THE STRONGEST LINK.

STAHL

R. STAHL AUTOMATION –
MORE THAN YOU EX PECT

THE PERFECT SOLUTION FOR YOUR INDUSTRY

As a leading supplier of automation technology for hazardous areas for almost 50 years, R. STAHL has been providing state-of-the-art components and complete solutions, perfectly matched to the varied requirements of different industries.
R. STAHL is committed to providing the highest level of safety and quality "Made in Germany" in explosion protection. Be it the integration in modern Ethernet networks, the integration of diagnostics and device data in plant asset management systems, wireless communication or the development of visualisation concepts – we meet any challenge!

LIFE SCIENCES

Our products and solutions meet the hygiene directives according to GMP. The implementation of requirements to the FDA 21 CFR Part 11 complement our full suite of services.

FINE & SPECIALITY CHEMICALS

R. STAHL's versatile products perfectly integrate in the modern modular Industry 4.0 automation concepts.

OIL & GAS UPSTREAM

Our automation products and solutions combine robustness with state-of-the-art technology.

OIL & GAS MIDSTREAM AND DOWNSTREAM

Our high-quality, durable products guarantee a high degree of availability and ensure that operating costs stay low.

MARITIME APPLICATIONS WITH LNG & FPSO

International ship approvals and our long-standing experience ensure perfectly tuned system solutions that are used on LNG tankers and FPSO vessels around the world.

BASIC CHEMICALS & PLASTICS INDUSTRY

The comprehensive diagnostics functions integrated in R. STAHL products enable predictive maintenance and failure-free operation.

MACHINE BUILDING & PACKAGE UNITS

Our internationally certified components enable us to develop solutions tailored to meet the specific requirements of the machinery.

FOOD & BEVERAGE INDUSTRY

R. STAHL products are ideally suited for this type of industry; they are certified for use in dust and gas explosion hazard areas and EHEDG-compliant.

R. STAHL AUTOMATION – MORE THAN YOU EXPECT

The Challenges of Automation

- Digitalisation, globalisation and ever shorter innovation cycles.
- IT meets process automation.
- „Internet of Things", Industry 4.0. and modularisation in the manufacturing process.

The business unit R. STAHL Automation combines the competencies and know-how of the product areas "Interface and Solutions" and "HMI and Camera Systems" to manage the fast-changing world and challenges of automation with high-quality products and solutions.

Our experts from around the world actively participate in technology task forces, e.g. "Ethernet in the field", and are represented in all major committees on international explosion protection like ATEX, IEC, NEC, and many more.

YOUR EXPERT FOR HAZARDOUS-AREA SOLUTIONS

CONSULTING & DESIGN EXPLOSION PROTECTION

CERTIFIED PRODUCTION

COMMISSIONING FAT / SAT

TRAINING & AFTER SALES SUPPORT

- From explosion-proof components to customised solutions – all „Made by R. STAHL".
- Global know-how in explosion protection and multifaceted expertise in automation solutions.
- Many years of project experience, also in extreme ambient conditions.
- Production is certified according to ATEX and IECEx.

INTERFACE PRODUCTS

Remote I/O

In process automation, intrinsic safety is the predominant type of ignition protection to prevent explosion in hazardous areas.

R. STAHL provides the full range of solutions:

- INTRINSPAK safety barriers for customised solutions with maximum flexibility.
- ISpac isolators with galvanic isolation and cost-saving installation options.
- IS1+ remote I/O – the most widely used system in Zone 1, 2, and Division 1, 2.
- ISbus fieldbus technology for effective FF H1 and PROFIBUS PA fieldbus installation.

All devices are certified to international explosive atmosphere standards; the predominant part of them meets the requirements relating to functional safety or the safety requirements of the shipbuilding industry.

Safety barriers | Ex i isolators | Fieldbus technology

HMI PRODUCTS

Operator station MANTA GMP

The major part of R. STAHL human-machine interfaces and HMI solutions are certified for use in hazardous areas Zone 1, 2, 21, 22, Class 1, Division 2 / Class II, Division 1, 2 / Class III – they are suitable for use in harsh environments, aboard ships, and in GMP and cleanroom environments.

- 7" / 10" / 15" / 21.5" / 22" / 24" and 24"WU displays.
- All established technologies: KVM systems, thin clients, panel PCs, operator panels.
- 4 device platforms for different ambient conditions.
- Peripheral devices, such as barcode scanner or RFID reader.

Operator station SHARK | Panel-mount device EAGLE | Panel-mount device RAPTOR

CAMERA AND CCTV SOLUTIONS

Full HD AFZ camera

R. STAHL cameras have been designed for use in hazardous areas Zone 1, 2, 21, 22, Class I, Division 2. Of superior quality and performance, they ensure reliable operation in harsh and extreme temperature environments.

- Our portfolio includes high-quality compact, all-round, AFZ-, PTZ-, dome, and thermal imaging cameras, available in analogue or IP versions.
- Full HD, ONVIF S, WDR, DEFOG, PoE functions.
- Additional hardware components can be added, e.g. redundant client-server structures, video encoders, switches, etc. to configure tailor-made CCTV systems.
- They also adapt to existing CCTV systems.
- Designed for use at temperatures ranging from -40 °C up to +75 °C (-40 °F up to +167 °F).

All-round camera | Full HD PTZ camera | Full HD dome camera

NETWORK PRODUCTS

Wireless

Implementing Industry 4.0 in process automation means placing greater reliance in networks in hazardous areas.

R. STAHL offers today solutions that are ready for tomorrow's production environments:

- Wireless using WiFi access points, WirelessHART or ISA 100.11a gateways.
- Ethernet switches for 'op is' optical data transmission in Zone 1, 2, and Division 1, 2.
- Network installation using copper or fiber optic cables in Zone 1, or 'op pr' splice boxes, or 'e' Ethernet terminals.
- PROFIBUS DP and Modbus RTU deployed in hazardous areas using 'i' copper and 'op is' fiber optic cables.

Ethernet | Network installation | Fieldbuses

SYSTEMS AND SOLUTIONS

System Solutions with Remote I/O and Fieldbus

All-in-one solution:
IS1+ remote I/O with Ethernet and Modbus TCP is the "classic" way to connect field devices; combined with ISbus field devices couplers they can also be used with digital FOUNDATION Fieldbus H1 (FF H1) segments.

Ex p System Solutions with Pressurisation Method

Direct implementation of industrial applications in explosion-proof controls.
Tried and tested, cost-saving solutions for e.g. machine control – can be used around the world.

Thin Clients in a Pharmaceutical Plant

MANTA HMIs are thin clients used to remotely control PCs or virtual workstations, e.g. via Ethernet or WiFi. These HMIs are suitable for use in the pharmaceutical, life sciences, or fine chemical industries and in cleanrooms; they are GMP/GAMP-compliant, and combined with RFID readers meet the requirements according to FDA 21 CFR Part 11.

OPEN CCTV SYSTEM

We combine our hardware and software components to configure the best CCTV system solutions for hazardous and safe areas, tailored to the specific needs of your production plant.
Based on our high-performance, explosion-proof cameras, all other components like server, clients, switches, and VMS are compiled to best suit your requirements.

OPEN CCTV SYSTEM
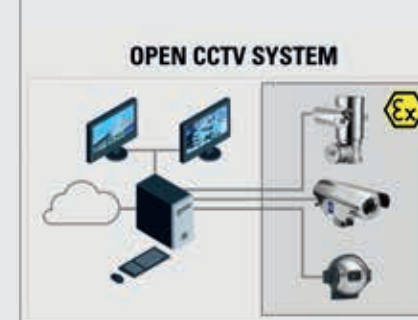
System Solution Wireless, Ethernet and FO

R. STAHL can provide WiFi access points of your choice in hazardous areas.
- Antennas of your choice.
- Compact design, or with enough space for extension.
- Easy connection of Ethernet and power supply.
- Easy replacement of the device.

R. STAHL AUTOMATION – MORE THAN YOU EXPECT

STAHL

CONTROL SYSTEM LEVEL

SAFETY BARRIERS	ISOLATORS	REMOTE I/O	FIELDBUS	NETWORK PRODUCTS	SYSTEMS & SOLUTIONS	HMIs	CAMERA SYSTEMS
INTRINSPAK	ISpac	IS1+	ISbus			EXICOM	

ZONE 2

ZONE 1

Ex p

CONTROL STATION

GROUNDING MONITORING

ISwireless

FIELD DEVICE LEVEL

SIL Safety Integrity Level
IEC 61508 IEC 61511

HART COMMUNICATION PROTOCOL

PROFINET

PROFIBUS

F FOUNDATION

WirelessHART

ISA100.11a

FDT

EtherNet/IP conformance tested

Modbus TCP

Modbus RTU

ONVIF