

Customer Information Sheet

DRAWING No.: M80-50000001-XX-XXX-00-000 SHEET 3 OF 4 IF IN DOUBT - ASK (C) NOT TO SCALE THIRD ANGLE PROJECTION ALL DIMENSIONS IN mm

SPECIFICATIONS:

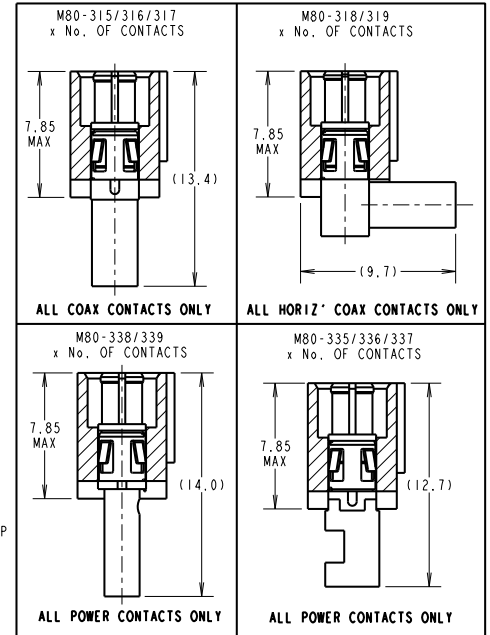
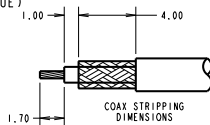
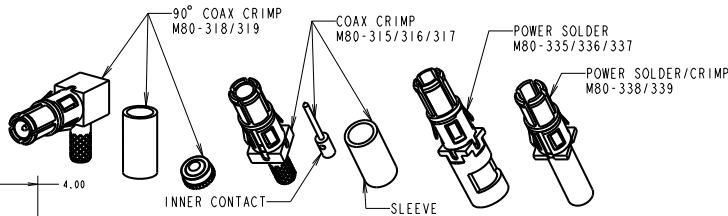
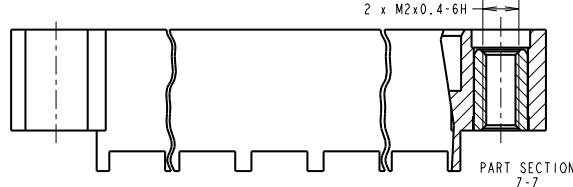
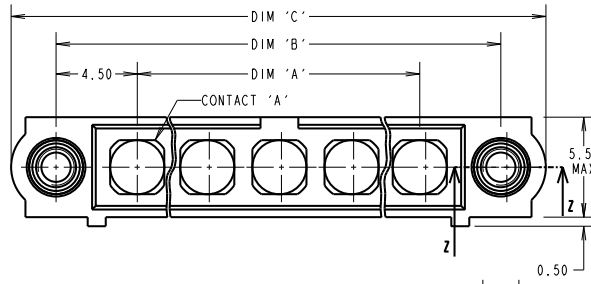
MATERIAL:
 MOULDING: GLASS FILLED PPS, UL94V-0, BLACK
 COAX & POWER CONTACT:
 BODY, SLEEVE, INNER CONTACT, END PLUG = COPPER ALLOY
 LATCHING COLLAR = BERYLLIUM COPPER
 INSULATOR = PTFE
 JACKSCREW: STAINLESS STEEL
FINISH:
 COAX & POWER CONTACT:
 BODY, SLEEVE, INNER CONTACT, END PLUG = GOLD
 LATCHING COLLAR = NICKEL
ELECTRICAL:
 WORKING VOLTAGE = 120V AC/DC
 VOLTAGE PROOF = 360V AC/DC
 INSULATION RESISTANCE = 100MΩ MIN
POWER CONTACT:
 CONTACT RESISTANCE 6mΩ MAX
 CURRENT RATING = M80-335 = 20A MAX WITH 12AWG
 M80-336 = 15A MAX WITH 14AWG
 M80-337 = 10A MAX WITH 16AWG
 M80-338 = 8A MAX WITH 18AWG
 M80-339 = 5A MAX WITH 20AWG
 CONTACT AS SPECIFIED

COAX CONTACT:
 FREQUENCY RANGE = 6GHz
 IMPEDANCE = 50 Ω
 V.S.W.R = 1.05 + (0.04 x FREQUENCY) GHz MAX
 CONTACT RESISTANCE 6 mΩ MAX
 INSULATION RESISTANCE = 10⁶MΩ @250V AC
 OPERATING VOLTAGE = 180V AC @ 500mA
 MAXIMUM VOLTAGE = 1000V AC

MECHANICAL:
 DURABILITY = 500 OPERATIONS
 COAX & POWER CONTACT:
 INSERTION FORCE = 5N MAX
 WITHDRAWAL FORCE = 0.5N MIN

ENVIRONMENTAL:
 TEMPERATURE RANGE = -55°C TO +125°C
 PACKING:
 BAG

FOR COMPLETE SPECIFICATION SEE COMPONENT SPECIFICATION C005XX (LATEST ISSUE)



ORDER CODE: (CRIMP/SOLDER CONTACTS)
M80-50000001-XX-XXX-00-000

TOTAL No. OF CONTACTS 02 To 12

SPECIAL CONTACTS (CRIMP)

| |
|--|
| 315 = COAX CONTACT 2.0mm CRIMP M80-315 |
| 316 = COAX CONTACT 2.4mm CRIMP M80-316 |
| 317 = COAX CONTACT 2.7mm CRIMP M80-317 |
| 318 = COAX CONTACT 2.0mm HORIZ' CRIMP M80-318 |
| 319 = COAX CONTACT 2.7mm HORIZ' CRIMP M80-319 |
| 335 = POWER CONTACT 12AWG SOLDER M80-335 |
| 336 = POWER CONTACT 14AWG SOLDER M80-336 |
| 337 = POWER CONTACT 16AWG SOLDER M80-337 |
| 338 = POWER CONTACT 18AWG SOLDER/CRIMP M80-338 |
| 339 = POWER CONTACT 20AWG SOLDER/CRIMP M80-339 |

- NOTES:**
- CONNECTORS ARE SUPPLIED WITH CONTACTS LOOSE.
 - COAX CONTACT IS SUPPLIED AS A KIT OF PARTS: BODY, MAIN INSULATOR, INNER CONTACT AND LATCHING COLLAR ARE PRE-ASSEMBLED AND SLEEVE AND INSULATED END PLUG ASSEMBLY ARE SEPARATE.
 - FOR EXTRA COAX CONTACTS, USE PART NUMBERS M80-315/316/317/318/319.
 - FOR EXTRA POWER CONTACTS USE PART NUMBERS M80-335/336/337/338/339
 - COAX & POWER CONTACT EXTRACTION TOOL = Z80-290
 - POWER CONTACT WIRE, STRIP BY 5.00mm MINIMUM.
 - RECOMMENDED HAND CRIMP TOOL FOR CONTACTS 338/339 = Z80-294 AND POSITIONER Z80-295.
 - RECOMMENDED HAND CRIMP TOOL FOR INNER CONTACT = Z80-292 WITH POSITIONER Z80-291. RECOMMENDED HAND CRIMP TOOL AND DIE SET FOR SLEEVE = Z80-293.
 - INSTRUCTION SHEETS ARE AVAILABLE.

| DIMENSION | CALCULATION |
|-----------|-----------------------------|
| DIM 'A' | 4 x No. OF CONTACTS - 4.00 |
| DIM 'B' | 4 x No. OF CONTACTS + 5.00 |
| DIM 'C' | 4 x No. OF CONTACTS + 10.00 |

EXAMPLE 1: CONNECTOR WITH 08 COAX CONTACTS,
 M80-50000001-08-315-00-000
 DIM 'A' = 28.00mm, DIM 'B' = 37.00mm, DIM 'C' = 42.00mm
 DIM 'D' = 3.00mm

EXAMPLE 2: CONNECTOR WITH 10 POWER CONTACTS,
 M80-50000001-10-335-00-000
 DIM 'A' = 36.00mm, DIM 'B' = 45.00mm, DIM 'C' = 50.00mm
 DIM 'E' = 3.5mm

HARWIN

| | | |
|--|--|--|
| HARWIN USA TEL: 603 893 5376 FAX: 603 893 5396 mis@harwin.com | HARWIN Europe (UK) TEL: 023 9231 4545 FAX: 023 9231 4590 mis@harwin.co.uk | HARWIN Asia TEL: +65 6 779 4909 FAX: +65 6 719 3868 mis@harwin.com.sg |
|--|--|--|

THIS DRAWING AND ANY INFORMATION OR DESCRIPTIVE MATTER SET OUT HEREON ARE CONFIDENTIAL AND COPYRIGHT PROPERTY OF THE HARWIN GROUP AND MUST NOT BE DISCLOSED, LOANED, COPIED OR USED FOR MANUFACTURING, TENDERING OR FOR ANY OTHER PURPOSE WITHOUT THEIR WRITTEN PERMISSION.

TOLERANCES

| |
|-----------------|
| X . : ±1mm |
| X.X : ±0.25mm |
| X.XX : ±0.10mm |
| X.XXX : ±0.01mm |
| ANGLES : ±5° |
| UNLESS STATED |

MATERIAL: SEE ABOVE

FINISH: SEE ABOVE

S/AREA: mm²

TITLE: JACKSCREW DATAMATE MIXED TECHNOLOGY MALE ASSEMBLY

DRAWING NUMBER: M80-50000001-XX-XXX-00-000

SHT 3 OF 4

| | | | |
|------------------------|------|----------|--------|
| SM | 2 | 11.11.10 | 11006 |
| NAME | ISS. | DATE | C/NOTE |
| APPROVED: S. MCCULLAGH | | | |
| CHECKED: R. ADDE | | | |
| DRAWN: R. ADDE | | | |
| CUSTOMER REF.: | | | |
| ASSEMBLY DRG: | | | |

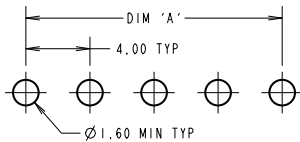
Customer Information Sheet

DRAWING No.: M80-5000000MI-XX-XXX-00-000 SHEET 4 OF 4 IF IN DOUBT - ASK (C) NOT TO SCALE THIRD ANGLE PROJECTION ALL DIMENSIONS IN mm

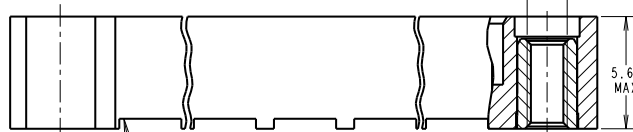
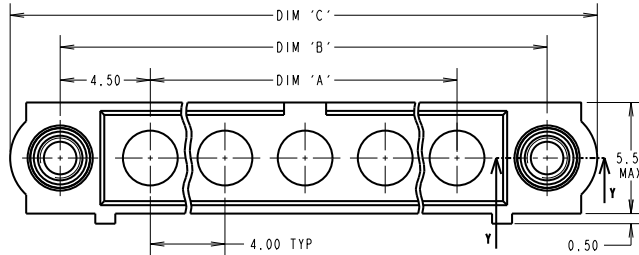
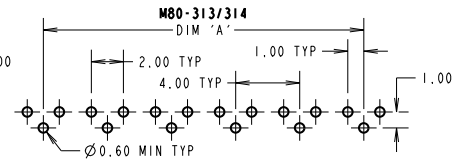
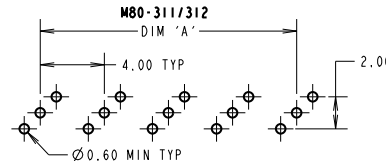
SPECIFICATIONS:

MATERIAL:
 MOULDING: GLASS FILLED PPS, UL94V-0, BLACK
 COAX & POWER CONTACT: BODY, INNER CONTACT, = COPPER ALLOY
 INSULATOR = PTFE
 JACKSCREW: STAINLESS STEEL
FINISH:
 COAX & POWER CONTACT: BODY, INNER CONTACT, = GOLD
ELECTRICAL:
 WORKING VOLTAGE = 120V AC/DC
 VOLTAGE PROOF = 360V AC/DC
 INSULATION RESISTANCE = 100MΩ MIN
POWER CONTACT:
 CONTACT RESISTANCE 6mΩ MAX
 CURRENT RATING = 20A MAX
COAX CONTACT:
 FREQUENCY RANGE = 6GHz
 IMPEDANCE = 50 Ω
 V.S.W.R = 1.05 + (0.04 x FREQUENCY) GHz MAX
 CONTACT RESISTANCE 6 mΩ MAX
 INSULATION RESISTANCE = 10⁶MΩ @250V AC
 OPERATING VOLTAGE = 180V AC @ 500mA
 MAXIMUM VOLTAGE = 1000V AC
MECHANICAL:
 DURABILITY = 500 OPERATIONS
 COAX & POWER CONTACT: INSERTION FORCE = 5N MAX
 WITHDRAWAL FORCE = 0.5N MIN
ENVIRONMENTAL:
 TEMPERATURE RANGE = -55°C TO +125°C
PACKING:
 TUBE
 FOR COMPLETE SPECIFICATION SEE COMPONENT SPECIFICATION C005XX (LATEST ISSUE)

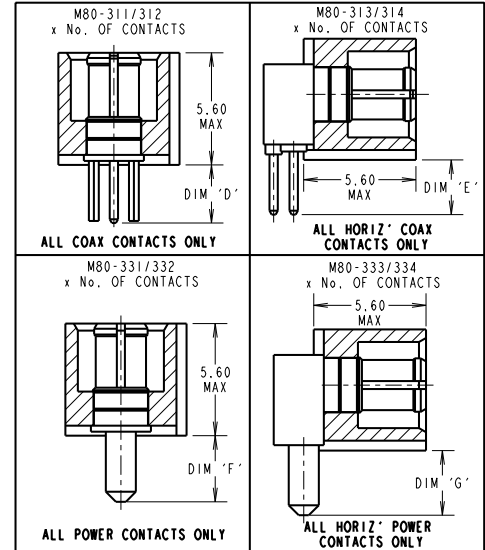
RECOMMENDED PCB LAYOUT FOR ALL POWER ONLY



RECOMMENDED PCB LAYOUTS FOR ALL COAX CONTACTS ONLY



PART SECTION Y-Y
 SPECIAL CONTACTS HIDDEN FOR ILLUSTRATION ONLY
 SEE ORDER CODE FOR PART No. TO BE ASSEMBLED



- NOTES:
 1. FOR EXAMPLE OF ALL COAX SPECIAL CONTACTS ORDER CODE SEE EXAMPLE 1 IN TABLE.
 2. FOR EXAMPLE OF ALL POWER SPECIAL CONTACTS ORDER CODE SEE EXAMPLE 2 IN TABLE.

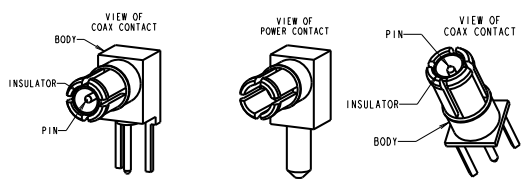
| DIMENSION | CALCULATION |
|-----------|----------------------------------|
| DIM 'A' | 4 x No. OF CONTACTS - 4.00 |
| DIM 'B' | 4 x No. OF CONTACTS + 5.00 |
| DIM 'C' | 4 x No. OF CONTACTS + 10.00 |
| DIM 'D' | M80-311 = 3.0mm, M80-312 = 4.5mm |
| DIM 'E' | M80-313 = 3.0mm, M80-314 = 4.5mm |
| DIM 'F' | M80-331 = 3.5mm, M80-332 = 5.0mm |
| DIM 'G' | M80-333 = 3.0mm, M80-334 = 4.5mm |

EXAMPLE 1: CONNECTOR WITH 08 COAX CONTACTS,
 M80-5000000MI-08-313-00-000
 DIM 'A' = 28.00mm, DIM 'B' = 37.00mm, DIM 'C' = 42.00mm
 DIM 'D' = 3.0mm

EXAMPLE 2: CONNECTOR WITH 10 POWER CONTACTS,
 M80-5000000MI-10-334-00-000
 DIM 'A' = 36.00mm, DIM 'B' = 45.00mm, DIM 'C' = 50.00mm
 DIM 'E' = 3.5mm

ORDER CODE: (PC TAIL CONTACTS ONLY)
M80-5000000MI-XX-XXX-00-000

TOTAL No. OF CONTACTS
 02 TO 12
SPECIAL CONTACTS (PC TAIL):
 311 = COAX CONTACT 3.0mm PC TAIL M80-311
 312 = COAX CONTACT 4.5mm PC TAIL M80-312
 313 = COAX CONTACT 3.0mm HORIZ' PC TAIL M80-313
 314 = COAX CONTACT 4.5mm HORIZ' PC TAIL M80-314
 331 = POWER CONTACT 3.5mm VERT' PC TAIL M80-331
 332 = POWER CONTACT 5.0mm VERT' PC TAIL M80-332
 333 = POWER CONTACT 3.0mm HORIZ' PC TAIL M80-333
 334 = POWER CONTACT 4.5mm HORIZ' PC TAIL M80-334



HARWIN
 HARWIN USA TEL: 603 893 5376 FAX: 603 893 5386 mis@harwin.com
 HARWIN Europe (UK) TEL: 023 9231 4545 FAX: 023 9231 4590 mis@harwin.co.uk
 HARWIN Asia TEL: +65 6 779 4909 FAX: +65 6 779 3868 mis@harwin.com.sg

THIS DRAWING AND ANY INFORMATION OR DESCRIPTIVE MATTER SET OUT HEREON ARE CONFIDENTIAL AND COPYRIGHT PROPERTY OF THE HARWIN GROUP AND MUST NOT BE DISCLOSED, LOANED, COPIED OR USED FOR MANUFACTURING, TENDERING OR FOR ANY OTHER PURPOSE WITHOUT THEIR WRITTEN PERMISSION.

TOLERANCES
 X. = ±1mm
 X.X = ±0.25mm
 X.XX = ±0.10mm
 X.XXX = ±0.01mm
 ANGLES = ±5°
 UNLESS STATED

MATERIAL: SEE ABOVE
 FINISH: SEE ABOVE
 S/AREA: mm²

| | | | |
|----------------|--------------|----------|--------|
| SM | 2 | 11.11.10 | 11006 |
| NAME | ISS. | DATE | C/NOTE |
| APPROVED: | S. MCCULLAGH | | |
| CHECKED: | R. ADDE | | |
| DRAWN: | R. ADDE | | |
| CUSTOMER REF.: | | | |
| ASSEMBLY DRG: | | | |

TITLE: JACKSCREW DATAMATE MIXED TECHNOLOGY MALE ASSEMBLY
 DRAWING NUMBER: M80-5000000MI-XX-XXX-00-000
 SHT 4 OF 4