

Sustainable Product Guide

Project Report-out & Lessons Learned

Business Opportunity

After a constant increase in climate change and environmental pollution, many respected organizations are putting their best efforts to introduce new measures and practices to reduce the devastating effect of mass production on our planet. Therefore, numerous manufacturing companies and brands including skin care brands are also adopting eco-friendly techniques as their contribution towards this initiative. However, to convey these recent developments and advancements to consumers many organizations are looking for ways to increase awareness and knowledge within the community to have more effective outcomes.

This project targets the skin care niche with a goal of increasing awareness of relevant ecological labels, difference between general skin care products and environmentally friendly products.

Project Planning

This project is inspired from two of the UN Sustainable Developments Goals i.e. Responsible Consumption and Production & Sustainable Cities and Communities. Major purpose of these goals is to ensure sustainable production and consumption patterns and also make communities more safe and sustainable. The reason for choosing these goals for this project was the current gap between skin care brands and buyers which is preventing consumers from adopting products that are not only suitable for them but for the environment as well. As a part of this community, I have noticed most of the people considering many good products such as products without certain chemicals, but they do not always consider the effect these products may have on the environment as well which inspired me to create an application to increase more awareness and participation of consumers so their decisions are not just based on self care but also on sustainable consumption.

Project Sponsor

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- **Community characteristics and technology configuration inventory**

Upon research, some websites and applications were found with the similar goal and purpose as this application. Community characteristics that are mostly adopted by these technologies include content based orientation which allows a community member to share content for others, access to expertise that only provides access to research results and experts findings with detailed scientific explanation and context based orientation which targets specific organizations or product types. Although some of the features were well implemented, the technologies are still missing the ability to provide knowledge relevant to eco friendly products and community participation. Some of the current common features, platforms and tools include, an admin control application/website targeting only limited and less popular brands, online shopping tool, environmental benefits in product description, scan feature to scan some products to find hazardous chemicals in them(only available to household cleaning products) and articles highlighting effects and benefits of eco-friendly product. As a result, the application design was designed based on content based and access to expertise orientation to incorporate community participation and also community members to seek legitimate knowledge through ecological labels.

- **Customers focused**

Currently, there are three major customers that can influence the results and outcomes of current skin care relevant production and consumption i.e. producers, consumers and experts who are publishing their findings and suggesting new methods for the process. For this application, consumers are focused mainly because of current lack of information and participation among consumers. Those community members that are looking for available products and possible comparison between various options to select the best one are main targeted customers for this technology.

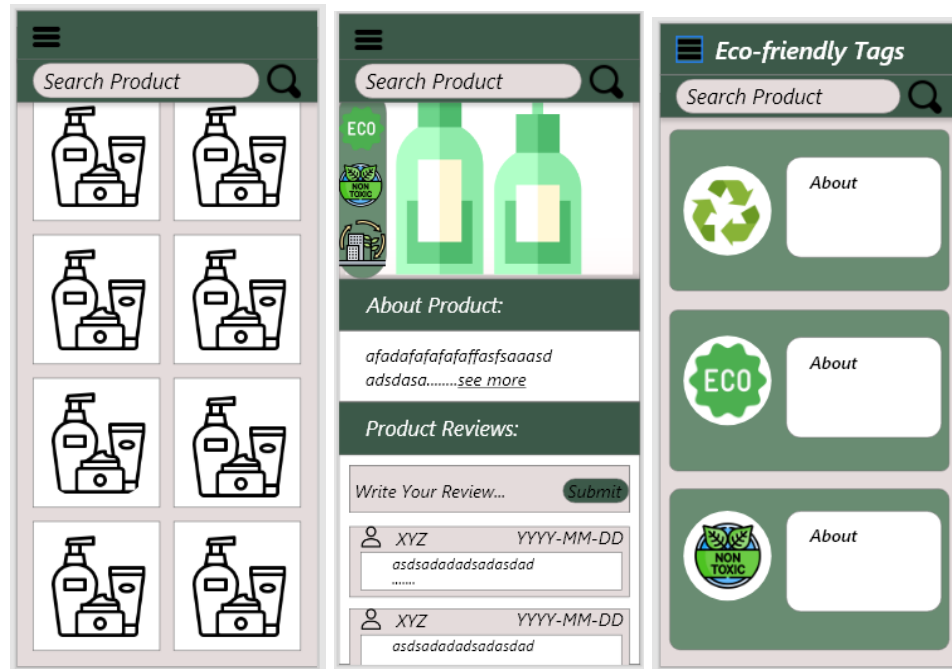
- **Initial Assumptions and Constraints**

It is assumed that products of different brands will have similar ecological labelling categories so that it is easier to identify products from different brands within a single category. Whereas, constraints are only due to limited resources, data on different products and verified expert findings.

- **Technology Proposed**

Technology is designed to provide consumers an access to information and allow them participate in the community as well. In order to achieve that a mobile application design was selected with features and tools such as an information page to access ecological label information, platform to

find available skincare products with highlighted eco-friendly benefits and review features to consumers to share their opinions within the community.



Pictures of high fidelity prototypes highlighting features discussed above

Project Reflection

- Overall experience

This project was an amazing way to implement lessons learned during the course and also design something for the community. One of the best things about this project was to analyze current technologies and design something with similar or better features. On the other hand, time constraints made the development phase really short which limited the quality of the final product. Features shown in prototypes were successfully implemented with slight UI design variations. Therefore, the final product achieved the initial minimum viable product with an additional feature that allows anyone to create a product post with selected ecological labels.

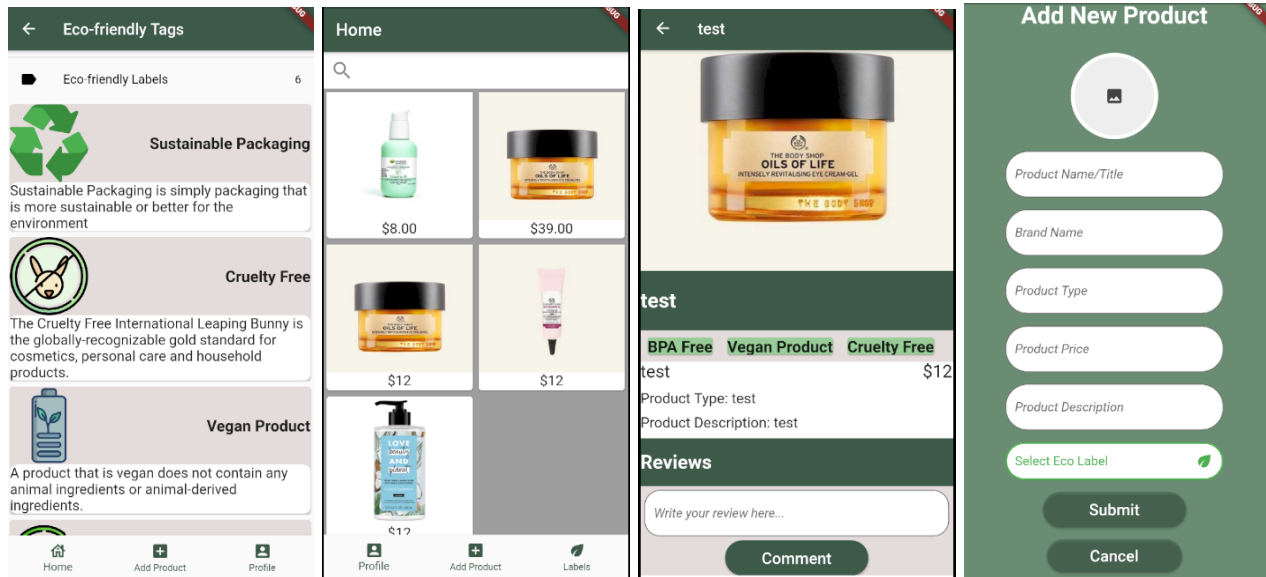


Image of final application

● Positive and negative outcomes

Positive results of this project include a method for consumers to identify products with environmental benefits and cross platform mobile application also makes the design more feasible.

Negative outcomes could be missing website or desktop versions or lack of some advanced features such as a scan feature to find hazardous ingredients within a product.

● Software design activities

Design decisions and activities involved content management and gamification concepts explored during the course. Content management provides a deeper analysis of how data should be used to transition as information (more structural values and meaningful explanations) and even into knowledge as current ecological label data is not available at a single platform with a clear meaning and impact. Whereas gamification allowed better implementation of In-app learning experience through customer participation and interaction with other community members. Other software activities included search for resources and standard eco-friendly label, change management to add further features such as post new products.

● Suggestions for future projects

For future projects, I would recommend the technology configuration activity for a better look at current available technologies, Google's services for development due to their advanced security

features and available resources for help. Whereare, things I would do differently includes adopting a better software architecture for designing and developmenting.

- **Future Opportunities**

Possible future improvements and modification for this application includes additional features such as scan features as discussed above, admin control to prevent spam product posts and more communication features such as chat to contact experts or even producers for queries.