

Protective Devices Combined RCD/MCB Devices PKNM, 1+N-pole

Catalog



Powering Business Worldwide

SG13711



Description

- High-quality residual current device / miniature circuit breaker combination, line voltage-independent
- Increased protection in applications with 1-phase frequency converter due to the detection of mixed frequencies (type F)
- Reduction of nuisance tripping (type F, G, or G/A) thanks to
 - time delayed tripping
 - increased current withstand capability > 3 kA
- Higher load rating with DC residual currents up to 10 mA (type F)
- Contact position indicator red - green
- Guide for secure terminal connection
- 3-position DIN rail clip, permits removal from existing busbar system
- Comprehensive range of accessories can be mounted subsequently
- Wide variety of rated tripping currents
- Rated currents up to 40 A
- Tripping characteristics B, C
- Rated breaking capacity 10 kA

$I_n/I_{\Delta n}$
(A)Type
DesignationArticle No. Units per
package**Type F****10 kA, 1+N-pole****Short-time delayed + surge current-proof 3 kA, sensitive to residual pulsating DC and mixed frequencies, type F****Characteristic B**

13/003	PKNM-13/1N/B/003-F	193572	1/60
16/003	PKNM-16/1N/B/003-F	193573	1/60
20/003	PKNM-20/1N/B/003-F	193574	1/60
25/003	PKNM-25/1N/B/003-F	193581	1/60
32/003	PKNM-32/1N/B/003-F	193582	1/60
40/003	PKNM-40/1N/B/003-F	193583	1/60
13/03	PKNM-13/1N/B/03-F	193587	1/60
16/03	PKNM-16/1N/B/03-F	193588	1/60
20/03	PKNM-20/1N/B/03-F	193589	1/60
25/03	PKNM-25/1N/B/03-F	193596	1/60
32/03	PKNM-32/1N/B/03-F	193597	1/60
40/03	PKNM-40/1N/B/03-F	193598	1/60
13/01	PKNM-13/1N/B/01-F	193602	1/60
16/01	PKNM-16/1N/B/01-F	193603	1/60
20/01	PKNM-20/1N/B/01-F	193604	1/60
25/01	PKNM-25/1N/B/01-F	193611	1/60
32/01	PKNM-32/1N/B/01-F	193612	1/60
40/01	PKNM-40/1N/B/01-F	193613	1/60

Characteristic C

13/003	PKNM-13/1N/C/003-F	193575	1/60
16/003	PKNM-16/1N/C/003-F	193576	1/60
20/003	PKNM-20/1N/C/003-F	193577	1/60
25/003	PKNM-25/1N/C/003-F	193584	1/60
32/003	PKNM-32/1N/C/003-F	193585	1/60
40/003	PKNM-40/1N/C/003-F	193586	1/60
13/03	PKNM-13/1N/C/03-F	193590	1/60
16/03	PKNM-16/1N/C/03-F	193591	1/60
20/03	PKNM-20/1N/C/03-F	193592	1/60
25/03	PKNM-25/1N/C/03-F	193599	1/60
32/03	PKNM-32/1N/C/03-F	193600	1/60
40/03	PKNM-40/1N/C/03-F	193601	1/60
13/01	PKNM-13/1N/C/01-F	193605	1/60
16/01	PKNM-16/1N/C/01-F	193606	1/60
20/01	PKNM-20/1N/C/01-F	193607	1/60
25/01	PKNM-25/1N/C/01-F	193614	1/60
32/01	PKNM-32/1N/C/01-F	193615	1/60
40/01	PKNM-40/1N/C/01-F	193616	1/60

Characteristic D

13/003	PKNM-13/1N/D/003-F	193578	1/60
16/003	PKNM-16/1N/D/003-F	193579	1/60
20/003	PKNM-20/1N/D/003-F	193580	1/60
13/03	PKNM-13/1N/D/03-F	193593	1/60
16/03	PKNM-16/1N/D/03-F	193594	1/60
20/03	PKNM-20/1N/D/03-F	193595	1/60
13/01	PKNM-13/1N/D/01-F	193608	1/60
16/01	PKNM-16/1N/D/01-F	193609	1/60
20/01	PKNM-20/1N/D/01-F	193610	1/60

SG13711



SG13711



SG13711



$I_n/I_{\Delta n}$ (A)	Type Designation	Article No.	Units per package
---------------------------	---------------------	-------------	----------------------

Type G/A

10 kA, 1+N-pole
Short-time delayed 3 kA, sensitive to residual pulsating DC, type G/A

SG13711



Characteristic B

13/003	PKNM-13/1N/B/003-G/A	182886	1/60
16/003	PKNM-16/1N/B/003-G/A	182887	1/60
20/003	PKNM-20/1N/B/003-G/A	182888	1/60
25/003	PKNM-25/1N/B/003-G/A	182889	1/60
32/003	PKNM-32/1N/B/003-G/A	182890	1/60

SG13711



Characteristic C

13/003	PKNM-13/1N/C/003-G/A	182891	1/60
16/003	PKNM-16/1N/C/003-G/A	182892	1/60
20/003	PKNM-20/1N/C/003-G/A	182893	1/60
25/003	PKNM-25/1N/C/003-G/A	182894	1/60
32/003	PKNM-32/1N/C/003-G/A	182895	1/60

$I_n/I_{\Delta n}$
(A)

Type
Designation

Article No. Units per
package
Type A**10 kA, 1+N-pole****Conditionally surge current-proof 250 A, sensitive to residual pulsating DC, type A****Characteristic B**

6/0.03	PKNM-6/1N/B/003-A	236012	1/60
10/0.03	PKNM-10/1N/B/003-A	236072	1/60
13/0.03	PKNM-13/1N/B/003-A	236133	1/60
16/0.03	PKNM-16/1N/B/003-A	236205	1/60
20/0.03	PKNM-20/1N/B/003-A	236239	1/60
25/0.03	PKNM-25/1N/B/003-A	236269	1/60
32/0.03	PKNM-32/1N/B/003-A	236299	1/60
40/0.03	PKNM-40/1N/B/003-A	236328	1/60
6/0.3	PKNM-6/1N/B/03-A	236014	1/60
10/0.3	PKNM-10/1N/B/03-A	236074	1/60
13/0.3	PKNM-13/1N/B/03-A	236135	1/60
16/0.3	PKNM-16/1N/B/03-A	236207	1/60
20/0.3	PKNM-20/1N/B/03-A	236241	1/60
25/0.3	PKNM-25/1N/B/03-A	236271	1/60
32/0.3	PKNM-32/1N/B/03-A	236301	1/60
40/0.3	PKNM-40/1N/B/03-A	236330	1/60

Characteristic C

6/0.03	PKNM-6/1N/C/003-A	236022	1/60
10/0.03	PKNM-10/1N/C/003-A	236082	1/60
13/0.03	PKNM-13/1N/C/003-A	236145	1/60
16/0.03	PKNM-16/1N/C/003-A	236217	1/60
20/0.03	PKNM-20/1N/C/003-A	236249	1/60
25/0.03	PKNM-25/1N/C/003-A	236279	1/60
32/0.03	PKNM-32/1N/C/003-A	236309	1/60
40/0.03	PKNM-40/1N/C/003-A	236338	1/60
6/0.3	PKNM-6/1N/C/03-A	236024	1/60
10/0.3	PKNM-10/1N/C/03-A	236084	1/60
13/0.3	PKNM-13/1N/C/03-A	236147	1/60
16/0.3	PKNM-16/1N/C/03-A	236219	1/60
20/0.3	PKNM-20/1N/C/03-A	236251	1/60
25/0.3	PKNM-25/1N/C/03-A	236281	1/60
32/0.3	PKNM-32/1N/C/03-A	236311	1/60
40/0.3	PKNM-40/1N/C/03-A	236340	1/60

SG13711



SG13711



$I_n/I_{\Delta n}$ (A)	Type Designation	Article No.	Units per package
---------------------------	---------------------	-------------	----------------------

Type AC

10 kA, 1+N-pole
Conditionally surge current-proof 250 A, type AC

SG13711



Characteristic B

6/0.03	PKNM-6/1N/B/003	236007	1/60
10/0.03	PKNM-10/1N/B/003	236067	1/60
13/0.03	PKNM-13/1N/B/003	236128	1/60
16/0.03	PKNM-16/1N/B/003	236200	1/60
20/0.03	PKNM-20/1N/B/003	236235	1/60
25/0.03	PKNM-25/1N/B/003	236265	1/60
32/0.03	PKNM-32/1N/B/003	236295	1/60
40/0.03	PKNM-40/1N/B/003	236324	1/60
6/0.3	PKNM-6/1N/B/03	236009	1/60
10/0.3	PKNM-10/1N/B/03	236069	1/60
13/0.3	PKNM-13/1N/B/03	236130	1/60
16/0.3	PKNM-16/1N/B/03	236202	1/60
20/0.3	PKNM-20/1N/B/03	236237	1/60
25/0.3	PKNM-25/1N/B/03	236267	1/60
32/0.3	PKNM-32/1N/B/03	236297	1/60
40/0.3	PKNM-40/1N/B/03	236326	1/60

SG13711



Characteristic C

6/0.03	PKNM-6/1N/C/003	236017	1/60
10/0.03	PKNM-10/1N/C/003	236077	1/60
13/0.03	PKNM-13/1N/C/003	236140	1/60
16/0.03	PKNM-16/1N/C/003	236212	1/60
20/0.03	PKNM-20/1N/C/003	236245	1/60
25/0.03	PKNM-25/1N/C/003	236275	1/60
32/0.03	PKNM-32/1N/C/003	236305	1/60
40/0.03	PKNM-40/1N/C/003	236334	1/60
16/0.1	PKNM-16/1N/C/01	236213	1/60
6/0.3	PKNM-6/1N/C/03	236019	1/60
10/0.3	PKNM-10/1N/C/03	236079	1/60
13/0.3	PKNM-13/1N/C/03	236142	1/60
16/0.3	PKNM-16/1N/C/03	236214	1/60
20/0.3	PKNM-20/1N/C/03	236247	1/60
25/0.3	PKNM-25/1N/C/03	236277	1/60
32/0.3	PKNM-32/1N/C/03	236307	1/60
40/0.3	PKNM-40/1N/C/03	236336	1/60

Specifications | Combined RCD/MCB Devices PKNM, 1+N-pole

Description

- Combined RCD/MCB Devices
- Line voltage-independent tripping
- Compatible with standard busbar
- Twin-purpose terminal (lift/open-mouthed) above and below
- Busbar positioning optionally above or below
- Free terminal space despite installed busbar
- Guide for secure terminal connection
- Switching toggle (MCB component) in colour designating the rated current
- Contact position indicator red - green
- Comprehensive range of accessories can be mounted subsequently
- The test key "T" must be pressed every 6 month. The system operator must be informed of this obligation and his responsibility in a way that can be proven (self-adhesive RCD-label enclosed). The test interval of 6 month is valid for residential and similar applications. Under all other conditions (e.g. damply or dusty environments), it's recommended to test in shorter intervals (e.g. monthly).
- Pressing the test key "T" serves the only purpose of function testing the residual current device (RCD). This test does not make earthing resistance measurement (R_E), or proper checking of the earth conductor condition redundant, which must be performed separately.
- **Type -A:** Protects against special forms of residual pulsating DC which have not been smoothed.
- **Type -G:** 10 ms time delay in order to avoid unwanted tripping (e.g. during thunderstorms).
Suitable for any circuit where personal injury or damage to property may occur in case of unwanted tripping.
- **Type -F:** Increased protection in applications with 1-phase frequency converter due to the detection of mixed frequencies, higher load capacity with smooth DC fault currents up to 10 mA.

Accessories:

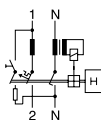
Auxiliary switch for subsequent installation	ZP-IHK	286052
	ZP-WHK	286053
Tripping signal switch for subsequent installation	ZP-NHK	248437
Shunt trip release	ZP-ASA/..	248438, 248439
Additional terminal 35 mm ²	BB-UL-TEPA/35	169823

Technical Data

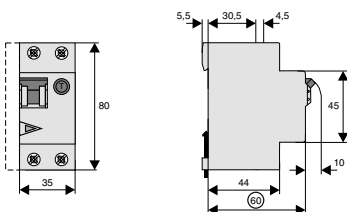
PKNM, 1+N-pole	
Electrical	
Design according to	IEC/EN 61009
Current test marks as printed onto the device	
Line voltage-independent tripping	Type AC, A Type G, F
	instantaneous 250 A (8/20 μ s), surge current proof 10 ms delay 3 kA (8/20 μ s), surge current proof
Rated voltage	U_e 230 V AC, 50 Hz
Operational voltage range	196-253 V
Rated tripping current	$I_{\Delta n}$ 10, 30, 100, 300 mA
Rated non-tripping current	$I_{\Delta no}$ 0.5 $I_{\Delta n}$
Rated insulation voltage	U_i 440 VAC
Sensitivity	AC and pulsating DC
Selectivity class	3
Rated breaking capacity	I_{cn} 10 kA
Rated current	2 - 40 A
Rated impulse withstand voltage	U_{imp} 4 kV (1.2/50 μ s)
Characteristic	B, C
Maximum back-up fuse (short-circuit)	100 A gL (>10 kA)
Endurance	
electrical components	$\geq 4,000$ switching operations
mechanical components	$\geq 20,000$ switching operations
Mechanical	
Frame size	45 mm
Device height	80 mm
Device width	35 mm (2 MU)
Mounting	3-position DIN rail clip, permits removal from existing busbar system
Degree of protection, switch	IP20
Degree of protection, built-in	IP40
Upper and lower terminals	open-mouthed/lift terminals
Terminal protection	finger and hand touch safe, DGUV VS3, EN 50274
Terminal capacity	1 - 25 mm ²
Terminal torque	2 - 2.4 Nm
Busbar thickness	0.8 - 2 mm
Operating temperature	-25°C to +55°C
Storage- and transport temperature	-35°C to +60°C
Resistance to climatic conditions	according to IEC/EN 61009

Connection diagram

1+N-pole



Dimensions (mm)

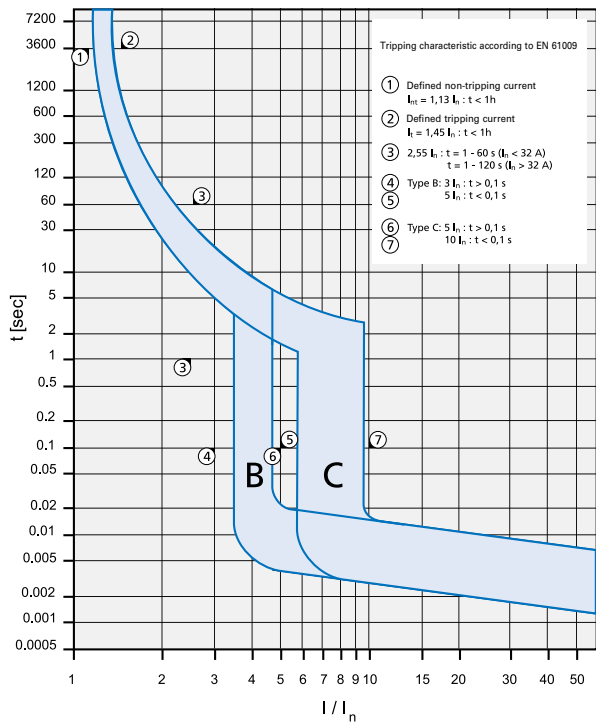


Load Capacity PKNM-../1N/

Effect of ambient temperature (MCB component)

I _n [A]	Ambient temperature T [°C]							
	-25	-15	-5	10	30	40	45	55
6	7	6.8	6.6	6.4	6	5.7	5.6	5.3
10	12.3	11.9	11.4	10.8	10	9.5	9.3	8.8
13	15.1	14.7	14.3	13.7	13	12.5	12.3	11.8
16	19.1	18.6	18	17.1	16	15.2	14.9	14.1
20	24.8	23.9	23	21.7	20	19	18.5	17.5
25	31.4	30.2	29.1	27.3	25	23.9	23.3	22.1
32	40.1	38.6	37.1	34.9	32	30.4	29.6	28
40	51	49	47	44	40	38.1	37.1	35.1

Tripping Characteristic PKNM-../1N/, Characteristics B and C



Short-circuit Selectivity PKNM-../1N/ towards DII-DIV fuse link

In case of short-circuit, there is selectivity between the combined RCD/MCB devices PKNM-../1N/ and the upstream fuses up to the specified values of the selectivity limit current I_s [kA] (i. e. in case of short-circuit currents I_{ks} under I_s , only the MCB will trip, in case of short-circuit currents above this value both protective devices will respond).

*) basically in accordance with EN 60898-1 D.5.2.b

Short-circuit selectivity **Characteristic B** towards fuse link **DII-DIV***)

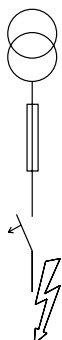
PKNM	DII-DIV gL/gG								
I _n [A]	10	16	20	25	35	50	63	80	100
2	<0.5 ¹⁾	<0.5 ¹⁾	2.2	8.5	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
4	<0.5 ¹⁾	<0.5 ¹⁾	0.7	1.2	3.7	10.0	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
6		<0.5 ¹⁾	0.7	1.0	2.9	6.9	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
8		<0.5 ¹⁾	0.6	1.0	2.4	5.1	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
10			0.6	0.9	1.9	3.3	7.0	10.0 ²⁾	10.0 ²⁾
13			0.5	0.7	1.6	2.8	5.7	9.0	10.0 ²⁾
16				0.7	1.4	2.4	4.4	7.0	10.0 ²⁾
20					1.3	2.2	4.0	6.3	10.0 ²⁾
25					1.3	2.1	3.8	5.8	10.0 ²⁾
32						2.0	3.5	5.2	9.5
40							3.1	4.5	8.1

Short-circuit selectivity **Characteristic C** towards fuse link **DII-DIV***)

PKNM	DII-DIV gL/gG								
I _n [A]	10	16	20	25	35	50	63	80	100
2	<0.5 ¹⁾	<0.5 ¹⁾	1.7	6.0	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
4	<0.5 ¹⁾	<0.5 ¹⁾	0.7	1.3	4.2	8.5	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
5	<0.5 ¹⁾	<0.5 ¹⁾	0.6	1.1	3.6	7.0	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
6		<0.5 ¹⁾	0.6	1.0	2.9	5.8	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
8		<0.5 ¹⁾	<0.5	0.9	2.5	4.8	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾
10			<0.5	0.7	1.5	2.6	5.3	9.0	10.0 ²⁾
13					1.4	2.3	4.6	7.6	10.0 ²⁾
16					1.2	1.8	3.4	5.5	10.0 ²⁾
20					1.2	1.7	3.1	5.0	10.0 ²⁾
25						1.6	2.9	4.6	10.0 ²⁾
32							2.3	3.4	7.7
40								2.9	6.2

¹⁾ Selectivity limit current I_s under 0.5 kA.

²⁾ Selectivity limit current I_s = rated breaking capacity I_{cn} of the RCD/MCB device
Darker areas: no selectivity



Short-circuit Selectivity PKNM-./1N/ towards D01-D03 fuse link

In case of short-circuit, there is selectivity between the combined RCD/MCB devices PKNM-./1N/ and the upstream fuses up to the specified values of the selectivity limit current I_s [kA] (i. e. in case of short-circuit currents I_{ks} under I_s , only the MCB will trip, in case of short-circuit currents above this value both protective devices will respond).

*) basically in accordance with EN 60898-1 D.5.2.b

Short-circuit selectivity **Characteristic B** towards fuse link **D01-D03***)

PKNM	D01-D03 gL/gG									
I_n [A]	10	16	20	25	35	50	63	80	100	
2	<0.5 ¹⁾	0.7	1.6	3.3	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
4	<0.5 ¹⁾	<0.5 ¹⁾	0.6	0.9	2.9	10.0	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
6		<0.5 ¹⁾	0.5	0.8	2.4	8.2	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
8			0.6	0.8	2.0	6.0	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
10			0.5	0.8	1.6	3.7	6.0	10.0 ²⁾	10.0 ²⁾	
13			0.6	0.7	1.4	3.0	4.7	9.0	10.0 ²⁾	
16				0.6	1.2	2.6	3.9	7.0	10.0 ²⁾	
20					1.2	2.5	3.6	6.2	10.0 ²⁾	
25					1.2	2.3	3.3	5.7	10.0 ²⁾	
32						2.3	3.1	5.1	10.0 ²⁾	
40							2.8	4.5	9.5	

Short-circuit selectivity **Characteristic C** towards fuse link **D01-D03***)

PKNM	D01-D03 gL/gG									
I_n [A]	10	16	20	25	35	50	63	80	100	
2	<0.5 ¹⁾	0.5	0.5	2.4	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
4	<0.5 ¹⁾	<0.5 ¹⁾	<0.5 ¹⁾	0.9	3.4	9.5	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
5	<0.5 ¹⁾	<0.5 ¹⁾	<0.5 ¹⁾	0.9	2.9	8.0	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
6		<0.5 ¹⁾	<0.5 ¹⁾	0.8	2.3	6.5	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
8			<0.5	0.7	2.1	5.5	9.5	10.0 ²⁾	10.0 ²⁾	
10			<0.5	0.6	1.3	2.9	4.5	8.9	10.0 ²⁾	
13					1.2	2.5	3.9	7.6	10.0 ²⁾	
16					1.0	2.1	3.0	5.5	10.0 ²⁾	
20					1.0	2.0	2.7	5.0	10.0 ²⁾	
25						1.9	2.6	4.5	10.0 ²⁾	
32							2.1	3.4	10.0 ²⁾	
40								3.0	8.7	

Short-circuit Selectivity PKNM-./1N/ towards NH-00 fuse link

In case of short-circuit, there is selectivity between the combined RCD/MCB devices PKNM-./1N/ and the upstream fuses up to the specified values of the selectivity limit current I_s [kA] (i. e. in case of short-circuit currents I_{ks} under I_s , only the MCB will trip, in case of short-circuit currents above this value both protective devices will respond).

*) basically in accordance with EN 60898-1 D.5.2.b

Short-circuit selectivity **Characteristic B** towards fuse link **NH-00***)

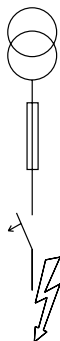
PKNM	D01-D03 gL/gG												
I_n [A]	16	20	25	32	35	40	50	63	80	100	125	160	
2	<0.5 ¹⁾	1.1	3.6	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
4	<0.5 ¹⁾	0.5	0.9	1.6	2.8	4.4	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
6	<0.5 ¹⁾	0.5	0.8	1.4	2.2	3.3	7.0	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
8	<0.5 ¹⁾	<0.5 ¹⁾	0.7	1.0	1.9	2.8	5.3	7.8	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
10		<0.5 ¹⁾	0.7	0.9	1.5	2.1	3.4	4.3	7.3	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
13		<0.5 ¹⁾	0.6	0.8	1.4	1.8	2.8	3.6	5.7	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
16			0.6	0.7	1.2	1.5	2.4	3.0	4.5	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
20				0.7	1.1	1.5	2.2	2.8	4.2	9.2	10.0 ²⁾	10.0 ²⁾	
25					0.7	1.1	1.4	2.1	2.6	4.0	8.2	10.0 ²⁾	10.0 ²⁾
32						1.0	1.4	2.0	2.5	3.7	7.1	10.0 ²⁾	10.0 ²⁾
40								2.3	3.4	6.2	8.8	10.0 ²⁾	

Short-circuit selectivity **Characteristic C** towards fuse link **NH-00***)

PKNM	D01-D03 gL/gG												
I_n [A]	16	20	25	32	35	40	50	63	80	100	125	160	
2	<0.5 ¹⁾	0.6	2.6	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
4	<0.5 ¹⁾	<0.5 ¹⁾	0.9	1.8	3.2	4.8	8.7	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
5	<0.5 ¹⁾	<0.5 ¹⁾	0.8	1.6	2.7	4.1	7.2	9.7	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
6	<0.5 ¹⁾	<0.5 ¹⁾	0.7	1.3	2.2	3.3	5.9	8.0	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
8	<0.5 ¹⁾	<0.5 ¹⁾	0.6	1.1	1.9	2.8	5.0	6.7	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
10			0.5	0.8	1.2	1.7	2.7	3.4	5.5	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
13					1.1	1.5	2.3	2.9	4.7	10.0 ²⁾	10.0 ²⁾	10.0 ²⁾	
16						1.0	1.3	1.8	2.3	3.7	8.7	10.0 ²⁾	10.0 ²⁾
20							0.9	1.1	1.7	2.2	3.4	8.0	10.0 ²⁾
25								1.6	2.1	3.2	7.2	10.0 ²⁾	10.0 ²⁾
32									1.7	2.6	5.3	9.0	10.0 ²⁾
40										2.4	4.5	7.5	10.0

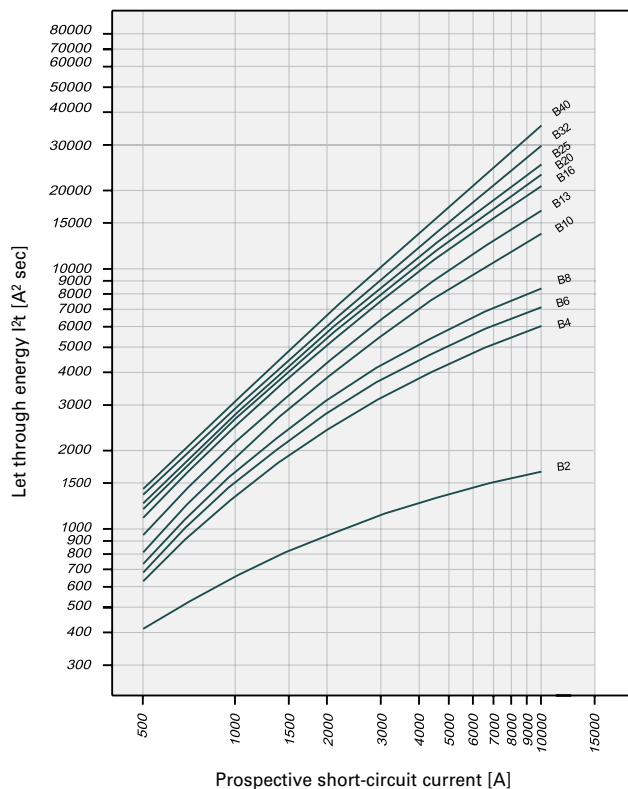
¹⁾ Selectivity limit current I_s under 0.5 kA.

²⁾ Selectivity limit current I_s = rated breaking capacity I_{cn} of the RCD/MCB device
Darker areas: no selectivity

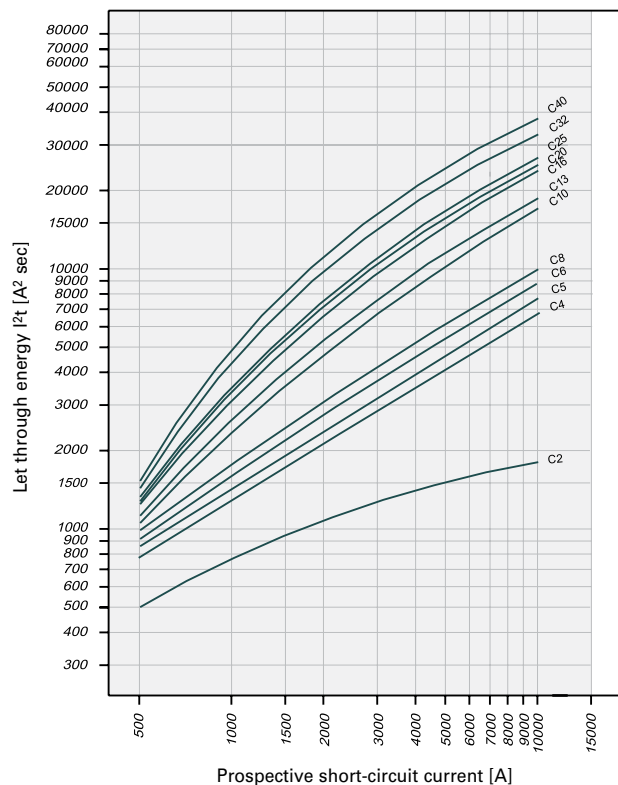


Let-through Energy PKNM-../1N/

Let-through Energy PKNM, Characteristic B, 1+N-pole



Let-through Energy PKNM, Characteristic C, 1+N-pole



Eaton's electrical business is a global leader with deep regional application expertise in power distribution and circuit protection; power quality, backup power and energy storage; control and automation; life safety and security; structural solutions; and harsh and hazardous environment solutions. Through end-to-end services, channel and an integrated digital platform & insights Eaton is powering what matters across industries and around the world, helping customers solve their most critical electrical power management challenges.

For more information, visit [Eaton.com](https://www.eaton.com).



Eaton Industries (Austria) GmbH
Scheydgasse 42
1210 Vienna
Austria

Eaton
EMEA Headquarters
Route de la Longeraie 7
1110 Morges, Switzerland

© 2021 Eaton
All Rights Reserved
Publication No. CA019041EN
Article number 302725-MK
September 2021

Changes to the products, to the information contained in this document, and to prices are reserved; as are errors and omissions. Only order confirmations and technical documentation by Eaton is binding. Photos and pictures also do not warrant a specific layout or functionality. Their use in whatever form is subject to prior approval by Eaton. The same applies to trademarks (especially Eaton, Moeller, and Cutler-Hammer). The Terms and Conditions of Eaton apply, as referenced on Eaton Internet pages and Eaton order confirmations.

Eaton is a registered trademark.

All other trademarks are property of their respective owners.

Follow us on social media to get the latest product and support information.

