



TE's broad portfolio of I/O interconnect satisfies the needs of diverse markets

DESIGN NAVIGATOR

	Pitch (mm)	Number of Contacts	Max Data Rate per Lane (Gbps) ²	Max Current Rating per Contact (A) ²	High Vibration Performance	Environment Corrosion Protection	Power & Signal Combined	Durable in Harsh Environments	Quickconnect / Disconnect	Standards
(1) DATA COMMUNICATIONS / TELECOMMUNICATIONS¹										
AMPLIMITE D-Subminiature Connectors	1.27 x 2.54 - 2.74 x 2.84	9 - 120	N/A	7.5	*	*	*	*	*	SCSI 2 & 3, RS-232, ISO-11569, IPI-2, HIPPI, IEE 802.3 MII, VESA, RS-232
CeeLok FAS-T/I/O Connectors	N/A	8	10	1.0	*	*	*	*	*	MIL-DTL-38999, Ethernet, USB, SATA/eSATA
CFP Compliant Connectors / CXP Connectors & Cage Assemblies	0.8	84 - 148	12.5	0.5	*	*	*	*	*	Ethernet, Infiniband
CHAMP Board-to-Board & Wire-to-Board Connectors	0.8/1.27/ 2.16	14 - 100	1.0	3.5	*	*	*	*	*	UL, CSA, SCSI, VHDCI
Circular Plastic Connectors (CPC)	N/A	3 - 63	N/A	60	*	*	*	*	*	UL, CSA, VDE (select parts)
DEUTSCH DMC-M Single Module Connectors	2.54	1 - 20	10	90	*	*	*	*	*	EN4165 - ARINC 809 - BACC65 - UL
DEUTSCH Wildcat High Density Connectors	1.73	3 - 64	N/A	5.0	*	*	*	*	*	N/A
Heavy Duty Connectors (HDC)	N/A	1 - 150	N/A	420	*	*	*	*	*	UL, CSA, VDE
Mini Serial Attached SCSI High Density (Mini SAS HD) Connectors	0.75	36	12.0	0.5	*	*	*	*	*	SAS 21, PCIe
PARALIGHT™ Active Optical Cable Assemblies	N/A	N/A	14.5	350	*	*	*	*	*	N/A
QSFP+ Fiber Optic Transceivers	N/A	N/A	10.0	N/A	*	*	*	*	*	SFF-8436, 40GBase-SR4 Ethernet and InfiniBand
Quad Small Form-Factor Plus (QSFP+) Connectors	0.8	38	16.0	0.5	*	*	*	*	*	Ethernet, Infiniband
Quadrx High Speed I/O Connectors & Contacts	N/A	1 - 12	2.0	1.0	*	*	*	*	*	MIL-DTL-38999, ARINC 404, ARINC 600
RJ point five Connector Systems	1.27	8	1.0	0.5	*	*	*	*	*	Ethernet
RJ45 Modular Jacks	1.27	8	1.0	1.5	*	*	*	*	*	TIA, IEC, FCC, Ethernet
Small Form-Factor (SFP & SFP+) I/O Products	0.8	20	16.0	0.5	*	*	*	*	*	Fibre Channel, Ethernet
USB Connectors	2.0	9	5.0	0.9	*	*	*	*	*	N/A
X2 Rails & Connectors	0.8	70	3.125	N/A	*	*	*	*	*	Ethernet
XFP Cages, Connectors & Module Systems	0.8	30	10.0	N/A	*	*	*	*	*	Ethernet, CTN
(2) INDUSTRIAL COMMUNICATION / AUTOMATION & CONTROL¹										
AMP Power Series Wire-Applied Connectors	N/A	4, 6	N/A	20	*	*	*	*	*	UL, CSA
AMPLIMITE D-Subminiature Connectors	1.27 x 2.54 - 2.74 x 2.84	9 - 120	N/A	7.5	*	*	*	*	*	SCSI 2 & 3, RS-232, ISO-11569, IPI-2, HIPPI, IEE 802.3 MII, VESA, RS-232
AMPLIMITE Hybrid Connectors (Power Coax Mixed)	0.109	3 - 36	N/A	32	*	*	*	*	*	MIL ¹
AMPSEAL Sealed Connector Series	2.0 x 4.0	8 - 35	N/A	17	*	*	*	*	*	UL, ISO/IEC
CHAMP Board-to-Board & Wire-to-Board Connectors	0.8 / 1.27 / 2.16	14 - 100	1.0	3.5	*	*	*	*	*	UL, CSA, SCSI, VHDCI
Circular Plastic Connectors (CPC)	N/A	3 - 63	N/A	60	*	*	*	*	*	UL, CSA, VDE (select parts)
Command Series Switches	N/A	4, 8, 12	N/A	5.0	*	*	*	*	*	UL, CSA, NEMA1, I2 & I3
DEUTSCH DMC-M Single Module Connectors	2.54	1 - 2	10	90	*	*	*	*	*	EN4165, ARINC 809, BACC65, UL
DEUTSCH DTS-RJ45 Ruggedized Shielded Connectors	1.27	4, 8	1.0	N/A	*	*	*	*	*	Cat5e
DEUTSCH Wildcat High Density Connectors	1.73	3 - 64	N/A	5.0	*	*	*	*	*	N/A
Heavy Duty Connectors (HDC)	N/A	1 - 150	N/A	420	*	*	*	*	*	UL, CSA, VDE
Industrial Mini I/O Connector System	N/A	8	1.0	0.5	*	*	*	*	*	Cat5e
Industrial RJ45 / Industrial Ethernet Connectors	1.27	4, 8	10	0.5	*	*	*	*	*	UL, CSA, Cat5e, Cat6
Industrial Switches	N/A	N/A	N/A	25	*	*	*	*	*	RU, CSA, VDE, UL
Industrial USB Connectors	2.0	4	0.12	0.5	*	*	*	*	*	UL, CSA, USB 2.0
Keylock Switches	N/A	2, 3	N/A	5.0	*	*	*	*	*	N/A
M8/M12 Connector Systems	N/A	3 - 4	1.0	5.0	*	*	*	*	*	UL, CSA
Micro-MaTch Board-to-Board & Wire-to-Board Connectors	1.27	4 - 24	N/A	0.5	*	*	*	*	*	N/A
Motorman Hybrid Connectors	N/A	13	1.0	20	*	*	*	*	*	UL, CSA, VDE, ISO/IEC, Cat5e
Quad Small Form-Factor Plus (QSFP+) Connectors	0.8	38	16.0	0.5	*	*	*	*	*	Ethernet, Infiniband
Quadrx High Speed I/O Connectors & Contacts	N/A	1 - 12	2.0	1.0	*	*	*	*	*	MIL-DTL-28999, ARINC 404, ARINC 600
RJ45 Modular Jacks	1.27	8	1.0	1.5	*	*	*	*	*	TIA, IEC, FCC, Ethernet
Small Form-Factor (SFP & SFP+) I/O Products	0.8	20	16	0.5	*	*	*	*	*	Fibre Channel, Ethernet
XFP Cages, Connectors & Module Systems	0.8	30	10.0	N/A	*	*	*	*	*	Ethernet
(3) PERSONAL COMPUTER / HANDHELD DEVICES¹										
AMPLIMITE D-Subminiature Connectors	1.27 x 2.54 - 2.74 x 2.84	9 - 120	N/A	7.5	*	*	*	*	*	SCSI 2 & 3, RS-232, ISO-11569, IPI-2, HIPPI, IEE 802.3 MII, VESA, RS-232
CHAMP Board-to-Board & Wire-to-Board Connectors	0.8 / 1.27 / 2.16	14 - 100	1.0	3.5	*	*	*	*	*	N/A
Connectors for HDMI Standards	N/A	19	10.2	0.5	*	*	*	*	*	N/A
Digital Visual Interface (DVI) Receptacles & Cable Assemblies	N/A	24 - 29	3.96	1.5	*	*	*	*	*	N/A
D-Subminiature Connectors for VGA Standard	N/A	9, 15	N/A	*	*	*	*	*	*	N/A
RJ point five Connector Systems	1.27	8	1.0	1.5	*	*	*	*	*	N/A
RJ45 Modular Jacks	1.27	8	1.0	1.5	*	*	*	*	*	TIA, IEC, FCC, Ethernet
USB Connectors	2.0	9	5.0	0.9	*	*	*	*	*	USB
(4) INSTRUMENTATION¹										
AMPLIMITE D-Subminiature Connectors	1.27 x 2.54 - 2.74 x 2.84	9 - 120	N/A	7.5	*	*	*	*	*	SCSI 2 & 3, RS-232, ISO-11569, IPI-2, HIPPI, IEE 802.3 MII, VESA, RS-232
AMPLIMITE Hybrid Connectors (Power Coax Mixed)	0.109	3 - 36	N/A	32	*	*	*	*	*	MIL ¹
CeeLok FAS-T/I/O Connectors	N/A	8	10	1.0	*	*	*	*	*	MIL-DTL-38999, 10/100/1000 Ethernet, USB2.0/3.0, SATA/eSATA
CHAMP Board-to-Board & Wire-to-Board Connectors	0.8 / 1.27 / 2.16	14 - 100	1.0	3.5	*	*	*	*	*	UL, CSA, SCSI, VHDCI
Circular Plastic Connectors (CPC)	N/A	3 - 64	N/A	5.0	*	*	*	*	*	UL, CSA, VDE (select parts)
Corcom Power Entry Modules	Refer to the Featured Product section for more product details.									UL, CSA, VDE
DEUTSCH DMC-M Single Module Connectors	2.54	1 - 20	10	90	*	*	*	*	*	EN4165, ARINC 809, BACC65, UL
DEUTSCH Wildcat High Density Connectors	1.73	3 - 64	N/A	5.0	*	*	*	*	*	N/A
Industrial RJ45 / Industrial Ethernet Connectors	1.27	4, 8	10	0.5	*	*	*	*	*	UL, CSA, Cat5e
Industrial USB Connectors	2.0	4	0.12	0.5	*	*	*	*	*	UL, CSA, USB 2.0
M8/M12 Connector Systems	N/A	3 - 4	1.0	5.0	*	*	*	*	*	UL, CSA
Micro- MaTch Board-to-Board & Wire-to-Board Connectors	1.27	2 - 24	N/A	0.5	*	*	*	*	*	N/A
Quadrx High Speed I/O Connectors & Contacts	N/A	1 - 12	2.0	1.0	*	*	*	*	*	MIL-DTL-38999, ARINC 404, ARINC 600
RJ point five Connector Systems	1.27	8	1.0	0.5	*	*	*	*	*	Ethernet
RJ45 Modular Jacks	1.27	8	1.0	1.5	*	*	*	*	*	FCC

¹ For cable assemblies using specified interconnect, visit the TE Cable Assembly website.

² May vary based on application and product selection

UL - Underwriters Laboratories Listed
 RU - Recognized Under
 CSA - Canadian Standards Association
 * - See product page on te.com for Mil specs

Data Communications / Telecommunications



Featured Products



1 AMPLIMITE D-Subminiature Connectors

- 2 • Ideal for industrial applications due to intermateability and rugged design
- 3 • Realize proven performance at competitive prices
- 4 • Support a broad range of design needs with extensive product offerings

[Website](#)

[Catalog](#)

[Virtual Sample Kit](#)



1 RJ45 Modular Jacks

- 2 • Reduce electrical noise and gain up to Cat5e performance
- 3 • Gain additional PCB space with low profile and narrow housing design
- 4 • Suitable for a broad range of applications with diverse product configurations

[Website](#)

[Catalog I](#)

[Catalog II](#)

[Quick Reference Guide](#)



1 QSFP+ Fiber Optic Transceivers

- Achieve increased data transfer rates with high speed capability
- Efficiently utilize application space with high density configuration
- Provide improved cable management with small design

[Website](#)



1 SFP+ I/O Products

- 2 • Support high density design with belly-to-belly and stacked configuration
- Maximize system thermal management with heat sink options
- Achieve high speed and high density with standardized products

[Website](#)

[Catalog](#)

[Quick Reference Guide](#)



1 CXP Connectors & Cage Assemblies

- Provide up to 120Gbps of total bandwidth in one-piece press-fit assembly
- Allow maximum system thermal management with heat-sink options
- Enable high reliability mating and unmating with robust EMI spring design

[Website](#)

[Catalog](#)



1 Quad Small Form-Factor Pluggable Plus (QSFP+) Connectors

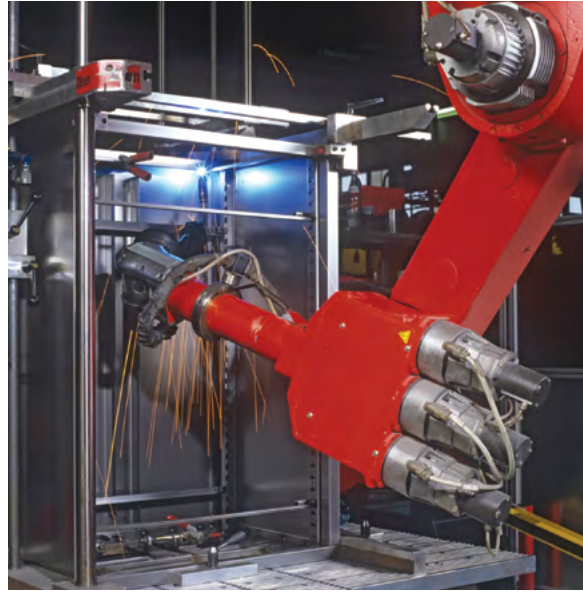
- 2 • Support a range of high speed requirements with multiple channels
- Achieve proven EMI containment with through-bezel or behind-bezel cage options
- Reduce cable clutter with direct attach copper cables for short reach applications

[Website](#)

[Catalog](#)

[Quick Reference Guide](#)

Industrial Communication / Automation & Control



Featured Products



1 CHAMP Board-to-Board & Wire-to-Board Connectors

- 2
- 3
- 4
- Satisfy board-to-board connection needs with stacking, coplanar and backplane configurations
- Offer versatility with plug and receptacle in both vertical and right angle mounting options
- Achieve durable connections with fully shrouded housings

[Website](#)



1 Circular Plastic Connectors (CPC)

- 2
- 4
- Mixed power and signal available in a single interconnect
- Ideal for harsh environments where mechanical shock, moisture and debris are prevalent
- Achieve efficient field repair with removable contacts and replaceable coupling ring

[Website](#)

[Catalog I](#)
[Catalog II](#)



1 DEUTSCH Wildcat High Density Connectors

- 2
- 4
- Enable quick and positive coupling with robust mayonet mechanism
- Provide for cable braid and boot termination with rear accessory feature
- Gain space and reduce weight with a small, lightweight design

[Website](#)
[Catalog](#)



1 Heavy Duty Connectors (HDC)

- 2
- Lower applied cost with quick and easy assembly options
- Gain machine configuration flexibility by combining power, signal and data circuits
- Withstand severe environmental conditions with IP68 configuration options

[Website](#)

[Catalog](#)



2 M8 / M12 Connector Systems

- 4
- Enable equipment interoperability through use of standard industrial interfaces
- Industrial Ethernet solutions ranging from 100Mb through 10Gb speeds
- Improve field termination time using factory made overmolded cable assemblies

[Website](#)



2 Industrial Mini I/O Connector System

- Avoid mis-mating with polarized housing options
- Increase reliability in high vibration environments with two points of contact
- Prevent unintentional plug pull-out with unique latching system

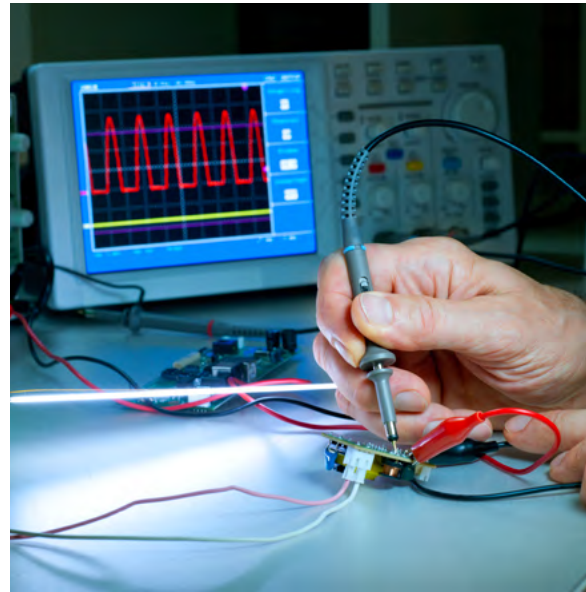
[Website](#)

[Catalog](#)

Personal Computer / Handheld Devices



Instrumentation



Featured Products



1
3
4

RJ point five Connector Systems

- Save board space with double density design and 7mm centerline spacing
- Increase installation and service efficiency with field terminable cable assemblies
- Ethernet solutions for application ranging up to 10Gb speeds

[Website](#)

[Quick Reference Guide](#)

[Video](#)



1
4

CeeLok FAS-T I/O Connectors

- Provide EMI protection in a low profile, light-weight strain relief with a backshell integrated plug
- Achieve easy termination and field repairability with crimp-snap, 39029-style contacts
- Minimize cross talk with patented, noise cancelling contract arrangement

[Website](#)

[Data Sheet](#)

[Video](#)



1
3

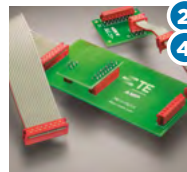
USB Connectors

- Support data transfer rates of standard USB 2.0 or the 10 times faster USB 3.0
- Optimize power efficiencies with improved device interaction and charging time
- Standard and customized styles and orientations available

[Website](#)

[Quick Reference Guide](#)

[Video](#)



2
4

Micro-MaTch Board-to-Board & Wire-to-Board Connectors

- Prevent fretting corrosion and allow for longer-lasting connection with contact spring design
- Eliminate unnecessary movement in high-vibration applications with high force contact system
- Support wide variety of design options with extensive product offering

[Website](#)

[Catalog](#)

[Quick Reference Guide](#)



3

Connectors for HDMI Standards

- Support standard, enhanced or high-definition video and multi-channel audio in one cable
- Provide secure electrical contact and smooth cable insertion/extraction with easy-to-use friction lock connector design
- Gain ESD protection with fully shielded housing

[Website](#)

[Data Sheet](#)

[Quick Reference Guide](#)



4

Corcom Power Entry Modules

Series	Type	Rated Current / Voltage (max)	Agency Approvals
CU Series	Compact 1U height switched power entry module	1 - 15A / 250 VAC	UL, CSA, VDE
Medium P Series	Versatile power entry module with reduced size	3 - 10A / 250 VAC	UL, CSA, VDE

For a complete list of TE's Corcom EMI/RFI filters,

visit: www.corcom.com

[Website](#)

[Catalog](#)

[Quick Reference Guide](#)

LET'S CONNECT

TE Connectivity (TE) is your communication I/O solutions provider for electronic interconnect. Whether you are designing a new system or retrofitting an existing system, this solutions guide will help you select the required I/O components with easy access to additional online information through te.com. TE's broad portfolio of I/O interconnect, from high speed data transfer to rugged industrial communications, satisfies the needs of diverse markets and will help you solve size and data rate challenges with your next I/O design.

Technical Support

te.com/support-center

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