

MICRO-CRIMP RECTANGULAR CONNECTORS

Series 791 Scoop-Proof



791-018

Panel Plug, Float Mounting



791-018 panel mount plug has stainless steel float bushings. Snap-in, rear-release M39029-type crimp contacts. High-density size 23 contacts are on .075 inch (1.9mm) centers and accept AWG 22-28 wire. Size 16 and size 12 cavities accept power contacts (supplied with connector) or coaxial RF contacts (ordered separately). Wire grommet provides environmental protection. Shell has threaded holes for attaching EMI banding backshell (799-016, sold separately).

- ◆ Crimp, rear-release
- ◆ Float mount blind mate
- ◆ Socket contacts

- Aerospace-grade ultraminiature connector with rugged scoop-proof duo-lobe shell
- Float bushings for rack-and-panel mounting
- Environmental
- 42 arrangements with M39029-type crimp contacts

INSERT ARRANGEMENTS					
FULL COMPLEMENT OF CONTACTS	#8, #12 OR #16 CONTACTS PURCHASED SEPARATELY	No. of Contacts			
		#23	#16	#12	#8
A-5		5			
B-2P2	B-2W2		2		
B-9		9			
C-13		13			
D-15		15			
D-3P3	D-3W3		3		
D-7P2	D-7W2	5	2		
E-11P2	E-11W2	9	2		
E-19		19			
E-7P3	E-7W3	4	3		
F-14P3	F-14W3	11	3		
F-15P2	F-15W2	13	2		
F-23		23			
F-5P5	F-5W5		5		
G-13P2	G-13W2	11		2	
G-21P1	G-21W1	20		1	
G-3P3	G-3W3			3	
G-33		33			
H-10P4	H-10W4	6		4	
H-29P7	H-29W7	22	7		
H-36P2	H-36W2	34		2	
H-51P1	H-51W1	50		1	
H-54P2	H-54W2	52	2		
H-5P5	H-5W5			5	
H-66		66			
J-17P4	J-17W4	13	4		
J-25P2	J-25W2	23	2		
J-33		33			
J-7P7	J-7W7		7		
K-27P4	K-27W4	23	4		
K-35P2	K-35W2	33	2		
K-43		43			
K-9P9	K-9W9		9		
L-22P4	L-22W4	18		4	
L-48P2	L-48W2	46		2	
L-6P6	L-6W6			6	
L-78		78			
M-17P17	M-17W17		17		
M-102		102			
M-4P4	M-4W4				4
N-13P13	N-13W13			13	
N-153		153			

HOW TO ORDER							
Sample Part Number			791-018S	J-33	TZ	G	B
Basic Part Number	791-018S	Panel Plug, Float Mount, Socket Contacts					
Shell Size-Insert Arr.	See “Insert Arrangements” Table						
Shell Finish	M	Electroless Nickel					
	MT	Nickel / PTFE					
	NF	Olive Drab Cadmium					
	TZ	Tin-Zinc					
	ZR	Black Zinc-Nickel					
Hardware Option Table 1	B	Guide Bushings <i>For blind mating</i>					
	G	Guide Pins <i>For blind mating</i>					
	N	No Hardware <i>Threaded holes</i>					
Polarization Key Option	Enter Letter Designator for Position A, B, C, D, E , or F per Mod Code 555 (see page B-8 for details) Omit for none						

TABLE 1 HARDWARE OPTIONS	
N No Hardware Threaded Blind Holes	G Guide Pins
B Guide Bushing	

RATINGS
■ Voltage (DWV): size 23 contacts 750 VAC, size 8, 12 and 16: 1800 VAC ■ Current: #23 5A, #16 13A, #12 23A, #8 46A ■ Operating temperature: -65 to +150 °C ■ Durability: 500 mating cycles ■ Shock: 300 g ■ Vibration: 20 g random ■ Altitude immersion: 75,000 feet ■ Ingress protection: IP67

CONSTRUCTION
■ Contacts: Copper alloy, gold over nickel finish ■ Shell: Aluminum ■ Insulators: High performance thermoplastic ■ Wire grommet: Fluorosilicone/silicone blend ■ Contact retaining clip: Beryllium copper, unplated ■ Hardware: Stainless steel

Application Note
Panel Cutouts
 See page B-54 for recommended panel cutout dimensions for float mount connectors.

Application Note
EMI Banding Backshell 799-016
 See page F-32 for backshell ordering information.

MICRO-CRIMP RECTANGULAR CONNECTORS

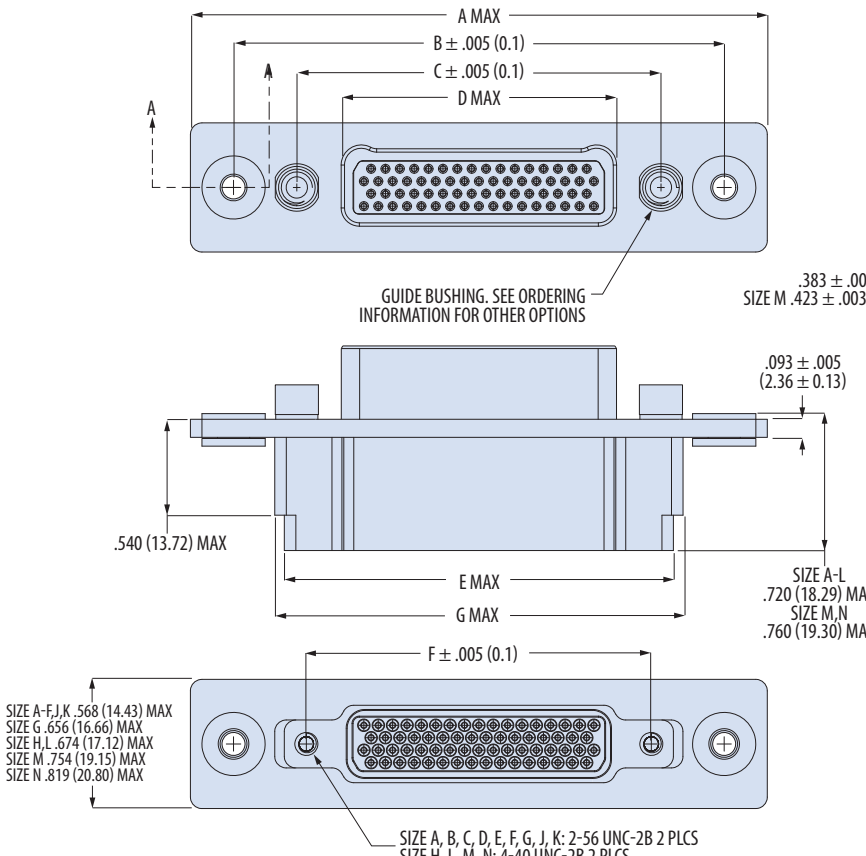
Series 791 Scoop-Proof



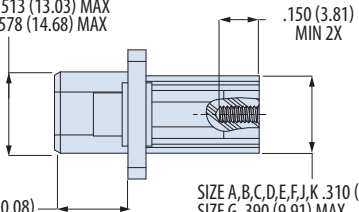
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Panel Plug, Float Mounting

- ◆ Crimp, rear-release
- ◆ Float mount blind mate
- ◆ Socket contacts



SIZE A,B,C,D,E,F,J,K .320 (8.13) MAX
 SIZE G .416 (10.57) MAX
 SIZE H,L .430 (10.92) MAX
 SIZE M .513 (13.03) MAX
 SIZE N .578 (14.68) MAX



Application Note
Polarization Key Positions
 See Mod Code 555 pg. B-8 for details

Plug Receptacle

SECTION A-A

DIAMETRAL FLOAT
 SIZE A-L: .040 ± .040 (1.0)
 SIZE M: .050 ± .050 (1.3)
 SIZE N: .060 ± .060 (1.5)

Shell Size	A Max		B		C		Screw Size
	in	mm	in	mm	in	mm	
A-G, J,K	.218	5.5	.138	3.5	.093	2.4	2-56
H, L	.250	6.4	.170	4.3	.120	3.0	4-40
M	.270	6.9	.170	4.3	.120	3.0	4-40
N	.316	8.0	.196	5.0	.146	3.7	6-32

Shell Size	A Max		B ± .005 (0.1)		C ± .005 (0.1)		D Max		E Max		F ± .005 (0.1)		G Max	
	in	mm	in	mm	in	mm	in	mm	in	mm	in	mm	in	mm
A	1.785	45.34	1.365	34.67	.750	19.05	.415	10.5	.760	19.30	.565	14.35	.965	24.51
B	1.935	49.15	1.515	38.48	.900	22.86	.565	14.4	.910	21.11	.715	18.16	1.115	28.32
C	2.085	52.96	1.665	42.29	1.050	26.67	.715	18.2	1.060	26.92	.865	21.97	1.265	32.13
D	2.160	54.86	1.740	44.20	1.125	28.58	.790	20.1	1.160	29.46	.965	24.51	1.340	34.04
E	2.310	58.67	1.890	48.01	1.275	32.38	.940	23.9	1.310	33.27	1.115	28.32	1.490	37.85
F	2.460	62.48	2.040	51.82	1.425	36.20	1.090	27.7	1.460	37.08	1.265	32.13	1.640	41.66
G	2.421	61.49	2.003	50.88	1.388	35.26	1.052	26.7	1.410	35.81	1.215	30.86	1.615	41.02
H	3.010	76.45	2.560	65.02	1.900	48.26	1.442	36.6	2.045	51.94	1.800	45.72	2.130	54.10
J	2.835	72.01	2.415	61.34	1.800	45.72	1.465	37.2	1.810	45.97	1.615	41.02	2.015	51.18
K	3.210	81.53	2.790	70.87	2.175	55.25	1.840	46.7	2.210	56.13	2.015	51.18	2.390	60.71
L	3.246	82.45	2.796	71.02	2.136	54.25	1.678	42.6	2.281	57.94	2.036	51.71	2.366	60.10
M	3.442	87.43	2.940	74.68	2.200	55.88	1.745	44.3	2.445	62.10	2.200	50.80	2.470	62.74
N	4.092	103.9	3.500	88.9	2.600	66.0	2.115	53.7	2.645	67.2	2.350	59.7	2.645	67.2

CRIMP CONTACTS AND TOOLS							
Contacts are bulk packed with connector. Spare contacts are not included with connector and are ordered separately if required. See "Contacts and Tools" section for additional information.	Contact Size	Skt Contact Part No.	AWG Wire Size	Installing and Removal Tool	Tool	Positioner	Die Assembly
	23	809-002	22 - 28	809-088	809-015	809-005	—
	16	857-448-16	16 - 20	809-131	809-136	809-137	—
	12	857-448-12	12 - 14	809-132	809-136	809-137	—
	8	850-138F	8	859-049	859-025	859-046	859-026

HARDWARE DETAILS

G Guide Pins
 Guide pins for blind mate applications. Non-removable. Requires guide bushing (B) on mating plug.

B Guide Bushings
 Guide bushings for blind mate applications. Non-removable. Requires guide pins (G) on mating plug.

N No Hardware
 Tapped holes. Size A-G, J, K = 6-32, H, L = 8-32, M = 10-32, N = 12-24. .150 (3.8) min. depth