

PLEASE CHECK WWW.MOLEX.COM FOR LATEST PART INFORMATION

Part Number: [0537480708](#)
Status: **Active**
Overview: [slimstack_050mm_020_pitch](#)
Description: 0.50mm (.020") Pitch SlimStack™ Plug, Surface Mount, Dual Row, Vertical, 3.00mm (.118") Stack Height, 70 Circuits, without Vacuum Pick-up Tape

Documents:
[3D Model](#) [Product Specification PS-52991-003 \(PDF\)](#)
[Drawing \(PDF\)](#) [RoHS Certificate of Compliance \(PDF\)](#)

General

Product Family	PCB Headers
Series	53748
Application	Board-to-Board
Overview	slimstack_050mm_020_pitch
Product Name	SlimStack™

Physical

Breakaway	No
Circuits (Loaded)	70
Circuits (maximum)	70
First Mate / Last Break	No
Glow-Wire Compliant	No
Guide to Mating Part	No
Keying to Mating Part	None
Lock to Mating Part	None
Mated Height (in)	0.118 In
Mated Height (mm)	3.00 mm
Material - Metal	Brass
Material - Plating Mating	Gold
Material - Plating Termination	Gold
Number of Rows	2
Orientation	Vertical
PCB Locator	No
PCB Retention	None
Packaging Type	Embossed Tape on Reel
Pitch - Mating Interface (in)	0.020 In
Pitch - Mating Interface (mm)	0.50 mm
Plating min: Mating (µin)	4
Plating min: Mating (µm)	0.1
Polarized to PCB	No
Shrouded	Fully
Stackable	No
Temperature Range - Operating	-40°C to +105°C
Termination Interface: Style	Surface Mount

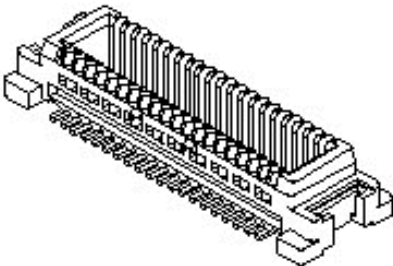
Electrical

Current - Maximum per Contact	0.5A
Voltage - Maximum	50V

Material Info

Reference - Drawing Numbers

Packaging Specification	SPK-53748-001
Product Specification	PS-52991-003, RPS-52991-013, RPS-52991-019
Sales Drawing	SD-53748-002, SD-53748-005



Series

image - Reference only

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

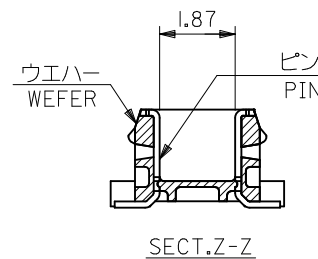
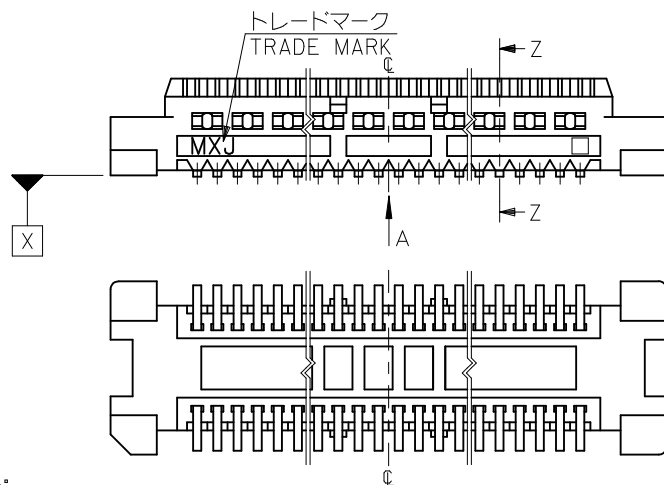
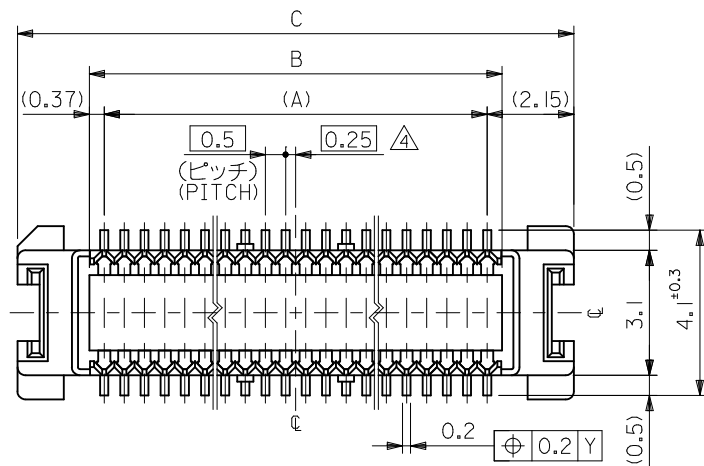
[53748Series](#)

Mates With

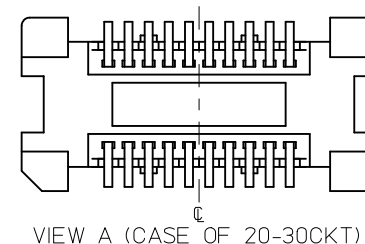
SlimStack™ Receptacle [52991](#) , [54167](#)

This document was generated on 05/26/2010

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参考基板レイアウト (マウント面)
P.C. BOARD PATTERN
DIMENSION. (REF.)
(MOUNTING AREA)



注記 NOTES:

- 使用材料 MATERIAL
ハウジング: LCPガラス入り (白), UL94V-0
HOUSING: LCP (G.F.) (COLOR: WHITE), UL94V-0
ターミナル: 黄銅 (t=0.15)
TERMINAL: BRASS (t=0.15)
- メッキ仕様 PLATING
全体仕上げ: 金メッキ 0.1 MICROMETER MIN.
ALL OVER: GOLD 0.1 MICROMETER MIN.
下地メッキ: ニッケルメッキ 1.5 MICROMETER MIN.
UNDER PLATING: NICKEL 1.5 MICROMETER MIN.
- 基準面 [X] からのソルダーテールの半田付け面のズレ量は、上方向 0 下方向 0.15MAX. とする。
MISALIGNMENT OF SOLDER TAIL FROM [X]
: UPPER DIRECTION 0, LOWER DIRECTION 0.15 MAX.
- (全極数/2) = 偶数の場合に適用。
APPLY FOR (CIRCUIT/2)=EVEN.
- 嵌合相手: 52991 シリーズ 54167 シリーズ
MATE WITH: 52991 SERIES, 54167 SERIES.
- テール平坦度は、0.1MAX.
TAIL COPLANARITY TO BE 0.1MAX.
- ELV 及び RoHS 適合品
ELV AND RoHS COMPLIANT

23.8	20.24	19.5	53748-0808	53748-0800	80
21.3	17.74	17.0	53748-0708	53748-0700	70
18.8	15.24	14.5	53748-0608	53748-0600	60
13.8	10.24	9.5	53748-0408	53748-0400	40
11.3	7.74	7.0	53748-0308	53748-0300	30
8.8	5.24	4.5	53748-0208	53748-0200	20
C	B	A	EMBOSSED TAPE ORDER No.	MATERIAL NO.	極数 CIRCUIT

REVISED	EC NO.	DRAWN	CHECKED	APPROVED	DESCRIPTION	REV	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE 8:1	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION	TITLE	DOCUMENT NO.	SHEET NO.
							10 UNDER	±0.2	DRAWN BY	DATE						
	J2010-1926	DRW:KTOYODA	2010/03/26	CHKD:SMARUYAMA	2010/03/29		10 OVER 30 UNDER	±0.25	S. AIHARA	'96/2/27				0.5 B-TO-B CONN PLUG ASSY (W/O BOSS, W/O NAIL)		
		CHKD:MSASAO	2010/03/29	APPR:MSASAO			30 OVER	±0.3	M. SASAO	'01/12/26				MOLEX INCORPORATED		
							ANGULAR	±3 °	APPROVED BY	DATE				SD-53748-002		1 OF 2
							DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		M. SASAO	'01/12/26				SEE TABLE		
									MATERIAL NO.					THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION		

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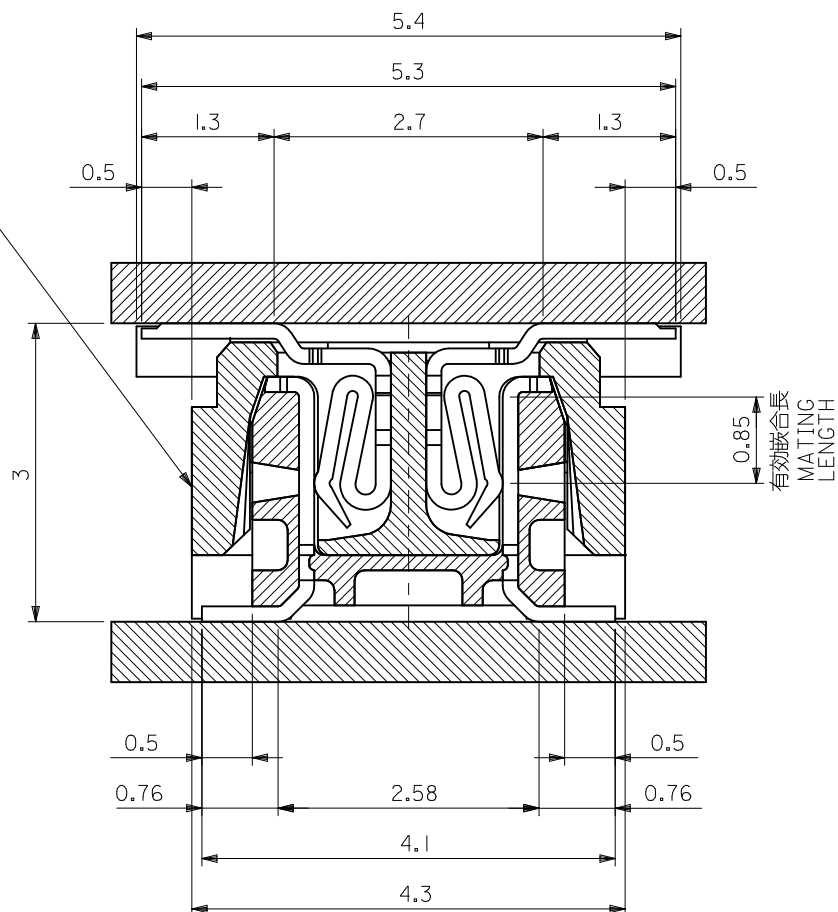
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嵌合相手 MATE WITH
52991-***0 (白 WHITE)
54167-***1 (黒 BLACK)



嵌合断面図 (参考)
MATED DRAWING (REF.)

MODEL NO. 53748-***0

REVISED EC NO.: J2010-1926 DRAWN: K. TOYODA CHKD.: S. MARUYAMA APPR.: M. SASAO	DESCRIPTION	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE 8:1	DESIGN UNITS METRIC	 THIRD ANGLE PROJECTION				
		10 UNDER	± ---	DRAWN BY S. AIHARA	DATE '96/2/27	TITLE 0.5 B-TO-B CONN PLUG ASSY (W/O BOSS ,W/O NAIL)						
		10 OVER 30 UNDER	± ---	CHECKED BY M. SASAO	DATE '01/12/26							
		30 OVER	± ---	APPROVED BY M. SASAO	DATE '01/12/26				 MOLEX INCORPORATED			
		ANGULAR ± --- °		MATERIAL NO.		DOCUMENT NO.						SHEET NO.
		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		SEE TABLE		SD-53748-002						2 OF 2
		REV	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION									

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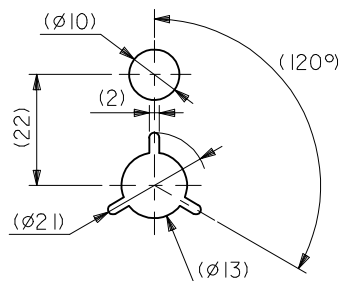
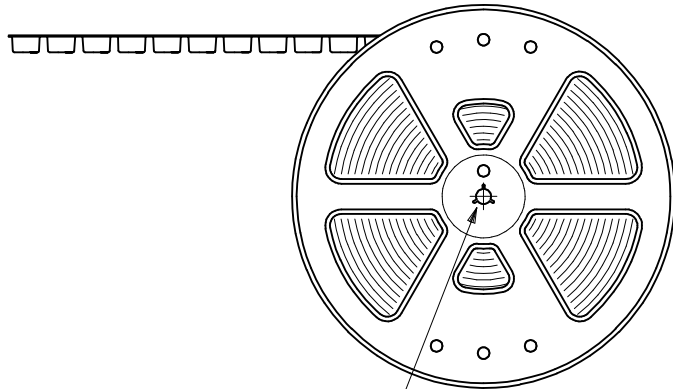
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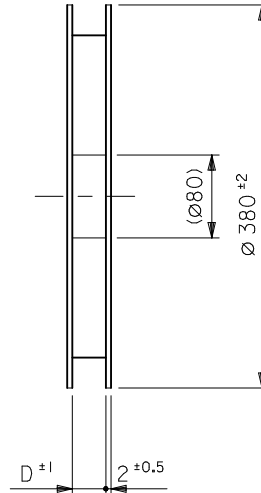
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引き出し方向
PULL OUT
DIRECTION



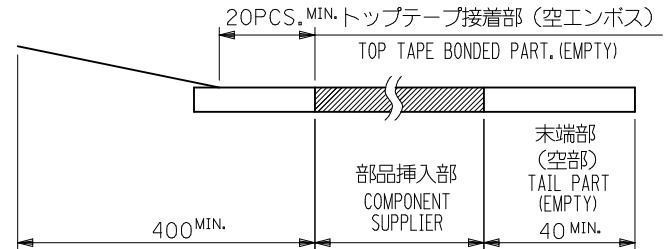
DETAIL "F"



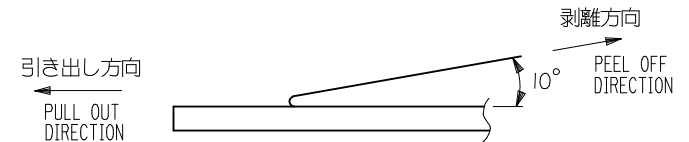
引き出し方向
PULL OUT
DIRECTION

NOTES

- 製品詳細寸法については図面 SD-53748-002 を参照下さい。
RE DETAILED DIMENSION, SEE SD-53748-002
- 梱包数量：3000個/リール
NUMBER OF CONNECTORS : 3000PCS/REEL
- リードテープ長さ LEAD TAPE LENGTH



4. トップテープの剥離強度：0.1N ～ 0.7N(10.2gf ～ 71.4gf)
(剥離方向は下図参照)
尚、本規格値は出荷時に適用。(但し、輸送時に剥離が発生しないこと。)
PEELING OFF FORCE OF TOP TAPE : 0.1N ～ 0.7N(10.2gf ～ 71.4gf)
(PEELING DIRECTION AS SHOWN IN FOLLOWING FIG.)
THIS REQUIREMENT SHOULD BE APPLIED AT SHIPMENT.
PEEL OFF SHOULD NOT BE ALLOWED , DURING TRANSPORTATION.



5. 材料(MATERIAL)
キャリアテープ(CARRIER TAPE)：ポリプロピレン(POLYPROPYLENE)
トップテープ(TOPTAPE)：PET , PE , PEF
リール(REEL)：ポリスチレン (PS) <リサイクル材を含む>
POLYSTYREN(PS) <RECYCLE MATERIAL CONTAINED>

MODEL NO. 53748-***8

REVISED EC NO.: J2009-0487 DWGN:NAKAMURA CHK'D: HARUYAMA APPR:NAKITA	DESCRIPTION	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE ---	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION		
		10 UNDER	±0.2	DRAWN BY T. NIITSU	DATE '95/10/17	TITLE 0.5 BTB CONN PLUG (BOSS,NAIL)EMBSTP PKG				
		10 OVER 30 UNDER	±0.25	CHECKED BY T. ITO	DATE '01/1/23					
		30 OVER	±0.3	APPROVED BY M. FUKUSHIMA	DATE '01/1/23	MOLEX INCORPORATED				
		ANGULAR ±3 °		MATERIAL NO.						
		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		SEE TABLE		SD-53748-005		1 OF 5		
0	REV	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION								

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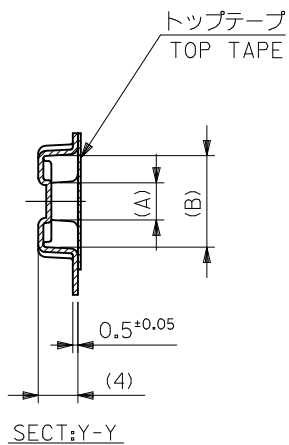
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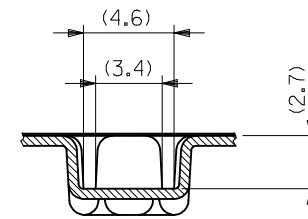
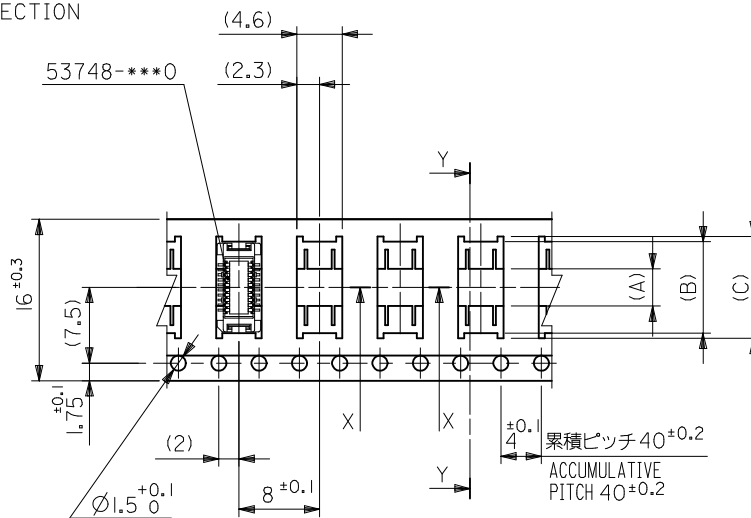
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引き出し方向
PULL OUT DIRECTION



16mm幅キャリアテープ
16mm WIDTH CARRIER TAPE



16	17.5	10.1	9.1	3.7	53748-0208	20
キャリアテープ幅 CARRIER TAPE WIDTH	D	(C)	(B)	(A)	MATERIAL NO.	極数 CKT.
					MODEL NO.	53748-***8

REVISED EC NO: J2009-0487 DRWN:NAKAMURA 2008/12/08 CHKD:T. HARUYAMA 2008/12/08 APPR:NUKITA 2009/01/09	DESCRIPTION	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE ---	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION		
		10 UNDER	± ---	T. NIITSU	DATE '95/10/17	TITLE 0.5 BTB CONN PLUG(W/O BOSS W/O NAIL)EMBSTP PKG				
		10 OVER 30 UNDER	± ---	CHECKED BY T. ITO	DATE '01/1/23					
		30 OVER	± ---	APPROVED BY M. FUKUSHIMA	DATE '01/1/23	MOLEX INCORPORATED				
		ANGULAR ± --- °		MATERIAL NO.						
		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		SEE TABLE		SD-53748-005			2 OF 5	
	REV	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION								

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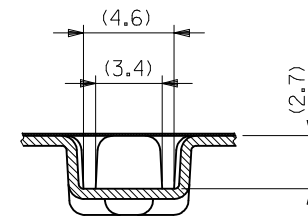
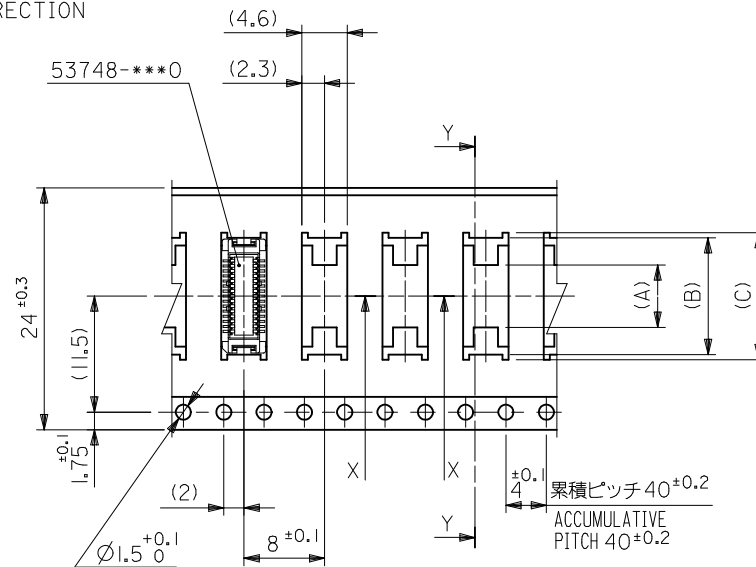
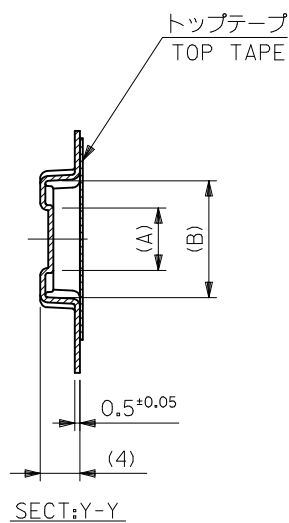
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引き出し方向
PULL OUT DIRECTION



SECT:X-X
(SCALE:4-1)

24mm幅キャリアテープ
24mm WIDTH CARRIER TAPE

24	25.5	15.1	14.1	7.4	53748-0408	40
		12.6	11.6	4.9	53748-0308	30
キャリアテープ幅 CARRIER TAPE WIDTH	D	(C)	(B)	(A)	MATERIAL NO.	極数 CKT.

MODEL NO. 53748-***8

REVISED EC NO.: J2009-0487 DRWN: NAKAMURA CHKD: T. HARUYAMA APPR: NUKITA	DESCRIPTION	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE ---	DESIGN UNITS METRIC	 THIRD ANGLE PROJECTION
		10 UNDER	± ---	DRAWN BY S. AIHARA	DATE '96/4/1	TITLE 0.5 BTB CONN PLUG(W/O BOSS W/O NAIL)EMBSTP PKG		
		10 OVER 30 UNDER	± ---	CHECKED BY T. ITO	DATE '01/1/23			
		30 OVER	± ---	APPROVED BY M. FUKUSHIMA	DATE '01/1/23			
		ANGULAR ± --- °		MATERIAL NO.				
	DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		SEE TABLE		SD-53748-005		3 OF 5	
	D	REV	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION					

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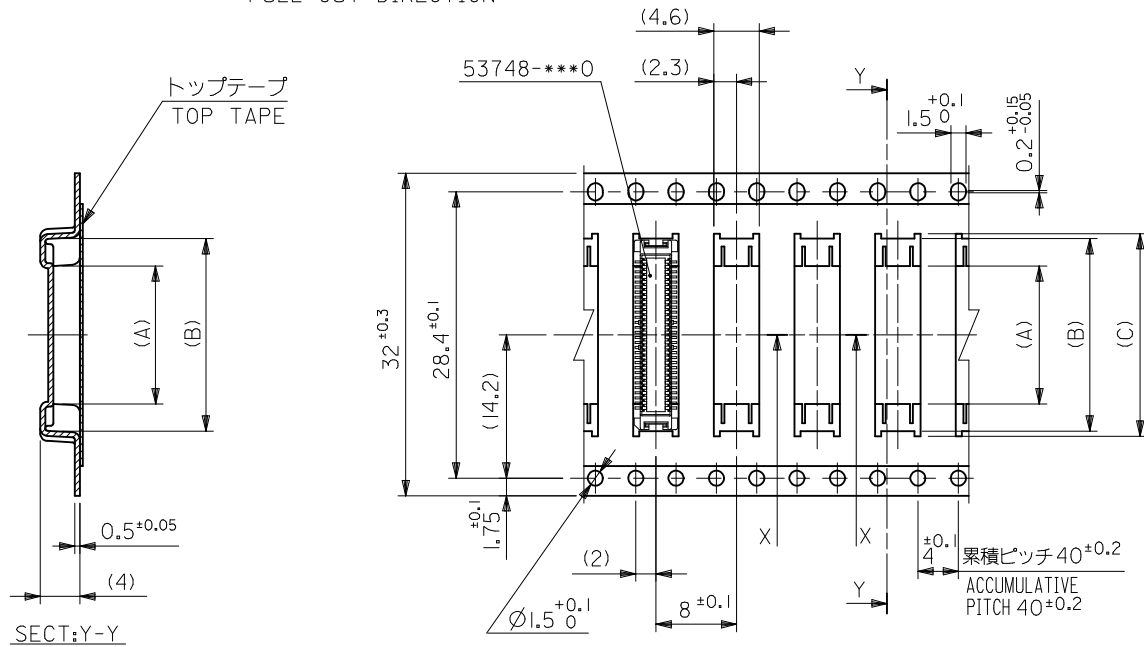
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引き出し方向
PULL OUT DIRECTION



32mm幅キャリアテープ
32mm WIDTH CARRIER TAPE

32	33.5	20.1	19.1	13.7	53748-0608	60
キャリアテープ幅 CARRIER TAPE WIDTH	D	(C)	(B)	(A)	MATERIAL NO.	極数 CKT.
MODEL NO.					53748-***0	

REVISED EC NO: J2009-0487 DRWN: NAKAMURA CHKD: T. HARUYAMA APPR: NUKITA	DESCRIPTION REV	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE ---	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION		
		10 UNDER	± ---	DRAWN BY S. AIHARA	DATE '95/11/13	TITLE 0.5 BTB CONN PLUG (W/O BOSS W/O NAIL)ENBSTP PKG				
		10 OVER 30 UNDER	± ---	CHECKED BY T. ITO	DATE '01/1/23					
		30 OVER	± ---	APPROVED BY M. FUKUSHIMA	DATE '01/1/23	MOLEX INCORPORATED				
		ANGULAR ± --- °		MATERIAL NO.						
		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		SEE TABLE		SD-53748-005		4 OF 5		
	D	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION								

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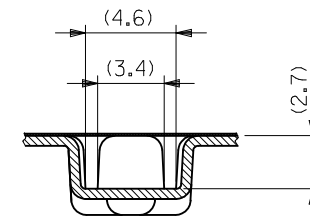
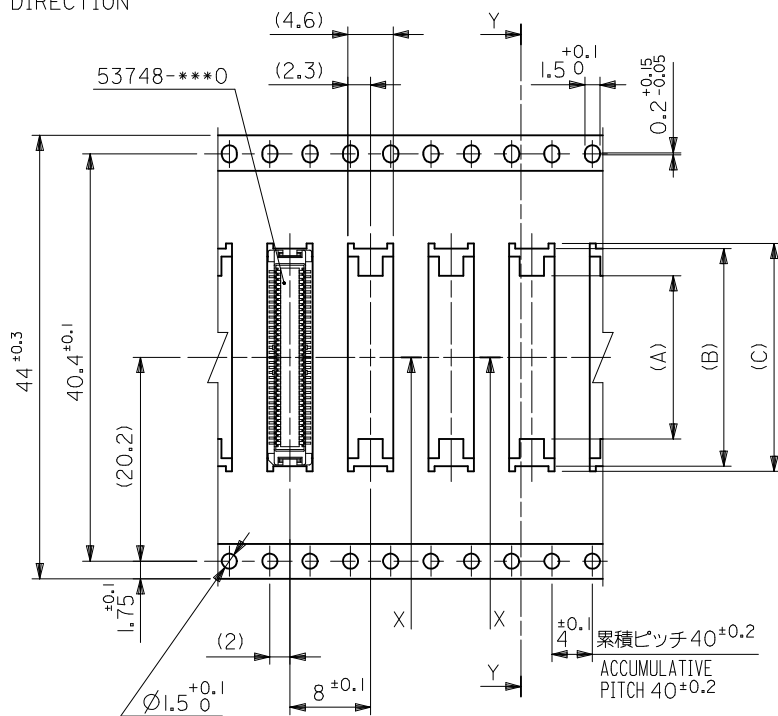
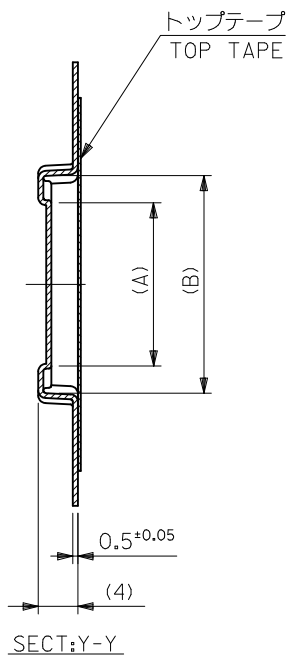
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10 9 8 7 6 5 4 3 2 1

引き出し方向
PULL OUT DIRECTION



SECT:X-X
(SCALE:4-1)

44mm幅キャリアテープ
44mm WIDTH CARRIER TAPE

44	45.5	25.1	24.1	18.7	53748-0808	80
		22.6	21.6	16.2	53748-0708	70
キャリアテープ幅 CARRIER TAPE WIDTH	D	(C)	(B)	(A)	MATERIAL NO.	極数 CKT.
					MODEL NO.	53748-***8

REVISED EC NO.: J2009-0487 DRWN: NAKAMURA CHKD: T. HARUYAMA APPR: NUKITA	DESCRIPTION	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE ---	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION		
		10 UNDER	± ---	DRAWN BY T. YASUI	DATE '96/4/16	TITLE 0.5 BTB CONN PLUG(W/O BOSS W/O NAIL)EMBSTP PKG				
		10 OVER 30 UNDER	± ---	CHECKED BY T. ITO	DATE '01/1/23					
		30 OVER	± ---	APPROVED BY M. FUKUSHIMA	DATE '01/1/23	MOLEX INCORPORATED				
		ANGULAR ± --- °		MATERIAL NO.						
		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		SEE TABLE		SD-53748-005			5 OF 5	
	REV	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION								