

TB-CDP02-RX/TX

- Status Translation System & Development Kit -



The test boards were developed to demonstrate and use the CDP-TX-02FP-R and CDP-RX-02FP-R. Besides this it is possible to develop own software for these boards.

It consists of a transmitter input board and receiver output board.

In combination with the radio modules, it is a full 8 channel digital status translator which can be practically used for various applications.

Features of the status translation

- TX board: 8 inputs (opto coupler) & RX board: 8 outputs (photo MOS relays).
- Manual and automatic channel control
- Different transmission types (test mode, continuous mode, triggered mode)
- Learning and pairing mode (TX 1 : RX N or TX N : RX 1)
- 8 monitoring LED's on the receiver board
- Data packets with CRC16 checksum
- Fail safe mode with max error count
- Calibrated to -116dBm for the automatic channel control

Features of the development set

- Full programmable Atmel® ATMEGA324P over ISP port
- 32 kb internal flash and 2 kB EEPROM for own software
- 2 UART ports for CDP-02, debugging/data transmission and reception
- 3 DIP switches for configuration
- Complete documented source code for the status transmission

Technical data

General specifications

Applicable standard	EN 300 220-3 Ver.1.1.1
Frequency	433.1875 – 434.7750 MHz
Channels	128
Antenna impedance	50 ohm

Operating temperature	-20 to + 60°C
Storage temperatur	-30 to + 70°C
Operating voltage	5 – 15 V DC
Data rate	4800 bps

TB-CDP02-TX

Current consumption	Typ. 66 mA	TX on, all inputs off / 15 V
	Typ. 22 mA	TX off, all inputs off / 15 V
	Typ. 2.2 mA	Input current for each channel / 5V +V Led
Input	8 opto coupler	
Input opto coupler	4-15 V DC	
Opto coupler LED current	1.5 – 8 mA	
Dimensions	70 x 80 x 13 mm	
Weight	60 g	

TB-CDP02-RX

Current consumption	Typ. 143 mA	RX on, all outputs on / 15V
	Typ. 53	RX on, all outputs off / 15V
	Typ. 11.3 mA	Current for each channel / 15 V
Output	8 Photo-MOS relays	
Output relay	Max. 48V, 300 mA	
Dimensions	100 x 80 x 13 mm	
Weight	90 g	