



DayCor®

ROMPACT

PORTABLE SBUV BLOCK CAMERA

DayCor® ROMpact is a bi-spectral UV-Visible block camera module with excellent scanning & corona detection capabilities for remote inspection of high and medium voltage electrical installations while on the move.. Due to its small dimension and low weight ROMpact can be installed in payloads of various sizes and shapes and used on UAS. ROMpact can be mounted on fixed mounts and on motorized pan & tilt systems to scan assets such as substations or cabinets. The camera incorporates Ofil's solar blind DayCor® Technology with guaranteed excellent sensitivity to UV discharges of corona. ROMpact records, saves and transfers on-the-fly, in real time, pinpointed information about occurrences of corona partial discharge (PD) and of electrical faults. ROMpact is attractive to systems with size and weight limitation and to systems that wish to incorporate multi spectral sensors.

HIGH SPEED INSPECTION

ROMpact's high sensitivity to UVc radiation enables detection and capture of distant corona discharge. Imaging is direct and does not involve processing nor frames integration. The resulted videos are sharp, showing pinpointed information without any smearing even during high speed motion.

REMOTELY CONTROLLED

Systems are remotely controlled through a set of communication commands of RS232 standard. Wireless control is also optional.

EASY INSTALLATION & LOW WEIGHT

ROMpact cameras can be mounted onto existing gimbals or on any standard 1/4" thread tripod mount . Installation is simple and standard. Systems can be dismantled after use

VIDEO RECORDING & TRANSMISSION

Throughout inspections a videos is being transferred to a remote monitor . Selected findings can be recorded onto an onboard internal flashcard for further analysis and documentation. ROMpact can be used either as a stand-alone UV-Visible camera or in combination with other optical sensors such as IR

DAYCOR® TECHNOLOGY INSIDE

Implementing DayCor® technology ROMpact camera is a solar blind UV camera allowing operation in full daylight, blocking noise and false signals [Registered Patent EP112459B1].

STABILIZED PLATE

A rigid stabilizing plate keeps the system securely attached to its seat letting the payload stabilization system gain full control.

- » Rigid & Rugged
- » Light weight
- » Remotely controlled
- » Highest sensitivity to UV
- » Built-in recorder
- » Bi-Spectral UV-Visible
- » Fit for speedy inspections
- » Corona events counting
- » Powerful optical zoom
- » Stabilizing plate



TECHNICAL SPECIFICATIONS

ULTRA VIOLET (UV) - OPTICAL PROPERTIES

Sunlight Rejection	Absolute – at all sunlight and all weather conditions, target can be inspected with the sun in the field of view
Minimum Discharge Detection	1pC @ 15 meters (RWE certified: IEC 60270:2000) Tested & certified
Minimum RIV Detection	7.7dB μ V (RIV) @1MHz @10m (RWE Tested & certified: NEMA107-1987)
Minimum UV Sensitivity	1.9 x 10 ⁻¹⁸ watt/cm ²
Variable UV Gain	10 Steps, to enhance detectivity
Field of View H x V	8° x 6°
Detector Life Span	No degradation
Focus Range	1.5m 4.9ft – Infinity
Corona Color	Can be selected to accommodate for various scenes or match individual preferences
Spectral Range	240–280nm

VISIBLE - OPTICAL CONFIGURATION

Auto Focus Mode	Yes
UV/Visible Overlay Accuracy	Deviation < 1 milliradian
Minimum Visible Light Sensitivity	0.1Lux
Zoom	10 optical x 12 digital (120 optical x digital)
Quick Zoom	Yes

CONTROLS AND OPERATION

Video output	NTSC PAL standards
Operation Time	Unlimited. No overheating

PHYSICAL CHARACTERISTICS & POWER SOURCE

Storage and Operation Temp	-200C up to +550C -4°F up to +131°F
Weight	1.4kg 3.08 lb
Dimensions L x W x H	L245 x W125 x H101 mm (L9.65" x W4.92" x H3.9")
Nominal Power Consumption	7.5÷30 VDC, 14 Watts
Vibration and Shock	ETSI EN 300 019-2-5 V3.0.0 (2002-12), IEC 60068-2-64

INTERFACE

Power Supply	Inbound
Video Transmission	Outbound
Control Functions	Inbound/Outbound
Communication	RS-232 (baud rate: 9.6 Kb/s, 19.2 Kb/s, 38.4 Kb/s, Stop bit: 1/2 selectable)

MEDIA CAPTURE & STORAGE

Video Format	AVI
Digital Storage	Removable SD card

ACCESSORIES

CoronaWise - Corona Management Software; Inspection Guide

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