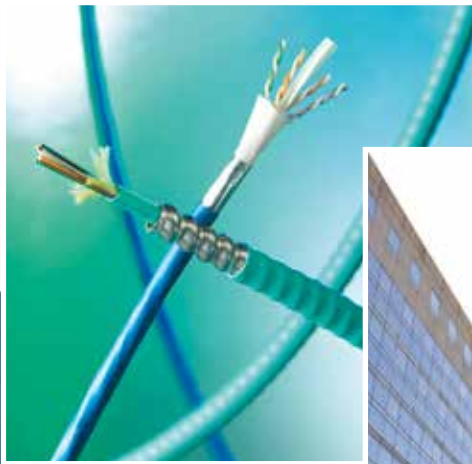


HIGH-PERFORMANCE COPPER AND FIBER SYSTEM SOLUTIONS

PanGen[®]

STRUCTURED CABLING SOLUTIONS

DELIVERING CUSTOMER-DRIVEN
Performance, Quality & Service



PANDUIT[®]

 **General Cable**



PanGen[®]

STRUCTURED CABLING SOLUTIONS

Partners since 2004, Panduit and General Cable have offered a comprehensive line of physical infrastructure solutions. Achieve guaranteed network performance and system reliability for your most demanding requirements with solutions from our world-class partnership.

A Shared Vision

For over 10 years, Panduit and General Cable's world-class partnership has provided high-performance infrastructure solutions, guaranteed network performance and system reliability. By combining the technological expertise and innovation of Panduit connectivity with General Cable cabling products, PanGen Structured Cabling Solutions provide a wide range of world-class copper and fiber solutions to support all of your needs.



Importance of Structured Cabling

A properly designed and implemented cabling infrastructure is a fundamental strategic asset of every business and institution. Carefully planning a structured cabling solution facilitates the delivery of new services, lower network maintenance costs and increased productivity. New high-bandwidth applications enable organizations to better fulfill their need for productivity and innovation in a rapidly changing world.

Superior Installation & Technical Support

Quality installation of PanGen® solutions is provided through an extensive network of specially trained and certified installers. Meeting stringent qualification requirements, our installers receive continuous training on products, standards and installation practices. PanGen solutions come with prompt, nationwide technical support for customers from the design stage to post-system installation support.

Complete Solution Warranty

- 100% warranty coverage to repair or replace defective components
- Compliance with all applicable ANSI, TIA and ISO standards
- Backed by an installed channel performance guarantee
- One point of contact for all inquiries (USAPartners@panduit.com)

Sustainability & LEED®

PanGen solutions now help your projects earn LEED status. Panduit and General Cable offer Environmental Product Declarations (EPDs) and Health Product Declarations (HPDs) for Category 6A, 6 and 5e cabling products. Using connectors by Panduit and cabling by General Cable helps satisfy two of the five manufacturers needed per LEED point.

PanGen®

STRUCTURED CABLING SOLUTIONS

Category 6A, 6, 5e
High-Performance Copper
and Fiber Systems

Exceeds All Industry
Performance Standards

Complete 25-Year Warranty

NetGen®

STRUCTURED CABLING SOLUTIONS

Category 6A, 6 and 5e
Copper Systems

Cost Effective and
Market Focused

Complete 25-Year Warranty

PANDUIT®

 **General Cable**

PanGen® Solutions

PanGen® Category 6A System Solutions – Premium & Standard	5-9
Panduit® Connectivity	6-7
General Cable’s Gen <i>SPEED</i> ® Brand Cabling	8-9
PanGen Category 6A System Solutions – Shielded	10-15
Panduit Connectivity	11-13
General Cable’s Gen <i>SPEED</i> Brand Cabling	14-15
PanGen Category 6 System Solutions – Premium & Enhanced	16-21
Panduit Connectivity	17-19
General Cable’s Gen <i>SPEED</i> Brand Cabling	20-21
PanGen Category 5e System Solutions – Premium	22-25
Panduit Connectivity	23-24
General Cable’s Gen <i>SPEED</i> Brand Cabling	25
PanGen Fiber System Solutions	26-33
Panduit Connectivity	27
Optical Fiber Code Cross-Reference	28
Fiber Optic Part Number System	29
General Cable’s NextGen® Brand Cabling	30-33
Panduit Accessories for PanGen Systems	34-45
Modular Patch Panels	34
Cable Management	35
Mini-Com® Faceplates	36-37
Mini-Com Faceplate Frames & Module Inserts	38
Mini-Com Module Frames	39
Mini-Com Furniture Faceplates	40
Mini-Com Phone Plate with Module	41
Mini-Com Surface Mount Boxes	41
Mini-Com Audio/Video Modules	42-43
Identification & Labeling Systems	44
Termination Tools	45

NetGen® Solutions

NetGen® Category 6A System Solutions	47-49
Panduit® NetKey® Connectivity	48
General Cable's Gen <i>SPEED</i> ® Brand Cabling	49
NetGen Category 6 System Solutions	50-53
Panduit NetKey Connectivity	51
General Cable's Gen <i>SPEED</i> Brand Cabling	52-53
NetGen Category 5e System Solutions	54-57
Panduit NetKey Connectivity	55
General Cable's Gen <i>SPEED</i> Brand Cabling	56-57
Panduit Accessories for NetGen Systems	58-65
NetKey Keystone Modular Patch Panels	58
NetKey Keystone Flush Mount Patch Panels	58
Wall Mount Bracket	58
Filler Panels	58
Cable Management	59
NetKey Faceplates	60
NetKey Faceplate Frames & Modular Inserts	61
NetKey Module Frames & Furniture Faceplate	62
NetKey Phone Plates	62
NetKey Surface Mount Boxes	62
NetKey Audio/Video Modules & Inserts	63
Identification & Labeling Systems	64
Termination Tools	65
General Cable Gen<i>SPEED</i> Brand Quick Reference Guides	66-68
Catalog Number Index	69-71

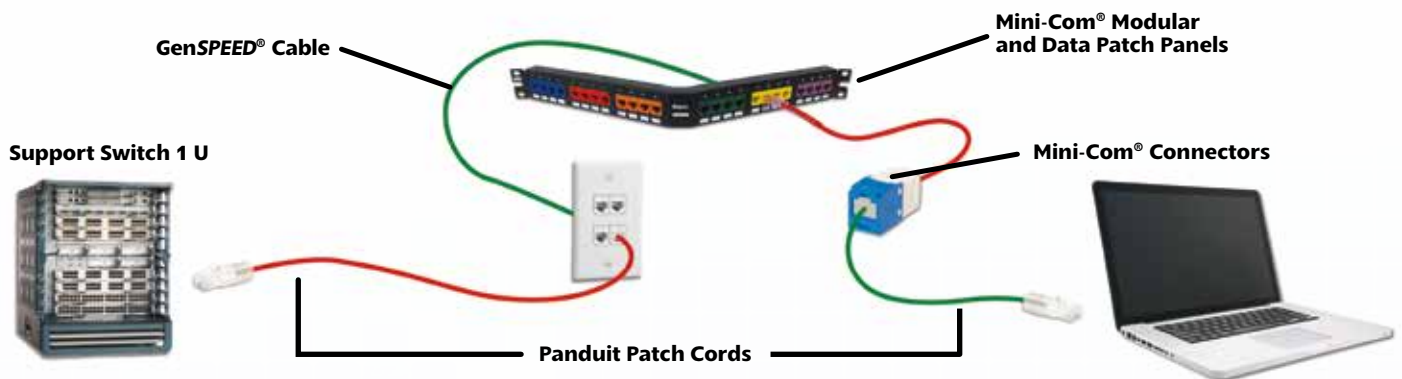


PanGen[®] Structured Cabling Solutions are robust, high-performance copper and fiber systems for the most demanding applications. The full line of PanGen Category 6A, 6 and 5e copper and fiber optic products will meet the most stringent demands and offer guaranteed performance. All products are designed to provide an optimized cabling infrastructure that exceeds all electrical parameters, delivering versatility for the latest technologies. Additionally, the PanGen solution comes with the assurance and backing of two world-class manufacturers, Panduit and General Cable, guaranteed!

PanGen high-performance cabling and connectivity solutions are well suited for the enterprise, financial, education, healthcare and government markets – anywhere network performance is critical.

	PanGen [®] System	Description	Connector	Patch Cord	Patch Panel	Cable
Cat 6A	PanGen [®] 6A Premium	Premium-level Category 6A system	Mini-Com [®] TX6A™ 10Gig UTP Jack Modules	TX6A-SD™ UTP Patch Cords	Mini-Com Angled and Flat Flush Mount Modular Patch Panels	GenSPEED [®] 10 MTP
	PanGen 6A	Category 6A system	Mini-Com TX6A 10Gig UTP Jack Modules	TX6A-SD UTP Patch Cords	Mini-Com Angled and Flat Flush Mount Modular Patch Panels	GenSPEED 10,000
	PanGen 6A Shielded	Category 6A shielded system	Mini-Com TX6A 10Gig Shielded Jack Modules	TX6A 10Gig Shielded Patch Cords	Mini-Com Angled and Flat All-Metal Shielded Modular Patch Panels	GenSPEED 10,000 Shielded
Cat 6	PanGen 6 Premium	Premium-level Category 6 system	Mini-Com TX6™ PLUS UTP Jack Modules	TX6 PLUS UTP Patch Cords	DP6™ PLUS Punchdown Patch Panels and Mini-Com Angled and Flat Flush Mount Modular Patch Panels	GenSPEED 6500
	PanGen 6 Enhanced	Mid-level Category 6 system	Mini-Com TX6 PLUS UTP Jack Modules	TX6 PLUS UTP Patch Cords	DP6 PLUS Punchdown Patch Panels and Mini-Com Angled and Flat Flush Mount Modular Patch Panels	GenSPEED 6000
Cat 5e	PanGen 5e Premium	Premium-level Category 5e system	Mini-Com TX5e™ UTP Jack Modules	TX5e UTP Patch Cords	DP5e™ Punchdown Patch Panels and Mini-Com Angled and Flat Flush Mount Modular Patch Panels	GenSPEED 5500
Fiber	PanGen SM	Premium level G.652.D SM with enhanced low loss and bend-fiber technologies Low-water peak fiber	Mini-Com Fiber Optic Adapter Modules Opticom [®] Fiber Adapter Panels Field Polish and Pre-Polished Fiber Optic Connectors	Opti-Core [®] Fiber Optic Patch Cords and Pigtailed	Opticom Rack Mounted Enclosures, Trays and Drawers	NextGen [®] Premise Indoor/Outdoor Outside Plant Blown Fiber
	PanGen OM4	Extended-level 10 Gbps/500 m or 100 Gbps/170 m link length 50 micron fiber	Mini-Com Fiber Optic Adapter Modules Opticom Fiber Adapter Panels Field Polish and Pre-Polished Fiber Optic Connectors	Opti-Core Fiber Optic Patch Cords and Pigtailed	Opticom Rack Mounted Enclosures, Trays and Drawers	NextGen Premise Indoor/Outdoor Outside Plant Blown Fiber
	PanGen OM3	Premium-level 10 Gbps/300 m or 100 Gbps/140 m link length 50 micron fiber	Mini-Com Fiber Optic Adapter Modules Opticom Fiber Adapter Panels Field Polish and Pre-Polished Fiber Optic Connectors	Opti-Core Fiber Optic Patch Cords and Pigtailed	Opticom Rack Mounted Enclosures, Trays and Drawers	NextGen Premise Indoor/Outdoor Outside Plant Blown Fiber

Example of a PanGen System



Different configurations available. Discuss with your PanGen sales representative.

Key Features and Benefits of PanGen Category 6A Solutions:

- Designed to exceed ANSI/TIA-568-C.2 channel requirements
- Installations covered by a 25-year comprehensive warranty program that provides performance to the latest industry standards
- A single point of contact for all PanGen inquiries
- All connectivity components are 100% performance-tested
- Quick installation of PanGen systems is provided through an extensive network of specially trained and certified installers

PanGen Category 6A Solutions Deliver:

- TRU-Mark® footage marking system to help eliminate unused lengths of cable and save installation time
- Jack modules feature the patent-pending Enhanced Giga-TX™ technology for terminations, which optimizes performance by maintaining cable pair geometry and eliminating conductor untwist
- Patch cords feature slender strain relief boots for easy access to high-density environments and a patented tangle-free latch which prevents snags and provides easy release for simple moves, adds and changes
- Patch panels are available in punchdown and modular styles and include flat and angled orientations

PanGen 6A PREMIUM:

- Uses GenSPEED® 10 MTP™ Category 6A cable
- Outstanding performance on all electrical parameters to provide a system that exceeds all applicable standards
- A 10 MTP unshielded-twisted pair (UTP) design provides industry-leading protection from external cable noise sources, also known as alien crosstalk
- Mosaic Crossblock™, a thin metallic tape of segmented sections separated by an insulating layer. Since there is no metal-to-metal contact, there is no path for current to flow longitudinally, and thus, no need for grounding

Category 6A Premium System

Electrical Value	Guaranteed Channel Headroom over ANSI/TIA Category 6A
Insertion Loss	3%
NEXT	3.5 dB
PSNEXT	5 dB
ACR-F	10 dB
PSACR-F	10 dB
Return Loss	3 dB
ACR-N	6 dB
PSACR-N	6.5 dB
PSANEXT	2 dB
PSAACR-F	10 dB

*Electrical values are above the specified standards and consist of worst pair margin per ANSI/TIA-568-C.2 Category 6A.

PanGen 6A STANDARD:

- Uses GenSPEED 10,000 Category 6A cable
- Compliant performance on all electrical parameters to provide a system that meets all applicable TIA standards
- Cable contains an aerated jacket that encompasses the inner core to reduce the capacitance effect of the outer sheath and permits consistent electrical performance at a smaller overall size

Category 6A UTP Copper Cable is a component of the TX6A™ 10 Gig UTP Copper Cabling System when installed according to the above length considerations. Interoperable and backwards compatible, this end-to-end system provides design flexibility to protect network investments well into the future. With certified performance to the ISO 11801 Class E_A and ANSI/TIA-568-C.2 Category 6A standards. Usage of the TX6A 10 Gig UTP Copper Cabling System includes:

- Ethernet 10GBASE-T
- Virtual business management applications
- Next generation PoE 802.3bt standard for power levels up to 100 watts

Mini-Com® TX6A™ 10Gig UTP Jack Modules

- Exceed ANSI/TIA-568-C.2 Category 6A, IEEE 802.3an-2006, and ISO 11801 Class E_A channel standards
- Exceed ANSI/TIA-568-C.2 Category 6A and IEC 60603-7-41 Category 6A component standards
- Meet IEC 60512-99-001 for 2500 cycles of engaging and separating conductors under electrical load
- Utilize patent-pending enhanced Giga-TX™ technology that optimizes performance by maintaining cable pair geometry and eliminating conductor untwist
- Support IEEE 802.3af, 802.3at and IEEE 802.3bt type 3 and type 4 for all PoE applications up to 100 W
- All jack modules are 100% performance-tested and individually serialized for future traceability
- Compatible with all Mini-Com Modular Patch Panels, Faceplates and Surface Mount Boxes
- Universal termination cap is color-coded for T568A and T568B wiring schemes
- Operating temperature: -10°C to 65°C (14°F to 149°F)
- Terminates full range of 22-26 AWG conductors allowed per ANSI/TIA-568-C.2

Part Number	Description
CJ6X88TGBU*	Category 6A, RJ45, 8-position, 8-wire universal module
CJ6X88TGBU-24	24-pack Category 6A, RJ45, 8-position, 8-wire universal module
CJ6X88TGBU-C	100-pack Category 6A, RJ45, 8-position, 8-wire universal module
CJH6X88TGBU*	Category 6A, RJ45, 8-position, 8-wire shuttered universal module with spring-shuttered door
CJR6X88TGBU*	Category 6A, RJ45, 8-position, 8-wire universal module with right angle wire cap
CJRCAPBU	Right angle wire cap for use with any TX6A™ 10Gig jack, blue

* Product is listed in Blue. To designate a different color, replace BU (Blue) with available colors: IW (Off White), EI (Electric Ivory), IG (International Grey), WH (White), BL (Black), BU (Blue), RD (Red), YL (Yellow), GR (Green), OR (Orange), or VL (Violet).

TX6A™-SD and TX6A™-28 UTP Copper Patch Cords





- Exceed requirements of ANSI/TIA-568-C.2 Category 6A, IEEE 802.3an-2006 and ISO 11801 Class E_A channel standards
- Meet IEC 60512-99-001 for 2500 cycles of engaging and separating conductors under electrical load
- Support IEEE 802.3af, 802.3at and IEEE 802.3bt type 3 and type 4 for all PoE applications up to 100 W
- 100% performance-tested
- Available in a variety of colors and lengths for design flexibility
- Category 6A 28 AWG patch cords are less than 50% the size of traditional 24 AWG patch cords
- UTP28X cords support up to 96 meters of channel length (when using 6 meters of patch)

Part Number	Description
UTP6ASD3*	Category 6A (SD), 26 AWG, 10 Gb/s UTP patch cord with TX6A™ 10 Gig modular plugs on each end
UTP28X3*	Category 6A performance, 28 AWG, small diameter, 10 Gb/s UTP patch cord with modular plugs on each end

* Available in lengths 1 to 20 feet (increments of one foot) and 25, 30, 35, 40 feet. Patch cords listed in Off White. To designate other colors, add suffix to end of part number: BL (Black), BU (Blue), GR (Green), OR (Orange), RD (Red), YL (Yellow), or VL (Violet).

DP6A™ 10Gig UTP Patch Panels

- Mount to standard EIA 19" racks
- DP6A™ 10Gig UTP Patch Panels exceed all industry performance standards for Category 6A
- Angled versions for higher density applications allow for easier routing of patch cords to each side of the panel, eliminating the need for horizontal cable management
- Meet IEC 60512-99-001 for 2500 cycles of engaging and separating conductors under electrical load
- Exceed requirement of ANSI/TIA-568-C.2 Category 6A and ISO Class E_A channel standards
- Exceed requirement of ANSI/TIA-568-C.2 Category 6A and IEC 60603-7-41 Category 6A component standards
- Each port is 100% tested to ensure NEXT and RL performance and is individually serialized to support traceability
- Utilize 110 punchdown termination on back panel and include retention cap for each port
- Optional label kits (DPLK24 and DPLK48) contain adhesive label holder and labels for easy port and panel identification
- Color-coded for T568A and T568B wiring schemes

	Part Number	Description
	DP246X88TGY	24-port, 1 RU, Category 6A patch panel with 24 RJ45, 8-position, 8-wire ports
	DP486X88TGY	48-port, 2 RU, Category 6A patch panel with 48 RJ45, 8-position, 8-wire ports
	DPA246X88TGY	24-port angled, 1 RU, Category 6A patch panel with 24 RJ45, 8-position, 8-wire ports
	DPA486X88TGY	48-port angled, 2 RU, Category 6A patch panel with 48 RJ45, 8-position, 8-wire ports

Note: For a full range of modular patch panels, contact Panduit customer service.

Features and Benefits

- 10 MTP™ unshielded-twisted pair (UTP) design provides industry-leading protection from external cable noise sources, also known as alien crosstalk. Guaranteed +8 dB over TIA 568-C.2 Standard for both PSANEXT & PSAACRF
- Mosaic Crossblock™ is a thin metallic tape of segmented sections separated by an insulating layer. Since there is no metal-to-metal contact, there is no path for current to flow longitudinally, and thus, no need for grounding
- Improved cable temperature rating (90°C plenum, 75°C riser) for greater protection against increased operating temperatures and for high-wattage applications
- The Internal Separator optimizes internal pair geometry to yield superior electrical performance and maintain flexibility. This unique cross-web stabilizes each pair to create a smaller, round cable profile
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRC)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Made in U.S.A.

Applications

- IEEE 802.3: 10G BASE-T, 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- Digital Video
- Broadband and Baseband Analog Video
- CDDI, Token Ring, ATM

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL Listed CMR-LP (0.5A) for Non-Plenum*
- UL Listed CMP-LP (0.7A) for Plenum**
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ISO/IEC 11801 Ed. 2.0 (Class E_A)



*0.5A is the ampacity rating of the cable, which equates to 100 watts using 50 volts over four pairs.

**0.7A is the ampacity rating of the cable, which equates to 140 watts using 50 volts over four pairs.

Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 23 AWG solid bare annealed copper

Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

Color Code

- Pair 1: Blue-White
- Pair 2: Orange-White
- Pair 3: Green-White
- Pair 4: Brown-White

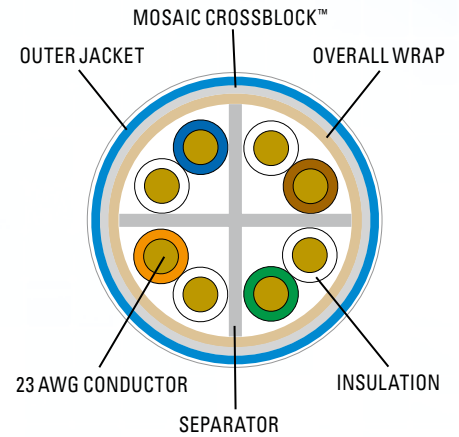
Separator

- Cross-web

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

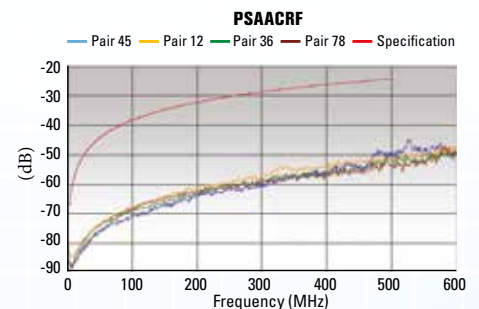
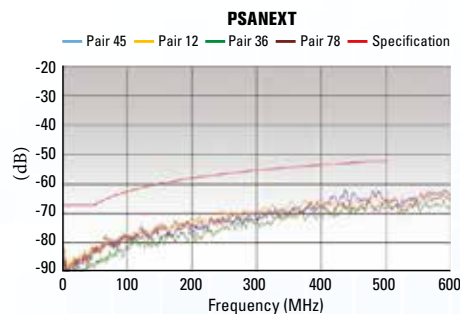
	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.305	0.275
Nominal Cable Weight (lbs/1000 ft)	40	39.5
Minimum Bend Radius (in)	1.25	1.25
Maximum Pulling Force (lbs)	40	40
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +90

Part Numbers

Spool (Standard packaging: 1000')		
Jacket Color	CMR (Non-Plenum)	CMP (Plenum)
Blue	7133849	7132849
White	7133850	7132850

See all colors and options for this product on page 66. Non-stock items may be subject to minimum order quantities.

Guaranteed +8 dB over TIA 568-C.2 Standard for both PSANEXT & PSAACRF



Features and Benefits

- Extensive design development conducted to find the perfect blend of product performance and consistent manufacturability
- Innovative T-Top cross-web provides superior internal electrical characteristics by locking the pairs into a systematic orientation within the cable
- Superior flame and smoke characteristics achieved through innovative design and careful selection of materials with certified suppliers
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED[®] credit under Material and Resource credit (MRc)
- Health Product Declaration[™] (HPD[™]) contributes toward one LEED credit under MRc
- TRU-Mark[®] print legend contains footage markings from 1000' to 0'
- AirEs[®] jacket provides superior flexibility and maximum separation of pairs from cable to cable for consistent PSANEXT and PSAACRF performance
- Made in U.S.A.

Applications

- IEEE 802.3: 10G BASE-T, 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- Digital Video
- Broadband and Baseband Analog Video
- CDDI, Token Ring, ATM

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ISO/IEC 11801 Ed. 2.0 (Class E_A)



Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 23 AWG solid bare annealed copper

Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

Color Code

- Pair 1: Blue-White
- Pair 2: Orange-White
- Pair 3: Green-White
- Pair 4: Brown-White

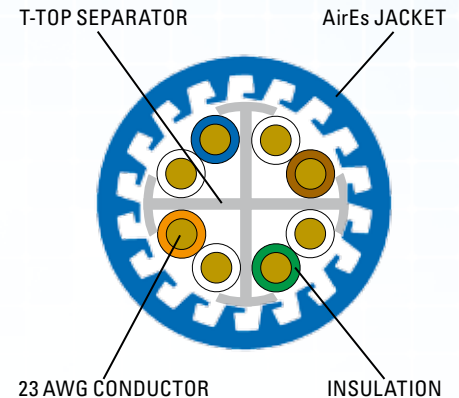
Separator

- T-Top cross-web

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.330	0.320
Nominal Cable Weight (lbs/1000 ft)	42	45
Minimum Bend Radius (in)	1.5	1.5
Maximum Pulling Force (lbs)	40	40
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +75

Part Numbers

Jacket Color	Spool (Standard packaging: 1000')	
	CMR (Non-Plenum)	CMP (Plenum)
Blue	7133819	7131819
White	7133820	7131820

See all colors and options for this product on page 66. Non-stock items may be subject to minimum order quantities.

Key Features and Benefits of the PanGen 6A Shielded Solution:

- Designed to exceed ANSI/TIA-568-C.2 channel requirements
- Installations covered by a 25-year comprehensive warranty program that provides performance to the latest industry standards
- A single point of contact for all PanGen inquiries
- All connectivity components are 100% performance-tested
- Quick installation of PanGen systems is provided through an extensive network of specially trained and certified installers

PanGen 6A Shielded Solution Delivers:

- Outstanding performance on all electrical parameters to provide a system that exceeds all applicable standards
- A shielded (STP) twisted pair cable with individually shielded pairs for optimized isolation between pairs and immunity from external noise as well as an overall shielded construction
- TRU-Mark® footage marking system to help eliminate unused lengths of cable and save installation time
- Jack modules feature the patent-pending Enhanced Giga-TX™ technology for terminations, which optimizes performance by maintaining cable pair geometry and eliminating conductor untwist
- Patch cords feature slender strain relief boots for easy access to high-density environments and a patented tangle-free latch which prevents snags and provides easy release for simple moves, adds and changes
- Modular patch panels are available in flat and angled styles




Category 6A Shielded System

Electrical Value	Guaranteed Channel Headroom over ANSI/TIA Category 6A	Guaranteed Channel Headroom over ISO Class E _x
Insertion Loss	3%	3%
NEXT	3.5 dB	2.5 dB
PSNEXT	5 dB	4 dB
PSACR-F	10 dB	10 dB
Return Loss	3 dB	3 dB
PSACR-N	6.5 dB	6.5 dB
PSANEXT	20 dB	20 dB
PSAACR-F	20 dB	20 dB

*Electrical values are above the specified standards and consist of worst pair margin per ANSI/TIA-568-C.2 Category 6A and ISO 11801 Class E_x standards.

Mini-Com® TX6A™ 10Gig Shielded Jack Modules

- Exceed ANSI/TIA-568-C.2 Category 6A, IEEE 802.3an-2006 and ISO 11801 Class E_A channel standards
- Exceed ANSI/TIA-568-C.2 Category 6A and IEC 60603-7-51 Category 6A component standards
- Meet IEC 60512-99-001 for 2500 cycles of engaging and separating conductors under electrical load
- Utilize patent-pending enhanced Giga-TX™ technology that optimizes performance by maintaining cable pair geometry and eliminating conductor untwist
- All jack modules are 100% performance-tested and individually serialized for future traceability
- Support IEEE 802.3af, 802.3at and IEEE 802.3bt type 3 and type 4 for all PoE applications up to 100 W
- Fully grounded and bonded to patch panel when installed in Panduit All-Metal Modular Patch Panels
- 0.187" grounding tab provides conductive path for grounding individual jacks
- Compatible with Mini-Com Modular Patch Panels, Faceplates and Surface Mount Boxes
- Universal termination cap is color-coded for T568A and T568B wiring schemes
- Operating temperature: -10°C to 65°C (14°F to 149°F)
- Terminates full range of 22-26 AWG conductors allowed per ANSI/TIA-568-C.2

Part Number	Description
 CJS6X88TG*Y	Category 6A, shielded, RJ45, 8-position, 8-wire universal module
 CJS6X88TGY-24	24-pack Category 6A, shielded, RJ45, 8-position, 8-wire universal module
 CJSH6X88TG*Y	Category 6A, shielded, RJ45, 8-position, 8-wire universal module with spring-shuttered door




The standard shielded jack is BL (Black): CJS6X88TGY

* To designate a color, add: BU (Blue), RD (Red), YL (Yellow), GR (Green), or VL (Violet). Ex: CJS6X88TGBUY.

Shield grounding requires proper installation of shielded jack module and the use of shielded patch cords and cable. For grounding shielded modules not installed in a shielded patch panel, see Panduit's shielded jack module grounding kit, CJSGK-XY.

TX6A™ and TX6A™-28 Shielded Copper Patch Cords

- Exceed requirements of ANSI/TIA-568-C.2 Category 6A, IEEE 802.3an-2006 and ISO 11801 Class E_A channel standards
- Exceed requirements of ANSI/TIA-568-C.2 Category 6A and ISO 11801 Class E_A component standards
- Meet IEC 60512-99-001 for 2500 cycles of engaging and separating conductors under electrical load
- Each patch cord is 100% performance-tested to component limits and wired T568B
- Plug performance in center of TIA component range, ensuring interoperability and 10G BASE-T Ethernet channel performance
- Patented tangle-free latch prevents snags and provides easy release, saving time on frequent moves, adds and changes
- Available in a variety of colors and lengths for design flexibility
- Category 6A 28 AWG shielded cords are less than 60% the size of traditional shielded patch cords
- STP28X* patch cords support up to 96 meters of channel length (when using 6 meters of patch)









Part Number	Description
 STP6X3*	Category 6A, 26 AWG, 10 Gb/s shielded S/FTP patch cord with TX6A modular plugs on each end
 STP28X3*	Category 6A, 28 AWG, small diameter, 10 Gb/s shielded F/UTP patch cord with TX6A 10Gig modular plugs on each end
 STP6C3M*	Category 6A, 26 AWG, 10 Gb/s shielded F/UTP patch cords with TX6A 10Gig modular plugs on each end (meters only)

* Available lengths: 1 to 20 feet (increments of one foot) and 25, 30, 35, 40 feet. Patch cords listed in Off White. To designate other colors, add suffix to end of part number: IG (International Grey), BL (Black), BU (Blue), GR (Green), OR (Orange), RD (Red), YL (Yellow), or VL (Violet).

* Available lengths: 0.5, 1, 1.5, 2, 2.5, 3-10 meters, 15, 20, 25, 30, 35 and 40 meters. Available colors: IG (International Grey), BL (Black), BU (Blue), GR (Green), RD (Red), YL (Yellow), OR (Orange), or VL (Violet).

Mini-Com® All-Metal Shielded Modular Patch Panels

- Mount to standard EIA 19" racks
- Accept Mini-Com Modules for shielded applications
- Provide write-on areas for port identification
- CPT removal tool allows easy moves, adds and changes of shielded jack modules
- Made of stainless steel

	Part Number	Description
	CP24BLY	24-port, 1 RU, all-metal modular patch panel
	CPA24BLY	24-port, 1 RU, angled, all-metal modular patch panel
	CP24WSBLY	24-port, 1 RU, all-metal modular patch panel with strain relief bar
	CP48BLY	48-port, 2 RU, all-metal modular patch panel
	CPA48BLY	48-port, 2 RU, angled, all-metal modular patch panel
	CP48WSBLY	48-port, 2 RU, all-metal modular patch panel with strain relief bar
	CP48HDBL	48-port, 1 RU, high-density, all-metal modular patch panel
	CPA48HDBL	48-port, 1 RU, angled, high-density, all-metal modular patch panel

HD patch panels do not require CPT tool. For full range of modular patch panels, contact Panduit customer service.

PanGen® Category 6A Shielded System Solutions

GenSPEED® 10,000 CATEGORY 6A U/FTP (STP) CABLE



Features and Benefits

- Individually pair shielded design allows for maximum pair separation, increasing key electrical performance parameters and providing EMI protection
- Typical positive PSACR beyond 500 MHz for increased available bandwidth
- Improved cable temperature rating (90°C Plenum, 75°C Riser) for greater protection against increased operating temperatures
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Made in U.S.A.

Applications

- IEEE 802.3: 10G BASE-T, 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- Digital Video
- Broadband and Baseband Analog Video
- CDDI, Token Ring, ATM

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ISO/IEC 11801 Ed. 2.0 (Class E_A)



Data subject to change without notice.

For full specifications, visit gca.us/Catalogs/DatacomCable.



Construction

Conductors

- 23 AWG solid bare annealed copper

Insulation

- Non-Plenum: Foamed HDPE
- Plenum: Foamed Fluoropolymer

Color Code

- Pair 1: Blue-White
- Pair 2: Orange-White
- Pair 3: Green-White
- Pair 4: Brown-White

Shield

- Each pair is individually shielded with an aluminum foil

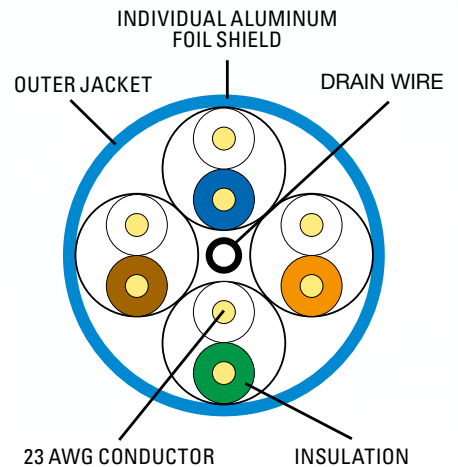
Drain Wire

- 24 AWG stranded (7/32) solid tinned copper

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.305	0.295
Nominal Cable Weight (lbs/1000 ft)	43	47
Minimum Bend Radius (in)	2.44	2.36
Maximum Pulling Force (lbs)	32	32
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +90

Part Numbers

		Spool (Standard packaging: 1000')	
Jacket Color		CMR (Non-Plenum)	CMP (Plenum)
Blue		7133786	7131786
White		7133787	7131787

See all colors and options for this product on page 66. Non-stock items may be subject to minimum order quantities.

Features and Benefits

- An overall shielded or foiled-twisted pair (F/UTP) cable, requiring grounding and providing industry-leading protection from external cable noise sources, also known as alien crosstalk (PSANEXT and PSAACRF)
- Improved cable temperature rating (90°C Plenum, 75°C Riser) for greater protection against increased operating temperatures and for high-wattage applications
- The internal separator optimizes internal pair geometry to yield superior electrical performance and maintain flexibility. This unique cross-web stabilizes each pair to create a smaller, round cable profile
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Made in U.S.A.

Applications

- IEEE 802.3: 10G BASE-T, 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- Digital Video
- Broadband and Baseband Analog Video
- CDDI, Token Ring, ATM

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL Listed CMR-LP (0.5A) for Non-Plenum*
- UL Listed CMP-LP (0.7A) for Plenum**
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ISO/IEC 11801 Ed. 2.0 (Class E_A)



*0.5A is the ampacity rating of the cable, which equates to 100 watts using 50 volts over four pairs.

**0.7A is the ampacity rating of the cable, which equates to 140 watts using 50 volts over four pairs.

Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 23 AWG solid bare annealed copper

Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

Color Code

- Pair 1: Blue-White
- Pair 2: Orange-White
- Pair 3: Green-White
- Pair 4: Brown-White

Separator

- Cross-web

Core Tape

- Non-Plenum: Polypropylene
- Plenum: Fluoropolymer

Shield

- Polyester-backed aluminum foil (aluminum side in)

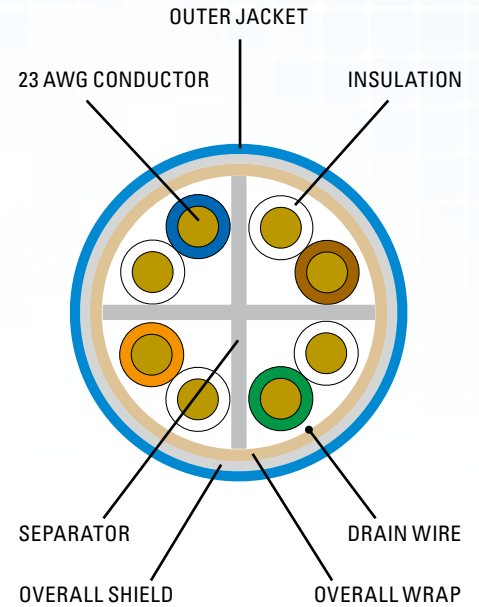
Drain Wire

- 24 AWG stranded (7/32) solid tinned copper

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.310	0.298
Nominal Cable Weight (lbs/1000 ft)	40	50
Minimum Bend Radius (in)	2.5	2.5
Maximum Pulling Force (lbs)	40	40
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +90

Part Numbers

		Spool	
Jacket Color		CMR (Non-Plenum)	CMP (Plenum)
Blue		7133586	7131586
White		7133587	7131587

See all colors and options for this product on page 66. Non-stock items may be subject to minimum order quantities.

Key Features and Benefits of PanGen Category 6 Solutions:

- Designed to exceed ANSI/TIA-568-C.2 channel requirements
- Installations covered by a 25-year comprehensive warranty program that provides performance to the latest industry standards
- A single point of contact for all PanGen inquiries
- All connectivity components are 100% performance-tested
- Quick installation of PanGen systems is provided through an extensive network of specially trained and certified installers

PanGen Category 6 Solutions Deliver:

- TRU-Mark[®] footage marking system to help eliminate unused lengths of cable and save installation time
- Jack modules feature the patent-pending Enhanced Giga-TX[™] technology for terminations, which optimizes performance by maintaining cable pair geometry and eliminating conductor untwist
- Patch cords feature slender strain relief boots for easy access to high-density environments and a patented tangle-free latch which prevents snags and provides easy release for simple moves, add, and changes
- Patch panels are available in punchdown and modular styles and include flat and angled orientations

PanGen 6 PREMIUM:

- Uses GenSPEED[®] 6500 Premium Category 6 cable
- Cable designed and engineered with precision balance to offer ultimate headroom
- Patent-pending Enhanced Giga-TX[™] technology for jack module termination, which optimizes performance by maintaining cable pair geometry and eliminating conductor untwist
- Keyed connectivity available to mechanically and visually distinguish connections to prevent unintentional mating with unlike keyed or non-keyed ports accommodating discrete networks

Category 6 Premium System

Electrical Value	Guaranteed Channel Headroom over ANSI/TIA Category 6 at 250 MHz
Insertion Loss	9%
NEXT	6 dB
PSNEXT	7.5 dB
ACR-N	7 dB
PSACR-N	9 dB
ACR-F	8 dB
PSACR-F	10 dB
Return Loss	3 dB

*Electrical values are above the specified standards and consist of worst pair margin per ANSI/TIA-568-C.2 Category 6.

PanGen 6 ENHANCED:

- Uses GenSPEED 6000 Enhanced Category 6 cable
- Optimal performance on all electrical parameters to provide a system that exceeds all applicable TIA standards. This performance is achieved through the robust cable design of GenSPEED paired with the Mini-Com Jack Module, TX6 PLUS Patch Cord, and DataPatch or Mini-Com Modular Patch Panels
- Category 6 channel designed to exceed the bandwidth requirements set by ANSI/TIA-568-C.2 Category 6 standards
- Jack modules feature the patented Giga-TX[™] technology for terminations, which optimizes performance by maintaining cable pair geometry and eliminating conductor untwist


Category 6 Enhanced System

Electrical Value	Guaranteed Channel Headroom over ANSI/TIA Category 6 at 250 MHz
Insertion Loss	5%
NEXT	6 dB
PSNEXT	7.5 dB
ACR-N	7 dB
PSACR-N	9 dB
ACR-F	7 dB
PSACR-F	9 dB
Return Loss	3 dB

* Electrical values are above specified standards and consist of worst pair margin per ANSI/TIA-568-C.2 Category 6 and ISO 11801 Class E standards.

Mini-Com® TX6™ PLUS UTP Jack Modules



- Exceed ANSI/TIA-568-C.2 Category 6 and ISO 11801 Class E standards
- All jack modules are 100% performance-tested and individually serialized for future traceability
- Compatible with all Mini-Com Modular Patch Panels, Faceplates and Surface Mount Boxes
- Universal termination cap is color-coded for T568A and T568B wiring schemes

Part Number	Description
 CJ688TGBU*	Category 6, RJ45, 8-position, 8-wire universal module
 CJ688TGBU*-24	24-pack Category 6, RJ45, 8-position, 8-wire universal module
 CJ688TGBU*-C	100-pack Category 6, RJ45, 8-position, 8-wire universal module
 CJH688TGBU*	Category 6, RJ45, 8-position, 8-wire shuttered universal module with spring-shuttered door
 CJR688TGBU*	Category 6, RJ45, 8-position, 8-wire universal module with right angle wire cap
 CJRCAPIW	Right angle wire cap for use with any TX6™ PLUS jack, white

* Product is listed in Blue. To designate a different color, replace BU (Blue) with available colors: IW (Off White), EI (Electric Ivory), IG (International Grey), WH (White), BL (Black), BU (Blue), RD (Red), YL (Yellow), GR (Green), OR (Orange), or VL (Violet).

TX6[™] PLUS and TX6[™]-28 Copper UTP Patch Cords

- Exceed all industry performance standards for Category 6
- 100% performance-tested
- Available in a variety of colors and lengths for design flexibility
- Category 6 28 AWG cord is less than 50% the size of traditional 24 AWG cords
- UTP28SP* cords support up to 96 meters of channel length (when used with 6 meters of patch)





Part Number	Description
	UTPSP3Y* Category 6, UTP patch cord with TX6 [™] PLUS modular plugs on each end
	UTP28SP3* Category 6, 28 AWG, small diameter UTP patch cord with TX6 PLUS modular plugs on each end

* Available in lengths 1 to 20 feet (increments of one foot) and 25, 30, 35, 40 feet. Patch cords listed in Off White. To designate other colors, add suffix to end of part number: BL (Black), BU (Blue), GR (Green), GY (Gray), OR (Orange), RD (Red), YL (Yellow), or VL (Violet).

† UTP28SP cords support up to 96 meters of channel length (when used with 6 meters of patch).

DP6™ PLUS UTP Patch Panels

- Mount to standard EIA 19" racks
- DP6 PLUS UTP Patch Panels exceed all industry performance standards for Category 6
- Angled versions are ideal for higher density applications; facilitate proper bend radius control and minimize the need for horizontal cable managers
- Each port is 100% tested to ensure NEXT and RL performance and is individually serialized to support traceability
- Utilize 110 punchdown termination on back of panel and include retention cap for each port
- Optional label kits (DPLK24 and DPLK48) contain adhesive label holder and labels for easy port and panel identification
- Color-coded for T568A and T568B wiring schemes

	Part Number	Description
	DP24688TGY	24-port, 1 RU, Category 6 patch panel with 24 RJ45, 8-position, 8-wire ports
	DP48688TGY	48-port, 2 RU, Category 6 patch panel with 48 RJ45, 8-position, 8-wire ports
	DPA24688TGY	24-port angled, 1 RU, Category 6 patch panel with 24 RJ45, 8-position, 8-wire ports
	DPA48688TGY	48-port angled, 2 RU, Category 6 patch panel with 48 RJ45, 8-position, 8-wire ports

Note: For a full range of modular patch panels, contact Panduit customer service.

Features and Benefits

- Designed and engineered with precision balance to offer ultimate headroom
- High-end optimized performance to support the most bandwidth-intense applications
- New and improved separator construction allowing for more pair separation
- Performance guaranteed to 350 MHz
- Improved cable temperature rating (90°C Plenum, 75°C Riser) for greater protection against increased operating temperatures and for high-wattage applications
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Third-party verified for guaranteed performance
- Made in U.S.A.

Applications

- IEEE 802.3: 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- CDDI, Token Ring, ATM
- Digital Video
- Broadband and Baseband Analog Video

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL Listed CMR-LP (0.5A) for Non-Plenum*
- UL Listed CMP-LP (0.6A) for Plenum**
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ICEA S-102-700
- ISO/IEC 11801 Ed. 2.0 (Class E)



*0.5A is the ampacity rating of the cable, which equates to 100 watts using 50 volts over four pairs.

**0.6A is the ampacity rating of the cable, which equates to 120 watts using 50 volts over four pairs.

Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 23 AWG solid bare annealed copper

Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

Color Code

- Pair 1: Blue-White/Blue
- Pair 2: Orange-White/Orange
- Pair 3: Green-White/Green
- Pair 4: Brown-White/Brown

Separator

- Cross-web

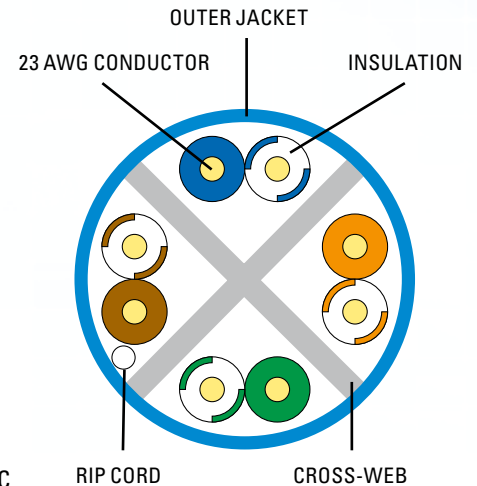
Rip Cord

- Applied longitudinally under jacket

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.260	0.255
Nominal Cable Weight (lbs/1000 ft)	32	31
Minimum Bend Radius (in)	1.0	1.0
Maximum Pulling Force (lbs)	50	50
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +90

Part Numbers Standard packaging: 1000' Spool-Pac®

Jacket Color	Spool-Pac®		Spool	
	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)
Blue	7133930	7131930	7133970	7131970
White	7133931	7131931	7133971	7131971

Bulk reels are available as a special request with a maximum allowable length of 3000 feet per reel. Minimum run and lead time may apply.

See all colors and options for this product on page 67. Non-stock items may be subject to minimum order quantities.

PanGen® Category 6 System Solutions

GenSPEED® 6000 ENHANCED CATEGORY 6 CABLE

PanGen®
STRUCTURED CABLING SOLUTIONS

Features and Benefits

- Innovative cross-web design allowing for maximum pair separation, increasing key electrical performance parameters
- Performance guaranteed to 350 MHz
- Improved cable temperature rating (90°C Plenum, 75°C Riser) for greater protection against increased operating temperatures
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Third-party verified for guaranteed performance
- Made in U.S.A.

Applications

- IEEE 802.3: 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- CDDI, Token Ring, ATM
- Digital Video
- Broadband and Baseband Analog Video

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL Listed CMP-LP (0.5A) for Plenum*
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ICEA S-102-700
- ISO/IEC 11801 Ed. 2.0 (Class E)



*0.5A is the ampacity rating of the cable, which equates to 100 watts using 50 volts over four pairs.

Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 23 AWG solid bare annealed copper

Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

Color Code

- Pair 1: Blue-White/Blue
- Pair 2: Orange-White/Orange
- Pair 3: Green-White/Green
- Pair 4: Brown-White/Brown

Separator

- Cross-web

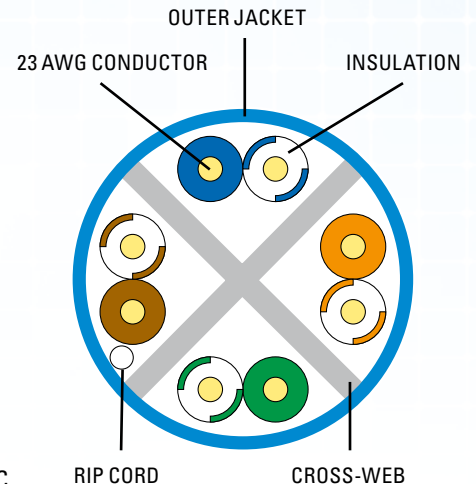
Rip Cord

- Applied longitudinally under jacket

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.235	0.215
Nominal Cable Weight (lbs/1000 ft)	28	28
Minimum Bend Radius (in)	1.0	1.0
Maximum Pulling Force (lbs)	32	32
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +90

Part Numbers Standard packaging: 1000' Spool-Pac®

Jacket Color	Pull-Pac® II		Spool-Pac®		Spool	
	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)
Blue	7133900	7131900	7133940	7131940	7133960	7131960
White	7133901	7131901	7133941	7131941	7133961	7131961

Bulk reels are available as a special request with a maximum allowable length of 3000 feet per reel.

Minimum run and lead time may apply.

See all colors and options for this product on page 67. Non-stock items may be subject to minimum order quantities.

Key Features and Benefits of the PanGen 5e Premium Solution:

- Designed to exceed ANSI/TIA-568-C.2 channel requirements
- Installations covered by a 25-year comprehensive warranty program that provides performance to the latest industry standards
- A single point of contact for all PanGen inquiries
- All connectivity components are 100% performance-tested
- Quick installation of PanGen systems is provided through an extensive network of specially trained and certified installers

PanGen 5e Premium Solution Delivers:

- Compliant performance on all electrical parameters to provide a system that exceeds all applicable TIA standards. This performance is guaranteed by pairing GenSPEED[®] 5500 with Mini-Com Jack Modules, TX5E Patch Cords, and DataPatch or Mini-Com Modular Patch Panels
- Category 5e channel designed to exceed bandwidth requirements set by ANSI/TIA-568-C.2 Category 5e standards
- TRU-Mark[®] footage marking system to help eliminate unused lengths of cable and save installation time
- Jack modules feature the patented Giga-TX[™] technology for terminations, which optimizes performance by maintaining cable pair geometry and eliminating conductor untwist
- Patch cords feature slender strain relief boots for easy access to high-density environments and a patented tangle-free latch which prevents snags and provides easy release for simple moves, adds and changes
- Patch panels are available in punchdown and modular styles and include flat and angled orientations







Category 5e Premium System

Electrical Value	Guaranteed Channel Headroom over ANSI/TIA Category 5e at 100 MHz
Insertion Loss	5%
PSNEXT	7.5 dB
PSACR-N	9 dB
PSACR-F	6 dB

*Electrical values are above the specified standards and consist of worst pair margin per ANSI/TIA-568-C.2 Category 5e.

Mini-Com® TX5e™ UTP Jack Modules



- Exceed ANSI/TIA-568-C.2 Category 5e and ISO 11801 Class D standards
- All jack modules are 100% performance-tested and individually serialized for future traceability
- Compatible with all Mini-Com Modular Patch Panels, Faceplates and Surface Mount Boxes
- Universal termination cap is color-coded for T568A and T568B wiring schemes

Part Number	Description
	CJ5E88TGBU* Category 5e, RJ45, 8-position, 8-wire universal module
	CJ5E88TGBU*-24 24-pack Category 5e, RJ45, 8-position, 8-wire universal module
	CJ5E88TGBU*-C 100-pack Category 5e, RJ45, 8-position, 8-wire universal module
	CJH5E88TGBU* Category 5e, RJ45, 8-position, 8-wire universal module with spring-shuttered door
	CJR5E88TGBU* Category 5e, RJ45, 8-position, 8-wire universal module with right angle wire cap
	CJRCAPRD Right angle wire cap for use with any TX5e™ jack, red

** Product is listed in Blue. To designate a different color, replace BU (Blue) with available colors: IW (Off White), EI (Electric Ivory), IG (International Grey), WH (White), BL (Black), RD (Red), YL (Yellow), GR (Green), OR (Orange), or VL (Violet). To order bulk packs of 24 jack modules, add -24 to end of part number.

TX5e[™] and TX5e[™]-28 Copper UTP Patch Cords

- Exceed all industry performance standards for Category 5e
- 100% performance-tested
- Available in a variety of colors and lengths for design flexibility
- Category 5e 28 AWG cord is less than 50% the size of traditional 24 AWG cords
- UTP28CH* cords support up to 96 meters of channel length (when used with 6 meters of patch)


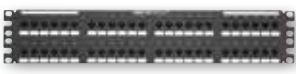


Part Number	Description
 UTPCH3Y*	Category 5e, 24 AWG, UTP patch cord with Pan-Plug modular plugs on each end
 UTP28CH3**	Category 5e, 28 AWG, small diameter UTP patch cord with Pan-Plug modular plugs on each end

* Available in lengths 1 to 20 feet (increments of one foot) and 25, 30, 35, 40 feet. Patch cords listed in Off White. To designate other colors, add suffix before the Y at the end of the part number: BL (Black), BU (Blue), GR (Green), GY (Gray), OR (Orange), RD (Red), YL (Yellow), or VL (Violet). For example, the part number for a blue 15-foot patch cord is UTPCH15BUY.

** UTP28CH3 cords support up to 96 meters of channel length (when used with 6 meters of patch).

DP5e[™] UTP Patch Panels

- Mount to standard EIA 19" racks
- DP5e UTP Patch Panels exceed all industry performance standards for Category 5e
- Angled versions are ideal for higher density applications; facilitate proper bend radius control and minimize the need for horizontal cable managers
- Each port is 100% tested to ensure NEXT and RL performance and is individually serialized to support traceability
- Utilize 110 punchdown termination on back of panel and include retention cap for each port
- Optional label kits (DPLK24 and DPLK48) contain adhesive label holder and labels for easy port and panel identification
- Color-coded for T568A and T568B wiring schemes

Part Number	Description
 DP245E88TGY	24-port, 1 RU, Category 5e patch panel with 24 RJ45, 8-position, 8-wire ports
 DP485E88TGY	48-port, 2 RU, Category 5e patch panel with 48 RJ45, 8-position, 8-wire ports
 DPA245E88TGY	24-port angled, 1 RU, Category 5e patch panel with 24 RJ45, 8-position, 8-wire ports
 DPA485E88TGY	48-port angled, 2 RU, Category 5e patch panel with 48 RJ45, 8-position, 8-wire ports

Note: For a full range of modular patch panels, contact Panduit customer service.

Features and Benefits

- Ensures increased headroom for future applications, lower bit-error rates, and higher signal transmission quality
- Enhanced signal-to-noise ratio, improving bit-error rate
- Performance guaranteed to 350 MHz
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Third-party verified for guaranteed performance
- Made in U.S.A.

Applications

- IEEE 802.3: 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- CDDI, Token Ring, ATM
- Broadband and Baseband Analog Video

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-90-661
- ISO/IEC 11801 Ed. 2.0 (Class D)



Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 23 AWG CMR solid bare annealed copper
- 24 AWG CMP solid bare annealed copper

Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

Color Code

- Pair 1: Blue-White/Blue
- Pair 2: Orange-White/Orange
- Pair 3: Green-White/Green
- Pair 4: Brown-White/Brown

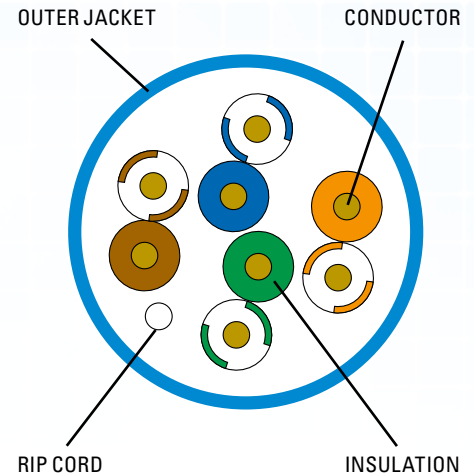
Rip Cord

- Applied longitudinally under jacket

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.220	0.190
Nominal Cable Weight (lbs/1000 ft)	24	21
Minimum Bend Radius (in)	1.0	1.0
Maximum Pulling Force (lbs)	25	25
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +75

Part Numbers Standard packaging: 1000' Pull-Pac® II

Jacket Color	Pull-Pac® II		Spool-Pac®		Spool	
	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)
Blue	6133299	6131278	6133403	6131433	6133282	6131282
White	6133255	6131361	6133339	6131449	6133492	6131618

Bulk reels are available as a special request with a maximum allowable length of 3000 feet per reel. Minimum run and lead time may apply.
See all colors and options for this product on page 68. Non-stock items may be subject to minimum order quantities.

Key Features and Benefits of PanGen Fiber Solutions:

- High-performance system engineered to meet network requirements for 10 Gb or 100 Gb applications
- Multimode fiber differential mode delay (DMD) and attenuation performance characteristics designed to meet the laser-based protocols of IEEE 802.3ae
- Compatible with Ethernet, Fast Ethernet and ATM protocols
- Tested at link length of 300 m with two mated pair connectors; PanGen OM3 system performed with a packet bit error rate (BER) of 10⁻¹², exceeding the IEEE specification requirements
- Installations covered by a 25-year comprehensive warranty program that provides performance to the latest industry standards
- A single point of contact for all PanGen inquiries
- All connectivity components are 100% performance-tested
- Quick installation of PanGen systems is provided through an extensive network of specially trained and certified installers

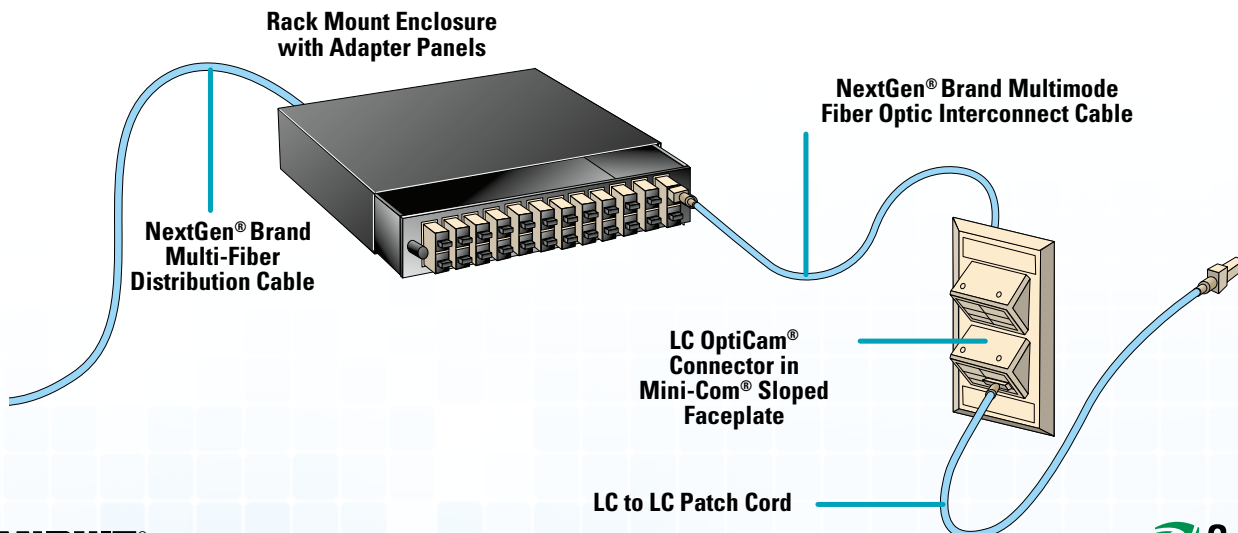
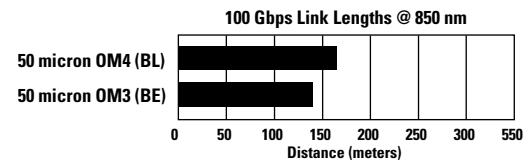
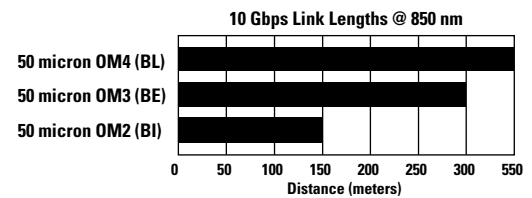
PanGen Fiber Solutions Deliver:

- 10 Gb or 100 Gb optical performance that exceeds IEEE 802.3 specifications
- Fully compatible suite of NextGen® cable, Panduit connectors and patch cords
- 50/125 multimode, 62.5/125 multimode or 9/125 singlemode fiber options
- Cable designs in various constructions for premise, outside plant and indoor/outdoor applications

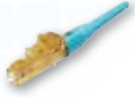






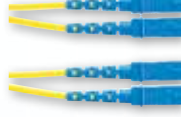

System Performance

Fiber Type	Description	10 Gbit Distance (meters)			100 Gbit Distance (meters)		
		850 nm	1300 nm	1310 nm	850 nm	1300 nm	1310 nm
PanGen SM	AP or AQ Low Loss/Enhanced Bend	--	--	10,000	--	--	10,000
PanGen OM4	BL 50/125 G10X 550	550	300	--	170	300	--
PanGen OM3	BE 50/125 G10X 300	300	300	--	140	300	--
PanGen OM2	BI 50/125 G10X 150	150	300	--	--	--	--













Performance Charts



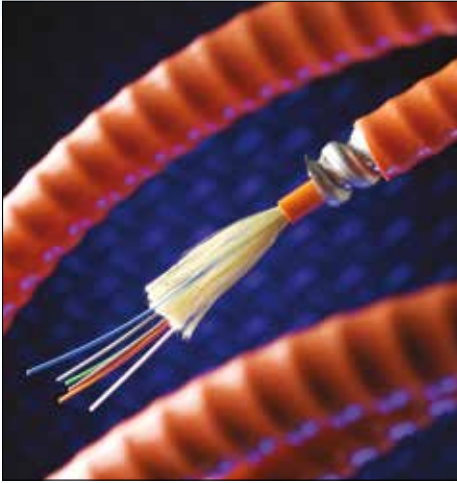
PANDUIT OPTICOM[®] Fiber Optic Components

Part Number	Description
Connectors*	
	FLCSMCXAQY LC 50/125 μm OM3/OM4 multimode simplex connector, aqua boot
	FLCSSCBUY LC 9/125 μm singlemode simplex fiber optic connector for 900 μm tight buffered fiber installation, blue boot
	FSCMCXAQ SC 50/125 μm OM2/OM3/OM4 duplex connector, aqua boot
Termination Tools*	
	FCAMKIT OptiCam [®] Termination Kit (Pre-Polished Cam Fiber Optic Connectors)
	FPPKIT-CVY Kit upgrades Opti-Crimp [®] Termination Kit for OptiCam [®] Connector termination
Patch Cord*	
	FX2ERLNLNSNM001 2-fiber OM3 50/125 μm, 1.6 mm riser-rated patch cord, LC duplex to LC duplex Std. IL., 1 m
	F92ERLNLNSNM001 2-fiber OS2 9/125 μm, 1.6 mm riser-rated patch cord, LC duplex to LC duplex Std. IL., 1 m
	FX23RSNSNSNM001 2-fiber OM3 50/125 μm, 3 mm riser-rated patch cord, SC duplex to SC duplex Std. IL., 1 m
	F923RSNSNSNM001 2-fiber OS2 9/125 μm, 3 mm riser-rated patch cord, SC duplex to SC duplex Std. IL., 1 m

* For complete product listing and product specifications, contact Panduit customer service.

Part Number	Description
Adapter Module*	
	CMDJALCBL LC Sr./Jr. SFF duplex 10 Gig MM, phos. bronze split sleeves
	CMDJLCZBU LC Sr./Jr. SFF duplex SM, zirc. ceramic split sleeves
	CMDAQSCBL SC duplex 10 Gig MM, phos. bronze split sleeves
	CMDBUSCZBU SC duplex SM, ceramic split sleeves
Fiber Adapter Panel*	
	FAP6WAQDLC 6 LC duplex 10 Gig MM adapters, phos. bronze split sleeves
	FAP6WBUDLCZ 6 LC duplex SM adapters, zirc. ceramic split sleeves
	FAP6WAQDSC 6 SC duplex 10 Gig MM adapters, phos. bronze split sleeves
	FAP6WBUDSCZ 6 SC duplex SM adapters, zirc. ceramic split sleeves
Rack Mount Enclosure*	
	FRME1U 1 RU enclosure, slide out/tilt down drawer
	FRME2U 2 RU enclosure, slide out/tilt down drawer
	FRME3 3 RU enclosure
	FRME4 4 RU enclosure

* For complete product listing and product specifications, contact Panduit customer service.



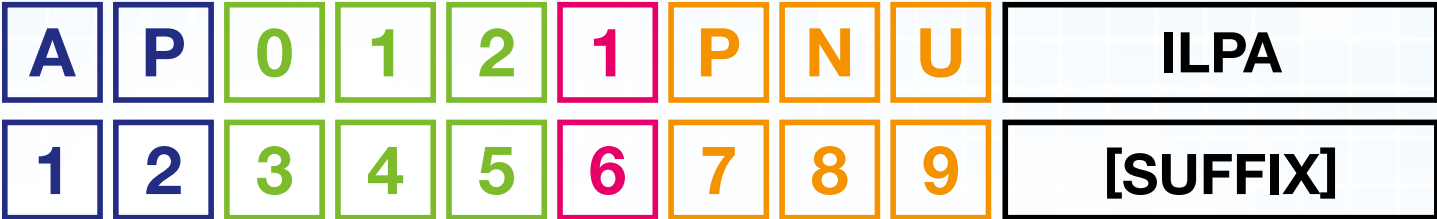
Fiber Type	General Cable	Industry Specification
Standard Loose Tube SM	AQ	ITU-T G.652 & ITU-T G.657.A1
Tight Buffer SM	AP	ITU-T G.652 & ITU-T G.657.A1
Long Haul SM	AL	ITU-T G.655
Bendable SM	AY	ITU-T G.657.A2/B2
Ultra-Bendable SM	AZ	ITU-T G.657.B3
62.5 μm MM	CG	OM1
Ultra-Bendable 50 μm MM	BI	OM2
Ultra-Bendable 50 μm MM	BE	OM3
Ultra-Bendable 50 μm MM	BL	OM4
Ultra-Bendable 50 μm MM	BM	OM4+

Multimode Fiber Selection Guide

Optical Characteristics:		50/125 Product Family				62.5/125 Product Family		Units
		OM2 Type-BI	OM3 Type-BE	OM4 Type-BL	OM4 Type-BM	OM1 Type-CG	OM1 Type-CL	
Maximum Finished Cable Attenuation Coefficient	@850 nm	3.0	3.0	3.0	3.0	3.5	3.5	dB/km
	@1300 nm	1.0	1.0	1.0	1.0	1.0	1.0	dB/km
Overfill Launch Bandwidth	@850 nm	700	1500	1500	1500	200	200	MHz.km
	@1300 nm	500	500	500	500	500	500	MHz.km
Laser Bandwidth	@850 nm	850	2000	4700	5350*	220	385	MHz.km
Gigabit Ethernet Link Length (1 Gbps)	1000 BASE-SX (850 nm)	750	1000	1100	1100	300	500	meters
	1000 BASE-LX (1300 nm)	550	550	550	550	550	1000	meters
10 Gigabit Ethernet Link Length (10 Gbps)	10G BASE-SR (850 nm)	150	300	550	600	33	33	meters

* Using 3.0 dB cable attenuation and 0.7 dB connector allocation

Example: AP0121PNU-ILPA
Singlemode, 12 Fibers, Tight Buffer Distribution Plenum, Interlock Armor Plenum Aluminum



Fiber Grade **Position 1, 2**

In position 1
 A: Singlemode (sm)
 B: 50 MM Multimode (mm)
 C: 62.5 MM Multimode (mm)
 For position 2, reference page 28 for fiber specifications and grades.

Requested Fiber Count **Position 3, 4, 5**

Standard Offerings:
 6 12 24 36 48 72 96 144

Buffer Construction **Position 6**

1) Tight Buffer
 3) Single-Fiber Loose Tube
 4) Multi-Fiber Loose Tube

Suffixes

- **BK** Black Jacket (UV Resistant)
- **DWB** Dry Water Block Cable Core
- **DT** Dry Tube
- **ILPA** Interlock Armor Plenum Aluminum
- **ILPAS** Interlock Armor Plenum Aluminum w/Sub-Units
- **ILRA** Interlock Armor Riser Aluminum

Series Type **Position 7, 8, 9**

Outdoor:
 H1A: Loose Tube DJ
 H1F: Loose Tube DJ Armored
 M1A: Loose Tube SJ
 M1F: Loose Tube SJ Armored

Indoor:
 PNR/P1R: Tight Buffer Distribution Riser
 PNU/P1D: Tight Buffer Distribution Plenum
 PNZ/P1Z: Tight Buffer Distribution LSZH

Indoor/Outdoor:
 ANR/A1R: Tight Buffer Distribution Riser
 ANU/A1D: Tight Buffer Distribution Plenum
 M1D: Loose Tube SJ Plenum
 M1M: Loose Tube SJ Riser
 M1Z: Loose Tube SJ LSZH

Note: DJ = Dual Jacket
 SJ = Single Jacket

PanGen® Fiber System Solutions

NEXTGEN® BRAND FIBER OPTIC CABLE
TIGHT BUFFER DISTRIBUTION



Features and Benefits

- Lightweight, flexible design simplifies installation
- Tight buffer provides individual fiber protection
- Tight buffered fibers are easy to handle and strip for field connectorization
- Sub-units are numbered for identification

Indoor/Outdoor

- Dry Water Block cable core for fiber protection
- Direct termination of connectors on tight buffer

Applications

- ETL Listed Type OFNR for installation in vertical riser and general horizontal applications when installed in accordance with NEC Article 770.154 and 770.179
- ETL Listed Type OFNP for installation in ducts, plenums and other spaces used as environmental air returns when installed in accordance with NEC Article 770.154 and 770.179

Indoor

- Intrabuilding voice or data communication backbones

Indoor/Outdoor

- Intrabuilding and interbuilding voice or data communication backbones
- Outdoor use in ducts and underground conduits

Standard Compliances

- ETL Listed Type OFNR for Riser
- ETL Listed Type OFNP for Plenum
- CSA FT4 for Riser
- CSA FT6 for Plenum
- TIA 568-C.3
- ICEA S-83-596 for Indoor
- ICEA S-104-696 for Indoor/Outdoor
- GR-409
- RoHS Compliant Directive 2011/65/EU

* Sequential meter markings available upon request



Data subject to change without notice.
For full specifications, visit gcn.us/Catalogs/FiberOpticCable.



Indoor Riser and Plenum

Construction

Fiber

- 2–144 fibers
- 900 µm tight buffer
- Color-coding per TIA/EIA 598B

Central Strength Member

- Epoxy/glass rod (P1R)

Overall Strength Member

- Aramid fiber yarn

Jacket

- Flame-retardant compound or fluoropolymer
- Sequential footage markings
- Orange jacket—multimode fibers (except 10 Gbps)
- Aqua jacket—10 Gbps multimode fibers
- Yellow jacket—singlemode fibers

Construction Options

	Fiber Count	Part Number
Riser	2-24 fibers	xyyyy1PNR*
Type OFNR, CSA FT4	18-144 fibers	xyyyy1P1R*
Plenum	2-24 fibers	xyyyy1PNU*
Type OFNP, CSA FT6	36-144 fibers	xyyyy1P1D*

* xx denotes fiber type and yyy denotes number of fibers



Indoor/Outdoor Riser and Plenum

Construction

Fiber

- 2–144 fibers
- 900 µm tight buffer
- Color-coding per TIA/EIA 598B

Central Strength Member

- Epoxy/glass rod (A1R)

Overall Strength Member

- Aramid fiber yarn

Jacket

- UV-resistant black jacket
- Flame-retardant compound
- Sequential footage markings

Construction Options

	Fiber Count	Part Number
Riser	2-24 fibers	xyyyy1ANR.BK*
Type OFNR, CSA FT4	18-144 fibers	xyyyy1A1R.BK*
Plenum	2-24 fibers	xyyyy1ANU.BK*
Type OFNP, CSA FT6	36-144 fibers	xyyyy1A1D.BK*

* xx denotes fiber type and yyy denotes number of fibers

PanGen® Fiber System Solutions

NEXTGEN® BRAND FIBER OPTIC CABLE
TIGHT BUFFER DISTRIBUTION INTERLOCK ARMORED



Features and Benefits

- Interlock armor provides outstanding mechanical protection
- Interlock armor is flexible and easy to use
- Tight buffer provides individual fiber protection
- Sub-units are numbered for identification

Applications

- ETL Type OFCR for installation in any premises location when installed in accordance with NEC Article 770.154 and 770.179
- ETL Type OFCP for installation in any premises location when installed in accordance with NEC Article 770.154 and 770.179

Indoor

- Harsh premises environments requiring heavy-duty protection

Indoor/Outdoor

- Harsh premises environments requiring heavy-duty protection
- Outdoor use in ducts and underground conduits

Standard Compliances

- ETL Listed Type OFCR for Riser
- ETL Listed Type OFCP for Plenum
- CSA FT4 for Riser
- CSA FT6 for Plenum
- TIA 568-C.3
- ICEA S-83-596 for Indoor
- ICEA S-104-696 for Indoor/Outdoor
- GR-409
- RoHS Compliant Directive 2011/65/EU

* Sequential meter markings available upon request



Data subject to change without notice.
For full specifications, visit gcna.us/Catalogs/FiberOpticCable.



Indoor Riser and Plenum

Construction

Fiber

- 2–144 fibers
- 900 µm tight buffer
- Color-coding per TIA/EIA 598B

Overall Strength Member

- Aramid fiber yarn

Inner Jacket

- Flame-retardant compound

Armor

- Interlock aluminum

Outer Jacket

- Flame-retardant compound
- Sequential footage markings
- Orange jacket—multimode fibers (except 10 Gbps)
- Aqua jacket—10 Gbps multimode fibers
- Yellow jacket—singlemode fibers

Construction Options

	Fiber Count	Part Number
Riser Type OFCR, CSA FT4	2-24 fibers	xxxxxy1PNR-ILRA*
	24-144 fibers	xxxxxy1P1R-ILRA*
Plenum Type OFCP, CSA FT6	2-24 fibers	xxxxxy1PNU-ILPA*
	24-144 fibers	xxxxxy1PNU-ILPAS*

* xx denotes fiber type and yyy denotes number of fibers



Indoor/Outdoor Riser and Plenum

Construction

Fiber

- 2–144 fibers
- 900 µm tight buffer
- Color-coding per TIA/EIA 598B

Overall Strength Member

- Water-swellaible aramid fiber yarn

Inner Jacket

- Flame-retardant compound

Armor

- Interlock aluminum

Jacket

- UV-resistant black jacket
- Flame-retardant compound
- Sequential footage markings

Construction Options

	Fiber Count	Part Number
Riser Type OFCR, CSA FT4	2-24 fibers	xxxxxy1ANR-ILRA*
	24-144 fibers	xxxxxy1A1R-ILRA*
Plenum Type OFCP, CSA FT6	2-24 fibers	xxxxxy1ANU-ILPA*
	24-144 fibers	xxxxxy1ANU-ILPAS*

* xx denotes fiber type and yyy denotes number of fibers



PanGen® Fiber System Solutions

NEXTGEN® BRAND FIBER OPTIC CABLE
LOOSE TUBE - INDOOR/OUTDOOR



Features and Benefits

- Dry loose tube for ease of termination
- Excellent chemical-resistant cable for harsh industrial environments

Applications

- Interbuilding and intrabuilding voice or data communication backbones
- Installed in ducts, underground conduits or aerial/lashed
- ETL Listed Type OFNR for installation in vertical riser and general horizontal applications when installed in accordance with NEC Article 770.154 and 770.179
- ETL Listed Type OFNP for installation in plenum airways and horizontal applications when installed in accordance with NEC Article 770.154 and 770.179

Standard Compliances

- ETL Listed Type OFNR for Riser
- ETL Listed Type OFNP for Plenum
- CSA FT4 for Riser
- CSA FT6 for Plenum
- ICEA S-104-696
- RoHS Compliant Directive 2011/65/EU

* Sequential meter markings available upon request



Data subject to change without notice.

For full specifications, visit gcn.us/Catalogs/FiberOpticCable.



Construction

Fiber

- 2-144 fibers
- Dry loose tube with super-absorbent polymer
- Color-coding per TIA/EIA 598B

Central Strength Member

- Epoxy/glass rod

Overall Strength Member

- Aramid fiber yarn

Jacket

- UV-resistant black jacket
- Flame-retardant compound
- Sequential footage markings

Construction Options

	Fiber Count	Part Number
Riser Type OFNR, CSA FT4	2-144 fibers	xyyyy4M1M-DT*
Plenum Type OFNP, CSA FT6	2-96 fibers	xyyyy4M1D-DT*

* xx denotes fiber type and yyy denotes number of fibers

PanGen® Fiber System Solutions

NEXTGEN® BRAND FIBER OPTIC CABLE LOOSE TUBE - OUTSIDE PLANT



Features and Benefits

- Loose tube gel-filled construction for superior fiber protection
- UV- and moisture-resistant design
- Dry Water Block cable core for ease of handling

Dual Jacket

- Added protection of an inner jacket

Single Jacket, Armored

- Rodent-resistant construction

Dual Jacket, Armored

- Added protection of an inner jacket
- Rodent-resistant construction

Applications

- Interbuilding voice or data communication backbones
- Installed in ducts, underground conduits or aerial/lashed

Standard Compliances

- Tested in accordance with EIA/TIA 455 FOTPs
- ICEA S-87-640
- Rural Utilities Service (RUS) 7 CFR 1755.900 (REA PE-90)
- GR-20
- RoHS Compliant Directive 2011/65/EU

* Sequential meter markings available upon request



EIA/TIA 455



Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/FiberOpticCable.



Single Jacket

Construction

Fiber

- 2-288 fibers
- Loose tube gel-filled
- Color-coding per TIA/EIA 598B

Central Strength Member

- Epoxy/glass rod

Jacket

- Black UV- and moisture-resistant polyethylene (PE)
- Sequential footage markings



Dual Jacket

Construction

Fiber

- 2-288 fibers
- Loose tube gel-filled
- Color-coding per TIA/EIA 598B

Central Strength Member

- Epoxy/glass rod

Inner Jacket

- Black UV- and moisture-resistant polyethylene (PE)

Outer Jacket

- Black UV- and moisture-resistant polyethylene (PE)
- Sequential footage markings



Single Jacket, Armored

Construction

Fiber

- 2-288 fibers
- Loose tube gel-filled
- Color-coding per TIA/EIA 598B

Central Strength Member

- Epoxy/glass rod

Armor

- Corrugated coated steel tape

Outer Jacket

- Black UV- and moisture-resistant polyethylene (PE)
- Sequential footage markings



Dual Jacket, Armored

Construction

Fiber

- 2-288 fibers
- Loose tube gel-filled
- Color-coding per TIA/EIA 598B

Central Strength Member

- Epoxy/glass rod

Inner Jacket

- Black UV- and moisture-resistant polyethylene (PE)

Armor

- Corrugated coated steel tape

Outer Jacket

- Black UV- and moisture-resistant polyethylene (PE)
- Sequential footage markings

Construction Options

	Fiber Count	Part Number
Single Jacket	2-288 fibers	xxyyy4M1A-DWB*
Dual Jacket	2-288 fibers	xxyyy4H1A-DWB*
Single Jacket, Armored	2-288 fibers	xxyyy4M1F-DWB*
Dual Jacket, Armored	2-288 fibers	xxyyy4H1F-DWB*

* xx denotes fiber type and yyy denotes number of fibers

Modular Faceplate Patch Panels

- Release snap feature on faceplate allows front access to installed modules

	Part Number	Description
	CPPL24WBLY	24-port, 1 RU patch panel with labels, supplied with six factory-installed CFFPL4-type front removable snap-in faceplates
	CPPL48WBLY	48-port, 2 RU patch panel with labels, supplied with twelve factory-installed CFFPL4-type front removable snap-in faceplates
	CPPLA24WBLY	24-port angled, 1 RU patch panel with labels, supplied with six factory-installed CFFPL4-type front removable snap-in faceplates
	CPPLA48WBLY	48-port angled, 2 RU patch panel with labels, supplied with twelve factory-installed CFFPL4-type front removable snap-in faceplates

Modular Flush Mount Patch Panels

- Rear-mounted faceplates allow modules to be flush with front of patch panel
- Pre-printed numbers above each port for easy identification








	Part Number	Description
	CPP24FMWBLY	24-port, 1 RU, flush mount patch panel supplied with rear-mounted faceplates
	CPP48FMWBLY	48-port, 2 RU, flush mount patch panel supplied with rear-mounted faceplates
	CPPA24FMWBLY	24-port angled, 1 RU, flush mount patch panel supplied with rear-mounted faceplates
	CPPA48FMWBLY	48-port angled, 2 RU, flush mount patch panel supplied with rear-mounted faceplates
	CPP48HDWBLY	48-port high-density, 1 RU, flush mount patch panel supplied with rear-mounted faceplates
	CPPA48HDWBLY	48-port angled, high-density, 1 RU, flush mount patch panel supplied with rear-mounted faceplates







R2P

WMPV45E







Part Number	Description
R2P	19" EIA rack, aluminum, 84.0" H x 20.3" W x 3.0" D (2134 mm x 514 mm x 76 mm), 45 RU
WMPV45E	NetRunner™ front and rear vertical cable manager with dual hinged covers and mounting hardware, 45 RU







Part Number	Description
 WMPSE	PatchLink™ front and rear horizontal cable manager with dual hinged cover, 1 RU
 WMP1E	PatchLink front and rear horizontal cable manager with dual hinged cover, 2 RU
 CMPH1	OpenAccess™ front and rear horizontal cable manager with optional snap-on cover, 1 RU
 CMPH2	OpenAccess front and rear horizontal cable manager with optional snap-on cover, 2 RU
 CMPHF1	OpenAccess front-only horizontal cable manager with optional snap-on cover, 1 RU
 SRM19FM1	Rack mount shelf, 30 lb. capacity, 1 RU
 SRM19FM2	Rack mount shelf, 50 lb. capacity, 2 RU

Part Number	Description
 SRBM19BLY	Strain relief bar with six Tak-Ty® Hook & Loop Cable Ties; supports, manages and provides proper bend radius protection for up to 72 cables
 SRBCT	Strain relief bar includes 24 cable ties to secure cable to each individual slot for additional stability; supports, manages and provides proper bend radius protection
 SRB19BLY	Strain relief bar extends 2" off the rack; supports, manages and provides proper bend radius protection
 SRB19MDBL	Strain relief multi-depth bar extends 7" off the rack; supports, manages and provides proper bend radius protection. Ideal for use with Category 6A copper cabling installations

Classic Series Faceplates

- Accept all Mini-Com Modules for STP, UTP, fiber optic and audio/video, which snap in and out for easy moves, adds and changes
- Optional labeling for easy port identification
- Available with or without labeling features and in flush mount or sloped configurations
- Available in a variety of port densities and colors






Part Number	Description
 CFP1IW+	Single gang, vertical faceplate. Accepts one Mini-Com Module
 CFP2IW	Single gang, vertical faceplate. Accepts two Mini-Com Modules
 CFP4IW	Single gang, vertical faceplate. Accepts four Mini-Com Modules
 CFPH2IW	Single gang, horizontal faceplate. Accepts two Mini-Com Modules
 CFPH4IW	Single gang, horizontal faceplate. Accepts four Mini-Com Modules
 CFPL2IWY	Single gang, vertical faceplate with two labels and label covers. Accepts two Mini-Com Modules
 CFPL3IWY	Single gang, vertical faceplate with two labels and label covers. Accepts three Mini-Com Modules

Part Number	Description
 CFPL4IWY	Single gang, vertical faceplate with two labels and label covers. Accepts four Mini-Com Modules
 CFPL6IWY	Single gang, vertical faceplate with two labels and label covers. Accepts six Mini-Com Modules
 CFPSL2IWY	Single gang, sloped, vertical faceplate with two labels and label covers. Accepts two Mini-Com Modules
 CFPSL4IWY	Single gang, sloped, vertical faceplate with two labels and label covers. Accepts four Mini-Com Modules
 CFPSL6IWY	Single gang, sloped, vertical faceplate with two labels and label covers. Accepts six Mini-Com Modules
 CFPHSL4IW	Single gang, sloped, horizontal faceplate with one label and one label cover. Accepts four Mini-Com Modules

* For other colors, replace suffix IW (Off White) with EI (Electric Ivory), WH (White), or IG (International Grey). All faceplates supplied with mounting screws.

Executive Series Faceplates

- Accept Mini-Com Modules for STP, UTP, fiber optic and audio/video, which snap in and out for easy moves, adds and changes
- Available with labeling features
- Raised rail design for aesthetic appeal

Part Number	Description
 CFPE11WY+	Single gang, vertical faceplate. Accepts one Mini-Com Module
 CFPE21WY	Single gang, vertical faceplate. Accepts two Mini-Com Modules
 CFPE41WY	Single gang, vertical faceplate. Accepts four Mini-Com Modules
 CFPE61WY	Single gang, vertical faceplate. Accepts six Mini-Com Modules
 CFPE10IW-26Y	Double gang, vertical faceplate. Accepts ten Mini-Com Modules

* For other colors, replace suffix IW (Off White) with EI (Electric Ivory), WH (White), or IG (International Grey). All faceplates supplied with mounting screws.





Panduit® Accessories for PanGen® Systems

MINI-COM® FACEPLATE FRAMES & MODULE INSERTS












Classic and Executive Faceplate Frames

- Inserts and faceplate frames enable design flexibility
- Accept all Mini-Com Modules

Part Number	Description
Classic Series Faceplate Frames	
 CBIW	Single gang faceplate frame accepts two ½ size modular inserts or three 1/3 size modular inserts
 CBIW-2G	Double gang faceplate frame accepts four ½ size modular inserts or six 1/3 size modular inserts
Executive Series Faceplate Frames	
 CBEIWY*	Single gang faceplate frame accepts two ½ size modular inserts or three 1/3 size modular inserts. Supplied with labels and label cover/screw covers
 CBEIW-2GY	Double gang faceplate frame accepts four ½ size modular inserts or six 1/3 size modular inserts. Supplied with labels and label cover/screw covers





* For other colors, replace suffix IW (Off White) with EI (Electric Ivory), WH (White), BL (Black), or IG (International Grey).

- Allow custom installation
- Optional label for easy port identification

Part Number	Description
Modular Inserts	
 CHS2IW-X	Two module, ½ size, sloped insert accepts two Mini-Com modules
 CHS2SIW-X	Two module, ½ size, sloped shuttered insert accepts two Mini-Com modules. Shutters are spring-loaded and rotate out of the way for cable connections. Not suitable for use with any audio/video or fiber connector module that protrudes beyond the face of the insert
 CHF2IW-X	Two module, ½ size, flat insert accepts two Mini-Com Modules
 CHSRE2IW-X	Two module, ½ size, 30° sloped recessed insert accepts two Mini-Com Modules
 CHS1SIW-X	One module, ½ size, sloped shuttered insert accepts one Mini-Com Module. Not suitable for use with any audio/video or fiber connector that protrudes beyond the face of the insert
 CHB2IW-X	½ blank insert. Reserves space for future upgrades
 CHF2MIW-X	Two module, 1/3 size, flat insert accepts two Mini-Com Modules
 CHB2MIW-X	1/3 blank insert. Reserves space for future upgrades
 CHLS2SIW-X	Sloped module insert with protective shutters and label/label cover; accepts up to two Mini-Com Modules and accommodates up to ½ of a single gang bezel. Shutters are spring-loaded and rotate out of the way for cable connections. Depth to rear modules: 16.5 mm. Not suitable for use with any audio/video or fiber connector module that protrudes beyond the face of the insert



GFCI Decora Module Frames

- Mount behind any standard GFCI electrical faceplate
- Optional adhesive labels

Part Number	Description
 CFG1IW⁺	Module frame accepts one Mini-Com Module
 CFG2IW	Module frame accepts two Mini-Com Modules
 CFG4IW	Module frame accepts four Mini-Com Modules
 CFG6IW	Module frame accepts six Mini-Com Modules


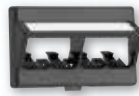








106 Duplex Module Frames

- Mount behind standard 106 NEMA faceplates

Part Number	Description
 CF1062IWY	Module frame accepts two Mini-Com Modules
 CF1064IWY	Module frame accepts four Mini-Com Modules

⁺ For other colors, replace suffix IW (Off White) with EI (Electric Ivory), WH (White), BL (Black), or IG (International Grey). All frames supplied with mounting screws.

Snap-On Modular Furniture Faceplates

Part Number	Description	Part Number	Description
 CFFPL4BL	Four module space modular furniture snap-on faceplate with labels	 CFFPLA4BL	Four module space angled, modular furniture snap-on faceplate with labels
 CFFP4BL	Four module space modular furniture snap-on faceplate	 CFFPHM4BL	Four module space Herman Miller Furniture snap-on faceplate. Compatible with Herman Miller lines such as Action Office Series 2 and 3 and Ethospace Baseline
 MFFPEBL	Snap-on modular furniture faceplate extender for use when depth inside modular furniture base is limited. Extends plate approximately 1/2". Accepts CFFPL4 and CFFP4 faceplates	 CFFPEBSL4BL	Four module space angled Herman Miller Ethospace Beltline Furniture snap-on faceplate with labels
 CFFPA2BL	Two module space angled, modular furniture snap-on faceplate	 CFFPKE3BL	Three module space Knoll Equity Furniture snap-on faceplate
 CFFPE3BL	Three module space extended furniture snap-on faceplate. Compatible with Knoll Morrison furniture, as well as industry standard knockouts	 C4PPLK	Replacement label/label cover kit for Mini-Com Modular Furniture Faceplates with Labels. Each kit contains six labels and six clear label covers per bag



Panduit® Accessories for PanGen® Systems

MINI-COM® PHONE PLATE WITH MODULE & SURFACE MOUNT BOXES







Phone Plate with Module

- Stainless steel construction
- Includes mounting studs which are positioned to mount standard wall mount telephones with keystone adaptation flush to wall surface

Part Number	Description
	KWP5EY Stainless steel phone plate with Giga-TX™ style Category 5e keystone jack module
	KWP6PY Stainless steel phone plate with Giga-TX style Category 6 keystone jack module













Surface Mount Boxes

- Accept Mini-Com Modules for STP, UTP, fiber optic and audio/video, which snap in and out for easy moves, adds and changes
- Mount easily with supplied mounting screws, adhesive tape or optional magnet (CBM-X)
- Cable entry from side and rear knockouts and from opening in center of base
- Optional adhesive labels available

Part Number	Description
	CBX1IW-A** Surface mount box accepts one Mini-Com Module
	CBX2IW-AY Surface mount box accepts one or two Mini-Com Modules; includes built-in removable blank to add second module
	CBX4IW-AY Surface mount box accepts four Mini-Com Modules. Provides slots for cable ties for strain relief. Supplied with label holder/screw cover
	CBM-X Optional magnet for mounting on metal surfaces



* For surface mount box standard colors other than IW (Off White), replace suffix with EI (Electric Ivory), IG (International Grey), or WH (White).
 * CBX1** -A does not include magnet pocket.

Modules

Part Number	Description
F-Type Modules	
 CMFIW	Module supplied with 75 ohm industry standard F-type coupler; accepts RG-6 and RG-59 coaxial cable
 CMFSRIW	Module supplied with 75 ohm self-terminating F-type coupler; accepts RG-6 and RG-59 coaxial cable
BNC Coax Coupler Modules	
 CMBA75IWY	Module supplied with 75 ohm industry standard BNC coupler
 CMBAIWY	Module supplied with 50 ohm industry standard BNC coupler
RCA Pass-Through Modules	
 CMRPRIW	Module supplied with one RCA pass-through coupler with red insert
 CMRPIWY	Module supplied with one RCA pass-through coupler with yellow insert
 CMRPWIW	Module supplied with one RCA pass-through coupler with white insert
 CMRPBIW	Module supplied with one RCA pass-through coupler with blue insert
 CMRPGIW	Module supplied with one RCA pass-through coupler with green insert
RCA 110 Punchdown Modules	
 CJRYIW	Module supplied with one RCA connector with yellow insert
 CJRWIW	Module supplied with one RCA connector with red insert
 CJRWIW	Module supplied with one RCA connector with white insert



RCA 1/3 Inserts

- Compatible with classic and executive faceplate frames

Part Number	Description
 CHR3RGBIW	1/3 insert with three RCA pass-through couplers. RCA insert colors are red, green and blue. R, G, B component video
 CHR3WYRIW	1/3 insert with three RCA pass-through couplers. RCA insert colors are white, yellow and red. W, Y, R composite video


3.5 mm Stereo Connector and Coupler Modules

- Accept male plug found on typical stereo headsets
- Solder-type connector accepts 22 AWG stereo wire or smaller
- Insulation resistance exceeds 100 milli-ohms at DC 500 V
- Rated for DC 12 V, 1A


Part Number	Description
 CM35MSCIWY	3.5 mm stereo coupler module
 CM35MSSIW	Module supplied with one 3.5 mm (1/8") stereo headset solder-type connector

15-Pin High-Density D-Subminiature Module



- Field terminable module features 15-pin screw terminal
- SVGA capable

Part Number	Description
 CMD15HDIWY	2-position module supplied with one 15-pin DB connector mounted to a printed circuit board; terminates on site

Module Base for D-Subminiature Connectors



Part Number	Description
Outer Jacket	
 CMDBIW-X	2-position module base which accepts 9-pin and 15-pin high-density D-subminiature connectors

D-Subminiature Inserts

Part Number	Description
 CHD15HDCIYW	1/3 insert with 15-pin high-density female-to-female coupler; SVGA capable
 CHD15HDSICIYW	1/3 insert with one 15-pin DB connector mounted to a printed circuit board; terminates on site; SVGA capable


5-Way Binding Post Modules

- Accept a variety of termination ends, including bare speaker wire (10-12 AWG) and banana plugs

Part Number	Description
 CMBPBIWY	Module supplied with one 5-way binding post with black stripe
 CMBPRIWY	Module supplied with one 5-way binding post with red stripe


HDMI Coupler

- Supports Category 1 and Category 2 HDMI cable
- Backwards compatible


Part Number	Description
 CMHDMIW	HDMI 1.4 Type A female-to-female Category 2 coupler module

USB Coupler

- Accepts USB 2.0 patch cords and is backwards compatible with USB 1.1 patch cords
- Supports cable lengths up to 15 feet between devices



Part Number	Description
 CMUSBAAIW	USB 2.0 female A-to-female A coupler module

Blank Module

Part Number	Description
 CMBIW-X	1-position, reserves space for future use

General Cable offers a complete line of Gepeco® Brand Commercial A/V Cabling Solutions to support Panduit's A/V products. Go to www.gepeco.com or ask your PanGen® representative for more details.

Thermal Transfer Desktop Printer and Accessories

Part Number	Description
 TDP43ME	300 dpi printer; includes printer, Panduit® Easy-Mark™ Labeling Software, RMEH4BL hybrid black ribbon, AC power adapter with US power cord, USB cable, user manual, quick start card and driver disk
 S100X150VA1Y	Self-laminating, white vinyl label for use with thermal transfer desktop printer

For complete identification offering, reference the Panduit Physical Infrastructure Systems Catalog (SA-NCCB51) or visit www.panduit.com.

PanTher™ LS8EQ/LS8E Hand-Held Thermal Transfer Printers and Accessories

- Variety of labeling systems and labels to enable quick and easy network identification

Part Number	Description
 LS8EQ-KIT-ACS	Includes LS8EQ printer with QWERTY keypad, one cassette of S100X150VAC self-laminating labels, six AA alkaline batteries, LS8E-ACS, LS8-CASE, LS8-PCKIT, LS8-IB, LS8-WS, quick reference card and operator's manual
 LS8EQ-KIT	Includes LS8EQ printer with QWERTY keypad, one cassette of S100X150VAC self-laminating labels, six AA alkaline batteries, LS8-CASE, LS8-PCKIT, LS8-IB, LS8-WS, quick reference card and operator's manual
 LS8EQ	Includes LS8EQ printer with QWERTY keypad, one cassette of S100X150VAC self-laminating labels, six AA alkaline batteries and quick reference card
 LS8E	LS8E printer, one cassette of self-laminating labels, six AA alkaline batteries and quick reference card
 LS8E-KIT	LS8E printer, one cassette of self-laminating labels, six AA alkaline batteries, rigid carrying case, LS8-PCKIT, LS8-IB, operator's manual and quick reference card
 S100X150VAC	Self-laminating, white vinyl label for use with LS8E printer

Cable Prep Tools

	Part Number	Description
	CWST	Copper conductor snipping tool
	CJAST	Cable jacket stripping tool
	CJASTB	Replacement blade for cable stripping tool

Module Termination Tools and Accessories

	Part Number	Description
	TGJT	TG termination tool easily terminates all TG-style jack modules by cutting conductors flush and assembling wire cap and jack. Ideal for high-volume installations
	EGJT	Terminates enhanced Giga-TX™ TG-style jack modules
	AVPDB	Audio/video punchdown base used to assist in terminating Mini-Com S-Video and RCA punchdown modules
	MDC-C	Jack module dust cap. Compatible with all RJ45 Mini-Com jack modules

Pan-Punch® Termination Tool

	Part Number	Description
	PDT110	Single pair punchdown tool and blade terminates and cuts UTP cable in one operation. Ideal for use with Pan-Punch® Punchdown System
	PDTH110	Replacement blade for single pair punchdown tool (PDT110)

NetKey® Jack Module Termination Tools

	Part Number	Description
	JR-PAN-2* Fluke**	JackRapid Termination Tool for Category 6 and Category 5e NetKey® Punchdown Modules
	CJT-X	Termination tool for Category 5e NetKey® Leadframe Jack Modules

* Fluke JackRapid Termination Tool available through distribution. Contact Fluke customer service at 800-283-5853 to locate a local distributor.
 ** Fluke is a registered trademark of Fluke Corporation.

Punchdown Base

	Part Number	Description
	NKSPB	Base used to assist in terminating punchdown modules

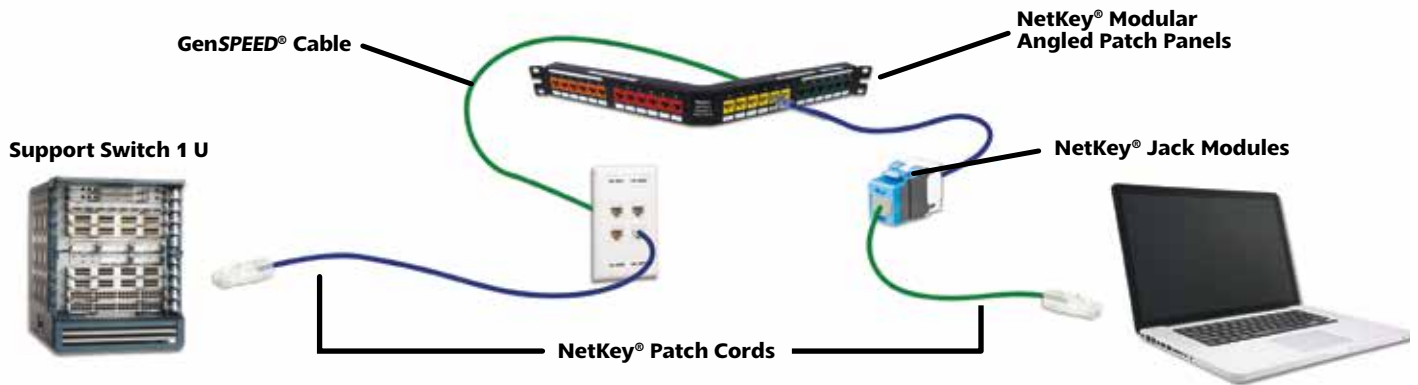


NetGen[®] Solutions deliver a cost-effective, high-quality alternative for a flexible, reliable network. Available in Category 6A, 6 and 5e, NetGen products support applications requiring up to 10G bandwidth. All NetGen products are designed to stringent requirements, offering robust solutions for a wide variety of applications, all with the assurance and backing of two world-class manufacturers, Panduit and General Cable, guaranteed!

NetGen high-quality cabling and connectivity solutions feature an industry-compatible keystone footprint and provide the flexibility to integrate with specialty applications such as audio/video systems, office furniture with integrated connectivity, designer faceplates and brownfield retrofits. The NetGen solution is ideal for the classroom, conference room, office building or doctor's office.

	NetGen [®] System	Description	Connector	Patch Cord	Patch Panel	Cable
Cat 6A	NetGen [®] 6A	Category 6A system	NetKey [®] Category 6A UTP Jack Modules	NetKey Category 6A UTP Copper Patch Cords	NetKey Category 6A Punchdown Patch Panels and NetKey Modular Patch Panels	GenSPEED [®] 10,000 Category 6A Cable
Cat 6	NetGen 6	Category 6 system	NetKey Category 6 UTP Jack Modules	NetKey Category 6 UTP Copper Patch Cords	NetKey Category 6 Punchdown Patch Panels and NetKey Modular Patch Panels	GenSPEED 6 Category 6 Cable
Cat 5e	NetGen 5e Enhanced	Enhanced Category 5e system	NetKey Category 5e UTP Jack Modules	NetKey Category 5e UTP Copper Patch Cords	NetKey Category 5e Punchdown Patch Panels and NetKey Modular Patch Panels	GenSPEED 5350 Enhanced Category 5e Cable
Cat 5e	NetGen 5e	Mid-level Category 5e system	NetKey Category 5e UTP Jack Modules	NetKey Category 5e UTP Copper Patch Cords	NetKey Category 5e Punchdown Patch Panels and NetKey Modular Patch Panels	GenSPEED 5000 Category 5e Cable

Example of a NetGen System



Different configurations available. Discuss with your NetGen sales representative.

Key Features and Benefits of NetGen Category 6A Solutions:

- Designed to meet ANSI/TIA-568-C.2 channel requirements
- Installations covered by a comprehensive warranty program that provides performance to the latest industry standards
- A single point of contact for all NetGen inquiries
- Quick installation of NetGen systems is provided through an extensive network of specially trained and certified installers

NetGen Category 6A Solutions Deliver:



- Channel-compliant performance on all electrical parameters to provide a system that meets all applicable TIA standards. This performance is achieved through the robust cable design of GenSPEED® 10,000 paired with the NetKey jack module, patch cord and modular patch panels
- Category 6A channel designed to meet the bandwidth requirements set by ANSI/TIA-568-C.2 Category 6A standards
- TRU-Mark® footage marking system to help eliminate unused lengths of cable and save installation time
- Jack modules are terminated with industry-standard 110 punchdown tool that reduces installation cost
- Patch cords feature slender strain relief boots for easy access to high-density environments and patented tangle-free latch which prevents snags and provides easy release for simple moves, adds and changes
- Modular patch panels available in both metal and molded versions

NetGen® 6A Solution: Guaranteed to ANSI/TIA Category 6A Standard

Frequency (MHz)	ANSI/TIA Cat 6A Insertion Loss (dB)	ANSI/TIA Cat 6A PSNEXT (dB)	ANSI/TIA Cat 6A PSACR (dB)	ANSI/TIA Cat 6A PSACRF (dB)	ANSI/TIA Cat 6A Return Loss (dB)	ANSI/TIA Cat 6A PSANEXT (dB)	ANSI/TIA Cat 6A PSAACR-F (dB)
1	2.3	62.0	59.7	60.3	19.0	67.0	67.0
4	4.2	60.5	56.4	48.2	19.0	67.0	65.0
8	5.8	55.6	49.8	42.2	19.0	67.0	58.9
10	6.5	54.0	47.5	40.3	19.0	67.0	57.0
16	8.2	50.6	42.4	36.2	18.0	67.0	52.9
20	9.2	49.0	39.8	34.2	17.5	67.0	51.0
25	10.2	47.3	37.1	32.3	17.0	66.0	49.0
31.25	11.5	45.7	34.2	30.4	16.5	65.1	47.1
62.5	16.4	40.6	24.2	24.3	14.0	62.0	41.1
100	20.9	37.1	16.2	20.3	12.0	60.0	37.0
200	30.1	31.9	1.8	14.2	9.0	55.5	31.0
250	33.9	30.2	-	12.3	8.0	54.0	29.0
300	37.4	28.8	-	10.7	7.2	52.8	27.5
400	43.7	25.8	-	8.2	6.0	51.0	25.0
500	49.3	23.2	-	6.3	6.0	49.5	23.0

NetKey® Category 6A UTP Jack Modules


- Meet all industry performance standards for Category 6A
- Punchdown jack modules are 100% performance-tested and individually serialized for future traceability
- Snap in and out of keystone openings for easy moves, adds and changes
- Universal label includes T568A and T568B wiring schemes

Part Number	Description
 NK6X88MIW*	Category 6A, 8-position, 8-wire, keystone punchdown jack module
 NK6X88MIW-Q	Convenience pack of 25, Category 6A, 8-position, 8-wire, keystone punchdown jack modules

* For standard colors, replace color suffix IW (Off White) with EI (Electric Ivory), IG (International Grey), WH (White), BL (Black), BU (Blue), RD (Red), YL (Yellow), GR (Green), OR (Orange) or VL (Violet).

NetKey® Category 6A Copper UTP Patch Cords

- Meet all industry performance standards for Category 6A
- 100% performance-tested
- Available in a variety of colors and lengths for design flexibility


Part Number	Description
 NK6APC**	Category 6A F/UTP patch cord with UTP modular plugs on each end

[^] Available in 3, 5, 7, 10, 14, 20, 25, 30, 40, 50 foot lengths

* For standard colors other than Off White, add suffix BU (Blue), RD (Red), YL (Yellow), GR (Green), BL (Black), or GY (Gray). For example, the part number of a blue Category 6A, 3-foot patch cord is NK6APC3BU.

NetKey® Category 6A Punchdown Patch Panels

- Mount to standard EIA 19" racks
- Punchdown patch panels meet all industry performance standards for Category 6A
- Modular patch panels accept all NetKey® modules
- Molded patch panels made of strong polymer material, with port numbering front and back
- Optional angled versions available for high-density installations
- Strain relief bars assist in cable management and bend radius control
- Filler panels reserve space for future use and direct airflow

Part Number*	Description
NK6XPPG24Y	Category 6A punchdown patch panel, 24-port, 1 RU
NK6XPPG48Y	Category 6A punchdown patch panel, 48-port, 2 RU
 NKA6XPPG24Y	Category 6A angled punchdown patch panel, 24-port, 1 RU
NKA6XPPG48Y	Category 6A angled punchdown patch panel, 48-port, 2 RU
NK6XPP24P	Category 6A molded, flat punchdown patch panel, 24-port, 1 RU
NK6XPP48P	Category 6A molded, flat punchdown patch panel, 48-port, 2 RU

*Punchdown patch panels are color-coded for T568A and T568B wiring schemes. For modular keystone patch panels, see page 58.

Features And Benefits

- Extensive design development conducted to find the perfect blend of product performance and consistent manufacturability
- Innovative T-Top cross-web provides superior internal electrical characteristics by locking the pairs into a systematic orientation within the cable
- Superior flame and smoke characteristics achieved through innovative design and careful selection of materials with certified suppliers
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- AirEs jacket provides superior flexibility and maximum separation of pairs from cable to cable for consistent PSANEXT and PSAACRF performance
- Made in U.S.A.

Applications

- IEEE 802.3: 10G BASE-T, 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- Digital Video
- Broadband and Baseband Analog Video
- CDDI, Token Ring, ATM

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ISO/IEC 11801 Ed. 2.0 (Class E_A)



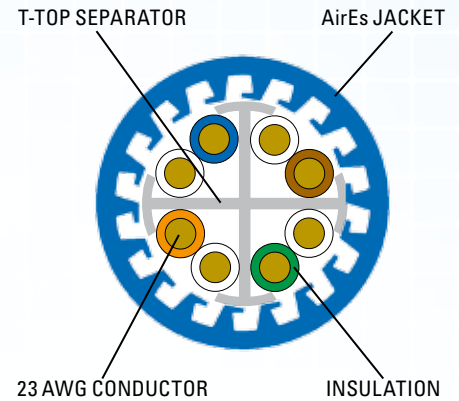
Data subject to change without notice.
For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

- Conductors**
- 23 AWG solid bare annealed copper
- Insulation**
- Non-Plenum: Polyolefin
 - Plenum: Fluoropolymer
- Color Code**
- Pair 1: Blue-White
 - Pair 2: Orange-White
 - Pair 3: Green-White
 - Pair 4: Brown-White
- Separator**
- T-Top cross-web
- Jacket**
- Non-Plenum: Flame-Retardant PVC
 - Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.330	0.320
Nominal Cable Weight (lbs/1000 ft)	42	45
Minimum Bend Radius (in)	1.5	1.5
Maximum Pulling Force (lbs)	40	40
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +75

Part Numbers

		Spool (Standard packaging: 1000')	
Jacket Color		CMR (Non-Plenum)	CMP (Plenum)
Blue		7133819	7131819
White		7133820	7131820

See all colors and options for this product on page 66. Non-stock items may be subject to minimum order quantities.

Key Features and Benefits of NetGen Category 6 Solutions:

- Designed to meet ANSI/TIA-568-C.2 channel requirements
- Installations covered by a comprehensive warranty program that provides performance to the latest industry standards
- A single point of contact for all NetGen inquiries
- All connectivity components are 100% performance-tested
- Quick installation of NetGen systems is provided through an extensive network of specially trained and certified installers

To be eligible for the NetGen® System Warranty, the system must be installed by a Panduit ONE Partner certified in Enterprise Structured Cabling Deploy Competency. The NetGen System Warranty is subject to various terms, conditions and limitations. Please contact the NetGen System Warranty program manager at warranty@panduit.com for details.

NetGen Category 6 Solutions Deliver:

- Optimal performance on all electrical parameters to provide a system that meets all applicable TIA standards. This performance is achieved through the robust cable design of GenSPEED® 6 paired with the NetKey® jack module, patch cord and punchdown or modular patch panels
- Category 6 channel designed to meet the bandwidth requirements set by ANSI/TIA-568-C.2 Category 6 standards
- TRU-Mark® footage marking system to help eliminate unused lengths of cable and save installation time
- Jack modules are terminated with industry-standard 110 punchdown tool that reduces installation cost
- Patch cords include slender strain relief boots for easy access to high-density environments and patented tangle-free latch which prevents snags and provides easy release for simple moves, adds and changes
- Modular and punchdown patch panels, available in both metal and molded versions



NetGen® 6 Solution: Guaranteed Channel Headroom

Electrical Value	NetKey®*
Insertion Loss	3%
NEXT	3.0 dB
PSNEXT	3.0 dB
Return Loss	2.0 dB
ACR-N	3.0 dB
PSACR-N	4.0 dB
ACR-F	4.0 dB
PSACR-F	6.0 dB

*Electrical values are above specified standards and consist of worst pair margin per ANSI/TIA-568-C.2 Category 6 and ISO 11801 Class E standards.

NetKey® Category 6 UTP Jack Modules

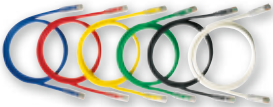
- Meet all industry performance standards for Category 6
- Punchdown jack modules are 100% performance-tested and individually serialized for future traceability
- Snap in and out of keystone openings for easy moves, adds and changes
- Universal label includes T568A and T568B wiring schemes

Part Number*	Description
 NK688MIW	Category 6, 8-position, 8-wire, keystone punchdown jack module
 NK688MIW-Q	Convenience pack of 25, Category 6, 8-position, 8-wire, keystone punchdown jack modules

* For standard colors, replace color suffix with IW (Off White), EI (Electric Ivory), IG (International Grey), WH (White), BL (Black), BU (Blue), RD (Red), YL (Yellow), GR (Green), OR (Orange) or VL (Violet). To order convenience package of 25 jack modules, add -Q to end of part number.

NetKey® Category 6 Copper UTP Patch Cords

- Meet all industry performance standards for Category 6
- 100% performance-tested
- Available in a variety of colors and lengths for design flexibility




Part Number	Description
 NK6PC^*Y	Category 6 UTP patch cord with modular plugs on each end

^ Available in 3, 5, 7, 10, 14, 20, 25, 30, 40, 50 foot lengths

* For standard colors other than Off White, add suffix BU (Blue), RD (Red), YL (Yellow), GR (Green), BL (Black), or GY (Gray). For example, the part number of a blue Category 6A, 3-foot patch cord is NK6APC3BU.

NetKey® Category 6 Punchdown Patch Panels*

- Mount to standard EIA 19" racks
- Punchdown patch panels meet all industry performance standards for Category 6
- Modular patch panels accept all NetKey® modules
- Molded patch panels made of strong polymer material, with port numbering front and back
- Optional angled versions available for high-density installations
- Strain relief bars assist in cable management and bend radius control
- Filler panels reserve space for future use and direct airflow

Part Number	Description
 NK6PPG12WY	Category 6, 12-port punchdown patch panel Mounts to wall with standard 89D bracket (WB89D)
 NK6PP24P	Category 6, 24-port molded punchdown patch panel, 1 RU
 NK6PP48P	Category 6, 48-port molded punchdown patch panel, 2 RU

*Punchdown patch panels are color-coded for T568A and T568B wiring schemes. For modular keystone patch panels, see page 58.

Features and Benefits

- Unique separator design engineered for consistent electrical performance
- Performance guaranteed to 350 MHz
- Improved cable temperature rating (90°C Plenum, 75°C Riser) for greater protection against increased operating temperatures
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Third-party verified for guaranteed performance
- Made in U.S.A.

Applications

- IEEE 802.3: 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- CDDI, Token Ring, ATM
- Digital Video
- Broadband and Baseband Analog Video

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL Listed CMP-LP (0.5A) for Plenum*
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ICEA S-102-700
- ISO/IEC 11801 Ed. 2.0 (Class E)



*0.5A is the ampacity rating of the cable, which equates to 100 watts using 50 volts over four pairs.

Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 23 AWG solid bare annealed copper

Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

Color Code

- Pair 1: Blue-White/Blue
- Pair 2: Orange-White/Orange
- Pair 3: Green-White/Green
- Pair 4: Brown-White/Brown

Separator

- Divider

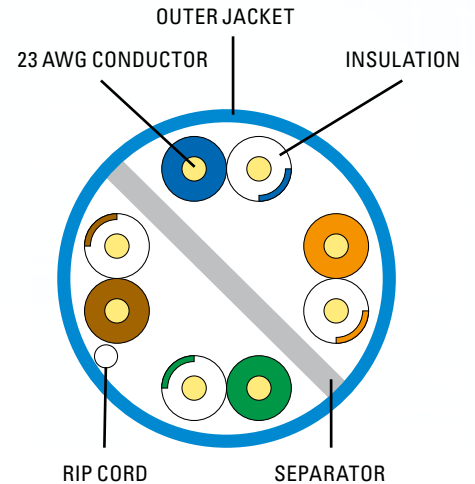
Rip Cord

- Applied longitudinally under jacket

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.220	0.205
Nominal Cable Weight (lbs/1000 ft)	24	25
Minimum Bend Radius (in)	1.0	1.0
Maximum Pulling Force (lbs)	32	32
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +90

Part Numbers Standard packaging: 1000' Pull-Pac® II

Jacket Color	Pull-Pac® II		Spool-Pac®		Spool	
	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)
Blue	7133800	7131800	7133840	7131840	7133860	7131860
White	7133801	7131801	7133841	7131841	7133861	7131861

Bulk reels are available as a special request with a maximum allowable length of 3000 feet per reel.

Minimum run and lead time may apply.

See all colors and options for this product on page 67. Non-stock items may be subject to minimum order quantities.

NetGen® Category 6 System Solutions

GenSPEED® 6 CATEGORY 6 CABLE (22 AWG)



Features and Benefits

- Large-gauge conductors for reduced heat generation, higher maximum current-carrying capabilities and improved attenuation performance
- Improved cable temperature rating (90°C) for greater protection against increased operating temperatures and for high-wattage applications
- Unique separator design engineered for consistent electrical performance
- Performance guaranteed to 350 MHz
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Third-party verified for guaranteed performance
- Made in U.S.A.

Applications

- IEEE 802.3: 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- ANSI/TIA 854: 1000 BASE-TX
- CDDI, Token Ring, ATM
- Digital Video
- Broadband and Baseband Analog Video
- Supports the growth of higher-wattage devices (IT/IP, IoT, and IoE)
- Compatible with new higher-speed, higher-power USB 3.1 SuperSpeed

Standard Compliances

- ANSI/TIA-568-C.2
- TIA TSB-184:2009
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL Listed CMP-LP (0.6A)*
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ICEA S-102-700
- ISO/IEC 11801 Ed. 2.0 (Class E)



*0.6A is the ampacity rating of the cable, which equates to 120 watts using 50 volts over four pairs.

Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 22 AWG solid bare annealed copper

Insulation

- Fluoropolymer

Color Code

- Pair 1: Blue-White/Blue
- Pair 2: Orange-White/Orange
- Pair 3: Green-White/Green
- Pair 4: Brown-White/Brown

Separator

- Divider

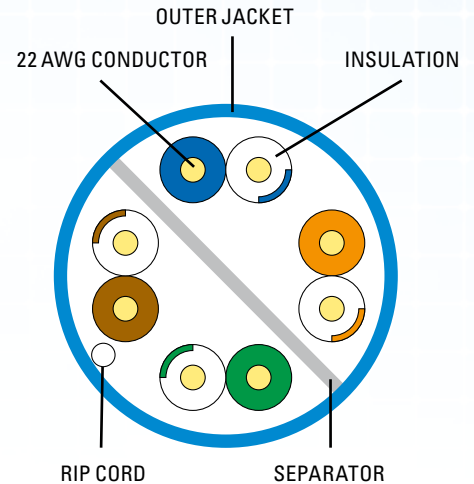
Rip Cord

- Applied longitudinally under jacket

Jacket

- Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMP (Plenum)
Nominal Cable Diameter (in)	0.220
Nominal Cable Weight (lbs/1000 ft)	29
Minimum Bend Radius (in)	1.0
Maximum Pulling Force (lbs)	32
Temperature Rating (°C)	
Installation:	0 to +60
Operation:	-20 to +90

Part Numbers

Pull-Pac® II (Standard packaging: 1000')

Jacket Color	CMP (Plenum)
Blue	8131800
White	8131801

Bulk reels are available as a special request with a maximum allowable length of 3000 feet per reel. Minimum run and lead time may apply.

See all colors and options for this product on page 67. Non-stock items may be subject to minimum order quantities.



Key Features and Benefits of NetGen Category 5e Solutions:

- Designed to meet ANSI/TIA-568-C.2 channel requirements
- Installations covered by a comprehensive warranty program that provides performance to the latest industry standards
- A single point of contact for all NetGen inquiries
- All connectivity components are 100% performance-tested
- Quick installation of NetGen systems is provided through an extensive network of specially trained and certified installers

To be eligible for the NetGen® System Warranty, the system must be installed by a Panduit ONE Partner certified in Enterprise Structured Cabling Deploy Competency. The NetGen System Warranty is subject to various terms, conditions and limitations. Please contact the NetGen System Warranty program manager at warranty@panduit.com for details.

NetGen Category 5e Solutions Deliver:





- Compliant performance on all electrical parameters to provide a system that meets all applicable TIA standards. This performance is achieved by pairing Gen*SPEED*® 5000 or 5350 with NetKey® jack modules, patch cords and punchdown or modular patch panels
- Category 5e channel designed to meet the bandwidth requirements set by ANSI/TIA-568-C.2 Category 5e standards
- TRU-Mark® footage marking system to help eliminate unused lengths of cable and save installation time
- Jack modules are terminated with industry-standard 110 punchdown tool that reduces installation cost
- Patch cords include slender strain relief boots for easy access to high-density environments and patented tangle-free latch which prevents snags and provides easy release for simple moves, adds and changes
- Modular and punchdown patch panels, available in both metal and molded versions

NetGen® 5e Solution: Guaranteed to ANSI/TIA Category 5e Standard

Frequency (MHz)	ANSI/TIA Cat 5e Insertion Loss (dB)	ANSI/TIA Cat 5e PSNEXT (dB)	ANSI/TIA Cat 5e PSACR (dB)	ANSI/TIA Cat 5e PSELFEXT (dB)	ANSI/TIA Cat 5e ReturnLoss (dB)
1	2.2	57.0	54.8	54.4	17.0
4	4.5	50.5	46.0	42.4	17.0
10	7.1	44.0	36.9	34.4	17.0
16	9.1	40.6	31.5	30.3	17.0
20	10.2	39.0	28.8	28.4	17.0
31.25	12.9	35.7	22.8	24.5	15.1
62.5	18.6	30.6	12.0	18.5	12.1
100	24.0	27.1	3.1	14.4	10.0

NetKey® Category 5e UTP Jack Modules


- Meet all industry performance standards for Category 5e
- Punchdown and leadframe jack modules are 100% performance-tested and individually serialized for future traceability
- Snap in and out of keystone openings for easy moves, adds and changes
- Universal label includes T568A and T568B wiring schemes

Part Number*	Description
 NKP5E88MIW	Category 5e, 8-position, 8-wire, keystone punchdown jack module
 NKP5E88MIW-Q	Convenience pack of 25, Category 5e, 8-position, 8-wire, keystone punchdown jack modules
 NK5E88MIWY	Category 5e, 8-position, 8-wire, keystone leadframe jack module
 NK5E88MIW-Q	Convenience pack of 25, Category 5e, 8-position, 8-wire, keystone leadframe jack modules

*For standard colors, replace color suffix with IW (Off White), EI (Electric Ivory), IG (International Gray), WH (White), BL (Black), BU (Blue), RD (Red), YL (Yellow), GR (Green), OR (Orange) or VL (Violet). To order convenience package of 25 jack modules, add -Q to end of part number.

NetKey® Category 5e Copper UTP Patch Cords

- Meet all industry performance standards for Category 5e
- 100% performance-tested
- Available in a variety of colors and lengths for design flexibility




Part Number	Description
 NK5EPC^*Y	Category 5e, UTP patch cord with modular plugs on each end

^Available in 3, 5, 7, 10, 14 and 20 foot lengths.

*For standard colors other than Off White, add suffix BU (Blue), RD (Red), YL (Yellow) or GR (Green) before Y in the part number. For example, the part number of a blue Category 5e 5-foot patch cord is NK5EPC5BUY.

NetKey® Category 5e Punchdown Patch Panels*

- Mount to standard EIA 19" racks
- Punchdown patch panels meet all industry performance standards for Category 5e
- Modular patch panels accept all NetKey® modules
- Molded patch panels made of strong polymer material, with port numbering front and back
- Optional angled versions available for high-density environments
- Strain relief bars assist in cable management and bend radius control
- Filler panels reserve space for future use and direct airflow

Part Number	Description
 NK5EPP612WY	Category 5e, 12-port punchdown patch panel Mounts to wall with standard 89D bracket (WB89D)
 NK5EPP24P	Category 5e, 24-port molded punchdown patch panel, 1 RU
 NK5EPP48P	Category 5e, 48-port molded punchdown patch panel, 2 RU

*Punchdown patch panels are color-coded for T568A and T568B wiring schemes. For modular keystone patch panels, see page 58.

NetGen® Category 5e System Solutions

GenSPEED® 5350 ENHANCED CATEGORY 5E CABLE



Features and Benefits

- For applications that require optimal Cat 5e performance with flexibility for the future
- Performance guaranteed to 350 MHz
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Third-party verified for guaranteed performance
- Made in U.S.A.

Applications

- IEEE 802.3: 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- CDDI, Token Ring, ATM
- Broadband and Baseband Analog Video

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-90-661
- ISO/IEC 11801 Ed. 2.0 (Class D)



Data subject to change without notice.

For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

Conductors

- 24 AWG solid bare annealed copper

Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

Color Code

- Pair 1: Blue-White/Blue
- Pair 2: Orange-White/Orange
- Pair 3: Green-White/Green
- Pair 4: Brown-White/Brown

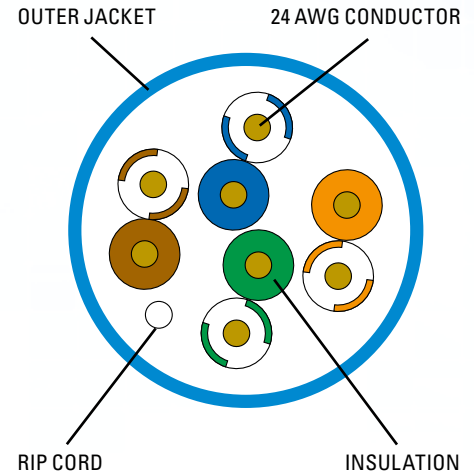
Rip Cord

- Applied longitudinally under jacket

Jacket

- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.200	0.190
Nominal Cable Weight (lbs/1000 ft)	20	22
Minimum Bend Radius (in)	1.0	1.0
Maximum Pulling Force (lbs)	25	25
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +75

Part Numbers Standard packaging: 1000' Pull-Pac® II

Jacket Color	Pull-Pac® II		Spool-Pac®		Spool	
	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)
Blue	6133712	6131690	6133707	6131688	6133703	6131686
White	6133713	6131691	6133708	6131689	6133704	6131687

Bulk reels are available as a special request with a maximum allowable length of 3000 feet per reel. Minimum run and lead time may apply.
See all colors and options for this product on page 68. Non-stock items may be subject to minimum order quantities.

Features and Benefits

- Engineered to provide stable and continuous performance
- Performance guaranteed to 200 MHz
- UL Certified Environmental Product Declaration (EPD) contributes toward one LEED® credit under Material and Resource credit (MRc)
- Health Product Declaration™ (HPD™) contributes toward one LEED credit under MRc
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- Third-party verified for guaranteed performance
- Made in U.S.A.

Applications

- IEEE 802.3: 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+
- CDDI, Token Ring, ATM
- Broadband and Baseband Analog Video

Standard Compliances

- ANSI/TIA-568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL 444
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-90-661
- ISO/IEC 11801 Ed. 2.0 (Class D)



Data subject to change without notice.

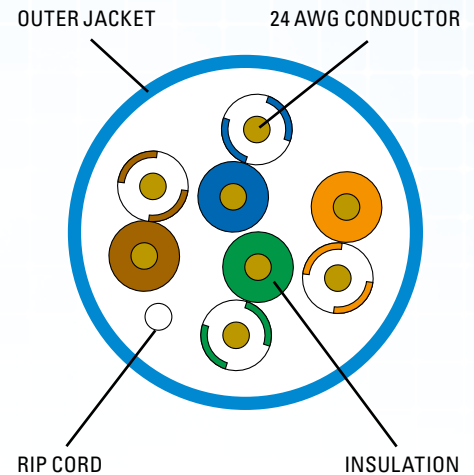
For full specifications, visit gcna.us/Catalogs/DatacomCable.



Construction

- Conductors**
- 24 AWG solid bare annealed copper
- Insulation**
- Non-Plenum: Polyolefin
 - Plenum: Fluoropolymer
- Color Code**
- Pair 1: Blue-White/Blue
 - Pair 2: Orange-White/Orange
 - Pair 3: Green-White/Green
 - Pair 4: Brown-White/Brown
- Rip Cord**
- Applied longitudinally under jacket
- Jacket**
- Non-Plenum: Flame-Retardant PVC
 - Plenum: Low-Smoke, Flame-Retardant PVC

Cross-Section



Physical Data

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.195	0.180
Nominal Cable Weight (lbs/1000 ft)	19	21
Minimum Bend Radius (in)	1.0	1.0
Maximum Pulling Force (lbs)	25	25
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +75

Part Numbers Standard packaging: 1000' Pull-Pac® II

Jacket Color	Pull-Pac® II		Spool-Pac®		Spool	
	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)	CMR (Non-Plenum)	CMP (Plenum)
Blue	5133299E	5131278E	5133374E	5131431E	5133300E	5131282E
White	5133255E	5131361E	5133342E	5131450E	5133250E	5131365E

Bulk reels are available as a special request with a maximum allowable length of 3000 feet per reel. Minimum run and lead time may apply.
See all colors and options for this product on page 68. Non-stock items may be subject to minimum order quantities.

Modular Patch Panels

	Part Number	Description
	NKFP12W	12-port modular patch panel, keystone. Mounts to wall with standard 89D bracket (WB89D)
	NKFP24Y	24-port modular patch panel, keystone, 1 RU
	NKFP48Y	48-port modular patch panel, keystone, 2 RU
	NKPP24P	24-port molded modular patch panel, keystone, 1 RU
	NKPP48P	48-port molded modular patch panel, keystone, 2 RU
	NKFP24KSRBSY	24-port modular patch panel with strain relief bar, keystone, 1 RU
	NKFP48KSRBSY	48-port modular patch panel with strain relief bar, keystone, 2 RU

Flush Mount Patch Panels

	Part Number	Description
	NKPPA24FMY	24-port flush mount angled modular patch panel, keystone, 1 RU
	NKPPA48FMY	48-port flush mount angled modular patch panel, keystone, 2 RU
	NKPP24FMY	24-port flush mount modular patch panel, keystone, 1 RU
	NKPP48FMY	48-port flush mount modular patch panel, keystone, 2 RU

Wall Mount Bracket

	Part Number	Description
	WB89D	Wall mount bracket. Ideal for use with 12-port punchdown or modular patch panels

Filler Panels








	Part Number	Description
	TLBP1S-V	1 RU tool-less filler panel, 9.52 mm (3/8 in.) square holes
	TLBP1R-V	1 RU tool-less filler panel, M5 (#10) or M6 (#12) round tapped holes
	TLBP2S-V	2 RU tool-less filler panel, 9.52 mm (3/8 in.) square holes
	TLBP2R-V	2 RU tool-less filler panel, M5 (#10) or M6 (#12) round tapped holes
	CPAF1BLY	1 RU angled filler panel
	CPAF2BLY	2 RU angled filler panel







R2P











WMPV45E

Part Number	Description
R2P	19" EIA rack, aluminum, 84.0" H x 20.3" W x 3.0" D (2134 mm x 514 mm x 76 mm), 45 RU
WMPV45E	NetRunner™ front and rear vertical cable manager with dual hinged covers and mounting hardware, 45 RU




Part Number	Description
 WMPSE	PatchLink™ front and rear horizontal cable manager with dual hinged cover, 1 RU
 WMP1E	PatchLink front and rear horizontal cable manager with dual hinged cover, 2 RU
 CMPH1	OpenAccess™ front and rear horizontal cable manager with optional snap-on cover, 1 RU
 CMPH2	OpenAccess front and rear horizontal cable manager with optional snap-on cover, 2 RU
 CMPHF1	OpenAccess front-only horizontal cable manager with optional snap-on cover, 1 RU
 SRM19FM1	Rack mount shelf, 30 lb. capacity, 1 RU
 SRM19FM2	Rack mount shelf, 50 lb. capacity, 2 RU

Part Number	Description
 SRB19BLY	Strain relief bar with six Tak-Ty® Hook & Loop Cable Ties; supports, manages and provides proper bend radius protection for up to 72 cables
 SRBCT	Strain relief bar includes 24 cable ties to secure cable to each individual slot for additional stability; supports, manages and provides proper bend radius protection
 SRB19BLY	Strain relief bar extends 2" off the rack; supports, manages and provides proper bend radius protection
 SRB19MDBL	Strain relief multi-depth bar extends 7" off the rack; supports, manages and provides proper bend radius protection. Ideal for use with Category 6A copper cabling installations

Flush Mount Screw-On Faceplates




Part Number*	Description
 NK1FNIW	Single gang, flush mount vertical faceplate. Accepts one NetKey® module
 NK2FNIW	Single gang, flush mount vertical faceplate. Accepts two NetKey modules
 NK3FNIW	Single gang, flush mount vertical faceplate. Accepts three NetKey modules
 NK4FNIW	Single gang, flush mount vertical faceplate. Accepts four NetKey modules
 NK1FIWY	Single or double gang, flush mount vertical faceplate with labels. Accepts one NetKey module
 NK2FIWY	Single or double gang, flush mount vertical faceplate with labels. Accepts two NetKey modules
 NK4FIWY	Single or double gang, flush mount vertical faceplate with labels. Accepts four NetKey modules
 NK6FIWY	Single or double gang, flush mount vertical faceplate with labels. Accepts six NetKey modules
 NK8FIWY	Single or double gang, flush mount vertical faceplate with labels. Accepts eight NetKey modules
 NK12FIWY	Single or double gang, flush mount vertical faceplate with labels. Accepts twelve NetKey modules

Flush Mount Screw-On Faceplates (cont'd.)

Part Number*	Description
 NK2HSFIWY	Single gang, sloped horizontal faceplate with labels. Accepts two NetKey modules
 NK4HSFIWY	Single gang, sloped horizontal faceplate with labels. Accepts four NetKey modules
 NK4VSFIWY	Single gang, 4-port, sloped vertical faceplate with labels

*Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black). NK2HSF**Y and NK4HSF**Y not available in BL (Black).

Stainless Steel Faceplates

Part Number*	Description
 NKF2S	Single gang, stainless steel vertical faceplate with labels. Accepts two NetKey modules
 NKF4S	Single gang, stainless steel vertical faceplate with labels. Accepts four NetKey modules
 NKF6S	Single gang, stainless steel vertical faceplate with labels. Accepts six NetKey modules

When mounting, opening should be a minimum of 2" wide.

Panduit® Accessories for NetGen® Systems


NETKEY® FACEPLATE FRAMES & MODULAR INSERTS




- Inserts and faceplate frames enable design flexibility
- Accept all NetKey® Modules


- Available in a variety of port densities and orientation
- Optional labels for easy port identification


Part Number*	Description
--------------	-------------

Classic Series Faceplate Frames	
 CBIW	Single gang faceplate frame accepts two ½ size modular inserts or three 1/3 size modular inserts

 CBIW-2G	Double gang faceplate frame accepts four ½ size modular inserts or six 1/3 size modular inserts
--------------------------------------------------------------------------------------------------	-------------------------------------------------------------------------------------------------


Executive Series Faceplate Frames


 CBEIWY	Single gang faceplate frame accepts two ½ size modular inserts or three 1/3 size modular inserts. Supplied with labels and label cover/screw covers
-------------------------------------------------------------------------------------------------	-----------------------------------------------------------------------------------------------------------------------------------------------------


 CBEIW-2GY	Double gang faceplate frame accepts four ½ size modular inserts or six 1/3 size modular inserts. Supplied with labels and label cover/screw covers
------------------------------------------------------------------------------------------------------	----------------------------------------------------------------------------------------------------------------------------------------------------


* Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black).

Part Number*	Description
--------------	-------------

Modular Inserts	
 NKHS2IW-X	1/2 size, sloped modular insert. Accepts two NetKey modules





 NKHS2SIW-X	1/2 size, sloped, shuttered modular insert. Accepts two NetKey modules
------------------------------------------------------------------------------------------------------	------------------------------------------------------------------------

 NKF2MIW-X	1/3 size flat modular insert. Accepts two NetKey modules
-----------------------------------------------------------------------------------------------------	----------------------------------------------------------

 CHB2MIW-X	1/3 blank modular insert reserves space for future use
-------------------------------------------------------------------------------------------------------	--------------------------------------------------------


* Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black).

Module Frames

Part Number*	Description
 NK2106MFIW	Screw mount "106" duplex module frame. Accepts two NetKey® modules
 NK4106MFIW	Screw mount "106" duplex module frame. Accepts four NetKey modules
 NK2RMFIW	Screw mount module frame. Accepts two NetKey modules. Compatible with standard NEMA outlet boxes and rectangular faceplates
 NK4RMFIW	Screw mount module frame. Accepts four NetKey modules. Compatible with standard NEMA outlet boxes and rectangular faceplates



* Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black).

Furniture Faceplate

Part Number*	Description
 NK4MFIW	Snap-on modular furniture faceplate. Accepts four NetKey modules

* Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black).




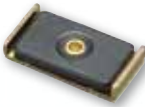
Phone Plates

Part Number*	Description
 KWPY	Stainless steel wall phone plate accepts one NetKey module
 KWP5EY	Stainless steel wall phone plate supplied with one Category 5e keystone leadframe module

* Wall mount faceplate kits compatible with wall mountable phones with short patch cord connections to the jack module.






Surface Mount Boxes

- Accept all NetKey modules
- Include mounting screws and adhesive tape
- Compatible with Panduit LD3, LD5 and LD10 Raceway

Part Number*	Description
 NK2BXIW-A	Surface mount box accepts two NetKey modules
 NK4BXIW-AY	Surface mount box accepts four NetKey modules
 NK6BXIW-AY	Surface mount box accepts six NetKey modules
 CBM-X	Optional magnet for mounting on metal surfaces. Compatible with NK2BXIW-A and NK4BXIW-AY



* Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), IG (International Gray) or WH (White).

Modules

Part Number*	Description
F-Type Module	
 NKFIW	Module supplied with 75 ohm industry standard F-Type coax bulkhead coupler
50 Ohm BNC Coax Module	
 NKBNCMIWY	Module supplied with 50 ohm industry standard coax bulkhead coupler
RCA Modules	
 NKRSM^IWY	Module supplied with RCA solder type connector. Inserts available in multiple colors
 NKRTM^IW	Module supplied with RCA pass-through connector. Inserts available in multiple colors
 NKRPM^IW	Module supplied with RCA punchdown connector. Inserts available in multiple colors







^ To designate insert color, replace ^ with R (Red), Y (Yellow) or W (White). RCA solder type module (NKRSM^IWY) also available with B (Black) insert.
 * Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black).

D-Subminiature Inserts

Part Number*	Description
 CHD15HDCIWY	1/3 insert with 15-pin female-to-female coupler; SVGA compatible
 CHD15HDSCIWY	1/3 insert with 15-pin HD screw-down DB connector mounted to a printed circuit board; SVGA compatible

* Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black).



Modules (cont'd.)

Part Number	Description
5-Way Binding Post Module**	
 NKBP^^IWY	Module supplied with 5-way binding post
3.5mm Stereo Connector*	
 NK35MSSIW	Module supplied with 3.5 mm (1/8") stereo solder type headset connector
 NK35MSCIW	Module supplied with 3.5 mm (1/8") stereo headset coupler
HDMI Coupler*	
 NKHDMIW	Module supplied with one HDMI 1.3 Type A female-to-female coupler module
USB Coupler*	
 NKUSBAAIW	Module supplied with one USB 2.0 female A-to-female A coupler module
Blank Module*	
 NKBMIW-X	Blank module reserves space for future use

^^To designate insert color, replace ^^ with R (Red) or B (Black).
 * Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black).
 **5-Way Binding Post Module (NKBP^^IWY) only available in EI (Electric Ivory) and WH (White).

RCA Inserts



- Compatible with classic and executive faceplate frames

Part Number*	Description
 CHR3RGBIW	1/3 insert with three RCA pass-through couplers. Inserts are red, green and blue. Ideal for component video
 CHR3WYRIW	1/3 insert with three RCA pass-through couplers. Inserts are white, yellow and red. Ideal for composite video or left/right stereo

* Product is listed in IW (Off White). To designate a different color, replace IW (Off White) with available colors: EI (Electric Ivory), WH (White), IG (International Gray) or BL (Black).

General Cable offers a comprehensive line of Carol® Brand A/V cabling products. For more information, contact your General Cable representative.

Thermal Transfer Desktop Printer and Accessories

Part Number	Description
 TDP43ME	300 dpi printer; includes printer, Panduit® Easy-Mark™ Labeling Software, RMEH4BL hybrid black ribbon, AC power adapter with US power cord, USB cable, user manual, quick start card and driver disk
 S100X150VA1Y	Self-laminating, white vinyl label for use with thermal transfer desktop printer




For complete identification offering, reference the Panduit Physical Infrastructure Systems Catalog (SA-NCCB51) or visit www.panduit.com.

PanTher™ LS8EQ/LS8E Hand-Held Thermal Transfer Printers and Accessories

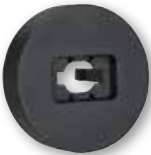
- Variety of labeling systems and labels to enable quick and easy network identification

Part Number	Description
 LS8EQ-KIT-ACS	Includes LS8EQ printer with QWERTY keypad, one cassette of S100X150VAC self-laminating labels, six AA alkaline batteries, LS8E-ACS, LS8-CASE, LS8-PCKIT, LS8-IB, LS8-WS, quick reference card and operator's manual
 LS8EQ-KIT	Includes LS8EQ printer with QWERTY keypad, one cassette of S100X150VAC self-laminating labels, six AA alkaline batteries, LS8-CASE, LS8-PCKIT, LS8-IB, LS8-WS, quick reference card and operator's manual
 LS8EQ	Includes LS8EQ printer with QWERTY keypad, one cassette of S100X150VAC self-laminating labels, six AA alkaline batteries and quick reference card
 LS8E	LS8E printer, one cassette of self-laminating labels, six AA alkaline batteries and quick reference card
 LS8E-KIT	LS8E printer, one cassette of self-laminating labels, six AA alkaline batteries, rigid carrying case, LS8-PCKIT, LS8-IB, operator's manual and quick reference card
 S100X150VAC	Self-laminating, white vinyl label for use with LS8E printer



Cable Prep Tools

	Part Number	Description
	CWST	Copper conductor snipping tool
	CJAST	Cable jacket stripping tool
	CJASTB	Replacement blade for cable stripping tool



Punchdown Base

	Part Number	Description
	NKSPB	Base used to assist in terminating punchdown modules

Pan-Punch® Termination Tool

	Part Number	Description
	PDT110	Single pair punchdown tool and blade terminates and cuts UTP cable in one operation. Ideal for use with Pan-Punch® Punchdown System
	PDTH110	Replacement blade for single pair punchdown tool (PDT110)

NetKey® Jack Module Termination Tools

	Part Number	Description
	JR-PAN-2* Fluke**	JackRapid Termination Tool for Category 6 and Category 5e NetKey® Punchdown Modules
	CJT-X	Termination tool for Category 5e NetKey Leadframe Jack Modules

* Fluke JackRapid Termination Tool available through distribution. Contact Fluke customer service at 800-283-5853 to locate a local distributor.

** Fluke is a registered trademark of Fluke Corporation.

General Cable

GenSPEED® CATEGORY 6A QUICK REFERENCE GUIDE



JACKET COLOR	PACKAGE	PREMIUM		ENHANCED (Individually Shielded)		ENHANCED (Overall Shielded)		STANDARD	
		Enhanced Category 6A GenSPEED® 10 MTP™ (p. 8)		Category 6A GenSPEED® 10,000 U/FTP (p. 14)		Category 6A GenSPEED® 10,000 F/UTP (p. 15)		Category 6A GenSPEED® 10,000 (p. 9, 49)	
		CMR	CMP	CMR	CMP	CMR	CMP	CMR	CMP
Blue									
	Spool	7133849	7132849	7133786	7131786	7133586	7131586	7133819	7131819
White									
	Spool	7133850	7132850	7133787	7131787	7133587	7131587	7133820	7131820
Yellow									
	Spool	7133852	7132852	7133788	7131788	7133588	7131588	7133822	7131822
Gray									
	Spool	7133851	7132851	7133789	7131789	7133589	7131589	7133821	7131821
Red									
	Spool	7133854	7132854	7133790	7131790	7133590	7131590	7133824	7131824
Orange									
	Spool	7133856	7132856	7133791	7131791	7133591	7131591	7133826	7131826
Green									
	Spool	7133853	7132853	7133792	7131792	7133592	7131592	7133823	7131823
Black									
	Spool	7133858	7132858	7133795	7131795		7131594	7133828	7131828
Pink									
	Spool	7133857	7132857				7131595	7133827	7131827
Purple									
	Spool	7133855	7132855	7133830	7131830	7133593	7131593	7133825	7131825

Note: Non-stock items may be subject to minimum order quantities.

General Cable

GenSPEED® CATEGORY 6 QUICK REFERENCE GUIDE



JACKET COLOR	PACKAGE	PREMIUM		ENHANCED		STANDARD (23 AWG)		STANDARD (22 AWG)
		Category 6 GenSPEED® 6500 Premium (p. 20)		Category 6 GenSPEED® 6000 Enhanced (p. 21)		Category 6 GenSPEED® 6 (p. 52)		Category 6 GenSPEED® 6 (p. 53)
		CMR	CMP	CMR	CMP	CMR	CMP	CMP
Blue								
	Pull-Pac®			7133900	7131900	7133800	7131800	8131800
	Spool-Pac®	7133930	7131930	7133940	7131940	7133840	7131840	
	Spool	7133970	7131970	7133960	7131960	7133860	7131860	
White								
	Pull-Pac®			7133901	7131901	7133801	7131801	8131801
	Spool-Pac®	7133931	7131931	7133941	7131941	7133841	7131841	
	Spool	7133971	7131971	7133961	7131961	7133861	7131861	
Yellow								
	Pull-Pac®			7133902	7131902	7133802	7131802	
	Spool-Pac®	7133932	7131932	7133942	7131942	7133842	7131842	
	Spool	7133972	7131972	7133962	7131962	7133862	7131862	
Gray								
	Pull-Pac®			7133903	7131903	7133803	7131803	
	Spool-Pac®	7133933	7131933	7133943	7131943	7133843	7131843	
	Spool	7133973	7131973	7133963	7131963	7133863	7131863	
Red								
	Pull-Pac®			7133904	7131904	7133804	7131804	
	Spool-Pac®	7133934	7131934	7133944	7131944	7133844	7131844	
	Spool	7133974	7131974	7133964	7131964	7133864	7131864	
Orange								
	Pull-Pac®			7133905	7131905	7133805	7131805	
	Spool-Pac®	7133935	7131935	7133945	7131945	7133845	7131845	
	Spool	7133975	7131975	7133965	7131965	7133865	7131865	
Green								
	Pull-Pac®			7133906	7131906	7133806	7131806	
	Spool-Pac®	7133936	7131936	7133946	7131946	7133846	7131846	
	Spool	7133976	7131976	7133966	7131966	7133866	7131866	
Black								
	Pull-Pac®			7133907	7131907	7133807	7131807	
	Spool-Pac®	7133937	7131937	7133947	7131947	7133847	7131847	
	Spool	7133977	7131977	7133967	7131967	7133867	7131867	
Pink								
	Pull-Pac®			7133908	7131908	7133808	7131808	
	Spool-Pac®	7133938	7131938	7133948	7131948	7133848	7131848	
	Spool	7133978	7131978	7133968	7131968	7133868	7131868	
Purple								
	Pull-Pac®			7133909	7131909	7133809	7131809	
	Spool-Pac®	7133939	7131939	7133959	7131959	7133859	7131859	
	Spool	7133979	7131979	7133969	7131969	7133869	7131869	

Note: Non-stock items may be subject to minimum order quantities.
Bulk reels are available in 2000' (2R), 2500' (2.5R), and 3000' (3R) lengths.

General Cable

GenSPEED® CATEGORY 5e QUICK REFERENCE GUIDE



JACKET COLOR	PACKAGE	PREMIUM		ENHANCED		STANDARD	
		Category 5e GenSPEED® 5500 Premium (p. 25)		Category 5e GenSPEED® 5350 Enhanced (p. 56)		Category 5e GenSPEED® 5000 (p. 57)	
		CMR	CMP	CMR	CMP	CMR	CMP
Blue							
	Pull-Pac®	6133299	6131278	6133712	6131690	5133299E	5131278E
	Spool-Pac®	6133403	6131433	6133707	6131688	5133374E	5131431E
	Spool	6133282	6131282	6133703	6131686	5133300E	5131282E
White							
	Pull-Pac®	6133255	6131361	6133713	6131691	5133255E	5131361E
	Spool-Pac®	6133339	6131449	6133708	6131689	5133342E	5131450E
	Spool	6133492	6131618	6133704	6131687	5133250E	5131365E
Yellow							
	Pull-Pac®	6133289	6131546	6133715	6131693	5133289E	5131379E
	Spool-Pac®	6133369	6131379	6133717	6131695	5133448E	5131546E
	Spool	6133348	6131382	6133719	6131697		5131648E
Gray							
	Pull-Pac®	6133200	6131418	6133714	6131692	5133200E	5131418E
	Spool-Pac®	6133331	6131619	6133716	6131694	5133329E	5131456E
	Spool	6133334		6133718	6131696	5133204E	5131475E
Red							
	Pull-Pac®	6133274	6131477			5133274E	5131477E
	Spool-Pac®		6131635		6131732	5133427E	5131553E
	Spool						5131383E
Orange							
	Pull-Pac®	6133746	6131422	6133761		5133383E	5131422E
	Spool-Pac®	6133383	6131576				
	Spool				6131733	5133667E	
Green							
	Pull-Pac®	6133512	6131547		6131699	5133512E	5131547E
	Spool-Pac®	6133615	6131575		6131731	5133693E	5131575E
	Spool	6133616	6131757		6131700	5133649E	5131649E
Black							
	Pull-Pac®	6133696	6131683		6131707	5133696E	5131683E
	Spool-Pac®		6131829				
	Spool						5131689E
Pink							
	Pull-Pac®	6133290	6131709			5133290E	5131380E
	Spool-Pac®	6133447	6131478			5133447E	5131478E
	Spool	6133341					
Purple							
	Pull-Pac®	6133445	6131710			5133445E	5131730E
	Spool-Pac®	6133446					
	Spool						

Note: Non-stock items may be subject to minimum order quantities.
Bulk reels are available in 2000' (2R) and 3000' (3R) lengths.

Catalog No.	Page	Catalog No.	Page	Catalog No.	Page	Catalog No.	Page
5131278E	57, 68	6131477	68	6133703	56, 68	7131842	67
5131282E	57, 68	6131478	68	6133704	56, 68	7131843	67
5131361E	57, 68	6131546	68	6133707	56, 68	7131844	67
5131365E	57, 68	6131547	68	6133708	56, 68	7131845	67
5131379E	68	6131575	68	6133712	56, 68	7131846	67
5131380E	68	6131576	68	6133713	56, 68	7131847	67
5131383E	68	6131618	25, 68	6133714	68	7131848	67
5131418E	68	6131619	68	6133715	68	7131859	67
5131422E	68	6131635	68	6133716	68	7131860	52, 67
5131431E	57, 68	6131683	68	6133717	68	7131861	52, 67
5131450E	57, 68	6131686	56, 68	6133718	68	7131862	67
5131456E	68	6131687	56, 68	6133719	68	7131863	67
5131475E	68	6131688	56, 68	6133746	66	7131864	67
5131477E	68	6131689	56, 68	6133761	66	7131865	67
5131478E	68	6131690	56, 68	7131586	15, 66	7131866	67
5131546E	68	6131691	56, 68	7131587	15, 66	7131867	67
5131547E	68	6131692	68	7131588	66	7131868	67
5131553E	68	6131693	68	7131589	66	7131869	67
5131575E	68	6131694	68	7131590	66	7131900	21, 67
5131648E	68	6131695	68	7131591	66	7131901	21, 67
5131649E	68	6131696	68	7131592	66	7131902	67
5131683E	68	6131697	68	7131593	66	7131903	67
5131689E	68	6131699	68	7131594	66	7131904	67
5131730E	68	6131700	68	7131595	66	7131905	67
5133200E	68	6131707	68	7131786	14, 66	7131906	67
5133204E	68	6131709	68	7131787	14, 66	7131907	67
5133250E	57, 68	6131710	68	7131788	66	7131908	67
5133255E	57, 68	6131731	68	7131789	66	7131909	67
5133274E	68	6131732	68	7131790	66	7131930	20, 67
5133289E	68	6131733	68	7131791	66	7131931	20, 67
5133290E	68	6131757	68	7131792	66	7131932	67
5133299E	57, 68	6131829	68	7131795	66	7131933	67
5133300E	57, 68	6133200	68	7131800	52, 67	7131934	67
5133329E	68	6133255	25, 68	7131801	52, 67	7131935	67
5133342E	57, 68	6133274	68	7131802	67	7131936	67
5133374E	57, 68	6133282	25, 68	7131803	67	7131937	67
5133383E	68	6133289	68	7131804	67	7131938	67
5133427E	68	6133290	68	7131805	67	7131939	67
5133445E	68	6133299	25, 68	7131806	67	7131940	21, 67
5133447E	68	6133331	68	7131807	67	7131941	21, 67
5133448E	68	6133334	68	7131808	67	7131942	67
5133512E	68	6133339	25, 68	7131809	67	7131943	67
5133649E	68	6133341	68	7131819	9, 49, 66	7131944	67
5133667E	68	6133348	68	7131820	9, 49, 66	7131945	67
5133693E	68	6133369	68	7131821	66	7131946	67
5133696E	68	6133383	68	7131822	66	7131947	67
6131278	25, 68	6133403	25, 68	7131823	66	7131948	67
6131282	25, 68	6133445	68	7131824	66	7131959	67
6131361	25, 68	6133446	68	7131825	66	7131960	21, 67
6131379	68	6133447	68	7131826	66	7131961	21, 67
6131382	68	6133492	25, 68	7131827	66	7131962	67
6131418	68	6133512	68	7131828	66	7131963	67
6131422	68	6133615	68	7131830	66	7131964	67
6131433	25, 68	6133616	68	7131840	52, 67	7131965	67
6131449	25, 68	6133696	68	7131841	52, 67	7131966	67

Catalog No.	Page	Catalog No.	Page	Catalog No.	Page	Catalog No.	Page
7131967	67	7133825	66	7133940	21, 67	CFG6IW	39
7131968	67	7133826	66	7133941	21, 67	CFP1IW	36
7131969	67	7133827	66	7133942	67	CFP2IW	36
7131970	20, 67	7133828	66	7133943	67	CFP4IW	36
7131971	20, 67	7133830	66	7133944	67	CFPE1IWY	37
7131972	67	7133840	52, 67	7133945	67	CFPE2IWY	37
7131973	67	7133841	52, 67	7133946	67	CFPE4IWY	37
7131974	67	7133842	67	7133947	67	CFPE6IWY	37
7131975	67	7133843	67	7133948	67	CFPE10IW-2GY	37
7131976	67	7133844	67	7133959	67	CFPH2IW	36
7131977	67	7133845	67	7133960	21, 67	CFPH4IW	36
7131978	67	7133846	67	7133961	21, 67	CFPHSL4IW	36
7131979	67	7133847	67	7133962	67	CFPL2IWY	36
7132849	8, 66	7133848	67	7133963	67	CFPL3IWY	36
7132850	8, 66	7133849	8, 66	7133964	67	CFPL4IWY	36
7132851	66	7133850	8, 66	7133965	67	CFPL6IWY	36
7132852	66	7133851	66	7133966	67	CFPSL2IWY	36
7132853	66	7133852	66	7133967	67	CFPSL4IWY	36
7132854	66	7133853	66	7133968	67	CFPSL6IWY	36
7132855	66	7133854	66	7133969	67	CHB2IW-X	38
7132856	66	7133855	66	7133970	20, 67	CHB2MIW-X	38, 61
7132857	66	7133856	66	7133971	20, 67	CHD15HDCIWY	43, 63
7132858	66	7133857	66	7133972	67	CHD15HDSCIWY	43, 63
7133586	15, 66	7133858	66	7133973	67	CHF2IW-X	38
7133587	15, 66	7133859	67	7133974	67	CHF2MIW-X	38
7133588	66	7133860	52, 67	7133975	67	CHLS2SIW-X	38
7133589	66	7133861	52, 67	7133976	67	CHR3RGBIW	42, 63
7133590	66	7133862	67	7133977	67	CHR3WYRIW	42, 63
7133591	66	7133863	67	7133978	67	CHS1SIW-X	38
7133592	66	7133864	67	7133979	67	CHS2IW-X	38
7133593	66	7133865	67	8131800	53, 67	CHS2SIW-X	38
7133786	14, 66	7133866	67	8131801	53, 67	CHSRE2IW-X	38
7133787	14, 66	7133867	67	AVPDB	45	CJ5E88TGBU	23
7133788	66	7133868	67	C4PPLK	40	CJ5E88TGBU-24	23
7133789	66	7133869	67	CBEIW-2GY	38, 61	CJ5E88TGBU-C	23
7133790	66	7133900	21, 67	CBEIWY	38, 61	CJ6X88TGBU	6
7133791	66	7133901	21, 67	CBIW	38, 61	CJ6X88TGBU-24	6
7133792	66	7133902	67	CBIW-2G	38, 61	CJ6X88TGBU-C	6
7133795	66	7133903	67	CBM-X	41, 62	CJ688TGBU	17
7133800	52, 67	7133904	67	CBX1IW-A	41	CJ688TGBU-24	17
7133801	52, 67	7133905	67	CBX2IW-AY	41	CJ688TGBU-C	17
7133802	67	7133906	67	CBX4IW-AY	41	CJ688TGIW-C	17
7133803	67	7133907	67	CF1062IWY	39	CJAST	45, 65
7133804	67	7133908	67	CF1064IWY	39	CJASTB	45, 65
7133805	67	7133909	67	CFFP4BL	40	CJH5E88TGBU	23
7133806	67	7133930	20, 67	CFFPA2BL	40	CJH6X88TGBU	6
7133807	67	7133931	20, 67	CFFPE3BL	40	CJH688TGBU	17
7133808	67	7133932	67	CFFPEBSL4BL	40	CJR5E88TGBU	23
7133809	67	7133933	67	CFFPHM4BL	40	CJR6X88TGBU	6
7133819	9, 49, 66	7133934	67	CFFPKE3BL	40	CJR688TGBU	17
7133820	9, 49, 66	7133935	67	CFFPL4BL	40	CJRCAPIW	17
7133821	66	7133936	67	CFFPLA4BL	40	CJRCAPIW	17
7133822	66	7133937	67	CFG1IW	39	CJRCAPRD	23
7133823	66	7133938	67	CFG2IW	39	CJRRIW	42
7133824	66	7133939	67	CFG4IW	39	CJRWIW	42

Catalog No.	Page	Catalog No.	Page	Catalog No.	Page	Catalog No.	Page
CJRYIW	42	DP24688TGY	19	NK5EPP24P	55	PDT110	45, 65
CJS6X88TG*Y	11	DP48688TGY	19	NK5EPP48P	55	PDTH110	45, 65
CJS6X88TGY-24	11	DPA245E88TGY	24	NK5EPPG12WY	55	R2P	35, 59
CJSH6X88TG*Y	11	DPA246X88TGY	7	NK6APC	48	S100X150VA1Y	44, 64
CJT-X	45, 65	DPA485E88TGY	24	NK6BXIW-AY	62	S100X150VAC	44, 64
CM35MSCIWY	42	DPA486X88TGY	7	NK6FIWY	60	SRB19BLY	35, 59
CM35MSSIW	42	DPA24688TGY	19	NK6PC^*Y	51	SRB19MDBL	35, 59
CMBA75IWY	42	DPA48688TGY	19	NK6PP24P	51	SRBCT	35, 59
CMBAIWY	42	EGJT	45	NK6PP48P	51	SRBM19BLY	35, 59
CMBIW-X	43	F92ERLNLNSNM001	27	NK6PPG12WY	51	SRM19FM1	35, 59
CMBPBIWY	43	F923RSNSNSNM001	27	NK6X88MIW	48	SRM19FM2	35, 59
CMBPRIWY	43	FAP6WAQDLC	27	NK6X88MIW-Q	48	STP6C3M	12
CMD15HDIWY	43	FAP6WAQDSC	27	NK6XPP24P	48	STP6X3	12
CMDAQSCBL	27	FAP6WBUDLCZ	27	NK6XPP48P	48	STP28X3	12
CMDBIW-X	43	FAP6WBUDSCZ	27	NK6XPPG24Y	48	TDP43ME	44, 64
CMDBUSCZBU	27	FCAMKIT	27	NK6XPPG48Y	48	TGJT	45
CMDJAQLCBL	27	FLCSMCXAQY	27	NK8FIWY	60	TLBP1R-V	58
CMDJLJCZBU	27	FLCSSCBUY	27	NK12FIWY	60	TLBP1S-V	58
CMFIW	42	Fluke, JR-PAN-2	45, 65	NK35MSCIW	63	TLBP2R-V	58
CMFSRIWY	42	FPPKIT-CVY	27	NK35MSSIW	63	TLBP2S-V	58
CMHDMIIW	43	FRME1U	27	NK688MIW	51	UTP6A3	6
CMPH1	35, 59	FRME2U	27	NK688MIW-Q	51	UTP6ASD3	6
CMPH2	35, 59	FRME3	27	NK2106MFIW	62	UTP28X3	6
CMPHF1	35, 59	FRME4	27	NK4106MFIW	62	UTP28CH3	24
CMRPBIW	42	FSCMCXAQ	27	NKA6XPPG24Y	48	UTP28SP3	18
CMRPGIW	42	FX2ERLNLNSNM001	27	NKA6XPPG48Y	48	UTPCH3Y	24
CMRPRIW	42	FX23RSNSNSNM001	27	NKBMIW-X	63	UTPSP3Y	18
CMRPWIW	42	KWP5EY	41, 62	NKBNCMIWY	63	WB89D	58
CMRPYIW	42	KWP6PY	41	NKBP^*IWY	63	WMP1E	35, 59
CMUSBAAIW	43	KWPY	62	NKF2S	60	WMPSE	35, 59
CP24BLY	13	LS8E	44, 64	NKF4S	60	WMPV45E	35, 59
CP24WSBLY	13	LS8E-KIT	44, 64	NKF6S	60	xyyyy1A1D.BK	30
CP48BLY	13	LS8EQ	44, 64	NKFIW	63	xyyyy1A1R.BK	30
CP48HDBL	13	LS8EQ-KIT	44, 64	NKFP12W	58	xyyyy1A1R-ILRA	31
CP48WSBLY	13	LS8EQ-KIT-ACS	44, 64	NKFP24KSRBSY	58	xyyyy1ANR.BK	30
CPA24BLY	13	MDC-C	45	NKFP24Y	58	xyyyy1ANR-ILRA	31
CPA48BLY	13	MFFPEBL	40	NKFP48KSRBSY	58	xyyyy1ANU.BK	30
CPA48HDBL	13	NK1FIWY	60	NKFP48Y	58	xyyyy1ANU-ILPA	31
CPAF1BLY	58	NK1FNIW	60	NKHDMIW	63	xyyyy1ANU-ILPAS	31
CPAF2BLY	58	NK2BXIW-A	62	NKH2MIW-X	61	xyyyy1P1D	30
CPP24FMWBLY	34	NK2FIWY	60	NKHS2IW-X	61	xyyyy1P1R	30
CPP48FMWBLY	34	NK2FNIW	60	NKHS2SIW-X	61	xyyyy1P1R-ILRA	31
CPP48HDWBLY	34	NK2HSFIWY	60	NKP5E88MIW	55	xyyyy1PNR	30
CPPA24FMWBLY	34	NK2RMFIW	62	NKP5E88MIW-Q	55	xyyyy1PNR-ILRA	31
CPPA48FMWBLY	34	NK3FNIW	60	NKPP24FMY	58	xyyyy1PNU	30
CPPA48HDWBLY	34	NK4BXIW-AY	62	NKPP24P	58	xyyyy1PNU-ILPA	31
CPPL24WBLY	34	NK4FIWY	60	NKPP48FMY	58	xyyyy1PNU-ILPAS	31
CPPL48WBLY	34	NK4FNIW	60	NKPP48P	58	xyyyy4H1A-DWB	33
CPPLA24WBLY	34	NK4HSFIWY	60	NKPPA24FMY	58	xyyyy4H1F-DWB	33
CPPLA48WBLY	34	NK4MFIW	62	NKPPA48FMY	58	xyyyy4M1A-DWB	33
CWST	45, 65	NK4RMFIW	62	NKRPM^*IW	63	xyyyy4M1D-DT	32
DP245E88TGY	24	NK4VSFIWY	60	NKRSM^*IWY	63	xyyyy4M1F-DWB	33
DP246X88TGY	7	NK5E88MIW-Q	55	NKRTM^*IW	63	xyyyy4M1M-DT	32
DP485E88TGY	24	NK5E88MIWY	55	NKSPB	45, 65		
DP486X88TGY	7	NK5EPC^*Y	55	NKUSBAAIW	63		



Connect with **PanGen**[®] STRUCTURED CABLING SOLUTIONS

Panduit[®] & **General Cable**

Our world-class partnership has provided infrastructure solutions, guaranteed network performance and system reliability for over 10 years.



PanGen[®] **Structured Cabling Solutions**

Our combined category 6A, 6, and 5e high-performance copper and fiber systems provide a robust and optimized cabling infrastructure that exceeds all your electrical parameters for today and into the future.

Call your Panduit or General Cable sales representative today and ask for PanGen.



PANDUIT[®]
800.777.3300

 **General Cable**
800.424.5666

www.pangensolutions.com

A SHARED VISION

The Panduit and General Cable vision is to provide organizations—large and small—the ability to enable essential business applications. This vision is realized through the delivery of high-quality physical infrastructure solutions. These solutions are developed through advanced research and development, manufacturing excellence and rigorous performance testing.

PanGen[®]
STRUCTURED CABLING SOLUTIONS

www.pangensolutions.com

PANDUIT[®]

18900 Panduit Drive
Tinley Park, IL 60487
800.777.3300
www.panduit.com
cs@panduit.com
CPCB154-SA-ENG

 **General Cable**

4 Tesseneer Drive
Highland Heights, Kentucky 41076
800.424.5666
www.generalcable.com
info@generalcable.com
Form No. DAT-0156-R0916

GENERAL CABLE, GENSPEED, MOSAIC CROSSBLOCK, MTP, PULL-PAC and TRU-MARK are trademarks of General Cable Technologies Corporation. PANGEN is a registered trademark of General Cable Technologies Corporation and PANDUIT.

PANDUIT, 10GIG, DP6A, DP6, DP5E, GIGA-TX, MINI-COM, NETKEY, NETRUNNER, OPENACCESS, PANTHER, PATCHLINK, TAK-TY, TX6A, TX6 and TX5E are trademarks of Panduit Corp.

Third party trademarks used herein are the property of their respective owners.

50823