



## Business case

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Community & UN SDG(s):	Responsible Home Cooks - 12. Responsible Consumption and Production, 13. Climate Action
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<b>Proposed Project</b>	ConsciousCart: Shopping & Cooking for Waste Reduction
<b>Date Produced</b>	October 20 <sup>th</sup> , 2023
<b>Background</b>	As part of the United Nation's 17 Sustainable Goals, individual consumers are asked to reduce their waste, and be thoughtful of what they buy and to choose sustainable options whenever possible. This includes reducing, reusing, and recycling waste created by food whenever possible, and to utilize composting and proper disposal of organic waste whenever possible.
<b>Business Need/ Opportunity</b>	There lacks an easy-to-use application for tracking and reducing a home cook's waste based upon the recipes that they create.
<b>Options</b>	Option 1: Create a web-based or mobile application for home cooks to track non-recyclable and non-compostable waste based on the ingredients in the recipes that they have created. Option 2: Create a web-based or mobile application for home cooks to track non-recyclable and non-compostable waste based on the list products they have purchased at the grocery store. Option 3: Allow users to perform both options above.
<b>Cost-Benefit Analysis</b>	

Note: For each of these options, due to the likelihood of free, publicly available data and the fact that each option will use require the same sets, financial expenditures in purchasing the data have been ignored.

Option 1: The cost of development for this option is estimated to be the second-most as each recipe tracked will require a measurement of each ingredient that may not be the entire container it is taken from. This will also take additional input from the user which may reduce quality as they attempt to estimate on the amount of each ingredient used or be forced to weigh to calculate the amount used to be accurate. Benefits include a more accurate recipe-based system for accurate tracking of the ecological impacts, and users may find more delight in seeing their waste and ecological impacts in real-time as they cook the recipes.

Option 2: The cost of development for this option is estimated to be the least as each item purchased can be tracked before opening and will have a standard size and weight often displayed on the packaging of the product. This will also allow the user to track products that may be more difficult when tracking based on recipes, such as packets of spices or cloves of garlic. This option could greatly simplify the user input and accuracy of products purchased. It may reduce delight from the people using the application as it would require them to take note of everything they have shopped for before storing it in their kitchen for future use.

Option 3: This option will require the most time for development as both methods of tracking will be required to be developed. This could allow the user to try each option and use both or the one that provides them with more delight. This could allow the user to choose themselves between each option to enjoy the specific benefits but would still suffer from the costs.

## Recommendation

My recommendation is to begin with option 1. I believe people will find more delight by interacting with the application on a recipe-based usage, more than receipt-based. This may require additional usage from the user, and it may require additional



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research and development to create the proper experience, but there are likely possible solutions to improve user input for efficient, accurate, and easy data inputs.

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