Customer Information Sheet

DRAWING No.: M80-5000000M7-XX-XXX-00-000	IF IN DOUBT - ASK	©	NOT TO SCALE	THIRD ANGLE PROJECTION	ALL DIMENSIONS IN mm

SPECIFICATIONS:

MATERIAL:
- MOULDING: GLASS FILLED PPS, UL94V-0, BLACK
- COAX CONTACT:
  - BODY, SLEEVE, INNER CONTACT,
  - END PLUG = COPPER ALLOY
  - LATCHING COLLAR = BERYLLIUM COPPER
  - INSULATOR = PTFE
  - BOARD MOUNT JACKSCREW, SCREW = STAINLESS STEEL

FINISH:
- COAX CONTACT:
  - BODY, SLEEVE, INNER CONTACT, END PLUG = GOLD
  - LATCHING COLLAR = NICKEL

ELECTRICAL:
- COAX CONTACT:
  - FREQUENCY RANGE = 6GHz
  - IMPEDANCE = 50Ω
  - V.S.W.R = 1.05 + (0.04 x FREQUENCY) GHz MAX
  - CONTACT RESISTANCE = 6mΩ MAX
  - INSULATION RESISTANCE = 10^6MΩ @250V AC
  - OPERATING VOLTAGE = 180V AC @ 500mA
  - MAXIMUM VOLTAGE = 1000V AC

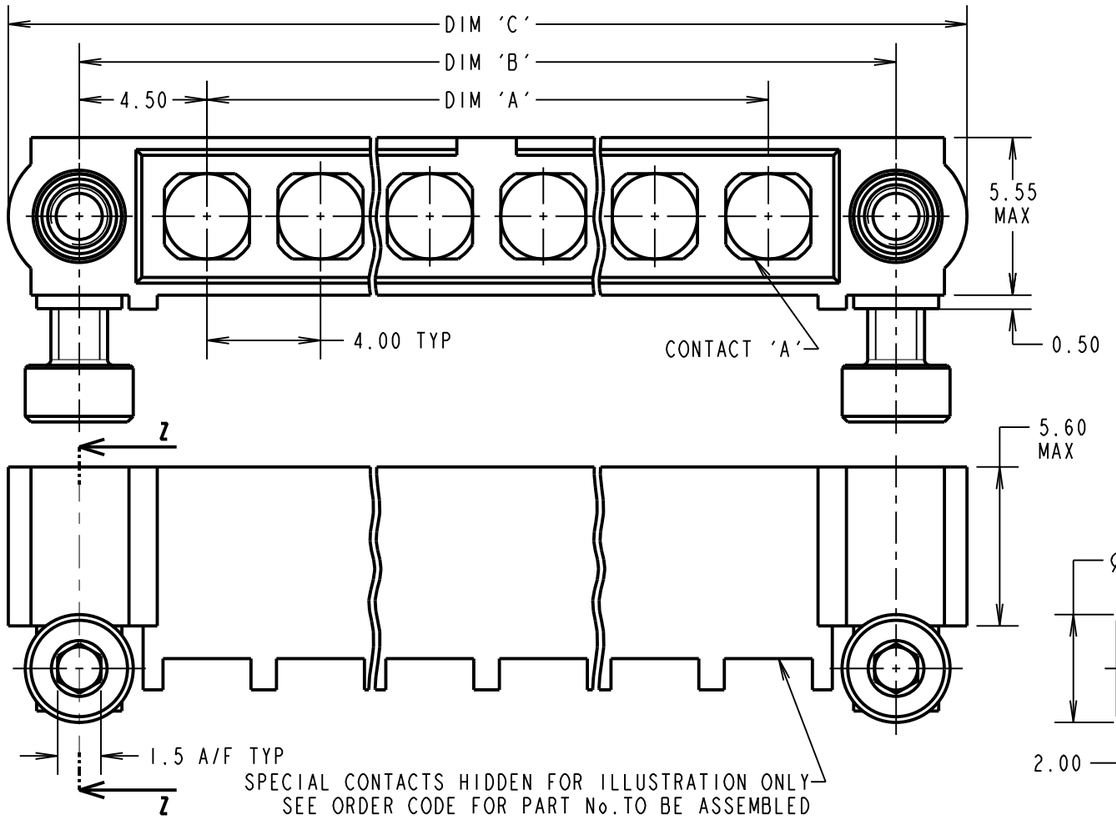
MECHANICAL:
- DURABILITY = 500 OPERATIONS
- COAX CONTACT:
  - INSERTION FORCE = 8N MAX
  - WITHDRAWAL FORCE = 0.5N MIN

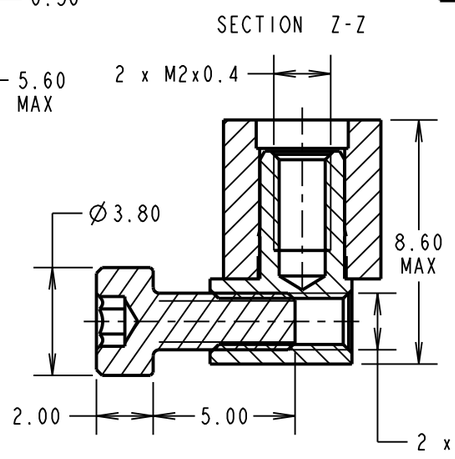
ENVIRONMENTAL:
- TEMPERATURE RANGE = -55°C TO +125°C

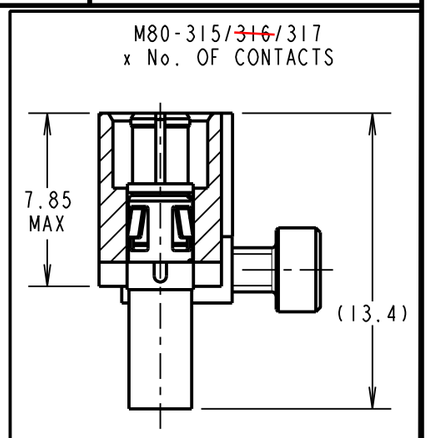
PACKING:
- BAG

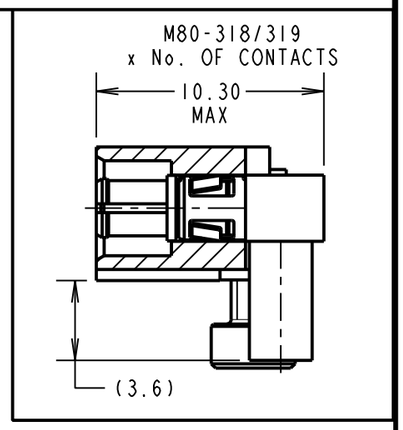
FOR COMPLETE SPECIFICATION SEE COMPONENT SPECIFICATION C005XX (LATEST ISSUE)

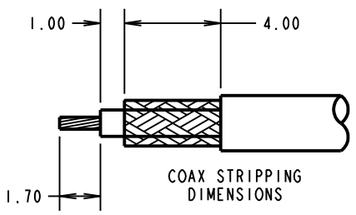
COAX CRIMP CONTACTS ONLY

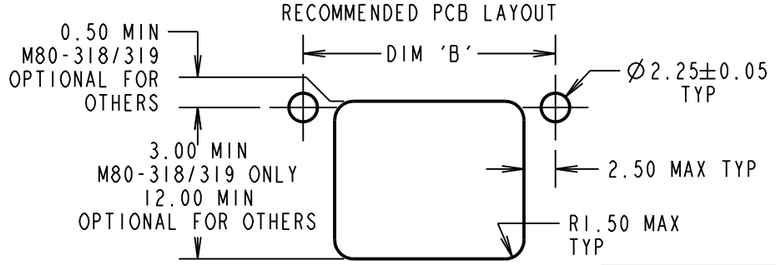


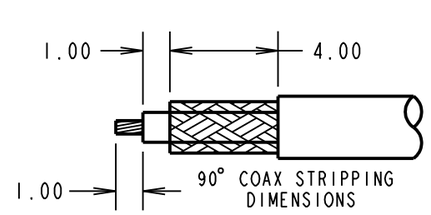


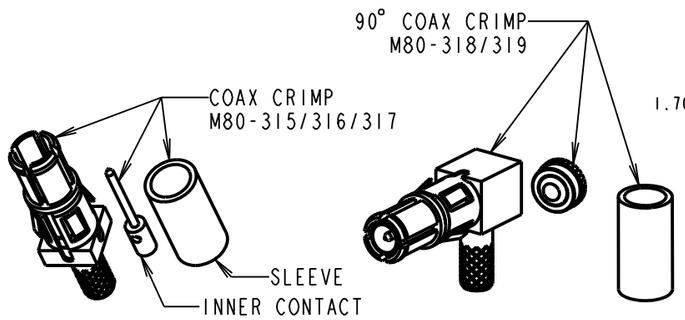












DIMENSION	CALCULATION
DIM 'A'	4 x No. OF CONTACTS - 4.00
DIM 'B'	4 x No. OF CONTACTS + 5.00
DIM 'C'	4 x No. OF CONTACTS + 10.0

EXAMPLE 1: CONNECTOR WITH 08 COAX CONTACTS,
M80-5000000M7-08-315-00-000
DIM 'A' = 28.00mm, DIM 'B' = 37.00mm, DIM 'C' = 42.0mm

CRIMP/SOLDER NOTES:
1. CONNECTORS ARE SUPPLIED WITH CONTACTS AND SCREWS LOOSE.
2. 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.
3. FOR EXTRA COAX CONTACTS, USE PART NUMBERS M80-315/~~316~~/317/318/319.
4. COAX CONTACT EXTRACTION TOOL = Z80-290.
5. RECOMMENDED HAND CRIMP TOOL FOR INNER COAX CONTACT = Z80-292 WITH POSITIONER Z80-291. RECOMMENDED HAND CRIMP TOOL AND DIE SET FOR SLEEVE = Z80-293.
6. INSTRUCTION SHEETS ARE AVAILABLE.

ORDER CODE: (COAX CRIMP CONTACTS)

M80-5000000M7-XX-XXX-00-000

TOTAL No. OF CONTACTS
02 TO 12

SPECIAL CONTACTS
- 315 = COAX CONTACT 2.00mm CRIMP M80-315
- ~~316 = COAX CONTACT 2.40mm CRIMP M80-316~~
- 317 = COAX CONTACT 2.70mm CRIMP M80-317
- 318 = COAX CONTACT 2.00mm HORIZ' CRIMP M80-318
- 319 = COAX CONTACT 2.70mm HORIZ' CRIMP M80-319

MGP	6	09.12.19	21540
NAME	ISS.	DATE	C/NOTE
APPROVED: MGP			
CHECKED: MR			
DRAWN: S.MCCULLAGH			
CUSTOMER REF.:			
ASSEMBLY DRG:			

HARWIN
www.harwin.com
technical@harwin.com

TOLERANCES
X. = ±1mm
X.X = ±0.50mm
X.XX = ±0.20mm
X.XXX = ±0.01mm
ANGLES = ±5°
UNLESS STATED

MATERIAL: SEE ABOVE

FINISH: SEE ABOVE

S/AREA: mm²

TITLE: DATAMATE MIX-TEK MALE ASSY WITH HEX SOCKET BOARDMOUNT J/SCREW

DRAWING NUMBER: M80-5000000M7-XX-XXX-00-000

SHT 4 OF 6

Customer Information Sheet

DRAWING No.: M80-5000000M7-XX-XXX-00-000	IF IN DOUBT - ASK	©	NOT TO SCALE	THIRD ANGLE PROJECTION	ALL DIMENSIONS IN mm

SPECIFICATIONS:

MATERIAL:
- MOULDING: GLASS FILLED PPS, UL94V-0, BLACK
- POWER CONTACT:
  - BODY, SLEEVE, INNER CONTACT, END PLUG = COPPER ALLOY
  - LATCHING COLLAR = BERYLLIUM COPPER
  - INSULATOR = PTFE
- BOARD MOUNT JACKSCREW, SCREW = STAINLESS STEEL

FINISH:
- POWER CONTACT:
  - BODY, SLEEVE, INNER CONTACT, END PLUG = GOLD
  - LATCHING COLLAR = NICKEL

ELECTRICAL:
- WORKING VOLTAGE = 800V AC/DC
- VOLTAGE PROOF = 1200V 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
  M80-PM5 = 40A MAX WITH 10AWG
  CONTACT AS SPECIFIED

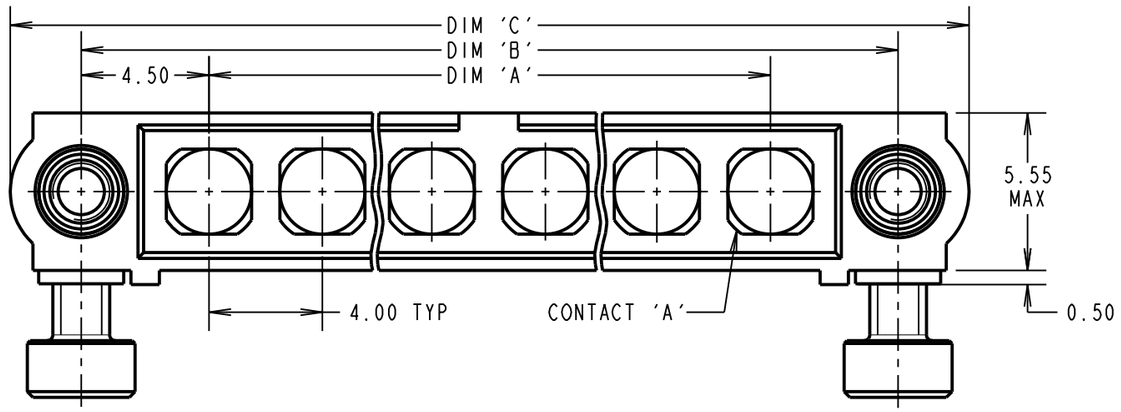
MECHANICAL:
- DURABILITY = 500 OPERATIONS
- POWER CONTACT:
  - INSERTION FORCE:
    M80-335/336/337/338/339 = 8N MAX
    M80-PM5 = 15N MAX
  - WITHDRAWAL FORCE = 0.5N MIN

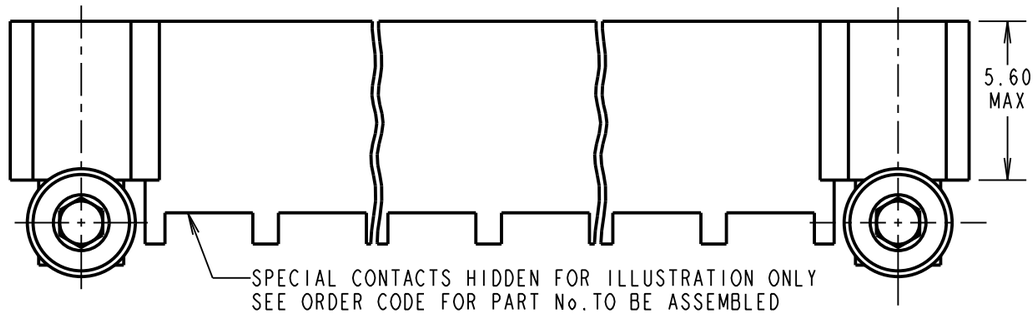
ENVIRONMENTAL:
- TEMPERATURE RANGE:
  - M80-335/336/337/338/339 = -55°C TO +125°C
  - M80-PM5 = -55°C TO +150°C

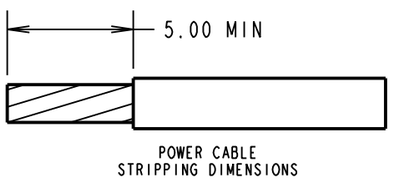
PACKING:
- BAG

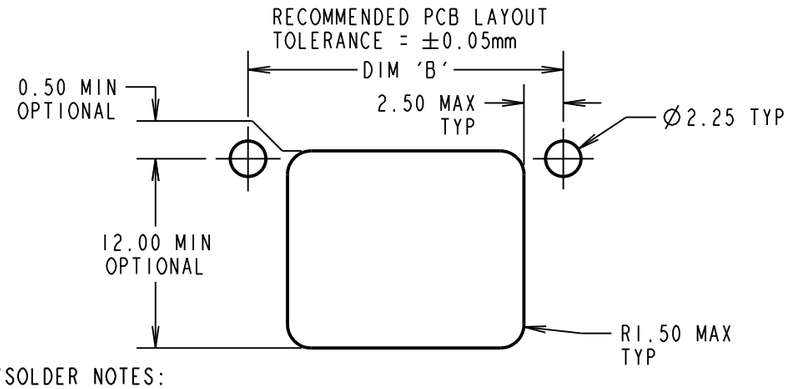
FOR COMPLETE SPECIFICATION SEE COMPONENT SPECIFICATION C005XX (LATEST ISSUE)

POWER CRIMP & SOLDER CONTACTS ONLY







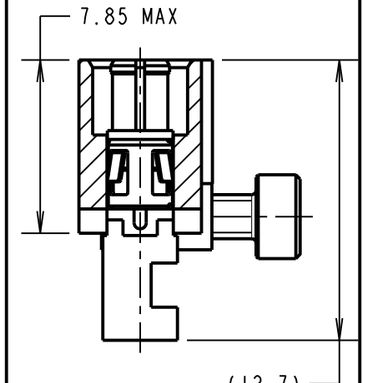


DIMENSION	CALCULATION
DIM 'A'	4 x No. OF CONTACTS - 4.00
DIM 'B'	4 x No. OF CONTACTS + 5.00
DIM 'C'	4 x No. OF CONTACTS + 10.0

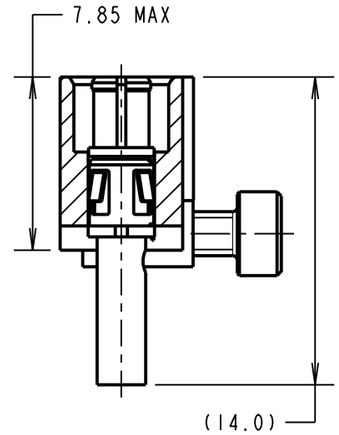
EXAMPLE 2: CONNECTOR WITH 10 POWER CONTACTS,
M80-5000000M7-10-335-00-000
DIM 'A' = 36.00mm, DIM 'B' = 45.00mm, DIM 'C' = 50.0mm

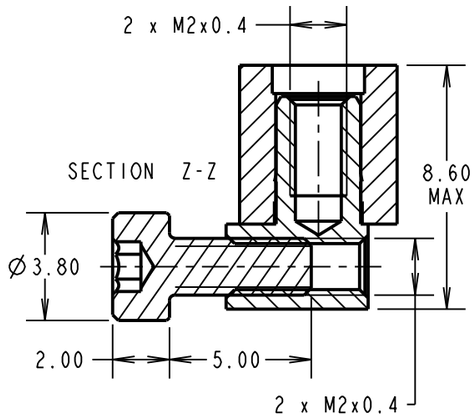
CRIMP/SOLDER NOTES:
1. CONNECTORS ARE SUPPLIED WITH CONTACTS AND SCREWS LOOSE.
2. FOR EXTRA POWER CONTACTS USE PART NUMBERS M80-335/336/337/338/339/PM5.
3. POWER CONTACT EXTRACTION TOOL = Z80-290.
4. RECOMMENDED HAND CRIMP TOOL FOR CONTACTS 338/339 = Z80-294 AND POSITIONER Z80-295.
5. INSTRUCTION SHEETS ARE AVAILABLE.

M80-335/336/337
x No. OF CONTACTS

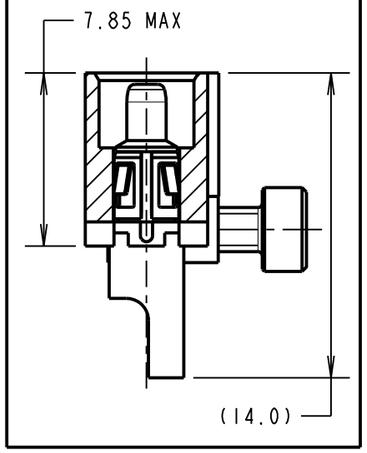


M80-338/339
x No. OF CONTACTS





M80-PM5
x No. OF CONTACTS



ORDER CODE: (POWER CRIMP/SOLDER CONTACTS)

M80-5000000M7-XX-XXX-00-000

TOTAL No. OF CONTACTS
02 TO 12

SPECIAL CONTACTS
- 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
- PM5 = POWER CONTACT 10AWG SOLDER M80-PM5

NAME	ISS.	DATE	C/NOTE
MGP	6	09.12.19	21540
APPROVED:	MGP		
CHECKED:	MR		
DRAWN:	S.MCCULLAGH		
CUSTOMER REF.:			
ASSEMBLY DRG:			

HARWIN
www.harwin.com
technical@harwin.com

TOLERANCES
X. = ±1mm
X.X = ±0.50mm
X.XX = ±0.20mm
X.XXX = ±0.01mm
ANGLES = ±5°
UNLESS STATED

MATERIAL: SEE ABOVE

FINISH: SEE ABOVE

S/AREA: mm²

TITLE: DATAMATE MIX-TEK
MALE ASSY WITH
HEX SOCKET BOARDMOUNT J/SCREW

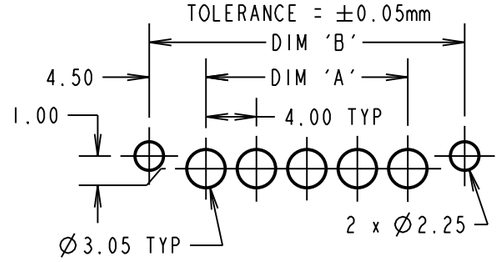
DRAWING NUMBER: M80-5000000M7-XX-XXX-00-000

SHT 5 OF 6

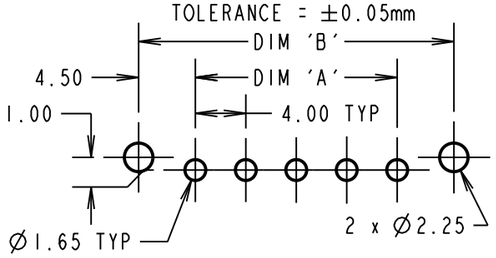
Customer Information Sheet

DRAWING No.: M80-5000000M7-XX-XXX-00-000	IF IN DOUBT - ASK	©	NOT TO SCALE	THIRD ANGLE PROJECTION	ALL DIMENSIONS IN mm

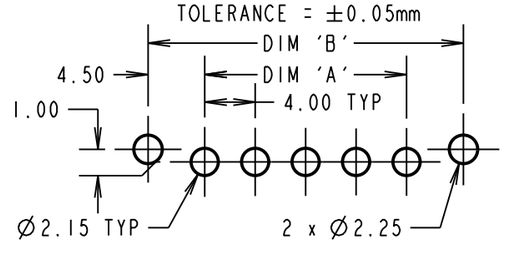
RECOMMENDED PCB LAYOUT FOR
SMT CONTACT: M80-33A
TOLERANCE = ±0.05mm



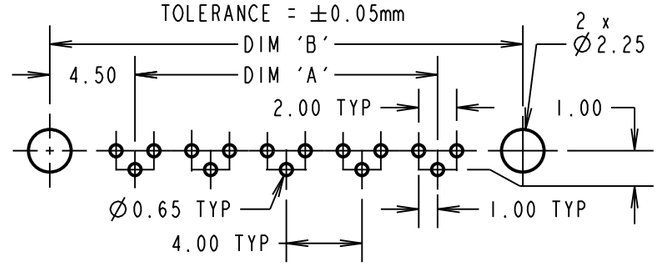
RECOMMENDED PCB LAYOUT FOR
POWER CONTACTS: M80-333/334
TOLERANCE = ±0.05mm



RECOMMENDED PCB LAYOUT FOR
POWER CONTACTS: M80-PM3/PM4
TOLERANCE = ±0.05mm



RECOMMENDED PCB LAYOUT FOR
COAX CONTACTS: M80-313/314
TOLERANCE = ±0.05mm



SPECIFICATIONS:

MATERIAL:
- MOULDING: GLASS FILLED PPS, UL94V-0, BLACK
- POWER CONTACT: COPPER ALLOY
- COAX CONTACT:
  - BODY = COPPER ALLOY
  - INNER CONTACT = COPPER ALLOY
  - INSULATOR = PTFE
  - JACKSCREW, SCREW = STAINLESS STEEL

FINISH:
- POWER CONTACT: GOLD
- COAX CONTACT: BODY, INNER CONTACT = GOLD

ELECTRICAL:

POWER CONTACT:
- WORKING VOLTAGE = 800V AC/DC
- VOLTAGE PROOF = 1200V AC/DC
- INSULATION RESISTANCE = 100MΩ MIN
- CONTACT RESISTANCE = 6mΩ MAX
- CURRENT RATING:
  - M80-333/334/33A = 20A MAX
  - M80-PM3/PM4 = 40A MAX

COAX CONTACT:
- FREQUENCY RANGE = 6GHz
- IMPEDANCE = 50Ω
- V.S.W.R = 1.05 + (0.04 x FREQUENCY) GHz MAX
- CONTACT RESISTANCE = 6mΩ MAX
- INSULATION RESISTANCE = 10^6MΩ @250V AC
- OPERATING VOLTAGE = 180V AC @ 500mA
- MAXIMUM VOLTAGE = 1000V AC

MECHANICAL:
- DURABILITY = 500 OPERATIONS

POWER CONTACT:
- INSERTION FORCE:
  - M80-333/334/33A = 8N MAX
  - M80-PM3/PM4 = 15N MAX
- WITHDRAWAL FORCE = 0.5N MIN

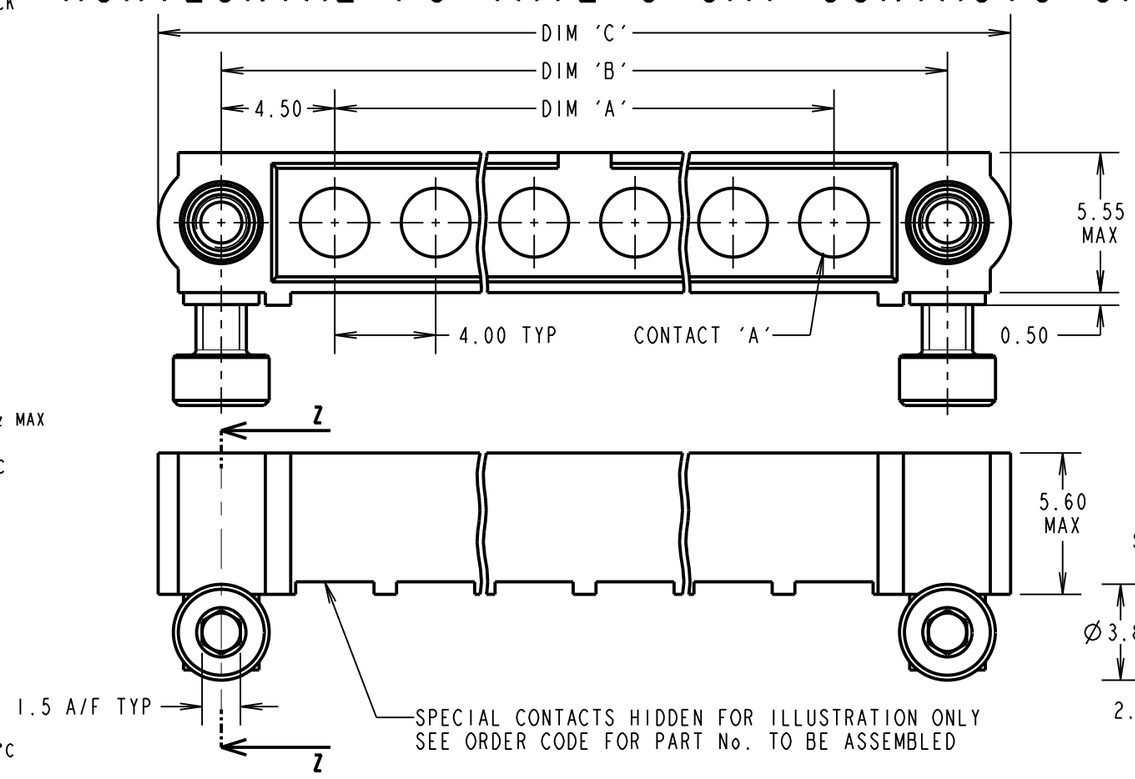
COAX CONTACT:
- INSERTION FORCE = 8N MAX
- WITHDRAWAL FORCE = 0.5N MIN

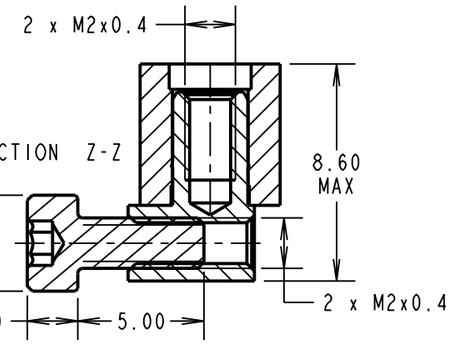
ENVIRONMENTAL:
- TEMPERATURE RANGE:
  - M80-313/314/333/334/33A = -55°C TO +125°C
  - M80-PM3/PM4 = -55°C TO +150°C

PACKING:
- TUBE

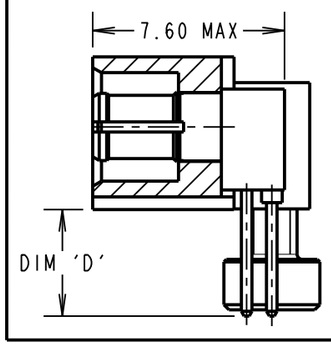
FOR COMPLETE SPECIFICATION SEE COMPONENT SPECIFICATION C005XX (LATEST ISSUE)

HORIZONTAL PC TAIL & SMT CONTACTS ONLY

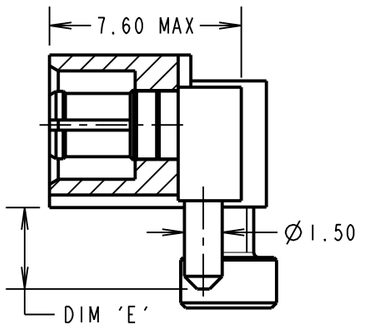




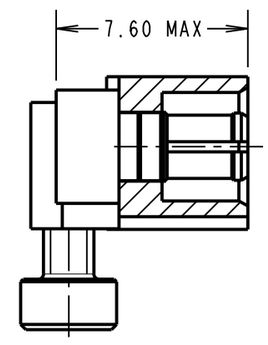
M80-313/M80-314
x No. OF CONTACTS

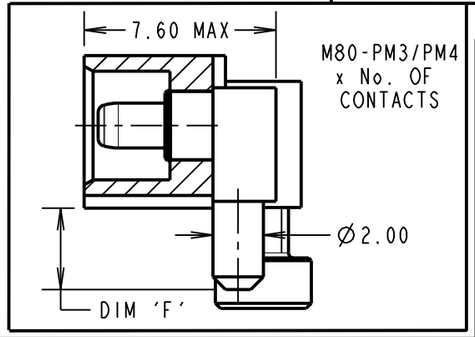


M80-333/M80-334
x No. OF CONTACTS



M80-33A
x No. OF CONTACTS





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 + 10.0
DIM 'D'	M80-313 = 3.0mm, M80-314 = 4.5mm
DIM 'E'	M80-333 = 3.5mm, M80-334 = 5.0mm
DIM 'F'	M80-PM3 = 3.5mm, M80-PM4 = 5.0mm
EXAMPLE 2: CONNECTOR WITH 10 POWER CONTACTS, M80-5000000M7-10-333-00-000 DIM 'A' = 36.00mm, DIM 'B' = 45.00mm, DIM 'C' = 50.0mm DIM 'E' = 3.5mm	

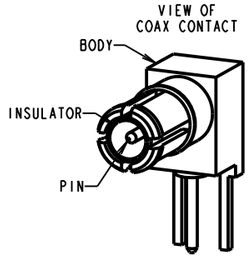
ORDER CODE: (PC TAIL CONTACTS ONLY)

M80-5000000M7-XX-XXX-00-000

TOTAL No. OF CONTACTS
02 TO 12

SPECIAL CONTACTS
- 313 = COAX CONTACT 3.0mm PC TAIL M80-313
- 314 = COAX CONTACT 4.5mm PC TAIL M80-314
- 333 = 20A POWER CONTACT 3.5mm HORZ' PC TAIL M80-333
- 334 = 20A POWER CONTACT 5.0mm HORZ' PC TAIL M80-334
- PM3 = 40A POWER CONTACT 3.5mm HORZ' PC TAIL M80-PM3
- PM4 = 40A POWER CONTACT 5.0mm HORZ' PC TAIL M80-PM4
- 33A = POWER CONTACT HORZ' SMT M80-33A

VIEW OF
COAX CONTACT



HARWIN
www.harwin.com
technical@harwin.com

TOLERANCES
X. = ±1mm
X.X = ±0.50mm
X.XX = ±0.20mm
X.XXX = ±0.01mm
ANGLES = ±5°
UNLESS STATED

MATERIAL: SEE ABOVE

FINISH: SEE ABOVE

S/AREA: mm²

TITLE: DATAMATE MIX-TEK
MALE ASSY WITH
HEX SOCKET BOARDMOUNT J/SCREW

DRAWING NUMBER: M80-5000000M7-XX-XXX-00-000

SHT 6 OF 6

NAME	ISS.	DATE	C/NOTE
MGP	6	09.12.19	21540

APPROVED: MGP
CHECKED: MR
DRAWN: S.MCCULLAGH
CUSTOMER REF.:
ASSEMBLY DRG: