

DATE:	June 3 rd , 2013 to June 6 th , 2013
NAME:	Michael Mancuso
COURSE:	MUX
DIRECTOR:	Megan Hunter
DOCUMENT:	Application UX Plan

OSHIERU

Overview: <https://www.youtube.com/watch?v=dELClIc9obM>

Prototype: <https://github.com/tarkenfire/oshi-ios/tree/master/testApp>

Application Definition Statement

A concise, concrete declaration of the app's main purpose and its intended audience

Purpose or Main Intent

Oshieru is an app that assists in the learning of the Japanese language by students of formal language classes, providing supplemental tools useful to those in formal classes. (Oshieru means "to teach" in Japanese)

Description of Intended Audience

Students of formal Japanese teaching, either in college or through private tutors. It may be of limited use to self-learners, though that is not the focus of the app.

Core Functionality

Allows users quick, offline or online access a set of tools that would help students in formal classes without providing "cheating tools".

Feature Set

- Hiragana Chart
- Hiragana Quizzer
- Grammar Tools
- Conjugation Sifters

Nice-to-Have

- Katakana Support
- Sentence Structure Quizzer
- Basic Kanji Dictionary
- Audio pronunciations for characters



User Research

Screenener Questionnaire

Questions Asked

The questions asked in the survey

MC: Multiple Choice | YN: Yes/No | FI: Fill In | 1T5: 1 to 5 Scale

General Information

1. What is your gender? (MC: Male, Female)
2. What is your nationality? (FI)
3. What is your job title/profession? (FI)
4. On a scale from 1 to 5, how would you rate your proficiency with computers and smartphones? (1T5)

Language Information

1. Do you speak more than one language? (YN)
2. Of any of the languages that you speak, are any of them Chinese or Japanese? (YN)
3. Have you ever had any formal language training in Japanese or Chinese? (YN)
4. Would an application that supplemented a formal training class in Chinese or Japanese be useful to you? (YN)

Phones

1. What kind of cell phone do you have? (MC: Android, iPhone, Feature Phone, Windows Phone, No Phone)

iOS

(will only be shown if question 4 from above is answered "iPhone")

1. How long have you had your iPhone? (FI)
2. On a scale of 1 to 5, how often do you use your iPhone for tasks other than phone calls? (1T5)
3. Are you familiar with finding and using apps on your iPhone? (YN)
4. What type of app do you use most often? (MC: News App, Social Networking App, Productivity App, Games)

Language App

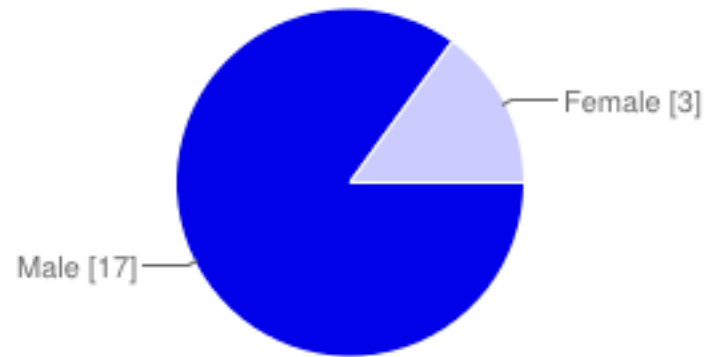
(will only be shown if question 4 from above is answered "yes")

1. Would an application that helped you learn the basic Japanese characters (hiragana and katakana) be useful to you? (YN)
2. Would an application that helped you learn the most common Chinese characters be useful to you? (YN)
3. Would an application that helped you learn basic Japanese grammar and conjugation be useful to you? (YN)
4. Would an application that helped you learn basic Chinese grammar and tone be useful to you? (YN)

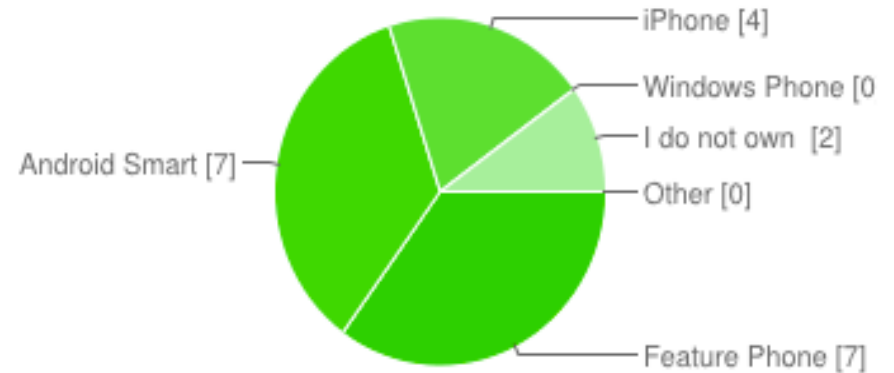
Charts

Graphical representation of the raw data for multiple-choice questions

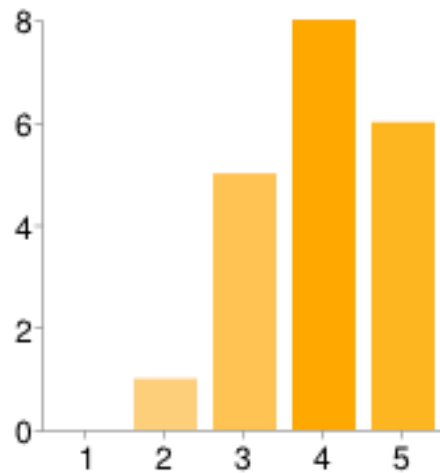
What is your gender?



What kind of cell phone do you have?

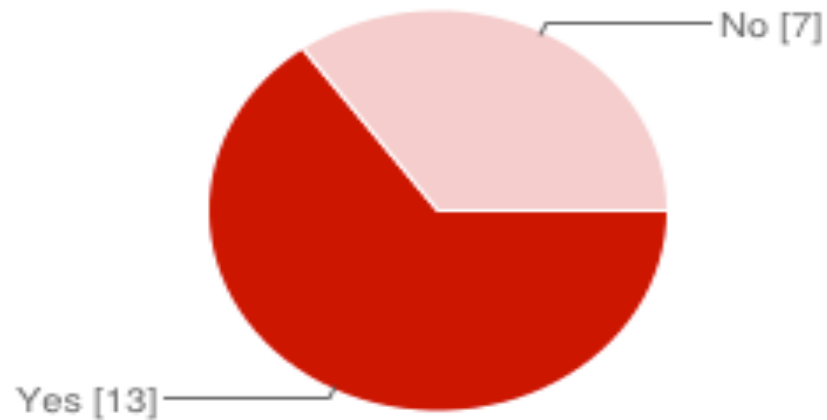


On a scale from 1 to 5, how would you rate your proficiency with computers and smartphones?



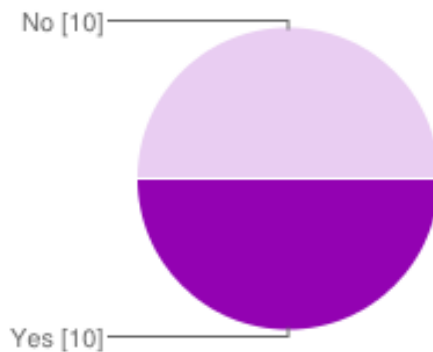
1	0	0%
2	1	5%
3	5	25%
4	8	40%
5	6	30%

Do you speak more than one language?



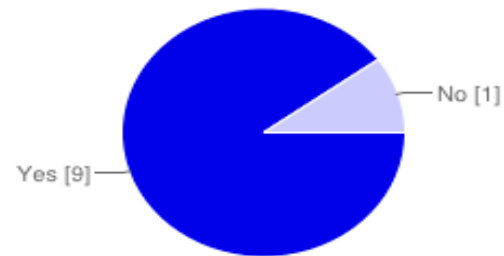
Yes	13	65%
No	7	35%

Would an application that supplemented a formal training class in Chinese or Japanese be useful to you?



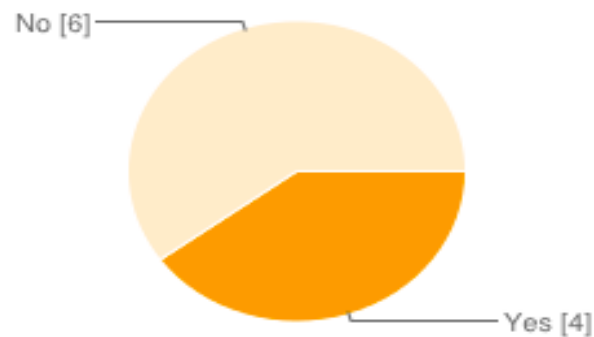
Yes	10	50%
No	10	50%

Would an application that helped you learn the basic Japanese characters (hiragana and katakana) be useful to you?



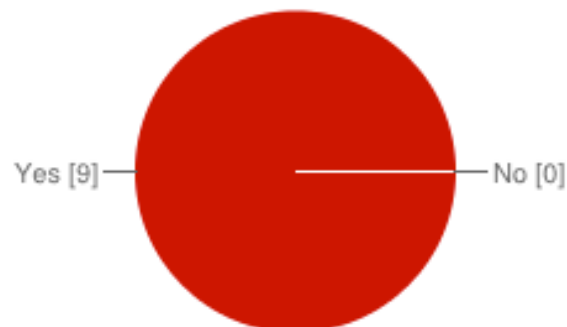
Yes	9	90%
No	1	10%

Would an application that helped you learn the most common Chinese characters be useful to you?



Yes	4	40%
No	6	60%

Would an application that helped you learn basic Japanese grammar and conjugation be useful to you?



Yes	9	100%
No	0	0%

Raw Data

The raw data from the survey, in table form

(1/3)

Timestamp	6/3/2013 16:31:07	6/3/2013 16:33:11	6/3/2013 19:45:16	6/3/2013 19:46:44	6/3/2013 19:46:53	6/3/2013 19:46:57	6/3/2013 19:48:37	6/3/2013 19:55:55
Gender	Male	Female	Male	Male	Male	Male	Male	Male
Nationality	American	French	caucasian		Swedish	Scottish	Irish	Italian
Job	Student Aide	Professor	unemployed	unemployed	unemployed	unemployed	mover	Exterminator
Computer Proficiency	5	1	3	3	5	4	4	2
Timestamp	6/3/2013 16:31:07	6/3/2013 16:33:11	6/3/2013 19:45:16	6/3/2013 19:46:44	6/3/2013 19:46:53	6/3/2013 19:46:57	6/3/2013 19:48:37	6/3/2013 19:55:55
Is Multilingual	Yes	Yes	No	No	Yes	Yes	Yes	No
Knows Chinese or Japanese	Yes	No	No	No	No	No	No	No
Has Formal Japanese/Chinese Training	Yes	No	No	No	No	No	No	No
Would App Be Useful	Yes	No	Yes	Yes	Yes	No	Yes	No
Timestamp	6/3/2013 16:31:07	6/3/2013 16:33:11	6/3/2013 19:45:16	6/3/2013 19:46:44	6/3/2013 19:46:53	6/3/2013 19:46:57	6/3/2013 19:48:37	6/3/2013 19:55:55
Useful: Japanese Characters	Yes		Yes	Yes	Yes		Yes	
Useful: Chinese Characters			No	Yes	No		Yes	
Useful: Japanese Grammar	Yes		Yes	Yes	Yes		Yes	
Useful: Chinese Grammar	Yes		No	Yes	No		Yes	

Non-Core Features	Direct conjugation tool, dictionary, vocab lists		sentence structure, rules, grammar, slang				iskabibilekidle	
Timestamp	6/3/2013 16:31:07	6/3/2013 16:33:11	6/3/2013 19:45:16	6/3/2013 19:46:44	6/3/2013 19:46:53	6/3/2013 19:46:57	6/3/2013 19:48:37	6/3/2013 19:55:55
Cell Phone Type	Android	iPhone	No Phone	Feature Phone	iPhone	Android	Android	Android
iPhone Ownership Time		6 months			3-4 weeks			
Non-Phone Call Use		4			3			
Can find/use apps		Yes			Yes			
Preferred Apps		Social			Social			

(2/3)

Timestamp	6/3/2013 21:58:28	6/3/2013 22:27:25	6/4/2013 0:16:57	6/4/2013 0:34:54	6/4/2013 4:29:12	6/4/2013 6:28:19	6/4/2013 13:20:48	6/4/2013 17:36:24
Gender	Male	Male	Female	Male	Male	Female	Male	Female
Nationality	American	American	American		danish	British	German	American
Job	Student	Student	Substitute Teacher	Wine Maker	early retired	Unemployed	Mate	Translator
Computer Proficiency	4	5	4	5	5	4	4	3
Timestamp	6/3/2013 21:58:28	6/3/2013 22:27:25	6/4/2013 0:16:57	6/4/2013 0:34:54	6/4/2013 4:29:12	6/4/2013 6:28:19	6/4/2013 13:20:48	6/4/2013 17:36:24
Is Multilingual	Yes	Yes	No	Yes	Yes	Yes	No	Yes
Knows Chinese or Japanese	Yes	No	No	No	No	Yes	No	Yes
Has Formal Japanese/Chinese Training	Yes	No	No	No	No	Yes	No	Yes
Would App Be Useful	Yes	Yes	No	No	No	Yes	No	No
Timestamp	6/3/2013 21:58:28	6/3/2013 22:27:25	6/4/2013 0:16:57	6/4/2013 0:34:54	6/4/2013 4:29:12	6/4/2013 6:28:19	6/4/2013 13:20:48	6/4/2013 17:36:24
Useful: Japanese Characters	Yes	Yes				No		

Useful: Chinese Characters	Yes	No				No		
Useful: Japanese Grammar	Yes					Yes		
Useful: Chinese Grammar	Yes	No				No		
Non-Core Features	Detail conjugation charts, and proper stroke order on characters.	Audio clips. Situational variations.				stroke orders for charecters, other meanings, fun lerning games		
Timestamp	6/3/2013 21:58:28	6/3/2013 22:27:25	6/4/2013 0:16:57	6/4/2013 0:34:54	6/4/2013 4:29:12	6/4/2013 6:28:19	6/4/2013 13:20:48	6/4/2013 17:36:24
Cell Phone Type	Android	Android	Feature Phone	Feature Phone	Feature Phone	Android	iPhone	iPhone
iPhone Ownership Time							6 months	2 years
Non-Phone Call Use							4	5
Can find/use apps							Yes	Yes
Preferred Apps							Social	Social

(3/3)

Timestamp	6/4/2013 17:37:40	6/4/2013 20:41:48	6/5/2013 5:02:35	6/5/2013 12:16:55	6/5/2013 13:21:10
Gender	Male	Male	Male	Male	Male
Nationality	Mexican	caucasian	Finland	austrian	Brazilian
Job	Systems Analyst	bakery assistant	University student	student	Student
Computer Proficiency	5	3	4	5	4
Timestamp	6/4/2013 17:37:40	6/4/2013 20:41:48	6/5/2013 5:02:35	6/5/2013 12:16:55	6/5/2013 13:21:10
Is Multilingual	Yes	No	Yes	Yes	Yes
Knows Chinese or Japanese	No	No	No	No	No
Has Formal Japanese/Chinese Training	No	No	No	No	No
Would App Be Useful	Yes	Yes	No	No	Yes

Timestamp	6/4/2013 17:37:40	6/4/2013 20:41:48	6/5/2013 5:02:35	6/5/2013 12:16:55	6/5/2013 13:21:10
Useful: Japanese Characters	Yes	Yes			Yes
Useful: Chinese Characters	No	No			Yes
Useful: Japanese Grammar	Yes	Yes			Yes
Useful: Chinese Grammar	No	No			Yes
Non-Core Features					Some kind simple database with audio of the pronunciation of all words /characters/whatever one wants to call them.
Timestamp	6/4/2013 17:37:40	6/4/2013 20:41:48	6/5/2013 5:02:35	6/5/2013 12:16:55	6/5/2013 13:21:10
Cell Phone Type	iPhone	Feature Phone	Feature Phone	Android	Feature Phone
iPhone Ownership Time	3 years				
Non-Phone Call Use	5				
Can find/use apps	Yes				
Preferred Apps	Productivity				

Survey URL

https://docs.google.com/forms/d/1tXQwYY1K9PwuB1Fr8gAmCq4y6ehEr712MvoMYt_IZz8/viewform

User Personas

And User Scenarios

Sam Roberson



Primary Persona

"I don't want my interests to conflict with my degree."

Sam is a sophomore computer science student who is taking out-of-degree Japanese classes at his college because of an interest in learning a second language. However, he is in an intensive program and struggles to balance his degree programs with the amount of time he must dedicate to language study.

Characteristics

Age: 19
Education: High School
Job Title: Student (Computer Science, A.A.S)
Tech Competence: Very High
Tech Usage: Daily
Platform: iOS, Windows, OSX

Influencers

- A way to practice Japanese characters without using notebooks and a textbook
- Ability to study portably and quickly
- Capability to be used in formal class as a quick reference

Pain Points

- Inconvenience of using bulky traditional textbooks for ALL study
- Balancing study between languages and his core degree classes

Scenarios

Goal:

Study Hiragana and Katakana

Goal:

Study for Grammar Quiz

Method:

Sam spends an hour on making index cards in a flashcard app on his iPhone for self-quizzing purposes. He then uses a note-taking application on an iPad to keep track of his progress. He wishes this process would be condensed so he didn't need to use two general-purpose apps for his specific purpose.

Method:

Sam prepares his notes and spends time reviewing this and his textbook, as well as drilling on workbook questions. He wishes he could do this more rapidly to allow for more study time for his other classes.

Min-Jae Kim



Secondary Persona

"I want to be able to study Japanese without interrupting my busy work schedule."

Min-Jae is a mid-level executive representing a large Korean tech firm. Over the past 20 years, the South Korean government has passed a group of xenophobic laws aimed at curbing both Chinese and Japanese literacy, so despite being an expat with an advanced business degree, Min-Jae only knows one language. Because of the economic prospects in the two countries, he has been learning the two languages. Chinese is fairly close to Korean, but Min-Jae has been having trouble with Japanese and is wary of needing to use cumbersome textbooks for even simple study.

Characteristics

Age: 48
Education: MBA
Job: VP of Marketing
Tech Competence: Average
Tech Usage: Bi-daily
Platform: iOS

Scenarios

Goal:

Study Hiragana and Katakana

Goal:

Study for Grammar Quiz

Influencers

- Ability to study Japanese during lunch break without bulky textbooks
- Ability to study easily on train/bus to and from work
- Ability to learn unfamiliar

Pain Points

- Preference to use of non-digital study aids
- Time needed to use traditional study aids

Method:

Min-Jae spends an hour preparing specific flash cards on index cards for self-quizzing purposes. He then must set up a manual tracking system in a notebook to track his progress with the flash cards. He would prefer not to have to manually track this and would like to not have to carry around a large stack of index cards.

Method:

Min-Jae spends time collating grammar-specific classroom notes and textbook materials into a separate notebook for each specific grammar construct and furthermore must spend time copying questions from a workbook to self-quiz. He would like it if he could do this without having to spend so much time preparing materials.

Competitive App Analysis

Heuristics Evaluation

Heuristic Evaluation Sheet

Comparing the quick and easy evaluation of UI decisions

Heuristics

Name: Hiragana and Katakana – Complete Basics of Japanese
Dev: TheJapanesePage.com
Price: Free (has ads & “premium” unlock)

Name: StickyStudy: Japanese Kana (Hiragana and Katakana Study)
Dev: StickyStudy
Price: \$1.99

Visibility of app status Does the app keep users informed about what is going on, through appropriate feedback?	Feedback is in form of obtrusive modal dialogs. During quizzes, there is audio feedback as to correct or incorrect answers.	Feedback is not obvious at first blush. It uses subtle color changes to give feedback on quiz results.
Match between app and the real world Does the app sense the user’s environment and adapt the information display accordingly?	Not relevant to this app.	Not relevant to this app.
User control and freedom Users often choose app functions by mistake and will need a clearly marked “emergency exit.” Does the app contain safe exploration features? (back, cancel, undo)	No “back” button as there are no nav controllers. All models do not use a “close” button, opting for a poorly placed “Main Menu” button. There are “back” buttons on SOME model windows.	Uses a standard iOS tab view controller for navigation as well as standard iOS nav controllers.

Error prevention Does the app eliminate error-prone conditions and present users with a confirmation option?	No true opportunity to cause user-errors seems to exist. No errors occurred during normal use.	No errors were encountered. If there was an error, it was handled silently.
Consistency and Standards Users should not have to wonder whether different words, situations, or actions mean the same thing.	Does not follow any traditional Apple-made standards, and uses non-standard words for common navigation buttons.	Consistent for the most part, using only some non-standard buttons ("X" instead of back on SOME nav controller windows)
Recognition rather than recall Minimize the user's memory load by making objects, actions, and options visible.	App does not seem to remember any information whatsoever.	Memorizes completed quiz results, options, filter options on lists.
Flexibility and efficiency of use Reduce the number of steps required by anticipating user needs and enabling customization.	Interface is convoluted and wastes large amounts of space. "Help menu" is hidden and hard to find. User must experiment and guess to find gestures and methods of use.	Use of mostly-standard iOS constructs makes use fairly straightforward.
Aesthetic and minimalist design Screens should not contain information which is irrelevant or rarely needed	Approximately 50-60% of "home page" is unused whitespace. Elements overlap each other and are overly gaudy.	All space is used wisely.

<p>Help users recognize, diagnose, and recover from errors</p> <p>Error messages should be expressed in plain language precisely indicating the problem and solution</p>	<p>No errors were encountered.</p>	<p>No errors were encountered aside from an error in the App Store app, which was handled by the App Store app.</p>
<p>Help and documentation</p> <p>Help should be focused on the user's task, list concrete steps to be carried out, and not be too long</p>	<p>Help documentation takes form of single modal dialog that is incorrectly formatted so one side is cut off. Help does show screenshots and explanations.</p>	<p>Help is "hidden" in the settings menu and is only provided for "advanced subjects". Basic use is simple enough to not need detailed help screens however.</p>
<p>Linguistic Accuracy</p> <p>Whether or not the actual grammar and syntax of the Japanese being taught is correct.</p>	<p>The grammar and syntax is correct.</p>	<p>The grammar and syntax is correct.</p>
<p>Customization and Settings</p> <p>Level of control the application gives to the user in settings.</p>	<p>The only "setting" is to buy the "ad free version", which seems to do nothing more than remove ads.</p>	<p>Settings allow a moderate amount of customization.</p>

(end of week one)

Usability Testing Plan

And Discussion Guide

Usability Testing Plan

Purpose & Objective

To evaluate the app's intended flow and interactions, with an emphasis on the primary and secondary goals. The objective is to uncover any UX issues that might be present, and use these to direct the iteration process.

Roles

I alone will proxy the roles and responsibilities of the interviewer, note taker, and observer. Legal complexities involved with some of the testing locations and local laws/ordinances make filming prohibitively taxing, therefore there will be no cameraman. There will be one role defined as participant.

Method

A focus on guerrilla testing will be used in this second set of testing. Outdoor (guerrilla) tests will reveal user interactions with variance resulting from environmental factors such as glare, noise, and movement.

Metrics

- Completion Rates
- Time on Task
- Satisfaction Rating
- Usefulness

Equipment

- iPad (testing device)
- Secondary tablet (note-taking)
- Smart Phone (stopwatch app)

Locations

- Times Square
- Penn Station (metro station)
- Garment District (W 34th Street X W 42nd Street X 7th Avenue X 9th

User Profiles



Sam Roberson



Min-Jae Kim

Participant Count

10
to
15

As participants will be pseudo-random, assuring complete even gender distribution will not be possible. However, an attempt will be made to come close to an even gender split.

Discussion Guide

The step-by-step dialog of conducting usability tests

1	Introduction	"[Good Morning/Good Afternoon/Good Evening], my name is Michael Mancuso and I'm a student at Full Sail University. I am currently enrolled in a Mobile User Experience Class and am wondering if I could have a few moments of your time in order to help with the project I am currently assigned. I need to test whether or not my app is both easy and enjoyable to use when it is used for accomplishing basic tasks. May I ask for your assistance in this?"
2	Explain the Test Goals	"I need your help to determine if my app makes it easy for people to perform a couple basic tasks, like finding a particular movie time or sport's score."
3	Complete the Questionnaire	<p>[SEE USER QUESTIONNAIRE]</p> <p>[ACTION: Ask participants to answer the screener questions to qualify them as users that most closely represent your intended audience. The app's intended audience is represented in the user personas]</p>
4	Introduce the Test Scenario	"First, I'll ask you to complete a series of three sequential tasks using my app. Along the way I encourage you to THINK OUT-LOUD. This will help me to better understand what aspects of my app seem to be obvious or confusing and unclear. After you complete the last task, you will be prompted to answer a short multiple-choice survey about some aspects of the application. Whenever you are ready, you may begin."

5 Define the Tasks

VERB BASED TASKS

(Second Task) Find the correct causative form conjugation of the Japanese verb "oshieru" using the app.

(Third Task) Complete a 5-question quiz on hiragana characters.

REMOVE AFTER HANDING IN

(For Professor, for sake of seeing quiz feedback changes on both correct and incorrect answers): き - ki、ふ - fu、こ - ko、う - u、ろ - ro

SCAVENGER HUNT TASKS

(First Task) Find the definition of two randomly selected hiragana characters. (pool – a, e, i, o, u, ka, ke, ki, ko, ku)

6 Complete Follow-Up Survey
(completed by the user)

QUESTION	ANSWERS
What is your overall impression of the app?	awesome - good - fair - poor
Was the brand distinguishable from other app's like it?	yes - kinda - no - unsure
How difficult was completing the basic tasks?	easy - fair - difficult
Did all of the "screens" you saw in the app feel consistent?	yes - maybe - no
Was the information given in the app relevant in your opinion?	yes - maybe - no

		Did the use of many colors in the app help or hinder you?	yes - kinda - no – unsure
7	Thank your Participants	“Thank you very much for your time. You’ve helped me to improve the usability and quality of my app.”	
8	Report your Findings (week reflection video)	[SEE WEEK REFLECTION VIDEO]	