

# Robotic Inspection Vehicle™ (RIV)

Low Profile Robotic System for Stator Core Testing and Inspection  
Model RIV-702

The Iris Power Robotic Inspection Vehicle enables remote scanning of the stator core of large motors and generators with or without the rotor in place. Controlled from outside the stator bore, the Iris Power RIV provides easier and more efficient testing of stator lamination insulation when used with Iris Power's EL CID™. The RIV can also carry other lightweight transducers for stator inspection such as slot wedge tightness probes (Iris Power WTD™) and allows for visual inspection (Iris Power Model 752 Camera System).

- Fits into the air-gap for rotor-in-place testing
- Carries multiple modules: EL CID, Wedge Tightness Detector (optional), Camera (optional)
- Tests faster with reduced human fatigue and stress
- Follows a straight line along the stator teeth
- Scans the stator surface with optional Iris Power Camera



## KIT CONTENTS – MODEL 702

- Signal processor unit
- Tractor vehicle
- Vehicle control cable
- Output lead
- Power cable
- Spare fuses
- Adjustment tools
- User manual
- Rugged shipping case
- 30 cm Chattocks for EL CID (20, 25, 45 cm optional)

## OPTIONAL ACCESSORIES

- Camera system type 752
- Miniature WTD probe for wedge tightness detection

## FEATURES

- Auto-stop setting ensures RIV stops at preset distance
- Control unit outside stator core connects via single multi-core cable for power and signals
- Can be mechanically adjusted for various slot widths
- Curvature adjustment for various core diameters
- Low height (30mm) allows rotor-in-place testing
- Magnetically self-supporting on core surface
- Automatically detects the edges of the stator teeth to follow a straight line
- Side plates give additional guidance when wedges are recessed or when wedges and coils are removed
- Distance measurement via

# ROBOTIC INSPECTION VEHICLE (RIV)

## SPECIFICATIONS\*

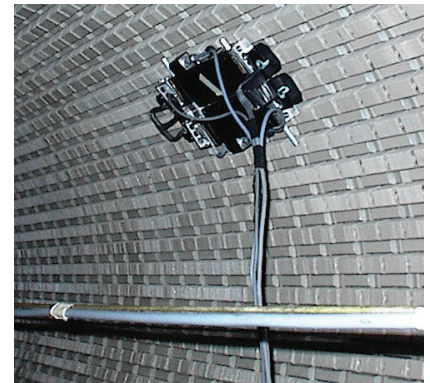
	Vehicle	Control Unit
Height	30mm – excluding payload	180mm
Overall Length	350mm with Chattock holders	430mm
Overall Width	Adjustable from 1 to 300mm	270mm
Weight	3.0 kg	7.2kg
Maximum Payload	2 kg in vertical climb mode	
Slot Pitch	65mm to 210mm	
Guidance	Automatic using magnetic sensors	
Distance Measurement	Optical encoder wheel, 0 to 9.99m	
Tractor Speeds	Nominally 2, 4 or 6 m/min	
Controls	Speed, direction and auto-stop distance	
Outputs	X axis pulses for EL CID	
Power Requirement	85-264 V, 50/60 Hz (<50VA) CAT II	
Operating Temperature	0°to +50°C (+32°to +122°F)	
Carrying Case Dimensions	55 x 72 x 30cm	
Total Weight	26.8kg	
Standards	EN61010-1, EN61326, CE marked	

\*Specifications are subject to change without notice

## ORDER

Part Nr.	Description
EL702	Robotic Inspection Vehicle Kit – Model RIV 702 including: 2 (30cm) flat chattocks, signal processor unit, tractor vehicle, operations manual, and shipping case.
<b>Optional accessories</b>	
	EL938 20 cm flat chattock
	EL939 25 cm flat chattock
	EL941 45 cm flat chattock

For other options, contact your sales representative



Robotic test in progress on a turbo generator (RIV feature is optional)

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