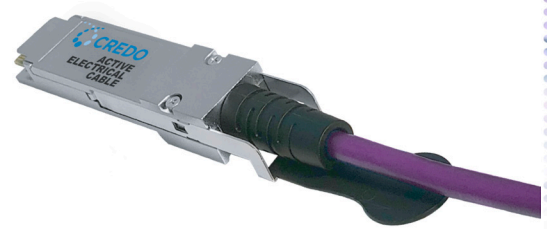




CLOS AEC SPECIFICATION

# Plug & Play AEC DDC



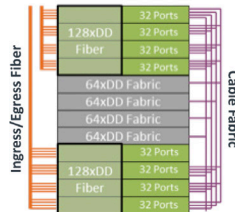
## Distributed, Disaggregated Chassis (DDC) CLOS

Chassis are large, expensive, proprietary solutions to high-bandwidth switching and routing applications. Modern, software-defined data centers that need greater flexibility are driving the migration to DDCs and decoupling network hardware and software in the process.

Traditional Chassis



Distributed, Disaggregated Chassis



### Solving the DDC CLOS Challenge

A chassis uses a backplane to build a CLOS network. A DDC uses standards based 400G cables to build a CLOS network – but legacy interconnect solutions don't deliver. Optics power is too high and DAC gauge is too large to route at these densities resulting in broken connectors and failed rollouts.

### Say Hi to HiWire LP CLOS AECs

Credo's HiWire CLOS AEC are thin, low power, deterministic Active Electrical Cables (AECs) specifically designed for DDC CLOS applications:

- Up to 75% less power consumption than optical solutions
- Up to 75% less space than DACs
- Deterministic  $1e^{-8}$  pre-FEC BER performance
- 10-year service life

### Using HiWire LP CLOS AECs in a DDC

- Routing densities of up to 1,000 cables per rack
- Improved reliability with MTBF >10 million hours
- Lower power consumption than chassis

## Features

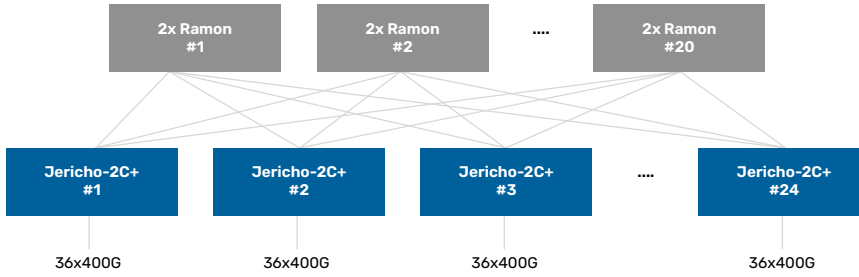
Credo HiWire LP CLOS Active Electrical Cables (AEC) are specifically designed for high density in-rack or HPC rack-to-rack interconnect to support CLOS architectures.

With 75% less power than optical solutions and 75% less volume than DACs, these AECs enable CLOS cabling densities up to 1,000 cables per rack.

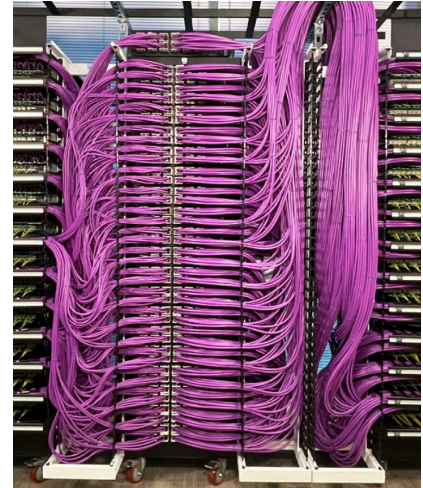
## Key Parameters

<b>Lengths</b>	0.5m – 3.0m 0.5m granularity
<b>Cu Gauge</b>	32 AWG
<b>Modulation</b>	PAM4 ⇌ PAM4
<b>Connectors</b>	A-Side QSFP56-DD B-Side QSFP56-DD
<b>Link Speeds</b>	56G
<b>Power</b>	4.5W per end
<b>BER</b>	Pre-FEC BER $1e^{-8}$ Post-FEC BER $< 10^{-15}$

### 345Tb Jericho2C+ / Ramon Cluster



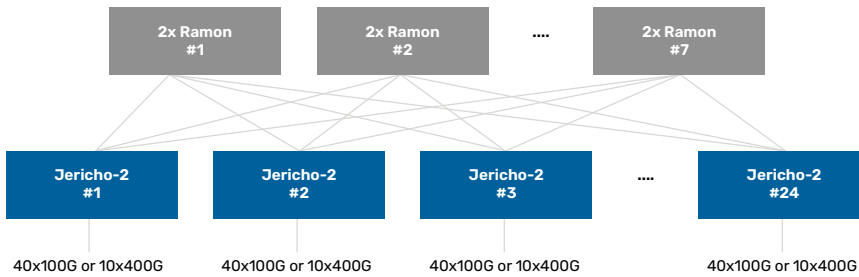
Item	Power (W)	Qty	Ext Power (kW)
Jericho2C+	900	24	21.6
2U Ramon	550	20	11
400G DR4	9	864	7.8
<b>Total</b>			<b>40.1</b>



#### CLOS Options

Item	Power (W)	Qty	Ext Power (kW)
AOC	2x9	960	17.2
HiWire LP CLOSAEC	2x4.5	960	8.6

### 96Tb Jericho2 / Ramon Cluster



Item	Power (W)	Qty	Ext Power (kW)
Jericho2	450	24	10.8
2U Ramon	550	7	3.9
400G DR4	9	240	2.2
<b>Total</b>			<b>16.4</b>



#### CLOS Options

Item	Power (W)	Qty	Ext Power (kW)
AOC	2x1	312	5.6
HiWire LP CLOSAEC	2x4.5	312	1.7

## About Credo

Credo's mission is to advance high-speed connectivity solutions that deliver optimized performance, reliability, energy efficiency, and security for the next generation of AI driven applications, cloud computing, and hyperscale networks.

Optimized for both optical and electrical applications, our solutions support port speeds up to 1.6Tb. At the core of our technology is our proprietary Serializer/Deserializer (SerDes) IP. Our diverse solutions portfolio includes system-level products such as Active Electrical Cables (AECs), a range of Integrated Circuits, including Retimers, Optical DSPs, SerDes chipsets, and SerDes IP Licensing.

For more information please visit [www.credosemi.com](http://www.credosemi.com)  
or email [sales@credosemi.com](mailto:sales@credosemi.com)

© 2025 Credo Semiconductor, Inc. All Rights Reserved. Credo Semiconductor Inc. and the Credo logo are trademarks of Credo Semiconductor Inc. All other marks are the property of their respective owners. This document is for information only. Specifications are subject to change without notice.

REV 031425

