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Part Number: **0480334900**
Status: **Active**
Overview: magnetic modular jacks
Description: Modular Jack, Right Angle, 10/100 Ethernet, Stacked 2x8, with LED and Magnetics, Lead Free

Documents:

[3D Model](#) [Product Specification PS-48033-002 \(PDF\)](#)
[Drawing \(PDF\)](#) [RoHS Certificate of Compliance \(PDF\)](#)

General

Product Family	Modular Jacks/Plugs
Series	48033
Comments	With LED Tail Length: 2.50mm (.098")
Component Type	PCB Jack
Magnetic	Yes
Overview	<u>magnetic modular jacks</u>
Performance Category	5
Power over Ethernet (PoE)	Non-PoE
Product Name	Magnetic Jack

Physical

Boot Color	N/A
Color - Resin	Black
Durability (mating cycles max)	750
Inverted / Top Latch	Yes
Keying to Mating Part	Yes
Lightpipes/LEDs	LEDs
Material - Metal	Brass, Phosphor Bronze
Material - Plating Mating	Gold
Material - Plating Termination	Tin
Material - Resin	Nylon
Orientation	Right Angle (Side Entry)
PCB Locator	Yes
PCB Retention	Yes
PCB Thickness Recommended (in)	0.079 In
PCB Thickness Recommended (mm)	2.00 mm
Packaging Type	Tray
Ports	16
Positions / Loaded Contacts	8/8
Surface Mount Compatible (SMC)	No
Temperature Range - Operating	-40°C to +85°C
Termination Interface: Style	Through Hole
Waterproof / Dustproof	No
Wire/Cable Type	N/A

Electrical

Current - Maximum per Contact	1.5A
Grounding to PCB	Yes
Grounding to Panel	Panel Ground Tab
Shielded	Yes
Voltage - Maximum	150V AC

Material Info

Reference - Drawing Numbers

Packaging Specification	PK-48033-005
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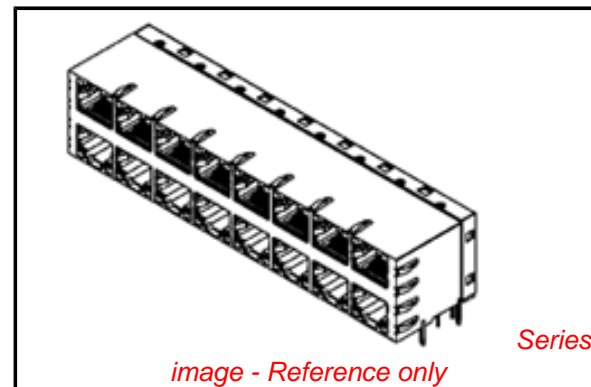


image - Reference only

EU RoHS

**ELV and RoHS
Compliant**
**REACH SVHC
Not Reviewed**
**Halogen-Free
Status
Not Reviewed**

China RoHS



**Need more information on product
environmental compliance?**

Email productcompliance@molex.com
 For a multiple part number RoHS Certificate of Compliance, [click here](#)

Please visit the [Contact Us](#) section for any non-product compliance questions.

Search Parts in this Series

48033Series

Mates With

FCC 68 Plugs

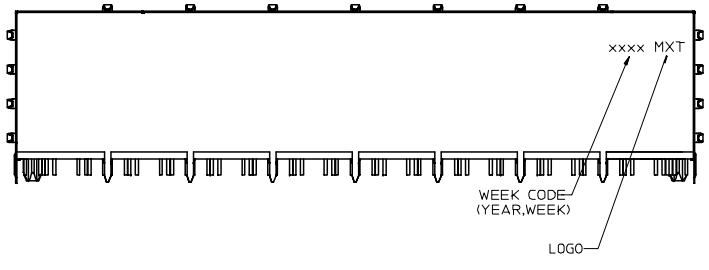
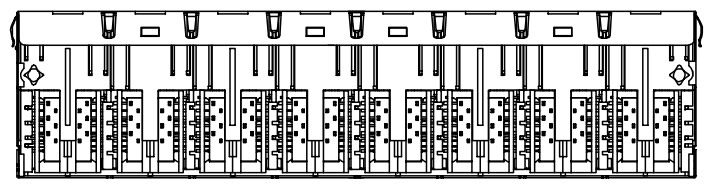
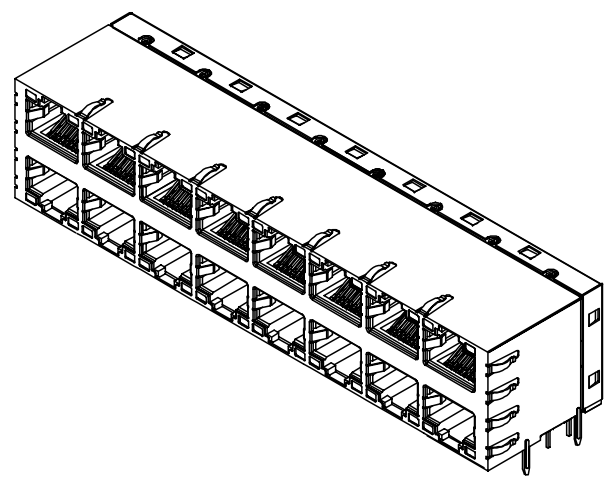
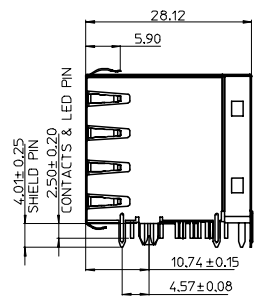
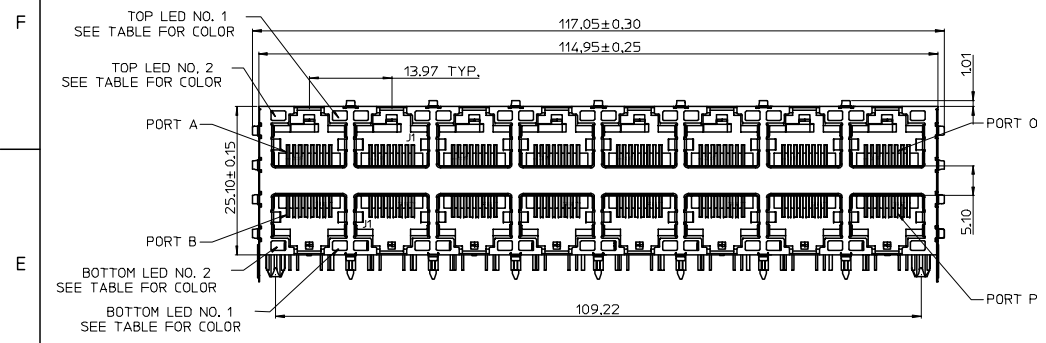
Product Specification
Sales Drawing
Test Summary

PS-48033-002
SD-48033-005
TS-48033-005

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D

C

B

A

RoHS FOR 48033-4900	DESCRIPTION
EC NO: SH2007-0131	REV
DRWN: ALLIN	2006/10/04
CHKD:	2006/10/04
APPR: WWSCHANG	2006/10/04

QUALITY SYMBOLS	DESCRIPTION
▽=0	
▽C=0	

GENERAL TOLERANCES (UNLESS SPECIFIED)	
	mm INCH
4 PLACES	± --- ± ---
3 PLACES	± --- ± ---
2 PLACES	± 0.25 ± ---
1 PLACE	± 0.25 ± ---
ANGULAR ± 3 °	
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS	

DIMENSION STYLE MM ONLY	
DRAWN BY	DATE
LINDA	2006/08/08
CHECKED BY	DATE
ALLEN LIN	2006/08/10
APPROVED BY	DATE
ERICK LAN	2006/08/10
MATERIAL NO. 48033-4900	

SCALE	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION
TITLE MODULAR JACK STACKED 2X8 RA, 10/100 ETHERNET W/ LEDS, MAGNETICS		
MOLEX INCORPORATED		
DOCUMENT NO. SD-48033-005	SHEET NO. 1 OF 3	
THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION		

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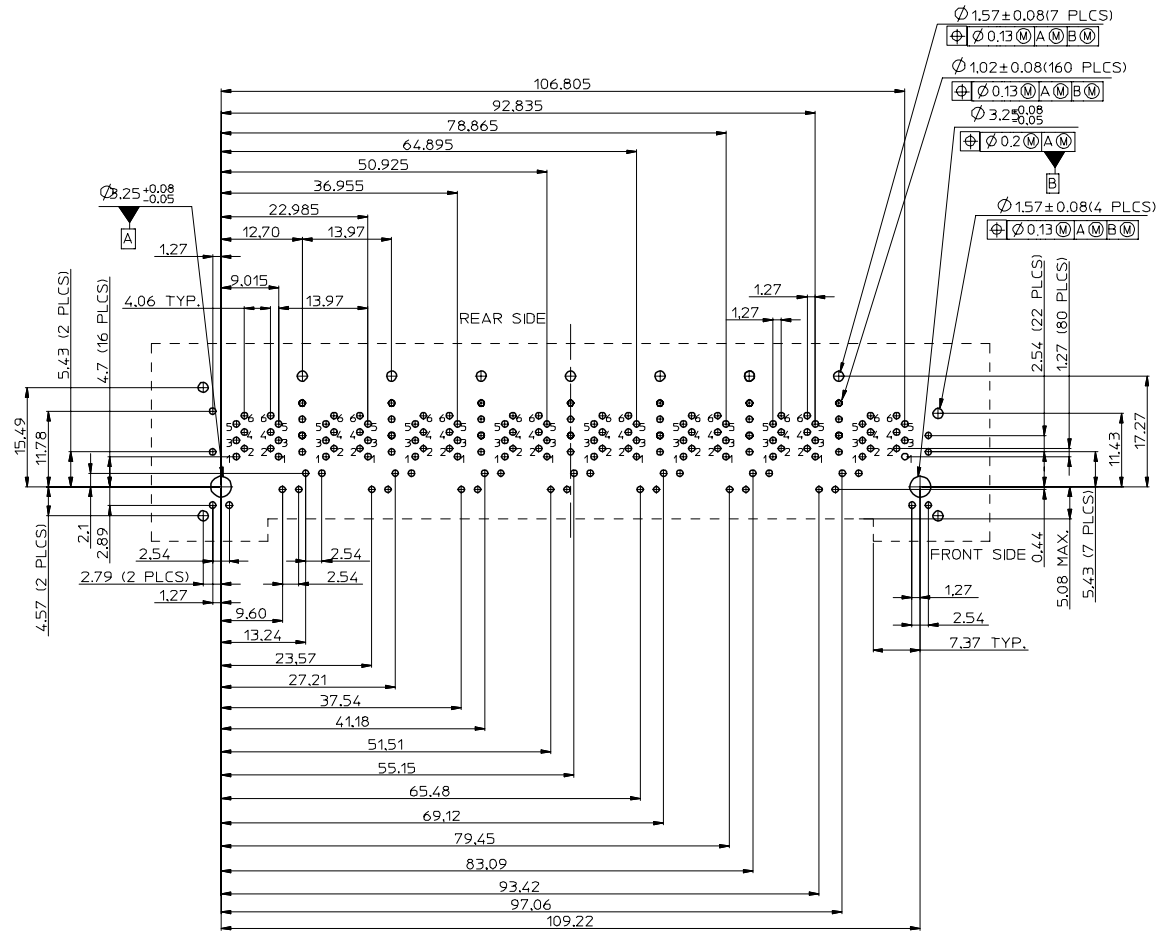
- NOTES:
 1.MATERIAL:
 PLASTIC HOUSING: POLYAMIDE, GLASS FIBER FILLED,UL94V-0,COLOR:BLACK
 SHIELD: BRASS.
 BACK SHIELD: BRASS.
 CONTACTS: PHOSPHOR BRONZE.
 LED: DIFFUSED EPOXY LENS,CARBON STEEL LEAD FRAME
 2.PLATING:
 SHIELD:SOLDER TAIL,TIN(Sn) THICKNESS-100 MICRONCH MINIMUM
 UNDER PLATE(NICKEL(Ni) PLATED OVERALL (SOLDERING AVAILABLE).
 TERMINAL CONTACT AREA:GOLD(Au) THICKNESS-50 MICRONCH/127 MICROMETER
 SOLDER TAIL,TIN(Sn) THICKNESS-100 MICRONCH MINIMUM
 UNDER PLATE(NICKEL(Ni) PLATED OVERALL.
 LED:TIN/SILVER/NICKEL/COPPER PLATING
 3.MAGNETICS:
 IMPEDANCE:100 OHMS
 TRANSMIT OPEN CIRCUIT INDUCTANCE (OCL):350uH (MIN)@ 100KHZ,0.1 VRMS WITH 8 mA DC BIAS
 TURNS RATIO (CHIP:CABLE):TX:41,RX:14
 PERFORMANCE:
 TRANSMIT BIDIRECTIONAL J3 AND J6
 RECIEVE BIDIRECTIONAL J1 AND J2

FREQUENCY	INSERTION LOSS	RETURN LOSS	CROSSTALK ATTENUATION	COMMON MODE REJECTION RATIO	
				TX	RX
1.0MHZ-15.0MHZ	0.3dB(MAX)	18.0dB(MIN)	35.0dB(MIN)	46.0dB(MIN)	35.0dB(MIN)
15.1MHZ-60.0MHZ	0.6dB(MAX)	16.0dB(MIN)	26.0dB(MIN)	46.0dB(MIN)	35.0dB(MIN)
60.1MHZ-80.0MHZ	1.1dB(MAX)	15.0dB(MIN)	24.0dB(MIN)	42.0dB(MIN)	33.0dB(MIN)
80.1MHZ-100.0MHZ	1.1dB(MAX)	12.0dB(MIN)	24.0dB(MIN)	42.0dB(MIN)	33.0dB(MIN)

- DIELECTRIC (ISOLATION VOLTAGE):
 2250 VDC (1mA CUTOFF CURRENT) FOR 60 SECONDS DURATION
 WITH DECOUPLING CAP
 ALL BRIDGED ON EITHER SIDE OF MAGNETICS PACKAGE FOR
 RJ-45 CONTACT
 4.RECOMMENDED PCB THICKNESS 2.00mm(.079")
 5.SUGGESTED OPERATING CURRENT FOR THE LED IS 20mA
 6.PRODUCT SPECIFICATION REFER TO PS-48033-002
 7.TEST SUMMARY REFER TO TS-48033-005
 8.PACKAGING SPECIFICATION REFER TO PK-48033-005
 9.LEAD FREE AND RoHS COMPLIANT PRODUCT

LED ELECTRICAL SPECIFICATION

PARAMETER	YELLOW (TYP.)	GREEN (TYP.)	UNITS	TEST CONDITIONS
POWER DISSIPATION	100	100	mW	
REVERSE VOLTAGE	5	5	V	
PEAK WAVELENGTH	585	565	nm	IF=20mA
FORWARD VOLTAGE	2.1 MAX.=2.5	2.1 MAX.=2.5	V	IF=20mA

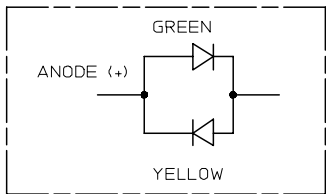


RECOMMENDED PC BOARD LAYOUT
 (VIEWED FROM COMPONENT SIDE)

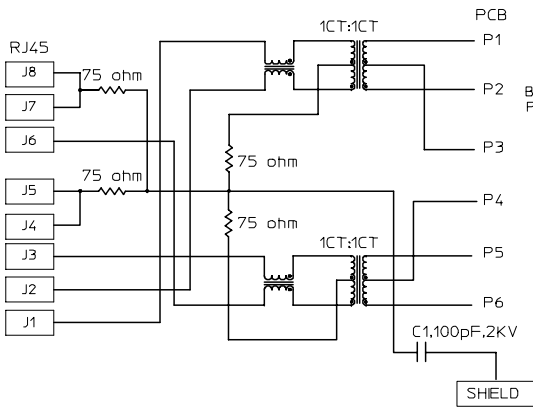
SEE SHEET 1 EC NO: SH2007-0131 DRWN:ALLIN CHKD: APPR:WMSCHANG	REV	DESCRIPTION	QUALITY SYMBOLS ▽=0 ▽=0	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE 1:1	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION	
				mm	INCH	DRAWN BY LINDA	DATE 2006/08/08	TITLE MODULAR JACK STACKED 2X8 RA, 10/100 ETHERNET W/ LEDS, MAGNETICS			
				4 PLACES ± ---	± ---	CHECKED BY ALLEN LIN	DATE 2006/08/10	MOLEX INCORPORATED			
				3 PLACES ± ---	± ---	APPROVED BY ERICK LAN	DATE 2006/08/10	DOCUMENT NO. SD-48033-005			
		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		MATERIAL NO. 48033-4900		SHEET NO. 2 OF 3					

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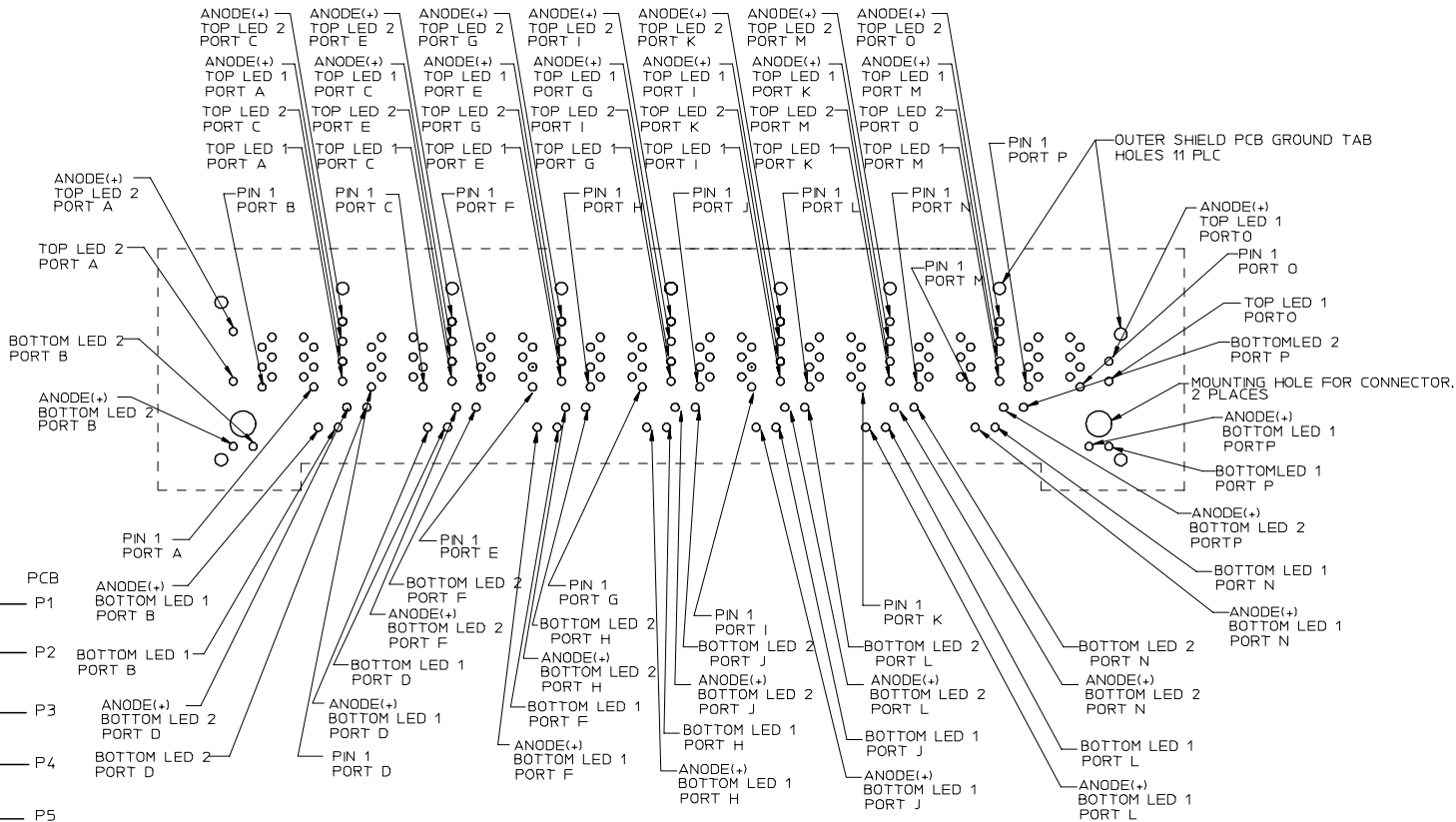
F E D C B A



BI-COLOR LED



MAGNETIC SCHEMATIC



LED HOLE DESIGNATIONS
(VIEWED FROM COMPONENT SIDE)

SEE SHEET 1 EC NO: SH2007-0131 DRWN: ALLIN CHKD: APPR: WWSCHANG 2006/10/04 2006/10/04 2006/10/04	QUALITY SYMBOLS ▽=0 ▽=0	GENERAL TOLERANCES (UNLESS SPECIFIED) mm INCH 4 PLACES ± --- ± --- 3 PLACES ± --- ± --- 2 PLACES ± 0.25 ± --- 1 PLACE ± 0.25 ± --- ANGULAR ± 3 °	DIMENSION STYLE MM ONLY DRAWN BY DATE LINDA 2006/08/08 CHECKED BY DATE ALLEN LIN 2006/08/10 APPROVED BY DATE ERICK LAN 2006/08/10	SCALE 1:1 DESIGN UNITS METRIC THIRD ANGLE PROJECTION	TITLE MODULAR JACK STACKED 2X8 RA, 10/100 ETHERNET W/ LEDS, MAGNETICS MOLEX INCORPORATED	SHEET NO. 3 OF 3
	DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS	MATERIAL NO. 48033-4900	DOCUMENT NO. SD-48033-005	SIZE A3 THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION		

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