



NEWS RELEASE

# Credo Unveils ZeroFlap Optical Transceivers – A Reliability Revolution for Optics in AI Networks

2025-10-13

Credo Introduces System-Level Optical Approach Leveraging PILOT Diagnostics at 2025 OCP Global Summit

SAN JOSE, Calif.--(BUSINESS WIRE)-- **Credo Technology Group Holding Ltd** (Credo) (NASDAQ: CRDO), an innovator in providing secure, high-speed connectivity solutions that deliver improved reliability and energy efficiency, today announced its **ZeroFlap (ZF) optical transceiver** product line supporting 400G, 800G, and 1.6T network speeds. The ZF optical transceiver product portfolio is designed to enable better management and mitigation of optical link flaps — an issue whereby a link will repeatedly connect and disconnect in quick succession — providing a new level of network stability and productivity to AI backend networks.

At OCP Global Summit 2025, Credo introduces system-level optical approach with ZeroFlap optical transceivers and PILOT diagnostics.

The new ZF optical transceivers utilize Credo's PILOT<sup>1</sup> platform to address optical transceiver

reliability in AI networks through system hardening, advanced telemetry, and remote management. As AI cluster sizes scale beyond 1GW, transceiver reliability has proven to be a limiting factor in cluster stability and uptime. Furthermore, customer demand for bare-metal GPU instances limits the operators' ability to manage GPU facing optics.

Credo's ZF optical transceivers solve these issues through:

- Mission mode optical link quality monitoring, including Bit Error Rates (BER), Forward Error Correction (FEC) histograms and multipath interference (MPI) indicating contamination in optical connections

- Transparent, in-band messaging enables comprehensive optical link management from either endpoint, supporting bare-metal deployments, and heterogeneous operating system environments
- On transceiver, non-volatile, event logging for debug and auditing purposes
- PILOT platform extensions, residing on network switches, for optics telemetry extraction and streaming to monitoring agents, initially supporting SONiC and other switch operating systems
- Enhanced component hardening and proactive self-diagnostics to detect impending failures such as laser degradation or electrostatic discharge related damage

## ZeroFlap Optics and the Open Compute Project:

As part of our commitment to standardization, Credo will contribute the ZF optical specification to a new Optics Reliability Workstream that Credo and Oracle will chair inside the **Open Compute Project** (OCP) Foundation.

Credo CEO Bill Brennan and Oracle Senior Principal Network Engineer Stephen Manley will present “**The Path to Zero Flap: Reinventing Optical Reliability for Scalable AI Clusters**” at 1:15pm on Tuesday, October 14, 2025 in room 211 at the OCP Global Summit in San Jose and demonstrate ZF Optical transceiver operation in booth B23.

“Moving our ZeroFlap commitment beyond AECs to optics requires a system approach to collecting, processing and actioning telemetry before it leads to a link flap,” said Chris Collins, AVP for optical products at Credo. “Credo is committed to the ZeroFlap revolution and is excited to work with the OCP community to standardize this important effort.”

## Availability:

Credo ZF optical transceivers are now sampling. For more information, contact [sales@credosemi.com](mailto:sales@credosemi.com).

To learn more about Credo products, go to the product pages linked [here](#).

## About Credo

Credo’s mission is to redefine high-speed connectivity by delivering breakthrough solutions that enable the next generation of AI-driven applications. We are committed to enabling faster, more reliable, more energy-efficient, and scalable solutions that support the ever-expanding demands of AI, cloud computing, and hyperscale networks. Our innovations ease system bandwidth bottlenecks while simultaneously improving on power, security, and reliability. Our connectivity solutions are optimized for optical and electrical Ethernet applications, including the emerging 100G (or Gigabits per second), 200G, 400G, 800G and the emerging 1.6T (or Terabits per second) port markets. Credo products are based on our proprietary Serializer/Deserializer (SerDes) and Digital Signal Processor (DSP) technologies. Our product families include Integrated Circuits (ICs) for the optical and line card markets, Active

Electrical Cables (AECs) and SerDes Chiplets. Our intellectual property (IP) solutions consist primarily of SerDes IP licensing.

For more information, please visit <https://www.credosemi.com>. Follow Credo on **LinkedIn**.

Credo and the Credo logo are registered trademarks of Credo Technology Group Limited in the United States and other jurisdictions. All other trademarks referenced herein are the property of their respective owners.

---

## 1: PILOT: Predictive Integrity Link Optimization and Telemetry

### Media Contact:

Diane Vanasse

[diane.vanasse@credosemi.com](mailto:diane.vanasse@credosemi.com)

### Investor Contact:

Dan O'Neil

[dan.oneil@credosemi.com](mailto:dan.oneil@credosemi.com)

Source: Credo