



KINECTRICS

Medium Voltage Cable Commissioning & Aging Management

For Renewables & Maintenance of Distribution Feeders





Supporting your reliability objectives with an unbiased third-party test partner.

Why Kinectrics?

- We deliver **comprehensive testing and diagnostic services** for medium voltage (5–35 kV) cable systems.
- Our solutions support both the commissioning of new renewable energy facilities and the maintenance of underground distribution infrastructure.
- We help asset owners **ensure system reliability, reduce operational risk, and make informed decisions** regarding cable performance and lifecycle management.

We use **advanced testing methods** to detect defects, assess insulation, and precisely locate anomalies across MV cable systems, including:

➔ Commissioning Testing

- Renewables
 - Solar farms
 - Wind farms
 - Battery storage facilities
- Underground projects
- Data centers

➔ Maintenance & Aging Assessment

- Renewables
- Underground distribution systems
- PILC cable systems
- Wet aging analysis for legacy infrastructure



Technical Capabilities.

- **Partial Discharge (PD) Testing**
Single, dual-ended or distributed sensor measurements with time-synchronized localization for accurate defect identification and location.
- **AC Withstand Testing**
Full 15-minute withstand testing in accordance with the latest IEEE and IEC standards.
- **Reflectometry**
Advanced TDR & FDR techniques provide redundant localization of impedance discontinuities and insulation anomalies.
- **Wet Aging Analysis**
Specialized protocols for PILC and polymer based insulation cable types to assess moisture ingress and insulation degradation.

With **decades of electrical infrastructure expertise**, we have developed proven and innovative testing solutions & protocols to ensure the reliability and longevity of MV cable systems.

Forensic Cable Analysis & Lifecycle Services.

Kinectrics brings **over 35 years of expertise in forensic investigation and root cause analysis of extruded and oil-filled cables (600 V–420 kV)** across utility, industrial, and generation sectors.

Our services summarized below support high-criticality environments with low failure tolerance and include:

- Electrical condition assessment
- Breakdown and diagnostic testing
- Cable sectioning and microscopic analysis
- Advanced polymer materials testing
- Standards-based qualification and compliance



Value-Driven Solutions.



Standards Compliance

Testing aligned with the most current industry standards, ensuring regulatory and operational alignment.



Comprehensive Test Coverage

All major test types provided by Kinectrics, reducing coordination complexity and ensuring consistency.



Extended Warranty Option

Available for aged cables that meet acceptance criteria, providing additional assurance for asset owners.



Minimized Risk of False Results

Proprietary and proven test protocols reduce the likelihood of unnecessary rework or missed defects.



Let's work together.

Contact us today to ensure the performance and longevity of your MV cable systems.



www.kinectrics.com

Head Office

800 Kipling Ave, Unit 2
Toronto ,ON
M8Z 5G5

United Kingdom

2 Edward Court
George Richards Way
Altrincham, Cheshire, WA14 5GL

Romania

59 Grigore Alexandrescu Street
2nd Floor, Bucharest, 010623

Canada

393 University Ave, 4th Floor
Toronto, ON, M5G 1E6

Germany

Kinectrics GmbH
Hertha-Lindner-Straße 10-12
01067 Dresden

India

Sy No. 125, Banda Mailaram Village
Mulugu Mandal, Siddipet District
Telangana - 502 336

USA

2135 City Gate Lane, Suite 100
Naperville, IL, 60563