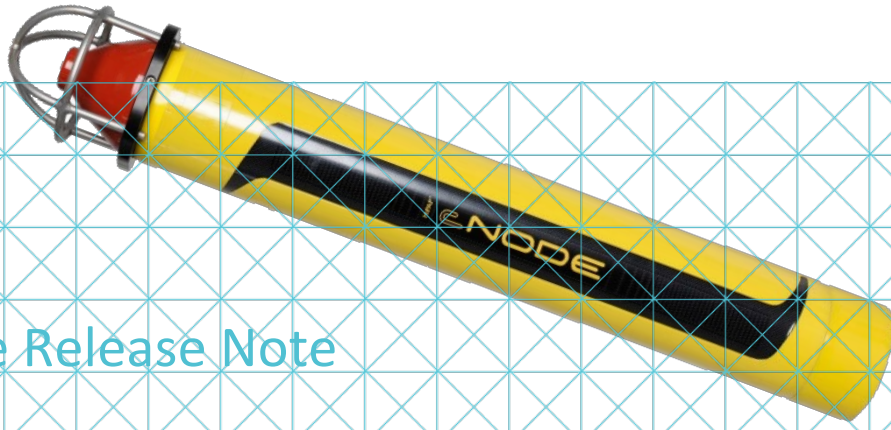




cNODE Maxi/Midi/Mini MF



Software Release Note

This software release is valid for medium frequency cNODE Maxi/Midi/Mini/Explorer transponders and modems. Software version 7.21 is released with FPGA version 4.48. Most functions in version 7.21 and newer are supported by previous FPGA version 4.46. Requirements for FPGA version newer than 4.46 is noted.

Release Description

Release 7.42

New functionality

- Support for tagged interrogation.
- Support for activation of release mechanism via serial line.

Improvements

- Improvements in telemetry decoding.
- Corrected battery usage calculations when MGC-R2 module is powered by external batteries. Requires SIO_Mini2 software version 2.5 or later on the MGC module.

Release 7.21

New functionality

- Common SW for both transponders and modems.
- Multi-Reply navigation mode.
- Supports combined depth and tilt sensor during navigation.
- Supports altimeter sensor (requires sensor module with SIO-P board).
- Supports Sensor Logger Client using sensor module with SIO-P board (Baseline measurements requires FPGA 4.48 or later).
- Supports interface to Teledyne Workhorse ADCP (requires modem option and FPGA 4.47 or later).

Improvements

- Explorer modem: Programmable maximum range for UTP transponder ranging.
- Improved performance in Power Save mode.

Release 6.10

New functionality

- Added 500+ channels. FPGA version 4.46 or newer is required.
- Added functionality for Power Save. FPGA version 4.46 or newer is required. The minimum ping rate for Power save is 3 seconds.
- Added new functionality to handle Modem and Hugin AUV requirements.
- Added sensor data in the navigation data reply for beacon mode.
- Initialized to vertical transducer during start up for all transducers.
- Additional information added to Read status reply telegram. Extended channels and Power save status is available.
- Added Sensor data for Responder positioning. Sensor must be enabled.
- Added new Release functionality (several release outputs).
- Added MGC attitude sensor.
- Added Strain sensor.

Improvements

- Correction in Cymbal wideband detection method used in FSK navigation.
- Correction in fragment handling for Cymbal.
- Added LF functionality for Acoustic test.
- Correction of FSK beacon mode. Bug caused by telemetry receives which blocked the beacon.
- Improvement of serial line communication.
- Correction in the Responder trig functionality. The cNODE had to go to sleep mode when going from SSBL mode to Responder mode the second time.
- Improved internal tilt measurement. Vector calculations implemented instead of using accelerometer values.