

# 9850-series Rotary sensor, single/dual output



6-Pin Contact



3-Pin Contact

The 9850 Gen II Series offers a highly reliable rotary potentiometer sensor module that can be easily integrated into a wide variety of space-conscious applications requiring installation simplicity, long service life and repeatable accuracy. The 9850 Gen II Series introduces a new, lower profile (15.2mm; maximum connector receptacle height 25.9mm), designed to perform in demanding environments.

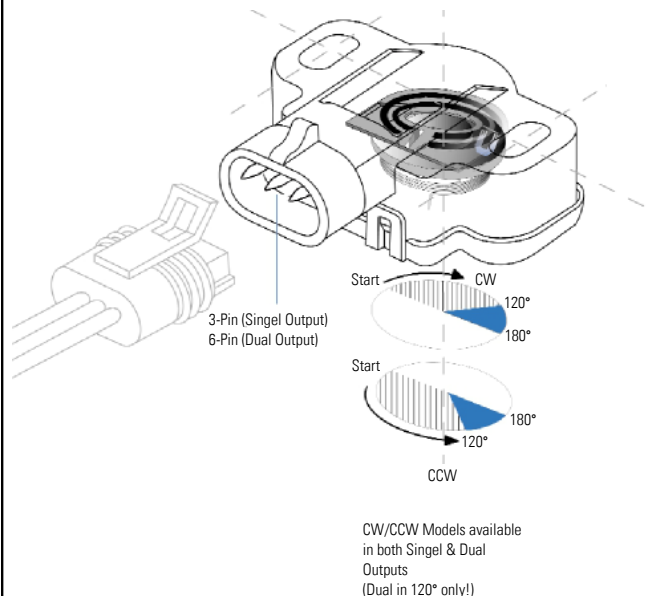
Manufactured for optimal cost-economies, the 9850 Gen II Series offers simple yet durable design strengths that can lead to significant systems costs savings. Plug-in simplicity and sealed connector contact is assured via an integral right-angle connector receptacle designed to accept industry-standard Packard Electric METRI-Pack™ connectors. This design also eliminates weak/stress points and leaks in exposure to water.

Twelve standard models offer a choice of 180° or 120° mechanical rotation with round or slotted mounting holes for optimal installation alignment

- Dual-output offers the added functionality of two sensors in a single sensor
- Sealed integral interface accepts industry-standard Packard Electric METRI-Pack™ connectors
- Low-profile design answers space-conscious applications
- Additional mechanical rotation angles available

ELECTRICAL SPECIFICATION	
<b>Active electric rotation</b>	85° or 130° Single Output 85° Dual Output
<b>Resistance</b>	5 kΩ ±20%
<b>Linearity over active electric rotation</b>	
<b>Standard</b>	±2%
<b>Special</b>	±0,5%
<b>Power rating at 70°C</b>	0,15 W
<b>Recommended load</b>	100 x R
ENVIRONMENTAL SPECIFICATION	
<b>Temperature range</b>	-40°C- +125°C
<b>Vibration</b>	15 Gs, 50 to 1000 Hz
<b>Humidity</b>	95 % at 40°C
<b>Shock</b>	50 Gs max.
MECHANICAL SPECIFICATION	
<b>Mechanical rotation</b>	120° - 180° single 120° dual
<b>Mechanical life</b>	5 million cycles
<b>Stop strenght</b>	max 0,68 Nm
<b>Torque</b>	max 0,11 Nm
<b>Mounting torque</b>	max 1,35 Nm
OPTIONS AVAILABLE	
<b>Integrated switch functions, user-specific electrical/mechanical rotation, mounting hole inserts, resistance and linearities</b>	

## INTEGRATED THICK FILM ELEMENT & PRECIOUS METAL CONTACT TECHNOLOGY



2015-02-16, specifications subject to change without notice

ISO 9001  
BUREAU VERITAS  
Certification

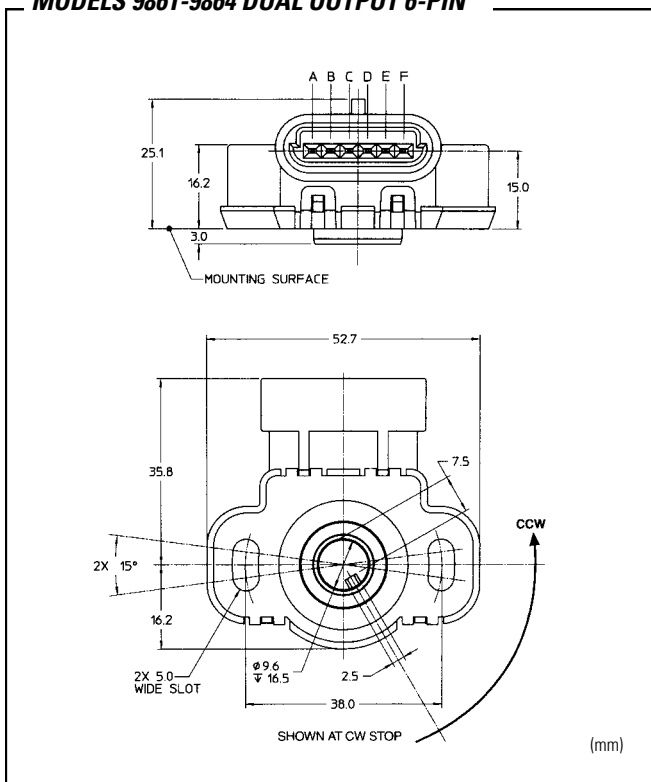


REGAL COMPONENTS AB • LEFFLERSGATAN 1 • SE-754 50 UPPSALA • SWEDEN  
+46 (0)18-65 70 00 • WWW.REGAL.SE • INFO@REGAL.SE

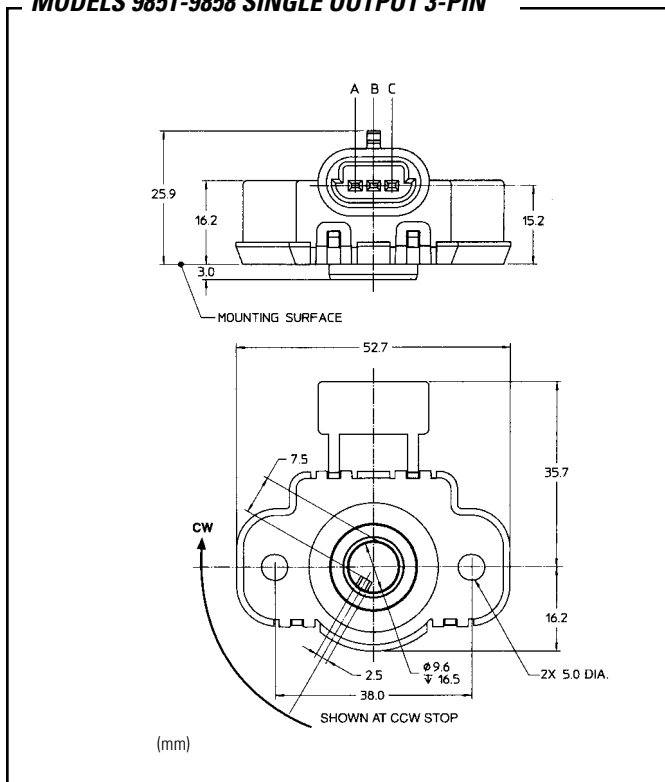
Regal

# 9850-series Rotary sensor, single/dual output

## MODELS 9861-9864 DUAL OUTPUT 6-PIN



## MODELS 9851-9858 SINGLE OUTPUT 3-PIN

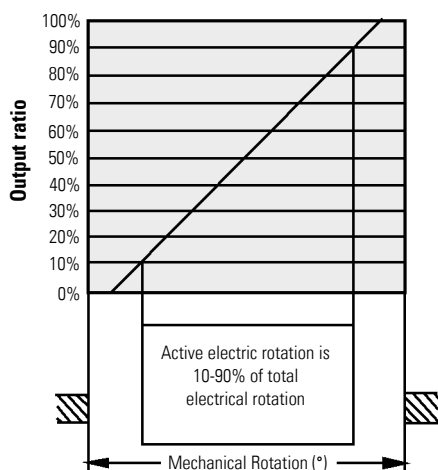


Model	Mechanical rotation	Active electric rotation	Rotation direction*	Mounting hole**
9861	120°	85°	CW	S
9862	120°	85°	CCW	S
9863	120°	85°	CW	R
9864	120°	85°	CCW	R

\*Spring-Return: CW Sensors return contact to CCW end CCW Sensors return contact to CW end  
 \*\* Mounting Hole style: S = Slotted, R = Round

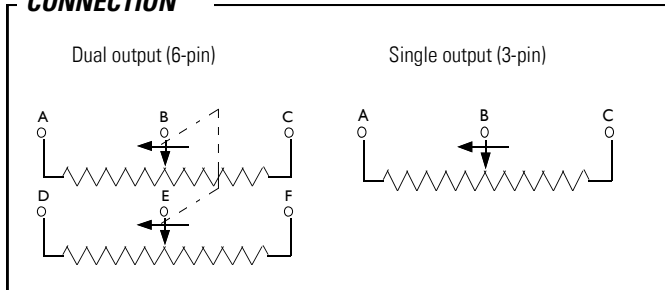
Model	Mechanical rotation	Active electric rotation	Rotation direction*	Mounting hole**
9851	120°	85°	CW	S
9852	120°	85°	CCW	S
9853	120°	85°	CW	R
9854	120°	85°	CCW	R
9855	180°	130°	CW	S
9856	180°	130°	CCW	S
9857	180°	130°	CW	R
9858	180°	130°	CCW	R

\*Spring-Return: CW Sensors return contact to CCW end CCW Sensors return contact to CW end  
 \*\* Mounting Hole style: S = Slotted, R = Round



Note: For rotation outside active electrical rotation, linearity may exceed specified tolerances.

### CONNECTION



2015-02-16, specifications subject to change without notice

ISO 9001  
BUREAU VERITAS  
Certification



REGAL COMPONENTS AB • LEFFLERSGATAN 1 • SE-754 50 UPPSALA • SWEDEN  
 +46 (0)18-65 70 00 • WWW.REGAL.SE • INFO@REGAL.SE

Regal