

New Year, New Innovations

As we enter the new year of 2020, we do so during the midst of an industrial revolution commonly refer to as Industry 4.0. The factory of the future is taking shape today as seen with innovative devices and systems that connects automation and safety across various platforms throughout the world. Instant diagnostics to your cellphone and live monitoring via cloud connections are just some of the possibilities being offered over IoT (the Internet of Things). This North American concept which focuses on data sharing can be used to help achieve design concepts of what is known as Industry 4.0.

In the past, automation tended to be years ahead of the capabilities of safety. Now, safety manufacturers are tasked with not only keeping up, but staying ahead of the curve in order to effectively integrate safe solutions into an Industry 4.0 factory. With the upcoming new decade, one can only expect the technological advances in safety to continue to evolve.



New Innovations From Schmersal

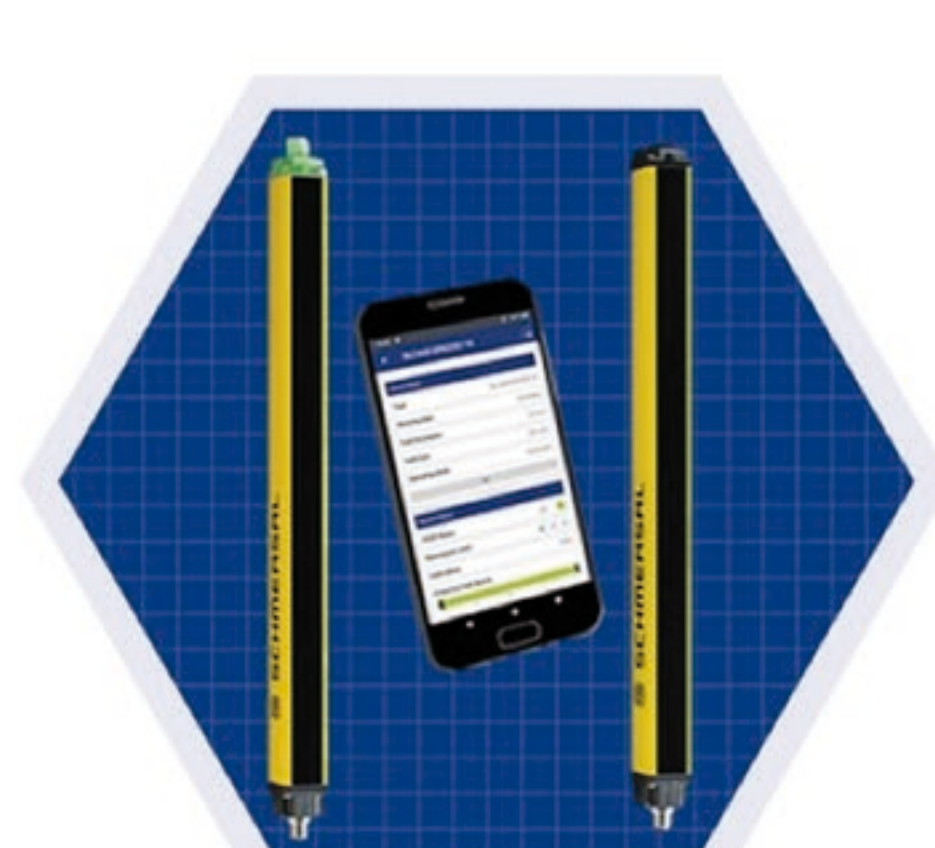
As safety requirements have changed over the years, Schmersal products have evolved as well. Being a world leader in machine safety is an ongoing mission, and at Schmersal we take pride in being able to develop new ideas into proven technology to stay ahead of the innovation curve and to meet the changes in industry applications for machine safeguarding. From simplifying installation with plug-and-play field boxes to integrating Bluetooth interface for real time diagnostic on safety components, our innovations have led the way in machine safety.

Here are some of the latest innovations from SCHMERSAL that will be available in the coming year:

Safety Light Curtains With Bluetooth Interface: SLC...BLE

View real time status and diagnostic information from your safety light curtains on your smartphone or tablet. Coming soon are SLC440 and SLC440COM safety light curtains with built-in Bluetooth interface. The BLE interface app will be available for Android or Apple iOS devices.

[View an demonstration video \(YouTube\)](#)



Compact Electronic Safety Bolt Lock with RFID Sensor: AZM40

The AZM40 is a motorized bolt lock with a bistable interlock principle, allowing the last lock state to be retained in the event of a power failure. The compact size of 119.5 x 40 x 20 mm makes the AZM40 the smallest electronic safety solenoid interlock in the world, ideal for confined and difficult-to-access locations. The integrated RFID sensor detects the presence of the actuator and offers individual coding of actuators (coding level High to ISO 14119).

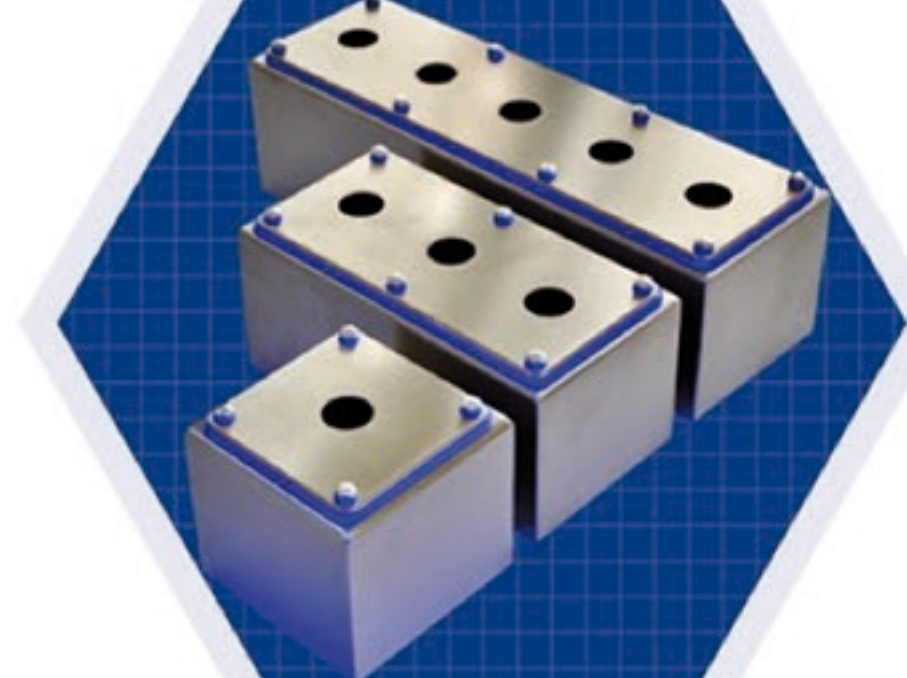
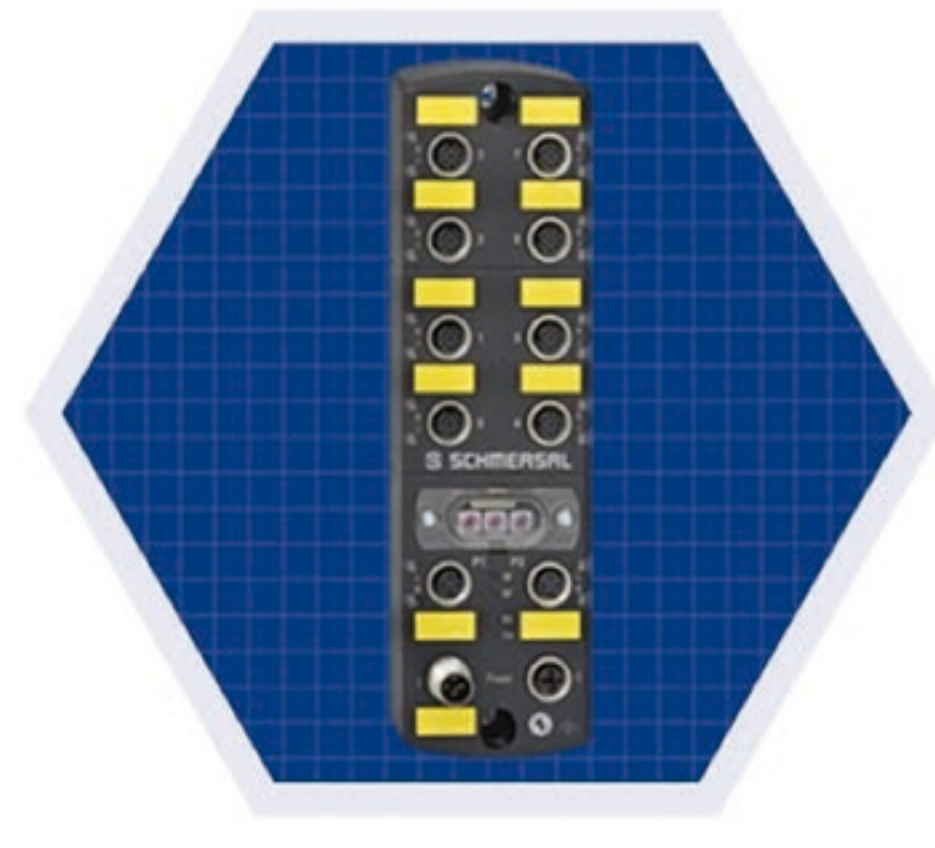
[More information](#)



PROFINET/PROFIsafe Safety Field Box: SFB

The SFB is a safety field box for PROFINET / PROFIsafe systems. It allows for simple plug-and-play installation, via M12-8 pole connectors, for up to eight safety devices. These include electronic and electro-mechanical interlocks, switches, sensors, light curtains, and other safety components. The safe signals from connected devices are forwarded to a safety controller for evaluation via the secure PROFINET/PROFIsafe field bus interface.

[Download the brochure](#)



IP69 Rated Housing for Pushbuttons: NBGLC

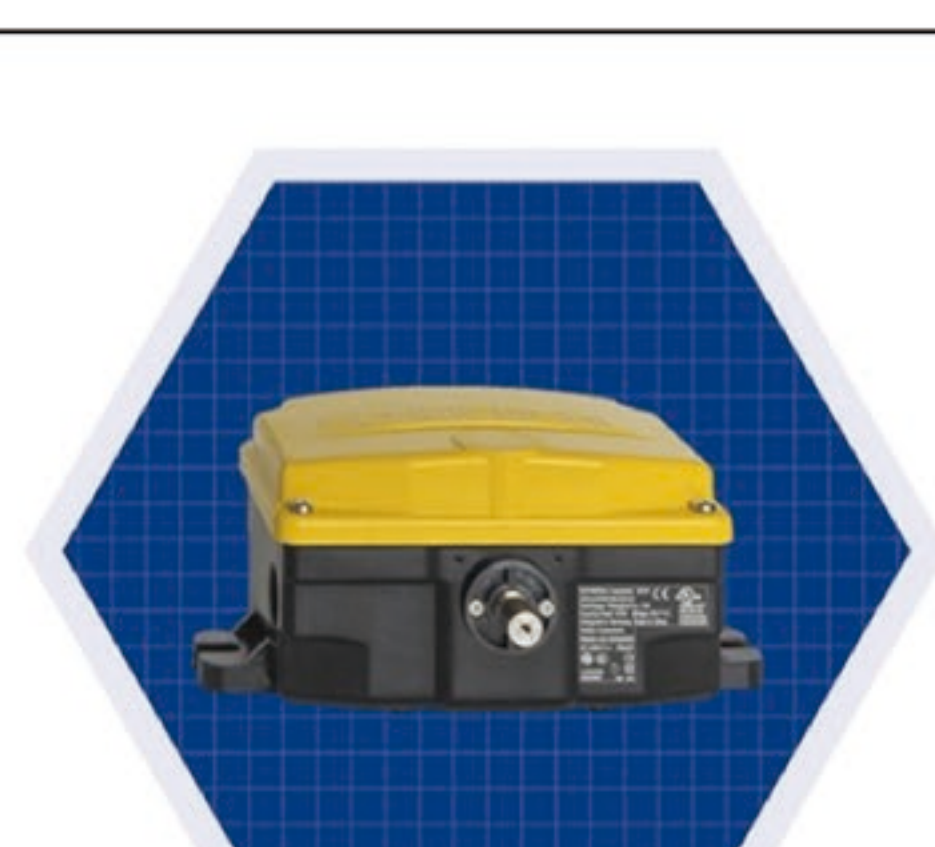
The NBGLC stainless steel enclosure was designed for use in hygienic applications, ideal for machines and equipment that require constant cleaning, prevalent in the food industry. These pushbutton housings feature smooth surfaces without sharp edges, IP69 rated seals to withstand high temperature / high pressure wash downs, and a high resistance to cleaning agents. They are available with 1, 3, or 5 holes, and compliments our N Series of IP69K pushbuttons, selector switches and indicator lights.

[See more information](#)

Heavy Duty Switch platform HDS

The HDS is a modular platform for a variety of heavy duty applications, such as Emergency Cable pull, position detection, belt alignment, slack wire, and level detection. The HDS housing is either Duroplast, especially suitable in port logistics applications as well as in the agricultural industry, or cast iron, suitable for robust industries such as mining or bulk materials and extraction.

[Download the brochure](#)



Reference



tec.nicum Brochure



Tech Brief - Electronic



The Effect of Industry 4.0

Learn more about the various Engineering Services our qualified specialists offer, such as risk assessments, stop time measurements, and machine safety training, including the new course: CE Conformity Assessment.

[Download the brochure](#)

Learn more about the various Electronic Safety Sensors and Solenoid Interlocks available from Schmersal. These switches have self diagnostic and series wiring capabilities, and options for Serial Diagnostic to communicate to fieldbus.

[Download the Tech Brief](#)

This article discusses the goals of Industry 4.0 which aims to combine cutting edge technology with rigorous safety requirements, and the path taken to arrive at this groundbreaking transformation of the modern industrial factory.

[Download the article](#)

Schedule

TECHNOLOGY WORKSHOP presented by



Technology Workshop

This hands-on two day workshop is the ideal forum to learn about up to date safety standards, regulations, procedures, and solutions while experiencing networked safety devices on AS-Interface. The sessions will be conducted by a team of safety experts from TUV USA and AS-IL.

[May 4-5, 2020 - Chicago, IL](#)

Machine Safety Training



General Machine Safety Training

This one day course covers the basics of machine safety: understanding legal requirements, risk assessment, types of hazards, the several levels of circuit design, and available types of safety equipment and how they all come together for a complete safety solution.

[March 17, 2020 - Irvine, CA](#)

[March 18, 2020 - San Jose, CA](#)

Webinar

Validation of Machine Safety Functions

This webinar reviews some of the characteristics with validation in both design and physical testing of a safety system. Some examples are provided with an overview of some validation principles. It provides an explanation why validation is important and what can potentially happen if an effective validation is not done.

Duration: 1 hour

Recording hosted by New Equipment Digest

[Register to view this webinar](#)

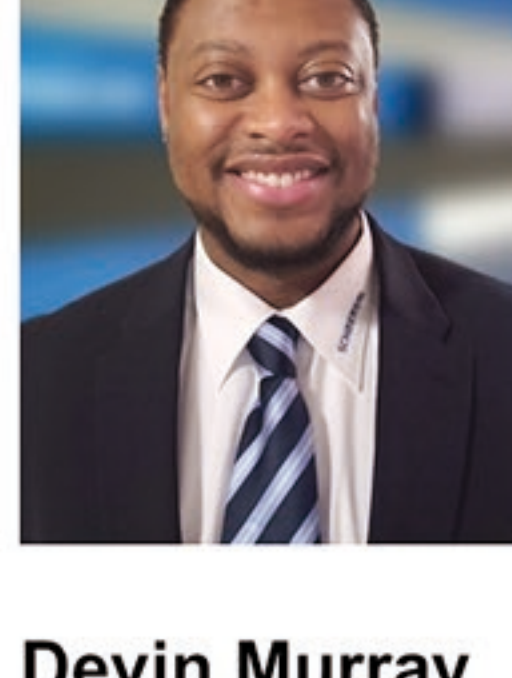
[View past webinars](#)

Webinar



NED MachineDesign

Ask The Expert



Devin Murray

TUV Functional

Safety Engineer

ID-No. 4274/11

Q: Are risk assessments a requirement?

A: Both OSHA and current International safety standards require a risk assessment to identify recognized, reasonable, and foreseeable hazards.

Although templates are available, a set method is not required. The main goal is to identify hazardous parts and conditions so that the necessary steps can be made to provide a safe working environment. This includes adding safety measures such as interlocks and monitoring devices to bring hazardous motions to a safe state when human interaction is required with the equipment.

In order to know which safeguarding measure to apply you first have to know which hazards exist, and this is determined by conducting a risk assessment.

Have a question? Ask Devin: dmurray@schmersal.com