

# Social Networks and Their Potential for Education

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**Abstract.** The purpose of this article is to explore whether there is a potential in using social networks among first-year undergraduates at the Faculty of Informatics and Management of the University of Hradec Kralove, Czech Republic. The authors want to discover which social networks are the most popular among these students so that the most frequently used could be implemented into teaching and learning processes.

**Keywords:** Cognitive aspects · Education · E-learning · Network

## 1 Introduction

At present information and communication technologies (ICT) are inseparable part of everyday activities. Hardly anyone could imagine this 20 years ago. And the same is now becoming true for the use of social networks. Originally, social networks were created for the purpose of entertainment, but gradually became used in all spheres of human activities, including education thanks to their abilities to assist in creating, collaborating and sharing content (cf. [1]; [2]). Boyd & Ellison add that social network sites (SNSs) are increasingly attracting the attention of academic and industry researchers who are intrigued by their affordance and reach [3]. They define SNSs as web-based services that allow individuals to construct a public or semi-public profile within a bounded system; articulate a list of other users with whom they share a connection; and view and traverse their list of connections and those by other within the system. They also put the main emphasis on their social aspect since these social network sites enable users to articulate and make visible their social networks.

SNSs are now on their rise, particularly in the institutions of higher education because most of their users, the so-called digital natives, study at these institutions. Generally, there is a trend worldwide to adopt this opportunity of using SNSs in order to support their academic activity [4]. However, the use of SNSs in education must be carefully planned and the right teaching and learning techniques and assessments must be employed. Thus, one should pay close attention to the following factors when implementing SNSs into a learning process (cf. [4]): the background and behavior of user; the university policy on the Internet access; the behavior of university communication; role and rule of social network in daily communication; and the attitude of user. In addition, Ratneswary & Rasiah claim that technology alone cannot bring

transformation because more important is the all-compassing pedagogy without which, no amount of technology can transform a student [5].

Many studies in the field of SNSs now confirm that SNSs can be very effective learning platforms that enhance students' engagement and learning experience, transforming them into active learners with an increased motivation to learn while fostering big quality exchange of ideas and knowledge among participants (cf. [6]; [5]; [7] or [8]).

Thus, the purpose of this article is to explore whether there is a potential in using social networks among first-year undergraduates at the Faculty of Informatics and Management of the University of Hradec Kralove, Czech Republic. Furthermore, the authors of this article want to discover which social networks are the most popular among these students so that the most frequently used could be implemented into teaching and learning processes.

## 2 Survey

The authors conducted the field research to discover whether young people, in this case Czech university students, are aware of social networks and their potential for education. The survey itself and its results are described below.

### 2.1 Survey Aim, Methods and Sample

The aim of the survey was to discover students' awareness of social networks and their potential use in education. This was done on the basis of online questionnaires which were distributed among the FIM students. These questionnaires were then analyzed, evaluated and the findings were compared with those of other researchers dealing with these issues.

Altogether 322 respondents participated in the survey. They were all enrolled in the first year of study. Out of these respondents 159 (49%) were females, 160 (50%) were males and three students (1%) did not answer this question. See Fig. 1 below for an illustration. The biggest age group of the respondents (196/61%) was between 20-29 years, which was then followed by students under 20 years (82 respondents/25%). See Fig. 2 for more information.

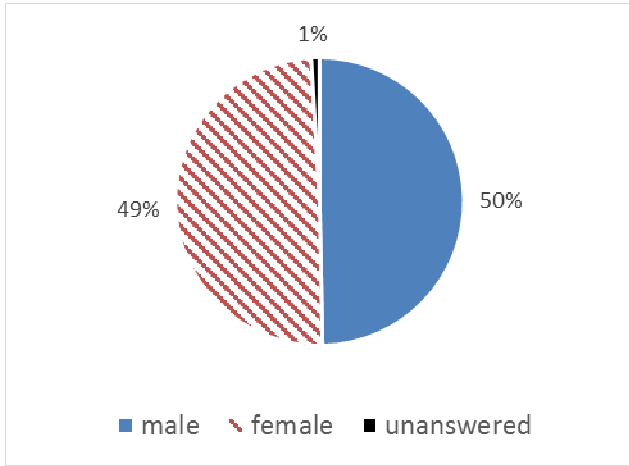


Fig. 1. Respondents' sex

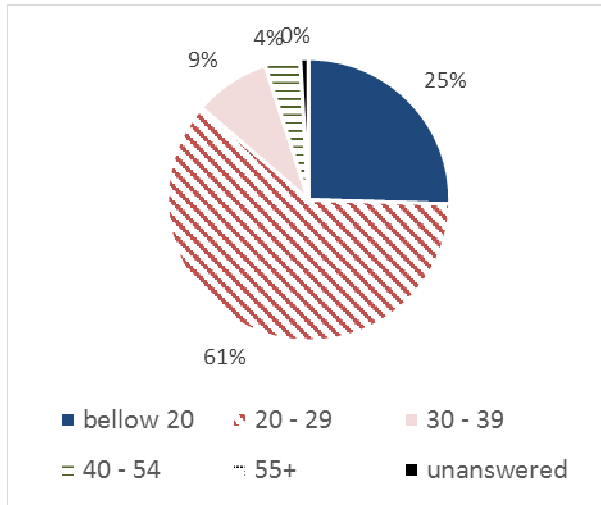


Fig. 2. Respondents' age

In addition, the respondents were relatively evenly spread across the main fields of study which are taught at FIM, such as Applied Informatics (68 respondents/21%); Information management (95 respondents/30%); Financial Management (65 respondents/20%); or Management of Tourism (88 respondents/27%). See Fig. 3 below.

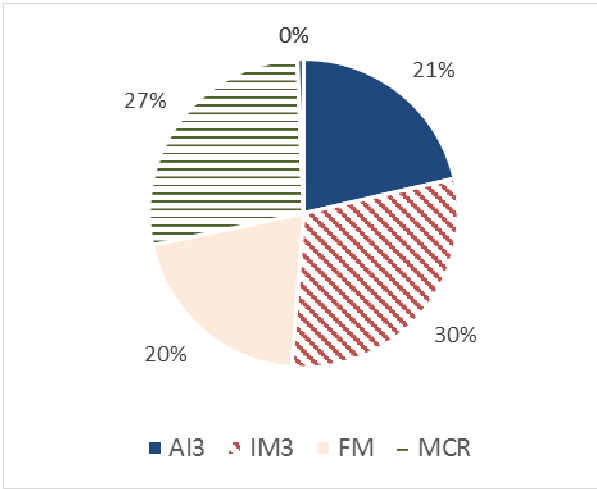


Fig. 3. Respondents' field of study

Moreover, these students were enrolled both in full-time and part-time studies as Fig. 4 shows below.

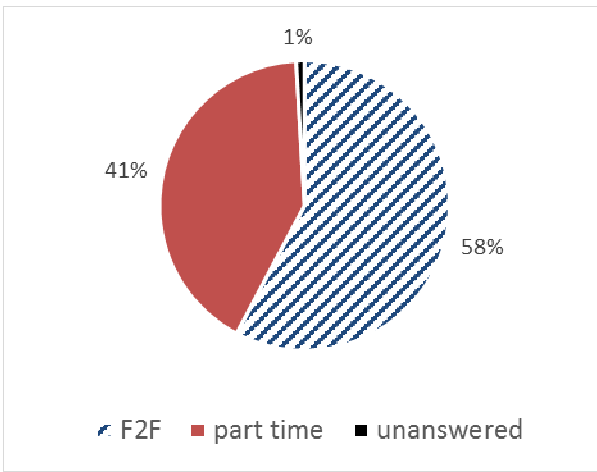


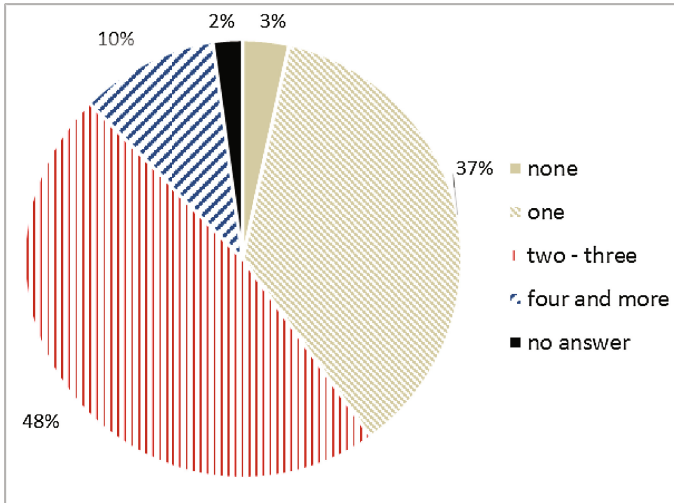
Fig. 4. Respondents' form of study

## 2.2 Findings

Within a larger survey focused on mobile devices and social networks, the respondents were asked seven questions which concerned their attitude to social networks.

**Question 1: Do you have a social network account?**

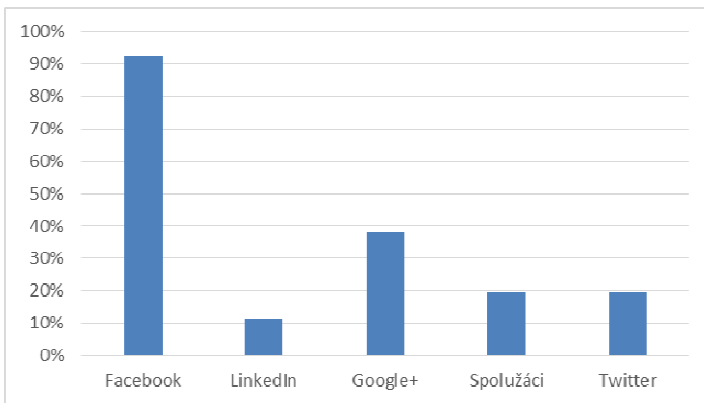
As Fig. 5 indicates, almost all respondents (95%) have the social network account. Only 3% of the respondents do not have any. And almost half of them possess two or three accounts.



**Fig. 5.** A number of respondent's social network accounts

**Question 2: If your answer to the previous question was positive, which of the following social networks do you use?**

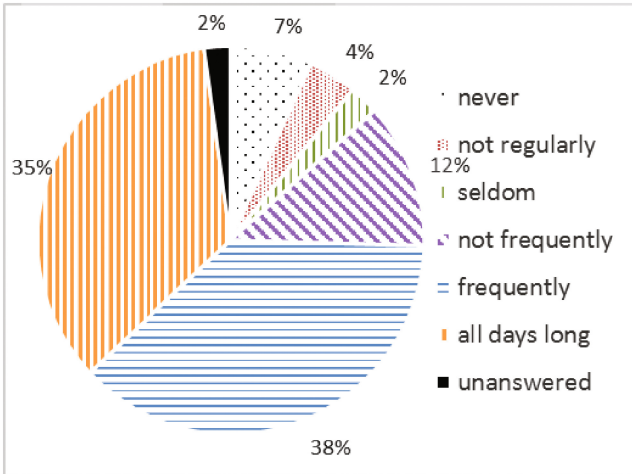
Fig. 6 below demonstrates that 298 respondents (93%) mostly use Facebook, which is then followed by Google+ (122 respondents/38%), Schoolmates (63 respondents/20%) and Twitter (63 respondents/20%), while only 37 students (11%) exploits LinkedIn.



**Fig. 6.** Use of social networks

**Question 3: How often do you login into Facebook?**

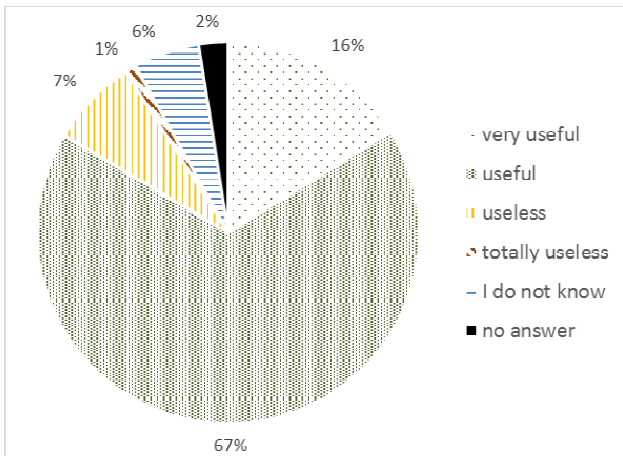
The authors of this article were also interested how often students login into these social networks and since Facebook was the most popular, they analyze here just the frequency of this network because, for example, the respondents do not login into Google+ on a regular basis and very scarcely into other social networks mentioned above. However, as Fig. 7 illustrates below, Facebook is quite frequently accessed and some respondents (112/35%) even do not logout.



**Fig. 7.** Respondent's Facebook access

**Question 4: Do you consider social networks useful?**

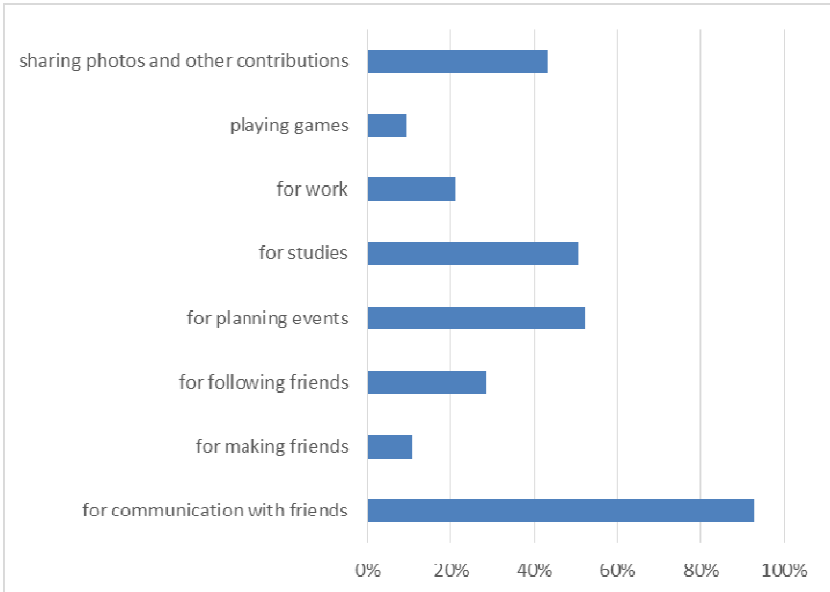
The majority of the respondents find the social networks useful or very useful (269 students/83%). Only 27 respondents consider them useless or totally useless. See Fig. 8 below.



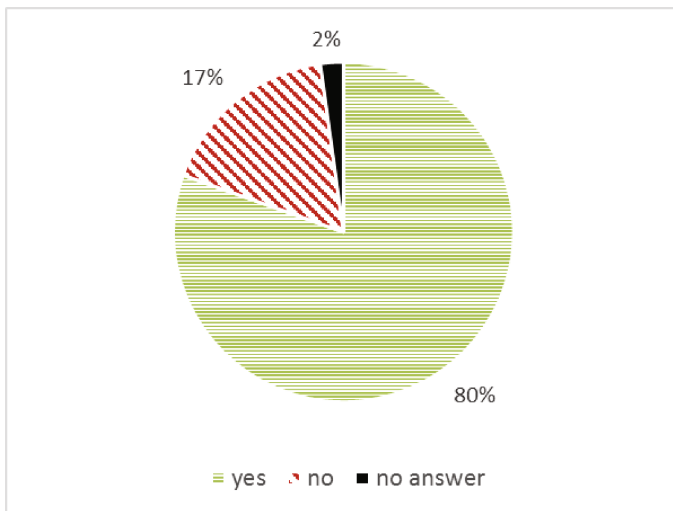
**Fig. 8.** Usefulness of social networks

**Question 5: What do you use social networks most often for?**

The authors of this article were curious whether students also use the social networks for study purposes and they were quite nicely surprised because besides communicating with friends and planning events, study purposes came third on the list. See Fig. 9 below for more information.



**Fig. 9.** Respondents' reasons for using social networks



**Fig. 10.** Possibility of an educational social network

**Question 6: Would you welcome an opportunity to have a social network connected with education?**

Most of the respondents (259 students/80%) would welcome social networks connected with education, while only 56 respondents (17%) would not (Fig.10).

**Question 7: If your answer to the previous question was positive, would you prefer a social network which would be added to you existing social network, or a new social network which would specifically focused on education?**

Almost 158 students (49%) would welcome a chance of a new educational social network, while 85 students (26%) would be satisfied with having it implemented into their existing social network. 37 (11%) respondents did not have any opinion on this issue and 42 (13%) respondents did not answer this question because they would not probably want any educational social network as it has resulted from Question 6. (Fig. 11).

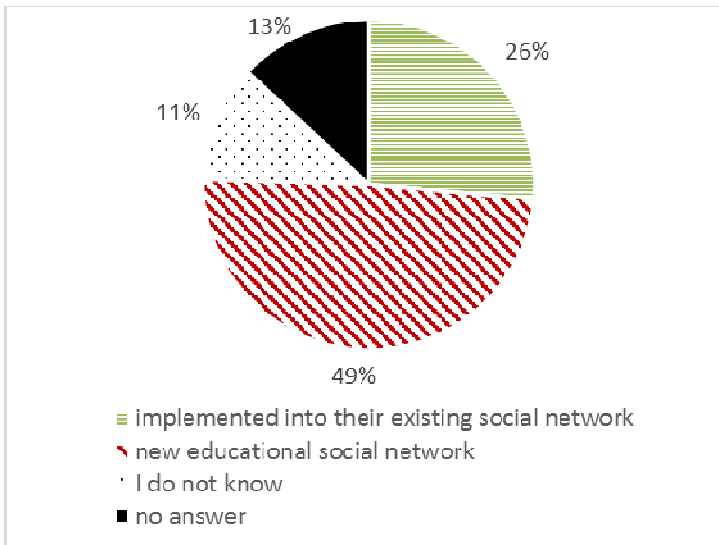


Fig. 11. Respondents' preferences for an educational social network

**3 Discussion of the Results**

As the findings show, most of the respondents (95%), mainly between 20 - 29 of an age across all the fields of study (i.e. even those who are not computer specialists such as students of Management of Tourism), use the social networks and they find them useful. However, the most dominating and commonly used social network nowadays is undoubtedly Facebook [9], including the users in the Czech Republic [10], [11], [12]. [13]. At present Facebook in the Czech Republic has 3.8 million of its users, which makes 56% of the whole population. And as this survey proved, also 93% of the FIM students used Facebook. In addition, besides using it mainly as a means of



communication with their friends (93%), planning events (52%), they also use Facebook for their studies (51%). Therefore, teachers should consider implementing them into their teaching. There have already existed several empirical studies ([5], [6], [7], [8] or [14]) describing the use of social networks, particularly Facebook in teaching and learning processes. For example, Falahah & Rosmala's research conducted among 300 Indonesian university students confirmed that the most dominant social network was Facebook [4]. These students use it at school mainly for resource material sharing and searching and task assignment. Furthermore, Ratneswary & Rasiah claim in their study that Facebook creates a more positive and less threatening learning environment which can enhance students learning and rapport between them and their teaching [5]. In addition, it can expand team-based learning, including interpersonal and intrapersonal skills, team-work skills, time management skills, discipline-specific knowledge and digital literacy.

The survey also revealed that there was an interest among the respondents (80%) in the introduction of the social network which would concentrate on education. One of the examples of such network which already exists and it is on its rise is the web portal called Piazza which was founded by an Indian girl Pooja Sankar. Its name comes from the Italian word for plaza--a common city square where people can come together to share knowledge and ideas. Piazza is a free platform for instructors to efficiently manage class questions and answers. Students can post questions and collaborate to edit responses to these questions. Instructors can also answer questions, endorse student answers, and edit or delete any posted content. Piazza is designed to simulate real class discussion [15].

## 4 Conclusion

This survey proved that there was a big potential for using social networks, particularly Facebook, in education since they attract thousands of users every day all over the world, including the Czech users. Facebook has many applications that support teaching and learning. Moreover, it was confirmed that it could cultivate positive learning experiences as well as to enhance the rapport between the educators and their students [16].

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