Motor Current Sensor

Equilibrium Point IOT, Inc.

1.0 FEATURES

- Integrated on the EQP IOT platform, powered by AWS
- Measures AC current and on-time duration of motors and other AC equipment
- Sends status and alerts to EQP IOT platform

2.0 GENERAL DESCRIPTION

The EQP Motor Current Sensor is a compact, reliable sensor that is compatible with almost any type of AC powered equipment. The minimally invasive design enables easy attachment to AC power cables. The AC current in the cable is detected by a split core magnetic transformer, and the current magnitude + on-time duration is transmitted to the gateway over the local EQP sensor network. Real time notification permits rapid response to system failures, which minimizes down time and prevents costly malfunctions.

3.0 DEVICE CHARACTERISTICS

Absolute Maximum Ratings [†]

Vcc (USB Supply)..... 6.5V

AC Current..... 35A

Storage Temperature..... -40°C to 80°C

Operating Temperature..... -20°C to 60°C

ESD Protection..... >2kV

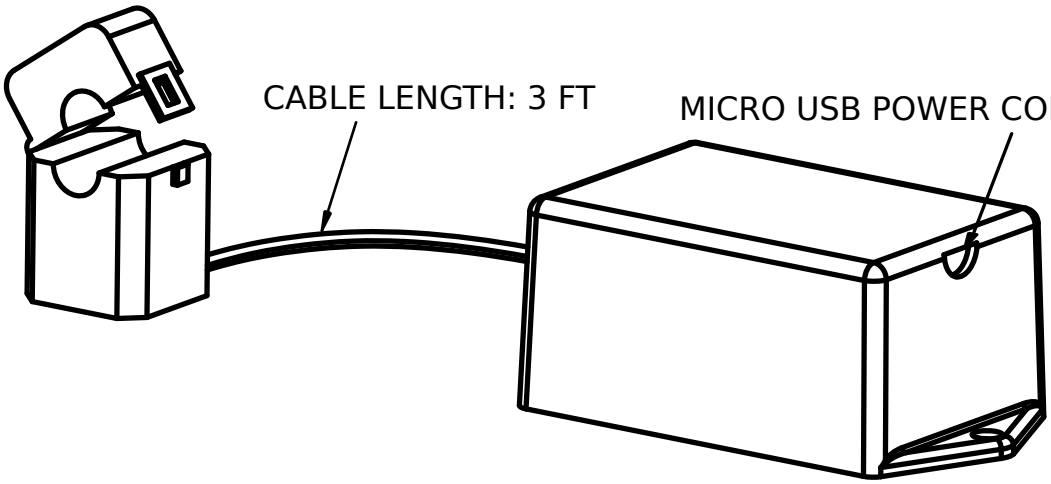
Drop Height..... 2m

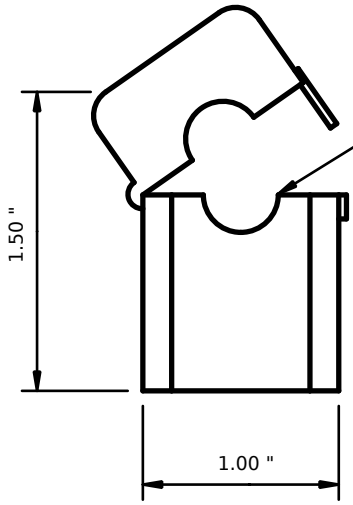
Relative Humidity..... Dew Point

† NOTICE: Stresses above those listed under “Absolute Maximum Ratings” may cause permanent damage to the device. This is a stress rating only and functional operation of the device at those or any other conditions above those indicated in the operational listings of this specification is not implied. Exposure to maximum rating conditions for extended periods may affect device reliability

Table 1-1: Operating Characteristics

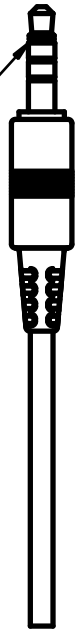
Sym	Characteristic	Min.	Typ.	Max.	Units	Conditions
Vcc	Input Voltage	4.5	5	6.5	V	USB Supply
Is	Standby Current	-	80	-	mA	-
It	Transmit Current	-	-	160	mA	-
Pd	Power Dissipation	-	-	1	W	-
Im	AC Current	3	-	30	A	Detection Range

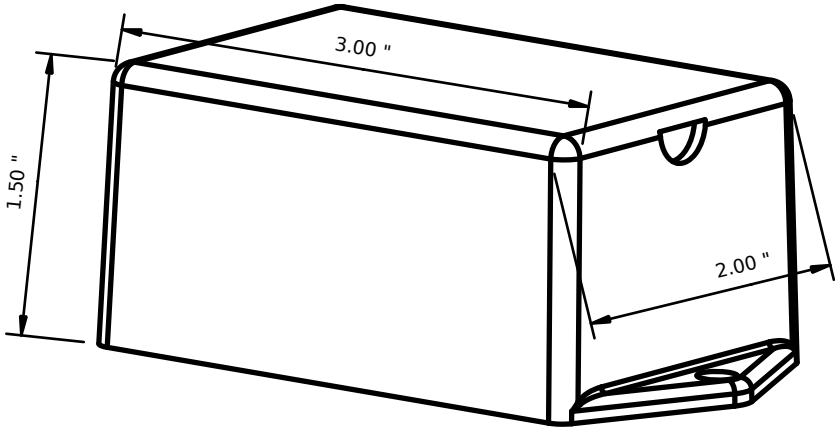




COMPATIBLE WITH CABLE DIAMETER UP TO 0.39"

3.5MM SENSOR CONNECTOR





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