OCTAVE

Octave Alto Mass Transit

Benefits

Comprehensive data access and editing: Empower teams to independently create, edit and access transportation data without relying on external specialists

Mobile asset management: Enable field workers to capture and upload asset data in real time, ensuring accuracy using custom-built mobile apps

Real-time monitoring and predictive insights: Provide executive teams with up-to-date data to make informed, data-driven decisions

Data-driven decision support: Use AI algorithms and geospatial processing for maintenance and better decision-making

Cross-department collaboration and data sharing: Foster improved communication and coordination across departments and external stakeholders

Streamlined workflow and process automation: Enhance operations and reduce administrative costs through workflow automation and task planning

Public transport networks are complex. An error or delay in one segment can cause a ripple effect down the line – for the transport provider and the public. To manage this complexity, transportation agencies rely on different, often disconnected data sources spread across multiple systems, departments and formats. Typically, this data cannot be viewed in real time, making it difficult to gain a holistic view of the network's asset conditions to coordinate maintenance activities or plan for new projects.

In an industry where efficiency and sustainability are critical, modern solutions that integrate real-time data and seamless workflows are essential.

A smarter way to manage public transit infrastructure

Octave Alto Mass Transit (formerly HxGN Mass Transit) is a comprehensive platform that helps agencies manage assets, make data-driven decisions, reduce costs, monitor infrastructure in real time and streamline task planning for improved operations. Its advanced analytics and real-time insights support smarter decision-making, helping transit systems address current and future challenges efficiently.

Alto Mass Transit goes beyond simple mapping to provide an advanced digital twin of a city's entire public transportation network. Additionally, it offers specialized modules for managing networks, tracks, stations, electrification and infrastructure.

Alto Mass Transit helps improve public transportation operations, enhancing collaboration, decision-making and overall efficiency while ensuring transit networks are reliable, safe and prepared for future demands.

As the demand for smarter and more sustainable transportation solutions grows, Alto Mass Transit ensures smart, connected and efficient public transit management.

Modules

Alto Mass Transit's modular system integrates seamlessly to enhance public transportation operations. These modules work together to streamline asset management, improve planning and increase efficiency across various aspects of the transit network. With a flexible and scalable design, Alto Mass Transit's modules allow transportation agencies to focus on specific operational needs while benefiting from a unified system that adapts to their unique challenges and goals.

Network Management

Facilitates the creation and maintenance of a digital transportation model, using the fastest linear referencing system (LRS) to define lines, routes and network segments, while also allowing for nomenclature adjustments and network imports

Track Characteristics

Enables tracking and management of track conditions, including super- and substructures, control points, switches and essential attributes such as rail quality and lubrication, all mapped via LRS

Station Management

Centralizes station-related data, managing platforms, stops, timetables, ticket machines and maintenance activities, ensuring compliance with industry standards and enabling seamless integration with other systems

Electrification

Manages the electrification network, including masts, overhead lines and cable ducts, with capabilities for documenting damage and incidents and planning repairs – voltage items are mapped via LRS for precise integration with the transport network

Construction

Manages construction sites, tunnels, crossings and planned infrastructure changes, ensuring integration with the underlying transportation network and offering real-time status tracking

Each module plays a vital role in modernizing transit systems and driving efficiency. These tools not only optimize daily operations, but also set the foundation for future-proofing transportation networks. Moreover, the customizable workflow within Alto Mass Transit allows agencies to create tailored modules that meet their specific transportation system needs, ensuring flexibility and scalability.

Find out more

About Octave

Octave is a leader in enterprise software, turning data into decisive action and intelligence into your edge. Our software solves for and simplifies complexity, from the design and build to operations and protection of people, property and assets – for any scope, at any scale. For decades, we've partnered with customers to sharpen performance, elevate efficiency and amplify results. From factory floors to entire cities, our solutions are tuned to scale up what's possible from day one onward.