Technical Specs

CI-TX

Size	315x255x150 mm
Weight	3 kg
Protection degree	IP65
Display	Monochrome 160x100
Rechargeable battery	8.4V 6.6Ah Li-ion
Battery charger input	100-240VAC 50/60Hz
Battery charger output	12VDC 2A
Car lighter charger	Yes
Operating Temperature	-10ºC a 55ºC

Energized Cables

Signal type	current pulses
Injected signal amplitude	100A peak
Max. network voltage	440Vac
Operation time	>24h

De-energized cables

Signal type	current frequency
Active signal power	10W
Operation time (level 2)	>24h

CI-RX

Size	120x220x65 mm
Weight	0,75 kg
Protection degree	IP54
Display	Color TFT 240x400
Batteries	4x1,5V AA
Operating Temperature	-10ºC a 55ºC

Energized Cables

Active signal analysis (from TX)	amplitude and polarity
Passive current measurement	50/60 Hz RMS
Max. network current (50/60Hz)	500A RMS
Maximum cable length	>20Km

De-energized cables

Active signal analysis (from TX)	amplitude and polarity
Maximum cable lenght	>20Km
Max. loop resistance	1000 Ω

* Specifications subject to change without notice

Ariadna CI cable identifier complies with security Standard IEC 61010-1 CAT IV 600V

Power cable identification and location solutions

instruments

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ariadna
instruments

Ariadna CI
MV & LV cable identifier

www.ariadna-inst.com

Ariadna CI
MV & LV cable identifier

In electrical maintenance works, in order to cope with safety standards, it becomes necessary to identify de-energized cables unambiguously prior to its manipulation.
Cutting the wrong cable may result in the following consequences:
• personnel live threat
• power supply failure

ARIADNA CI cable identifier is an advanced, yet simple to operate, digital tool. It helps users to easily identify de-energized and energized MV&LV electrical cables among multiple conductors, in trenches, manholes, panels, aerial/underground conversions, etc.

Main Features:

• Identifies:
    - energized MV cables
    - energized LV cables
    - de-energized MV and LV cables

• Works with:
    - Single phase conductors (shielded or unshielded)
    - Three phase or 3 phase + neutral conductors

• Signal injection by:
    - Direct connection to cables
    - Signal induction through toroidal clamp (optional)

• Detects active signal's Amplitude and Polarity

• Maximum cable length > 20km (direct connection)

• Rechargeable Li-ion battery on transmitter (CI-TX):

• >24h at level 2 (up to 4) of transmission power

CI-TX

**CI-RX**

Energized MV cable identification

It works by sinking energy from a live network, by connecting a load at the LV side of an MV/LV transformer, and detecting the current that is produced at the MV side of the transformer.
The CI-TX unit acts as the signal transmitter that sinks energy from the electric grid, producing coded current pulses, and the CI-RX unit as the digitally tuned receiver that detects them.
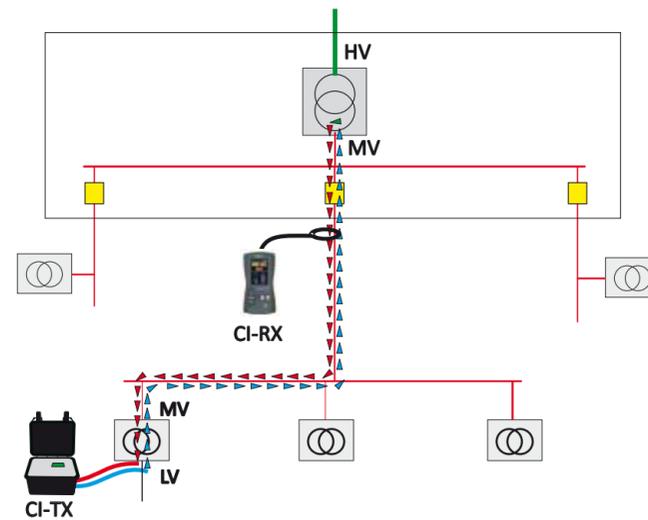
Energized LV cable identification

In a similar way to MV live cable identification, it is possible to identify LV energized cables by sinking current from the network.
CI-TX transmitter is connected at the end side of the LV cable to be identified. When turned on, it starts to sink current pulses from the network, and these pulses flow from the point of injection to the LV transformer that feeds it. With the CI-RX unit it is possible to identify LV cable path in any accessible places, like manholes, busbars, etc.
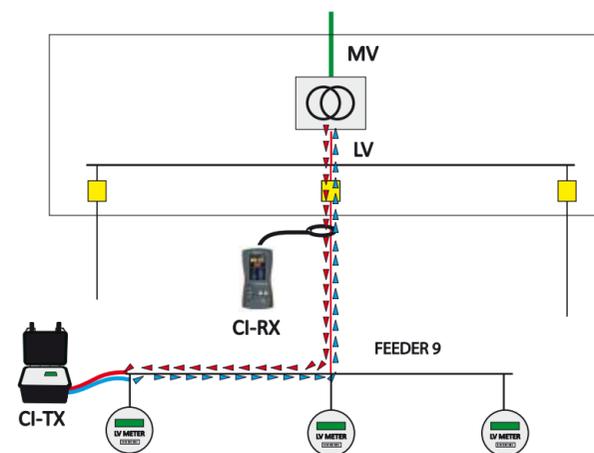
De-energized MV & LV cable identification

Through polarized frequency signal injection and detection, it is possible to positively identify de-energized cables.
Unlike live cable identification, the needed energy for generating identification signals comes from CI-TX's rechargeable li-ion battery, instead of coming from the grid.
Two ways are available for injecting signals on cables, through direct connection or by using a toroidal inductive clamp.
Afterwards cables are identified by measuring produced signal's amplitude and polarity.