

# **THE DRIVERS OF PRODUCT RETURNS IN UK HIGH STREET RETAILING**

**Mike Bernon and Professor John Cullen**

## **INTRODUCTION**

This paper forms part of a wider piece of research funded by the Department for Transport and undertaken by a collaborative team including the Chartered Institute of Logistics and Transport (UK), Cranfield School of Management and Sheffield Hallam University. At its inception, the motivation for this study arose out of increasing awareness of the need to encourage 'sustainable development' both in terms of achieving economic growth whilst at the same time maintaining environmental protection and social progress.

Product returns and the resulting need for reverse logistics potentially have an impact on sustainability in a number of ways. However, there was little research in the UK that established the size of the problem and therefore one of the main aims of the research was to quantify the current levels of product returns experienced by UK retailers. A further aim of the research was to explore current reverse logistics practices and to evaluate the impact on sustainability.

As part of that research, the focus of this paper is on the drivers of product returns for UK high street retailers. The body of knowledge surrounding supply chain management centres on the efficient and effective flow of products to the market place to meet consumer demand. However, there is little understanding of the drivers of product returns and how the decisions made by upstream operations in the supply chain can have an impact on the level of returns experienced.

To provide an indication of the scale of the problem, the following figures are extracted from our postal survey. In 2002, total UK retail sales amounted to £230.5 billion. Most of the organisations in our survey reported returns of between 1 and 5 percent of their sales value. Taking the mean of a middle figure of 2.5 percent, this represents £5.75 billion of goods being returned.

In some areas, for example catalogue retailing, returns can be around 30 percent (and even higher). Given total UK retail sales through home buying of £9.33 billion in 2002, returns at 30 percent represent £2.8 billion of goods being returned. Internet shopping could also result in similar levels of returns. Our study suggested returns for durable products, (i.e. non perishable goods such as TVs, fridges, etc), were estimated to be 4 percent. Given total UK sales of durable products in 2002 of £79.9 billion, a returns figure of 4 percent would give a returns value of £3.2 billion in that product area. Returns in the book industry appear to be between 10 and 20 percent. Given UK sales of £ 3.46 billion in 2002, even at a conservative estimate of 10 percent, this would represent returns of a value of £346 million. Returns in the music and entertainments industry average at around 10 percent. Given a sales figure of around £2.0 billion, returns at 10 percent represent a returns figure of £200 million.

The survey also indicated that the percentage of logistics costs associated with handling returns as a percentage of total logistics costs could be around 5 percent. This would tend to support other studies undertaken in the area. A number of sources give an estimate for total UK retail distribution costs to be in the order of £10 billion. Therefore the logistics costs for handling product returns is approximately £500 million for the UK retail sector. If an integrated supply chain approach is taken to the management of returns, the opportunity for companies to reduce these associated logistics costs could be in the order of 20 to 40% (£100 - 200 million). Even this may underestimate the full potential for improvement since most companies do not measure the total opportunity costs associated with product returns.

#### **RESEARCH APPROACH ADOPTED**

In order to triangulate evidence from a range of sources, the empirical work involved collecting data using three different approaches. Case study evidence was obtained from three organisations, a leading grocery retailer, a general merchandise retailer and a publishing company (together with their distributor). Semi-structured interviews were undertaken with appropriate managers at each of the case study organisations. The case studies have been used to provide a detailed understanding of the processes involved in the management of reverse logistics in the organisations being studied.

## ***The Drivers of Product Returns in UK High Street Retailing***

---

A postal survey was also sent out and usable data was received from 15 organisations covering a range of different size organisations operating in different parts of the retail sector. Responses were received from organisations involved in catalogue retailing, supermarkets, electronic durables, pharmaceuticals, automotive, footwear, apparel and distributors. Findings from the survey, in addition to publicly available information about annual sector sales value and logistics cost figures, were mainly used to inform our view of the scale of the issue.

Finally, an industrial focus group was held with members representing grocery, catalogue shopping, consumer electronics, entertainment, book publishing and third party logistics providers. Additional material obtained at the focus group allowed us to verify many issues and also gave us additional insights into some potential opportunities.

### **ESTABLISHED DRIVERS OF PRODUCT RETURNS**

There are a number of recognised drivers of product returns. The following section describes some of the more established ones.

Often, the customer is seen as being a main driver of product returns. Consumer legislation protects buyers from products that do not meet minimum statutory requirements. The Sale of Goods act 1979, Supply of Goods and Services Act 1982, Sale and Supply of Goods Act 1994, The Sale and Supply of Goods to Consumers Regulations 2002 are examples of legislation designed to protect the consumer from less than perfect quality merchandise. As a consequence, consumers are a driver of non-conforming product returns. However, for many supply chains, consumer returns form only a part of the total returns.

In grocery retail, the shelf life will often govern the duration a product can remain available for sale in store. Retailers deal with obsolete stock in a number of ways. For short life products, such as fresh produce, it is common simply to dispose of the goods once the shelf life has expired and, therefore, none of the value of the product is recovered. In the clothing and fashion industry, mark-downs and sales are commonly used to sell over stocked and out of season product. Although a nil or lower margin may be the result, at least there is some working capital recovery.

For other products, agreements may be in place for the retailer to return goods to the original manufacturer. A sale or return contract or a returns allowance, (which enables a quantity of product to be returned to the

manufacturer; normally calculated as a percentage of total purchases), will allow the retailer to return unwanted stock for credit.

Reverse logistics can enhance customer service. Customers consider returns policies when making purchasing decisions. If a firm makes its returns' policies more restrictive while its competitors continue to offer liberal returns' policies, the firm will have placed itself at a competitive disadvantage (Rogers et al, 2001). Christopher, (1998) demonstrates that the whole purpose of logistics strategy is to provide customers with the level and quality of service that they require and to do so at less cost to the total supply chain. One key economic element, driving the development of reverse logistics, is also from the perspective of customer service. For example, Van Hillegersberg et al, (2001) indicates that a trend contributing to the growth of return flows is the growing perception of physical products as part of the service package, which may include repair and maintenance contracts, as well as services enhancing the pleasure and comfort of using the product.

Reverse logistics plays an important role in keeping inventory "fresh". If a retailer's inventory is filled with old or slow-moving SKUs, it is in the manufacturer's best interest for the retailer to remove this product from inventory and replace it with a newer, more desirable product. "Cleaning the channel" in this way is regarded as one of the critical ways to utilise reverse logistics capabilities (Rogers et al, 2001). This argument is also supported by Daugherty et al, (2001), who conclude that the strong correlation found between the achievement of reverse logistics programme goals and overall programme effectiveness has direct benefits for the firm on a global or strategic level. Direct benefits such as more effective utilisation of inventory will be reflected in the company's financial statement.

In a competitive environment, a company may recover to prevent other companies from getting their technology, or from entering the market (De Brito et al, 2002). A good example is provided by Dijkhuizen, (1997), who presents IBM's repair network. The protection for its own service part contributes to deciding where to repair the products either within each country, or at one central European location.

A company may deploy reverse logistics in order to obtain a good environmental image with the customer or to enable better customer relations. Having such an image can be part of a customer relationship strategy, especially due to the increase of environmental consciousness

## ***The Drivers of Product Returns in UK High Street Retailing***

---

by society as a whole (De Brito et al, 2002). This is also supported by Daugherty et al, (2001). They conclude that the strong correlation found between the achievement of reverse logistics programme goals and overall programme effectiveness has indirect benefits for the firm, such as better corporate image or improved levels of customer satisfaction. Whilst not immediately apparent from a monetary perspective, these factors are also important to the continuing success of the organisation and customer relations.

### **RESEARCH FINDINGS**

As mentioned above, the main driver of product returns is often seen as a consequence of consumers returning faulty products; however, when we examine the way in which companies manage their supply chain operations we find that there are many internal drivers that lead to product returns. The research found 10 internal drivers that led to product returns.

#### **Forecast Accuracy and Demand Variability**

One of the most recognised drivers of obsolete stock is caused by 'make to stock' or 'push' supply chains. In this scenario, where lead times to supply are longer than consumers are prepared to wait for delivery, producers are obliged to forecast demand and manufacture goods to hold as finished stock. Any imbalances that exist between the forecast and true demand will lead to either a stock out situation or over supply. The latter potentially leads to the need for reverse logistics to return the unsold goods.

#### **Promotional Activity**

In FMCG environments, marketing through the use of short run promotional activity is prevalent. Promotions typically lasting for a limited period are generally related to price discounts or product offers such as, 'buy one get one free' (BOGOF), larger pack size for the standard price, or a free gift attached to the product, such as a free CD with a journal. Due to the short promotional period, it is difficult to forecast the sales accurately and hence major overstocking can occur if a promotion does not meet anticipated demand.

#### **New Product Introduction**

For some markets the success of new product introduction (NPI) is also difficult to determine. In the music industry, the sales of the release of a new single may be almost impossible to accurately predict. In addition, to support the introduction of a new product in-store, promotional material may include the use of the product itself. For example, in book

retailing, a new book title may be promoted by stacking a large quantity of the book at the point of sale to attract customers' attention. The volume of books held in such a display may represent many weeks worth of sales.

#### **Product Range and Safety Stock Policy**

The product range and the associated number of different stock keeping units are also a driver of returns. Consumer expectations of choice means that companies will provide a wide range of stock keeping units (SKU's) within each product category. Brand extensions that drive additional SKU's require safety stock to be held for each SKU. The amount of safety stock is based upon the level of service offered in the market place but will inevitably lead to some SKU's being overstocked.

#### **Product Life Cycles**

Product life cycles are shortening and the risk of obsolescence is becoming a major supply chain strategy for providing competitive advantage in markets such as electronics and high tech (E&HT). The first mover advantage means that in some cases companies may now adopt a strategy to make their own products obsolete before their competitors do. If companies that adopt this approach do not have agile and responsive supply chains, they will experience high levels of product returns.

#### **Logistics Trade-Offs**

For a number of products, the economics are such that the cost of manufacturing and logistics are low, compared with lost revenue from not having on shelf availability. Research has shown that for FMCG, consumers faced with a stock out situation will undertake a number of buying decisions, including brand substitution (Christopher, 1992). In these contexts, the supply chain may operate to ensure that supply, on aggregate, is higher than demand. This leads to excessive stock holding in retail outlets, which has to be returned at some later date.

#### **Purchasing Policies**

Purchasing policies can also have an impact on the amount of returns. Products will often be purchased well ahead of seasonal demand, either due to long lead times or to gain quantity discounts for placing large orders with suppliers. Although the purchasing policy is designed to minimise the price paid for goods, often this does not take into account the costs of dealing with returns by the logistics function. The

## ***The Drivers of Product Returns in UK High Street Retailing***

---

consequence is that when demand does not meet supply this leads to obsolete stock holding.

### **High On-Shelf Availability**

A prime measure of supply chain performance for retailers is on-shelf (OSA) availability. To achieve superior performance some retailers may keep high stock levels at both the retail outlet and distribution centre. Overstocking to achieve high OSA can lead to high returns of obsolete stock.

### **Cash Flow Management**

The trading terms that exist between retailers and manufacturers will include the commercial arrangement for managing returns. In some sectors such as the book and entertainment industry the returns policy is extremely liberal with clauses that can allow retailers to return unsold products to manufacturers for up to twelve to eighteen months.

Some retailers may take advantage by returning goods to manufacturers for credit to enhance their cash flow position. In some instances this has led to a product being returned in one week for credit, only to be ordered for re-supply the following week.

### **Customer 'No Fault Found'**

A high level of products that are returned by customers are found to have no problem and termed as 'no fault found'. One catalogue retailer reported the level of 'no fault founds' to be in the region of 30 percent of total returns. The problem is linked to the liberal returns policies that companies offer to customers. However, if the products still need to be quality checked, repackaged and returned to stock this represents a significant cost. For many 'no fault found', items, the costs to take the product back to grade A for re-sale is uneconomical and therefore it will be sold at a significantly reduced price to Jobbers.

### **Legislative Factors**

In addition to the internal drivers indicated above, emerging legislation designed to protect the environment is creating a new external pressure on organisations to take back their products at end of life. This form of legislation is likely to have a dramatic impact on organisations planning their returns management strategy. Two examples of this form of legislation are briefly described below:

*EC's Directive on Waste Electrical and Electronic Equipment (WEEE) (2002/96/EC)* aims to reduce the waste arising from electrical and electronic equipment and improve the environmental performance of all those involved in the life cycle of electrical and electronic equipment. The UK government supports this directive and is seeking an implementation to achieve provisions, which will bring environmental benefits but not impose excessive costs on industry (Defra, 2003).

*EC's Directive on Distance Contract (97/7/EC)* stipulates that anyone buying over the Internet (or by telephone, fax or mail order) should be able to change their mind about the purchase for seven working days after the goods are received. No explanation for the rejection of the goods will be required (Europa, 2003). The UK Consumer Protection (Distance Selling) Regulation 2000 (SI 2000 No. 2334) translates this directive into UK law.

### **CONCLUSIONS**

This paper has highlighted the established drivers of product returns for the UK retail sector. In addition, the research findings have identified a number of additional internal supply chain drivers that can lead to product returns and the need for reverse logistics. Finally, emerging EU directives in the form of producer responsibility legislation will provide a powerful external force on organisations to take back their products at end of life.

The implication for companies is the necessity to manage product returns in a holistic way. To do this they need to consider not only the conventional drivers of product returns but examine their internal supply chain operations in order to fully understand the consequence of decisions made in upstream operations on returns.

Finally, emerging legislation may compel companies to take back the products they produce at end of life and therefore they need to consider the implications of this when considering supply chain design and planning.

**The Drivers of Product Returns in  
UK High Street Retailing**

---

**REFERENCES**

- De Brito, M.P. and Dekker, R. (2002), “Reverse logistics – a framework”, *Econometric Institute Report EI 2002-38*, Erasmus University, Rotterdam.
- De Brito, M.P., Flapper, S.D. and Dekker, R. (2002), “Reverse logistics: a review of case studies”, *Econometric Institute Report EI 2002-21*, Erasmus University, Rotterdam.
- Carter, C.R. and Ellram, L.M. (1998), “Reverse logistics: a review of the literature and framework for future investigation”, *Journal of Business Logistics*, Volume 19 (1), pp. 85-102.
- Christopher, M., (1992). *The customer service planner*, Butterworth-Heinemann Ltd, Oxford
- Christopher, M., (1998). *Logistics and supply chain management, Strategies for reducing cost and improved service*, 2, Prentice Hall
- Daugherty, P.J., Autry, C.W. and Ellinger, A.E. (2001), “Reverse logistics: the relationship between resource commitment and programme performance”, *Journal of Business Logistics*, Vol 22 (1), pp. 107-123.
- Defra, The Website of UK Department of Environment, Food and Rural Affairs. Citing Internet Resources (WWW documents). <http://www.defra.gov.uk/environment/waste/topics/packaging/faq.htm>
- Dijkhuizen, H.P., (1997). Reverse Logistics at IBM in van Goor, A.R., Flapper, S.D.P., Clement, C., (eds.). *Handbook of reverse logistics*, Kluwer, B.V., Deventer, The Netherlands, E1310-1—E1310-12 (in Dutch). Cited in: De Brito, M.P., Flapper, S.D.P., Dekker, R., (2002). *Reverse logistics: a review of case studies*, Econometric Institute Report EI 2002-21
- Europa, The portal site of the European Union. Citing Internet resources (WWW document). <http://www.europa.eu.int/scadplus/leg/en/lvb/l32014.htm>.
- Rogers, D.S., Tibben-lembeke, R., (2001). An examination of reverse logistics practices. *Journal of Business Logistics*, 22(2), 129-148
- Stock, J.R. (1998), “Development and implementation of reverse logistics programmes”, *Council of Logistics Management*, Illinois.
- Van Hillegersberg, J., Zuidwijk, R., van Nunen, J., van Eijk, D., (2001). Supporting returns flows in the supply chain, *Communications of the ACM*, 44(6), 74-78

**Mike Bernon BA MSc MILT** is a senior lecturer and director of the Executive MSc. in Logistics and Supply Chain Management within the Centre for Logistics and Supply Chain Management at Cranfield School of Management. In addition to his lecturing responsibilities at Cranfield on MSc and MBA programmes, Mike is visiting lecturer to a number of universities and academic institutions across Europe and the Far East. He is also principle investigator for the EPSRC funded research programme 'SUCCESS'; a joint project between Cranfield School of Management, Warwick University, The CILT (UK) and a number of industrial sponsors. The three year project is focused on logistics costs within the food & drink sector. In addition, Mike has recently managed research programmes for the World Bank and the Department of Transport. As a consultant, Mike has been involved in a range of engagements including; supply chain strategy, inventory management and vendor managed inventory, time compression and manufacturing planning and control. His PhD research is concerned with exploring the nature of supply chain costs and costing approaches.

Mike can be contacted at: [m.p.bernon@cranfield.ac.uk](mailto:m.p.bernon@cranfield.ac.uk)

## **The Drivers of Product Returns in UK High Street Retailing**

---

**John Cullen** is professor of management accounting at Sheffield Hallam University and is a Fellow of the Chartered Institute of Management Accountants. He is head of the Centre for Supply Chain Accounting Research at Sheffield Hallam University. His main research interests are in the area of supply chain management, supply chain accounting, management control and corporate governance. His research is mainly case study based and it has focused on both small and large organisations in both the public and private sectors. He has undertaken supply chain consultancy projects in a range of organisations. The Chartered Institute of Management Accountants funded initial studies and this led to several publications in both academic and practitioner journals and books. Examples of recent work include research projects on reverse logistics, in collaboration with Cranfield School of Management and the Chartered Institute of Logistics and Transport, on behalf of the Department for Transport and the Royal Mail. He has also undertaken a recent project with a local SME company identifying ways in which improvements can be made to the supply chain in order to enhance performance of all the parties concerned. A particular area of interest is the development of performance measures that identify improvements in the supply chain.

John can be contacted at: [j.cullen@shu.ac.uk](mailto:j.cullen@shu.ac.uk)