



## SDG TARGET 12.3 ON FOOD LOSS AND WASTE: 2024 PROGRESS REPORT

An annual update on behalf of Champions 12.3

### LETTER FROM THE CO-CHAIRS OF CHAMPIONS 12.3

Just six years remain to achieve the Sustainable Development Goals' Target 12.3, which calls for halving food loss and waste worldwide by 2030. At this juncture, we fear that the uncomfortable truth is that SDG 12.3 is fast becoming out of reach.

This report shows that the world is at a fork in the road. Unless a slew of companies and countries prioritize food loss and waste reduction, we will have missed one of the best opportunities to build a resilient food system for generations.

But if governments and the private sector act immediately, we may still achieve significant benefits for people, the economy, and the climate. In fact, halving food loss and waste would reduce global greenhouse gas emissions by up to 5 percent, according to estimates from the Intergovernmental Panel on Climate Change.

That's an astonishing figure, and it shows how sizeable the rewards are for addressing the world's food loss and waste problem.

As Champions of SDG 12.3, we have been leaders in this effort for almost a decade. We understand just how overwhelming it can feel to reduce food loss and waste. It can be especially difficult in an ecosystem where few others have prioritized the issue.

We therefore have a very simple message for everyone: Identify at least one thing you can do in a food loss and waste hotspot, and then do it.

If that's working with a single supplier to reduce food losses, do it. If that's working with a government agency to promote consumer education, do it. If that's managing how much food your own household throws out, do it. No matter what or where the hotspot is, *do something*.

As you read this report, please take inspiration and ideas for how to curb food loss and waste in your own life and sphere of influence—because the only chance we have to realize SDG 12.3's enormous promise is if we all do *something* and we do it *now*.

#### **Hans Hoogeveen**

Independent Chairperson of the Council at FAO and  
Champions 12.3 Co-chair

#### **Sunny Verghese**

Co-founder and Group CEO, Olam International Limited and  
Champions 12.3 Co-chair

## ABOUT THIS PUBLICATION

*SDG Target 12.3 on Food Loss and Waste: 2024 Progress Report* is the ninth in an annual series of updates assessing the world's progress toward Sustainable Development Goal (SDG) Target 12.3. SDG 12.3 aims to, "by 2030, halve per capita global food waste at the retail and consumer levels and reduce food losses along production and supply chains, including post-harvest losses." Prepared on behalf of Champions 12.3, this publication seeks to inform decision-makers in government, business, academia, and civil society about recent advances and what remaining steps need to be addressed if the world is to achieve the target. Previous progress reports (2016–23) can be found at <https://www.champions123.org>. This progress report contains text from the previous editions in the series, with permission of the authors of those editions.

## AUTHOR

This publication was prepared by Brian Lipinski of the World Resources Institute.

## SUMMARY

In 2015, countries from around the world adopted the Sustainable Development Goals to end poverty and hunger, protect the planet, and ensure prosperity for all populations and generations. One target within these goals is SDG 12.3, which calls for per capita reductions of food loss and waste by 50 percent globally.

With six years to go before 2030, the world is not on track to achieving SDG 12.3. Global progress on reducing food loss and waste has not accelerated to the point needed to achieve this ambitious target, either from companies or countries. And with fewer than six years left, time is running out.

There are bright spots of action. Food loss and waste is rising on the political agenda, thanks to growing recognition of the role of food system transformation as highlighted by the [Emirates Declaration on Sustainable Agriculture, Resilient Food Systems, and Climate Action](#). Several large countries and regional bodies have announced strategies for addressing food loss and waste throughout the supply chain, most recently the United States and the European Union. But these strategies still need to be implemented, and they are subject to political pressures and changes in leadership. Addressing food loss and waste needs to be considered a key part of a country's environmental, economic, and social activities, and few countries are currently tackling the problem in this way.

The private sector is making more progress than national and regional governments but still not enough to systematically address the world's food loss and waste problem. Initiatives like 10x20x30 and 10x20kx30, which work with businesses

to address food loss and waste, provide a model for whole supply chain action, but more needs to happen. Here are some immediate necessary steps:

- **Countries and companies need to establish immediate and ambitious food loss and waste reduction targets, and those targets need to be represented throughout national climate strategies and communications, such as nationally determined contributions (NDCs). These strategies and communications then need to be translated into meaningful policies and actions.**
- **Countries and companies need to report food loss and waste figures publicly, identifying key hotspots and considering the climate implications of those hotspots.**
- **Both governments and companies need to turn their attention to farm-level food loss as well as consumer food waste, two underexplored contributions to the global state of food loss and waste.**
- **Financing organizations and philanthropists need to contribute to the more than \$300 million in investments that are ready today to reduce food loss and waste.**

In short, the world's food loss and waste problem has remained unchecked for too long. Although there are encouraging signs of progress, at current levels of action the world will not achieve SDG 12.3. Collectively, we must begin assessing how to massively scale up action, and what the next steps will be if and when we miss out on this crucial 2030 goal.

## THE CHALLENGE

It is estimated that 40 percent of the world’s global food supply is lost or wasted, an increase of 10 percent from previous estimates. This huge level of inefficiency has significant impacts. Consider food security. Food loss is most common during either production or postharvest handling and storage. This can affect the ability of farmers to live above the poverty line or even to feed their families. Food waste, which occurs near the end of the food supply chain, can affect household nutrition and food-related spending. Regardless of where the food loss and waste occur, in a world where nearly one in three people faces moderate or severe food insecurity, it is a travesty that 2.5 billion tons of food each year never gets consumed (WWF-UK 2021).

In the past several years, global shocks including the COVID-19 pandemic and Russia’s invasion of Ukraine have led to food shortages, restrictions on exports, and increased global food prices to the highest levels ever recorded (Glauber et al. 2022; Treisman 2022). In the face of such shocks, reducing food loss and waste effectively means increasing the amount of food available to consumers. Recovering surplus food that would otherwise be wasted and ensuring its redistribution to people in need can also help address growing food security concerns.

Consider the economic costs. Food loss and waste results in more than US\$1 trillion in economic losses globally per year. Recent estimates from the Consumer Goods Forum indicate that the global costs of food loss and waste are 25–50 percent higher than previously estimated, in part because of greenhouse gas emissions (GHGs) from food loss and waste. Therefore, investing in food loss and waste reduction efforts can reap significant economic benefits. For example, one study found that food-related businesses such as canteens, hotels, and restaurants can experience up to a 14-fold return on their investment in food waste reduction programs (Hanson and Mitchell 2017).

Consider the environment. The production of food that is ultimately lost or wasted requires a land area greater than that of China (FAO 2013). Moreover, food loss and waste generates about 8–10 percent of global greenhouse gas emissions annually (IPCC 2020). To put this in perspective, if food loss and waste were a country, it would be the second-largest greenhouse gas emitter on the planet—surpassed only by China. When food is lost or wasted, the land, water, and fertilizer used to produce that food goes to waste as well. Considering these impacts, reducing food loss and waste can generate a triple win. It can help feed more people. It can increase savings for

farmers, businesses, and households. And it can reduce the food system’s pressure on the environment and help mitigate climate change.

## A HISTORIC OPPORTUNITY

In September 2015, a historic window of opportunity opened to elevate the issue of food loss and waste reduction on the global agenda. At the UN General Assembly, countries around the world formally adopted a set of 17 Sustainable Development Goals as part of the 2030 Agenda for Sustainable Development: these global goals sought to end poverty and hunger, protect the planet, and ensure prosperity for all populations and generations (UN 2017). SDG 12 seeks to “ensure sustainable consumption and production patterns.” The third target under this goal (SDG 12.3) calls for halving per capita global food waste at the retail and consumer levels and reducing food losses along production and supply chains (including postharvest losses) by 2030. Many countries and initiatives, including Champions 12.3, are interpreting this target to mean that all food loss and waste across the food supply chain should be reduced by 50 percent.

This ambitious yet achievable target has the potential to embed the reduction of food loss and waste firmly in public and private sector strategies around the world for the first time. Moreover, national action on this problem can help countries meet their commitments to the Paris Agreement on climate change. It is truly a global target, but every country, company, and individual has a role to play.





## BOX 1. Why Target-Measure-Act?

The Target-Measure-Act approach to reducing food loss and waste is based on the simple steps wherein a country or company sets a food loss and waste reduction target, measures its food loss and waste, and acts to reduce the hot spots.

- **Target.** Targets set ambition, and ambition motivates action. Therefore, as a first step toward reducing food loss and waste, governments and companies should set reduction targets aligned with SDG 12.3.
- **Measure.** The adage “What gets measured gets managed” holds true for this issue as well. Quantifying food loss and waste within borders, operations, or food supply chains can help decision-makers better understand how much, where, and why food is being lost or wasted. This information is the foundation for developing and prioritizing reduction strategies. In addition, measurement is necessary if entities are to know whether they are on track to meeting SDG 12.3; they need to publicly quantify a base-year amount of food loss and waste and monitor change over time.
- **Act.** Setting targets and measuring food loss and waste are important. But what ultimately matters is action. Therefore, governments and companies need to follow through on implementation. Flanagan et al. (2019) provide recommendations on several actions that actors in the food supply chain, from farmers to consumers, can take to reduce food loss and waste.

Source: Lipinski et al. 2017.

## A ROAD MAP TO ASSESS PROGRESS

It has been nine years since the launch of the SDGs. So how much progress has been made in relation to SDG 12.3? Is the world on track, or is the world behind? In the 2017 edition of this progress report, the authors introduced a “road map” of milestones (grouped into three-year segments) based on Champions 12.3’s “Target-Measure-Act” approach (Box 1) (Lipinski et al. 2017). This road map is designed to track global progress by governments and businesses toward achieving SDG 12.3 and assesses where progress is sufficient or insufficient relative to Target-Measure-Act. We most recently assessed these milestones in the 2022 edition of the report, in which, globally, companies were overall found to be making more progress than national governments (Lipinski 2022). However, our analysis found that the global rate of progress on food loss and waste reduction was currently insufficient to achieve SDG 12.3. The next set of milestones concludes at the end of 2024, so the 2025 progress report will provide a new assessment of global progress toward achieving SDG 12.3 by both companies and countries.

## MAJOR DEVELOPMENTS AND TRENDS SINCE SEPTEMBER 2023

### Governments

Governmental action is key to successful efforts to reduce food loss and waste. Policies put in place by governments can either help or hinder food loss and waste prevention and reduction efforts. These policies can determine whether food loss and waste reduction is a priority for government agencies, private sector actors, and households within a country or region. And national communications such as nationally determined contributions, developed by countries for submission to the UN Framework Convention on Climate Change (UNFCCC), can help to establish food loss and waste as a climate solution (Box 2).

Most national governments are not addressing food loss and waste in a systematic way. In our most recent assessment of global progress toward reducing food loss and waste, we assessed that countries representing just 35 percent of the world’s population are now acting at scale to address food loss and waste within their borders. Despite this slow rate of progress, there has been some positive movement toward national and regional action on food loss and waste. Profiled here are some examples of new and notable policy and strategy developments from national governments as well as global and regional bodies in the previous year.

## BOX 2. Nationally determined contributions and food loss and waste

By early 2025, countries are meant to unveil new climate commitments under the Paris Agreement, known as nationally determined contributions (NDCs). NDCs describe how a country intends to reduce greenhouse gas emissions (GHGs) and limit global warming. NDCs in turn can help guide domestic policies across a national government, signal priorities to public and private sector investors, and improve implementation of policy measures aimed at reducing GHGs.

Currently, not many countries mention food loss and waste in their NDCs. A forthcoming analysis from WRI's System Change Lab found that just 25 countries include measures to reduce food loss and waste in their NDCs. Most countries are therefore not including food loss and waste in their climate strategies. Food loss and waste is a necessary focus area for countries aiming to achieve serious greenhouse gas reductions, and therefore should be integrated into more NDCs during the next round of climate commitments.

### GLOBAL

In December 2023, 134 countries signed the [Emirates Declaration on Sustainable Agriculture, Resilient Food Systems, and Climate Action](#), in which countries committed to integrate food into their climate plans by 2025. The declaration was signed by many countries with the highest food-related greenhouse gas emissions, including Brazil, China, the European Union, and the United States. The importance of addressing food loss and waste was highlighted twice within the declaration, reflecting the increased awareness of the link between food loss and waste and climate change.

Reflecting the rise of food loss and waste on the global agenda, [Reducing Food Loss & Waste: A Roadmap for Philanthropy](#) was released at UNFCCC COP28 in Dubai. Following this launch, a consortium of nongovernmental organizations, called the Global Action Drive, came together to coordinate and advance the needed global-level system change enabling efforts identified in the road map. The road map sets out how these *global-level* efforts are necessary to support *national-level* efforts to tackle food loss and waste. Such global efforts include developing food loss and waste reduction tools and guidance, ensuring lesson-sharing between priority countries, identifying long-term financing models, and measuring and monitoring progress.

### AUSTRALIA

In July 2024, a new National Food Donation Tax Incentive was introduced in the Australian Parliament. If passed, the bill would amend the tax system to offer incentives for businesses donating food and services to food rescue organizations. The bill was the result of research by End Food Waste Australia and food rescue organizations in the country.



### CHINA

In December 2023, China published the final version of the National Food Security Law, which went into effect on June 1, 2024. The law called for grain producers to “use advanced and efficient grain storage, transportation, and processing facilities and equipment to reduce grain loss and waste” but did not provide further details relating to how the law would be implemented. Provincial-level governments have started to disclose progress on reducing food loss and waste (e.g., the measures taken to reduce food loss and waste, the progress on food loss and waste reduction). Additionally, two standards for reducing food waste of retailers, e-commerce, restaurants, and hotels were published in 2023 and early 2024 by food-related industry associations.



### EUROPEAN UNION

As discussed in the *2023 Progress Report*, the European Commission proposed legally binding food waste reduction targets to be achieved by EU member states by 2030 as a part of the revised EU Waste Framework Directive. The commission's proposed targets represented the first mandatory food waste reduction targets to be put forward by a national or supranational authority.

These targets would require member states to take the necessary measures to reduce food waste by 30 percent per capita jointly at the retail and consumption levels (i.e., restaurants, food service establishments, and households), and by 10 percent at the processing and manufacturing levels. This target is less ambitious than SDG 12.3 but still significant due to its prominence as the first legally binding target to be proposed globally, giving the opportunity to increase ambition and widen scope in the future.



In March 2024, members of the European Parliament overwhelmingly approved the revised Waste Framework Directive. The Parliament also voted to increase the ambition of the directive to reduce food waste at retail and consumption by 40 percent, and by 20 percent at the processing and manufacturing levels. This increase in ambition was proposed by members of the Parliament’s Committee on the Environment, Public Health and Food Safety. However, this vote came too late for negotiations between the Council and Parliament to be finalized prior to European Parliament elections in June 2024, so this increase in ambition has not yet been codified and would need to be revisited by the next session of Parliament.

In June 2024, the European Council reviewed the directive and retained the earlier, less ambitious targets while also introducing changes.

- The revised directive provides for the possibility to set more ambitious targets by the end of 2027, when the commission will review the 2030 targets.
- The approach allows member states to select a baseline year from 2023 or earlier against which their progress will be measured. In the previous version of the directive, 2020 had been identified as the baseline year, but member states raised concerns that 2020 was not a representative year because of the COVID-19 pandemic.

### INDIA

- The Union Budget 2024–25 has set a target to enhance agricultural infrastructure capacity (dry and cold storage) to reduce postharvest losses and food waste by 4 percent in food grains and by 10 percent in horticulture produce.

The budget has also focused on increasing food processing, treatment, and testing facilities by supporting micro-, small, and medium enterprises and fostering innovation and entrepreneurship, which will play a crucial role in addressing postharvest losses and food waste in India.

- The Indian Council of Agricultural Research established a working group on “Post-harvest Engineering and Technology for Horticulture” to unite experts for research, development, and implementation of advanced technologies and practices. This initiative aims to improve postharvest handling, minimize losses, and maintain quality throughout the supply chain.
- The Netherlands Embassy in India, in collaboration with the Centre for Responsible Business, Food Safety and Standards Authority of India, the International Training Center Food Safety and Applied Nutrition, and WRI India commissioned a study to identify data-driven solutions across the retail, hotel, restaurant, and catering segments in Mumbai and Pune. The landscaping study aimed to map food waste patterns, identify critical gaps in the value chain, and propose actionable recommendations.

### KENYA

In 2023, the Kenya government, in collaboration with the Food and Agriculture Organization of the United Nations (FAO) and local stakeholders, embarked on the country’s first Postharvest Management Strategy. The strategy, which is expected to be launched by the end of 2024, is anchored to three strategic pillars: knowledge, skills, and tools for food management at the farm level; value-chain development services; and food waste management initiatives. These pillars are underpinned

by three strategic enablers: policy, regulations, and legislation; institutional arrangements; and research and knowledge management.

These efforts are part of Kenya's broader goal to enhance food security and reduce the economic impact of postharvest losses.

In addition to the postharvest strategy, the Retail Trade Association of Kenya, in partnership with Food Banking Kenya, FAO, WRI, and stakeholders is supporting the development of guidelines for food redistribution in Kenya. This effort helps reduce food waste and ensures that excess food reaches those in need.



## SOUTH AFRICA

In late September 2023, the South Africa Department of Forestry, Fisheries and the Environment released a Draft Strategy for Reducing Food Losses and Waste, based on four primary goals:

**Goal 1:** Creating an enabling environment for the implementation of food loss and waste-related strategies. Activities within this goal include developing guidelines to prevent food loss and waste, guidelines for marketing of imperfect or “ugly” produce, and reviewing regulations around secondary markets for farmers.

**Goal 2:** Creating a circular economy for food loss and waste in South Africa and expanding beneficiation (or treatment) of food loss and waste. This would include developing a mandatory national Food Loss and Waste Prevention Plan and expanding access to food loss and waste treatment technology (such as for farmers).

**Goal 3:** Building capacity and raising awareness around food loss and waste in South Africa. Activities within this goal include revising date labeling, adopting a food recovery hierarchy, and public information campaigns around food loss and waste.

**Goal 4:** Addressing food waste diversion and reducing greenhouse gas emissions. This goal would encompass the exploration of a carbon offset program for food loss and waste reduction activities, expanding food donation programs, and building public-private partnerships.

The comment period for the draft strategy closed in October 2023. As of the release of this publication, the revised strategy has not yet been published.



## TANZANIA

In support of Tanzania's National Post Harvest Management Strategy 2019–2029, the US Agency for International Development, in partnership with the Ministry of Agriculture, embarked on the Tuhifadhi Chakula (Let's save food) program to address the inefficiencies within horticultural and cereal value chains that lead to significant postharvest losses. The initiative's comprehensive approach spans five production regions (Mbeya, Morogoro, Njombe, Pwani, and Tanga) and five market sheds (Arusha, Dar es Salaam, Dodoma, Kilimanjaro, and Zanzibar), focusing on enhancing food handling, storage, and value addition practices. The objectives of the project include improving food handling and storage, facilitating market access, advocating for beneficial policy and regulatory frameworks, and strengthening local organizations' postharvest management capabilities.

By breaking down policy-related barriers and facilitating a seamless flow from production to market, Tuhifadhi Chakula aims not only to improve market access and optimize production but also to make a significant contribution to mitigating greenhouse gas emissions— a critical step in the fight against climate change.



## UNITED STATES

In June 2024, the Biden-Harris administration in the United States released the National Strategy to Reduce Food Loss and Waste and Recycle Organics. This strategy intends to provide a route for the United States to meet its goal of reducing food loss and waste by 50 percent by 2030, in line with SDG 12.3. The full strategy details activities already taken by government agencies such as the Food and Drug Administration (FDA), the US Department of Agriculture (USDA), and the Environmental Protection Agency (EPA), as well as additional activities that could be undertaken in the future.

The strategy contains four objectives and related activities within each objective:

**Objective 1:** Prevent food loss. Some key activities in this objective include investing in agricultural research to reduce food losses, facilitating food donation directly from the farm level, and investing in extension activities to educate farmers and individuals on food loss prevention techniques.



**Objective 2:** Prevent food waste. Key activities in this objective include changing the Food Code to allow for food donations from retail food establishments, plans for a consumer education campaign, and funding for school activities addressing food and food waste prevention.

**Objective 3:** Increase the recycling rate for all organic waste. The EPA has invested \$83 million in projects addressing organics recycling, and the USDA has invested \$30 million in composting and food waste reduction programs with local and municipal governments.

**Objective 4:** Support policies that incentivize and encourage the prevention of food loss and waste and organics recycling. The United States takes part in several international bodies and coalitions with activities relating to food loss and waste, such as the Commission for Environmental Cooperation, the Food Is Never Waste Coalition, and Champions 12.3.

The strategy also discusses the importance of public-private partnerships in reducing food loss and waste. On June 1, the FDA, USDA, and EPA renewed a memorandum of understanding with the Food Waste Reduction Alliance, which is comprised of the three major food industry associations in the United States.

## Private sector progress

As detailed in previous progress reports, the private sector as a whole is more advanced in food loss and waste reduction efforts than national governments, especially when it comes to measurement and action. Table 1 gives a sample, nonexhaus-

tive list of companies that have publicly reported significant reductions in food loss and waste to date, compared with their baselines.

## PROGRESS UPDATE

10x20x30 is an existing initiative where at least **10** of the world’s largest food retailers each engage **20** of their priority suppliers to take a “Target, Measure, Act” approach to collaboratively halve their food waste by **2030**. The logic is one of leveraging supply chain power, using the existing retailer-supplier relationship. Since 2019, WRI has mobilized 13 major food retailers and food providers and a cohort of over 200 food suppliers through this initiative, with early adopters demonstrating significant reductions in food loss and waste.

Of the 248 suppliers and retailers participating in 10x20x30, many have made significant progress in addressing food loss and waste throughout their operations:

- **74 percent** of 10x20x30 companies have set a public food loss and waste baseline against which they can measure their progress.
- **54 percent** of 10x20x30 companies have measured and publicly reported multiple years of food loss and waste data.
- The average reduction in food loss and waste among 10x20x30 companies who are reporting their food loss and waste data publicly is **15.4 percent**. As Table 1 shows, several companies are publicly reporting higher levels of reductions.

TABLE 1. **Company-level reductions in food loss and waste exceeding 20 percent**

COMPANY	% FOOD LOSS AND WASTE REDUCTION ACHIEVED
Ingka Group (IKEA)	54
Kellanova	42
Fresh Del Monte	41
Ahold Delhaize	37
Cargill	35
Pick N Pay	31
Danone North America	30
Kroger	26
Ajinomoto Foods	23

*Note:* This list is nonexhaustive. Percentages reflect a reduction of food loss or waste compared to total food handled by the business.



### BOX 3. The importance of public reporting

Most companies do not currently report their food loss and waste figures publicly. Although 74 percent of 10x20x30 companies have reported at least one year of data, this is far above the industry average. For example, when assessing 350 of the world's most prominent food and agriculture companies, the World Benchmarking Alliance found that about 15 percent of those companies reported food loss and waste data publicly.

Without public reporting, it is impossible to understand how well companies are progressing toward reducing food loss and waste within their operations to achieve SDG 12.3. It is also impossible to fully quantify the benefits to the economy, the meals saved, or the greenhouse gas emissions avoided by reducing that loss and waste. Public reporting is also necessary for holding companies accountable to their environmental, social, and governance commitments, and for acknowledging those who have demonstrated leadership in such efforts.

No national government has yet required businesses to fully and publicly report their operational food loss and waste. The United Kingdom's Department for Environment, Food and Rural Affairs had announced in 2018 plans to require food loss and waste reporting, but last year these plans were delayed until the end of 2026 at the earliest.

Although this progress is inspiring, more public reporting is needed to truly track progress (Box 3), and companies need to go further in their food loss and waste reduction efforts. However, there are many examples of strong action from the private sector to address food loss and waste. Below are some new initiatives and efforts launched by 10x20x30 partners in the past year.

#### CASE EXAMPLES

**Ahold Delhaize** has achieved a 37 percent reduction in food waste in its own operations and has implemented numerous measures to address in-store food waste as well as consumer food waste through its brands:

- Albert Heijn, based in the Netherlands, uses new scanners powered by artificial intelligence to determine strawberry shelf life. The technology has saved at least 70,000 kilograms of strawberries from food waste, and the company is exploring its application to other fruits. The stores also use electronic price tags that allow an algorithm to automatically mark down food approaching its sell-by date, thus minimizing perishable products remaining unsold.
- AB Vassilopoulos, based in Greece, has implemented nine public awareness campaigns for its customers, each of which is estimated to have reached 2 million users. Campaigns involved asking customers to consider if they need everything in their basket, to avoid waste. Additionally, within the last two years, more than 10 operational waste reduction measures have been implemented or are planned, from automated store ordering to training employees.

- Delhaize, based in Belgium, and start-up Wastech launched the “From Waste to Feed” project, an innovative system that, for the first time, uses live larvae to process food surpluses. Unsold fruit and vegetables from the supermarket are put to good use, because the larvae that eat the surplus food are then processed into protein as a supplement for animal feed.

**Ajinomoto Foods**, a Japanese food manufacturer, has achieved a 23 percent reduction in food waste in its own operations through activities such as improving manufacturing processes, refining demand forecasting, and extending “best-before” time periods on its packaging. In March 2024, Ajinomoto also released an advertisement highlighting national statistics of food waste in Japan and featuring a monster comprised of food waste named Foodlosslla rampaging through the streets of Tokyo. As of the time of publication, this advertisement has reached nearly 2.6 million views online.

**Bel Group**, a dairy company based in France, has addressed food loss and waste throughout its operations. Activities include more regular milk collection from farms to reduce spoilage, valorization of coproducts for use in new recipes, and development of single-size portions to reduce leftover waste at home and in catering. In September 2023, Bel Group Canada also committed to a goal of zero destruction of finished products by 2030.

**Danone** has reduced food waste in its global operations by 19.8 percent compared to a 2020 baseline, and Danone North America has achieved a 30 percent reduction to date. Danone North America has seen reductions in operational food waste in part due to the Spoiler Alert sales platform, where foods

close to expiration are matched with appropriate buyers. Since partnering with Spoiler Alert, Danone has seen a 50 percent increase in the sell-through rate of its excess product.

**Mondelez**, a multinational food manufacturer, has launched several related initiatives to reduce food loss and waste at the consumer level. One initiative addressed uncertainty around best-before dates by printing the “Often Good After” logo on packaging. Social media videos in Germany encouraged consumers to look, smell, and taste products before discarding them. In Sweden, surplus products were donated to Matmissionen Supermarkets, where they were sold at reduced prices to economically vulnerable consumers.

**Pick N Pay**, a South Africa–based retailer, has reduced food waste in its operations by 31 percent over the past five years. Pick N Pay has implemented improved forecasting, invested in shelf-life extension technologies, and improved employee training around cold storage facilities.

**Unilever**, a global food manufacturer, encourages individual facilities to develop innovative solutions in their own factories, which then are communicated across the company. For example, in Heilbronn, Germany, the development of a Rework machine by the Knorr team reduced food waste by reprocessing unused packaged food, saving 60 tons of that food in just six months. Similarly, in Poznan, Poland, the Hellmann’s team optimized their decanting process, reducing mayonnaise

waste by up to 200 tons annually. In Corlu, Turkey, the ice cream factory team cut food waste by 30 percent through daily waste tracking and targeted equipment audits, highlighting the power of collaboration in driving efficiency and sustainability.

### **10x20kx30**

In 2024, Champions 12.3 launched the 10x20kx30 initiative. 10x20kx30 is a new initiative where **10** major farmgate-facing agribusinesses will each engage at least 20,000 (**20k**) of their supply base of small-scale farmers (ones farming less than two hectares) to follow the “Target, Measure, Act” approach to reducing food losses by 50 percent by **2030**. Based on the success of the 10x20x30 approach to addressing food waste, the logic of this strategy is that farmgate-facing agribusinesses have a unique ability to engage small-scale farmers through existing outgrower programs.

10x20kx30 has the potential to deliver significant impacts across a part of the supply chain that is very challenging to reach. We are leveraging expertise from companies already using this model and who have demonstrated it works. Small-scale farmers represent 84 percent of all farms and are responsible for 32 percent of world food production. Tackling on-farm losses among small-scale farmers will deliver both GHG emission reductions and critical economic and developmental cobenefits in low- and medium-income countries.



## IN CLOSING

The world's food loss and waste problem has remained unchecked for too long. Although there are encouraging signs of progress, at current levels of action the world will not achieve SDG 12.3. Why is not a mystery—we know what needs to be done. As the world approaches the 2030 SDG deadline, governments, countries, and individuals must consider how to scale up action leading to 2030 and beyond. Using the Target-Measure-Act framing, several key steps can be taken *immediately* to jump-start progress.

### Target:

**Countries need to recognize SDG 12.3 as their food loss and waste reduction target, and that target needs to be represented throughout national climate strategies and communications and translated into meaningful policies.** The Emirates Declaration represents a positive development in this regard, but countries need to incorporate food loss and waste into their NDCs and further integrate food loss and waste into national agricultural and climate strategies.

**Companies need to also adopt aggressive food loss and waste reduction targets**—strong goals lead to prioritization within a company. If a company has already adopted a target, it can strengthen that target by considering its potential impact both upstream at the farm level and downstream at the consumer level—two areas whose contributions to food loss and waste have been insufficiently considered.

### Measure:

**Governments need to report national food loss and waste figures and track progress over time and identify hot spots** (such as key commodities and sectors) if they have not already done so. Although an analysis of food loss and waste throughout the entire food supply chain can be challenging, countries should focus on identifying these key hot spots for immediate attention while continuing to gather additional data.

**Companies need to report food loss and waste publicly**, and governments need to create the enabling environment for this to happen (including considering mandatory reporting of food loss and waste figures by businesses). Companies and governments also need to incorporate food loss and waste impacts into their greenhouse gas reporting.

### Act:

**Governments and companies need to address their hot spots**, as identified by measurement. In some countries, hot spots will be priority crops or commodities. In others, actions might focus on the consumer side of the supply chain. Climate and food security need to be priorities when considering which hot spots to address.

**Both governments and companies need to turn their attention to the farm level**, which remains an understudied and underaddressed area of the food loss and waste puzzle. Small-scale farmers have their livelihoods disproportionately impacted by losses, and yet they have not been prioritized in food loss and waste activities. Governments need to address the farm level in their food loss and waste planning, and businesses need to extend food loss reduction activities to the farm level.

**Governments and companies also need to address consumer food waste and go beyond public information campaigns.** Public information campaigns are a good start for raising awareness of consumer food waste, but they can only go so far in changing the way consumers purchase, consume, and waste food. While the complex nature of this issue makes it a difficult problem to fix, a wide range of behavior change solutions are available to prevent and reduce food waste at home. Governments and companies should identify more consistent methods for measuring household food waste, fund behavioral change research in household settings, and replicate trials of behavioral science interventions across contexts to determine which are most effective.

**Financing organizations and philanthropists need to contribute to the more than \$300 million in investments that are ready today to reduce food loss and waste.** The global philanthropy road map for food loss and waste identifies these investment-ready projects, and philanthropists need to follow suit and invest in these transformational opportunities. Taking action now will show immediate benefits.

These steps are merely a start to addressing our global food loss and waste plight, but they will help to move progress in the right direction. There is no more time to delay in acting on food loss and waste—for people or for the planet.



## REFERENCES

- FAO (Food and Agriculture Organization of the United Nations). 2013. “Food Wastage Footprint: Impacts on Natural Resources.” <http://www.fao.org/3/i3347e/i3347e.pdf>.
- Flanagan, K., B. Lipinski, and L. Goodwin. 2019. “SDG Target 12.3 on Food Loss and Waste: 2019 Progress Report.” Champions 12.3. <https://champions123.org/sites/default/files/2020-09/champions-12-3-2019-progress-report.pdf>.
- Glauber, J., D. Laborde, and A. Mamun. 2022. “From Bad to Worse: How Russia-Ukraine War-Related Export Restrictions Exacerbate Global Food Insecurity.” International Food Policy Research Institute (blog), April 13. <https://www.ifpri.org/blog/bad-worse-how-export-restrictions-exacerbate-global-food-security>.
- Hanson, C., and P. Mitchell. 2017. “The Business Case for Reducing Food Loss and Waste.” Champions 12.3. <https://champions123.org/sites/default/files/2020-08/business-case-for-reducing-food-loss-and-waste.pdf>.
- IPCC (Intergovernmental Panel on Climate Change). 2020. *Climate Change and Land: An IPCC Special Report on Climate Change, Desertification, Land Degradation, Sustainable Land Management, Food Security, and Greenhouse Gas Fluxes in Terrestrial Ecosystems*. Edited by P.R. Shukla, J. Skea, E. Calvo Buendia, V. Masson-Delmotte, H.-O. Pörtner, D.C. Roberts, P. Zhai, et al. Geneva: IPCC. [https://www.ipcc.ch/site/assets/uploads/sites/4/2021/07/210714-IPCCJ7230-SRCCL\[1\]Complete-BOOK-HRES.pdf](https://www.ipcc.ch/site/assets/uploads/sites/4/2021/07/210714-IPCCJ7230-SRCCL[1]Complete-BOOK-HRES.pdf).
- Lipinski, B. 2022. “SDG Target 12.3 on Food Loss and Waste: 2022 Progress Report.” Champions 12.3. [https://champions123.org/sites/default/files/2022-09/22\\_WP\\_SDG%20Target%2012.3\\_2022%20Progress%20Report\\_v3\\_o.pdf](https://champions123.org/sites/default/files/2022-09/22_WP_SDG%20Target%2012.3_2022%20Progress%20Report_v3_o.pdf).
- Lipinski, B., A. Clowes, L. Goodwin, C. Hanson, R. Swannell, and P. Mitchell. 2017. “SDG Target 12.3 on Food Loss and Waste: 2017 Progress Report.” Champions 12.3. <https://champions123.org/sites/default/files/2020-09/champions-12-3-2017-progress-report.pdf>.
- Treisman, R. 2022. “Global Food Prices Hit Their Highest Recorded Levels Last Month, Driven Up by the War.” National Public Radio, April 8. <https://www.npr.org/2022/04/08/1091705608/global-food-prices-record-high-ukraine-war>.
- UN (United Nations). 2017. “Sustainable Development Goals.” <https://www.un.org/sustainabledevelopment/sustainable-development-goals/>.
- WWF-UK. 2021. *Driven to Waste: The Global Impact of Food Loss and Waste on Farms*. Woking, UK: WWF-UK. <https://www.worldwildlife.org/publications/driven-to-waste-the-global-impact-of-food-loss-and-waste-on-farms>.

Photo credits: p. 1 flickr.com/World Bank Photo Collection, p.3 unsplash.com/Chanwei, p. 6 flickr.com/ICRISAT, p. 10 unsplash.com/Arno Senoner.

## ACKNOWLEDGMENTS

The author thanks the members of Champions 12.3 and its associates for reviewing and providing helpful input on draft versions of this publication. The author acknowledges, in particular, the following individuals for their thorough comments: Stacy Blondin (WRI), Yvette Cabrera (Natural Resources Defense Council), Liz Goodwin (WRI), Craig Hanson (WRI), Swati Hegde (WRI), Jillian Holzer (WRI), Jennifer Kelly (WRAP), Cristina Lisetchi (European Commission), Rebecca Lovelady (Danone), Tom Qusted (WRAP), Richard Swannell (WRAP), James Wangu (WRI), and Bartosz Zambrzycki (European Commission).

The author thanks Alex Martin for copyediting and Romain Warnault for publication layout and design.

This publication represents the views of the author alone.

---

## ABOUT CHAMPIONS 12.3

Champions 12.3 is a unique coalition of public and private sector leaders from around the world dedicated to inspiring ambition, mobilizing action, and accelerating progress toward achieving SDG 12.3.

Visit [www.champions123.org](http://www.champions123.org) for more information.

CHAMPIONS  12.3

