A guide to connected asset tracking

T-MOBILE FOR BUSINESS

Asset trackers ensure that you know where your valuables are at all times, whether that is a pallet of shipped goods, a fleet of trailers or heavy equipment, or other high-value items. Data collected via these connected devices can help organizations optimize operations, reduce costs, increase efficiency, and improve overall asset utilization.

However, the term "asset tracking" often leaves much to interpretation. Let's take a closer look at the Internet of Things (IoT) and the various types of assets that you can track:

01 IOT = business growth

80%+ SENIOR EXECUTIVES

The transformative potential of IoT is a key driver for businesses looking to stay competitive in today's digital economy. In fact, more than **80% of senior executives** across industries say IoT is critical to some or all of their lines of business.[1]

19% EXPECTED GROWTH

The global IoT market is expected to **grow 19%** in 2023, remaining strong despite slower-than-expected overall economic growth.[2]

$484B IN VALUE

The long-term growth potential of the IoT enterprise market is resilient and expected to reach $484 billion in 2027.[3]

30B CONNECTED DEVICES

By 2025, there will be **more than 30 billion connected devices** worldwide—that's almost four IoT devices per person.[4]

02 IoT drives cost savings and business growth

Cost reduction through:

- Process efficiency
- Lower energy consumption
- Regulatory compliance
- Autonomous monitoring
- Supply chain management

Business growth through:

- New business models
- Improved safety and security
- Enhanced customer service
- New technology integration
- Improved management data

UP TO 30% LOWER COSTS

Using IoT sensors to monitor assets and equipment in real-time can reduce maintenance costs by up to 30%.[5]

8X ENERGY SAVINGS

By 2030, IoT operations will save more than eight times the energy they consume—that's equivalent to eliminating one gigaton of CO_2 emissions.[6]

30–40% REVENUE INCREASE

IoT deployments can create cost reductions that generate revenue increases between 30% to 40%.[7]

03 Asset tracking provides peace of mind

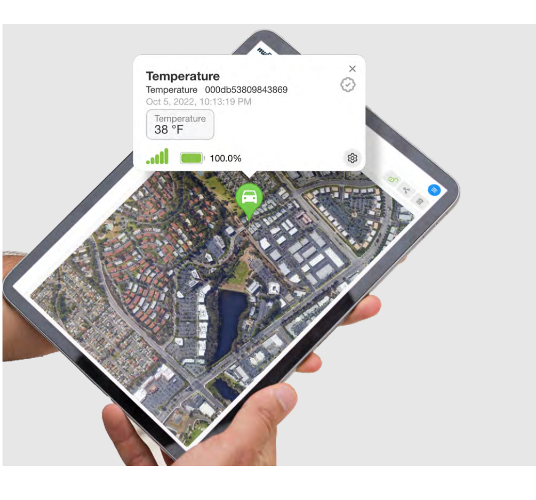
Annual economic impact of untracked items by the numbers[8]

- **$1B** in stolen tools
- **$1.5B** in lost pallets
- **$50B** in U.S. workplace theft
- **$150B** in cold chain waste

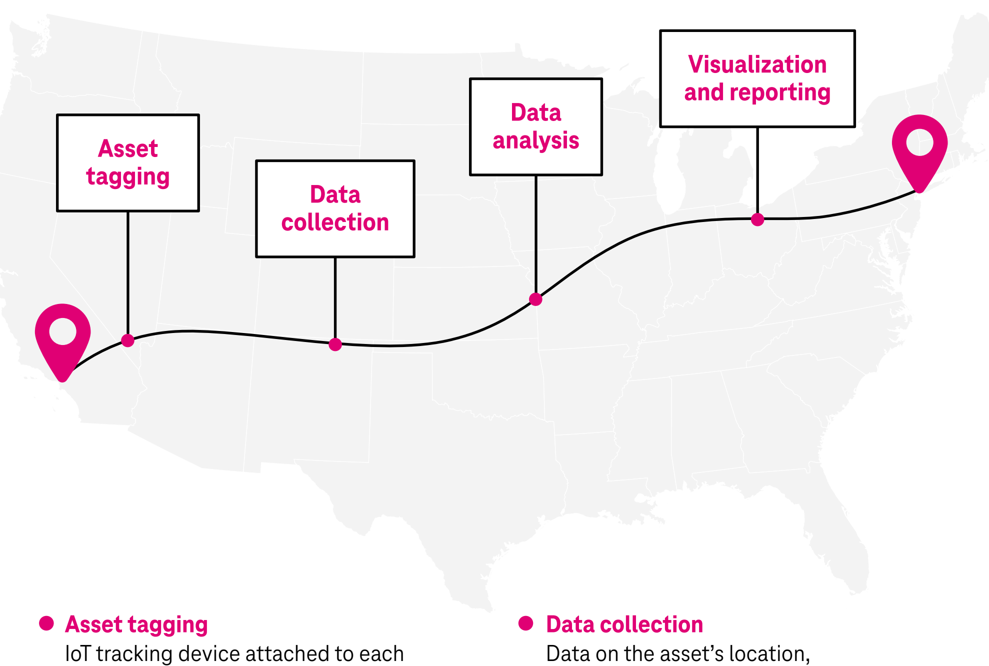
Visibility will increase awareness in critical connected assets.[9]

- Raise maintenance productivity as much as **28%**
- Lower inventory repair and maintenance by **17%**
- Eliminate up to **20%** of equipment downtime

04 Breaking down asset types and functions



The primary function of asset trackers is to track asset locations.



- **Asset tagging** IoT tracking device attached to each container and/or vehicle(s) to monitor location and movement.
- **Data collection** Data on the asset's location, movement, and condition is collected via a cloud-based platform.
- **Data analysis** Near real-time insights on location, movement, and conditions of the asset to identify any patterns or potential issues such as delays or route deviations (e.g., due to weather).
- **Visualization and reporting** Simple presentation of data for logistics managers and others to track progress, receive updates and alerts of delays, etc.

Additional types of data that asset trackers collect:

PHYSICAL

Motion detection including drop and impact, tilt, geofencing, tamper/anti-theft detection, doors, and liftgates.

ENVIRONMENTAL

Temperature, air pressure, humidity, and ambient light.

Powered assets

- Yellow iron
- Generators
- Field equipment

High value/critical assets

- Electronics
- Perishable goods
- Cold chain integrity

Mobile goods

- Pallet tracking
- Shipment deliveries
- Trailers

MORE THAN 1 IN 3

U.S. manufacturers are already collecting and using data generated from asset trackers.[10]

05 T-Mobile for Business: Your asset management partner

T-Mobile for Business provides a simplified asset management solution designed to align with your business objectives, anticipate your future needs, and quickly adapt as market dynamics change. Our industry-leading network, flexible offerings, and years of IoT experience provide the solutions you need to make it happen. To learn more about how T-Mobile for Business is driving results with IoT asset tracking, visit our IoT Solutions page.

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