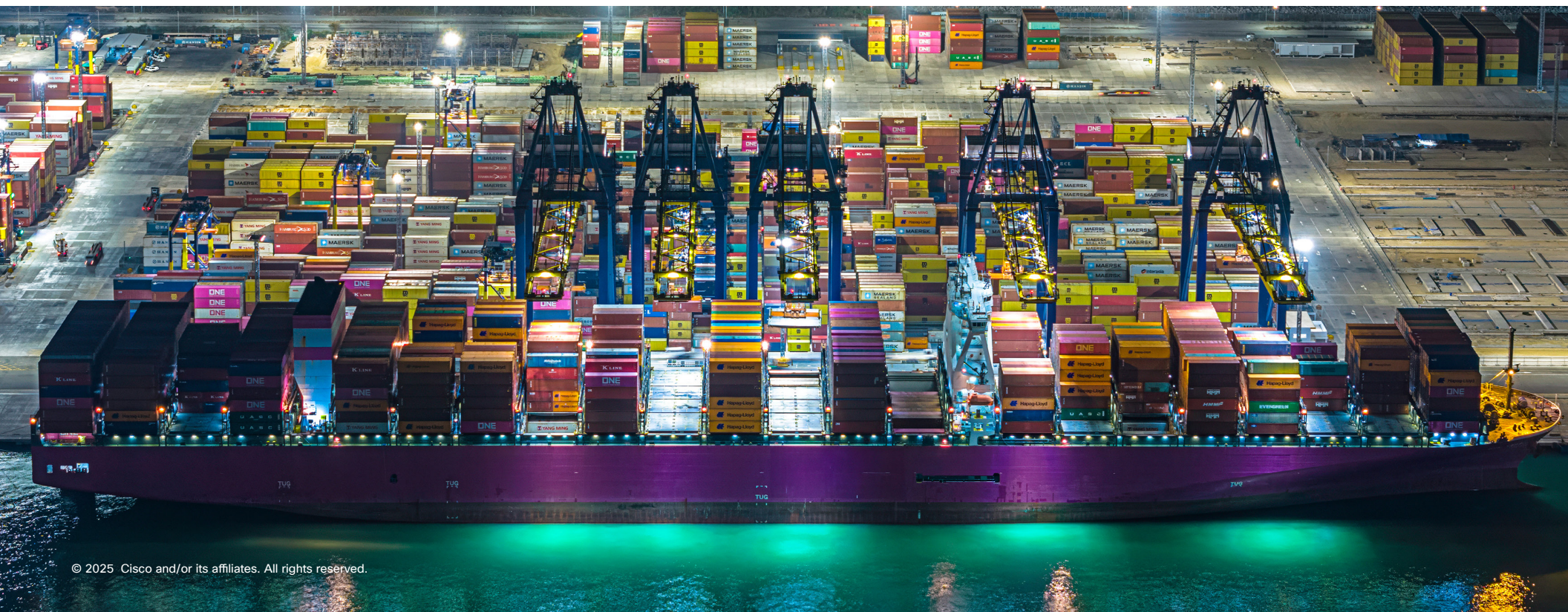# IoT Asset Management: Operate Smarter with Intelligent Cellular Connectivity Management

With an estimated 14.4 billion connected devices,[1] IoT-based asset management is transforming industries from manufacturing to utilities, from mining to equipment rentals, from healthcare to agriculture.

Your business profitability and growth depend in large part on how efficiently you manage your physical assets—whether they're shipping containers, heavy equipment, or livestock. Tracking and monitoring Internet of Things (IoT)–connected assets saves time, lowers costs, and keeps operations running smoothly. Picture it: Locate connected assets with a glance. Remotely monitor vital information such as usage, maintenance, calibration, and security. Keep staff who monitor equipment in hazardous environments out of harm's way. If you're an equipment manufacturer, create new revenue streams by offering asset management "as a service."

> "The worldwide IoT-based asset tracking and monitoring industry is expected to grow from US$3.77 billion in 2021 to US$9.46 billion in 2030."
>
> – Polaris Market Research, 2022

Real-time asset tracking

- Optimize your supply chain by knowing when assets will arrive.

- Prevent loss and theft of everything from power tools to livestock with geo-fencing.

- Accelerate processes by moving assets where they're needed.

- Confirm that assets were installed.

Real-time monitoring

- Improve asset performance with preventive maintenance based on temperature, door closures, vibration levels, etc.

- Improve the customer experience by fixing problems—for example, low soda-machine supply levels—before they inconvenience the customer.

- Verify that food has been kept at a safe temperature throughout the supply chain.

- Simplify regulatory compliance with accurate records of asset use and performance.

Challenges of cellular connectivity management

Smart cellular connectivity management must address a number of challenges:

Ensuring service reliability: Depending on the asset, you may need to transmit continuously or at regular intervals. Missing a sensor reading because the cellular connection was lost might mean having to discard a shipment of milk or pharmaceuticals, for instance.

Deploying large volumes of assets: Individually provisioning large groups of assets is time-consuming and error-prone, slowing down deployment.

Rate-plan management and overage charges: Assigning the right rate plans to thousands, or tens of thousands, of connected assets is excruciatingly complicated. Getting it wrong can lead to unexpected data overage charges.

Security: When SIMs are stolen from connected assets, tracking and monitoring comes to a halt. What's more, the SIM owner is on the hook for unauthorized data charges until the theft is discovered.

Multiple management platforms across regions: Your assets may be spread across regions served by different mobile network operators. Integrating different management platforms is costly and can take months.

Insight into usage trends: Manually exporting needed cellular usage data to other enterprise applications is tedious and time-consuming and can postpone insights.

Respond quickly to hidden connectivity challenges

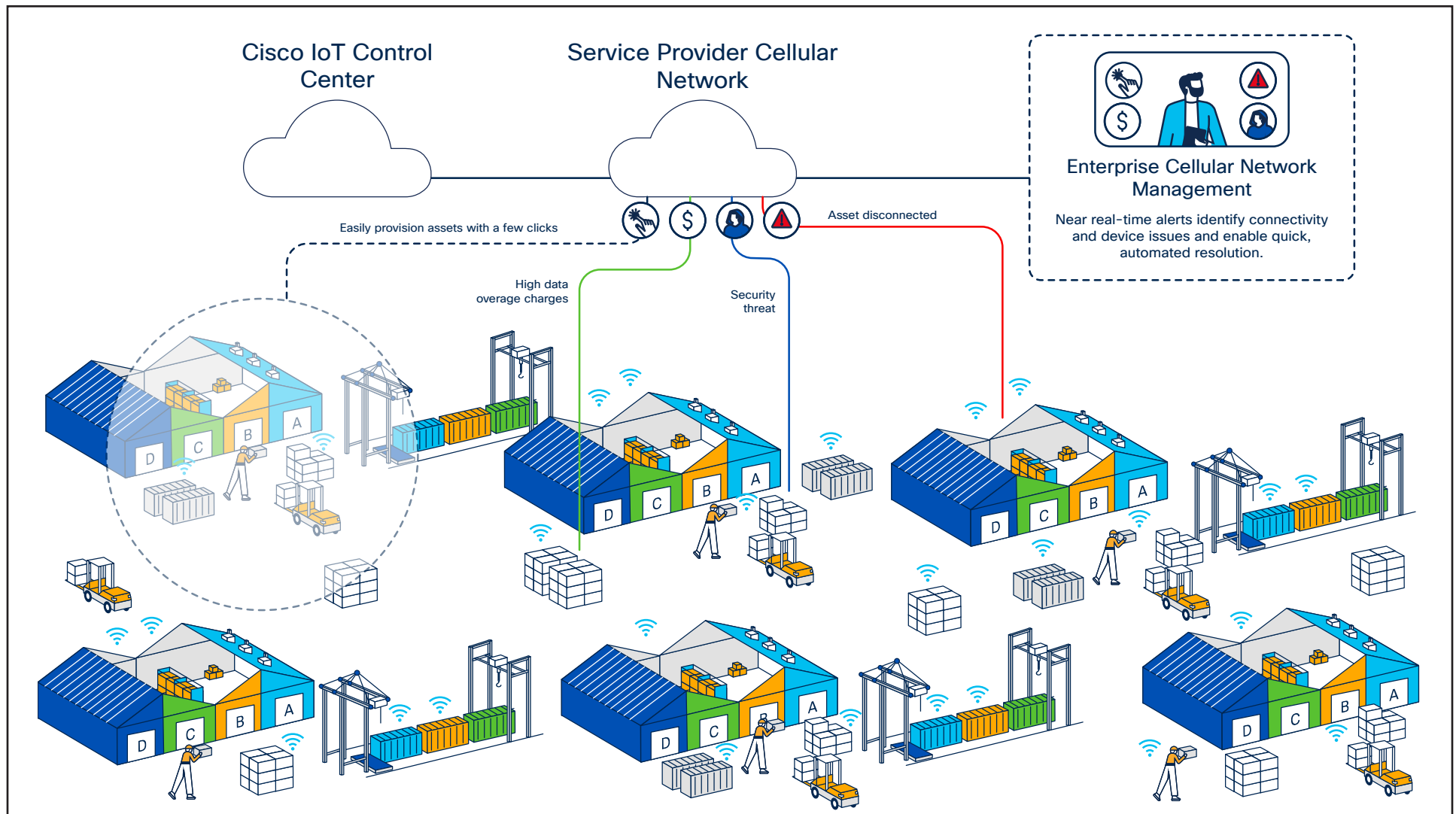Managing 1000's of assets requires real-time visibility and control

Figure 1.   Cisco IoT Control Center's cloud platform enables real-time IoT device tracking and fleet management

Benefit from the experience of the global market leader.

Cisco IoT Control Center is the trusted CMP used by:

270+ million
connected devices

100+ million
connected cars

20+ million
smart meters

50+
service providers in 120 countries

30+
thousand enterprises

Delight customers and scale profitably with Cisco IoT Control Center

Scale faster, operate smarter, and protect better with Cisco® IoT Control Center. As a foundational component of Cisco's Mobility Services Platform, IoT Control Center stands as the industry's leading Connectivity Management Platform (CMP) for asset management (see sidebar). Whether you're just starting out with IoT-based asset management or scaling an established business, Cisco IoT Control Center accelerates your journey. Unlike cellular IoT platforms that simply connect your IoT sensors, Cisco IoT Control Center also helps you move your business forward.

Whether you're just starting out as a CPO or are already operating at scale, Cisco IoT Control Center accelerates your journey to the next step:

- **Scale faster.** Cisco IoT Control Center makes it as simple to onboard and manage 10,000 assets easy as 10. Provision thousands of SIMs with a few clicks.

- **Operate smarter.** Deliver better customer experiences and increase profitability with near real-time visibility and control. Optimize rate plans with Artificial Intelligence and Machine Learning (AI/ML)–based analytics.

- **Protect better.** Protect data and your CMP platform with multi-layered, enterprise-class security. Automatically identify and respond to possible comprised devices exhibiting unusual connectivity behavior.

> "We can see if a device is connecting or not in just a couple mouse clicks, and we can manage issues ourselves at any time—day or night."
>
> – Cisco IoT Control Center Customer

⟶ Learn more at **Cisco IoT Control Center** and **Cisco Mobility Services Platform**