Business Plan Interim Deliverable

VISION OF THE ENTERPRISE

Our vision is to redefine the way people shop for groceries by creating a smart, waste-free, and health-conscious food ecosystem. We envision a world where technology and sustainability work hand in hand to eliminate food waste, optimize grocery consumption, and promote healthier eating habits. By leveraging AI-driven inventory tracking, intelligent recipe recommendations, and personalized portion control, we aim to empower individuals to make mindful purchasing decisions while enjoying a carefree, efficient, and sustainable grocery shopping experience. Our ultimate goal is to minimize food waste at the household level, helping customers save money, reduce environmental impact, and cultivate a healthier lifestyle.

VALUE PROPOSITION

Our platform is designed to **reduce food waste** by helping customers make **smarter purchasing decisions** while offering a **seamless, AI-powered grocery shopping experience** that promotes **convenience and health**.

Smart Inventory Tracking & Utilization

Users can input their existing groceries, and the system will track their usage.

Benefit: Prevents unnecessary purchases by ensuring food is consumed efficiently.

AI-Powered Recipe Suggestions

Before checkout, an AI analyzes the shopping cart and suggests recipes using both new and existing ingredients.

Benefit: Encourages meal planning and reduces food waste.

Personalized Portion Recommendations

Users input age, height, weight, and gender for tailored portion suggestions.

Benefit: Prevents overbuying and promotes healthier eating habits.

Expiration Date Reminders

The system tracks expiration dates and sends timely notifications.

Benefit: Helps customers consume food before it spoils.

Adaptive Purchase Review System

Provides feedback on past purchases to help adjust shopping habits.

Benefit: Ensures continuous optimization of food consumption.

THEORY OF CHANGE

Approach	Linkage	Essential activities	Impact	Allocation
Smart Inventory Tracking & Expiration Reminders	Integrates with AI algorithms to analyze consumption patterns and connect to recipe recommendation systems.	-Users input their existing groceries into the system. -AI tracks inventory usage and estimates food consumption patterns. -Automated expiration date reminders notify users before food goes bad.	Reduces food waste through proactive spoilage prevention; optimizes household inventory efficiency.	**25%**
AI-Powered Food Planning & Recipe Recommendations	Leverages inventory data and user health profiles to generate context-aware meal plans.	-Use LLMs to provide personalized food plans and recipes based on existing ingredients and health preferences. -AI generates precise ingredient quantities needed for meals, avoiding excess purchases. -Users receive alternative recipe suggestions for food nearing expiration to maximize food utilization.	Minimizes over-purchasing; increases meal diversity and nutritional adherence.	**35%**
Personalized Portion Control & Nutritional Guidance	Synergizes with inventory tracking and recipe systems to align purchases with dietary needs.	-Users input personal details (age, weight, activity level, dietary preferences). -AI tailors portion sizes to prevent overbuying and overeating. -Health-focused recommendations	Increases adoption of diverse and healthier recipt. Fosters long-term healthy eating habits	**25%**

		encourage balanced nutrition and sustainable meal planning.		
Community-Driven Food Sharing & Learning	Enhances user engagement by linking platform features to social learning and cultural exchange.	-Users can upload and share food preparation videos to showcase creative recipes and food utilization tips. -AI curates popular videos based on user preferences, promoting cultural diversity in meal preparation. -Enables a community-driven learning experience, encouraging waste-free cooking and sustainable food habits.	Increases user retention; drives users to adopt new sustainable habits.	**15%**

MARKET ASSESSMENT

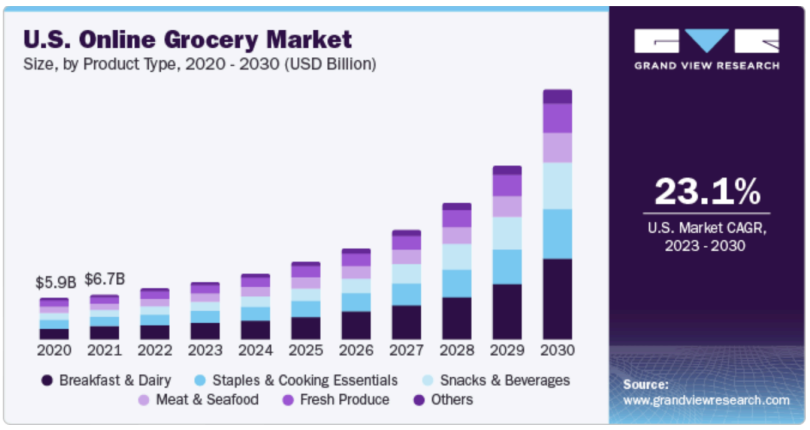
Our platform is designed to **redefine grocery shopping** through a **smart, waste-free, and health-consciousfood ecosystem**. Several key indicators suggest a strong market opportunity:

1. **Consumer Behavior Shifts**
   • Growing concerns over **food waste** and demand for **healthier eating habits**.
   • Increasing adoption of **AI-driven and online shopping solutions**.
   • Shift toward **intentional consumption and meal planning** to reduce waste.
2. **Economic & Cultural Trends**
   • **Rising food costs** are driving households to **optimize grocery spending**.
   • Cultural emphasis on **sustainability and wellness** enhances market appeal.

Market Size Analysis

Total Addressable Market (TAM)

• The **global online grocery market** was valued at **$50.28 billion in 2022**.
• Projected to grow to **$305.13 billion by 2030** (CAGR of **26.8%**), driven by **e-commerce, AI integration, and post-pandemic trends**.



(https://www.grandviewresearch.com/industry-analysis/online-grocery-market)

Service Addressable Market (SAM)

• **Geographic Segmentation:** Focusing on **North America and Europe** as primary markets is strategic due to their **high online grocery adoption** and **higher dining-out costs** compared to Asia. The **U.S. online grocery market** is projected to reach **$100 billion by 2025**(https://shorturl.at/TtxTt), while **Europe's market** was valued at **$66.3 billion in 2024** (https://shorturl.at/v5fQ9). Together, these regions could represent a **combined online grocery market of approximately $173 billion by 2025**.

• **Demographic Segmentation:** Within these regions, our platform targets **sustainability-focused and health-conscious consumers**, a segment that comprises **30-50% of online grocery shoppers** in developed markets. A **2023 McKinsey report** (https://shorturl.at/DjpNO) found that **30% of U.S. consumers** are willing to **pay a premium for sustainable products**. Applying a **conservative estimate of 40%** to the **$170 billion** combined online grocery market in **North America and Europe**, this target segment could be valued at approximately **$70 billion**.

• **Adoption of Tech-Driven Solutions:** Not all sustainability-focused consumers will immediately adopt an **AI-powered grocery platform**, so we assume that **50% of this segment** is **tech-savvy and open to the solution**, narrowing the **SAM to $35 billion by 2025**. This estimate is based on industry trends showing **50-60% comfort with AI tools** in developed markets (https://shorturl.at/SOJBl), **40-50% trust in AI features** among online grocery shoppers (https://shorturl.at/OOdHg), and **early adoption patterns**, where **50% of a niche market** typically consists of **early adopters and part of the early majority** (https://shorturl.at/gfMkv).

COMPETITIVE LANDSCAPE

Our primary competitor, **Eatr**, offers a similar concept to our platform, but key differences give us a competitive edge. After testing their app, we found that while it provides **meal recommendations, ingredient lists, and portion measurements**, the **tedious setup process** can be frustrating for users. Additionally, **Eatr is designed for individuals with specific goals**—such as weight loss, muscle gain, or general health—making it less flexible for a broader audience.

A major distinction lies in the **user experience and process flow**. Our app allows users to **input leftover ingredients from their fridge**, select groceries based on **personal preferences**, and receive **recipe suggestions**

tailored to their choices. In contrast, **Eatr provides fixed meal plans**, requiring users to purchase specific ingredients for pre-selected recipes, limiting flexibility.

Furthermore, our platform offers **food tracking** to prevent waste by reminding users before items expire. Lastly, we provide a **community-driven feature**, allowing users to **stream and upload their own cooking videos**, enabling people to learn and share diverse recipes from around the world. These unique elements position our platform as a more **personalized, flexible, and engaging solution** in the market.

(Eatr App Link: https://apps.apple.com/us/app/eatr-ai-healthy-meal-plan-diet/id6479693198)

ECONOMIC LANDSCAPE

Macroeconomic and microeconomic factors driving corporate decision-making

Macroeconomics:

Inflation and rising food prices: Inflation reduces consumer purchasing power, prompting individuals to adopt AI technology to optimize inventory management and reduce losses.

Sustainability: Governments are promoting policies to reduce food waste, such as the EU's Farm to Fork Strategy and the US's Food Loss and Waste 2030 which means Governments may provide subsidies, tax breaks or incentives for sustainable development projects.

Microeconomics:

Market competition and market differentiation: The online food retail market is highly competitive, with large companies such as Instacart, Amazon Fresh, and Walmart+ occupying a major market share. We will help these platforms establish a unique competitive advantage through AI-optimized personalized shopping experience and sustainable development concepts.

Consumer needs: Nowadays, more and more consumers want to shop more conveniently, efficiently, and reduce waste, so AI-driven food procurement and management tools will be more popular.

Macroeconomic and microeconomic factors driving consumer decisions:

Macroeconomics:

Inflation and income levels: High food prices prompt consumers to look for ways to save costs, such as reducing food waste and optimizing shopping decisions.

Microeconomics:Reduced consumer budgets: When faced with rising food prices, most people are willing to use smart tools that can reduce food waste to save money.

Time cost: The pace of life is gradually accelerating, and AI-driven food management systems can reduce decision fatigue and make shopping more efficient.

Borrowing and lending landscape:

The current interest rate hike policies of the Federal Reserve and the European Central Bank have kept interest rates high in many markets, which has put some pressure on the financing of start-ups. However, due to the

concern about food waste, companies can raise funds in the direction of ESG (environment, society and governance).

Other economic factors:

Now, consumers' trust in AI technology is gradually increasing, especially for young people. Therefore, our platform can be promoted first among young people. At the same time, the digital infrastructure in North America and Europe is very mature, and most consumers have experience in using online food procurement platforms, which also makes it easier for our platform to be promoted in these two regions.

CULTURAL LANDSCAPE

Personalized recommendation systems are becoming popular in multiple industries, and people are becoming more and more accustomed to using AI automation tools. Therefore, in developed regions, such as North America and Europe, such habits will make it easier for consumers to accept our products. At the same time, affected by climate change, more and more consumers are beginning to pay attention to environmental protection and food waste, which will also make it easier to promote our products.

Our platform is inspired by the zero waste chef program. Zero waste chef is a platform founded by Anne-Marie Bonneau, a food writer and environmental advocate. She focuses on reducing food waste, using sustainable ingredients, and promoting plastic-free living (https://zerowastechef.com/). This concept is consistent with the goal of our AI smart food management platform, which is to reduce food waste, optimize food procurement, and promote more sustainable consumption habits.

In today's information age, many companies use AI to predict customer needs in order to provide them with a personalized shopping experience. For example, the Caper Cart launched by Instacart is an AI-d riven smart shopping cart that can provide recommendations and promotional information about related products based on the items in the cart to help consumers discover more discounts (https://technews.tw/). This also inspired the design of our platform.

A possible cultural factor is the diversity of customers' culture. Eating habits vary greatly around the world, so recipe recommendations need to consider localization issues. For example, Muslims need to com

ply with the halal diet, which prohibits the consumption of pork, alcohol, and non-Islamic meat. Therefore our AI system needs to be flexible enough to adapt to eating habits in different regions and religions.

PRODUCT MANAGEMENT

Mao Chi He: He is a product and technology manager accountable for AI and technology plans, user experience, and product strategy.

- Defines product features and user experience strategy.
- Oversees AI-driven inventory tracking and recipe suggestions.
- Aligns technology development with business goals.
- Conducts market size analysis and TAM/SAM calculations.

Tianhan Zhong: He is a research and financial analyst accountable for market assessment and financial modeling.

- Defines product features and user experience strategy.
- Evaluates pricing strategy and revenue projections.
- Ensures the financial feasibility of the business model.

Yifei Ding: She is a business strategy lead accountable for vision, competitive analysis, and marketing.

- Defines overall strategic direction and value proposition.
- Leads competitive research and business positioning.
- Oversees branding, marketing, and user engagement strategy.

Meixin Ma: She is an operations and project coordinator accountable for operations, logistics, and team coordination.

- Manages workflow, deadlines, and team accountability.
- Handles operational planning, including supply chain and partnerships.
- Supports product testing and go-to-market execution.