Product Opportunity Analysis

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Contents

1 Introduction

Analysis Basis

- Based on product version v2.0

- Based on Product Overview v0.0.0

Analysis Purpose

The purpose of this analysis is to uncover, categorize, and evaluate opportunities for product improvement. The analysis is meant to drive the prioritization of both short term and long term resource allocation.

Method

The areas of Opportunity are divided into 6 categories. Each category is expanded through 6 points:

- **Opportunities:** To provide examples, inspiration, and points of future expansion upon the analysis. Not exhaustive.

- **User Value:** To identify the value which investment in the opportunities would afford the users.

- **Business Value:** To identify business opportunities and values from the product improvements

- **Marketing Value:** To identify marketing opportunities and values from the product improvements

- **Cumulative Value:** To identify value generated over time and thereby arguments for an early adoption of the improvements.

  Potential Waste: To identify potential waste and thereby arguments for a delayed adoption of the improvements.

2   Categories of Opportunity

2.1   User Experience

UX seeks to provide a better experience of the current functionality of the system. It seeks to improve the feel of the app, the ease of use, and reduce the errors made both by the system and the user.

2.1.1   Opportunities

- Onboarding of users to show the features of the system

- Better error handling to guide the users to the right solution

- User flow simplification and clarification to help new users

- Optimize data loading visuals to improve understanding of the apps operation

- Improve layout response on different screen size and aspect ratios

- Conduct usability scenarios on users

- Develop personas to improve usability understanding

2.1.2   User Value

Increasing User Experience would make the app easier to use and more reliable.

2.1.3   Business Value

Increasing User Experience would increase the reputation of the company and increase the user growth through word of mouth and positive reviews. It would increase user retention as new users will quickly abandon a platform if they are met with confusion and errors.

2.1.4   Marketing Value

Increasing User Experience would provoke more positive connotations when exposing our brand and make positive claims such as high app ratings available for campaigns.

2.1.5   Cumulative Value

UX optimization will generate value for as long as it is exposed to the users. Any features will eventually be optimized for usability once the time is available. Accepting the cost sooner will yield greater ROI in the long run.

Identifying reusable patterns of good UX soon will allow these to be implemented immediately in future features rather than through refactors, reducing the overall cost of achieving good and consistent UX.

2.1.6   Potential Waste

Many features will be remade in the future, and some might be removed. This can potentially remove some or all of the effort put into optimizing the UX.

2.2 User Data Collection and Analysis

User Data Collection and Analysis seeks to provide insight in the existing user base. About the user, it seeks information of who they are, how they can be differentiated, identified and grouped, and what they think of the app. About the app, it seeks information of how the app is used, how often, and how it performs.

2.2.1 Opportunities

- User location - to identify areas of high users and high user growth. Can be used for assessing the effect of targeted advertisement.

- use frequency - to identify the spread of user activity, and the difference between power users and casual users. Can also show the effectiveness of marketing to, not just generate users, but active users.

- usage patterns - to identify which features are generating the most activity, whether the same features are used by the same users, to identify user types and segregate user attention.

- user opinions - to identify user satisfaction, ideas, and problems.

- user bio data - to identify cause and effect between medication response and user bio data

2.2.2 User value

User information does not directly affect the user experience. However, it does guide the development of the platform to better match the average user's needs and expectations. In time, it can also offer a more personal experience and guidance based on personal information.

2.2.3 Business Value

The data can help guide the development of the product and prioritize resource spending. The data can be used as metrics for user base development. This can guide further efforts and convince stakeholders to commit to partnerships and investments. User data is also valuable to other companies for data analysis.

2.2.4 Marketing Value

Data can be used to monitor effects of targeted advertisement. It can also help show what users care most about and prioritize this in promotional material.

2.2.5 Cumulative Value

User data will help steer the business in the right direction. It can help avoid waste which increases acceleration of the product development and user growth.

2.2.6 Potential Waste

The data in itself does not benefit the user. Any data collected which fails to be actionable or prove to be erroneous will not only be wasted, but can lead to further loss in the form of misguided decisions.

2.3   Seizure Data Collection and Analysis

Seizure Data Collection and Analysis seeks to provide insight into the users condition, as well as improve on the detection and recording of epileptic seizures. The seizure data collection is targeted both at human and machine comprehension. The goal is any reaction to the data which can be a preventative or alleviating measure.

2.3.1   Opportunities

- data collection at detected seizures

- data collection before and after detected seizures

- data retention to collect upon manually detected seizures

- visualization of seizure development over time

- comparison of seizure development with medication development

- machine learning driven algorithm improvements

2.3.2   User Value

It will take a lot of effort to make the seizure data useful in any capacity beyond the simple data representation which is implemented now. It is not suspected to improve the user experience in the short term. However, in the long term it can provide much more value. It can improve the seizure detection greatly and potentially lead to seizure prediction. Seizure data visualization can help give users and their physicians a unique insight into their conditions development. Seizure data comparison with other collected data, such as changes in their behavior and medication intake can inform users of epileptic triggers and guide their medication intake.

2.3.3   Business Value

The implementation of seizure collection in the long term can help us develop detection algorithms which cannot simply be copied by competitors. It will give our company unqiue qualities based on the unique data we collect. Data analysis can also become an important part in the evaluation and treatment of patients which will make us a very interesting partner with doctors and hospitals. Health data is very valuable and could become a main part of the company's business model.

2.3.4   Marketing Value

Seizure analysis will provide a more in depth look into epilepsy. It will make the detection algorithm more precise and make the app more useful for physicians. This can be used for marketing material to attract more users. Our data collection can also aid in large scale data driven research into the cause and effect of both medication, behavior, body composition and other data points effect on epilepsy. This can be used as a philanthropic argument for using our service.

2.3.5   Cumulative Value

The faster data collection is initiated the more data we can collect. Any data generated before data collection has been set up is lost forever. We will also end up competing against similar companies with data collection and machine learning in mind. Here, the quality and magnitude of the data collection is a dominating factor in who will end up providing the best service.

2.3.6   Potential Waste

Seizure data will take a lot of resources to extract value from. The data will therefore be nearly irrelevant until we have the resources to exploit them.

2.4   Feature Expansion

Feature Expansions seeks to provide the user value in other ways than what is already being done. This can be through completely new functionality, or supplementary functionality.

2.4.1   Opportunities

- Side effect log - to record effects of medication on users and use it for analysis with collected bio data.

- Parental control - allow parents of users to control the profile of their children

- progress questionnaire - collect information on users memory, mode problems, and other areas which may be affected by epilepsy or the administered medicine.

- risk factor - collect info on potential risk factors, calculate their cumulative effect to urge users for caution.

2.4.2   User Value

Completely new features can provide users with value they otherwise could not get. Implementing features offered elsewhere can help users get the features they require from one service rather than multiple.

2.4.3   Business Value

Adding features can create more value for existing users and create sufficient value to convince new users to join. It provides more reasons to use the service which creates more traffic and increases user retention. Some features may also become exclusive to paying members. This can drive further revenue.

2.4.4   Marketing Value Potential

New features are prime sales arguments, and a steady stream of new features - even small ones, can keep users engaged on our sales channels and help spread the word of our business faster.

2.4.5   Cumulative Value

Implementing features fast can help collect data on which are popular. This will help us invest in the right ones, rather than doubling down on a few. Continuously adding features will build up a one stop shop which can make our service preferable even if other services provide one or some of the features better than we do.

2.4.6   Potential Waste

It is not certain that all features will be used, especially if not enough effort is put into developing them. Allocating resources to implementing multiple features half hearted can also drive users away as the overall feel of the service declines. It is a balance of quality and quantity.

2.5 Platform Expansion

Platform expansion seeks to increase the ways and places in which the current functionality of the system is offered. This can help serve more users who are currently not supported, and to offer existing users with more choice of platform.

2.5.1 Opportunities

- Android watch - implement seizure detection on android watches to cater to more users.

- Web platform - a web platform for users who prefer to manage things on a computer.

- Health data collection platform - create platform for extraction of anonymized user data.

- Third party hardware integration - api for integrating service with third party epilepsy detection devices

- Third party health platform integration - integrate our service with external user oriented health data collection platforms

- Expanding to new countries

2.5.2 User Value

Expanding any user oriented platform will have an immediate effect as users will get more choice of the platform they use, and more users will be serviceable. As to third party business oriented platform expansion and integration it is not expected to get any adaptation in the short term.

2.5.3 Business Value Potential

Offering third party integration can open doors for new partnerships which can strengthen the service by leveraging existing user products of other companies. Offering services on multiple platforms and in multiple countries will create a larger potential user base, which will also make our company more interesting to investors.

2.5.4 Marketing Value

It is difficult to target marketing at users of specific platforms. This means that advertisement value is lost on users who are not supported, and may in fact send them to competitors who do support them.

2.5.5 Cumulative Value

Each platform and country is its own ecosystem wherein information travels. It takes time for news to spread which means the success on one platform does not travel directly to a new. This makes it relevant to implement new platforms early to give the user adaptation time to grow.

2.5.6 Potential Waste

Adaptation on new platforms is not guaranteed, and the effort may be wasted. It is also a new platform to maintain which makes new feature implementation costlier and more error prone. Abandoning a poorly performing platform can also have a negative effect on the companies image, as some users may have come to rely upon

2.6 Monetization Expansion

Monetization Expansion seeks to create new streams of revenue or expand upon existing channels. This can be to increase the revenue or change the method of income to increase user retention.

2.6.1 Opportunities

- Splash screen advertisement

- User data sale

- User subscription

2.6.2 User Value

Increasing monetization will increase the resources for improving the service. Establishing indirect income streams can also keep the user price down.

2.6.3 Business Value Potential

Increasing current income will prove the viability of the business model. This will make it more interesting to investors, which can result in even more resources from investments.

2.6.4 Marketing Value

More resources means faster development. This development can be used for marketing. Resources can also be used for more marketing.

2.6.5 Cumulative Value

Any unexploited revenue is lost. Establishing revenue streams fast will create income, which can drive the product development, which will create more revenue. It should therefore be a strong focus even early in the process as long as investments do not max out the development potential.

2.6.6 Potential Waste

Some revenue streams may not be worth pursuing. Some may drive away users and eventually delay the growth of the company.