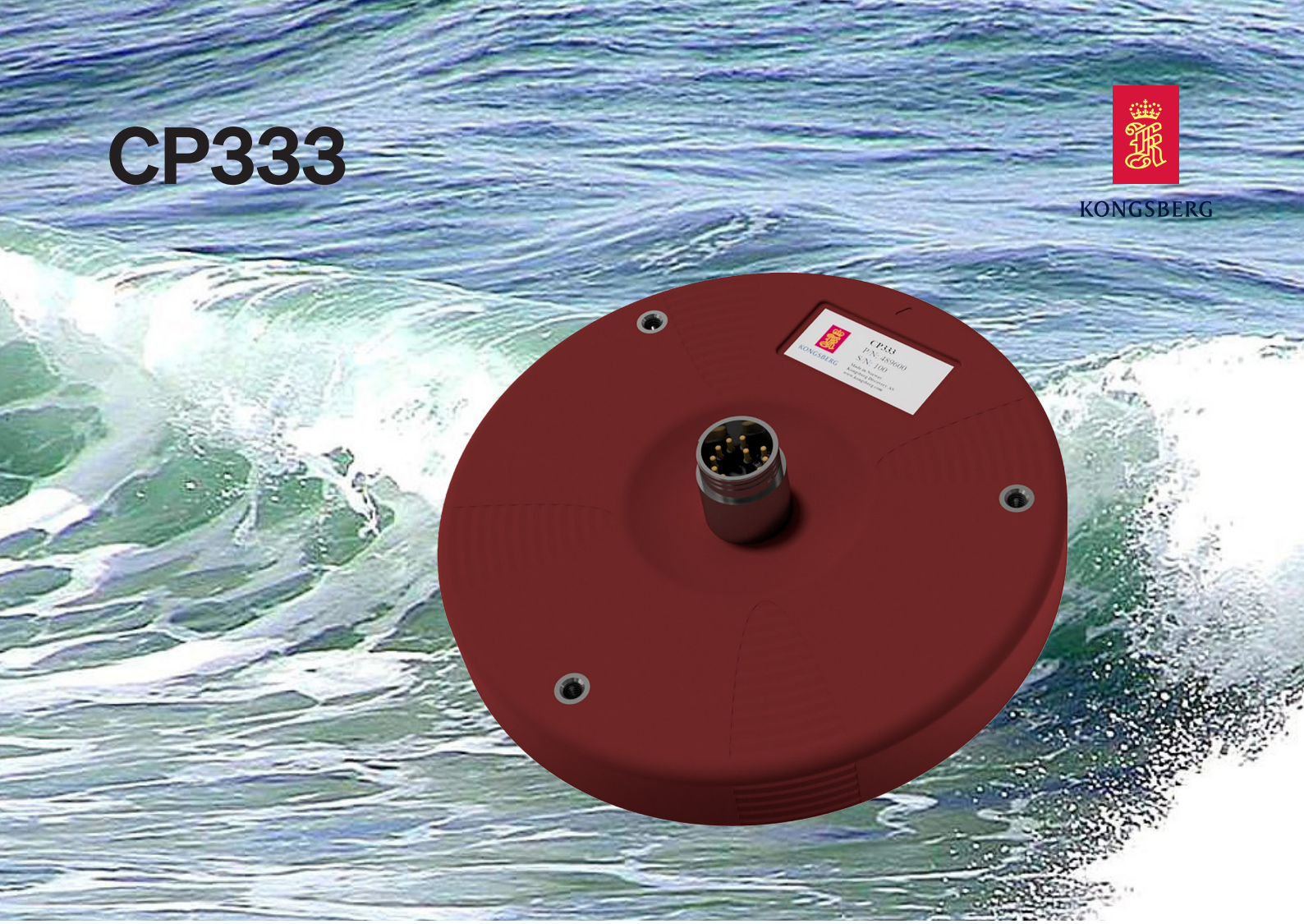
CP333

KONGSBERG



CP333 High-performance ADCP transducer

The CP333 is a compact and versatile ADCP transducer. The transducer has a 1500-meter depth rating and weighs only 2 kg when submerged in water. The composite elements inside the transducers are arranged in a Janus configuration, with four beams tilted 25 degrees. Like most Kongsberg transducers, the composite elements have high bandwidth, with the transducer specifications going from 270 to 445 kHz. This creates flexibility and opens the possibility to exploit the longest possible range at the lower end of the frequency band and the highest possible resolution at the highest end. The transducer can be operated in narrowband (CW) or broadband (FM) mode across the full frequency band.

The CP333 transducer is designed to fit on a great range of instrument platforms from large to smaller and even uncrewed vessels. Coupled with the WBT transceiver and the EK80 acquisition software, with input from a high-quality motion and GNSS system such as Seapath, the system provides high-resolution current profiles and platform velocity (DVL) with high accuracy and resolution in real-time. Fully integrated into the EK80 system, synchronization with other echo sounder transducers is optimized internally, and synchronization with other acoustic systems is possible through dedicated functionality in the EK80 software.

KEY FEATURES

- Wide operating frequency band
- High vertical resolution
- High ping-to-ping accuracy
- Depth rated to 1500 meters
- Excellent bottom-track capability
- Fully integrated in the EK80 system
- Easy to integrate with other Kongsberg products
- Built-in calibration and system test wizard

Order information

To order the CP333 transducer contact your local dealer or use our website:
www.kongsberg.com/cp333

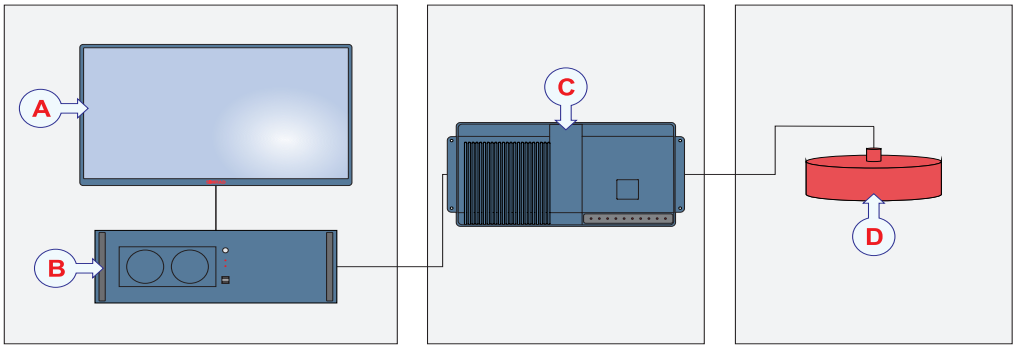
Deliverables

- CP333 Transducer

Optional items

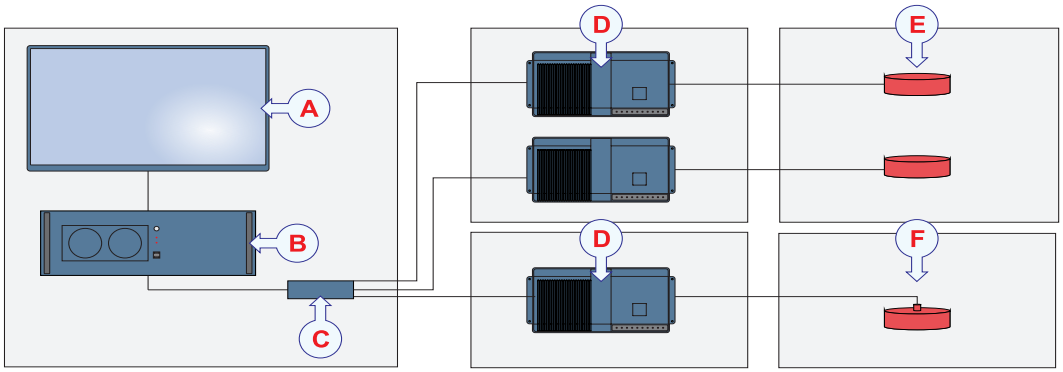
- Cable
- Wide Band Transceiver
- Clamping / mounting ring

Basic system with CP333

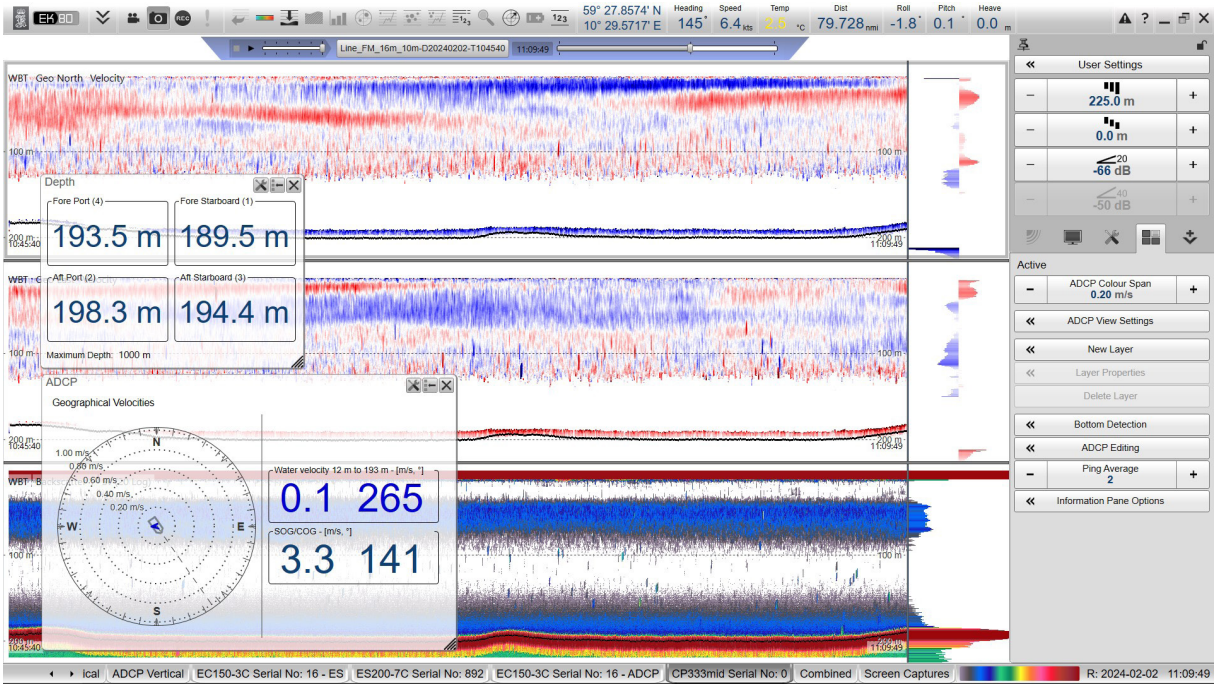


A) Display
B) Processing Unit
C) Wide Band Transceiver
D) CP333 transducer

Complete system with CP333 and split-beam transducers



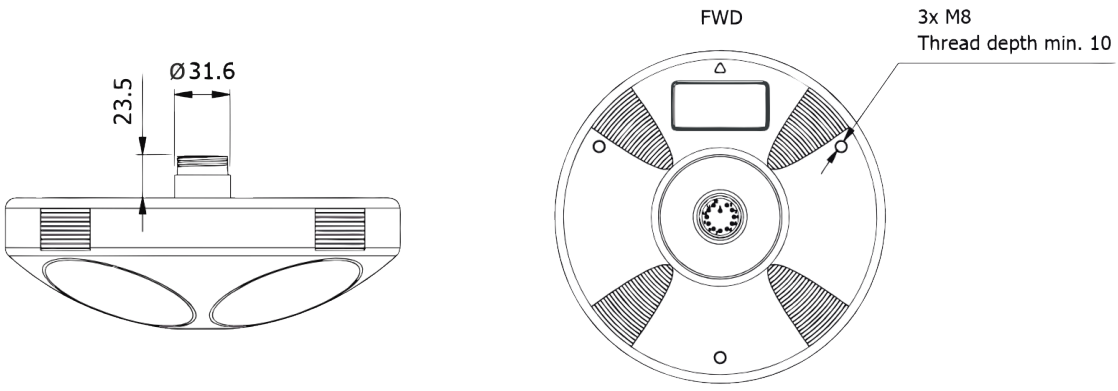
A) Display
B) Processing Unit
C) Ethernet switch
D) Wide Band Transceivers
E) Split-beam transducers
F) CP333 transducer



Screen capture from EK80. High-resolution speed profiles are shown over time, and real-time water speed and speed over ground are calculated continuously.

Weight and outline dimensions

All measurements are in mm. The drawings are not to scale.



Weight: 4.0 kg
Weight in water: 2.0 kg
Max. tightening torque (M8): 17 Nm

Overall performance

- Nominal frequency: 333 kHz
- Frequency range: 270 to 445 kHz

ADCP performance

- Number of beams: 4
- Beam direction: 25 degrees
- Max number of depth cells: Infinite (Sliding cell)
- Pulse type: CW or FM
- Cell size: 1 m, 2 m, 4 m, 6 m, 8 m
- Range FM (BB): 105 m
- Range CW (NB): 120 m
- Bottom track for every ping: no special mode needed
- Bottom track Range: 220 m
- Velocity Resolution: 0.1 cm/s
- Current Velocity Range: ±5 m/s
- Vessel Velocity Range: 20 knots
- Std. Dev. 4 m FM (BB): 5 cm/s
- Std. Dev. 4 m CW (NB): 16 cm/s
- Recommended sensor input: KM Binary (best performance); VTG, HDT, MRU (good performance)
- Accuracy (typical): ±1.0%, ±0.5 cm/s

Installation requirements

CP333 transducer

Cable	Ordered separately
WBT	Ordered separately

Environmental requirements

Operational temperature:	-5 to +50°C
Storage temperature:	-20 to +60 °C

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Output specifications

Ethernet: ZeroMQ
NetCDF

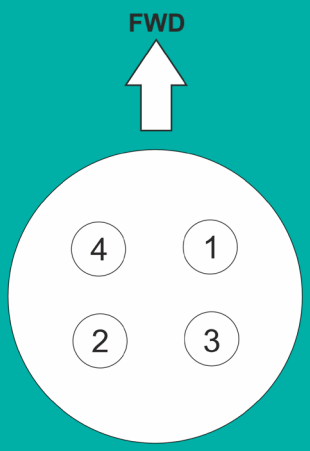
Processing Unit

Computer: EK80 Processing Unit
Operating system: Windows® 10
Software: EK80

Interfaces

Internal sensor: Temperature
External sensors: Position, Attitude and Heading

We are continuously working to improve the quality and performance of our products. Technical specifications may therefore be changed without prior notice.



The CP333 transducer measures ADCP velocities in 4 different beams (image: seen from above).