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THE FOURTH INFORMATION REVOLUTION

Annotation. It describes some aspects of the Internet's influence on society that have not been observed in the past millennia; from which it was concluded that the Internet is the basis of the fourth information revolution, which began in 1989 and continues to this day.

Keywords: *information revolution, digital society, Internet, social change, digitalization*

A quote from the description of information revolutions in the Great Russian Encyclopedia (GRE)

«There are several information revolutions in the history of the development of civilization. The first is associated with the invention of writing, thanks to which it became possible to transfer knowledge between people without direct communication. The second (16-17 centuries) was caused by the invention of printing and reforms of the school system, which made possible mass education and the popularization of knowledge and played an important role in the formation of an industrial society. The third information revolution (late 19th - early 20th centuries) began with the appearance of the telegraph, telephone, radio, which made it possible to quickly transmit information over any distance, and entered a new phase with the invention of television and computers (1930-1940s.), and then (late 1970s) - with the widespread spread of information technologies»[2].

Disadvantages of defining the third information revolution

In the interpretation of the third information revolution on (GRE), telephone, telegraph, radio, television and the Internet are mixed.

Telephone, telegraph and radio are similar to each other, since these three technologies are based on the technical implementation of the principle of communication at a distance. Before the invention of these technologies, people were forced to communicate only in person.

Television, radio and the newspaper (which was invented in the middle of the 19th century) are similar to each other, since these three technologies are based on the delivery of the same type of information to large masses of the population. Before newspapers, radio, and television, criers did a good job in this role.

Like radio, the Internet unites personal communication and report of information to large masses of people; but, unlike radio communication, the capabilities of the Internet allow you to edit information, translate it into other languages, transmit text,

sound, pictures and video at a very high speed (for ordinary purposes - from a fraction of a second to several minutes) without losing quality over thousands of kilometers.

How the Internet changed society

The impact of the Internet on human society is strong, affecting the fundamental foundations of humanity, formed over centuries and millennia.

1. An increase in the level of communication.

In the era of the Internet, contacts between people have become more, much more than during the previous millennia: if earlier peasants or hunters could contact in their entire life only one or two hundred people, now such a number of contacts can be made within one incomplete day conducted online.

2. An increase in the level of filling contacts with information

The Internet has increased the filling of contacts with information - thousands of years ago, words, pictures and objects were the basis for communication, later printed texts were added to this set, and in the Internet era, the opportunity to share photos and videos was added to this set.

3. Ease of getting prominence.

In the era of the Internet, it is much easier to become more or less famous than during the previous millennia: the colossal number of contacts allows even a slightly distinguished person to receive their share of fame and fame, which would have previously been taken away from him by more significant figures.

4. Huge speed of access to an incredibly large array of information from almost anywhere in the world.

Before the invention of printing, this was basically impossible. Finding data became easier with the creation of giant book libraries, but it still took hours, days, or even months. Now, in the era of the Internet, search engines and services allow you to search for a variety of information on the Internet, getting an almost instant answer to virtually any request. Moreover, if a person who was walking before had to physically move somewhere to obtain information (for example, go to a teacher or to a library), now this can be done without leaving home. But that's not all - the spread of the mobile Internet allows you to look for answers to your questions anywhere in the world where there is a network signal (on the road, in the forest, at sea, and so on).

5. Easy access to information in any language.

Earlier, for millennia, the language and spatial barrier quite reliably separated people - in the era of the Internet, you can easily go to a foreign website and, with the help of an online translator, get acquainted with the information from there.

6. The proximity of information sources to its consumers.

How to inform the source of information about your attitude to the information received? For millennia, before universal literacy, this could only be done personally, and this is extremely difficult to accomplish. With the increase in the level of literacy among the population, it became possible to convey their opinions through writing. Now, in the age of the Internet, you can express your attitude through comments, emails, and other means.

7. *Falling interest in secondary school education.*

For thousands of years, teaching has taken place orally, as well as through personal example. The first information revolution added textual information to this set, which was scarce and of a limited nature. The second information revolution led to the formation of a school, where students received knowledge, mainly from books. Studying at school opened up good career prospects for a literate young man. Over time, the volume of school knowledge constantly grew, becoming unnecessarily large at the end of the twentieth century, since for the subsequent acquisition of a specialty, much of what is taught at school turns out to be unnecessary. The Internet has become a powerful alternative to the necessary school knowledge, making it possible to obtain it easily and quickly, as a result of which the school has actually become a place for socialization, and not for acquiring knowledge. At the same time, the information received by students of vocational schools and universities studying specialties is, in their eyes, important, therefore, such educational institutions now remain places for obtaining knowledge and skills for subsequent work.

8. *The spread of a sedentary lifestyle.*

With the penetration of information technology into all aspects of human life, the need arose to develop, support and use a huge number of all kinds of programs, which led to an increase in the time people spend sitting or lying down. Throughout its history, humans have never spent so much time sitting or lying down before.

9. *Other aspects of the impact of the Internet on people's lives.*

The Internet has not yet completed its development, therefore, more and more new aspects appear in it that can potentially significantly change people's lives, in particular: the population has easy access to erotica and pornography; there were cryptocurrencies, face recognition systems (and the ability to build a digital concentration camp on their basis), distance learning; the possibilities for the use of mobile technologies in military affairs have expanded (for example, remotely controlled land and air combat vehicles have appeared), and so on.

The Internet has already significantly influenced and continues to influence further on the relations that have been established in human society for centuries and millennia, therefore, the era of mass distribution of the Internet should be singled out as a separate, fourth information revolution.

Start date of the fourth information revolution

The ability of computers to unite into a single network is just one of the properties of computer systems, on the basis of which you can build something qualitatively different, but the Internet is not a local computer network, but something completely different.

The basis of the fourth information revolution is precisely the Internet, and the Internet is massive, global, cheap, saturated with all kinds of information and various services, which is now developing at a rapid pace, becoming more and more mobile, diverse and perfect.

The date of the beginning of the fourth information revolution is the period of the creation of the Internet.

The year that could be declared the year of the creation of the Internet is difficult to identify, since the creation of the Internet is a process that stretched out over decades [1]:

1. 1962 - the idea of building an information network.
2. 1967 - plan for building APRANET.
3. 1969 - realization of APRANET.
4. 1971 - the invention of electronic mail.
5. 1972 - realization of e-mail.
6. 1973 - the TCP / IP protocol family is developed.
7. 1983 - standardization of the TCP / IP protocols.
8. 1989 - realization of the World Wide Web project.

Thus, the Internet was created over thirty years - from the early 1960s to the late 1980s, or more precisely from 1962 to 1989; which means that the fourth information revolution began in 1989. The time interval from 1962 to 1989 should be recognized as a transitional period between the third and fourth information revolutions.

Duration of the fourth information revolution

There is no doubt that the Internet is developing now, acquiring more and more new services, services and opportunities, therefore, at present, the fourth information revolution is not over yet, continuing further.

Conclusions:

1. The Internet is the backbone and driving force of the fourth information revolution.
2. The process of creating the Internet from 1962 to 1989 is a transitional period of time between the third and fourth information revolutions.
3. The fourth information revolution began in 1989.
4. The fourth information revolution continues at the present time.

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