
PRODUCT RANGE OVERVIEW

Installation Products Division

Portfolio overview - Poland



ABB's Installation Products Division has a long legacy of providing quality products and innovative solutions. From safeguarding critical infrastructure on Earth to cable ties that help put machines in space, we continue to deliver solutions that provide a smarter, safer and more reliable flow of electricity from source to socket.

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Designed to perform

Installation Products Division

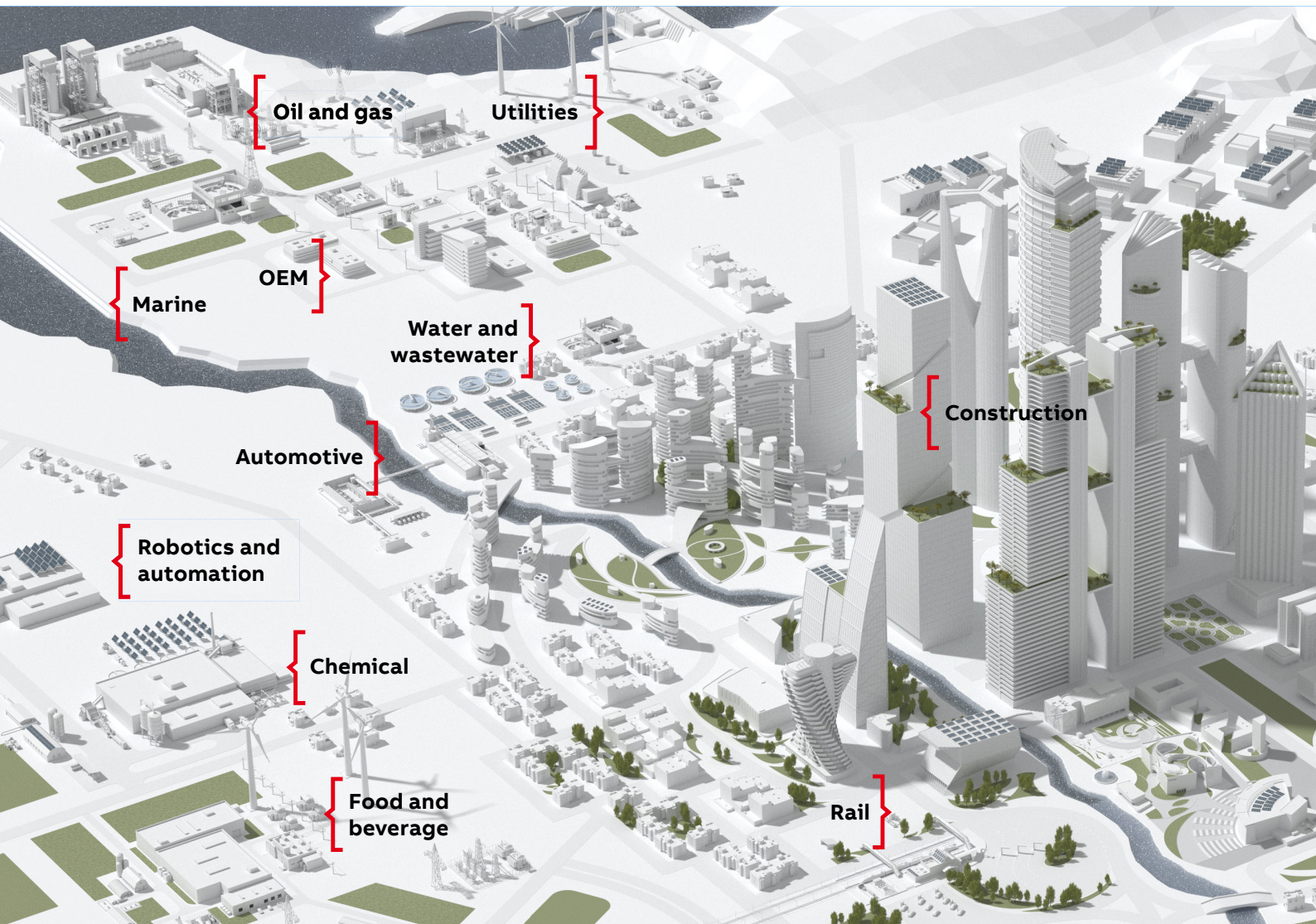
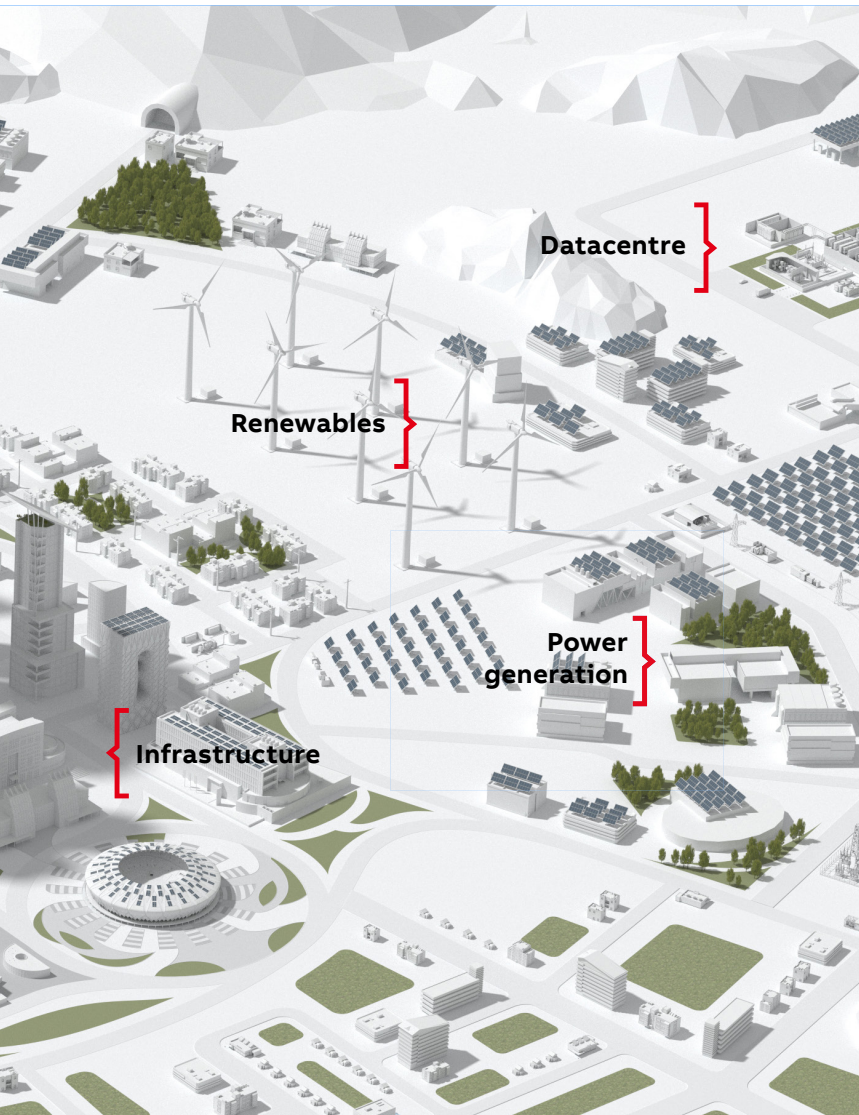


ABB Installation Products Division understands the challenges faced in projects and is committed to providing engineered installation solutions that not only reduce overall project costs, but also increase safety, promote sustainability and even improve cash flow.

SEE MORE



Engineered installation products for:

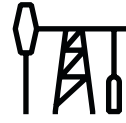
-  Safety
-  Continuous operation
-  Power quality, efficiency & reliability
-  Efficiency
-  Corrosive & harsh environment protection
-  Grounding & bonding
-  Hazardous location protection
-  Liquid ingress protection
-  Extreme temperature protection
-  Services & training

Whether it's labor-saving rough-in components, custom-designed electrical prefabrication systems, online cloud-based design tools or even our world-class logistics, ABB can help bring projects in on time, within budget and profitably.

Installation Products Division

Industry segments

— Industry segments



Industry / Brands	Metals & Mining	Oil & Gas (onshore)	Chemicals (midstream)
Cable protection systems			
Adaptaflex® Flexible conduit systems	–	–	–
Kopex® Hi-Spec Metallic conduit systems	•	•	•
ABB Cable Glands® High-specification glands	•	•	•
Wire and cable mangement			
Ty-Met® Stainless steel cable ties	•	•	•
Ty-Rap® High performance cable ties	•	•	•
Ty-Fast® All-plastic cable ties	–	–	–
Earthing & Lightning			
Furse® Lightning	•	•	•
Furse® SPD	•	•	•
Furse® Earthing	•	•	•
Wire and cable mangement			
E-Klips® Spring steel fasteners	–	–	–
ABB Cable Tray® Metallic cable tray	–	–	–
ABB Wiring Duct® Wiring duct systems	–	–	–
Connectivity solutions			
IS2 Enclosures	–	–	–
Color-Keyed®	•	•	•
Sta-Kon®	•	•	•



Shipyards

OEM

Construction

Infrastructure

Utilities

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Adaptaflex®

KOPEX
HI-SPEC CONDUIT SYSTEMS

ABB Cable Glands®

Ty-Met™

Ty-Rap®

Ty-Fast®

furse®

E-Klips®

ABB Cable Tray®

ABB Wiring Duct®

IS2 Enclosures

Color-Keyed®

Sta-Kon®

Cable protection systems

Adaptaflex® Flexible conduit systems



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Adaptaflex® is a market-leading flexible conduit system brand that can be found all over the world. Combining innovative design with dedicated manufacture it offers customers one of the world's broadest ranges of cable protection products and solutions. With a choice of over 6000 products the range covers metallic and non-metallic flexible conduit systems for the protection of critical power and data cable.

The system solutions from Adaptaflex need to perform in a wide variety of environments, from high temperature to freezing conditions.

The products are designed and tested to withstand constant vibrations, water ingress and offer corrosion and chemical resistance.

Products are available in many different materials, including halogen free, low smoke and low toxicity materials. An extensive range of engineered solutions are designed to withstand the rigours of some of the most technically-demanding markets. So whatever your project involves, our experience will provide the answer, helping you to specify the correct flexible conduit system.

Kopex® Hi-Spec

Metallic conduit systems



Kopex® conduit systems stand for quality and reliability. Quality assurance in manufacture is backed up by accreditations from major organisations worldwide.

- **Conduit sizes** from 10mm up to jumbo size 75mm
- **High** compression/crush strength
- **Tensile strength** - pull off load under tension
- **Impact** resistance
- **Inherent fire protection** on uncoated versions
- **Corrosion resistant** - stainless steel options

- **Proven patented design** - over 20 years in service
- **Application support** and custom design
- **Lifetime** warranty

Approvals and certifications:

- Our testing system includes weight-drop, tensile strength and bend tests.
- ISO 9001:2015
- BS EN IEC 61386-1:2008
- Following the provisions of the low voltage Directive 2014/35/EU

CATALOGUE

MORE INFO

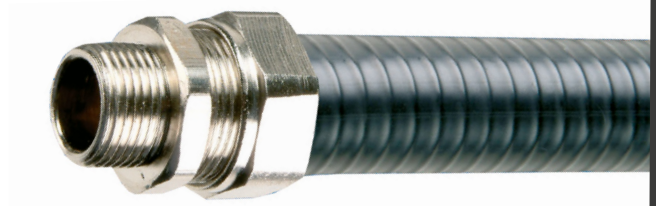


ABB Cable Glands®

High-specification glands

ABB Cable Glands®



The **ABB Cable Glands** range offers high-specification protective cable glands suitable for harsh conditions, including high or extreme temperature ranges, oil and UV exposure, Data Centre use, or highly corrosive environments. Solutions are also readily available for a broad range of general-purpose uses.

The complete ABB line of cable glands and fittings is complemented by the worldwide availability of ABB's comprehensive cable protection portfolio. ABB's offering is amongst the world's largest range of electrical equipment for hazardous, explosive, classified and industrial environments.

CATALOGUE

MORE INFO



Cable glands provide sealed entry into enclosures, motors, panels, or any other device, limiting the ingress of water and dust. Regardless of the configuration, ABB's high-quality standards help to extend system life and minimise downtime.



Wire and cable management

Ty-Met® Stainless steel cable ties

Ty-Met™

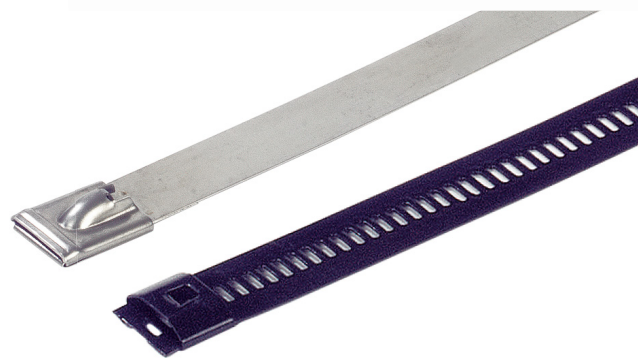


ABB provide unrivalled stainless steel cable tie solutions. Our **Ty-Met®** product range is highly regarded by electrical contractors, electrical installers and electricians, and used throughout many sectors, including petrochemical and food processing industries, power stations, mining, shipbuilding, offshore and other aggressive environments. These ties are available in 316 grade (marine grade) stainless steel, providing extra corrosion resistance.

Range includes:

- **Ball-lock type:** quick and reliable self-locking mechanism
- **Ladder type:** easy application and strong locking system
- **Strap type:** either pre-assembled or on reel with separate heads
- **Releasable type:** can be unfastened for re-use
- **Identification system:** durable in tough environments and extreme conditions
- **Band on reel** with separate heads for a cost saving installation without waste

CATALOGUE



Ty-Rap®

High performance cable ties

Ty-Rap®



ABB employ innovative design and superbly engineered materials that make our range of **Ty-Rap®** cable ties the perfect fastening solution for electricians, electrical installers and electrical contractors - essential where high performance really matters.

Wide range of cable ties available including:

- Natural
- UV-resistant
- Coloured
- Flame retardant
- Anti-microbial detectable
- Extra high-temperature resistant

CATALOGUE



MORE INFO



Offering unequalled quality, Ty-Rap cable ties provide superior performance in any application, and characteristics include resistance against extreme temperatures, flames, continuous sunlight and UV radiation, aggressive chemicals and heavy tensile strength.

Ty-Fast®

All-plastic cable ties

Ty-Fast®



The all-plastic cable ties are available in lengths from 100mm to 1220mm and widths from 2.5mm to 12.4mm, offering a loop tensile strength up to 1200N. These cable ties will satisfy bundling requirements up to 375.5mm. Made of halogen and silicone free Polyamide 6.6, these cable ties are available in natural and black UV-resistant.

On top the Ty-Fast® range is also compliant to UL 62275. State-of-the-art robotic and raw material handling equipment assures product and material integrity throughout the manufacturing process.

Suitable for indoor and outdoor applications:

- **Material:** Polyamide 6.6
- **Color:** Natural or black
- **Halogen** and silicone free
- **Heat stabilised** + UV-resistant cable ties available for outdoor applications that also require a resistance to high temperature +115°C

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MORE INFO



Ty-Fast® cable ties meet shipbuilding classification such as DNV-GL, Lloyd's Register of Shipping, Bureau Veritas. Ty-Fast® cable ties have a CE declaration, supported by compliance to the low voltage directive and EN/IEC 62275.

Earthing and lightning protection

Furse® Structural lightning protection



Furse® lightning protection products deliver effective life safety, together with long-lasting, reliable protection for both structures and critical electronic systems. The product line offers a complete solution for lightning and electronic protection.

IEC/BS EN 62305 makes clear the need for a combined lightning protection solution including both structural and electronic systems protection.

The Furse® Total Solution takes into account many potential risks associated with lightning strikes, and incorporates all the elements necessary to deliver both effective structural lightning protection, as well protection against surge and transient overvoltages.

Including:

- Air termination systems
- Lightning protection conductors
- Conductor clips, clamps and holdfasts
- Bimetallic connection components

CATALOGUE



MORE INFO



Fursee® Surge Protection Devices (SPDs)



Electronic systems now pervade almost every aspect of our lives, both at work and at home. As a society, we are heavily reliant on the continuous and efficient running of computers, electronic process controls and telecommunications networks.

All **Fursee®** Electronic Systems Protection (ESP) products are designed to provide simple system integration whilst achieving the highest levels of protection against transients. The Fursee ESP range of SPDs (mains power, data and telecom) are widely specified in all applications to help ensure the continuous operation of critical electronic systems, helping to form a crucial part of a complete lightning protection solution to IEC/BS EN 62305.

CATALOGUE

MORE INFO



One of the most common causes of damage to these systems are transient overvoltages - short duration, high magnitude voltage peaks with fast rising edges, commonly referred to as surge. Lightning strikes are the most common source of extreme transient overvoltages, however electrical and electronic equipment is also continually stressed by hundreds of transients that occur every day on the power supply network through switching.

Fursee® SPDs are made for protecting:

- Mains power
- Data & signal lines
- Telecom & computer lines
- Other specific electronic systems

Fursee® Earthing



In addition to the right conductor for the application, an effective earthing system relies on joints and connections to have good electrical conductivity with high mechanical strength. All **Fursee®** earthing components are designed to withstand mechanical damage, as well as the thermal and electromechanical stresses from the expected earth fault and leakage currents.

Fursee® earthing components are manufactured to meet exacting British, European and International standards, ensuring robust, long-lasting performance in even the harshest soil conditions.

Including:

- **Earth rods** & conductor systems
- **Mechanical earth clamps** and bonds
- **FurseeWELD®** exothermic welding
- **Earth bars** and equipotential bonding

CATALOGUE

MORE INFO

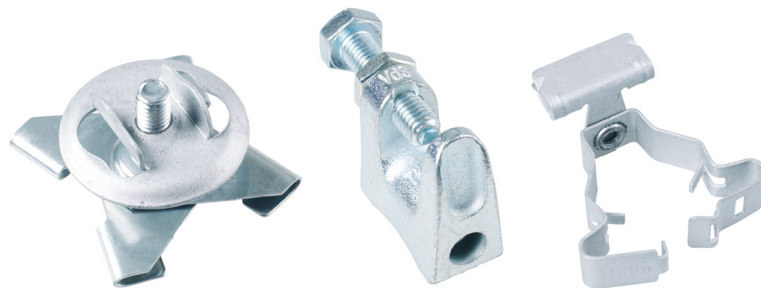


This integrated approach ensures all systems are appropriately cross-bonded and earthed, safeguarding against the risk of voltage differences which might otherwise give rise to flashover or electric shock.

Wire and cable management

E-Klips® Spring steel fasteners

E-Klips®



CATALOGUE



MORE INFO



E-Klips® spring steel fasteners have been manufactured in the UK for over 40 years. They offer a quick, easy and reliable method of fixing surfaces to steelwork without the need for bracket making, drilling holes or the use of nuts and bolts.

- **Corrosive Environment Protection:** most of our E-Klips® spring steel fasteners are zinc coated which provides a high level of protection against corrosion.
- **Total Installation Cost Reduction:** E-Klips® fasteners can be applied using minimal tools – usually only a hammer, screwdriver or pliers are needed.

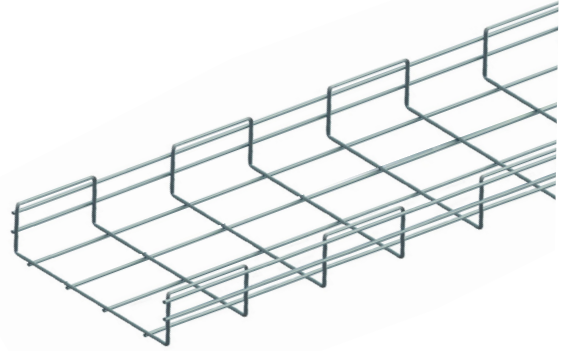
Certifications:

- All products are manufactured using **low carbon steel** in accordance to BS EN 10132-4 grade C67S, and are suitable for indoor or outdoor use, and for mildly corrosive environments.
- **E-Klips® is registered** for BS EN ISO 9001 and has a comprehensive test and inspection programme.
- **FMRC approval** indicates that the product has been tested and approved by the Factory Mutual Research Corporation (FMRC) for use in buildings where fire regulations and environmental concerns would apply.

ABB Cable Tray®

Metallic cable tray

ABB Cable Tray®



A complete system of **ABB Cable Tray®** and accessories is available in several dimensions, fitting a multiple choice of power and data cables.

The accessories allow the system to adapt to different shapes of the infrastructure. This solution is ideal to contain cables above the racks in a secure way, allowing for easy moves, additions or changes.

- **Mechanical protection** against impacts up to 20J
- **Classified in D class** as for the drilling index >30% and Z class as for free base index >90%, in compliance with EN61537 Standard

- Available in **three** different heights and with resistant finishes:
 - **Painted** galvanisation (mica-colors gray)
 - **Hot dip** galvanisation after fabrication
 - **Electrogalvanised**
- The **universal joint** guarantees electrical continuity even in the painted sendzimir finish
- **Painted** with thermosetting, epoxy-polyester powder; average thickness 60 micron
- Cable trays can be **equipped** with couplers, corners, shelves and other ABB metallic trunking range

CATALOGUE



ABB Wiring Duct®

Wiring duct systems

ABB Wiring Duct®



Its new rib profile makes **ABB Wiring Duct®** easy to open and close the cover and guarantees that it clips on more safely.

- **Controlled splaying** of sides to ensure a perfect seal of the cover in the vertical sections and at high temperatures
- **Double trimming line**, one at the base of the ribs so that they can be removed by bending them outwards and one at the base of the lateral sides so that the edge can be cut when two wiring ducts are branched
- **Cover can be opened** without having to use a special tool
- **Can be mounted** on horizontal or vertical surfaces

- **Colour:** RAL 7030 grey
- **Plastic** insulating, shock-proof, self-extinguishing material
- **Maximum usage** temperature +60°C
- **Resistant** to acids, oils and greases
- **Designed to snap** onto the Fix-O-rapid special accessory, suitable to be fastened both to DIN rail and base plate
- The **ribs are cut** using a special pressing process (rounding of the edges) free of burr and rough edges

Standards:

Material in compliance with UL 94 V0 Standard and resistant to abnormal heat and fire up to 960°C (glow wire test) in compliance with IEC 695-2-1 Standard.

CATALOGUE



Connectivity solutions

IS2 Enclosures Control and operation

IS2 Enclosures



The IS2 panel boards are suitable for making electrical automation, control and operation panel boards, with the possibility of constructing batteries of cabinets side by side to control complex industrial plants, to enclose UPS solutions or for capacitor banks. While they are suitable for floor mounting, the cable entry area is prepared in the bottom side of the cabinet but it is also possible to enter with cables through the top, the lateral and the rear sides.

Including:

- The IS2 family offers the possibility to choose from pre-assembled structures and flat pack solution
- Adjustable back plates



- Cabinets with blind or glazed door
- Cabinets with 19" rack frame
- Cabinet with compartments
- Cabinet for modular configurations
- Cabinet for PC
- Cabinet with console

The metal structures conform to the IEC 62208 and IEC 60439-1 reference Standards and to the new IEC 61439-1-2 Standard.

Their performances are the market reference ones: High IP degrees of protection (according to IEC 60529) and IK (according to IEC 62262), which allows installation in industrial environments. IS2 is UL approved according to UL 508A.

MORE INFO



Color-Keyed® Compression connections

Color-Keyed®



CATALOGUE



The **Color-Keyed®** system is designed to meet the most stringent UL & IEC Class A testing requirements. Our Color-Keyed lugs are made of 99.9% pure, oxygen-free copper. The Color-Keyed color coded crimping system assures the right die is used with the right lug resulting in an accurate, reliable crimp.

- **Reliability:** Color-Keyed dies are designed to produce a circumferential, hex- or diamond-shaped compression rather than a simple indent resulting in assured high conductivity, exceeding IEC 61238-1 and UL standards.
- **Shure-Stake® Crimp Mechanism:** The Shure-Stake crimp mechanism eliminates guesswork and produces proper terminations every time.
- **Stranded Wire Termination:** The precision hardened steel dies used by the Color-Keyed system exert tremendous controlled pressure on the connector and form the strands and connector into a solid mass.
- **Verifiable and Inspectable:** A die code embossed onto the Color-Keyed connector during compression makes it easy for inspectors to compare the finished crimp with the die table to verify correct termination.

Sta-Kon® Crimped wire termination systems

Sta-Kon®



CATALOGUE



Sta-Kon® wire terminals offer more copper and a wider funnel to help ensure a premium connection with less work in a line that includes insulated and non-insulated terminals, splices, wire joints, disconnects, ferrules, heat-shrinkable terminals, splices and disconnects.

- **Sta-Kon Terminals:** made of high-conductivity copper with corrosion-resistant plating, include marked stud and wire sizes, a long chamfered barrel to eliminate missed crimps, a deep internal serration to produce a larger contact area, and selective annealing, to leave the barrel soft for crimping while the tongue remains strong.
- **Heat shrink insulation products:** Provides durable protection against moisture, corrosion and abrasion.
- **Shielded wire terminations:** One-piece solderless, wraparound shield connectors terminate shielded cable in seconds with uniform precision while preventing cable damage that may be caused by soldering.
- **Insulation piercing connectors:** Permanent, low-resistance electrical connections, capable of maintaining contact integrity throughout the life of the connection.



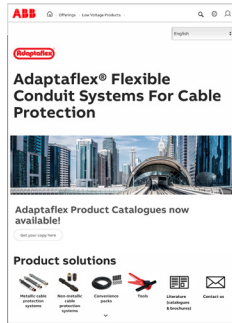
Literature

Download your catalogue / visit the website

01 Adaptaflex® catalogue



01



02

01 Kopex® Hi-Spec catalogue



01



02

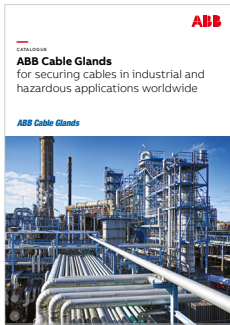
02 Adaptaflex® website



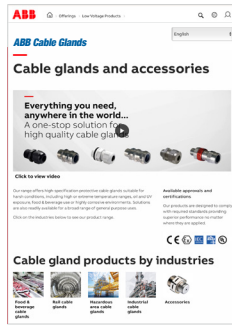
02 Kopex® Hi-Spec website



01 ABB Cable Glands® catalogue



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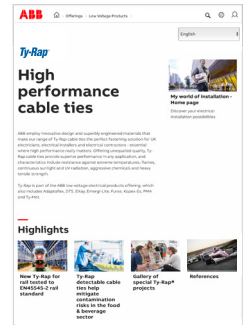


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01 Ty-Rap® / Ty-Met® catalogue



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02 ABB Cable Glands® website



02 Ty-Rap® website



01 Ty-Fast® catalogue



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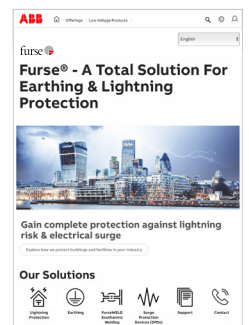


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01 Furse® Earthing & lightning catalogue



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02 Ty-Fast® website



02 Furse® Earthing & lightning website



01 Furse® SPD catalogue



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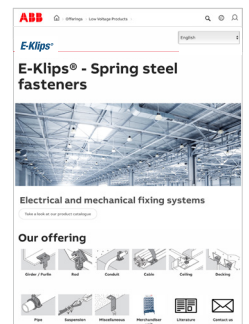


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01 E-Klips® catalogue



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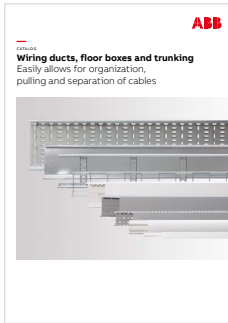
02 Furse® SPD website



02 E-Klips® website

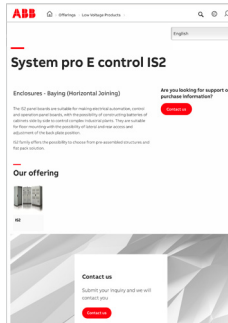


01 ABB Cable Tray® catalogue



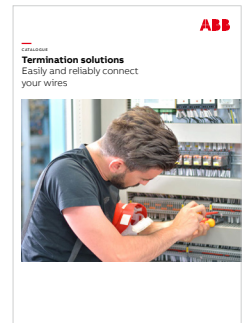
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01 IS2 Enclosures website



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01 Color-Keyed® / Sta-Kon® catalogue



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Online in one glance

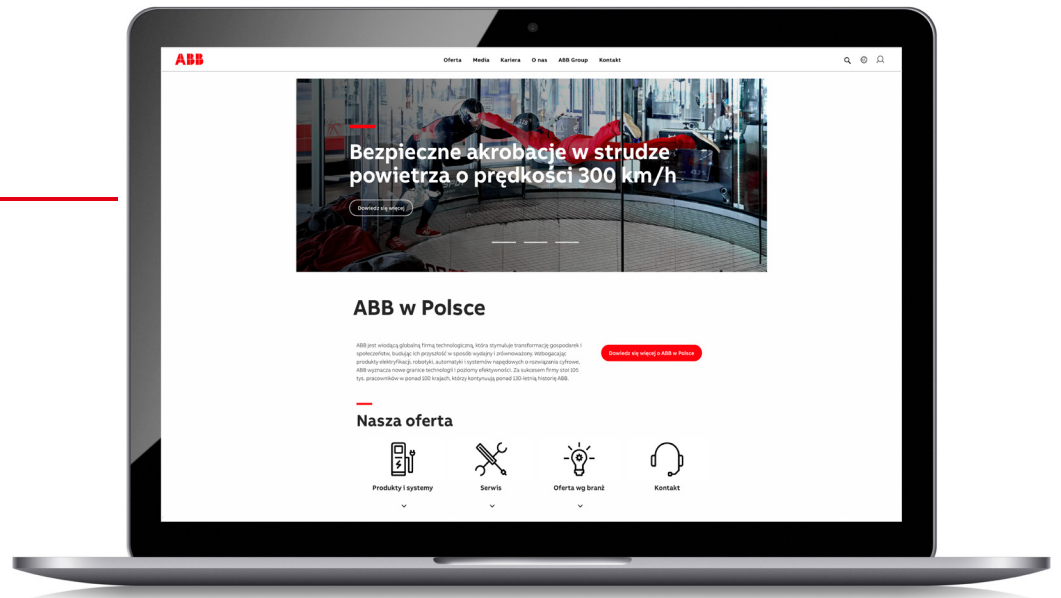




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