

# GPS 2000

Active Receiving Antenna for the 1575 MHz NAVSTAR GPS Satellite Navigational System for Maritime and Landmobile Use

## DESCRIPTION

- Flat-pack GPS-antenna for fixed installations.
- Full hemispherical coverage.
- Built-in high-gain, low-noise amplifier.
- Right-hand circular polarization (RHCP).
- Available in black or white, see model survey.
- 3 V or 5 V supply voltage (12 V available on request).
- DC supply via RF-connector.
- EMC tested to IEC 801 and IEC 255.
- Provided with FME (male), TNC (female) connector, or models with permanently attached 0.15 m cable with FME (male) connector, see model survey.
- Wide range of FME-accessories available.

GPS 2000B and GPS 2000W



GPS 2000B-P0.15 and GPS 2000W-P0.15



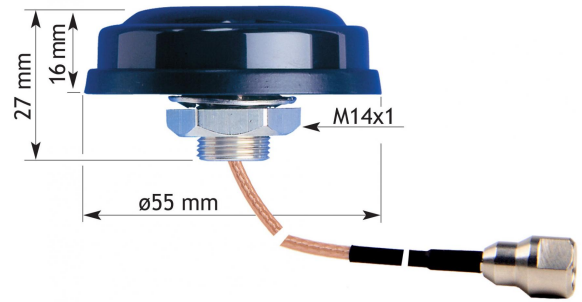
FME-VERSION



TNC-VERSION



MODELS WITH PERMANENTLY ATTACHED CABLE



MOUNTING

The gasket should be entirely supported by the mounting plane.

Do not use sealer on rubber gasket or other places.

SPECIFICATIONS

ELECTRICAL GENERAL SPECIFICATIONS	
MODEL	GPS 2000
ANTENNA TYPE	Active patch antenna
FREQUENCY	1575 MHz
IMPEDANCE	Nom. 50 Ω
POLARIZATION	Circular right-hand
COVERAGE	Hemispherical
GAIN (in axial direction)	28 dBi (typ.)
CROSSPOLARIZATION ATT.	> 10 dB (typ.)
SELECTIVITY	> 45 dB down @ ± 45 MHz
BUILT-IN AMPLIFIER	
GAIN	> 30 dB (typ.)
NOISE FIGURE	< 1 dB (typ.)
1 dB COMPRESSION POINT	Approx. +7 dBm
SWR (output)	< 2.0
SUPPLY VOLTAGE	5 ± 0.5 VDC or 3 V ± 0.3 VDC (12 V available on request)
CURRENT CONSUMPTION	Approx. 20 mA
MECHANICAL	
MOUNTING	14 mm / 0.55 in. dia. hole
MOUNTING THICKN.	0.7 → 4.5 mm / 0.028 → 0.18 in.
MATERIALS	Cu-nite brass, seawater resistant Lexan
COLOUR	Black or white, see ordering designations
TEMP. RANGE	-50° C → +70° C
CONNECTOR	FME (male), TNC (female) or models with 0.15 m RG 316 permanently attached cable with FME (male) connector, see ordering designations
RECOMMENDED INSTALL. TORQUE	8.5 ± 1 Nm
HEIGHT	16 mm / 0.63 in.
OUTER HEIGHT	26.5 mm / 1.04 in. total (FME) 38 mm / 1.50 in. total (TNC) 27 mm / 1.22 in. total for P0.15 models
WIDTH/LENGTH	ø55 mm / ø2.17 in.
WEIGHT	Approx. 120 g / 0.26 lb.

ORDERING DESIGNATIONS

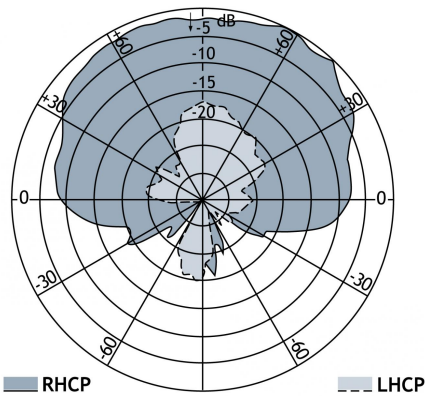
TYPE	COLOUR	PRODUCT NO.
<b>FME CONNECTOR</b>		
GPS 2000B-FME-5V	Black	112000026
GPS 2000B-FME-3V	Black	112000029
GPS 2000W-FME-5V	White	112000024
GPS 2000W-FME-3V	White	112000023
<b>TNC CONNECTOR</b>		
GPS 2000B-TNC-5V	Black	112000028
GPS 2000B-TNC-3V	Black	112000032
GPS 2000W-TNC-5V	White	112000027
GPS 2000W-TNC-3V	White	112000019
<b>PERMANENTLY ATTACHED CABLE</b>		
GPS 2000B-P0.15-5V	Black	112000072
GPS 2000B-P0.15-3V	Black	112000074
GPS 2000W-P0.15-5V	White	112000071
GPS 2000W-P0.15-3V	White	112000073

FME-SYSTEM ACCESSORIES

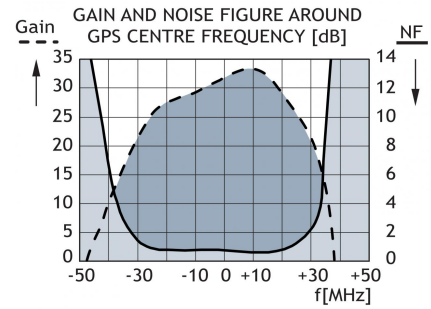
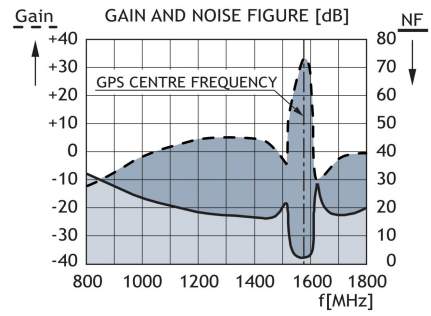
FME-CABLES		FME-CONNECTORS	
TYPE	PRODUCT NO.	TYPE	PRODUCT NO.
1 m FME	130000437	FME-FME	130000583
2 m FME	130000447	FME-P (Prolongation)	130000565
3 m FME	130000457	FME-N	130000571
4 m FME	130000466	FME-FSMA (Female-SMA)	130000578
5 m FME	130000474	FME-BNC	130000566
6 m FME	130000483	FME-TNC	130000569
4 m FME-white	110000064	FME-UHF	130000572
6 m FME-white	110000066	FME-MUHF (Mini-UHF)	130000573
12 m FME-white	110000068	FME-EMUHF (Elbow-MUHF)	130000582
18 m FME-white	110000069	FME-EBNC (Elbow-BNC)	130000580
		FME-ETNC (Elbow-TNC)	130000581
		FME-SMA	130000577

For further information about other types of FME-cables and FME-connectors, please compare the cable and connector data sheets under accessories.

VERTICAL RADIATION PATTERN

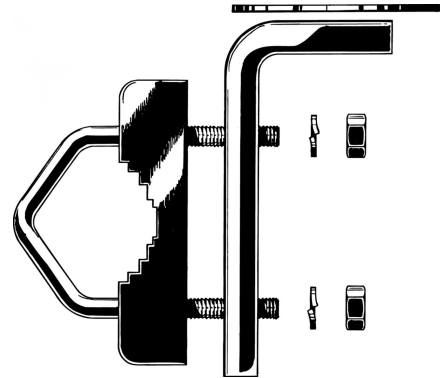



TYPICAL RESPONSE CURVES



ACCESSORIES

Stainless steel angle bracket for fixation of GPS 2000... antennas. (To be ordered separately: MB 2000 clamp). Not recommended for GPS 2000...-P0.15 types.



 PROCOM A/S reserve the right to amend specifications without prior notice.  
22/04/14