

Exploring Daily Browsing Activities

Heather Sayers, Liam McDaid, Maurice Mulvenna, Mary Shapcott, Malcolm Hutchison
Faculty of Engineering, University of Ulster, Northern Ireland
{ hm.sayers, lj.mcdaid, md.mulvenna, cm.shapcott, mj.hutchison } @ulster.ac.uk

Summary

The paper 'Exploring Activities of Daily Browsing' put forward the view that activities of daily browsing by ageing users can be captured and analysed. This data can then provide information about behaviour and changes in behaviour. In monitoring these changes, feedback may be provided to change the user interface in such a way that it supports the user in completing a task, for example. The paper explored this concept further through the use of intelligent techniques, such as neural networks, to classify behavioural changes in users. Another application is to seek to use the data to detect changes over time that, for ageing people in particular, may indicate the onset of a cognitive or physical impairment. This approach would provide objective measurements of activity and changes in activity, which are difficult to capture normally.

The paper sets out the key first steps to be taken to determine activities of daily browsing for healthy ageing people and the issues associated with them through extensive usability studies, and to subsequently make this information available to interface applications. The paper presents the related work in this area, encompassing specialized adaptive interfaces, initiatives that include ageing people, and context-aware computing.

As the work-force which uses computers on a daily basis begins to retire, 'silver surfers' will become likely to rely on them increasingly for their daily living. Ameliorating the effects of declining physical and mental abilities will be an important priority for the designers of computer systems.

The paper has proposed a technique for logging the interactions of users, which should be able to yield valuable information on behaviour. Obviously, much work, including observational work on real subjects, needs to be done, and issues of ethics, privacy and consent must also be addressed.