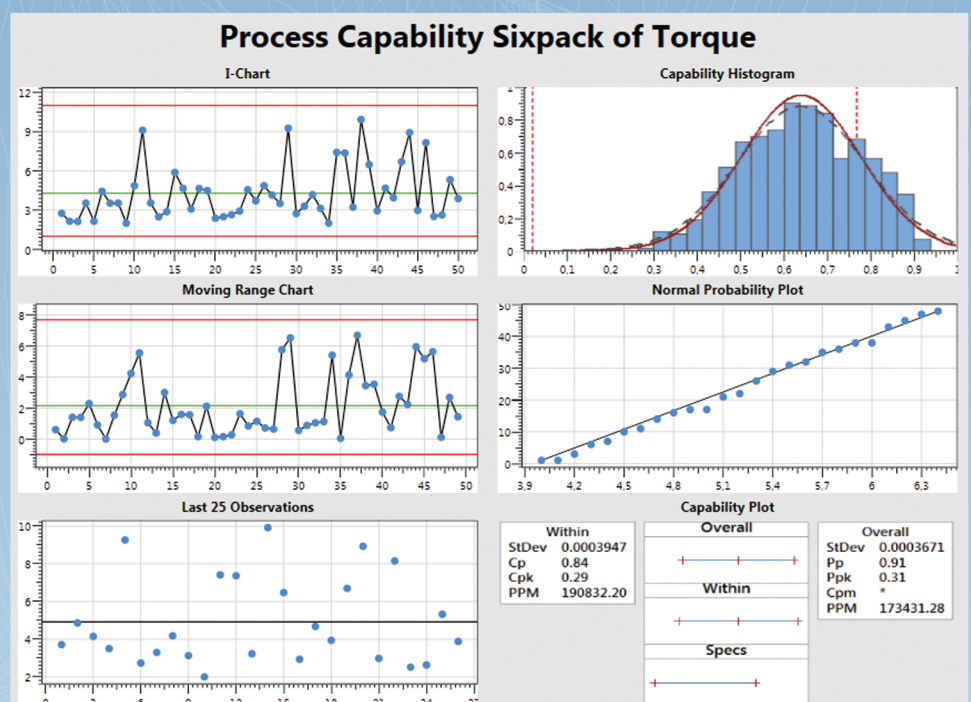
Manufacturing Execution Systems



Get a clear picture of your process with our powerful dashboards, designed to give you a comprehensive overview of the data that matters to you the most.

- Monitor your Key Performance Indicators such as Overall Equipment Efficiency, Availability, Quality and Performance at a glance
- Easily find, reduce and eliminate failures with pareto analysis and reduce waste, re-work and scrap by finding flaws in your production process
- Generate custom Reports of your process data
- Analyze your process data using historical data mining and experience great benefits through data intelligence

Use the power of statistical process control (i.e. process capability sixpack) to optimize your process, improve quality and performance, reduce waste and scrap and ensure that your process operates at its full potential.





a competent and reliable development partner for industrial automation

alpha-bit GmbH is specialized in developing customized software and project solutions for automation, control, monitoring and simulation of industrial plants including data acquisition and evaluation.

In the highly specialized market of ship automation, alpha-bit GmbH is a sought-after system supplier for general contractors and system integrators for more than 30 years. In this sector alone, alpha-bit has successfully implemented over 1000 projects worldwide in both commercial and naval shipping.

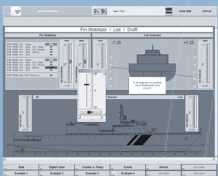
With these many years of experience, alpha-bit expanded its business to nearly all fields of industrial automation. In many industries customers worldwide rely on alpha-bit.

Our services include:

- Customer specific software and component development using proven standard tools
- Supplementary modules for existing solutions including digital networking
- Components for training and simulation of complex processes, e.g. pre-commissioning or failures
- Retrofitting and Upgrading of obsolescent components
- Competent project support through all phases of the life cycle.

Reference projects

From process control systems to machine alarm and monitoring systems for retrofits and new buildings, from merchant ships to submarines - our project experience in the international shipping industry is manifold and technologically profound.



Retrofitting the ship automation of frigates of the Australian and New Zealand Navy by implementing a slightly modified automation solution based on the existing system landscape.



Development of a panel-system which enables local operation as well as decentralized alarming (UMS) and remote control.

Also beyond ship automation, our products and solutions are powerful tools for implementing processes in energy plants, complex production lines, operator training or simulation of malfunctions - while complying with tight time and budget limits.

Complex projects require solid solutions

alpha-bit GmbH is your partner for developing industrial software and realizing automation projects. We provide individual all-in-one solutions which support your processes effectively and amortize fast. Our engineers place special emphasis on adherence to schedule, open communication and the integration of existing standards to support your project perfectly in every phase.

Your company benefits from our considerable experience in the fields of automation and process communication. The focus is on industrial projects which require excellent project expertise.

We offer solutions in all major programming techniques preferring standard technologies as

.NET / WPF

Benefit from alpha-bit's years of experience and Industrial Automation competencies and contact us:

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