

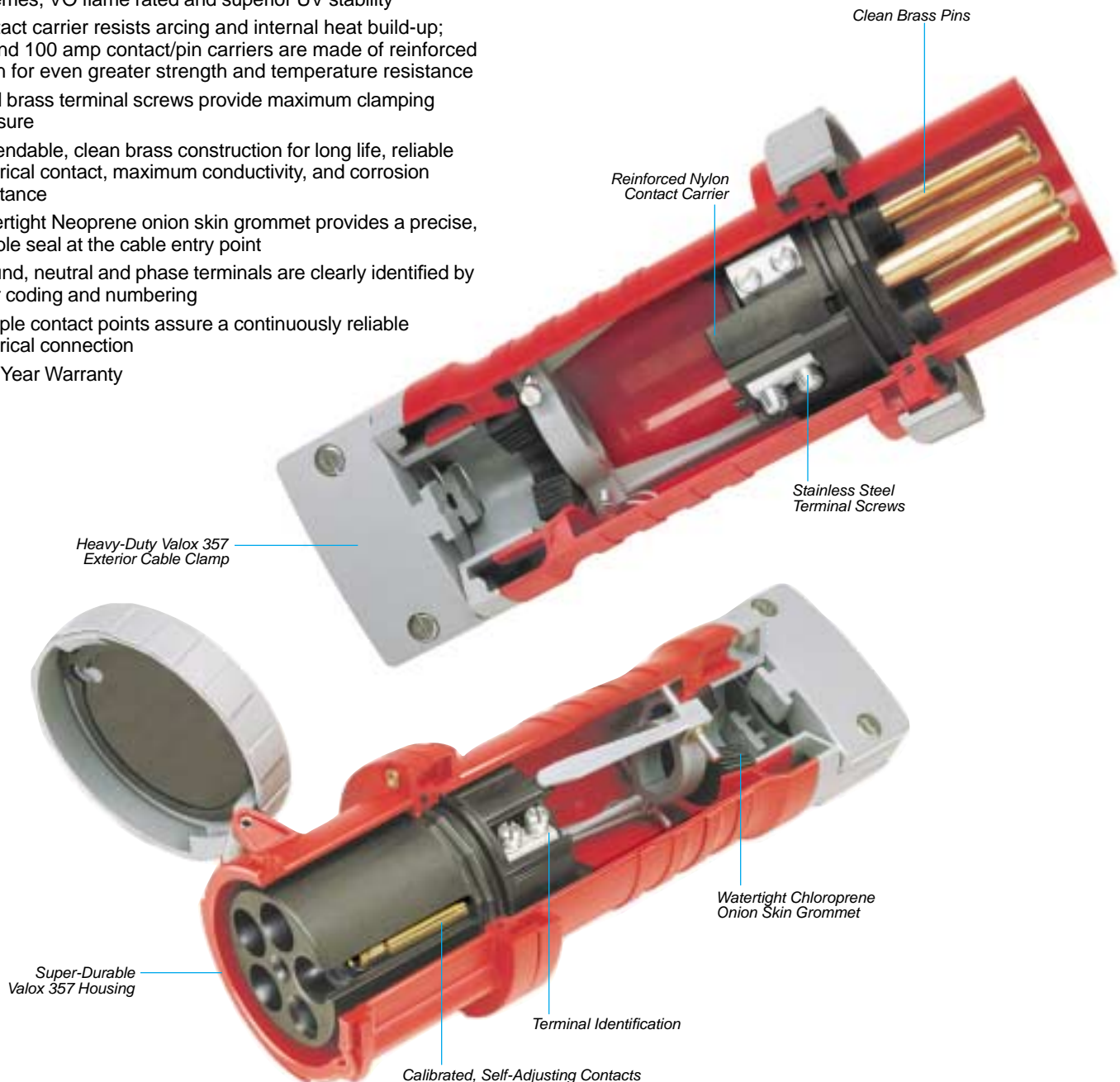
Pin and Sleeve Devices

The Watertight Line: North American-Rated Devices

Superior Connection... Superior Protection

Features and Benefits

- Rugged housing, made of superior performance Valox 357, provides maximum corrosion protection and makes the device resistant to impact and abuse; greater resistance to temperature extremes, VO flame rated and superior UV stability
- Contact carrier resists arcing and internal heat build-up; 60 and 100 amp contact/pin carriers are made of reinforced nylon for even greater strength and temperature resistance
- Solid brass terminal screws provide maximum clamping pressure
- Dependable, clean brass construction for long life, reliable electrical contact, maximum conductivity, and corrosion resistance
- Watertight Neoprene onion skin grommet provides a precise, reliable seal at the cable entry point
- Ground, neutral and phase terminals are clearly identified by color coding and numbering
- Multiple contact points assure a continuously reliable electrical connection
- Two-Year Warranty



IP 67 Watertight Mechanical Interlock Devices

The leader in ruggedness and easy installation

Enclosures made of rugged Valox 357 carry NEMA 4X – outdoor (watertight, washdown) and 12K – indoor (dust tight, falling dirt) enclosure rating

Grounding wire and conduit grounding plate for connection of system ground

Watertight conduit hubs for use with metallic conduit

Convenient knockout for top conduit entry; bottom feed variations available (NEMA type 4X and 12K)

Leviton's watertight inlets and receptacles (shown above) offer the same superior performance and design features as Leviton plugs and connectors.

Easy-wiring switch terminal block for fast installation

Heavy-duty, HP-rated disconnect switch, factory-wired to single-rated receptacle; handles large motor loads

Screw-mounted switch resists accumulation of contaminants for easier service

60 and 100 amp devices have receptacle contact carriers made of reinforced nylon for high heat and impact resistance. 20 and 30 amp receptacle contact carriers are made of nylon for high impact resistance

Pre-wired IEC 309-1 & 309-2 pin and sleeve receptacle

Receptacle contact carrier has staggered contacts; ground makes first, breaks last

All mechanical interlock devices have factory-installed auxiliary contacts. Switch opens/closes no less than 30 milliseconds before/after live contacts.

Making the Right Connection is as Easy as Matching Colors and Telling Time!

Leviton's pin and sleeve devices are easy to use. Matching amperage and voltage requirements is literally as easy as matching colors and telling time.

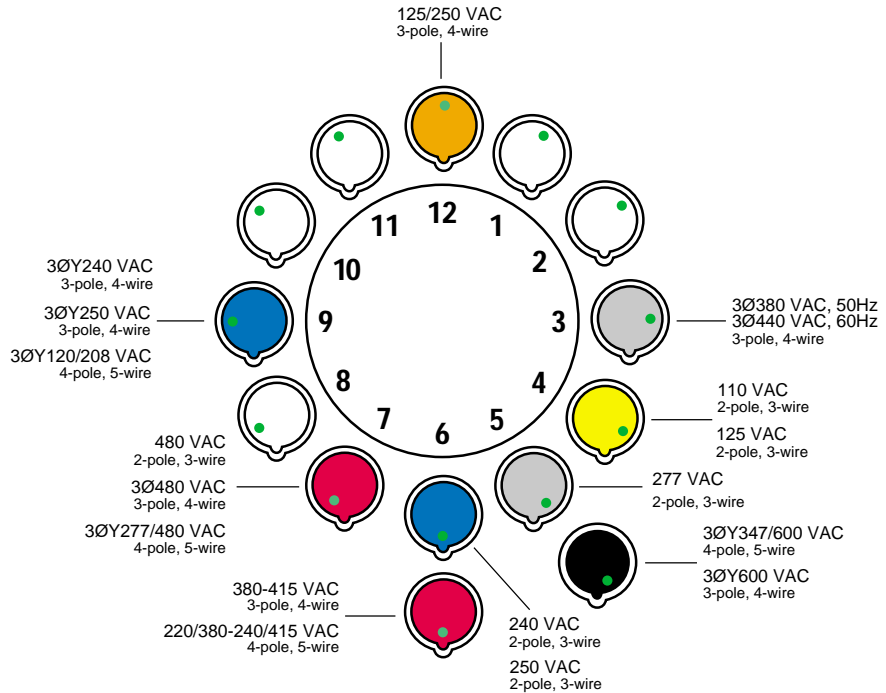
The amperage rating is related to the size of the device; devices of the same amperage are the same size.

The voltage rating is related to the location of the ground sleeve on the female device and the number of conductors. This location is based on a clock face with the key-way at the 6 o'clock position.

The ground sleeve is positioned at a specific hour location, depending on the device's voltage rating.

The clock position for plugs and inlets is a mirror image of the position for matching connectors and receptacles.

For quick visual identification, voltage ratings are also color-coded and the housings of interconnecting units are always the same color. All 125VAC devices are yellow; 250VAC are blue, etc. Matching up interconnecting devices is as easy as matching colors.

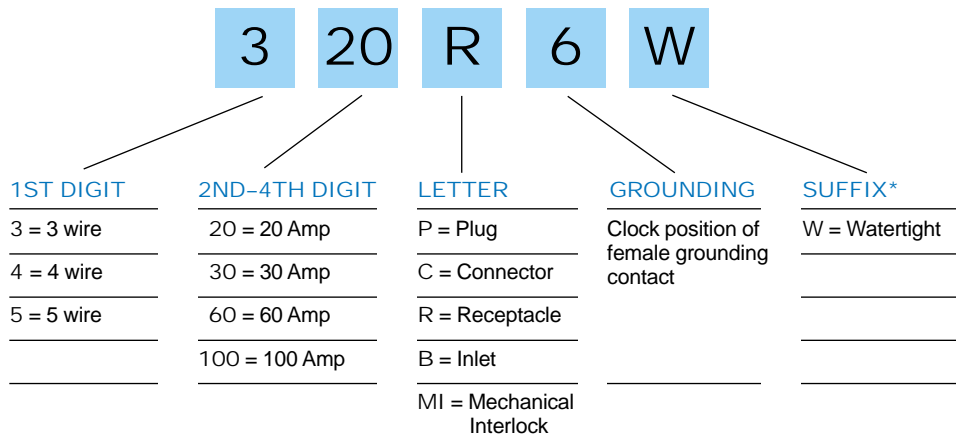


Rated Voltage	Color
110V-130V	Yellow
125V-250V	Orange
200V-250V	Blue
277V, 380V, 440V	Grey
380V-480V	Red
500V and above	Black

Ordering is Easy

Leviton's catalog number system is easy to use. Each letter or number provides a description of the product. Simply follow the six-part code below, made up of letters and numbers. Each catalog number contains the number of conductors, amperage rating, device type, clock position of the ground sleeve, and environmental rating.

For example, the catalog number below refers to a 3-wire, 20 amp receptacle with a grounding sleeve located at the 6 o'clock position and an environmental classification of watertight.



*Watertight devices are identified by their "W" suffix; Splashproof devices by their "SP" prefix.

North American Watertight Devices

- Listed to UL 1682 and 1686, CE Approved
- Certified to CSA Standard C22.2 number 182.1
- IEC Classified to Standards 309-1 and 309-2 for both North American-rated and International-rated voltages and services

Materials

Inlet

PART	MATERIAL
Housing	Valox 357
Locking Ring	Valox 357
Mounting Flange	Valox 357
Contact Carrier	Nylon for 20 and 30 Amp devices; Reinforced nylon for 60 and 100 Amp devices
Phase, Ground Pins	Brass
Terminal Screws	Brass
Sealing Gasket	Solid Neoprene

Connector

PART	MATERIAL
Housing	Valox 357
Internal Cord Clamp Assembly	Thermoplastic
External Cord Clamp Assembly	Valox 357
Gland Cap	Valox 357
Grommet	Neoprene Onion Skin
Cover with Arm	Valox 357
Arm Spring	"Performance Grade" Stainless Steel
Cover Eyelet	Nickel-Plated Brass
Sealing Gasket	Solid Neoprene
Contact Carrier	Nylon for 20 and 30 Amp devices; Reinforced nylon for 60 and 100 Amp devices
Phase, Ground Sleeve	Brass
Sleeve Spring	Stainless Steel
Terminal Screws	Brass
Internal Screws	Zinc-plated Steel
External Screws	Acid-proof Stainless Steel

Watertight Application Guide

INDUSTRY	APPLICATION
Agriculture	For outdoor fans, HVAC pumping, and similar equipment.
Chemical Processing	For maintenance and process control equipment where electrical connectors are subject to immersion and corrosive chemicals.
Computer	For connections under raised floors or plenum spaces where moisture may be present, and the risk of accidental power disconnection must be virtually eliminated.
Construction	Use in areas where connections are outdoors and exposed to wet ground, severe weather or rough handling.
Food Processing	Use in areas subject to wash downs and where electrical connections are likely to see rough handling.
Entertainment	For outdoor connections subject to extremes of temperature and weather, particularly for critical loads such as sound and lighting.
Heavy Manufacturing	Areas where material particles, dust, or coolants might enter a device, or the connection may be subject to impact, temperature extremes, crushing, or other rough handling.
Light Manufacturing	Areas where connections are subjected to cleaning solvents or chemicals.
Wastewater Treatment	For outdoor use on aerators, pumps, and ventilating equipment, or in areas subject to moisture.



Plug

PART	MATERIAL
Housing	Valox 357
Locking Ring	Valox 357
Sealing Gasket	Solid Neoprene
Internal Cord Clamp Assembly	Thermoplastic
External Cord Clamp Assembly	Valox 357
Gland Cap	Valox 357
Grommet	Neoprene Onion Skin
Cord Clamp Screws	Acid-proof Stainless Steel
Gland Cap Screws	Acid-proof Stainless Steel
Contact Carrier	Nylon for 20 and 30 Amp devices; Reinforced nylon for 60 and 100 Amp devices
Ground, Phase Pins	Brass
Terminal Screws	Brass
Internal Screws	Zinc-plated Steel
External Screws	Acid-proof Stainless Steel

Receptacle

PART	MATERIAL
Housing	Valox 357
Mounting Flange	Valox 357
Cover with Arm	Valox 357
Arm Spring	"Performance Grade" Stainless Steel
Cover Eyelet	Nickel-Plated Brass
Sealing Gasket	Solid Neoprene
Terminal Screws	Brass
Phase, Ground Sleeves	Brass
Sleeve Spring	Stainless Steel



Pin and Sleeve Devices



Performance Specifications

Electrical

Dielectric Voltage	Devices rated ≤ 300V: 2000V for 1 min. Devices rated >300V: 3000V for 1 min.												
Insulation Resistance	500 V for 1 min. Insulation Resistance ≥ 5 megohms												
Ground Path Current	Apply high current for short time (See Table 1) and maintain continuity												
Overload	150% of rated current and 100% of rated voltage for 50 cycles (Power factor 0.75–0.80)												
Current Interrupting	Certified for current interrupting at full-rated current and voltage												
Temperature Rise	Max 30°C rise at full rated current (after overload)												
Resistance to Arcing	Continuation of overload for additional 200 cycles												
Endurance with Load	<table border="1"> <thead> <tr> <th>Device</th> <th># Cycles with Load</th> <th></th> </tr> </thead> <tbody> <tr> <td>20A</td> <td>5000</td> <td>Rated Current, Voltage</td> </tr> <tr> <td>30A, 60A</td> <td>1000</td> <td>Rated Current, Voltage</td> </tr> <tr> <td>100A</td> <td>250</td> <td>Rated Current, Voltage</td> </tr> </tbody> </table> (Power Factor 0.75 - 0.80)	Device	# Cycles with Load		20A	5000	Rated Current, Voltage	30A, 60A	1000	Rated Current, Voltage	100A	250	Rated Current, Voltage
Device	# Cycles with Load												
20A	5000	Rated Current, Voltage											
30A, 60A	1000	Rated Current, Voltage											
100A	250	Rated Current, Voltage											

Mechanical

Mold Stress Relief	70°C for 7 hrs								
Humidity	32°C, 93% humidity, 168 hrs								
Cable Secureness	Pull force and apply torque for 1 minute (See Table 2)								
Impact	Drop from 30" 8 times after conditioning to -25°C, for 6 hrs								
Crush	250 lbs for 1 min after -25°C for 6 hrs								
Withdrawal Force	Pull for one minute (See Table 3)								
Strength of Insulating Base and Support	110% of specified tightening torque on terminal screws								
Endurance	<table border="1"> <thead> <tr> <th>Device</th> <th>Total #Cycles (connect & disconnect)</th> </tr> </thead> <tbody> <tr> <td>20A</td> <td>5000</td> </tr> <tr> <td>30A, 60A</td> <td>2000</td> </tr> <tr> <td>100A</td> <td>500</td> </tr> </tbody> </table>	Device	Total #Cycles (connect & disconnect)	20A	5000	30A, 60A	2000	100A	500
Device	Total #Cycles (connect & disconnect)								
20A	5000								
30A, 60A	2000								
100A	500								
Polarization Integrity	Matching devices will not mate so that ground is energized even when polarization feature is removed and 40-lb insertion force applied								

Environmental

Flammability	V2 or better on 20 and 30 amp devices per UL 94 or CSA 22.2 No 0.6 ; VO on 60 and 100 amp devices
Resistance to Corrosion	Ferrous parts immersed in 10% ammonium chloride solution at 20°C for 10 minutes
Moisture Resistance	Watertight: Device immersed for 24 hrs in 5 cm of 25°C water Splashproof: 1 inch diameter water stream at 15 PSI from 10 feet for 5 minutes
UV Resistance	Exposed plastic materials are UV stabilized

Table 1

SHORT-TIME GROUNDING TEST CURRENTS

Device Rating, Amperes	Minimum Size Equipment Grounding Conductor (Copper)		Time, Seconds	Test Current, Amperes
	AWG	(mm ²)		
20	12	(3.3)	4	470
30	10	(5.3)	4	750
60	10	(5.3)	4	750
100	8	(8.4)	4	1180

Ground-path integrity is of critical importance to safe operation of industrial equipment. Leviton pin and sleeve devices are tested by applying a test current through their ground path that far exceeds the device rating. All devices are properly wired and connected to line current at rated values. Then the ground path is subjected to a dramatic, sudden increase in current for 4 seconds. In all cases, the ground pin, sleeve, and terminals of the devices must sustain the test current, continue to function properly, and show no evidence of damage or deterioration in any electrical or mechanical elements of the ground path. Test current values and test parameters are displayed in the above chart.

Table 2

CORD OR CABLE SECURENESS TEST VALUES

Device Rating, Amperes	Force		Torque		Maximum Displacement	
	lb	N	ft-lb	N•M	inches	mm
20	30	133	0.4	0.54	≤3/32	2.38
30	75	333	0.5	0.68	≤3/32	2.38
60	150	667	1.0	1.4	≤3/32	2.38
100	150	667	2.0	2.7	≤3/32	2.38

Heavy cord stress is typical of industrial applications. To assure you of top performance, Leviton pin and sleeve devices are subjected to a punishing series of tests to confirm they can absorb heavy cord pulls. The cord conductors wired to devices are simultaneously twisted and pulled. Values for the applied twisting torque and force of pull are shown above. In all cases, the cord displacement is less than 3/32 inches.

Table 3

MINIMUM WITHDRAWAL FORCE

Device Rating, Amperes	Minimum Withdrawal Force	
	lb	N
20	5	22
30	6	27
60	15	67
100	20	89

In industrial settings, inadvertent disconnection of power can be troublesome at best, dangerous at worst, and unacceptable in any case. To verify that Leviton pin and sleeve plugs and connectors remain securely connected, they are tested to establish the minimum force required for withdrawal. In establishing these minimum withdrawal forces, the plugs and connectors are properly mated, but not locked with locking rings or other mechanical means. The pins and sleeves provide the only resistance to the force of withdrawal. In all cases, the values in the table above show the minimum force required to separate the plugs and connectors.

Watertight Dimensions

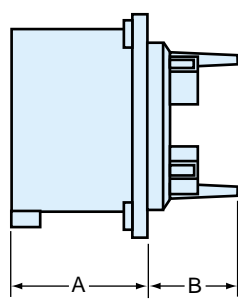
Inlet Dimensions

TYPE		A	B
320B*	inch	1.61	0.95
	mm	41	24
420B*	inch	1.61	0.95
	mm	41	24
520B*	inch	1.61	0.95
	mm	41	24
330B*	inch	1.97	1.10
	mm	50	28
430B*	inch	1.97	1.10
	mm	50	28
530B*	inch	1.97	1.10
	mm	50	28
360B	inch	3.15	1.97
	mm	80	50
460B	inch	3.15	1.97
	mm	80	50
560B	inch	3.15	1.97
	mm	80	50
3100B	inch	3.50	2.21
	mm	89	56
4100B	inch	3.50	2.21
	mm	89	56
5100B	inch	3.50	2.21
	mm	89	56

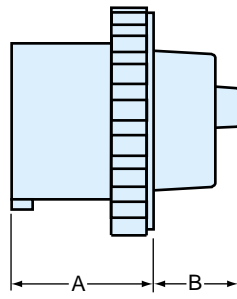
*20 and 30 Amp inlets available in splashproof only.

Receptacle Dimensions

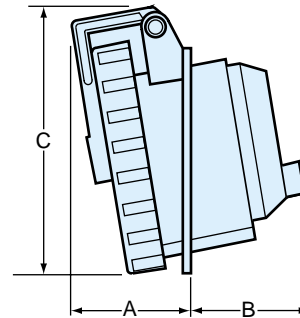
TYPE		A	B	C
320R	inch	2.17	1.26	3.15
	mm	55	32	80
420R	inch	2.17	1.26	3.54
	mm	55	32	90
520R	inch	2.17	1.26	3.94
	mm	55	32	100
330R	inch	2.36	1.97	3.94
	mm	60	50	100
430R	inch	2.36	1.97	4.13
	mm	60	50	105
530R	inch	2.36	1.97	4.33
	mm	60	50	110
360R	inch	3.50	1.89	4.37
	mm	89	48	111
460R	inch	3.50	1.89	4.37
	mm	89	48	111
560R	inch	3.50	1.89	4.37
	mm	89	48	111
3100R	inch	3.94	2.28	4.80
	mm	100	58	122
4100R	inch	3.94	2.28	4.80
	mm	100	58	122
5100R	inch	3.94	2.28	4.80
	mm	100	58	122



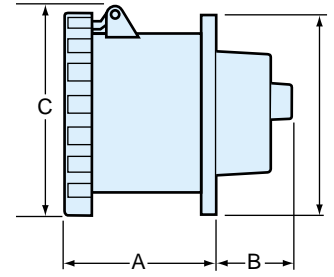
INLET 20A, 30A



INLET 60A, 100A



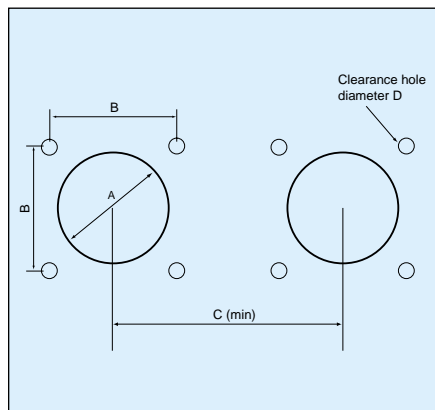
RECEPTACLE 20A, 30A



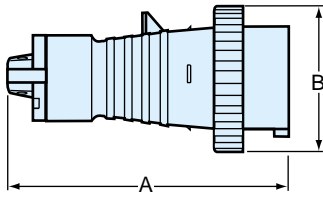
RECEPTACLE 60A, 100A

Drilling Plan

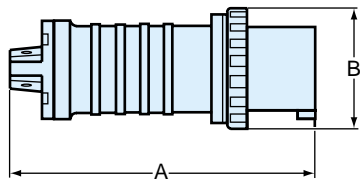
Receptacles and Inlets



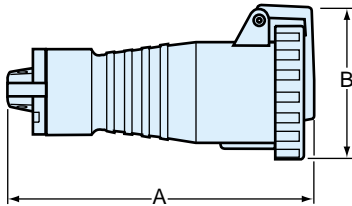
DEVICE SIZE	A		B		C (min)		D		
	inches	mm	inches	mm	inches	mm	inches	mm	
20A; 3-wire:	Receptacle	1.97	50	2.17	55	3.94	100	0.185	4.7
	Inlet	1.93	49	1.73	44	3.94	100	0.185	4.7
20A; 4-wire:	Receptacle	2.17	55	2.36	60	4.33	110	0.185	4.7
	Inlet	2.32	59	2.05	52	4.33	110	0.185	4.7
20A; 5-wire:	Receptacle	2.87	73	2.72	69	4.92	125	0.236	6.0
	Inlet	2.87	73	2.60	66	4.92	125	0.185	4.7
30A; 3-wire:	Receptacle	2.99	76	2.72	69	5.12	130	0.236	6.0
	Inlet	2.99	76	2.76	70	5.12	130	0.185	4.7
30A; 4-wire:	Receptacle	2.99	76	2.72	69	5.12	130	0.236	6.0
	Inlet	2.99	76	2.76	70	5.12	130	0.185	4.7
30A; 5-wire:	Receptacle	3.11	79	2.72	69	5.71	145	0.236	6.0
	Inlet	3.11	79	2.95	75	5.71	145	0.185	4.7
60A All		2.76	70	2.40	61	6.69	170	0.224	5.7
100A All		3.19	81	2.80	71	7.87	200	0.280	7.1



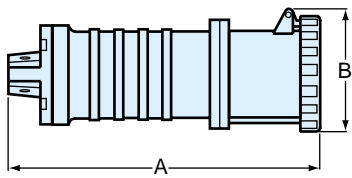
20A, 30A PLUG



60A, 100A PLUG



20A, 30A CONNECTOR



60A, 100A CONNECTOR

Plug Dimensions

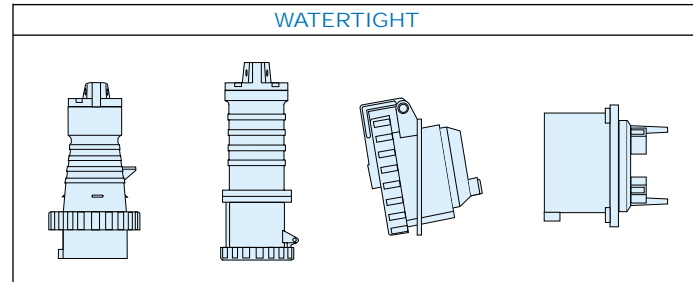
TYPE		A	B	CORD GRIP RANGE (DIA.)
320P	inch	5.83	2.80	.350 – .860
	mm	148	71	9 – 22
420P	inch	6.46	3.11	.350 – .860
	mm	164	79	9 – 22
520P	inch	6.61	3.43	.437 – 1.187
	mm	168	87	11 – 30
330P	inch	6.85	3.70	.437 – 1.187
	mm	174	94	11 – 30
430P	inch	6.85	3.70	.437 – 1.187
	mm	174	94	11 – 30
530P	inch	7.40	3.98	.437 – 1.450
	mm	188	101	11 – 37
360P	inch	10.83	4.49	.670 – 1.625
	mm	275	114	17 – 41
460P	inch	10.83	4.49	.670 – 1.625
	mm	275	114	17 – 41
560P	inch	10.83	4.49	.670 – 1.625
	mm	275	114	17 – 41
3100P	inch	12.3	5	.950 – 1.875
	mm	312	127	24 – 48
4100P	inch	12.3	5	.950 – 1.875
	mm	312	127	24 – 48
5100P	inch	12.3	5	.950 – 1.875
	mm	312	127	24 – 48









































Connector Dimensions

TYPE		A	B	CORD GRIP RANGE (DIA.)
320C	inch	6.73	3.19	.350 – .860
	mm	171	81	9 – 22
420C	inch	7.36	3.46	.350 – .860
	mm	187	88	9 – 22
520C	inch	7.68	3.82	.437 – 1.187
	mm	195	97	11 – 30
330C	inch	7.68	4.02	.437 – 1.187
	mm	195	102	11 – 30
430C	inch	7.68	4.02	.437 – 1.187
	mm	195	102	11 – 30
530C	inch	8.27	4.29	.437 – 1.450
	mm	210	109	11 – 37
360C	inch	11.26	4.41	.670 – 1.625
	mm	286	112	17 – 41
460C	inch	11.26	4.41	.670 – 1.625
	mm	286	112	17 – 41
560C	inch	11.26	4.41	.670 – 1.625
	mm	286	112	17 – 41
3100C	inch	12.8	4.84	.950 – 1.875
	mm	325	123	24 – 48
4100C	inch	12.8	4.84	.950 – 1.875
	mm	325	123	24 – 48
5100C	inch	12.8	4.84	.950 – 1.875
	mm	325	123	24 – 48

Watertight Pin and Sleeve Devices

North American Devices, 20 and 30 AMP



AMPS	WIRING	VOLTAGE AC	CONNECTOR/RECEPTACLE	PLUG/INLET	WATERTIGHT			
					PLUG	CONNECTOR	RECEPTACLE	INLET
20	2p3w	125			320P4W	320C4W	320R4W	320B4W
	2p3w	250			320P6W	320C6W	320R6W	320B6W
	2p3w	480			320P7W	320C7W	320R7W	320B7W
	3p4w	125/250			420P12W	420C12W	420R12W	420B12W
	3p4w	3Ø250			420P9W	420C9W	420R9W	420B9W
	3p4w	3Ø480			420P7W	420C7W	420R7W	420B7W
	3p4w	3Ø600			420P5W	420C5W	420R5W	420B5W
	4p5w	3ØY120/208			520P9W	520C9W	520R9W	520B9W
	4p5w	3ØY277/480			520P7W	520C7W	520R7W	520B7W
	4p5w	3ØY347/600			520P5W	520C5W	520R5W	520B5W
30	2p3w	125			330P4W	330C4W	330R4W	330B4W
	2p3w	250			330P6W	330C6W	330R6W	330B6W
	2p3w	480			330P7W	330C7W	330R7W	330B7W
	3p4w	125/250			430P12W	430C12W	430R12W	430B12W
	3p4w	3Ø250			430P9W	430C9W	430R9W	430B9W
	3p4w	3Ø480			430P7W	430C7W	430R7W	430B7W
	3p4w	3Ø600			430P5W	430C5W	430R5W	430B5W
	4p5w	3ØY120/208			530P9W	530C9W	530R9W	530B9W
	4p5w	3ØY277/480			530P7W	530C7W	530R7W	530B7W
	4p5w	3ØY347/600			530P5W	530C5W	530R5W	530B5W

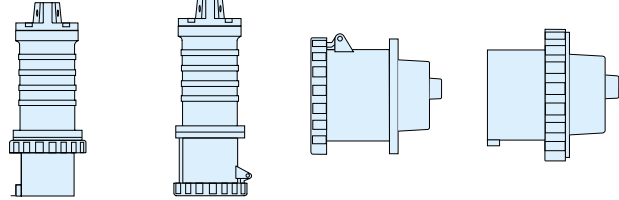
*For 20 and 30 North American Ratings ONLY, inlets are available exclusively in splashproof style, NOT available in watertight.









































Watertight Pin and Sleeve Devices

North American Devices, 60 and 100 AMP



WATERTIGHT



AMPS	WIRING	VOLTAGE AC	CONNECTOR/RECEPTACLE	PLUG/INLET	PLUG	CONNECTOR	RECEPTACLE*	INLET
60	2p3w	125			360P4W	360C4W	360R4W	360B4W
	2p3w	250			360P6W	360C6W	360R6W	360B6W
	2p3w	480			360P7W	360C7W	360R7W	360B7W
	3p4w	125/250			460P12W	460C12W	460R12W	460B12W
	3p4w	3Ø250			460P9W	460C9W	460R9W	460B9W
	3p4w	3Ø480			460P7W	460C7W	460R7W	460B7W
	3p4w	3Ø600			460P5W	460C5W	460R5W	460B5W
	4p5w	3ØY120/208			560P9W	560C9W	560R9W	560B9W
	4p5w	3ØY277/480			560P7W	560C7W	560R7W	560B7W
	4p5w	3ØY347/600			560P5W	560C5W	560R5W	560B5W
100	2p3w	125			3100P4W	3100C4W	3100R4W	3100B4W
	2p3w	250			3100P6W	3100C6W	3100R6W	3100B6W
	2p3w	480			3100P7W	3100C7W	3100R7W	3100B7W
	3p4w	125/250			4100P12W	4100C12W	4100R12W	4100B12W
	3p4w	3Ø250			4100P9W	4100C9W	4100R9W	4100B9W
	3p4w	3Ø480			4100P7W	4100C7W	4100R7W	4100B7W
	3p4w	3Ø600			4100P5W	4100C5W	4100R5W	4100B5W
	4p5w	3ØY120/208			5100P9W	5100C9W	5100R9W	5100B9W
	4p5w	3ØY277/480			5100P7W	5100C7W	5100R7W	5100B7W
	4p5w	3ØY347/600			5100P5W	5100C5W	5100R5W	5100B5W

*Back-boxes for receptacles are noted on pages I16 and I17.

North American Watertight Mechanical Interlock Devices

- Listed to UL 231 and UL 1686, CE Approved
- Certified to CSA Standard C22.2 number 182.1
- Switches are listed to UL 508 and CSA C22.2-14
- IEC Classified to Standards 309-1 and 309-2 for both North American and International rated voltages and services



Materials

20 and 30 AMP Devices

PART	MATERIAL
Housing Cover	Valox 357
Housing Base	Valox 357
Cover with Arm	Valox 357
Locking Ring	Valox 357
Cover Arm Eyelet	Nickel-Plated Brass
Housing Gasket	Solid Neoprene
Sealing Gasket	Solid Neoprene
Handle	Valox 357
Actuator Shaft	Valox 357
Locking Mechanism	Zinc-Coated Steel
Contact Carrier	Nylon
Phase and Ground Sleeves	Brass
Ground Contact	Brass
Conduit Grounding Plate	Zinc-Coated Steel
Conduit Hub★	Die-Cast Zinc
Switch Terminal Block	Phenolic-Malamine
Switch Terminal Contacts	Brass
Internal Screws	Zinc-Coated Steel
Housing Screws	Stainless Steel

Additional Components for 60 AMP Devices

PART	MATERIAL
Ground Bus	Brass
Neutral Bus	Brass
Actuator Shaft	Zinc-Coated Steel
Contact Carrier	Reinforced Nylon
Conduit Hub (1½")	Die-Cast Zinc

Additional Components for 100 AMP Devices

PART	MATERIAL
Ground Terminal	Plated Brass/Steel
Ground Terminal Block	Nylon
Neutral Terminal	Plated Brass/Steel
Neutral Terminal Block	Nylon
Terminal Shaft Key	Die-Cast Aluminum
Actuator Shaft	Zinc-Coated Steel
Contact Carrier	Reinforced Nylon
Conduit Hub (2")	Die-Cast Zinc
Switch	Reinforced Nylon

20 Amp ¾"; 30 Amp 1"★

Performance Specifications

Electrical

	Device	Current Applied	Duration
Ground Path Integrity	20 A	40 A	2 min
	30 A	60 A	2 min
	60 A	120 A	4 min
	100 A	200 A	6 min
Current Interrupting	Certified for current interrupting at full-rated current and voltage		
Endurance	6000 operations at rated current and voltage (Power factor 0.75 – 0.80)		
Dielectric	1000 V plus twice rated voltage for 1 minute		

Mechanical

Mold Stress Relief	70°C for 7 hours
Knockout Test	Remains in place with 20 lb push
Crush	100 lb
Impact	1.2 lb steel ball dropped from 5 ft
Cold Impact	Same as above, after conditioning to -35°C
Strength of Insulating Base and Support	110% of specified tightening torque on terminal screws
Pullout	18 lb pull on internal wires

Environmental

Flammability	V2 or better per UL 94 or CSA 22.2 No 0.6; VO for watertight enclosure
Rain (3R)	Water spray @ 5 psi from all sides for 1 hr
Hosedown (4X)	Water spray @ 65 gal/min for 5 minutes
Gasket Aging	70°C for 168 hours
UV Resistance	Exposed plastic materials are UV stabilized
Operating Temperature	-40°C to +60°C (-40°F to +140°F)
Icing	Switch operational and enclosure undamaged with ¾" ice accumulation
Dust 12K	Cement dust circulated @ 1000 ft/min for 5 minutes

Dimensions for Valox Mechanical Interlock Receptacles

20 AMP Valox

	A	B	C	D	E	*ØF	G	H	J	K	ØL
inch	6.61	4.92	3.70	4.96	6.32	0.26	6.94	5.72	7.77	6.55	0.33
mm	168	125	94	126	161	6.5	176	145	197	166	8.4

30 AMP Valox

inch	6.61	4.92	3.70	5.35	6.46	0.26	6.94	5.72	7.77	6.55	0.33
mm	168	125	94	136	164	6.5	176	145	197	166	8.4

60 AMP Valox

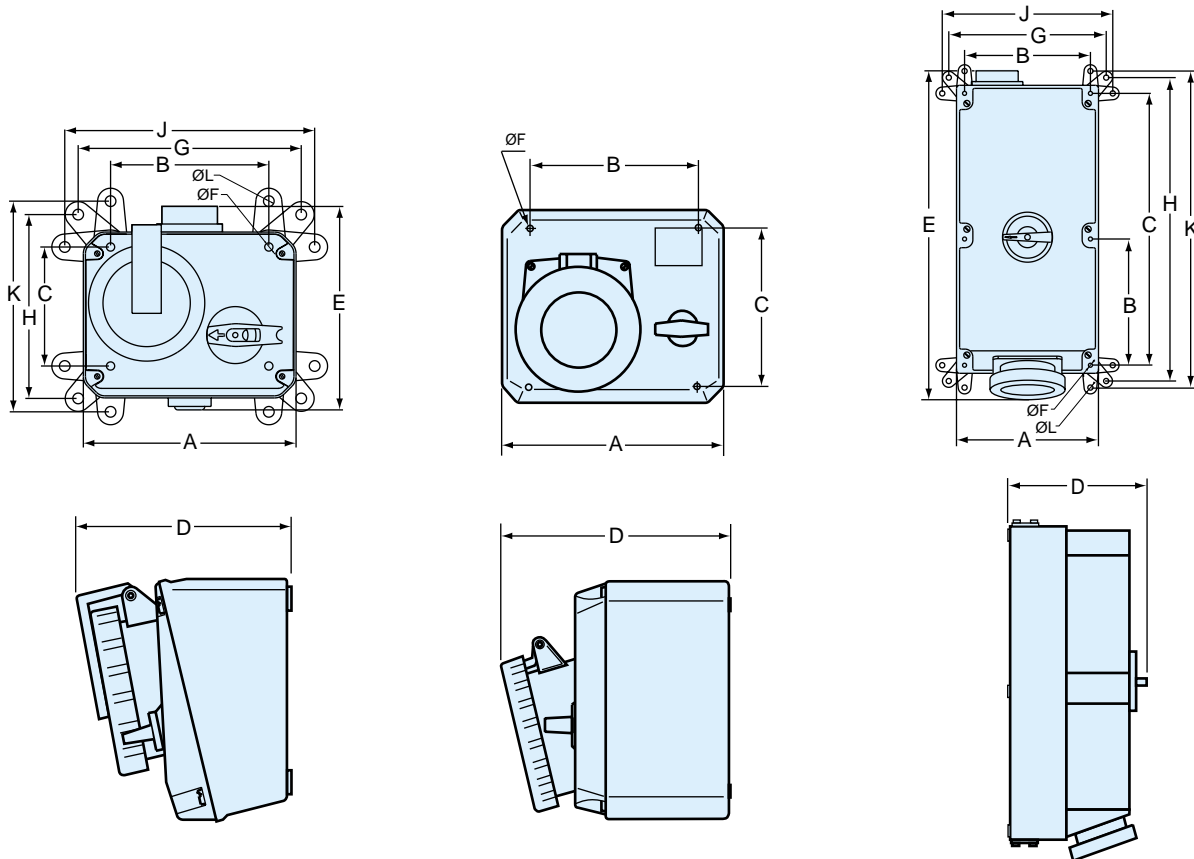
inch	8.11	5.98	5.20	7.17	7.77	0.26	8.00	7.22	8.83	8.05	0.33
mm	206	152	132	182	197	6.5	203	183	224	204	8.4

100 AMP Valox

inch	9.06	8.03	17.32	9.45	21.00	0.26	10.05	19.34	10.88	20.17	0.33
mm	230	204	440	240	533	6.5	255	491	276	512	8.4

*ØF shows the diameter of the mounting hole on bottom of the enclosure.

Note: 20A watertight ¾" NPT threaded hub provided
 30A watertight 1" NPT threaded hub provided
 60A watertight 1½" NPT threaded hub provided
 100A watertight 2" NPT threaded hub provided
 60A splashproof 1¼" NPT threaded hub provided



20A, 30A VALOX MI RECEPTACLE

60A VALOX MI RECEPTACLE

100A VALOX MI RECEPTACLE



360MI7W



330MI6W

Mechanical Interlock Receptacles IP 67 Watertight Devices (Valox)

AMPS	WIRING	VOLTAGE AC	RECEPTACLE CONFIG.	PLUG CONFIG.	MECHANICAL INTERLOCK	HORSEPOWER RATING	USE PLUG CAT. NO.
20	2p3w	240			320MI6W	5	320P6W
	2p3w	480			320MI7W	10	320P7W
	3p4w	125/250			420MI12W	5	420P12W
	3p4w	3Ø240			420MI9W	10	420P9W
	3p4w	3Ø480			420MI7W	20	420P7W
	3p4w	3Ø600			420MI5W	30	420P5W
	4p5w	3ØY120/208			520MI9W	10	520P9W
	4p5w	3ØY277/480			520MI7W	20	520P7W
	4p5w	3ØY347/600			520MI5W	30	520P5W
30	2p3w	240			330MI6W	5	330P6W
	2p3w	480			330MI7W	10	330P7W
	3p4w	125/250			430MI12W	5	430P12W
	3p4w	3Ø240			430MI9W	10	430P9W
	3p4w	3Ø480			430MI7W	20	430P7W
	3p4w	3Ø600			430MI5W	30	430P5W
	4p5w	3ØY120/208			530MI9W	10	530P9W
	4p5w	3ØY277/480			530MI7W	20	530P7W
	4p5w	3ØY347/600			530MI5W	30	530P5W
60	2p3w	240			360MI6W	7.5	360P6W
	2p3w	480			360MI7W	20	360P7W
	3p4w	125/250			460MI12W	15	460P12W
	3p4w	3Ø240			460MI9W	15	460P9W
	3p4w	3Ø480			460MI7W	30	460P7W
	3p4w	3Ø600			460MI5W	40	460P5W
	4p5w	3ØY120/208			560MI9W	15	560P9W
	4p5w	3ØY277/480			560MI7W	30	560P7W
	4p5w	3ØY347/600			560MI5W	40	560P5W

Features and Benefits

IP 67 Watertight Mechanical Interlock Receptacles

- Made of rugged Valox 357; carry NEMA 4X and 12K enclosure rating
- 20 & 30 Amp receptacles have nylon contact carrier; 60 & 100 Amp receptacles have reinforced contact carrier
- Versatile lockout/tagout switch handles meet OSHA regulations
- Color-coded spring-loaded lift covers for easy voltage rating identification
- Equipped with grounding terminal plate
- Interlock mechanism prevents live make-break
- Horsepower rated disconnect switch handles large motor loads
- All devices have factory-installed auxiliary contacts



5100MI5W

Mechanical Interlock Receptacles

IP 67 Watertight Devices (Valox)

AMPS	WIRING	VOLTAGE AC	RECEPTACLE CONFIG.	PLUG CONFIG.	MECHANICAL INTERLOCK	HORSEPOWER RATING	USE PLUG CAT. NO.
100	2p3w	240			3100MI6W	15	3100P6W
	2p3w	480			3100MI7W	30	3100P7W
	3p4w	125/250			4100MI12W	*	4100P12W
	3p4w	3Ø240			4100MI9W	25	4100P9W
	3p4w	3Ø480			4100MI7W	50	4100P7W
	3p4w	3Ø600			4100MI5W	60	4100P5W
	4p5w	3ØY120/208			5100MI9W	20	5100P9W
	4p5w	3ØY277/480			5100MI7W	50	5100P7W
	4p5w	3ØY347/600			5100MI5W	60	5100P5W

*Consult Leviton for your specific application.

International-Rated Devices

Leviton offers international-rated pin and sleeve devices available in 16, 32, 63 and 125 amps. These IEC 309-1 and 309-2-compliant devices are ideal for use overseas where voltage and amperage requirements differ from North American standards, but where rigorous performance, quality, and reliability criteria need to be met. Leviton's international-rated devices offer many of the same design features as Leviton's domestic product line. 16, 32 and 63 Amp devices have an environmental classification of splashproof, and 125 Amp devices are classified as watertight. Special watertight versions are available in 16, 32, and 63 Amp ratings.

Ordering Information

International-Rated Devices*

AMPS	WIRING	VOLTAGE AC	CONNECTOR/ RECEPTACLE	PLUG/ INLET	PLUG	CONNECTOR	RECEPTACLE	INLET
16	2p3w	110			SP316P4	SP316C4	SP316R4	SP316B4
	2p3w	250			SP316P6	SP316C6	SP316R6	SP316B6
	3p4w	380/415			SP416P6	SP416C6	SP416R6	SP416B6
	4p5w	220/380-240/415			SP516P6	SP516C6	SP516R6	SP516B6
32	2p3w	110			SP332P4	SP332C4	SP332R4	SP332B4
	2p3w	250			SP332P6	SP332C6	SP332R6	SP332B6
	3p4w	380/415			SP432P6	SP432C6	SP432R6	SP432B6
	3p4w	3Ø380-3Ø440			432P3WL†	432C3WL†	—	—
	4p5w	220/380-240/415			SP532P6	SP532C6	SP532R6	SP532B6
63	2p3w	250			SP363P6	SP363C6	SP363R6	SP363B6
	3p4w	380/415			SP463P6	SP463C6	SP463R6	SP463B6
	4p5w	220/380 - 240/415			SP563P6	SP563C6	SP563R6	SP563B6
125	2p3w	250			3125P6W	3125C6W	3125R6W	3125B6W
	3p4w	380/415			4125P6W	4125C6W	4125R6W	4125B6W
	4p5w	220/380- 240/415			5125P6W	5125C6W	5125R6W	5125B6W

*Consult the factory for availability before placing your order. These are specialty order items and are not regularly stocked.

†This device has North American 30 Amp construction and is used in refrigerated-container applications.

IP 44 Splashproof Pin and Sleeve Devices

Leviton Splashproof Pin and Sleeve products comply with IEC 309-1 and 309-2. When splashing liquids and dirt can't be allowed to interfere with reliable, dependable connections in demanding industrial environments, these devices are the ideal choice.

Splashproof devices feature a rugged, insulated thermoplastic housing built to withstand impact. Clean brass pins provide long, reliable service life. Staggered contacts assure first make-last break grounding. Leviton splashproof devices are available in 20, 30 and 60 amp ratings.

When safety, ruggedness, performance, and firm locking are essential — and especially economy — turn to Leviton's Splashproof devices.

Ordering Information

Splashproof Devices*

AMPS	WIRING	VOLTAGE AC	CONNECTOR/RECEPTACLE	PLUG/INLET	PLUG	CONNECTOR	RECEPTACLE	INLET
20	2p3w	125			SP320P4	SP320C4	SP320R4	SP320B4
	2p3w	250			SP320P6	SP320C6	SP320R6	SP320B6
	3p4w	3Ø480			SP420P7	SP420C7	SP420R7	SP420B7
	4p5w	3ØY120/208			SP520P9	SP520C9	SP520R9	SP520B9
30	2p3w	250			SP330P6	SP330C6	SP330R6	SP330B6
	3p4w	3Ø250			SP430P9	SP430C9	SP430R9	SP430B9
	3p4w	3Ø480			SP430P7	SP430C7	SP430R7	SP430B7
60	3p4w	3Ø250			SP460P9	SP460C9	SP460R9	SP460B9
	3p4w	3Ø480			SP460P7	SP460C7	SP460R7	SP460B7
	4p5w	3ØY120/208			SP560P9	SP560C9	SP560R9	SP560B9

*Consult the factory for availability before placing your order. These are specialty order items and are not regularly stocked.

2 YEAR LIMITED
WARRANTY



BX230-V



BX100-V



PLG1

Back Boxes & Accessories

Valox® Back Boxes for Watertight Inlets & Receptacles

APPLICATION	CAT. NO.
20 & 30 AMP No Adapter Plate Required	BX230-V
60 AMP Adapter Plate Included	BX60-V
100 AMP Adapter Plate Included	BX100-V

*Lockout / Tagout for
Pin and Sleeve Devices*

APPLICATION	CAT. NO.
Can be used for any IEC 309-1 and 309-2 pin and sleeve plugs and inlets	PLG1

*Replacement Valox® Adapter
Plates for Leviton Back Boxes*

APPLICATION	CAT. NO.
20 & 30 AMP Splashproof Inlets & Receptacles	AP230
60 AMP Watertight or Splashproof Inlets & Receptacles	AP60
100 AMP Watertight or Splashproof Inlets & Receptacles	AP100

*Adapter Plates for Installing Leviton Inlets and
Receptacles in Hubbell Back Boxes*

APPLICATION	CAT. NO. ALUMINUM	CAT. NO. VALOX®
20 AMP, 3-wire Splashproof Inlets & Receptacles	AP320H	AP230
20 AMP, 4-5-wire Splashproof Inlets & Receptacles	AP420H	AP230
30 AMP Splashproof Inlets & Receptacles	AP30H	AP230
60 AMP Watertight or Splashproof Inlets & Receptacles	AP60H	AP60
100 AMP Watertight or Splashproof Inlets & Receptacles	AP100H	AP100

Protective Closure Caps for Plugs and Inlets

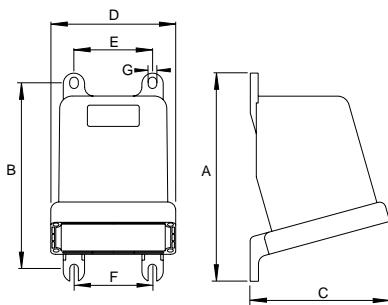
APPLICATION	CAT. NO. WATERTIGHT	CAT. NO. SPLASHPROOF
20 AMP, 3-wire	PC320	SPC320
20 AMP, 4-wire	PC420	SPC420
20 AMP, 5-wire	PC520	SPC520
30 AMP, 3-, 4-wire	PC3430	SPC3430
30 AMP, 5-wire	PC530	SPC530
All 60 AMP	PC60	---
All 100 AMP	PC100	---

*Replacement Watertight Closure
Cover Kit for Connectors and
Receptacles*

APPLICATION	CAT. NO.
20 AMP, 3-wire	CA320
20 AMP, 4-wire	CA420
20 AMP, 5-wire	CA520
30 AMP, 3-, 4-wire	CA343
30 AMP, 5-wire	CA530
All 60 AMP	CA060
All 100 AMP	CA100

*Replacement Watertight Locking
Ring for Plugs and Inlets*

APPLICATION	CAT. NO.
20 AMP, 3-wire	RA320
20 AMP, 4-wire	RA420
20 AMP, 5-wire	RA520
30 AMP, 3-, 4-wire	RA343
30 AMP, 5-wire	RA530
All 60 AMP	RA060
All 100 AMP	RA100



Dimensions for Valox® Back Boxes

		A	B	C	D	E	F	G
20 AMP & 30 AMP-1" HUB	inch	6.69	5.91	4.53	3.90	2.35	2.35	0.25
	mm	170.0	150.0	115.0	99.0	60.0	60.0	6.5
60 AMP-1½" HUB	inch	7.68	6.92	5.20	4.65	2.99	2.99	0.31
	mm	195.0	176.0	132.0	118.0	76.0	76.0	8.0
100 AMP-2" HUB	inch	8.23	7.39	6.30	5.71	3.99	3.33	0.33
	mm	209.0	188.0	160.0	145.0	101.0	84.5	8.5