

DATASHEET

# XNK-Mini

## Expeditionary Networking Kit (XNK) Mini

The XNK-Mini is a modular, scalable deployable communications transit case solution that brings enterprise class small form factor IP networking, IT capabilities and military tactical communications infrastructure to austere field operations. It is the first of its kind integrated solution that combines open standard Half Rack Width appliances with our XC devices in support of tactical-edge computing and storage, virtualization (traditional or hyper-converged), and secure IP networking.

### Modular Design

The XNK solution is modular and can scale to meet the smallest or largest customer requirements, including single person portable and airline carry-on luggage compliant solutions. The XNK is comprised of:

- XNK modules – Half Rack Width (HRW) route, switch, compute, power, and Software Definable Network-Appliances™ (SDN-ATM)
- Software-based network functions and virtualized network appliances
- TFO chassis system

### XNK Chassis System

The XNK chassis system is standards compliant and designed to retain HRW appliances and traditional commercial off-the-shelf (COTS) 1U, 2U, or larger



IT rack-mount appliances, providing the ultimate in flexibility. The XNK chassis can mount into traditional, fixed location IT racks and commercial IT transport cases. Available in 2U and 3U variants, the chassis system scales to any number of HRW, 1U, or 2U appliances, in any combination, to meet your mission requirements. HRW appliances can be inserted into and removed from the XNK chassis system quickly and easily without tools. They can operate freestanding outside the chassis system, as they do not rely on the chassis for power or network interconnectivity, only retention and transport.

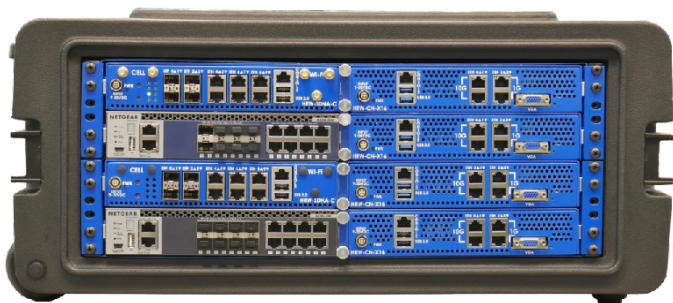
## HRW Form Factor

The HRW form factor has been created and released as an industry open standard for use by anyone who wishes to design products to the form factor specification. The HRW form factor has been designed to support two appliances side by side within a standard IT rack, and can be inserted into and removed from the TFO chassis system quickly and easily without tools. HRW devices are shallow in depth, supporting easily stow-able transit case solutions. HRW appliances can operate freestanding outside the chassis system, as they do not rely on the chassis for power or network interconnectivity, only retention and transport. The HRW mechanical specification is available to other vendors to encourage an open chassis ecosystem. Eliminating bespoke solutions and proprietary form factors, enables you to implement innovative technology from a range of tactical comms vendors, instead of being tied to just one for the life of a program.

## Power and Networking Interconnection

The XNK and XNK-Mini rugged transit case solutions have been designed for use in multi enclave within a single transit case requirements. SUB-U has intentionally not built power and IP networking interface interconnectivity into these transit case systems based on over a decade of customer feedback regarding red/black separation and EMI leak concerns. SUB-U produces products that filter and isolate power at the power supply output and the device power input, ensuring robust EMI design.

Sigma Defense offers several Half Rack Width appliances designed for use as stand alone desktop appliances within the Expeditionary Networking Kit Mini Carbon Fiber VIP case or the scalable 2U-4U XNK Chassis System.



XNK



### Compute Nodes

- HRW-CN
- HRW- CN 1500

### Miscellaneous

- CS HRW-P

### Software Definable Network-Appliances

- SDNA-ECB-HRW
- SDNA-HRW-X2
- SDNA-HRW-R
- SDNA-HRW-i7

