Forum MATRIX
(Software review)

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Product details:
<table>
<thead>
<tr>
<th>Product Name:</th>
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Snapshot review:

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Main features and strong points

- Matrix provides a workspace for groups of people to post and retrieve documents, to edit and annotate documents, and to exchange messages. Several users can collaborate by editing the same document.
- Facilities are provided to add links to external html documents, links to documents deposited in the system, and textual pop-ups. To link to a document deposited in the system, one does not need to enter a full URL, but rather user is prompted to make a choice among the applicable documents.
- Matrix implements a security architecture, which includes compulsory authentication. Users can set permissions on document they create; giving the appropriate write-permissions opens way to collaborative editing.
- The system attempts to reproduce the familiar Windows interface, so one can start using it very fast.
- Documents are edited and created in WYSIWYG editors, which, again, cut down the learning curve.
- Potentially, the Matrix can be much more intuitive to use than present-day bulletin board systems, and could open bulletin boards as an educational medium to a much wider category of users.

Criticism and suggestions

Windows look and feel

The system attempts to reproduce the look and feel of the familiar Windows explorer interface. Yet, the approach seems to have 2 major flaws (as implemented):

- Network delays make the interface to behave very differently from the Windows interface. User, without receiving a prompt feedback, tends to repeat the user interface action attempted, or to attempt other actions, with unpredictable results.
The system does not interact very well with browser controls. In particular, an attempt to reload the current page (likely to attempted by a user, waiting for a feedback from the system) logs one out of the system completely.

To remedy the problems stated above, I suggest that:

More work should be done client-side, while the central repository can be updated at a relatively slow pace, in the background.

Browser controls, which realize a different interface paradigm, should not be available. For example, the application could run in its own window, rather than inside the browser window.

Client-side editors

Users are expected to be aware of the editor to be used in a particular discussion. Moreover, Word 2000 users can not participate in discussions set for Word 97. Presumably, a user upgrading to Windows XP would automatically lose the ability to use the system.

I believe that this is a very significant drawback, as in distance education there can be very little guarantee as to what software is installed client-side.

A way out would be to transform all documents to standard HTML server-side (for Word, some free converters are available), and to promote the use of the built-in Matrix editor.

Email

The system uses the regular Email to send messages between users. That implies that users are to reveal their Email addresses, something which many users will be reluctant to do. Moreover, when a user is sending a message, she is not warned that she is about to reveal her Email address. Thus, if problems arise, system maintainers can be vulnerable to litigation.

This problem can be solved by introducing an internal Email system (as in products such as WebCT), or, at the very least, a redirection service, so that Email addresses do not need to be revealed.

Low bandwidth connections

The system is not usable over an average modem connection.

Client-side cashing, as suggested under Windows look and feel, would go some way to remedy this problem.

Installation

The software has to be installed on the client system. That means that in environments where users are not allowed to perform installations, support costs will have to be incurred. On the other hand, some users may be unable to perform installation properly, or may be reluctant to perform installation (out of security or other considerations).

I suggest that some (reduced) functionality could be provided to users who choose not to install.

Conclusion

Viewed as a prototype, Forum MATRIX demonstrates an approach that has a lot of potential. Still, many improvements are possible that will make the system even better ready for “real world” use.