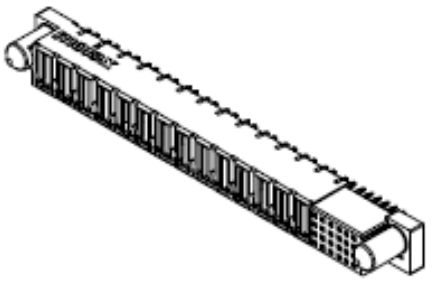
This document was generated on 05/22/2010

PLEASE CHECK WWW.MOLEX.COM FOR LATEST PART INFORMATION

Part Number: 0877102012
Status: Active
Overview: extreme_powerplus_ssi
Description: 6.35mm (.250") Pitch, Power, 2.54mm (.100") Pitch, Signal, EXTreme PowerPlus™ S-P(B) Receptacle, Press-fit, Vertical, 0.76µm (30µ") Gold (Au) Plating, 28 Circuits, Power Beta 4, Signal 24, No Recessed Power Circuit, Lead-free



Series image - Reference only

Documents:

3D Model
Drawing (PDF)
Product Specification PS-87633-006 (PDF)
RoHS Certificate of Compliance (PDF)

General

Product Family	PCB Receptacles
Series	87710
Application	Board-to-Board
Comments	No Recessed Power Circuits
Overview	extreme_powerplus_ssi
Product Name	EXTreme PowerPlus™

Physical

Circuits (Loaded)	28
Circuits Detail	Power Beta 4, Signal 24
Color - Resin	Black
Durability (mating cycles max)	100
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	Vertical
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, 0.175 In, 0.250 In
Pitch - Mating Interface (mm)	2.54 mm, 4.45 mm, 6.35 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
Temperature Range - Operating	-20°C to +105°C
Termination Interface: Style	Through Hole - Compliant Pin

Electrical

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

Material Info

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
87710Series

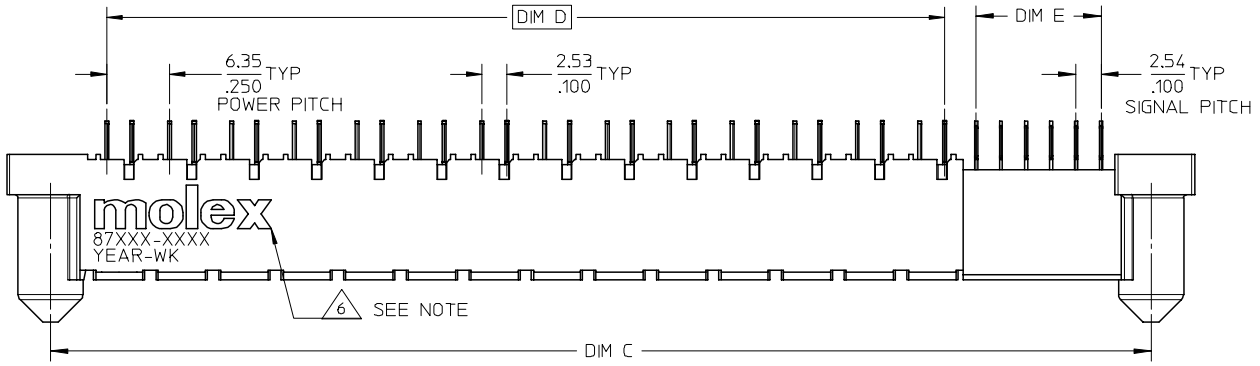
Mates With
87667 PCB Headers

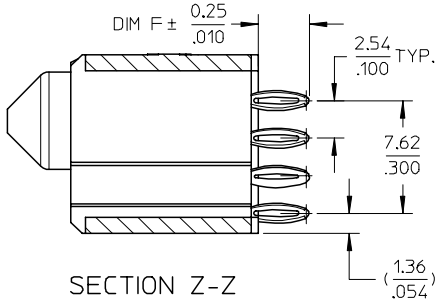
Reference - Drawing Numbers

Application Specification	AS-87631-018
Product Specification	PS-87633-006
Sales Drawing	SD-87710-011

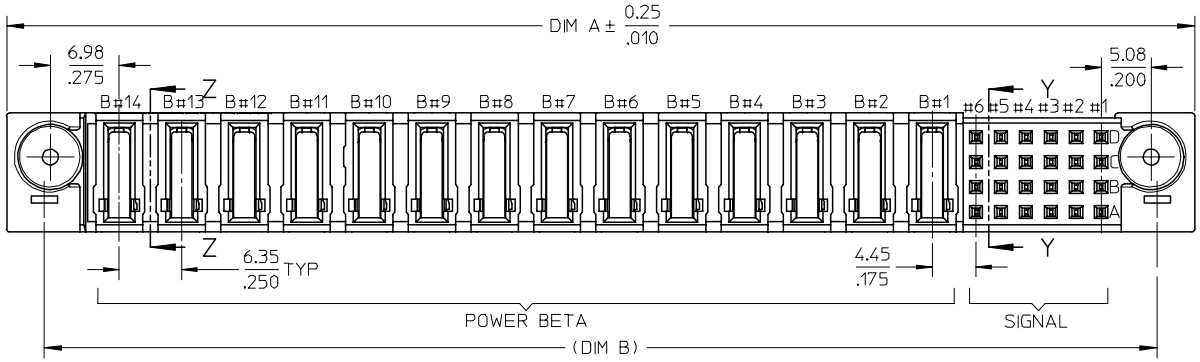
This document was generated on 05/22/2010

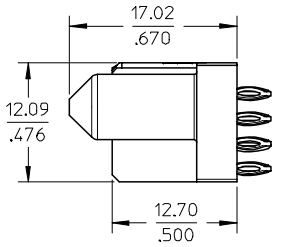
PLEASE CHECK WWW.MOLEX.COM FOR LATEST PART INFORMATION

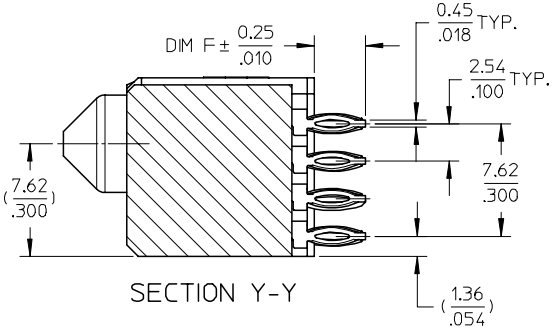




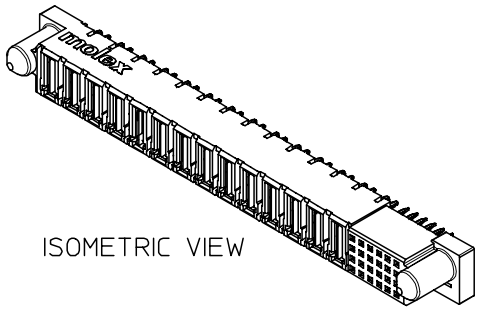
SECTION Z-Z







SECTION Y-Y



ISOMETRIC VIEW

PDR#S-001481-00-00		2006/12/26	DESCRIPTION
EC NO: S2007-0577	DRWN:KFLIM	2006/12/27	
	CHKD:MLONG		
	APPR:SKTOH	2006/12/28	
C2			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	KMGOH	DATE	2002/10/10
CHECKED BY	PTLIM	DATE	2002/11/25
APPROVED BY	SKTOH	DATE	2002/11/26
MATERIAL NO.	SEE TABLE		
SIZE	A3		

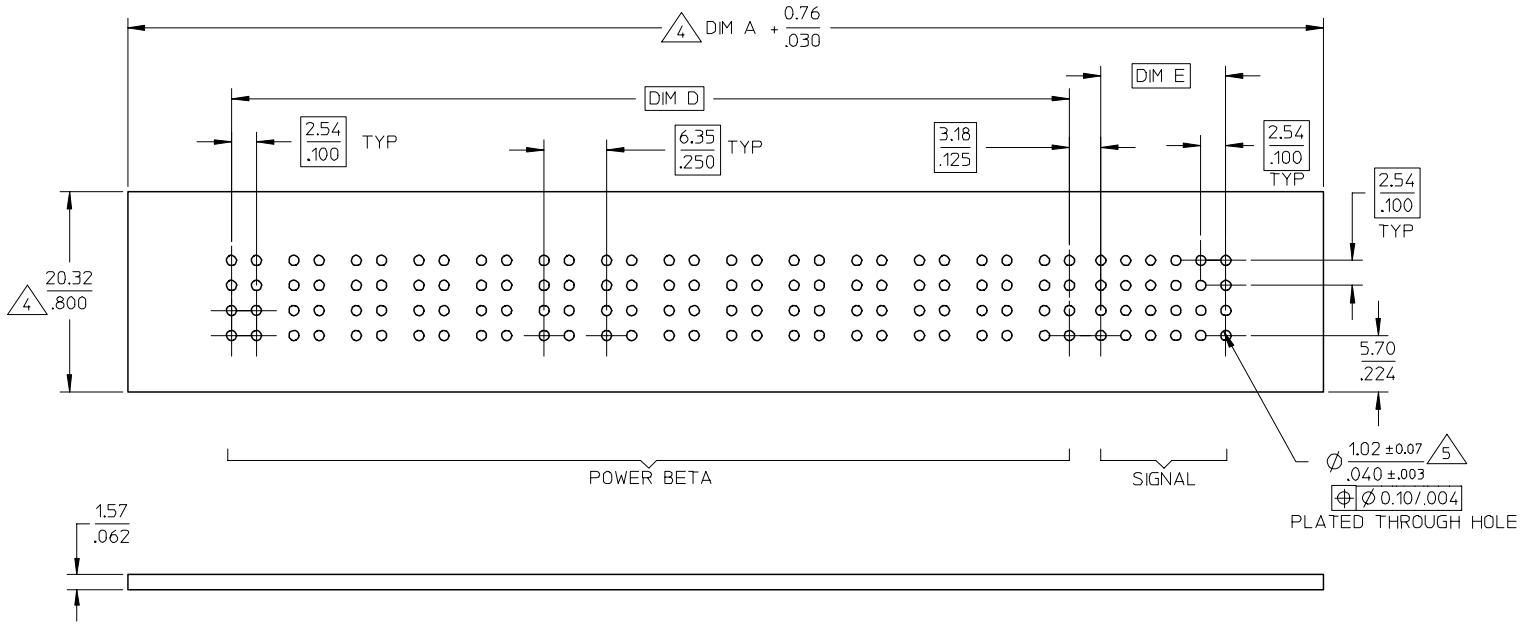
TITLE: POWER CONN. RECEPTACLE S-P(B) CONFIGURATION VERTICAL PRESS-FIT

MOLEX INCORPORATED

DOCUMENT NO. SD-87710-011

SHEET NO. 1 OF 3

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



RECOMMENDED PCB LAYOUT

CONNECTOR - NOTES

1. MATERIALS :
   HOUSING - LCP,
   GLASS FILLED, UL94-0,COLOR:BLACK.
   SIGNAL PIN - COPPER ALLOY
   POWER PIN - COPPER ALLOY
2. FINISH :
   SIGNAL & POWER CONTACTS
   0.76 MICROMETER MINIMUM GOLD (Au) AT CONTACT AREA AND
   2.54 MICROMETER MINIMUM TIN/LEAD OR TIN AT SOLDERTAIL AREA
   OVER 1.27um MIN. NICKEL (Ni) UNDERPLATE.
3. PRODUCT SPECIFICATION: PS-87633-006.
4. COMPONENT STAY AWAY ZONE FROM CONNECTOR.
5. PCB NOTE FOR DIAMETER 1.02/.040 PLATED HOLE.
   - DRILLED HOLE SIZE IS 1.151/.0453
   - PLATE WITH 0.007/.0003 MINIMUM TIN/LEAD OR TIN OVER 0.03/.001 TO 0.08/.003 COPPER PLATING TO ACHIEVE 1.02±0.08/.040±.003 HOLE.

   SEE SHEET 2 FOR RECOMMENDED PCB LAYOUT.
6. MANUFACTURER LOGO,PART NUMBER AND YEAR-WEEK CODE.
7. 14 POWER BETA-24 SIGNAL CONFIGURATION IS SHOWN FOR ILLUSTRATION ONLY.

PDR#S-001481-00-00
EC NO: S2007-0577
DRWN:KFLIM 2006/12/26
CHKD:MLONG 2006/12/27
APPR:SKTOH 2006/12/28
DESCRIPTION
REV C2

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	KMGOH	2002/10/10
CHECKED BY	PTLIM	2002/11/25
APPROVED BY	SKTOH	2002/11/26

TITLE: POWER CONN. RECEPTACLE S-P(B) CONFIGURATION VERTICAL PRESS-FIT

MOLEX INCORPORATED

MATERIAL NO.: SEE TABLE
DOCUMENT NO.: SD-87710-011
SHEET NO.: 2 OF 3
SIZE: A3

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

PART NUMBER	P-S CONFIGURATION		RECESS POWER CIRCUIT #	DIM A	DIM B	DIM C	DIM D	DIM E	DIM F ±0.25	PACKAGING	PLATING OPTION
	POWER BETA	SIGNAL									
87710-8001	14	24	NIL	120.65 / 4.750	113.03 / 4.450	111.76 / 4.400	85.09 / 3.350	12.70 / .500	3.43 / .135	TRAY	TIN/LEAD
87710-8002	6	24	NIL	69.85 / 2.750	62.23 / 2.450	60.96 / 2.400	34.29 / 1.350	12.70 / .500	3.43 / .135	TRAY	
87710-8003	6	24	B4,B5,B6	69.85 / 2.750	62.23 / 2.450	60.96 / 2.400	34.29 / 1.350	12.70 / .500	3.43 / .135	TRAY	
87710-8005	10	24	NIL	95.25 / 3.750	87.63 / 3.450	86.36 / 3.400	59.69 / 2.350	12.70 / .500	3.43 / .135	TRAY	
87710-2001	14	24	NIL	120.65 / 4.750	113.03 / 4.450	111.76 / 4.400	85.09 / 3.350	12.70 / .500	3.43 / .135	TRAY	TIN
87710-2002	6	24	NIL	69.85 / 2.750	62.23 / 2.450	60.96 / 2.400	34.29 / 1.350	12.70 / .500	3.43 / .135	TRAY	
87710-2003	6	24	B4,B5,B6	69.85 / 2.750	62.23 / 2.450	60.96 / 2.400	34.29 / 1.350	12.70 / .500	3.43 / .135	TRAY	
87710-2005	10	24	NIL	95.25 / 3.750	87.63 / 3.450	86.36 / 3.400	59.69 / 2.350	12.70 / .500	3.43 / .135	TRAY	
87710-2011	4	16	NIL	52.07 / 2.050	44.45 / 1.750	43.18 / 1.700	21.59 / .850	7.62 / .300	3.43 / .135	TRAY	
87710-2012	4	24	NIL	57.15 / 2.250	49.53 / 1.950	48.26 / 1.900	21.59 / .850	12.70 / .500	3.43 / .135	TRAY	

PDR#S-001481-00-00
EC NO: S2007-0577 2006/12/26
DRWN:KFLIM 2006/12/27
CHKD:MLONG
APPR:SKTOH 2006/12/28
DESCRIPTION
REV
C2

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: KMGOH DATE: 2002/10/10
CHECKED BY: PTLIM DATE: 2002/11/25
APPROVED BY: SKTOH DATE: 2002/11/26

TITLE: POWER CONN. RECEPTACLE S-P(B) CONFIGURATION VERTICAL PRESS-FIT

MOLEX INCORPORATED

MATERIAL NO.: SEE TABLE
DOCUMENT NO.: SD-87710-011
SHEET NO.: 3 OF 3
SIZE: A3

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