

Protection components

3-pole electronic thermal overload relays, model LR9 F for motor protection

819855



LR9 F53●●

819856



LR9 F73●●

Compensated and differential overload relays

Thermal overload relays:

- compensated and differential,
- with relay trip indicator,
- for a.c.,
- for direct mounting on contactor or independent mounting (1).

Relay setting range	Fuses to be used with selected relay		For direct mounting beneath contactor LC1	Reference	Weight
	aM	gG			
A	A	A			kg
Class 10 (2)					
30...50	50	80	F115...F185	LR9 F5357	0.885
48...80	80	125	F115...F185	LR9 F5363	0.900
60...100	100	200	F115...F185	LR9 F5367	0.900
90...150	160	250	F115...F185	LR9 F5369	0.885
132...220	250	315	F185...F400	LR9 F5371	0.950
200...330	400	500	F225...F500	LR9 F7375	2.320
300...500	500	800	F225...F500	LR9 F7379	2.320
380...630	630	800	F400...F630 and F800	LR9 F7381	4.160
Class 20 (2)					
30...50	50	80	F115...F185	LR9 F5557	0.885
48...80	80	125	F115...F185	LR9 F5563	0.900
60...100	100	200	F115...F185	LR9 F5567	0.900
90...150	160	250	F115...F185	LR9 F5569	0.885
132...220	250	315	F185...F400	LR9 F5571	0.950
200...330	400	500	F225...F500	LR9 F7575	2.320
300...500	500	800	F225...F500	LR9 F7579	2.320
380...630	630	800	F400...F630 and F800	LR9 F7581	4.160

(1) When mounting overload relays up to size LR9 F5371 directly beneath the contactor, they may be additionally supported by a mounting plate (see page 27075/3). Above this size it is always necessary to use the mounting plate.

Power terminals can be protected against direct finger contact by the addition of shrouds and/or insulated terminal blocks, to be ordered separately (see page 27075/3).

(2) Standard IEC 60947-4 specifies a tripping time for 7.2 times the setting current I_n :

- class 10: between 4 and 10 seconds,
- class 20: between 6 and 20 seconds.

Protection components

3-pole electronic thermal overload relays, model LR9 F for motor protection

Compensated overload relays, class 10 or 20 with alarm

Thermal overload relays:

- compensated,
- with relay trip indicator,
- for a.c.,
- for direct mounting on contactor or independent mounting (1),
- class 10 or 20 by selector switch,
- protection of 3-phase or single-phase circuits by selector switch,
- with alarm function that enables tripping to be forestalled.

Relay setting range	Fuses to be used with selected relay		For direct mounting beneath contactor LC1	Reference	Weight
	aM	gG			
A	A	A			kg
30...50	50	80	F115...F185	LR9 F57	0.885
48...80	80	125	F115...F185	LR9 F63	0.900
60...100	100	200	F115...F185	LR9 F67	0.900
90...150	160	250	F115...F185	LR9 F69	0.885
132...220	250	315	F185...F400	LR9 F71	0.950
200...330	400	500	F225...F500	LR9 F75	2.320
300...500	500	800	F225...F500	LR9 F79	2.320
380...630	630	800	F400...F630 and F800	LR9 F81	4.160

(1) When mounting overload relays up to size **LR9 F71** directly beneath the contactor, they may be additionally supported by a mounting plate (see page 27075/3). Above this size it is always necessary to use the mounting plate.

Power terminals can be protected against direct finger contact by the addition of shrouds and/or insulated terminal blocks, to be ordered separately (see page 27075/3).

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LR9 F57