

# Enclosed Circuit Breakers

## NEMA 1 General Purpose

**Surface or Flush Mounting  
15-1200 Ampere Range  
600 Volts Ac, 500 Volts Dc**

NEMA 1 enclosed breakers are designed for indoor use in commercial buildings, apartment buildings and other areas where a general purpose enclosure is applicable. The breaker is front operable and is capable of being padlocked in the Off position. (Padlocking not available on enclosures for Quicklag® breakers.)

Ratings through 1200 amperes are listed with Underwriters Laboratories, Inc. as suitable for service entrance application. Both surface and flush mounted enclosures are available.



**UL File Number E7819  
CSA File Number LR84319**

## NEMA 3R Rainproof Surface Mounting

**Interchangeable Hubs  
(through 400 amperes)  
15-1200 Ampere Range  
600 Volts Ac, 500 Volts Dc**

This general purpose outdoor service center employs a circuit breaker inside a weather-proof sheet steel enclosure to serve as a main disconnect and protective device for feeder circuits. The operating handle can be padlocked in the Off position, and is interlocked to prevent the door from opening when the breaker is On. Ratings through 1200 amperes are listed by Underwriters Laboratories, Inc. as suitable for service entrance application.



**UL File Number E7819  
CSA File Number LR84319**

## NEMA 4/4X, 5 Water and Dustproof

**Stainless Steel – Type 304  
Surface Mounting  
15-1200 Ampere Range  
600 Volts Ac, 500 Volts Dc**

This enclosure meets NEMA 4/4X and 5 requirements for water and dustproof applications and has no knockouts or other openings. It is particularly well suited for use in dairies, borax mines, breweries, paper mills and other process industries. The operating handle can be padlocked in the Off position, and is interlocked to prevent the door from opening when the breaker is On. Ratings through 1200 amperes are listed as suitable for service entrance application.



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## NEMA 12 Dustproof Surface Mounting

**No Knockouts or Other Openings  
15-1200 Ampere Range  
600 Volts Ac, 500 Volts Dc**

The Type 12 enclosure is designed in line with specifications for special industry application where unusually severe conditions involving oil, coolant, dust and other foreign materials exist in the operating atmosphere. The handle padlocks in the Off position and the cover is interlocked with the handle mechanism to prevent opening the cover with the circuit breaker in the On position. Ratings through 1200 amperes are listed by Underwriters Laboratories, Inc. as suitable for service entrance application. A NEMA 12 semi-dust-tight design which includes knockouts is available. These units are rated 15-400 amperes, 600 volts Ac, 500 volts Dc.



**UL File Number E7819  
CSA File Number LR84319**

## NEMA 7, 9 Hazardous Location

**Cast Aluminum, Explosionproof  
Surface Mounting  
15-800 Ampere Range  
600 Volts Ac, 250 Volts Dc**

Hazardous location, Type 7: Class I, Groups B<sup>Ⓛ</sup>, C, D; Type 9: Class II, Groups E, F, G. This special service cast aluminum enclosure is supplied with a wide, machined flanged cover to prevent igniting outside atmospheres by arcing from inside the enclosure. Front operable, the handle padlocks in the Off position. Enclosures rated 600 amperes and above have lift-off hinges for ease of assembly.

**UL and cUL File Number E71279**

Ⓛ XFDN050 not Group B.

Enclosure Only Catalog Numbers Selection Guide

Breaker Frame	Breaker Ampere Range	Enclosure	
		NEMA Class	Catalog Number
<b>Series C Breakers</b>			
GC, GHC 1-Pole only	15-100	1 Surface	SGDN100 <sup>①</sup>
GC, GHC, GD, GHCGFEP 2- and 3-Pole only	15-100	1 Surface 3R 12 12K 4/4X, 5 St. Steel	SGDN100 RGDN100 JGDN100 DGDN100 WGDN100
EHD, FD, FDB, HFD, FDC	15-100	1 Surface 1 Flush 3R 12 12K 4/4X, 5 St. Steel	SFDN100 FFDN100 RFDN100 JFDN100 DFDN100 WFDN100
EHD, FD, FDB HFD, FDC	15-50 60-225 <sup>②</sup>	7/9 Cast Alum. 7/9 Cast Alum.	XFDN050 XFDN225
FD, FDB, HFD, FDC, ED, EDH, EDC	125-225	1 Surface 1 Flush 3R 12 12K 4/4X, 5 St. Steel	SFDN225 FFDN225 RFDN225 JFDN225 DFDN225 WFDN225
JD, JDB, HJD, JDC	125-250	1 Surface 1 Flush 3R 12 12K 4/4X, 5 St. Steel	SJDN250 FJDN250 RJDN250 JJDN250 DJDN250 WJDN250
JD, JDB, HJD, JDC	125-250	7/9 Cast Alum.	XJDN250
KD, KDB, HKD, KDC, DK	125-400	1 Surface 1 Flush 3R 12 12K 4/4X, 5 St. Steel	SKDN400 FKDN400 RKDN400 JKDN400 DKDN400 WKDN400
KD, KDB, HKD, KDC, DK	125-400	7/9 Cast Alum.	XKDN400
LD, LDB, HLD, LDC	300-600	1 Surface 3R 12 4/4X, 5 St. Steel	SLDN600 RLDN600 JLDN600 WLDN600
LD, LDB, HLD, LDC MD, MDS	300-600 400-800	7/9 Cast Alum.	XMCN800
MD, MDS, ND, NDC, HND	400-1200	1 Surface 3R 12 4/4X, 5 St. Steel	SNDN1200 RNDN1200 JNDN1200 WNDN1200
ND, HND, NDC		7/9 Cast Alum.	XNDN1200

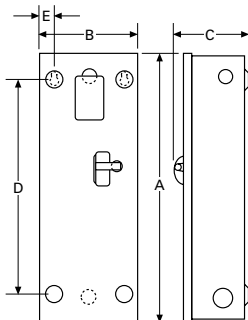
Breaker Frame	Breaker Ampere Range	Enclosure	
		NEMA Class	Catalog Number
<b>Earth Leakage Breakers<sup>③</sup></b>			
ELFD, ELHFD & ELFDC (3-Pole Only)	15-100	1 Surface 1 Flush 3R 12 12K 4/4X	SFD100E FFD100E RFDN100E JFDN100E DFDN100E WFDN100E
<b>Current Limit-R Breakers</b>			
FCL	15-100	3R 12 12K 4/4X, 5 St. Steel	RFDN150 JFDN150 DFDN150 WFDN150
LCL <sup>④</sup>	125-400	1 Surface 3R 12 4/4X, 5 St. Steel	SNDN1200 RNDN1200 JNDN1200 WNDN1200
<b>TRI-PAC<sup>®</sup> Breakers</b>			
FB-P	15-100	3R 12 12K 4/4X, 5 St. Steel	RFDN150 JFDN150 DFDN150 WFDN150
LA-P <sup>⑤</sup>	70-400	1 Surface 3R 12 4/4X	SNDN1200 RNDN1200 JNDN1200 WNDN1200
NB-P	500-800	12 4/4X, 5 St. Steel	JNDPN800 WNDPN800

Enclosures only shown above; if an assembled enclosed circuit breaker is required refer to Cutler-Hammer Satellite.

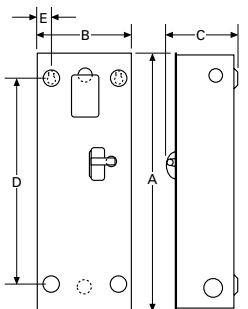
**Note:** For enclosed breakers above 1200 amperes refer to Cutler-Hammer.

- ① QCCBP base mounting plate required for use with one-pole breaker.
- ② Maximum wire size: 4/0.
- ③ Availability to be announced.
- ④ LCL requires additional adapter plate 1223C06G01.
- ⑤ LA-P requires additional adapter plate S/N 1223C06G02.
- ⑥ If ground fault protection is required, contact regional satellite.

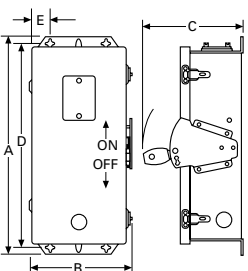
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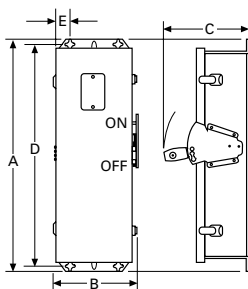
NEMA 1 Surface Mounted												
Catalog Number	App. Wt. Lbs.	Max. Amps.	Dimensions									
			A		B		C		D		E	
			IN.	MM	IN.	MM	IN.	MM	IN.	MM	IN.	MM
SGDN100	12	100	17-1/2	444	8-13/32	214	6-9/32	160	13-1/32	331	1-13/64	31
SFDN100	12	100	17-1/2	444	8-13/32	214	6-9/32	160	13-1/32	331	1-13/64	31
SFDN150	15	150	23-1/4	591	8-13/32	214	6-9/32	160	18-3/4	476	1-13/64	31
SFDN225	15	225	23-1/4	591	8-13/32	214	6-9/32	160	18-3/4	476	1-13/64	31
SJDN250	31	250	34-45/64	881	10-59/64	227	7-13/64	183	30	762	1-7/8	48
SKDN400	53	400	38-13/16	986	11-1/16	281	10-15/16	278	34	869	2-9/32	58
SLDN600	81	600	45-7/8	1165	14-5/16	364	12-3/8	314	46-9/16	1183	1-29/32	48
SNDN1200	178	1200	61-7/32	1555	21-7/16	545	15-13/32	391	61-27/32	1571	1-31/32	50



NEMA 1 Flush Mounted												
Catalog Number	App. Wt. Lbs.	Max. Amps.	Dimensions									
			A		B		C		D		E	
			IN.	MM	IN.	MM	IN.	MM	IN.	MM	IN.	MM
FFDN100	12	100	18-13/16	478	9-23/32	247	6-9/32	160	13-1/32	331	1-55/64	47
FFDN150	15	150	24-9/16	624	9-23/32	247	6-9/32	160	18-3/4	476	1-55/64	47
FFDN225	15	225	24-9/16	624	9-23/32	247	6-9/32	160	18-3/4	476	1-55/64	47
FJDN250	32	250	36-1/64	915	12-15/64	311	7-13/64	183	30	762	1-7/8	48
FKDN400	53	400	40-1/8	1019	12-3/8	314	10-15/16	278	34	869	2-15/16	75

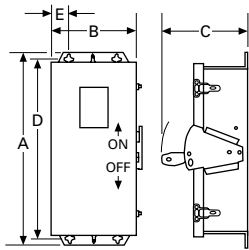


NEMA 12, 12K Dustproof												
Catalog Number	App. Wt. Lbs.	Max. Amps	Dimensions									
			A		B		C		D		E	
			IN.	MM	IN.	MM	IN.	MM	IN.	MM	IN.	MM
JGDN100	14	100	19-29/32	506	8-27/32	225	9-5/16	237	18-17/32	471	1-45/64	43
JFDN100	14	100	19-29/32	506	8-27/32	225	9-5/16	237	18-17/32	471	1-45/64	43
JFDN150	18	150	25-21/32	652	8-27/32	225	9-5/16	237	24-9/32	617	1-45/64	43
JFDN225	18	225	25-21/32	652	8-27/32	225	9-5/16	237	24-9/32	617	1-45/64	43
JJDN250	37	250	37-17/32	953	11-9/16	294	10-7/32	260	35-49/64	909	1-15/16	49
JKDN400	58	400	41-11/16	1059	11-3/4	298	14-1/16	357	39-15/16	1014	1-31/32	50
JLDN600	81	600	48-5/16	1227	14-29/32	379	15-1/2	394	46-9/16	1183	1-59/64	49
JNDPN800	110	800	63-19/32	1545	22	559	17-5/8	448	—	—	—	—
JNDN1200	170	1200	63-19/32	1545	22	559	17-5/8	448	61-27/32	1571	1-31/32	50
DGDN100	16	100	19-29/32	506	8-27/32	225	9-5/16	237	—	—	—	—
DFDN100	16	100	19-29/32	506	8-27/32	225	9-5/16	237	—	—	—	—
DFDN150	19	150	25-21/32	652	8-27/32	225	9-5/16	237	—	—	—	—
DFDN225	19	225	25-21/32	652	8-27/32	225	9-5/16	237	—	—	—	—
DJDN250	36	250	37-17/32	953	11-9/16	294	10-7/32	260	—	—	—	—
DKDN400	53	400	41-11/16	1059	11-3/4	298	14-1/16	357	—	—	—	—



NEMA 3R Rainproof												
Catalog Number	App. Wt. Lbs.	Max. Amps.	Dimensions									
			A		B		C		D		E	
			IN.	MM	IN.	MM	IN.	MM	IN.	MM	IN.	MM
RGDN100	14	100	19-29/32	458	8-27/32	225	9-5/16	237	18-17/32	471	1-45/64	43
RFDN100	14	100	19-29/32	458	8-27/32	225	9-5/16	237	18-17/32	471	1-45/64	43
RFDN150	19	150	25-21/32	603	8-27/32	225	9-5/16	237	24-9/32	617	1-45/64	43
RFDN225	19	225	25-21/32	603	8-27/32	225	9-5/16	237	24-9/32	617	1-45/64	43
RJDN250	40	250	37-1/2	891	11-9/16	294	10-7/32	260	35-49/64	909	1-15/16	49
RKDN400	60	400	41-11/16	997	11-3/4	298	14-1/16	357	39-15/16	1014	1-31/32	50
RLDN600	84	600	48-5/16	1227	14-29/32	379	15-1/2	394	46-9/16	1183	1-59/64	49
RNDN1200	175	1200	63-19/32	1615	22	559	17-5/8	448	61-27/32	1571	1-31/32	50

Not to be used for construction purposes unless approved.



NEMA 4/4X, 5 Stainless Steel												
Catalog Number	App. Wt. Lbs.	Max. Amps.	Dimensions									
			A		B		C		D		E	
			IN.	MM	IN.	MM	IN.	MM	IN.	MM	IN.	MM
WGDN100	16	100	19-29/32	506	8-27/32	225	9-5/16	237	18-17/32	471	1-45/64	43
WFDN100	16	100	19-29/32	506	8-27/32	225	9-5/16	237	18-17/32	471	1-45/64	43
WFDN150	20	150	25-21/32	652	8-27/32	225	9-5/16	237	24-9/32	617	1-45/64	43
WFDN225	20	225	25-21/32	652	8-27/32	225	9-5/16	237	24-9/32	617	1-45/64	43
WJDN250	39	250	37-1/2	953	11-9/16	294	10-7/32	260	35-49/64	909	1-15/16	49
WKDN400	60	400	41-11/16	1059	11-3/4	298	14-1/16	357	39-15/16	1014	1-31/32	50
WLDN600	88	600	48-5/16	1227	14-29/32	379	15-1/2	394	46-9/16	1183	1-59/64	49
WNDN1200	185	1200	63-19/32	1545	22	559	17-5/8	448	61-27/32	1571	1-31/32	50

NEMA 7, 9 Cast Aluminum with Weather Resistant Seals																
Catalog Number	Breaker Size Amperes	Dia. No.	Overall Enclosure				Enclosure Mounting			Conduit		Hinged Cover	Std. Conduit		Weight (lbs)	
			A	B	C	D	E	F	G	H	I	J	Size	Location		
XFDN050	50	1	15	10-5/8	8-3/4	5-13/16	9	12	1/2	1-3/4	3-1/4	2-5/8	1-1/4	2 & 7	34	
XFDN225	100/225	1	25-1/2	12-1/2	10-1/8	7-5/8	10-1/2	20	1/2	2	3-1/4	4-3/4	2	2 & 7	70	
XJDN250	250	1	38-1/2	13	11-1/4	8-3/4	11-1/2	28	1/2	2-1/8	3-1/2	5-1/2	2-1/2	2 & 7	120	
XKDN400	400	2	44-3/4	18	12-3/8	9-7/8	10	45	1/2	3	4	5-1/2	3	1, 3 & 6, 8	180	
XMCN800	600/800	3	50-3/4	20-3/4	15	12-1/2	22	40	1/2	4	5	6	4	1, 3 & 6, 8	460	
XNDN1200	1200 <sup>①</sup>	3	65	25	15-1/4	12-3/4	23-1/2	50	1/2	6-1/2	4-3/4	7	4	1, 3 & 6, 8	600	

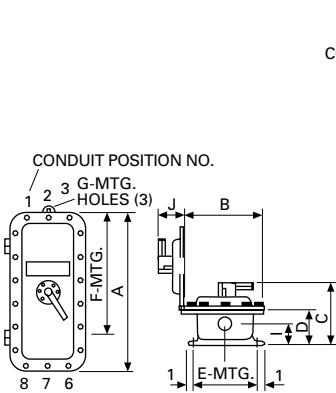


Diagram 1

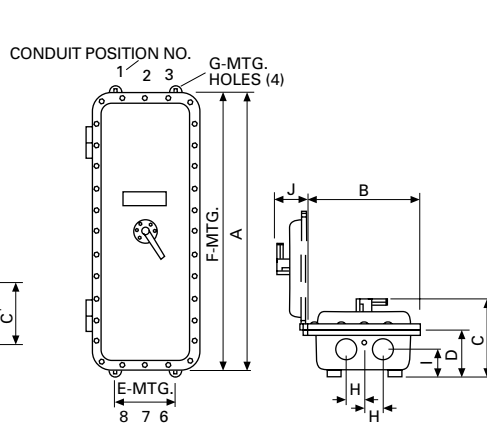


Diagram 2

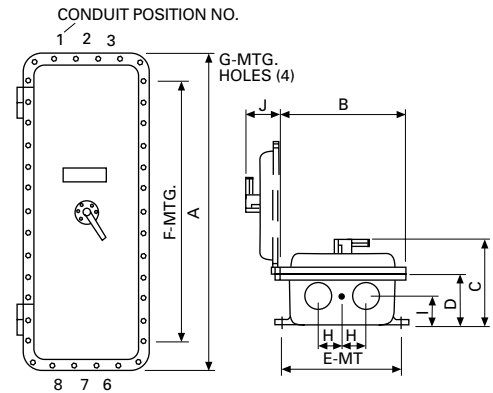


Diagram 3

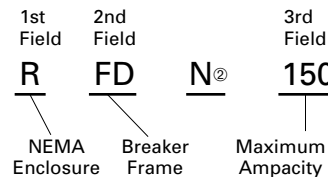
Conduit Openings

Refer to outline dimensions for size and location of standard conduit openings. In addition, 1/2-inch openings are drilled and tapped for breather and drain. Unless ordered with breather and drain, these openings are plugged. Refer to Cutler-Hammer for list price of breather and drain.

Circuit Breaker Enclosure Interpretation Data

1st Field NEMA Enclosure Type	2nd Field Breaker Family	3rd Field Maximum Ampacity
1 (Flush)	F-Frame	50
1 (Surface)	F-Frame	100
3R	J-Frame	150
12	K-Frame	225
12K	L-Frame	250
4, 4X, 5 (Stainless)	M-Frame	400
7/9 Cast Al.	N-Frame	600
		1200

Example



① Power cables must enter and leave from opposite ends (through feed).  
 ② "N" in this position indicates enclosure complies with 1981 NEC gutter space requirement.

List Prices for Complete Enclosed Circuit Breaker Assemblies

Circuit Breaker			Enclosure Type — List Price						
Frame Type	No. of Poles	Amperes Rating	NEMA 1 Surface	NEMA 1 Flush	NEMA 3R	NEMA 12	NEMA 12K	NEMA 4/4X	NEMA 7/9
GHC	1P	15-60A	\$ 247	—	—	—	—	—	—
	1P	70-100A	343	—	—	—	—	—	—
GHC W/GFP	1P	15-60A	645	—	\$ 815	\$ 683	\$ 692	\$ 1,371	—
GHC	2P	15-60A	380	—	550	418	427	1,106	—
	2P	70-100A	604	—	774	642	651	1,330	—
	3P	15-60A	550	—	720	588	597	1,276	—
	3P	70-100A	696	—	866	734	743	1,422	—
EHD	2P	15-60A	542	\$ 542	720	582	592	1,306	\$ 2,517
	2P	70-100A	653	653	831	693	703	1,417	3,117
	3P	15-60A	653	653	831	693	703	1,417	2,628
	3P	70-100A	748	748	926	788	798	1,512	3,212
ED	2P	100-225A	529	529	818	595	595	1,572	2,978
	3P	100-225A	1,039	1,039	1,328	1,105	1,105	2,082	3,488
EDH	2P	100-225A	1,008	1,008	1,297	1,074	1,074	2,051	3,457
	3P	100-225A	1,425	1,425	1,714	1,491	1,491	2,468	3,874
EDC	2P	100-225A	1,348	1,348	1,637	1,414	1,414	2,391	3,797
	3P	100-225A	1,785	1,785	2,074	1,851	1,851	2,828	4,234
FDB	2P	15-60A	589	589	767	629	639	1,353	2,564
	2P	70-100A	715	715	893	755	765	1,479	3,179
	2P	125-150A	1,404	1,404	1,693	1,470	1,470	2,447	3,853
	3P	15-60A	725	725	903	765	775	1,489	2,700
	3P	70-100A	843	843	1,021	883	893	1,607	3,307
	3P	125-150A	1,703	1,703	1,992	1,769	1,769	2,746	4,152
FD	2P	15-60A	878	878	1,056	918	928	1,642	2,853
	2P	70-100A	998	998	1,176	1,038	1,048	1,762	3,462
	2P	125-225A	2,048	2,048	2,337	2,114	2,114	3,091	4,497
	3P	15-60A	1,003	1,003	1,181	1,043	1,053	1,767	2,978
	3P	70-100A	1,111	1,111	1,289	1,151	1,161	1,875	3,575
	3P	125-225A	2,322	2,322	2,611	2,388	2,388	3,365	4,771
HFD	2P	15-60A	1,018	1,018	1,196	1,058	1,068	1,782	2,993
	2P	70-100A	1,266	1,266	1,444	1,306	1,316	2,030	3,730
	2P	125-225A	2,820	2,820	3,109	2,886	2,886	3,863	5,269
	3P	15-60A	1,276	1,276	1,454	1,316	1,326	2,040	3,251
	3P	70-100A	1,523	1,523	1,701	1,563	1,573	2,287	3,987
	3P	125-225A	2,322	2,322	3,506	3,283	3,283	4,260	5,666
JDB	2P	70-225A	1,480	1,480	1,788	1,623	1,623	3,189	7,169
	2P	250A	2,438	2,438	2,746	2,581	2,581	4,147	8,127
	3P	70-225A	1,815	1,815	2,123	1,958	1,958	3,524	7,504
	3P	250A	2,902	2,902	3,210	3,045	3,045	4,611	8,591
HJD	2P	70-225A	3,288	3,288	3,596	3,431	3,431	4,997	8,977
	2P	250A	4,508	4,508	4,816	4,651	4,651	6,217	10,197
	3P	70-225A	3,839	3,839	4,147	3,982	3,982	5,548	9,528
	3P	250A	4,951	4,951	5,259	5,094	5,094	6,660	10,640
DK	2P	250-400A	2,214	2,214	3,034	2,529	2,529	5,547	11,578
	3P	250-400A	2,616	2,616	3,436	2,931	2,931	5,949	11,980
KDB	2P	100-400A	2,632	2,632	3,452	2,947	2,947	5,965	11,996
	3P	100-400A	3,147	3,147	3,967	3,462	3,462	6,480	12,511
HKD	2P	100-400A	4,666	4,666	5,486	4,981	4,981	7,999	14,030
	3P	100-400A	5,160	5,160	5,980	5,475	5,475	8,493	14,524
LDB	2P	300-600A	4,216	—	5,228	4,775	—	9,714	16,775
	3P	300-600A	5,235	—	6,247	5,794	—	10,733	17,794
HLD	2P	300-600A	6,111	—	7,123	6,670	—	11,609	18,670
	3P	300-600A	7,465	—	8,477	8,024	—	12,963	20,024
MDL	2P	300-800A	5,920	—	6,872	6,476	—	13,763	18,146
	3P	300-800A	7,168	—	8,120	7,724	—	15,011	19,394
HMDL	2P	300-800A	8,175	—	9,127	8,731	—	16,018	20,401
	3P	300-800A	9,039	—	9,991	9,595	—	16,882	21,265





① For all other combination assembled enclosed circuit breakers refer to Cutler-Hammer Satellite.

② List price includes enclosure; breaker frame and trip unit or rating plug; line and load terminals; assembling and packaging in single shipping carton.

List Prices for Complete Enclosed Circuit Breaker Assemblies<sup>①</sup> Continued

Circuit Breaker			Enclosure Type — List Price <sup>②</sup>						
Frame Type	No. of Poles	Amperes Rating	NEMA 1 Surface	NEMA 1 Flush	NEMA 3R	NEMA 12	NEMA 12K	NEMA 4/4X	NEMA 7/9
ND	2P	600-1200A	\$10,389	—	\$11,341	\$10,945	—	\$18,232	\$33,718
	3P	600-1200A	11,579	—	12,531	12,135	—	19,422	34,908
HND	2P	600-1200A	11,491	—	12,443	12,047	—	19,334	34,820
	3P	600-1200A	12,805	—	13,757	13,361	—	20,648	36,134
ND W/GFP	2P	600-1200A	12,799	—	13,751	13,355	—	20,642	36,128
	3P	600-1200A	13,994	—	14,946	14,550	—	21,837	37,323
HND W/GFP	2P	600-1200A	13,901	—	14,853	14,457	—	21,744	37,230
	3P	600-1200A	15,215	—	16,167	15,771	—	23,058	38,544
ELFD	3P	15-100A							
	3P	15-150A							
	4P	15-100A							
	4P	15-150A							
ELHFD	3P	15-100A							
	3P	15-150A							
	4P	15-100A							
	4P	15-150A							
ELJD	3P	100-225A							
	3P	250A							
	4P	100-225A							
	4P	250A							
ELHJD	3P								
	3P								
	4P								
	4P								
ELKD	3P	200-400A							
	4P	200-400A							
ELHKD	3P	200-400A							
	4P	200-400A							
FCL	3P	15-100A							
FBP	3P	15-100A							

Assembled Enclosed Circuit Breakers Modifications and Accessories

Accessories, Modifications	Breaker Frame	Description	List Price Each
<b>Auxiliary Switches</b> (Specify Voltage and Hertz) 	G, F, J, K, L, M, N	1A, 1B	\$194
	G, F, J, K, L, M, N	2A, 2B	388
	K, L, M, N	3A, 3B	582
<b>Shunt Trips</b> (Specify Voltage and Hertz) 	G, F, J, K, L, M, N		474
<b>Alarm Switches</b> (Specify Voltage and Hertz) 	G, F, J, K, L, M, N	1 Make, 1 Break	194
	F, K, L, M, N	2 Make, 2 Break	388
<b>Undervoltage Release</b> (Specify Voltage and Hertz) 	G, F, J, K, L, M, N		474

Modifications

Allowable accessory combinations can be reviewed in Cutler-Hammer Circuit Breaker Product Guide: PG.74.A.01.T.E. Verify final application with the Cutler-Hammer satellite.

① For all other combination assembled enclosed circuit breakers refer to Cutler-Hammer Satellite.

② List price includes enclosure; breaker frame and trip unit or rating plug; line and load terminals; assembling and packaging in single shipping carton.

Circuit Breaker Type	Cont. Amp Rating At 40°C	No. Poles	Volts		Type of Trip <sup>①</sup>	Federal Spec. W-C-375b	UL Listed Interrupting Rating rms Symmetrical Amperes									
			Ac	Dc			Ac Ratings Volts						Dc <sup>②</sup>			
							120	120/240	240	277	480	600	125	250	125/250	
<b>Series C® Industrial Circuit Breakers</b>																
GC	15-100	1	120	125	N.I.T.	11a	65,000	—	—	—	—	—	—	14,000	—	—
GC	15-100	2, 3	240	125/250		10b, 11b, 12b, 14b, 15b	—	—	65,000	—	—	—	—	—	—	14,000
GHC	15-100	1	120	125	N.I.T.	12c, 13a	65,000	—	—	—	—	—	—	14,000	—	—
GHC	15-100	2, 3	240	125/250		13b	—	—	65,000	—	—	—	—	—	—	14,000
GHC	15-100	1	277	125		12c, 13a	—	—	—	14,000	—	—	—	14,000	—	—
GHC	15-100	2, 3	277/480	215/250		13b	—	—	—	14,000	14,000	—	—	—	—	14,000
GD	15-100	3	480	250	N.I.T.	13b	—	—	65,000	—	22,000	—	—	—	10,000	—
<b>F-Frame</b>																
ED	100-255	2, 3	240	125	N.I.T.	12b	—	—	65,000	—	—	—	—	10,000	—	—
EDH	100-255	2, 3	240	125		14b	—	—	100,000	—	—	—	—	10,000	—	—
EDC	100-255	2, 3	240	125		1	—	—	200,000	—	—	—	—	10,000	—	—
EHD	15-100	1	277	125	N.I.T.	13a	—	—	—	14,000	—	—	—	10,000	—	—
EHD	15-100	2, 3	480	250		13b	—	—	18,000	—	14,000	—	—	—	10,000	—
FDB	15-150	2, 3	600	250	N.I.T.	18a	—	—	18,000	—	14,000	14,000	—	10,000	—	—
FDB	15-150	4	600	250		③	—	—	18,000	—	14,000	14,000	—	10,000	—	—
FD	15-150	1	277	125	N.I.T.	13a	—	—	—	25,000	—	—	—	10,000	—	—
FD	15-150	2, 3	600	250		22a	—	—	65,000	—	25,000	18,000	—	10,000	—	—
FD	15-150	4	600	250		③	—	—	65,000	—	25,000	18,000	—	10,000	—	—
HFD	15-150	1	277	125	N.I.T.	13a	—	—	—	65,000	—	—	—	10,000	—	—
HFD	15-150	2, 3	600	250		22a	—	—	100,000	—	65,000	25,000	—	20,000	—	—
HFD	15-150	4	600	250		③	—	—	100,000	—	65,000	25,000	—	20,000	—	—
FDC	15-150	2, 3	600	250	N.I.T.	24a	—	—	200,000	—	100,000	35,000	—	20,000	—	—
FDC	15-150	4	600	250		③	—	—	200,000	—	100,000	35,000	—	20,000	—	—
<b>J-Frame</b>																
JDB	70-250	2, 3	600	250	N.I.T.	22a	—	—	65,000	—	25,000	18,000	—	10,000	—	—
JD	70-250	2, 3, 4	600	250	I.T.	22a	—	—	65,000	—	25,000	18,000	—	10,000	—	—
HJD	70-250	2, 3, 4	600	250	I.T.	22a	—	—	100,000	—	65,000	25,000	—	22,000	—	—
JDC	70-250	2, 3, 4	600	250	I.T.	22a	—	—	200,000	—	100,000	35,000	—	22,000	—	—
<b>K-Frame</b>																
DK	250-400	2, 3	240	250	N.I.T.	14b	—	—	65,000	—	—	—	—	10,000	—	—
KDB	100-400	2, 3	600	250	N.I.T.	23a	—	—	65,000	—	35,000	25,000	—	10,000	—	—
KD	100-400	2, 3, 4	600	250	I.T.	23a	—	—	65,000	—	35,000	25,000	—	10,000	—	—
HKD	100-400	2, 3, 4	600	250	I.T.	23a	—	—	100,000	—	65,000	35,000	—	22,000	—	—
KDC	100-400	2, 3, 4	600	250	I.T.	23a	—	—	200,000	—	100,000	50,000	—	22,000	—	—
<b>L-Frame</b>																
LDB	300-600	2, 3	600	250	N.I.T.	23a	—	—	65,000	—	35,000	25,000	—	22,000	—	—
LD	300-600	2, 3, 4	600	250	I.T.	23a	—	—	65,000	—	35,000	25,000	—	22,000	—	—
HLD	300-600	2, 3, 4	600	250	I.T.	23a	—	—	100,000	—	65,000	35,000	—	25,000	—	—
LDC	300-600	2, 3, 4	600	250	I.T.	23a	—	—	200,000	—	100,000	50,000	—	25,000	—	—
<b>M-Frame</b>																
MDL	300-800	2, 3	600	250	I.T.	23a	—	—	65,000	—	50,000	25,000	—	22,000	—	—
HMDL	300-800	2, 3	600	250	I.T.	23a	—	—	100,000	—	65,000	35,000	—	25,000	—	—
ND	600-1200	3, 4	600	—	N.I.T.	23a	—	—	65,000	—	50,000	25,000	—	—	—	—
HND	600-1200	3, 4	600	—	N.I.T.	23a	—	—	100,000	—	65,000	35,000	—	—	—	—
NDC	600-1200	3, 4	600	—	N.I.T.	23a	—	—	200,000	—	100,000	50,000	—	—	—	—
<b>Current Limit R Current Limiting Circuit Breakers – Non-Fused Type</b>																
FCL	15-100	2, 3	480	—	N.I.T.	—	—	—	200,000	—	150,000	—	—	—	—	—
LCL	125-400	2, 3	600	—	N.I.T.	—	—	—	200,000	—	200,000	100,000	—	—	—	—
<b>Tri-Pac Current Limiting Circuit Breakers – Fused Type</b>																
FB	15-100	2, 3	600	250	N.I.T.	16a, 16b, 17a, 26a	—	—	200,000	—	200,000	200,000	—	—	—	100,000
LA	70-400	2, 3	600	250	I.T.	16a, 16b, 17a, 26a	—	—	200,000	—	200,000	200,000	—	—	—	100,000
NB	300-800	2, 3	600	250	I.T.	16b, 17a, 26a	—	—	200,000	—	200,000	200,000	—	—	—	100,000

① N.I.T. is non-interchangeable trip unit and I.T. is interchangeable trip unit.

② Two-pole circuit breaker, or two poles of three-pole circuit breaker at 250 Vdc.

③ Not defined in W-C-375b.

**Nameplates**

Information is engraved in 1/4-inch high white letters on black background with a maximum of 15 letters. Customer must provide nameplate legend at the time of order.

List Price Adder Per Legend Plate	<b>\$104</b>
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To order, add Suffix -NP to standard Safety Switch Catalog Number. Example: **DH362FGK-NP**, legend to read PUMP NUMBER 1.

**Key Interlock Systems**

Interlocks are used to prevent the authorized operator from making an unauthorized operation. The interlock system is a simple method of applying key interlocks to safety switches so as to require operation in a predetermined sequence.

Before system construction can begin, the following information must be known:

1. User – name, address and telephone number.
2. Complete coordination (lock scheme) required with order.

Order by description.

Safety Switch Ampere Rating	Switch Type	List Price Adder Per Lock (Max. of Three Devices Interlocked)
30-800	Heavy Duty	<b>\$2,200</b>
30-600	Double Throw	<b>2,200</b>

**Neutral Assemblies Factory Installed**

Safety Switch Ampere Rating	Switch Type 2- and 3-Pole	List Price Adder Per Switch
30	Fusible and Non-Fusible	<b>\$140</b>
60	Fusible and Non-Fusible	<b>140</b>
100	Fusible and Non-Fusible	<b>140</b>
200	Fusible and Non-Fusible	<b>200</b>
400	Non-Fusible	<b>350</b>
600	Non-Fusible	<b>450</b>
400	Fusible	<b>650</b>
800	Fusible	<b>650</b>

**Satellite Service Locations**

**Atlanta**  
7990-A 2nd Flag Drive  
Six Flags Industrial Park  
Austell, GA 30001

**Baltimore**  
6671 Santa Barbera Ct.  
Elkridge, MD 21227

**Chicago**  
959 AEC Drive  
Wood Dale, IL 60191

**Cleveland**  
4711 Hinckley Industrial Pkwy.  
Cleveland, OH 44109

**Dallas**  
1100 Avenue T  
Grand Prairie, TX 75050

**Denver**  
14101 East 33rd Place  
Suite F  
Aurora, CO 80011

**Hartford**  
625 Day Hill Road  
Windsor, CT 06095

**Los Angeles**  
2021 Locust Court  
Ontario, CA 91761

**Orlando**  
3827 St. Valentine Way  
Orlando, FL 32811

**Phoenix**  
7160 Harl Avenue  
Tempe, AZ 85283

**Portland**  
6024 SW Jean Road  
Bldg. C-8  
Lake Oswego, OR 97035

**Raleigh**  
2933 South Miami Blvd.  
Durham, NC 27703

**San Francisco**  
20919 Cabot Blvd.  
Hayward, CA 94545

**Seattle**  
18657 72nd Avenue, South  
Kent, WA 98032

**St. Louis**  
12947 Gravois Road  
St. Louis, MO 63127

**Neutral Kits, Insulated and Groundable®**

Maximum Enclosure Rating (A)	Catalog Number	Main Lug Size Cu/Al	Ground Lug Size Cu/Al
100	<b>INK100</b>	(1) 14-1/0	(1) 14-1/0
250	<b>INK250</b>	(1) 6-350 kcmil	(1) 4-300 kcmil
400	<b>INK400</b>	(1) 4-750 kcmil or (2) 1/0-250 kcmil	(1) 4-300 kcmil
600	<b>INK600</b>	(2) 250-500 kcmil	(1) 4-300 kcmil
1200	<b>INK1200</b>	(3) 1/0 to 750 kcmil or (4) 1/0 to 750 kcmil	(1) #6-250 kcmil

**Raintight Hubs**

All rainproof enclosures 30A through 400A are shipped with plate over cutout. Hubs are not supplied with screws on 30A through 400A enclosures. Use screws from plate.



Small Hubs	Hub Diameter (Inches)	Catalog Number	Large Hubs	Hub Diameter (Inches)	Catalog Number
For use with RGDN and RFDN	3/4	<b>DS075H1</b>	For use with RJDN. RKDN has 2 cutouts	2	<b>R1H200</b>
	1	<b>DS100H1</b>		2-1/2	<b>R1H250</b>
	1-1/4	<b>DS125H1</b>	Required if using Type DS hubs on RJDN and RKDN enclosures.	3	<b>R1H300</b>
	1-1/2	<b>DS150H1</b>			<b>R1HA</b>
	2	<b>DS200H1</b>			

**Breather and Drain, Hazardous Enclosures**

A Universal Breather/Drain Fitting is installed in the top of an enclosure to provide ventilation to minimize condensation and in the bottom to allow drainage of accumulated condensation while maintaining explosion proof integrity.

Type	Compliance		Conduit Opening	Catalog Number
	NEMA 7	NEMA 9		
BD	Class I, Groups C, D; Class I, Zone 1, Group IIB	Class II, Groups F, G	1/2	<b>XPBD2</b>
DBB	Class I, Groups B, C, D; Class I, Zone 1, Group IIB + Hydrogen	Class II, Groups E, F, G	1/2	<b>XPDBB50</b>

