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# **Internet Blogs' Potential in Education**

#### **Abstract**

The paper is devoted to general aspects of an Internet blog as an educational instrument and its prospects in education. The authors touch upon the connection between demographic challenges and the current educational trends, showing the main skills of Generation Z. A blog as a teaching tool can be broken down into a number of categories. The paper also discusses in short a few popular blogging platforms.

K e y w o r d s: education and learning, Web 2.0, blogs, blogging platforms, educational blogs

# Introduction

The innovation process includes three components, namely: creation, development, and application of innovations. The key criterion for innovation is efficiency. Any innovation is designed to ensure the effectiveness of the educational process.

In the field of higher education, we distinguish the following types of innovations that are capable of improving the competitiveness of higher education institutions: "innovations in the content of higher education, innovations in the pedagogical process, innovations in organisational structures of higher education, innovations in the activities and relations between teachers and students, innovations in the field of educational services, development of cooperation with

social partners, personnel customers, and innovations in the field of international cooperation of higher educational institutions" (Šeliuk, 2013, p. 31).

The efficiency of innovation activity depends mostly on the way all participants of this process interact with each other. The system of relations arising in the innovative educational activity is aimed at the formation of subject-to-subject relations between the teacher and the student. Such a system radically changes the teacher–student relationship, turning them into partners who are responsible for the results of their work (Morze & Ignatenko, 2010, p. 32).

# ICTs and a Younger Generation

# **Previous Research and Prospects in Education**

The study of the main trends in the evolution of higher education in Ukraine was made possible due to the fundamental research in this thematic field by domestic and foreign specialists. Here, we must mention the research by V. Andrushchenko, V. Astakhova, V. Bakirov, V. Volovich, I. Gavrilenko, and others. The aspects of introduction of the Internet services in the educational process of educational institutions are discussed in the papers by O. G. Glazunova, V. P. Karpovskaya, N. V. Morze, K. M. Obukhova, V. V. Osadchy, Ye. D. Pataraquin, and others. It becomes evident that recent Internet developments provide a plethora of modes of study. However, the concept of an Internet blog and its advantages for teachers in terms of cooperation and interaction is not presented thoroughly in the academic scientific literature; therefore, there is a need for a more detailed study of the possibilities of blogs as means of interaction between a teacher and students.

According to a study realised within the framework of European Commission to identify new ways of obtaining education and training in Europe in 2020–2030, one of the experts expressed, among others, the following predictions:

- open online learning will become traditional;
- mobile devices will be used as the main instrument of learning;
- teaching materials will gradually become digital;
- open educational resources will be widely used by all subjects of the educational process;
- the community will not rely on experts as to the quality of knowledge and training programmes, but will move towards high-quality knowledge, verified through Internet resources;
- there will appear systems and services to provide mutual group learning;
- blogs and other multimedia materials published online will be considered as reliable scientific data;
- virtual mobility will blur boundaries between national education systems; and

• individual learning environments will develop more intensely than institutional online learning environment (Attwell, 2010).

The educational forecasts go in line with demographics. Modern students are representatives of Generation Z. Born and growing up in the information age, representatives of Generation Z, like no one else, can effectively work with information. They are able to analyse it literally "on the fly." They are constantly online and are constantly browsing through heaps of new information. The elder generation members tend to complain that people no longer write letters by hand and do not sit for 8 hours in a row at the table with books, totally focused. However, the fact remains – the world has changed, and we all are now getting new competences to adapt to new conditions. Generation Z might become the most educated one in the running history of mankind, mainly because of their exposure to an almost unlimited amount of information and teaching materials, as well as due to their skills to deal with all these resources. This means that the teacher should take this circumstance into account and confidently direct the students to the desired content.

A sociological survey with Ukrainian youth devoted to the values was held ("Динаміка користування Інтернет..."). Survey results show that 88.5% of young people regularly use a computer at home and 90.4% use the Internet. For comparison, only 21.8% and 22.6% of the interviewed young people use computers and the Internet at work. Answering the question "How often do you use the Internet?," 3% of the respondents commented that they use it once a day, 26% – twice or thrice a day, 65% are constantly online and 6% use the Internet rarely. Consequently, most of the youth are constantly online. This is due to the fact that now one can access the Internet not only with one's computer but also with the phone and other gadgets. Thus, since almost anyone now possesses a mobile telephone, then it is possible to be constantly online.

The social network is a large environment that brings together a huge number of people. Here one can find friends by interests, discuss any questions, comment on anything, and express one's thoughts completely free and, most importantly, absolutely anonymously. All these aspects attract young people. Therefore, in order to communicate in social networks, young people most often go online.

At the same time, the main purposes of using the Internet are the search for versatile thematic information, information for study or work (53.2%), communication in social networks (45.5%), and news (45.3%).

Taking into account the high percentage of young people using the Internet to search for versatile thematic information, the one for teaching, fulfiling their professional duties, as well as for communicating in social networks, there is a need to manage educational activity of young people.

Traditional forms of conducting classes in higher educational institutions are: lectures, seminars, laboratory and practical works, tests and examinations, and defence of coursepapers and diploma projects. Currently, it considerably

improves their vividness to rely on such modern ICT instruments as: multimedia presentations, blogs, Wikiquotes, geoinformation services, webcasts, virtual worlds, etc.

Table 1.

Distribution of answers to the question "For what purpose do you most often use the Internet?"

to look for different thematic information, information for studying, performing professional duties, etc.	53.2%
to communicate in social networks	45.5%
to hear the latest news	45.3%
to download or listen to music, watch films	38.7%
to communicate in chats, Skype, etc.	26.1%
to play computer games or download them	22.1%
to send and receive emails	18.5%
to search and download e-books	7.8%
difficult to answer	0.6%
to buy something online, to pay bills	0.4%
to work online	0.4%

S o u r c e: "Динаміка користування Інтернет...".

Current trends and demographic challenges call for a revolution in educational ideology, for a remote educational mode. For the systematic application of remote technologies based on Web 2.0 technologies in today's higher education institutions, special educational content management systems such as LCMS (Learning Content Management System) can be used, as they make it possible to implement tasks in the educational process related to the educational system of information society.

## A Blog as a Teaching Tool

The most accessible and most widely used Web 2.0 services are network diaries (blogs) – small websites whose authors (bloggers) can manage access to information posted on the blog: make it accessible to all users or only to a specific audience. "Blog" comes from English bloging (blogging) – the entrance to the "World Wide Web," in which people keep their collection of records (Labud'ko, 2013). "It wasn't until 1997 that the term 'weblog' was coined. The word's creation has been attributed to Jorn Barger, of the influential early blog Robot Wisdom. The term was created to reflect the process of 'logging the web' as he browsed. 1998 marks the first known instance of a blog on a traditional news site, when Jonathan Dube blogged Hurricane Bonnie for The Charlotte Observer. 'Weblog' was shortened to 'blog' in 1999 by programmer Peter Merholz. It's not until five

years later that Merriam-Webster declares the word their word of the year" ("A brief history of blogging..."). The advantages of this technology include:

- the openness of information content to all participants;
- the efficiency of presenting information and access to it;
- a free individual schedule of visits for participants;
- interactivity members of the network community (students, teachers, academic staff of educational institutions, administration of higher educational institutions, etc.) can leave their own records in the blog, read posts and publications of their colleagues, comment on the messages and respond to comments, and link posts and comments using hyperlinks.

### The Advantages of Blogs in Teaching

The principles and features of Web 2.0 allow the use of free network software to organise the interaction of university instructors and to plan open lectures, webinars, educational events, intellectual competitions, etc. Despite the fact that school methods offer "closed" questions with unambiguous answers and continue to bring up children within an outdated cultural paradigm, modern students – former schoolchildren – are starting to think differently due to ICT technologies. Therefore, students should be offered "open" questions so that they could understand their "self" and reason, and thus develop their position to perceive the environment, self-reflect on it. Thus, students' personality is manifested and, accordingly, the person's identity is formed; as a consequence the person will never become a manipulated cog in the system.

Comparing traditional world of corporate education to digital learning, Hinchcliffe argues: "This is sharp contrast to the digital era, where knowledge is pervasive, instantly searchable, consumable on-demand, and kept continuously up-to-date by millions of daily global contributors to the online commons. This allows learning – for better or worse, depending on the critic – to be far more situational, on-demand, self-directed, infinitely customized, even outright enjoyable, depending on the user experience, all of which leads to more profound engagement of learners" (Hinchcliffe, 2017).

Summarising the pedagogical potential of blogs, let us first of all stress that in the process of receiving knowledge, transforming knowledge, and further publishing their works, students learn to construct knowledge based on relations and communication, that is, on interaction. For teachers, the works published by students are an opportunity to draw conclusions about how they transform and convey the meanings and strategies mastered within the framework of social experience. For students, such a publication is the ground for further reflection and analysis, which allows them once again to turn to their reflections and reconsider them, thus enriching their own experience. The possibility of posting comments to posts facilitates feedback and potential support for new ideas, while the chance to include hyperlinks to other resources helps students understand the interconnections

and the context of knowledge, its structure and reception. References to sources help the reader determine how relevant the author's blog is to his or her conviction (Labud'ko, 2013).

Hicks lists general benefits of using blogging as a classroom tool; it improves student involvement with study materials, provides more chances for students to collaborate with each other, and enriches students with another channel of communication with the professor (Hicks, 2013).

There are interesting results from book reviewing of a university professor in an open blog. There is evidence that such reviewing is quite detailed even compared to reports from peers chosen by the editorial office (Young, 2009).

Apart from evident benefits for distance learning on the whole, where instructors and students from different parts can teach and learn together, let us refer to a few important points, made by a group of Spanish colleagues:

- teacher-student interaction continues in distance mode;
- blogs are environments of compromise for students with various mindsets;
- some weblogs are open for team work and group learning;
- it simplifies final assessment:
- a wider student community can get an insight about information technology;
- participation in blogs gives students some experience in using information technology before employment;
- blogging promotes skills of informal interaction and creative self-expression. At the same time, it is quite understandable that blogs represent a bigger effort from the teachers' side than traditional presence classes:
  - managing a blog is quite time-consuming for teachers;
  - for the project outcomes to be accurate, there should be a continuous flow of feedback from the teacher and fellow students from the weblog (Luján-Mora & Juana-Espinosa, 2007).

This idea is evidently supported by a number of researchers and educators, for instance here: "community and informal learning platforms need some initial content to ensure there is enough usefulness from the outset to achieve effective adoption by the workforce. This requires an investment in content production (short training videos, articles, and blog posts that can trigger participation and co-creation)" (Hinchcliffe, 2017).

# Popular Blogging Platforms

The blogging mode can be chosen by the bloggers themselves. In case there is a need to make the blog individual, standing out in design and allowing special functions, then it is developed as a website. If it is more crucial for the author to easily upload new posts and manage publications, then specialised blogging platforms will be in use. They are called blogging platforms or services for managing blogs.

Below a few most popular blogging platforms are presented ("The 14 best free blogging platforms..."), based on their popularity, visitor statistics, and functional opportunities.

- 1. **Wix** (https://ru.wix.com) here, there are around 500 creative templates; one can also find here a lot of extra features and apps, and superb hosting. The resource provides users with 500MB storage, 1GB bandwidth, and a free Wix account. There is an option of premium plans.
- 2. **Yola** (https://yola.com) at Yola's free plan one is given a modest offer of two sites and three web pages, but also 1GB of both storage and bandwidth. It is easy to use; the resource provides users with dozens of customisable designs templates, a website builder, customisable flexible layouts, and functions of drag-and-drop.
- 3. **Jekyll** (http://www.jekyllrb.com) Jekyll is described as a static site generator, destined for blog creation. The developer team call it "blog aware" since users create their content in the form of text files (Markdown), and then put them into folders. It means that writing blog posts equals managing text folders on one's PC, which should be named according to specific format. Then, Jekyll suggests a variety of Liquid-enhanced HTML templates which the resource fuses with users' content. Users receive a website relying on static assets and ready to be uploaded to any server. The customer can then host their projects on GitHub's servers for free. This gem can be installed on most systems: MacOS, Ubuntu Linux, Windows, and can be upgraded with time.
- 4. WordPress (http://www.creativebloq.com/tag/wordpress) WordPress is open source software that can be used to create websites, blogs, complex portals, enterprise websites, or applications. WordPress features usability for average customers and the sophistication for experienced developers. WordPress boasts that as much as 30% of the web uses are serviced by WordPress. Here users will find over 40 000 plugins for specific needs: online store, galleries, mailing lists, forums, analytics, etc. WordPress is a vibrant community that hold monthly meetups in 436 cities worldwide.
- 5. **Tumblr** (https://www.tumblr.com) Tumblr covers both blogging and social networking functionality so it can be argued it is in-between WordPress and Twitter. As to a blogging option, Tumblr is a microblogging platform allowing to follow other blogs, reblog, share, and more. Tumblr users find it easy to quickly post videos, GIFs, images, and audio formats. Users can connect their blogs to their Twitter and Facebook pages. It is free and very easy to use.
- 6. **Blogger** (http://blogger.com) it is a blog-publishing service. The platform has been run by Google since 2003. Blogger provides basic blogging experience to its users. Blogger provides a modest number of templates to use, where one can modify the colours and layout using the built-in tools, but one cannot create one's own layouts. Blogger is supported by Google's strong security platform.

- 7. **Medium** (http://medium.com) Medium is a socially-oriented place that promotes writing, organised in a number of predefined segments. The platform is focused on people, quality, original ideas, clean reading experience, engagement, and depth, as well as viewpoint, rather than advertisers, quantity, sponsored content, pop ups and banners, clickbait, and pageviews. Medium offers paid subscription either \$50/year or \$5/month.
- 8. **LiveJournal** (http://livejournal.com) LiveJournal is a community publishing platform, combining features of blogging and social networking. LiveJournal welcomes creative individuals, and promotes interaction and personal expression in the community owing to its user-friendly interface and customisable journal. There are over 50 million journals organised in topics like politics, entertainment, fashion, literature and design, etc.

## **Blogs in Education**

There is a wide discussion as to kinds of blogs according to the functions of educational activity. It has been argued that blogs can be of the following kinds: "a blog for professional community, a personal blog of a subject teacher, a blog to support an educational project, a workbook blog or a blog to present the learning materials of some topic" (Roždestvenskaja, 2008).

Vividly, the variety of blogs could be represented by broader classes. According to Zaharova, "teaching blogs can be divided into two main groups: those of methodical and informative nature. Methodical blogs in turn are divided into thematic ones and blogs of subject teachers, while informative blogs can be presented by a blog of the class teacher (for the school – a class blog), a blog as a training project, a blog of the association, a blog for students' distance support" (Zaharova, 2015, p. 1).

In the group of methodical blogs, we have collected a short list of links to useful blogs for the teaching community.

A blog resource EduGugu (http://blog.eduguru.in/) suggests ideas on online learning, web tutorial, software development, call centre technology suits, and provides technical support for them.

Blog High Ed (http://www.bloghighed.org) is a higher education blogger network where we can read about current issues in higher education, namely the following experts: webmasters, marketers, vendors, counsellors, consultants, and more.

Casting Out Nines (http://rtalbert.org/blog) is a blog of ideas and opinions on mathematics, technology, and education from Robert Talbert, an associate professor in the Mathematics Department at Grand Valley State University in Allendale, Michigan, an inspired presenter and expert in the areas of e-learning, independent learning, and other areas.

Changing Higher Education is a blog from Lloyd Armstrong, University Professor Emeritus and Provost Emeritus at the University of Southern California (Changinghighereducation.com), which presents the author's views on future developments in university education, with a specific interest in higher education financing and globalisation. There is a counterbalancing set of new resources and processes that can be used to help meet the challenges (changing economic conditions, technological advances, and globalisation provide numerous challenges to the status quo of American higher education) and create new opportunities – MOOCs, outcomes based learning, etc.

Coursera blog (https://blog.coursera.org/) provides insights and inspiration for teaching world-class courses online, on data science, computer science, business, personal development, and arts and humanities.

The blog of Eric Stoller (www.ericstoller.com/blog) suggests ideas on how educators can use social media for learning and engagement, and hints about teaching students about digital identity development. With a background in student affairs, academic advising, wellness, technology, and communications, Stroller focuses his energies on educating clients and captivating audiences.

Yet another blog GlobalHigherEd (https://globalhighered.wordpress.com) is designed to share information about progress in education policy, useful resources and the like in order to have a clear idea of the changes in educational organisations globally. The contributors are motivated to research in the ways knowledge spaces are growing increasingly connected with developments in "knowledge economy."

### Conclusion

Blogs can serve as instruments of distance learning, where an important thing is that one can convey information. At the same time, we should keep in mind that possessing information or knowledge and understanding something are two different things. People build their understanding to a large extent through interactivity with other people, and here we observe a proper multiplication of knowledge through comparing different mindsets. Knowledge is developed inside a person's mind, so it is very complicated to pass it through the screen, while information can be passed. The most useful thing is to merge two methods: where one needs to understand something, interactivity should be applied, while in order to get information one should go online. Therefore, the qualitative student—teacher interaction through a blog can provide a dynamic cognitive activity. Hence, blogs have a great potential for active and interactive learning, intensive interaction between students and teachers, the development of higher-order thinking skills, and greater flexibility in the learning process.

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# References

- A brief history of blogging, Accessed 15 October 2017. Retrieved from https://www.webdesignerdepot.com/2011/03/a-brief-history-of-blogging/.
- Ananny, M., Strohecker, C., & Biddick, K. (2004). Shifting scales on common ground: Developing personal expressions and public opinions. International Journal of Continuing Engineering Education and Life-long Learning, 14(6), 484–505.
- Attwell, G. Crowd sourcing the European foresight study: your chance to be an expert. Accessed 10 October 2017. Retrieved from http://www.pontydysgu.org/2010/01/crowd-sourcing-the-european-foresight-study-your-chance-to-be-an-expert/.
- Динаміка користування Інтернет в Україні: травень 2017. Accessed 1 October 2017. Retrieved from http://kiis.com.ua/?lang=ukr&cat=reports&id=705&page=1&t=5.
- Generation Z: Як підвищити суб'єктність нового покоління. 7 думок про виховання та освіту від Олександра Саврука, декана Києво-Могилянської бізнес-школи. Accessed 30 September 2017. Retrieved from http://womo.ua/generation-z-yak-pidvishhiti-sub-yektnist-novogo-pokolinnya/.
- Grannell, C. (2017). The 14 best free blogging platforms. Accessed 10 September 2017. Retrieved from https://www.creativebloq.com/web-design/best-blogging-platforms-121413634.
- Hicks, K. (2013). The benefits of blogging as a learning tool, part 1. Accessed 18 September 2017. Retrieved from http://www.gettingsmart.com/2013/12/benefits-blogging-learning-tool-part-1/.
- Hinchcliffe, D. (2017). The digital transformation of learning: Social, informal, self-service, and enjoyable. Accessed 30 September 2017. Retrieved from http://www.zdnet.com/article/digital-transformation-of-learning-social-informal-self-service-enjoyable-mooc-education/.
- Kudryavtseva, I. A. (2012). Образовательный блог в деятельности учителя-предметника. In Proceedings from Теория и практика образования в современном мире: материалы Междунар. науч. конф. (Saint-Petersburg, February 2012) (pp. 408–410). Saint Petersburg: Renome. Accessed 30 September 2017. Retrieved from https://moluch.ru/conf/ped/archive/21/1646/.
- Labud'ko, S. P. (2013). Блог як сучасний засіб взаємодії вчителів. Всеукраїнська науковопрактична Інтернет-конференція «Електронні інформаційні ресурси: створення, використання, доступ» (Vinnitsya, 29–30 April 2013). Accessed 12 October 2017. Retrieved from http://liyalnol.blogspot.ru/2013/04/blog-post 30.html.

- Luján-Mora, S. & Juana-Espinosa, S. (2007). The use of weblogs in higher education: Benefits and barriers. Accessed 1 October 2017. Retrieved from http://desarrolloweb.dlsi.ua.es/blogs/use-of-weblogs-in-higher-education-benefits-and-barriers.
- Morze, N. V. & Ignatenko, O. V., (2010). Methodical features of webinars as innovative technology of education. In Information technologies in education, Issue 5 [collected scientific papers] (pp. 31–39). Kherson: HSU.
- Ogrodzka-Mazur, E. & Gajdzica, A. (2015). "New professionalism" of the teacher and education towards interculturalism. International Journal of Continuing Engineering Education and Lifelong Learning, 25(4), 487–497.
- Roždestvenskaja, L. (2008). Такие разные блоги .... Accessed 16 October 2017. Retrieved from http://ljudmillar.blogspot.com/search?q=такие+разные+блоги.
- Šeliuk, L. (2013). Модернізація освіти як інноваційний процесс. Вісник Інституту розвитку дитини. Філософія, педагогіка, психологія, 29, 31–36. Accessed 1 October 2017. Retrieved from http://nbuv.gov.ua/UJRN/Vird 2013 29 8.
- Wang, Q., Quek, Ch. L., & Zhong, B. (2017). Teachers' time investment in online teaching. International Journal of Continuing Engineering Education and Life-long Learning, 27(1/2), 111–121.
- Young J. R. (2009). Blog vs peer review final report: Lessons learned. Accessed 30 September 2017. Retrieved from http://www.chronicle.com/blogs/wiredcampus/blog-vs-peer-review-final-report-lessons-learned/7166.
- Zaharova, M. V. (2015). Педагогический блог инновационная форма взаимодействия в образовании (на примере проекта «Блогосфера» МКУ КМЦИКТ «Старт» города Краснодара и муниципального конкурса «Лучший блогер»). Образование и воспитание, 5, 1–3. Accessed 30 September. Retrieved from https://moluch.ru/th/4/archive/18/331/.

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#### Potencjał blogów internetowych w edukacji

#### Streszczenie

Niniejszy artykuł jest poświęcony ogólnym aspektom wykorzystywania blogów internetowych w edukacji. Autorzy zastanawiają się nad związkiem między wyzwaniami demograficznymi a obecnymi trendami w nauczaniu, skupiając się na umiejętnościach pokolenia Z. Wyróżniono liczne kategorie blogu jako narzędzia edukacyjnego. Przedstawiono także kilka popularnych platform do blogowania.

Słowa kluczowe: edukacja i uczenie się, narzędzia 2.0, blogi, platformy do blogowania, blogi edukacyjne

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### Потенциал Интернет блогов для образования

#### Аннотация

Статья посвящена общим вопросам Интернет-блога как учебного инструмента и его перспектив в образовании. Авторы затрагивают связь между демографическими проблемами и текущими тенденциями в области образования, демонстрируя основные навыки поколения Z. Блог как инструмент обучения можно разбить на несколько категорий. В документе также кратко обсуждается несколько популярных платформ для блогов.

Ключевые слова: образование и учение, веб 2.0, блоги, платформы блогов, образовательные блоги

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### El potencial de los blogs de Internet en Educación

#### Resumen

El artículo trata los aspectos generales del blog en Internet como un instrumento educativo y sus perspectivas en materia de educación. Los autores tocan la conexión entre los desafíos demográficos y las tendencias educativas actuales, mostrando las habilidades principales de la generación Z. El blog como herramienta de enseñanza se puede dividir en una serie de categorías. El documento también analiza en pocas palabras algunas plataformas populares de blogs.

Palabras clave: educación y aprendizaje, web 2.0, blogs, plataformas de blogs, blogs educativos