

INNOVATIVE APPROACH TO SOCIAL MEDIA IN EDUCATION

Summary

The current paper reviews the usage of social resource such as VKontakte and microlearning technique for educational purposes. The problem is that students in Kazakhstan spend a lot of time in social networks, therefore, the lack of motivation drives to critical results on their academic performance. In order to solve this problem, the research was applied on CSS 216 Mobile Programming (Android) course at Suleyman Demirel University (Kazakhstan). The collected results show that in a modern world of emerging mobile technologies, we as educators should improve the way of teaching by adding electronically supported learning methods. In this study, the significance of microlearning technique is proposed.

Keywords: social media, microlearning, Vkontakte, education.

Кілт сөздер: социалдық медиа, микрооқу, ВКонтакте, білім беру.

Ключевые слова: социальные медиа, микрообучение, ВКонтакте, образование.

Introduction. Today organizations consider how to systematically use micro-sharing, made possible using tools like VKontakte to connect with people. It allows organizations to reach people's desktops, laptops, and devices already in pockets without any dependency of local email servers or a phone tree. Because this is the beginning of the mobile era, where people will be able to communicate, work, share the information, make easier their lives by using mobile devices in their pockets [1].

As it is mentioned above, Vkontakte is a public social network used all over the world which has become an integral part of people's own professional practice or personal point of view. They use it to connect, share, and discover information far beyond any other networks. As a consequence, users finally start to understand that Vkontakte can be used for educational field as a microlearning.

VKontakte – is a social network service available in several languages but popular particularly among Russian-speaking users around the world, especially in Russia, [Ukraine](#), Kazakhstan, Moldova, Belarus, and Israel. Like other social networks, VK allows users to message contacts publicly or privately, create groups, public pages and events, share and tag images, audio and video, and play browser-based games.

As with most social networks, the site's core functionality is based around private messaging and sharing photos, status updates and links with friends. VKontakte also has tools for managing online communities and celebrity pages. The site allows its users to upload, search and stream media content, such as videos and music. VKontakte features an advanced search engine, which allows complex queries for finding friends as well as a real-time news search.

VKontakte users can post on their profile walls, each post may contain up to 10 attachments – media files, maps and documents (see above). VKontakte features two types of communities. Groups are better suited for decentralised communities (discussion-boards, wiki-style articles, editable by all members etc.). Liked content doesn't get automatically pushed to the user's wall, but is saved in the (private) Favorites section instead. The user has to press a second 'share with friends' button to share an item on their wall.

Ubiquitous technology can be usefully applied for microlearning because it reaches users throughout the day, when they have idle time. Users can look through and revise subscribed

course's data while spending time in public transport, waiting in line, or in the brief transition periods between activities. Brief interactions allow users to chip away at a larger learning goal and may serve a priming role by repeatedly bringing the learning task to their attention; users may then be more mentally prepared to take an advantage of richer learning opportunities, such as those that occur naturally during actual social events [2].

How much time does an average human-being spend in social network? How much time do we waste, how much do we use for self-development? According to statistics of International Network for Social Network Analysis (INSNA) our young generation live in virtual world. They always stay connected. The aim of this research is to combine what they like and what they need. As far as V Kontakte is an online network service with elements of microlearning[3], it enables users to learn anywhere and anytime.

Methods. There is a CSS 216 Mobile Programming (Android) course in Suleyman Demirel University, which is mostly oriented on sophomore students. As an experimental tool V Kontakte was chosen to teach Android with microlearning technique [4].

The main idea of connecting V Kontakte with programming languages was to improve knowledge of students. As a learning method, microlearning was chosen. In order to collect data for this research, we interviewed sophomore students from different groups and faculties using questionnaires, which consisted of 7 questions.

The most important questions are specified below:

Do you use V Kontakte? What do you want to learn using microlearning approach? How much of your time would you spend for educational purposes while implementing V Kontakte and microlearning technique?

The results of this questionnaire are provided below:

Total number of students, who participated, is 77. Number of students, who use V Kontakte is 76, don't use – 1.

The question concerned with time has shown the most interesting results:

14 students want to spend 10–20 minutes, 45 students – 1 hour and 18 students – 2 hours per day to learn using social media.

According to the results of this questionnaire, students are unwilling to learn programming language using V Kontakte or they don't know how to use social media for educational purposes.

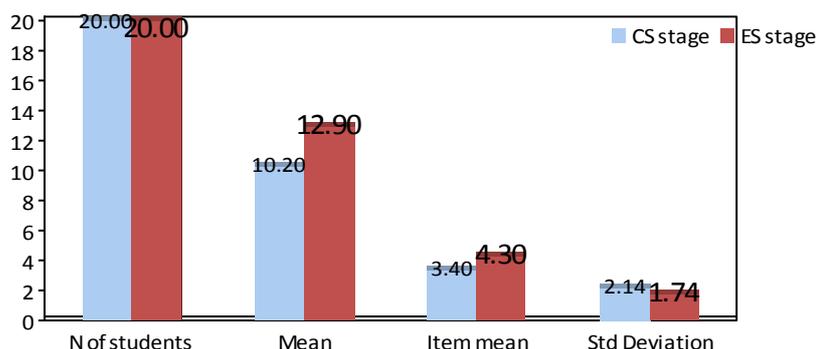
Course materials were processed and compressed into more brief and comprehensive data. Later this data was uploaded to instructor's website and other web resources such as Youtube. As a next step, we prepared a list of links which corresponded to earlier prepared syllabus for Android course. In order to have tweets sent on specific time and date according to the syllabus, we used tweet scheduler to keep the data updated and sent regularly without instructor's control. Students subscribe for Android group, created for this experimental course, which enables getting messages and notifications anywhere, anytime on their mobile phones [5]. This keeps students informed about which topic should be studied, revised and rehearsed.

Data analyzes of students' performance evaluation. There is students' performance evaluation test assigned for the topic from Android Programming Course – Broadcast Receivers. Test consists of some problems which were firstly done on sophomore students during the special lesson devoted to broadcast receivers. Cronbach's alfa mean, item mean and standard deviation was calculated.

The pre and post test results of students' performance evaluation tests were compared and the results were analyzed by SPSS program. The means and standard deviations of the pre and post tests are shown in tables and can be observed on the graphs. Tests were initially applied for sophomore students in order to calculate their Cronbach's alfa coefficients.

Performance evaluation test for sophomore students

Stages of the study	Type of testing topic	Subjects	Type of the test	Mean	Item mean	Std. Deviation
---------------------	-----------------------	----------	------------------	------	-----------	----------------



CS	Content Providers	Sophom ore students	Pre- evaluation	10,20 0	3,4	2,14476
ES	Broadcast Receivers		Post- evaluation	12,90 0	4,3	1,74416

Pre and Post performance evaluation tests results are shown on the figure and in the table. One can observe that during the CS stage students showed lower performance in solving problems than during the ES stage where Broadcast Receivers method was instructed.

It is remarkable that even though problems were comparatively easier than in other tests, the mean and item mean for sophomore students that were tested on Broadcast receivers are higher than mean. But it should be noticed that the number of students was different and education level was also different.

Conclusions. Students were able to access study material outside university. This data was compressed and sliced into small chunks of information. Students subscribed for mobile notifications, that allowed receiving tweets anytime and anywhere, which is the main principle of micro-learning.

Results of the performance evaluation test during CS & ES stages

Moreover, information is nested on students' phones and VKontakte accounts, which they can easily access via Internet.

The mobile technology is spreading very fast. Each second the tons of bytes of information are created. There is a need for learning technique, such as micro-learning. This paper demonstrates a simple example how to use Vkontakte and microlearning technique for educational purposes, but enterprises can use this approach as well. There is a necessity for researching this field of study, which is not yet complete. Many sections are under work and will be expanded in future

REFERENCES

- 1 Corner M. Enterprise Micro-learning. New-York: Pistachio), 2008.
- 2 Beaudin J.S., Intille S.S., Morris M.E. MicroLearning on a Mobile Device. MIT Media Lab, 2011.
- 3 Clarey J. Microlearning presentation at LearnTrends. LearnTrends, 2009.
- 4 Lindner M. What is Microlearning? Austria, Research Studios Austria, 2007.
- 5 Hug T., Lindner M., Bruck P.A. Microcontent is Everywhere (Eds.) 2005.

6 Sarsengeldin M., Satabaldiyev A., Guvercin S., Zhaparov M. Interdisciplinary connections and their influence on mathematical educationn of students // Proc. Social and Behavioral Sciences. Elsevier, 2013.

Резюме

Б. Х. Айтчанов, А. Б. Сатабалдиев, А. В. Богданчиков, К. Н. Латута

(¹Қ. И. Сәтбаев атындағы Қазақ ұлттық техникалық университеті, Алматы, Қазақстан Республикасы,

²Сүлеймен Демирел атындағы университет, Қаскелен, Қазақстан Республикасы)

ӘЛЕУМЕТТІК МЕДИАЛАР АРҚЫЛЫ БІЛІМ БЕРУ ЖҮЙЕСІНДЕГІ ИННОВАЦИЯЛЫҚ КӨЗҚАРАС

Қарастырылып отырған жұмыс, ВКонтакте сияқты әлеуметтік желілерді қолдану мен білім беру мақсатында бағдарламалық ортада микрооқудың технологияларын қарастырады. Бұл жұмыстың негізгі мәселелері аналитикалық орталықтардың зерттеулері анықтағандай, студенттер мен оқушылардың әлеуметтік желілерге біршама уақыттарын жіберуі болып табылады. Интернетте отырып шектен тыс уақытты өткізу дербес оқып-үйренуде біршама мәселелер мен қозғамданың (мотивация) болмағандығына әкеп соғады. Осы мәселенің шешімін табуда университеттің екінші курс студенттеріне «Мобильді бағдарламалау» пәні-нен зерттеулер жүргізілген болатын. Зерттеу нәтижелері көрсеткендей, қазіргі мобильді технологиялардың дамыған заманында біз, яғни оқытушылар электрондық-есептеу жүйелері базасындағы оқыту әдістерін қолдануымыз қажет.

Кілт сөздер: социалдық медиа, микрооқу, ВКонтакте, білім беру.

Резюме

Б. Х. Айтчанов, А. Б. Сатабалдиев, А. В. Богданчиков, К. Н. Латута

(¹Казахский национальный технический университет им. К. И. Сатпаева, Алматы, Республика Казахстан,

ИННОВАЦИОННЫЙ ПОДХОД К ИСПОЛЬЗОВАНИЮ СОЦИАЛЬНЫХ МЕДИА В ОБРАЗОВАНИИ

Данная работа рассматривает применение социальных сетей, таких как – Вконтакте, и технологии микро-обучения в программной среде для образовательных целей. Основной проблемой является то, что студенты и школьники тратят огромное количество времени в социальных сетях, о чем свидетельствуют исследования ряда аналитических центров. Бесполезное просиживание в интернете приводит к серьезным проблемам и отсутствию мотивации в персональном обучении. Для частичного решения данной проблемы было проведено исследование в университете на студентах вторых курсов по дисциплине «Мобильное программирование». Исследование показало, что в современном мире развивающихся мобильных технологий, мы, как преподаватели, должны применять методы обучения на базе электронно-вычислительных систем.

Ключевые слова: социальные медиа, микрообучение, ВКонтакте, образование.

Поступила 5.07.2013г.