How we calculated the food waste from our UK operations

SCOPE AND DEFINITIONS

The methodology outlined below is used to calculate the total tonnes of food wasted in our UK operations in the full Tesco financial year 2014/15.

Timeframe

The published figure represents the food wasted in our full financial year 2014/2015. This year this includes 53 weeks, from 24th February 2014 to 1st March 2015 inclusive, compared to 52 weeks in our previous financial year.

Store Location and Type

The scope of this calculation covers our entire UK operations. This means that all food waste generated in stores, including those in petrol stations, in England, Wales, Scotland and Northern Ireland is included. Waste generated at our depots is also included.

The calculation only covers our operations. Therefore, waste arising at our supplier's sites is not included.

Food Waste Definition

The scope of the calculation only includes waste materials defined as food waste, according to the UN FAO definition of food waste:

> Food waste refers to food appropriate for consumption being discarded, usually at the retail and consumer levels. We do not include the consumer levels of food waste

All food that was intended for human consumption but is removed from the human food chain is considered to be food waste, even if it is directed to non-human food use, such as animal feed. Packaging is also excluded. On the other hand, food donated to FareShareis not considered to be food waste.

During the calculations all non-food items are removed from our waste data. The following product categories are out of scope and therefore excluded from the calculations:

- Retail categories:
    - Healthcare
    - Household
- Depot categories:
    - Hardware
    - Health & Beauty
    - Horticulture
    - Household
    - Unallocated (all items are paper goods)
    - News/Mags/Other

In addition to the Categories listed above, the following products were excluded:

- All divisions within the Baby, Beauty & Toiletries Category except 'Frozen baby food' and 'Ambient baby food & drinks'.
- Pet Products Department and Division Non Foods Grocery in Poundshop Category.
- Plants and Flowers Department in the Produce Category.
- Some individual products were excluded in other Categories where they were clearly not food, for example: books.

Other Exclusions

During the FY 2014/15 we outsourced the production of bakery products to Euphorium Bakery. The waste arsing are no longer in scope as these arise at a supplier's site. As a result, the 980 tonnes of food waste generated at the Euphorium bakery site were excluded from our total food waste tonnage. We have not adjusted the 2013/14 data as it is not possible to identify with an appropriate level of certainy the impact.

DATA SOURCES

In order to calculate the amount of food wasted each year we record the following data in our stores and depots.

Retail waste: This dataset contains the number of retail units wasted and the total value (£) of such waste per item, split by waste type –

- DAM waste: products that are damaged in store, whether on the shop floor or in storage
- OOC waste: Products that exceed the 'Best before' or 'Use by' date and are removed from shelves.

Depot waste: This dataset contains the number of depot units wasted and the total value (£) of such waste per item. Depot units differ from retail units as these contain several retail units (for example a pallet or a carton of individual packs). The number of retail units per depot unit is also provided in the dataset and is used to calculate the total retail units per item.

Depot waste figures are reported as a mixture of positive and negative totals. Negative figures are 'losses', i.e. waste. Positive figures are single items that have been retrieved from wasted packs (e.g. individual cartons retrieved from a broken case). The total waste per item is the sum of losses and gains multiplied by minus one, in order to align this data with other datasets.

Product data: This dataset contains the contents weight and the packaged weight per item. Note that where duplicates are found, a conservative estimate is taken and the highest weight is used.

FareShare: The dataset contains the tonnage of food redistributed to FareShare by food category.

METHODOLOGY

The bullet points below explain how we have calculated our total food waste tonnage for the full year 2014/15.
- Included in the scope of our calculation is any food that has not been sold in our stores because it is past its best before or use by date or has been damaged. The non-food categories mentioned above are therefore removed at this stage
- The number of units wasted per item is converted into a weight measured in tonnes by combining DAM, OOC and depot waste data with product content weights*

- We perform a 'bottom up' calculation from the waste tonnages for individual products (e.g. Gala Apples), to the commercial food category (e.g. Produce), to our entire UK operations
- Waste tonnages are added to obtain totals by category and for our entire UK operations. We therefore perform a 'bottom up' calculation from the individual product (e.g. Gala Apples) to the commercial food category (e.g. Produce)
- We used this calculation method for 64% of the waste products (by weight) from our own operations – in our depots and within our stores
- The remaining 36% of waste by weight (and 53% of total units wasted and up from 30% in the FY 2013/14) occurs in products that do not have a standard weight on their pack - this could include items such as baguettes in our bakery or food in our deli counters. The following steps are taken to select the best estimate:
    1. Product content weights are checked category by category and are marked as requiring adjustment where the content weight is missing or if it is high or low compared to the category average
    2. If adjustment is required, packaged weights are selected where available and if appropriate according to expert judgement
    3. For all items with no weight data available, items are checked on a sub-category basis and either the category or sub-category average is used based on expert judgement.
    4. For the Bakery category, primary data collection was necessary to obtain average weights for several sub-groups.

In order to minimise the risk associated with such estimates, categories with the largest number of waste items are prioritised and checked in more detail as these have a greatest impact on the total waste (Bakery and Produce). In addition, within each category, the products with the highest number of wasted units are checked manually one-by-one as these can also have a significant impact on the total waste tonnage.

- All food that we donate to charity through our FareShare initiative is deducted as FareShare redistributes surplus food to community groups to provide meals to those in need

* It is assumed that 1 L is equivalent to 1 Kg where product content weights are listed as volumes.