

# From Breaking Ground to Routine Maintenance and Repair Panduit Products Impact Your Entire Project Lifecycle

Partner with a company committed to meeting the daily challenges you face. Panduit offers a full solution of over 30,000 readily available parts – from cable ties to power connectors, terminals to identification – Panduit products are engineered for all aspects of designing, installing and maintaining infrastructures within heavy-duty industrial environments.

Productivity Reduce costs and meet deadlines with products and tools engineered

to improve efficiency

**Reliability** Ensure performance and design consistency of products that are vital

to the success of the job

**Safety** Protect personnel, equipment and infrastructure with product systems

that meet/exceed industry standards











# Panduit provides solutions for a number of industrial applications and markets.

### Oil and Gas:

The world's appetite for energy grows every day, and oil and gas are still the best options for meeting global demand. Faced with the need to explore in challenging locations, integrate new oil sands and shale capabilities, meet updated safety protocols, and identify new technologies to handle remote environments, energy producers are looking for partners who can help them keep up with changing business conditions and goals.

### Shipbuilding:

Shipbuilders focusing on ultimate reliability and safety while facing constant cost containment pressures, are looking into ways to increase productivity, minimize unscheduled maintenance, extend global availability and lower overhead expenses.

### Mining and Minerals:

As the global demand on natural resources continues to increase, efficiency and productivity requirements are pushing all mining systems and components to the limit. Site and operator safety are also extremely important as exposure to harsh chemicals, abrasive environments, and extreme temperature conditions are consistently present in this hectic environment.

### Food and Beverage:

Food and beverage manufacturers are faced with countless product safety, quality and manufacturing challenges. Maximizing productivity while reducing downtime requires a robust integrated electrical infrastructure that can deliver optimum productivity, reliability and profitability.

### **Pulp and Paper:**

From sawmill operations through the manufacturing of the final wood and paper, the Pulp, Paper & Wood industry comprises over 3,500 operational plants worldwide. The Pulping process occurs in a harsh environment and is exposed to high cooking temperatures and a variety of chemicals that require high quality of maintenance, repair and operation products to protect people and infrastructure to ultimately eliminate downtime and improve productivity.

### Water/Wastewater:

Water treatment facilities are critical for maintaining public sanitation and a healthy environment. Whether the facility treats industrial and residential wastewater to remove impurities, or treats fresh water for consumption, these facilities rely on robust solutions for dependable continuous operation within harsh environments.

### The Power of Panduit

Panduit offers a comprehensive line of power and grounding products. These products will maintain the quality that Panduit is known for while providing the ultimate productivity, reliability, and safety.











With a comprehensive line of power and grounding solutions, we've got you covered from the ground up.

Structure Ground Compression Grounding

Mechanical Grounding

> Flexible Braid

Blackfin Power and Grounding Installation Tooling

> Heat Shrink

Silicon Bronze and Stainless Steel Hardware PanLug<sup>™</sup> Compression Connectors

Oxide Inhibitor

BusBar

Mechanical Connector

> Cable Ties

GTC Series Cable Clamp

### **Cable Tray Bonding Clamps**

- Listed under UL 467 and CSA 22.2 No. 41. for Grounding Application
- Incorporates a ribbed bolt that holds its place during 1-wrench installation
- Tin-plated to inhibit corrosive effects and improve termination quality of dissimilar metals
- Clear product markings are convenient for ensuring proper installation
- Direct Burial versions include customized hardware for increased strength and corrosion resistance over the competition

### **GPL Series**

- Used to ground copper conductor parallel or at a right angle to a rod, tube, or pipe
- Made from high strength, electrolytic cast bronze
- High strength silicon bronze hardware provides long term reliable assembly
- Accommodates a wide range of pipe, tube, rod and conductor sizes – minimizes inventory requirements, saves cost
- cULus 467 Listed for grounding and bonding and suitable for direct burial in earth or concrete





### **Service Post Connector, Type SP1 and SP2**

- For grounding two copper code conductors to steel structures, busbars, or transformers or for tapping from busbar with hexnut and washer
- Made from high copper content, hard drawn copper rod provides high strength
- Offered with standard and long stud lengths to accommodate a variety of mounting applications
- Wide wire range-taking capability minimizes inventory requirements
- True hex design for body and nut hex provide correct fit with socket, box, or open end wrenches resulting in proper torqueing of electrical connection
- Pressure bar provides secure connection on a full range of conductor combinations used with each connector providing premium wire pull-out strength

# **PanLug<sup>™</sup> Compression**

The substantial offering of Panduit lugs covers most configurations of hole, barrel, and tongue.

Made from high-strength electrolytic copper to provide premium electrical and mechanical performance, each lug can take a wide range of wires, minimizing inventory requirements

### StructuredGround™ Compression Grounding

• The Panduit® StructuredGround™ Direct Burial CompressionGrounding System provides the highest performance and most reliable compression connection in the industry. This system offers the speed and safety of a compression connection, while complying with the industry requirements of IEEE Std. 837. The fully inspectable system that is UL 467 Listed and CSA 22.2 Certified, ensures that the installed product operates safely. Wide range-taking and universal designs provide installation flexibility with a minimum number of parts, reducing procurement and inventory costs. Innovative features assure a high quality bond, reducing labor costs and improving crimp quality

### BlackFin BlackFin Tooling:

Panduit features new battery-powered crimping tools that are the first in the industry to meet the (OSHA) and international safety standards for battery-operated hand tools. Workers have a right to a safe workplace. If you are an employer responsible for the safety and well-being of your employees, you have a responsibility to ensure your employees have a safe work environment, which extends to the tools you use on the job

# PanLug<sup>™</sup> Compression Lugs and Splices

### **Proven Reliability for Mission Critical Applications:**

- Regulatory Standards Compliant: Meets UL, CSA, IEC, ABS, and NEBS Level 3
- Enhance Workplace Safety: Protects personnel and equipment throughout the lifecycle with power connections and cable management that are easy to use, install, and maintain safety
- Engineered for Maximum Reliability and Extended Service Life: Provides superior electrical performance in harsh environmental applications











### **One Hole Barrel:**

Lowest cost connector option can be used in space constrained applications

Standard Barrel:

Code: LCA Series Flex: LCAX Series

Flex Flared: LCAF Series Metric: LCMA Series Aluminum: LAA Series

Long Barrel:

Code: LCB Series Flex: LCBX Series Metric: LCMB Series



### **Butt Splices:**

Facilitate joining of wires to provide a continuous length of conductor

Standard Barrel:

Code: SCS Series Metric: SCMS Series

Long Barrel: SCL Series

Aluminum: SA Series



### **Two Hole Barrel:**

Two stud holes provides anti-rotation feature and maximizes electrical conductivity

Standard Barrel:

Code: LCD Series Flex: LCDX Series Metric: LCMD Series Aluminum: LAB Series

Long Barrel:

Code: LCC Series Flex: LCCX Series Metric: LCMC Series



### **Split Bolts:**

Wide range-taking capability minimizes inventory requirements

Copper: SBC Series

Tin Plated: SBCT Series





**BlackFin Hydraulic Installation Tools:** 



Tested by CSA to Meet OSHA safety requirements.

### CT-3001/CCP

Crimps copper lugs up to 600 kcmil and aluminum lugs up to 350 kcmil, cuts cable up to 1" dia. and rod and punches holes in sheet metal. Tool crimp history and maintainence log recorded using CT-USB device and FINS software.



CT-3980 6.7 Ton Dieless Crimping Tool

Crimps copper lugs up to 600 kcmil and aluminum lugs up to 350 kcmil. Tool crimp history and maintainence log recorded using CT-USB device and FINS software.





### **Multi-tap Connectors:**

Flexible design can be used as a tap, splice, or dead end connector, eliminates need for insulating tape or heat shrink

Dual Sided: PCSB\* Series

Single Sided: PCSB\*S\* Series

In-line splicer reducer: PISR\* Series



### **Aluminum Mechanical Lugs:**

Dual rated for use with aluminum or copper wire, range taking, reusable, install with common tools

Single barrel lugs: LAMA\*, LAMB\* Series

Two barrel lugs: LAM2\* Series

Three barrel lugs: LAM3\* Series

Four barrel lugs: LAM4\* Series

Splicer - Reducers: SR\* Series

### **Copper Mechanical Lugs:**

Install with common tools, range taking and re-usable

### **Heavy Duty Cast Copper Lugs and Splices**

1-Hole Lugs:

Barrel Post: ML\*-\*Y Series

Straight Tongue

Internal Pressure Plate: HL\* Series

2-Hole Lugs:

Straight Tongue: HL-2\* Series Two Barrel: H2L\*-2N\* Series

# **Economical Stamped and Formed Copper Lugs**

1-Hole Lugs:

Straight Fixed Tongue: CXS\* Series Straight Floating Tongue: CS\* Series Offset Floating Tongue: CB\* Series

2-Hole Lugs:

Straight Floating Tongue: CD\*Series Offset Floating Tongue: CO\* Series





CT-2980/ST 6.2 Ton Dieless Crimping Tool

Crimps copper lugs up to 750 kcmil with wire range taking capability and aluminum lugs up to 500 kcmil. Download tool crimp history and maintainence log using CT-USB device and FINS software.



\*Signifies different lengths and package size options. Entering \* in the part number on www.panduit.com will give you different size options.

# **Grounding Connectors**

### StructuredGround™ Direct Burial Compression Grounding System:

Provides highest performance and most reliable compression connection in the industry. Offers the speed and safety
of a compression connection while meeting IEEE Std. 837; UL 467 Listed for grounding and bonding; suitable for
direct burial; c UL us Listed for use in the U.S. and Canada

### **Mechanical Grounding Connectors:**

- Designed for easy installation – no special tools requires; UL 467 Listed for grounding and bonding; direct burial rated where applicable







# V® — — LISTED CENTRIED I

### **E Style Grounding Connectors:**

For connecting: conductor to conductor, conductor to rebar, and conductor to ground rod applications. Meets IEEE837-2014 requirements (except GCE500-500). UL Listed for direct burial grounding applications in the U.S. and Canada.



GCE\* Series

### **Universal Beam Grounding Clamp:**

Bonds structural steel to grounding conductor system: provides a mounting pad suitable for a two-hole compression lug





### **C Style Grounding Connectors:**

For connecting: conductor to conductor and conductor to ground rod applications UL Listed for Direct Burial Grounding and voltage applications up to 35 KV in the U.S. and Canada



### **Grounding Cross Connectors:**

For connecting: conductor to conductor, conductor to rebar, and conductor ground rod applications



GCC\* Series

### **Aluminum Ground Clamp:**

Dual-rated for grounding aluminum or copper code conductors to copper water pipe, galvanized pipe, or steel conduit

GC\* Series



**Hydraulic Installation Tools:** Tested by CSA to Meet OSHA safety requirements.

CT-2931/ST 12 Ton Battery Powered Crimping Tool

Crimps GCE/GCC connectors, copper lugs up to 750 kcmil and aluminum lugs up to 600 kcmil. Download tool crimp history and maintainence log using CT-USB device and FINS software.





### **Bronze Service Post Mechanical Grounding Connectors:**

For grounding copper code conductors to steel structures, busbars, or transformers, direct burial rated





Male Stud:

One Conductor: SP1\* Series Two Conductor: SP2\* Series

**Female Thread:** 

One Conductor: SPF1\* Series Two Conductor: SPF2\* Series

### **Bronze Ground Rod Clamp:**

For grounding copper conductor parallel to ground rods, direct burial rated

Standard Duty: GRC\* Series **Heavy Duty: GRCH\* Series** 



### **Lay-in Lugs:**

For quick installation of a continuous grounding conductor

Tin Plated Aluminum: LIAS\* and LIAC\* Series

**Direct Burial Rated: LICC4\* Series** 

(copper body)



### **Bronze Grounding Clamp, U-Bolt style:**

For grounding copper code conductors parallel to a rod, tube, or pipe, direct burial rated

One Conductor: GPL\* Series

Two Conductor: GU\* Series

Three Conductor: GPC3250-38-X

**Two Conductor** (perpendicular to rod, tube or pipe):

**GPC2\* Series** 

### **Bronze Ground Clamp for Flat Surfaces:**

For arounding copper code conductor to flat surfaces, direct burial rated

### **GM\* Series**

- incorporates spacer plate to separate conductor from mounting surface

**GMS\* Series** 

**GBC\* Series** 

### **GTC and GTCDB Cable Tray Bonding Clamps**

- Used for grounding cable tray for above grade or direct burial applications







Entering \* in the part number on www.panduit.com will give you different size options.

<sup>\*</sup>Signifies different lengths and package size options.

### Stainless Steel

When strength, vibration, radiation, weathering, corrosion and temperature extremes are a factor, the Pan-Steel® System provides strong, reliable solutions for use in indoor, outdoor, and direct burial applications.

- Improved productivity and worker safety for bundling, fastening, and identification in harsh environments
- Meets and exceeds the most stringent industry standards

























Delivers strength, long life and resistance to chemicals, vibration, radiation, and weathering

316 Stainless Steel: MLT\*\*\*-\*\*316 Series

304 Stainless Steel: MLT\*\*\*-\*\*

Aluminum: MLT\*\*-LPAL



### **Coated Stainless Steel Cable Ties:**

Superior corrosion resistance providing maximum performance, longer service life and improved reliability

Nylon 11 Selectively Coated: MLTC\*\*-\*\*316 and Polyester Coated Stainless Steel: MLTFC\*\*-\*\*316

- Variety of sizes and colors available in AISI 316 stainless steel



### **Stainless Steel Strapping:**

Ultimate solution for mechanical fastening applications. The buckle design and installation tools offer a quick and safe installation

MS\* Series (uncoated)

- Variety of sizes available in both AISI 304 and 316 stainless steel

MSC\* Series (coated)

- AISI 316 stainless steel for the most corrosive environments
- UV resistant, low smoke, halogen-free coating material

MSB\* Series

- Individual low profile buckles





### Wave-Ty™:

Use in the installation of Mineral Insulated Electric Heat Trace (MIEHT)

HTMLT\* Series MLT\*W\*-\*\*

Variety of Sizes available in AISI 304 or AISI 316 stainless steel



### **Installation Tools:**

### **GS4MT-E**

Ergonomic manual tool for standard. light-heavy, and heavy cross-sections



### **PPTMT**

Pneumatic Cable Tie and Custom 4 Length Banding Tool. Use with various sizes and styles of Panduit stainless steel products.



### RT2HT

Used with extra heavy and super-heavy cross sections



### **Cable Cleats and Accessories**

### **Short Circuit Protection**

- Available in a variety of sizes and configurations
- Our extensive line of cable cleat solutions ensure cables remain contained in the event of a short circuit fault.
- Engineered for ease of installation in a range of applications and harsh environments.
- Tested to globally recognized IEC 61914:2015 standards to ensure performance and safety

























### **Locking Strap Cleats – MLT\*D\* Series:**

- Heavy, Extra-Heavy, and Super-Heavy cross-sections
- Compatible with Quad, Trefoil, and Multicore cables
- Made from 304 or 316L Stainless Steel



### **Buckle Strap Cleats – MS\*75\* Series:**

- Compatible with Quad, Trefoil, and Multicore cables
- Made from 316L Stainless Steel



### Stainless Steel Trefoil Cleats - CCSSTR\* Series:

- Suitable for Trefoil cable arrangements
- Made from 316L Stainless Steel



### Aluminum Cleats – CCAL\* Series:

- Available as 1-Hole, 2-Hole, and Trefoil configurations
- Suitable for Single Conductor or Trefoil cable arrangements
- Made from Casted Aluminum



### Polymer Cleats - CCPL\* Series:

- Available as 1-Hole, 2-Hole, and Trefoil configurations
- Suitable for Single Conductor or Trefoil cable arrangements
- Made from Nylon



### **Cushion Sleeving –** PCSLSH\*, PCSSH\*, PCSS\*:

- Suitable for MLT and MS75 Series Strapping Cleats
- Made from Neoprene or Low Smoke, Halogen Free TPE



### **Metal Uniclip Brackets – UC\* Series:**

- Compatible with MLT and MS75 Series Strapping Cleats
- Available in multiple configurations to accommodate various cable tray designs



### **Metal Cable Cleat Brackets – CBH\* Series:**

- Compatible with CCALTR and **CCSSTR Series Cleats**
- Available in multiple configurations to accommodates various rung heights



- \*Signifies different lengths and package size options.
- Entering \* in the part number on www.panduit.com will give you different size options.

### **Installation Tools:**

### **BT2HTI**

Used for Buckle Strap Cleats and MS strapping with 0.38" (9.5mm), 0.50" (12.7mm), and 0.63" (15.9mm) widths.



### PBTMT and PBTMT/E

Used with heavy, extra-heavy and super heavy cross sections



### Used with MS75 Strapping Only



### **Cable Ties**

### **Built for Durability:**

- A wide range of sizes, styles and materials for fastening, bundling, clamping and identifying in a variety of applications
- Panduit cable ties are designed and manufactured to meet or exceed industry standards to deliver maximum reliability
- Panduit cable ties are engineered from specially selected materials for optimum reliability in the harshest environments including exposure to: acids, bases, chemicals, radiation, and all-weather conditions with operating temperatures up to 500°F (260°C)

### **Suitability for Securement and Support:**

- Select ties meet the 2017 NEC Code for support and secureness of various cable types identified in the Code
- Select Standard cross-section ties (PLT, BT) and Light-Heavy ties (BT)
- Ties meeting this requirement are designated as UL 62275 Type 2S, 21S
  - Select Standard cross-section ties (PLT, BT) and Light-Heavy ties (BT)

































### **High-temperature PEEK:**

Provide excellent performance at continuous operating temperatures of up to 500°F (260°C), best in class strength, in addition to chemical and radiation resistance





### **Weather Resistant Acetal:**

Provides excellent ultra-violet resistance, strength and durability for long service life. Temperatures of up to 185°F (85°C)

DT\*\*-\*0 Series



### Polypropylene:

Provide superior chemical resistance to acids, bases, and salts making them ideal for chemical plants. Temperatures of up to 239°F (115°C)

PLT\*\*-\*109 Series: Green, Indoor use PLT\*\*-\*100 Series: Black, Weather Resistant



### **TEFZEL:**

Excellent flammability rating of UL 94V-0. Distinct aqua blue color. Ideal for applications requiring resistance to gamma radiation and chemical attack. Temperatures of up to 338°F (170°C).

PLT\*\*-\*76 Series

Tefzel is a registered trademark of The Chemours Company



### **Installation Tools:**

GTS-E

Installs subminiature, miniature, intermediate and standard cross section cable ties



### GTH-E

Installs standard, heavy-standard, light-heavy, and heavy cross section cable ties





### **Weather Resistant Nylon 12:**

A material with 12-15 years of weathering life expectancy and resistance to zinc chlorides and dilute acids. Ideal for wire management on galvanized surfaces / frames. Nylon 12 ties are marked with a "+" sign at the neck to distinguish these ties from black weather resistant nylon 6.6 ties. Temperatures of up to 194°F (90°C)



PLT\*\*-\*120 Series

### HALAR:

Identifiable maroon colored parts UL listed for use in plenum or air handling spaces per NEC, Section 300-22 (C) and (D); UL62275 AH2 rating. Suitable in applications where flame resistance and smoke generation is a concern. Temperatures of up to 257°F (125°C)



PLT\*\*-\*702Y Series

HALAR is a registered trademark of Solvay Solexis

### Flame Retardant Nylon 6.6:

Ties are UL94V-0 rated for applications requiring resistance to flame propagation. Temperatures of up to 212°F (100°C)



PLT\*\*-\*69 Series

### \*Signifies different lengths and package size options. Entering \* in the part number on www.panduit.com will give you different size options.

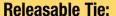
### **Metal Barb Tie**

Stainless steel lock barb provides consistent performance, reliability, and infinite adjustability through entire bundle range applications

BT\*\*-\* Series: Natural, Indoor use, up to 185°F (85°)

BT\*\*-\*0 Series: Black, Weather Resistant, up to 185°F (85°)

BT\*\*-\*30 Series: Black, Heat Stabilized up to 239°F (115°C)



Release tab permits easy release and re-use where changes are anticipated

PRT\*\* Series



### **Metal Detectable:**

Unique metal impregnated material allows identification by metal detectors to meet food and beverage industry FDA requirements by helping to reduce product contamination



PLT\*\*-\*86 Series, up to 185°F (85°C) Also available in polypropylene: PLT\*\*-\*186 Series, up to 239°F (115°C)

### Abrasion Protection and Cable Accessories

### **Protect Your Connections:**

Insulate, harness and identify electrical/electronic components and cable with Panduit abrasion protection and cable accessories.

- A wide variety of sizes, materials and designs are available to meet a broad range of indoor and outdoor applications
- Panduit abrasion protection products are designed and manufactured to meet applicable quality standards including UL and CSA
- Comprehensive offering of wire management securing devices speed installation and improve reliability





### **Slotted Grommet Edging:**

Slotted nylon performs up to 149°F (65°C) operation temperature and slotted polyethylene performs up to 122°F (50°C)

Nylon: GEE\*\*N-\* Series

Polyethylene: GEE\*\*F-\* Series

Adhesive Lined Polyethylene: GE\*\*F-A-\* Series



### **Spiral Wrap:**

Provides weather resistant abrasion protection to hoses/cables while harnessing multiple hoses/cables into a single manageable bundle

Polyethylene: T\*\*F-\*0 Series

Nylon 6.6: T\*\*N-\*0 Series

Polypropylene: T\*\*P-\*0 Series



### **Thin Wall TFE Heat Shrink Tubing:**

Dry shrink applications up to 482°F (250°C) operating temperatures

**HSTTT\* Series** 



### **Thin Wall KYNAR Heat Shrink Tubing:**

Dry shrink applications up to 347°F (175°C)
HSTTK\* Series



### **Heat Shrink End Caps:**

Adhesive lined inner wall seals and provides excellent protection against moisture

**HSEC\*\*** Series



### **Thick Wall Heat Shrink:**

UL listed for direct burial and recognized for sunlight resistance and VW-1 flammability with an operating temp of 230°F (110°C)

**HST\* Series Black** 



### Pan-Wrap<sup>™</sup> Split Harness Wrap:

Patented slot pattern provides improved flexibility and cable abrasion protection with reduced installation time

PW\*F\*-\* Series



### **Pan-Wrap<sup>™</sup> Braided Sleeving:**

Highly flexible, does not trap heat or humidity and the slit allows easy install and access for further upgrades or repairs

SE\*PS-\*RO Series





### **Corrugated Loom Tubing:**

Provides protection for cables. Slit for easier install onto a bundle of wires or a pre-assembled harness assembly





### **J-Pro** <sup>™</sup> Cable Support System:

Provide standards-compliant method for routing communication cables throughout the plant infrastructure

JP\*\* Series



### **Screw Applied Cable Tie Mounts:**

Available in a broad selection of materials, sizes, and styles

TM\*S\*-\*\* Series



### **PEEK Cable Tie Mounts:**

Operating temperature range up to 500°F (260°C); maintains good tensile strength in high temperature environments





### **Adhesive Cable Tie Mounts:**

Provide maximum adhesion even in high-temperature and outdoor environments

**ABM\* Series** 



### **TEFZEL Cable Tie Mounts:**

Ideal for applications requiring resistance to gamma radiation and chemical attack

TM\*\*-\*76 Series



### **Metal Detectable Cable Tie Mounts:**

Unique metal impregnated material allows identification by metal detectors to meet food, beverage, and pharmaceutical safety standards by helping to reduce product contamination



Nylon 6.6 TM\*\*-\*86 Series Polypropylene TM\*\*-186 Series

\*Signifies different lengths and package size options. Entering \* in the part number on www.panduit.com will give you different size options.

## **Identification and Safety**

### Safety is a Top Priority

In today's environment, workplace safety is a key concern for all production operations. Managing these concerns and the associated energy sources can be challenging. Panduit brings to market a broad portfolio of solutions that help to achieve workplace safety on industrial construction and MRO sites

- Expertise in Workplace Safety Compliance: Meeting requirements of stringent regulatory bodies (OSHA, ANSI, and NFPA)
- Complete Safety Solution: To control and identify energy in a workplace with lockout/tagout devices, facility signage, and labeling systems
- Training and Tools: Available to help you understand and comply with workplace safety regulations

### **Arc Flash Labels:**

Pre-printed and blank label voltage adhesive markers

PVS0305W\* Series



### **Voltage and Pipe Markers:**

Identify voltage, pipe content, and flow direction for safety and compliance

Voltage Adhesive Markers: PCV\* Series

Pipe Markers: T\*X\*V\* Series



Contact your Panduit Sales Rep for further details.

### **Pre-Printed Marker Books:**

Pre-assembled convenient, pocket-sized books

PCMB\* Series



### **Circuit Breaker Lockout Device:**

Quick, effective lockout of energy sources controlled by circuit breakers

PSL-PCB or PSL-PCBNT



### **Metal Embossing Hand Tool:**

Lightweight, compact, portable embossing tool

MEHT187



### **Safety Tags:**

Pre-printed Plastic Tags
PVT\* Series



### **Nylon Marker Plates:**

Clearly identify cable bundles MP175-C



### **Safety Signs:**

High quality signs for use indoors and outdoors to inform of hazards

Vinyl: PVS\* Series

Polyester: PPS\* Series

Polypropylene Rigid: PRS\* Series



### **Thermal Transfer Labels and Ribbons:**

Available in both cassettes for mobile printers and in rolls for desktop printers

Self-laminating: S\*X\*V\* Series Heat shrink: H\*\*X\*\*H\* Series



### PES400:

Delivers maximum usability for medium to high volume applications that are exposed to dirt and paint

**PES400** 





### **Electrician Lockout Kit:**

Contains a variety of lockout/ tagout devices commonly used by an individual electrician

PSL-PK-EAP



### **Lockout Stations:**

Conveniently store padlocks, tags, and lockout devices in one common area

PSL-\*\*SWCA



### **Permanent Identification:**

Ideal in harsh and industrial environments, delivers long-term durability and legibility for optimum identification of pipes, conduit, cables and equipment. Use with MLT Series ties for fast installation at lowest installed cost.



MMP\* Series MT\* Series

### **Electrical Tape:**

Suitable for primary insulation and splicing up to 600V and can be used as protective jacketing. Offering protects against an array of abrasive and corrosive materials, while providing quality adhesion properties, as well as resistance to UV rays and cold weather.



### **Thermal Transfer Desktop Printer:**

Compact, lightweight, and rugged design for use at the job site

TDP43ME **Easy-Mark Plus™ Labeling Software:**EMPLUS-DL and EMPLUS-2G0



### **Multiple Lockout Device:**

Only one device needed to perform a variety of lockout functions

PSL-MLD



### **Lockout Padlocks:**

Each lock keyed differently and some styles are supplied with 2 keys

PSL-\*



### **OSHA Compliance Training Program:**

Complete lockout/tagout program to help your organization enhance safety in the workplace



Contact your Panduit Sales Rep for further details.

# VeriSafe - Absence of Voltage Tester (AVT):

Automate and simplifies the process of absence of voltage verification testing. Retrofit kit available as well.



VS-AVT-\* Series

\*Signifies different lengths and package size options. Entering \* in the part number on www.panduit.com will give you different size options.

### **Mobile Thermal Transfer Printer:**

QWERTY keypad designed for easier typing

MP300



### **Terminals and Ferrules**

### Meeting Application Challenges at the Lowest Installed Costs:

- Panduit terminals, disconnects and ferrules are designed and manufactured for superior electrical performance.

A complete line of high quality insulated and non-insulated terminals, disconnects, splices, wire joints and ferrules offered in loose piece, reel fed, and various other configurations with worldwide availability











### **Ring Terminals:**

Ring tongue design assures a secure connection in high vibration applications

Nylon: PN\*-\*R Series

Heavy Duty: PN12-\*\*HDR-\* Series

Vinyl: PV\*-\*R Series

Heavy Duty: PV12-\*HDR-\* Series

Heat Shrink: PH\*\*-\*\*R\* Series

Kynar Insulated: PK\*-\*R Series

Non-Insulated: P\*\*-\*R Series Heavy Duty: P12-\*HDR-L Series

High Temp: P\*\*-\*R Series





### **Fork Terminals:**

Fork design provides for fast and easy installation, without the need to remove fastener

Nylon: PN\*-\*F Series

Flanged Forks: PN\*-\*FF Series Locking Forks: PN\*-\*LF Series

Vinvl: PV\*-\*F Series

Flanged Forks: PV\*-\*FF Series Locking Forks: PV\*-\*LF Series

Non-Insulated: P\*-\*F Series Flanged Forks: P\*-\*FF Series Locking Forks: P\*-\*LF Series





### **Disconnects:**

Designed and precision made to function as a reliable method of making quick, repeatable interconnections

Nylon: DN\* Series

Vinyl: DV\* Series

Heat Shrink: DNH\* Series
Non-Insulated: D\*\* Series





### **Pin Terminals:**

Solid pin designed to prevent damage to the wire from over tightening, resulting in a reliable electrical connection

Vinyl: PV\*-P\* Series

Non-Insulated: P\*-P\* Series



### **Installation Tools:**

CT-1525, CT-1550, CT-1570

The CT-1500 series of controlcycle tools crimp most Panduit insulated and non-insulated terminals, splices and disconnects.



### CT-2300/ST

This termination tool has a 65% faster crimping cycle vs. a manual crimp tool. This compact, light-weight design reduces hand force from 53 pounds to 6 pounds – maximizing efficiency.





### **Ferrules:**

Designed with a seamless barrel to contain loose wire strands for superior termination^

Bare Single-wire Ferrules:

F\*\* Series

Polypropylene Covered Single-wire Ferrules 26 AWG-300 kcmil:

FSD\* Series

Polypropylene Covered, Twin-wire Ferrules 22 AWG-6 AWG:

FTD\* Series

### **Industrial Maintenance Kits:**

Steel kits have individual compartments for storage of terminals, disconnects and splices

Nylon: K1-PNKIT Vinyl: K2-PVKITY

Ferrule 100 Piece Kit: KP-FSD3

Terminal Kit: KP-1075Y



### Splices:

Designed and manufactured for fast assemble, and long reliable performance

Nylon:

Butt Splice: BSN\* Series Parallel Splice: PSN\* Series Wire Joint: JN\* Series

Vinyl:

Butt Splice: BSV\* Series

**Heat Shrink:** 

Butt Splice: BSH\* Series

Non-Insulated:

Butt Splice: BS\* Series Parallel Splice: PS\* Series Wire Joint: J\*\*\* Series



\*Signifies different lengths and package size options. Entering \* in the part number on www.panduit.com will give you different size options.

### **Installation Tools:**

Contour Crimp<sup>™</sup> Ferrule Crimping Tools

The Contour Crimp ferrule tools crimp most single and twin- wire, covered and bare ferrules



BlackFin<sup>™</sup> Battery-Powered Compression Tools

Our BlackFin crimping tools are lightweight and ergonomically designed. They meet OSHA mandated electrical and mechanical product safety requirements as well as other safety standards.



^ UL486F is applicable sizes.

### **Industrial Network Infrastructures**

### **Future Proof Your Network:**

- As network components are deployed further into the industrial space, the need for diagnostic test points and future expansion is essential
- Panduit Market Automation Infrastructure solutions adhere to network architectures such as CPwE, providing a reliable end-to-end network physical layer infrastructure
- Standards based solutions are available in many performance levels and configurations offering flexibility and fast installation for a variety of demanding industrial applications

# future

### **Harsh Environment Copper Solutions:**

The Panduit® TX6A™ Shielded Copper Cabling Solutions for Harsh Environment Applications provide a superior infrastructure with a Channel Headroom Guarantee exceeding the TIA/ISO Standards.

### TX6A™ Category 6A Shielded Solution

Horizontal Cable: PSM7004BU-KEM

Jack: CJS6X88TGY

### TX6A™ Category 6A Shielded MUD Resistant Solution

Non-Armored: PSMD7004BL-LED Armored: PSMDA7004BL-LED

Jack: CJSM6X88TG



### **Fiber Connectivity Solutions:**

A complete offering of fiber optic cabling and connectivity for harsh environments

Horizontal Cable (OM3 and OM4)

Outside Plant (OSP) Armored: FOWN\* Series Indoor Distribution Cable: FODP\* Series

Armored: FOPP\* Series

Dielectric Double Jacketed Fiber (DDJ): FSJD9\*\* Series

Connector

LC (OM3 and OM4): FLCDMCXAQY

**Patch Cords** 

LC to LC (OM3): FX2ERLNLSN\* Series LC to LC (OM4): FZ2ELLNLSN\* Series



### **Industrial Copper Solutions:**

Panduit has a comprehensive line of copper physical layer solutions for the industrial Ethernet.

### **Category 6 Copper Cables**

Shielded: IFC6C04BBL-CEG Unshielded: IUC6C04ABL-CEG

### Category 6A RJ45 Plugs

(UTP and STP copper cable compatible): Shielded Field Term Plug: FPS6X88MTG Unshielded Field Term Plug: FP6X88MTG

### **Mini-Com DIN Rail Patching Devices**

(UTP and STP copper cable compatible):

DIN-Rail Adapter: CADIN1IG DIN-Rail Panel: CDPP8RG

### **Category 6A Connectors**

Mini-Com® Module Shielded: CJS6X88\* Series
Mini-Com® Module Unshielded: CC6X88\* Series
Mini-Com® with bulkhead Shielded: IAEBH6XS
Mini-Com® with bulkhead Unshielded: IAEBH6X

### **Category 6A Bulkhead Patch Cords**

**Shielded:** ISTP6X\* Series **Unshielded:** ISTP6X\* Series

Category 6A M12 X-Code Connectors Field Terminable Connector: ISPS6A88MFA Panel Mount Adapter: ICAM12DXRJS

Category 5e M12 D-Code Connectors Field Terminable Connector: ISPS5E44MFA

IndustrialNet™ Overmolded Cordsets Category 5e, UTP Cable: ICD\* Series

Panel Mount Adapter: ICAM12DRJS

Category 6A, STP Cable: ICX\* Series

















### **Control Panel Solutions:**

### Space Optimization PanelMax™ DIN Rail Wiring Duct:

Up to 30% space savings vs. conventional duct/rail layouts
DRD\*LG\* Series



### PanelMax™ Corner Duct:

Up to 20% space savings in layouts with side and back panels CWD\*LG\* Series



# Noise Mitigation PanelMax™ Shielded Wiring Duct and Noise Shield:

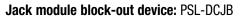
Deliver approximately 20dB of noise reduction across common industrial noise frequencies at 30mm wire separation with an approximate 1-meter coupling length



Shielded Wiring Duct: G\*LG6EMI Noise Shield: SD\*EMI Series

# Network Security Copper and Fiber Lock-In/Block-out:

The innovative designs of the block-out and lock-in devices ensure the safety and security of the network infrastructure.



RJ45 Plug lock-in device: PSL-DCPL









### **Universal Network Zone System:**

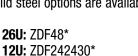
Designed for deploying a reliable and secure Ethernet network on the plant floor. Includes cable management, copper and fiber connectivity, grounding, high voltage barrier, redundant power supplies, UPS, PoE power speeds installation time by up to 75%.



**24" Height:** Z22U\* Series **36" Height:** Z23U\* Series

### **Pre-Configured Industrial Distribution Frame:**

Engineered to deploy and protect rack mountEthernet switches in industrial applications. 316 stainless steel and mild steel options are available.





### **Pre-Configured Micro Data Center:**

Provides the link between the Corporate and Industrial Networks in order to maintain network uptime and security, segregate networks and speed changes and troubleshooting.



**42RU**, includes shock pallet and ramp: MDC79D

**42RU:** MDC79

24RU, includes shock pallet and ramp: MDC48D

# **Industrial Network Uninterruptible Power Supply (UPS):**

No-battery, maintenanc-free UPS delivers uninterrupted power and decreased risk of downtime for critical industrial applications including managed network switches, micro PLCs, and HMIs.



**UPS:** UPS00100DC

**Load Sense Module:** UPS003LSM



### **NEMA Wireless Enclosure:**

Wireless enclosures protect wireless networks from tampering and theft by enclosing WAPs; specifically designed for use in outdoor and industrial environments.



**PoE applications:** PZNWE12 **AC power applications:** PZNWE14

<sup>\*</sup>Signifies different lengths , materials or package size options.

Entering \* in the part number on www.panduit.com will give you different options.

<sup>^</sup>EtherNet/IP is a trademark of ODVA.

# **Global Capabilities**

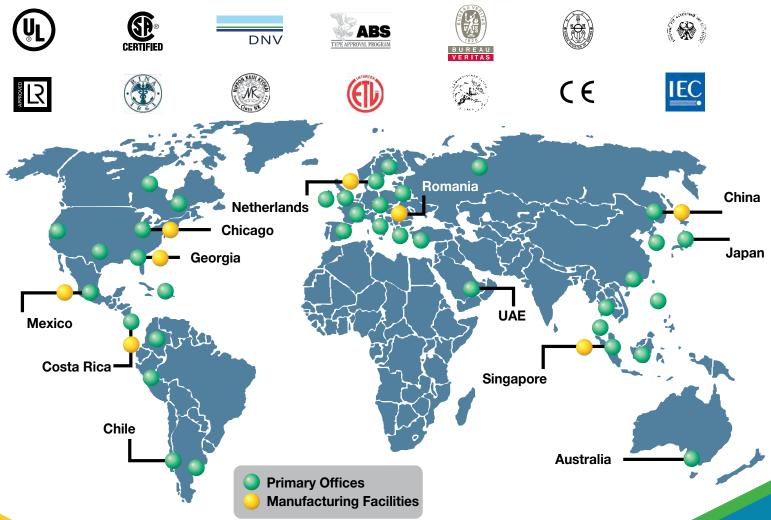
### **Global Expertise and Support**

Global distribution, manufacturing, sales and technical support teams make Panduit solutions readily accessible, allowing the right products to be delivered when and where they are needed.

### **Worldwide Certifications**

Panduit solutions hold a variety of the most common heavy industry certifications and approvals worldwide.





PANDUIT®

Panduit Corp. World Headquarters Tinley Park, IL 60487

cs@panduit.com

US and Canada: 800.777.3300 Europe, Middle East, and Africa: 44.20.8601.7200

Latin America: 52.33.3777.6000

Asia Pacific: 65.6305.7575

www.panduit.com