Step 1 to Prevent Pilferage & Theft in the Supply Chain — Track Your Packages
Supply chain security doesn’t stop at putting up fences, setting up access control, deploying
CCTV surveillance, or locking up trailer doors.

As cargo thieves get smarter and work harder to get the goods and make a good getaway, there’s
a growing need for cargo security solutions that go beyond simply preventing theft in the supply
chain.

What’s needed is a shipment security solution that works throughout a supply chain — both in the
warehouse and on the road — to detect theft or pilferage as well as curb shrinkage in the supply
chain.

What is the Difference Between Theft, Pilferage, and Shrinkage in a Supply Chain

**Theft** in a supply chain refers to acts by criminals, employees, or even other stakeholders (such
as truck drivers) in the cargo chain of custody that involve stealing a complete shipment, whether
it’s a pallet, container, or full truck load.

**Pilferage** in a supply chain refers to theft in the cargo chain of custody that involves stealing a
small part of the complete shipment, usually a few boxes or crates that pilferers skim from the
complete shipment.

**Shrinkage** in a supply chain is a measure of the amount of inventory or cargo that’s lost in
storage or in transit due to factors like spoilage, physical damage, theft, as well as human error in
counting or inventory.

Although thefts where full shipments, truckloads, or warehouses are looted continue to rise, a
growing number of thieves prefer pilferage as a more sustainable solution.

It’s harder to detect pilferage because it’s difficult to spot missing inventory when just a few
cases are taken from stacks of hundreds. Unless there are visible signs of forced entry or tamper,
pilferage usually isn’t even detected until after a delivery is completed.

Sometimes, pilferage is hard to spot even on delivery, especially with bulk goods and raw
materials piled into open bins or trailers. Clever thieves sometimes replace goods with the good
old elements (earth, water, stones) so nothing seems missing when trucks are weighed at a
checkpoint or upon delivery.
The Impact of Growing Pilferage in the Supply Chain

Besides the obvious inventory losses, there are several reasons why cargo theft and pilferage weigh heavily on logistics operations and modern businesses.

**Indirect Financial Losses Due to Pilferage Can Build Up**

Besides the cost of stolen inventory, losses also involve the cost of replacing the missing inventory and restoring supply chain facilities like warehouse doors, locks, trailers, or vehicles that were damaged or tampered with during incidents of theft.

**Compensation for Damage Can Add to Your Losses**

Compensations doled out after incidents include the cost of reimbursing drivers, transporters, or other third-party logistics service providers for damage that affected their property or business. As a 3PL or logistics service provider, this can include penalties incurred from the client due to SLA violations as well.

A growing number logistics service contracts with 3PLs now feature clauses to mandate a minimum threshold of cargo safety measures during transport and handling, especially for high-value goods. While that’s nice to have, it doesn’t guarantee compliance, or for that matter, your shipment’s security.

**Missing Goods Could Mean Missed Business or Market Opportunities**

Pilfered goods often mean lost market opportunities (and would-be profits) due to an unavailability of inventory or an inability to restock stolen items in time to fulfill immediate demand. Cargo theft or pilferage doesn’t just hit bottom lines, it also affects a company’s competitiveness.
Buffer Inventory Costs Can Grow Unsustainably

It costs a lot to maintain safety stock throughout a supply chain to offset the usual levels of pilfered or stolen inventory.

Shipment Insurance Costs a Premium

This involves not just the cost of insuring the vehicles or facilities which are routinely broken into, but also the cost of insuring precious or high-risk cargo like automotive parts, electronics, or pharmaceuticals that need to be transported through high-risk routes.

These, and several other operational overheads like facility or vehicle downtime (when cargo thieves do serious damage) or the inconvenience of having a trailer or container impounded as evidence for ongoing police investigations can lead to spiraling costs and unnecessary expenditures in supply chains.

The Importance of Detecting & Tracking Pilferage in the Supply Chain

Besides the obvious cost implications of pilferage in a supply chain, there are also other, probably more important reasons to improve vigilance and supply chain security management to counter cargo theft.

Tracking Pilferage Makes it Easier to Flag or Blacklist Stolen Goods

It’s important to track stolen shipments or missing inventory, flagging them with the authorities as well as unsuspecting resellers as soon as possible before they end up on the open market, or worse, with a customer. This is especially important for shipments of sensitive products like pharmaceuticals and vaccines, where tamper or bad handling of the goods can, and often do, endanger lives.
A growing number of underground websites and markets have emerged where stolen products are routinely bought and sold.

This is important not just to safeguard unsuspecting buyers, but also to preserve your brand’s reputation. If something goes awry, it doesn’t matter if the faulty consumer product wasn’t procured through reputable channels, all that matters is the manufacturer’s liability.

**Tracking Pilferage Makes it Easier to Prove Theft & Liability**

There are a growing number of thefts occurring from moving vehicles or parked trailers; knowing where and when pilferage occurs is the first step toward figuring out who is liable, especially if there’s insurance claims or reparations involved.

Taking stock of losses and filing an incident report after final delivery doesn’t always help; an insurance provider can argue you’re trying to make up losses from damaged or misplaced goods through the theft claim.

It’s easier to claim an insurance pay-out if you can prove that, despite preventive measures in place, an incident occurred en-route or at an external facility (like a parking lot or 3PL warehouse) where you had no control over the outcome.

**Tracking Pilferage Makes it Easier to Benchmark Cargo Security by Route or Carrier**

While it’s possible to guarantee cargo security, it’s not always operationally or financially feasible. It is, however, possible to minimize the risk of incidents, and one of the easiest ways to do that is tracking which of your routes or transport service providers are the safest.

While you can do that over time by just taking stock of losses at the end of every shipment, it’s probably better to track incidents as well as live feeds (such as current news, alerts from authorities or other cargo security watchdogs) to gauge the security of your shipments in real time.

Doing it in real time is what’s important here; it allows you to minimize risk without running the risk of quadrupling losses while waiting for a “statistically significant data set” to build up.

Tracking shipments as they happen, especially at the package level to detect pilferage, is the only way you can boost supply chain security.

Detecting incidents as they happen will not only decrease the time you take to respond (either by contacting the authorities or dispatching a recovery team) but also improves the odds of recovering stolen cargo. That doesn’t just shore up your supply chain’s security and resilience, it can also help meet aggressive business goals like improving brand security, reducing liabilities, and giving you the ability to guarantee product integrity to the end consumer.

If you think tracking a package — yes, tracking individual packages — throughout a supply chain is cumbersome or expensive, think again.
There's a plethora of IoT sensors and cloud-based monitoring solutions out there that can help. They are readily available, low-cost, and scalable to be deployed not just throughout the supply chain, but through the enterprise value chain as well. They can be used to track shipment location and condition as well as generate live alerts in case shipments veer off their pre-assigned routes or if individual packages get split up from the complete load without a good reason.

The aggregated package-level tracking data can also help automate manual processes like inventory management, delivery itinerary and route optimization, as well as periodic compliance audits, besides general report/data assembly.

**How to Track Packages to Secure Shipment and Reduce Pilferage**

A successful IoT package tracking and supply chain security system has a few essential components to help you get real-time visibility and actionable alerts, components that include:

- A portable GPS/GSM/Wi-Fi enabled tracking device to monitor the shipment
- Tags or beacons to track individual packages in the shipment
- Automated alerts and 24x7 monitoring to make sure everything’s going as it should be
- Real-time shipment analytics to optimize routes and flag possible incidents before they occur

**5 Benefits of Tracking and Securing Packages Using Hybrid IoT**

There are many benefits that a logistics operation — whether it’s your own or a 3PL’s — stand to gain from securing their shipments by tracking at the package level.
1 — Better Inventory Awareness
Know exactly what’s missing and when it goes missing, detect pilferage as it happens, report and act on it instantly to maximize the odds of recovery.

2 — Secure the Complete Supply Chain
Tracking packages can extend your cargo security and theft prevention measures throughout the supply chain. Secure goods in the warehouse, on the road, and until the final delivery is confirmed.

3 — Easier Inventory Tracking & Management
Easier stock audits and inventory management on the go, minimize process and accounting errors, especially with multiple drop-offs.

4 — Real-time Visibility Into the Condition of Goods
Reduce shrinkage due to spoilage as well, easier quality audits and compliance for more sensitive shipments.

5 — No More Reporting Delays
Whether it’s proof of final delivery, filing police reports, or dispatching replacement stock for critical shipments, detecting pilferage through package tracking can help handle things with minimal delay and maximum ease.

It’s never feasible (economically or otherwise) to maximize shipment security through the usual means. In any case, you can’t guarantee security either. Despite having the largest number of CCTV cameras in the world, 70% of the major cargo crimes in March ‘18 took place in the UK* with a combined loss of $1.6 Million.

Whether you’re running your own logistics operations, or outsourcing it to 3PLs, the best approach is to monitor shipments in real time to detect theft, or even better, monitor at the package level so you can spot pilferage as well.

Knowing when something’s wrong is the first — perhaps even the most important — step to a more secure supply chain.

Real-time shipment tamper or theft alerts give you an opportunity to act before the thieves make off with your goods. What’s more, the ability to track packages independent of a vehicle also improves the odds of recovering your stolen goods, which ultimately improves your supply chain resilience.

If you’d like to know how to track at the package level, we’ve got something on how to track LTL shipments, packages, and market vehicles as well.