

Centaur[®] VHF Manpack Radio (VM)

Secure VHF communications integrating voice and data, embedded GPS supporting situational awareness, and an IP router.



Exelis is the VHF world market leader with more than 650,000 radios deployed worldwide. The Centaur VHF Manpack (VM) is a fully secure voice and data radio providing Situation Awareness (SA) for dismounted troops and vehicles that require the highest level of security. We are able to provide this using AES 256 bit encryption and by allowing the radio to operate in three different secure modes – fixed frequency, frequency hopping and free channel search.

Every radio is stringently tested to surpass military specifications. The operational temperature of all radios exceeds -40°C to +71°C. The radios are robust, reliable and can be trusted in the most hostile of environments. Flexibility is key on the battlefield; the VM is software programmable and can be easily upgraded. The versatility of this radio enables integration between dismounted and vehicular units.

VM OVERVIEW

- > Compact, lightweight tactical radio
- > Fully secure in both voice and data
- > Resistant to jamming and interference
- > Supports Situational Awareness (SA)
- > Robust, reliable and battle proven
- > Centaur radios are available and interoperate with ground, sea and air applications
- > Better radio reliability provides serious long term customer savings

OPERATIONAL BENEFITS

- > Embedded GPS and IP router
- > Open architecture IP data networking
- > TCP/IP internet compatible
- > Fully secure with world-leading AES 256-bit encryption
- > Multiple ECCM modes – secure fixed frequency, frequency hopping, free channel search
- > Temperature range exceeds full military specification and environmental climates
- > Backward compatible with existing analogue radios (STANAG 4204)
- > CVSD and MELP voice modes resist enemy jamming
- > Outstanding co-site performance

Centaur[®] VHF Manpack Radio (VM)

SPECIFICATIONS

Physical Characteristics

Size	185 mm x 88 mm x 234 mm
Weight	3.4 kg

System Characteristics

Model type	Manpack and vehicle
Frequency	30 - 88 MHz
Power out	5/16 watts
Data rate	16 kbps
DC Power in	14 volt battery
ECCM	Multiple levels of protection
Embedded Comsec	Yes
Embedded Transec	Yes
Embedded GPS	Yes
Functions	Voice, data
Platform	Man, vehicle and sea (inshore)
Operational temperature	-40°C to +71°C including solar
Storage temperature	-55°C to +71°C including solar
Environmental	Full military specification
EMI/EMC	Full military specification
Power	Smart rechargeable Lithium-ion battery: 4AH, 5AH and 10AH
Hold up battery	Rechargeable Lithium-ion (internal)
Reliability (MTBF)	>5000 hours
Maintainability (MTTR)	Remove and replace < 15 minutes No preventative maintenance or adjustments
Test	Full Built-In-Test (BIT) Fault isolation



Exelis Defence Ltd.
Jays Close, Viabes Estate
Basingstoke, Hampshire
RG22 4BA, United Kingdom
Ph #: +44 (0) 1256 311600
defenceltd@exelisinc.com

www.exelisinc.com

EXELIS

EASE OF USE

- > Simple to use with standard controls for all VHF radios
- > Software programmable - upgradeable in the field
- > Standardised man machine interface
- > Wide range of ancillaries (headsets, handsets, antennas, batteries and chargers)

Exelis is a registered trademark of Exelis Inc.

Copyright © 2013 Exelis Inc.
VM06, Approved for Public Release
04-10, EXPID7022

Registered in England No. 2803090.
Registered office as above.