



## RESOLVER TO ENCODER CONVERTER

The LTN-REC is a position data converter.  
The LTN-REC drives autonomously a resolver sensor and converts its output signals to encoder incremental (square wave) output signals (emulates encoder signals).



## SPECIFICATIONS - ENCODER OUTPUT

Output Signals:	incremental A+, A-, B+, B-, Z+, Z-
Resolution:	1024 incremental steps per revolution
Output Voltage Level:	5 V - 36 V, limited by the supply voltage
Output Current:	100 mA limited, short circuit proof
Dynamic Peak Current:	1500 mA max.
Accuracy:	+/- 0,184° (+/- 11 arcmin)
Repeatability:	+/- 1/4 of incremental step
Angular speed:	up to 1000 s <sup>-1</sup> , load depending, has to be tested

## RESOLVER OUTPUT / INPUT

Output Ref. Signal:	8 V <sub>pp</sub> (diff.) 100 mA max. 10 kHz
Input SIN / COS:	4 V <sub>pp</sub> (max.) Resolver Transformation Ratio K = 0,5

## POWER SUPPLY

Supply Voltage (+V <sub>s</sub> ):	+8 to +15 V <sub>DC</sub> or +14 to +36 V <sub>DC</sub>
Power Consumption:	~1 W (e.g. 40 mA at 24 V)
Operating Temperature:	0 to +85 °C

The supply voltage can be supplied via the power connector or optionally via the encoder connector (from the encoder decoding unit).  
The G-RCC is protected against the wrong polarity and transient overvoltage of power supply and short circuit proof on output terminals.

Housing:	P hoenix Contact „ME 22,5“ for top hat rail mounting
Dimensions:	l=114,5 mm; h = 99 mm, w = 22,5 mm

## CONNECTOR TERMINALS

Encoder Out: Sub-D, 9-pole male -> mating connector: female	
Pin 1	G ND
Pin 2	Z-
Pin 3	Z+
Pin 4	A
Pin 5	A+
Pin 6	-
Pin 7	+ V <sub>s</sub> (Opt.)
Pin 8	B-
Pin 9	B+
Screen	PE

Resolver IN: Sub-D, 9-pole female -> mating connector: male	
Pin 1	Ref-
Pin 2	-
Pin 3	-
Pin 4	-
Pin 5	SIN+
Pin 6	SIN
Pin 7	Ref+
Pin 8	C OS+
Pin 9	C OS
Screen	PE

Power connector: 4-pole plug, screw wire connection, included	
Pin 1 (left)	+V <sub>s</sub>
Pin 2	+V <sub>s</sub>
Pin 3	GND
Pin 4	GND
Max. loopthroughed current:	
+V <sub>s</sub> :	Pin 1 - Pin 2: 3 A
GND:	Pin 3 - Pin 4: 3 A

The PE connection (protective earth) is implemented over the mounting clamp to the top hat rail.

## ORDERING INFORMATION

G-REC LDBI-1024-5X1-15  
G-REC LDBI-1024-5X1-24

Supply Voltage (+V<sub>s</sub>): +8 to +15 V<sub>DC</sub>  
Supply Voltage (+V<sub>s</sub>): +14 to +36 V<sub>DC</sub>

Output Voltage Level: 5 V  
Output Voltage Level: 5 V

Other configurations on request.