

UCM Series Standard Features

AccQClamp™ Mounting Provision Universal one-size-fits-all design automatically adjusts

High/Low Trip Setting Selection No minimum load current requirement, and no load surveys needed.

Trip Response .001 Seconds Coordinates with current limiting fuses, as well as other protection devices

Internal Magnetic Shielding Prevents adjacent phase effects

URD Cable Mounted Fault Indicators aid in locating faulted cables and equipment on underground distribution systems. Indicators are self powered and consist of a solid state current sensor connected to faulted circuit display.

Units are designed for direct installation to an underground power cable using a spring loaded, over center toggle clamp mounting provision. The clamp accommodates cables ranging from .4 to 2.2 inches in diameter and includes retainer pads to prevent slip and twist. The clamp positions the cable conductor at a constant distance from the current sensor, maintaining indicator trip accuracy over the entire range of cable sizes.

Designs feature compact, shielded and sealed, corrosion resistant construction. The indicator is enclosed in a durable, impact resistant Lexan housing and includes a built-in pulling eye for easy hotstick installation and removal from the cable.

Basic Operation

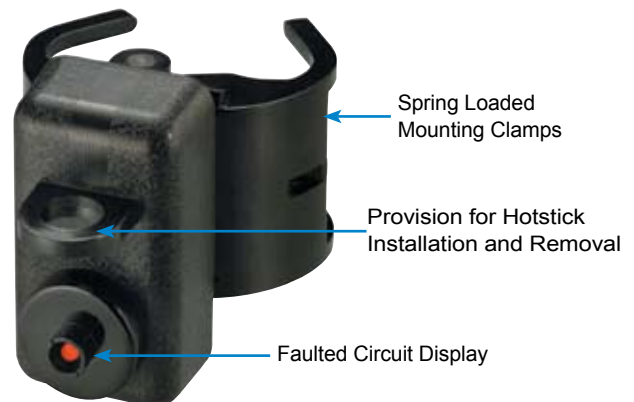
A faulted circuit produces an associated magnetic field which closes a reed switch in the indicator resulting in a tripped display. Trip response occurs in .001 seconds allowing the fault indicator to properly coordinate with all types of circuit protection schemes including current limiting fuses.

URD Cable Mounted Fault Indicators are constructed with an internally shielded current sensor that prevents inadvertent tripping when located in close proximity to adjacent phases, such as junction mounted applications.



UCMTL
Model

Fault Indicators



SPECIFICATIONS FOR UCM TIME RESET, LED DISPLAY: MODEL UCMTL

Nominal Voltage	4.16-60kV (L-L)
Nominal Trip Ratings	Low, 400 Amp; High, 800 Amp
Trip Response Time	1mS
Maximum Surge Level	25kA 10 Cycles 60 Hz
Effect of Adjacent Phase	Internal Shielding Prevents Adjacent Phase Effects
Display Type	Flashing Super Bright LED
Flash Rate	30 Flashes per Minute
Reset Time	4 Hour - Standard
Power Source ¹	3.6 volt Lithium Thyonil Chloride Battery
Battery Capacity	2.4 Ah
Battery Operating Life	1200 Flash Hours Minimum
Battery Storage Life	15-20 Years
Temperature Range	-40°C To +85°C
Housing Material	Mounting Boot – EPDM Conductive Rubber Housing Body – UV Stabilized Polycarbonate Polymer
Weight	258 Grams

Footnotes

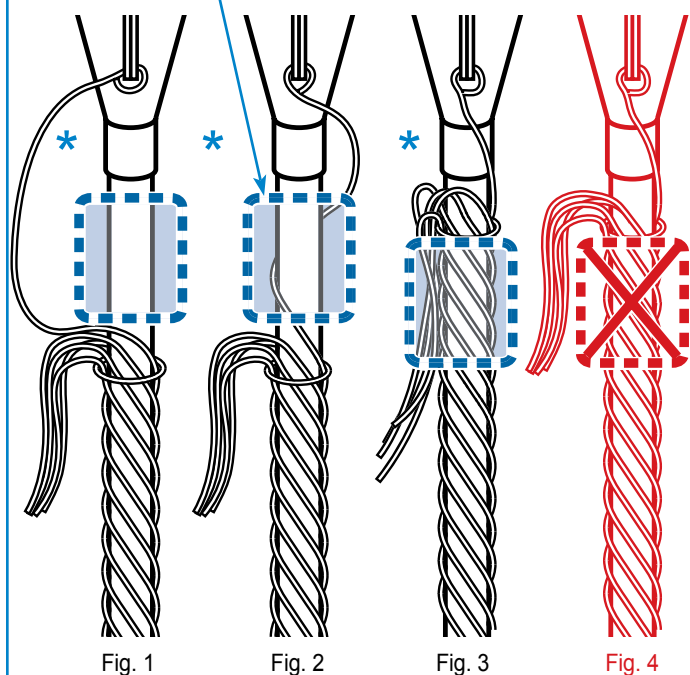
- 1) Battery powers LED and it is active only when LED is ON. Lithium Thyonil Chloride batteries provide accurate indication throughout the entire temperature range.
- 2) Certified per ANSI/IEEE Standard 495-1986



TYPICAL INSTALLATION

As shown below, proper installation of URD Cable Mounted Fault Indicators requires routing cable neutral wires to prevent the ground return from affecting trip accuracy. Similar procedures should be followed for tape, wire, LC or other types of shielded cable constructions.

INSTALL FAULT INDICATOR IN AREA SHOWN

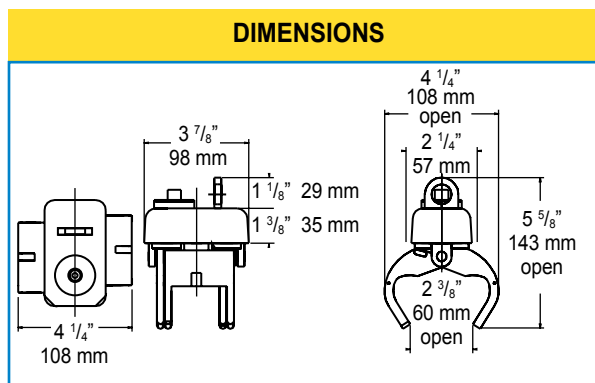
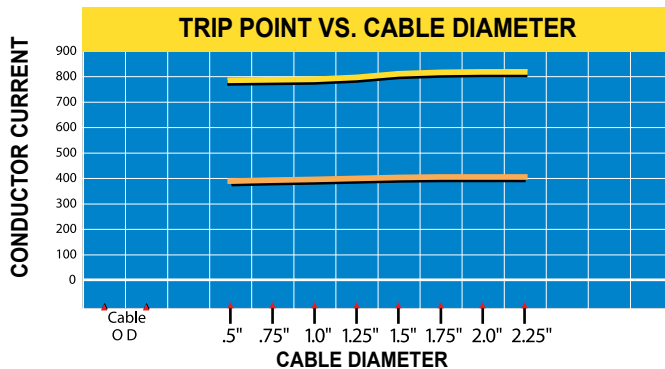
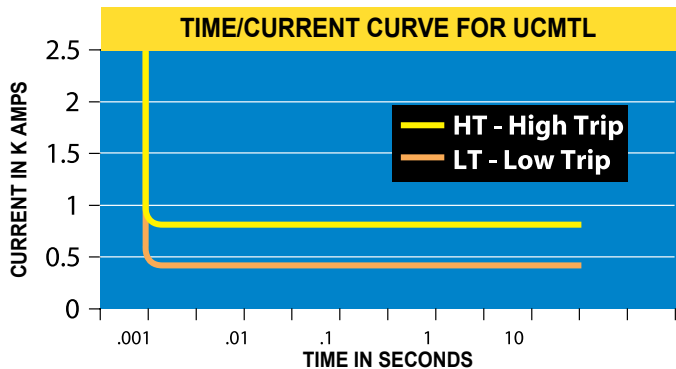


* Recommended

INCORRECT

Do not install indicator directly over the concentric neutral to avoid misindication (Fig. 4)





ORDERING INFORMATION

CATALOG PREFIX

Catalog Number	Description	Reset Operation
UCMTL	Time Reset with LED Display	Indicator auto-resets to normal after a four-hour time duration. Indicator may also be manually reset using an FTT test tool.

CATALOG SUFFIX

Catalog Number	Description
LT	All fused taps use LOW trip ratings. For 200 Amp circuits. URD applications, use LOW trip rating
HT	For 600 Amp circuits. URD applications, use HIGH trip rating

For overhead bulk feeder applications, use HIGH or LOW trip ratings (whichever is greater than the minimum pickup setting of the related protection device).

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Fault Indicators