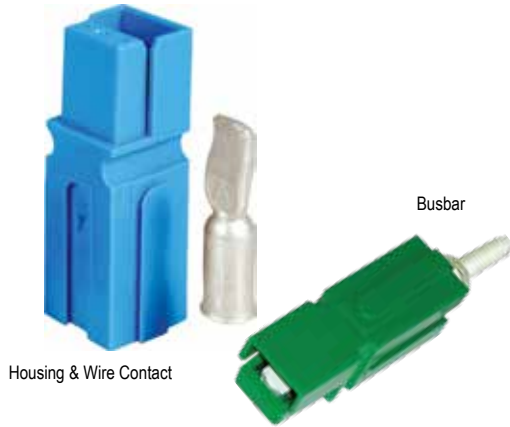


Powerpole® Connector

PP180 - Up to 350 Amps

POWERPOLE® PP180



PP180 are the largest of the Powerpole® series housings. They are designed to accommodate up to 3/0 (70 mm²) wires and handle high currents up to 350 amps. Busbar contacts are also available for power inputs and takeoffs. Color-coded housings minimize user confusion and the potential of cross mating circuits.

- **Low Resistance Silver Plated Copper Contacts**

Allows currents up to 350 amps

- **UL Rated for Hot Plugging up to 75 Amps**

Great for battery or other applications where the ability to interrupt circuits is required

- **Busbar Contacts Work with Standard Housings**

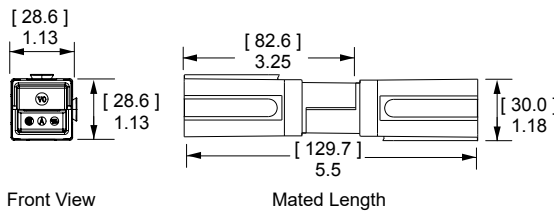
Provides a hot swappable quick disconnect system for busbar power distribution

PP180 ORDERING INFORMATION

PP180 Housings

The largest Powerpole® housing can be used with wire contacts for up to 3/0 AWG (85 mm²) or busbar contacts.

Description	Part Numbers	
Minimum Quantity	250	50
Red	1381G3-BK	1381G3
Green	1381G4-BK	1381G4
Black	1381G1-BK	1381G1
White	1381G2-BK	1381G2
Blue	1381-BK	1381

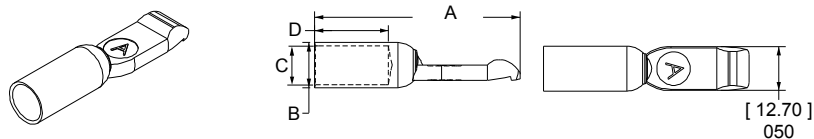


PP180 Silver Plated Wire Contacts

Silver plated contacts offer superior electrical performance and durability up to 10,000 mating cycles. New contacts for 2/0 to 3/0 AWG (70 to 85 mm²) offer extended capability in the same housings. See Reducing bushings in accessory section for smaller wires.

AWG	mm ²	Mating Force	Loose Piece Part Numbers				Dimensions							
			500	300	250	50	- A -		- B -		- C -		- D -	
Minimum Quantity						inches	mm	inches	mm	inches	mm	inches	mm	
3/0	85	Low	-	-	1328G2-BK	1328G2 *	2.35	59.69	0.70	17.78	0.58	14.73	1.04	26.42
2/0	67.4	Low	-	1328G1-BK	-	1328G1 *	2.35	59.69	0.64	16.26	0.49	12.45	1.04	26.42
1/0	53.5	High	1382-BK	-	-	1382	2.35	59.69	0.52	13.21	0.44	11.18	1.04	26.42
1	42.4	High	1347-BK	-	-	1347	2.35	59.69	0.52	13.21	0.39	9.91	1.04	26.42
2	33.6	High	1383-BK	-	-	1383	2.35	59.69	0.52	13.21	0.35	8.89	1.04	26.42
4	21.1	High	1384-BK	-	-	1384	2.35	59.69	0.52	13.21	0.30	7.62	1.04	26.42
6	13.3	High	1348-BK	-	-	1348	2.10	53.34	0.37	9.40	0.22	5.59	0.80	20.32

* Extended range

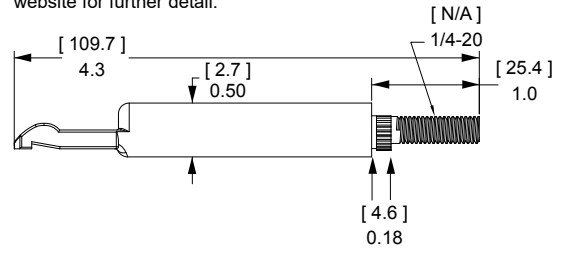


PP180 Silver Plated Busbar Contacts

Use 1 busbar contacts per housing to provide a quick disconnect input or output busbar connection. Busbar contacts are for mating with wire contacts only. Part number 180BBS includes lock nuts. Locknuts must be ordered separately for 180BBS-BK.

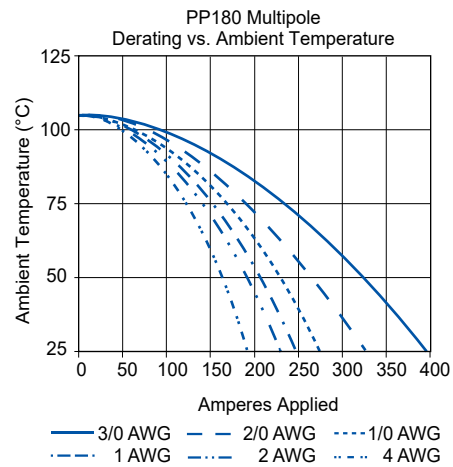
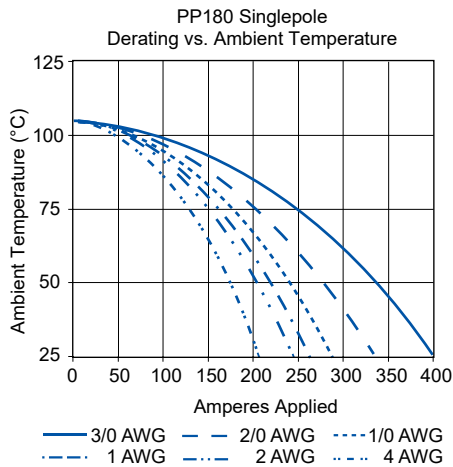
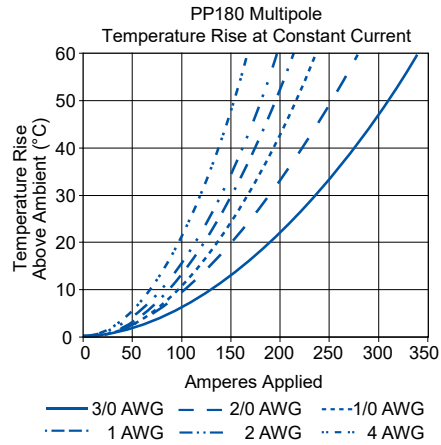
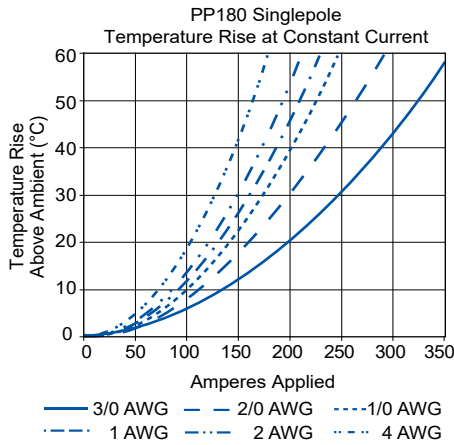
Thread	Mating Force	Loose Piece Part Numbers		
Minimum Quantity		1,000	120	10
Busbar 1/4-20	High	180BBS-BK	180BBS	-
Lock Nut 1/4-20	N/A	H1216P7	110G56	110G55

See Busbar contact drawing on website for further detail.



PP180 CONNECTOR TEMPERATURE CHARTS - Temperature rise charts are based on a 25°C ambient temperature.

Current - Temperature Derating per IEC 60512-5-2 Test 5B



POWERPOLE® PP180

PP180 SPECIFICATIONS

ELECTRICAL

Current Rating Amperes ¹	UL 1977	CSA
Singlepole (Wire-to-Wire) (3/0 AWG)	350	230
2x2 Block (Wire-to-Wire) (3/0 AWG)	350	
Singlepole (Wire-to-Busbar) (1/0 AWG)	180	

Voltage Rating AC/DC

UL 1977	600
---------	-----

Dielectric Withstanding Voltage

Volts AC	2,200
----------	-------

Avg. Mated Contact Resistance Milliohms ¹

6" of 1/0 AWG Wire	0.100
--------------------	-------

UL Hot Plug Current Rating Amperes ⁴

250 Cycles at 120V DC	75A
-----------------------	-----

MATERIALS

Housing

Plastic Resin	Polycarbonate
Contact Retention Spring	Stainless Steel

Housing Flammability Rating

UL94	V-0
Glow Wire	960°C (GWFI) / 850°C (GWIT)

Contact

Base	Copper Alloy
Plating	Silver

Contact Termination Methods

- Crimp ³
- Hand Solder
- Wrench / Socket *

* Busbar Contacts Only

MECHANICAL

Wire Size Range	AWG	mm ²
Wire Contacts with Bushings	10 to 3/0	5.3 to 85
Max. Wire Insulation Diameter	in.	mm
	0.900	22.860
Operating Temperature ²	°F	°C
	-4° to 221°	-20° to 105°
Mating Cycles No Load by Plating	Silver (Ag)	N
Wire and Busbar Contacts	10,000	44
Avg. Mating / Unmating Force	Lbf.	N
Wire & Busbar Contacts	10	44
Min. Contact / Spring Retention Force	Lbf.	N
	120	534



File No. E26226



File No. LR25154



NOTE 1: See IEC 60664-1 for working voltage.

NOTE 2: Amp ratings are stated per position and based on all positions being fully loaded.

- 1 - Based on: 105°C rated or better cable of the largest size, Properly calibrated APP® recommended tooling, and a 25°C ambient temperature. UL rating not to exceed the maximum operating temperature. CSA rating below a 30°C temperature rise.
- 2 - Limited by the thermal properties of the connector plastic housing.
- 3 - Use APP® recommended tooling only. Alternate tools may adversely affect the performance of our connectors along with UL and CSA recognition.
- 4 - Based on 2 housings blocked together.

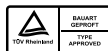
IEC INFORMATION

Connector Series	Configurations		Creepage / Clearance per IEC 60950-1	Material Group
PP180	Single Pole	Unmated	6.02 mm	IIla
		Mated	6.02 mm	
	Stacked Powerpole®	Unmated	6.02 mm	
		Mated	6.02 mm	

PROTECTION

Touch Safety with Wire Contacts

IEC 60529	IP10
-----------	------

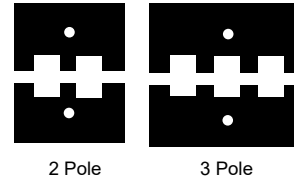
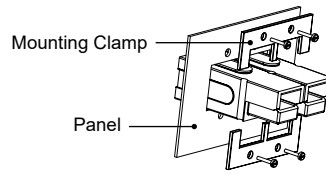


ATTRIBUTES	PP180
AMP Rating AC/DC	180
Voltage Rating AC/DC (Steady State)	500 V AC/DC (Operational)
Breaking Capacity - AMP Rating / Cycles	180 Amp / 10 Cycles
Voltage Rating (Breaking Capacity)	220 VDC
FINGER Safety - Mated Only	IEC 60529 - IP20
Wire Size Tested	70 mm ²
Contact Series Tested	1382G2
Climatic Testing (Cold, Heat & MFG)	IEC 60512 Test-11j, 11i & 11g
Cycle Life	IEC 60512 Test 9a - 5,000 Cycles
Mechanical Strength Impact	IEC 60512-5 @ 29.5 Inches-Dropped 8 times
Temperature Range	-20°C to 105°C -4°F to 221°F

POWERPOLE® PP180 ACCESSORIES

Mounting Clamp

Mounting clamps can be used for fastening a block of Powerpole® 180 series housings to a panel. Connector blocks must be a complete square for the clamps to work properly. Fastening hardware not included.

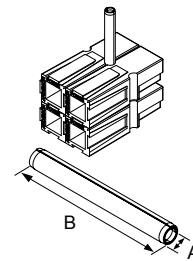


Description	Part Numbers
Minimum Quantity	20 sets of 2
2 Pole	1465G1
3 Pole	1465G2

Retaining Pins

Retaining pins are used to keep stacked Powerpole® 180 series housings from separating. Retaining pins are inserted in the circular opening between two housings stacked side by side. Dimension "B" is +/- .015 in or .38 mm.

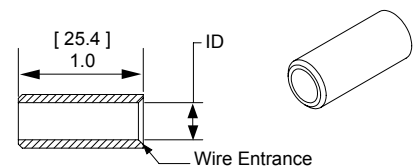
Description	Part Numbers		Dimensions			
			- A - inches		- B - mm	
Minimum Quantity	1,000	100				
1 Block High	111812P6	110G18	0.196 / 0.207	4.98 / 5.26	1.000	25.400
2 Block High	111812P8	110G20	0.196 / 0.207	4.98 / 5.26	1.500	38.100



Reducing Bushings

Use with contact part number 1382-BK to allow a smaller wire to be used with the connector. Electrical capability is derated with smaller wire.

Contact Barrel Size		Wire Size		Part Numbers				Dimensions - ID -	
AWG	mm ²	AWG	mm ²					inches	mm
Minimum Quantity				1,500	1,000	500	100		
1/0	53.5	1	42.4	-	-	5687-BK	5687	0.39	9.91
1/0	53.5	2	33.6	5690-BK	-	-	5690	0.34	8.64
1/0	53.5	4	21.2	-	5693-BK	-	5693	0.27	6.86
1/0	53.5	6	13.3	-	5663-BK	-	5663	0.22	5.59
1/0	53.5	10 to 8	5.3 to 8.4	5648-BK	-	-	5648	0.19	4.83



NOTE: Combination of a bushing and contact is not UL approved.

For environmentally sealed connector shells to hold Powerpole® 15 to 180 connectors, see SPEC Pak® product series on our website www.andersonpower.com



Powerpole®

Tooling Information - APP® Applicators are Mechanical Feed Style and do not Require an Air Feed Kit.

POWERPOLE® TOOLING

Wire Size		Loose Piece Part Number		Loose Piece Contact Crimp Tools							
AWG	mm ²	Tin Plating	Silver Plating	Hand Tool	OR	Pneumatic Bench Tool	+	Die	+	Locator	Number of Crimps
PP15 / 45 Flat Wiping Power & Ground											
16 to 20	1.3 to 0.52	N/A	1332	1309G2 or 1309G8							Single
12 to 16	3.3 to 1.3	N/A	1331								
16 to 20	1.3 to 0.52	262G1-LPBK	262G2-LPBK								
16 to 20	1.3 to 0.52	269G2-LPBK	N/A								
12 to 16	3.3 to 1.3	261G1-LPBK	N/A	1309G3 or 1309G8		N/A		N/A			Single
10 to 14	5.3 to 2.1	261G2-LPBK	261G3-LPBK								
12 to 16	3.3 to 1.3	269G1-LPBK	N/A								
10 to 14	5.3 to 2.1	269G3-LPBK	N/A	1309G6 or 1309G8							Single
10 to 14	5.3 to 2.1	200G1L-LPBK	200G3L-LPBK								
10 to 14	5.3 to 2.1	201G1H-LPBK	N/A								
310 to 14	5.3 to 2.1	1830G1-LPBK	1830G2-LPBK								
PP75											
6	13.3	N/A	1307	1309G4		1387G1		1388G6		1389G6	Single
			5900								
8	8.4		1875G1								
			5952								
			1875G2								
10 to 12	5.3 to 3.3		5953								
			5915								
			1875G3								
								1388G7		1389G6	
										1389G21	
PP120											
1/0	53.5	N/A	1323G2	1368 Series		1387G1		1388G3		1389G4	Single
1	42.4		1323G1								
2	33.6		1319								
4	21.2		1319G4								
6	13.3		1319G6								
								1388G4			
PP180											
3/0	85	N/A	1328G2	1368 Series		1387G2		1303G12		1304G32	Double
2/0	53.5		1328G1								
1/0	53.5		1382								
1	42.4		1347								
2	33.6		1383								
4	21.1		1384								
6	13.3		1348								
						1387G1		1388G4		1389G3	Single

Insertion / Extraction Tool for PP15/45 Contacts = 111038G2

NOTE: see website for the most current information.

Wire Size		Reeled Part Number		Reeled Contact Crimp Tools		
AWG	mm ²	Tin Plating	Silver Plating	APP® Applicator	+	APP® Press
PP15/45 Flat Wiping Power & Ground						
16 to 20	1.3 to 0.52	262G1	262G2	TD0101		115V = TE0101 230V = TE0102
16 to 20	1.3 to 0.52	269G2	N/A			
12 to 16	3.3 to 1.3	261G1	N/A			
10 to 14	5.3 to 2.1	261G2	261G3			
12 to 16	3.3 to 1.3	269G1	N/A			
10 to 14	5.3 to 2.1	269G3	N/A			
10 to 14	5.3 to 2.1	200G1L	200G3L	TD0102		
10 to 14	5.3 to 2.1	201G1H	N/A			
10 to 14	5.3 to 2.1	1830G1	1830G2			

Your Best Connection™

2020-0055 DS-PP180 REV C7

Anderson™ will use reasonable efforts to include accurate and up-to-date content in the data sheet. All product information contained in the data sheet including ordering information, illustrations, specifications, and dimensions, are believed to be reliable as of the date of publishing, but is subject to change without notice. Anderson™ makes no warranty or representation as to its accuracy. Content in the data sheet may contain technical inaccuracies, typographical errors and may be changed or updated without notice. Anderson™ may also make improvements and/or changes to the products and/or to the programs described in the content at any time without notice. Current sales drawings and specifications are available upon request.

©2020 Anderson Power Products, Inc. All rights reserved. APP®, A®, Anderson Power Products®, Powerpole®, SPEC Pak® and the APP Logo are registered trademarks of Anderson Power Products, Inc. Anderson™ and Your Best Connection™ are trademarks of Anderson Power Products, Inc.

Looking for pricing, stock, or lifecycle information?

Click below to explore more details on WIN SOURCE:

- ⊖ [View 1348-BK on WIN SOURCE](#)
- ⊖ [Anderson Power Products, Inc. Information](#)

Optimize Your Supply Chain with WIN SOURCE Solutions

- ✓ Global Sourcing Solution
- ✓ Obsolete Management
- ✓ Cost Control Management
- ✓ Shortage Management
- ✓ Alternative Solution
- ✓ Excess Inventory Management