

# Powertite® Series Pin and Sleeve Plugs, Connectors and Receptacles

## Applications

- Designed to supply power to portable or fixed electrical equipment such as motor generator units, welders, pumps, compressors, cellular relay stations, and similar apparatus.
- Ideal for use on shipping docks, ports, and other “ship to shore” applications.
- Suitable for use in locations where a weatherproof enclosure is required.
- Rough usage construction.

## Features

- Available in 30, 60, 100, 150, 200, and 400 Amp units.
- Available in two grounding styles: Style 1 (shell only) and Style 2 (shell and extra pole).
- Neoprene bushing compressed by cable collar prevents entrance of water. Bushing is highly resistant to hydrocarbon deterioration and is self-extinguishing.
- Locking screw and slot prevents plug cable collar from “backing off.”
- Contacts exert constant pressure along entire contact surface and provide electrical continuity.
- Suitable for use from -40 °F/-40 °C to 225 °F/107 °C.
- Insulating blocks provide greatest dielectric and mechanical strength and lowest arc tracking.
- Positive polarization: only plugs and receptacles of same style, number of poles and ampere rating can be used together.
- Circuit breaking: in 30, 60, 100, and 200 Amp units, any arcing created as line and load terminals disengage is safely confined deep within terminal cavities. Plugs may be withdrawn in an emergency under full rated loads without separate disconnect switches (400 Amp plug is for disconnecting use only; not for current rupturing).
- 30, 60, 100, and 150 Amp Powertite® plugs also suitable for classified locations when used with Appleton EBR, EBRH, JBR, MD2SR, or DBR explosion-proof interlocking receptacles.
- Controlled length contacts ensure that ground makes first and breaks last for added safety.

## Standard Materials

- Plug, receptacle, connector and mounting box housings: copperfree (4/10 of 1% max.) aluminum
- Insulating blocks: glass filled polyester

## Standard Finishes

- Aluminum plug, receptacle, connector and mounting box housings: epoxy powder coat
- Insulating blocks and contacts: natural finish

## Options

- See Illustrated Options

## Certifications and Compliances

- UL Standard: UL 1682, UL 1686, UL 50E
- UL Listed: E145916, E145917
- CSA Standard: C22.2 No. 182.1
- CSA Certified: 065179
- NEMA 4X (30, 60, 100, 150, and 200 Amp)
- NEMA Configuration: FB11

## Related Products

- For classified location plugs and receptacles, see *Plugs and Receptacles: Hazardous Location*.



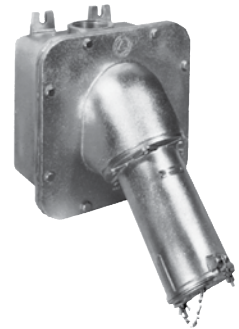
30 and 60 Amp



100 and 150 Amp



200 Amp

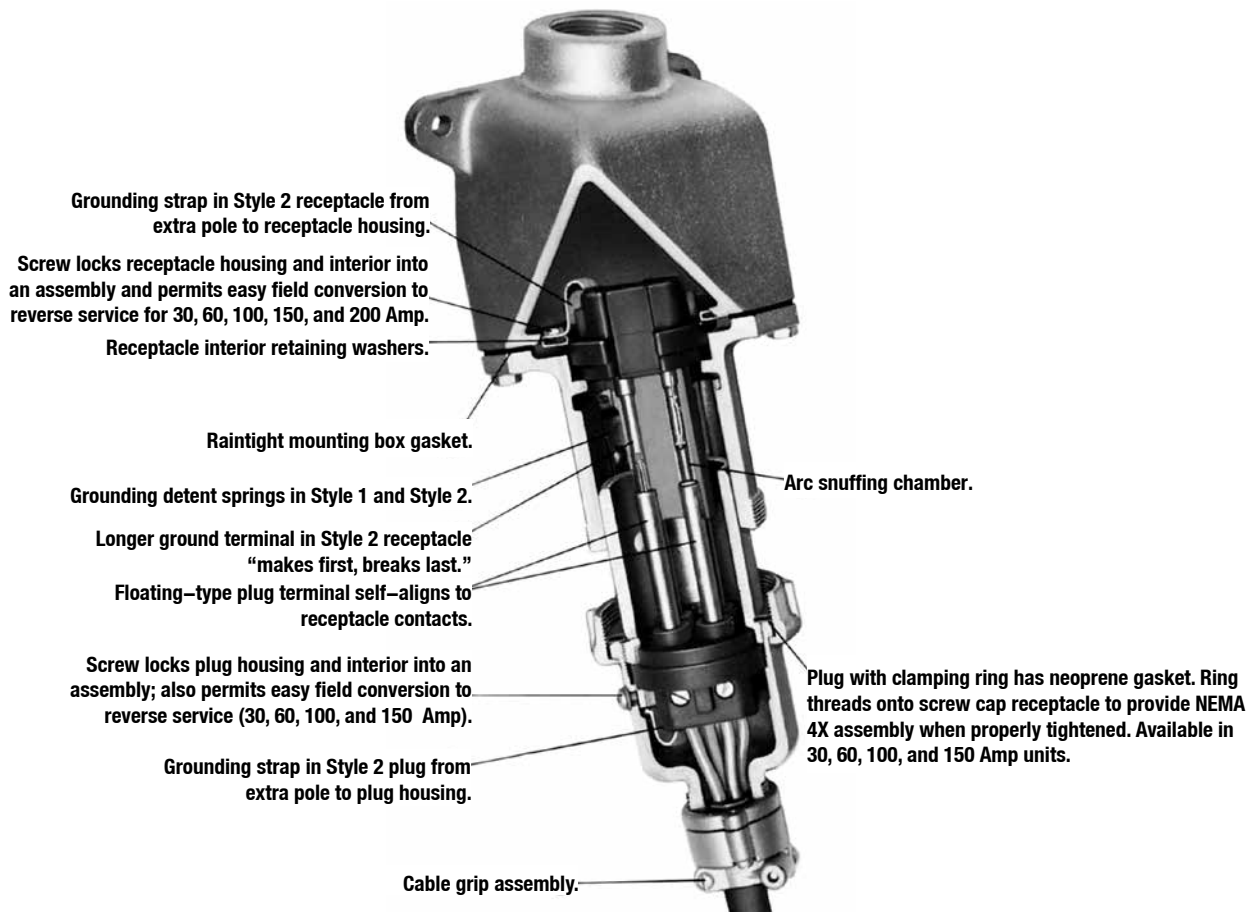


400 Amp

Classified by UL and Certified by CSA for use in specific combinations with Crouse-Hinds Arktime. Arktime is a registered trademark of Cooper Crouse-Hinds.

# Powertite® Series Pin and Sleeve Plugs, Connectors and Receptacles

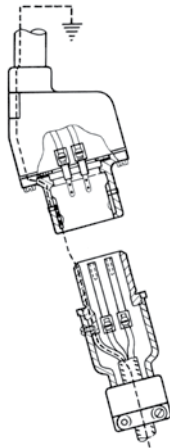
## Illustrated Features



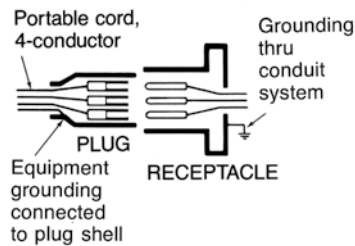
# Powertite® Series Pin and Sleeve Plugs, Connectors and Receptacles

## Illustrated Features

### Grounding Styles

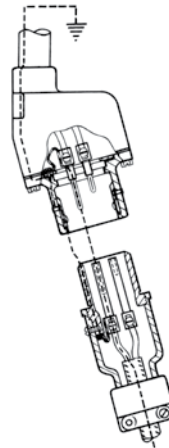


**Style 1  
(Shell Only)**

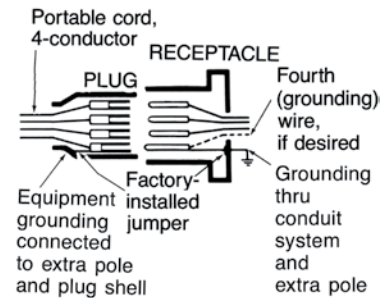


**Plug**—Equipment grounding conductor is wired directly to solderless lug which is connected to the plug housing with a pressure connector. All terminals are “current carrying.”

**Receptacle**—Two detent spring clips engage the grounded plug housing on plug insertion—grounded plug shell makes contact with receptacle ground spring before line and load poles are engaged. Grounding path is maintained until after current-carrying contacts disengage. All terminals are “current carrying.”



**Style 2  
(Shell and Extra Pole)**



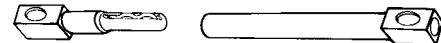
**Plug**—Equipment grounding conductor is not only connected to the solderless lug in the plug housing, but also to an extra grounding pole. Grounding pole has copper alloy grounding jumper strap that connects to plug housing.

**Receptacle**—Two detent spring clips engage grounded plug housing on plug insertion. Jumper from extra grounding pole is electrically connected to a screw on receptacle housing. Longer grounding pole “makes first and breaks last.”

### Pin and Sleeve Design †



**30, 60, and 100 Amp Pressure Wire Terminals.**  
Solid Brass Contacts with Beryllium Copper Springs.



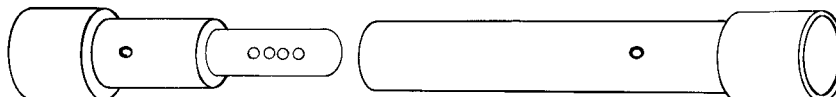
**150 Amp Pressure Wire Terminals.**  
Solid Copper Contacts with Beryllium Copper Springs.



**200 Amp Pressure Wire Terminals. Solid Copper Split-Type Contact.**



**400 Amp 0.84" Solder Well Wire Terminals. Solid Copper Contacts with Four Spring-Loaded Borosilicate Bearings.**



**400 Amp 1.25" Solder Wire Well Terminals. Solid Copper Contacts with Four Spring-Loaded Borosilicate Bearings.**

† Pins and sleeves are not sold separately. Available on the Replacement Interiors pages.

# Powertite® Series Pin and Sleeve Plugs, Connectors and Receptacles

## Illustrated Features

### Spring Door and Screw Cap

30, 60, 100, and 150 Amp spring door and screw cap receptacles are threaded to accept clamping ring ACP plug. The ring threads onto the receptacle to form a raintight assembly with plug in use-and also to prevent plug fallout. When the plug is withdrawn, the gasketed spring door cover closes tightly against receptacle opening automatically, providing weatherproof protection. Spring door has stainless steel spring and shaft.



### Spring Door Cover

30, 60, 100, and 150 Amp units may be located at any position in a 360° circle by adjusting a setscrew. Set screw also allows complete removal of cover. Spring door available on 200 Amp units.

*NOTE: Spring Door cover in open positions for illustration only.*



### ACP Plugs

Supplied with bushings to accommodate a wide variety of cable diameters. 30 Amp plug clamp used in first position with smallest inside diameter bushing provides positive grip on cables as small as 0.390 inches, such as those that are used in oil rig installations.



### Reversible Cable Clamps

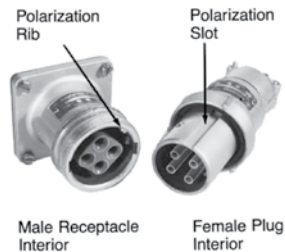
Permits wide cable range (just loosen screws and flip over). Each position accommodates one of two bushings. Convenient in installations having different cable sizes.



## Illustrated Options

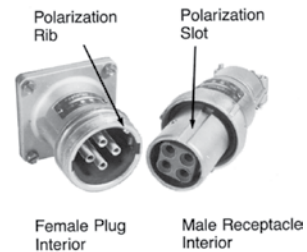
### Standard Service

Energized receptacle has recessed male contacts to reduce danger of accidental touching. Plug has female contacts that are energized only upon insertion in receptacle.



### Reverse Service (Generator Application)

Useful where a "hot" plug feeds a dead receptacle. Reverse service is often used for generator applications where the receptacle houses a dead plug interior. Plug houses an energized receptacle interior, which has recessed male contacts to reduce danger of accidental touching. 30, 60, 100, 150, and 200 Amp units can be easily converted to reverse service in the field when matching plug and receptacle are ordered. 400 Amp unit is only available as a factory assembled item at extra cost. Add suffix **-RS** to receptacle or connector.









### Special Polarization

Prevents plug insertion in a receptacle or connector wired for a different voltage. In installations where there are different line voltages, the special polarization option is desirable. This allows only plugs and receptacles wired for the same line voltage to be mated together. The receptacle or connector interior is positioned 22-1/2°, relative to the polarization rivet, to the right (as specified) of standard, and plug is polarized to correspond. Add suffix **-P4** to the standard or reverse service plug, receptacle or connector.

# Powertite® 30, 60, 100, and 150 Amp Replacement Parts

600 Vac, 250 Vdc, 50-400 Hz








	Description	Catalog Number
<b>ACP Plug Clamping Ring — Includes Gasket</b>		
	30 Amp — 2-, 3- and 4-Pole	CLMPR30
	30 Amp — 3-Wire, 4-Pole	30CRING ‡
	60 Amp — 2- and 3-Pole	CLMPR23P60
	60 Amp — 4-Pole	CLMPR4P60
	100 Amp — 2- and 3-Pole	CLMPR23P100
	100 and 150 Amp — 4-Pole	CLMPR4P100
<b>Receptacle Spring Cover — Includes Gasket</b>		
	30 Amp — 2-, 3- and 4-Pole	PTSC30
	60 Amp — 2- and 3-Pole	PTSC60A
	60 Amp — 4-Pole	PTSC60B
	100 Amp — 2- and 3-Pole	PTSC100A
	100 and 150 Amp — 4-Pole	PTSC100B
<b>Receptacle Threaded Cover — Includes Gasket and Chain</b>		
	30 Amp — 2, 3, and 4-Pole	PTTC30
	30 Amp — 3 Wire, 4-Pole (Unthreaded)	30SCAP ‡
	60 Amp — 2- and 3-Pole	PTTC60A
	60 Amp — 4-Pole	PTTC60B
	100 Amp — 2- and 3-Pole	PTTC100A
	100 and 150 Amp — 4-Pole	PTTC100B
<b>Bushing Bags and Crown Bushings for Plugs and Cable Connectors</b>		
	30 Amp	PTGB30
	60 Amp	PTGB60
	100 Amp and 150 Amp (CD)	PTGBCD
	150 Amp (DE)	PTGBDE
<b>Universal Plug Bushing</b>		
	30 and 60 Amp Cable Range 0.300" – 9.00" Package of 10	PTGBUBC
<b>Receptacle Ground Lug Kit</b>		
	30 Amp Receptacle Ground Lug Kit. Wire Well ID 0.272"	PTRGL30
	60 Amp Receptacle Ground Lug Kit. Wire Well ID 0.312"	PTRGL60
	100 Amp Receptacle Ground Lug Kit. Wire Well ID 0.389" *	PTRGL100

‡ For use with 30 Amp Powertite plugs and WSR/WSRD/JBR/EBR/DBR receptacles.

\* Ground lug is cast into the housing after 09/2008.

# Powertite® 200 and 400 Amp Replacement Parts

600 Vac, 250 Vdc, 50-400 Hz.

	Description	Catalog Number
<b>Receptacle Covers</b>		
	<b>Spring Cover — Includes Gasket</b>	
	200 Amp — 2- and 3-Pole	PTLC200A
	200 Amp — 4-Pole	PTLC200B
<b>Clamping Cover — Includes Gasket and Chain</b>		
	200 Amp — 2- and 3-Pole	PTBC200A
	200 Amp — 4-Pole	PTBC200B
	400 Amp — 2- and 3-Pole	PTBC400A
	400 Amp — 4-Pole	PTBC400B
<b>Bushing Bags for Plugs and Cable Connectors</b>		
	200 Amp - Suffix CD	PTGBCD
	200 Amp - Suffix E	PTGB200E
	400 Amp - Suffix E	PTGB400E
	400 Amp - Suffix F	PTGB400F
	400 Amp - Suffix G	PTGB400G
<b>Receptacle Lockout Device</b>		
	Lockout, 200 Amp 3- and 4-Pole Models	PTLOCK2004
	Lockout, 400 Amp 4-Pole Models	PTLOCK4004
<b>Optional Accessory for Wire Size #1 to #4</b>		
<i>Check National Electrical Code for proper wire size and application</i>		
	200 Amp, 3-Pole Wire Adapter Kit	PTK200WA3
	200 Amp, 4-Pole Wire Adapter Kit	PTK200WA4
<b>400 Amp Pressure Terminal Kits</b>		
	<b>Use with 400-500 MCM Wire</b> <i>0.84" I.D. Wire Recess</i>	
	3 Adapters	PTK84-3P
	4 Adapters	PTK84-4P
	<b>Use With 750 MCM General Wire or 500-777 MCM Flexible Wire</b> <i>1.18" I.D. Wire Recess</i>	
	3 Adapters	PTK750-3P
	4 Adapters	PTK750-4P

Plugs and Receptacles

PLUGS AND RECEPTACLES: ORDINARY LOCATION

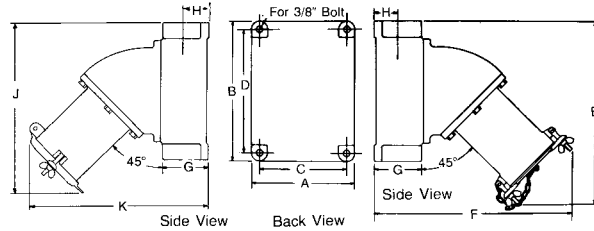
# Powertite® 200 Amp Mounted Receptacle Dimensions

600 Vac, 250 Vdc, 50-400 Hz.

Plugs and Receptacles

PLUGS AND RECEPTACLES: ORDINARY LOCATION

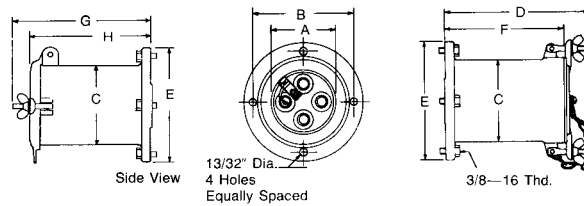
## Receptacle Mounted on AJA and AJAC Boxes



Dimensions in Inches/Millimeters

A	B	C	D	E	F	G	H	J	K
8.00/203.2	10.75/273.0	6.75/171.4	9.50/241.3	14.00/355.6	15.25/387.3	3.75/95.2	1.88/47.7	13.50/342.9	14.25/361.9

## Receptacle



Dimensions in Inches/Millimeters

No. Poles	A	B	C	D	E	F	G	H
3	3.25/82.5	5.63/143.0	4.19/10.46	8.00/203.2	6.63/168.4	6.56/166.6	6.70/170.1	7.05/179.0
4	3.63/92.2	5.63/143.0	4.56/115.8	8.00/203.2	6.63/168.4	6.56/166.6	6.70/170.1	7.05/179.0