# **Usability Test Plan**

# Centre for Social Innovation website

Aditi Bhargava, Sally Harrison, Danielle Klein, Paola Santiago

INF1005H: Usability Workshop

Faculty of Information, University of Toronto

January 2016

# **Table of Contents**

1. Introduction	3
1.1 Overview of product and its users	3
1.2 User type for your test	
1.3 Purpose/objectives of test	
2. Methodology	5
2.1 Briefing/Introduction	5
2.2 Tasks	5
2.3 Logistical details	6
2.3.1 Testing facility	
2.3.2 Equipment and software	6
2.3.3 Number of participants	
2.3.4 Duration of test sessions	6
2.3.5 Data to be collected	
2.3.6 Roles and responsibilities of team members	7
2.4 Debriefing/Closing	
3. Bibliography	9
4. Appendices	10
4.1 Background questionnaire	
4.2 Post-session questionnaire	
4.3 Product reaction form	11
4.4 Moderator's script	12
4.5 Test metrics	12
4.6 Observer form	13

### 1. Introduction

# 1.1 Overview of product and its users

The Centre for Social Innovation (CSI) is a group of co-working spaces and community hubs for non-profit organizations and social enterprise ventures. Founded in Toronto in 2004, the CSI now has four locations in the city and employs over 2,500 staff. The CSI provides rental space for individual social entrepreneurs and researchers, as well as full office space for social organizations and charities.

There are three tiers of membership offered at varying price points. Firstly, there are "hot desks" for individuals seeking to rent a desk for a given number of hours per month. Secondly, there is the community membership for individuals seeking access to resources exclusively, without paying for a space. Lastly, there is also the team clusters option, which offers a group of desks clustered together for teams or organizations. Teams also have the option of renting private office suites. The Centre also fosters innovation by providing event and meeting space and hosting skill-building events for up-and-coming organizations.

The CSI website provides visitors with an introduction to the work of the Centre, as well as its affiliated members. It contains explanations of the centre's philosophy and definition of "social innovation," as well as a blog showcasing the work of the community. The site also advertises opportunities for membership and hosts online forms for those interested in applying for space or for community membership. Upcoming events are also advertised on the site, as well as job postings from CSI members and "community buzz" posts (which are effectively an online bulletin board for community members, advertising events and requesting services).

Chief among potential users of the CSI website are non-profit organizations, charities, and social ventures seeking information about the centre, events or meeting space, and/or membership. Similar major users include individual social entrepreneurs or researchers seeking the same information, along with potential partners seeking sponsorship information. Additional users would be CSI community members from different cities or neighbourhoods seeking information about temporary work at a different location and local community members seeking information about the CSI.

#### 1.2 User type for your test

For the purposes of our usability test, our primary user type is a young individual interested in social innovation and/or research. Our target user type is seeking information about what the CSI is, as well as potential opportunities for launch support, space use, skill-building, and networking. Our user is a novice in terms of their knowledge of the CSI, but with a strong technical competency.

# 1.3 Purpose/objectives of test

As this is a developed website, our summative test will evaluate whether the site is being used as efficiently as intended. Our test has multiple objectives. Broadly, we aim to determine the user's actions in attempting to gain a basic understanding of what the CSI is, what it's activities are, and what opportunities the CSI can provide them. In order to test these criteria, we are evaluating user experience through the lens of Quesenbery's 5 Es (Barnum, 2011, pp. 108). In particular, our evaluation aims to test primarily the effectiveness of the site, as well as its ease of use and efficiency.

Specific goals of our test include determining the user's ability to find relevant membership options; to find community events and workshops; to find possible job postings; and to understand associated costs for involvement with the CSI. Overall, our goal is to gain an understanding of the user's perception of the CSI on the basis of their navigation of the website. Specifically, whether the CSI's site effectively provides users with a clearly defined idea of their activities and of what opportunities might be available for them through the Centre.

# 2. Methodology

# 2.1 Briefing/Introduction

Our test will begin with an introduction from the moderator using the script provided in appendix 4.4. The user will also fill out the background questionnaire at this point. The user will then have the opportunity to ask questions and express concerns, after which the evaluation will begin.

#### 2.2 Tasks

For our usability test, sample users will be given high-level tasks to ensure unbiased navigation. In order to discover authentic user behaviours and needs, the test users are given a general set of objectives that guides them but also allows them explore the site. Tasks are also situated as scenarios with some context provided in order to more easily allow the user to understand the activity (McClosky, 2014). Our tasks are also generally more focused on how users use the interface, rather than how users use specific features within it (McClosky, 2014).

Tasks for the user are as follows:

- 1. Consider the home page of this website. What do you think this website is for? Are there any unfamiliar words or terms? We don't want you to start clicking, though you can start scrolling and looking at navigation options.
  - a. What would be the first thing you would click on this website?
- 2. You are seeking a space to work at the CSI. Using this website, determine where to obtain this information, and what your options are.
- 3. A friend has told you that CSI is a large community with many different ways to become involved. Using this website, please identify where to find information about ways to get involved with this organization and any associated costs. Please let me know when you have finished the task.
- 4. You have heard of the Centre for Social Innovation before, but are unsure of what it actually is. You've identified information about the Centre, but have more questions. Using this website, determine whether or not you have the ability to speak with a representative.
- 5. You are currently unemployed and a friend has just informed you that there is a job posting on the CSI website that suits you perfectly. Using this site, please locate the current CSI job listings and click on a posting that interests you.

Users will be directed to indicate whether they have completed the task.

Depending on time allocation based on our pilot testing, we will also include a card sorting component in order to test the intuitiveness of navigation on the site, asking users to sort pages into their given drop-down menu category on the universal navigation bar.

### 2.3 Logistical details

#### 2.3.1 Testing facility

Testing will be executed in a conference room in the Bissell building, room 728. The user will sit in the centre of the conference table, with note-takers seated behind them, the moderator on one side of the table, and the observer on the other side and moving around (Figure 1).

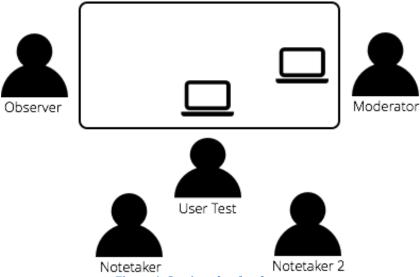


Figure 1: Seating plan for the tests.

#### 2.3.2 Equipment and software

Users will conduct tests on a Mac Laptop on a Google Chrome browser. Card sorting will use cue cards. Depending on the outcomes of our pilot testing, we may also employ online screen-sharing software through *join.me* so note-takers can observe the user's screen on separate laptops. Users will input questionnaires using Google Forms.

#### 2.3.3 Number of participants

The test will have 5 user testers.

#### 2.3.4 Duration of test sessions

Each user test will be roughly half an hour. They will be conducted on February 1, 2016 between 12:00pm and 3:00pm.

#### 2.3.5 Data to be collected

To collect data in this evaluation, two note-takers will document user's responses, noting comments and actions. The note-takers will be provided with printed screenshots of the webpages and ideal paths per task as a metric against which to evaluate the user's progress and experience. The percentage of tasks that users complete correctly will also be collected (McClosky, 2014). Since the website is already built and reasonably robust, note-takers will also be provided a rubric for testing basic usability metrics (see Appendix 4.5) (Barnum, ch. 5, 2011). These metrics will examine performance and preference data, and qualitative feedback (Barnum, ch. 5, 2011). Observers will also be provided with observer forms to guide their notes (Barnum, ch. 5, 2011).

An observer will also take further notes, looking particularly for non-language cues, such as actions, body language, facial expressions, and other indicators of user experience. The moderator will also provide a post-session debriefing report based on their observations. Based on the results of our pilot testing, we will determine whether or not we require technical data collection to bolster the quality of our findings, such as audio or screen recording.

As mentioned in section 1.3, effectiveness and efficiency are central concerns in our evaluation. To track these qualities specifically, our note-takers and observers will look for any indication that the user needed assistance to perform the tasks given within the time limit, and for indications that the users understand what the CSI is and what services it offers. Engagement will be further measured by responses to the post-session questionnaire and product reaction form (see section 2.4). They will also evaluate error-tolerance by counting experiences of errors and noting how users recovered or failed to recover from errors. Our evaluation will also take into account the easiness of learning to navigate the CSI site. The tight time frame of 30 minutes per test, however, lowers the importance of this last goal.

#### 2.3.6 Roles and responsibilities of team members

Each test will have one moderator, two note-takers, and one observer. Our team members will rotate through these roles. The responsibilities of each role are as follows:

- Moderator: The moderator conducts the test and engages with the user, employing the moderator script. The moderator will prompt the user to fill out the pre-test background questionnaire, post-session questionnaire, and product reaction form. The moderator will also run through all tasks with the user and lead card sorting if applicable, and will answer user questions.
- **Note-taker:** The note-takers will record data from the test by taking notes based on their impressions and filling out rubrics. Note-takers will observe users' actions on the site and in card sorting, as well as comments made and errors. Note-takers will be silent and seated during the test.

• **Observer:** The observer will record data from the test with based on their impressions and filling out rubrics, with particular attention to non-language cues. The observer will also look for potential limitations with the test itself based on the user's actions and behaviours. The observer will be silent during the test and may move around as they see fit.

# 2.4 Debriefing/Closing

Following the completion of the test tasks, the user will be asked by the moderator to fill out both the post-test questionnaire and the product reactions form. The user will be asked if they have any further questions, comments, or concerns, which will be addressed by the moderator. The session will then be closed.

# 3. Bibliography

Barnum, Carol. (2011). *Usability testing essentials.* Burlington, MA: Morgan Kaufmaan. Chapters 5, 6.

Hawley, Michael. (February 22, 2010). *Rapid Desirability Testing: A Case Study*. Retrived from <a href="http://www.uxmatters.com/mt/archives/2010/02/rapid-desirability-testing-a-case-study.php">http://www.uxmatters.com/mt/archives/2010/02/rapid-desirability-testing-a-case-study.php</a>

Krug, Steve. (2014). Don't Make Me Think Revisited: A Common Sense of Approach to Web and Mobile Usability. Chapter 9.

Krug, Steve. (2010). *Usability test script*. Retrieved from from <a href="https://www.sensible.com/downloads/test-script.pdf">https://www.sensible.com/downloads/test-script.pdf</a>

McCloskey, M. (2014). *Turn user goals into task scenarios for usability testing.*Retrieved from <a href="http://www.nngroup.com/articles/task-scenarios-usability-testing/">http://www.nngroup.com/articles/task-scenarios-usability-testing/</a>

Pernice, Karen. (January 26, 2014). *Talking with participants during a usability test*. Retrieved from http://www.nngroup.com/articles/talking-to-users/

Planning a Usability Test. Retrieved from <a href="http://www.usability.gov/how-to-and-tools/methods/planning-usability-testing.html">http://www.usability.gov/how-to-and-tools/methods/planning-usability-testing.html</a>

System Usability Scale (SUS). Retrieved from <a href="http://www.usability.gov/how-to-and-tools/methods/system-usability-scale.html">http://www.usability.gov/how-to-and-tools/methods/system-usability-scale.html</a>

Web Accessibility Initiative Site Usability Testing Questions. (2003). Retrieved from <a href="http://www.w3.org/WAI/EO/Drafts/UCD/questions.html">http://www.w3.org/WAI/EO/Drafts/UCD/questions.html</a>

# 4. Appendices

# 4.1 Background questionnaire

The background questionnaire will be hosted on Google Forms. Where not otherwise indicated, users will provide answers in text fields. The form will contain the following fields:

- Full Name
- Iob Title
- Age Range (Pull-down menu options: 20-25, 25-30, 30-35, 35-40, 40+)
- Are you involved in the non-profit sector? E.g. volunteering, serving on a board of directors, networking/attending events, formal work, social entrepreneurship (Multiple choice: Yes, no, unsure)
- How many time do you attend community events in a month? (Multiple choice: 0, 1, 2, 3, 4+)
- Are you currently a member of a professional organization or community institution? E.g. Library, professional association, community centre (Multiple choice: Yes, no, unsure)
- If you answered yes to the previous question, what organization(s) are they?
- If you need to have a group meeting, where do you meet? (Multiple choice: Coffee shop, Library, Campus, Home, Other)
- If you want to work somewhere other than home, where do you go? (Multiple choice: Coffee shop, Library, Campus, Other)
- Do you have any experience with co-working spaces? (Multiple choice: Yes, no, Don't know what that is)
- Do you have any experience with Social Innovation? (Multiple Choice: Yes, No, I know of it but no experience, Don't know what it is)
- Are you willing to pay for a space to work in? (Multiple choice: Yes, No)

#### 4.2 Post-session questionnaire

*These questions were adapted from* <a href="http://www.usability.gov/how-to-and-tools/methods/system-usability-scale.html">http://www.usability.gov/how-to-and-tools/methods/system-usability-scale.html</a>.

The post-session questionnaire will be hosted on Google Forms. This questionnaire employs a scale from 1-5, ranging from Strongly Disagree to Strongly Agree to the following statements unless otherwise indicated:

- Full Name (text field)
- I think that I would like to use this website frequently.
- I found the website unnecessarily complex.
- I thought the website was easy to use.

- I think that I would need the support of a technical person to be able to use this website.
- I found the various functions in this website were well integrated.
- I thought there was too much inconsistency in this website.
- I would imagine that most people would learn to use this website very quickly.
- I found the website very cumbersome to use.
- I felt very confident using the website.
- I needed to learn a lot of things before I could get going with this website.

#### 4.3 Product reaction form

The product reaction form will be hosted on Google Forms. All answers for this form are provided in text fields. The form will contain the following fields:

- Full Name
- What are your overall impressions of the website?
- What are the 3 things you like best about the website?
- What are the 3 things you like least about the website?
- Would you return to this website on your own in the future? Why/Why not?
- If you were to describe this site to a colleague in a sentence or two, what would you say?
- If you were the website developer, what would be the first thing you would improve?
- Are there materials you would like to see added to the website?

Users will also be provided with printed Product Reaction Cards to circle their impressions of the site (Figure 2).

The complete set o	f 118 Product Reaction	n Cards		
Accessible	Creative	Fast	Meaningful	Slow
Advanced	Customizable	Flexible	Motivating	Sophisticated
Annoying	Cutting edge	Fragile	Not Secure	Stable
Appealing	Dated	Fresh	Not Valuable	Sterile
Approachable	Desirable	Friendly	Novel	Stimulating
Attractive	Difficult	Frustrating	Old	Straight Forward
Boring	Disconnected	Fun	Optimistic	Stressful
Business-like	Disruptive	Gets in the way	Ordinary	Time-consuming
Busy	Distracting	Hard to Use	Organized	Time-Saving
Calm	Dull	Helpful	Overbearing	Too Technical
Clean	Easy to use	High quality	Overwhelming	Trustworthy
Clear	Effective	Impersonal	Patronizing	Unapproachable
Collaborative	Efficient	Impressive	Personal	Unattractive
Comfortable	Effortless	Incomprehensible	Poor quality	Uncontrollable
Compatible	Empowering	Inconsistent	Powerful	Unconventional
Compelling	Energetic	Ineffective	Predictable	Understandable
Complex	Engaging	Innovative	Professional	Undesirable
Comprehensive	Entertaining	Inspiring	Relevant	Unpredictable
Confident	Enthusiastic	Integrated	Reliable	Unrefined
Confusing	Essential	Intimidating	Responsive	Usable
Connected	Exceptional	Intuitive	Rigid	Useful
Consistent	Exciting	Inviting	Satisfying	Valuable
Controllable	Expected	Irrelevant	Secure	
Convenient	Familiar	Low Maintenance	Simplistic	

Figure 2: Product Reaction Forms (Hawley, 2010)

#### 4.4 Moderator's script

This script is	adapted from <u>htt</u> t	os://www.sensible.com/downloads/test-script.pdf.
"Hi, session toda	My name is y.	, and I'm going to be walking you through this

Before we begin, I have some information for you, and I'm going to read it to make sure that I cover everything.

We're asking people to try using a website that we're working on so we can see whether it works as intended.

I am here to record your reactions and comments of the website you will view. My colleagues are helping me take notes and observe your interaction with the site as well.

The session should take 30 minutes. The first thing I want to make clear right away is that we're testing the site, not you. You can't do anything wrong here. In fact, this is probably the one place today where you don't have to worry about making mistakes.

As you use the site, I'm going to ask you as much as possible to try to think out loud: to say what you're looking at, what you're trying to do, and what you're thinking. This will be a big help to us. Also, please don't worry that you're going to hurt our feelings. We're doing this to improve the site, so we need to hear your honest reactions.

If you have any questions as we go along, just ask them. I may not be able to answer them right away, since we're interested in how people do when they don't have someone sitting next to them to help. But if you still have any questions when we're done I'll try to answer them then. And if you need to take a break at any point, just let me know.

Do you have any questions before we begin?"

Following these introductory comments, the moderator will proceed using the tasks as their script. The moderator will also refer to tasks during the test as "activities" in order to ensure that participants do not feel that they are being tested (McClosky, 2014). The moderator will also use the "echo, boomerang, columbo" techniques to respond to user inquiries and comments throughout the test (Pernice, 2014).

#### **4.5 Test metrics**

Note-takers will be provided with the following metrics to assist in evaluating users.

Metric Title	Description
Successful Task Completion	Test user indicates they found answer or complete task goal
Critical Errors	Task goal is incorrect or incomplete
Non-Critical Errors	Error that do not result in the test user's ability to successfully complete the task
Time on Task	Amount of time it takes to complete the task
Likes, Dislikes & Recommendations	Comments made during the test user of what the tester likes, dislikes and recommends.

# 4.6 Observer form

This form can be found in chapter 5 of Carol Barnum's Usability testing essentials (2011).

Participant name		
Date/time of session		
Scenario/task	Issue/problem	Observer comments