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Part Number: [0525593052](#)
Status: **Active**
Overview:
Description: 0.50mm (.020") Pitch FFC/FPC Connector, Vertical, SMT, ZIF, 30 Circuits, Lead-free, Gold Contact Plating, High Barrier Packaging

Agency Certification

UL E29179

General

Product Family FFC/FPC Connectors
 Series 52559
 Overview ffc_fpc_smt
 Product Name N/A

Physical

Circuits (Loaded) 30
 Contact Position N/A
 Durability (mating cycles max) 20
 Entry Angle Vertical
 Flammability 94V-0
 Mated Height (in) 0.154 In
 Mated Height (mm) 3.90 mm
 Material - Metal Phosphor Bronze
 Material - Plating Mating Gold
 Material - Plating Termination Tin
 Material - Resin Nylon
 Number of Rows 1
 Orientation Vertical
 PCB Locator No
 PCB Retention Yes
 Packaging Type Embossed Tape on Reel
 Pitch - Mating Interface (in) 0.020 In
 Pitch - Mating Interface (mm) 0.50 mm
 Polarized to PCB No
 Stackable No
 Temperature Range - Operating -20°C to +85°C
 Termination Interface: Style Surface Mount
 Wire/Cable Type FFC/FPC

Electrical

Current - Maximum per Contact 0.5A
 Voltage - Maximum 50V AC (RMS)/DC

Material Info

Reference - Drawing Numbers

Application Specification AS-52559-001
 Packaging Specification SPK-52559-001, SPK-52559-003
 Product Specification PS-52559-013, RPS-52559-062, RPS-52559-064, RPS-52559-068, RPS-52559-070, RPS-52559-072
 Sales Drawing SD-52559-048, SD-52559-049

EU RoHS

ELV and RoHS Compliant
REACH SVHC Contains SVHC: No
Halogen-Free Status

China RoHS



Not Halogen-Free

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

[52559Series](#)

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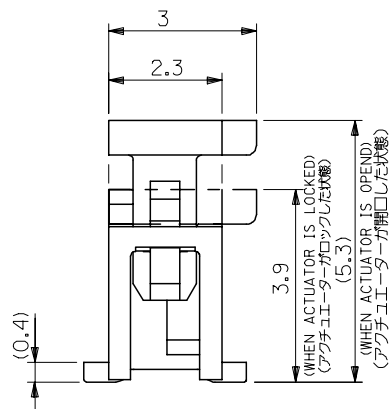
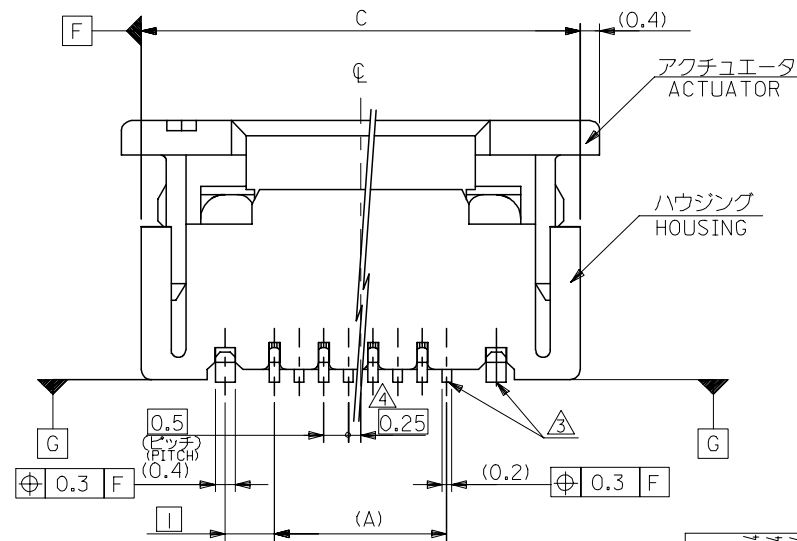
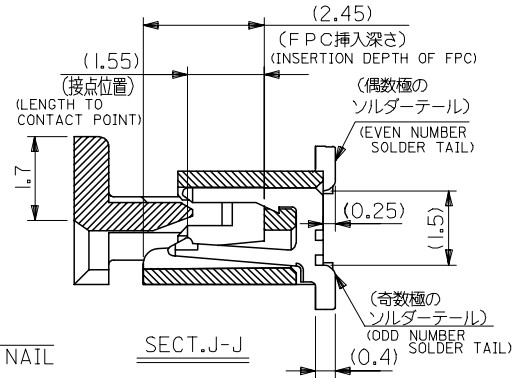
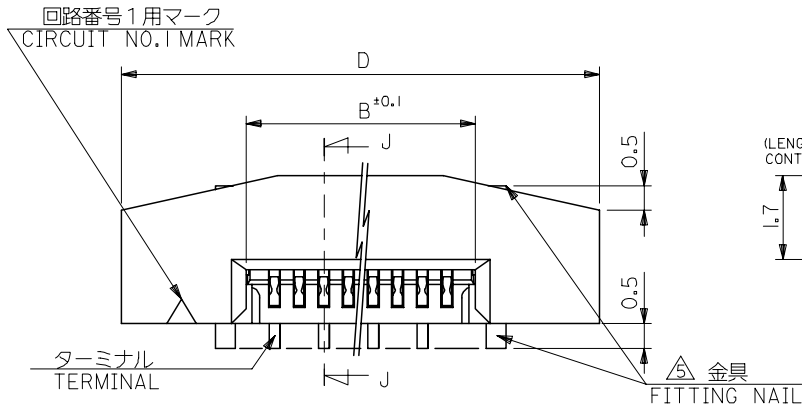
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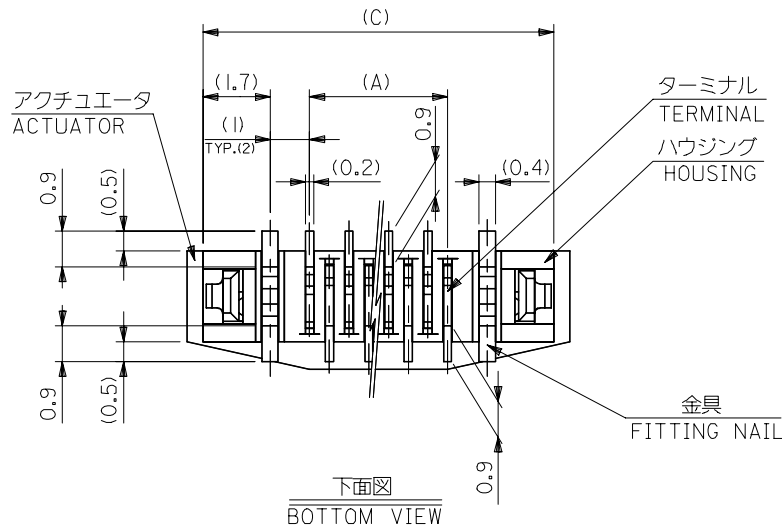


注記 NOTES

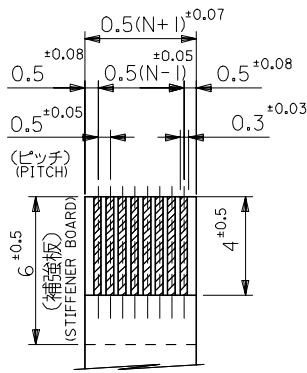
- 使用材料 : MATERIAL
 - ハウジング HOUSING : 46NYLON UL94V-0
 - アクチュエータ ACTUATOR : PPS UL94V-0
 - ターミナル TERMINAL : リン青銅 (t=0.2) PHOS-BRO
 - 接点部 金メッキ 0.1マイクロメートル以上 CONTACT GOLD 0.1 MICROMETER MINIMUM
 - 半田付け部 錫メッキ 1.0マイクロメートル以上 TAIL TIN 1.0 MICROMETER MINIMUM
 - ニッケル下地 1.0マイクロメートル以上 NICKEL (UNDER PLATING) 1.0 MICROMETER MINIMUM
 - 金具 FITTING NAIL : リン青銅 (t=0.4) PHOS-BRO
 - 錫メッキ 1.0マイクロメートル以上 TIN 1.0 MICROMETER MINIMUM
 - ニッケル下地 1.0マイクロメートル以上 NICKEL (UNDER PLATING) 1.0 MICROMETER MINIMUM
- エンボステープ梱包時は、アクチュエータがロックした状態とする。
IN THE PACKAGE, ACTUATOR OF PART NO. 52559-**79 SHOULD BE LOCKED.
△ソルダータール半田付け面のスレ量、及び金具半田付け面のスレ量は、基準面 G に対し上方向 0.05 MAX. , 下方向 0.15 MAX. とする。
MISALIGNMENT OF SOLDER TAILS AND FITTING NAILS FROM G UPPER DIRECTION: 0.05 MAX. , LOWER DIRECTION: 0.15 MAX.
- 偶数極に適用。
APPLY FOR EVEN CIRCUIT.
- パターンはくり止め用金具。
FITTING NAIL FOR PREVENTION OF PEELING OF P.C.B. PATTERN.
- RO. 3は、FPCの導体部にかからないこと。
RO.3 MUST NOT BE OVERLAPPED TO PATTERN OF FPC.

MODEL NO. 52559-**79

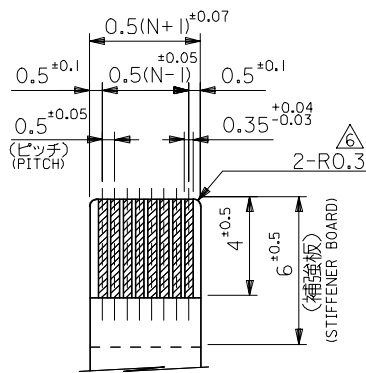
| | | | | | | | | |
|---|---------------------------------------|------------|----------------------------|---|---------------------------------|------------------------|------------------------|--|
| RELEASED EC NO: J2005-0174 DRAWN: MNABE1 2004/07/14 CHKD: KTOJO 2004/07/14 APPR: NUKITA 2004/07/14 REV 0 | GENERAL TOLERANCES (UNLESS SPECIFIED) | | DIMENSION STYLE MM ONLY | | SCALE --- | DESIGN UNITS METRIC | THIRD ANGLE PROJECTION | |
| | 10 UNDER | ±0.2 | DRAWN BY MNABE1 | DATE '04/07/13 | TITLE 0.5 FPC CONN ASSY ZIF. | | | |
| | 10 OVER 30 UNDER | ±0.25 | CHECKED BY KTOJO | DATE '04/07/13 | -LEAD FREE- | | | |
| | 30 OVER | ±0.3 | APPROVED BY NUKITA | DATE '04/07/13 | molex MOLEX INCORPORATED | | | |
| | ANGULAR | ±3 ° | MATERIAL NO. SEE CHART | DOCUMENT NO. SD-52559-048 | SHEET NO. 1 OF 2 | | | |
| DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS | | SIZE A3 | | THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION | | | | |



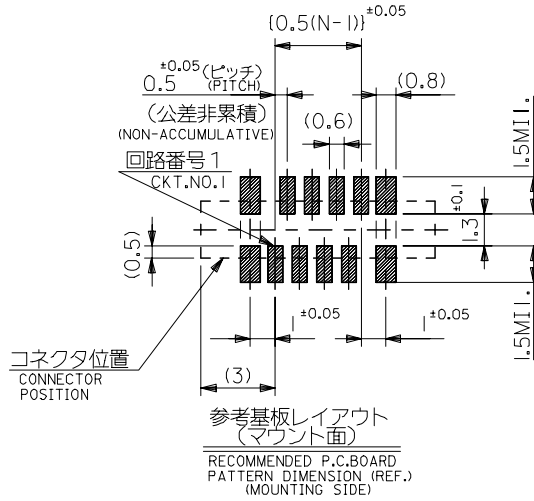
下面図
BOTTOM VIEW



適合FPC推奨寸法
APPLICABLE FPC
RECOMMENDED DIMENSION.
(仕上がり厚さ: 0.3^{+0.05})
(THICKNESS: 0.3^{+0.05})



適合FPC推奨寸法
APPLICABLE FPC
RECOMMENDED DIMENSION.
(仕上がり厚さ: 0.3^{+0.05})
(THICKNESS: 0.3^{+0.05})

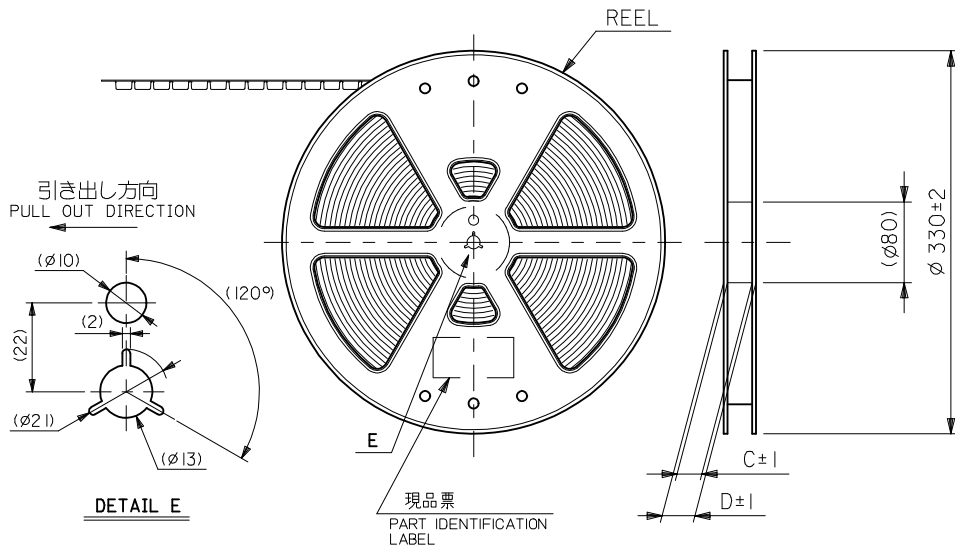


FPCについて：
打抜き方向は導体側から補強板側を推奨致します。
補強フィルム材質はポリイミドを推奨致します。
接着剤は熱硬化接着剤を推奨致します。

ABOUT FPC :
RECOMMENDED PUNCHER DIRECTION : FROM CONDUCTOR SIDE TO STIFFENER BOARD SIDE.
RECOMMENDED MATERIAL :
STIFFENER FILM : POLYIMIDE
BONDING AGENT : THERMOSETTING BONDING AGENT

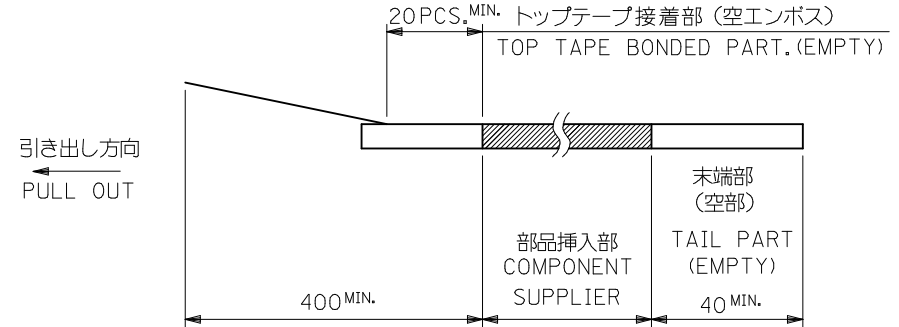
| | | | | | |
|------|------|-------|------|--------------|----|
| 25.7 | 24.9 | 20.65 | 19.5 | 52559-4079 | 40 |
| 23.7 | 22.9 | 18.65 | 17.5 | -3679 | 36 |
| 22.2 | 21.4 | 17.15 | 16.0 | -3379 | 33 |
| 21.7 | 20.9 | 16.65 | 15.5 | -3279 | 32 |
| 21.2 | 20.4 | 16.15 | 15.0 | -3179 | 31 |
| 20.7 | 19.9 | 15.65 | 14.5 | -3079 | 30 |
| 20.2 | 19.4 | 15.15 | 14.0 | -2979 | 29 |
| 19.7 | 18.9 | 14.65 | 13.5 | -2879 | 28 |
| 19.2 | 18.4 | 14.15 | 13.0 | -2779 | 27 |
| 18.7 | 17.9 | 13.65 | 12.5 | -2679 | 26 |
| 18.2 | 17.4 | 13.15 | 12.0 | -2579 | 25 |
| 17.7 | 16.9 | 12.65 | 11.5 | -2479 | 24 |
| 17.2 | 16.4 | 12.15 | 11.0 | -2379 | 23 |
| 16.7 | 15.9 | 11.65 | 10.5 | -2279 | 22 |
| 16.2 | 15.4 | 11.15 | 10.0 | -2179 | 21 |
| 15.7 | 14.9 | 10.65 | 9.5 | -2079 | 20 |
| 15.2 | 14.4 | 10.15 | 9.0 | -1979 | 19 |
| 14.7 | 13.9 | 9.65 | 8.5 | -1879 | 18 |
| 14.2 | 13.4 | 9.15 | 8.0 | -1779 | 17 |
| 13.7 | 12.9 | 8.65 | 7.5 | -1679 | 16 |
| 13.2 | 12.4 | 8.15 | 7.0 | -1579 | 15 |
| 12.7 | 11.9 | 7.65 | 6.5 | -1479 | 14 |
| 12.2 | 11.4 | 7.15 | 6.0 | -1379 | 13 |
| 11.7 | 10.9 | 6.65 | 5.5 | -1279 | 12 |
| 11.2 | 10.4 | 6.15 | 5.0 | -1179 | 11 |
| 10.7 | 9.9 | 5.65 | 4.5 | -1079 | 10 |
| 10.2 | 9.4 | 5.15 | 4.0 | -0979 | 9 |
| 9.7 | 8.9 | 4.65 | 3.5 | -0879 | 8 |
| 8.7 | 7.9 | 3.65 | 2.5 | 52559-0679 | 6 |
| D | C | B | (A) | MATERIAL NO. | 極数 |

| | | | | | | | |
|--|---------------------------------------|--|----------------------------|---------------------------|---------------------------------|-------------------------------------|------------|
| RELEASED EC NO: J2005-0174 DRAWN: MNABE 2004/07/14 CHKD: KTOJO 2004/07/14 APPR: NUKITA 2004/07/14 REV: 0 | GENERAL TOLERANCES (UNLESS SPECIFIED) | | DIMENSION STYLE MM ONLY | | SCALE --- | MODEL NO. DESIGN UNITS METRIC | 52559-**79 |
| | 10 UNDER | ±0.2 | DRAWN BY MNABE1 | DATE '04/07/13 | TITLE 0.5 FPC CONN ASSY ZIF. | | |
| | 10 OVER 30 UNDER | ±0.25 | CHECKED BY KTOJO | DATE '04/07/13 | -LEAD FREE- | | |
| | 30 OVER | ±0.3 | APPROVED BY NUKITA | DATE '04/07/13 | MOLEX INCORPORATED | | |
| ANGULAR ±3 ° | | DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS | | MATERIAL NO. SEE CHART | DOCUMENT NO. SD-52559-048 | SHEET NO. 2 OF 2 | |
| THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION | | | | | | | |

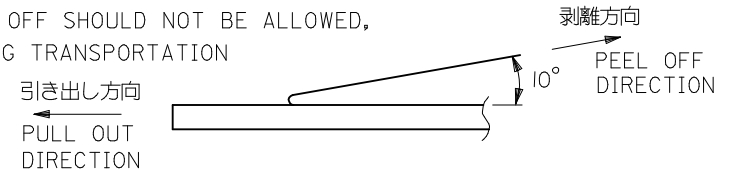


注記 NOTES

- 製品番号 52559-**79 の梱包状態はアクチュエータがロックした状態とする。
 詳細寸法については 製品単体図面を参照下さい。
 IN THE PACKAGE,ACTUATOR OF PART NO.52559-**79 SHOULD BE LOCKED
 RE DETAILED DIMENSIONS,SEE ASSY DRAWING
- 梱包数量：1000個/リール
 NUMBER OF CONNECTORS:1000PCS/REEL
- リードテープ長さ LEAD TAPE LENGTH



- トップテープの剥離強度：(剥離方向は下図参照)
 0.1N~1.3N {10gf~130gf} 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事。)
 PEELING OFF FORCE OF TOP TAPE
 0.1N~1.3N{10gf~130gf}(PEELING DIRECTION AS SHOWN IN FOLLOWING FIG.)
 THIS REQUIREMENT SHOULD BE APPLIED AT SHIPMENT
 PEEL OFF SHOULD NOT BE ALLOWED,
 DURING TRANSPORTATION



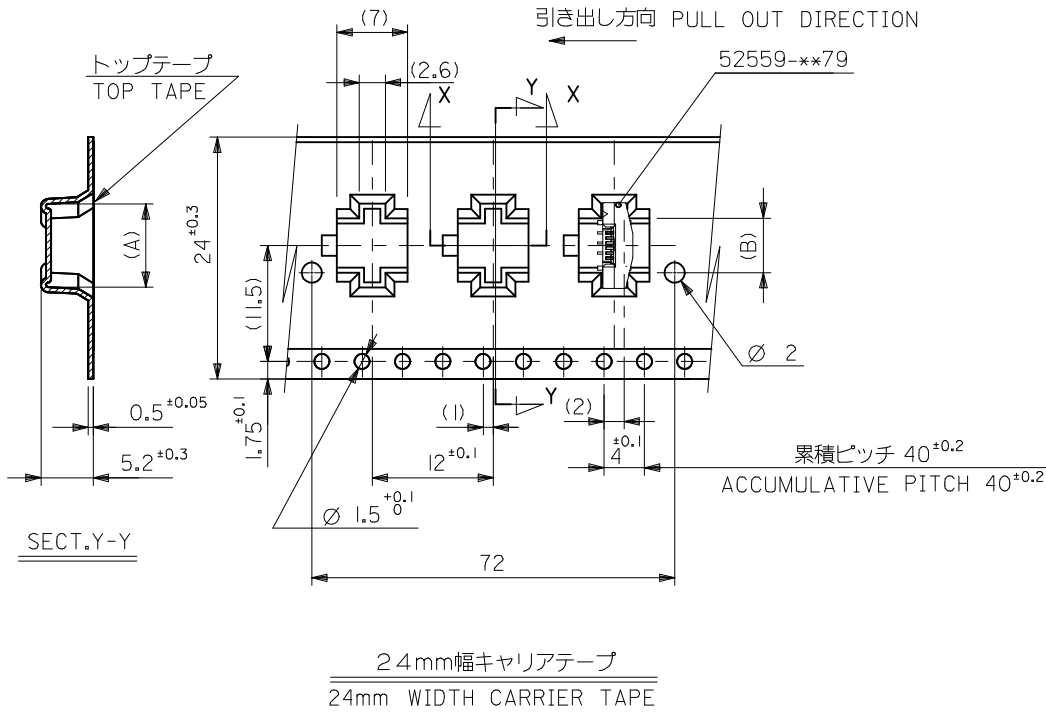
5. 材料 キャリアテープ：ポリプロピレン (PP)
 トップテープ：PET, PE, PEF
 リール：ポリスチレン (PS) <リサイクル材を含む>

MATERIAL CARRIER TAPE:POLYPROPYLENE
 TOP TAPE:PET,PE,PEF
 REEL:POLYSTYRENE (PS)
 <RECYCLE MATERIAL CONTAINED>

6. 本製品は 52559-**53 のエンボステープ違い品である。
 THIS PRODUCT IS EMBOSSED TAPE DIFFERENCE ARTICLE OF 52559-**53.

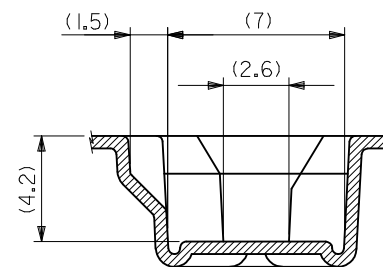
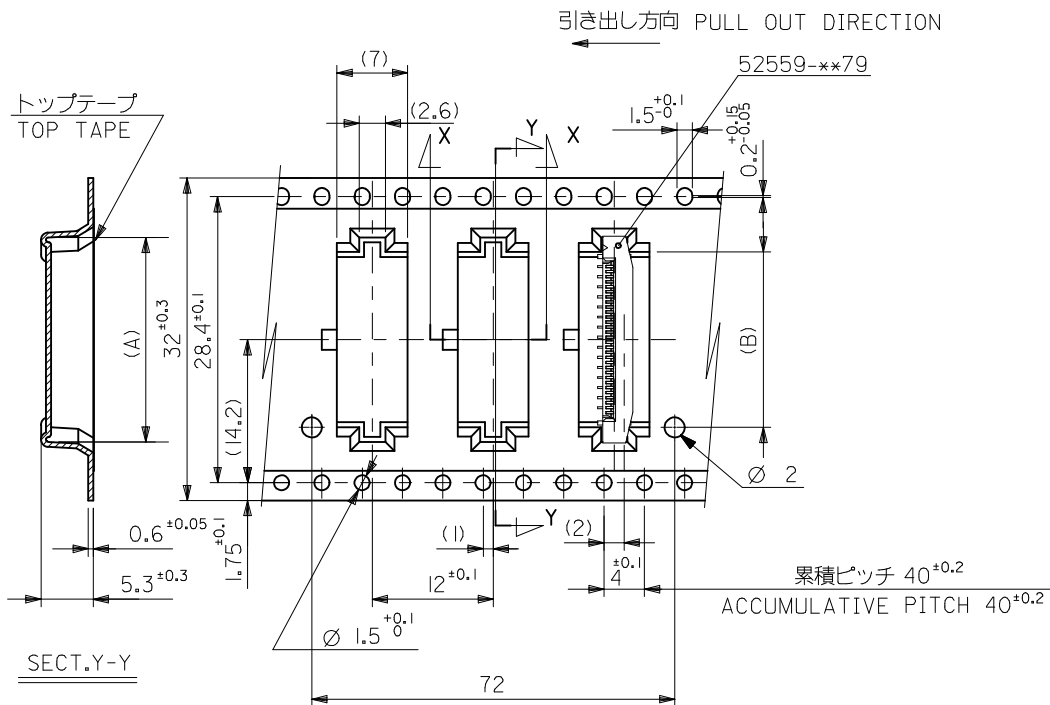
7. 本製品は乾燥剤入り、ハイバリア梱包仕様である。
 THIS PRODUCT IS HIGH BARRIER PACKAGE WITH DESICCANT.

| | | | | | | | |
|--|---------------------------------------|---|--------------------------------------|------------------------------|--|------------------------|-----------|
| REVISED EC NO: J2009-2061 DRWN:TKON 2009/05/20 CHKD:HMATSUMOTO 2009/05/21 APPR:NUKITA 2009/05/21 | GENERAL TOLERANCES (UNLESS SPECIFIED) | | DIMENSION STYLE MM ONLY | | SCALE --- | 52559-**52 | MODEL NO. |
| | 10 UNDER ±0.2 | | DRAWN BY DATE MNABEI '04/07/13 | | TITLE | THIRD ANGLE PROJECTION | |
| | 10 OVER 30 UNDER ±0.25 | | CHECKED BY DATE KTOJO '04/07/13 | | 0.5 FPC CONN ASSY ZIF FOR SMT EMBSTP PKG -LEAD FREE- | | |
| | 30 OVER ±0.3 | | APPROVED BY DATE NUKITA '04/07/13 | | MOLEX INCORPORATED | | |
| ANGULAR ±3 ° | | MATERIAL NO. SEE SHEET 2-4 | | DOCUMENT NO. SD-52559-049 | | SHEET NO. 1 OF 4 | |
| DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS | | THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION | | | | | |



| | | | | | | | | |
|--------------------------------|------|------------|------|------|------------|-----|--------------|-------------|
| 24 | 29.4 | 25.4 | 14.4 | 17.3 | 52559-2452 | 24 | | |
| | | | 13.9 | 16.8 | 52559-2352 | 23 | | |
| | | | 12.9 | 15.8 | 52559-2152 | 21 | | |
| | | | 12.4 | 15.3 | 52559-2052 | 20 | | |
| | | | 10.9 | 13.8 | 52559-1752 | 17 | | |
| | | | 10.4 | 13.3 | 52559-1652 | 16 | | |
| | | | 9.9 | 12.8 | 52559-1552 | 15 | | |
| | | | 9.4 | 12.3 | 52559-1452 | 14 | | |
| | | | 8.4 | 11.3 | 52559-1252 | 12 | | |
| | | | 7.4 | 10.3 | 52559-1052 | 10 | | |
| 6.9 | 9.8 | 52559-0952 | 9 | | | | | |
| 5.4 | 8.3 | 52559-0652 | 6 | | | | | |
| キャリアテープ幅 CARRIER TAPE WIDTH | | | D | C | (B) | (A) | MATERIAL NO. | CIRCUIT NO. |

| | | | | | | |
|---|---------------------------------------|--|----------------------------|---|------------------------|-----------|
| REVISED EC NO.: J2009-2061 DRWN:TKON 2009/05/20 CHKD:HMATSUMOTO 2009/05/21 APPR:NUKITA 2009/05/21 | GENERAL TOLERANCES (UNLESS SPECIFIED) | | DIMENSION STYLE MM ONLY | SCALE --- | 52559-**52 | MODEL NO. |
| | 10 UNDER | ±0.2 | DRAWN BY MNABEI | DATE '04/07/13 | DESIGN UNITS METRIC | |
| | 10 OVER 30 UNDER | ±0.25 | CHECKED BY KTOJO | DATE '04/07/13 | THIRD ANGLE PROJECTION | |
| | 30 OVER | ±0.3 | APPROVED BY NUKITA | DATE '04/07/13 | MOLEX INCORPORATED | |
| REV | DESCRIPTION | ANGULAR ±3 ° | MATERIAL NO. | DOCUMENT NO. | SHEET NO. | |
| | | DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS | SEE TABLE | SD-52559-049 | 2 OF 4 | |
| | | | SIZE A3 | THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION | | |



32mm幅キャリアテープ
32mm WIDTH CARRIER TAPE

| | | | | | | |
|--------------------------------|------|------|------|------|--------------|-------------|
| 32 | 37.4 | 33.4 | 18.4 | 21.3 | 52559-3252 | 32 |
| | | | 17.4 | 20.3 | 52559-3052 | 30 |
| | | | 16.4 | 19.3 | 52559-2852 | 28 |
| | | | 15.9 | 18.8 | 52559-2752 | 27 |
| | | | 15.4 | 18.3 | 52559-2652 | 26 |
| キャリアテープ幅 CARRIER TAPE WIDTH | D | C | (B) | (A) | MATERIAL NO. | CIRCUIT NO. |

| | | | | | | | |
|---|---------------------------------------|---|----------------------------|---------------------|--|------------------------|-----------|
| REVISED EC NO.: J2009-2061 DRWN:TKGN 2009/05/20 CHKD:HMATSUMOTO 2009/05/21 APPR:NUKITA 2009/05/21 | GENERAL TOLERANCES (UNLESS SPECIFIED) | | DIMENSION STYLE MM ONLY | | SCALE --- | 52559-**52 | MODEL NO. |
| | 10 UNDER | ±0.2 | DRAWN BY MNABEI | DATE '04/07/13 | 0.5 FPC CONN ASSY ZIF FOR SMT EMBSTP PKG -LEAD FREE- MOLEX INCORPORATED SD-52559-049 | | |
| | 10 OVER 30 UNDER | ±0.25 | CHECKED BY KTOJO | DATE '04/07/13 | | | |
| | 30 OVER | ±0.3 | APPROVED BY NUKITA | DATE '04/07/13 | | | |
| ANGULAR ±3 ° | | MATERIAL NO. | DOCUMENT NO. | | | | |
| DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS | | SEE TABLE | | SHEET NO. 3 OF 4 | | THIRD ANGLE PROJECTION | |
| G | DESCRIPTION | THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION | | | | | |

