

# Navigation buoy

Tridel offers a comprehensive range of navigation buoys available in polyethylene (PE) and steel construction, with diameters ranging from 1.5 meters to 3 meters. Designed to meet diverse coastal, harbor, and offshore navigation needs, these buoys deliver reliable performance, high visibility, and long service life in demanding marine environments.

## Polyethylene (PE) Navigation Buoys:

Constructed using UV-stabilized, marine-grade PE shells and filled with closed-cell polyurethane foam, Tridel's PE buoys are lightweight, unsinkable, and resistant to corrosion and marine growth. Their modular design allows for easy handling, transport, and maintenance.

## Steel Navigation Buoys:

Engineered for heavy-duty applications, Tridel's steel buoys are fabricated from marine-grade steel and coated with anti-corrosive epoxy systems. These buoys are ideal for locations requiring higher mooring loads, enhanced structural integrity, and longer deployment periods in open-sea conditions.

## Key Features

- Size Range: Diameters from 1.5 m to 3 m, adaptable for various visibility and site conditions.
- Material Options:
  - PE: Foam-filled, maintenance-free, ideal for corrosion-prone environments.
  - Steel: Ballasted or foam-filled, high structural strength for offshore deployments.
- Mooring System: Customizable options including chain, rope, swivels, and load-rated mooring eyes.
- Navigation Aids: Supports marine lanterns, AIS, radar reflectors, day marks, and monitoring systems.
- Power Options: Solar-powered systems with integrated battery packs for autonomous operation.
- Standards Compliance: Designed in accordance with IALA recommendations for shape, color, light characteristics, and top marks.

## Applications

- Channel and fairway marking
- Harbor entrances and anchorage zones
- Offshore platforms and oil fields
- Aquaculture and fishing zones
- Marine protected areas and environmental monitoring







