



INTERNATIONAL
**FOOD
WASTE**
COALITION

Innovation Lab 2022

The top 45 innovations helping to reduce food waste in the hospitality & food service sectors

Introduction

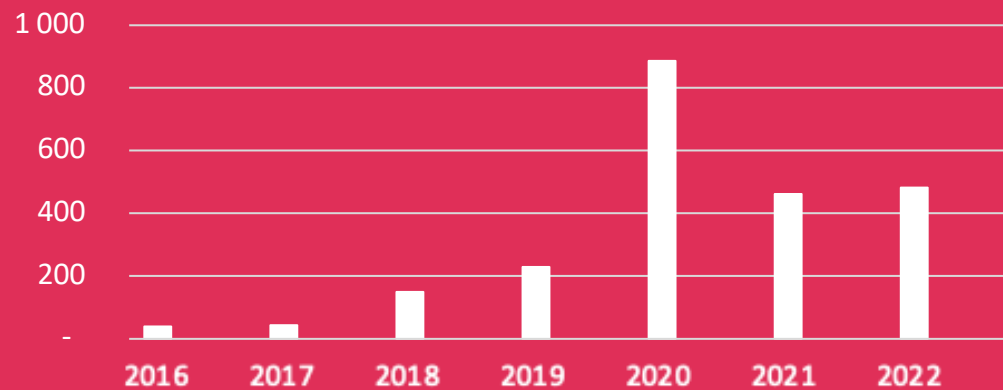
A key objective of IFWC is to foster innovation and accelerate the development and deployment of impactful food waste solutions. To achieve this, we are continually screening and evaluating new solutions through collaborative projects within the IFWC ecosystem.

We are therefore delighted to present a selection of 45 companies making a significant contribution to our common objectives: to reduce food loss and waste, to value bio-waste, to transform the packaging industry with biodegradable material, and to extend product shelf life. You can find more details on all these companies at our our digital [Innovation Lab](#)

Total funding for these companies has increased significantly over the last 7 years (see below) reaching a total of €2 billion.

If we are to meet the challenge laid down by UN SDG 12.3, it is essential that we continue to connect innovative companies with leaders from the hospitality and food service sectors and investors. And that is exactly what IFWC is committed to do!

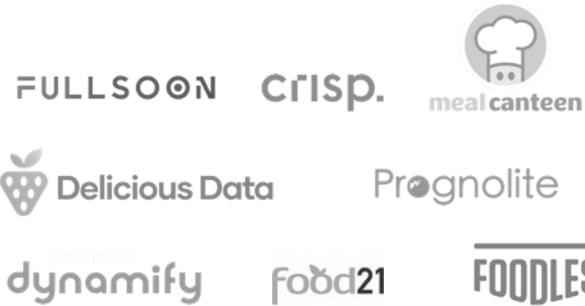
2016 - 2022 Innovation funding (€k)



The Top 45:



Demand Forecasting



Extend Shelf Life



Measuring & Reporting



Secondary Markets



Organic Waste Valorization



Smart Labels & Packaging



Sustainable Packaging



Menu planning, Portion Control and Consumer Engagement are other priorities for which solutions are being screened

Demand Forecasting



FULLSOON

Fullsoon is a predictive tool, collecting data and helping restaurants and hotel to predict the guest attendance and menu ordering up to two weeks in advance. By doing so, it does optimize the restaurant food preparation and prevent food waste



Country:
France



Development Stage:
Commercial



Founding Date:
2022



Contact:
Hassan Chaudhary, Founder



Problem Solved:

Fullsoon was able to predict the guest attendance as up to 95% accuracy and ordered dishes as up to 85% when performing a trial with the group Big Mamma.



Latest News:

23/03/2022 – [Hassan-Ali Chaudhary chasse le gaspi dans les restaurants](#)
12/07/2022 – [Fullsoon chasse le gaspillage dans les restaurants](#)
01/07/2022 – [Double gagnant pour le duo Fullsoon x Accor](#)



Existing Customers:

- Accor
- Fairmont
- GLaDalle
- SmashinBurger
- Drugstore Publicis



Total Funding:

€m



Target Segments:

- restaurants
- mass caterers
- hotels



Investors:

crisp.

A platform that leverages the power of the cloud to connect and analyze data sources in real-time, providing meaningful insights and trend



Country:
USA



Development Stage:
Commercial



Founding Date:
2016



Contact:
Are Traasdahl, Founder



Problem Solved:

Crisp has identified that a leading cause of retail food waste is slow-moving, inaccurate data in the supply chain. By breaking down data silos and connecting distributors, retailers and manufacturers with real-time data sharing, Crisp allows more accurate production planning, optimized product assortments, and better inventory management. The solution helps to increase supply chain efficiency, improve profitability, and reduce waste.



Latest News:

02/02/2022 – [Crisp Raises \\$35M in Series B](#)
21/06/2021 – [Crisp endorsed by UNFI to provide suppliers with real-time insights](#)
04/05/2021 – [Crisp customers share how data reduces food waste](#)
20/04/2021 – [Crisp joins Snowflake Data Marketplace to integrate live retail data](#)
26/03/2021 – [Crisp joins NielsenIQ Connect Partner Network to help brands](#)
15/07/2020 – [Crisp Raises \\$12M in Series A Funding](#)
16/09/2019 – [Crisp Raises \\$14M in Series A Funding](#)

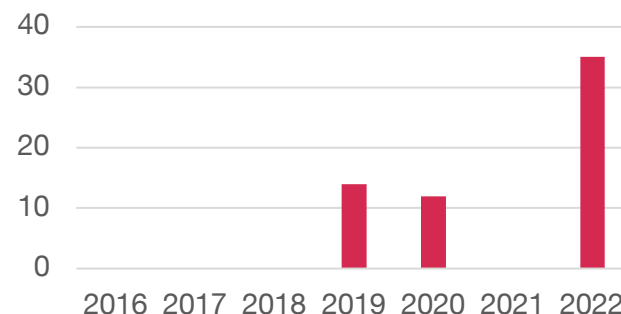


Existing Customers:

- Greenleaf Foods
- High Road Craft Brands
- Mezzetta
- Flow Alkaline Spring Water



Total Funding:
€61m



Target Segments:

- retailers
- restaurants
- mass caterers



Investors:

- FirstMark Capital
- HDM
- Spring Capital
- Swell



meal canteen

A digital service to allow each user of the app to order their next meal the ahead of time. It tackles food waste at its source



Country:
France



Development Stage:
Commercial



Founding Date:
2016



Contact:
Denis Olivier, Founder



Problem Solved:

Where installed, the application has showed a food loss reduction of 18% after 3 month and over 50% (189g/person to 84g/person) after 6 months. The average engagement rate was over 40% after 3 months. No investment is requirement upfront, no maintenance and update cost are charged. The application is also free for the guest.



Latest News:

06/07/2022 – [Réserver les repas pour moins jeter](#)

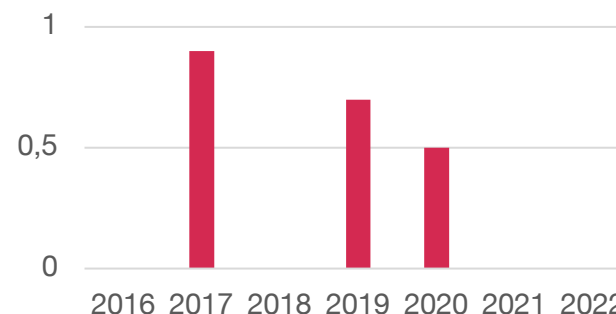


Existing Customers:

- Dupont Restauration
- French Ministry of Army
- BNP Paribas



Total Funding:
€2,1m



Target Segments:

- mass caterers



Investors:

- HAB Partners



Delicious Data

Artificial Intelligence tool that enables customers to reduce avoidable food waste, increase operational efficiency and improve the operational result. It offers four smart product features to accurately plan food operations, creating greater efficiency and transparency.



Country:
Germany



Development Stage:
Commercial



Founding Date:
2017



Contact:
Markus Fröhlich, CRO



Problem Solved:

Data Delicious has implemented its predictive tool at Apetito Catering leading to :

- 50 % better planning accuracy
- 40 % better production accuracy
- 3.5 % less use of goods
- 15 % less Food Waste



Latest News:

05/09/2022 – [Serie A-Finanzierung für Delicious Data](#)



Existing Customers:

- Apetito Catering
- Bayer Gastronomie
- Ergo Gourmet
- WISAG
- Bakery Höflinger Müller



Investors:

- Basinghall Partners



Total Funding:
€2,5m



Target Segments:

- mass caterers
- hotels
- restaurants

Prognolite

An AI-based solution dedicated to the food service and hospitality segments. Prognolite predicts customers' attendance and supports the planning of food purchasing and preparation, thereby reducing kitchen waste.



Country:
Switzerland



Development Stage:
Commercial



Founding Date:
2015



Contact:
Roman Lickel, Co-founder



Problem Solved:

Approximately 12% of food waste in the restaurant and food service sectors is related to over-production.

Through its powerful prediction capabilities, Prognolite helps providers to optimize staff scheduling and simultaneously tackle food waste



Latest News:

17/09/2020 – [Prognolite secures funds for its DACH expansion](#)
17/09/2020 – [Prognolite raised CHF 1.25 million](#)

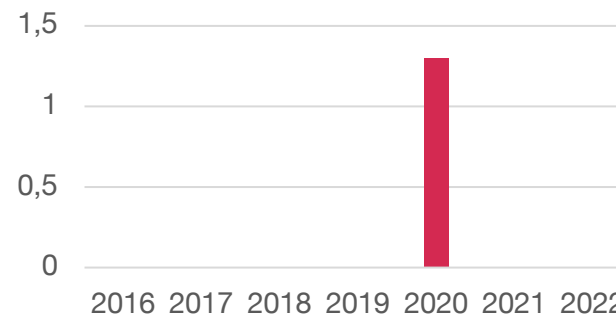


Existing Customers:

- SV Group
- Burger King
- Jungfrau
- Valora



Total Funding:
€1,3m



Target Segments:

- mass caterers
- hotels
- restaurants



Investors:

- Innovationsstiftung der SZKB



An app-based digital catering platform that gives customers options such as scan-and-go, pre-order and pre-pay, home delivery, table service, reservations and loyalty points.



Country:
U.K



Development Stage:
Commercial



Founding Date:
2015



Contact:
Maxwell Harding, Founder



Problem Solved:

Dynamify works with food service partners to deliver a mobile-first experience developed with the consumer and their smartphone in mind.

It removes shared touchpoints, eliminates physical queuing (up to 6.5 mins on average), saves labor cost (up to 33%) and reduces food waste through pre-ordering.



Latest News:

08/09/2020 – [Sodexo goes digital with Dynamify partnership](#)

12/02/2020 – [Elior partners with Dynamify to launch mobile application](#)



Existing Customers:

- Sodexo
- Elior
- Alchemista
- Lexington



Total Funding:
€m



Target Segments:

- mass caterers
- hotels
- restaurants



Investors:

- Undisclosed



An AI based forecasting tool that aims to develop solutions with all stakeholders involved (food processing, wholesale, retail, consumers) and generate company- and industry-focused impacts through a B2B2C community.



Country:
Germany



Development Stage:
Pilot



Founding Date:
2019



Contact:
Friedrich Rantzau, Co-founder



Problem Solved:

The forecasting model has been introduced to more than ten companies (food processors and retailers).

The results showed encouraging results such as a halving of food waste within five weeks, higher forecast accuracy compared to existing system forecasts, a significant reduction in the time required for the planning process and overall cost savings.



Latest News:



Existing Customers:

- H&J Brüggen (pilot)
- Landbäckerei Matthiessen (Pilot)



Total Funding:

€m



Target Segments:

- mass caterers
- hotels
- restaurants



Investors:



A new player in collective catering that offers gourmet and ultra-fresh menus delivered every day in fridges equipped with patented technology and 100% made in France. Everyone can now have access to a gourmet, flexible and attractive catering solution at their workplace.



Country:
France



Development Stage:
Commercial



Founding Date:
2015



Contact:
Clément Bonhomme, Co-founder



Problem Solved:

Committed to healthy and sustainable food : every receipt follow a strict quality charter and all products are sourced seasonally and locally.

It also reduces food waste by half through its algorithm which allows to deliver the right quantity. Up to three times cheaper than a traditional canteen.



Latest News:

06/04/2022 – [France's Foodles feeds workforce fresh food from formidable fridges](#)
06/04/2022 – [Foodles debuts in the UK](#)
14/09/2021 – [Foodles to raise €31M series B](#)
09/05/2019 – [Foodles raises another \\$10 million for its cloud canteen](#)



Existing Customers:

- Accor
- Ubisoft
- Bouygues
- Hermes

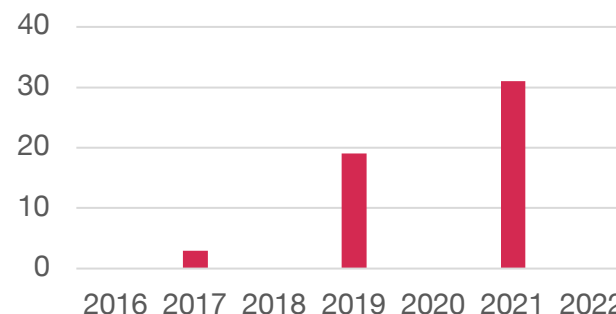


Investors:

- Adelle
- BPI France
- Credev
- DN Capital
- Elior
- InfraVia Capital Partners
- Large Venture



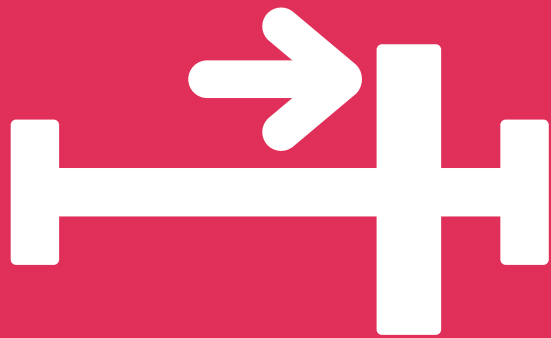
Total Funding:
€53m



Target Segments:

- mass caterers
- hotels
- restaurants

Extend Shelf Life





A layer of tasteless, odorless, plant-based protection on the surface of fruit and vegetables. Apeel helps to keep moisture in and oxygen out, which means produce lasts twice as long.



Country:
USA



Development Stage:
Commercial



Founding Date:
2012



Contact:
Marije Van Dalen, CCO Europe



Problem Solved:

Single-use plastic is one of the major contributors to plastic pollution.

Apeel has developed a coating to slow down fruit and vegetable degradation by preventing dehydration and keeping oxygen out. With the coating in place on an avocado, the softening rate decreases by 60% and water loss by 30%, thereby doubling the ripeness window.



Latest News:

25/03/2022 – [Apeel announces Retail Advisory Board](#)
24/02/2022 – [UK retailer partners with Apeel Sciences for citrus, avocados](#)
16/02/2022 – [Eroski debuts Apeel citrus](#)
15/02/2022 – [Tesco to Try Apeel Edible Coating](#)
18/08/2021 – [Apeel bites into another \\$250M funding round](#)
01/08/2021 – [Apeel Sciences Secures New Funding to Fight Food Waste](#)
26/05/2020 – [Preventing food waste nets Apeel \\$250 million](#)



Existing Customers:

- Swakefern
- The Fresh Grocers
- Dearborn Market
- Fairway

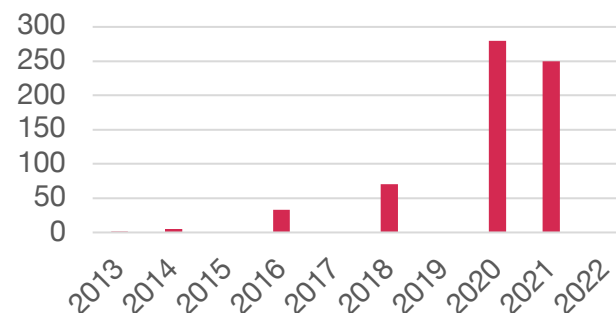


Investors:

- Andreessen Horowitz, Astanor, GIC, K3 Venture, Mirae Asset Capital, Rock Creek Group, Sweetwater Private Equity, Tao Capital partners, Tech Coast Angels, Temasek, Tenere Capital, Upfront Venture,



Total Funding:
€639m



Target Segments:

- farmers
- retailers
- hotels
- restaurants
- mass caterers



A sustainable photobiological solution to decontaminate seeds, fruit and vegetables and water improving shelf life, nutrients and health benefits whilst reducing chemicals use, food loss and waste. Boxilumix® has been awarded by Solar Impulse Foundation.



Country:
France



Development Stage:
Pilot



Founding Date:
2019



Contact:
Christine Roynette, CEO



Problem Solved:

In 2020 the technology was validated on various fruit and vegetables . Impact was evaluated as follow:

- 4x extended shelf-life
- Up to 50% reduction of agrochemical products
- Up to 50% reduction of loss and waste.
- 99,99% of virus, bacteria, and mold eliminated in few minutes



Latest News:



Existing Customers:



Investors:



Total Funding: €m



Target Segments:

- farmers
- retailers
- hotels
- restaurants
- mass caterers



A tasteless, odorless layer that extends the lifespan of fresh or shelf-stable foods. The solution is made from naturally derived silk proteins that prevent dehydration, keep oxygen out and make it difficult for bacteria, yeast and mold to grow.



Country:
USA



Development Stage:
Commercial



Founding Date:
2018



Contact:
Adam Behrens, Co-founder



Problem Solved:

Mori's technology addresses two of the most urgent challenges related to food. First, it reduces food spoilage by extending the lifespan of fresh produce. Secondly, it reduces the need for wax, fungicides, chemicals and plastic packaging

The technology can be applied to any shape, size or texture by dunking or spraying. It is compatible with fruit, vegetables or meat.



Latest News:

14/03/2022 – [Mori Secures \\$50 Million in Series B1 Funding](#)

15/04/2021 – [Mori Raises \\$16 Million in Series B Funding](#)

18/07/2020 – [Mori Raises \\$12M in Series A Funding](#)



Existing Customers:

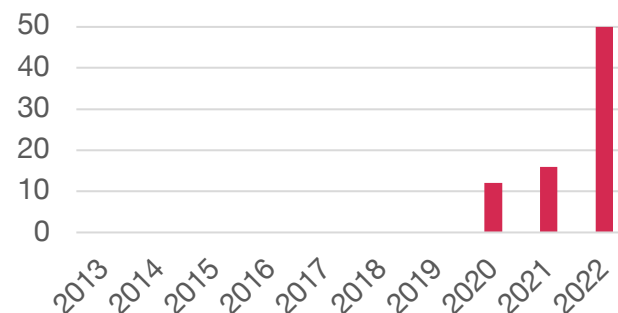


Investors:

- Acre Venture Partners, Andreessen Horowitz, Blindspot, Closed Loop Partners, Collaborative Funds, Drawdown Fund, For Good Ventures, Knollwood Investment, Prelude Ventures, Refractor Capital, The Engine, Thia Ventures, Toba Capital



Total Funding:
€78m



Target Segments:

- farmers
- retailers
- hotels
- restaurants
- mass caterers



A handheld scanner coupled with an AI cloud-based system allows you to make smarter produce supply chain decisions that save money and improve freshness.



Country:
Netherland



Development Stage:
Commercial



Founding Date:
2019



Contact:
Marko Snickers, Co-founder



Problem Solved:

Unpredictable growing conditions, limitations in the human food inspection process and consumer demand for high quality all make it difficult to manage produce by its freshness.

OneThird technology offers insight into the internal biological processes of fresh produce, allowing us to determine exactly how much time remains until food can no longer be eaten or sold..



Latest News:

20/09/2021 – [Large strawberry grower tests harvest forecasting technology](#)

21/04/2021 – [Dutch startup OneThird raises €1.5M](#)



Existing Customers:



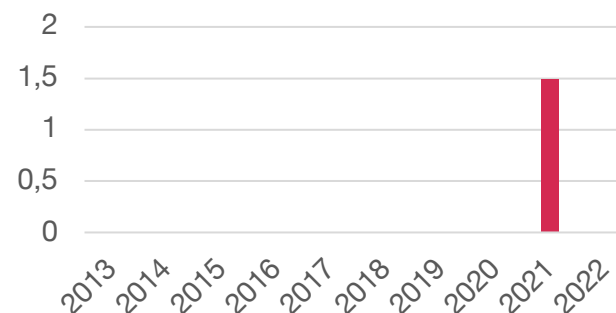
Investors:

- Oost NL
- Shift Invest



Total Funding:

€1,5m



Target Segments:

- farmers
- retailers
- hotels
- restaurants
- mass caterers



hazel technologies inc.

A plant growth regulator (methylcyclopropene) that blocks Ethylene receptors to slow down the ripening process of fruit and vegetables to extend shelf life by days or weeks.



Country:
USA



Development Stage:
Commercial



Founding Date:
2016



Contact:
Pat Flynn, Co-founder



Problem Solved:

Extending the shelf life of fresh produce is a major challenge that can be tackled by reducing the respiration process.

Hazel Technologies has developed a simple sachet that releases methylcyclopropene that blocks Ethylene for up to 3 weeks. By inhibiting Ethylene absorption, the ripening process is slowed down.



Latest News:

01/04/2022 – [Hazel Technologies Partners With The Fredericksburg Peach Company®](#)
21/01/2022 – [Hazel Technologies sets up in Singapore](#)
17/01/2022 – [Hazel Tech reaches \\$1.5MM in USDA funding with recent grant](#)
22/11/2021 – [Hazel Technologies Expands to West Coast](#)
20/09/2021 – [Hazel Tech partners with Jasmine Vineyards for table grapes](#)
13/04/2021 – [Hazel Technologies Closes \\$70 Million Series C Financing](#)



Existing Customers:

- Oppty, Mission, WP Produce, Kingsburg Orchard, Orchard View Cherries, BelleHarvest

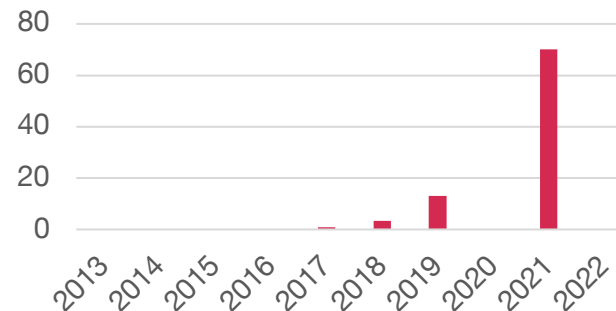


Investors:

- Agriculture Technologies Fund, Asahi Kasai, Grantham Fund, Jordan Park Group, Pangaea Ventures, Pontifax Global Fund, Rhapsody Venture Partners, S2G Ventures, Serra Venture, Temasek, Valley Oak Investments, Venturewell



Total Funding:
€87m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers

DENBA⁺

A unique patented technology that extends the freshness of food using a water molecule re-activation technology



Country:
Japan



Development Stage:
Commercial



Founding Date:
2004



Contact:
Fran Maunder, Sales



Problem Solved:

The water molecule re-activation technology, not only extend the freshness of food and flowers, but increase the quality and taste of produce, maintain the colour and the nutritional value, typically lost by standard freezing and thawing. It is the first to thaw food evenly and creates unique ice crystals that do not penetrate the cell membrane which ensures weight consistency, colour and taste.



Latest News:

17/01/2022 – DENBA selected as one of the global logistic providers of Japan!
28/07/2021 – Completion of FDA registration for DENBA+ Series
18/01/2021 – Shinshu starting to use DENBA containers in children's cafeteria
04/09/2020 – Launch of New Product DENBA GREEN
30/07/2019 – DENBA+ Secures Alliance with CIMC



Existing Customers:

- Walmart Japan, CIMC International, Marubeni, Itochu, China Haier, Aucma group, Hoshizaki co

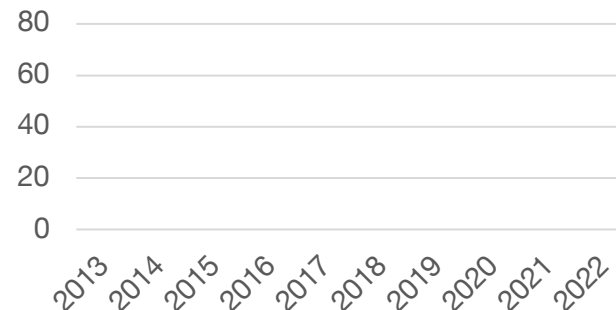


Investors:



Total Funding:

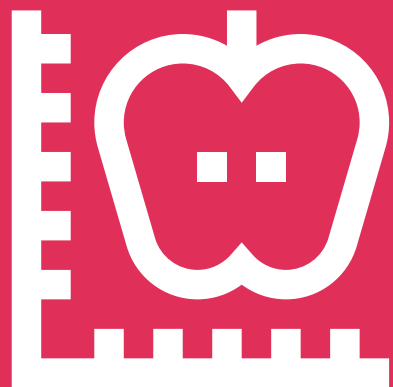
€m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers

Measuring and Reporting





An AI based solution that continuously scans plate waste in restaurants, hotels and food service locations.



Country:
France



Development Stage:
Pilot



Founding Date:
2019



Contact:
Vincent Garcia, Co-founder



Problem Solved:

According to Ademe, food waste accounts for between 14-17% of costs in France's food service sector.

Kikleo is the only solution with the ability to continuously scan and analyze plate waste. The model is still at the prototype stage and has been tested in several



Latest News:



Existing Customers:

- AP-HP
- Crous



Investors:



Total Funding:
€m



Target Segments:

- hotels
- restaurants
- mass caterers



With AI as its foundation, KITRO offers an automated plug and play food waste data collection and analysis solution for food and beverage outlets.



Country:
Switzerland



Development Stage:
Commercial



Founding Date:
2016



Contact:
Naomi McKenzie, Co-Founder



Problem Solved:

An internet-connected camera and scale identifies, and weighs food thrown into the bin. Food waste data is then processed and displayed on a customized dashboard.

Based on a subscription model, Kitro is targeting canteens, hotels and restaurants. The solution helps to drive down food waste and reduce costs by up to 8%.



Latest News:

10/12/2021 – [KITRO banks fresh capital for growth and expansion](#)



Existing Customers:

- Ecole Polytechnique
- World Economic Forum
- SwissRE



Investors:

- Foundation for technology innovation
- Miteinander
- Quadia
- The Technology Fund



Total Funding:
€1,8m



Target Segments:

- hotels
- restaurants
- mass caterers



An artificial Intelligence that helps large hospitality businesses run more profitable, sustainable kitchens by cutting food waste in half.



Country:
U.K



Development Stage:
Commercial



Founding Date:
2013



Contact:
David Jackson CMO



Problem Solved:

Data collected in over 1,500 kitchens show that 5%-15% of food a kitchen purchases is wasted. Winnow offers a range of tracking solutions for any kitchen from a simple tablet to AI-enabled tools which automate data collection. Combine with Winnow's analytics platform teams typically see food waste cut in half, leading to food purchasing cost savings of 2%-8%.



Latest News:

27/07/2022 – [IKEA more than halves food waste across 400 stores](#)
07/10/2022 – [Hotel Group Iberostar Uses Artificial Intelligence To Become Zero Waste](#)
01/06/2022 – [ISS Partners with Winnow Solutions to Tackle Food Waste](#)
10/02/2022 – [The Future of Food Waste Reduction – with Winnow. TTN 591](#)
09/07/2021 – [ISS Announces Program to Cut Food Waste in Half by 2024](#)
07/06/2021 – [Elior: First caterer in Italy to bring Artificial Intelligence into Italian](#)
17/10/2019 – [Winnow raises \\$12M Series B](#)



Existing Customers:

- Accor
- Compass
- IHG
- ISS
- IKEA
- Hilton
- Iberostar

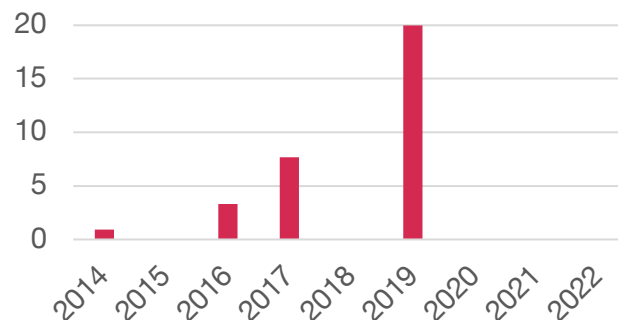


Investors:

- Circularity Capital
- D-Ax
- Ingka
- Mustard Seed
- The Ingenious Group



Total Funding:
€31,9m



Target Segments:

- hotels
- restaurants
- mass caterers
- casinos
- cruise ships
- retail



A fully automated food waste registration in the kitchen down to the ingredient level. Outfitting the waste bin with a smart camera and a connected scale, all food waste is automatically captured and categorized. Coupled with a dashboarding solution it provides automated advice to reduce food waste by over 50%



Country:
Netherlands



Development Stage:
Commercial



Founding Date:
2019



Contact:
Olaf van der Veen, CEO



Problem Solved:

An average foodservice location, like a hotel, catering institution or restaurants, with 100+ covers per day, wastes between 30-90 kilos of perfectly edible food. By giving tangible insights in their food waste streams, Orbisk enables their customers to save over 50%, lowering food waste to the lowest margins achievable and saving locations tens of thousands of euros each year, doubling profit margins.



Latest News:

29/09/2022 - [Accor teams say no to food waste](#)
23/07/2022 - [Orbisk expands in the US](#)
16/02/2022 - [Orbisk launches new solution to reduce industry food waste by up to 50%](#)
14/02/2022 - [AI smart food monitor is at your service](#)
14/10/2021 - [Dutch foodtech startup Orbisk secures €2.4 million in EU grant](#)
27/08/2021 - [Orbisk to commercialise its system to tackle food waste](#)
23/08/2021 - [Orbisk Raises €1.05M for its Food Waste Fighting AI for Restaurants](#)



Existing Customers:

- Accor
- Sodexo
- Albron
- Bilderberg

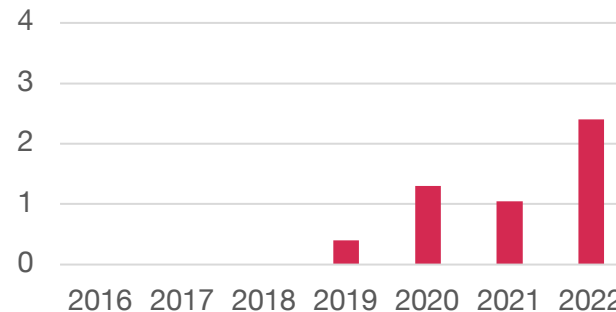


Investors:

- Doen Participaties
- EIT Food
- Peakbridge
- Brabant Ventures



Total Funding:
€5,15m



Target Segments:

- hotels
- restaurants
- mass caterers



A multi-site management software solution that allows restaurants to better manage, supply and control their operations. It enables users to take greater control over the food preparation process, measurement and analysis of food waste and health control plans.



Country:
Spain



Development Stage:
Commercial



Founding Date:
2008



Contact:
Emmanuel Grelaud, CEO Easyls



Problem Solved:

The solution has been used for more than two years in the central kitchen of Douardenez in France, helping the team to forecast the right quantities of food to be cooked each day. Supply orders have subsequently been optimized, saving time and money. Stock management is facilitated.



Latest News:

03/06/2021 – [PSG-Backed MAPAL Group Welcomes Easyls to the Family](#)



Existing Customers:

- Rest Alliance
- Caisse des Dépôts
- Big mama
- Frichti
- Aestra



Total Funding:

€m



Target Segments:

- hotels
- restaurants
- mass caterers



Investors:



The Leanpath Food Waste Prevention Platform is a combination of in-kitchen food waste trackers that weigh and characterize food waste; and back-end software that analyses that data, identifies trends, and sets workflows that enable kitchen teams to prevent their most pressing food waste issues.



Country:
USA



Development Stage:
Commercial



Founding Date:
2004



Contact:
Andrew Shakman, Founder



Problem Solved:

Located just outside Washington, DC, The Ritz-Carlton, Pentagon City (RCPC) is part of the global Marriott brand, which has committed to reducing its food waste by 50% by 2025. Working with Leanpath, Pentagon City has already exceeded that goal, with a 54% reduction in food waste.



Latest News:

07/03/2022 – [Two new pledges to reduce food loss and waste at Google](#)
22/09/2021 – [Leanpath introduces a new way to understand your food donations](#)
15/09/2021 – [Sodexo changes kitchen behaviour with data-led equipment programme](#)
06/05/2021 – [Sodexo partners with Leanpath to cut waste](#)
04/08/2020 – [Leanpath unveils new tracking platform for Covid-19-era foodservice](#)
22/09/2019 – [SaaS Capital Provides \\$7 Million in Growth Funding to Leanpath](#)

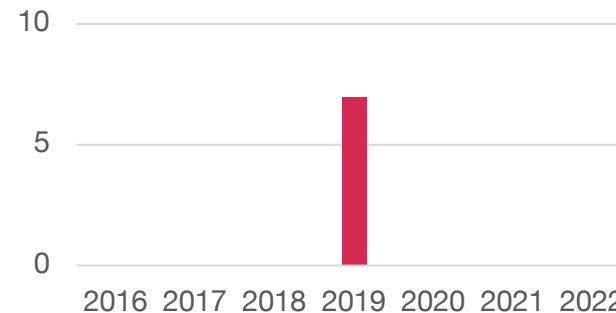


Existing Customers:

- Sodexo
- Google
- Aramark
- Compass



Total Funding:
€7m



Target Segments:

- hotels
- restaurants
- mass caterers
- healthcare
- corporate dining
- college and university



Investors:

- SaaS Capital

Secondary Markets





A cloud-based digital app solution to organize the donation or sale of unsold food.



Country:
France



Development Stage:
Commercial



Founding Date:
2014



Contact:
Amélie Dumont, COO



Problem Solved:

Determined to create a world without waste, Phenix proposes 4 alternatives to the trash can: (a) donations to charitable organizations in order to give a second life to unsold items (b) donating unsold and inedible produce as animal food (c) selling edible products at a reduced price on the Phenix app (d) compost and methanation of organic waste.



Latest News:

07/03/2022 – [Two new pledges to reduce food loss and waste at Google](#)
09/11/2021 – [The anti-waste app Phenix acquires its Italian competitor, MyFoody](#)
14/06/2021 – [Food-Waste Prevention App Phenix To Launch In Belgium](#)
12/02/2020 – [Danone invests in food waste management start-up Phenix](#)
09/11/2018 – [Phenix Raises €15 Million to Fight Food Waste](#)



Existing Customers:

- Monoprix
- Carrefour
- Leclerc
- Intermarché

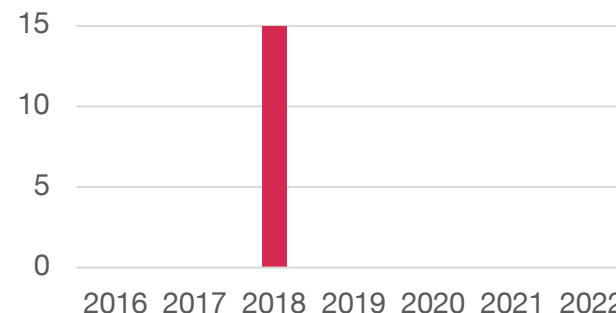


Investors:

- Arkéa,
- BPI France
- Danone
- ETF Partners
- Sofiouest
- Starquest Capital



Total Funding:
€15m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers



Comerso connects all players in the food value chain with waste valorization solutions (charitable donation, animal feed, methanization, composting)...



Country:
France



Development Stage:
Commercial



Founding Date:
2013



Contact:
Pierre-Yves Pasquier, CEO



Problem Solved:

Comerso transforms the burden of handling unsold stock and waste into an opportunity for organizations to make a positive social, environmental and economic impact. It aims to make productive use of unsold items the norm.

Comerso helps businesses to transition to zero-waste by designing efficient, ergonomic solutions based on new technology.



Latest News:



Existing Customers:

- Leclerc
- System U
- Carrefour
- Danone



Investors:

- BPI France



Total Funding:
€2,2m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers



Services and solutions from Eqosphere help you reduce food waste and waste by 20 to 60 % depending on your sector; for both private and public organizations..



Country:
France



Development Stage:
Commercial



Founding Date:
2012



Contact:
Xavier Corval, Founder



Problem Solved:

In 2018, the GCS Centre Val de Loire, a regional public health organisation, partnered with Eqosphere and Ernst&Young consulting to support its 146 restaurants to reduce food waste.



Latest News:



Existing Customers:

- Leclerc
- Auchan
- Les traiteurs de France
- ANFH



Investors:



Total Funding: €m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers



Too Good To Go

A digital app that connects users with businesses that have surplus food. Too Good To Go enables consumers to enjoy food at a discounted price instead of it being wasted.



Country:
France



Development Stage:
Commercial



Founding Date:
2015



Contact:
Philippe Schuler, Impact Manager



Problem Solved:

TGTG is on a mission to empower and inspire everyone to take action against food waste.

The solution enables businesses to sell surplus food to consumers at discounted prices. Unlike other models, the customer buys a mixture of food rather than selecting items individually.

TGTG also works to raise awareness about food waste amongst communities, schools and businesses.



Latest News:

01/04/2022 – [TIME 100 most influential Companies](#)

24/03/2022 – [Too Good To Go's Western Canada Expansion](#)

01/11/2021 – [Too Good To Go Celebrates 100 Million Meals Saved](#)

01/05/2021 – [This app fighting food waste is gaining ground in the U.S.](#)

07/01/2021 – [Too Good To Go raises \\$31 million to fight food waste](#)

07/02/2019 – [Too Good To Go Raises a Further €6 Million](#)

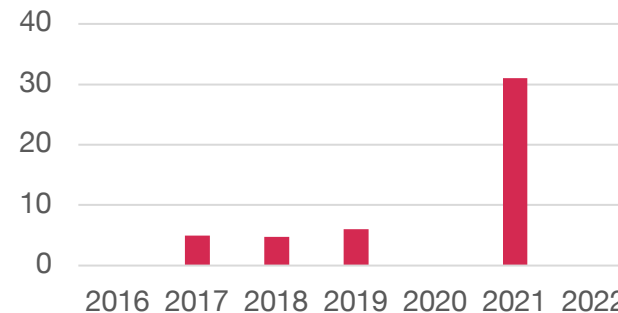


Existing Customers:

- Unilever
- Intermarché
- Accor
- Elior



Total Funding:
€46,7m



Target Segments:

- retailers
- hotels
- restaurants
- mass caterers



Investors:

- Almanac Insights
- Audeo Venture
- Blisce
- London Technology Club

Organic Waste Valorization





A biotechnology company and leading insect producer for animal and plant nutrition. InnovaFeed grow black soldier flies and transform their larvae into proteins, mainly targeting the aquaculture market.



Country:
France



Development Stage:
Commercial



Founding Date:
2015



Contact:
Bastien Oggeri, Co-founder



Problem Solved:

Producing more and producing better is one of the key challenges for the decades to come in order to feed a growing population. Insects are recognized as one of the most promising solutions to meet this requirement, in particular the use of insects for animal and plant nutrition



Latest News:

20/09/2022 – [French insect farm InnovaFeed scoops up \\$250m](#)
23/03/2022 – [Innovafeed launches new brand platform ahead of AgriFood Summit](#)
11/03/2022 – [Ex-Mowi CEO joins board of insect ingredient producer](#)
08/02/2022 – [ADM & InnovaFeed's insect protein partnership examined](#)
20/12/2021 – [InnovaFeed building world's largest fly farm in Decatur](#)



Existing Customers:

- Cargill

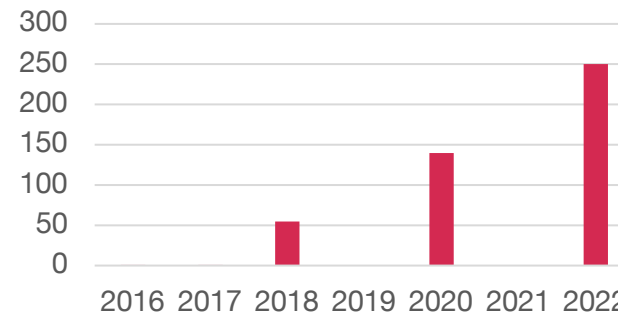


Investors:

- AlterEquity 3P
- Credev
- Finnovam
- Siparex
- Temasek
- Qatar Investment Authorities
- ADM
- Cargill



Total Funding:
€445m



Target Segments:

- farmers
- processors



Purpose-built farms that grow and transform insects into proteins and oils for animal feed and fertilizer for agriculture. The insects are fed with biowaste, closing the biological loop.



Country:
France



Development Stage:
Commercial



Founding Date:
2011



Contact:
Antoine Hubert, CEO



Problem Solved:

By 2050, food production will need to increase by more than 70% to meet the needs of our planet's growing population. This means massively increasing protein production today.

Ynsect offers an alternative valorization for biowaste, producing a source of protein to feed animals and plants, and eventually human beings.



Latest News:

29/03/2022 – [France's Ynsect expands in U.S. pet food market with Jord buy](#)
11/12/2021 – [Ynsect partners with ultra-premium pet food startup](#)
18/05/2021 – [Breaks ground on 'world's largest' vertical farm for insect ingredients](#)
15/04/2021 – [Ynsect announces acquisition of Protifarm](#)
06/10/2020 – [Agtech startup Ynsect extends its Series C to \\$372](#)



Existing Customers:

- Over \$100M worth of commercial contract concluded

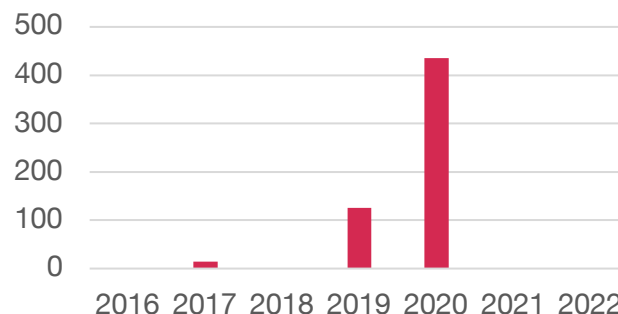


Investors:

- Armat Group
- Astanor
- BPI France
- Caisse d'Epargne
- Demeter Partner
- Sofiproteol
- Footprint Coalition
- Supernova invest



Total Funding:
€582m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers

BETTER ORIGIN

An on-site fully automated insect farming module (called X1), using local organic waste to feed larvae which are harvested after 7-14 days to feed animals. There is no processing nor additives involved.



Country:
UK



Development Stage:
Pilot



Founding Date:
2015



Contact:
Fotis Fotiadis, Co-founder



Problem Solved:

Food supply will need to grow by 70% by 2050, yet only 5% of arable land is left. Worse, a third of all food already produced every year is wasted. Our broken food system cannot meet the increasing demand.

Better Origin is a decentralized food and feed production solution to help protect the food supply chain and food security



Latest News:

02/08/2022 – [Hens will be fed insects to lay carbon-neutral eggs for Morrisons](#)
07/04/2022 – [Better Origin banks \\$16m in Balderton-led Series A](#)
01/12/2021 – [Morrisons ditches soya for insects in chicken feed](#)
15/03/2021 – [Better Origin insect farm raises \\$3M to provide alternative protein](#)



Existing Customers:



Investors:

- Balderton Capital
- EASME
- Fly Ventures
- Innovate UK
- Metavallon VC



Total Funding:
€19m



Target Segments:

- farmers
- food processors
- retailers



An on-site anaerobic digester that turns biodegradable waste (domestic and commercial) into biogas, electricity, heat and liquid fertilizer. The solution is a closed system with no sound or smell.



Country:
Netherlands



Development Stage:
Commercial



Founding Date:
2012



Contact:
Lara Van Druten, CEO



Problem Solved:

In the heart of Amsterdam, the Waste Transformer converts organic waste from ten restaurants, two theaters, a micro-brewery and many creative industries. This former gas coal plant and the surrounding area has been transformed into a buzzing, healthy park.

The collective organic waste is transformed into green energy, compost and fertilizer that makes the park bloom even more.



Latest News:

16/05/2022 – [Freetown Waste Transformers secures USD 3.9 million](#)
12/05/2022 – [CI2 enters a DFA with Waste Transformers in Freetown, Sierra Leone](#)
15/02/2022 – [Co-powering the IKEA Haarlem store \(NL\) with a Waste Transformer](#)
07/01/2022 – [The 6 \(and counting\) countries we expand to in 2022](#)
01/06/2021 – [Amsterdam Arena using organic fertilizers](#)
20/06/2021 – [Officially labeled as a Solar Impulse Efficient Solution](#)



Existing Customers:

- City of Amsterdam
- City of Cape Town
- City of Freetown



Investors:

- Climate Fund Manager



Total Funding:
€3,9m



Target Segments:

- hotels
- restaurants
- mass caterers

FRUITLEATHER ROTTERDAM

A start-up that transforms discarded or leftover fruit into a leather-like material for the textile, footwear and wider fashion industries.



Country:
Netherlands



Development Stage:
Pilot



Founding Date:
2014



Contact:
Koen Meerkerk, Co- founder



Problem Solved:

Whilst a third of food is wasted, the production of animal leather is also an environmental problem. Every year, more than a billion animals are slaughtered for their hides. The subsequent hide cleaning process produces approximately 650,000 tons of CO2 globally each year. Fruitleather takes advantage of its unique location close to the port of Rotterdam to salvage fruits damaged during transport.



Latest News:

03/08/2021 – [How one Dutch company is making vegan leather from mangoes](#)
01/07/2021 – [How Vegan Leather Is Made From Mangoes](#)



Existing Customers:



Investors:



Total Funding: €m



Target Segments:

- farmers
- food processors



A process that gives new life to food by-products by transforming them into natural and compostable biopolymers with which they create functional eco-design products.



Country:
Italy



Development Stage:
Commercial



Founding Date:
2018



Contact:
Ivan Calimani, founder & CEO



Problem Solved:

Use the orange peels of San Pellegrino soft drinks which become a new resource for the company. Their life cycle does not end, but the skins are transformed into a biomaterial for 3D printing. From the collaboration with the Seletti brand, iconic products are born, which preserve the memory of their origin in the colors and textures.



Latest News:

03/08/2021 – [Ohmie Lamp by Krill Design made of orange peels](#)



Existing Customers:

- San Pellegrino, Autogrill, Nestlé, Enel, Gruppo Cimbali, Officina Naturae, Arla, Lurpak, Irene



Total Funding: €m



Target Segments:

- farmers
- food processors
- hotels
- restaurants
- mass caterers



Investors:



SEaB Energy is the first to market a patented, highly mobile energy generator that uses a microbial process to turn organic waste into energy and revenue. At the same time, it eliminates the necessity and associated costs of transport and disposal of waste.



Country:
UK



Development Stage:
Commercial



Founding Date:
2009



Contact:
Sandra Sassow, Co-founder



Problem Solved:

The process:

- transforms food waste into energy, water and revenue
- eliminates the cost of waste disposal
- reduces your carbon footprint and complements net-zero/carbon neutrality ambitions



Latest News:

01/09/2022 – [Axon Partners Group Leads Investment Round](#)

01/04/2022 – [Microsoft selects AI start-ups to accelerate progress](#)



Existing Customers:



Investors:

- Axon Partners Group
- Enagas Emprende



Total Funding:
€2,6m



Target Segments:

- food processors
- hotels
- restaurants
- mass caterers



A smart and flexible door to door bio-waste collection system and the production of sustainable compost and biogas



Country:
France



Development Stage:
Commercial



Founding Date:
2013



Contact:
Stéphan Martinez, Founder



Problem Solved:

Over 2 millions tons of organic waste are generated in Paris and the surrounding areas. But the region's high-density population and intense traffic make it difficult to organize waste collection and valorization.

Using small gas-powered trucks, Moulinot can collect from any location. Organic waste is weighed and then valorized, either on site (compost) or offsite (biogas).



Latest News:

15/04/2022 – Moulinot raises €18 Million to build 6 new plants



Existing Customers:

- Accor
- Elio
- Sodexo
- Compass

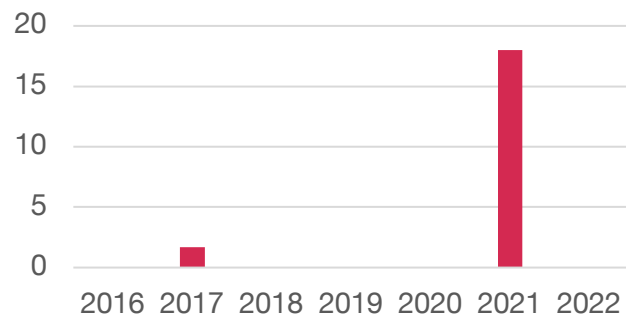


Investors:

- BNP Parisbas
- BPI France
- France Active
- INCO
- Le Comptoir de l'Innovation
- Mandarine Gestion



Total Funding:
€19,3m



Target Segments:

- hotels
- restaurants
- mass caterers

MI TERRO

An advanced materials company that creates home compostable, single-use plastic-alternative packaging materials made from agricultural waste such as milk proteins.



Country:
USA



Development Stage:
Pilot



Founding Date:
2018



Contact:
Robert Luo, Founder and CEO



Problem Solved:

The proprietary technology converts agricultural waste into plastic-alternative packaging film. The film is 3 to 4 times cheaper than other bio-based materials, is home compostable, ocean degradable, heat sealable with low thickness and an excellent water and oxygen barrier.

Unlike current alternatives to microplastics, MiTerro decompose quickly and completely in the natural environment.



Latest News:

16/03/2022 – [Mi Terro at Unilever Partner with Purpose Connect](#)

04/03/2022 – [Mi Terro downs \\$1.5M to make the world more biodegradable](#)

29/10/2021 – [Co-Financed Paid Pilots by Unilever and AB inBev](#)



Existing Customers:



Investors:

- Astanor



Total Funding:
€1,5m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers

ENTOCYCLE

A biotechnology company leading a project to build the UK's first large-scale insect farm, raising black soldier flies fed on food waste to create sustainable protein for animal feed. The new facility will process 33,000 tons of food waste per year



Country:
UK



Development Stage:
Pilot



Founding Date:
2014



Contact:
Keiran Whitaker, Founder



Problem Solved:

he production and sourcing of the protein that livestock are fed is creating habitat-loss and dead zones in the sea. By enabling widespread adoption of insect protein as a sustainable alternative to soy and fishmeal, Entocycle is helping feed the earth's animals without destroying the natural world



Latest News:

28/10/2021 – [Entocycle's insect farm is proof that flies can be bug business](#)
18/06/2021 – [UK Government awards £10m to industrial insect farm project](#)



Existing Customers:



Investors:

- UK Government



Total Funding:
€11m



Target Segments:

- farmers
- food processors



NextAlim

NextAlim provides the growing insect protein industry with healthy and performing young black soldier flies that are ready for rearing, such as eggs, neonates or 7-day old larvae



Country:
France



Development Stage:
Commercial



Founding Date:
2014



Contact:
Xavier Thilly, General Manager



Problem Solved:

Founded in 2014, NextAlim are experts in insect farming with wide expertise across the whole process, from feed preparation to grow-out larvae, up to larvae processing into proteins. Today, the company specializes in black soldier fly genetics and breeding operations, and in neonates multiplication on an industrial scale.



Latest News:

23/03/2022 – [InnovaFeed launches new brand platform ahead of AgriFood Summit](#)
11/03/2022 – [Ex-Mowi CEO joins board of insect ingredient producer](#)
08/02/2022 – [ADM & InnovaFeed's insect protein partnership examined](#)
20/12/2021 – [InnovaFeed building world's largest fly farm in Decatur](#)



Existing Customers:



Investors:



Total Funding: €m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers



As a leading insect breeder, Protix transform the larvae of black soldier fly into a range of proteins for animal feed and fertilizers. With high-tech solutions, artificial intelligence, genetic improvement programs and robotics, Protix brings the food system back in balance with nature.



Country:
Netherlands



Development Stage:
Commercial



Founding Date:
2009



Contact:
Kees Aarts, Founder & CEO



Problem Solved:

By 2040, the world will need to provide protein for 9 billion people. But modern-day protein production places a heavy burden on the world's limited resources.

The soldier flies convert low-grade food waste into high-end protein and fat, all in a matter of weeks and using little space.



Latest News:

01/02/2022 – [Protix raises €50m as impact investors catch the bug](#)

15/02/2021 – [Protix raises €15.5M to breed insects for aquaculture; here's how](#)



Existing Customers:

- Coppins
- Jonker
- Trovet



Investors:

- Aquaspark
- BNP Paribas
- Invest-NL
- Price Albert 2 Foundation
- Rabo Invest
- The good Investors



Total Funding:
€65m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers



An on-site micro composting solution that transforms biowaste into premium compost within 15 days. UpCycle is a flexible, odor-free solution that can accept up to up to 350 kg of biowaste per day, including meat and fish.



Country:
France



Development Stage:
Commercial



Founding Date:
2011



Contact:
Arnaud Ulrich, Co-founder



Problem Solved:

One of the latest UpCycle micro-composting units was installed in the basement of the Pernod Ricard headquarters in Paris where 900 employees use the canteen. An average of 120 kg of biowaste is recycled every day, generating 60 kg of compost after just 15 days. Some of the compost is reused in the building's terrace garden to ensure a closed loop and local recycling solution



Latest News:

26/01/2022 – [Kroptek welcomes Upcycle SAS as a shareholder](#)
21/07/2021 – [UpCycle ouvre une usine de composteurs électromécaniques](#)



Existing Customers:

- Elior
- Novotel
- Carrefour
- Monoprix
- Total Energies
- Cafés Richard



Total Funding: €m



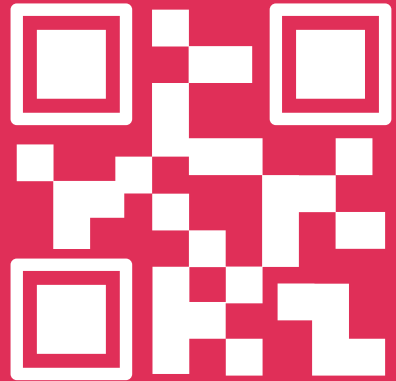
Target Segments:

- hotels
- restaurants
- mass caterers



Investors:

Smart Labels and Packaging





A food tech start-up disrupting the best-before date system with an analogue and digital sensor-based label which tracks produce freshness all along the value chain.



Country:
Sweden



Development Stage:
Pilot



Founding Date:
2016



Contact:
Erik Mansson, CEO



Problem Solved:

It is estimated that the misuse of expiry dates is responsible for 10% or 8,8 MT of food waste every year in Europe. Innoscentia's reactive ink label allows a move from static to dynamic expiring date labelling, giving a real-time indication of product freshness. It has the potential to increase product shelf life by up to 30% whilst reducing retailer and consumer food waste by as much as half.



Latest News:

28/01/2021 – [Ynvisible Collaborates With Innoscentia For New Food Waste Label](#)



Existing Customers:



Investors:



Total Funding: €m



Target Segments:

- farmers
- food processors
- retailers
- hotels
- restaurants
- mass caterers



Unique and innovative labelling solutions designed to indicate the quality and freshness of goods and products. These smart labels act as time-temperature indicators (TTIs) and are cost-effective, easy to apply smart packaging solution for improving food freshness and quality.



Country:
UK



Development Stage:
Commercial



Founding Date:
2017



Contact:
Josh Maclean, Business Manager



Problem Solved:

In developed countries, over 50% of waste occurs before food even reaches consumers.

Insignia's smart labels act as time-temperature indicator which shows the quality and freshness of food to businesses and consumers.

These cost-effective, easy to apply smart packaging solutions help to reduce food waste, enhance food freshness and improve food safety



Latest News:



Existing Customers:



Investors



Total Funding: €m



Target Segments:

- food processors
- retailers
- hotels
- restaurants
- mass caterers



An antimicrobial additive used in the polymer formulation for food packaging. Its addition prevents the latching of viruses or bacteria on the surface, thus keeping food fresher and safer for longer.



Country:
Netherlands



Development Stage:
Pilot



Founding Date:
2012



Contact:
Michaël van der Jagt, CEO



Problem Solved:

A large amount of food is lost along the supply chain because of contamination caused by viruses and bacteria.

Parx Materials' zinc-based additive is 100% food contact compatible. It is completely stable to light, temperature and humidity changes with no leaching.

This translates into less food waste, an overall fresher product (no smell) and no cross-contamination between the inside and the outside of the packaging.



Latest News:

09/04/2021 – Parx Materials' unique approach to hygienic plastic materials.

02/12/2020 – Parx Materials N.V. received €1 million in funding from Lausha Nv



Existing Customers:

- Pepsi Co
- Tesco
- Aldi
- Lidl

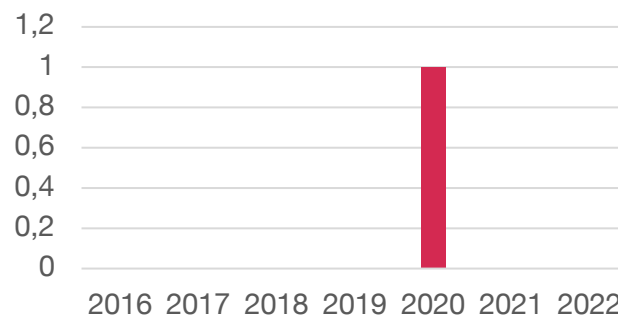


Investors:

- Lausha



Total Funding: €1m



Target Segments:

- food processors
- retailers
- hotels
- restaurants
- mass caterers



Smart expiry label providing real-time indication of food freshness, using tactile interface (touch), based on time & temperature response calibrated to different food types and their spoilage characteristics.



Country:
UK



Development Stage:
Commercial



Founding Date:
2017



Contact:
Solveiga Pakštaitė, Founder



Problem Solved:

Expiry dates are estimates of the worst-case temperature scenario for food. This keeps us safe, but most of us store food in much better conditions than the worst-case scenario – so by following expiry dates we can end up wasting perfectly good food. By using Mimica Touch which responds to all the temperature changes, in most cases you will be able to use food for longer and reduce waste.



Latest News:



Existing Customers:

- AP-HP
- Crous

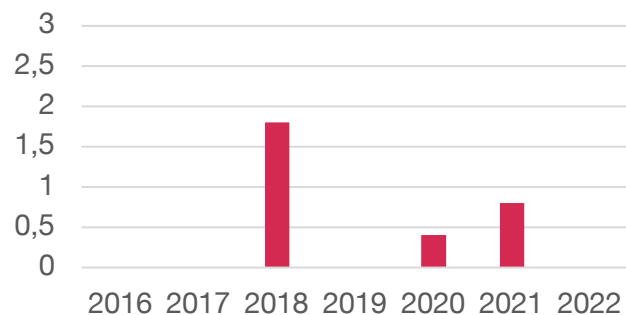


Investors:

- EIT Food



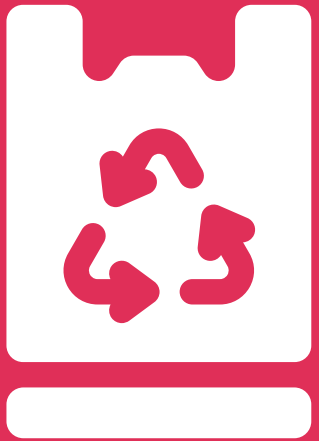
Total Funding: €3m



Target Segments:

- food processors
- retailers
- hotels
- restaurants
- mass caterers

Sustainable Packaging





A proprietary technology that transforms wheat bran into fully biodegradable single-use tableware suitable for hot and cold meals that can be baked and re-heated.



Country:
Poland



Development Stage:
Commercial



Founding Date:
2012



Contact:
Malgorzata Then, CEO



Problem Solved:

Single-use plastic is one of the major contributors to plastic pollution. In February 2021, the EU Parliament approved a plan to ban single-use plates and cutlery by 2023. Biotrem's environmentally-friendly manufacturing process creates single-use plates and bowls from wheat bran and small amounts of water, fully biodegradable in 30 days



Latest News:



Existing Customers:



Investors:



Total Funding: €m



Target Segments:

- retailers
- hotels
- restaurants
- mass caterers



An enzymatic additive added to the formulation of bio-based plastics (PLA) breaks down polymers to make plastic packaging 100% biodegradable & 100% compostable, even in domestic conditions



Country:
France



Development Stage:
Commercial



Founding Date:
2016



Contact:
Sophie Macedo, Business Director



Problem Solved:

8MT of plastic end up in the ocean every year. By 2050 there will be more plastic than fish. Less than 10% of new plastic produced annually is recycled, often because of its formulation. Carbiolice's solution enables the biodegradation of non-recyclable plastic (estimated at 52%) into compost with no residue or toxicity.



Latest News:

06/09/2021 – [Carbiolice obtains OK Compost HOME certification](#)



Existing Customers:



Investors:



Total Funding:
€m



Target Segments:

- food processors
- retailers
- hotels
- restaurants
- mass caterers



A compostable packaging that imitates nature's packaging by using materials that mimic the qualities of plastic yet biodegrade into nourishing compost and return safely to the biosphere, leaving behind the same nutrients left by organic waste.



Country:
Israel



Development Stage:
Commercial



Founding Date:
2010



Contact:
Daphna Nissenbaum, Co-founder



Problem Solved:

Conventional flexible plastic packaging, particularly films and multilayered plastic packaging is nearly impossible to recycle. TIPA developed a packaging that mimics the qualities of plastic yet is made of materials that return safely to the biosphere. TIPA's fully compostable film and laminate packaging solutions break down into water, CO₂, and biomass under industrial and home composting conditions.



Latest News:

09/08/2022 – [TIPA & Aquapak announce collaboration](#)
15/02/2022 – [SILBO and TIPA Prove Compostable Alternatives Offer Ideal Solution](#)
08/02/2022 – [SUNRAYS Launch Market's First Home Compostable Grape Bag](#)
03/01/2022 – [Israeli compostable packaging firm nabs \\$70m investment](#)



Existing Customers:

- PANGAIA
- Riverford
- Natoora
- Stella McCartney
- The Happy Pear

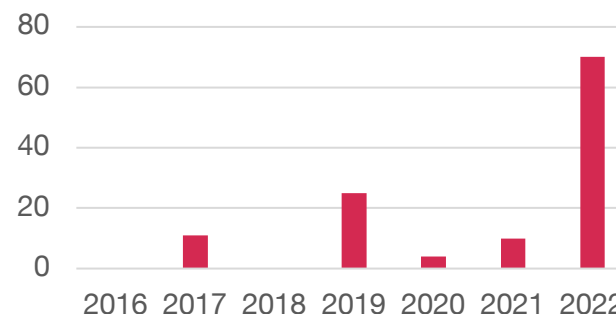


Investors:

- Blue Horizon Venture
- Chesnut
- Green soil Investment
- Millenium Food tech
- Triodos Organic Growth Fund



Total Funding:
€120m



Target Segments:

- farmers
- food processors



An enzymatic bio-recycling technology that break downs PET plastics and textile fibers into monomers that can be reused infinitely in the production of new polymers.



Country:
France



Development Stage:
Pilot



Founding Date:
2011



Contact:
Emmanuel Ladent, CEO



Problem Solved:

86% of packaging waste goes unrecycled globally, including over 100MT of plastic waste. Carbios has developed a process that can handle all forms of PET plastics (clear, colored, opaque, multi-layer...) and polyester, diverting them from incineration, landfill or ocean pollution.



Latest News:

09/08/2022 – [Carbios joins WhiteCycle](#)
26/02/2022 – [Carbios and Indorama Ventures to build plant](#)
20/12/2021 – [The EIB is financing a €30 million loan for Carbios](#)



Existing Customers:

- Expression of intent signed with a major PET producer



Investors:



Total Funding:
€m



Target Segments:

- food processors
- retailers
- hotels
- restaurants
- mass caterers



**Food is a universal
experience, let's
not waste it.**

