



Rudder Angle Indicator System



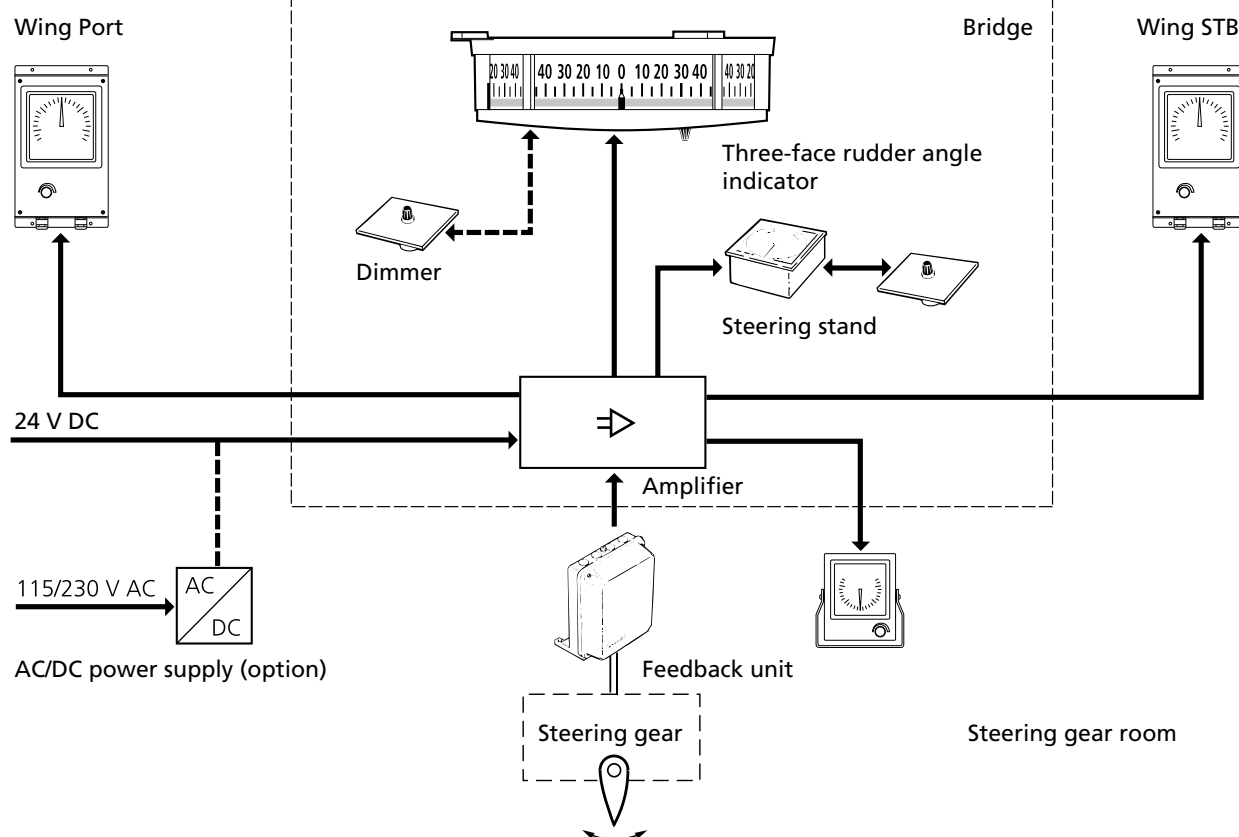


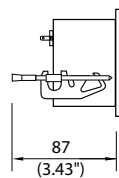
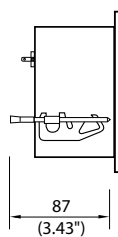
Rudder Angle Indicator System

Raytheon Anschütz provides all components for ship specific rudder angle indicator systems. Through the modular design and the variety of indicators all requirements with regard to IMO/SOLAS, class notations and Panama regulations are met.

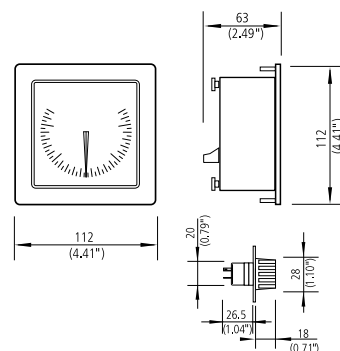
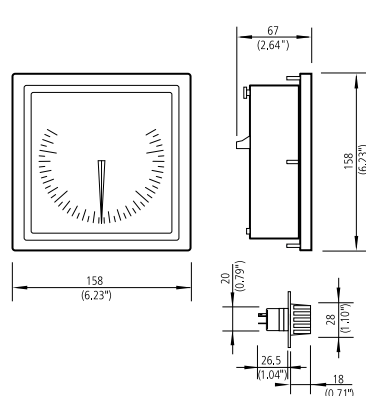
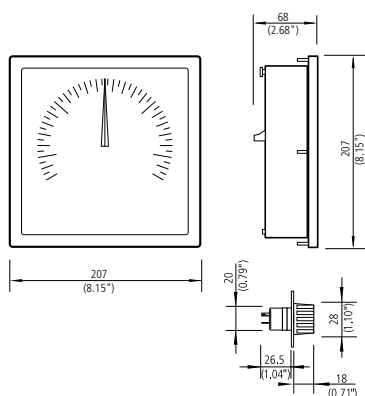
According to IMO/SOLAS the rudder angle indicator system shall be independent of the steering gear control system. Therefore a separate feedback unit and also an independent power supply are required.

Raytheon Anschütz offers indicators with different dimensions, different scales, three-face rudder angle indicators and special indicators to meet Panama requirements. All indicators can be dimmed and are available with different protection grades.

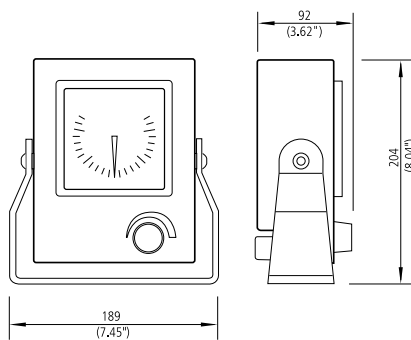
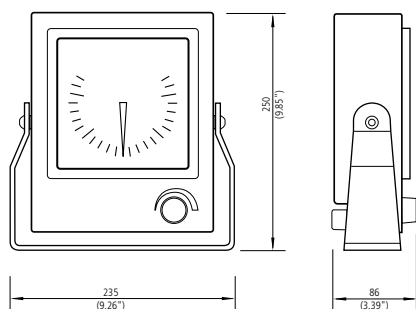




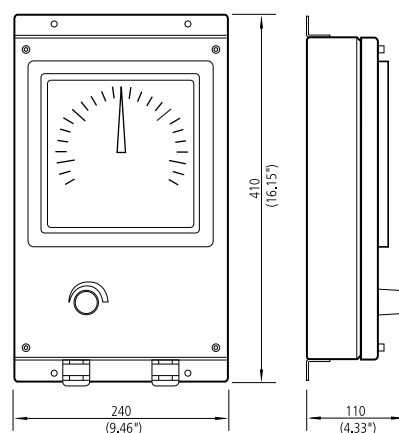
Rudder angle indicators / desk mounting for indoor use



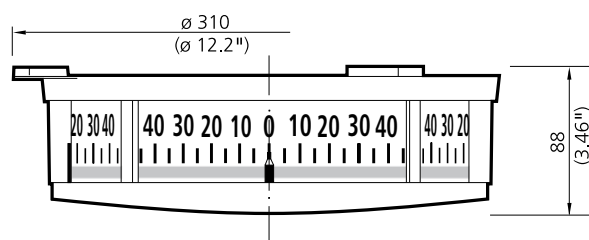
Rudder angle indicators and dimmer / desk mounting / front waterproof



Rudder angle indicators / casing waterproof



Rudder angle indicator according to Panama canal recommendations



Three-face rudder angle indicator

Benefits

- Three-face rudder angle indicator with 270° panoramic indication
- Rudder angle indicators with different dimensions
- Different rudder scales depending on the rudder angle
- Internal or external dimming control
- Different protection grades
- Rudder angle amplifier for the connection of multiple indicators
- MED type approved

Technical Data

Supply Voltage

- 24 V DC
- optional: 115/230 V AC

Power Consumption

- Three-face rudder angle indicator: max. 12 W
- Analog rudder angle indicator: max. 3 W

Read-off accuracy

- $\leq 1^\circ$

Scale

- Red/green for port/starboard
- Display range: 45° or 75° (standard)

In accordance with

- EN/IEC 60945-2002
- For details refer to EC-type examination certificate

Type of enclosure acc. to IEC/EN 60529

- Three-face rudder angle indicator: IP 23
- Rudder angle indicator (indoor use): IP 22
- Rudder angle indicator (outdoor use): IP 66
- Feedback unit: IP 44

General Data

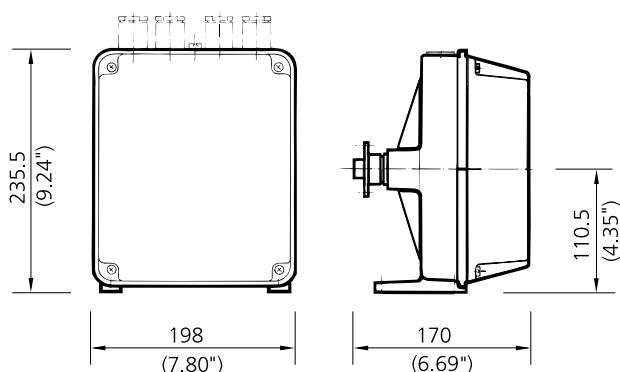
Temperature range

- Indoor: -15° to $+55^\circ$ C
- Outdoor: -25° to $+55^\circ$ C

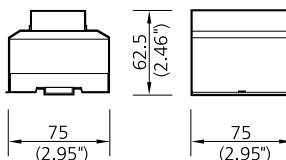
Type approval

- MED (Wheelmark) 96/98/EC, 2002/75/EC

Feedback unit (rudder angle transmitter)



Rudder angle amplifier



Distribution plate

