

Owl Talon Torrent[™]

1U Data Diode

Low Latency, High-Speed One-Way Transfer Up to 10Gbps



Key Features

- → Secure, hardware-enforced, one-way data transfers
- → Transfer multiple high-speed simultaneous data types and protocols via 16 independent channels on a single device
- → Compatible with Owl Talon software platform for easy-to-use, web-based user interface
- → Long-lasting, set-and-forget reliability
- → Meets U.S. Government Protocol Filtering Diode requirements
- \rightarrow Up to 10 Gbps max throughput
- → Advanced security features including TPM binding, SELinux enforcement, STIG-compliant OS, BIOS password, and disk encryption

Owl Talon™: The Data Diode, Reinvented.

Building on a quarter century of one-way networking expertise and customer feedback, the Owl Talon™ data diode platform is the latest, revolutionized iteration of Owl's award-winning, rigorously tested data diode software platform, designed for fast and easy configuration with an all new, modern user interface, unmatched interoperability, and secure, reliable operation.

Owl Talon™ Torrent: Ultra High-Speed Data Diodes

Owl Talon Torrent data diodes are the latest, revolutionized data diode series Owl's portfolio, representing the pinnacle of performance in data diode technology. With an all-new FPGA-based protocol filtering diode (PFD) architecture designed for low latency, ultra-high data transfer requirements, Owl Talon Torrent data diodes are capable of file transfer at up to 100 Gbps.

Owl Talon™ Torrent: 1U

The Owl Talon Torrent 1U Data Diode is a highly integrated, all-in-one, 19" rack-mountable appliance that leverages the Supermicro Twin SuperServer hardware platform, Owl Talon software platform, and Owl Talon Torrent data diode card kit to provide secure, high speed one-way data transfers at up to 10 Gbps. With an extensible foundation to support a variety of OT and IT protocols and applications, the Owl Talon Torrent 1U Data Diode enables a broad range of one-way data transfer use cases at ultra high-speeds.

Protocols currently supported in the Owl Talon Torrent: 1U include high-speed file transfer (RFTS) and high-speed TCP protocol adapter (TCP-PA) with additional protocol support coming soon.



Owl Talon Torrent™ Data Diode Card Kit

The Owl Talon Torrent Data Diode Card Kit is comprised of two commercial PCIe network interface cards (one send, one receive) connected via a one-way-only fiber optic cable cable (for transfer between cards). Each individual card is installed on a separate host server within the 1U chassis envelope. The Owl Talon Torrent Data Diode Card Kit facilitates high bandwidth, low latency one-way transfer at up to 100 Gbps.

Technical Specifications

Supermicro Twin SuperServer SYS-120TP-DTTR

Case

19" 1U Rackmount Chassis

Dimensions

Height:

1.7 inches (43 mm)

Width:

17.25 inches (438 mm)

Depth:

28.25 inches (718 mm)

Security

Hardware:

Trusted Platform Module (TPM) 2.0

Silicon Root of Trust (RoT) – NIST 800-193 Compliant

Features:

Cryptographically Signed Firmware

Secure Boot

Secure Firmware Updates

Automatic Firmware Recovery

System Lockdown

16 independent channels that automatically adapt to overall bandwidth requirements

Operating Environment

Environmental Specs:

Operating Temperature: 10°C to 35°C

(50°F to 95°F)

Non-operating Temperature: -40°C to

60°C (-40°F to 140°F)

Operating Relative Humidity: 8% to 90% (non-condensing)

Non-operating Relative Humidity: 5% to 95% (non-condensing)

Approvals/Certifications

Pending regulatory certification exercises



Unmatched Ease of Use

Featuring a modern, web-based user interface, the Owl Talon software platform is extremely easy to use. In just minutes, you can configure your data flows from source to destination, getting you up and running faster than ever before.





Owl Cyber Defense Solutions, LLC, headquartered in Columbia, MD, is a pure play cybersecurity company solely focused on purpose-built, made-in-the-USA data diode and cross domain solutions. Trusted to protect the most sensitive government and commercial networks worldwide, our technologies are developed and manufactured to meet the strictest U.S. security standards. Owl enables secure, near-instantaneous collaboration across network boundaries—powering faster, safer, and smarter decisions for military, federal, and commercial critical infrastructure organizations. With a focus on scalability, interoperability, and regulatory compliance, Owl ensures resilient communication in the most high-threat environments. Rigorously tested. Globally trusted.

Visit www.owlcyberdefense.com or contact us at info@owlcyberdefense.com for more details.

