

MHS Series

1/12-12 HP • 110-77 VAC • 50/60 Hz



Product Overview

The MHS Series Hard Start Kits are engineered to enhance the starting torque of single-phase electric motors. Each kit includes a start capacitor and an integrated switching device. During startup, the capacitor delivers additional current to the motor's start winding, providing the extra torque required for initial rotation. Once the motor reaches its optimal operating speed, the switching device automatically disconnects the capacitor, ensuring efficient and reliable performance.

Features & Benefits

FEATURES	BENEFITS
Use on 1/12 to 1/3 Hp (MHS 410 and MHS 810)	Combines a solid-state relay, overload, and start capacitor in one unit
Use on 1/2 to 10 Hp (MHS 5 and 6)	Delivers up to 400% torque boost for fast, reliable startup
Easy 5-wire (MHS 410 and 810) or 2-wire (MHS 5 and 6) installations	Meets a broad range of applications

Applications

- **HVAC Compressors:** Ensures fast startup under low voltage or high head pressure
- **Refrigeration Systems:** Improves compressor reliability in tough conditions
- **Commercial Appliances:** Supports reliable startup for fractional HP compressors and motors

Compliance & Safety

- RoHS Compliant
- Manufactured using UL-recognized internal components
- Meets global electrical and thermal protection standards
- Designed to comply with UL 810
- Safe for use in HVAC/R and light commercial motor applications
- **Not intended for continuous duty operation**

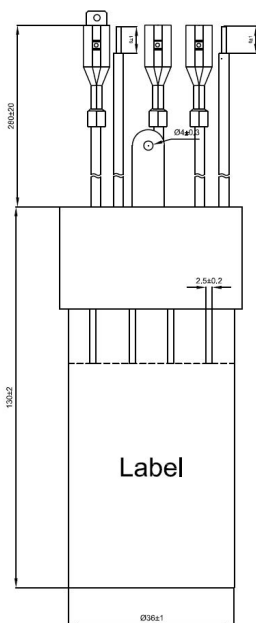
Electrical Specifications

Input Voltage Range	110-277 VAC
Frequency	50/60 Hz
Capacitance Range	43-292 μ F
Mounting Method	Clip mount or screw mount
Operating Temperature	-40 °C to +65 °C
Storage Temperature	-40 °C to +85 °C
Humidity Tolerance	\leq 95% RH (non-condensing) – suitable for humid environments, but not for exposure to moisture or condensation

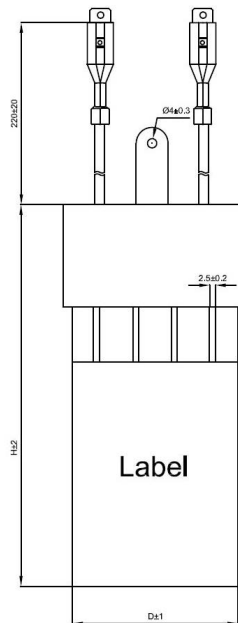
Order Information

MeK-Tronics P/N	Special Function	Termination	Input Voltage	Capacitance (μ FD)	Frequency	Weight
MHS-410	Solid state relays and capacitor. Works on RSIR; CSIR; PSC; and CSR compressors.	5 wires leads	110-125 V	243-292	50/60 Hz	0.5Lb
MHS-5	Positive temperature coefficient (PTC) relay and capacitor; easy 2-wire installation	2 wires leads	90–277 V	43-52	50/60 Hz	0.5Lb
MHS-6	Positive temperature coefficient (PTC) relay and capacitor; easy 2-wire installation	2 wires leads	90–277 V	130-156	50/60 Hz†	0.5Lb
MHS-810	Solid state relays and capacitor. Works on RSIR; CSIR; PSC; and CSR compressors.	5 wires leads	110-125 V	145-173	50/60 Hz	0.5Lb

Outline Dimensions (mm)



MHS-410 / MHS-810



MHS-5 / MHS-6