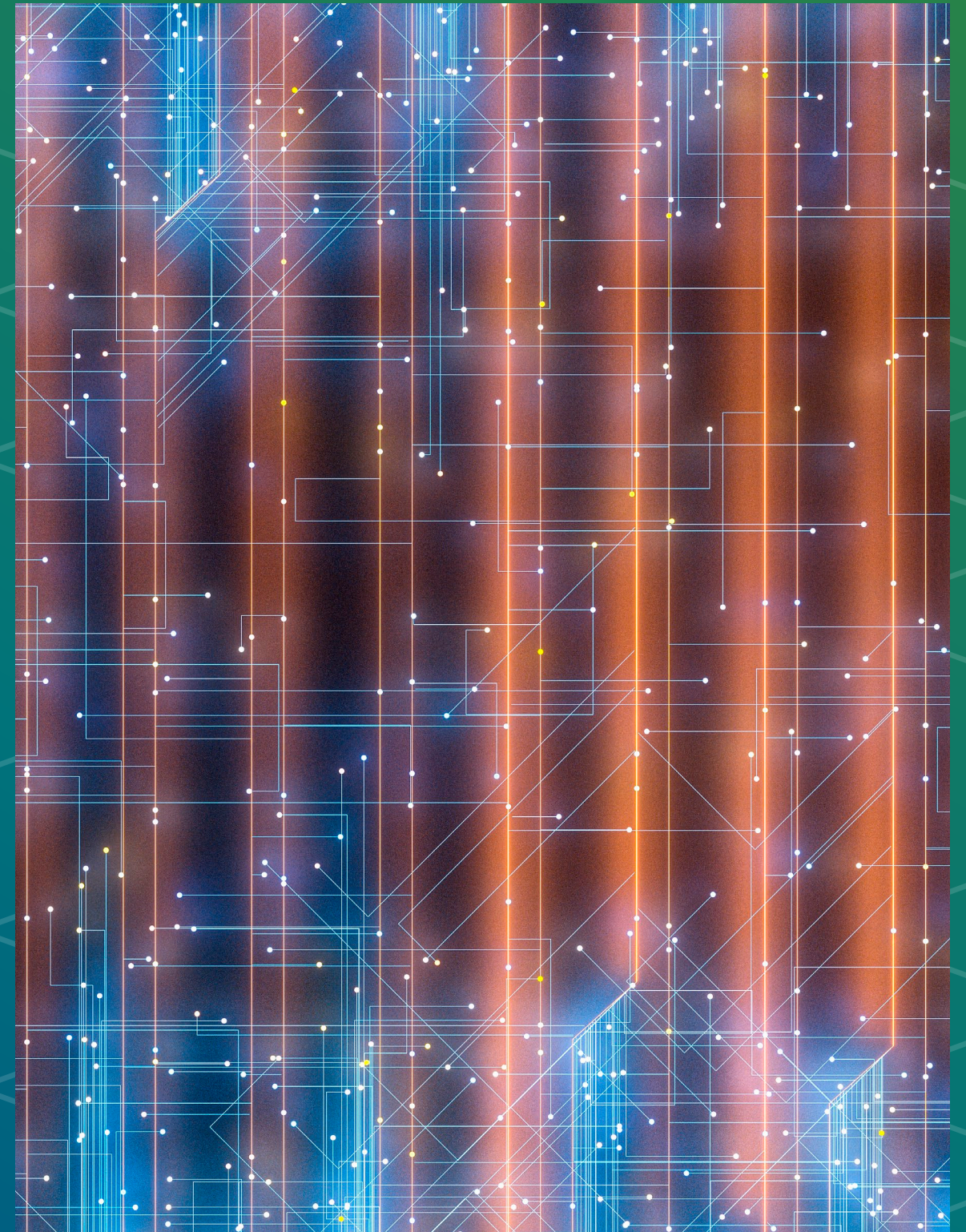




Equinix and Zayo Redefine AI-Ready Infrastructure, Delivering the Speed and Scale AI Demands

400G connectivity integrated with
high-performance infrastructure moves
AI workloads faster, further and smarter.

Case Study



AI is reshaping infrastructure requirements. From powering bandwidth-intensive AI applications to enabling real-time data insights, enterprises need environments that can move massive amounts of data quickly, reliably and at scale.

Meeting that demand requires more than a strong network or a well-connected data center. It takes both.

That's why Zayo and Equinix have teamed up to deliver a new kind of solution by combining [Zayo's 400G-enabled network backbone](#) – which offers four times the capacity of 100G – with Equinix's AI-optimized digital infrastructure available in 45+ global metros.

Combined, these capabilities enable faster, more efficient movement of AI workloads across cloud, core and edge, empowering enterprises with the foundation to scale with confidence.

Challenge

While the need for high-capacity connectivity is clear, accessing and deploying 400G remains a challenge.

Not all data centers offer compatible infrastructure or access to network providers that can deliver true 400G capacity. And even when they do, setting up and managing 400G waves can be complex, costly and time-consuming, especially for enterprises without specialized teams or resources.

As a result, many organizations struggle to scale their networks fast enough to support modern workloads like AI, real-time analytics and cloud-native applications.

Solution

In partnership with Zayo, Equinix has developed the right technology and support teams in each of our data centers to provide 400G-capable transport to support connectivity needs between enterprises and our data centers. Paired with Equinix's expertise in data center network architecture, access to Zayo's 400G-enabled network enables:

- **Fiber-backbone leadership:** Enterprises can leverage Zayo's 19.1M fiber-mile network for IP, Ethernet, and Wavelength networking needs. Today, Zayo's core Wavelength Network is 100% 400G-enabled across North America, helping enterprises move more data, faster.
- **Simplified access at key locations:** Currently, 16 Equinix data centers are part of Zayo's Quick-Connect program, which offers faster, more seamless access to high-capacity bandwidth without lengthy setup times.
- **Security:** With Zayo, businesses benefit from dedicated bandwidth utilizing defined physical and logical path connectivity.
- **Reliability:** Enterprises get consistent latency, guaranteed availability and transparent services from IP Transit to Ethernet and Wavelength solutions.
- **On-demand Wavelengths:** Gain access to Waves On Demand, immediately available 100G Wavelengths in Equinix data centers with instantly delivered Letters of Authorization/Circuit Facility Assignments (LOAs/CFAs).
- **Availability:** Measurable carrier-class performance with pre-provisioned capacity available for industry-leading expedited delivery timelines at ready-to-go data centers and core network arteries.
- **Scalability:** Bandwidth options ranging from 1G to 400G support standards-based protocols and are delivered and managed over world-class dark fiber and lit infrastructure.
- **Customization:** Diverse, latency-sensitive and custom fiber and hardware configurations are fully supported.

“AI workloads demand unprecedented speed and scale, pushing the boundaries of traditional infrastructure with massive data flows and real-time processing needs. By integrating Zayo's robust, high-capacity connectivity solutions and leading 400G network capabilities directly within Equinix's strategically located, AI-optimized data centers, we're creating a powerful, streamlined environment to enable faster, more efficient movement of AI workloads across cloud, core and edge. This partnership ensures our shared customers have immediate, seamless access to the high-performance communications infrastructure that is absolutely essential for rapidly deploying, managing and scaling their critical AI initiatives effectively.”

Aaron Werley, Vice President, Technology

Benefits

Zayo and Equinix are changing the game by empowering enterprises with 400G IP and Wavelength capabilities. The result is the ability to handle substantially more data and provide greater reliability than previous network standards. And, thanks to Equinix's global presence, 400G capabilities from Zayo are available anywhere around the world.

By using these solutions, businesses can now quickly deploy workloads in domains like AI and content streaming, which require ultra-high bandwidth and minimal latency, all without the operational cost or complexity of building 400G infrastructure capacity from scratch.

For example, consider [i3D.net](#), a European gaming company. To detect cheating, i3D.net analyzes screenshots during play using AI. The ability to process large volumes of data in real-time is critical for this use case – which is why the company deploys in over 35 Equinix locations, ensuring close proximity to users, and leverages Zayo's ultra-low latency network connectivity solutions.

Results

- **Unmatched bandwidth and speed:**
400G waves deliver the high-performance connectivity needed for AI, real-time analytics and cloud workloads.
- **Faster deployment and agility:**
Waves on Demand and Quick-Connect Data Centers enable enterprises to scale instantly, reducing time-to-market.
- **Scalability without complexity:**
400G IP PoPs provide seamless, high-capacity connectivity that grows with your business.
- **Built-in redundancy and reliability:** Zayo's expansive footprint and Equinix's interconnection ecosystem ensure network resilience and uptime.
- **Optimized for digital transformation:**
Direct access to cloud providers and data centers enables AI-driven insights, seamless cloud adoption and global expansion.

Solution components



Network connectivity between enterprise and Equinix locations

Benefit from scalable 1G to 400G network solutions for enterprises, carriers and data centers, ensuring seamless AI, cloud, and content delivery.



High-performance data centers

Operate scalable, sustainable, AI-ready data centers, strategically located in every major market around the world.



Seamless cloud and edge integration

Get direct connections to AWS, Azure, Google Cloud and other major providers within Equinix's interconnection ecosystem.

About Zayo

For more than 17 years, Zayo has empowered some of the world's largest and most innovative companies to connect what's next for their business. The Zayo group of companies connects 400 global markets with future-ready networks that span over 19.1 million fiber miles and 147,000 route miles. Zayo's tailored connectivity solutions and managed services enable data centers, carriers, cloud providers, schools, and enterprises to deliver exceptional experiences, from core to cloud to edge. Discover how Zayo connects what's next at www.zayo.com and follow us on [LinkedIn](#).

[Zayo.com](http://www.zayo.com)

About Equinix

Equinix (Nasdaq: EQIX) is the world's digital infrastructure company*. Digital leaders harness Equinix's trusted platform to bring together and interconnect foundational infrastructure at software speed. Equinix enables organizations to access all the right places, partners, and possibilities to scale with agility, speed the launch of digital services, deliver world-class experiences, and multiply their value, while supporting their sustainability goals.

Equinix.com

Ready to get started?

Contact us to learn more about how your business can benefit from Zayo's network solutions within enabled data centers, as well as Equinix's multitude of complementary network optimization technologies.

[Learn more](#)

Drive your future forward on Platform Equinix®

Platform Equinix is where digital businesses bring together all the right places, partners and possibilities to create the digital infrastructure they need to succeed. It's the trusted foundation for digital infrastructure, enabling businesses to innovate and create value through our digital ecosystem of tools, technologies and capabilities from the most valuable partners and communities in the world.

