PROBLEM
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CONSUMER GOODS & RETAIL 3

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Profit Protection
New Ways to Combat Shrinkage

IE FOUNDATION ADVANCED SERIES ON PROBLEM-DRIVEN RESEARCH

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Greetings

Dear friends:

One of IE Business School's goals is to be an international center of excellence for research in all areas of management. We pursue this goal in close collaboration with the IE Foundation and the recently established IE University.

I would like to present a new initiative of the IE Foundation and IE Business School. We hope it will provide an innovative way to share the results of the joint work of our scholars and partner organizations.

The initiative, "IE Foundation Advanced Series on Problem Driven Research", aims to provide support to organizations facing the new economic structure, featuring unique market rules. Recognizing the importance of retailing for assessing the current situation and the social expectations, we have chosen the "Consumer Goods & Retail" series as our maiden work.

The IE Business School seeks to create an environment where we can develop the best talent, while at the IE Foundation we seek to close the loop between the school and businesses by fostering sustainable relationships through the organization.

We are confident that this initiative will meet the challenge and offer a new perspective on the issues.

Marco Trombetta
Vice-Dean of Research IE Business School
Vice-Rector of Coordination and Research IE University

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Acknowledgement

We would like thank our interview partners in the Spanish retail industry for the precious time they spent answering our many questions. We would also like to express our gratitude towards Adrian Beck, Colin Peacock, Dennis Klein and Matt Parish for their valuable input. All errors are of course our responsibility. We hope that you find our report useful for your business.

Researcher

Prof. Dr. Daniel Corsten

Daniel Corsten is a full Professor of Retail Operations and Technology Management at IE Business School. Previously he taught,researched or visited at University St. Gallen, London Business School, The Wharton School and INSEAD.

A leading academic of Efficient Consumer Response Initiative, the collaborative supply chain movement, Daniel was for many years Founding Editor of the ECR Journal and President of the ECR Research Foundation. His two reports on "Global Retail Out-of-Stocks" co-authored by Professor Tom Gruen, funded by Procter & Gamble and published by the Grocery Manufacturers of America are considered a game-changer in retail. His new research on global shopping trip management, co-authored by Professors David Bell and George Knox, and sponsored by Unilever was recently awarded research grants by the Marketing Science and the International Commerce Institute. For his applied work with fashion retailer Charles Voegele he was awarded an Award of the RFID Journal. He is a regular speaker at international conferences and a consultant to many Fortune 500 companies.

Daniel obtained his PhD from University St. Gallen. His scholarly research appeared in Management Science, Strategic Management Journal, Journal of Marketing and Journal of Operations Management as well as in managerial journals such as Harvard Business Review and the International Commerce Review. He authored several books on supply chain management.

Rafael Puyol
Vice-president
IE Foundation

Margarita Velásquez
General Director
IE Foundation

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Among its primary activities, IE Foundation supports the research and the knowledge sharing endeavors of IE Business School's professors. Through its initiatives IE Foundation contributes to the positioning of IE Bvusiness School as a center of excellence for innovation, and for the creation of knowledge targeted at its productive environment.

The IE Foundation aims to create strong ties and alliances with prestigious, public and private, institutions, particularly those in the business domain that can help propel our researchers' initiatives. As an institution that pursues excellence, research activities are driven by academic rigor and the utilitarian nature seeking to create knowledge. We aim to push innovation and competitiveness to provide answers to the challenges and needs of society.

This publication is part of the IE Foundation's collection on Consumer Goods and Retail, developed in collaboration with Ernst & Young. We would like to extend our gratitude to them for their commitment and their vast experience on this matter.

The collection has been designed with the purpose of analyzing the key aspects of the industry through a practice-driven, up to date perspective on key aspects of the industry such as Sustainability, Information Security, Pricing, and Profit Protection. We are in the midst of a major change in the retail industry. The challenge many Spanish organizations face, is being at the forefront of such change and benchmarking best practices in the global market. The IE Foundation looks forward to helping organizations in this process.

We hope that this publication will be of interest to you, and we appreciate your support.

José Luis Ruiz Expósito
Partner Responsible for
Consumer Products & Retail

Manuel Fernández
Business Development Director
Consumer Products & Retail

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Consumer Products and Retail companies are developing their business in a much more complex and volatile environment than they have in the past. In this environment, companies' actions focus on transforming their business processes and protecting their operational margins.

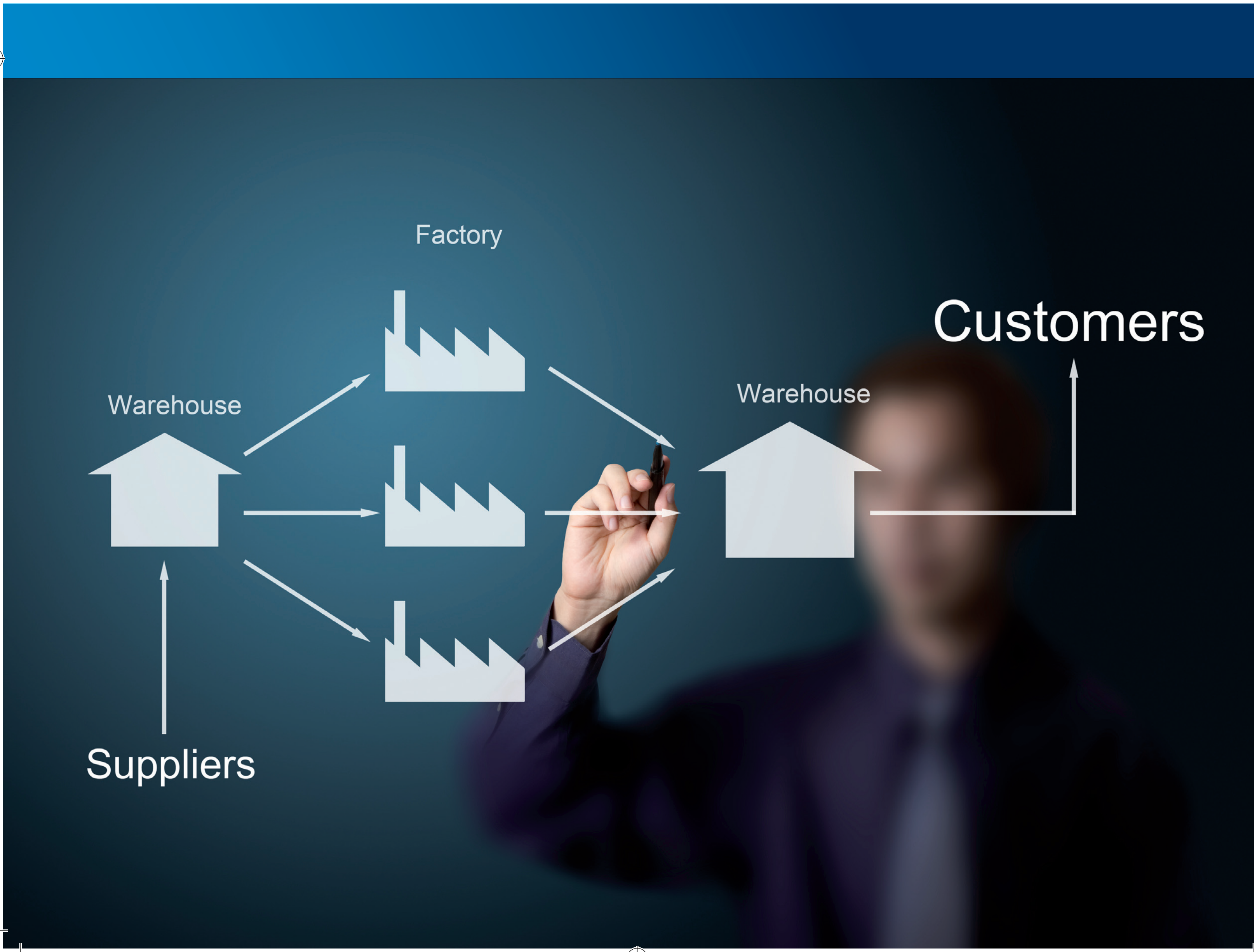
In its commitment to innovation and value creation, Ernst & Young has propelled research projects on the issues that will help companies deal with today's industry challenges.

Our research takes into account different actions regarding price dynamics from a brand differentiation perspective. Secondly, we take on the negative economic effect of shrinkage with an analytical approach, to identify its root causes and suggest corrective actions for its mitigation (profit protection). We also seek ways to preserve the information security of an industry that operates, with an increasing frequency, in mobile scenarios and technologies. Finally, we propose the adoption of a business commitment perspective, betting on sustainable initiatives from retailers that take into account manufacturers and consumers.

These four areas are experiencing a large change in process. Ernst & Young and the IE Foundation are approaching these challenges from an innovative perspective with the intention of putting them into practice and creating value for the business environment.

Executive Summary

Retail is a vibrant part of the Spanish economy. However, the current global economic crisis continues to reduce growth and profit expectations for Spanish retailers and their suppliers. Many firms are exploring new ways to increase profitability and growth. Shrinkage contributes substantially to retail losses. Reducing shrinkage is therefore an important opportunity and perhaps "low-hanging fruit" for retailers to amplify their profits.



Academic research confirms that shrinkage continues to be a major problem in the global retail industry. However, most research to date has been conducted from English-speaking countries, with the US and the UK on the forefront, while little is known about shrinkage and its causes and consequences in Spain. This report is an attempt to close this gap. It estimates the opportunity to increase profitability by reducing shrinkage and describes current practices in Spain as well as international benchmarks and suggests ways to implement best practices. The insights of this report are based on a series of interviews conducted with Spanish retailers, international benchmark firms, as well as academic experts. It draws on two decades of personal experience in retail operations as well as a systematic search of academic research databases.

Global studies estimate the extent of shrinkage in Spain at around 1.4% of sales. Our interviews with a broader sample of retailers than in other surveys suggest an extent of around 1.75% of sales. We also propose that the real cost of shrinkage is even higher because many estimates do not take into account the hidden cost of shrinkage. Building on the concept of "total loss" and drawing on recent research we advocate a new typology of shrinkage consisting of physical loss, value variance, process variance and unknown losses as well as cash losses.

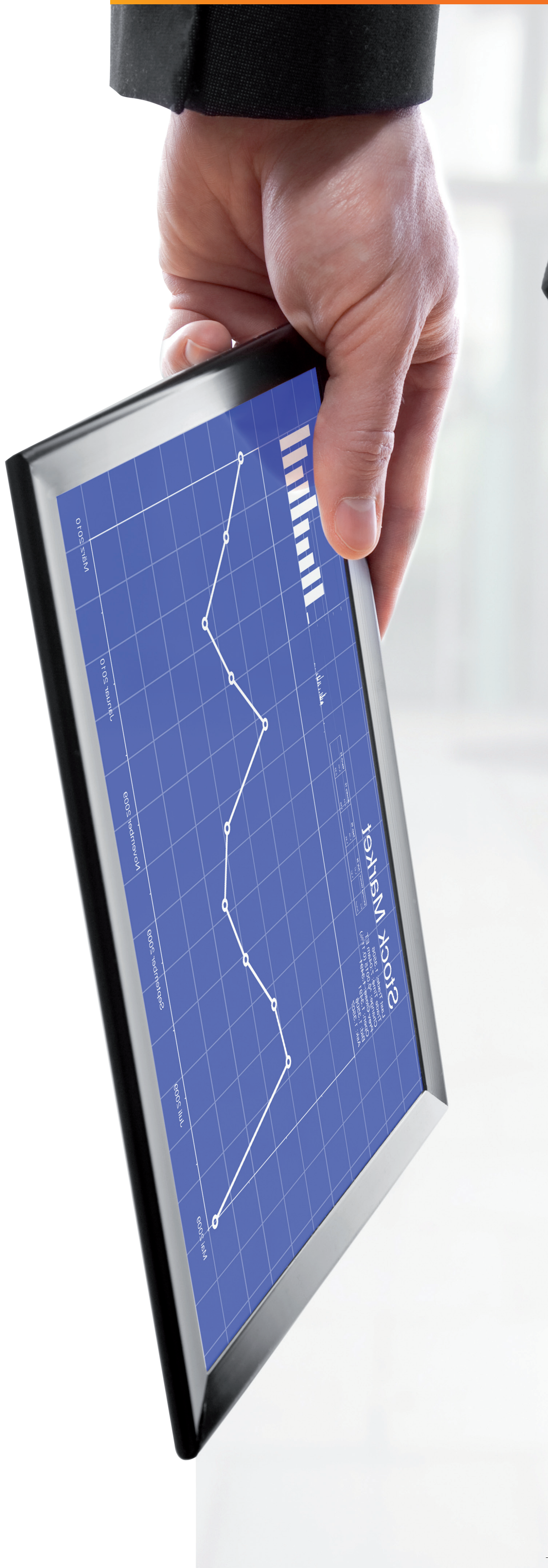
Our report indicates that Spanish retailers focus too much attention on malicious shrinkage caused by internal or external theft. This is exemplified in massive investments into traditional retail security measures. We propose that at the root shrinkage is caused by process failures. Badly designed processes at headquarters, warehouse or store are non-malicious causes that account for more losses than any other reasons. However, these causes are harder to spot and escape the vigilant eye. Fortunately, retailers possess a wealth of data around their assortments, ordering, replenishment, and selling processes that can be mined to reveal unusual patterns of losses. This requires that data is checked and systems are connected. New service providers have developed innovative capabilities to detect patterns in the terabytes of retail data. Importantly, the data analysis links the physical with the informational and the financial flows to reveal gaps. Our benchmarks with international retailers show how they systematically analyze their processes for leaks and breaks, and leverage their data flows across functions.

We propose a simplified loss prevention implementation pyramid based on European best practices. Given the important financial implications of shrinkage, it is imperative that the Chief Executive Officer and/or Chief Financial Officers are on board. Profit protection should be embedded in the daily routines of managers in a systematic process. Loss prevention leadership must have the capabilities to drive a data-driven approach to profit protection and operational excellence. Collaboration with third parties such as capable suppliers or innovative service providers is crucial. Store management responsibility must be strengthened because this is where shrinkage becomes visible and where the interaction with the shoppers occurs. We stress, however, that the store is often simply the end-of-the-pipe and the root causes of shrinkage are upstream at headquarters or even the supplier which underlines the need for broad collaboration.

1. Retail in Spain

Retail is an important part of Spanish economy. Some Spanish retail brands have achieved global fame and continue to be ambassadors for the fine Spanish culture and its businesses. However, the current global economic crisis continues to reduce growth and profit expectations for Spanish retailers. According to the Spanish National Institute of Statistics (INE), retail sales fell by 3.9% on average in 2012. At constant prices the decrease was even larger. Hypermarkets are particularly hit by this trend as shoppers reduce basket size in favor of increased shopping frequency or reduce spending altogether. Shopper also cut back on non-food items including clothing more than they do on food and daily essentials. With unemployment expected to remain high the outlook for the Spanish retail sector is not favorable.

Shopper enthusiasm measured by the Consumer Confidence Indicator (CIS) remains gloomy. As a consequence, retailers are looking to improve their already small margins and profit opportunities. Loss prevention is a profit opportunity that cannot be ignored. According to the Global Retail Theft Barometer (2011), Spanish retail ranks in the middle of 42 other countries with regards to shrinkage. Profit losses due to shrinkage have been estimated at nearly EUR 4.0 billion which accounts for 1.4% of retail sales (2011). This is a 7.7% increase compared to 2010 when it accounted for 1.3%. While the numbers are similar to those of other southern countries negatively affected by the economic crisis such as Italy or Greece they are higher compared to some northern countries such as Germany or Switzerland.



2. Defining Profit Protection

Profit Protection comprises a collection of methods and instruments to reduce shrinkage. While many definitions of shrinkage, shortage or loss of inventory exist, we have adopted in this report a very recent definition of shrinkage as "intended sales income that was not and cannot be realized" (Beck and Peacock 2009, 28). In other words, a company did not receive the income from the goods it has purchased that it originally expected. Increasing profits by reducing losses should be a priority for Spanish retailers as it can be considered a "low hanging fruit" in these difficult economic times.

3. Valuing Shrinkage

3.1 Size of the Prize

Over the past decade, dozens of studies on shrinkage around the globe have been undertaken by academics, associations, and consultancies. Not only do they differ in their methodologies, the same surveys produce varying results from year to year. Some of the discrepancies can be attributed to the choice of retail verticals (e.g. supermarket or fashion), country differences and changes in the economic climate. Therefore, previous academic studies on shrinkage in Spain have limited benchmark value (Nueno and Videla 2004). If we take a recent number from the Global Theft Barometer (2011) the global extent of shrinkage is 1.45% of retail sales and the global value is estimated at USD 119.1 bio. If take the overall average across many recent studies in order to compensate for the difference in measurement, the global extent of shrinkage is somewhat higher at 1.65% of retail sales (Beck and Peacock 2009). Our interviews suggest an even higher level of shrinkage for Spain of around 1.75% of retail sales. This we believe could be due to our broad sample of firms which includes fashion, furniture and other retail verticals.

While our number is undoubtedly fraught with measurement issues, it nevertheless suggests a value of more than the EUR 4.0 billion shrinkage for Spain reported by the Global Theft Barometer (2011) and certainly higher than the monetary value of shrinkage of EUR 1.2 billion recently published by AECOC. On top of this already staggering number, two additional costs of shrinkage must be added:

Costs of managing shrinkage: The Global Theft Barometer (2011) study estimates that European retailers spend on average 0.34% of their sales on Profit Protection. We can therefore conclude that the combined cost of shrinkage is at least 2% of annual Spanish retail sales.

Cost of lost sales: Shrinkage causes additional cost, e.g. extra labor cost to mitigate shrinkage or extra shipment and administrative cost to compensate for losses. But two areas stick out.

- **Cost of not-selling:** Defensive merchandising, i.e. locking up expensive beauty or electronic goods, lowers sales when shoppers do not ask staff to unlock these products and instead decide not to buy the product.
- **Cost of out-of-stock:** The extent of out-of-stock has been estimated to be globally at 8.3% and in Europe at 8.6% (Corsten and Gruen 2006). Shrinkage can cause out-of-stocks when demand for the product is not satisfied. Shoppers cancel or delay the purchase, substitute the product or leave the store when confronted with an out-of-stock. As the retail loss of out-of-stocks has been estimated to be around 4% for Europe, we can conclude that shrinkage causes additional cost of lost sales.

Judging the size of the prize it is clear that shrinkage cannot be delegated to a functional manager but must receive executive attention and responsibility must reside with the CEO or the CFO.

3.2 Buckets of Shrinkage

In order to reduce shrinkage we need to understand its sources. Until recently research converged to four broad "buckets of shrinkage" which also stood for the original definition of shrinkage (Beck and Chapman 2003; Beck and Peacock 2009; Global Theft Barometer 2011).

1. **Internal Theft:** This category refers to the unauthorized taking of goods by staff directly employed by the company (or working almost exclusively for the company e.g. guards or cleaners). Its worldwide shrinkage share in 2011 is estimated at 35.0% and the value at USD 41.65 bio (2011).

2. **External Theft:** This category refers to unauthorized taking of goods by customers or other non-company employees. This share is said to be 43.2% at a value of USD 51.46 bio (2011).

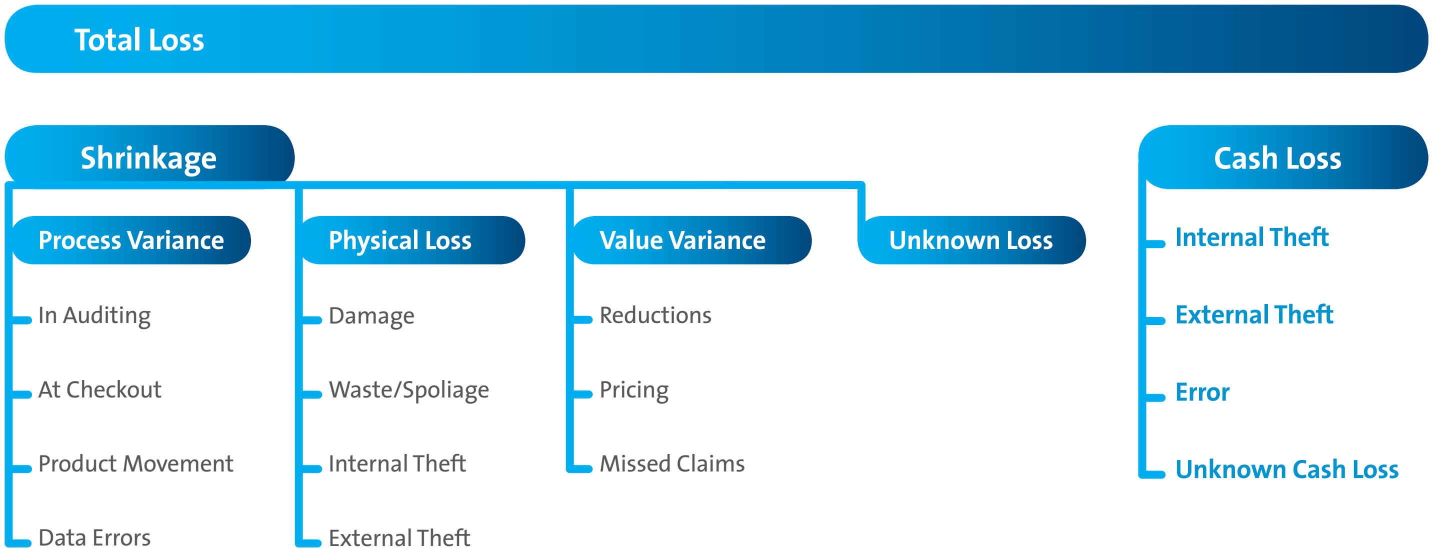
3. **Intercompany Fraud:** This category refers to losses due to suppliers or their agents deliberately manipulating product deliveries, receipts, or returns with the corresponding invoice and payment errors. The share is 5.6% and the value is USD 5.60 bio (2011).

4. **Process Failures:** This category refers to losses due to operating procedures within the company. Some firms use the term such as "administrative or paperwork errors". The share of such errors is estimated to be 16.2% and is valued at USD 19.36 bio (2011). According to the ECR Europe Working Group on Shrinkage this category has been consistently ignored or sidelined in favor of the other categories. But the scope of process failures is considerable as can be seen by the graph in the next page.

The above typology of the sources of shrinkage endorsed by the original ECR Europe Working Group on Shrinkage has proven to be very successful. However, it simplifies what is a relatively complex problem. Moreover, it over emphasizes the problem of malicious shrinkage - those types of shrinkage purposefully carried out by individuals or organizations intent upon profiting from loopholes in flawed processes and procedures (Beck and Peacock 2006). Propelled by a growing retail security sector, a great deal of retail attention and shrinkage budget has gone to reduce malicious shrinkage. Some of the Spanish retailers we interviewed spend almost their entire shrinkage budget on theft prevention.

In addition, the categorization tends to under estimate the amount of operational failures. A recent study by the American Food Marketing Institute into the 'causes and cures' of retail supermarket shrink indicates that 64% of store shrink is directly caused by a breakdown in or the absence of effective store operating best practices, while only 36% of store shrink is cause by internal, external theft and/or other misdeeds (FMI 2012). This result is in stark contrast to the numbers reported by more traditional shrinkage survey (e.g. Global Theft Barometer 2011).

The FMI study confirms that operational shrinkage is the #1 focus area for American retailers targeting lower store shrink as one of their top business imperatives. The study also analyzes the loss prevention and shrinkage control budgets of American retailers. It still finds a disproportionate allocation of budget dollars to technologies to "catch" theft versus budget dollars allocated to train of store personnel in effective store operating practices known to prevent shrink loss. However, 47% of companies report a growing shift in the role of loss or asset protection departments to focus more on operationally centric profit protection. The study also shows a growing trend toward collaborative partnership between loss or asset protection and store operations with shared accountability for shrink control (FMI 2012).



3.3 True Causes of Shrinkage

Recently a new typology for thinking about shrinkage was proposed by members of the ECR Europe Shrinkage Group that accounts for some of the issues around the previous conceptualization (Beck and Peacock 2006). At its centre is the idea of "Total Loss" which is made up of at least two elements - shrinkage and cash loss. Other elements can be added as seen fit, for instance, losses through counterfeit products. The typology puts forth four sub-categories of shrinkage (Beck and Peacock 2006):

1. **Physical loss:** This area comprises all causes that effect that stock cannot be sold at all by the business. It refers to the actual loss of goods within the business via the following factors.

   - **Damage -** Goods that have been damaged during the process of delivery, storage, and merchandising, which means they cannot be sold for any value. Examples: a pallet of sugar that is left outside in bad weather or cartons of washing powder crushed by a forklift truck.
   - **Wastage/Spoilage -** Products that have reached their expiration date or gone beyond agreed temperature parameters and are no longer safe to sell to consumers or staff. Examples: fresh meat and vegetables.
   - **Internal Theft -** Known incidents of theft by staff that have been recorded by the company. Examples: empty bottles of spirits found in the staff toilets or locker areas or detected incidents of non-scanning of items.
   - **External Theft -** Known incidents of theft by members of the public, including contract staff, that have been recorded by the company. Examples: items recovered from shop thieves that cannot be resold or empty bottles of product found in customer toilets.

2. **Value variance:** This category considers changes to the price of goods, meaning that the full price for those products is never realized. This category of shrinkage covers those causes of loss that refer to changes in the value of the product that mean that the original envisioned return is not realized.

   - **Reductions -** The original price of a product is reduced in order that the product is more likely to be sold, such as goods about to reach their sell-by date, have been partially damaged, or have been discontinued. Examples: ready-made meals close to their expiration date or end-of-line clothing.
   - **Pricing -** Losses caused by errors in the way in which goods are priced and sold in the business. Examples: goods coded incorrectly on the store inventory system or staff incorrectly pricing product in the back room areas or on the shelf.
   - **Missed Claims -** A failure to claim for refunds or rebates on items returned to a supplier. Examples: newspapers and magazines not sent back within an agreed time to the distributor.

3. **Process variance:** This category contains those causes that can be categorized as being created by the flow of goods and information throughout the supply chain. Its elements relate to processes that impact upon the movement of goods and information through the business and the way in which they are monitored and accounted for.

- **In Auditing -** Errors, such as stock being incorrectly counted, in the audit process during annual stock checks and periodic cycle counts. Example: incorrect counting of packs of batteries that are located at multiple locations within a store or distribution centre.
- **At the Checkout -** Errors occurring at the point of sale that lead to a discrepancy in the store book stock. Examples: a checkout operator entering the wrong code for a product or not scanning free products as part of a promotion.
- **Product Movement -** Errors generated by the flow of goods within the business, in particular, in the receiving of goods, the transfer of goods, and returns or refunds. Examples: shortages in deliveries to a store directly from a manufacturer or a distribution centre or transfers to others stores incorrectly recorded.
- **Data Errors -** Errors in the recording of stock on company systems. Examples: retail buyers or suppliers incorrectly inputting item set up details that lead to stores receiving fewer items than identified on the system or promotional items that are not correctly associated with the book stock database.

4. **Unknown loss:** The final category captures shrinkage for which no evidence suggests its cause. By their very nature the causes of unknown loss are not apparent to an organization, but they can be characterized as either losses of physical product or the loss of value that the organization might have received for the sale of the goods. There is little value in trying to guess what may be the causes of unknown loss. The important aspect of this type of shrinkage is to develop ways in which the amount of unknown losses can be minimized and/or converted into known losses. The percentage of shrinkage that is unknown compared with known should be a key performance indicator for any organization. The results from the ECR Europe Working Group on Shrinkage showed that 51 percent of shrinkage was unknown compared with 49 percent that was known.

The second main element of total loss is "cash loss", which comprises four areas relating to the receipt, movement, storage, and processing of cash within the business.

- **Internal Theft -** Cash that is stolen by employees. This could take many forms including the direct theft of cash from the register or cash office, exploitation of the refund/reduced price system, abuse of a loyalty card system, and theft of retail vouchers.
- **External Theft -** Cash that is stolen by members of the public. This can take the form of overt physical intimidation and the threat of violence at the front end or cash office, such as register snatches or armed robbery, or more subtly through the exploitation of the company's returns policy, such as returning goods that have been previously stolen.
- **Error -** Non-malicious mistakes made in the counting, auditing, and transfer of cash within the business.
- **Unknown Loss -** Loss of cash that cannot be accounted for through internal and external theft or errors in auditing or transfer of cash.

This new typology has several advantages:

- **It recognizes that shrinkage is much more than just the theft of stock.** It is a resolutely complex and interwoven problem that transcends company and departmental boundaries and requires a much more multi-faceted and coordinated approach to its successful management.

- **It proposes categories of shrinkage can be easily measured and recorded by the business;** the "unknown category" by a simple process of deduction, meaning if the other numbers are known, the remaining losses must be unknown.

- **It enables retailers to more readily identify the root causes of shrinkage** within their organizations and subsequently develop practical solutions to respond to them.

- **It can be easily adapted to meet the varying challenges faced in different organizational settings and locations,** such as stores, distribution centers, or manufacturer production plants.

To date, much of the loss prevention world has been dominated by a focus on external theft characterized by a reactive °security-oriented approach. What this new typology does is emphasize the many and varied components that make up shrinkage, the vast majority of which have little or nothing to do with catching thieves. This requires loss prevention professionals to fully understand the retail processes, for instance, using the plethora of data available in retail, and develop solutions that may be much more about effective and robust retail procedures than they are about tagging goods and arresting shoplifters.

4. Current Practices

While the new categories of shrinkage help to understand its root causes, due their novelty we have not been able to collect detailed information about its elements. We therefore organize the results of our interviews with Spanish retailers following the idea of a simplified value chain with “stores” and “headquarters”.

4.1 In-Store

Internal Theft: Most Spanish retailers identify internal theft as the second biggest cause of loss of margin. While some retailers report higher internal theft, others believe that, with the current crisis and rising unemployment, employees are more fearful of losing their jobs and have reduced fraud attempts on their part.

Retailers increasingly invest into specific technology to prevent cashiers from colluding with a third party to pass unpaid merchandise at the cash register. This includes cameras that count the number of items passing through or weigh platforms that control the weight of the products and compare this with the receipt and the weight of the master data files or systems that measure the processing time between items or clients. However, it seems as if these new technologies systems were not yet fully reliable as retailers report a number of errors and slowdown in sales that hardly justify the investments. Many retailers put forth that the most cost-effective method continues to be to simply measure an employee’s labor productivity at the cash register. However, with large number of staff this practice is difficult to implement and also prevents the store managers from interacting with shoppers.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Shrinkage at Spanish Retail Stores

Spanish retailers agree that the most stolen items are the ones that are closest to liquidity and can be easily re-sold on the black market. This applies to pieces of ham or cheese, or bottles of alcohol, which can be sold to bars, or branded cosmetics that can be sold at flea markets.

Shoppers sometimes try to lower the price for an article by exchanging its ticket with a cheaper variant or to return it at another store with a more expensive ticket. An example would be to replace the price ticket of expensive beef with ticket of a cheaper variant. A more sophisticated method is to buy an item and scan the ticket. The item is returned. Later the article is stolen and again returned submitting the false ticket. This practice is attractive because the thieves receive cash instead of merchandise.

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International Best Practices at Store Level

Overriding Pull Orders and Increased Out Of Stock: Profitect, a software company specialized in retail loss prevention, once identified a pattern of increased out-of-stock for a store. The pattern consisted of an increase in pull order overrides to compensate for out of stock merchandise. An opportunity was created for the store with the following best practice recommendations:

- Review override policy with store manager
- Review stock room to ensure compliance with storage management policy
- Identify actual inventory level of product within store

As it turns out, the manager of a store was not properly managing stock room and did not have the space to store the overstock from the original order. The store manager overrode the order and reduced the size of the shipment, resulting in the need for increased pull orders when the product was out of stock.

As a result, a task was created to monitor the number of pull orders completed by the store. The manager was also instructed on proper storage procedures to be able to properly handle allocated overstock. The identified opportunity resulted in an 82% decrease in out-of-stock and a 4% increase in revenue.

4.2 Headquarters

Our interviews indicate that most Spanish retailers focus their loss prevention downstream on the store rather than on the upstream supply chain and the central office. For the purpose of this report we group all non-store upstream related shrinkage under the header headquarters. This is clearly an over-simplification but we want to make the point that too much effort is spent fixing shrinkage at the “end-of-pipe” rather than at its source.

Warehouse: We found that losses that are caused in the warehouse represent only a minority of shrinkage. However, many retailers have pointed to the risks of good faith “blind” receiving, when the merchandise is supplied by a vendor without double-checking whether the goods received truly match the dispatch note. Similarly, differences can occur between warehouse and store inventory when only sample counts are practiced.

International Best Practices

Items shipped but showed no sales in majority of stores: Profitect, a software company specialized in retail loss prevention, once identified a pattern of a seasonal fashion item that had been shipped to stores in the past 72 hours (on-hand) but showed no sales in more than 75% of the stores of the same format.

- An opportunity was created for the merchandiser with the following best practice recommendations:

- Contact the warehouse to discuss potential mis-picking issues

- Notify stores to re-label the products

- Change UPC / product details in the UPC maintenance system

As it turns out, the items in the warehouse were kept in a wrong lot number and as a result, the wrong items were picked to be shipped and the store received items that are not the intended items. The store blindly received the merchandise without knowing that the items should be in the store. The systems showed that the right items were shipped to the stores but it was actually a wrong item that was shipped. As a result, a task was created to the warehouse to check and correct any misplaced merchandise and to expedite shipments of the right items to the stores. The identified opportunity resulted in a quick turnaround of a warehousing issue affecting the sales of a very seasonal item that without this insight would result in lost sales of more than $100K.

Headquarters: Our research reveals that perhaps counter-intuitively, shrinkage at the store level has its roots often upstream at headquarters. This represents a paradigm shift in loss prevention as previously most blame was put onto the store. While we don't want to free store management from its responsibility, a thorough process analysis with the support of advanced pattern recognition techniques reveals how badly designed upstream processes lead to losses that become apparent only downstream at the store front. Unfortunately, many retailers still focus too much on the store and have not developed the capabilities to root out shrinkage at the upstream source.

International Best Practices

High return of a new product in majority of stores: Profitect, a software company specialized in retail loss prevention, once identified a pattern of a new product with return rate greater than 20% compared with other new products in majority of the stores within 7 days of initial ship to store.

- An opportunity was created for the merchandiser with the following best practice recommendations:

- Recall the products immediately to the return center to avoid brand image issues.

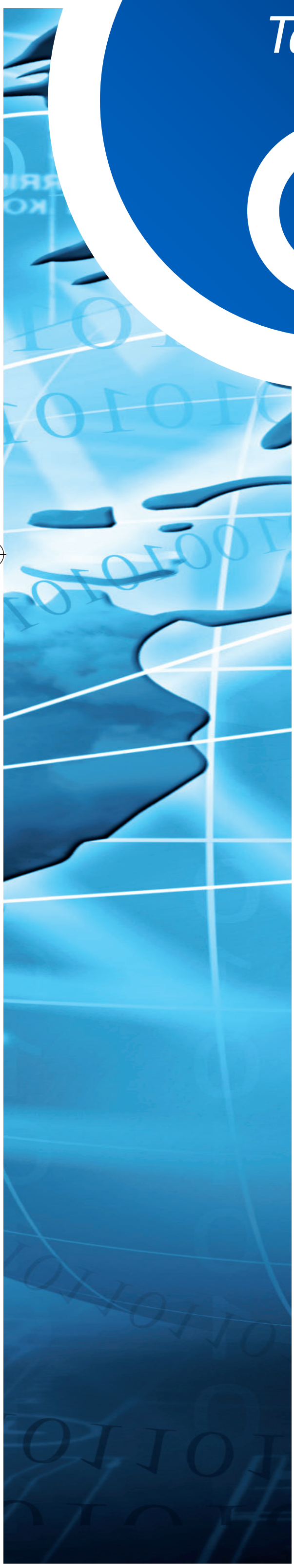
- Re-label sizing to represent true fit.

- Re-label garment care instructions.

- Contact quality assurance team to notify of product issue.

As it turns out, the product was missing the right washing instructions in the garment care label which caused consumers that bought the product to return it to the stores after the garment was affected by the home washing process. As a result, a task was created to the stores to attach additional instructions to the existing garment care label on all the current merchandise that is in the stores. A similar process was followed for the merchandise that was in the warehouse and a notification to the manufacturer was sent with correction instructions. The identified opportunity resulted in a quick action taken by the stores, warehouse and manufacturer to significantly reduce the amount of products returned by consumers. The returns of this product were reduced by 78% in the following weeks after the corrective actions, saving the product and turning it into a major success.

5. International Best Practices



5.1 Target

A few years ago, the shrinkage team at Target faced an increasingly complex business. The team was at risk to becoming less relevant to the business and needed to think differently on how to get their job done, specifically on investments in human capital and systems.

However, the team then turned around and successfully developed an innovative approach to Shrinkage. Matt Parish, the leader of Target's efforts to reduce shrinkage, increased the scope of loss prevention based on his experience in store operations. Instead of narrowly defining loss prevention as theft or spoilage he reframed the business issue as any measure that could help increase store profitability. He then adapted existing store management tools and developed new tool such that they could be applied by headquarters to a broad concept of Profit Protection.

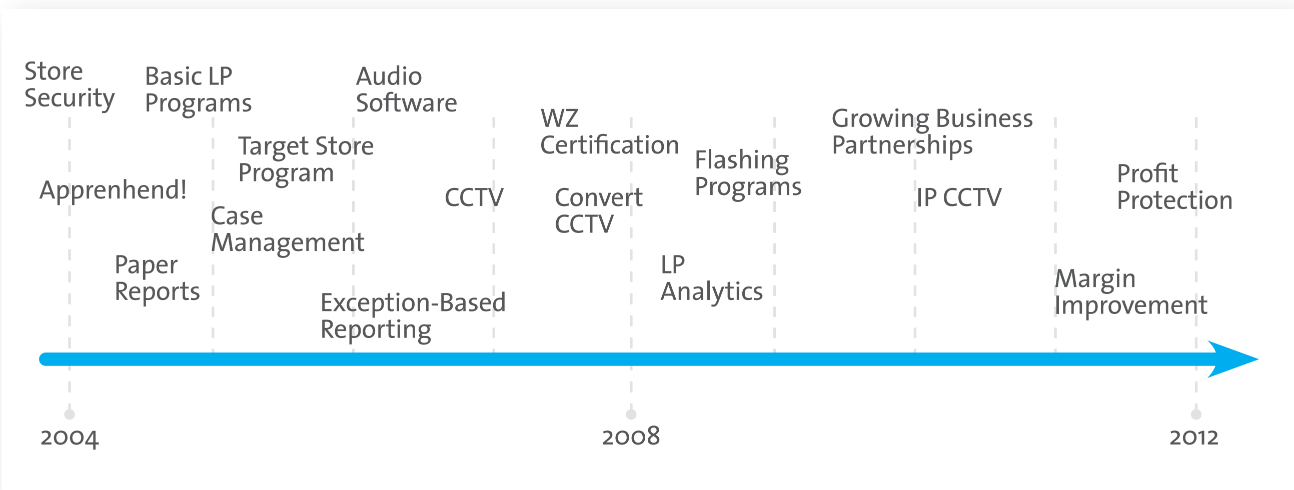
The collaboration with Procter & Gamble, the branded goods manufacturers well known for its loss prevention approach, allowed Target to benchmark its ideas against ECR Europe's best practices and changed the way they approached shrinkage. The first years of collaboration were process-driven, trying to understanding the sources of shrinkage. Recently, Target started systematically leveraging its IT-systems. For instance, Target previously used the data and systems around replenishment primarily to keep the stores in stock. But then they realized that the information flow around ordering and replenishment linked back into both physical and financial flow and that the flows must not be treated separately but as one. For instance, Target now systematically monitors the flows around inventory adjustments, receipts adjustments, and item data accuracy. It now identifies the sources of shrinkage proactively and creates more value by better solving business problems. Over time, Target has applied the learning to many other categories including soft goods such as apparel. Target's key lessons include:

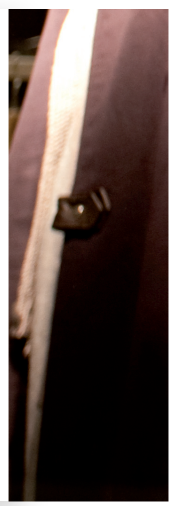
- Shrinkage is too important to be left to the traditional, lower-level loss prevention function.
- Profit Protection must include all areas in the supply chain: store (retail), storage (logistics), order (customer), suppliers (purchases).
- Profit Protection has to be raised as a cross-functional, systematic approach and requires systems and processes that link physical, informational and financial flows.
- Profit Protection requires new capabilities in particular process-thinking and advanced statistical and analytical capabilities.
- Profit Protection needs executive support ideally by the Chief Financial Officer who understands the link between the three flows.

5.2 *Abercrombie & Fitch*

Abercrombie & Fitch, the US-American retailer of casual wear for young shoppers, realized that the traditional methods with which it had been trying to reduce shrinkage since 2004 were reaching their limits. Inventory data was collected only twice per year. Data was held in multiple systems that were not networked and had to be manually consolidated. Data analysis was mostly Excel-based and therefore inefficient. Therefore, data visibility was mostly at the style-level instead of SKU-level. Data was often outdated and much time was lost in model building.

As a consequence they were looking for a new action-based approach to loss prevention. Their vision was to no longer react to shrinkage but to prevent losses using predictive analytics. Building on the foundation of their systematic process they added a layer of data analytics and pattern recognition. First, they consolidated their data so that pattern seeking and analytics would be possible within one application. Then, they added automatic key performance indicator trending, monitoring and alerting. This allowed them to identify potential and actual losses with a fine-granular visibility that they did not have before. Early on the A&F loss prevention team was assured the support of the Chief Financial Officer and the Chief Information Officer. While the latter led the implementation of the new





technology, the former helped prepare the business case for the new fact-based margin improvement system. With a reasonable and attainable return on investment, the business case was convincing and successfully implemented. Guided by the philosophy that there is more to loss prevention "than finding thieves and bad guys," the team used the new approach to find new areas of profit improvement. Looking at the detailed rather than aggregated data, and leveraging pattern seeking technology, they quickly uncovered, for instance, that spoilage was a shrinkage shelter that was waiting to be reduced. A good example was the case when they found in one store $1,800 worth of damaged goods in one single shift. The system pointed to a new associate who had not been properly trained and didn't know how to put the EAS tags on the shirts. After proper training, as the system recommended, the issue disappeared. Another area for improvement was the "value visits." Today when the field manager is going to visit a store, she knows exactly what the areas are where the store is trending in the wrong direction. The store doesn't even need to be in the "red" zone to be visited. Abercrombie & Fitch now starts visiting stores they never visited before, because although they are still in the "green zone", certain trends indicate areas where loss prevention and operational excellence can be improved to increase sales and improve bottom line quickly. These are just a few examples of many more benefits that the innovative Loss Prevention team at Abercrombie & Fitch has accomplished in a very short time.

6. How to Implement

The ECR Europe Working Group on Shrinkage (Beck and Chapman 2003) has proposed a framework for reducing shrinkage termed the Loss Prevention Pyramid. Our interviews support the principles of this pyramid with a few variations which we will detail below.

Strategic Factors: The three strategic factors at the bottom of the pyramid are the bedrocks of success.

- **Senior Management Commitment:** We found that in many firms shrinkage does not receive the necessary board level support that is necessary for effective implementation. However, global best practices confirm that board level involvement is paramount.
- **Organizational Ownership:** We found that in many Spanish firms the traditional functions of security, shrinkage and crime-related activities, such as guarding are the sole preserve of one department – security or loss prevention. Such a narrow view ignores the cross-functional nature of process failures and will always lead to inferior results compared to an approach where all shrinkage related activities are bundled and ultimately report to the company board.
- **Embedded Loss Prevention:** Many firms we interviewed did not have a systematic process for reducing shrinkage and therefore deployed measures with varying rigor. Our benchmarking reveals that Profit Protection must be embedded in the daily routines of all departments following the principles of effective process management.

Organizational Factors: These factors can be influenced by the Loss Prevention Department and influence their daily work with other functions.

- **Loss prevention leadership:** The key to the success is to have the right manager in place. The responsible manager should be able to develop a vision and effectively communicate it to all levels of the hierarchy. He should have deep operational knowledge and a passion for detail – never forgetting that "retail is detail".
- **Data management:** Our best practice examples demonstrate clearly that with the increasing data volumes in retailing information technology is paramount. However, we found that in many firms neither IT managers nor Shrinkage managers were aware of the latest developments in software for pattern recognition that can identify potential sources of shrinkage.
- **Operational Excellence:** While operational excellence is a well known discipline of leading industrial firms, many retailers have not yet developed a rigorous system of process management. Best practice retailers, however, have either hired industrial experts or trained their managers in the respective process management techniques.

Profit Protection

- **Collaboration:** Since the sources of shrinkage cross boundaries any effort to reduce loss prevention must do so as well. The continuous flow of products, information and moneys requires that functions within a business must work together to identify shrinkage patterns. Equally important, retailers must work together with their suppliers who can influence some of the latent sources of shrinkage, such as packaging or master data issues. While soft goods retailers must train theirs often smaller suppliers with regards to loss prevention several multinational suppliers have developed notable capabilities in loss prevention that can help retailers jump-start the journey.

Operational Factors

- **Store Management Responsibility:** While process failures can cause shrinkage across the whole value chain the store remains the hotbed of retail losses. Our interviews confirm that the way in which a store is managed is the key factor in explaining why some stores have higher rates of loss than others. It also shows that proper training, technology and accountability can turn a “hot store” (meaning a high-shrinkage store) into a low shrinkage store.

7. Viewpoint Ernst & Young

Driving for agility and resilience

Consumer products companies may have weathered the global economic slump better than other sectors. But agility and resilience will be critical if they are to build on their relatively strong position, surmount the challenges and seize the opportunities that now lie ahead.

The recession has changed the consumer landscape, possibly irrevocably. Value is now engrained in the psyche of almost all consumer groups. Trading down will continue in many categories, private label is set to grab further market share and volume recovery will be uneven across different categories and territories.

Retailers have also turned up the pressure on manufacturers by negotiating harder, sometimes across international borders, rationalizing their product ranges, seeking even leaner inventories and increasing sustainability demands.

With risk levels on the rise, whether from regulatory pressures, issues around product safety, or increasing complexity from extending supply chains, there is a constant pressure to deliver bigger and better innovations. Leading companies are already starting to move beyond the easy wins in cost savings and in some cases are beginning to implement new operating models that have the flexibility to respond to change, and the resilience to enable sustainable growth.

As markets recover, and mergers and acquisitions come front and center stage once more, it is clear that the future is a complex balance of risk and opportunity. We believe that the scale and complexity of change facing the industry will make getting ahead and staying there a challenging and hazardous task, even for the leanest and sharpest organizations.

In Ernst & Young we believe that industry focus is critical if we are to deliver outstanding service. That's why we have created a Global Consumer Products Center to harvest the best of our knowledge and to share leading practices with our clients. We also invest in developing the 10,000 people who work in this industry and in turn they invest in building relationships with our clients. Together, these investments enable us to understand our clients' agenda and generate tailored ideas and insights that keep us relevant.

Consumer products is a principal sector for Ernst & Young and our fourth largest by revenue. That means it enjoys the sustained and focused attention of our global leadership team and attracts the significant level of investment needed to run our Global Consumer Products Center.

We are committed as an organization to invest in this sector so that we can help our clients develop and retain a leading position by:

- Anticipating market developments and trends, assessing the implications and developing effective strategies to help our clients address the challenges of tomorrow, today.
- Providing our clients with insights and leading practices around the world to help them make decisions better and faster.
- Investing time with our clients' organization to hear their concerns and get right to the heart of the issues that have the capacity to limit or extend the value in their business.

SERGIO GARRIDO

Partner - Advisory Services Ernst & Young

Sergio Garrido is a partner in the Advisory Service Line of Ernst & Young, based out of our Madrid Office in Spain. He has more than 20 years of management consulting experience in different industries such as Construction & Infrastructures, Travel & Transportation, Industrial Equipment or Natural resources. He also has relevant experience in transformation projects for the Retail and Consumer Goods sectors.

He has a strong background in Treasury Management, Shared Services, F&A outsourcing, Back Office Transformation, Working Capital, Cost reduction and Enterprise Performance Management projects.

Sergio holds a degree in Economics and did post-graduate studies at the European School of Management (ESCP-EAP) and at the Kellogg Graduate School of Management (NorthWestern University).

8. Viewpoint Profitect

With consumers more knowledgeable and searching for the best value, retailers must evolve quickly to stay competitive in the changing global retail environment. Many organizations are doing everything possible to utilize their current resources in order to keep expenses low and at the same time boost sales. Retailers must identify new ways to continuously improve margins and same store sales.

Whether downstream at the store or upstream in the supply chain, margin expansion can be achieved through identification of root causes contributing to lower profits, followed by actionable solutions. Left untouched, margin expansion will not be achieved and the profit opportunities will remain theoretical.

Issues affecting the ability of retailers to deliver the most value to consumers can often be impacted by upstream supply chain issues. Identifying challenges will often rely on the talent of employees to properly interpret the data. With high employee turnover and unique ways of thinking, each employee may have a different understanding, leading to inconsistencies in the course of action.

Profit amplification is the way to expand margins by focusing on revenue increase and cost/loss reduction opportunities to enhance the customer experience, increase overall top line growth, and impact upstream and downstream store operations. Patterns that "tell a story" are used to identify and resolve issues relating to inventory distortion, on-shelf availability, shrink/waste/damage, or process compliance. Automatic actions guide retailers, step by step, to quickly increase profits at all levels of the organization. This resulting efficiency of managed tasks and reduced associated labor costs will improve critical Key Performance Indicators (KPI's) and quickly prevent profit leakage throughout the organization.

Guy Yehiav
CEO, Profitect

9. References

Abercrombie & Fitch (2012): Presentation by Dennis Klein, VP Loss Prevention, RILA 2012 http://growprof.it/HY1GQy)

Beck, Adrian and Paul Chapman (2003): *Hot Spots in the Supply Chain*, ECR Europe Group on Shrinkage, Brussels

Beck, Adrian and Colin Peacock (2006): *Redefining Shrinkage - Four New Buckets of Loss*, LP Magazine July 2006, http://goo.gl/hVQ40

Beck, Adrian and Colin Peacock (2009): *New Loss Prevention: Redefining Shrinkage Management*, Palgrave MacMillan.

Centre for Retail Research (2011): Global Theft Barometer, Nottingham

Corsten, Daniel and Thomas Gruen (2006): *Desperately seeking shelf availability: an examination of the extent, the causes, and the efforts to address retail out-of-stocks, International Journal of Retail & Distribution Management,* (31), 605 – 617

Food Marketing Institute (2012): *National Supermarket Shrink Survey*, Arlington http://goo.gl/8ZWUO

Nueno, J.L., Videla, Petro (2004): *Impacto de la Pérdida Desconocida en la Distribución Comercial Española*, IESE

Target (2012): Interview with Matt Parish, Head of Loss Prevention, Target Corporation, US

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