6450830-1 ✔ ACTIVE

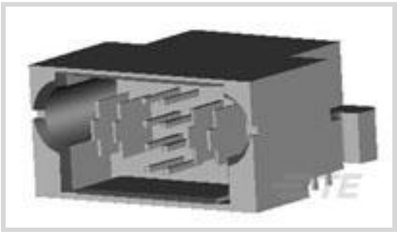
MULTI-BEAM

TE Internal #: 6450830-1

Rectangular Power Connectors, Header, Plug, Board-to-Board, 12 Position, 2.54 mm / 2.92 mm [.1 in / .115 in] Centerline, Printed Circuit Board

View on TE.com >

Connectors > Power Connectors > Rectangular Power > Rectangular Power Connectors



Rectangular Power Connector Type: **Header**

Connector & Housing Type: **Plug**

Connector System: **Board-to-Board**

Number of Positions: **12**

Centerline (Pitch): **2.54 mm, 2.92 mm [.1 in, .115 in]**

Features

Product Type Features

Header Type	Fully Shrouded
Rectangular Power Connector Type	Header
Connector & Housing Type	Plug
Connector System	Board-to-Board
Sealable	No
Connector & Contact Terminates To	Printed Circuit Board

Configuration Features

Number of Positions	12
PCB Mount Orientation	Right Angle
Number of Power Positions	4
Number of Signal Positions	8
Number of Rows	4

Electrical Characteristics

Operating Voltage	60 VDC

Contact Features

Power Contact Base Material	Tin
Contact Underplating Material	Nickel
Contact Current Rating (Max)	50 A

Contact Retention Within Housing	Without
Contact Type	Blade, Pin
PCB Contact Termination Area Plating Material	Tin
Contact Mating Area Plating Material	Gold Flash over Palladium Nickel
Contact Mating Area Plating Material Thickness	.076 µm[3 µin]
Underplate Material Thickness	4.45 µm

Termination Features

Termination Post & Tail Length	4.45 mm[.175 in]
Termination Method to Printed Circuit Board	Through Hole - Solder

Mechanical Attachment

PCB Mount Retention	Without
Connector Mounting Type	Board Mount

Housing Features

Centerline (Pitch)	2.54 mm, 2.92 mm[.1 in][.115 in]
Housing Color	Black
Housing Material	High Temperature Thermoplastic

Dimensions

Row-to-Row Spacing	2.54 mm[.1 in]

Usage Conditions

Operating Temperature Range	-40 – 125 °C[-40 – 257 °F]

Operation/Application

Circuit Application	Power & Signal

Industry Standards

UL Flammability Rating	UL 94V-0
Glow Wire Rating	High Temperature Part - Not Glow Wire

Packaging Features

Packaging Method	Tray

Product Compliance

For compliance documentation, visit the product page on TE.com>

EU RoHS Directive 2011/65/EU	Compliant
EU ELV Directive 2000/53/EC	Compliant

China RoHS 2 Directive MIIT Order No 32, 2016	No Restricted Materials Above Threshold
EU REACH Regulation (EC) No. 1907/2006	Current ECHA Candidate List: JUNE 2022 (224) Candidate List Declared Against: JUNE 2022 (224) Does not contain REACH SVHC
Halogen Content	Not Low Halogen - contains Br or Cl > 900 ppm.
Solder Process Capability	Wave solder capable to 265°C

Product Compliance Disclaimer

This information is provided based on reasonable inquiry of our suppliers and represents our current actual knowledge based on the information they provided. This information is subject to change. The part numbers that TE has identified as EU RoHS compliant have a maximum concentration of 0.1% by weight in homogenous materials for lead, hexavalent chromium, mercury, PBB, PBDE, DBP, BBP, DEHP, DIBP, and 0.01% for cadmium, or qualify for an exemption to these limits as defined in the Annexes of Directive 2011/65/EU (RoHS2). Finished electrical and electronic equipment products will be CE marked as required by Directive 2011/65/EU. Components may not be CE marked. Additionally, the part numbers that TE has identified as EU ELV compliant have a maximum concentration of 0.1% by weight in homogenous materials for lead, hexavalent chromium, and mercury, and 0.01% for cadmium, or qualify for an exemption to these limits as defined in the Annexes of Directive 2000/53/EC (ELV). Regarding the REACH Regulation, the information TE provides on SVHC in articles for this part number is based on the latest European Chemicals Agency (ECHA) 'Guidance on requirements for substances in articles' posted at this URL: https://echa.europa.eu/guidance-documents/guidance-on-reach

Compatible Parts

TE Part # 3-6450832-8
MBXL R/A HEADER 3ACP + 4P + 24S

TE Part # 2159562-1
CABLE ASSY, PRESS FIT POWER,FB.

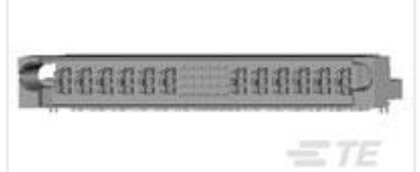
TE Part # 1892301-1
MBXL R/A HDR DB 12S+11P

TE Part # 6450860-1
MBXLE VERT RCPT 2LP+8S+2LP

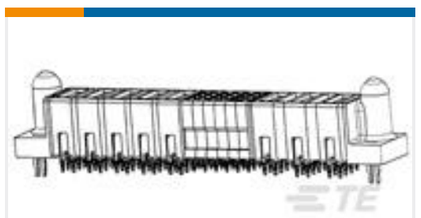
TE Part # 6450152-8
MBXL VERT RCPT 3ACP+6P+24S

TE Part # 6450553-5
MBXL VERT RCPT 6ACP

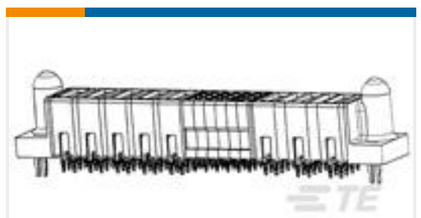
TE Part # 6450553-4
MBXL VERT RCPT 9P



TE Part # 1892100-3
MBXL R/A HDR 6P+24S+6P



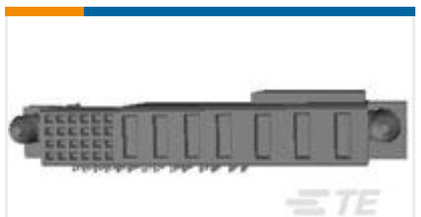
TE Part # 1892430-4
MBXL VERT RCPT 6P+24S+6P



TE Part # 1892430-5
MBXL VERT RCPT 2P+24S+2P

TE Part # 3-6450830-2
MBXL R/A HDR 4ACP + 12S + 3P

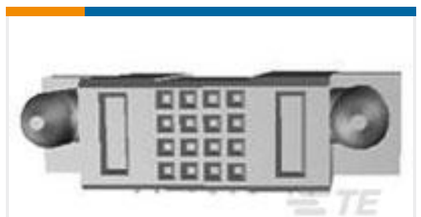
TE Part # 5-6450550-7
MBXL VERT RCPT 4P+24S+4P



TE Part # 6450378-1
MBXL R/A RCPT 3ACP+4P+24S

TE Part # 6450530-4
MBXL R/A HDR 2P+24S+2P

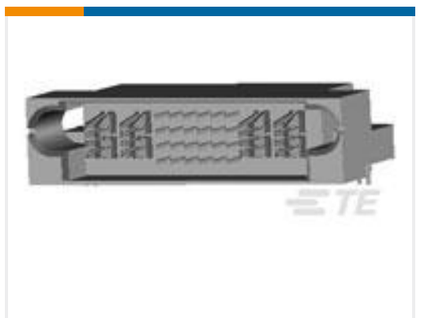
TE Part # 6450551-6
MBXL VERT RCPT 24S+10HDP



TE Part # 6450570-9
MBXL R/A RCPT 1P+16S+1P

TE Part # 6600120-2
MBXL R/A HDR DB 24S+6P

TE Part # 6450824-9
MBXL VERT HDR STR 7ACP



TE Part # 4-6450120-7
MBXL R/A HDR 2P+24S+2P

TE Part # 1-6600132-5
MBXL R/A HDR DB 2ACP + 12S + 1P

Documents

Product Drawings

MBXL R/A HDR 2LP + 8S + 2LP

English

CAD Files

3D PDF

3D

Customer View Model

ENG_CVM_CVM_6450830-1_J5.2d_dxf.zip

English

Customer View Model

ENG_CVM_CVM_6450830-1_J5.3d_igs.zip

English

Customer View Model

ENG_CVM_CVM_6450830-1_J5.3d_stp.zip

English

By downloading the CAD file I accept and agree to the Terms and Conditions of use.

Datasheets & Catalog Pages

POWER_CONNECTORS_CATALOG_SEC01_BOARD_TO_BOARD

English

MULTI-BEAM XLE Connectors Quick Reference Guide

English

2_PIECE_POWER_CONNECTORS_qrg_4-1773458-1

English

Product Specifications

Application Specification

English

Product Environmental Compliance

Product Compliance

English

Product Compliance

English

Agency Approvals

UL Report

English