



Case study for measuring food loss

Meat and Dairy sector case study (milk)

This case study aims to address food loss in dairy products in Ireland and is led by the University of Limerick. Initially, it was conceived as a single case study together with the meat sector; however, given the specific characteristics and distinct particularities of each food commodity, it was deemed clearer and more appropriate to treat them as two independent case studies.

Food Loss information	
Commodity	Dairy milk
Quantification	The use of registries and interviews
Timing	Primary production: pre-harvest and harvesting losses

General information	
Policies	No policy for food loss in Ireland.
Challenges	There are challenges both in adapting the general food loss framework to the dairy sector and in data collection, as this relies on the milk sector, including both farms and processing industries.
Technology	It was not necessary to use technology for the current collection of data through interviews or records.
Destination	Mainly waste management.
Benefits	At this stage, the key objective is to make a problem visible that is primarily borne by them.

Food Loss results

Table 1 below provides a comprehensive overview of the main food loss categories identified across the dairy sector in the Irish case studies. The table highlights the distinct loss profiles between sectors, with dairy losses encompassing both production and immediate post-milking stages:

Table 1. Summary table of overview of the main food loss categories identified across the dairy sector in the Irish case studies

Loss Category	Drivers of Loss	Dairy Sector	Primary Causes	Substage
Downgrade	Societal /Behavioural	N/A	Transportation, pharmaceutical residues, export specification failures	Post-milking food loss
Specification mismatches	Behavioural	N/A	fat classification issues	Post-milking food loss
Withdrawal period disposal	Societal	High frequency	Mastitis treatment, antibiotic treatment, preventative medication	Post-milking food loss
Tank contamination	Behavioural	Low frequency (HIGH impact)	Equipment malfunction, power outages, bacterial contamination	Post-milking food loss
Collection failures	Environmental /Behavioural	Low frequency	Weather access issues, vehicle breakdown, scheduling conflicts	Post-milking food loss