

A309

3,4,5 contacts power connectors up to 100A

Amphenol

Oil & Gas Technologies



A309 (UL and CSA listed)

Datasheet <http://www.amphenol-industrial.com/c/images/datasheets/IDS-33%20Amphe-309.pdf>

3d Models <http://www.amphenol-industrial.com/literature/aogt-3d>

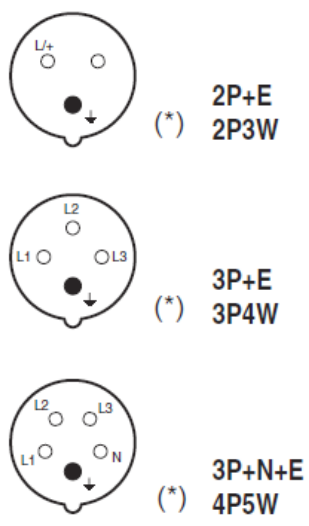
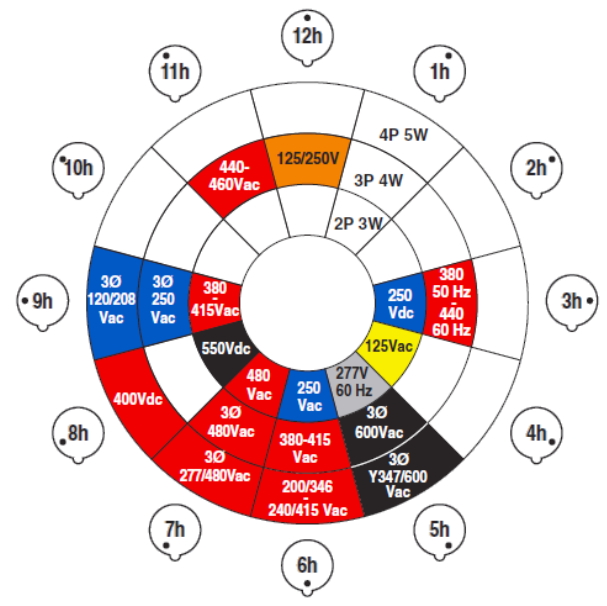
UL/CSA <http://www.amphenol-industrial.com/company/quality>

How To Order: A309



Number of Wires	2P+E 3P+E 3P+N+E	3 4 5
Amperage	16A 20A 30A 32A 60A 63A 100A 125A	16 20 30 32 60 63 100 125
Type	Plug, straight Connector Receptacle, straight Receptacle, surface Receptacle for Panel Mounting, straight Inlet, surface Inlet for Panel Mounting, straight	P C RS R BS B

SC PE SP MA LV MF	Modification Screw Terminals Perforating Terminals Spring Terminals Mantle Terminals Extra Low Voltage Minimized Flange
S W	Protection IP44 IP67
1 to 12	Clock Keyway position of female Grounding



RATED VOLTAGE	COLOUR
110-130V	Yellow
208-250V	Blue
380-480V	Red
500-690V	Black
277V	Grey
125/250V	Orange

- UL listed range
 - 20A
 - 30A
 - 60A
 - 100A

Amphe-309 UL listed

NEW



- **No Tools, No Screws**
 - Snap-on locking handle saves 75% on assembly time



- **Easy Single-Wiring Access point**
 - All terminal screws face in same direction



- **Easy gland**
 - Watertight onion ring bushing fits a wide variety of outside diameters.



IP67



IP44



Plugs and Connectors



Inlets



**Receptacles
Panel Mount**



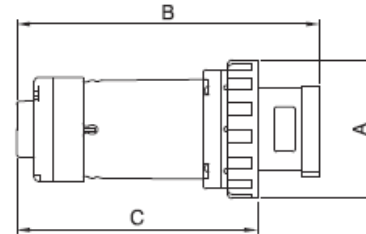
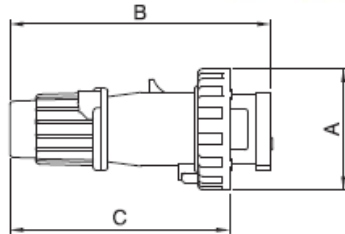
Accessories

A309-XXPXW -> PLUG STRAIGH WITH PINS IP67

PLUG

Safe Connections Standard

- Earth contacts make first, break last for safe connections even under load



PLUG IP67 16/20A AND 30/32A

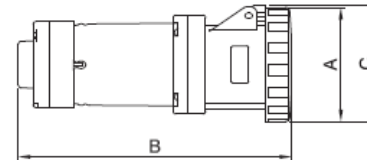
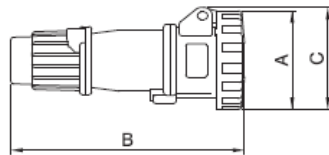
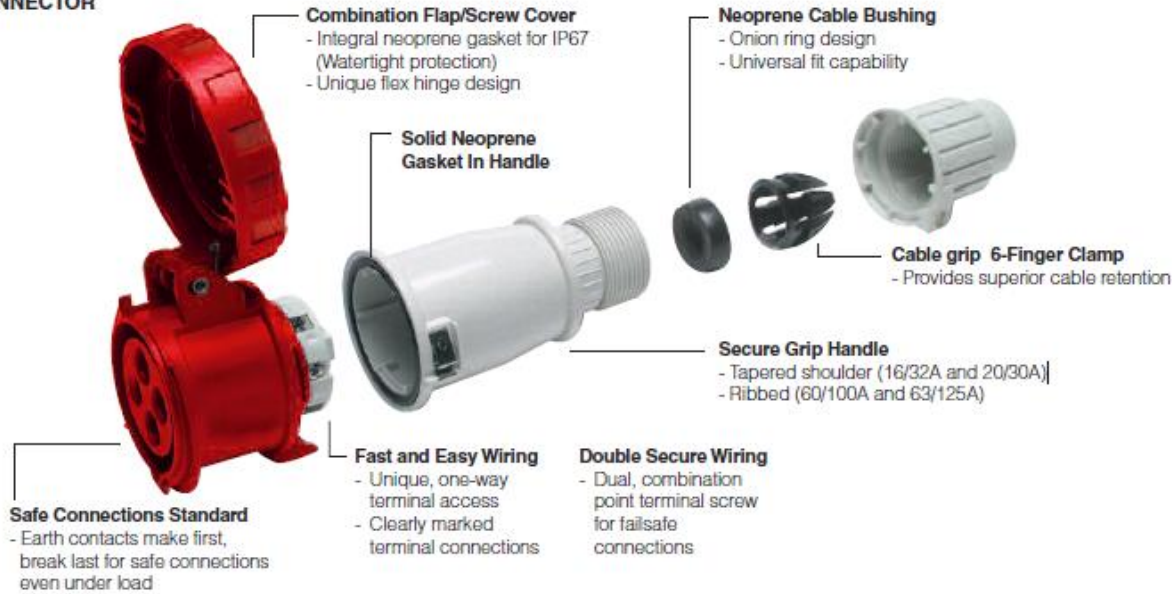
	A		B		C		Corp grip range	
	inches	mm	inches	mm	inches	mm	inches	mm
16/20A 2P3W	2.87	73	6.20	157	5.23	133	.570-.710	14-18
16/20A 3P4W	3.17	81	6.47	164	5.51	140	.570-.710	14-18
16/20A 4P5W	3.48	88	7.02	178	6.06	154	.570-.710	14-18
30/32A 2P3W	3.66	93	7.37	187	6.13	156	.675-.910	17-23
30/32A 3P4W	3.66	93	7.37	187	6.13	156	.675-.910	17-23
30/32A 4P5W	3.96	101	8.15	207	6.91	176	.675-.910	17-23

PLUG IP67 60/63A AND 100/125A

	A		B		C		Corp grip range	
	inches	mm	inches	mm	inches	mm	inches	mm
60/63A 2P3W	4.41	112	9.68	246	7.67	195	.937-1.375	24-35
60/63A 3P4W	4.41	112	9.68	246	7.67	195	.937-1.375	24-35
60/63A 4P5W	4.41	112	9.68	246	7.67	195	.937-1.375	24-35
100/125A 3P4W	5.06	129	12.16	309	9.83	250	1.265-1.790	32-45
100/125A 4P5W	5.06	129	12.16	309	9.83	250	1.265-1.790	32-45

A309-XXCXW -> RECEPTACLE CONNECTOR WITH SOCKETS IP67

CONNECTOR



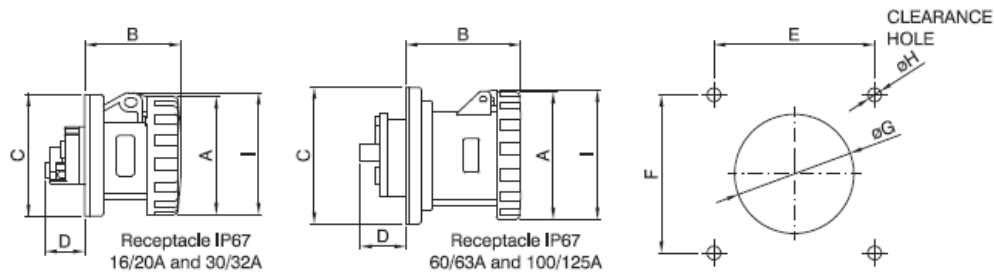
CONNECTOR IP67 16/20A AND 30/32A

	A		B		C		Corp grip range	
	inches	mm	inches	mm	inches	mm	inches	mm
16/20A 2P3W	2.87	73	6.75	171	2.97	75	570-710	14-18
16/20A 3P4W	3.17	81	7.04	179	3.28	83	570-710	14-18
16/20A 4P5W	3.48	88	7.62	194	3.75	95	570-710	14-18
30/32A 2P3W	3.66	93	8.04	204	4.04	103	675-910	17-23
30/32A 3P4W	3.66	93	8.04	204	4.04	103	675-910	17-23
30/32A 4P5W	3.96	101	8.83	224	4.03	102	675-910	17-23

CONNECTOR IP67 60/63A AND 100/125A

	A		B		C		Corp grip range	
	inches	mm	inches	mm	inches	mm	inches	mm
60/63A 2P3W	4.41	112	10.52	267	4.47	114	937-1.375	24-35
60/63A 3P4W	4.41	112	10.52	267	4.47	114	937-1.375	24-35
60/63A 4P5W	4.41	112	10.52	267	4.47	114	937-1.375	24-35
100/125A 3P4W	5.06	129	12.80	325	5.06	129	1.265-1.790	32-45
100/125A 4P5W	5.06	129	12.80	325	5.06	129	1.265-1.790	32-45

A309-XXRXW -> REPECTALCE FOR PANEL MOUNT WITH SOCKETS IP67



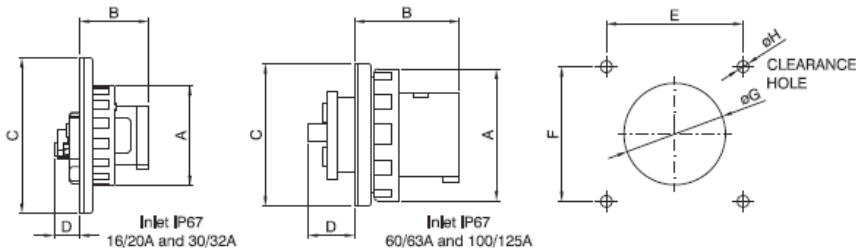
RECEPTACLE IP67 16/20A AND 30/32A

	A		B		C		D		E		F		G		H		I	
	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm
16/20A 2P3W	2.87	73	2.32	59	2.97	.76	.94	24	2.36	60	2.36	60	2.38	60	.219	5.5	2.97	75
16/20A 3P4W	3.17	81	2.34	60	2.97	.76	.94	24	2.36	60	2.36	60	2.38	60	.219	5.5	3.28	83
16/20A 4P5W	3.48	88	2.37	60	2.97	.76	.94	24	2.36	60	2.36	60	2.38	60	.219	5.5	3.75	95
30/32A 2P3W	3.66	93	2.79	71	2.97	.76	1.52	39	2.36	60	2.36	60	2.38	60	.219	5.5	4.04	103
30/32A 3P4W	3.66	93	2.79	71	2.97	.76	1.52	39	2.36	60	2.36	60	2.38	60	.219	5.5	4.04	103
30/32A 4P5W	3.96	101	2.81	71	2.97	.76	1.52	39	2.36	60	2.36	60	2.38	60	.219	5.5	4.03	102

RECEPTACLE IP67 60/63A AND 100/125A

	A		B		C		D		E		F		G		H		I	
	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm
60/63A 2P3W	4.41	112	4.16	106	4.50	114	1.68	43	3.87	98	3.87	98	3.25	83	.282	7.2	4.47	114
60/63A 3P4W	4.41	112	4.16	106	4.50	114	1.68	43	3.87	98	3.87	98	3.25	83	.282	7.2	4.47	114
60/63A 4P5W	4.41	112	4.16	106	4.50	114	1.68	43	3.87	98	3.87	98	3.25	83	.282	7.2	4.47	114
100/125A 3P4W	5.06	129	4.52	115	5.50	140	1.94	49	4.87	124	4.87	124	3.75	95	.282	7.2	5.06	129
100/125A 4P5W	5.06	129	4.52	115	5.50	140	1.94	49	4.87	124	4.87	124	3.75	95	.282	7.2	5.06	129

A309-XXBXW -> INLET RECEPTACLE WITH PINS IP67



INLET IP67 16/20A AND 30/32A

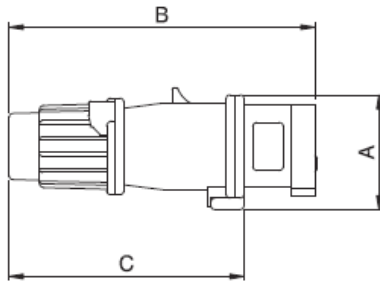
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	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm
16/20A 2P3W	2.87	73	1.96	50	4.50	114	.75	19	3.87	98	3.87	98	2.38	60	.282	7.2
16/20A 3P4W	3.17	81	1.96	50	4.50	114	.75	19	3.87	98	3.87	98	2.38	60	.282	7.2
16/20A 4P5W	3.48	88	1.96	50	4.50	114	.75	19	3.87	98	3.87	98	2.38	60	.282	7.2
30/32A 2P3W	3.66	93	2.32	59	4.50	114	1.32	34	3.87	98	3.87	98	2.38	60	.282	7.2
30/32A 3P4W	3.66	93	2.32	59	4.50	114	1.32	34	3.87	98	3.87	98	2.38	60	.282	7.2
30/32A 4P5W	3.96	101	2.32	59	4.50	114	1.32	34	3.87	98	3.87	98	2.38	60	.282	7.2

INLET IP67 60/63A AND 100/125A

	A		B		C		D		E		F		G		H	
	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm
60/63A 2P3W	4.41	112	3.44	87	4.50	114	1.68	43	3.87	98	3.87	98	3.25	83	.282	7.2
60/63A 3P4W	4.41	112	3.44	87	4.50	114	1.68	43	3.87	98	3.87	98	3.25	83	.282	7.2
60/63A 4P5W	4.41	112	3.44	87	4.50	114	1.68	43	3.87	98	3.87	98	3.25	83	.282	7.2
100/125A 3P4W	5.06	129	3.88	99	5.50	140	1.94	49	4.87	124	4.87	124	3.75	95	.282	7.2
100/125A 4P5W	5.06	129	3.88	99	5.50	140	1.94	49	4.87	124	4.87	124	3.75	95	.282	7.2

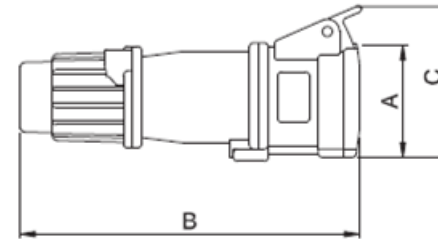
A309-XXPXS

-> PLUG STRAIGHT WITH PINS IP44



A309-XXCXS

-> RECEPTACLE CONNECTOR WITH SOCKETS IP44



PLUG IP44

	A		B		C		Corp Grip Range	
	Inches	mm	Inches	mm	Inches	mm	Inches	mm
16/20A 2P3W	2.26	58	6.20	157	4.76	121	.570-710	14-18
16/20A 3P4W	2.52	64	6.47	164	5.04	128	.570-710	14-18
16/20A 4P5W	2.85	73	7.02	178	5.58	142	.570-710	14-18
30/32A 2P3W	2.85	73	7.37	187	5.58	142	.675-910	17-23
30/32A 3P4W	2.85	73	7.37	187	5.58	142	.675-910	17-23
30/32A 4P5W	3.13	80	8.15	207	6.36	162	.675-910	17-23

PLUG IP44

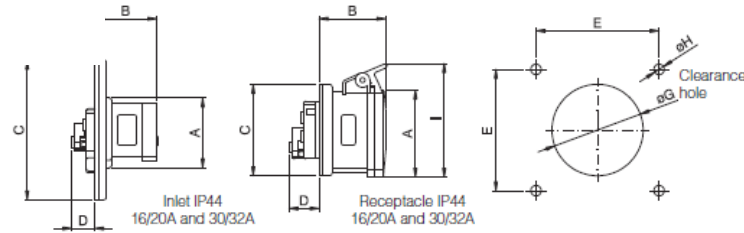
	A		B		C		Corp Grip Range	
	Inches	mm	Inches	mm	Inches	mm	Inches	mm
16/20A 2P3W	2.18	55	6.53	166	3.07	73	.570-710	14-18
16/20A 3P4W	2.43	62	6.83	173	3.33	80	.570-710	14-18
16/20A 4P5W	2.81	71	7.41	188	3.79	91	.570-710	14-18
30/32A 2P3W	2.81	71	7.81	198	3.79	91	.675-910	17-23
30/32A 3P4W	2.81	71	7.81	188	3.79	91	.675-910	17-23
30/32A 4P5W	3.09	79	8.62	219	4.17	101	.675-910	17-23

A309-XXBXS

-> INLET RECEPTACLE WITH PINS IP44

A309-XXRXS

-> RECEPTACLE FOR PANEL W/ SOCKETS IP44



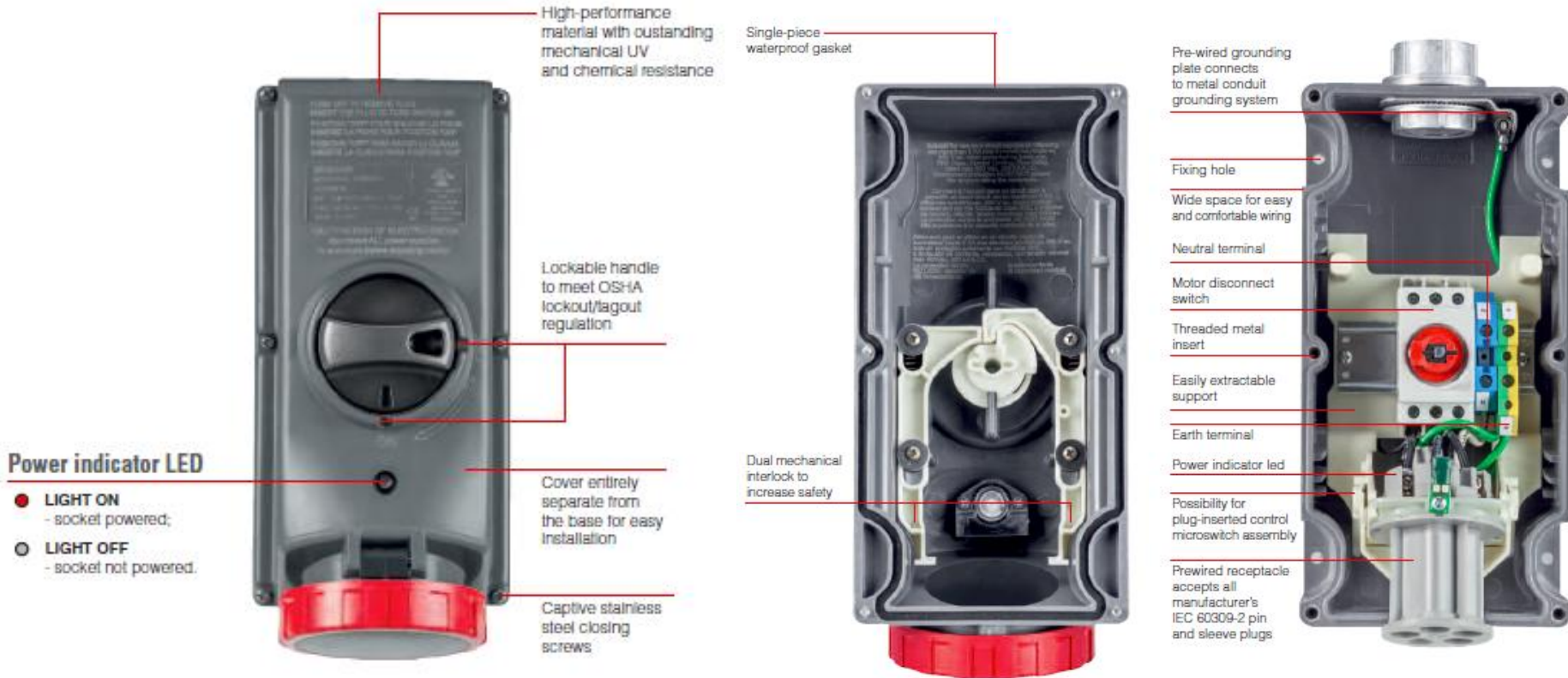
INLET IP44

	A		B		C		D		E		F		G		H	
	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm
16/20A 2P3W	2.26	58	1.96	50	4.50	114	.75	19	3.87	98	3.87	98	2.38	60	.282	7.2
16/20A 3P4W	2.52	64	1.96	50	4.50	114	.75	19	3.87	98	3.87	98	2.38	60	.282	7.2
16/20A 4P5W	2.85	73	1.96	50	4.50	114	.75	19	3.87	98	3.87	98	2.38	60	.282	7.2
30/32A 2P3W	2.85	73	2.32	59	4.50	114	1.32	34	3.87	98	3.87	98	2.38	60	.282	7.2
30/32A 3P4W	2.85	73	2.32	59	4.50	114	1.32	34	3.87	98	3.87	98	2.38	60	.282	7.2
30/32A 4P5W	3.13	80	2.32	59	4.50	114	1.32	34	3.87	98	3.87	98	2.38	60	.282	7.2

RECEPTACLE IP44

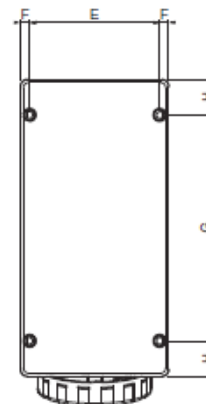
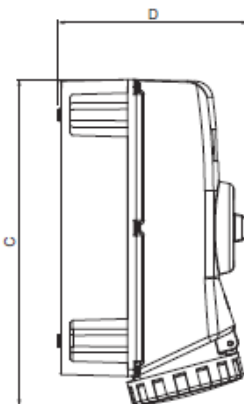
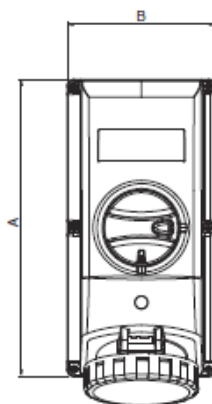
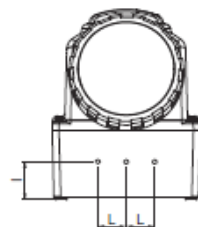
	A		B		C		D		E		F		G		H		I	
	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm	Inches	mm
16/20A 2P3W	2.18	55	2.11	54	2.97	76	0.94	24	2.36	60	2.36	60	2.38	60	.219	5.5	3.07	73
16/20A 3P4W	2.43	62	2.13	54	2.97	76	0.94	24	2.36	60	2.36	60	2.38	60	.219	5.5	3.33	80
16/20A 4P5W	2.81	71	2.17	55	2.97	76	0.94	24	2.36	60	2.36	60	2.38	60	.219	5.5	3.79	91
30/32A 2P3W	2.81	71	2.56	65	2.97	76	1.52	39	2.36	60	2.36	60	2.38	60	.219	5.5	3.79	91
30/32A 3P4W	2.81	71	2.56	65	2.97	76	1.52	39	2.36	60	2.36	60	2.38	60	.219	5.5	3.79	91
30/32A 4P5W	3.09	79	2.60	66	2.97	76	1.52	39	2.36	60	2.36	60	2.38	60	.219	5.5	4.17	101

A309-XXMXW Mechanical Interlocks IP67



A309-XXMXW

Mecanical Interlocks IP67



VERSION		A	B	C	D	E	F	G	H	I	L
2P+E	20A	260	130	280	167	114	8	198	31	33.5	25
3P+E	20A	260	130	282	167	114	8	198	31	33.5	25
3P+N+E	20A	260	130	282	167	114	8	198	31	33.5	25
2/3P+E	30A	260	130	285	167	114	8	198	31	33.5	25
3P+N+E	30A	260	130	286	167	114	8	198	31	33.5	25
2P+E	60A	380	170	420	206	150	10	310	35	40	32.5
3P+E	60A	380	170	420	206	150	10	310	35	40	32.5
3P+N+E	60A	380	170	420	206	150	10	310	35	40	32.5

■ TECHNICAL CHARACTERISTICS

Rated current:	20A-30A-60A
Rated voltage:	100÷600V-
Frequency:	50÷60Hz
Insulating voltage:	500/690V-
Protection degree:	IP66/IP67/IP69 (UL 94 type 3R, 4/4X, 12)
Operating ambient temperature according to the reference standard:	-25°C +40°C
Minimum operating ambient temperature:	-40°C
Max. operating ambient temperature:	+70°C
Self-extinguishing GW test:	960°C
Self-extinguishing UL94:	V0
Material:	Thermosetting
IK degree at 20°C:	IK10 (20J)
Colour:	Grey RAL7037

EX309 Zone 1



NEW

- **Specs**

- 16A, 32A, 63A, 125A
- 3,4 & 5 Pins
- -50c up to 60c *
- 690 V
- Ex II 2GD (Atex/ IECEx - Zone 1)
 - Ex d e IIC
 - Ex tb IIIC
- IP66



- **Extra Features**

- Plug Mates to Standard IEC60309 socket
- IEC60309 Plug doesn't mate EX309 Receptacle
- EX309 Switched interlock doesn't go ON without full mated EX309 plug
- EX309 Plug doesn't unmate while Switch its ON