Food Waste Value Solution

DZZ

Food waste problem

According to the data from the National Bureau of statistics, in 2018, China's food and beverage industry revenue reached 4.27 trillion yuan, an increase of 9.5% over the previous year. Industry insiders predicted that national catering revenue will exceed 4.6 trillion yuan in 2019. However, behind the industry's rapid development is an astonishing amount of food waste.

In 2018, the Chinese Academy of Sciences' Institute of Geographic Sciences and Resources and the World Wildlife Fund jointly released a report on food waste in urban restaurants in China. The survey found that the per capita food waste in China's food and beverage industry was 93 grams per person per meal, with a waste rate of 11.7%. In addition, the food waste of large banquets and group meals was up to 38%, and one third of the food in students' lunches was thrown away. According to preliminary estimates, the amount of food wasted on the dining table in China's urban restaurant industry in 2015 was between 17 and 18 million tons, equivalent to the annual food consumption of 500,000 people.

Currently, China is beginning to address the problem of food waste through policies. On April 29, 2021, China enacted the Food Waste Law. "Food waste" refers to neglecting to use food which is otherwise

safe to consume for its intended purpose, including throwing food away or misusing food in a way that significantly reduces its quantity or quality. China has started to crack down on food waste in bakeries and restaurants, and in serious cases, relevant penalties and punishments have been administered.

Our mission
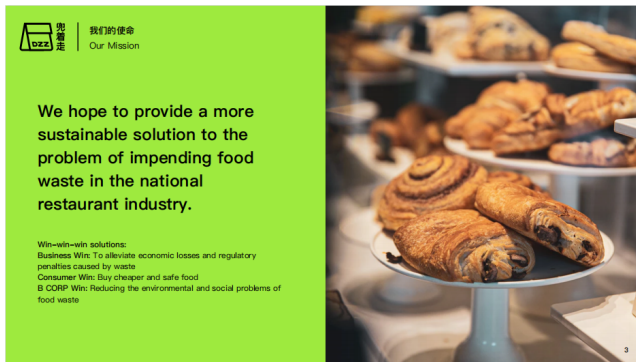
The DZZ team initiated a food waste solution. Our short-term target market is Shanghai, and we plan to expand to other first-tier cities within three years. The project hopes to solve two major problems:

1.We hope to solve the problem of food approaching the expiry date being wasted in the domestic catering industry and provide businesses with more sustainable solutions.

2.We hope to alleviate the economic losses and regulatory penalties caused by food waste, enable consumers to buy food that is both safe and affordable, and effectively reduce food waste.
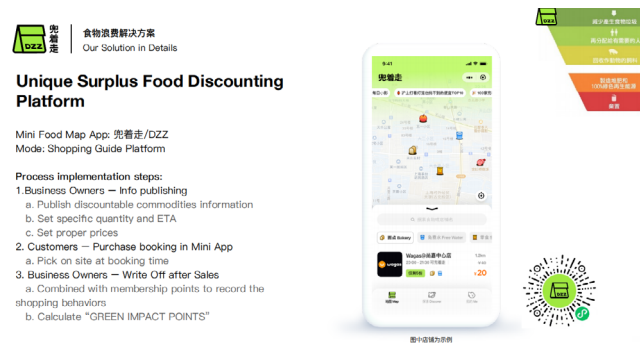
Our solution

Our mini program Precious SH functions as a discount information platform for merchants and covers a wide range of products, from food to clothing and daily necessities. The platform has gained the attention of media and the public, but currently has not struck any business partnerships. However, as a first MVP, it has been tested and verified as having market potential. In our new plan, we will launch new products to solve the problem of food waste.

## Early stage (current stage)
Food Discount Platform—DZZ

We are developing DZZ, a WeChat mini program

for reserving almost-expired food. Merchants can publish information about discounted products on the platform and set the number of items available for reservation. It can be a specific product or a "blind box" of randomly selected products. Consumers can make reservations on the mini program first and then pick the things up at the store. There are also points and membership systems to help businesses record users' green consumption behavior.

We are now cooperating with businesses in Shanghai who want to participate in reducing food waste, developing targeted solutions to deal with leftover food according to the business type and size. These solutions include launching short-term discount campaigns for almost-expired foods, testing consumer acceptance, and exploring ways to better match retailers. This data will then be used to help us build an algorithm platform for expiring food discounts. We will also implement business-to-business food donation and kitchen waste processing and utilization solutions, which can help us build partnerships with downstream NGOs and enterprises and accumulate more practical experience in the process.

Mid-term stage
To B Leftover food solution
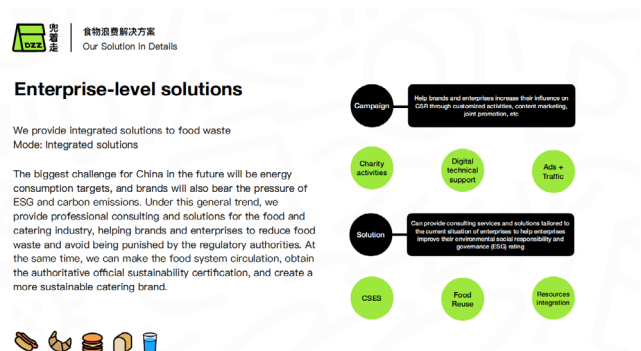
At present, only Shanghai and Beijing are thoroughly enforcing the separation of food waste from other garbage. In fact, restaurants and supermarkets in many cities can separate food waste and create value—they simply do not know how to do it in a simple and effective way. This platform can help waste-conscious enterprises to understand their options and choose a solution. For example, this platform will accommodate food banks, composting plants, farms, and processing plants that produce organic fertilizer or animal feed in cities across the country. The platform will also publish success stories and best practice case studies.

We will also provide consultation and other services through the website. Merchants can contact us for cooperation, and we can provide more professional solution packages. The goal will be to help enterprises reduce food waste, reduce waste processing fees, and avoid noncompliance fines from regulatory authorities. At the same time, we can help the business to create a closed-loop waste management system, obtain official sustainable certification, and create a more sustainable brand identity.

Goals and forecasts

In December 2021, the DZZ mini program will be launched online to test the feasibility of the business model. It is expected to attract at least 10 cooperating merchants. After launch, we will accumulate project experience while cooperating with partners to initiate multiple activities to increase our influence. We will iterate and improve the mini program to add more functions and improve user experience.