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Theoretical background

The idea of a personal learning environment (PLE) corresponds closely to the concept of a learning ecology and can help in the design of institutional learning environments that render the learning experience more flexible and permeable. PLEs represent an easier way for students in order to construct a personal environment in the network, organizing the set of resources, applications and services that they use to learn in function of their interests and preferences, also including the persons in their network who act as points of reference for their learning (Adell & Castañeda, 2010; Anderson, 2006; Attwell, 2007; Coll, Bustos & Engel, 2008; Downes, 2007; van Harmelen, 2008).

Aim of the study

In this paper we present a pilot study which is part of a larger project that introduces PLEs in a Master's degree in order to improve students' lifelong and lifewide learning competencies in the information society.

The aim of this study is to assess students' perceptions of the use of Elgg, an open source social networking engine, in creating their own personal learning environments.

More specifically, the objective is to evaluate whether the set of resources and applications offered by Elgg allows students to make explicit their learning ecologies in order to establish synergies between the different contexts for learning and work, both formal and informal.

Methodology

Subjects and setting

The study was conducted during the first semester of the 2011-2012 academic year inside the framework of an Educational Psychology postgraduate course at the University of Barcelona, and involved 16 students (13 women and 3 men) and three teachers (1 woman and 2 men).

Data collection

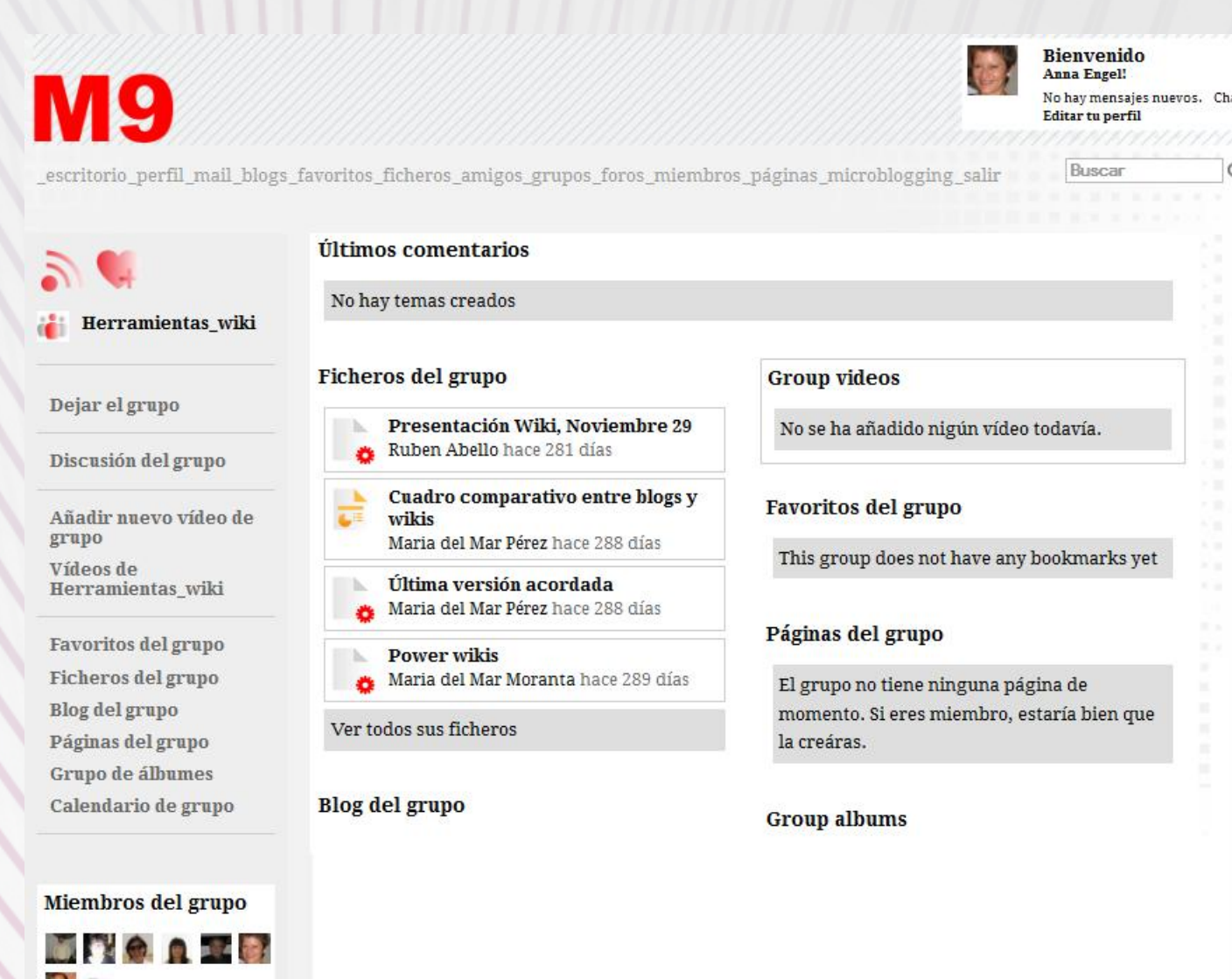
Data on individual users' perceptions were collected by responses to items on a survey about the use of PLE. The survey contained 20 questions, some in multiple choice format and others in short answer format, and was organized into four sections: (i) the most commonly used resources; (ii) the usability of the resources, and (iii) the improvement in the students' ability to establish significant relationships between learning experiences in different contexts.

Data Analysis

For the analysis of the data collected we use descriptive statistics.

Results

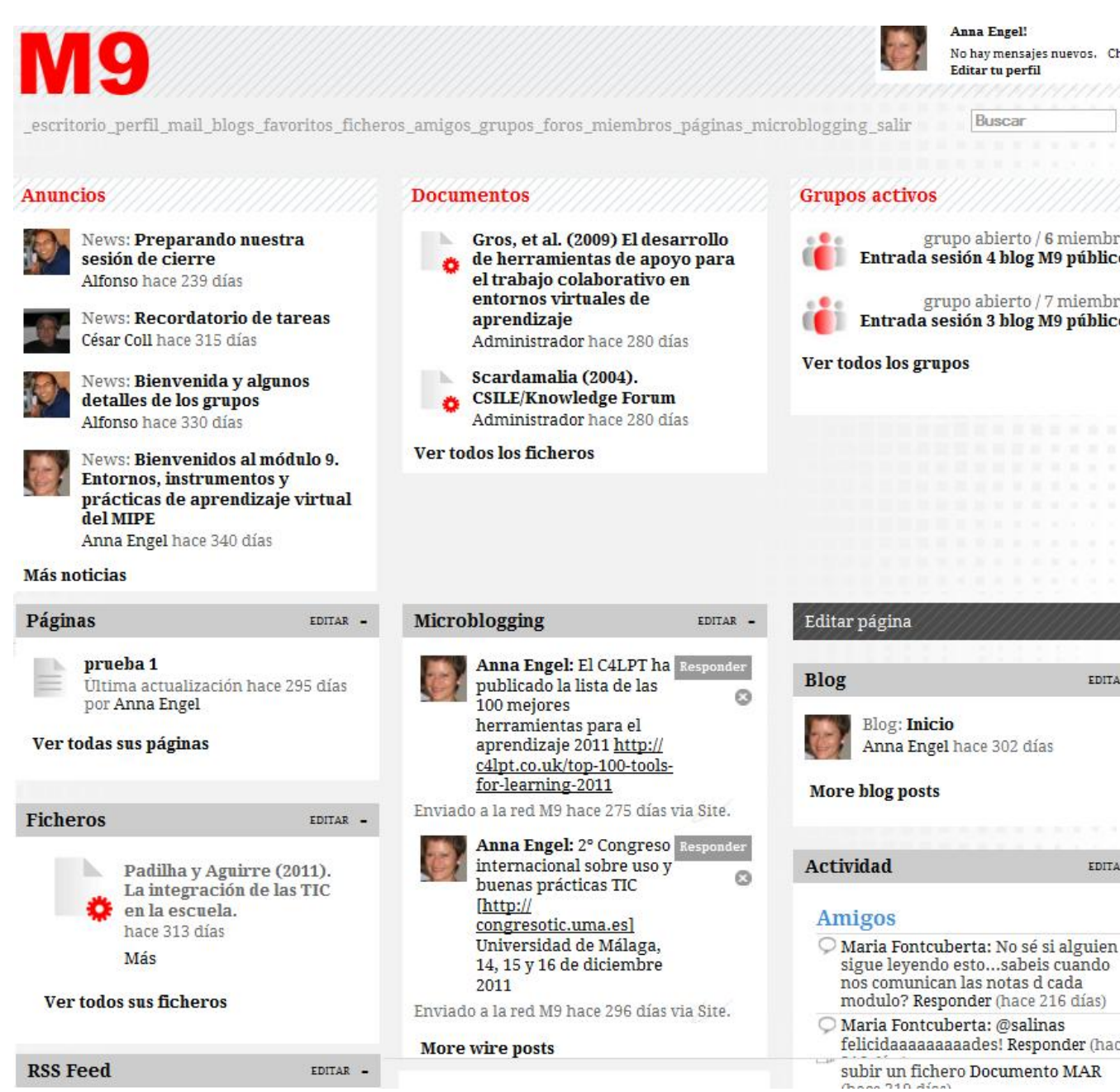
Groups



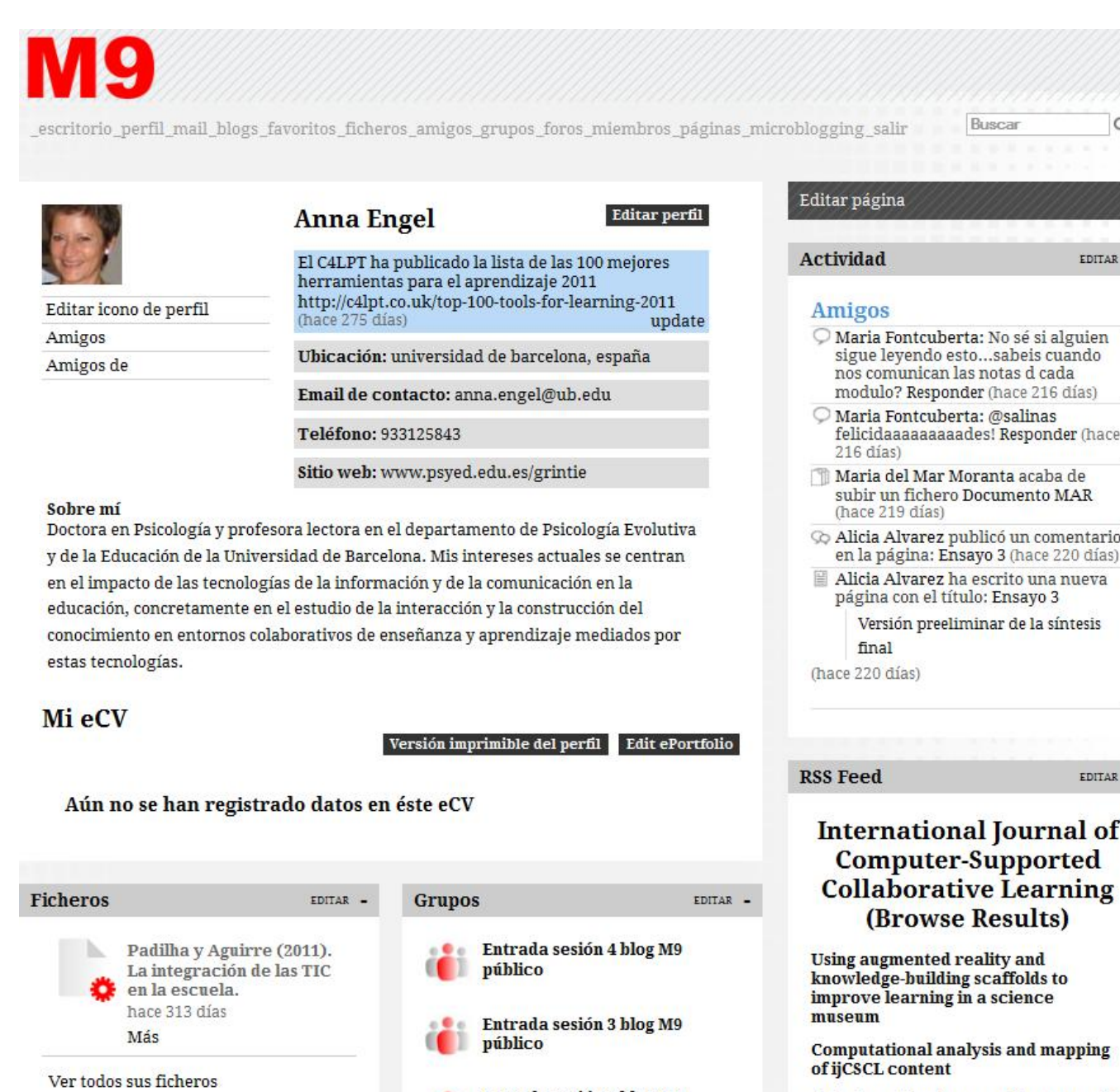
Public view



Desktop



Profile



The vast majority of students (78.6%) reported that the file management tool was one of the five most useful tools to learn, followed by discussion forums (57.1%) and the collaborative editor (50.0%).

Positive evaluation of the degree of control that Elgg allows users (50% rated it as good or very good, 36% as fair and only 14% as poor or very poor). Negative evaluation of the possibilities for organizing information offered by Elgg (78% rated it as poor or very poor).

A high rate of student satisfaction in terms of improving their ability to learn to learn: mean score of 3.07 on a 5-point Likert scale.

A high rate of student satisfaction in terms of improving their own learning processes and strategies: mean score of 3 on a 5-point Likert scale.

Conclusions

The results of the pilot study showed that, from a technological perspective, the most functional feature in Elgg is its ability to integrate a wide range of tools or plugins in the same environment.

However, the specific analysis of students' perceptions of each of these tools shows that the benefits they offer are quite limited when compared with the tools commonly used by students in other platforms offering social networking capabilities (e.g. GoogleApps).

From a psychoeducational perspective, our results show a high rate of student satisfaction with regard to the improvement in their ability to use digital resources to share, learn, work and socialize with others, as well as to establish significant relationships between the different educational and professional contexts in which they learn and work.

However, the results regarding the limited usefulness of the resources available also make it clear that teachers must provide support for students in the process of personalizing their learning environment and in developing the fundamental skills that will enable them to manage their own learning ecologies.

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