



# HSNR-5000 Hybrid Naval Subnet Router Solution

Tactical, Cross Platform  
Networking Technology



Navies around the globe are faced with increased asymmetrical threats which is the main driver behind better situational awareness requirements. The need to share sensor data and to receive sensor data from allied forces are causing massive growths in reliable communications and bandwidth demand.

The dynamic nature and complexity of these missions means that naval users need flexibility and adaptability while utilizing legacy systems and new generation systems together, especially on different communication environments and joint/allied forces operations. Furthermore, long-term total cost of ownership and sustainability of any solution comes under increasing scrutiny.

Our Hybrid Naval Subnet Router Solution provides cutting edge and transparent tactical IP networking infrastructure without location limitations. The system is able to aggregate and converge existing radios (HF/VHF/UHF) for narrowband communications while supporting broadband newer generation wireless systems under a single managed solution. Our solution is transparent to the existing applications (web services, chat, email, messaging etc.) so long as they are IP based. The system has the capability to support multiple platforms and can automatically enable radios from different operational domains within the same network.

HSNR-5000 is a simple and cost-effective solution providing reliable, mobile IP networking capability between naval platforms and fixed sites. It also enables a long-range, ship-to-ship or ship-to-shore, medium data rate communication networking. Our solution is a self-configured and self-organized IP network with dynamic selection of relays and bandwidth provisioning.

HSNR-5000 provides an integrated communication platform supporting current NATO STANAG's such as STANAG 5066, STANAG 4691 and STANAG 4538 which enables platforms to have simultaneous access to legacy narrowband HF/VHF/UHF networks and broadband IP networks simultaneously.

HSNR-5000 is designed to operate seamlessly with a broad range of legacy voice radios. Software defined modems enable implementation of upcoming waveforms as well as ability to remote control the radios (if supported by the radio).

Security is an integral part of HSNR-5000 solution supports both serial type legacy synchronous and asynchronous data crypto devices as well as IP crypto equipment.

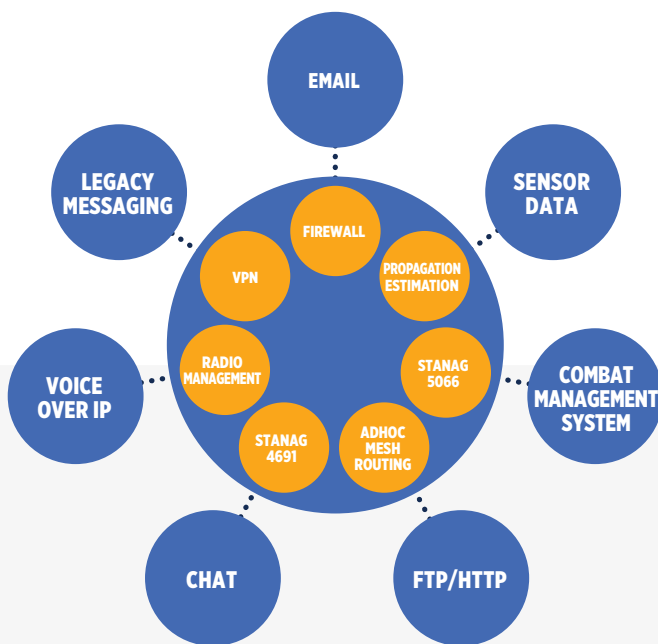
HSNR-5000 is designed to be completely modular which enables the solution to be retrofitted to even most space-constraint applications.



Both hardware and software architecture of the solution enables very advanced redundancy measures to yield very high availability rates, even under most difficult situations. HSNR-5000 solution is purpose-built to meet critical communication and situational awareness needs of tactical platforms in extreme environments and under most challenging conditions.

Optional voice capabilities allow tightly integrated data and voice communications solution under a single umbrella which enables to usage of the valuable resources with very high efficiency.

Integrated automatic subnet relay functionality extends operational communication range to support beyond line-of-sight where each platform acts not only as a subscriber but also as a repeater.



## KEY FACTS

- Future Proof
- Mission Flexibility
- Voice and wideband data capable
- Leverages existing voice radios for value added tactical network operations
- Multi-mission, multi-user, and multi-waveform
- Meets current and future requirements
- Integrated STANAG 5066, 4691, 4538 capabilities
- Broadband connection Support
- Supports standard TCP/IP and UDP/IP protocols
- Integrated relay functionality extend operational communication range
- Dynamic bandwidth allocation in response to reported requirements
- Application Transparent
- Technology Neutral
- Self Healing
- Self Organizing
- Compliant to MIL-STD-810 environmental conditions and MIL-STD-461 EMI/EMC requirements.

ONUR is your partner in creating network enabled voice and data communications capability by converging state-of-the art communication systems with legacy communication assets.



### Headquarter:

Mutlukent Mahallesi 1942. Cadde No: 39,  
TR06800 Ümitköy Ankara  
**Tel:** +90 312 235 15 50 **Fax:** +90 312 235 15 40  
**www.onur.net**

### R&D Center:

Mutlukent Mahallesi 1942. Cadde No: 41,  
TR06800 Ümitköy Ankara  
**Tel:** +90 312 235 15 50 **Fax:** +90 312 235 15 40  
**info@onur.net**