

# DRX™ 100

thermal magnetic MCCBs from 15 to 100 A



0 270 10



0 270 46



0 270 58



0 270 68



0 271 83



0 271 70



0 271 42



0 271 50



Technical characteristics and curves p. 123 to 125

For switching, control, isolation and protection of low-voltage electrical lines  
Can be fitted with auxiliaries

Supplied with:

- M5 terminal for  $I_n \leq 50$  A and M8 range for  $I_n > 50$  A
- Fixing screws
- Insulating shields (2 for 3P and 3 for 4P)

Fixed thermal and magnetic

Conform to IEC 60947-2, in compliance with NEMA

Pack	Cat.Nos		DRX 100
			<b>Breaking capacity Icu 10 kA (415 V~)</b>
			In
1	3P 0 270 00	4P 0 270 10	15 A
1	3P 0 270 01	4P 0 270 11	20 A
1	3P 0 270 02	4P 0 270 12	25 A
1	3P 0 270 03	4P 0 270 13	30 A
1	3P 0 270 04	4P 0 270 14	40 A
1	3P 0 270 05	4P 0 270 15	50 A
1	3P 0 270 06	4P 0 270 16	60 A
1	3P 0 270 07	4P 0 270 17	75 A
1	3P 0 270 08	4P 0 270 18	100 A
			<b>Breaking capacity Icu 20 kA (415 V~)</b>
			In
1	3P 0 270 20	4P 0 270 30	15 A
1	3P 0 270 21	4P 0 270 31	20 A
1	3P 0 270 22	4P 0 270 32	25 A
1	3P 0 270 23	4P 0 270 33	30 A
1	3P 0 270 24	4P 0 270 34	40 A
1	3P 0 270 25	4P 0 270 35	50 A
1	3P 0 270 26	4P 0 270 36	60 A
1	3P 0 270 27	4P 0 270 37	75 A
1	3P 0 270 28	4P 0 270 38	100 A
			<b>Breaking capacity Icu 35 kA (415 V~)</b>
			In
1	1P 0 270 40 <sup>1</sup>	2P 0 270 50	15 A
1	1P 0 270 41 <sup>1</sup>	2P 0 270 51	20 A
1	1P 0 270 42 <sup>1</sup>	2P 0 270 52	25 A
1	1P 0 270 43 <sup>1</sup>	2P 0 270 53	30 A
1	1P 0 270 44 <sup>1</sup>	2P 0 270 54	40 A
1	1P 0 270 45 <sup>1</sup>	2P 0 270 55	50 A
1	1P 0 270 46 <sup>1</sup>	2P 0 270 56	60 A
1	1P 0 270 47 <sup>1</sup>	2P 0 270 57	75 A
1	1P 0 270 48 <sup>1</sup>	2P 0 270 58	100 A
			In
1	3P 0 270 60	4P 0 270 70	15 A
1	3P 0 270 61	4P 0 270 71	20 A
1	3P 0 270 62	4P 0 270 72	25 A
1	3P 0 270 63	4P 0 270 73	30 A
1	3P 0 270 64	4P 0 270 74	40 A
1	3P 0 270 65	4P 0 270 75	50 A
1	3P 0 270 66	4P 0 270 76	60 A
1	3P 0 270 67	4P 0 270 77	75 A
1	3P 0 270 68	4P 0 270 78	100 A

### Mounting on rail

1	0 271 89	Plates for fixing DRX 100 on DIN rail
1	0 271 90	For 1P
1	0 271 90	For 2P
1	0 271 87	For 3P and 4P



Pack	Cat.Nos	Rotary handles
1	0 271 76	<b>Direct on DRX</b> Standard (grey)
1	0 271 77	<b>Vari-depth handle</b> Comprising: connecting rod, bracket, drilling template, mounting accessories, door locking mechanism Standard (grey)
		<b>Connection accessories</b>
		<b>Insulating shields</b> Used to isolate the connection between each pole
1	3P 0 271 81	Set of 2
1	4P 0 271 82	Set of 3
		<b>Sealable terminal shields</b>
1	2P 0 271 91	Set of 2
		<b>Cage terminals</b>
1	3P 0 271 83	Set of 2
1	4P 0 271 84	Set of 2
1	3P 0 271 70	Up to 50 A (inclusive)
1	4P 0 271 71	From 60 to 100 A
1	0 271 92	Set of 60 pieces up to 50 A (inclusive)
1	0 271 93	Set of 60 pieces from 60 to 100 A
		<b>Padlock</b>
1	0 271 80	For locking in "off" position (up to 3 locks)
		<b>Electrical accessories</b>
		<b>Auxiliary contact blocks</b> For left-hand side mounting Up to 250 V~ and =
1	0 271 40	Block with 1 auxiliary
1	0 271 41	Block with 1 alarm
1	0 271 42	Block with 1 auxiliary + 1 alarm
		<b>Shunt trips</b>
1	0 271 50	12 V~ and =
1	0 271 51	24 V~ and =
1	0 271 52	48 V~ and =
1	0 271 53	100/130 V~
1	0 271 54	200/277 V~
1	0 271 55	380/480 V~
		<b>Undervoltage releases</b>
1	0 271 60	12 V~ and =
1	0 271 61	24 V~ and =
1	0 271 62	48 V~ and =
1	0 271 68	110 V=
1	0 271 63	110/130 V~
1	0 271 64	200/240 V~
1	0 271 67	277 V~
1	0 271 65	380/415 V~
1	0 271 66	440/480 V~

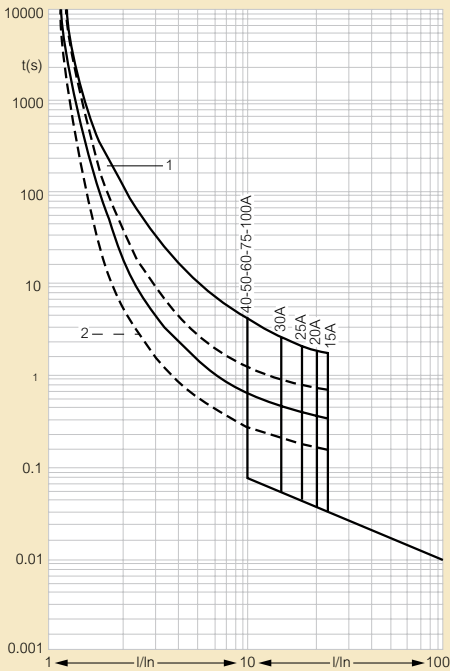
1: Icu 25 kA (240 V~) for 1P

# DRX™ 100

## technical characteristics and curves

### Curves

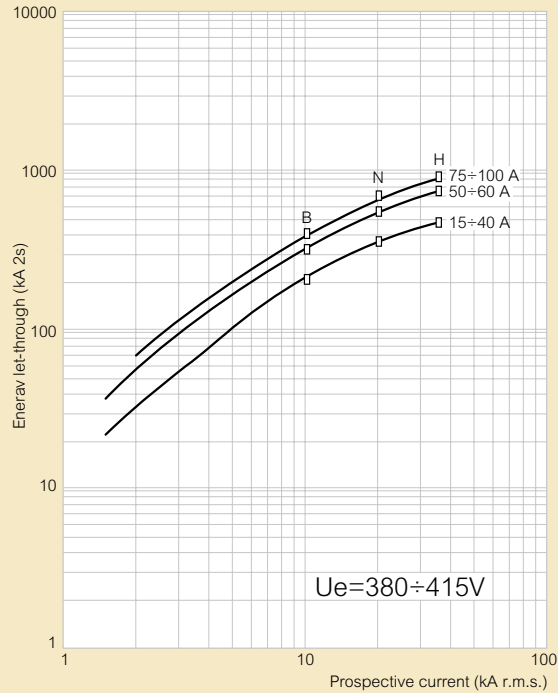
DRX 100 In max = 100 A 1P - 2P - 3P - 4P at 415 V~



t = time  
 I = rated current  
 Ir = setting current  
 1 = characteristic with cold start  
 2 = characteristic with hot start

### Let through specific energy characteristics

DRX 100 In max = 100 A 1P - 2P - 3P - 4P at 415 V~

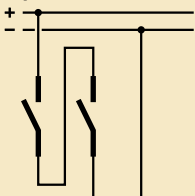


### Technical characteristics

	DRX - 10 kA	DRX - 20 kA	DRX - 25 kA <sup>(1)</sup>	DRX - 35 kA	DRX - 35 kA
Number of poles	3P - 4P	3P - 4P	1P	2P	3P - 4P
Nominal current In (A)	15-100	15-100	15-100	15-100	15-100
Neutral protection for 4P version (%)	100	100	100	100	100
Rated insulation voltage Ui (V)	690	690	690	690	690
Rated impulse withstand current Uimp (kV)	6	6	6	6	6
Rated operating voltage (50/60 Hz) Ue (V)	600	600	600	600	600
Ultimate breaking capacity Icu (kA) IEC 60947-2	110/130 V~	50	75	50	100
	220/240 V~	25	40	25	60
	277 V~	-	-	15	50
	380/415 V~	10	20	10	35
	440/460 V~	10	15	-	30
	480/550 V~	7,5	10	-	20
	600 V~	5	5	-	10
Ultimate breaking capacity Icu (kA) NEMA AB-1	125 V=	10 <sup>(2)</sup>	10 <sup>(2)</sup>	10	20 <sup>(2)</sup>
	250 V=	5 <sup>(2)</sup>	5 <sup>(2)</sup>	5	10 <sup>(2)</sup>
	240 V~	25	40	25	100
Standard breaking capacity Ics (% Icu)	480 V~	7,5	10	-	20
	600 V~	5	5	-	10
Category of use	A	A	A	A	A
Suitable for isolation	YES	YES	YES	YES	YES
Endurance (cycles)	mechanical	25000	25000	25000	25000
	electrical at In	8000	8000	8000	8000
	electrical at 0.5 In	10000	10000	10000	10000

1: 1P - Icu 25 kA (220/240 V~)  
 2: 2 poles in series

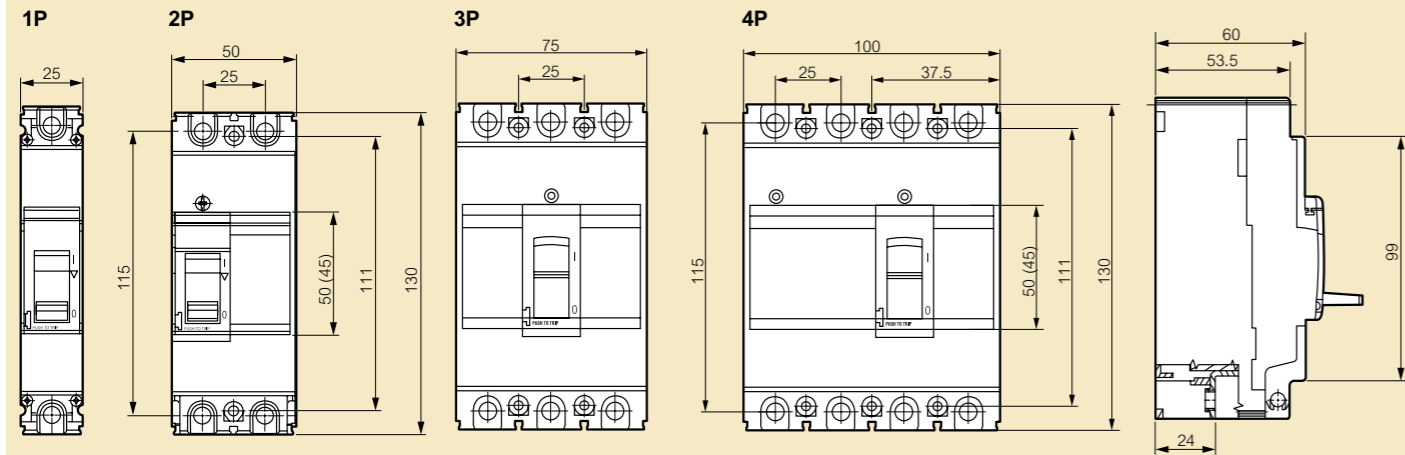
### 2 poles in series



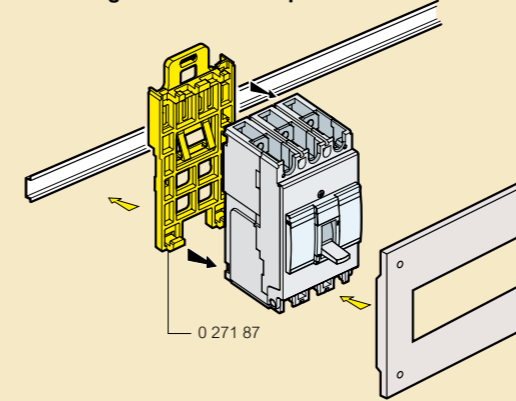
# DRX™ 100

dimensions, mounting principle and connection

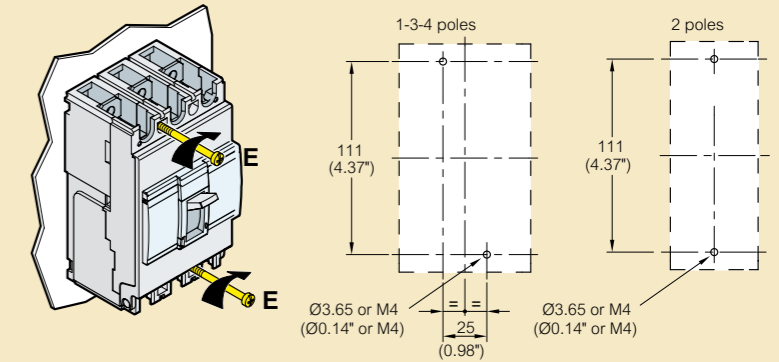
## ■ Dimensions



## Mounting on DIN rail with plate

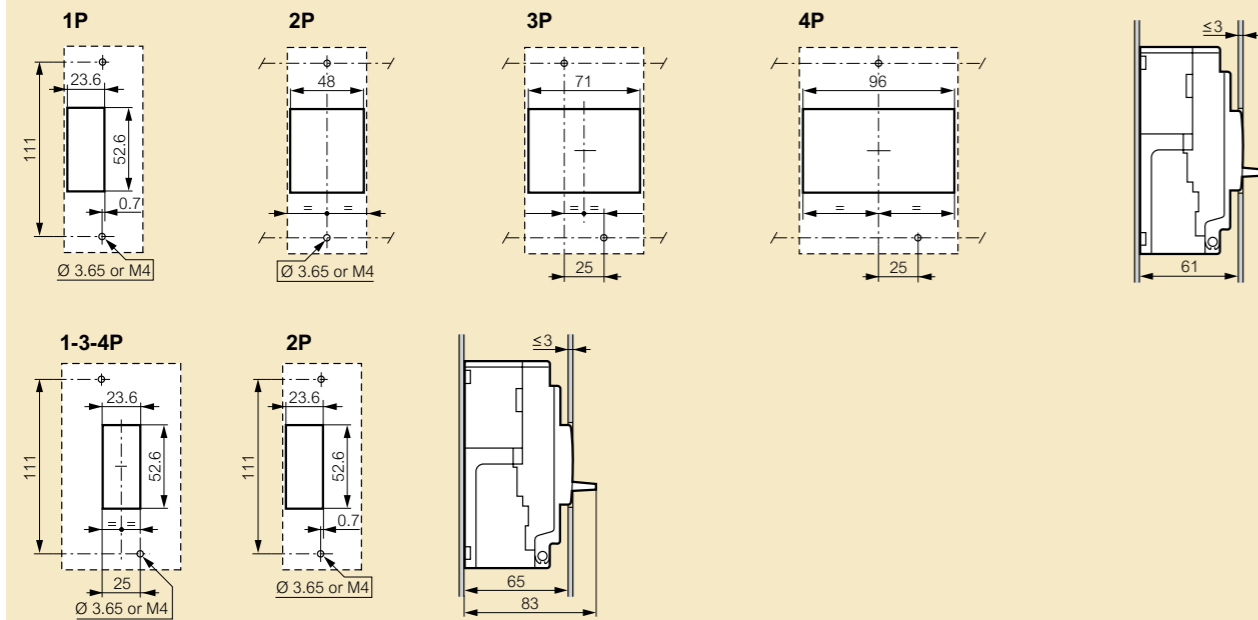


## Fixing on plate



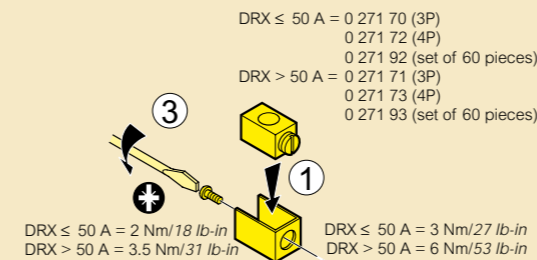
## ■ Mounting principle

### Door cut-out

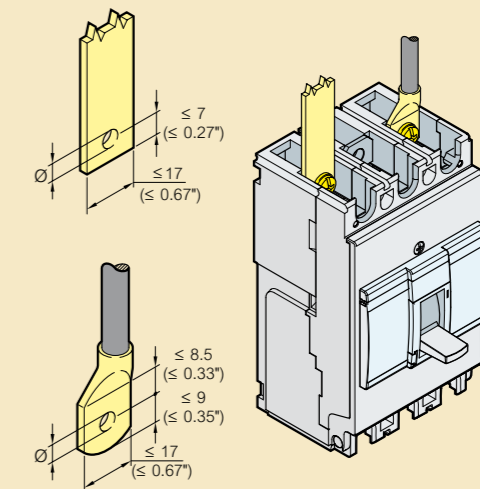


## ■ Connection

### Connection via cable



### Connection via busbar



DRX ≤ 50 A	DRX > 50 A
Flexible 2,5 → 16 mm <sup>2</sup> #14 → #6 AWG	Flexible 10 → 35 mm <sup>2</sup> #8 → #2 AWG
or Solid 2,5 → 25 mm <sup>2</sup> #14 → #4 AWG	Solid 10 → 50 mm <sup>2</sup> #8 → #1/0 AWG
2,5 to 4 mm <sup>2</sup> (#14 to #10 AWG) flexible cables connection via crimped end-barrels	

DRX ≤ 50 A	DRX > 50 A	DRX ≤ 50 A	DRX > 50 A
Ø 5.5 mm / 0.21"	Ø 8.5 mm / 0.33"	M5	M8
		2 Nm / 18 lb-in	5.5 Nm / 49 lb-in

## ■ Auxiliary contacts

	Voltage (V)	Resistive load (A)
Vac	125	5
	250	5
Vdc	30	5
	50	1
	75	0.75
	125	0.5
250	0.25	
Mechanical endurance (No. of operations)	5 x 10 <sup>6</sup>	
Temperature (°C)	- 40 to 85 °C	

