

OPDS-Talon

Owl Perimeter Defense Solution (OPDS) Software Platform

Vigorous Engineering. Proven Technology.

FEATURES & ENHANCEMENTS

The latest version of the OPDS-Talon software platform features a user-friendly menu design, more network diagnostics, and simplified configuration.

- Clean menu design for simplified navigation
- Menu-based server configuration
- Common network diagnostics tools available in menus
- Select menu options displayed by both user role type and server mode
- Simplified process for updating and viewing current software versions
- Application updates for improved performance and stability

HARDENED SECURITY STANDARDS

- Secure operating system based on Owl Security Enhanced Linux (OSEL) and CentOS
- Adheres to CIS benchmarks
- Unsupported IP protocol ports are disabled, restricting traffic before packets can enter the system

Owl Cyber Defense (Owl) specializes in data diode hardware technology that allows for secure, one-way data transfer while providing absolute network segmentation, assuring network security against malware, control system override, and other risks. While OPDS data diodes enforce network segmentation and eliminate the risk of penetration, a complementary software layer is required in order to manage the device, enforce security, interact with the network and control data flow. OPDS-Talon is the software layer that operates the device, manages data flows and protocols while allowing the data diode to interact with endpoints on the network. Built on a Defense-in-Depth strategy, the OPDS hardware and Talon software operate together in a layered approach to defend both the network and hardware from cyber attacks.

OPDS-Talon was engineered to be a comprehensive suite of software that supports the entire OPDS product line, running on DIN rail units, 1U small form factor units, and enterprise servers. OPDS-Talon runs on the following hardware products: OPDS-100D, 100, and 1000, and EPDS. The core proxies it supports are: Remote File Transfer, FTP, UDP, TCP, Syslog, SMTP, SNMP Traps, UDP unicast, UDP multicast, and UDP broadcast. OPDS-Talon also provides an extensible foundation for flexible support of a broad range of protocols and interfaces, such as OPC, Modbus, OSIsoft® PI System, and AVEVA Wonderware®, to satisfy various OT requirements.

One-way data transfer is enforced in the Owl data diode hardware to protect the integrity of the source network. OPDS-Talon uses a simple menu-based administration system to define interfaces and data flows operating with source and destination networks. It features a hardened Linux operating system that follows Center for Internet Security (CIS) benchmarks. These functionalities enable secure, deterministic one-way data flows.

Navigate Tasks Quicker with New Menus

- 1 Intuitive menu options and organization
- 2 Follows Unix best practices
- 3 Streamlined menus enforce role-based access controls

UPDATES FOR ENHANCED SECURITY AND PERFORMANCE

Owl's software platforms are constantly improving to better serve customer needs. Occasionally, this requires users to perform system updates. That's why we recommend that customers keep their OPDS software up-to-date with the latest release through Owl Technical Services for streamlined usability and security. Over the last couple of releases, the OPDS software platform has seen more than 70 enhancements, ranging across OS, system controls, and new features.

OPDS-TALON COMES STANDARD ON ALL OPDS & EPDS PRODUCTS



Best-in-Class Security Features

OPDS solutions are designed around the three basic attributes of security: Availability, Confidentiality, and Integrity.

AVAILABILITY

- CIS hardening installed for mitigating attacks
- Menu-driven for reduced vulnerability; no command line access required
- Critical OS and application files scanning with system alert if compromised
- Internet browsing prohibited to rule out system intrusion and malware
- Built on high MTBF hardware

CONFIDENTIALITY

- One-way-transfer protocol, based on ATM link layer communications
- True protocol-break between networks (terminated at source/destination servers)
- Payload-only transfer: no routable header information transferred
- Separate system administrators for transferring data on each side of data diode

INTEGRITY

- Hardware ATM protocol supports HW checksums, packet sequence numbering, and channel identifiers
- Payload data checked with hash and/or checksums when crossing the data diode
- Role-based menu access for operating and configuring (IAO, SA, AM, CON)
- System includes two operational states (Operational Mode and Maintenance Mode)
- Independent network interfaces for data transfer and network administration

OWL Cyber Defense

Owl Cyber Defense Solutions, LLC leads the world in data diode and cross domain network cybersecurity. With a constant focus on customers in the military, government, critical infrastructure, and commercial communities, Owl develops market-first, one-way data transfer products to meet a variety of operational needs, from entry level to enterprise.

For more information on Owl, or to schedule a demo, visit www.owlcyberdefense.com