

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 1/36/90/180/360:1 synchro signal, 90/180/360:1 step signal, DC $\pm 5/10V$ or DC 4~20mA 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 180:1 or 360:1 Synchro Signal
- AC 26 ~ 115V, 50/60Hz or 400/500Hz

Step Input - 90:1 or 180(6 Step/1°):1 or 360:1 Step Signal
- DC 25~75V

Output Data - Auto Detection of Common Plus or Common Minus
- \$HEHDT,359.9,T*hh<CR><LF>

Anemometer Applications

Angle Input - 1:1 Synchro Signal, AC 26 ~ 115V, 50/60Hz or 400/500Hz
- DC $\pm 5/10V$ or 4~20mA

Speed Input - DC $\pm 5/10V$ or 4~20mA or 1,710Hz at 60m/s

Output Data - \$WIMWV,359.9,R,60,M,A*hh<CR><LF>
- Port/starboard, m/sec, Knot, km/h Selectable (Display & NMEA Data)

Rudder Applications

Angle Input - 1:1 Synchro Signal, AC 26 ~ 115V, 50/60Hz or 400/500Hz
- DC $\pm 5/10V$ or 4~20mA
- Offset Correction is available

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 - 5~36V Pulse or Dry Contact Signal - 1~20Hz at 1 nautical mile
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Output Data	- \$VDVBW,29.9,A,,*hh<CR><LF> or \$VDVHW,359.9,T,,,49.9,N,,*hh<CR><LF>
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■ Common Specifications

Signal Input

Analog	- 2 Input Ports, $\pm 5/10V$ or 4~20mA Signal - 5~36V Pulse or Dry Contact Signal
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Pulse	- Pulse and Analog Input (Ch2) use Same Terminal, Selectable by Jumper
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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
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Voltage	- 2 Output Ports, $\pm 5/10V$ or 4~20mA Selectable (- Optional D/A Board required
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Power

Input Voltage	- DC 18~32V, Approximately 200mA (5W) - 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)
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Terminal	- Screwless Terminal Blocks
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■ Remark

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