TIER-ONE DATA CENTER SUPPORTING MISSION CRITICAL **DEVELOPMENTS**



QuietLine® Barrier Walls



OVERVIEW

When a prominent global technology company began construction on a new Tier-One data center noise mitigation quickly emerged as a top design priority. The new facility, valued at over \$200 million, was to be constructed on a vast, open parcel of land but bordered closely by three established residential communities. Noise Barriers was engaged to deliver a highperformance perimeter noise solution to preserve neighborhood quietness while ensuring uninterrupted site operations.

PROBLEM

Data centers present a unique acoustical challenge. With massive HVAC and chilling systems operating 24/7, sound emissions can easily exceed municipal noise ordinances, especially in residential-adjacent zones. Early in the design phase, the project architect, Page, sought an experienced partner to engineer a sound barrier solution that would blend aesthetic flexibility with industrial-grade performance.

Page turned to Noise Barriers to provide a comprehensive, end-to-end solution tailored specifically to the site's acoustical and structural requirements.



SOLUTION

Noise Barriers recommended the QuietLine® 5" V-Stack panel, a robust and modular acoustical wall system engineered for high-demand environments. With a final installed footprint exceeding 1,900 linear feet at 15 feet high, the system was designed to attenuate mechanical noise and to integrate with the site's perimeter security and landscape architecture.

The Noise Barriers team was involved with the Mission Critical staff throughout design consultation, structural detailing, acoustic modeling, and field coordination, ensuring on-time delivery and seamless installation.

RESULTS

The completed barrier wall dramatically reduced environmental noise exposure for surrounding residents and enabled the data center to meet both local and corporate acoustic compliance standards. By delivering a comprehensive solution backed by technical expertise, Noise Barriers reinforced its reputation as the trusted provider for critical infrastructure acoustical needs.

In today's data-driven economy, the expansion of server farms and cloud facilities often brings them closer to residential developments. Mission Critical projects like this highlight the essential role that acoustic planning and mitigation play in protecting community quality of life, without compromising operational efficiency.





