

PFR 120b

80b

60b

96b

SALIENT FEATURES

- Manual, auto switching control
- Automatic C/K and rated step adjustment
- Automatic CT polarity correction
- Alarm Relay
- User-friendly setting
- Complies with IEC 61000-6-2 standard



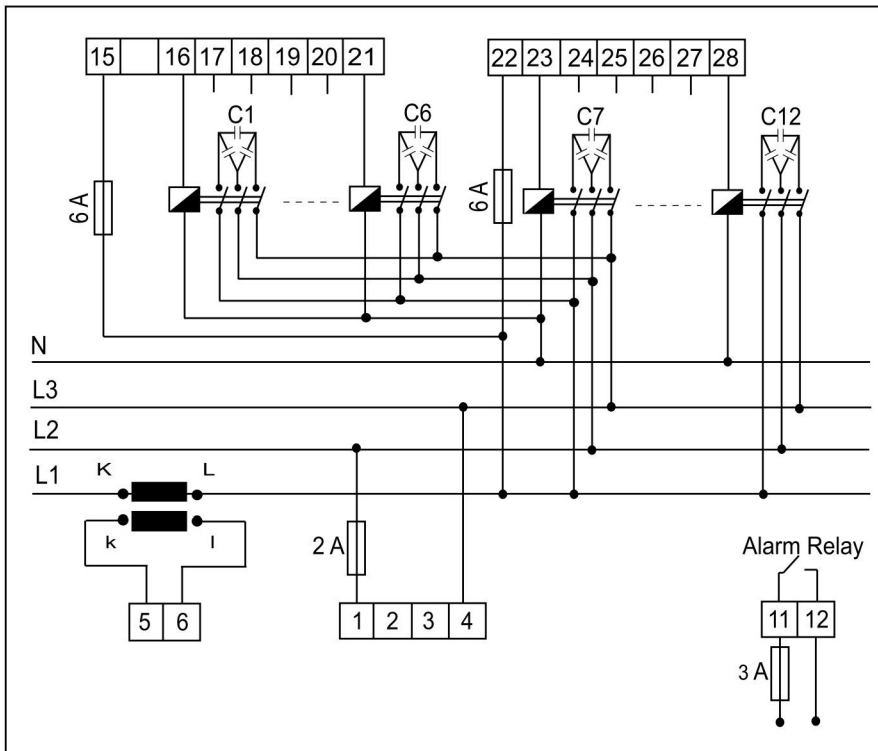
APPLICATION

Power Factor Controllers are used for measurement and control of power factor control units for central reactive power compensation. The Power Factor measured by PFR is compared with the set point values in order to provide necessary compensation, Power Factor Controller switches capacitor steps ON and OFF automatically. PFR is microcontroller relay, designed for flush mounting with rear plug-in connectors. In addition it displays the system's $\cos\phi$, in Automatic Operating Mode, PFR displays the RMS value of Voltage (V), Current (I), Active Power (W), Reactive Power (kvar) and Apparent Power (VA) of measuring phase.

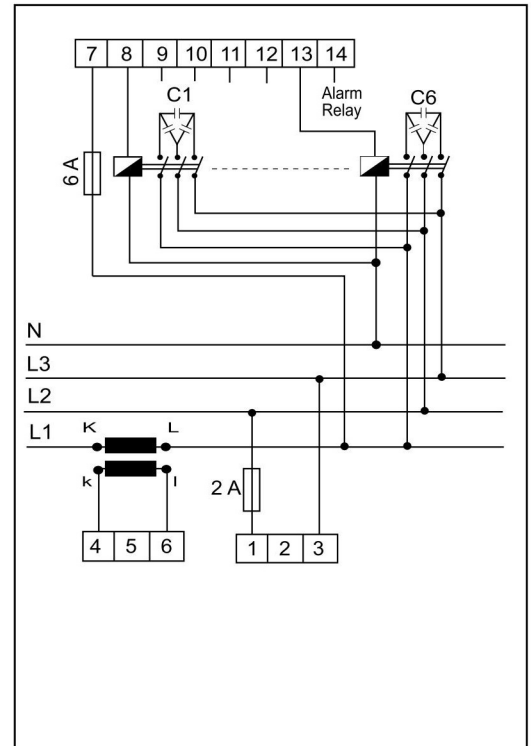
GENERAL TECHNICAL PARAMETERS

Function	Specifications	Data
Auxiliary Supply	Rated Voltage (Un)	240/415V
	Operating Voltage Range	(0.9-1.1)xUn
	Power Consumption	3VA – 10VA
	Rated Frequency	50 Hz / 60 Hz
Current Input	Rated current	5A
	Power Consumption	2VA max
	Operating Current Range	50 mA-5.5A
	Rated Frequency	50 Hz / 60 Hz
Relay Output	Numbers of outputs	6 / 8 / 12 (PFR96b, PFR60b/ PFR80b / PFR120b)
	Output Contact	5 A, 250V (NO Contact)
	Expected electrical life	> 100000 operations at rated current
	Expected mechanical life	> 5000000 operations
	No-Volt Feature	In case of power failure longer than 200 msec.all capacitor steps are disconnected automatically
	Alam relay	1 (NO Contact)
Control Range	Cosφ setting	0.85 (ind.)-1.00
	C/k Setting	Automatic / 0.02-1.0
	CT Value	5-10000/5
	Time Delay (on, off)	Between 2 sec.-1800 sec
	Over Voltage Values	240-275 (265) V/ 410-480 (475)V
	Switching Program	PS1 – PS5
Environmental Conditions	Ambient Temperature	-5°C - 55°C
	Humidity	5% - 95% non-condensing
	Protection Class	IP 40
	Terminal Block Protection Class	IP 00
	Equipment Protection Class	Double Insulation-Class II
Mechanical	Mounting	Panel mounting
	Connections	Socket terminals with screw
	Dimension (HxWxD)	143x143x67mm / 96x96x91mm
	Switchboard cut-out	139x139mm / 91x91mm
	Weight	0.8 kg

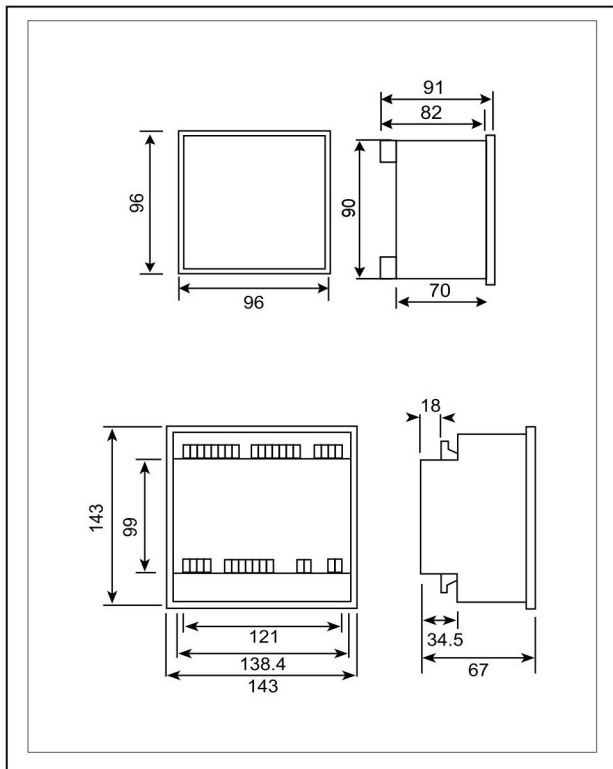
TYPICAL APPLICATION DIAGRAM



PFR96B (96X96)



DIMENSIONS



ORDERING INFORMATION

MODEL	DESCRIPTION
PFR60b - 415 - 50	6 Steps, 50 Hz system, auxiliary voltage 380~415 V AC
PFR80b - 415 - 50	8 Steps, 50 Hz system, auxiliary voltage 380~415 V AC
PFR120b - 415 - 50	12 Steps, 50 Hz system, auxiliary voltage 380~415 V AC
PFR96b - 415 - 50	6 Steps, 50 Hz system, auxiliary voltage 380~415 V AC
PFR 60b - 220 - 50	6 Steps, 50 Hz system, auxiliary voltage 220~240 V AC
PFR 80b - 220 - 50	8 Steps, 50 Hz system, auxiliary voltage 220~240 V AC
PFR 120b - 220 - 50	12 Steps, 50 Hz system, auxiliary voltage 220~240 V AC
PFR 96b - 220 - 50	6 Steps, 50 Hz system, auxiliary voltage 220~240 V AC
PFR 60b - 415 - 60	6 Steps, 60 Hz system, auxiliary voltage 380~415 V AC
PFR 80b - 415 - 60	8 Steps, 60 Hz system, auxiliary voltage 380~415 V AC
PFR 120b - 415 - 60	12 Steps, 60 Hz system, auxiliary voltage 380~415 V AC
PFR 96b - 415 - 60	6 Steps, 60 Hz system, auxiliary voltage 380~415 V AC
PFR 60b - 220 - 60	6 Steps, 60 Hz system, auxiliary voltage 220~240 V AC
PFR 80b - 220 - 60	8 Steps, 60 Hz system, auxiliary voltage 220~240 V AC
PFR 120b - 220 - 60	12 Steps, 60 Hz system, auxiliary voltage 220~240 V AC
PFR 96b - 220 - 60	6 Steps, 60 Hz system, auxiliary voltage 220~240 V AC