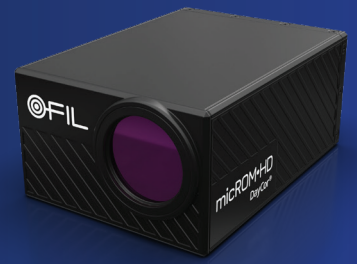




DayCor[®] micROM HD



In the world of critical electrical systems, the growing demand for power, aging infrastructure, and overloading of grids are leading to an increasing number of failures. The need for reliable solutions to ensure uninterrupted power supply and to efficiently manage the health of the electrical grid has never been more critical.

Spotting the Invisible: The Role of Corona Partial Discharge (PD) and Arcing Detection

Identifying corona PD and arcing is crucial in preventing power system failures. Early detection enables timely interventions to avoid costly and disruptive outages, maintaining system stability and performance.

DayCor[®] Technology Inside

Experience unmatched clarity and performance with OFIL's proprietary DayCor[®] technology. This camera sees the unseen by detecting corona PD and arcing, utilizing solar blind UV technology that operates in full daylight, unaffected by solar radiation. It captures a spectral range of UVC 240-280nm, ensuring superior detection capabilities.



DayCor[®] micROM HD

DayCor[®] micROM HD Solar Blind UV Camera is a UAV solution specifically designed to detect and pinpoint corona PD and arcing - a major but often unseen hazard to electrical equipment.

It's compact, lightweight, features a wide field of view and high - definition imaging.

With its electromagnetic shielding, it ensures optimal performance even in the most demanding conditions.

Its easy integration on UAVs, combined with the ability to integrate with various gimbals enhances its practicality and versatility

Product Key Features

Sensitivity:
Sensitivity to PD detection at 1pC @ 8m, certified by Eurotest lab.

Precise Pinpointing:
Ensures accurate fault localization.

HD Resolution:
720p video for detailed imaging.

Easy Integration on UAVs:
Offers multiple integration and gimbal choices, including kits for DJI M300/M350 and RtRobotics HERA.

Remote Inspection Capability:
Perform safe inspections from up to 40 meters*

Light Weight, Small Size:
Lightweight camera with energy-efficient usage, allowing longer and faster flights scanning power lines.

Electromagnetic Shielding:
Safely and accurately inspect power lines up close, ensuring data integrity and operational safety.

Control Protocols:
Supports a variety of UAV control protocols including PWM, MAVLINK, Ethernet, and UART.

DayCor Inside:
Embedded with proprietary DayCor technology for superior performance.



*The inspection distance can vary according to environmental conditions and corona PD intensity



Compact, Advanced, UAV-Integrated Solution

Product Benefits

- ⌚ **Reduced Maintenance Costs** with Aerial Efficiency
- ⌚ **Perform large-scale aerial inspections** and minimize the need for extensive ground-based inspections.
- ⌚ **Timely Identification and Rectification:** Don't react, act!
- ⌚ Ensuring you get **the best view of electrical equipment hazards.**
- ⌚ Specially designed for UAVs the camera offers **hassle-free integration** with various drone models and gimbals.

Applications



UAV Inspection of Transmission, Distribution, Substations and Generation

Commissioning | Periodic Inspections & Maintenance | Fault Investigation & Repair | Washing of Powerlines & Substations | Locating Sources of RFI/AN



UAV Inspection of Railways Overhead Lines and Traction Substations



UAV Inspection of Substations and Power Lines in Mines, Data Centers, and Heavy Industries



Gridnostic

Grid Reliability through Image Intelligence

Enhance your Grid performance by complementary Diagnostic and Inspection tools

Gridnostic is a software platform that leverages multi-sensor technologies including UV, RGB, and thermal, converts complex imagery data into clear numeric severity scores, and delivers actionable insights for efficient asset health management.

EPRI This product was developed based on research and guidelines from the Electric Power Research Institute (EPRI) and integrates all inspection data within a geospatial context, offering a strategic, map-based overview of grid performance.



micROM's Unique & Smart Features



Seamless Gridnostic Integration

Effortlessly manage and analyze inspection data with our advanced **smart data management** system.



Data Geotagging

Tagged with **precise GIS data**, making asset tracking and reporting easier than ever.

Product Accessories

Integration Kits: Includes gimbal and components for smooth and effortless integration.

- 🔄 DJI M300/M350 Integration Kit
- 🔄 RtRobotics HERA Integration Kit





TECHNICAL SPECIFICATIONS

UV - OPTICAL PROPERTIES

Minimum Discharge Detection	1pC @ 8 m Tested & certified by Innogy SE-Eurotest Germany: IEC 60270:2000
Minimum UV Sensitivity	7.8 x 10 ⁻¹⁸ watt/cm ²
Fields of View	H: 20° V: 11.25°
Focus	Auto focus
UV Zoom	3x digital continuous zoom; UV & Visible channels sync
Spectral Range	240-280nm

VISIBLE - OPTICAL PROPERTIES

Video Standard	HD, 720p ,1280 x 720
Fields of View	H: 20° V: 11.25°
Focus Range	5m to infinity, automatic & manual
Visible Zoom	3x optical

I/O & CONTROLS

Video Interface	HDMI, RTSP
Interfaces	RS232, MFIO-PWM, UART, Ethernet
Connectors	micro HDMI, RJ45, Power, AUX, MFIO-PWM

ENVIRONMENTAL

Storage and Operation Temp	-20°C up to +50°C
IP Rating	IP 42

MEDIA CAPTURE & DATA STORAGE

Video Format	MOV res. 720p
Stills Format	JPG
Digital Storage	Memory flash card Micro SD

PHYSICAL CHARACTERISTICS & POWER SOURCE

Weight	875gr (1.92lb)
Dimensions	L156 x W112 x H71mm L6.14" x W4.4"x H2.79"
Nominal Power Consumption	7-28V DC, 12 Watts

ACCESSORIES

Installation kits, Adaptors & Gimbals for various UAVs with and integration support, OFIL Reporting Software, Li-Po rechargeable batteries, Connect - Remote Control Desktop Software