

Bush Mount : Incremental Rotary Position Sensor

RotaCol® bushing contactless rotary position sensors range are available in plastic and metal housings with 12, 22, 25, 28 and 30 mm Ø housing diameter. Bushing size : M9X0.75 / M10X0.75 / 3/8"X32 UNEF with shaft diameters of 6mm and 1/4" Ø are available. Bushing has brass sleeve bearing, Polymer sleeve bearing or Ball bearing. Mechanical angle is 360° without stop as default version. Enstops at 320°, 270°, 180° and 90° are also available. In case of the incremental interface, one revolution generates N pulses of signal A or B. The reference mark signal is produced once per revolution. Absolute sensor information can be provided by counting the number of pulses which matches with the actual absolute angle. Any number of pulses per revolution from 2 to 128, 256, 512, 1024 ppr are programmable. Maximum number of pulses are now 1024 ppr (default).

22I ERCB

Bush Mount : 22 mm Ø *Ecoline* Incremental Rotary Position Sensor



Interconnection - Flat cable

[Link for Datasheet :](http://www.rotacol.info/22iercb.pdf)
www.rotacol.info/22iercb.pdf

- 22mm Ø plastic housing
- Replacement of optical encoders
- 2 to 128, 256, 512, (1024 ppr. std)
- Bushing : M10X0.75 / M9X0.75 / 3/8"X32UNEF
- Shaft diameter : 6mm or 1/4"
- Mechanical angle : 360° without stop (O) 90°/180°/270°/320° with stop (S)
- Stainless steel shaft
- Brass sleeve bearing; polymer bearing (optional)
- Shock and vibration proof
- Interconnection : 5 core flat cable 0.15 mtr long

Type	22I ERCB
Electrical pulses	Any pulse from 2 to 128, 256, 512, 1024 (1024 ppr std)
Supply voltage	5V±10% / 9-30 VDC
Output signal	5V TTL; 5V / 24V Open collector
Resolution	4096 steps (12 bit)
Mech.speed (max)	800 rpm (brass); 3000 rpm (polymer)
Elec. speed (max)	1600 rpm
Rotary life	~ 10 mil. rotations (brass) ~ 15 mil. rotations (polymer bearing)

28I ERCB

Bush Mount : 28 mm Ø *Ecoline* Incremental Rotary Position Sensor



Interconnection - Flat cable

[Link for Datasheet :](http://www.rotacol.info/28iercb.pdf)
www.rotacol.info/28iercb.pdf

- 28mm Ø plastic housing
- Replacement of optical encoders
- 2 to 128, 256, 512, (1024 ppr. std)
- Bushing : M10X0.75 / M9X0.75 / 3/8"X32UNEF
- Shaft diameter : 6mm or 1/4"
- Mechanical angle : 360° without stop (O) 90°/180°/270°/320° with stop (S)
- Stainless steel shaft
- Brass sleeve bearing; polymer bearing (optional)
- Shock and vibration proof
- Interconnection : 5 core flat cable 0.15 mtr long

Type	28I ERCB
Electrical pulses	Any pulse from 2 to 128, 256, 512, 1024 (1024 ppr std)
Supply voltage	5V±10% / 9-30 VDC
Output signal	5V TTL; 5V / 24V Open collector
Resolution	4096 steps (12 bit)
Mech.speed (max)	800 rpm (brass); 3000 rpm (polymer)
Elec. speed (max)	1600 rpm
Rotary life	~ 10 mil. rotations (brass) ~ 15 mil. rotations (polymer bearing)

25I RSB

Bush Mount : 25 mm Ø *RS Speed Connect* Incremental Rotary Position Sensor



Interconnection - Miniature Connector

[Link for Datasheet :](http://www.rotacol.info/25irsb.pdf)
www.rotacol.info/25irsb.pdf

- 25mm Ø plastic housing
- Replacement of optical encoders
- 2 to 128, 256, 512, (1024 ppr. std)
- Bushing : M10X0.75 / M9X0.75 / 3/8"X32UNEF
- Shaft diameter : 6mm or 1/4"
- Mechanical angle : 360° without stop (O) 90°/180°/270°/320° with stop (S)
- Stainless steel shaft
- Brass sleeve bearing; polymer bearing (optional)
- Shock and vibration proof
- Interconnection : cable gland (OCG) / Miniature push-pull connector (OCM) / terminal block axial (OCTA) / radial (OCTR)

Type	25I RSB
Electrical pulses	Any pulse from 2 to 128, 256, 512, 1024 (1024 ppr std)
Supply voltage	5V±10% / 9-30 VDC
Output signal	5V TTL; 5V / 24V Open collector
Resolution	4096 steps (12 bit)
Mech.speed (max)	800 rpm (brass); 3000 rpm (polymer)
Elec. speed (max)	1600 rpm
Rotary life	~ 10 mil. rotations (brass) ~ 15 mil. rotations (polymer bearing)

30I RSB

Bush Mount : 30 mm Ø *RS Speed Connect* Incremental Rotary Position Sensor



Interconnection - Miniature Connector

Link for Datasheet :
www.rotacol.info/30irsb.pdf

- 30mm Ø plastic housing
- Replacement of optical encoders
- 2 to 128, 256, 512, (1024 ppr. std)
- Bushing : M10X0.75 / M9X0.75 / 3/8"X32UNEF
- Shaft diameter : 6mm or 6.35mm
- Mechanical angle :
360° without stop (O)
90°/180°/270°/320° with stop (S)
- Stainless steel shaft
- Brass sleeve bearing; polymer bearing (optional)
- Shock and vibration proof
- Interconnection : cable gland (OCG) / Miniature push-pull connector (OCM) / terminal block axial (OCTA) / radial (OCTR)

Type

30I RSB

Electrical pulses	Any pulse from 2 to 128, 256, 512, 1024 (1024 ppr std)
Supply voltage	5V±10% / 9-30 VDC
Output signal	5V TTL; 5V / 24V Open collector
Resolution	4096 steps (12 bit)
Mech.speed (max)	800 rpm (brass); 3000 rpm (polymer)
Elec. speed (max)	1600 rpm
Rotary life	~ 10 mil. rotations (brass) ~ 15 mil. rotations (polymer bearing)

13I M/Z MCB

Bush Mount : 12 mm Ø *Miniline* Incremental Rotary Position Sensor



Interconnection : terminal block

Link for Datasheet :
www.rotacol.info/13immcb.pdf
www.rotacol.info/13izmcb.pdf

- 12 mm Ø metal housing
- Precision Miniature bushing mount
- Low cost , Hall effect technology
- Bushing : 3/8" X 32 UNEF
- Shaft diameter :
Metric : 6mm (MMCB)
Inch : 1/4" (ZMCB)
- Compact size, long life
- Sleeve bearing
- Interconnection : terminal block

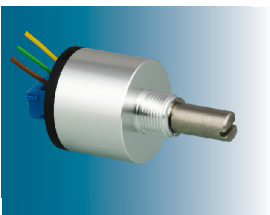
Type

13I M/Z MCB

Electrical pulses	1024 ppr
Electrical angle	360°
Supply voltage	3.3V ; 5V ± 10%
Output signal	3.3V TTL; 5V TTL
Resolution steps	4096 (12 bit)
Elec. speed (max)	1600 rpm
Rotary Life	~ 5 mil. rotations

22I M/Z SL RCB

Bush Mount : 22 mm Ø *Silverline* Incremental Rotary Position Sensor



Interconnection : terminal block (optional)

Link for Datasheet :
www.rotacol.info/22imslrcb.pdf
www.rotacol.info/22izslrcb.pdf

- 22 mm Ø metal housing
- Economical Hall effect magnetic sensor
- Robust metal aluminium housing with sleeve bearing (RCB)
- Bush mounting -
Metric M10 X 0.75 (MSL)
Inch 3/8" X32 UNEF (ZSL)
- Shaft diameter : Metric - 6mm (MSL)
Inch - 1/4" (ZSL)
- Mechanical angle : 360° without stop
- Long life
- Ball bearing
- Interconnection :
5 core flat cable 0.15 mtr long (std)
terminal block (option)

Type

22I M/Z SL RCB

Electrical pulses	Any pulse from 2 to 128, 256, 512 1024 ppr (1024 ppr std)
Supply voltage	5V±10% / 9-30 VDC
Output signal	5V TTL; 5V / 24V Open Collector
Resolution Steps	4096 (12 bit)
Mech.speed (Max)	1000 rpm
Elec. speed (Max)	1600 rpm
Life (rotations)	~ 5X10 ⁶

22I M/Z SL RCBB

Bush Mount : 22 mm Ø *Silverline* Incremental Precision Rotary Position Sensor



Interconnection : Flat cable

Link for Datasheet :

www.rotacol.info/22imslrcbb.pdf
www.rotacol.info/22izslrcbb.pdf

- 22 mm Ø metal housing
- Ball bearing
- Economical Hall effect magnetic sensor
- Robust metal aluminium housing
- Bush mounting -
 - Metric M10 X 0.75 (MSL)
 - Inch 3/8" X32 UNEF (ZSL)
- Shaft diameter : Metric - 6mm (MSL)
Inch - 1/4" (ZSL)
- Mechanical angle : 360° without stop
- Long life
- Interconnection :
 - 5 core flat cable 0.15 mtr long (std),
 - terminal block (option)

Type

22I M/Z SL RCBB

Electrical pulses	Any pulse from 2 to 128, 256, 512 1024 ppr (1024 ppr std)
Supply voltage	5V±10% / 9-30V DC
Output signal	5V TTL; 5V / 24V Open Collector
Resolution Steps	4096 (12 bit)
Mech. speed (Max)	4000 rpm
Elec. speed (Max)	1600 rpm
Life (rotations)	~ 15 million