

Enclosed disconnect switches

Enclosed fusible and non-fusible disconnect switches up to 100 A

EDITION 2



When **energy** matters

Enclosed disconnect switches

Non-fusible disconnect switches, fusible disconnect switches & transfer switches up to 1200 A



UL / NEMA 4, 4X
Glass reinforced polyester
Ref. 221E 3903

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UL / NEMA 1, 3, 3R, 12, 4, 4X
Polycarbonate
Ref. 2214 3503

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UL / NEMA 4, 4X
Stainless steel
Ref. 221X 3903

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UL / NEMA 3R, 12
Painted steel
Ref. 30VC 3003

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Function

Enclosed disconnect switches range are used as:

- The NEC required motor disconnect upstream from the motor.
- Main disconnecting means, fusible and non-fusible.
- OSHA Lock Out / Tag Out devices to isolate a load for maintenance, service or repair.
- Transferring low voltage circuits on load.

Advantages

A flexible range

- Designed for normal as well as difficult or harsh environments (wash down, mechanical impacts, corrosion...).
- UL / NEMA rated enclosures up to 1, 3R, 12, 4, 4X.
- Metallic and nonmetallic enclosures.
- Compact design.
- For applications up to 1200 A.

High switching performance, simple wiring

- High short-circuit rating.
- Reliable switching technology.
- Large terminals.

Robust and ergonomic handle

- Red/Yellow handle (available in black).
- Painted steel enclosure are equipped with heavy duty handle with metallic padlock hasp.
- Clear On - Off positions indication.
- 3 padlocks capability.
- Door interlocking in ON position and padlocked in OFF position.
- Defeatable door interlock in ON position. (The interlocking is automatically reactivated when the door is closed, except for polycarbonate boxes up to 60A).

The solution for

- > Industrial control systems



Strong points

Suitable for use as :

- > Manual motor controller
- > OSHA Lockout/Tagout disconnects
- > Safety switches
- > Emergency power electrical installations

Conformity to standards⁽¹⁾

- > cULus 508A
- > UL 508 listed guide NLRV file E173959
- > UL489 guide WJAZ file E255272
- > UL98 guide WHTY file E201138



- > CSA



- > IEC versions available



⁽¹⁾ Product reference on request.

Enclosed disconnect switches

Non-fusible disconnect switches, fusible disconnect switches and transfer switches
up to 1200 A

Applications and range overview



Heavy duty industry



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Food and beverage processing



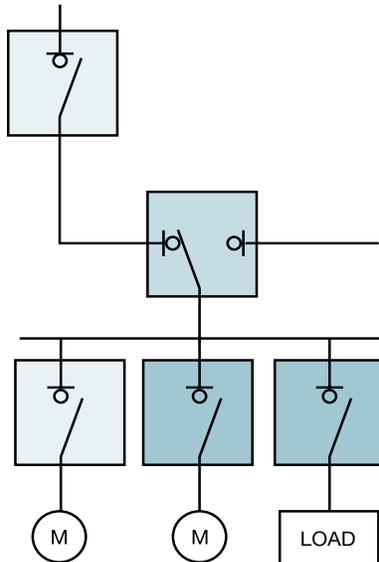
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Machinery and safety



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	Rating (A)	Switch	Enclosure	UL / NEMA
Service Entrance Disconnect or Branch Disconnect	100 A non-fusible	SIRCO M (UL 98)	Polycarbonate Polyester Stainless steel	1, 3, 3R, 12, 4, 4X 4, 4X
	Up to 1200 A non-fusible	SIRCO (UL 98)	Painted steel	3R, 12
	Up to 800 A fusible	FUSERBLOC (UL 98)		
Transfer switch	Up to 400 A non-fusible	SIRCOVER (UL 1008)	Painted steel	3R, 12
	Up to 1200 A non-fusible	SIRCOVER (UL 98)		
Manual motor Disconnect	Up to 60 A non-fusible	SIRCO M (UL 60947-4-1) ⁽¹⁾	Painted steel	3R, 12
			Polycarbonate	1, 3, 3R, 12, 4, 4X
			Polyester	4, 4X
			Stainless steel	4, 4X

(1) Meets the requirements of the standard UL508.

Enclosed disconnect switches

Non-fusible disconnect switches, fusible disconnect switches and transfer switches
up to 1200 A

References

Non-fusible disconnect switch, suitable for use as motor disconnect and service entrance disconnect

UL / NEMA enclosure, 3-pole, 600 VAC, non-fusible

					
Approvals	Rating (A)	UL / NEMA 3R, 12 ⁽²⁾ Painted steel color ANSI 61 gray	UL / NEMA 1, 3R, 12, 4, 4X Glass reinforced polyester color RAL 7035 light-gray	UL / NEMA 1, 3R, 12, 4, 4X Stainless steel (304) brushed finish	UL / NEMA 1, 3, 3R, 12, 4, 4X Polycarbonate color RAL 7035 light-gray
cULus 60947-4-1	30 ⁽¹⁾	221M 3703	221E 3903	221X 3903	2214 3503
	60 ⁽¹⁾	222M 3706	222E 3906	222X 3906	2224 3506
cULus 508A	100	30UC 3010	30UL 3010	30UF 3010	30UJ 3010
	200	30UC 3020	-	-	-
	400	30UC 3040	-	-	-
	600	30UC 3060	-	-	-
	800	30UC 3080	-	-	-
	1200	30UC 3120	-	-	-

(1) Suitable for motor disconnect.

(2) Handle with metallic padlocking hasp.

(3) UL 98

(4) 30 A in large 60 A enclosure

Standard accessories - when ordered separately

Rating (A)	Auxiliary contacts	Unswitched neutral pole	Switched fourth pole	Terminal shrouds / screens	
				3 P	1 P
30	1 AC NO + NC 2299 0001 ⁽⁶⁾	2200 5005	2200 1003	2294 3005 ⁽²⁾	2294 1005 ⁽²⁾
60		2200 5009	2200 1006 ⁽¹⁾	2294 3009 ⁽²⁾	2294 1009 ⁽²⁾
100	1 AC 2 NC 2299 0011 ⁽⁶⁾	2200 5011	2200 1010	2294 3016 ⁽²⁾	2294 1011 ⁽²⁾
200				2798 3021 ⁽³⁾	2798 8021 ⁽⁴⁾
400	1 st AC NO + NC 2799 0021	30AC 0102 ⁽⁷⁾		2798 3041 ⁽³⁾	2798 8041 ⁽⁴⁾
600		30AC 0104 ⁽⁷⁾		2798 3060 ⁽⁵⁾	
800	2 nd AC NO + NC 2799 0022	30AC 0106 ⁽⁷⁾		2798 3120 ⁽⁵⁾	
1200		30AC 0108 ⁽⁷⁾			

(1) Not UL.

(2) Top or bottom.

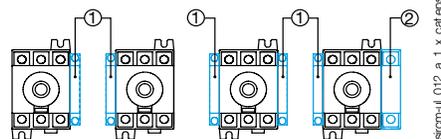
(3) Top.

(4) Bottom.

(5) Load side screen, the line side is included with the switch.

(6) Not UL only for rating 100 A.

(7) UL components



Configuration of the auxiliary contacts for enclosed SIRCO M.

1. M type auxiliary contacts.

2. Additional pole.

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Enclosed disconnect switches

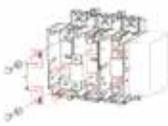
Non-fusible disconnect switches, fusible disconnect switches and transfer switches
up to 1200 A

Fusible disconnect switch, fuse class CC, J and L suitable for use as motor disconnect and service entrance disconnect

UL / NEMA enclosure, 3-pole, 600 VAC, fusible⁽¹⁾

Standard accessories - when ordered separately

			
Approvals	Rating (A)	Fuse type	UL / NEMA 3R, 12 ⁽²⁾ Painted Steel color ANSI 61 gray
cULus 508A	30	CC	30VC 3A03
	30	J	30VC 3003
	60		30VC 3006
	100		30VC 3010
	200		30VC 3020
	400		30VC 3040
	600	30VC 3060	
800	L	30VC 3080	

			
Unswitched neutral pole	Class T fuses adapter	U-type auxiliary contacts	Terminal shrouds / screens
-	-	1 AC NO 3999 0701	As standard
-	-		
30AC 0102	3729 8010	1 AC NC 3999 0702	3898 3020 ⁽³⁾
30AC 0104	3729 8020		3898 3040 ⁽³⁾
30AC 0106	3729 8060		3898 3080 ⁽⁴⁾
30AC 0108	3729 8080		

(1) Fuses not included.

(2) Handle with metallic padlocking hasp.

(3) Top or bottom.

(4) Load side screen, the line side is included with the switch.

Transfer switch

UL / NEMA enclosure, 3-4 poles, 600 V, non-fusible

Standard accessories - when ordered separately

			
Approvals	Rating (A)	UL / NEMA 3R, 12 ⁽¹⁾ Painted Steel color ANSI 61 gray	
		3 P	4 P
UL 1008	100	30WC 3010	30WC 4010
	200	30WC 3020	30WC 4020
	400	30WC 3040	30WC 4040
cULus 508A	600	30WC 3060	30WC 4060
	800	30WC 3080	30WC 4080
	1200	30WC 3120	30WC 4120

			
Unswitched neutral pole	Auxiliary contacts	3 P	4 P
30AC 0102	1 AC NO/NC on position 1 and 2 4159 0021	4158 3021	4158 4021
30AC 0104		4158 3041	4158 4041
30AC 0106	NO/NC on position 1 and 2 As standard	1609 3063	1609 4063
30AC 0108		1609 3080	1609 4080
30AC 0112			

(1) Handle with metallic padlocking hasp.

Enclosed disconnect switches

Non-fusible disconnect switches, fusible disconnect switches and transfer switches
up to 1200 A

Characteristics

Non-fusible disconnect switch - Characteristics according to UL 60947-4-1 and UL 98/CSA 22.2#4

General use rating (A)	Motor disconnect		Service disconnect, non-fusible					
	30	60	100	200	400	600	800	1200
Short circuit at 600 VAC (kA)	65	50/65	25 (100)	200	200	200	100	100
Type of fuse	J	J	J	J	J	J	L	L
Max rating (A)	30	100/60	100	200	400	600	800	1200
Max. motor hp / FLA 3 ph motor max.								
208 VAC	7.5 / 24.2	15 / 46.2	-	-	-	-	-	-
220-240 VAC	7.5 / 22	20 / 54	20 / 54	75 / 192	125 / 312	200 / 480	200 / 480	200 / 480
440-480 VAC	20 / 27	40 / 52	50 / 65	150 / 180	250 / 302	400 / 477	500 / 590	500 / 590
600 VAC	25 / 27	40 / 41	50 / 52	200 / 192	350 / 336	350 / 336	500 / 472	500 / 472
Connection terminals								
Min. connection section / AWG	#14 - #14	#14 - #1	#12 - #10	#6 - 300MCM	#2 - 600MCM	#2 - 600MCM	#2 - 600MCM	#2 - 600MCM
Max. connection section / AWG	2x (#14 - #12)	2x (#10 - #6)	-	-	2x (#6-350MCM)	2x (#2-600MCM)	4x (#2-600MCM)	4x (#2-600MCM)
Mechanical characteristics								
Endurance (number of cycles)	10 000	10 000	10 000	8 000	6 000	6 000	3 500	3 500
Operating torque (lbs.in/Nm)	7 / 0.8	8.9 / 1	12.4 / 1.4	88.5 / 10	128.3 / 14.5	327.5 / 37	442.5 / 50	442.5 / 50
Auxiliary contacts								
Electrical characteristics	A300	A300	A300	A300	A300	A600	A600	A600

Fusible disconnect switch - Characteristics according to UL 98/CSA 22.2#4

General use rating (A)	30 ⁽¹⁾	30	60	100	200	400	600	800
Short circuit at 600 VAC (kA)	100	100	200	200	200	200	200	200
Type of fuse	CC	J	J	J	J	J	J	L
Max rating (A)	30	30	60	100	200	400	600	800
Max. motor hp / FLA 3 ph motor max.								
220-240 VAC	7.5 / 22	7.5 / 22	15 / 42	30 / 80	60 / 154	125 / 312	200 / 480	200 / 480
440-480 VAC	15 / 21	15 / 21	30 / 40	60 / 77	125 / 156	250 / 302	500 / 590	500 / 590
600 VAC	20 / 22	20 / 22	50 / 52	75 / 77	150 / 144	350 / 336	500 / 472	500 / 472
Connection terminals								
Min. connection section / AWG	#14 - #10	#14 - #10	#10 - #6	#10 - 2/0	#6 - 300MCM	#2 - 600MCM	#2 - 600MCM	#2 - 600MCM
Max. connection section / AWG	-	-	-	-	-	2x (#6-350MCM)	2x (#2-600MCM)	2x (#2-600MCM)
Mechanical characteristics								
Endurance (number of cycles)	10 000	10 000	10 000	10 000	8 000	6 000	5 000	5 000
Operating torque (lbs.in/Nm)	31 / 3.5	31 / 3.5	71 / 8	71 / 8	90 / 10.2	150 / 17	586 / 66.2	586 / 66.2
Auxiliary contacts								
Electrical characteristics	A600	A600	A600	A600	A600	A600	A600	A600

(1) UL 489.

Enclosed disconnect switches

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up to 1200 A

Transfer switch - Characteristics according to UL 1008

General use rating (A)	100 A	200 A	260 A	400 A	600 A	800 A	1200 A
Frame size	B4		B5		B6	B7	
Operation voltage 2 P - 3/4 P	240/600	240/600	240/600	240/600	-/600	-/600	-/600
Short circuit rating at 600 VAC with fuses (kA)							
Short circuit rating at 600 VAC (kA)	100	100	65	65	100	100	100
Type of fuse	J	J	J	J	L	L	L
Max fuse rating (A)	200	400	600	600	800	1000	1600
Short circuit rating at 600 VAC with "Specific Circuit Breaker" (kA)							
Square D JJ breaker 250 A - 2 P 240 VAC - 3/4 P 480 VAC	65	65	-	-	-	-	-
Schneider Electric NSX-F 160 A - 3/4 P 480 VAC	35	-	-	-	-	-	-
Short circuit rating at 600 VAC with "Any Breaker" (kA)							
Short circuit rating (kA)	10	10	14	14	35	35	35
Short circuit capacity (ms)	25	25	50	50	50	50	50
Rated operational current							
240 VAC "Total System" (A)	100	200	260	400	400	700	700
240 VAC resistive load (A)	100	200	260	400	600	800	1200
480 VAC "Total System" (A)	100	100	260	400	350	600	600
480 VAC resistive load (A)	100	200	260	400	600	800	1200
600 VAC "Total System" (A)	100	100	200	200	-	-	-
600 VAC resistive load (A)	100	200	260	400	600	800	1200
Mechanical endurance							
Endurance (number of operating cycles)	6050	6050	6050	4050	3050	3050	3050
Connection terminals							
Min. connection section / AWG	#6	#6	#4 / 2 X 1 / 0	#4 / 2 X 1 / 0	2 x #2	2 x #2	4 x #2
Max. connection section / AWG	300MCM	300MCM	600MCM / 2 X 250MCM	600MCM / 2 X 250MCM	2x 600MCM	2x 600MCM	4 x 600MCM

Transfer switch - Characteristics according to UL 98/CSA 22.2#4

General use rating at 600 VAC and 250 VDC (A)	Specific reference upon request				600 A	800 A	1200 A
Frame size					B6	B7	
Short-circuit rating at 600 VAC (kA)	-	-	-	-	200	100	100
Type of fuse	-	-	-	-	J	L	L
Max. fuse rating (A)	-	-	-	-	600	800	1200
Max. motor, hp / FLA 3 ph motor max.							
220-240 VAC	-	-	-	-	200 / 480	-	-
440-480 VAC	-	-	-	-	400 / 477	-	-
600 VAC	-	-	-	-	500 / 472	-	-
Mechanical characteristics							
Endurance (number of operating cycles)	-	-	-	-	5000	3500	2500
Operating torque (lbs.in/Nm)	-	-	-	-	327.5/37	442.5/50	442.5/50
Auxiliary contacts							
Electrical characteristics	A300	A300	A300	A300	A300	A300	A300

Enclosed disconnect switches

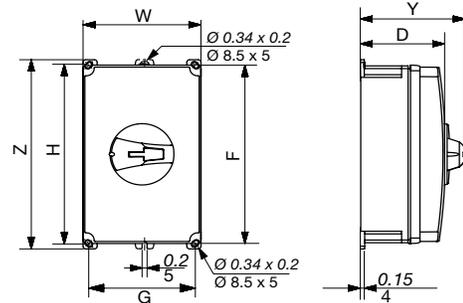
Non-fusible disconnect switches, fusible disconnect switches and transfer switches
up to 1200 A

Dimensions (in/mm)

UL / NEMA enclosure 1, 3, 3R, 12, 4, 4X - polycarbonate

Non-fusible disconnect switch up to 100 A

Rating (A)	Unit	H	W	D	G	F	Y	Z	Weight (lbs)
0 ... 30	in	5.9	3.9	3.62	0	6	4.37	6.38	4.4
	mm	150	99	92	0	152.5	111	162	
0 ... 60	in	7.8	4.94	3.62	4.45	7.32	4.37	8.27	6.6
	mm	198	125.5	92	113	186	111	210	
0 ... 100	in	11.81	8.27	5.35	7.44	9.37	7.12	11.81	9
	mm	300	210	136	189	238	181	300	

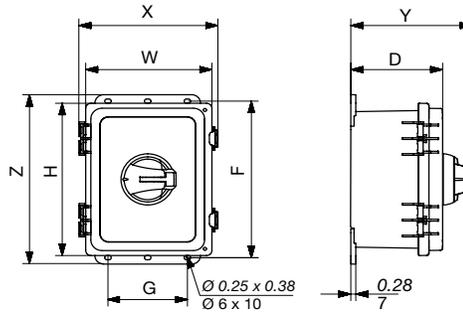


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UL / NEMA enclosure 1, 3R, 12, 4, 4X - glass reinforced polyester

Non-fusible disconnect switch up to 100 A

Rating (A)	Unit	H	W	D	G	F	X	Y	Z	Weight (lbs)
0 ... 30	in	7.12	7.24	5.27	4.56	7.36	7.99	6.97	8.15	4.4
	mm	181	184	134	116	187	203	177	207	
0 ... 60	in	9.13	7.24	5.27	4.56	9.37	7.99	6.97	10.16	6.6
	mm	232	184	134	116	238	203	177	258	
0 ... 100	in	12.08	11.23	7.28	8.56	13.34	12.05	8.97	14.08	11
	mm	307	285	185	217	339	306	228	358	

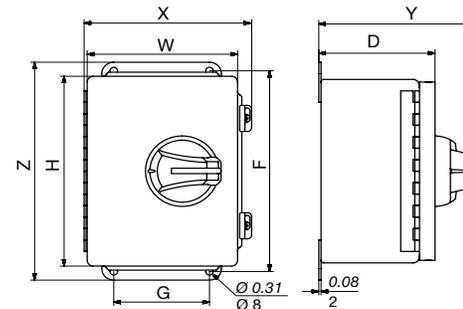


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UL / NEMA enclosure 1, 3R, 12, 4, 4X - stainless steel (304)

Non-fusible disconnect switch up to 100 A

Rating (A)	Unit	H	W	D	G	F	X	Y	Z	Weight (lbs)
0 ... 30	in	6.29	6.26	4.84	4	6.75	6.97	6.38	7.50	4.4
	mm	159	159	123	102	171	177	162	191	
0 ... 60	in	8.26	6.26	4.84	4	8.75	6.97	6.38	9.50	6.6
	mm	210	159	123	102	222	177	162	241	
0 ... 100	in	12	10	6	8	12.75	11	8.4	13.5	12
	mm	305	254	152	203	324	280	213	343	

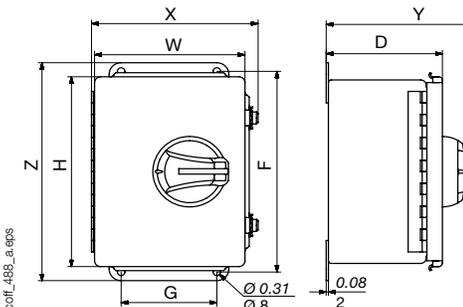


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UL / NEMA enclosure 1, 3R, 12 - painted steel

Non-fusible disconnect switch up to 100 A

Rating (A)	Unit	H	W	D	G	F	X	Y	Z	Weight (lbs)
0 ... 30	in	6.0	6.0	4.8	4.0	6.8	6.9	6.6	7.5	6
	mm	152.4	152.4	120.7	101.6	171.5	176.3	167.6	190.5	
0 ... 60	in	8.0	6.0	4.8	4.0	8.8	6.9	6.6	9.5	7
	mm	203.2	152.4	120.7	101.6	222.3	176.3	167.6	241.3	
0 ... 100	in	12.0	10.0	6.8	8.0	12.8	10.9	8.6	13.5	16
	mm	304.8	254.0	171.5	203.2	323.9	277.9	218.4	342.9	



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Fusible disconnect switch up to 100 A

Rating (A)	Unit	H	W	D	G	F	X	Y	Z	Weight (lbs)
0 ... 30	in	10.0	8.0	6.8	6.0	10.8	8.9	8.8	11.5	11
	mm	254.0	203.2	171.5	152.4	273.1	227.1	223.5	292.1	
0 ... 60	in	12.0	10.0	8.8	8.0	12.8	10.9	10.4	13.5	18
	mm	304.8	254.0	222.3	203.2	323.9	277.9	264.2	342.9	
0 ... 100	in	14.0	12.0	8.8	10.0	14.8	12.9	10.4	15.5	24
	mm	355.6	304.8	222.3	254.0	374.7	328.7	264.2	393.7	

Enclosed disconnect switches

Non-fusible disconnect switches, fusible disconnect switches and transfer switches
up to 1200 A

UL / NEMA enclosure 1, 3R, 12 - painted steel

Non-fusible disconnect switch > 100 A

Rating (A)	Unit	H	W	D	G	F	X	Y	Z	Weight (lbs)
200	in	24.0	16.0	6.8	14.0	24.8	16.9	8.6	25.5	80
	mm	609.6	406.4	171.5	355.6	628.7	430.3	218.4	647.7	
400	in	30.0	20.0	10.8	18.0	30.8	20.9	12.6	31.5	115
	mm	762.0	508.0	273.1	457.2	781.1	531.9	320.0	800.1	
600	in	42.0	24.0	12.8	22.0	42.8	24.9	15.3	43.5	230
	mm	1066.8	609.6	323.9	558.8	1085.9	633.5	387.9	1104.9	
800 ... 1200	in	60.0	36.0	12.8	34.0	60.8	36.9	15.3	61.5	332
	mm	1524.0	914.4	323.9	863.6	1543.1	938.3	387.9	1562.1	

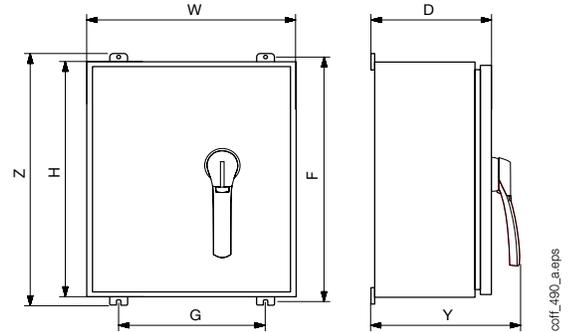
Fusible disconnect switch > 100 A

Rating (A)	Unit	H	W	D	G	F	Y	Z	Weight (lbs)	
200 A	in	24.0	20.0	10.8	18.0	24.8	20.9	12.6	25.5	92
	mm	609.6	508.0	273.1	457.2	628.7	531.9	320.0	647.7	
400 A	in	42.0	32.0	12.8	30.0	42.8	32.9	14.6	43.5	200
	mm	1066.8	812.8	323.9	762.0	1085.9	836.7	370.8	1104.9	
600 A	in	48.0	36.0	12.8	34.0	48.8	36.9	15.3	49.5	268
	mm	1219.2	914.4	323.9	863.6	1238.3	938.3	387.9	1257.3	
800 A	in	60.0	36.0	12.8	34.0	60.8	36.9	15.3	61.5	332
	mm	1524.0	914.4	323.9	863.6	1543.1	938.3	387.9	1562.1	

Transfer switch ≥ 100 A

Rating (A)	Unit	H	W	D	G	F	Y	Z	Weight (lbs)	
100 ... 200	in	24.0	20.0	10.8	18.0	24.8	20.9	12.6	25.5	95
	mm	609.6	508.0	273.1	457.2	628.7	531.9	320.0	647.7	
400	in	30.0	24.0	16.8	22.0	30.8	24.9	19.3	31.5	185
	mm	762.0	609.6	425.5	558.8	781.1	633.5	489.5	800.1	
600	in	48.0	36.0	20.8	34.0	48.8	36.9	23.3	49.5	321
	mm	1219.2	914.4	527.1	863.6	1238.3	938.3	591.1	1257.3	
800 ... 1200	in	60.0	36.0	20.8	34.0	60.8	36.9	23.3	61.5	460
	mm	1524.0	914.4	527.1	863.6	1543.1	938.3	591.1	1562.1	

Note: dimensions are subject to change. Please consult us for verification.



Model: SOCOMEC
Production: SOCOMEC
Photography: Martin Bernhart and Studio Objectif
Printing:

Socomec: our innovations supporting your energy performance

1 independent manufacturer

3,600 employees
worldwide

10 % of sales revenue
dedicated to R&D

400 experts
dedicated to service provision

Your power management expert



POWER
SWITCHING



POWER
MONITORING



POWER
CONVERSION



ENERGY
STORAGE



EXPERT
SERVICES

The specialist for critical applications

- Control, command of LV facilities
- Safety of persons and assets
- Measurement of electrical parameters
- Energy management
- Energy quality
- Energy availability
- Energy storage
- Prevention and repairs
- Measurement and analysis
- Optimization
- Consultancy, commissioning and training

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- France (x3)
- Italy (x2)
- Tunisia
- India
- China (x2)
- USA (x3)

28 subsidiaries and commercial locations

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- Dubai (United Arab Emirates) • France • Germany
- India • Indonesia • Italy • Ivory Coast • Netherlands
- Poland • Portugal • Romania • Singapore • Slovenia
- South Africa • Spain • Switzerland • Thailand
- Tunisia • Turkey • UK • USA

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