SpotTrack is a high performance laser-based relative positioning reference sensor. The sensor is developed for use in offshore applications in need of high accuracy range and bearing measurements. The SpotTrack solution is based on years of experience and knowledge in offshore applications, and developed to secure safe and efficient operation in a dynamic environment.

**Designed for Dynamic Positioning**

SpotTrack is tailor made for use as a reference system for relative positioning in DP operations.

The SpotTrack sensor is a robust motion stabilized rotating laser sensor which measures range and bearing to one or several retro-reflective targets installed on the target platform or vessel.

Automatic wave motion stabilization provides optimum target lock. All calculations are carried out in the SpotTrack sensor. The onboard control unit runs the application software which makes configuration and monitoring of the SpotTrack system easy and efficient.

**SpotTrack at a glance**

- Robust design
- No exposed moving parts (enhances MTBF)
- Weight of moving parts are very light (enhances MTBF)
- Designed for 10+ years lifetime
- Low maintenance
- Ease of installation
- Easy to operate
- Multiple detectors and enhanced signal processing method, enhances performance and reduce risk of false reflection
- Extended opening angle (65 degree vertically)
- Built in motion compensation (roll/pitch). Can be connected to external MRU for enhanced motion compensation (for very high vessel dynamics with heave measurements)
- Can utilize all existing infrastructure
- Interface and mounting brackets compatible with similar products in the market
**OPERATIONAL BENEFITS**

**Easy setup**

The lightweight SpotTrack sensor is with its elegant and slim award-nominated design easy to install on the vessel. Different mounting brackets are available - also for replacement for existing installations - for rapid deployment and easy placement.

![CyScan replacement kit](image1.png) ![FanBeam replacement kit](image2.png)

**Reflector types**

All standard reflector/targets can be utilised by SpotTrack.

**Robust true multi-target tracking**

The unique design secures lock on true targets in different heights, even in high dynamic environment, due to the innovative design of the signal processing circuits. Novel design of receiving circuits creates a unique signature of the target for enhanced robustness, reduces the risk of false reflections and reject outliers.

Adjustments on-the-fly in dynamic environment, prevents loss of locked targets for an optimal performance during operation.

Together with true horizontal distance measurements, SpotTrack provides a high integrity reference solution, with accurate range and bearing input for dynamic positioning operations.

**Low maintenance**

All moving parts are enclosed within the sensor housing. The mechanical wear due to harsh weather conditions is thus kept at a minimum, allowing for low maintenance costs.

**Close-by operations**

Due to its unique design with a wide vertical field of regard, SpotTrack is capable of target tracking in close-by operations. By utilizing roll and pitch stabilization, SpotTrack keeps track of targets even at high elevation angles.

![SpotTrack sensor](image3.png)

![Passive reflectors](image4.png)

**Increased availability**

By connecting to an existing MRU, SpotTrack obtains increased accuracy and robustness in extreme weather conditions with high precision elevation measurements to a target relative to the horizontal plane.