Amphenol

the ultimate connection













For more information call 210 372 0631
Amphenol PCD mikehands@amphenolpcd.com

SCE

Snatch Connector Electrical Series The Ultimate Connector Series



SCE is a miniature product with a silent push to mate and pull to release design across two styles of cable receptacles. All inserts and contacts are moulded in place, achieving high environmental sealing to IP68. The metalwork is machined from brass, giving an increased number of mating cycles over traditional aluminium connectors.

The snatch push pull design is fully grounded and cannot be locked when mated, as the cable receptacle has no moving parts, i.e. coupling nut, thus eliminating the path for the ingress of moisture and dust to the interface. The latch push pull design can be non-grounded or grounded and is locked when mated by rotating the coupling nut fitted to the cable receptacle by 30°. This coupling mechanism locks the connectors together, ensuring that they cannot be inadvertently demated. Both are fitted with internal and external o-rings for sealing.

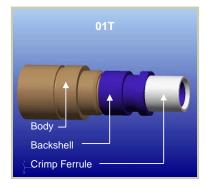
The chassis mounting plug remains unchanged to allow the user to select either a snatch or latch cable receptacle without changing the equipment interface.

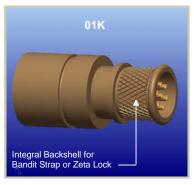
Scoop proof shell to shell keying is provided with five different key options of A, B, C, D and N positions, to prevent mis-mating between shells of different operations.

Amphenol offers full cable harness solutions with overmoulding capabilities or, where preferred, a heat shrink boot can be used.



SCE Terminology







SCE Mating Options



Chassis Mount Plug remains same to mate with Snatch or Latch Receptacle





SCE Performance Information

	INSERT AVAILABILITY
06-05	5 #22 AWG Contacts
06-06	6 #22 AWG Contacts
06-07	7 #22 AWG Contacts
07-10A	8 #22 AWG Contacts and 2 #16 AWG Contacts
07-12	12 #22 AWG Contacts
07-14	14 #22 AWG Contacts
08-19	19 #22 AWG Contacts

CONTACT SPECIFICATIONS							
Contact Resistance 5 m Ω initially Less than 10 m Ω							
Shell to Shell Conductivity	5 mΩ initially	Less than 10 mΩ					

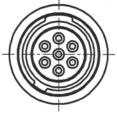
INSERT SPECIFICATIONS							
Working Voltage (Sea Level)	115 Vac						
DWV (Sea Level)	500 Vac						
Insulation Resistance (Sea Level)	1GΩ @ 500 Vdc						
Current Rating (Individual Contact)	3A						

ENVIRONMENTAL					
Temperature	-55°C / +85°C				
Salt Spray Resistance	500 hours				
Fluids	As per MIL-C-26482 Series I				
Vibration and Shock	As per MIL-C-26482 Series I				
Sealing	IP68 through Unmated Bulkhead Connectors				
	IP68 Mated Pair Interface				
Sand and Dust	DEF STAN 07-55 (Part 2) Test D1				
Icing/Frosting	DEF STAN 07-55 (Part 2) Test B10				

MECHANICAL					
Durability	2000 Matings				
Materials	Shell : Brass – Standard plating finish Black Silver				
	Contacts : Turned, Gold Plated				
	Inserts and Seal : Proprietary Thermoplastic Polyester Elastomer				

SCE Insert Availability - Shell Size 06

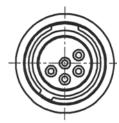
RECEPTACLES - PIN CONTACTS ONLY



FRONT FACE VIEW SCE 7 WAY



FRONT FACE VIEW SCE 6 WAY



FRONT FACE VIEW SCE 5 WAY



REAR FACE VIEW SCE 7 WAY



REAR FACE VIEW SCE 6 WAY

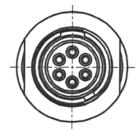


REAR FACE VIEW SCE 5 WAY

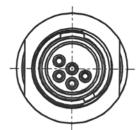
PLUGS - SOCKET CONTACTS ONLY



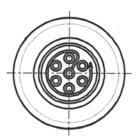
FRONT FACE VIEW SCE 7 WAY



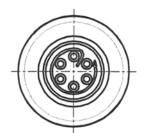
FRONT FACE VIEW SCE 6 WAY



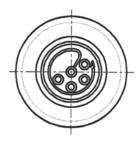
FRONT FACE VIEW SCE 5 WAY



REAR FACE VIEW SCE 7 WAY

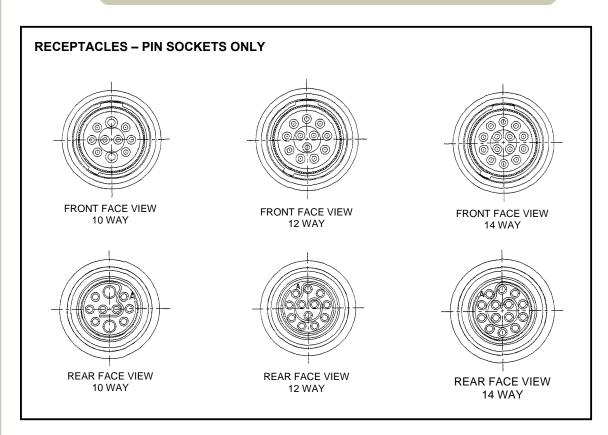


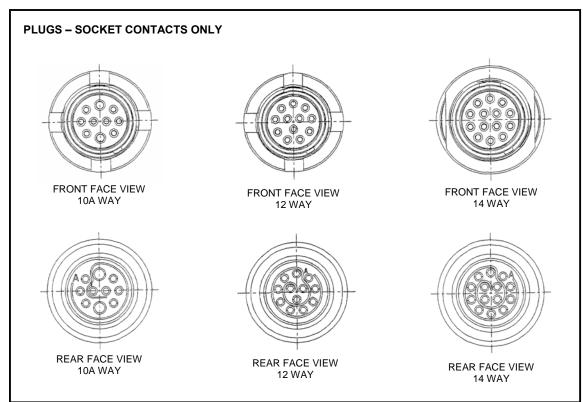
REAR FACE VIEW SCE 6 WAY



REAR FACE VIEW SCE 5 WAY

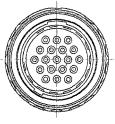
SCE Insert Availability - Shell Size 07



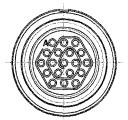


SCE Insert Availability – Shell Size 08

RECEPTACLES - PIN CONTACTS ONLY

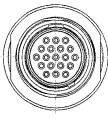


FRONT FACE VIEW 19 WAY

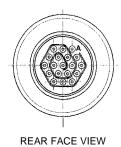


REAR FACE VIEW 19 WAY

PLUGS - SOCKET CONTACTS ONLY



FRONT FACE VIEW 19 WAY



19 WAY

SCE Keyway Orientation

Part Number	Keyway Position	AA'
SCE-B-76A**-**SN-***	NORMAL	180
SCE-B-76A**-**SA-***	A	150
SCE-B-76A**-**SB-***	В	210
SCE-B-76A**-**SC-***	С	120
SCE-B-76A**-**SD-***	D	240

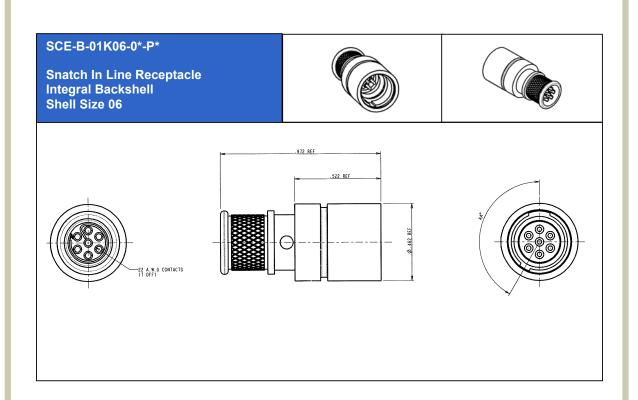
Part Number	Keyway Position	AA'
SCE-B-06K-**-**PN	NORMAL	180
SCE-B-06K-**-**PA	A	150
SCE-B-06K-**-**PB	В	210
SCE-B-06K-**-**PC	С	120
SCE-B-06K-**-**PD	D	240

Part Number	Keyway Position	AA'
SCE-B-01K**-**PN	NORMAL	180
SCE-B-01K**-**PA	A	150
SCE-B-01K**-**PB	В	210
SCE-B-01K**-**PC	С	120
SCE-B-01K**-**PD	D	240

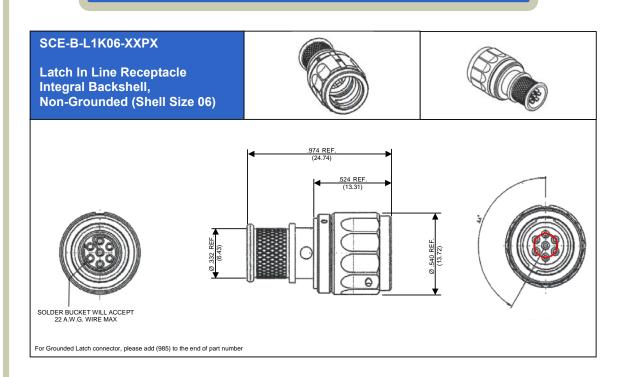
Part Number	Keyway Position	AA'
SCE-B-L1K**-**PN	NORMAL	180
SCE-B-L1K**-**PA	А	150
SCE-B-L1K**-**PB	В	210
SCE-B-L1K**-**PC	С	120
SCE-B-L1K**-**PD	D	240

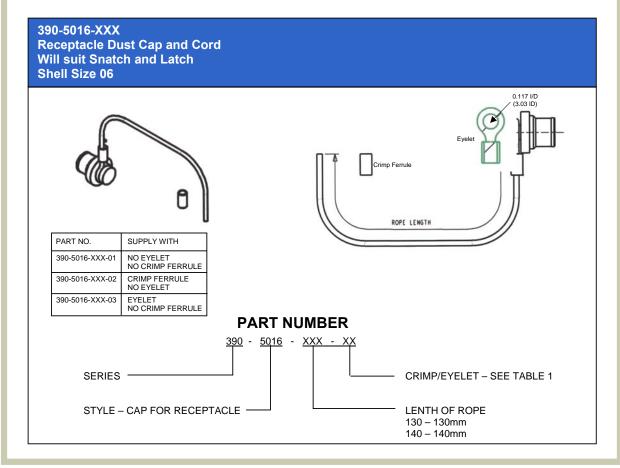
SCE Table of Styles – Up to 7 Ways

In Line Receptacle Solder Bucket Contacts Crimp Ferrule 1377 (26.00) All Dimensions are for reference only (Dimensions in brackets are in rmm)



SCE Table of Styles – Up to 7 Ways





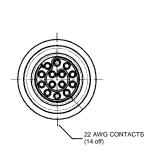
SCE Table of Styles – Up to 14 Ways

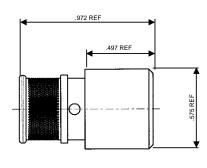
SCE-B-01K07-XXPX

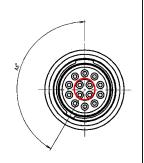
Snatch In Line Receptacle Integral Backshell Shell Size 07









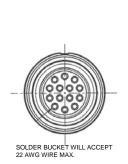


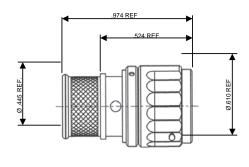
SCE-B-L1K07-XXPX

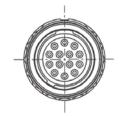
Latch In Line Receptacle Integral Backshell, Non Grounded Shell Size 07



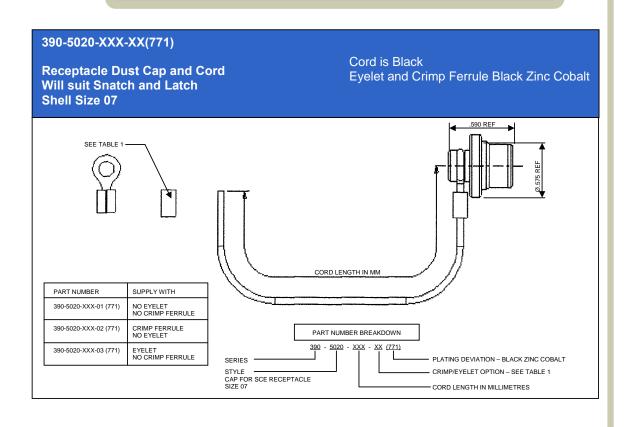




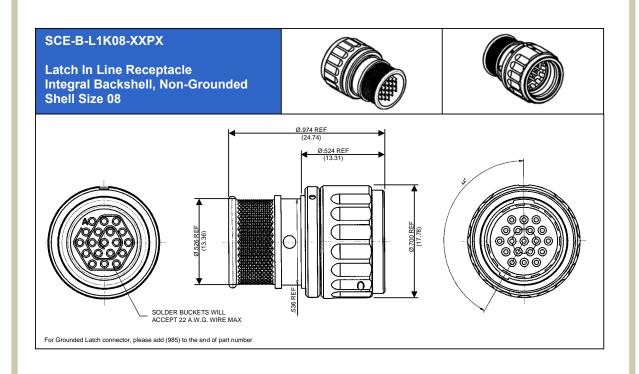


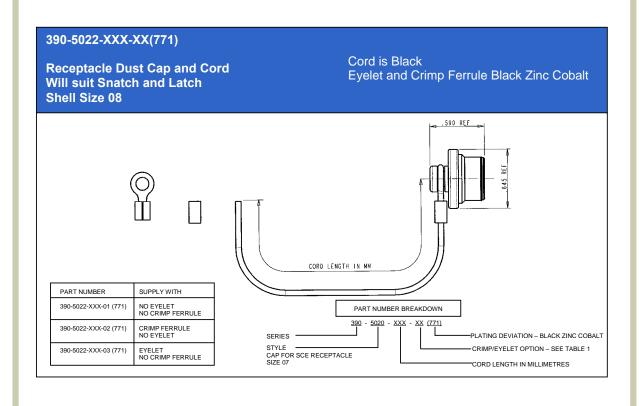


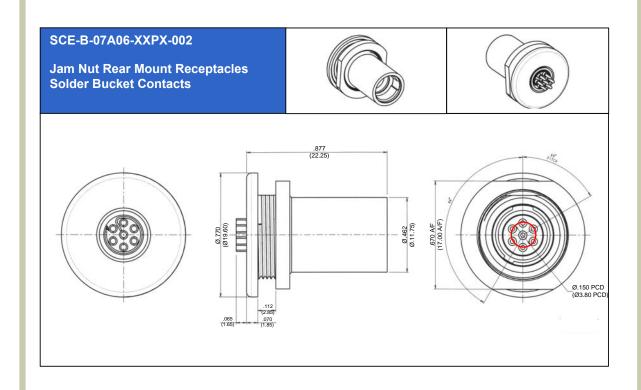
For Grounded Latch connector, please add (985) to the end of part number



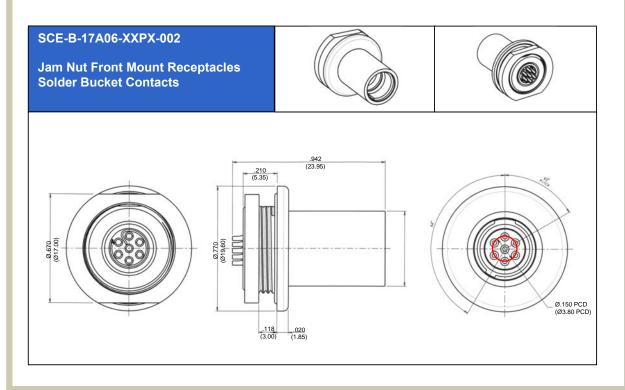
SCE Table of Styles – Up to 19 Ways



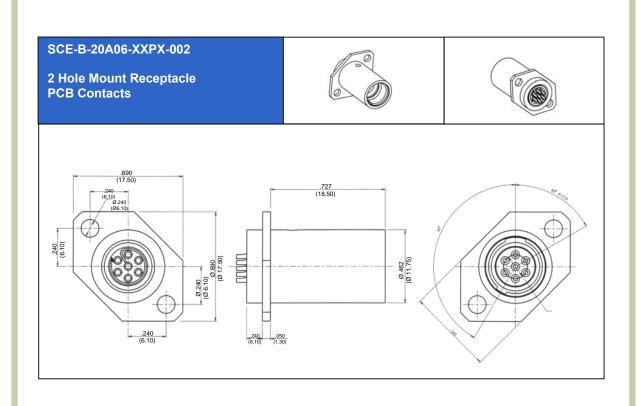




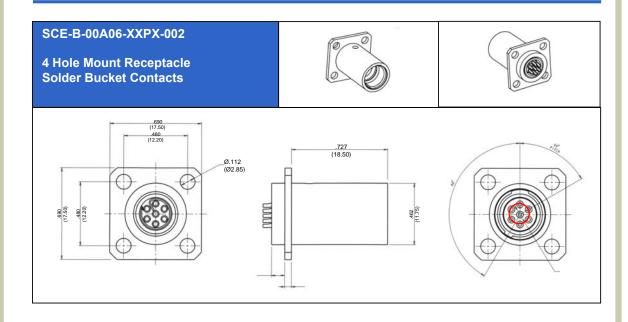
Jam Nut Front Mount Receptacles PCB Contacts 877 (22 25) (22 25) (22 25) (23 25) (24 25) (25 25) (26 25) (26 25) (26 25) (26 25) (26 25) (26 25) (26 25) (27 25) (27 25) (27 25) (28

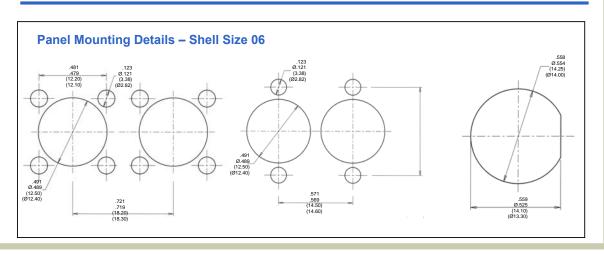


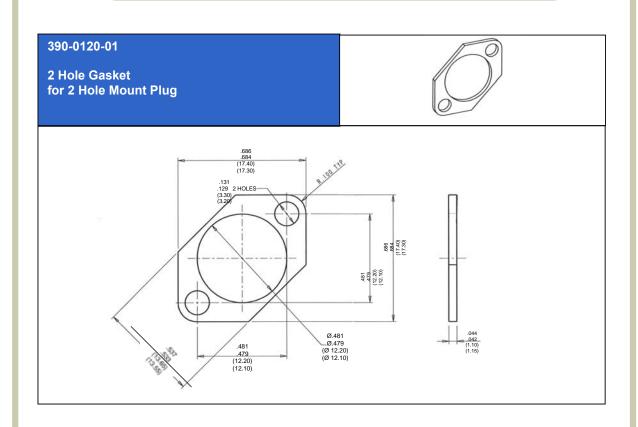
SCE-B-20A06-XXPX-001 2 Hole Mount Receptacle PCB Contacts 777 (18.50) 777 (18.50) 777 (18.50) 777 (18.50) 777 (18.50)

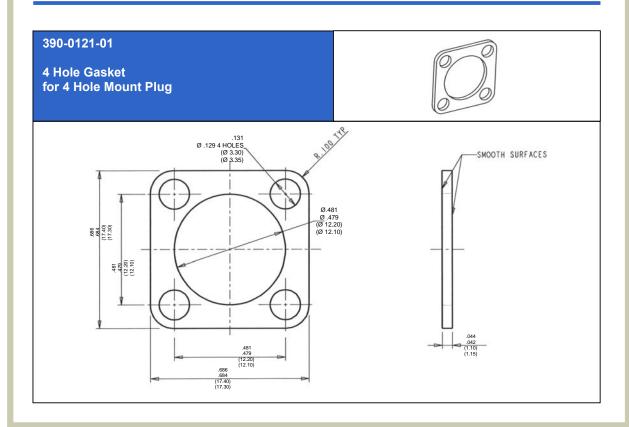


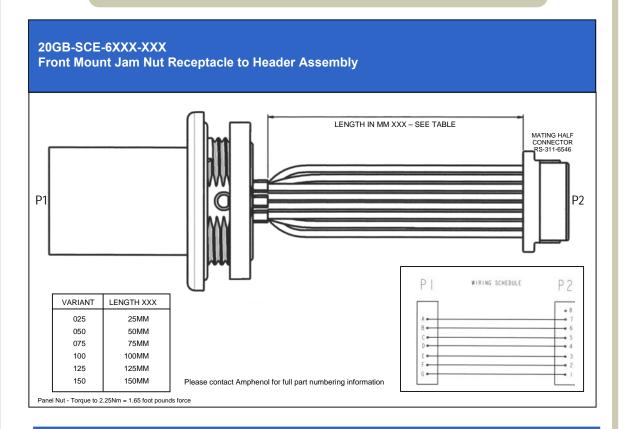
SCE-B-00A06-XXPX-001 4 Hole Mount Receptacle PCB Contacts (12.00) (12.00) (13.00) (1

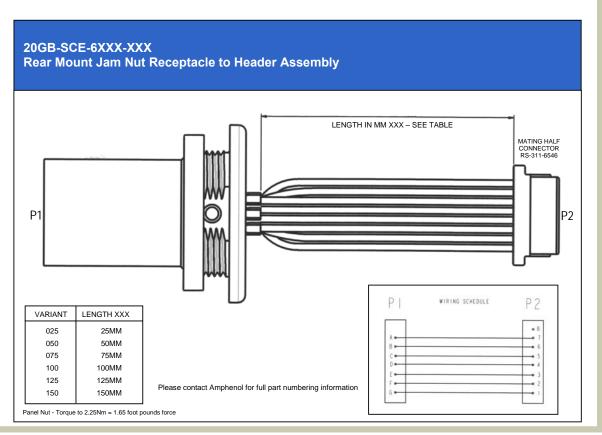






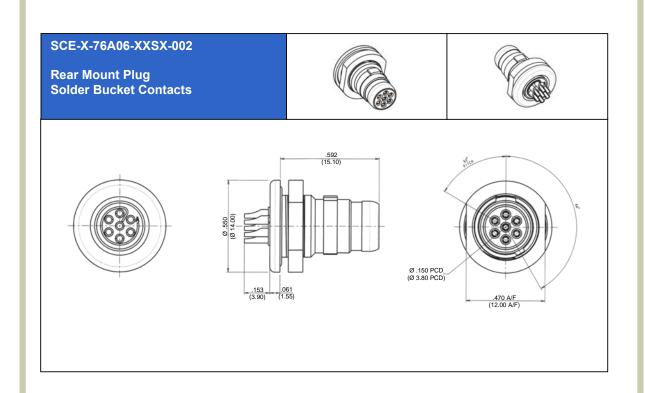






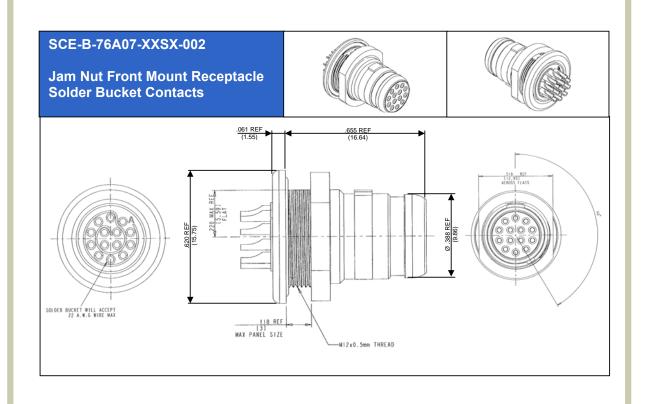
SCE Table of Styles – Up to 7 Ways

Rear Mount Plug PCB Contacts Output Description: Output Desc

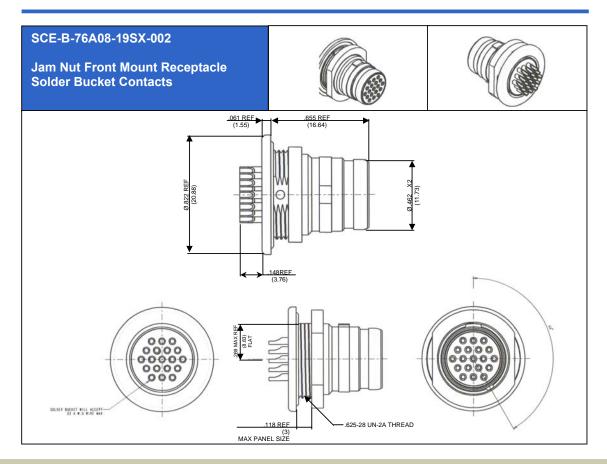


SCE Table of Styles - Up to 14 Ways

Jam Nut Front Mount Receptacle PCB Bucket Contacts | Separation | Sep

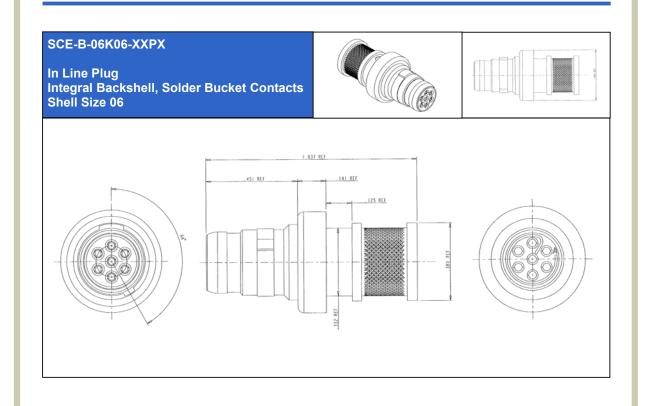


SCE Table of Styles – Up to 19 Ways



SCE Table of Styles – Up to 7 Ways

In Line Plug Solder Bucket Contacts only (complete with Backshell) CRIMP FERRULE OR 150 PCD (Ø 3.80 PCD)



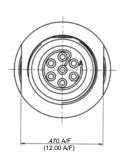
SCE Table of Styles – Up to 7 Ways

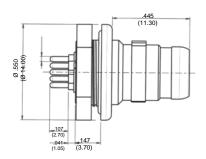
SCE-X-67A06-XXSX-001

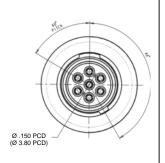
Front Mount Plug PCB Contacts









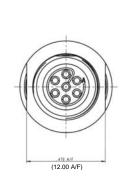


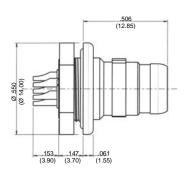
SCE-X-67A06-XXSX-002

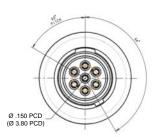
Front Mount Plug Solder Bucket Contacts

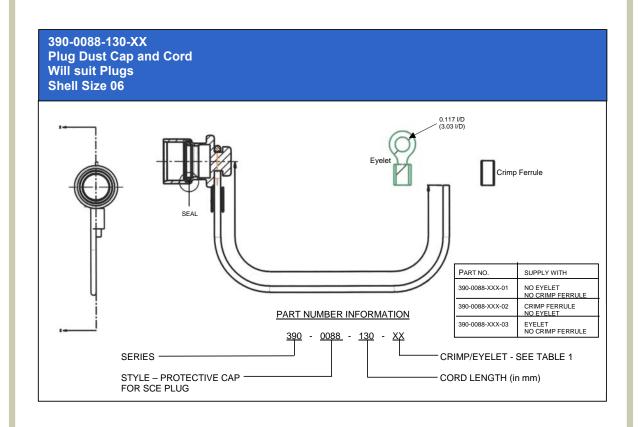


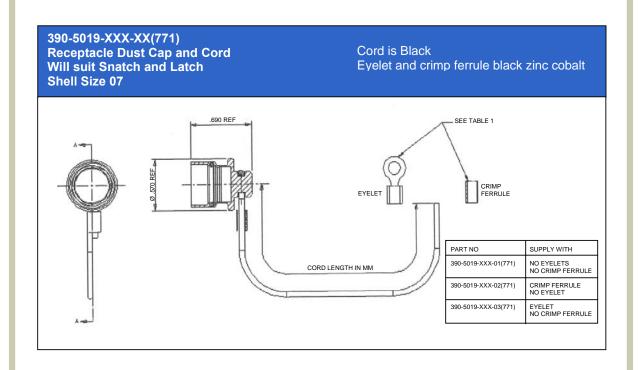










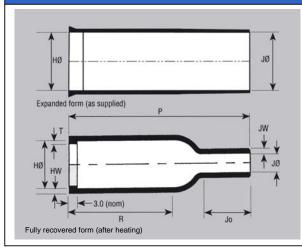


Heatshrink Boots

100 Series - Bottle Shapes with Rib - MIL Style

For use with SCE-06T and SCE-01T

We have selected Heatshrink Boots from Hellermann Tyton. Heatshrink Boots from other manufacturers may be used if appropriate.

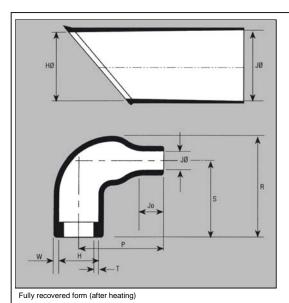


This style is used in conjunction with the backshell (see page 13) providing strain relief and environmental sealing

Dimensions apply to all materials unless otherwise indicated

	Expanded (Min)				Recovered (Max) Recovered Dimensions Fully Shrunk							
Hellermann Part No	Н	H -H matl	JØ	J -H matl	н	JØ	P ±10%	R ±10%	Jo ±10%	HW ±10%	JW ±10%	T ±10%
113-4-G-WM250	0.3976	0.3976	0.1811	0.1811	0.3110	0.0787	1.0	0.5709	0.1811	0.0512	0.0512	0.0394
	(10.7)	(10.7)	(4.6)	(4.6)	(7.9)	(2.0)	(25.4)	(14.5)	(4.6)	(1.3)	(1.3)	(1.0)
104-4-G-WM250	0.6456	0.6456	0.6456	0.6456	0.3110	0.149	1.0	0.5590	0.2716	0.0512	0.0512	0.0394
	(16.4)	(16.4)	(16.4)	(16.4)	(7.9)	(3.8)	(25.4)	(14.2)	(6.9)	(1.3)	(1.3)	(1.0)

1100 Series - Right Angle Shapes with Rib - MIL Style

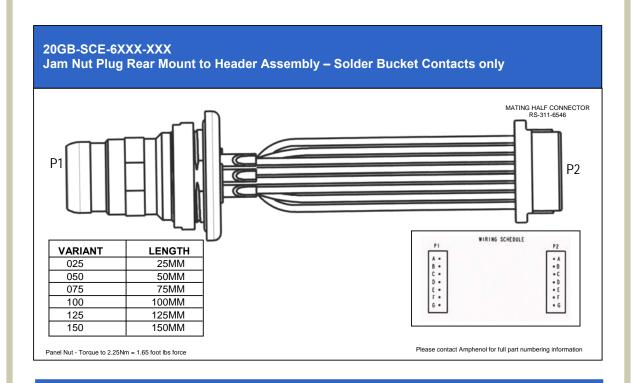


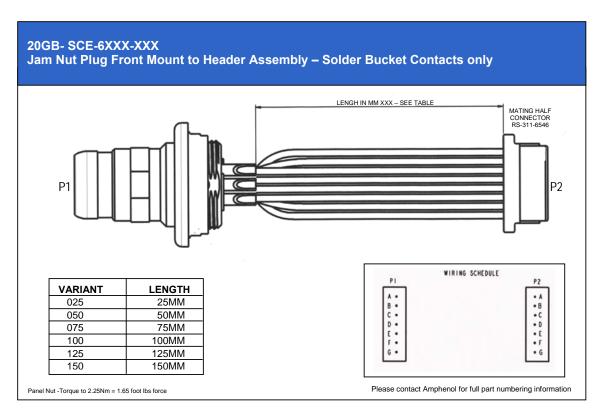
The style provides strain relief for harness systems when used in conjunction with the backshell (see page 13)

Dimensions apply to all materials unless otherwise indicated

	Expanded (Min) Recovered (Max)					Recovered Dimensions Fully Shrunk							
Hellermann Part	н	JØ	Н	JØ	Р	R	S	Jo	W	T			
No			• • •		-	0.0	•~	±10%	±10%	±10%	±10%	±20%	±20%
1108-4-G-WM250	0.6496	0.6496	0.3110	0.1496	0.6875	0.7969	0.6005	0.1614	0.0394	0.0394			
1100-4-G-VVIVI230	(16.5)	(16.5)	(7.9)	(3.8)	(17.3)	(20.1)	(15.2)	(4.1)	(1.0)	(1.0)			
1106-4-G-WM250	0.9173	0.9173	0.4094	0.2204	0.7992	0.9015	0.6005	0.2283	0.0511	0.0394			
1106-4-G-WW250	(23.3)	(23.3)	(10.04)	(5.6)	(20.3)	(22.9)	(15.2)	(5.8)	(1.3)	(1.0)			

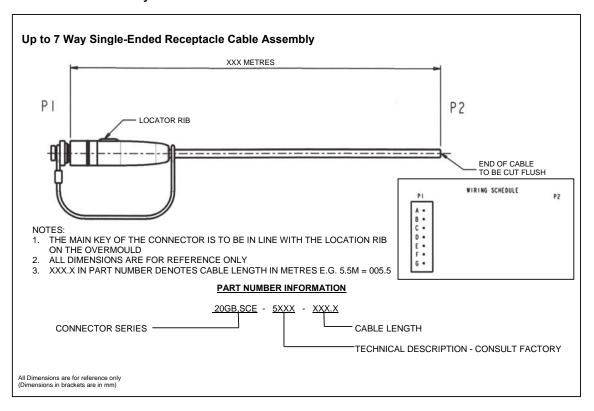
SCE Plug to Header Cable Assemblies

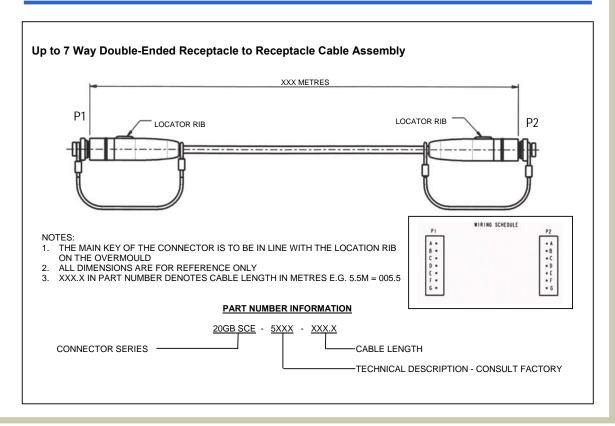




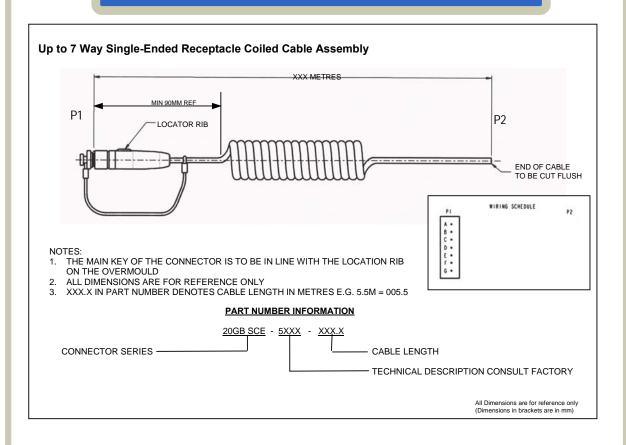
SCE - Cable Assemblies

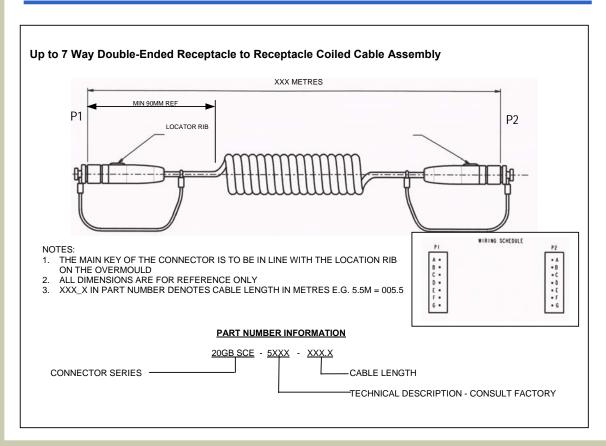
Amphenol can supply complete overmoulded cable harness solutions to your specifications. Please consult factory for cable number allocation.

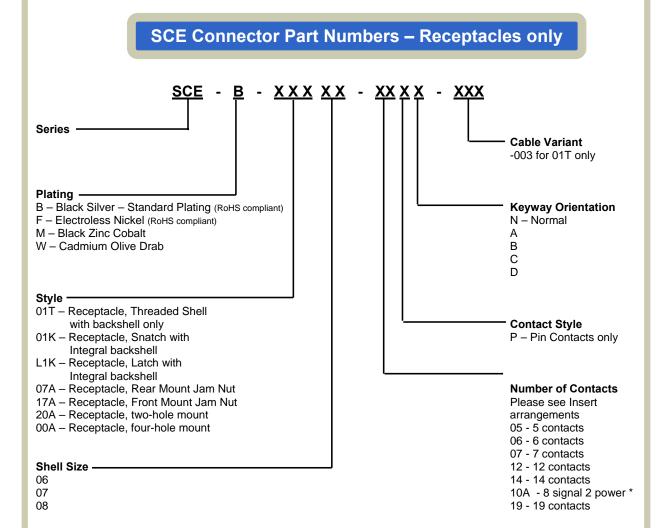




SCE - Cable Assemblies

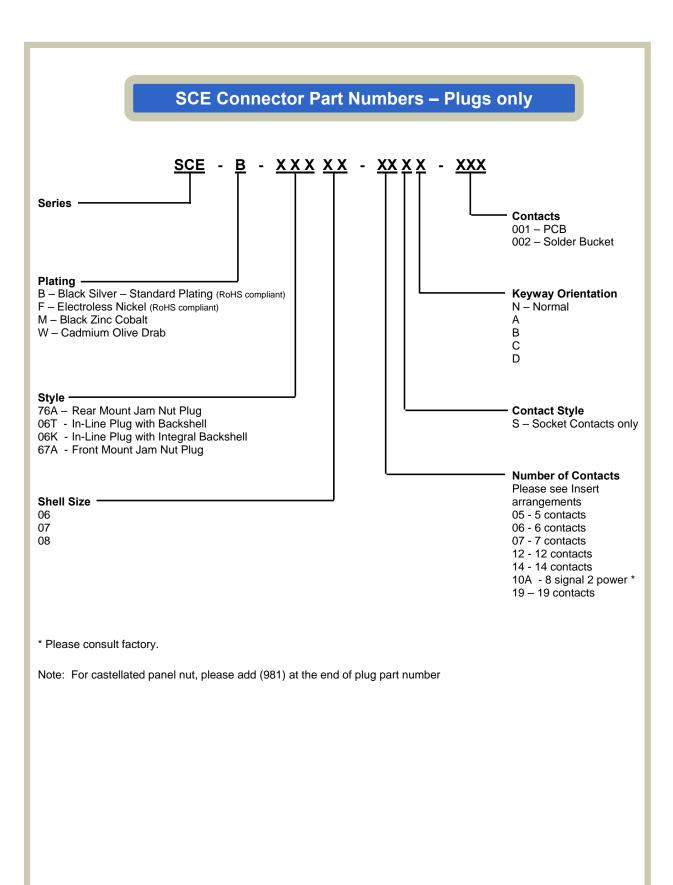






^{*} Please consult factory.

Note: If ordering 01K and L1K receptacles, please omit the cable variant from the part number.



SCE Crimp Tool

For Braid Termination Style 003

Crimp the Braid into place so that the ferrule butts up against the shoulder of the backshell. Use crimp tool Daniels HX4 M22520/5-01 handle, crimp die set Daniels Y530 CAGE 11851 at setting 180.





July 2006

Notice: Products are sold subject to Amphenol's Standard Conditions of Sale. All specifications and statements contained herein are believed to be correct at the time of printing but no representation or warranty, express or implied, is given as to any specification or statement contained herein. Product specifications including performance characteristics are typical only and subject to deviation. Specifications are also subject to change without notice. Users should not assume that all safety measures are indicated or that other measures may not be required. No representation or warranty, express or implied, is given that any use of products (including any stated or suggested use) does not infringe any patent, registered design or other third party rights and no stated or suggested use of products can be taken to recommend any such infringement.

Amphenol PCD

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