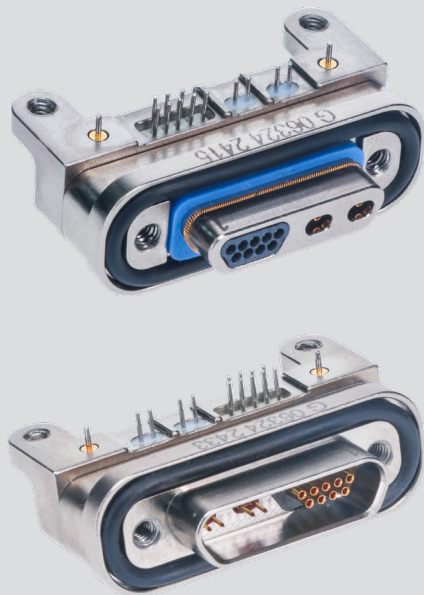


"ZERO-CROSSTALK" M83513 Micro-D VersaLink™ Connectors



GVL RPM-BR, Rear Panel Mount, Right Angle PCB Connectors

MICRO-D VERSALINK CONNECTORS



PART NUMBER DEVELOPMENT										
Sample Part Number	GVL RPM	2	L-	2-9	P	BR	R3	T	C	-.110
Series	GVL RPM = VersaLink RPM Micro-D									
Shell Finish	2 = Nickel 5 = Gold									
Insulator Material	L = LCP or PPS									
Contact Layout (V-M) ¹	1-0, 1-9, 2-0, 2-9, 2-15, 2-21, 3-9, 4-0, 4-15, 4-31, 8-9, 10-0									
Connector Type ³	P = Plug S = Receptacle									
Connector Style	BR = Right Angle Board Mount									
Hardware ^{4,5}	Rear panel mount jackposts (Length in Inches): R1 = .032 panel R2 = .047 panel R3 = .062 panel R4 = .093 panel R5 = .125 panel R6 = .080 panel B = Threaded inserts, no hardware									
Threaded Insert Option	T = Threaded insert in board mount hole; omit for thru-hole									
O-Ring	C = Conductive N = Non-conductive (Nitrile) F = Fluorosilicone									
PC Tail Length ⁶	-.080, -.110, -.140 (Length in Inches +.020/-0.000)									

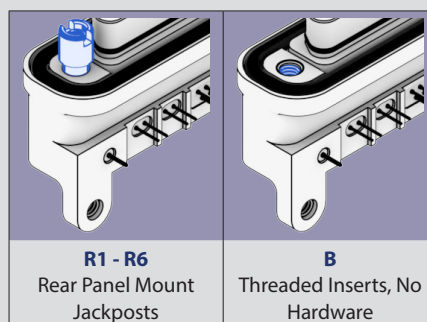
MATERIALS AND FINISHES

- Connector shell: aluminum alloy 6061
- Insulator (v): rigid dielectric
- Insulator (m): liquid crystal polymer (LCP) or polyphenylene sulfide (PPS)
- Flange seal: fluorosilicone rubber, blue
- Pin contact: copper alloy, gold over nickel plating
- Socket contact: copper alloy, gold over nickel plating
- Ground spring: stainless steel, gold plating
- Ground pin: copper alloy/gold plating
- Hardware: 300 series stainless steel, passivated
- Encapsulant: epoxy resin Hysol EE4215

PERFORMANCE SPECIFICATIONS

- Current rating: 3 amp (Micro-D contacts)
- DWV: 600 VAC sea level
- Insulation resistance: 5000 megohms minimum
- Operating temperature: -55° C to +150° C
- Mating force (contact m): (10 ounces) x (# of contacts)
- Mating force (contact v): (5 ounces) x (# of contacts)
- Electrical performance IAW Glenair specification GT-19-230
- Interface dimensions IAW MIL-DTL-83513
- Reference application notes AN0005 for optimal performance

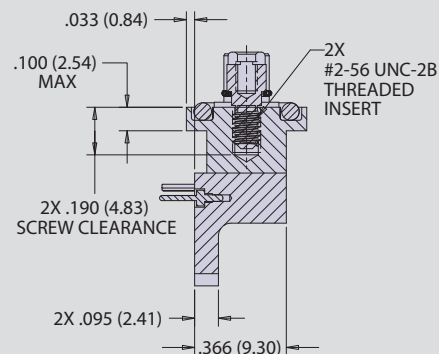
HARDWARE



NOTES

- Refer to GHS4-M-1000 for insert arrangement details on page 94.
- Refer to GVLM-1001 for GVL RPM-BR PCB footprints on page 142.
- Plug connector uses pin Micro-D contacts and socket VersaLink contacts. Receptacle uses socket Micro-D contacts and pin VersaLink contacts.
- Hardware always required to ensure connector pair is fully mated when installed.
- Refer to MIL-DTL-83513 panel cutout details on page 95.
- PC tails are solder-dipped in 60/40 tin-lead solder.
- Refer to 500-154 for protective cover on page 164.

CONNECTOR CUTAWAY



INSERT ARRANGEMENTS

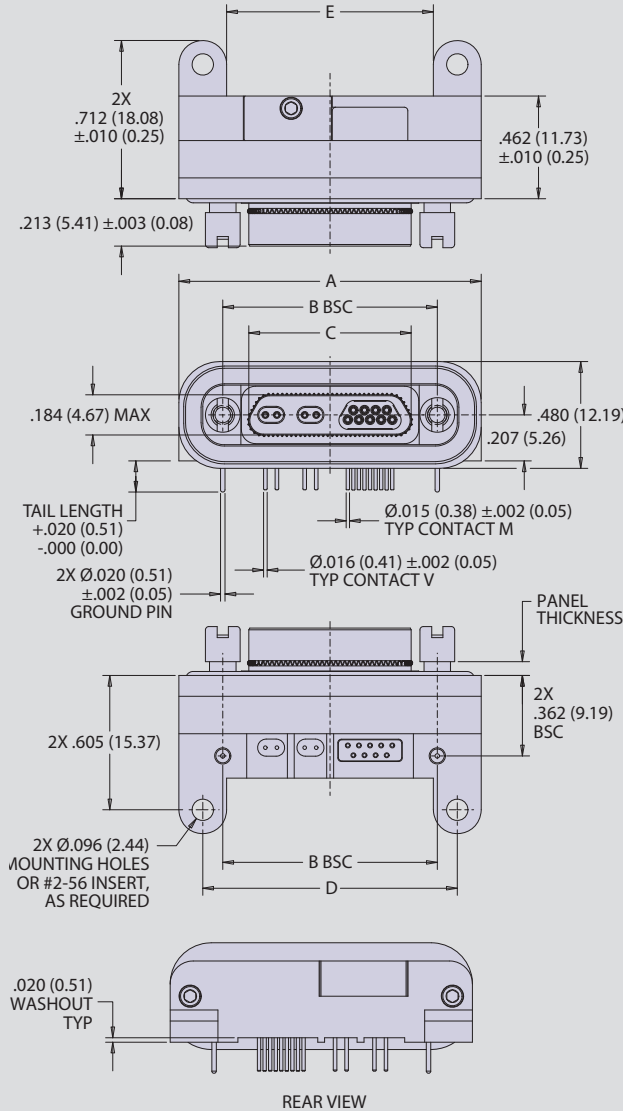
Insert Arrangements	No. of Contacts	
	VersaLink (V)	TwistPin (M)
1-0	1	0
2-0	2	0
1-9	1	9
2-9	2	9
4-0	4	0
2-15	2	15
2-21	2	21
3-9	3	9
4-15	4	15
4-31	4	31
8-9	8	9
10-0P	10	0

"ZERO-CROSSTALK" M83513 Micro-D VersaLink™ Connectors

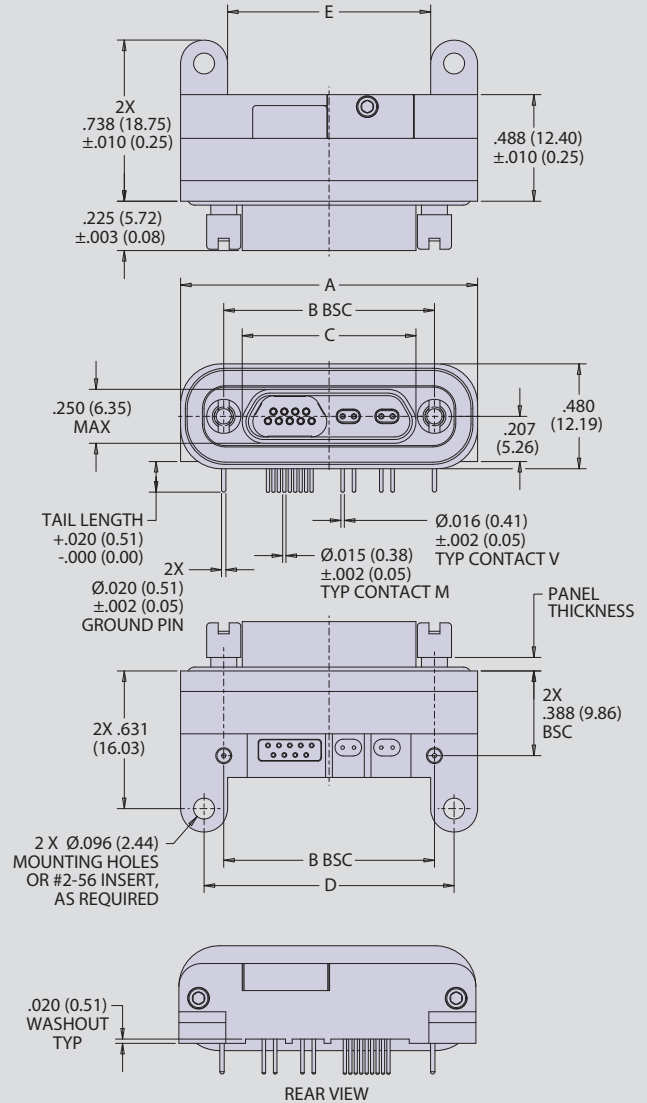


GVL RPM-BR, Rear Panel Mount, Right Angle PCB Connectors

GVL-M-BR PCB RIGHT ANGLE PLUG CONNECTOR



GVL-M-BR PCB RIGHT ANGLE RECEPTACLE CONNECTOR



MICRO-D VERSALINK CONNECTORS

PLUG DIMENSIONS

LAYOUT	A MAX	B ± 0.005	C MAX	D ± 0.005	E ± 0.005
1-0P	0.965 (24.51)	0.565 (14.35)	0.333 (8.46)	0.745 (18.92)	0.530 (13.46)
2-0P	1.115 (28.32)	0.715 (18.16)	0.483 (12.27)	0.895 (22.73)	0.680 (17.27)
1-9P	1.265 (32.13)	0.865 (21.97)	0.633 (16.08)	1.045 (26.54)	0.830 (21.08)
2-9P	1.365 (34.67)	0.965 (24.51)	0.733 (18.62)	1.145 (29.08)	0.930 (23.62)
4-0P	1.365 (34.67)	0.965 (24.51)	0.733 (18.62)	1.145 (29.08)	0.930 (23.62)
2-15P	1.515 (38.48)	1.115 (28.32)	0.833 (21.16)	1.295 (32.89)	1.080 (27.43)
3-9P	1.665 (42.29)	1.265 (32.13)	1.033 (26.24)	1.445 (36.70)	1.230 (31.24)
4-15P	2.015 (51.18)	1.615 (41.02)	1.384 (35.15)	1.795 (45.59)	1.580 (40.13)
4-31P	2.415 (61.34)	2.015 (51.18)	1.784 (45.31)	2.195 (55.75)	1.980 (50.29)
8-9P	2.415 (61.34)	2.015 (51.18)	1.784 (45.31)	2.195 (55.75)	1.980 (50.29)
10-0P	2.415 (61.34)	2.015 (51.18)	1.784 (45.31)	2.195 (55.75)	1.980 (50.29)

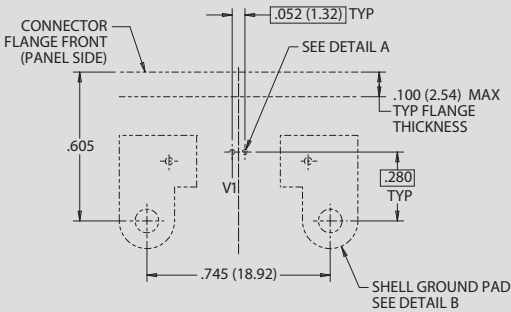
RECEPTACLE DIMENSIONS

LAYOUT	A MAX	B ± 0.005	C MAX	D ± 0.005	E ± 0.005
1-0S	0.965 (24.51)	0.565 (14.35)	0.400 (10.16)	0.745 (18.92)	0.530 (13.46)
2-0S	1.115 (28.32)	0.715 (18.16)	0.551 (14.00)	0.895 (22.73)	0.680 (17.27)
1-9S	1.265 (32.13)	0.865 (21.97)	0.701 (17.81)	1.045 (26.54)	0.830 (21.08)
2-9S	1.365 (34.67)	0.965 (24.51)	0.801 (20.35)	1.145 (29.08)	0.930 (23.62)
4-0S	1.365 (34.67)	0.965 (24.51)	0.801 (20.35)	1.145 (29.08)	0.930 (23.62)
2-15S	1.515 (38.48)	1.115 (28.32)	0.951 (24.16)	1.295 (32.89)	1.080 (27.43)
3-9S	1.665 (42.29)	1.265 (32.13)	1.101 (27.97)	1.445 (36.70)	1.230 (31.24)
4-15S	2.015 (51.18)	1.615 (41.02)	1.450 (36.83)	1.795 (45.59)	1.580 (40.13)
4-31S	2.415 (61.34)	2.015 (51.18)	1.850 (46.99)	2.195 (55.75)	1.980 (50.29)
8-9S	2.415 (61.34)	2.015 (51.18)	1.850 (46.99)	2.195 (55.75)	1.980 (50.29)
10-0S	2.415 (61.34)	2.015 (51.18)	1.850 (46.99)	2.195 (55.75)	1.980 (50.29)

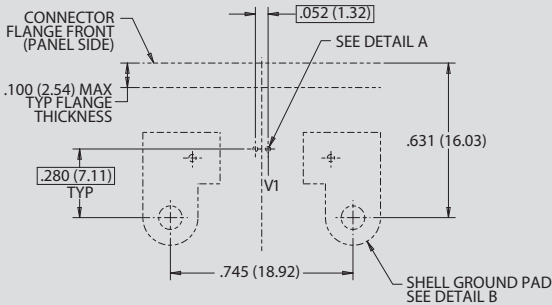
"ZERO-CROSSTALK" M83513 Micro-D VersaLink™ Connectors



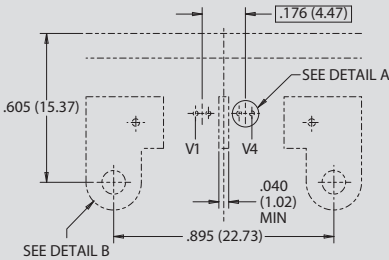
GVLM-1002: GVL RPM-BR, Rear Panel Mount, Right Angle PCB Connector Footprints



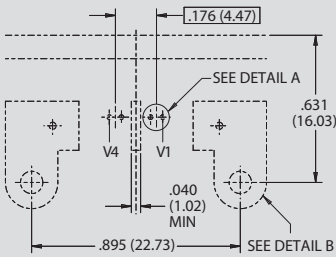
Plug Layout 1-0



Receptacle Layout 1-0



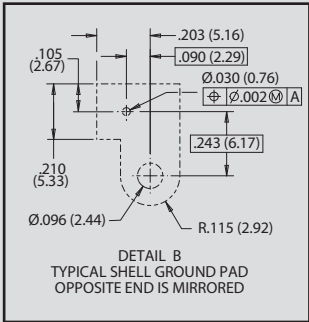
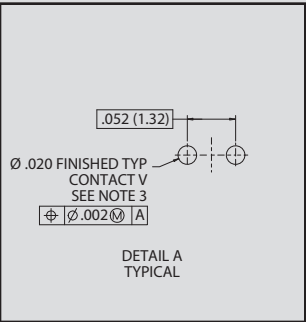
Plug Layout 2-0



Receptacle Layout 2-0

NOTES

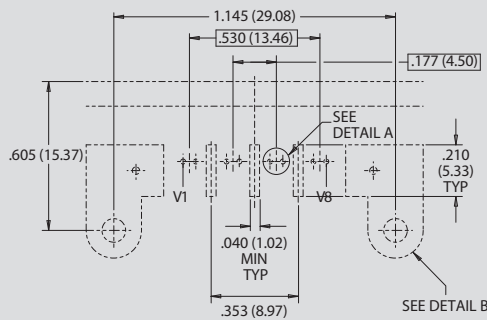
1. Patterns shown are for connector mounting side of PC board.
2. Reference GVL RPM-BR for connector details.
3. Reference application notes AN0005 for optimal performance.



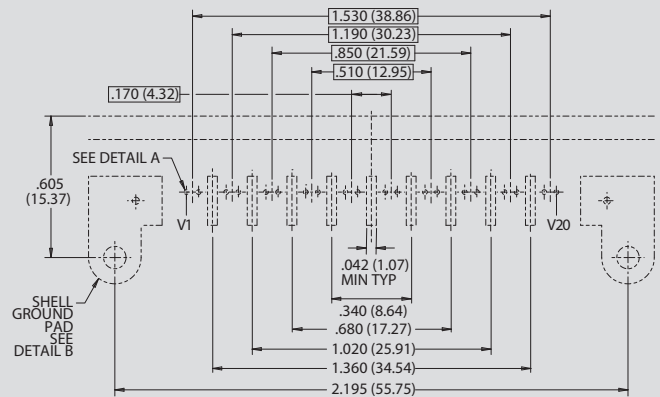
"ZERO-CROSSTALK" M83513 Micro-D VersaLink™ Connectors



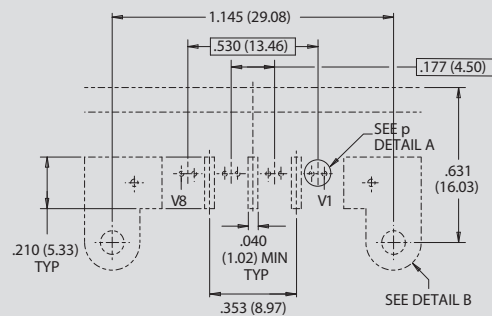
GVLM-1002: GVL RPM-BR, Rear Panel Mount, Right Angle PCB Connector Footprints



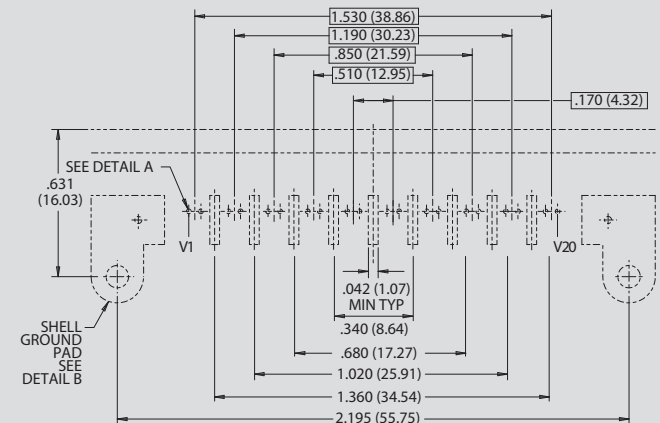
Plug Layout 4-0



Plug Layout 10-0



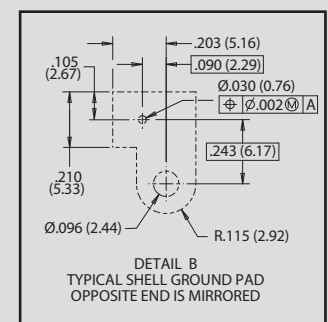
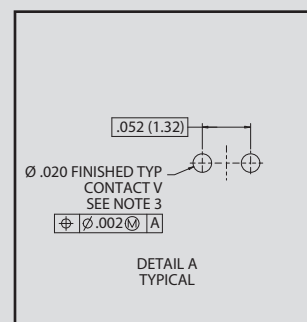
Receptacle Layout 4-0



Receptacle Layout 10-0

NOTES

1. Patterns shown are for connector mounting side of PC board.
2. Reference GVL RPM-BR for connector details.
3. Reference application notes AN0005 for optimal performance.

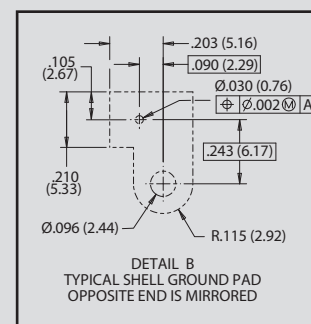


Glenair

MICRO-D VERSALINK CONNECTORS



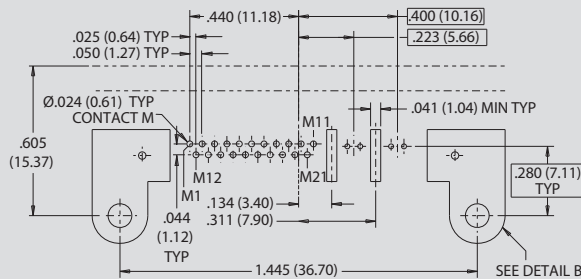
1. Patterns shown are for connector mounting side of PC board.
2. Reference GVL RPM-BR for connector details.
3. Reference application notes AN0005 for optimal performance.



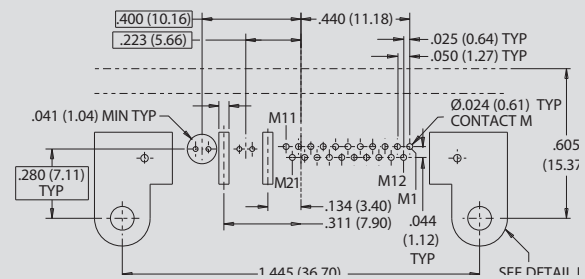
"ZERO-CROSSTALK" M83513 Micro-D VersaLink™ Connectors



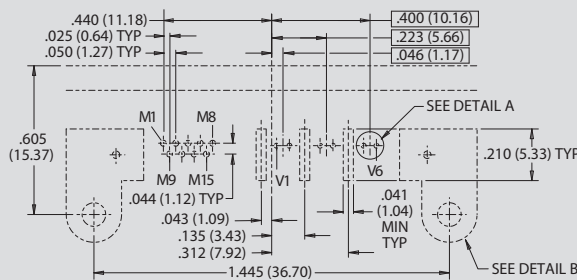
GVLM-1002: GVL RPM-BR, Rear Panel Mount, Right Angle PCB Connector Footprints



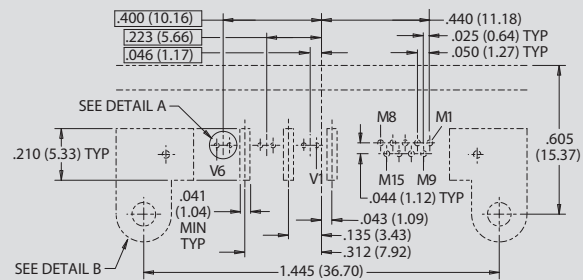
Plug Layout 2-21



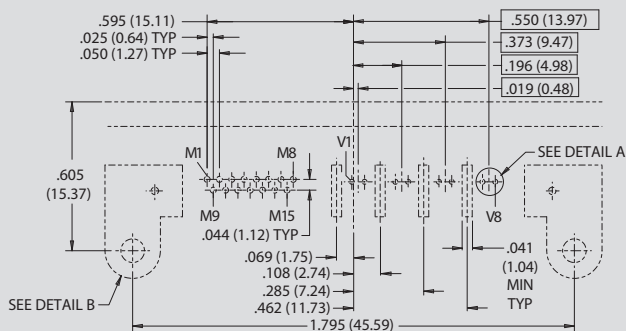
Receptacle Layout 2-21



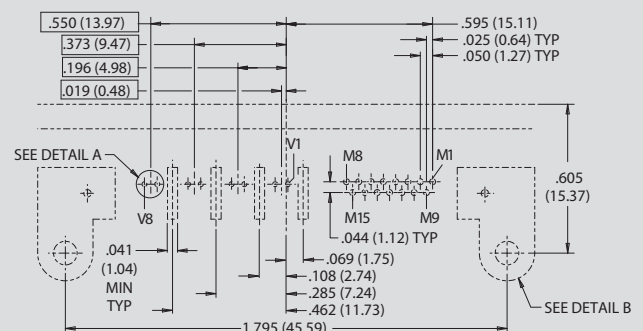
Plug Layout 3-9



Receptacle Layout 3-9



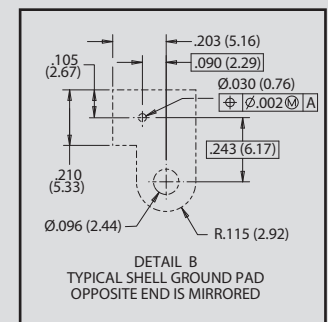
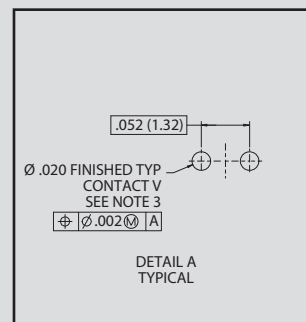
Plug Layout 4-15



Receptacle Layout 4-15

NOTES

1. Patterns shown are for connector mounting side of PC board.
2. Reference GVL RPM-BR for connector details.
3. Reference application notes AN0005 for optimal performance.



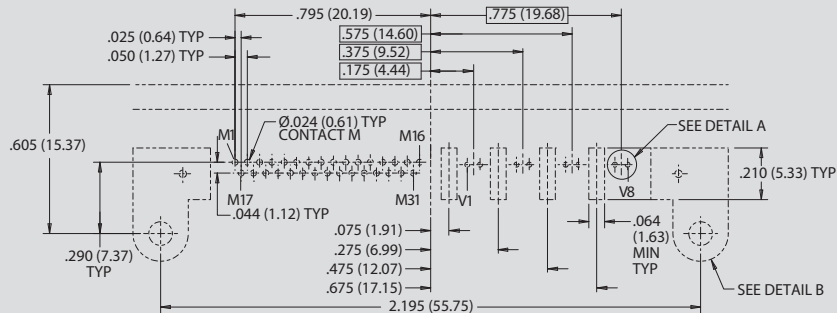
"ZERO-CROSSTALK"

M83513 Micro-D VersaLink™ Connectors

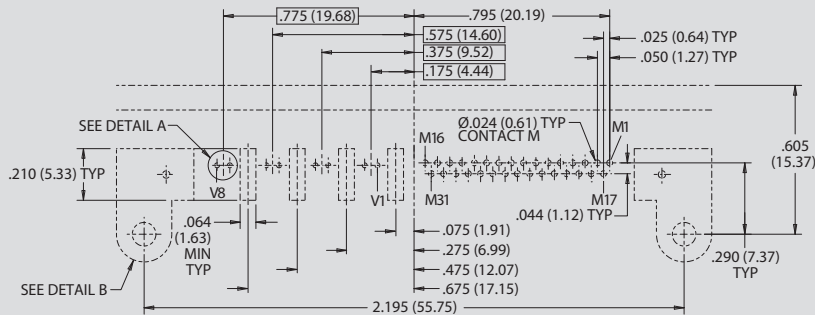


GVLM-1002: GVL RPM-BR, Rear Panel Mount, Right Angle PCB Connector Footprints

MICRO-D VERSALINK CONNECTORS



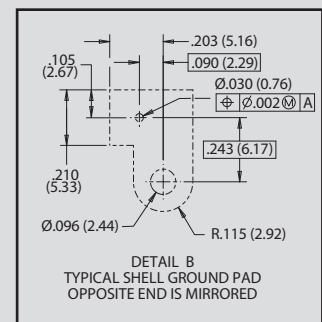
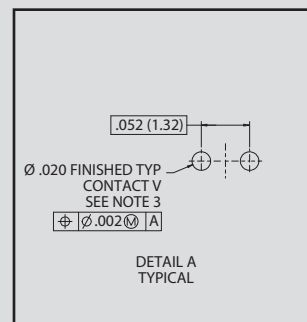
Plug Layout 4-31



Receptacle Layout 4-31

NOTES

1. Patterns shown are for connector mounting side of PC board.
2. Reference GVL RPM-BR for connector details.
3. Reference application notes AN0005 for optimal performance.

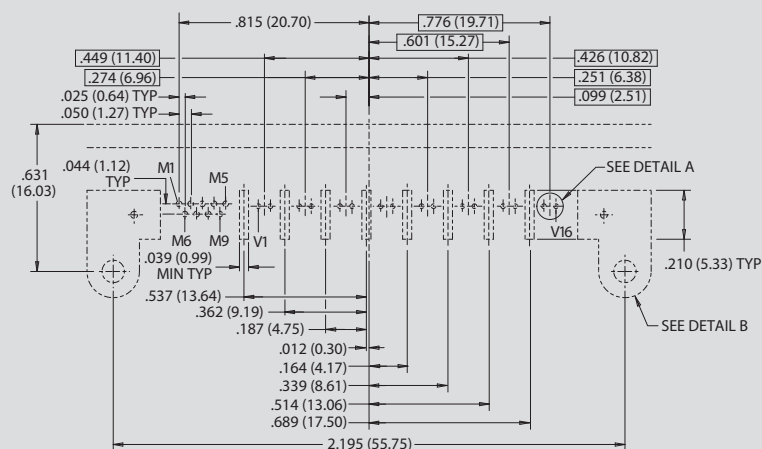


"ZERO-CROSSTALK" M83513 Micro-D VersaLink™ Connectors

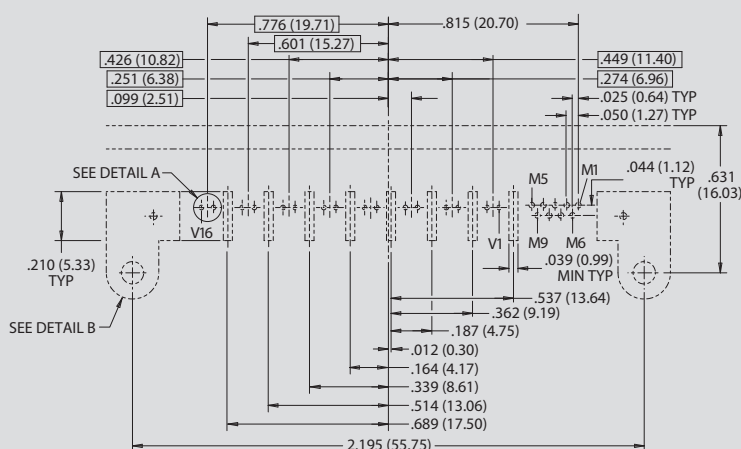


GVLM-1002: GVL RPM-BR, Rear Panel Mount, Right Angle PCB Connector Footprints

MICRO-D VERSALINK CONNECTORS



Plug Layout 8-9



Receptacle Layout 8-9

NOTES

1. Patterns shown are for connector mounting side of PC board.
2. Reference GVL RPM-BR for connector details.
3. Reference application notes AN0005 for optimal performance.

