

Assignment 5

Design Thinking-Innovation Idea Summary

Who are you?

My name is Rishabh Pandita. I am pursuing Masters in Computer Science from University of Florida. My technical background include working as a software developer for Barclays for 3 years and studying Computer Science for 4 years from University of Pune. My combined experience has imbibed a sense of how industry work and how to deliver a finished product to users while innovating and staying ahead of market. I have been in multiple roles during my technical work experience. I have been a scrum master of a small team of six people and delivered a polished product which was later deployed successfully and currently in use by farmers in south part of India. I believe my experience with technology and leading teams ensures that our product will get to the market in the best possible shape and we can scale up and improve the product as we go.

Unmet Need/Problem Statement

Now a day's lot of people have devices like computer and mobile where a lot's of storage is left unused. The service that I am proposing will help users monetize their unused digital space. Another problem is that most of servers on internet are centralised which means a single company has all data and they charge heavy charges for it. If a users wants to buy some cloud storage for hosting a web service they have to make do with the fact that all their confidential data is with a single party which can be easily exploited and they have to pay heavy charges to keep their data on the servers. My proposal helps to save a major percentage of fee to rent a server and provide the guarantee that it will be safe.

End Product and the Underlying Technology

Well now to describe the end product and underlying technology. The end product will have two stakeholders and two services to feed from them and provide to other. It will work as a producer and consumer concept. One service will run on user's computer and mobile device. This will use the free space which is not being claimed by OS or user to store some data. The bytes of data stored on user's storage will be paid back to user in form of money by this service. This service will make sure that data stored is encrypted and is fragmented which means user will not be able to make sense of data. This service will automatically adjust the data as user uses its own storage. The other part of the service will be a online storage renting service. Some other users can rent bytes of data and pay per byte. Their data is will not be stored on any server, rather it will be stored on the storage of users who have accepted to rent out their storage to the first service. Multiple copies of data fragmented and encrypted will be distributed on this network of users renting out space. Thus this will result in a self balancing ecosystem.

Target Market

This product and service is targeted to all those people who have extra space on their phones and other device and want to monetize it. This is also targeted to users who want to put their data on internet with the guarantee of data security and at low cost. This service can be used by developers to make use of distributed network of storage and take advantage of low cost. Users can pay a small amount to the company to maintain their data consistency and make sure data is not lost. Without this service users will be left to pay heavy sum to big companies to user servers and host their websites. Without this service all those who have extra storage in their digital devices will be un used. Without this service

market will miss the opportunity to monetize distributed networks which is the future and hope that the single company who has all their data at one place don't get hacked or exploited. Another advantage of such a service would be that it would be unhackable because no device will have complete data.

Competition and Competitive Advantage

Currently there are no services in the market which brings together both, helping users to monetize their storage and provide server less cloud storage to the internet. There are products which do one of the mentioned service but not both. Paying users to rent their space on their day to day usage devices will encourage them to be more proactive and contribute more. A few products offer users their own product or service in exchange of shared space or processing which is not exciting because a user may not be interested in using their product. Many users in market are afraid that allowing such services will stop them from using their own storage when they need it, this is addressed in my product where the service proactively detects if a user is trying to use space which is overlapping with shared storage and maintains a buffer and proactively moves data to other nodes and frees that space so that it is available for user to use.

Funding and Operations

In order to turn this innovation into end product it is important to invest in research and development of a distributed topological protocol and algorithm which efficiently manages the bytes of data, transferring data in the mesh network, fragmenting and efficiently moving and making redundant copies of data. Many important roles will need to be filled with engineers and manager. Investors who believe in the technology and idea will be an integral part of the process and with their investment this operation will be successful. Operations will include selling the software over the internet. This will be offered with a trial period to use it for free and lucrative on boarding offers for first time users. A marketing is necessary which markets this product to investors and make them aware about how secure and safe this service is and why it is the future. If needed a kick starter can be started till market acknowledges the product and attracts users and investors.

Go-to-Market Strategy

Everyone who is on internet, owns a device and is willing to share their storage will make money. Users who want to host their data cheaply and securely will be one of the other end customers. Now this ecosystem will not be self sustaining from start so we will need investors to cover the cost difference and invest on research and development. But once enough users have on boarded on both service it will become a self sustaining machine with little supervision and intervention. The end product will be advertised word to mouth. In addition this can be used as an external service by many other applications and service on internet which will bring up the profits.

Stakeholders and Partners

The only stakeholders in this product are users and investors in early stage of product, after it has matured only users will be the stakeholders. There is no approval required from any government department because a user is always aware if their device is being used or not and the service guarantees not to invade users private data on their device. This is a new unexplored market which has huge potential in pushing internet in the new technology age and making money and its' always good to be first than to be last.