
Software Quality Assurance: SOFT3302

Tutorial – Week 13

Objectives

To carry out a usability review of several web sites in order to develop an appreciation of some of the key points in usability.

Pework

Start preparing your revision materials for the examination. This is your final tutorial so you need to ask your questions this week. Tutors will not be available to answer your questions (*via* email or otherwise) once lectures finish this week.

If, for some reason, you have not submitted Assignment 3, please note it is now overdue.

Labwork

You will be examining the following web sites:

- www.whitepages.com.au
- www.qantas.com.au
- www.webpagethatsuck.com

Usability Heuristics: violating the following precepts causes 95% of usability problems:

- *Seeing/pointing* versus *remembering/typing*: the function of an interface element should be visible *before* one chooses to use it, not only visible when one moves one's mouse over to it so that a menu fades in (look's nice but a UI no-no)
- *Consistency*: doing the same thing the same way each time
- *Timely/accurate feedback*: feedback should be relevant and responsive
- *Salient repertoire of actions*: the actions/choices available at a point in time should be relevant; 'extra' information just clutters up an interface and reduces the relative visibility of the meaningful actions
- *Forgiveness*: actions should be reversible where possible (undo); the user shouldn't be forced to complete a sequence of actions, *e.g.* a collection of dialogues, because of a simple mistake, especially if the user initiated the sequence because the interface was unclear in the first place
- *Familiar user conceptual model*: the interface metaphor should be something the user can understand; basing an interface on a desktop/filing cabinet metaphor is useful, while basing in on a metaphor which requires an understanding of quantum mechanics probably limits its audience somewhat ('Yes, just putting that information "wave packet" near that "potential barrier" will mean that it will eventually "tunnel" from out active "well" into the storage "well" if we wait long enough and assume that the wave function of the information is a decreasing exponential of the form $\Psi_H = Be^{-\alpha x}$... yeah, right')
- *Feedback*: input should be acknowledge so the user know they have initiated an action otherwise the user may repeatedly click or enter the same thing over and over again
- *Prevention of errors*: it's better to not put the user into a situation where an error can occur than to allow the user to correct an error he shouldn't have made in the first place; ideally an interface should only allow legal/semantically correct actions

- *Easily discriminated action alternatives*: the difference between choices should be clear both in what happens and how it is to be made to happen
- *Modeless interaction*: the user should be free to choose what to do next not forced into a sequence of actions and/or be told what to do by the application; the application is there for the convenience of the user not *vice versa*

We covered these in last week's lecture. You would do well to review those slides as part of this tutorial.

You should:

1. Review each of the web sites listed above against the usability heuristics

Students should be encouraged to take the time to do this exercise as it will be instructive. Even with well-designed sites students may not have thought about *why* the sites worked well before.

Note that 'ugliness' is only one aspect of usability. An ugly site can be usable but jarring or unpleasant to work with while a site full of eye-candy may look nice but be completely unusable. (Suggest they try finding download and/or information on *older versions* of IBM's Java virtual machine from www.ibm.com.)

2. Identify two websites using www.webpagesthatsuck.com that violate all of many of the usability heuristics.

Have a look at the sections on page sizes and fixed-size flash-based pages.