



Brightline enhances guest connectivity with McLaren Applied motorsport-inspired technology

Brightline Florida and McLaren Applied are proud to announce a partnership that brings advanced motorsport-inspired technology to passenger rail for the first time. Brightline is the first train operator worldwide to deploy this advanced hybrid technology at-scale, enabling more reliable Wi-Fi connection, even at high speeds or in rural areas.

This is made possible by McLaren Applied's Fleet Connect software using their 5G Edge Active Antenna and Low Earth Orbit (LEO) satellite communications in a world first. This represents a leap forward in onboard communication, setting a new standard for passenger experience.

"Guests want fast and reliable Wi-Fi and this unique partnership will deliver that," said Kevin McAuliffe, chief technology & digital innovation officer of Brightline. "Elevating the guest experience is at the center of everything we do and leveraging technology partnerships like McLaren Applied puts our guests in the driver's seat when it comes to internet connectivity."

The roots of this groundbreaking technology trace back to the highest level of motorsport. Two decades ago, McLaren Applied developed the software and hardware to overcome the challenge of real-time monitoring of sensors on Formula One race cars at speeds exceeding 200 mph. The result was a suite of high-performance connectivity solutions, including a unique software approach to optimize connectivity in every turn, resulting in near 100% coverage at the most challenging international racetracks. Now, McLaren Applied has developed a similar solution for Brightline.



“Rail networks had long struggled with onboard connectivity issues, especially on high-speed trains,” said Pablo Garcia, Director, Connected Intelligence at McLaren Applied. “Traditional systems can’t efficiently adapt to signal changes or network switching, leading to dropouts. McLaren Applied recognised the parallels between the challenges faced in motorsport and rail, applying expertise to bring a solution that provides the best link aggregation technology tailored to the unique demands of Brightline.”

The result is Fleet Connect - a software already in large fleets worldwide- that facilitates seamless high-speed passenger Wi-Fi connections, as well as operator uplinks for operational, infrastructure and safety purposes. In this occasion, Fleet Connect combines Starlink LEO Satcoms and 5G networks to eliminate blackspots, offering a transformative hybrid connectivity solution only found on Brightline trains.

In addition to the software, McLaren Applied has now revolutionized the hardware architecture used in connected trains. This system is the first to remove routers and RF cables from the train. By integrating electronics on the antenna, the 5G Edge Active antenna brings next generation performance, as well as lower cost and complexity.

“These innovations were designed with the racing mindset: be ultra-reliable, lightweight, and resilient to high speeds and vibrations—attributes that seamlessly translate to rail applications,” continued Pablo Garcia, McLaren Applied.

“As the first modern, intercity passenger rail in a century, we will continue to innovate and provide our guests the best experience possible,” added McAuliffe.

Brightline anticipates the McLaren Applied system will be operational on all trains by July 2025.

About McLaren Applied

McLaren Applied develops and delivers advanced engineering and technology solutions that enable organizations across motor-sport, transport, electrification and beyond to make a difference to their customers and the world around us. McLaren Applied’s innovations in transport achieve reliable connectivity at high speeds, enhance their passengers’ experiences, and increase operational efficiency.

For more information, visit www.mclarenapplied.com and follow us on LinkedIn, X, Instagram and Bluesky.

About Brightline

Brightline seamlessly connects travelers to top destinations and major events between Central and South Florida with stations in Miami, Aventura, Fort Lauderdale, Boca Raton, West Palm Beach, and Orlando. The company offers a hospitality-centric experience designed to reinvent train travel at a comparable price to driving or flying. Brightline is recognized as one of TIME100’s Most Influential Companies, one of the World’s 50 Most Innovative by Fast Company and one of the fastest-growing private companies in the Southeast by Inc. The company focuses on city pairs that are too close to fly and too long to drive. Construction is currently underway to connect Las Vegas to Southern California.

For more information, visit www.gobrightline.com and follow us on Facebook, Instagram, and X.

Media Contacts

Joseph Butcher, McLaren Applied, joseph.butcher@mclarenapplied.com

Ashley Blasewitz, Brightline, ashley.blasewitz@gobrightline.com
Michael Hicks, Brightline, mhicks@bltrain.com

