

Extended Abstract

Manipulation and self-realization in the network media

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Collective intelligence

I'd like to ask whether social networks support man's intelligence. The answers differ, we can distinguish between two types of opinions.

J. Surowiecky claims social media are in an equal position to traditional media. The first time this happened was the 2004/2005 tsunami in Southeast Asia. Videos and blogs reported on the situation sooner than newspaper and TV stations. Mainstream media used social media as a source. The motivation of social media journalists is not profit, but sharing their story, getting attention of the fans, readers and listeners. General public was active in the process of getting, analyzing and spreading information.

Surowiecky claims a group can be in some instances more intelligent than the most intelligent of its members. His book *The Wisdom of the Crowd* (2005) is based on numerous case studies and anecdotes where his claim was confirmed. A typical example he uses is the Galton's experiment in which the weight of ox was better estimated if individual guesses were averaged than if its weight was estimated by any group member or an expert. Surowiecky's examples can be classified into categories like cognition (market judgement and evaluation which is faster and more precise than an expert's assessment), coordination (people naturally coordinate their behavior in the traffic, in using public spaces etc.) and cooperation (people trust one another on the market without a central control). For the formation of a wise crowd diversity of opinions, independence, decentralization and aggregation is necessary. However, in many cases crowd produces bad behavior. The reasons for that are too much homogeneity in the crowd, centralization, isolation and division of information, imitation of crowd members and unsuitable emotionality.

The advantages of network society are not limited to the crowd phenomena. E.g. in the game industry there were some attempts to use game players in solving real issues, but within the game environment. The advantage people have in comparison to computers is recognizing patterns (2014).

Anonymous collectivism

On the other hand blogs, wikis and social networks repeat the opinion that has been once formulated. It is difficult to have an individual opinion as the power of the group is very strong. The members of social networks want to belong into the group and that is why they repeat the group's opinions. For the Surowiecky's principle it is necessary that somebody calculates the average and so the advantage of crowd intelligence is dependent on an enlightened member of the crowd.

The idea of collective intelligence has been attacked by many other thinkers. J. Lanier thinks the aim of social networks is to destroy one's intelligence and support anonymous collectivism. He even calls the online collectivism "digital Maoism". An example can be the speculative bubble, i.e. crowd craziness that causes that shares' prizes go up or down. Group fanaticism led to the support of Nazism, communism, religious fanaticism etc. There is no reason to think that digital revolution would lead to a change in the thinking of crowds.

Lanier criticizes in his *One-Half a Manifesto* (2010) a situation when computers become masters of life. Computer's computing power increases, but their performance increases slowly. The problem with computers consists in their inability to be creative. If we succumb to them we lose the potential plurality of perspectives on the world.

In his *Digital Maoism* (2006) he criticizes the situation in the cyberspace where we consider just one source of information like the Wikipedia authority, where the relation to the real author and the sophistication of his ideas is lost, where the source of information creates a false sense of authority behind the information, where the information source produces mainstream beliefs and where information is manipulated by anonymous editors behind the scene. All these approaches create some sort of totalitarianism.

With the spread of social media and big data, the potential for manipulation and totalistic tendencies increased. The big data analysis has been used in presidential elections, in commercial applications, marketing and other areas of human life. They use the common human features like the willingness to help, altruism, reciprocity, empathy, respect for authority, group specific features (e.g. group identity), and individual features (stereotypes, submissivity, prosocial behavior etc.).

Janus face of technology

If we criticize the limited perspective on network media it will turn out that technology has a Janus face as Arnold (2003) formulates it. The critique of its negative influence will provide space for the appearance of its opposite effects. Arnold's claim is that technology including network media has a dual face: on the one hand it supports the purpose for which it was designed, constructed and used, but on the other hand ironically it provides unintended effects that lead in the opposite direction. To provide some examples we can mention antibiotics which were originally invented to provide protection against bacteria and pathogens and to reduce diseases. In the course of time they made pathogens stronger and our health weaker. Air conditioning cools down the inner environment, but increases external temperatures. The linear logic of cause and effect doesn't work here. ICT which abolished distance among community members created an environment where almost everybody is at the same distance (Heidegger, 1969). Cooper (2002) states that our increased ability to assert oneself is at the expense of one's quality and maturity.

If we look at the effects of new media we can generalize the results of Arnold who analysed the effects of mobile phones. His analysis is not instrumental, he accepts technology and stays away from it – he evaluates it critically.

The first appreciated quality of new network technologies is their mobility: they are small, can operate without cable connection to the internet, have many functions and don't bind its user to a specific environment. He can move without losing the ability to work. On the other hand because technology allows unanimous identification of the device, it also fixes its user to itself and the user is always available. He has no free time. New technologies allow independence, one can travel, be in contact with many friends and colleagues, but technologies require at the same time that everybody has it and has a compatible type and operating system. The communication at distance may cause isolation and vulnerability, one communicates, but the partner is at a distance, the interaction is limited etc. The information is available, but without context, simplified, without warranty. The bridging of distance to others or to information is ostensible only. And using communication technology means I am in the same position as other users, I am part of their community, but still isolated and at a distance. People who are physically close become distant in their ideas – they communicate with somebody who is not present, solve issues which are not related to their physical context etc. But they can be closer to more urgent issues or to people to whom they otherwise wouldn't be able to communicate. Modern technologies also break the difference between close and distant friends as everybody is at the same distance. On the other hand that may be helpful and allow finding new friends or deepening the relations that may be developed in reality. People get new senses (hear at long distance, remember big amounts of data due to their online databases etc.), but can be accessed, analysed, influenced as well. The boundaries between private and public, free and charged, available and busy, important and not important is more fixed as the signal can be coded, the switched off device can't be from a distance switched on, without password the access is not possible, but more benevolent at the same time as login information can be stolen, code can be broken etc. The idea of new technologies is to save time, help their users, do some work for them, but they waste their time with their games, competitions, supply of functions etc.

Conclusion

What we must keep doing is to criticise the current understanding of the world in order not to get caught in one of its aspects.

The problem of the relativist thinkers is that they don't question the closed context of human behaviour. The ideas of the critiques of new technologies are grounded, but their result, that they uncover the only substance of technology is not, their critique just opens space for various aspects technology can have. If we criticise it from one perspective it will show its other character because it has Janus faces.

References and Notes:

1. Arnold, M. On the phenomenology of technology: the "Janus-faces" of mobile phones, *Information and Organization* 13, 2003, pp. 231–256
2. Cooper, S. *Technoculture and critical theory: in the service of the machine?* London: Routledge, 2002
3. Heidegger, M. *Discourse on thinking*. New York: Harper & Row, 1969
4. Lanier, J. *Digital Maoism: The Hazards of the New Online Collectivism*. <http://edge.org/conversation/digital-maoism-the-hazards-of-the-new-online-collectivism>, May 30, 2006; Retrieved December 10, 2014.

5. Lanier, J. *One-Half a Manifesto*. <https://edge.org/conversation/one-half-a-manifesto>, November 10, 2000; Retrieved July 13, 2014.
6. Surowiecki, J. *The Wisdom of Crowds*. Anchor Books, 2005, ISBN 0-385-72170-6.
7. The Guardian, *How online gamers are solving science's biggest problems*, <http://www.theguardian.com/technology/2014/jan/25/online-gamers-solving-sciences-biggest-problems>, 2015; Retrieved May 5, 2015

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