Retail is an exciting, diverse and dynamic industry undergoing transformational change. The BRC is at the forefront – enhancing, assisting, informing and shaping. Our mission is to make a positive difference to the industry and to the customers it serves. Our broad range of stakeholders demonstrates how retailing touches almost every aspect of our culture.

The BRC leads the industry and works with our members to shape debates and influence issues and opportunities that will help make that positive difference. We care about the careers of people who work in our industry, the communities retail touches and competitiveness as a fundamental principle of the industry’s success – our 3Cs.

Our members are at the forefront of initiatives to improve resource efficiency and reduce waste — demonstrated through our A Better Retailing Climate (ABRC) initiative and our comprehensive report detailing progress on reducing waste and packaging and helping consumers make more sustainable choices amongst others. ABRC contains a set of targets and commitments to 2020 agreed by retail signatories, including a target to divert waste from landfill so that less than one per cent of retail waste is landfilled by 2020 and a commitment to report annually on retail food waste.
Food waste and the use of surplus food has become much more important to everyone over the last few years and is widely acknowledged to be a serious problem with environmental as well as social and economic consequences. The global dimension to the food waste issue is clear — under current production and consumption trends, global food production must increase by 60 per cent by 2050 in order to meet the demands of the growing world population. Yet, more than one third of the food produced today is lost or wasted.

In the UK, WRAP estimates that 15 million tonnes of food and drink are thrown away each year. UK grocery retailers are heavily engaged in the current debate around food waste, working closely with partners up and down the supply chain to bring about a long-term sustained reduction in waste levels. Retailers sit at the heart of the food chain with direct relationships with both customers and suppliers.

In 2013, for the first time UK food retailers agreed a set of common rules and working with WRAP, calculated a UK food retail waste figure of around 200,000 tonnes (accounting for 85 per cent of the UK grocery market). This figure has been updated based on 2014 data and now stands at around 180,000 tonnes. This equates to 1.2 per cent of all UK food waste so there are still bigger challenges we all need to address together. As an industry we have a huge contribution to make and will continue our work with suppliers and customers to build on the progress we have already achieved.

UK retailers can influence the amount of food wasted both in the supply chain and at home. For this reason, UK supermarkets are committed to help drive down food waste across the value chain from farm to fork. This commitment is on-going and retailers are working on a range of projects and initiatives, within their own operations and with suppliers and households, to prevent food waste from occurring in the first place. Where food waste or surplus does arise, retailers find the most appropriate way of utilising it effectively, with many retailers sending zero waste to landfill.

The case studies that follow detail how UK retailers are working to reduce and prevent food waste in the supply chain, at store level and distribution centres and in the home. This report also contains case studies illustrating how retailers are working with their suppliers and establishing processes within their own operations to ensure that surplus food is redistributed to those who need it most.
HOW RETAILERS ARE HELPING TO CUT FOOD WASTE IN THE SUPPLY CHAIN
Around half of the UK’s food waste arises in the supply chain (including on farm and in food manufacturing). The causes of food waste in the retail supply chain are many and varied, so retailers are taking a multipronged approach to addressing the issue. Supermarkets are working with farmers and producer groups to tackle food waste and losses in agriculture, making the most of the entire crop in the field or more of the carcass of animals. Other measures include reviewing current specifications for produce, smarter ways to forecast and opportunities to improve storage and transportation.

Given the large volumes of food waste in the UK grocery supply chain and the lack of detailed data on agricultural food waste, food waste on farm is becoming a focus of attention. We are working with our members on this issue and we are planning to hold a round table event in early 2016.

FOOD SUPPLY SUMMIT

Last year, Sainsbury’s launched a summit that sees fresh fruit and veg donated directly to the food redistribution charity FareShare by the UK’s major food producers. The summit was created with fruit and vegetable suppliers including Mack and Thanet Earth, which form part of the Fresca Group, the UK’s largest independent fresh produce supplier. As a result, over a million meals of fresh fruit and vegetables which might otherwise have been discarded have been donated directly from the field by the supermarket’s fruit and vegetable producers.

POTATO PATHFINDER PROJECT

A WRAP supported ‘whole chain pathfinder project’ has examined potato production in The Co-operative Group from farm to shelf. The project found that significant value is lost along the supply chain and demonstrated where and how fewer resources can be used to deliver better commercial and environmental outcomes. The key opportunities identified include:

- A focus on maximising the percentage of potatoes that are packed for retail (as well as yield) so that more of the harvested crop is available for sale to consumers
- More effective supply chain collaboration, for example through order timing and promotional planning, can save significant costs

Following this value chain work The Co-operative has been involved in WRAP supported work to examine bacon production from farm to shelf and outcomes from this work will be published in 2016.

WORKING WITH SUPPLIERS

Asda is supporting its suppliers to reduce food waste. Initiatives include:

- Asda Sustain & Save Exchange (SSE) — a free on-line tool specially devised to give Asda suppliers access to information and ideas, best practice and methods to identify opportunities to reduce waste, resource use and identify efficiency savings. Initial results show that 2012-2014 SSE members have reduced food waste tonnage by seven per cent.
- ‘Farm to fork’ walkthroughs, where the business visits every point on the chain, from farm production through processing and manufacture, packaging, transportation and delivery. At every stage Asda determines where food is wasted and where improvements could be made; it then works with suppliers to make changes and increase efficiency. One of the most successful projects with Asda’s soup supplier has saved hundreds of tonnes of product and packaging just by making simple changes such as altering transit packaging to reduce breakages in the supply chain

DOVECOTE PARK

Waitrose and Dovecote Park (Waitrose’s dedicated beef, veal and venison supplier) have developed Cattle Connect — an integrated beef production scheme, which connects Waitrose dairy farmers with beef producers in order to ensure that calves produced at the dairy farms are retained within the Waitrose supply chain. Dairy bulls have long been considered a waste product of the industry, as they are unable to produce milk and are unsuitable for commercial beef production. By retaining the calves within the supply chain, the Dovecote Park
ethical veal scheme reduces wastage and improves welfare by making use of animals which would otherwise be killed at birth.

Waitrose and Dovecote Park purchase the whole carcass from the farmer, not just the parts they need. This helps spread the risk between farmer, processor and retailer. Parts of the carcass not required by Waitrose are sent for export where they find a ready market. No part of the beast is wasted.

SILVER FACTORY PROGRAMME
Waste management forms an integral part of the environmental section of the M&S silver factory programme with suppliers. Suppliers are encouraged to reduce waste, reuse and recycle where possible and find alternative uses for by-products that they cannot use. Through the M&S supplier exchange programme (where groups of suppliers gather to share knowledge) M&S has facilitated and given tools on waste mapping as well as introducing a number of redistribution partners. Currently 52 per cent of M&S suppliers are zero waste to landfill. Forty per cent of M&S sales (by volume) come from silver factories; of these four sites have reached the top level of gold, representing 10 per cent of sales.

NO BANANA LEFT BEHIND: REDUCING FOOD WASTE FARM TO FORK
As part of its mission to ensure no edible part of the banana crop is wasted, Tesco has taken steps to ensure smaller and unusually shaped bananas are used in its Everyday Value and Goodness ranges. Tesco also processes bananas for example into milkshakes. It has built long-term relationships with 12 South American farms that grow and pack all of their bananas to Tesco. This work has led to the farmers Tesco works with seeing significant reductions in their waste figures. For example Tesco farms in Costa Rica reported that waste reduced from 10 per cent in 2011 to four per cent in 2014. In addition Tesco has worked in partnership with its ripeners to guarantee almost 100 per cent of its orders. This means that this uncertainty around demand is avoided and waste reduced.

PIE MANUFACTURING WASTE SAVINGS
Morrisons is a major food manufacturer as well as a retailer and has worked with WRAP using a Waste Event process to evaluate pie waste at its Farmers Boy manufacturing site. This highly structured programme took place over a number of days and its focus was to look carefully at new options for waste improvement. Pastry re-working was identified as a key root cause of later waste generation and as a result several simple low cost solutions were presented to the management team to develop further. It is estimated that more than 300 tonnes of waste could be eliminated each year. Morrisons plans to roll-out what has been learned from this approach to colleagues at other manufacturing sites.
HOW SUPERMARKETS ARE TACKLING FOOD WASTE IN STORES AND DISTRIBUTION CENTRES
Our members’ overriding priorities are to provide fresh, quality food at best value to all of their customers and to prevent food waste from occurring in the first place. Food waste arises at retail level for a variety of reasons such as expiry of use by date; product recalls; breakages; damages; and products that have been taken out of the chill chain.

Supermarkets are working on projects to increase the shelf life on a number of products and to promote products that are close to their end of life through prominent placements or discounts. Retailers are ensuring that any food surplus to requirements is put to good use through processes such as redistribution to charities, use in animal feed and anaerobic digestion.

**PREVENTING FOOD WASTE IN STORE**

Initiatives introduced by Asda to make sure it reduces food waste wherever possible include:

- Clearer labelling and dates codes to avoid confusion in-store and at home and ensure as much produce is sold and eaten as possible
- A review of packaging across its product lines to make sure it protects food and keeps it fresh
- To maximise selling time and ensure that as much food as possible is sold and not wasted Asda reduces produce on the day of ‘use by’
- A specially trained group reviews dates, products and how things are selling in each store. From this, Asda can calculate the right stock for the right place at the right time
- Switching its ‘Butcher’s Selection’ beef packaging to ‘skin’ packaging. This reduces the amount of packaging needed and doubles the meat’s shelf life. This has now been extended across lamb and pork

**A COMPREHENSIVE APPROACH**

The Co-operative Food’s food waste prevention initiatives include:

- System-generated production plans indicating store-specific daily bake quantities
- In-store software instructing staff by how much to reduce products reaching their end of life
- Reviewing all fresh lines ensuring the case size reflects the amount that will sell within life
- Extension of shelf-life using gas-flushing for fresh chicken and skin packs and vacuum packs for steaks, beef joints and lamb
- Using differential perforations for asparagus giving two days extra life
- Full review of shelf-life of all products, maximising life while maintaining safety and quality

**PRODUCT LIFE EXTENSION AND REDUCE TO CLEAR**

M&S has extended the life of over 200 products in 2015 which keeps them on shelves longer, reducing waste and keeping them fresher for longer for customers. This includes ‘stay fresh’ tabs in berries as well as vacuum packing meat. Each day M&S has a reduced sales to customers programme which reduces the prices of items going out of life that day which at present is saving around 75 per cent of products from becoming waste.

**REDUCING BAKERY WASTE**

Tesco found that 41 per cent of its waste was within its bakery departments and implemented a strategy to reduce bakery waste over a two year period, successfully achieving a significant reduction in waste.

- Bakery teams were encouraged to bake less bread more often, rather than larger volumes in one go
- Tesco worked with suppliers to extend code life on a range of breads and sweet products
- Bakery and store managers review and allocate excess bakery space to other categories so that bakery shelves still look full but with much lower waste levels
- A bakery ‘centre of excellence’ was established to facilitate knowledge sharing across the business
BLUE DOT PACKAGING AND EXTENDING SHELF LIFE

Morrisons has introduced simple, clearly identifiable blue dots on highly perishable produce packaging to help colleagues ensure the chill chain on these products is never broken, therefore reducing waste at store and in the home.

By moving selected fresh meat traditionally packaged in store to its Winsford factory to be factory wrapped, Morrisons has extended its shelf life from four to 16 days.

TURNING FOOD WASTE INTO POWER

In July 2014, industry partners Biffa and Sainsbury's announced an innovative facility that allows Sainsbury's Cannock store to run on power generated solely from the supermarket's own food waste. Using Biffa's advanced anaerobic digestion (AD) facilities and a unique power link up, Sainsbury's Cannock store is powered using electricity generated from food waste from Sainsbury's stores across the UK. This project helps to close the loop on food recycling and enables Sainsbury's to continue to send zero operational waste to landfill.

STOCK OPERATING MODEL

One of the most significant moves Waitrose has made in relation to stock management has been the introduction of a new Stock Operating Model. This project has significantly shortened the order cycle from the time an order is placed through to stock being delivered into the shops. The new system means Waitrose has a more accurate and responsive forecasting system which not only improves customer availability but also reduced waste previously caused by inaccurate forecasting and "just in case" stock. The reduced lead times within the order cycle on fresh products also provide greater product life on shelf.
HOW RETAILERS ARE WORKING TO ENSURE THAT SURPLUS FOOD IS REDISTRIBUTED
When retailers have usable excess stock they work with charities, manufacturers and redistribution organisations across the UK. Our members work with FareShare, Community Shop, FoodCycle, In Kind Direct, the Trussell Trust, His Church Trust and Esther Community Enterprise amongst others to make sure as much as possible goes to people who need it and is of social benefit. Individual retail initiatives are set out below.

**M&S**
M&S has been working with a range of food redistribution organisations to redistribute surplus food from the back of its stores. Following a number of trials in 45 stores to establish the best model for getting surplus food to those who need it, M&S has now launched a nationwide charitable redistribution scheme, working with Neighbourly to provide an online platform that connects every store with existing and new local charity partners. This single platform removes some of the logistical barriers to redistribution, including ensuring that all those registered have the correct charity and food hygiene credentials in place. M&S believes this will maximise the amount of food that can be redistributed and accelerate M&S towards its Plan A target of reducing food waste by 20 per cent by 2020.

**SAINSBURY’S**
Sainsbury’s has been donating surplus food to a network of good causes across the UK for over 20 years. Over 300 of Sainsbury’s stores and four distribution centres are currently involved in donating food to their local communities. If stores don’t already have a food donation partner, they are now being encouraged to set them up with dedicated support available. The food is perfectly edible, safe and nutritious but is past its best before date. It provides a lifeline to many local charities and helps to improve the quality of life of the most vulnerable groups in society.

Sainsbury’s was a founder member of FareShare and surplus food that would otherwise go to waste is taken from Sainsbury’s suppliers, stores and depots to FareShare’s six centres located across the UK.

**THE CO-OPERATIVE FOOD**
The Co-operative Food is donating its warehouse depot surplus food to local charities as it diverts food for over a million meals away from anaerobic digestion energy plants. Following a successful trial at its depot in Castlewood, Derbyshire the mutual is rolling out the programme from September 2015, supplying a range of chilled food items to FareShare, which passes the food on to charities and community groups who transform it into nutritious meals for vulnerable people. The Co-operative Food estimates that in 2016 it could provide 500 tonnes from all depots – enough food for over a million meals.

**ASDA**
In an ideal world, when stock arrives at an Asda distribution centre it is exactly what the retailer has ordered. But sometimes this isn't the case. Suppliers send ‘overs’ or stock that hasn’t been ordered. This food is in date and fit for human consumption but risks being disposed of as food waste. As the supplier still owns this surplus stock, Asda is obliged to return it to them. In June 2013, Asda forged a partnership with its suppliers and FareShare to redistribute surplus food to UK charities and community projects. To date this has resulted in over 1,300 tonnes of surplus food being redistributed — enough food to make over three million meals at over 2,000 charities every week. Asda has extended this scheme in 2015 to include donation of non-technical quality rejections.

**TESCO**
Tesco has partnered with FareShare and Irish social enterprise FoodCloud to launch the FareShare FoodCloud app in the UK. Store managers will alert charities to the amount of surplus food they have at the end of each day. The charity then confirms it wants the food, picks it up free of charge and turns it into meals for those in need. Beneficiaries will come from the wide range of charities including homeless hostels, women’s refuges and breakfast clubs for disadvantaged children. FoodCloud is supplying its technology and expertise developed from its scheme in Ireland. The scheme is already in place in Tesco stores across Ireland and is live in 13 stores across...
the UK. Tesco is now working on scaling its UK pilot up to 100 stores. Since May 2015, the scheme has resulted in the donation of over 30,000 meals, over 13 tonnes of food.

MORRISONS
In addition to working with the national charity FoodCycle redistributing food from Morrisons stores to local FoodCycle hubs, Morrisons began a trial unsold food redistribution programme in June 2015 with 112 of its stores. The aim of this trial was to see whether stores could effectively redistribute edible unsold food to a local charity of their choice. The trial has been really successful, with over 70 per cent of stores engaged with a local charity, with a weekly average of £60-80 worth of food donated. Morrisons will be rolling this programme out across all stores in the early part of 2016.

WAITROSE
Waitrose has been donating surplus food for many years and works with over 80 different charities and organisations around the UK. To date, over half its shops have contracts in place. To meet its ambition for all shops to have a donation arrangement in place, it has set up a dedicated email address to encourage charities to come forward enabling Waitrose to put charities in touch with as many shops as possible.

Following a number of recent trials, Waitrose has a target for all of its redistribution centres to be redistributing surplus food within the next six months.
HOW RETAIL IS HELPING REDUCE FOOD WASTE IN THE HOME
Nearly half of all food waste is created in the home but retailers know that they have a key part to play in reducing this and are acutely aware of their customers’ desire to get the most value from the food they buy.

Since 2009, UK grocery retailers have signed up to voluntary targets to reduce household food waste under the Courtauld Commitments and have contributed to a reduction of 15 per cent (or around 1.3 million tonnes) in household food waste between 2007 and 2012. Retailers have been working through WRAP’s Love Food, Hate Waste campaign and the Ten Cities campaign with their customers to help them reduce household food waste, make it easier to purchase the right amount and to store food in the best way to prevent food waste. Retailers offer advice on how to use and store leftovers in store, on packaging and online as well as amending freezing guidance, introducing innovative packaging to keep food fresher for longer and providing recipe ideas to help customers use up surplus food.

LOVE FOOD HATE WASTE PACKAGING
In a bid to give its customers better advice about food handling and storage to help them reduce waste in their homes, Tesco has worked with WRAP to redesign its produce packaging to provide ‘Love Food Hate Waste’ hints and tips on how to store key products at home. In addition, Tesco has introduced ‘Love Food Hate Waste’ information on the paper delivery bags in which its customers receive their loose fruit and veg when shopping online. Preliminary findings show that 1 in 10 customers report they have changed their behaviour as a result of the new packaging, which is 1.4 million customers.

CUSTOMER ENGAGEMENT
In Autumn 2014 WRAP, along with The Co-operative, piloted food waste prevention engagement in Porthcawl on behalf of the Welsh Government. The pilot used community-based social marketing, WRAP’s ‘Fresh for Longer’ materials and face-to-face engagement within The Co-operative Food Porthcawl store. Findings included:

- 30 per cent of customers had seen the campaign
- Bag clips and on-pack labelling was the most useful support
- Functional solutions encourage more behaviour change than communications alone

In 2012 the retailer introduced home-storage labelling for produce which is now on 300 own brand lines. Storage and freezing advice is now on 30 bread products and will appear on cooking sauces from November 2015. Eight table sauces have an “opened on” box for customers to complete as a reminder.

FOOD FOR THOUGHT
Asda’s consumer panel indicated that 85 per cent of its customers would like Asda to help them reduce food waste in their own homes. Throughout summer 2015 Asda partnered with WRAP to deliver a number of Love Food Hate Waste activities in store. Over 600 community life champions organised games, provided tips and recipes and gave out freebies to help customers reduce food waste in their homes. Initial results show that interaction with Love Food Hate Waste activity in-store improves customers’ intentions to reduce food waste.

HELPING CUSTOMERS TO REDUCE FOOD WASTE
Packaging technologies such as resealable bags and individual portions of meat and fish allow M&S customers to make the most of the food they buy. In addition to this M&S has partnered with WRAP on the Love Food Hate Waste campaign which aims to tackle five behaviours in the home to reduce food waste. M&S has carried out a number of events and campaigns including most recently a Salad Days event in Manchester engaging consumers on how to make the most of salad and fruit (two of the
top foods wasted in the home). Salad Days was featured in various Manchester local papers and attracted over 500 attendees as well as delivering over a million timeline deliveries on Twitter.

**ON-LINE RECEIPTS**

**Morrisons** online shoppers can better manage the contents of their fridge from the receipt which informs customers where best to store items to keep them fresher for longer. The receipt also sets out when items need to be used by in date order, helping customers to reduce their food waste in the home.

**FORGOTTEN CUTS RANGE**

**Waitrose** has also worked on adding value to more traditional and perhaps unfashionable cuts of beef through its Forgotten Cuts range. Developed as a project between Waitrose and Dovecote Park, Forgotten Cuts has given customers a taste for the kind of food that has fallen out of favour recently such as shin and ox cheek along with baked bone marrow. This improves returns to farmers, cuts wastage for the processor and helps customers enjoy amazing flavours for a great price.
REFERENCES

1 Projections from the Food & Agriculture Organisations of the United Nations (FAO), 2013.


3 See www.wrap.org.uk.

4 The participating retailers are Asda, The Co-operative Food, M&S, Morrisons; Sainsbury’s, Tesco, and Waitrose.

5 WRAP estimates equivalent food waste figures for the whole retail grocery sector as around 240,000 tonnes for 2013 and around 210,000 tonnes for 2014 - based on the market share data provided for the two years.

6 ‘Skin’ packaging, is a type of carded packaging where a product is placed on a piece of paperboard, and a thin sheet of transparent plastic is placed over the product and paperboard. The printed paperboard usually has a heat-seal coating.

7 The Courtauld Commitment is a voluntary agreement aimed at improving resource efficiency and reducing product and packaging waste within the UK grocery sector. The agreement is funded by Westminster, Scottish, Welsh and Northern Ireland governments and delivered by WRAP.