ultraSV – OEM Sound Velocity Sensor

As part of our policy of continuing development, we reserve the right to alter at any time, without notice, all specifications, designs, prices and conditions of supply of all equipment.

Redesigned from the connector up, the ultraSV offers a truly smart and exchangeable sound velocity sensor without compromise.

Ideally suited to system integrators and OEM applications, the ultraSV is a truly exchangeable SV sensor with all critical electronics contained within the housing.

Each sound velocity measurement is made using a single pulse of sound travelling over a known distance, so is independent of the inherent calculation errors present in all CTDs. Our unique digital signal processing technique virtually eliminates signal noise, and gives almost instantaneous response; the digital measurement is also entirely linear, giving predictable performance under all conditions.

**Performance:**
- **Range:** 1375 – 1900 m/s
- **Resolution:** 0.001 m/s
- **Accuracy:** ±0.020 m/s
- **Sample Duration:** ~30 µs @1500 m/s
- **Sample Rate:** Up to 300 Hz

**Electrical:**
- **Voltage:** 5V DC regulated ±3%
- **Power:** <250mW
- **Connector:** SubConn MCBH6F

**Communications:**
- **Output:** RS485 \ TTL
- **Protocol:** 4800 to 230400 baud (8,1,N)
- **Format:** Proprietary NMEA string

**Physical:**
- **Depth Rating:** 200m
- **Size:** 38mmØ x 120mm (including connector)
- **Weight:** <0.3 kg in air
- **Housing & Bulkhead:** Titanium
- **Transducer Window:** Titanium
- **Sensor Legs:** Carbon Composite
- **Reflector Plate:** Titanium

**Ordering:**
- ultraSV 06520550

**Note:** All systems supplied with a manual no cables are supplied contact Valeport for options