



# UHF Radio Telemetry



Valeport radio telemetry solutions are centered on our IP67 housed package offering UHF transmission options. The robust housing contains back up battery capability to cover short-term survey work or power outs.

Compatible with most Valeport products, the units are designed to provide transparent links between instrument and operating software, as well as third party Internet / FTP data display services.



## Out Station Transceiver

Housing:	IP67 moulded ABS box with o-ring seals, and separate battery & electronics compartments with connections for antenna, PC interface and external DC power.
Power input:	Requires 9 – 28V DC
Backup Battery:	The telemetry unit is fitted with 4 Alkaline D-Cell batteries to provide back-up power during long term deployments or power for short term deployments. Internal battery Capacity is 13,000mAH @ 6vDC (based on 75% efficiency)
Radio:	SATEL SATELLINE-M3-TR1
Antenna:	Standard 0dB whip antenna, plugged directly onto the housing. Optional 3dB omni-directional antenna with 10m cable
Frequency:	403 ... 473 MHz (contact Valeport for alternative frequencies)
Channels:	12.5 / 20 / 25 kHz selectable
Channel select:	Software controlled
License:	Conforms to EN 300 220, EN 300 133 approvals.
Power output:	1W maximum (500mW, to comply with UK MPT1329 regulations)
Dimensions:	260 x 160 x 55mm
Weight:	2kg

## Base Station Transceiver

Housing:	IP67 moulded ABS box with o-ring seals, and separate battery & electronics compartments with connections for antenna, PC interface and external DC power.
Power input:	Requires 9 – 28V DC
Radio:	SATEL SATELLINE-M3-TR1
Frequency:	403 ... 473 MHz (contact Valeport for alternative frequencies)
Channel Spacing:	12.5 / 20 / 25 kHz selectable
Channel select:	Software controlled
Power output:	1W maximum (500mW, to comply with UK MPT1329 regulations)
Dimensions:	260 x 160 x 55mm
Weight:	2kg

## Base Station Antenna

Gain over ½ wave dipole:	3dB
VSWR:	Better than 1.5:1 over the operating band
Max Input Power:	150W
Input Impedance:	50
Bandwidth:	±2% of centre frequency
Polarisation:	Vertical
Half Power Beamwidth:	32°
Connection:	10m length of RG213 terminated N type socket and PVC sleeve
Radiating Elements:	Brass rod plasfilm coated
Encapsulation:	Reinforced glass fibre tube
Length:	1.160m @ 460MHz
Weight:	1.1kg
Wind Loading:	6.4kgf @ wind velocity of 160kph

## Ordering

### Out Station Transceiver

04000566-SAT-M3TR1:	UHF Radio Transceiver in IP67 housing. Supplied with selectable frequency synthesised UHF radio - 403...473MHz as standard "rubber duck" type omni-directional antenna Comms lead
FUC3-458M10:	Option: 3dB antenna and 10m cable for transmitter

### Base Station Transceiver

04000569-SAT-M3TR1:	Radio Receiver Unit in IP67 housing Supplied with selectable frequency synthesised UHF radio - 403...473MHz as standard 3dB omni-antenna & 10m cable External DC power lead and comms lead to PC
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### Option

0740018:	Solar power option c/w solar panel, frame and battery pack in environmental housing
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## Compliance

Directive	2014/53/EU (RED) 2011/65/EU (RoHS)
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Note: It is the customer's responsibility to ensure that the chosen radio frequency is clear and available for use and that any required fees are paid or licences obtained. Valeport accepts no responsibility or liability for system failure due to radio interference from a third party source.