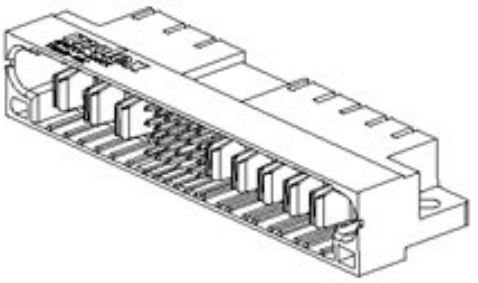
This document was generated on 05/25/2010

PLEASE CHECK WWW.MOLEX.COM FOR LATEST PART INFORMATION

Part Number: 0876639001
Status: Active
Overview: extreme_powerplus_ssi
Description: 6.35mm (.250") Pitch Power (DC), 7.62mm (.300") Pitch Power (AC), 2.54mm (.100") Pitch Signal, EXTreme PowerPlus™ Board-to-Board Header, Through Hole, Right Angle, 33 Circuits, Power Alpha 3, Signal 24, Power Beta 6, Long Contact, with Bevel



Series image - Reference only

Documents:

- 3D Model
- Drawing (PDF)
- Product Specification PS-87663-006 (PDF)
- RoHS Certificate of Compliance (PDF)

General

Product Family	PCB Headers
Series	87663
Application	Board-to-Board
Comments	<LI>Long Blade|<LI>Recessed Signal Pin : A1
Overview	extreme_powerplus_ssi
Product Literature Order No	987650-3002
Product Name	EXTreme PowerPlus™

Physical

Breakaway	No
Circuits (Loaded)	33
Circuits Detail	Power Alpha 3, Signal 24, Power Beta 6
Color - Resin	Black
First Mate / Last Break	Yes
Glow-Wire Compliant	No
Guide to Mating Part	Yes
Keying to Mating Part	Yes
Material - Metal	Copper Alloy
Material - Plating Mating	Gold
Material - Plating Termination	Tin
Material - Resin	High Temperature Thermoplastic
Number of Rows	4
Orientation	Right Angle
PC Tail Length (in)	0.135 In
PC Tail Length (mm)	3.43 mm
PCB Locator	No
PCB Retention	Yes
PCB Thickness Recommended (in)	0.062 In
PCB Thickness Recommended (mm)	1.57 mm
Packaging Type	Tray
Pitch - Mating Interface (in)	0.100 In, 0.250 In, 0.300 In
Pitch - Mating Interface (mm)	2.54 mm, 6.35 mm, 7.62 mm
Plating min: Mating (µin)	30
Plating min: Mating (µm)	0.76
Plating min: Termination (µin)	100
Plating min: Termination (µm)	2.54
Polarized to Mating Part	Yes
Polarized to PCB	Yes
Shrouded	Fully
Stackable	No
Temperature Range - Operating	-20°C to +105°C
Termination Interface: Style	Through Hole

Electrical

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

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
87663Series

Mates With
87664 PCB Receptacle with Beveled Metal Pins. 87734 Vertical PCB Receptacle

Current - Maximum per Contact	2.5A, 30A, 50A
Voltage - Maximum	250V

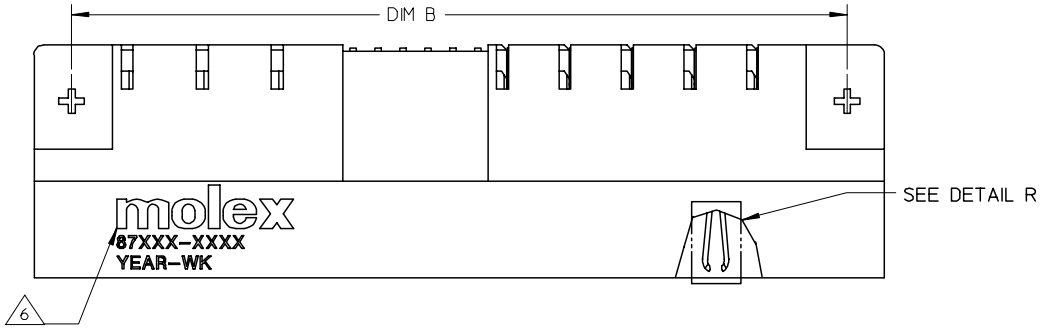
Solder Process Data

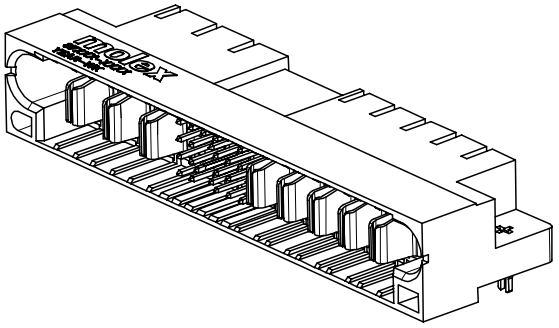
Duration at Max. Process Temperature (seconds)	10
Lead-free Process Capability	SMC & Wave Capable (TH only)
Max. Cycles at Max. Process Temperature	3
Process Temperature max. C	260

Material Info

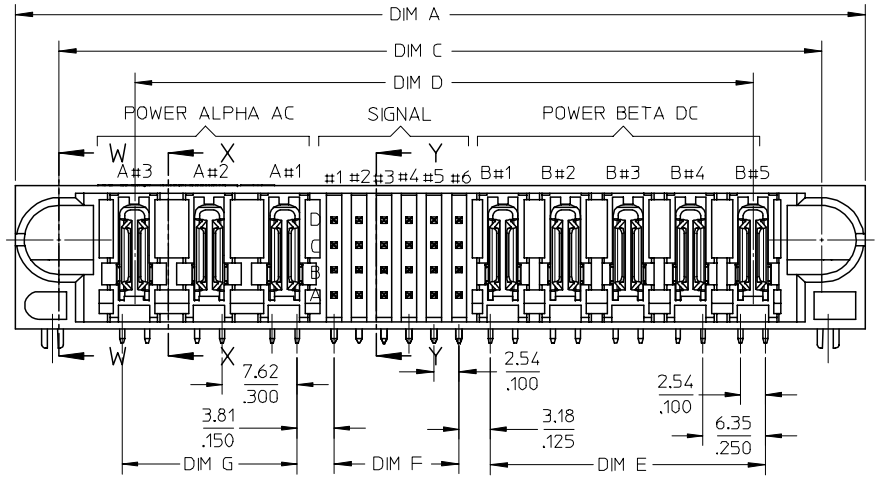
Reference - Drawing Numbers

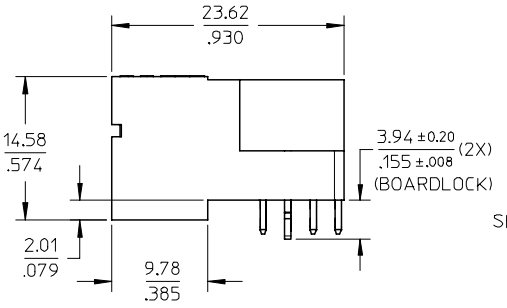
Application Specification	AS-87631-018
Product Specification	PS-87663-006
Sales Drawing	SD-87663-010

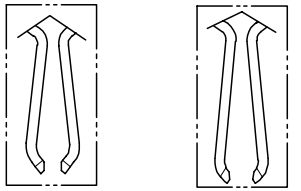




ISOMETRIC VIEW
3P(AC)-24S-5P(DC) FOR ILLUSTRATION







SHORT BLADE OPTION LONG BLADE OPTION

DETAIL R
(SEE TABLE FOR BLADE OPTION)

NOTES:

1. MATERIALS:-
   HOUSING - LCP, GLASS FILLED, UL94V-0, COLOUR: BLACK.
   SIGNAL TERMINAL - COPPER ALLOY
   POWER TERMINAL - COPPER ALLOY
2. FINISH :-
   SIGNAL & POWER CONTACTS
   0.76 MICROMETER MINIMUM GOLD (Au) AT CONTACT AREA AND
   2.54 MICROMETER MINIMUM TIN AT SOLDERTAIL AREA
   OVER 1.27 MICROMETER MINIMUM NICKEL (Ni) UNDERPLATE.
3. PRODUCT SPECIFICATION : PS-87663-006.
4. COMPONENT STAY AWAY FROM CONNECTOR.
5. PCB NOTE FOR DIAMETER 1.02/.040 PLATED HOLE.
   - DRILLED HOLE SIZE IS 1.15/ .0453.
   - PLATE WITH 0.007 / .0003 MINIMUM TIN OVER 0.03/.001
   TO 0.08/.003 COPPER PLATING TO ACHIEVE 1.02±0.08/.040±.003 HOLE.
6. MANUFACTURER LOGO, PART NUMBER AND YEAR-WEEK CODE.
7. LONG AND SHORT CONTACT POWER BLADE OPTIONS ARE AVAILABLE FOR DIFFERENT CUSTOMERS REQUIREMENT.

PDR#S-001538-00-00	2007/03/28
EC NO: S2007-0817	2007/03/28
DRWN:GMENARLY	2007/03/28
CHKD:SKANG	
APPR:MLONG	
DESCRIPTION	
REV	D3

QUALITY SYMBOLS
▼=0
▽C=0

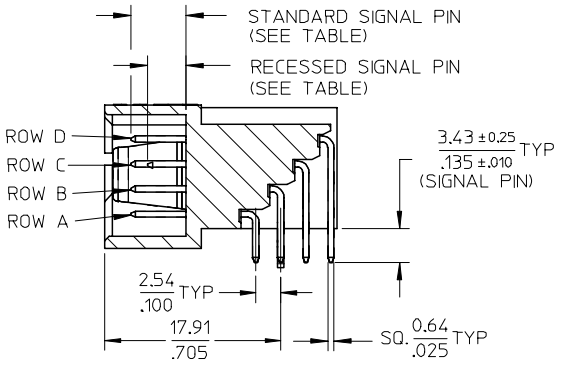
GENERAL TOLERANCES (UNLESS SPECIFIED)

	mm	INCH
4 PLACES	± ---	± ---
3 PLACES	± ---	± .010
2 PLACES	± 0.25	± ---
1 PLACE	± ---	± ---
ANGULAR ± 3 °		

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

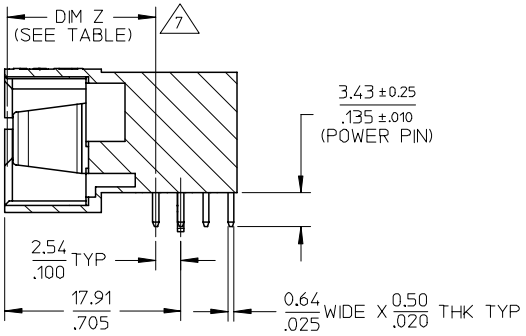
DIMENSION STYLE	MM/IN
SCALE	NTS
DESIGN UNITS	METRIC
	THIRD ANGLE PROJECTION
DRAWN BY	BHLOW
DATE	2002/11/27
CHECKED BY	PTLIM
DATE	2002/12/03
APPROVED BY	SKTOH
DATE	2002/12/03
MATERIAL NO.	SEE TABLE
TITLE	AC/DC POWER CONN. HEADER P(AC)-S-P(DC) CONFIG. RIGHT ANGLE, BOARD-LOCK
	MOLEX INCORPORATED
DOCUMENT NO.	SD-87663-010
SHEET NO.	1 OF 3
SIZE	A3

THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION



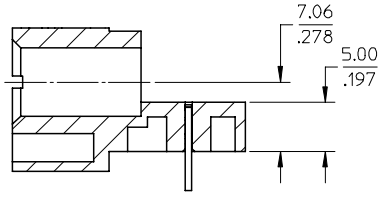
(TERMINAL LOCKING DETAIL NOT SHOWN)

SECTION Y-Y

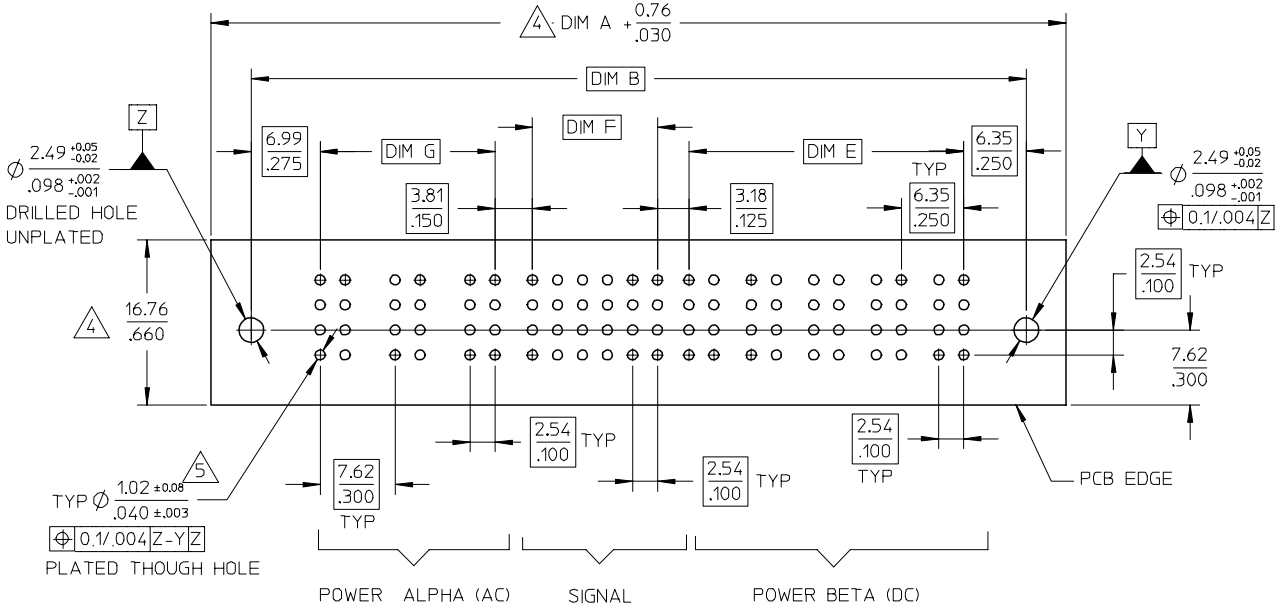


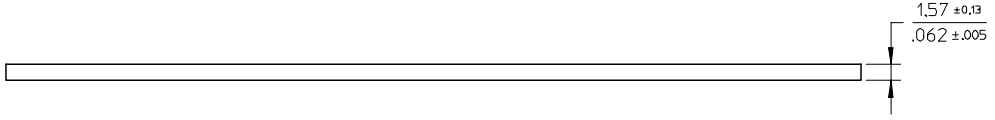
(TERMINAL LOCKING DETAIL NOT SHOWN)

SECTION X-X



SECTION W-W





RECOMMENDED PCB LAYOUT

PDR#S-001538-00-00
EC NO: S2007-0817
DRWN:GMENARLY 2007/03/28
CH'KD:SKANG 2007/03/28
APPR:MLONG 2007/03/28
DESCRIPTION
REV D3

QUALITY SYMBOLS
▼=0
▽=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

	mm	INCH
4 PLACES	± ---	± ---
3 PLACES	± ---	± .010
2 PLACES	± 0.25	± ---
1 PLACE	± ---	± ---

ANGULAR ± 3 °

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM/IN
SCALE: NTS
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

		DATE
DRAWN BY	BHLOW	2002/11/27
CHECKED BY	PTLIM	2002/12/03
APPROVED BY	SKTOH	2002/12/03

TITLE: AC/DC POWER CONN. HEADER P(AC)-S-P(DC) CONFIG. RIGHT ANGLE, BOARD-LOCK

MOLEX INCORPORATED

MATERIAL NO.: SEE TABLE
DOCUMENT NO.: SD-87663-010
SHEET NO.: 2 OF 3
SIZE: A3

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PART NUMBER	P-S-P CONFIGURATION			DIM A	DIM B	DIM C	DIM D	DIM E	DIM F	DIM G	7 POWER BLADE OPTIONS			STANDARD PIN			RECESSED PIN			VOID PIN LOCATION		PACKAGING
	POWER ALPHA AC	SIGNAL	POWER BETA DC								TYPE	DIM Z ±0.13/.005	LOCATION	ROW	COLUMN	LENGTH	ROW	COLUMN	LENGTH	ROW	COLUMN	
87663-9000	3	24	5	86.36 / 3.400	78.74 / 3.100	77.47 / 3.050	62.88 / 2.475	27.94 / 1.100	12.70 / .500	17.78 / .700	SHORT CONTACT	13.32/.524	ALL	D C B A	1,2,3,4,6 1,2,4,5,6 1,2,3,4,5 1,2,4,5,6	5.59/.220	D C B A	5 3 6 3	4.32/.170	D C B A	NIL	TRAY
87663-9001	3	24	6	92.71 / 3.650	85.09 / 3.350	83.82 / 3.300	69.22 / 2.725	34.29 / 1.350	12.70 / .500	17.78 / .700	LONG CONTACT	14.12/.556	ALL	D C B A	1 - 6 1 - 6 1 - 6 2,3,4,5,6	6.86/.270	D C B A	- - - 1	5.59/.220	D C B A	NIL	TRAY
87663-9002	3	24	4	80.01 / 3.150	72.39 / 2.850	71.12 / 2.800	56.52 / 2.225	21.59 / .850	12.70 / .500	17.78 / .700	LONG CONTACT	14.12/.556	ALL	D C B A	1 - 6 1 - 6 1,2,3,5,6 1 - 6	6.45/.254	D C B A	- - 4 -	5.18/.204	D C B A	NIL	TRAY
87663-9003	3	24	5	86.36 / 3.400	78.74 / 3.100	77.47 / 3.050	62.88 / 2.475	27.94 / 1.100	12.70 / .500	17.78 / .700	LONG CONTACT	14.12/.556	ALL	D C B A	1,2,3,4,6 1,2,4,5,6 1,2,3,4,5 1,2,4,5,6	6.86/.270	D C B A	5 3 6 3	5.59/.220	D C B A	NIL	TRAY
87663-9004	3	24	2	67.31 / 2.650	59.69 / 2.350	58.42 / 2.300	43.82 / 1.725	8.890 / 0.350	12.70 / .500	17.78 / .700	LONG CONTACT	14.12/.556	ALL	D C B A	1,2,4,5,6 1 - 6 1,2,4,5,6 1 - 6	6.86/.270	D C B A	3 - 3 -	5.59/.220	D C B A	NIL	TRAY
87663-9005	4	16	4	82.55 / 3.250	74.93 / 2.950	73.66 / 2.900	59.06 / 2.325	21.59 / 0.850	7.62 / .300	25.40 / 1.000	LONG CONTACT	14.12/.556	ALL	D C B A	ALL	6.86/.270	D C B A	NIL	NIL	D C B A	NIL	TRAY
87663-9006	3	24	5	86.36 / 3.400	78.74 / 3.100	77.47 / 3.050	62.88 / 2.475	27.94 / 1.100	12.70 / .500	17.78 / .700	LONG CONTACT	14.12/.556	ALL	D C B A	4,5,6 4,5,6 4,5,6 4,5,6	6.86/.270	D C B A	NIL	NIL	D C B A	1,2,3 1,2,3 1,2,3 1,2,3	TRAY
87663-9007	4	16	6	95.25 / 3.750	87.63 / 3.450	86.36 / 3.400	71.76 / 2.825	34.29 / 1.350	7.62 / .300	25.40 / 1.000	LONG CONTACT	14.12/.556	ALL	D C B A	ALL	6.86/.270	D C B A	NIL	NIL	D C B A	NIL	TRAY

PDR#S-001538-00-00 2007/03/28
EC NO: S2007-0817 2007/03/28
DRWN:GMENARLY 2007/03/28
CH'KD:SKANG
APPR:MLONG
DESCRIPTION
D3
REV

QUALITY SYMBOLS
▼=0
Ⓒ=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

	mm	INCH
4 PLACES	± ---	± ---
3 PLACES	± ---	± .010
2 PLACES	± 0.25	± ---
1 PLACE	± ---	± ---

ANGULAR ± 3 °

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM/IN
SCALE: NTS
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

DRAWN BY: BHLOW DATE: 2002/11/27
CHECKED BY: PTLIM DATE: 2002/12/03
APPROVED BY: SKTOH DATE: 2002/12/03

TITLE: AC/DC POWER CONN. HEADER P(AC)-S-P(DC) CONFIG. RIGHT ANGLE, BOARD-LOCK

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MATERIAL NO.: SEE TABLE
DOCUMENT NO.: SD-87663-010
SHEET NO.: 3 OF 3
SIZE: A3

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