

ZNC-401

Universal NMEA Converter

Introduction

ZNC-401 Universal NMEA Converter is the only instrument to convert various signals such Gyrocompass, Anemometer, Speed Log, Rudder, Analog format signal into NMEA 0183(IEC61162-1) signal. This is very useful for interfacing between old navigation instruments and VDR, AIS, ECDIS.



ZNC-401 can accept various analog signals such 1/36/90/360:1 synchro signal, 180:1 step signal, DC $\pm 5/10V$ or DC4~20mA signal, pulse or dry contact signal.

It was designed for considering high accuracy and stabilized temperature for using as core parts of Anemometer, Rudder.

All information is displayed on the large LCD monitor and a user can adjust dimming and contrast of it.

Applications

Gyrocompass Applications

Synch Input	- 1:1 or 36:1 or 90:1 or 360:1 Synchro Signal - AC 26/11.8V ~ 115/90V, 50~400Hz
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Step Input	- 180:1 (6 Step/1°) Step Signal - 25~70V
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Output Data	- Auto Detection of Common Plus or Common Minus - \$HEHDT,359.9,T*hh<CR><LF>
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Anemometer Applications

Angle Input	- 1:1 Synchro Signal
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Speed Input	- $\pm 5/10V$ or 4~20mA or 1,710Hz at 60m/s
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Output Data	- \$WIMWV,359.9,R,60,M,A*hh<CR><LF> - Port/starboard, m/sec, Knot, km/h Selectable (Display & NMEA Data)
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Rudder Applications

Synch Input	- 1:1 Synchro Signal - Offset Correction is available
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Rate	- 1:1 or 1:2 or 1:4 Angle Rate
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Output Data	- \$RARSA,45.0,A,*hh<CR><LF>
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Speed Log Applications

Pulse Input	- 200 Pulses or 400 Pulses at 1 Nautical Mile - 5~32V Pulse or Dry Contact Signal
Output Data	- \$VDVBW,29.9,,A,,,*hh<CR><LF> or \$VDVHW,359.9,T,,,49.9,N,,,*hh<CR><LF>

Common Specifications

Signal Input

Analog	- 2 Input Ports, $\pm 5/10V$ or 4~20mA Signal - 5~32V Pulse or Dry Contact Signal
Pulse	- Pulse and Analog Input (Ch2) use Same Terminal, Selectable by Jumper

Signal Output

NMEA 0183	- 3 Output Ports (IEC61162-1, RS422), 1 Port is changeable to RS232 - 4,800/9,600/19,200/38,400bps Transmission Speed - 1/sec or 10/sec Transmission Rate
Voltage/Current	- 2 Output Ports, $\pm 5/10V$ or 4~20mA Selectable (Optional D/A Board required)

Display

ZNC-401	- 8 Characters x 2 Lines Large LCD, Eight-Steps Dimmer & Contrast Adjustable
ZNC-401F	- 4 Digits 7 Segments Display, Eight-Steps Dimmer Adjustable

Power

Input Voltage	- DC 18~32V, Approximately 200mA - Electronic Fuse, No Replacement Required
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Physical specifications

Dimension/Weight	- 176 x 63 x 210 mm / 1.5 kg (6.9 x 2.5 x 8.3 in / 3.3 lb)
Terminal	- Screwless Terminal Blocks

Remark

- 1) If you need any other specifications, please contact us.
- 2) This specification may be changed without notification.