

## Appendix J: Heuristic evaluation

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### Nielson Checklist

Reviewer: Sadat

Category	Priority*	Problem
Simple and natural dialog	3	Map link only takes you to top level from wherever you click. It also is small and not that visible.
	2	The map that is displayed uses a small font and makes finding a location difficult.
Speak the users' language	3	The term "things" is ambiguous. The classification schema or grouping is non-intuitive.
Minimize user memory load	2	The maps section requires that the user hold information in their memory.
Consistency	2	Some labs and places have graphics or pictures, others do not.
	2	The Groundworks page has a different format with more information than all of the other labs. It is also listed twice in the hierarchy.
Feedback	2	It does not tell the user that they clicked on a spot that is not a link.
Clearly marked exits	2	The main page link is not underlined and is just text, so it is not obvious it is a link
Good error messages	2	No feedback when user clicks outside of link.
Shortcuts	NA	
Prevent errors	2	Better system calibration is necessary. Make the link area bigger.
Help and Documentation	2	FAQ is not easily accessible.

\*(1) no problem, (2) minor problem, (3) major problem, (NA) non-applicable

## Appendix J: Heuristic evaluation

### Olson Checklist

Reviewer: Tom

Category	Priority*	Problem
Consistency	2	<i>Maps</i> does not really fit into the P,P,T hierarchy, although it is treated as a <i>Thing</i> . Groundworks is accessible from both <i>Places</i> as well as the second-level heading <i>Labs and Studios</i> .
	2	There is no back button, which is common to most web applications. The Media Union graphic serves as a home button, but this is not immediately apparent.
Correspondence	3	<i>People</i> and <i>Places</i> makes sense, but the labeling breaks down with “Things”. Building Hours, Events, and FAQs are informational objects, not physical things.
	3	Task order: <i>Places</i> displays room numbers, but user must remember number and go to separate screen to find room on map. <i>People</i> displays phone number, but phone is located on opposite side of kiosk.
Error Recovery	NA	There are no error messages.
Help and Docs	NA	There is no help or documentation.
Menu/Command Structure	1	The hierarchy is shallow and broad, an appropriate design for this type of device.
System Response Time	3	The responsiveness of the touch screen is quite poor. Many menu items, especially the smaller ones such as <i>maps</i> require multiple touches. This is due to the poor calibration of the screens and lack of visual bounding boxes for the icons.
	3	There is also no visual feedback that an icon has been touched.
Training	NA	No training is necessary.
Visual Display	3	Similarity: All links are underlined, keeping with Web standards. Menu headings are black and second and third level links are orange. This breaks down slightly with the <i>map</i> link, which is halfway between first and second level by nature of its color and location.
	3	The lack of bounding boxes and around menu links exacerbates the cursor calibration problem. This forces users to make multiple clicks on menu items.
	3	The maps are not very readable on the screen. The printed versions are more readable, but they are not oriented correctly and lack a “you are here” indicator.

\*(1) no problem, (2) minor problem, (3) major problem, (NA) non-applicable

## Appendix J: Heuristic evaluation

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### Olson Checklist

Reviewer: Theresa

Category	Priority*	Problem
Consistency	3	The maps link is smaller and in a different font.
	3	Information is not consistently ordered.
	3	Navigation back to the home screen is difficult.
	2	The maps link is not available from the top level.
Correspondence	3	Users are not able to translate their queries into the overbroad, unclear categories of Persons, Places and Things. There also is no information scent from the home page to where the FAQs are actually listed at the bottom of the page in Things. Information scent is, moreover, lacking throughout.
	2	It would seem that one major query would be wayfinding. There is no link to the maps from the top level.
Error Recovery	NA	
Help and Documentation	3	No help is available in the system.
Menu/Command Structure	NA	
System Response Time	3	The system is very slow causing users to double touch. No feedback that system has registered the touch.
Training	NA	
Visual Display	3	The maps are very difficult to read. The letters are non intuitive (e.g. T for Restroom).
	2	Title bar uses similar shades of blue for two different categories making differentiation difficult.

\*(1) no problem, (2) minor problem, (3) major problem, (NA) non-applicable

## Appendix K: Cognitive Walkthrough

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### QUESTIONS

What do users' have to know in order to use this system? Are there any mismatches between the users' conceptualization of the task and how the kiosk allows them to perform the task? What are difficult tasks to accomplish and what steps are difficult or not intuitive? Does the order of the screens make sense? Will the user be able to make associations between the correct actions and their desired result?

### METHODS

We performed a cognitive walkthrough of two tasks using the Media Union Information Kiosks. One of the tasks was finding the building hours. The other task was to locate a room. At each step in these tasks, we asked 4 questions:

1. Will the user try to achieve the correct effect?
2. Will the user notice that the correct action is available?
3. Will the user associate the correct action with the effect to be achieved?
4. If the correct action is performed, will the user see that progress is being made toward solution of the task?

### RESULTS

For the most part, the user is not likely having problems trying to achieve the correct effect. There is only 1 type of task that is available at the information kiosks—finding information. There is also only one way to find information—to navigate through the screens by touching the screen. The user will almost always be trying to navigate through the screens, so the user will be trying to achieve the correct effect.

The user will also almost always realize that this action is available. However, in other situations or performing other tasks, this might action might not be as obvious. For instance, if the user wanted to get back up to the top level, they need to click on the picture of the Media Union—it is a link. However, it does not look like the other links, so the user might not notice this action is available.

The major problems that user will have is in associating the link they need to click on, with the information that is contained in that link. For instance, the association between “things” and “building hours” is unlikely. If the user is looking for the “Usability Lab”, they need to look under the “Technology Assessment Lab”. This association is not too difficult, however, it does require some thought.

Another major problem that occurs when looking for a location is when the user clicks on the “maps” link. If they click on this link from a place, they are likely to think that they will reach a map that contains that place. However, they are brought to a page that makes the user choose which floor they want to view. The user is not likely to think of this as progress. They also might have forgotten which floor the place was even on.