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MLIS Independent Study Proposal – LIS 600

1.   Abstract / General Description

        The TiddlyWiki Thesaurus (TWT) is a web application which can be used to create a thesaurus of subject terms for indexing or searching a collection of items. The TWT was originally created by me in autumn 2007, and was used in a course project for *LIS 537: Construction of Indexing Languages*. It was built as an aid to the thesaurus construction process, and an alternative to manual methods such as using index cards or spreadsheets to collect and organize terms. Trent Hill felt that in its current form, it showed promise for use as a distance learning tool in the online version of LIS537. The TWT was a central focus of study in my *TC 518: User-Centered Design* course in spring 2008, and my group applied many usability techniques to determine the strengths and weakness of the application, and create a proposal for redesign and improvements. The existing TWT, with a few minor improvements, was also used by a group of students in LIS 537 during spring quarter. This independent study will focus on implementation of a redesign of the TWT, leveraging the information collected in the recent usability study and proposal, and guidance from the major stakeholder (Trent Hill).

2.   Learning Objectives

   •   Review of available software-based thesaurus construction tools and an analysis of their lack of suitability for the LIS 537 course
   •   Exploration of scholarly literature for references to TiddlyWiki technology used in other projects; exploration of TiddlyWiki modifications and other technologies available on the web that could be leveraged in the TWT
   •   Construction of a redesigned TWT and supporting documentation which could be used as an educational tool in future LIS 537 courses
   •   User testing of the new TWT to ascertain its effectiveness as a teaching tool

3.   Textbooks and/or Resources Required

   •   Aitchison, Jean, Alan Gilchrist, and David Bawden. Thesaurus Construction and Use A Practical Manual. Chicago: Fitzroy Dearborn Publishers, 2000.
   •   National Information Standards Organization (U.S.). Guidelines for the Construction, Format, and Management of Monolingual Controlled Vocabularies. Bethesda, Md: National Information Standards Organization, 2005.
   •   Existing literature referring to TiddlyWiki, information visualization techniques, or related technology

4.   Activities

- Survey the literature and the results of previous usability testing to determine an effective strategy and design for the new version of the TWT.
- Build a new version of the TWT that will exhibit the desired design.
- Write supporting documentation for the TWT. This includes documentation for the instructor, as well as documentation for the student users in LIS 537.
- Test the redesigned TWT to determine its effectiveness.
- Document additional features or enhancements that could be added to the TWT in the future, and indicate their benefits.
- Write a reflection essay reviewing the process followed, lessons learned, etc.

5.   Expected Outcomes / Project Deliverables

- Project plan document that includes an analysis of existing tools, a review of the usability test results and recommendations, a list of features/fixes to be implemented, and a schedule for implementation of these features.
- Source code and new working version of the TWT.
- Supporting documentation for the TWT.
- A reflection essay.

6.   Evaluation / Assessment Method

- Delivery of a project plan document
- Demonstration and delivery of the working redesigned TiddlyWiki Thesaurus which supports:
    - a minimal learning curve (student users should focus on thesaurus construction and not on learning how to use the TWT)
    - simultaneous modifications of content from multiple users
    - construction of a structurally valid thesaurus useful for a target domain
    - fostering an appreciation and understanding of the process of thesaurus construction
- Creation of relevant documentation for the TWT
- Explanation of lessons learned and intellectual challenges met during this project