

Voltage and Motor Protection Relays

Motor Protection Relays

Asymmetry-Hysteresis-Off Delay Adjusting-PTC Motor Protection Relay (MKR-05)

Application and Operation Principles

MKR-05 : Main problems for industrial type electric motors are the phase to phase voltage fluctuations and extreme overload occurrences. MKR-05 is designed in principle to eliminate such inconveniences.

Asymmetry : It performs according to the phase-phase voltage balance. Asymmetry ratio is adjustable upon the choice. The phase-phase voltage difference can be adjustable in between %5 and %25 of the nominal voltage. When the phase- phase voltage difference is within the set intervals the LED is turned on and the relay is switched on. When the phase-phase voltage difference exceed the set value the LED turns off and the relay switches off. The relay will be switched on once the voltage difference is reached to the set value.

Hysteresis : It is used to adjust input - output voltage difference in between %1 and %10 of the output voltage.

PTC : Overload causes overheating on the motor coil. This may be resulted with the destruction of the motor insulation. Consequently the motor will be under the risk of the burning. PTC is used to protect motors against overheating.

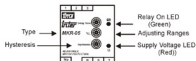
Technical Datas

Supply Voltage	: 3X380VAC 50-60 Hz
Relay Output	: 250VAC-5A
Adjusting Range	: +5% - +20% (Phase to Phase)
Hysteresis	: max. 10V
Delay Time	: 1 - 10 sec. (Adjustable)
Setting Error	: +3%
PTC Cut-off Resistance	: 1600 -2000 ohm.
PTC Reversing Resistance	: 1000 - 1400 ohm
Operation Temperature	: -40°C., +50°C
Net Weight	: 304 gr

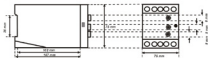
Order Informations

Type	Supply Voltage	Contact Output
MKR - 05	3X380V AC 50-60Hz	250VAC-5A

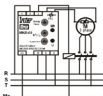
Front View Informations



Dimensions



Connection Diagram



Terminals

- 1 : Normally Closed Contact
- 2 : Common Contact
- 3 : Normally Open Contact
- Mp : Neutral
- R : R Phase Input
- S : S Phase Input
- T : T Phase Input
- PTC : PTC Inputs