Surprize.Me – Interaction Design Project

SI 582
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Interaction Design Project

1 LINK TO THE PROTOTYPE

http://share.axure.com/3UH2EA/

2 INTRODUCTION

It was a really interesting and rich experience to follow the entire design process. I started with the process of defining the problem. Following the problem definition, I sketched out around forty solutions to solve the problem and the concerns surrounding that problem. Next, I did the conceptual map of the solution that I choose, so as to understand the solution concept in its entirety. Following conceptual map, I did the scenarios and story boarding to test the solution. Refining the solution further, I did the wireframing. But wireframes were not enough to test the interaction hence, I developed the paper prototypes and tested them with real users.

After the continuous refining and rigorous testing, I started with the development of the Digital Prototype using the tool - AXURE. After starting the digital prototyping process, I went into the continuous loop of getting design critique and integrating the critique with my digital prototype. Hence, after this thorough and robust process, I was able to develop a solution - Surprize.Me, which I will explain in the later part of the report.

3 PROBLEM STATEMENT

There are two primary problems that I am focusing to solve with my project:

1. In the present scenario, even though the world calls itself globalized, we hardly know about people from different countries and the cultures that prevail in that country. I realized about this fact, when I came to the United States, for my masters. I was so excited to meet people from different cultures and know about their traditions. I wanted to talk with them and understand the intricacies of their culture and compare them with mine. But unfortunately, the traditional ways of reading and learning about the cultures (through internet and books) is extremely boring and mundane.
2. I wanted to help the introverts and the people with lesser friends to have better social lives. At present, all the social networks that exist, only lets you be friends with the people who you already know. Moreover, some other networks which allow strangers to interact with each other are full of spam. Hence, it is difficult for these people to remain connected to this world.

4 SOLUTION OVERVIEW

I designed a gift/keepsake giving website that matches the gifts based on the gift giver and gift receiver personality. The gifts are of type – Self Created, Handmade, Personal Items, Phone/Email and Surprize

gift from the system. Additionally, you can provide the feedbacks on the gift received, this will help the system to do the better matching next time. All the users who received the gift from the gift giver, will be included as friends in the "Stranger Network" of the gift giver.

To detail the solution, this system will be used by people to send gifts to people around the world. Hence, gifts received from different cultures will encourage people to know about the culture from where they received the gift. Additionally, if they are sending a gift to a person in a different country, they will be encouraged to know about that culture in advance before sending the gift. Lastly, the systems "Stranger Network" will let people talk to other people from different cultures and will motivate mutual learning. Moreover, the special dates like birthdays, anniversary can be marked by the system and the probability to get a gift on that day will increase, so as to spread greater joy.

The introverts and the socially outcast people will also be able to benefit from the system, as they will be able to connect to similar people based on their personality and also receive gifts from around the globe and this is turn, will give them a sense of belongingness.

In short, this gift giving system will aim at making the world to be a better connected place. A little gratitude should be shown by everyone and this system will help them do so.

5 DESCRIPTION OF THE FINAL DESIGN

Currently, the prototype of this system is able to address all the major functionalities, which I intend to be built into the system.

The major functionalities of the system are:

Receive/Request a Gift: This is the major flow, implemented by me. It has several steps, and other processes, kind of, borrow concepts and bleed into this process. This process is implemented assuming that the user is not logged in. So, the first screen asks the user about the gift-givers characteristics. Next, the user is asked about the characteristics of the gift that is desired by them. Following this, the user is asked to give a personality test. If the user is a first time user, or is requesting the gift on behalf of their loved one then this test is recommended, else they can skip this test, in that case the last saved settings will be used. If the system finds the gift, fulfilling the criteria given by the user, then the users is asked to log in the system. At this point, they can either register if they are a new user or directly log in. After this, the users are shown the "order" screen. If the user is a new user then they will be asked to pay a small monthly participation fee. This fee in turn is used to facilitate the gift donators. For existing users, they can buy an additional monthly pack if they are running out of the gift requests. **[See Appendix 1]**

Send a Gift: I have implemented this process assuming that the users are already logged into the system. The system will have to borrow some screens from the receive/request gift process, if it was otherwise. So, the current process flow, asks the user for the gift-receivers characteristics. Next, it asks the user about the characteristics of the gift, which the user is planning to give. Finally, based on the gift receiver and the gift's characteristics, user (gift-giver) is shown the appropriate screen which can be used to deliver the gift to the gift-receiver. **[See Appendix 2]**

Donate a Gift: Again, this process is implemented assuming that the user is logged in. This process starts by asking the user about the characteristics of the gift which they are planning to donate and based on

that, the gift will either be picked up or will be submitted to the admin, via the internet. These are the gifts that are available to the gift receiver/requester. **[See Appendix 3]**

Personality Test: These are the set of questions which are intended to assess the personality of the person (idea from www.hunch.com). These questions are usually funny and amusing to answer, and they also fulfill the purpose of judging the personality of the respondent. In my system, these set of questions appear, whenever you are using the system for the first time. Moreover, in the case of requesting a gift for your loved ones, you may choose to answer these questions again, on their behalf. **[See Appendix 4]**

Stranger Network: Out of all the people who received the gift from you, the ones who gave you the above average rating will be shown in the section of your account's page. This is your "Stranger Network". You can chat with these people and have the mutual cultural learning experience. Moreover, if you feel that one or more of these people are annoying or are spamming you, then there is an option to block them out. **[See Appendix 5]**

Feedback to the Gift Received: In the accounts page, you have an option to give feedback to all the gifts that you have received till date. These feedbacks are really important in order to improve the algorithm, so as to better suit your personality. Additionally, the gifts which you rate high, will appear in the gift-givers page and you will be included in their "stranger network" as friends. So, the idea in general is to combine the results from the personality test and the feedbacks received from the gift-receivers to assess the overall personality of the gift-givers and in general the users of this system. **[See Appendix 6]**

Left un-implemented: For the gift receivers, I wanted to create some kind of a profile, so that every time they give the personality test on someone else's behalf, they do not have to repeat the test when they request a gift for themselves. Second, I was unable to provide the scenario of logged in for the send and donate gift processes. This was majorly because of the technological limitations which I was facing with the tool. Third, the overall system has some consistency issues, for example, the Gift Characteristics screen asks the user to click on the gift image, while in the other screens you can proceed to the next screen by hitting the Next button.

I used the convention sketching technique of drawing everything on the paper and then materializing it. I think I was able to harness the benefits of quick and dirty designing, to get more clarity about my design. Same was suggested by Buxton in "The anatomy of sketching" and in "Sketching User Experiences". Also, I did not get too attach to my design and hence, was able to make regular adjustments based on the feedbacks which I received. This move was encouraged by the reading Rudd, J., Stern, K., & Isensee, S. (1996). Low vs. High-fidelity prototyping debate. Interactions, 3(1), 76-85. The negatives of the paper sketching is that till the very last moment you are not very sure of the final design and layout of the finished product.

I used the tool – AXURE, to develop my digital prototype. To improve the aesthetics I used the Photoshop and the Illustrator. AXURE, as a tool is quick and effective in creating mid-fi prototypes. The only problem is that it has an extremely high learning curve. Sometimes, even to implement small details you have to go through an extremely long learning curve. Moreover, it is really difficult to pass variables from one screening to another and you end up developing several screens for each of the decision node.

6 DESIGN EVOLUTION

The design of the system took a giant leap from the initial design to the final prototype. Some of the major changes which happened and the cause of those changes are illustrated below in the chronological order:

Initial Design: So the initial idea for this project was to solve the problem of cultural exchange and introversion through a gift exchange system. Hence, only the process of SEND gift was my design consideration.

Brainstorming Session: After the initial self-brainstorming and sketching of the design alternatives, I had a brainstorming session with the assigned team. This session was based on the "Chapter 4: The perfect brainstorm" in Kelley, T., & Littman, J. (2001). And, I was amazed to see the productivity of this session. I received several new perspectives and ideas which could improve my current design. I included the processes of RECEIVE/REQUEST gift, and DONATE gift, only after the group brainstorming session. Hence, I can say that the brainstorming session was a major impact on my design process.

Concept Map: Next major impact was the concept map **[Appendix 7].** This was the first time in my design process that I was able to envision my entire system. I was able to define the major stakeholders and the processes attached with those stakeholders. The workflow diagram from the Case Study: "Mullaney, et al. Thinking beyond the Cure: A Case for Human-Centered Design in Cancer Care. International Journal of Design 6(3), 2012", was especially helpful.

QOC Analysis: All the previous steps of the design process – brainstorming, sketching, wireframing, scenarios etc. were aimed at expanding the scope of the project and I was really getting confused regarding the number of processes and the interlinking between them. The Questions, Options and Criteria (QOC) Analysis was the first time I started to scope down my project. It was a really helpful technique and I learned it from the reading of MacLean, A., Young, R. M., Bellotti, V. M. E., & Moran, T. P. (1991). Questions, options, and criteria: Elements of design space analysis. Human-Computer Interaction, 6(3-4), 201-250. With the help of this technique I was able to narrow down my functionalities of the system, also the gift categories. The end result of this process was an implementable scoped project with key design features. **[Appendix 8]**

Paper Prototyping: I really loved this process. This was the first time that the real users interacted with my system – the paper prototyped version. And while I was watching this process, another team-mate took the notes about the bottlenecks in the design which the user was testing. I this particular process helped me make my project more semantically appealing to audiences. There were certain buttons and wordings which made sense to me but were oblivious and confusing to the users. Hence, this firsthand experience of the user interacting with my system impacted my project in a major way. And, since it was a paper prototype, hence, I had no attachments with the prototype and therefore I was able to make the changes then and there and also discarded some of the unnecessary screens. The Fudd's law of creativity explained in the "Rettig, M. (1994). Prototyping for tiny fingers. Communications of the ACM, 37(4), 21-27" was really motivating. Additionally, the case Study: "Wii: http://iwataasks.nintendo.com/interviews/#/wiiu/miiverse2/0/0" explained me the importance of the paper prototyping and how it is being used by the professionals.

Design Critique: I will call this as the most important phase in my design process. I had the chance to take the design critique, first from my team mates and then from Professor Predrag. The design critique from my classmates helped me to improve my project by removing some of the unnecessary steps and by adding details at other places to remove the ambiguity from the design. Professor Predrag's design critiques was much more directed. Hence, I was able to correct the project semantically. I had messed the design in terms of mixing the process concerning the Gift, Gift Giver and Gift Receiver. His critiques helped me sort this process and allowed me to separate them out. This in turn, gave a clearer meaning to my design. Additionally, I was able to resolve the issue concerning the display of feedback to the users in the least annoying manner. The challenges concerning this design were:

- People will be emotionally hurt and will be discouraged to use the system if they received a bad rating.
- Even if we remove the bad rating, people will be able to know that they received a bad rating based on the people in the stranger network.
- Total removal of feedback will hinder the system's capability to better match, next time.

The solution which I arrived at, through the process of critique was:

- Since, people who gave you bad rating might not be interested in showing up into your stranger network, hence I decided to not include bad feedbacks [1, 2 and 3 stars] and also remove those people who gave the bad feedback from the stranger network.
- But, internally make use of these ratings to improve the matching process.

Additionally, the reading of Design Critique and the Creative Process - http://www.alistapart.com/articles/design-criticism-creative-process/ was especially helpful.

7 CONCLUSION

The design which I have developed is the result of the numerous changes which occurred throughout the entire design process. The entire experience has made me realize the fact that until the design is in your head it is of no use, since it will be naïve, as it only has been looked upon from one perspective and secondly it will lack the user aspect in it. The second important fact is that you cannot achieve the goals and the objectives of your design, until and unless you incorporate design critique into your designing process. Overall, this project provided me with unparalleled learning experience, which will definitely be utilized in my future career.

8 APPENDIX

8.1 APPENDIX 1 – RECEIVE GIFT PROCESS

Who do you want the Gift from?
NOTE: You will receive one of the donated gifts by other users.

Country of Origin ❓ ⓧ

- ☑ Country A
- ☑ Country A
- ☐ Country A
- ☐ Country A
- ☐ Country A
- ☐ Country A
- ☐ Country A
- ☐ Country A

Gift Giver Characterestics ❓ ⓧ

- ☑ Age Below 20
- ☐ Age Between 20 to 50
- ☐ Age Above 50
- ☐ Male
- ☑ Female
- ☐ Feature 1
- ☐ Feature 2
- ☐ Feature 3

Your Selection:

Countries:
ABV
ABC

Demographics:
<20
Female

Next >>

What kind of gift do you want?

Occasion ❓ ⓧ

- ☑ Birthday
- ☐ Anniversary
- ☑ Marriage
- ☐ Festival
- ☐ Event 1
- ☐ Event 2
- ☐ Event 3

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Please Click on the below Gift Category to proceed further:

Receive a surprize gift from the Surprize.me team

Gift Categories

System Surprize	**Self-made Gifts**

Previous		Next

Tell us about yourself (If you are requesting the Gift, tell us about your loved one)
NOTE: If you are a First time user or choosing the gift for your loved ones, please give this test for yourself or on their behalf. The results help us match the Gifts better.

❓ **Skip this STEP>>**

Question 1: Which of the below colors, you like the most   **2 More Remaining**
- Yellow
- Orange
- Red
- Blue

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Please Login to continue

Log In Panel

Your Name *

somesh

Your Password*

For the Demo Purpose No Validation has been done!!

Cancel

Login

Mactch Found

Login   OR   Re

To Continue

Please fill out the details

Personal

Expected Date for Delivery

04/25/2013   NOTE: Atleast one week advance date should be picled

Street Address:

1962 Traver Road, #104

City: **State:**   **Zip:**

Ann Arbor   MI   48105

Phone:

734 111 1111

Get this Gift

Gift Requests Left for the Month: 2

NOTE: After this request you will be left with **1** gift request for the month.

Place Order   **Purchase more Requests**

8.2 Appendix 2 – Send Gift Process

Who do you want to give the Gift to?
NOTE: You should already have a gift which you want to give.

Gift Receiver's Country ❓ ⊗

☐ Country A
☐ Country A
☐ Country A
☐ Country A
☐ Country A
☐ Country A
☐ Country A
☐ Country A
☐ Country A

Gift Receiver's Characterestics ❓ ⊗

☑ Age Below 20
☐ Age Between 20 to 50
☐ Age Above 50
☐ Male
☑ Female
☐ Feature 1
☐ Feature 2
☐ Feature 3

Your Selection:

Countries:
ABV
ABC

Demographics:
<20
Female

Next >>

What kind of gift are you giving?

Occasion ❓ ⊗

☑ Birthday
☐ Anniversary
☑ Marriage
☐ Festival
☐ Event 1
☐ Event 2
☐ Event 3

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Make Phone Call / send email to a person, based on your chosen criteria

Phone / Email   **Self-made Gifts**

Previous   Next

Please write the email and send it to your "stranger" friend

This email will be received by:

somesh@gmail.com from India

B *I* U | ☰ ☰ | ☲ ☲ | ☰ ☰ ☰

Send

8.3 APPENDIX 3 – DONATE GIFT PROCESS

What kind of gift are you Donating?
NOTE: The gifts donated can be requested from the Receive section of the website.

Occasion ?

X

- ☑ Birthday
- ☐ Anniversary
- ☐ Marriage
- ☑ Festival
- ☐ Event 1
- ☐ Event 2
- ☐ Event 3
- ☐ Event 4

Personal Gifts include Books, Guitar, and other self owned items.

Hand-made Gifts | **Personal Items**

Previous | | Next

Please tell us the date, time and address and we will be happy to pick it up

Expected Date for Pick-Up

04/25/2013   NOTE: Atleast one week advance date should be picled

Expected Time for Pick-Up

9-12 AM EST   NOTE: Time should have 3 hr window example - 9-12 AM EST
(Format - HH:MM AM/PM EST)

Street Address:

1962 Traver Road, #104

City: Ann Arbor   **State:** MI ↕   **Zip:** 48105

Phone:

734 111 1111

Pick-Up Logistics

Pick-Up Date:
04/22/2013

Pick-Up Time:
9 - 12 AM

Address:
1962 Traver Road, #104
Ann Arbor, MI - 48105

Phone:
734-111-1111

Pick-Up

8.4 APPENDIX 4 – PERSONALITY TEST

Tell us about yourself (If you are requesting the Gift, tell us about your loved one)

NOTE: If you are a First time user or choosing the gift for your loved ones, please give this test for yourself or on their behalf. The results help us match the Gifts better.

Question 1: Which of the below colors, you like the most

2 More Remaining

- Yellow
- Orange
- Red
- Blue

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8.5 APPENDIX 5 – STRANGER NETWORK

Stranger Network

Somesh

Chat   Block

Rahul

Chat   Block

8.6 APPENDIX 6 - FEEDBACK

Gifts Received / Requested
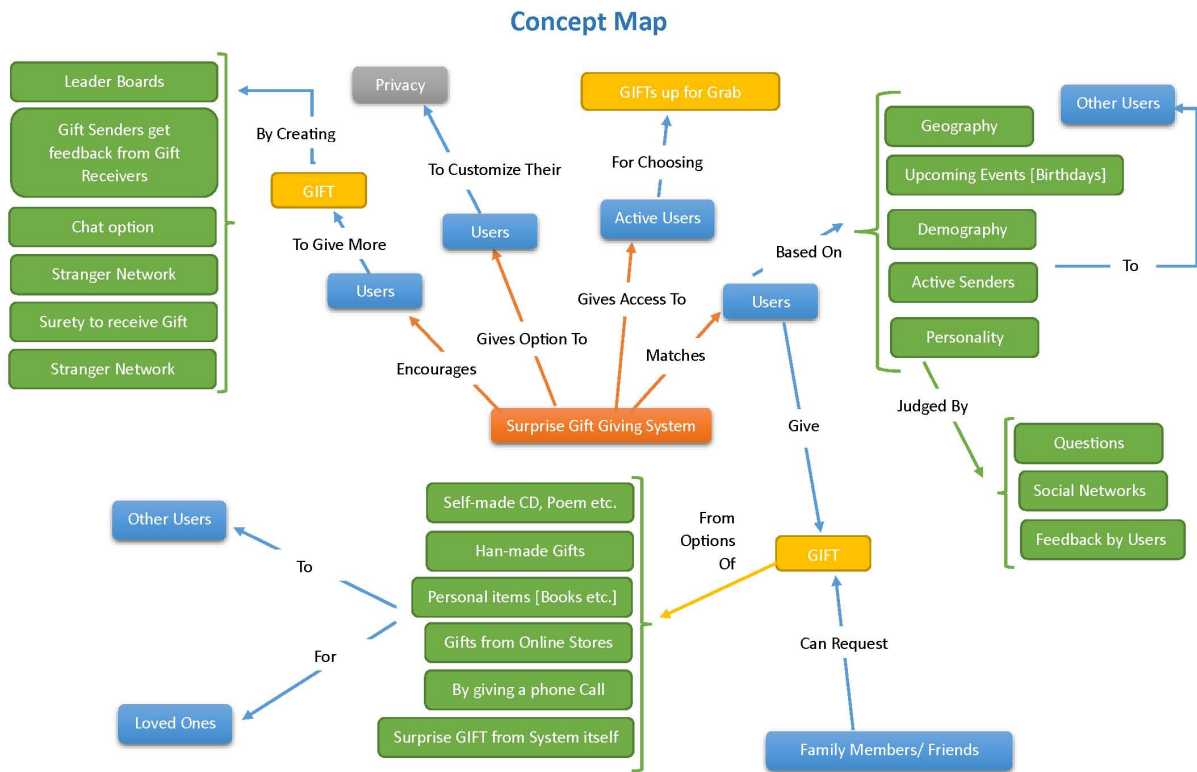
Gift 1   **Rate This:**
☆☆☆☆☆

Gift 2   **Rate This:**
☆☆☆☆☆

8.7 Appendix 7 – Concept Map

Concept Map

Leader Boards

Gift Senders get feedback from Gift Receivers

Chat option

Stranger Network

Surety to receive Gift

Stranger Network

By Creating

GIFT

To Give More

Users

Privacy

To Customize Their

Users

GIFTs up for Grab

For Choosing

Active Users

Gives Access To

Users

Matches

Gives Option To

Encourages

Surprise Gift Giving System

Based On

Geography

Upcoming Events [Birthdays]

Demography

Active Senders

Personality

Other Users

To

Judged By

Questions

Social Networks

Feedback by Users

Other Users

To

For

Loved Ones

Self-made CD, Poem etc.

Han-made Gifts

Personal items [Books etc.]

Gifts from Online Stores

By giving a phone Call

Surprise GIFT from System itself

From Options Of

GIFT

Give

Can Request

Family Members/ Friends

8.8 APPENDIX 8 – QOC ANALYSIS

**Feature:** Gifts will be given from one user to the other

Question: What kind of gifts?

Options:

- Self-made CD, poem etc.
- Hand-made gifts
- Personal items like books etc.
- Gifts from online stores
- Phone / email
- Surprise gift from the system

Criteria and Priority:

- Convenient to deliver [4]
- Easy to manage (in terms of – keep track of active users, keep track of online inventory etc.)[5]
- Wanted by the other users [1]
- Make sense to the users [3]
- Fulfill the purpose of the system [2]
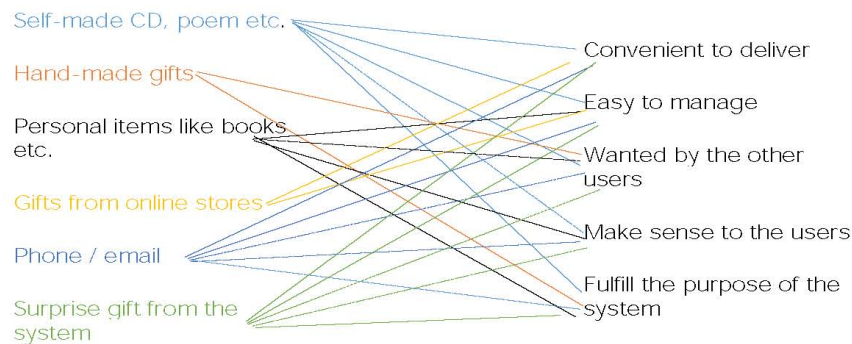
Based on the above, the options I chose: Self-made non tangible gifts, hand-made tangible gifts, personal items, phone / email, and, Surprise gift from the system.
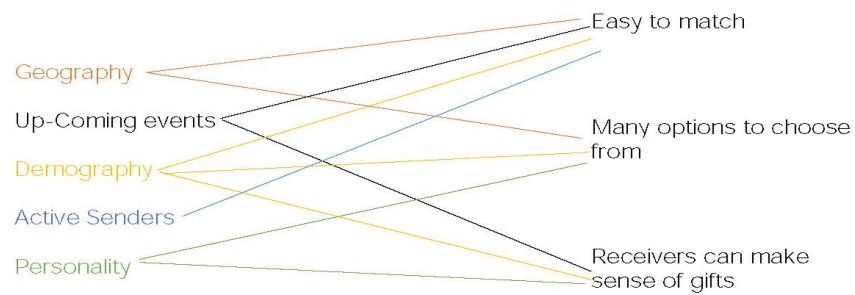
QOC Analysis:

Feature: Matching the users

Question: Based on what factor the users will be matched?

Options:

- Geography
- Up-Coming events
- Demography
- Active Senders
- Personality

Criteria and Priority:

- Easy to match [3]
- Many options to choose from [2]
- Receivers can make sense of gifts [1]

Based on the above, the options I chose: Upcoming Events, Demography, and, Personality.

Feature: Matching the personality of the users

Question: How will the personality of the users be matched?

Options:

- Questionnaire
- Social Networks
- Feedback by the Users

Criteria and Priority:

- Should be accurate [1]
- Should not invade users privacy [2]
- Should be convenient to do [4]
- Should reveal results quickly [3]

Questionnaire

Social Networks

Feedback by the Users

Should be accurate

Should not invade users privacy

Should be convenient to do

Should reveal results quickly
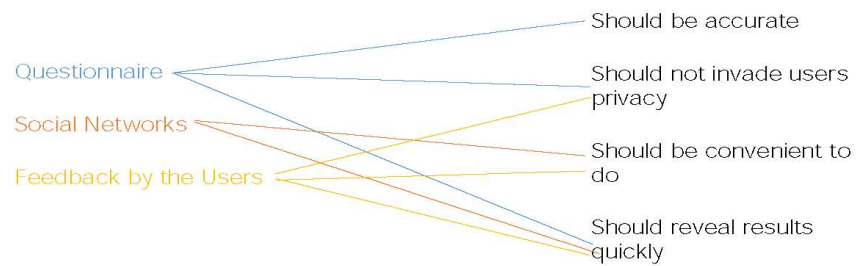
Based on the above, the options I chose: Questionnaire, and, Feedback from Users.