



B&G Legacy Product Identification Guide & Current Status

**Ver 1.4
February 2023**

Many B&G legacy products are no longer produced or supported by B&G. A+T can repair and replace many of these. This document shows the current B&G status of many products together with A+T part numbers for replacements where available or other options. A+T is always interested to hear from clients with older equipment and can suggest solutions or repairs.

A+T Instruments Ltd
235 Bentley Way
Lymington
Hants UK SO41 8JW

Tel: +44 (0) 1590 718182
Email: info@AandTinstruments.com
Website: www.AandTinstruments.com



CONTENTS

Description	Page
DISPLAYS	2
BOAT SPEED SENSORS	3-8
PADDLEWHEEL TYPE.....	34
PADDLEWHEEL SPARES KITS	5
SOVs	6
Impeller Type	7
SONIC SPEED	8
XTL- MICROSONIC SPEED SENSOR	8
DEPTH FINDERS	9
HECTA	9
DEPTH TRANSDUCERS	10-11
MASTHEAD UNITS.....	12-18
VERTICAL MASTHEAD UNIT	12
213 MASTHEAD UNIT.....	13
496 MASTHEAD UNIT	14
283 MASTHEAD UNIT	15
A TYPE MASTHEAD UNIT.....	16
C-TYPE MASTHEAD UNIT	16
WIND SPEED AND DIRECTION MODEL.....	17
MAST CABLES.....	18
COMPASS SENSORS	19-22
IMU SENSOR	19
HALCYON GYRO STABILISED COMPASS SENSOR	19
GIMBALLED RATE COMPASS.....	20
HALCYON 2000.....	20
H1000 FLUXGATE SENSOR.....	21
SUPER HALCYON 3.....	21
HALCYON 3.....	22
DIRECTION FINDERS.....	23
HERON/HOMER.....	23
METEOROLOGICAL SENSORS.....	24
SEA TEMPERATURE SENSOR	24
AIR TEMPERATURE SENSOR	24
Barometric Pressure Sensor.....	25
Heel/Trm Sensor.....	25
LOADCELL SENSORS.....	26
HYDRAULIC PILOT DRIVES	27
BLUE TO 12V HYDRAULIC RAM	27
BLUE T1/T2 12V/24V HYDRAULIC RAM.....	27
BLUE T3 24V HYDRAULIC RAM	27
RUDDER AND MAST ROTATION SENSORS	28-29
ROTARY RUDDER POSITION SENSOR	28
LINEAR FEEDBACK SENSOR.....	28
Black 12V/24V BLACK HYDRAULIC RAM.....	29

DISPLAYS

B&G FFD

H2000 System

Discontinued (Part No. 240-00-026, 240-00-028)



B&G GFD

H3000 Systems

Discontinued (Part No. BGH211001)



A+T MFD

Part No. MFD001

Replacement for B&G FFDs&GFDs (Part No. 240-00-026, 240-00-028, BGH11001)



Pilot head version of these are also available.

BOAT SPEED SENSORS

Overview

Historically these have been made with various techniques.

- Paddle wheel
- Impeller
- Sonic Speed
- XTL

And through hull fittings are either:

Normal (short)

or

Shut Off Valve



Details are set out below, in most cases A+T can normally repair or find a solution, even for older systems.

Paddle Wheel

BLACK PLASTIC/BRONZE HULL HOUSING

Sensor body diameter 40mm



B&G Modern Six Blade Paddlewheel Speed Sensor –old type **discontinued** (Part No. **SEN-SPEED-N, H, or P**)

Modern Four Blade Paddlewheel Speed Sensor –new type - available contact A+T

BOAT SPEED SENSORS - continued

WHITE PLASTIC/BRONZE HULL HOUSING

Sensor body diameter 31mm



Discontinued (610-0A-026, 202-00-100,
610-0A-036, 610-0A-129, 610-0A-130)









A+T Boat Speed Sensor

Part No. BSPD – replaces (B&G 610-0A-026, 202-00-100,
610-0A-036, 610-0A-129, 610-0A-130)



Keep your retaining ring to use with the A+T
Paddlewheel Speed Sensor. (Part No. BSPD).

Paddlewheel Spares Kit

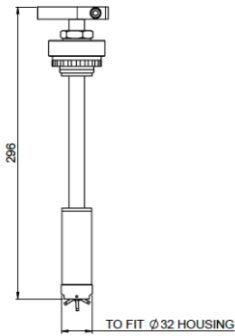
 <p>B&G Low Speed, Bronze Housing, pre-1996 B&G Product No. 202-00-128- Type B</p>	 <p>B&G Low Speed, Plastic Housing, pre-1996 B&G Product No. 202-00-129 – Type B</p>
 <p>B&G High Speed, Bronze Housing, pre-1996 B&G Product No. 202-00-160 – Type B</p>	 <p>B&G High Speed, Plastic Housing, pre-1996 B&G Product No. 202-00-161 – Type A</p>
 <p>Airmar Sensors Pre-1996 B&G Product No. 202-00-54 – Type A</p>	 <p>Airmar Sensors Post-1996 B&G Product No. SEN-SPRS-SPD</p>

All Paddlewheel Spares Kits are available from A+T Instruments. info@aandtstruments.com

BOAT SPEED SENSORS - continued

SOV (Shut off valve)

SOV Standard



A+T SOV (Part no. SOVso1)
Replaces discontinued (B&G 202-00-064)



Some vessels, particularly Huisman built, have custom lengths. A+T can provide these.



A+T Bronze SOV Gate Valve

Valve compatible with A+T SOV speed and depth sensors. (Part No. SOVHSGo1 / SOVSK01)

Direct replacement for discontinued B&G shut-off-valve (SOV).
(Part No. Housing – 155-00-025, Insulation Kit -155-30-017).



The shut-off-valve is used mainly on larger vessels; the insulation packing prevents corrosion caused by electrolytic action on steel/aluminum/carbon hulled boats.

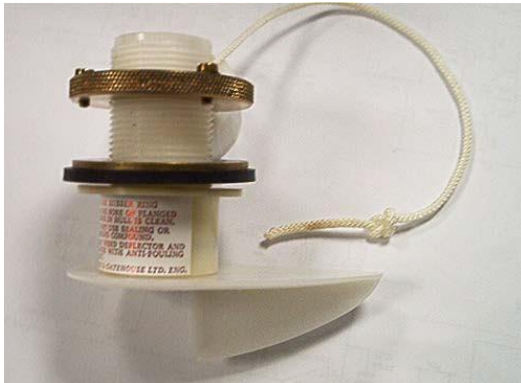
BOAT SPEED SENSORS – continued

B&G Impeller Type – (discontinued)

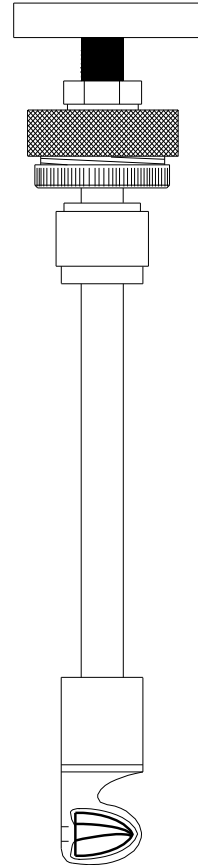
Contact info@aandtstruments.com for a solution that fits in the same diameter hull fitting.



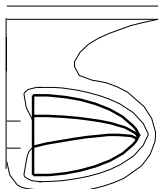
B&G Impeller Type Speed Sensor.
Part No. **117-00-120- discontinued**



Hull Housing for an Impeller – Type Speed Sensor **Discontinued (Part No. 117-00-46)**



B&G Impeller Type Speed Sensor for use with a Shut-Off-Valve. Part No. **117-00-124 – discontinued (Part No. 117-00-46)**



Impeller Fin – **Discontinued**
Contact A+T for a solution.

Note: items marked in **Red** are discontinued product lines. Please contact info@AandTstruments.com for a solution

BOAT SPEED SENSORS - continued

Sonic Speed – (discontinued)

Description: Matched pair of sensors connected to a central processor
Date introduced: 1986
Date Discontinued: **Discontinued**
Part Number: 184-00-081

Repairable by A+T. Service Exchange available. Contact info@aandtstruments.com



The Sonic Speed Sensor System uses two sensors, positioned fore and aft and the boat's speed is calculated by measuring the time taken for a series of sonic pulses to travel through the water between the two sensors.

XTL- Microsonic Speed Sensor

Description: Sonic speed sensors mounted in an underwater fin assembly
Date Introduced: 1988
Date Discontinued: **Discontinued**
Part Number: 275-00-001/017, 275-00-032/032, 275-00-039, 275-00-045/046
dependent on stud length and material. Some with integrated Depth.

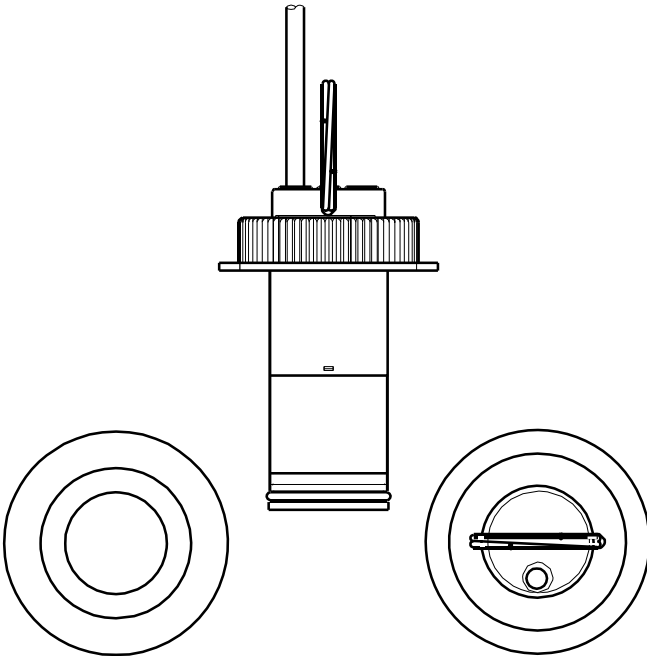
Contact info@aandtstruments.com for solution.



DEPTH TRANSDUCERS

BLACK PLASTIC/BRONZE HULL HOUSING

Sensor body diameter 40mm



Modern Depth Sensor – old type –
discontinued (Part No. SEN-DEPTH-H, N, or P)



Modern Depth Sensor –new type - available
contact A+T

WHITE PLASTIC/BRONZE HULL HOUSING

Sensor body diameter 31mm



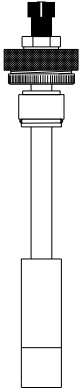
B&G Depth Transducer discontinued (B&G 401-00-011, B&G 610-0A-027, B&G 199-00-018 and B&G 610-0A-040)



A+T Depth Sensor (Part No. DPTH-170/DPTH-200)
Replaces discontinued (B&G 401-00-011, B&G 610-0A-027, B&G 199-00-018 and B&G 610-0A-040)

DEPTH TRANSDUCERS – continued

SOV (Shut off valve)



Depth Sensor for use with a Shut-Off-Valve
Discontinued (Part No. 157-AA-038)



A+T SOV Depth for use with a Shut-Off Valve (Part No. SOVDo1/170 or SOVDo1/200)
 Direct replacement for discontinued B&G
(Part No. 157-AA-038)



Some vessels, particularly Huisman built, have custom lengths. A+T can provide these.



A+T Bronze SOV Gate Valve
 compatible with A+T SOV speed and depth sensors. (Part No. SOVHSGo1 / SOVISK01)

Direct replacement for discontinued B&G shut-off-valve (SOV).
 (Part No. Housing – 155-00-025, Insulation Kit -155-30-017).



The shut-off-valve is used mainly on larger vessels; the insulation packing prevents corrosion caused by electrolytic action on steel/aluminum/carbon hulled boats.

Insulation Kit (155-30-017)

DEPTH TRANSDUCERS – continued

Hecta

Description: Transistorised echo sounder
Date Introduced: 1958
Date Discontinued: 1978 – Superseded in 1979 by the 200 meter range Hecta echo sounder

Repairable by A+T. Contact info@aandtstruments.com for a solution.

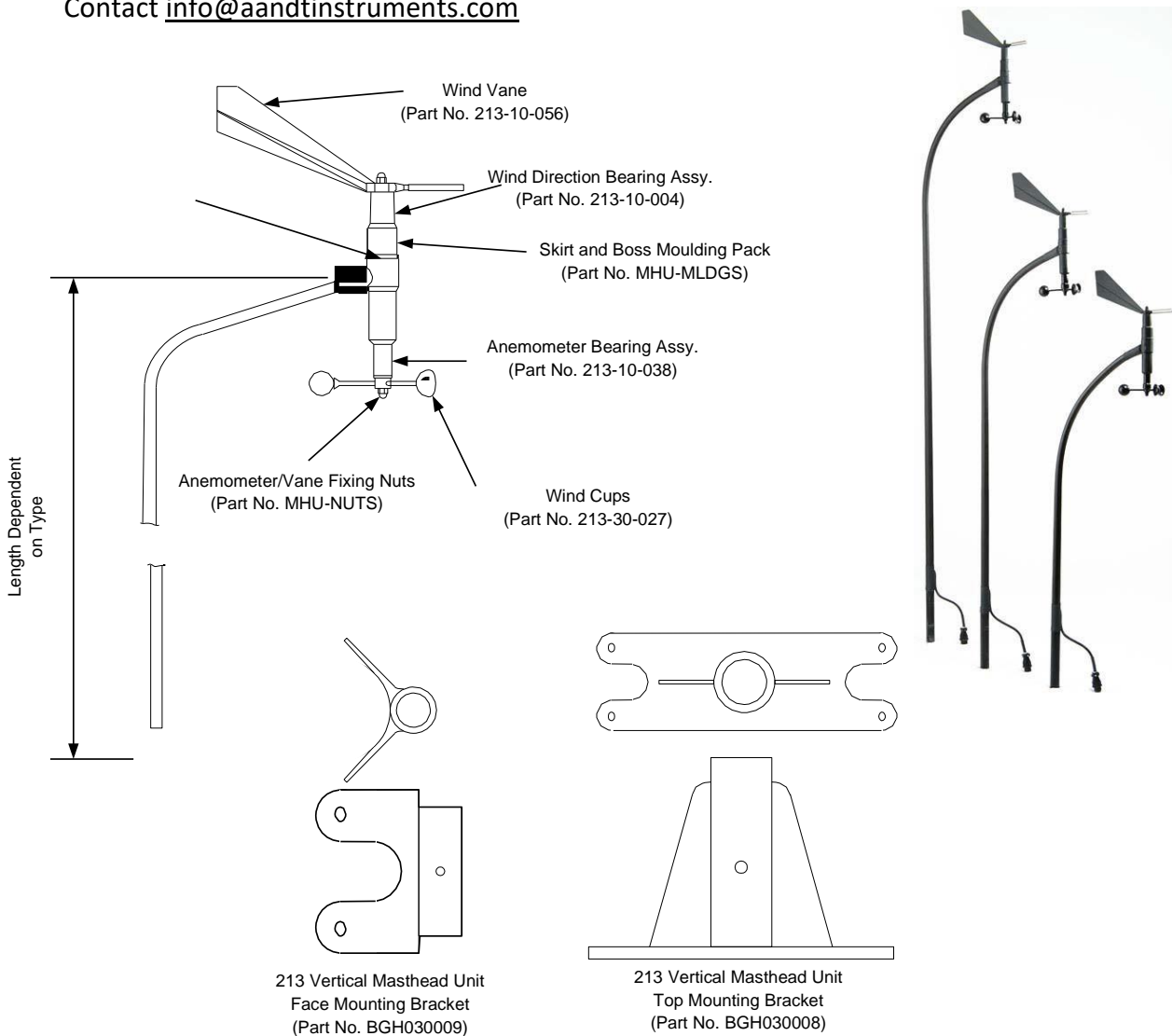


MASTHEAD UNITS

Vertical Masthead Unit

Description: Used with Hydra and Hercules systems
 Date Introduced: 1999
 Date Discontinued: Current product
 Part Number: BGH031001 (32"), BGH031002 (42"), BGH031002S (Ocean Spec.*), BGH031003 (57") & BGH031003S (Ocean Spec.*)
 *Ocean Spec constructed with extra laminate for increased durability

Repairable by A+T. Complete unit and parts available from A+T, normally ex stock.
 Contact info@aandtstruments.com



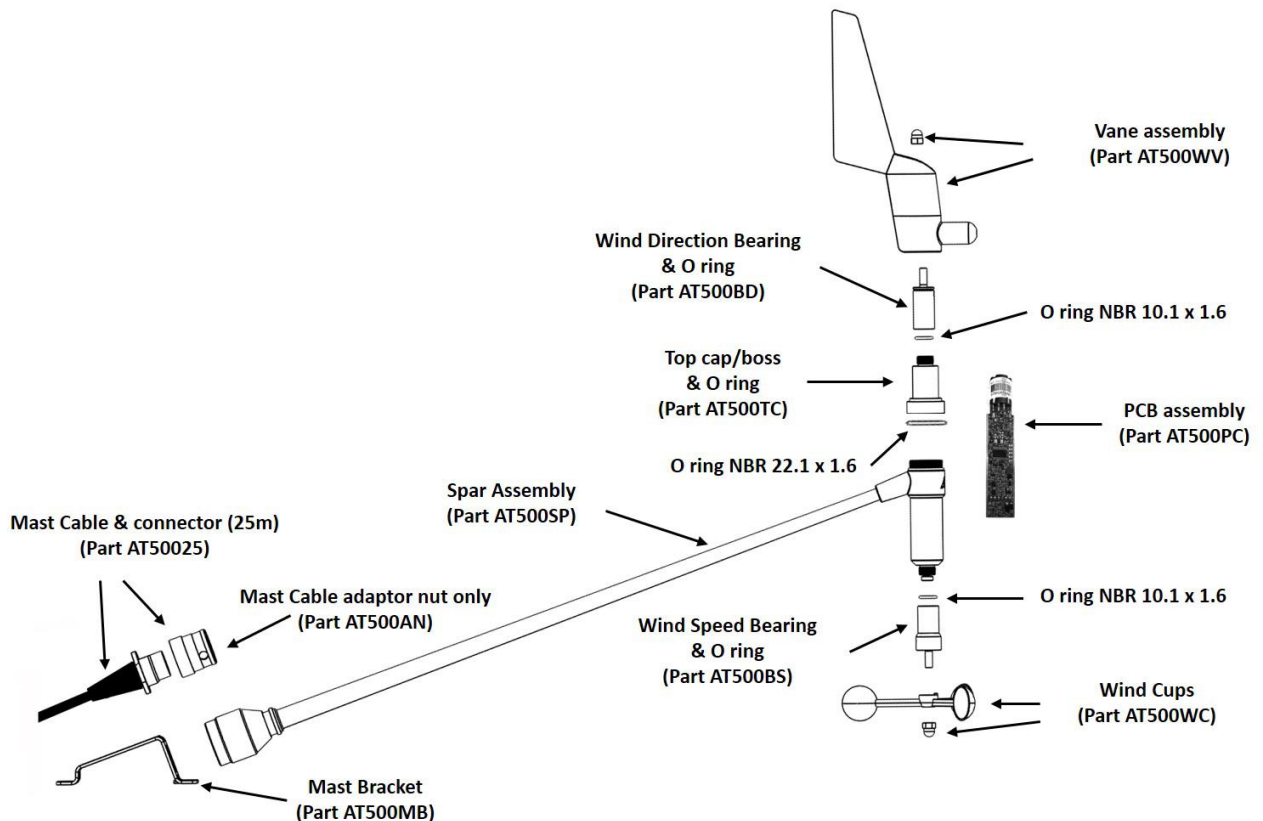
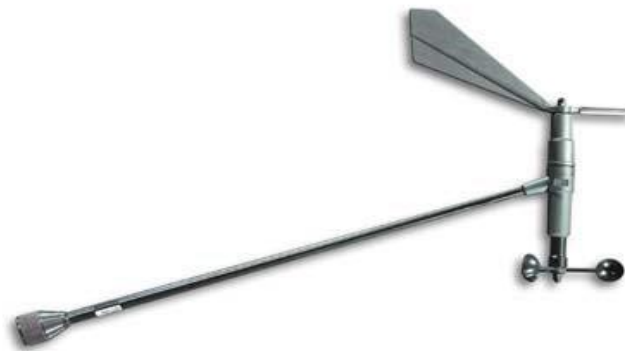
213 Vertical Masthead Unit Top Mounting Bracket (Part No. BGH030008)

MASTHEAD UNITS - continued

213 Masthead Unit

Description: Used with Hercules 390, Hydra and Hercules systems
 Date introduced: 1985
 Date Discontinued: Current Product
 Part Number: 213-00-002

Repairable by A+T with AT500 series parts. Complete unit and parts available from A+T,
 Contact info@aandtstruments.com for a solution.

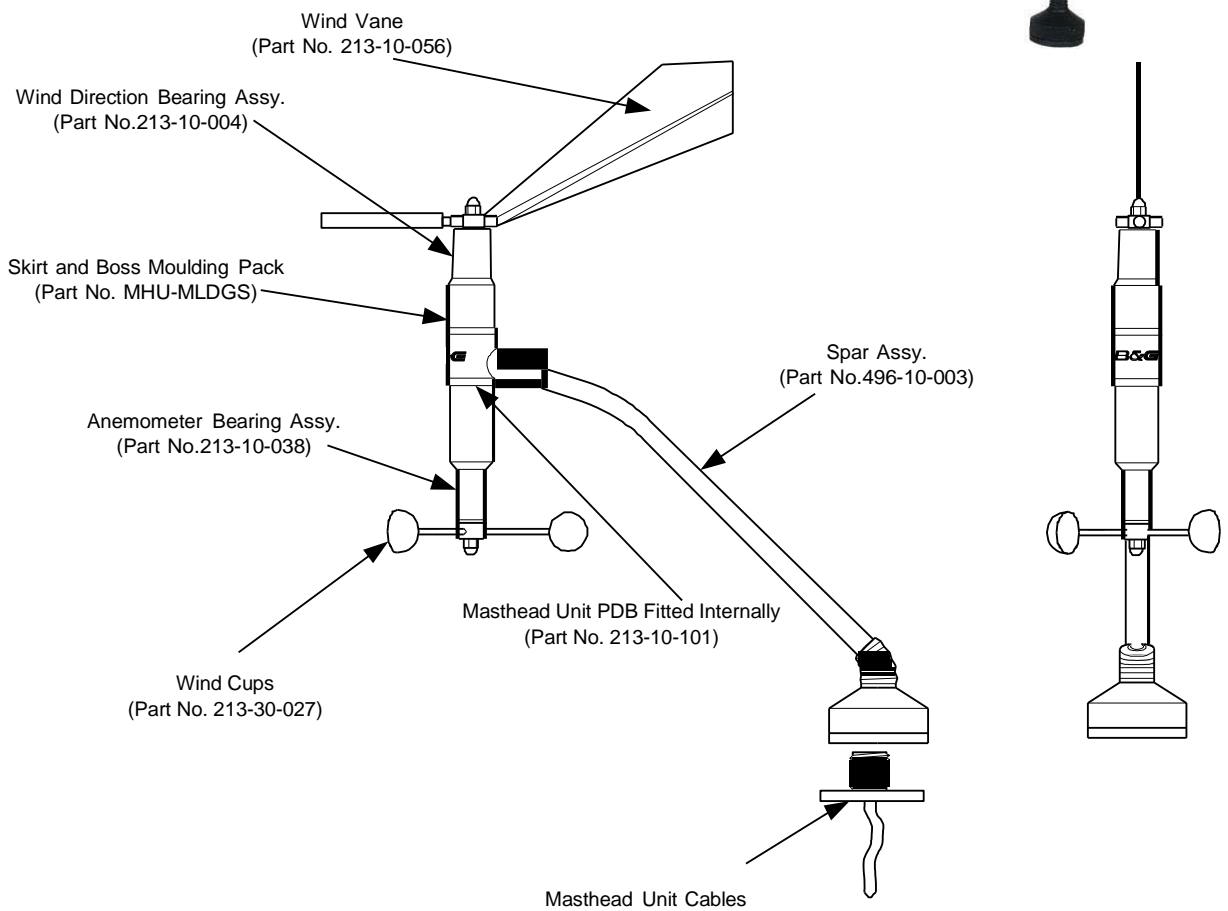


MASTHEAD UNITS - continued

496 Masthead Unit

Description: Used with Network and h1000 systems
 Date Introduced: 1996
 Date Discontinued: **Discontinued**
 Part Number: 496-00-001

Repairable by A+T. Compatible replacement available.
 Contact info@aandtstruments.com for a solution

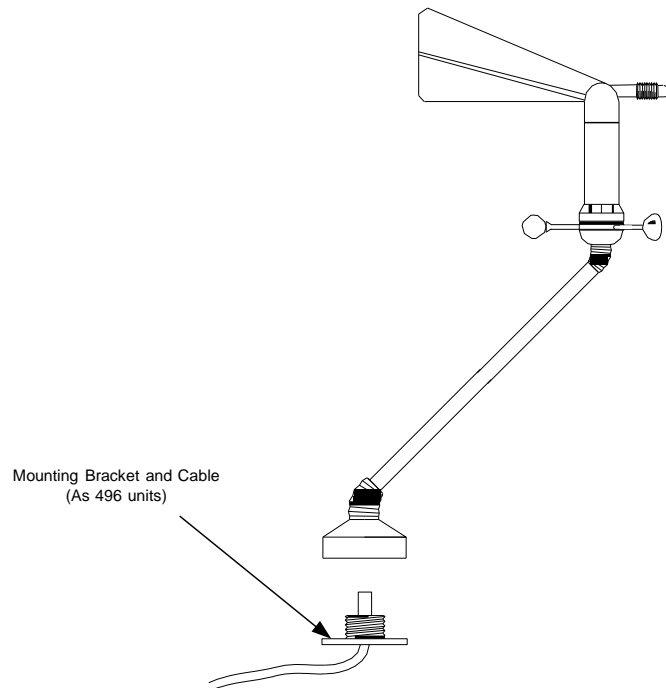


MASTHEAD UNITS - continued

283 Masthead Unit

Description: Used with Focus and early Network systems
Date Introduced: 1988
Date Discontinued: **Discontinued**
Part Number: 283-00-001

Repairable by A+T or compatible replacement available. Contact info@aandtstruments.com for a solution.



MASTHEAD UNITS - continued

A-Type Masthead Unit

Description: Used with Hengist/Horsa 'A' Type Systems (close hauled meter)

Date Introduced: 1950s

Date Discontinued: **Discontinued**

Repairable by A+T or compatible replacement available. Contact info@aandtstruments.com for a solution.

C-Type Masthead Unit

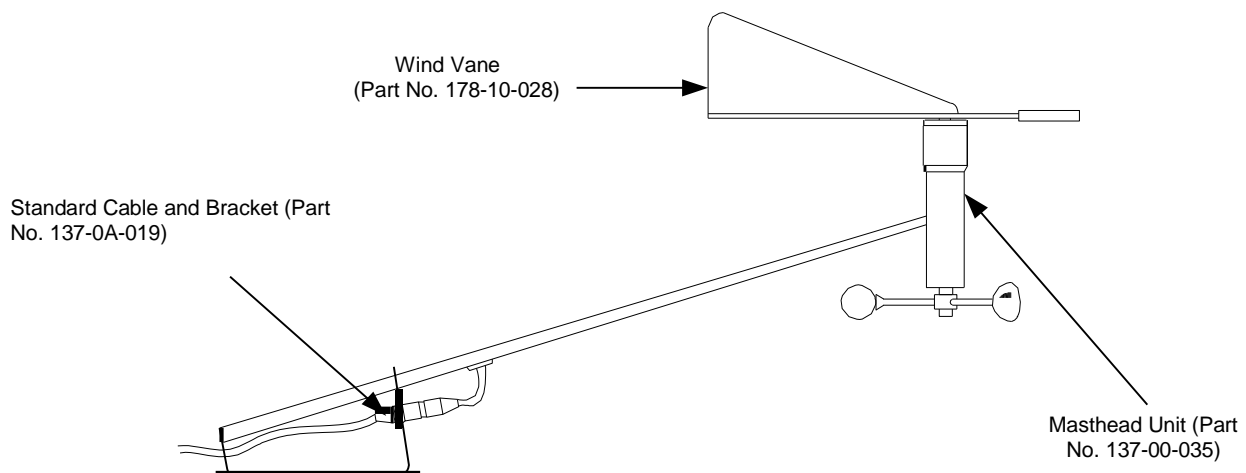
Description: Used with Horsa, Hornet, Hengist, 'C' Type and Hercules 190/290 systems (MWD meter)

Date Introduced: 1972/73

Date Discontinued: **Discontinued**

Part Number: 137-00-035

Repairable by A+T or compatible replacement available. Contact info@aandtstruments.com for solution.



A+T can make custom length and connector cables for Masthead units. Please contact info@aandtstruments.com

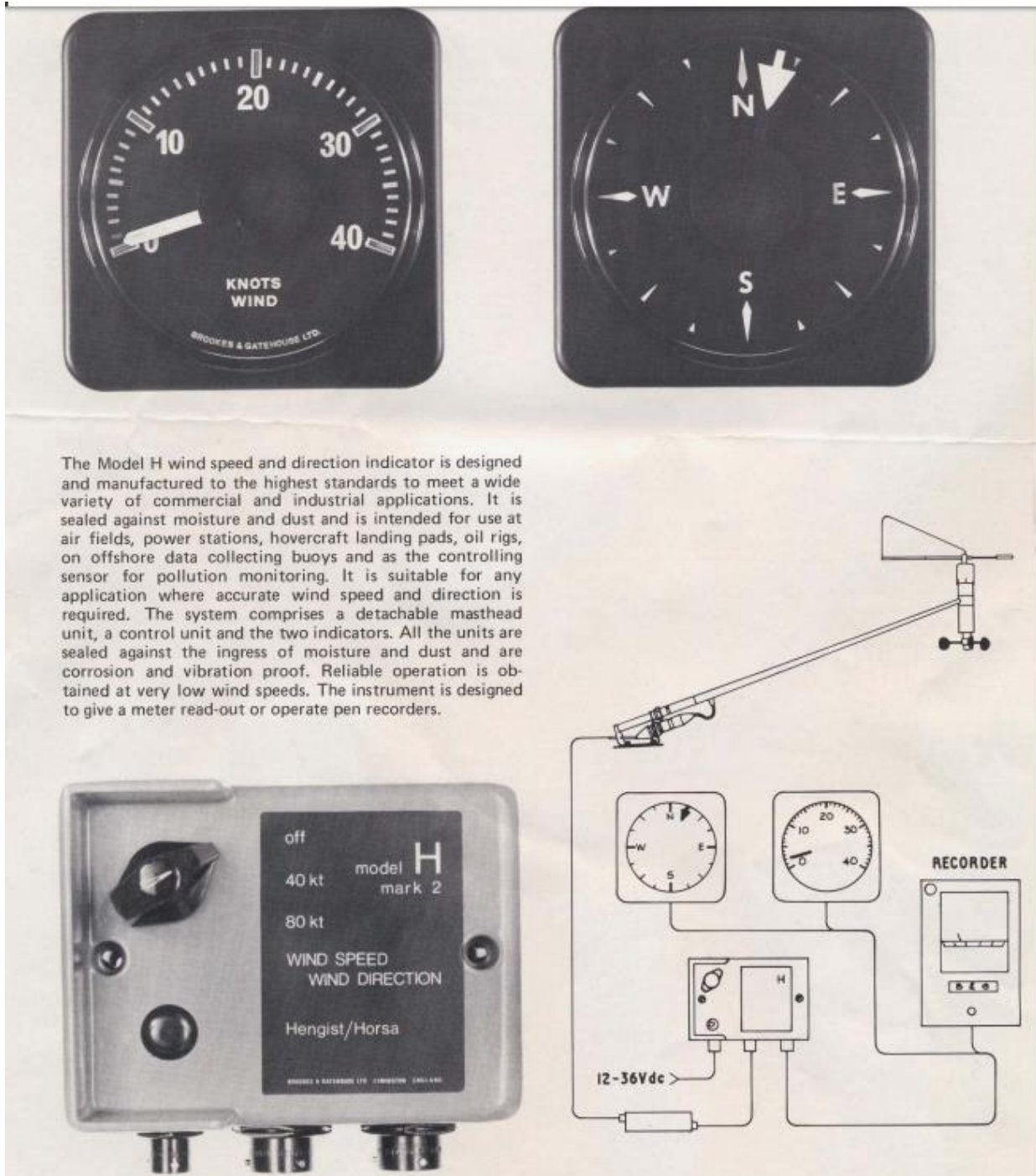


MASTHEAD UNITS - continued

Wind speed and direction indicator Model 160 AKA "Hovercraft"

Discontinued

Repairable by A+T. Contact info@aandtstruments.com





MASTHEAD UNITS – continued

Mast VMHU Cable



A+T can make custom lengths and connectors. Please contact info@aandtstruments.com for more information.

213 Mast Cable





COMPASS SENSORS

IMU Sensor

Description: Used with WTP2 systems.
 Date Introduced: 2008
 Date Discontinued: Current Product
 Part Number: BGH260000



Halcyon Gyro Stabilised Compass Sensor

Description: Used with the Halcyon Gyro Processor on Hydra/Hercules systems and ACP Mk2 from 2003
 Date Introduced: 1999
 Date Discontinued: **Discontinued**
 Part Number: BGH060002

Repairable by A+T. Contact info@aandtstruments.com



COMPASS SENSORS - continued



Gimballed Rate Compass

Description: Used with the Halcyon Gyro Processor on Hydra/Hercules systems and ACP Mk2. Also used as an NMEA 0183 heading source.

Date Introduced: 2008

Date Discontinued: **Discontinued** - Repairable by A+T.

Part Number: BGH330001

Repairable by A+T.

Contact info@aandtstruments.com



Halcyon 2000

Description: Used with Hydra/Hercules systems

Date Introduced: 1997

Date Discontinued: **Discontinued**

Part Number: 486-00-009

Repairable by A+T. Contact info@aandtstruments.com



View of the sensor showing the FastNet connector

COMPASS SENSOR - continued



H1000 Fluxgate Sensor

Description: Used with h1000 systems
 Date Introduced: 2001
 Date Discontinued: **Discontinued**

Repairable by A+T. Contact info@aandtstruments.com



View of sensor showing the two FastNet² Databus connection

Super Halcyon 3

Description: Used with Hydra/Hercules and Helmstar systems
 Date Introduced: 1987
 Date Discontinued: **Discontinued**
 Part Number: 386-00-009



Repairable by A+T. Contact info@aandtstruments.com

Sensor viewed from the base showing the connector



Sensor viewed from the top showing mounting orientation
 (Later models were white in colour)

COMPASS SENSOR - continued



Fluxgate Type – Halcyon 3

Description: Used with Hydra and Helmstar systems
Date Introduced: 1987
Date Discontinued: **Discontinued**

Repairable by A+T. Contact info@aandtstruments.com



Sensor viewed from the base showing the connector



Sensor viewed from the top showing mounting orientation

DIRECTION FINDERS



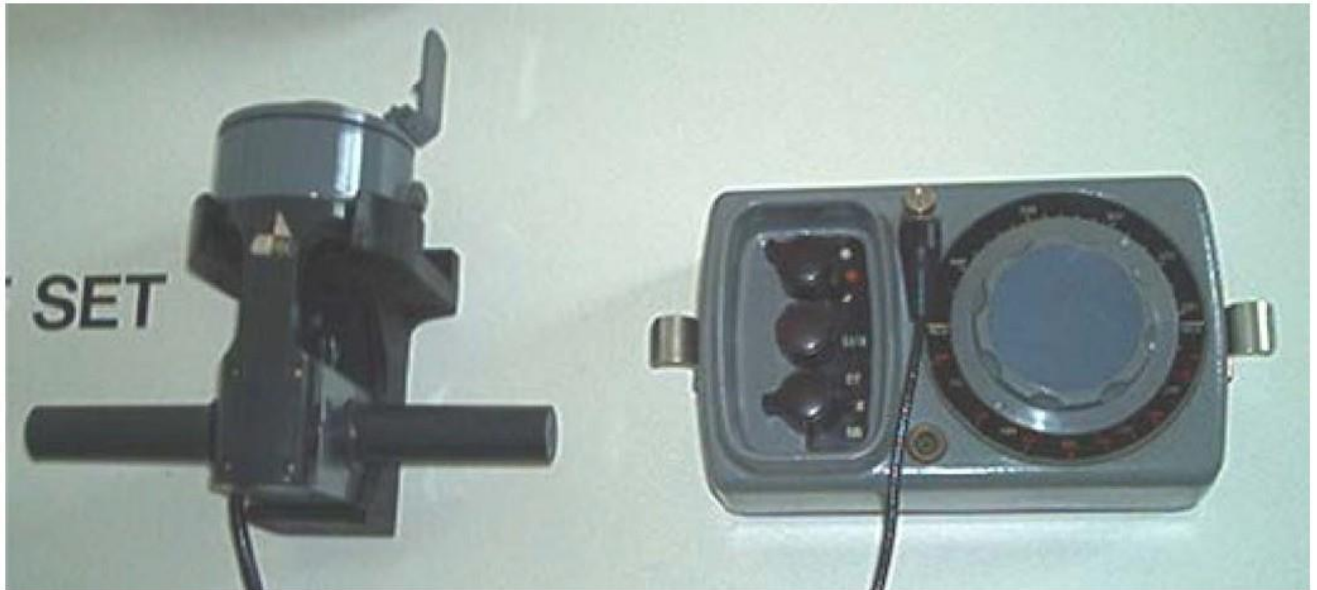
Heron/Homer

Description: Long wave direction finding aerial

Date Introduced: 1955

Date Discontinued: **Discontinued**

Repairable by A+T. Contact info@aandtstruments.com





METEOROLOGICAL SENSORS

Sea Temperature Sensor

Description: Used with Hydra and Hercules Systems
 Date Introduced: 1988
 Date Discontinued: **Discontinued**
 Part Number: 224-00-065



Air Temperature Sensor

Description: Used with Hydra and Hercules Systems
 Date Introduced: 1988
 Date Discontinued: **Discontinued**
 Part Number: 224-00-066



A+T Air Temperature Sensor

(Part No. ATS1)

Replacement for discontinued B&G sensor (**Part No. 224-00-066**)





METEOROLOGICAL SENSORS - continued

Barometric Pressure Sensor

Description: Used with Hydra and Hercules Systems
 Date Introduced: 1988
 Date Discontinued: **Discontinued**
 Part Number: 690-00-007

Repairable by A+T. Contact info@aandtinstruments.com



Heel/Trim Sensor

Description: Used with Hydra and Hercules Systems
 Date Introduced: 1988
 Date Discontinued: **Discontinued**
 Part Number: 690-00-004

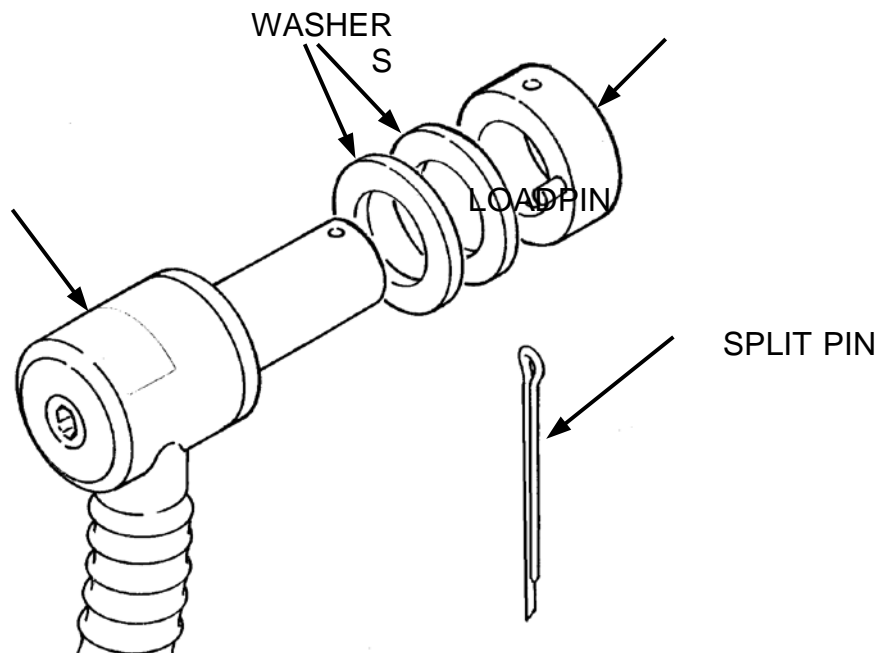
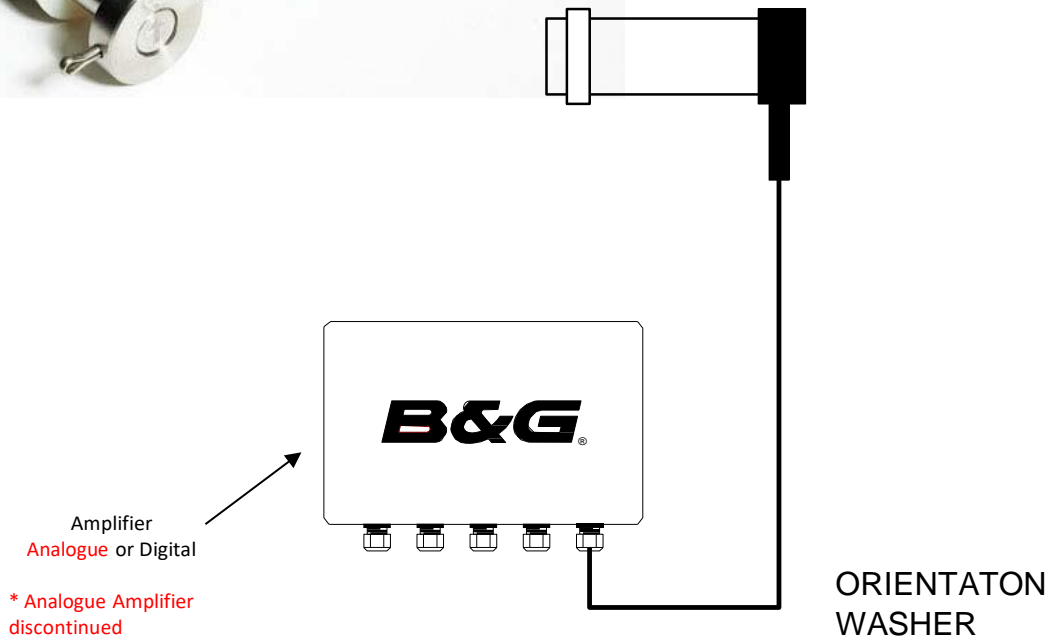
Repairable by A+T. Contact info@aandtinstruments.com



LOADCELL SENSORS

Description: Used with the Hydra 2000 and Hercules 2000 systems
 Date Introduced: 2000
 Date Discontinued: Current product
 Part Number: Standard Loadcell Part Numbers

- BGH041001 - 12.7 mm (1/2")
- BGH041001 – 16 mm (5/8")
- BGH041003 – 19 mm (3/4")
- BGH041004 – 23 mm (7/8")
- BGH041005 – 25.4 mm (1")
- BGH041006 – 28.5 mm (1 1/8")
- BGH041007 – 32 mm (1 1/4")



HYDRAULIC PILOT DRIVES

Blue T0 12V Hydraulic Ram

Description: Used with the H1000/H2000/H3000 autopilots

Date Introduced: 2003

Date Discontinued: 2008 (discontinued)

Part Number: RAM-T0-12V

Some parts available. Service Exchange. Contact info@aandtstruments.com for solutions.



Blue T1/T2 12V/24V Hydraulic Ram

Description: Used with the H1000/H2000/H3000 autopilots

Date Introduced: 1995

Date Discontinued: 2008 (discontinued)

Part Numbers: RAM-T1-12V / RAM-T2-12V / RAM-T2-24V

Some parts available. Service Exchange. Contact info@aandtstruments.com for solutions.



Blue T3 24V Hydraulic Ram

Description: Used with the H2000/H3000 autopilots

Date Introduced: 1995

Date Discontinued: Discontinued

Part Numbers: RAM-T3-24V

Some parts available. Service Exchange.

Contact info@aandtstruments.com for solutions.



RUDDER AND MAST ROTATION SENSORS

Rotary Rudder Position Sensor

Description: Used with the Helmstar, Hydra, Hercules, Network and h1000 autopilot systems

Date Introduced: 1985

Date Discontinued: **Discontinued**

Part Number: RRF-ACP

Repairable by A+T. Contact info@aandtstruments.com



Linear Feedback Sensor

Description: Used with the Hydra 2000, Hercules 2000 and h1000 autopilots (Blue Type 1 and 2 Rams)

Date Introduced: 2003

Date Discontinued: **Discontinued**

Part Number: SEN-RUD-LFB (used with Blue Rams)
SEN-RUD-LFB2 (used with Black Rams)



RUDDER AND MAST ROTATION SENSORS - continued

Black 12V/24V Black Hydraulic Ram

Description: Used with the H2000/H3000 autopilots
Date Introduced: 2008
Date Discontinued: **Discontinued**
Part Numbers: RAM-T1-
12V RAM-
T2-12V
RAM-T2-
24V

Contact info@aandtstruments.com for solutions.

