

Special Report: The State of Retail Return Fraud in 2026

Operational Strategies
to Minimize Losses in
a High-Return Economy

A report by LiquiDonate

- 1 Introduction**
- 2 Major Types of Fraudulent Returns**
- 9 The Scale of the Problem**
- 10 Major Costs, Challenges to Address Fraud**
- 12 Combatting Fraud**
- 16 LiquiDonate: Reducing the Burden of Returns and Fraud**
- 17 Looking Forward**
- 18 Appendix A**

Introduction

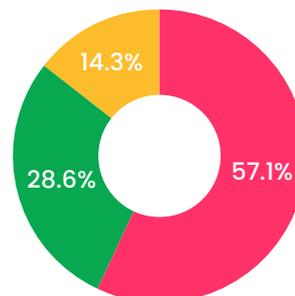
The growth of e-commerce has led to a significant increase in product returns, which now represent a substantial operational cost for retailers across all sectors. As return volumes rise, fraudulent return activity is growing alongside them, intensifying the financial impact on retailers. The shift from in-person returns to automated, remote, and low-touch return processes has created procedural vulnerabilities and new opportunities for exploitation by bad actors.

This report outlines major categories of return-related fraud, the mechanisms that enable them, the scale of the problem, and the implications for retail operations and reverse logistics systems. It also provides guidance on how businesses can limit return fraud while turning returns into both a competitive and sustainability advantage.

The information presented in this paper is primarily drawn from publicly available sources cited throughout the document and is supplemented by expert interviews and responses from a LiquiDonate survey conducted online in December 2025.

Do you currently use any fraud detection tools for returns?

- Yes
- No
- I'm not sure



Major Types of Fraudulent Returns

Historically, in-store returns allowed retailers to visually inspect items and verify authenticity before accepting a return. These interactions introduced natural friction that deterred many forms of fraudulent behavior. In contrast, today's digital return workflows substantially reduce those safeguards. Modern returns are characterized by self-service return initiation, automated label generation, and drop-off processes with little or no human verification.

This shift has introduced two primary vulnerabilities. First, reduced early-stage inspection allows fraudulent items to enter the return stream undetected. Second, the absence of person-to-person interaction can create a sense of anonymity that lowers psychological barriers to fraud. Together, these dynamics have contributed to an increase in both traditional and emerging forms of return fraud.

In research conversations with a veteran retail asset protection professional with nearly 40 years experience at national retail brands and solution providers, several themes emerged:

- The issue is broad and affects every retail sector.
- Discussions about return costs and fraud have intensified in the last five to ten years.
- The connection between receiving a return and issuing a refund has weakened or been eliminated for many online returns, creating new vulnerabilities.
- Psychological and generational barriers to committing fraud have eroded.
- It is important to differentiate between policy abuse and criminal fraud aimed at monetary gain.



We used to allow instant returns to store credit and came across one customer with tens of thousands of dollars of purchases—which she was then reselling online.

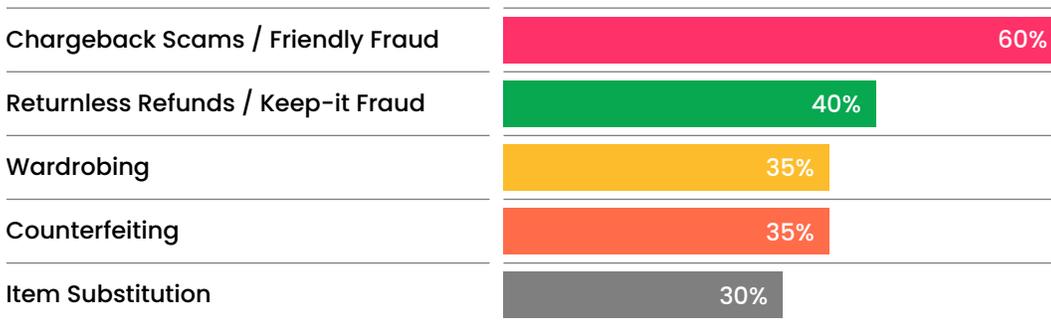
—Midsize Health & Beauty Retailer

- Artificial intelligence may help mitigate fraud over time but can also be leveraged by bad actors, for example by altering images to make products appear damaged or scanning return policies to identify loopholes.

As the same expert summarized: “Return fraud has expanded significantly over the past five to ten years and has become much broader, particularly in e-commerce.”

With this context, the following sections outline some of the most prevalent fraud types currently affecting retailers.

**What type of returns fraud have you experienced?
Check all that apply**



Chargebacks

Chargeback scams are a form of fraud in which consumers dispute legitimate transactions with their bank or credit card issuer to obtain a refund while retaining the purchased item or service. Unlike traditional return fraud, chargebacks bypass the retailer’s return and customer service processes entirely, shifting the dispute into the payments ecosystem. Scammers may claim that a purchase was unauthorized, that an item never arrived, or that the product was materially different from what was advertised, even when tracking data or transaction records show otherwise. Because card networks and issuers often prioritize consumer protection, retailers are frequently required to refund the transaction while also losing the product and incurring additional chargeback fees.

The operational and financial impact of chargeback scams can be significant. In addition to lost revenue and merchandise, excessive chargebacks can increase payment processing costs, trigger monitoring programs from card networks, or even lead to the loss of merchant processing privileges. As e-commerce volumes grow and returns processes become more automated, chargeback abuse has increasingly overlapped with other forms of return fraud, including “friendly fraud,” where customers knowingly exploit dispute mechanisms rather than engaging in overt criminal activity.

Amazon has long cited chargebacks and “friendly fraud” as a material operational issue, particularly for third-party sellers on its marketplace.¹ Sellers frequently report losses from “item not received” or “unauthorized transaction” disputes even when delivery confirmation exists.

1 *Justt, Amazon Chargebacks: Everything You Need To Know*

Addressing chargeback scams typically requires a combination of stronger transaction verification, better delivery confirmation, clearer return and refund policies, and tighter integration between returns management and payments systems.

➔ **Most common sectors affected: Luxury apparel and accessories; cosmetics and personal care; consumer electronics**

Wardrobing

Sometimes referred to as temporary use fraud, wardrobing occurs when consumers purchase items with the intent to use them briefly and then return them as if unused. This practice imposes direct costs on retailers, including return processing expenses and inventory losses when worn or damaged products cannot be resold at full value.

Estimates vary widely, but according to industry data, a shocking 13 to 70 percent of shoppers admit to wardrobing, with significantly higher rates observed among shoppers aged 18 to 34.^{2,3} For apparel and fashion retailers, wardrobing erodes margin and complicates inventory planning. The problem is particularly acute in fast fashion, where rapid product turnover means returned items may no longer align with current assortments and must be discounted or written off.

2 *Narvar, 2023 State of Returns Report*

3 *Optoro, 2024 Market Research: Returns Unwrapped*

Nordstrom has frequently been cited in industry discussions as experiencing high rates of wardrobing due to its historically generous return policies.⁴ Former executives and retail analysts have noted that high-end dresses and occasion wear were particularly susceptible. In response, Nordstrom eliminated its explicit “no-questions-asked” policy and moved to more discretionary returns, explicitly referencing abuse. Nordstrom and other retailers have also added anti-wardrobing fraud tags to items to further support these new stricter return policies.⁵

4 *Yahoo! Shopping, \$2 Billion of Retail Fraud Could Be Ruining Nordstrom’s Legendary Return Policy*

5 *360 ID Tag, Major Retailers Move to Combat Return Fraud with Return Tags*

Similar behavior occurs in other categories such as tools, outdoor gear, and household goods, where it is often described as rental or borrowing fraud.

➔ **Most common sectors affected: Luxury apparel and accessories; home improvement and tools; outdoor gear**

Counterfeiting

Counterfeit product returns remain a longstanding challenge, and the expansion of high-volume reverse logistics operations has increased retailers’ exposure to non-authentic items entering the supply chain. Light-inspection or no-inspection workflows, designed to improve throughput and lower costs, can create opportunities for counterfeit products to be substituted for genuine merchandise.

The prevalence of counterfeiting has grown alongside online marketplaces and the availability of high-quality replicas and used items that closely resemble new inventory. The internet has also lowered barriers to counterfeiting by making instructional content widely accessible through forums, videos, and online communities.

➔ **Most common sectors affected: Luxury apparel and accessories; jewelry; consumer electronics; cosmetics and personal care**

Item Substitution and Empty-Box Returns

Item substitution involves returning the wrong product or substituting unrelated objects of similar weight or size. In some cases, fraudsters return empty boxes or envelopes. These schemes rely on automated systems that validate label scans and package characteristics rather than contents.

Related variations exploit policies that issue refunds as soon as carriers confirm delivery. Fraudsters may send substituted items or empty packages to an address near the correct return location, triggering an immediate refund once delivery is recorded.

Gutted items, also known as bricked returns, are also an increasing problem as low-touch return processes expand. Fraudsters remove valuable internal components from electronics (e.g. RAM, solid-state harddrives, CPUs and batteries), then reassemble and return the device for a full refund while claiming it is defective. Lastly, Damaged-on-purpose fraud affects both online and brick-and-mortar retailers. In these cases, customers intentionally damage items after use to exploit return policies that allow refunds for defective products when other return options are unavailable.

Substitution fraud was difficult to execute when most returns occurred at staffed counters, but it has become more viable as digital return processes reduce human verification.

➔ **Most common sectors affected: Consumer electronics; home improvement and tools; automotive parts**

Keep-it Fraud

“Keep-it” return policies have expanded significantly in recent years. Under these policies, customers receive refunds without being required to send products back. These programs are designed to reduce the cost of processing low-value returns since it costs the retailer more for return shipping, handling, inspection, and reselling



We got a giant rock back in place of a weighted blanket.

–Home Goods Retailer

I’ve received empty packages, bricks, a customer that ordered 14 times and returned it all 14 times, seriously soiled product, chewed up by pets, other competitors products, you name it.

–Mid Size Home Goods Brand

than refunding the customer. Rather than making the policy public and for every product, keep-it returns are typically triggered algorithmically based on item value.

Nearly 60 percent of retailers offer “keep it” options on select items,⁶ and more than 80 percent of these returns involve products priced under \$30.⁷ While cost effective, these policies introduce easy opportunities for abuse when customers intentionally purchase low-cost items expecting a refund without a return.

These policies also shift responsibility for unwanted products to the customer, who must decide whether to keep, resell, donate, or dispose of the item. In some cases, emerging extended producer responsibility (EPR) regulations may discourage or complicate keep-it return practices by increasing producer accountability for product disposition and waste outcomes. These dynamics introduce not only sustainability concerns, but also new fraud exposure.

Because no physical product is recovered, determining the true rate of fraud within keep-it returns remains difficult, creating unique challenges for retailers.

➔ **Most common sectors affected: Household items; fashion (particularly low cost items); cosmetics and personal care**

Bracketing

Bracketing involves purchasing multiple versions of an item and returning those that do not fit or meet expectations, is not technically fraud but significantly increases operational costs for retailers. Bracketing is particularly prevalent in online fashion retail, where return rates often exceed 30 percent,⁸ compared to an overall retail average of 15 to 20 percent. Survey data shows that 63 percent of consumers admit to buying multiple sizes and returning those that do not fit.⁹

➔ **Most common sectors affected: Fashion and apparel**

6 ReturnPro, 2023 Returns Report

7 New York Times, *Returns Are a Headache. More Retailers Are Saying, Just 'Keep It.'*

8 Red Stag Fulfillment, *What are Average Return Rates for Ecommerce?*

9 CapitalOne Shopping, *Retail Returns Statistics*, May 6, 2025

Return-as-a-Service

Return-as-a-Service (RaaS) fraud is an organized retail crime model in which criminal groups provide professionalized return scams to clients in exchange for a portion of the proceeds. Rather than stealing goods themselves, RaaS operators manipulate retailers' return systems on behalf of customers.

These groups use many of the same tactics as individual fraudsters, such as item substitution and counterfeiting, but also employ additional techniques that require coordination across multiple retailers and locations. Through this centralized and organized fraud scheme, the number of products and value of returns can grow quite large.

In one U.S. federal case, a defendant was sentenced to 30 months in prison for operating an organized online refunding fraud ring that stole more than \$6 million from retailers by helping consumers obtain illegitimate refunds.¹⁰ The operation ran refund services, including one called Simple Refunds, that guided buyers on how to falsely claim refunds from merchants. Simple Refunds collected order details from customers and then exploited those to secure refunds they weren't entitled to.

¹⁰ United States Department of Justice, Second Defendant in Organized Refunding Fraud Ring Sentenced to 30 Months in Prison

RaaS schemes are adaptable across sectors. In consumer electronics, they require technical expertise but generate high value per item. In contrast, cosmetics and personal care require little skill but generate lower value per item, requiring high volumes to remain profitable.

➔ **Most common sectors affected: Nearly all retail sectors, with highest value from consumer electronics and luxury goods and the highest volumes occurring in apparel and cosmetics**

The Scale of the Problem

Fraudulent returns represent a large and growing challenge. According to the National Retail Federation's 2025 Returns Landscape Report, retailers estimate that roughly 15 percent of total annual sales were returned in 2025, with total returns reaching nearly \$850 billion.¹¹ This represents a dramatic increase from less than \$200 billion in 2007 and the overall return rate has not decreased since its rapid spike during the COVID-19 pandemic, showing that the drastic change in consumer shopping, once from strict shelter-in-place regulations, may be here to stay.¹²

¹¹ National Retail Federation and Happy Returns, 2025 Retail Returns Landscape Report

¹² Statista, Cost of Retail Merchandise Returned in the United States from 2007 to 2024

Value of U.S. retail returns year-over-year



Source: National Retail Federation

¹³ Appriss Retail and Deloitte, 2024 Consumer Returns in the Retail Industry Report

Online return rates reached 24.5 percent in 2024 compared to 8.9 percent for in-store purchases, highlighting the heightened vulnerability of digital channels to margin erosion and fraud.¹³

Retailers estimate that approximately 15 percent of all returns are fraudulent. Survey data also shows that nearly half of shoppers believe it is acceptable to bend return rules if they are unhappy with a purchase, and more than one in three consumers admit to committing at least one form of return-related fraud.¹⁴

A 2024 Appriss Retail and Retail Dive survey of 150 retail executives identified the most common types of return fraud and abuse.¹⁵ In that report, respondents identified wardrobing (60 percent of respondents) and bracketing (47 percent of respondents) as two of the top six forms

¹⁴ Narvar, 2023 State of Returns Report

¹⁵ Appriss Retail and Retail Dive, How Important are Returns to Customers?

1 in 3

consumers admit to committing retail return fraud

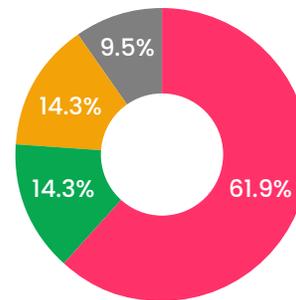
of return fraud (along with four others that represent behavior that is more criminal in nature).

These pressures compound existing cost challenges. While gross margins can appear healthy, net margins in retail remain thin. A January 2025 analysis from NYU Stern estimates that overall net margins for general retail average roughly five percent.¹⁶

16 NYU Stern School, *Margin/ROIC By Sector (US)*, January 2025

Do you predict fraud will rise or fall in 2026?

- Fraud will rise
- Fraud will fall
- Fraud will stay the same
- N/A



Major Costs, Challenges to Address Fraud

Returns create substantial costs for retailers, with most estimates placing the average return cost between \$25 and \$30 per item.¹⁷ Fraudulent returns amplify these burdens because many of those products cannot be resold at full price.

\$25–30

The average cost to a retailer for a single product return

The source of costs to retailers for returns are numerous, making the problem especially difficult to address.

17 Narvar, *2024 State of Returns Report*

Reverse logistics is a major contributor to return costs. A 2021 Return Logic report estimates that shipping and label costs alone amount to \$7 to \$9 per return.¹⁸ Some simple math can help us get at the scale of shipping and labeling. Amazon alone accepts 1.2–1.5 billion returns per year.¹⁹ Assuming it represents approximately eight percent of the total retail market,²⁰ industry-wide return volumes likely exceed 15 billion packages annually, suggesting more than \$100 billion in shipping and labeling costs each year.

18 Return Logic, *Ecommerce Returns by The Numbers in 2021*

19 Red Stag Fulfillment, *How many Amazon orders get returned each year?*

20 PYMTS, *Amazon Extends Gains While Walmart Holds Steady in Q2 Spending, September 2025*

Not all retailers offer free returns, but approximately half do, while others subsidize return shipping.^{21, 22} As a result, a significant portion of these costs directly impacts retailers' bottom lines.

21 Invesp CRO, E-commerce Product Return Rate – Statistics and Trends

Handling, inspection, and restocking further increase costs, often totaling \$20 or more per return.²³ While retailers have streamlined workflows to reduce administrative expenses, these efficiencies also create opportunities for fraud.

22 ShipBob, A Guide to Ecommerce Return Policies in 2025

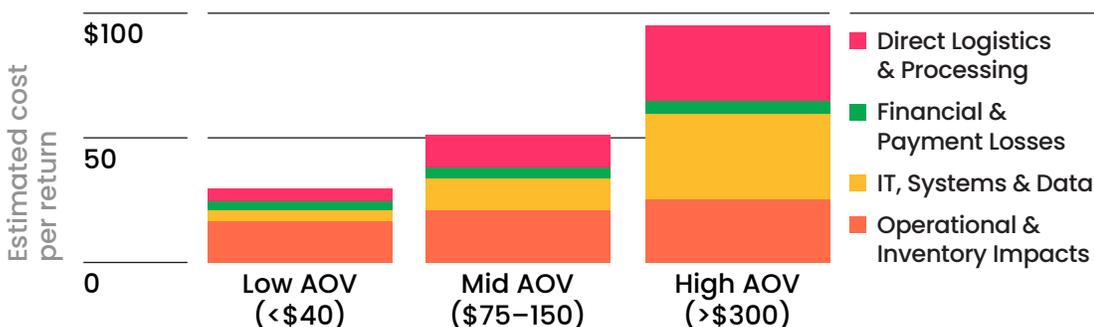
23 Narvar, 2024 State of Returns Report

This tension is critical. Retailers possess many of the tools to address fraud but must carefully weigh their effectiveness against the added cost of implementing those measures.

Other transaction costs also exist for retailers that represent erosion of overall profit margin. These costs (based on an average \$100 retail purchase) include:

Category	Examples	Cost Estimate (per return)
Direct Logistics and Processing	Shipping and labeling, physical materials, refurbishment and repair, repackaging	\$20–\$30
Financial and Payment	Payment processing and refunds, lost margin and markdowns	\$10–\$12
IT, Systems and Data	Systems and software, data and analytics, automation, equipment	\$3–\$6
Operational and Inventory Side Effects	Inventory distortion, planning and forecasting, channel management	\$10–\$12

Illustrative Return Cost Model by Average Order Value (AOV)



24 Illustrative cost estimates in this paper are intended to demonstrate relative cost drivers rather than exact per-item losses. More detail on specific costs is provided in Appendix A.

Estimated costs per return based on three order values showing that proportion of return costs by category changes are order value changes.²⁴

Combating Fraud

According to the best available data, roughly 15 percent of all retail purchases are returned, and approximately 15 percent of those returns are fraudulent. Together, this represents a significant and systemic challenge for retailers.

Interventions generally fall into six categories: controlling return channels, strengthening return policies and customer verification, deploying advanced verification technologies, optimizing post-return routing, industry collaboration, and managed donation.

Control the Return Channels

This is likely the most impactful category. Fraudsters take advantage of anonymity and low-touch return channels. By controlling where and how returns are accepted, retailers can address this challenge directly.

Interventions include partnerships with third-party return inspection providers, in-store or assisted returns for high-risk products, and pre-return authorization steps such as serial number checks and condition assessments.

Retailers are increasingly taking control of the returns channel itself to reduce fraud. For example, UPS-owned returns processor Happy Returns has deployed an AI-based system that analyzes returned items against purchase expectations and flags suspicious returns for human review. Participating brands including Everlane, Revolve, and Under Armour are testing the tool to reduce fraudulent return activity at the point of acceptance.²⁵

➔ Use this intervention for: Wardrobing; bracketing; item substitution; counterfeiting; gutted items



We only allow for returns above a certain dollar amount and limit the number of returnless returns. We also rely on Happy Returns to do some verification.

–Midsize Health & Beauty Retailer

We stopped selling on the E-Comm site and only worked direct with grocery stores that will carry our product OR the customer can come direct to the warehouse to pick up goods offered.

–Large Food & Beverage Brand

²⁵ Reuters, UPS company deploys AI to spot fakes amid surge in holiday returns

Strengthen Return Policies and Customer Verification

Retailers can reduce fraud before it occurs through return-policy adjustments such as tiered policies that include stricter windows for high-risk categories, and proof-of-purchase requirements. Customer-focused measures include account requirements, two-factor authentication,²⁶ device fingerprinting, and analytics that identify high-risk purchase patterns or serial returners.

The shoe retailer DSW employs a tiered policy for customer returns.²⁷ One part of this policy is encouraging customers to sign up for the company's membership program, which adds barriers to both orders and returns that can disincentivize policy abuse. Signing up for the top tier of the membership program gives those customers up to 365 days to make free returns. Non-members, on the other hand, have just 30 days and incur a fee for online returns. While longer return windows could increase the risk of wardrobing, gathering additional information on customers through loyalty programs can decrease other forms of fraud.

➔ Use this intervention for: Wardrobing; bracketing; keep-it abuse; item substitution

Deploy Advanced Verification and Authentication

Once a product is returned, authentication and evaluation can reduce fraud. Deploying technology can play a significant role here. Examples include:

- RFID²⁸ (for physical products) and digital watermarks²⁹ (for multimedia)
- AI-based image comparison
- Package sensors for shock and tampering
- Component verification for electronics
- Blockchain provenance tools, including digital product passports³⁰

These approaches help identify substitution, counterfeiting, gutted items, and price arbitrage schemes while reducing the need for manual inspection.

²⁶ According to the U.S. Cybersecurity and Infrastructure Security Agency, two-factor authentication reduces the risk of online account hacking by 99 percent.

²⁷ Narvar, *7 Return Policy Examples for Ecommerce Retailers*

²⁸ Radio Frequency Identification is a technology that uses radio waves to automatically identify and track products. It enhances inventory management, reduces theft, and improves the shopping experience.

²⁹ Digital watermarking involves embedding a digital code or image, which might be visible or covert, inside multimedia content.

³⁰ Circularise, *Digital product passports (DPP): what, how, and why? 2024*

Many e-commerce platforms and marketplaces also use machine learning, behavioral analytics, and multi-factor authentication to strengthen transaction and account verification.³¹ This includes real-time monitoring of purchasing behavior and additional authentication steps when fraud risk is detected.

³¹ Amazon, How Amazon uses AI innovations to stop fraud and counterfeits

➔ Use this intervention for: Item substitution; gutted items; damaged-on-purpose fraud; counterfeiting

Optimize Post-Return Routing

Reverse logistics is complex, but strong post-return routing policies can help retailers detect fraud and prevent losses. Many forms of return fraud are only identifiable once an item enters the reverse-logistics system. By establishing structured workflows for inspection and routing, retailers increase the likelihood of identifying fraudulent returns before refunds are finalized.



We use tools to upfront screen for fraudulent orders. All returns are physically inspected and reviewed by our warehouse teams to ensure accuracy and compliance.

—Online Home Goods Brand

Common optimization strategies include routing electronics through component testing, flagging high-risk product categories for deeper inspection, and directing suspicious returns into manual review. In addition to reducing fraud, these processes create valuable feedback loops that improve fraud detection models and analytics over time.

As one example, platforms such as Optoro's OptiTurn system are used by major retailers to manage returned and excess merchandise in ways that maximize recovery and minimize losses, including losses from fraud. OptiTurn helps retailers and their partners identify items that are likely fraudulent and route them to appropriate secondary channels such as recycling or liquidation, rather than allowing them to be resold as new. The platform also tracks reverse-logistics decisions, helping retailers avoid losses caused by unverified returns re-entering active inventory.

LiquiDonate's ReturnsDirect service, which routes unprofitable or unsellable customer returns to bypass the warehouse and ship directly

from the customer to a local nonprofit, can also help combat return fraud. ReturnsDirect includes a nonprofit application with an optional setting that requires recipient organizations to confirm both receipt of the return and the contents of the package. This confirmation step allows nonprofits to identify potentially fraudulent returns and verify whether items are in usable condition before refunds are finalized.

➔ Use this intervention for: Item substitution; empty-box returns; gutted items; counterfeiting

Industry Collaboration

Most fraudsters rarely target a single retailer. Both organized retail crime groups and individual fraudsters exploit fragmentation and lack of communication across the industry. Collaborative solutions include shared fraud databases, counterfeit libraries, partnerships with law enforcement, and information sharing on emerging fraud types.

➔ Use this intervention for: Sharing best practices across retailers can help combat all forms of return fraud

Donation

Facilitating the donation of returned items can help combat return fraud by removing high-risk items from the reverse-logistics pipeline altogether. By eliminating physical returns, reducing automated refund abuse, and lowering the economic incentives for fraud, donation-based return pathways offer retailers a way to reduce losses without increasing inspection or handling costs.

Many common fraud types, including item substitution, empty-box returns, and counterfeiting, depend on items physically re-entering the reverse-logistics network. When returns are routed through a managed donation pathway, the retailer is largely removed from the physical process, eliminating these fraud vectors.

Donation pathways also decouple refunds from shipping events. Refunds can be issued only after donation confirmation, reducing exposure to automated refund abuse.

In addition, there is a growing trend among younger generations to opt for brands that have sustainable, socially responsible and climate-friendly practices. One study showed that over 80 percent of Gen Z, millennial and Gen X consumers are willing to pay up to 10 percent more for the same item if the brand is sustainable. Routing returns to non-profit organizations through a managed donation pathway ensures that products are used (saving on waste) by people and organizations that need them.³²

32 First Insight, The State of Consumer Spending: Gen Z Influencing All Generations to Make Sustainability-First Purchasing Decisions

Finally, donation reduces incentives for opportunistic fraud in categories where inspection is not cost-effective and where keep-it policies are most prevalent, offering a more controlled alternative that preserves cost savings while limiting abuse.

LiquiDonate: Reducing the Burden of Returns and Fraud

LiquiDonate, headquartered in Oakland, California, was founded in 2021 with a vision for a world without waste. The company developed a software platform that reduces logistics costs by matching unsellable inventory and returns with local nonprofits and schools, helping prevent products from being landfilled or destroyed.

The solution emerged because retailers and brands traditionally lacked scalable and economically viable alternatives to landfilling or incinerating inventory that can no longer be sold. Combined with increasing pressure on warehouses due to increased ecommerce and returns and lenient return policies that include free return shipping, the industry faces a challenge that requires smart and flexible solutions.

LiquiDonate's ReturnsDirect system enables online retailers to offer donation as an alternative to traditional returns. Through LiquiDonate's online platform, customers donate would-be returns, while retailers avoid restocking, storage, transit, and disposal costs. Refunds can be

issued only after nonprofit inspection and confirmation. A significant added benefit of routing returns through established donation channels is that retailers are able to take advantage of the tax benefits of donation. This process makes donations cost competitive with keep it returns.

In addition to reducing fraud exposure and logistics costs, donating through LiquiDonate helps companies advance environmental, social, and governance goals, creating value for brands, customers, and communities.

Looking Forward

Return fraud is no longer a marginal issue. It affects every part of the retail value chain, from customer experience and loss prevention to reverse logistics and inventory planning. Low-touch return channels and increasingly sophisticated fraud tactics have turned returns into a major source of cost and risk at a time when retailers operate on thin margins.

The interventions outlined in this paper offer a practical path forward. Stronger policies and customer verification reduce fraud before it begins. Greater control over return channels, combined with advanced verification and optimized routing, increases detection once returns enter the system. Industry collaboration helps close gaps exploited by organized fraud.

Solutions such as LiquiDonate demonstrate how a more thoughtful approach to reverse logistics can reduce fraud while improving financial and sustainability outcomes. Retailers that invest in modern return systems today will be better positioned to protect margins, strengthen trust, and transform returns from a liability into a strategic advantage.

Appendix A Cost Categories & Components of Retail Returns

Category	Cost Area	Examples / Details
Direct Logistics & Processing Costs	Physical materials	Replacement boxes or mailers; Tape, labels, filler, pallets, shrink wrap, etc.; Special packaging for refurbished or open-box resale
	Refurbishment & repair	Cleaning, steaming, pressing for apparel and other soft goods; Cosmetic repair (buffing, repainting, fixing minor defects); Technical repair (replacement of components, diagnostics); Replacement parts, consumables, and service tools; Technician labor, and QC sign-off
	Repackaging	New branded packaging when original is missing or damaged; New polybags, hangers, tags, and seals; Relabeling (barcodes, size labels, translations, region-specific labels)
	Disposal / non-recovery	Landfill or incineration fees; Recycling fees where applicable; Data destruction for electronics (secure wipe); Hazardous waste handling (e.g., batteries, chemicals, aerosols)
Financial & Payment Costs	Payment processing & refunds	Credit card and other transaction fees not fully refunded to the merchant; Refund transaction fees; Currency conversion spreads on cross-border transactions; Chargeback fees if a dispute is involved
	Lost margin & markdowns	Selling the item at a lower price (open-box, outlet, secondary marketplace); Obsolescence write-downs (seasonal or trend-sensitive items that come back late); Damage or wear that makes the item unsellable at full price; Complete write-off for items that must be scrapped or destroyed
IT, Systems and Data Costs	Systems & software	Returns management software (return merchandise authorization portals, returns apps, plugins, etc.); Integrations between ecommerce platform, warehouse management systems, customer relationship management software, and carrier systems; License and subscription costs for reverse-logistics platforms
	Data & analytics	Analytics tools and dashboards for return rates by SKU, size, color, customer segment; Fraud and abuse detection; Data engineering and BI labor to maintain pipelines and reporting
	Automation / equipment	Capex and operating costs for scanners, conveyors, sorting machines, etc.; Automated bagging or boxing machines; Smart lockers, drop-off kiosks, etc.
Operational & Inventory Side Effects	Inventory distortion	Overstock at returns processing locations vs. primary distribution centers; Cost of transferring returns back to the “right” facility; Mis-slotting or inaccurate on-hand counts due to returns timing; Stockouts at forward-locations while inventory sits in the reverse pipeline
	Planning and forecasting	Demand forecasting complexity due to high/volatile return rates; Safety stock adjustments and additional working capital tied up in inventory
	Channel management	Costs to route product into outlet stores, off-price retailers, liquidators and jobbers, re-commerce platforms and marketplaces

Named a TIME Best Invention of 2025, LiquiDonate is the first software platform that makes reducing retail waste cost-effective.

LiquiDonate's bulk donation and automation platform reroutes excess inventory, customer returns, and unsellable goods to nonprofits and schools—turning a traditionally costly, landfill-bound problem into a tax-deductible, socially impactful solution.

Powered by a network of 4,000+ nonprofit partners, LiquiDonate matches goods quickly and almost always locally, helping retailers cut shipping distances by thousands of miles while ensuring products reach communities that need them most.

Since launching in 2021, LiquiDonate has helped 150+ brands donate over 15 million items, saving money, reducing landfill waste, and strengthening local communities. Retail partners include Room & Board, BAGGU, Luxome, Tuft & Needle, Honeylove, Bombas, Liquid Death, and many more.

✉ partners@liquidonate.com

🌐 LiquiDonate.com

