

Week 2 Deliverable: Team 12 Pod 3

Scenario Matrix:

Critical uncertainties Issue 1:

Public preference

Polarities:

1a - Shift to Organic food, considering health and environment

1b - Stick to familiar and cheaper non-organic food



Critical Uncertainties Issue 2:

Tech for decision support

Polarities:

2a - Procurement systems use automation tools to support small farmers promoting sustainability

2b - Procurement systems may use automation to favor large suppliers, focusing on low prices and high volumes.



Scenario 1: Locally Grown, Digitally Powered

This scenario highlights a future where public preference is increasingly shifting towards organic food, driven by a growing focus on health and sustainability. Tech-driven tools in public procurement systems are playing a key role in supporting this shift, helping public bodies make informed decisions based on the sustainability and quality of organic food. This future market is a decentralized, sustainable, and transparent system where organic food dominates public procurement, benefiting both local economies and the environment.



Scenario 2: Clean Image, Clouded Impact



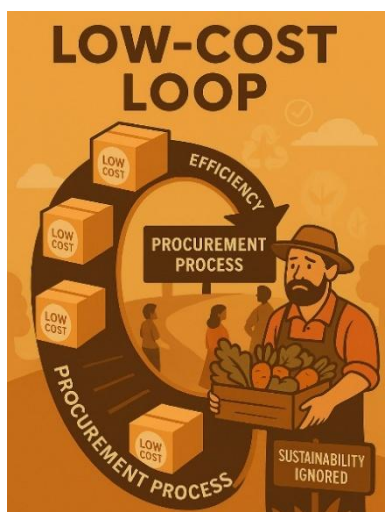
This scenario highlights a future where public preference is shifting towards organic food, driven by a growing awareness of health and sustainability. However, automation-driven procurement systems favor large suppliers, allowing them to dominate the market due to their ability to offer non-organic food at lower prices and in larger volumes. In this future market, smaller organic farmers struggle to compete, and to sustain in the market, the quality of organic food may be compromised by local producers, as large suppliers prioritize cost efficiency over sustainability. AI-driven decision tools further neglect public preferences, focusing on price and volume, leaving the true values of organic farming underrepresented in public procurement.

Scenario 3: Sustainable Systems, Familiar Flavours

This scenario highlights a future where public procurement systems are working towards sustainability, but demand for organic food remains low as consumers continue to prefer familiar, non-organic options. Despite tech-driven tools that improve supply chain transparency and help small organic farmers comply with procurement standards, the public's preference for cheaper, non-organic food prevents significant growth in the organic food market. In this future, technology's role in promoting organic food is limited by consumer habits, leaving the shift toward sustainable systems slower and less impactful than anticipated.



Scenario 4: Low-Cost Loop



This scenario highlights a future where public preference continues to favor non-organic food, and automation-driven procurement systems heavily favor large suppliers focused on low prices and high volumes. As AI and data-driven systems prioritize cost efficiency over sustainability, small organic farmers are left at a disadvantage, struggling to compete. Non-organic food dominates public procurement as the systems focus on price and volume, leaving organic food rarely chosen despite growing sustainability efforts. In this future, technology and consumer preferences reinforce a low-cost loop, where large suppliers continue to control the market, and organic food remains sidelined.

Futures Cone Mapping: Data-Driven Sustainability Prioritization

The Futures Cone tool helped us to explore different futures perspectives based on current trends. In this case, we have chosen Data-driven sustainability prioritization as our preferred future.

In this future, technology helps public institutions track the sustainability and quality of organic food, making it easier for them to choose sustainable options in their procurement decisions. Tech-driven tools ensure that small organic farmers have a fair chance to compete by focusing on sustainability and quality rather than just price or quantity. This leads to more organic food being included in public contracts, benefiting both the environment and public health.

Why is this future desirable?

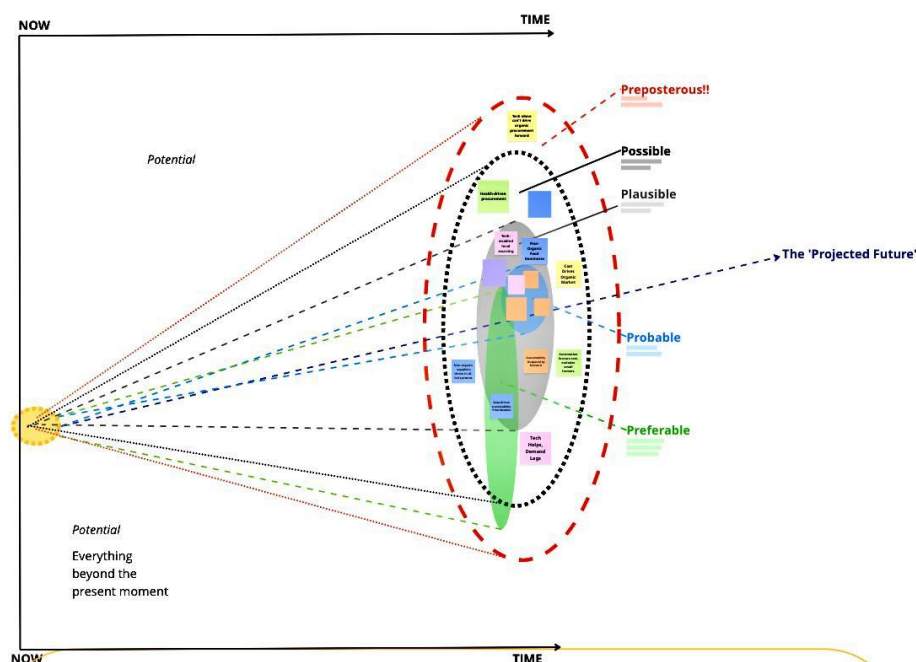
This future is desirable for small farmers, public institutions, and consumers. For farmers, it provides fair opportunities to compete, allowing them to grow and sell sustainable food. For public institutions, it helps them make better choices that support public health and the environment. For consumers, it means access to healthy and sustainable food that is good for both them and the planet.

What values does it embody?

It embodies values like sustainability, fairness, and strong support for the local community. It focuses on making decisions based on quality and sustainability rather than just cost, supporting a healthier and more environmentally friendly food system.

What uncertainties or risks remain?

Some uncertainties include the potential higher cost of organic food, which could make it harder for everyone to access. There may also be challenges in scaling these systems to help all farmers compete, especially considering large suppliers with more resources. Additionally, data accuracy and security could be concerns when using tech to track sustainability.



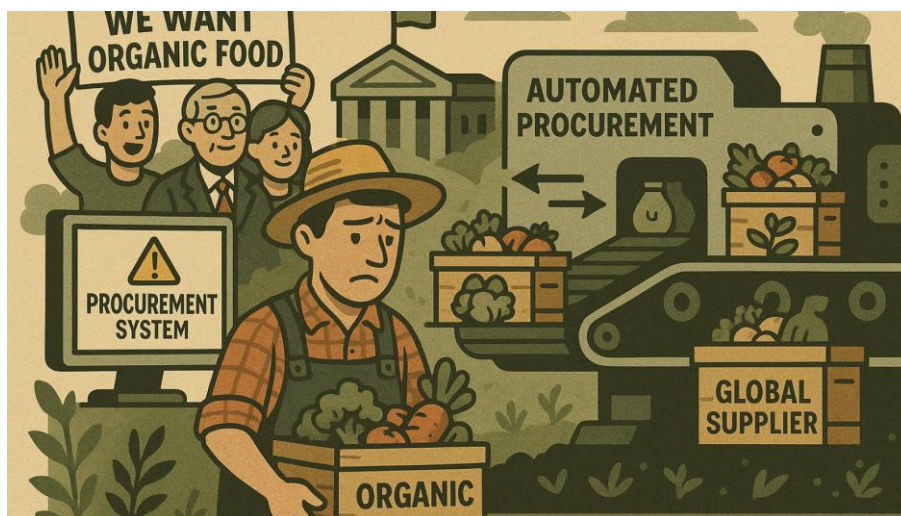
Scenario Sketches

Scenario 1: Locally Grown, Digitally Powered



We're now living in a world where small organic farmers are at the heart of the public food procurement system. Thanks to automation tools in procurement systems, small producers have an easy and fair way to bid for public contracts, leveling the playing field with larger suppliers. Public institutions like schools, hospitals, and government offices have embraced organic food as a standard, driven by public demand for healthier, sustainable options. The public sector leads the way, sourcing from local organic farms to meet the growing consumer demand for sustainably sourced food. Today, organic food is no longer a niche or alternative choice; it's the norm in public procurement. Technology continues to empower small farmers, enabling them to expand and provide food that is both healthy and environmentally friendly. Local, sustainable farming is thriving, and organic food is now synonymous with public meals across the country.

Scenario 2: Clean Image, Clouded Impact



Despite growing public interest in organic food, the procurement system still favors large suppliers. Automated tools are widely used in public procurement, but their algorithms continue to reward cost-efficiency and high-volume output over sustainability or locality. Small-scale farmers struggle to

compete within this rigid system, often disqualified by automated filters or pricing thresholds. Organic food appears more frequently in public institutions however it comes from global suppliers with little connection to local ecosystems. Technology has become a tool that enhances existing inequalities, rather than correcting them. The potential to support small, sustainable producers remains untapped, and the promise of fair food procurement slips further from reach.

Scenario 3: Sustainable Systems, Familiar flavours



Procurement tools have become more inclusive, designed to support small producers with easier applications and more transparency — but public preferences haven't changed. Even with improved access, small farmers struggle to secure contracts because public institutions continue choosing cheaper, conventional food. Budgets are tight, and many consumers still value price and convenience over sustainability. While the groundwork has been laid for a more equitable procurement system, there's a disconnect between what's possible and what is prioritized. Farmers are ready. The tech is ready. But the shift in mindset and consumption habits hasn't followed.

Scenario 4: Low-cost Loop



In this future, non-organic food continues to dominate the public procurement system. Despite being aware of the benefits of organic food, public preference still heavily favors non-organic food because it is cheaper and more familiar to the general population. Even though there is some interest in organic food, most people are still reluctant to pay the higher prices that often come with it. As a result, non-organic food remains the default choice in schools, hospitals, and other public institutions. At the same time, automation tools in procurement have made it easier for large suppliers to dominate the market. These automation systems prioritize low cost and high volume, which allows big companies to supply large quantities of food at cheaper prices. Big suppliers can meet these cost-efficient goals through economies of scale, pushing small farmers out of the procurement process.

Provisional Design Direction

1. What kind of market device, institution, or infrastructural shift might enable the preferred future and help avoid other possible futures (from the matrix) that are less/not preferred?

Market Device/Infrastructural Shift:

To enable Data-Driven Sustainability Prioritization, a region-level digital platform for food procurement could be developed. This platform would use AI to evaluate sustainability, quality, and local sourcing to support decision-making. Smart contracts could be introduced to automatically prioritize sustainable food options while ensuring transparency and fairness for all suppliers.

Additionally, data-driven monitoring systems should be implemented to track the environmental impact and social responsibility of food suppliers, encouraging them to meet higher standards. This would also require a shift in policy to incorporate sustainability and social values as core criteria in procurement processes, not just price and volume.

To avoid less preferred futures, such as the dominance of large suppliers driven by automation and cost advantages, it's crucial to integrate fairness metrics within these procurement systems, ensuring that small producers have access to opportunities. Policymakers would need to promote an inclusive digital infrastructure to allow all farmers to participate in the sustainable procurement process.

2. What kinds of actors need to be involved?

- **Governments and Policymakers:** They must lead the shift by setting mandatory sustainability criteria for public procurement contracts and providing funding for digital tools that support small farmers.
- **Tech Companies:** To develop the AI and data systems that track sustainability, quality, and local sourcing, making them accessible for small producers. They would also need to ensure the accuracy and security of data used in procurement decisions.
- **Small Organic Farmers:** They are key actors who need to be empowered with digital skills and tools to participate in the procurement process, ensuring that they can compete on an equal footing with larger suppliers.
- **Public Institutions (schools, hospitals, etc.):** They must adopt and use the new procurement systems that prioritize sustainability, ensuring that the food they purchase aligns with health, sustainability, and local economy goals.

- Consumers/Public: Their demand for organic and sustainable food drives the market and helps to shape procurement priorities.

3. What assumptions must be challenged or reframed?

- Price-First Mindset: The assumption that cheaper and faster food procurement systems are always better must be reframed. Instead, systems should focus on long-term benefits, including health, local economy, and environmental sustainability, rather than short-term cost savings.
- Tech as a Replacement for Human Judgement: There is a common belief that AI and automation should replace human decision-making in procurement. This must be challenged by ensuring that AI is used to support human oversight and that human values (like fairness and equity) are embedded into decision-making processes.
- Exclusion of Small Farmers: The assumption that large suppliers are the only efficient providers must be reframed to include small farmers. They must be supported with digital tools and access to markets, so they can compete with larger players who act as Monopolies.

Supplementary Requirements:

- We received feedback to stay focused on public food procurement, which further helped us refine our direction.
- This week, we ensured all our futures work stayed grounded in that specific context.
- We adjusted our insights, scenarios, and narratives to reflect issues in public institutions and procurement systems.
- Our maps now reflect uncertainties, their narratives and future perspective within public food contracts.
- The feedback helped us stay aligned, relevant, and more impactful in our exploration.