

# Navigation and Piloting

Powered By  
**SmartPort**



**Bringing large vessels into port is a complex process that requires the ship's captain, tug skippers and port operators to precisely coordinate their efforts - working as a cohesive unit.**

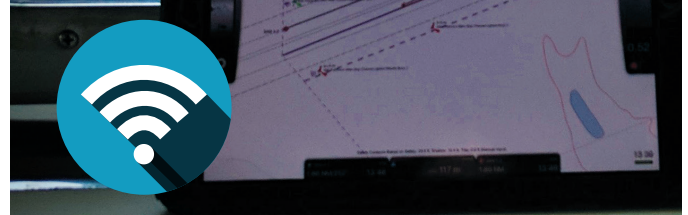
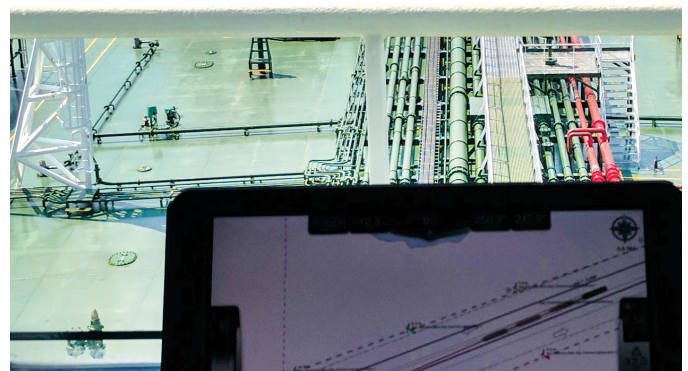
SafePilot from Trelleborg increases operational visibility during port approach to improve situational awareness, safety and efficiency. And SafeTug has been developed as an evolution of and complement to SafePilot, enabling Pilots and Tug Operators to communicate more effectively through shared data. Combining the two platforms increases operational visibility for all parties to make port approach, berthing and departure easier, safer and more efficient.

## **SMARTER SOLUTIONS FOR NAVIGATION AND PILOTING**

Navigation and piloting are critical areas for review as the industry moves further towards adopting smart technologies that have a profound impact on berth efficiency and personnel safety.

Situational awareness is mission critical. Port operators need high range and accuracy of navigational measurements, clear visibility and access to relevant information in real-time.

Developed by a dedicated team of software programmers working closely with worldwide pilots, SafePilot and SafeTug are critical components within Trelleborg's SmartPort platform.



**SafePilot and SafeTug  
increase operational  
visibility during port  
approach to improve  
situational awareness,  
safety and efficiency.**

## KEY FEATURES

### Touchscreen operation

The touchscreen interface of SafePilot and SafeTug enable Pilots and Tug Operators to interact directly and quickly, the PPU interface is extremely user-friendly and smooth.

### Instant zoom function

New intelligent chart structure enables instant zooming and is capable of a faster response than any other navigational software.

### Scalable and cost efficient

To keep the SafePilot intuitive and simple, and at the same time a highly specialized tool for pilots, it is designed with a core that allows for expansion options for dedicated applications such as Docking-, Lock-, River- or Offshore operations. Likewise, integrations to shore-based systems, live data and personnel are available as add-ons.

### Developed for iPads

Featuring low weight, long battery life, flat and integrated design and instant accessibility, as well as excellent outdoor readable graphics.

### Real-time data exchange

Real-time data exchange between both Pilot and Tug Skipper. No AIS lag and updates of the situation every second.

## TANGIBLE BENEFITS

### SafePilot and SafeTug improve situational awareness, safety and efficiency during port approach, by:

- Displaying what is relevant: through one touch mode changes, SafePilot displays only the data that is relevant to the Pilot at the current stage of the operation.
- Responding instantly: through a dedicated chart kernel featuring intelligent chart handling with quick zooming and panning functionality based on simple touch gestures for ease of use and momentary response.
- Ensuring accuracy: true shape graphical illustration of own and other vessels enhances the overview. Other vessels can be investigated for additional data via AIS and an adjustable vector gives an indication of current speed and direction. Prediction footprints give a clear picture of the vessel's movements ahead of time. These predictions include ROT calculations, enabling accurate displays of the current maneuver.
- Informing future scenarios: an editable vessel database with vessel particulars based on information automatically drawn from AIS for minimum setup time and effort. Replay functionality with the option to change scaling, routes, distance lines and fender lines is ideal for training and optimization of maneuvers.
- Offering application specificity: optional modules are available featuring dedicated functionality for rivers, docking, locks and offshore operations.

# SmartPort by Trelleborg

SmartPort by Trelleborg powers the critical interface between ship and port, on land and at sea. Visit our website to access our case studies and white paper, plus the entire suite of SmartPort solutions.

SmartPort



Learn more  
about **SmartPort**  
solutions

### GET IN TOUCH:

Website | [trelleborg.com/marineandinfrastructure](https://trelleborg.com/marineandinfrastructure)

Email | [marine\\_infra@trelleborg.com](mailto:marine_infra@trelleborg.com)