The Meridian gyrocompass is a product suitable for the ever-changing needs of a modern integrated navigation bridge system. This includes highly accurate performance with low cost of ownership and system flexibility. Due to the Meridian’s small size and fast settle time of less than 45 minutes, there are no limits to the type of vessel for which it is suitable.

The Meridian gyrocompass can be installed as a stand-alone unit or, together with any of the Meridian range of repeaters and ancillaries, it becomes a single or dual gyro system. The Meridian can also be used to replace many existing gyrocompasses as a retro fit unit.

For simple installation the Meridian offers a large array of digital and analogue outputs plus easy to use set-up and self-test modes that are activated via the control unit. The versatility and flexibility of the Meridian can be clearly demonstrated with the remote control unit option. This gives freedom to install the main unit in the most convenient location whilst installing the remote control unit where it can be seen and regularly used.

The heart of the Meridian gyrocompass is the element, which is a dynamically tuned gyroscope (DTG). The DTG is a high precision technology which, due to its size, accuracy, reliability and shock resistance, is used in many different applications.

The guaranteed accuracy of the Meridian gyrocompass is obtained through specialised high quality engineering. This gives exceedingly stable heading and means that the gyro will follow a high turn rate of up to 200° per second.

Unlike virtually every other marine navigation gyrocompass currently available, the Meridian has a maintenance-free dry element with a meantime between failure of more than 30,000 hours. After installation there are no scheduled annual maintenance and servicing costs.

**Features**

- IMO, HSC & Wheelmark certified
- Economic one-box solution
- Fast initial settle time
- Small, lightweight and versatile
- Dynamic heading accuracy of 0.6°
- Multiple analogue and digital outputs
- Start up power requirement of <3A
- Low cost of ownership
- MTBF of >30,000 hours
- 200° per second rate of turn
### Display
- 360° compass card and digital display

### Performance
- **Settle point error**: 0.25° secant latitude
- **Static error**: 0.10° secant latitude RMS
- **Dynamic accuracy**: 0.60° secant latitude
- **Settle point repeatability**: 0.25° secant latitude
- **Follow-up speed**: 200°/second
- **Settling time**: 45 minutes, or less to within 0.2°

### Outputs
- **"S" type**: 1 x Step by Step (5V TTL), six steps per degree
- **Synchro**: 1 x 26V 400Hz sector value 360° (1:1 ratio) 11.8V line to line
- **Serial data**: 11 x RS422, NMEA 0183
  - 5 x RS 232, NMEA 0183
  - 1 x printer port, NMEA 0183
  - 1 x ROT 20/second (10V)
- **Status/Alarm**: 5V TTL power fail/gyro fail
  - 5V TTL system ready
  - Potential free relays

### Inputs
- **Latitude**: NMEA 0183 via RS232 or RS422 from GPS
- **Speed**: Pulse or contact closure at 100, 200 or 400 per NM for Log/GPS
  - NMEA 0183 via RS232 or RS422 from Log/GPS

### Compensation
- **Latitude**: 80° N to 80° S
- **Speed**: 0-90 Knots

### Environmental
- **Ambient operating temperature**: 0°C to 45°C (-15°C to +55°C with reduced accuracy)
- **Storage temperature**: -25°C to +80°C
- **Gimbal limits**: ±45° roll and pitch
- **Meantime between failure**: >30,000 hours
- **Shock**: 10g

### Operating voltage
- **Input voltage**: 24V d.c. (18-36V d.c.)

### Operating power
- **Start-up**: <3A at switch on / <1.5A in ready mode

### Dimensions
- **Size**: 344mm (h) x 267mm (w) x 440mm (d)
- **Weight**: 15.5 Kg

### Accessories (included)
- Operators handbook, spare fuse

### Options
- Remote control unit option kit; Stepper amplifier; various repeater

### Standards

### Warranty
- 24 months international warranty including parts and labour

*Due to continuous development, specifications may vary from those listed above.*