Location Intelligence

Enlighted

Location Intelligence

Lighting-based RTLS to increase productivity and drive a sustainable enterprise



5M

Sensors installed Up to 90% Lighting energy savings

1000+ Customer installations

60 Countries

CO₂ reduction

A renewed focus on operational efficiency

With rising energy costs, workforce shortages, supply chain issues, and volatile markets, there is a renewed focus on efficient operations. Bottom line impacts are being scrutinized around:

- Increasing employee productivity and well-being
- Reducing operating costs with more efficient workflows
- Reaching sustainability goals while reducing costs

The role of Enlighted Location Intelligence

Business leaders are striving to ensure optimal flow of movement of people and assets within their facilities while at the same time managing company resources wisely. RTLS (Real Time Location Systems), the ability to locate, track, and monitor critical resources, offers a range of applications to help achieve financial and ESG (Environmental, Social & Governance) objectives.

Location Intelligence capabilities include*

- A software defined sensing infrastructure ready for RTLS deployment
- An intuitive, customizable RTLS application with personalized events, triggers, and alerts
- A mobile and/or web-based user interface or the ability to integrate with common systems via API
- A range of long-life asset tags and badges, designed for multiple purposes
- A proven solution with thousands of global lighting implementations

*This feature and/or service offering may not be commercially available in all countries due to regulatory or other reasons. Therefore, the feature and/ or service offering cannot be guaranteed. Please get in touch with your local contact for further details.

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A unique approach

Enlighted's connected lighting system is the foundational platform for the deployment of Location Intelligence, an RTLS solution. It begins with patented, software-defined sensors embedded within lighting fixtures that drive occupancy-based lighting and temperature control, achieving energy savings of up to 75 percent.

As a result, buildings are completely blanketed in a dense, wireless, and fully powered sensing infrastructure, with the ability to detect and track assets, people, and motion. This unique, smart IoT building approach drives a range of RTLS applications and use cases.

A comprehensive IoT design

Enlighted Location Intelligence begins with a sophisticated software defined lighting system. A fault tolerant wireless grid network continuously gathers and records movement, temperature, and activities that feed occupancy-driven software for lighting and temperature control. With configuration flexibility and task tuning, the Enlighted Lighting Solution saves up to 90 percent of energy use.

Each Enlighted tag broadcasts Bluetooth messages, which are received by the Enlighted sensors embedded in lighting fixtures. Using the location data and other information captured from the tag, Location Intelligence tracks and anonymously records movement through the building using advanced proprietary algorithms. Data is transmitted via a wireless network to the cloud, where it is collected, correlated, and integrated with other application systems via APIs.





Customizable for a range of RTLS uses

The Location Intelligence application provides a wide range of configurations to meet your specific needs:

- Easily update tag labels and icons
- Stay organized and enhance search capabilities by creating tag groups
- Drive safety and efficiency by configuring custom events and real-time alerts:
 - Create at tag, element, or group level
 - Assign appropriate notification method (email, SMS, in-app, or others)
 - Create location-based alerts, acceleration, button state (pressed/not pressed)
 - Add multiple conditions for events
- Keep maps current by easily updating zone names
- Configure and schedule reports
- Configure maps by hiding/showing tags, zones, movement, and more

Location Intelligence solution outcomes

The flexibility of Location Intelligence provides a route to multiple functions that can be applied to a wealth of use cases.

Equipment localization	Quickly locate the nearest available equipment; save employee time, improve response times, and increase staff productivity.
People localization	Locate people in map-based view to improve personal safety and receive alerts if people leave or enter a restricted area.
Asset management	Analyze how a specific asset is used, avoid over-provisioning, and ensure assets are effectively deployed. Support efficient and compliant workflows (e.g., device disinfection).
Asset loss prevention	Prevent asset loss by receiving an alert when an asset leaves a designated area; protection against theft of devices and equipment.
Workflow optimization	Use location services data to identify duplicate or inefficient workflows, optimizing processes, and improving outcomes.
Interactive visualization	Interactive visualization, charts, and tables provide analysis across employee and asset movement by floors and departments, further filtered by category and tag customer data fields. Track movement in real time, with additional historical movement displays, tagged and searchable by specific time frames.
Asset categories and tag statuses	Manage assets by grouping them into categories and assigning tag statuses to equipment for easier organization and management. Apply filters dynamically, based on category or tag status to search for equipment or staff and view them on floor maps.
Wayfinding	Leverage partner technology to help guide users with personalized and precise turn-by-turn directions, especially relevant for large campuses.
Real-time alerts	Real-time alerts can be configured to notify staff when an asset enters or leaves geofence areas. Alerts can also be generated based on category counts and duration of stay in selected areas. Notifications can be sent directly to mobile devices, via email or through APIs for integrated systems.
Replay movement	The application stores location data by date and time, which can be replayed on demand on the map with several options for playback. The tag location data is also accessible via APIs, which can be used to drive operational insights and analytics.
Report generation	Reports provide insights to both live and historical data based on filters such as departments, room types, tag category, and tag status, with options to customize, share, schedule reports, and run at selected intervals.

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Intuitive configuration and visualization

Location Intelligence provides a wide range of configuration capabilities and real-time visualizations that help guide easy setup and use.



Flexibility to design and visualize zones on floor plans



Easily define new events, triggers, and directed action for response



Follow asset movements over specified times with replay options

Location Intelligence – a fast path to RTLS success

Successfully launching an RTLS initiative begins with the infrastructure and technology, but it also requires analysis and consideration of work processes, flows, responsibilities, and asset use to realize productive business outcomes. We understand both sides of the equation and bring expertise to bear across all phases of project implementation.

Begins with Lighting Control



- Software-controlled lighting and temperature result in up to 75 percent energy savings to the bottom line
- Wired sensor network infrastructure for sensing assets and people

Implementation planning



- Business objectives, workflow analysis, integration needs
- Long-life badges and tags configurations with group-level strategies
- System customization workshop and testing

Easy route to outcomes



- Integration activation
- API/application launch
- Intuitive user application launches and user education
- Expansion to new departments, use cases, and assets/people tracking

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Multiple possibilities for multiple industries

Location Intelligence is used across industries for a multitude of purposes, each bringing greater efficiencies, operational improvements, and occupant health and safety.

Healthcare



Manufacturing or warehouse



- Increased staff efficiency
- Improved patient experience and safety
- Cleaning guidance to avoid spread of HAI
- Refined contact tracing and identification of disease exposure
- Asset tracking for location and loss avoidance
- Alerting for unauthorized movement
- Worker safety: Identification of high-risk workflows
- Inventory management-batch
- Time and motion data for route and process optimization
- Track and maximize asset utilization; leverage for maintenance cycles

Education



Commercial office



- Improve student and staff safety
- Equipment tracking and loss prevention
- Correlate student counts and asset usage (*i.e.*, tables/desk per area per population)
- Traffic patterns/campus layout efficiencies
- Space utilization analytics for portfolio right-sizing
- Optimized cleaning and facilities services
- Wayfinding for large campuses
- Asset tracking for loss prevention
- Traffic pattern analysis for optimal space layout design

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The approach taken by Enlighted represents the new way of thinking about smart IoT buildings – to outfit it from the ground up with technology that is software driven. This means we can continuously improve our data collection and RTLS applications and benefits.



For more information on Enlighted Location Intelligence, contact an Enlighted sales representative: www.enlightedinc.com/contact-us | www.enlightedinc.com/support



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Turn Everyday Spaces into Extraordinary Places

Wherever space, people and work meet, Enlighted empowers organizations with the technology to transform real estate spaces into regenerative places that fuel positive impact for people, portfolio, and our planet.

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