Homework Assignment #2: Design and Implementation of a Web-Based Database

Important Dates

2:10PM October 4 (Friday), 2013 design document 2:10PM October 9 (Wednesday), 2013 demo

Task Description

This assignment is intended to be a warm-up sprint (in the terminology of Agile Software Development) of the term project, the goal of which is to develop a Web application for facilitating the interactions between a university, or a department within a university, and her alumni and also interactions among the alumni. Your task in this sprint is to design and implement a Web-based relational database whose refined and expanded version will become a component of the planned Web application. The database supports storage and organization of discussions on various issues/topics that have been raised by the university/department or some alumnus.

What should be in the database is up to you, but we expect it to store at least the following information.

- All issues/topics that have been raised so far
- Discussions/comments addressing each issue
- Who made a comment and when

To demo what the database contains and that it is truly Web-enabled, you will need to write some webpages that allow the user (with a browser) to view or update the database (by adding comments). Expectedly, the client-side code should be able to accept an addition of comments and, after the database has been updated, display the most recent comments addressing the same issue.

General Instructions

- This assignment is to be completed by each student individually (though the term project will be carried out by teams of around six members).
- You must use the Git version control system, set up for this course, to manage your development work.
- Your webpages must be accessible at the sdm.im.ntu.edu.tw server, the same server that hosts the Git system.

- The database must reside on the sdm2.im.ntu.edu.tw server, to which you have access with the same account for the Git server.
- Drop a printed copy of your design document by the due time in Yih-Kuen Tsay's mail box on the first floor of Management Building 2. Late submission will be penalized by 20% for each working day overdue.
- The demo may not be postponed.
- Both the design document and the demo will be taken into account for the grading.
- DO NOT plagiarize (i.e., do not use material without crediting the source).

Design Document

The design document should include at least the following items:

- An overview of the database with adequate diagrams and explanations
- Rationale of the design
- Illustrative queries or updates (here you should anticipate possible functions in the Web application)

The design document, including the cover and references, is limited to 6 pages. So, please use the space wisely.

Demo

All demos will be scheduled during the breaks of the class meeting or after the class meeting on October 9. For the demo, you just need to show that comments may be added and subsequently the current comments shown on the browser are refreshed for one particular issue.