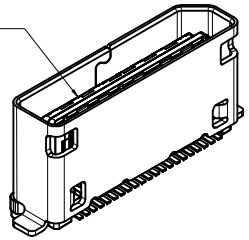
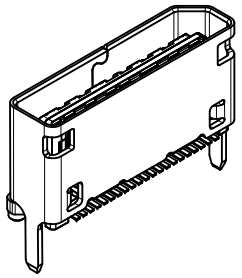
| STATUS | MATERIAL NUMBER | PIN OUT OPTIONS | MATING LEVELS | CIRCUIT SIZE | SHELL ATTACH OPTION | DUST CAP COLOR | PLASTIC COLOR | DIM "T" OPTION 1 |
|---|---|---|---|---|---|---|---|---|
| TOOLED | 171983-0142 | 4X | 3 | 42 | SMT | BLACK | BLACK | - |
| NOT TOOLED | 171983-0342 | 4X | 3 | 42 | SMT | BLACK | NATURAL | - |
| TOOLED | 171983-2042 | 4X | 3 | 42 | TH | BLACK | BLACK | 3,00 |
| TOOLED | 171983-2342 | 4X | 3 | 42 | TH | BLACK | NATURAL | 3,00 |
| NOT TOOLED | 171983-2442 | 4X | 3 | 42 | TH | BLACK | BLACK | 2.36 |
| NOT TOOLED | 171983-2542 | 4X | 3 | 42 | TH | BLACK | NATURAL | 2.36 |
| NOT TOOLED | 171983-2642 | 4X | 3 | 42 | TH | BLACK | BLACK | 1,57 |
| NOT TOOLED | 171983-2742 | 4X | 3 | 42 | TH | BLACK | NATURAL | 1,57 |
| TOOLED | 171983-3042 | 4X | 3 | 42 | XD | BLACK | BLACK | 3,00 |
| NOT TOOLED | 171983-3142 | 4X | 3 | 42 | XD | BLACK | NATURAL | 3,00 |
| NOT TOOLED | 171983-3242 | 4X | 3 | 42 | XD | BLACK | BLACK | 2.36 |
| NOT TOOLED | 171983-3342 | 4X | 3 | 42 | XD | BLACK | NATURAL | 2.36 |
| NOT TOOLED | 171983-3442 | 4X | 3 | 42 | XD | BLACK | BLACK | 1,57 |
| NOT TOOLED | 171983-3542 | 4X | 3 | 42 | XD | BLACK | NATURAL | 1,57 |

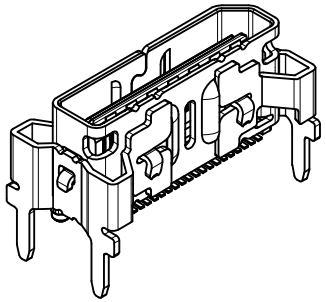
## 42 CIRCUIT SMT SHELL



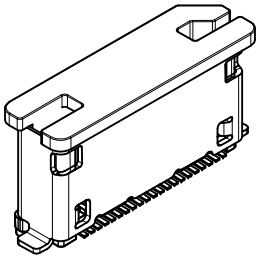

## 42 CIRCUIT THRU HOLE SHELL



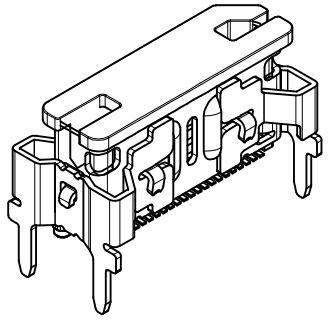
## 42 CIRCUIT XD SHELL



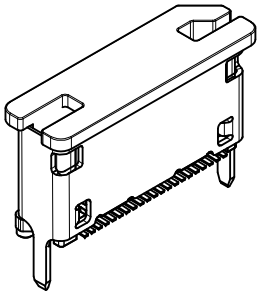
## 42 CIRCUIT SMT SHELL W/ CAP



## 42 CIRCUIT XD SHELL W/ CAP



## 42 CIRCUIT THRU HOLE SHELL W/ CAP



NOTES:

1. MATERIALS:
   HOUSING - GLASS FILLED THERMOPLASTIC, 94V-0
   CONTACTS - HIGH PERFORMANCE COPPER ALLOY
   SHIELD - STAINLESS STEEL

2. FINISH:
   CONTACTS - 0.76µm MIN. GOLD MATING SIDE
   2.54µm TIN ON SOLDER TAILS
   2.0µm MIN. NICKEL UNDERPLATE OVERALL

   SHIELD - MATTE TIN OVER 1.27µm MIN. NICKEL

3. PRODUCT SPECIFICATION: PS-171982-0001

4. PACKAGING SPECIFICATION: PK-171982-9000

5. MATES WITH: MOLEX CABLE SERIES 100436
   PER INDUSTRY STANDARD PCIe OCuLink OR SFF-8612

6. APPLICATION SPECIFICATION: AS-173162-0001

7. COSMETIC SPECIFICATION: PS-173162-0001

8. ASSEMBLY PART NUMBER AND DATE CODE TO BE
   LOCATED APPROXIMATELY AS SHOWN. DATE CODE
   TO SHOW THE DATE AND YEAR OF ASSEMBLY (DDDY OR YDDD)

UPDATE TABLE
EC NO: UCP2017-1264 2016/12/06
DRWN:SYANG01 2016/12/06
CHKD:MJANTELEZ10 2017/04/24
APPR: MMCCLELL
DESCRIPTION
REV: G

QUALITY SYMBOLS
▽=0
▽=0
▽=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

| | mm | INCH |
|---|---|---|
| 4 PLACES | ± --- | ± --- |
| 3 PLACES | ± --- | ± --- |
| 2 PLACES | ± 0.13 | ± --- |
| 1 PLACE | ± 0.25 | ± --- |
| 0 PLACE | ± --- | ± --- |

ANGULAR ±1/2°
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM ONLY
SCALE: 8:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

DRAWN BY: MJANTELEZ10 DATE: 2015/10/22
CHECKED BY: DATE:
APPROVED BY: MBANAKIS DATE: 2015/11/09
MATERIAL NO.: SEE CHART

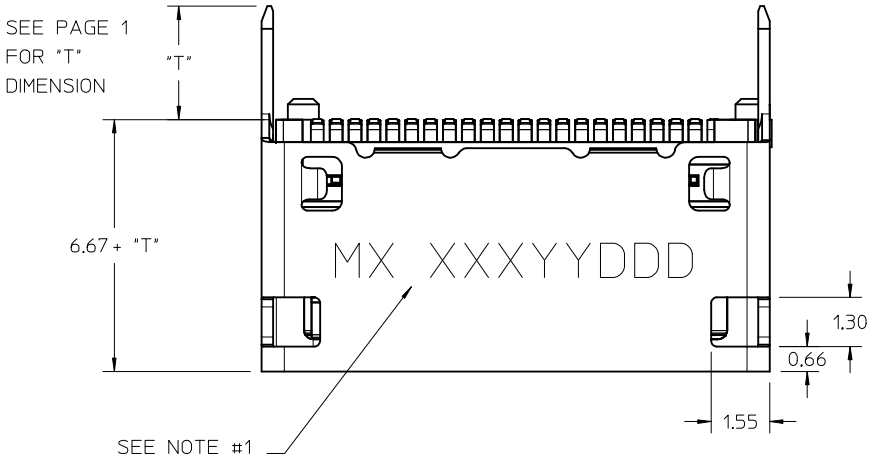
TITLE: NANO PITCH I/O VERTICAL PRE R1.0 - 16 GT/S

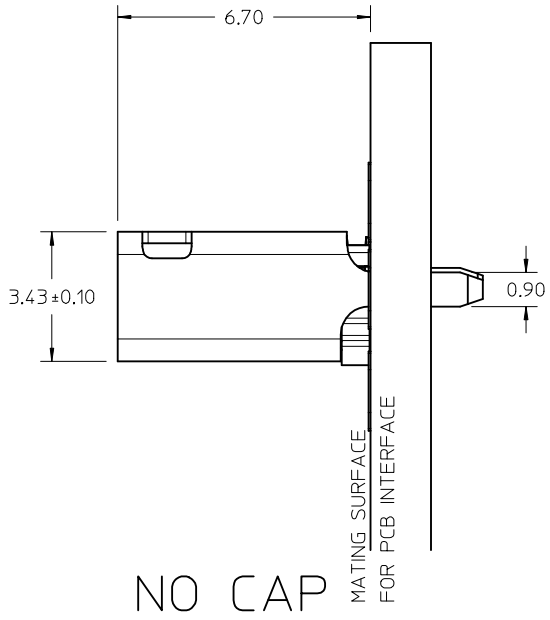
molex

DOCUMENT NO.: SD-171983-1000
SHEET NO.: 1 OF 8

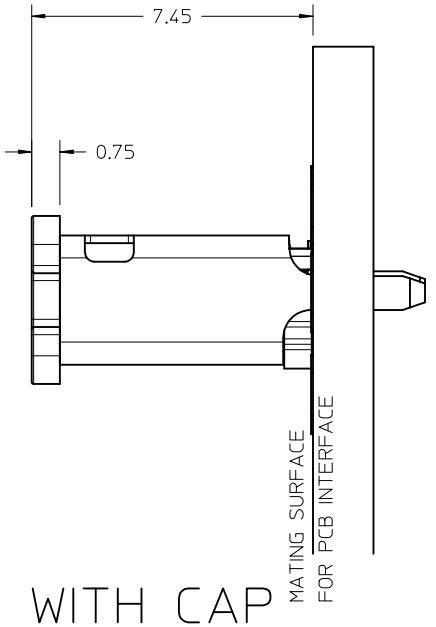
SIZE: D

# 42 CIRCUIT TH ASSEMBLY

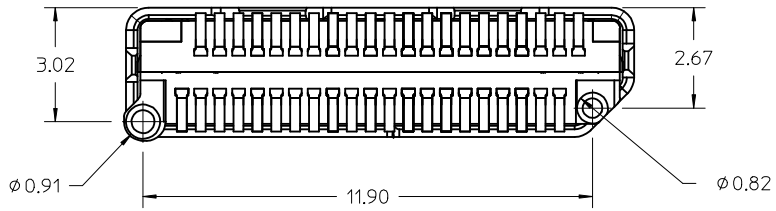



NO CAP




WITH CAP


NOTES:
1. PLANT CODE, MANUFACTURED DATE CODE (JULIAN CALENDAR) AND PART NUMBER
2. SOLDER TAIL COPLANARITY 0.10 MAX

SEE SHEET 1
EC NO: UCP2017-1264 2016/12/06
DRWN:SVANG01 2016/12/06
CHKD:MJANTELEZIO 2016/12/06
APPR:TMCCLELL 2017/04/24
DESCRIPTION
REV

QUALITY SYMBOLS

GENERAL TOLERANCES (UNLESS SPECIFIED)

| | mm | INCH |
|---|---|---|
| 4 PLACES | ± --- | ± --- |
| 3 PLACES | ± --- | ± --- |
| 2 PLACES | ± 0.13 | ± --- |
| 1 PLACE | ± 0.25 | ± --- |
| 0 PLACE | ± --- | ± --- |
| ANGULAR ±1/2° | | |

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM ONLY
SCALE: 10:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

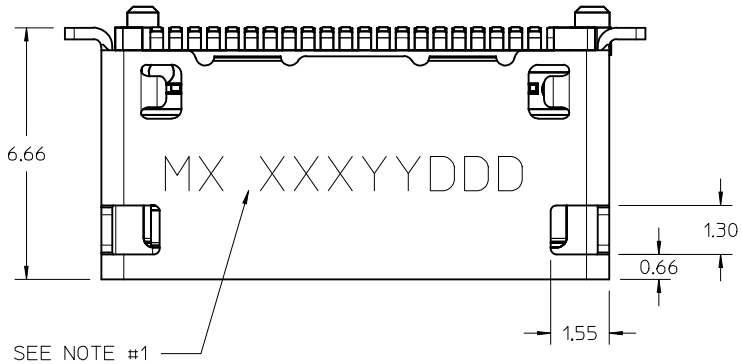
DRAWN BY: MJANTELEZIO DATE: 2015/10/22
CHECKED BY: DATE:
APPROVED BY: MBANAKIS DATE: 2015/11/09
MATERIAL NO.: SEE SHEET 1

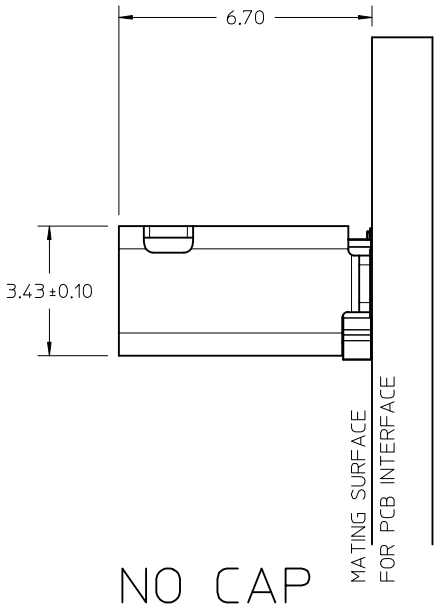
TITLE: NANO PITCH I/O VERTICAL PRE R1.0 - 16 GT/S

molex

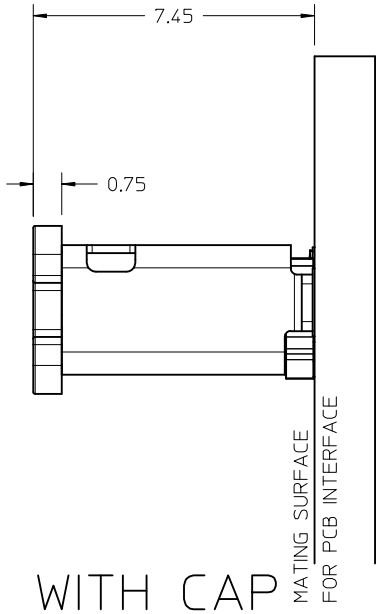
DOCUMENT NO.: SD-171983-1000
SHEET NO.: 2 OF 8
SIZE: C

# 42 CIRCUIT SMT ASSEMBLY

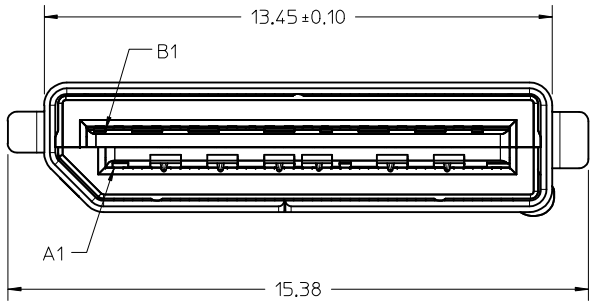


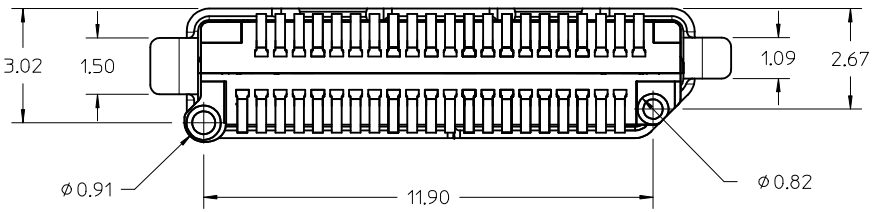




NO CAP




WITH CAP




NOTES:
1. PLANT CODE, MANUFACTURED DATE CODE (JULIAN CALENDAR) AND PART NUMBER
2. SOLDER TAIL COPLANARITY 0.10 MAX

SEE SHEET 1
EC NO: UCP2017-1264
DRWN:SVANG01 2016/12/06
CHKD:MJANTELEZIO 2016/12/06
APPR:TMCCLELL 2017/04/24
DESCRIPTION
REV

QUALITY SYMBOLS

GENERAL TOLERANCES (UNLESS SPECIFIED)

| | mm | INCH |
|---|---|---|
| 4 PLACES | ± --- | ± --- |
| 3 PLACES | ± --- | ± --- |
| 2 PLACES | ± 0.13 | ± --- |
| 1 PLACE | ± 0.25 | ± --- |
| 0 PLACE | ± --- | ± --- |

ANGULAR ±1/2°

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM ONLY
SCALE: 10:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

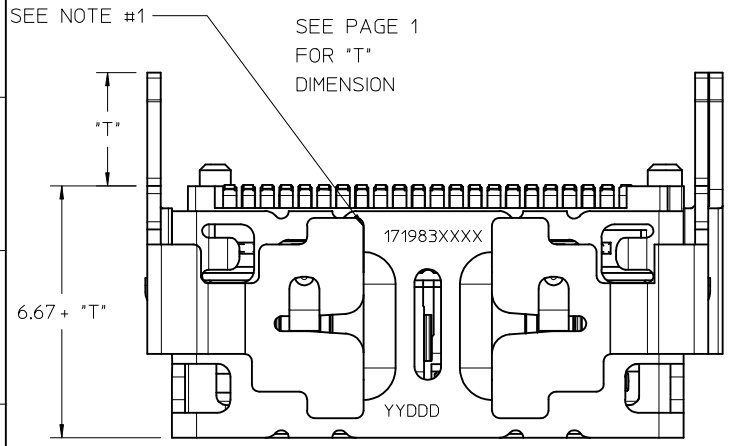
DRAWN BY: MJANTELEZIO DATE: 2015/10/22
CHECKED BY: DATE:
APPROVED BY: MBANAKIS DATE: 2015/11/09
MATERIAL NO.: SEE SHEET 1

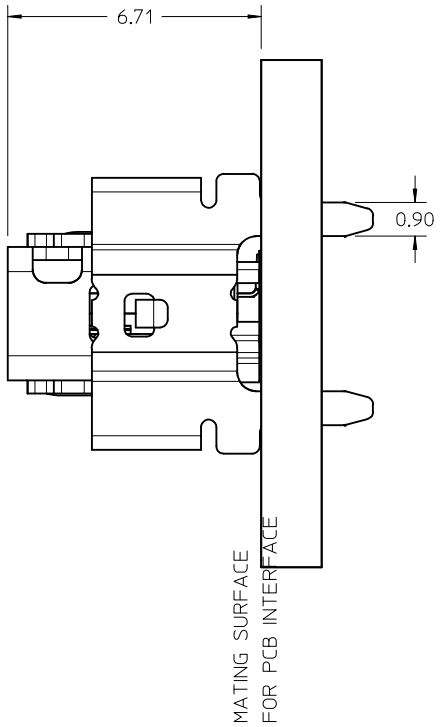
TITLE: NANO PITCH I/O VERTICAL PRE R1.0 - 16 GT/S

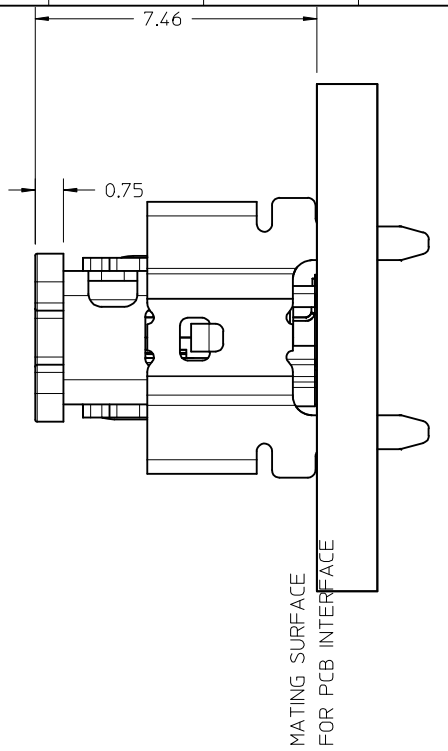
molex

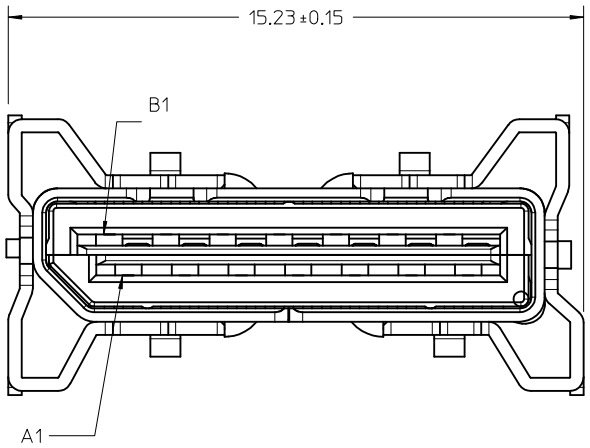
DOCUMENT NO.: SD-171983-1000
SHEET NO.: 3 OF 8
SIZE: C

# 42 CIRCUIT HD ASSEMBLY



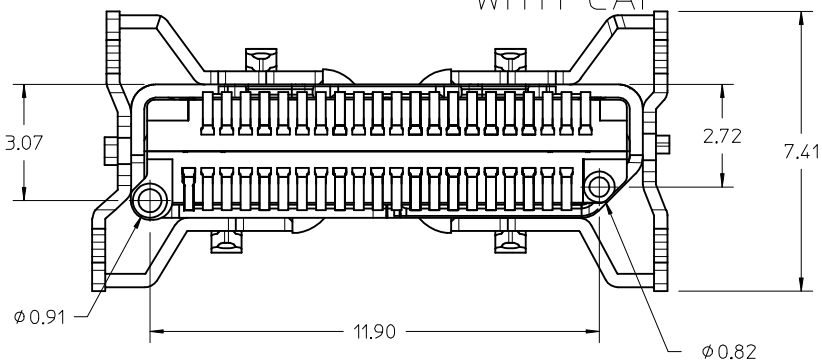




NO CAP

WITH CAP




NOTES:
1. MANUFACTURED DATE CODE (JULIAN CALENDAR) AND PART NUMBER
2. SOLDER TAIL COPLANARITY 0.10 MAX

SEE SHEET 1
EC NO: UCP2017-1264
DRWN:SVANG01 2016/12/06
CHKD:MJANTELEZIO 2016/12/06
APPR:TMCCLELL 2017/04/24
DESCRIPTION
REV

QUALITY SYMBOLS

GENERAL TOLERANCES (UNLESS SPECIFIED)

| | mm | INCH |
|---|---|---|
| 4 PLACES | ± --- | ± --- |
| 3 PLACES | ± --- | ± --- |
| 2 PLACES | ± 0.13 | ± --- |
| 1 PLACE | ± 0.25 | ± --- |
| 0 PLACE | ± --- | ± --- |

ANGULAR ±1/2°

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM ONLY
SCALE: 10:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

DRAWN BY: MJANTELEZIO DATE: 2015/10/22
CHECKED BY: DATE:
APPROVED BY: MBANAKIS DATE: 2015/11/09
MATERIAL NO.: SEE SHEET 1

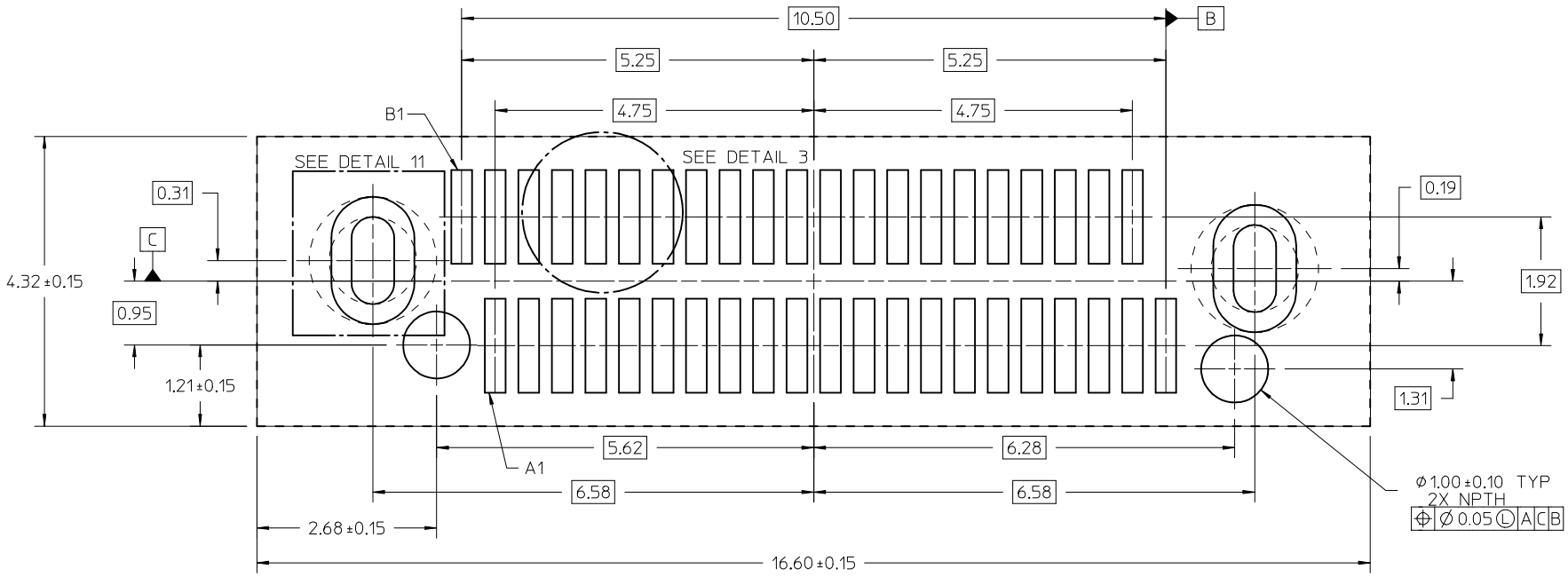
TITLE: NANO PITCH I/O VERTICAL PRE R1.0 - 16 GT/S

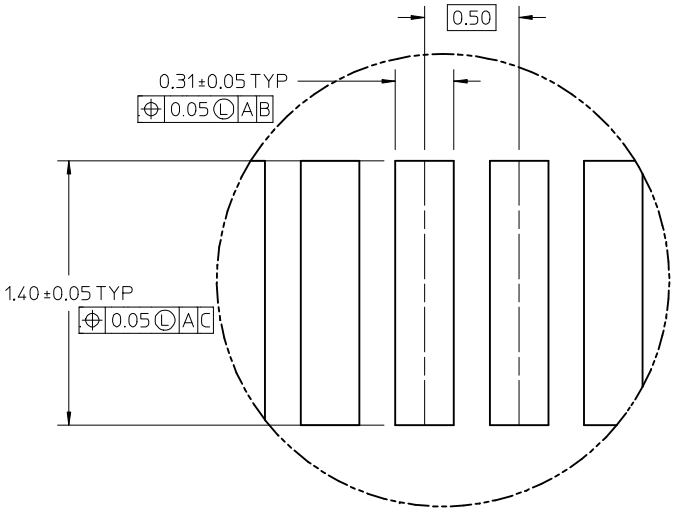
molex

DOCUMENT NO.: SD-171983-1000
SHEET NO.: 4 OF 8

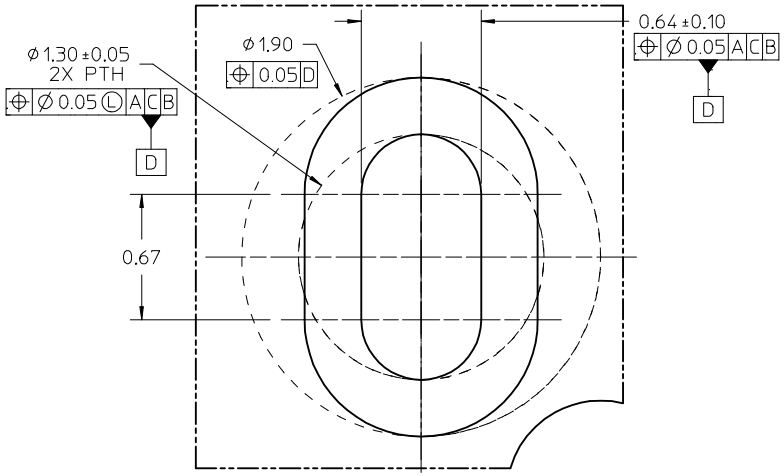
SIZE C

# 42 CIRCUIT TAIL RECOMMENDED FOOTPRINT




DETAIL 3
SCALE 50:1




DETAIL 11
SCALE 50:1

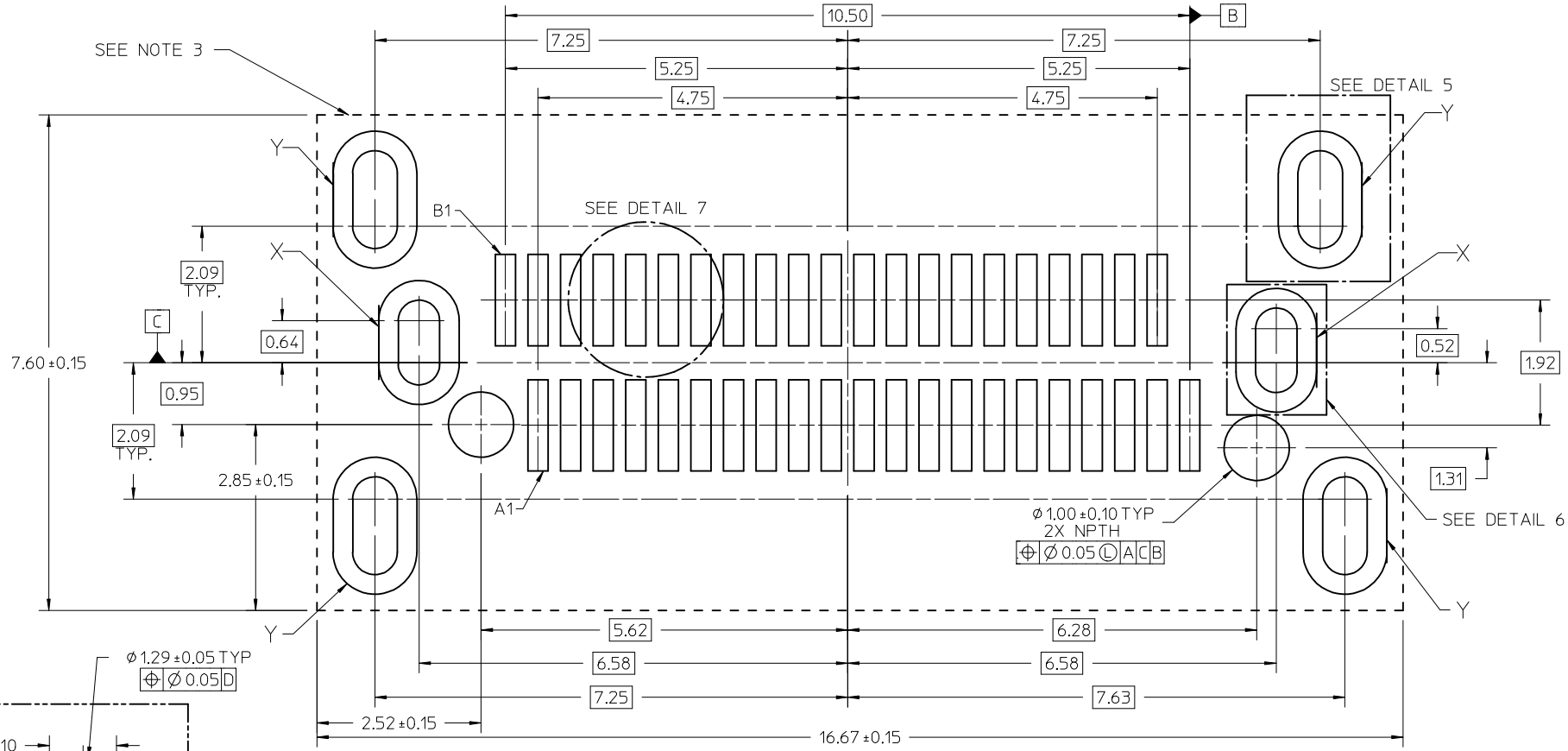
NOTES:
1. MINIMUM RECOMMENDED SPACING BETWEEN ADJACENT CONNECTORS IS 19.05mm
2. MINIMUM RECOMMENDED PCB THICKNESS: 1.57mm
3. CONNECTOR KEEP OUT AREA
4. DATUM -A- ESTABLISHED FROM TOP SURFACE OF PCB

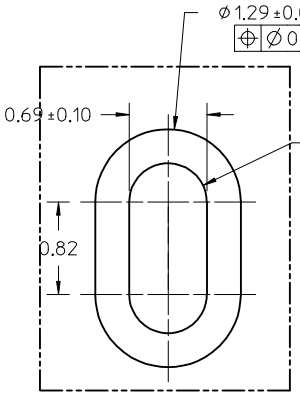
| | | | |
|---|---|---|---|
| SEE SHEET 1 | QUALITY SYMBOLS | GENERAL TOLERANCES (UNLESS SPECIFIED) | DIMENSION STYLE: MM ONLY |
| EC NO: UCP2017-1264 | | mm / INCH | SCALE: 10:1 |
| DRWN: SVANG01 2016/12/06 | | 4 PLACES ± --- / ± --- | DESIGN UNITS: METRIC |
| CHKD: MJANTELEZ10 2016/12/06 | | 3 PLACES ± --- / ± --- | THIRD ANGLE PROJECTION |
| APPR: TMCCLELL 2017/04/24 | | 2 PLACES ± 0.13 / ± --- | DRAWN BY: MJANTELEZ10 DATE: 2015/10/22 |
| DESCRIPTION | | 1 PLACE ± 0.25 / ± --- | CHECKED BY: DATE: |
| REV: G | | 0 PLACE ± --- / ± --- | APPROVED BY: MBANAKIS DATE: 2015/11/09 |
| | | ANGULAR ±1/2° | MATERIAL NO.: SEE SHEET 1 |
| | | DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS | DOCUMENT NO.: SD-171983-1000 |
| | | | SHEET NO.: 5 OF 8 |
| | | | SIZE: C |

TITLE: NANO PITCH I/O VERTICAL PRE R1.0 - 16 GT/S

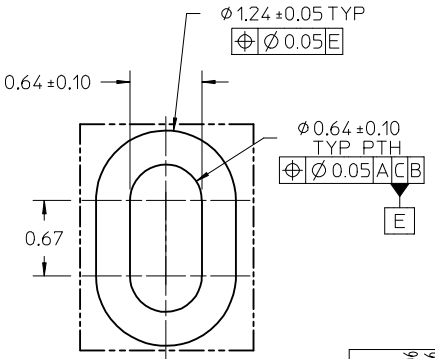
molex

# 42 CIRCUIT COMMON TAIL/XD RECOMMENDED FOOTPRINT

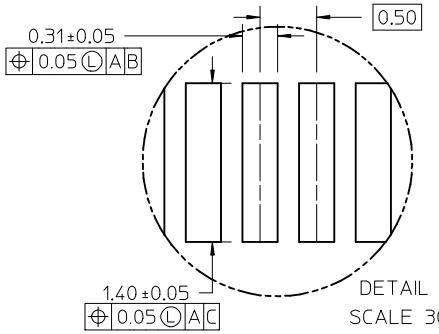



DETAIL 5
SCALE 30:1




DETAIL 6
SCALE 30:1




DETAIL 7
SCALE 30:1

NOTES:
1. MINIMUM RECOMMENDED SPACING BETWEEN ADJACENT CONNECTOR IS 19.05mm
2. MINIMUM RECOMMENDED PCB THICKNESS: 1.57mm
3. CONNECTOR KEEP OUT AREA
4. DATUM -A- ESTABLISHED FROM TOP SURFACE OF PCB
5. COMMON FOOTPRINT SHOWN
   FOR XD ONLY PATTERN USE ONLY PTH DENOTED "Y"
   FOR TH ONLY PATTERN USE ONLY PTH DENOTED "X"

SEE SHEET 1
EC NO: UCP2017-1264 2016/12/06
DRWN:SVANG01 2016/12/06
CHKD:MJANTELEZIO 2017/04/24
APPR:TMCCLELL
DESCRIPTION
G
REV

QUALITY SYMBOLS
F1 =0
F2 =0
F3 =0

GENERAL TOLERANCES (UNLESS SPECIFIED)

| | mm | INCH |
|---|---|---|
| 4 PLACES | ± --- | ± --- |
| 3 PLACES | ± --- | ± --- |
| 2 PLACES | ± 0.13 | ± --- |
| 1 PLACE | ± 0.25 | ± --- |
| 0 PLACE | ± --- | ± --- |

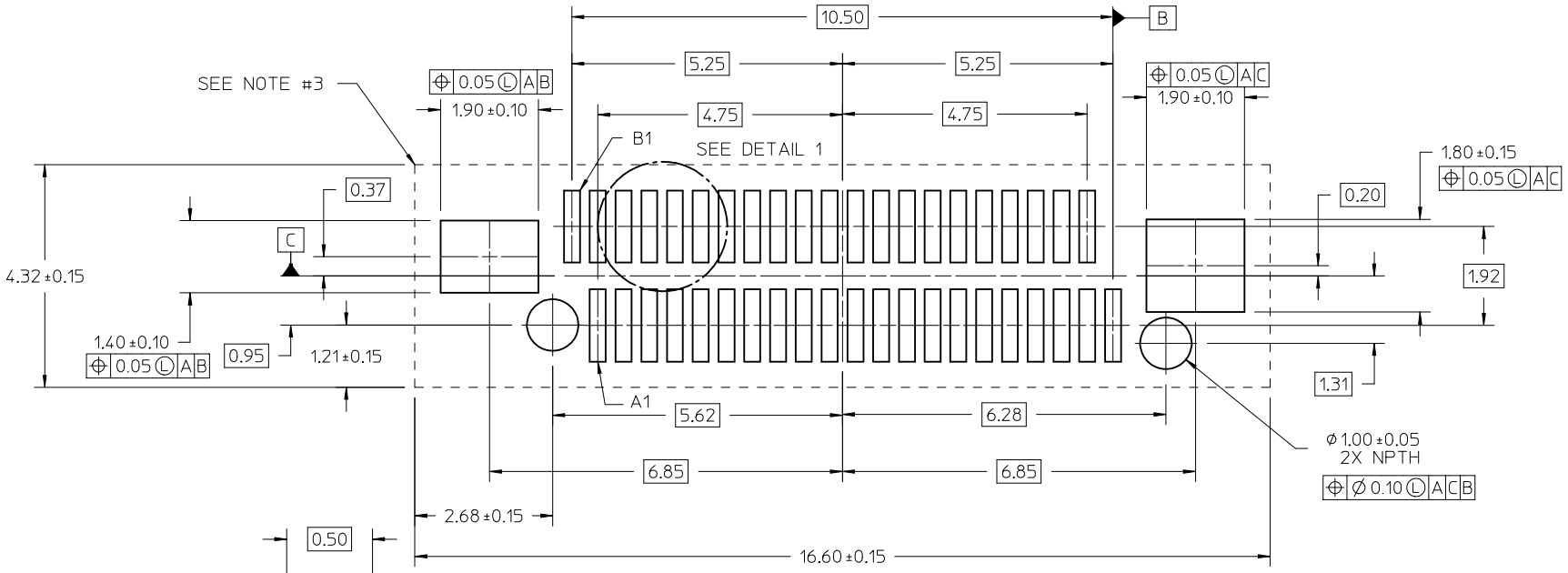
ANGULAR ±1/2°
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

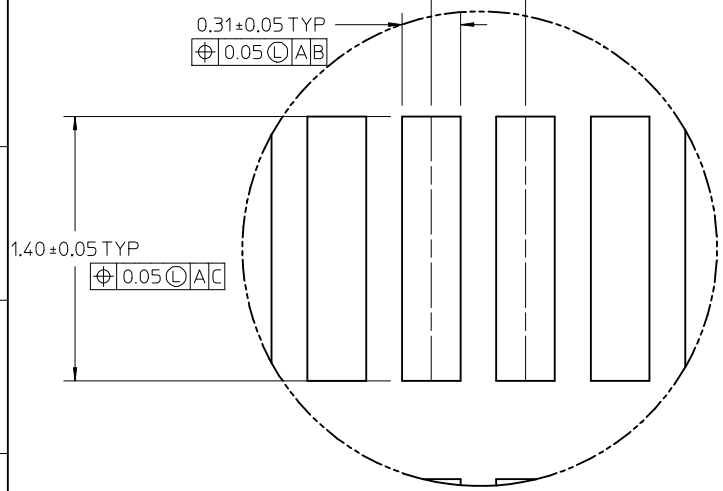
DIMENSION STYLE: MM ONLY
SCALE: 15:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

DRAWN BY: MJANTELEZIO DATE: 2015/10/22
CHECKED BY: DATE:
APPROVED BY: MBANAKIS DATE: 2015/11/09
MATERIAL NO.: SEE SHEET 1

TITLE: NANO PITCH I/O VERTICAL PRE R1.0 - 16 GT/S
molex
DOCUMENT NO.: SD-171983-1000
SHEET NO.: 6 OF 8
SIZE: C

# 42 CIRCUIT SMT RECOMMENDED FOOTPRINT




DETAIL 1
SCALE 50:1

NOTES:
1. MINIMUM RECOMMENDED SPACING BETWEEN ADJACENT CONNECTORS IS 19.05mm
2. MINIMUM RECOMMENDED PCB THICKNESS: 1.57mm
3. CONNECTOR KEEP OUT AREA
4. DATUM -A- ESTABLISHED FROM TOP SURFACE OF PCB

SEE SHEET 1
EC NO: UCP2017-1264
DRWN:SVANG01 2016/12/06
CHKD:MJANTELEZIO 2016/12/06
APPR:TMCCLELL 2017/04/24
DESCRIPTION
REV
G

QUALITY SYMBOLS
E =0
E =0
E =0

GENERAL TOLERANCES (UNLESS SPECIFIED)

| | mm | INCH |
|---|---|---|
| 4 PLACES | ± --- | ± --- |
| 3 PLACES | ± --- | ± --- |
| 2 PLACES | ± 0.13 | ± --- |
| 1 PLACE | ± 0.25 | ± --- |
| 0 PLACE | ± --- | ± --- |

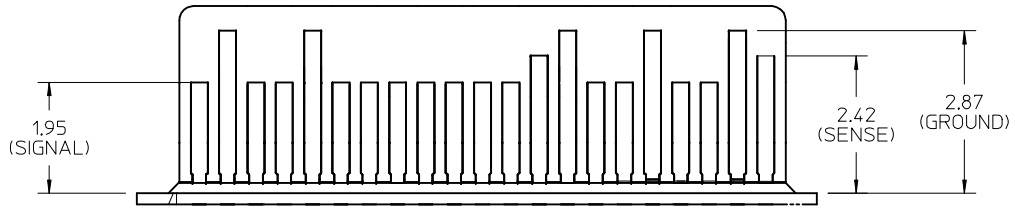
ANGULAR ±1/2°
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM ONLY
SCALE: 15:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

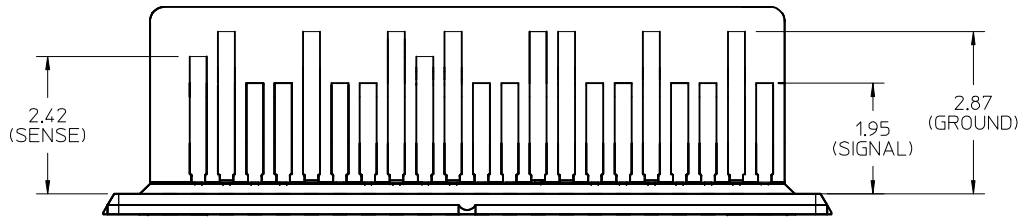
DRAWN BY: MJANTELEZIO DATE: 2015/10/22
CHECKED BY: DATE:
APPROVED BY: MBANAKIS DATE: 2015/11/09
MATERIAL NO.: SEE SHEET 1

TITLE: NANO PITCH I/O VERTICAL PRE R1.0 - 16 GT/S
molex
DOCUMENT NO.: SD-171983-1000
SHEET NO.: 7 OF 8
SIZE: C

# INTERFACE PATTERN




42 CIRCUITS
BOTTOM
SCALE 15:1




42 CIRCUITS
TOP
SCALE 15:1

SEE SHEET 1
EC NO: UCP2017-1264
DRWN:SVANG01 2016/12/06
CHKD:MJANTELEZIO 2016/12/06
APPR:TMCCLELL 2017/04/24
DESCRIPTION
REV G

QUALITY SYMBOLS
F1 =0
F2 =0
F3 =0

GENERAL TOLERANCES (UNLESS SPECIFIED)

| | mm | INCH |
|---|---|---|
| 4 PLACES | ± --- | ± --- |
| 3 PLACES | ± --- | ± --- |
| 2 PLACES | ± 0.13 | ± --- |
| 1 PLACE | ± 0.25 | ± --- |
| 0 PLACE | ± --- | ± --- |

ANGULAR ±1/2°
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM ONLY
SCALE: 15:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

DRAWN BY: MJANTELEZIO DATE: 2015/10/22
CHECKED BY: DATE:
APPROVED BY: MBANAKIS DATE: 2015/11/09
MATERIAL NO.: SEE SHEET 1

TITLE: NANO PITCH I/O VERTICAL PRE R1.0 - 16 GT/S

molex

DOCUMENT NO.: SD-171983-1000
SHEET NO.: 8 OF 8
SIZE: C