

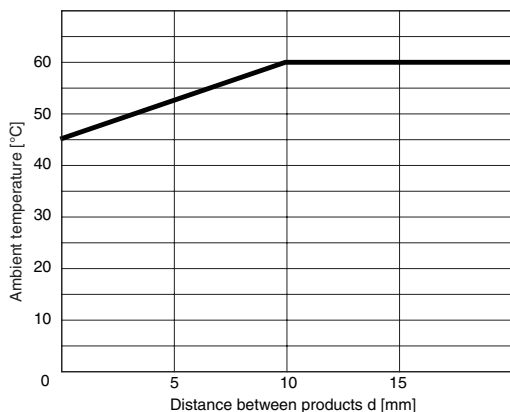
## Specifications

<b>Input voltage range</b>		200 to 480 VAC
<b>Input frequency</b>		50/60 Hz (no presumed range)
<b>Overload capacity</b>		Continuous 528 V
<b>Phase loss detection level</b>		80%±10% of rated input Calculation Formula = 1 - ((Highest phase-to-phase voltage - Lowest phase-to-phase voltage)/Average three-phase phase-to-phase voltage)
<b>Applicable standards</b>	<b>Conforming standards</b>	EN 60947-5-1 Installation environment (pollution level 2, installation category III)
	<b>EMC</b>	EN 60947-5-1
	<b>Safety standards</b>	UL 508 (Recognition), Korean Radio Waves Act (Act 10564), CSA: C22.2 No.14, CCC: GB14048.5
<b>Insulation resistance</b>		20 MΩ min. Between external terminals and case Between input terminals and output terminals
<b>Dielectric strength</b>		2,000 VAC for one minute Between external terminals and case Between input terminals and output terminals
<b>Noise immunity</b>		1,500 V power supply terminal common/normal mode Square-wave noise of ±1 μs/100 ns pulse width with 1-ns rise time
<b>Vibration resistance</b>		Frequency: 10 to 55 Hz, acceleration 50 m/s <sup>2</sup> 10 sweeps of 5 min each in X,Y, and Z directions
<b>Shock resistance</b>		100 m/s <sup>2</sup> , 3 times each in 6 directions along 3 axes
<b>Degree of protection</b>		Terminals: IP20

### ● Relationship of Mounting Distance between K8AK-PH Relays and Ambient Temperature (Reference Values)

The following diagram shows the relationship between the mounting distances and the ambient temperature.

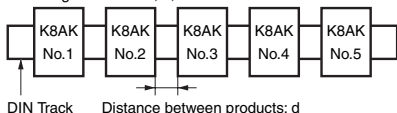
If the relay is used with an ambient temperature that exceeds these values, the temperature of the K8AK may rise and shorten the life of the internal components.



#### Test method

Sample: K8AK-PH

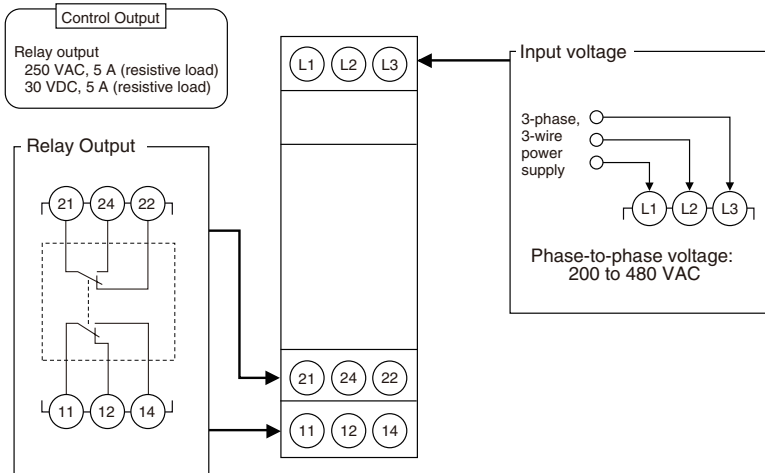
Mounting distances: 0, 5, and 10 mm min.



# K8AK-PH

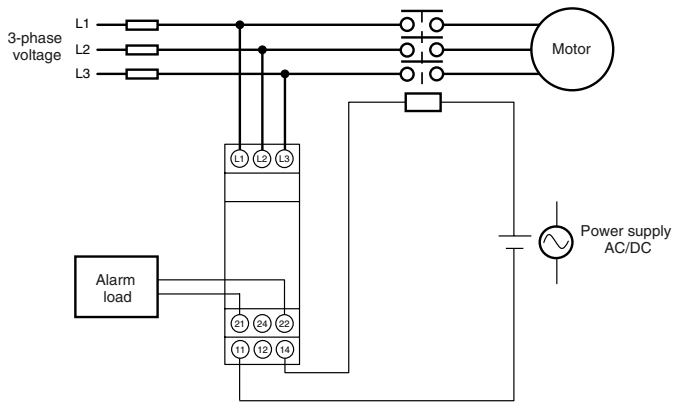
## Connections

### Terminal Diagram



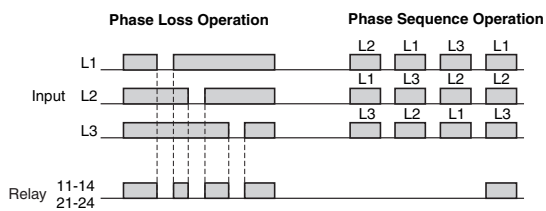
**Note: 1.** Use the recommended ferrules if you use twisted wires.

### Wiring Example



### Timing Charts

#### ●Phase Sequence and Phase Loss Operation Diagram



- Note: 1.** The K8AK-PH1 output contacts are normally operative.  
**2.** The Relay will not operate if the input voltage drops below 70% of the minimum input value because L1 and L2 are also used to provide power.  
**3.** Phase loss cannot be detected on the load side because this detection is based on the voltage.