

Web 2.0 - New Perspectives

Social, Political and Economic Impacts of Emerging Web 2.0 Platform

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ABSTRACT

The technological advancements in the late twentieth and early twenty first centuries have given online media, in the first instance, an enormous advantage over other mediums such as the printing press, the radio and TV. To date, with the media technology transferring to the stage of a participative, interactive Web 2.0 platform, the causes and effects of this new media technology have aroused many researches and discussions in the field. Some take the new media technology as an extension of human beings, as a commercial product, or as a business model whereas others argue that it is another form of political force. This literature review attempts to gather the latest discussion on Web 2.0 in order to have a general idea of its nature, the influencing factors and the controlling forces. No definite answers are put forward. However, a better understanding of various effective factors positioned to the new media technology, be they societal, political or commercial, are critically demonstrated.

INTRODUCTION

Prior to the advent of Web 2.0, the World Wide Web was, more or less, of the same organisational structure as the traditional media in terms of authors, editors etc. who are in charge of delivering the media content. Some scholars thus argue that the change associated with the new technology of the internet is simply a shift in platform from the real world to the hypertext domain (Kolbitsch & Maurer, 2006). However, this is no longer true when the technology runs into the time of "Web 2.0", the term put forward by Tim O'Reilly in 2004 which refers to the transformation of the World Wide Web to be interactive, enabling users to have a chance to participate (see Harison & Barthel 2009; Kolbitch & Maurer, 2006; OECD, 2007).

O'Reilly (2005) defines Web 2.0 as the "architecture of participation". Web 2.0 applications enable users to utilize technologies in a more active way – even those users with little technical knowledge can "construct and share their own media and information products on social networking websites and to pool the collaborative efforts of potentially millions of users" (Harison & Barthel, 2009, p. 159). Examples of Web 2.0 technologies include wikis, blogs, podcasts, file sharing tools, social networking sites etc. (O'Reilly, 2005; Kolbitsch & Maurer, 2006; Harison & Barthel, 2009).

It is true that the development of Web 2.0 is still ongoing and the technological revolution is dramati-

cally penetrating. Examples of the recent boom of social networking sites include Facebook and Twitter. Discussions of Web 2.0 have centered on its features, as well as its socio-political and economic impact (OECD, 2007; Harison & Barthel, 2009; Benkler, 2006;). Based on the fundamental understanding of the nature of this "new media technology" (Harison & Barthel, 2009, p.157), this literature review analyses the arguments on factors that shape and, further, control the Web 2.0 platform. Social, political and economic factors need to be considered in selecting appropriate literature.

WHAT SHAPES WEB 2.0: FACTORS OF THE ORIGIN AND DEVELOPMENT

There are some scholars who challenge whether Web 2.0 is fundamentally different from previous Internet technologies. World Wide Web inventor Tim Berners-Lee has said in an interview that he had intended the Web to be "a collaborative authoring tool" enabling people to "edit in this space, or different people would have access rights to different spaces" (Berners-Lee, 2006). Meanwhile, Kolbitsch and Maurer (2006) claim that it is "a fundamental mind shift that encourages individuals to take part in developing new structures and content" (p.187), rather than the driving of new technologies that is subject to the transformation of the Web.

Similarly, Tim O'Reilly (2005) observes that the central principle behind the Web 1.0 giants' successful transfer to the Web 2.0 era is the power of harnessing

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collective intelligence. There is an interesting point of view from McLuhan's understanding of media as "the extension of man". Harrison and Barthel (2009) further explain that it is natural for users to create media products as active and creative human beings, for whom media is an "extension of our senses". This answers the question of why media development happened, from the telegraph, radio and television to today's computer-mediated interactive platform.

The virtual world as a platform for communication is still new and the research is at an embryonic stage. Nevertheless, scholars have tried to explain the participation in the virtual platform at both individual and community levels (Wasco & Samer, 2005; Goel, Junglas & Ives, 2009).

Applying the theories of collective action, Wasco and Samer (2005) examine individual motivations and social capital that could influence knowledge contribution in online communities. Their empirical study suggests that people contribute their knowledge in electronic networks when they recognize an approval and enhancement of their professional reputations, "when they have experience to share with others", and "when they are structurally embedded in the network" (Wasco & Samer, 2005, p.53).

Goel, Junglas and Ives (2009) discuss effective ways of transferring tacit knowledge, and they propose virtual worlds as "platforms for communities of practice". The four affordances attributed to are "self-expression", "co-creation", "co-experience" and "crowd sourcing" (pp.186-188). Certainly, technology, like those life entities on the earth, does not exist in a vacuum - it is applied and situated in a socio-political and economic context.

Harrison and Barthel (2009) explain that the term Web 2.0 "is associated with a set of motivations for business advantage" (p.173) and this is largely related to the creative idea of user-generated content. Similarly, as earlier, users participate in the technology of electronic mail with their own purpose, "Web 2.0 users have seized on the opportunities presented by new media technologies to create media content for their own purposes, producing an array of evocative projects and new media forms" (Harrison & Barthel, 2009, p.174). This is convincing when the authors refer to the Pew data on content construction. A more substantial amount of Web 2.0 content participative activities are created with users having more artistic and personal purposes (Harrison & Barthel, 2009).

Although Castells (2000) accepts this 'open' communication system with a flexible and adaptive networking logic, he makes a convincing argument for political pressure in a network society. In Castells' opinion, media space is "largely shaped by business

and governments" (Castells, 2007, p.246). Similarly, Williams and Delli Carpini (2004) also examine the new media environment and highlight the impact of the more fundamental structures of economic and political power.

In general, the literature has so far demonstrated psychological factors in both individual and group levels, together with the fundamental socio-economic and political power that shape the new media technology (Castells, 2007; Goel, Junglas & Ives, 2009; Harrison & Barthel, 2009; Wasco & Samer, 2005; Williams and Delli Carpini, 2004).

WHO CONTROLS WEB 2.0: QUESTIONING THE OPENNESS OF THE 'OPEN' TECHNOLOGY

Many influencing factors are present, but who is, in fact, taking charge of Web 2.0? Many scholars agree that the Internet, especially the Web 2.0 platform, provides an open platform for political, commercial and social engagement (Berners-Lee, 2006; De Backer, López-Bassols & Martinez, 2008; Harison & Barthel, 2009). Some scholars have argued that the platform of the internet is the "democratization of access to media outlets", which enables the diversity of public opinions, political discourse, freedom and justice (Balkin, 2004; Lessig, 2004). However, Harison and Barthel's observation suggests that the introduction of any new major media technology, associated with the rise of corresponding movements, is "aimed at using the new medium in the service of personal, artistic, political and community objectives" (p.161).

Castells (2007) observes a new round of power making in the network society. His assumption is based on the fact that "power holders have understood the need to enter the battle in the horizontal communication networks" (p.259), as he suggests:

This means surveilling the Internet as in the U.S., using manual control of email messages when robots cannot do the job, as in the latest developments in China, treating Internet users as pirates and cheaters, as in much of the legislation of the European Union, buying social networking web sites to tame their communities, owning the network infrastructure to differentiate access rights, and endless other means of policing and framing the newest form of communication space. (Castells, 2007, p.259)

Consequently, Castells (2007) indicates a double process of convergence: technological and political. In his view, the contours and effects of new media reality "will ultimately be decided through a series of political and business power struggles", where the owners of the telecommunication networks "are already positioning themselves to control access and traffic in

favour of their business partners, and preferred customers" (p.241). He also proposes that the interplay amongst business, political actors and grassroots activists will continue to exist.

Hutchins and Mikosza's (2010) article illustrates an interesting case study on the impact of Web 2.0 on the 2008 Beijing Olympic Games. By examining the restriction of athlete blogging and social networking, the literature reveals some policy contradictions. In advance of new media technology, the counter-mediatization, footage and discussion of Olympic events and experiences existing beyond the control of the official broadcasters were widely spread (Hutchins & Mikosza, 2010). Hutchins and Mikosza discuss the "market-based policy control mechanism" applied to "an open-access, participation-based publishing platform" (p.281). In practice, Olympic organizations and sports officials established guidelines to regulate the athletes' personal blogs, accredited "a market-based logic", which is also called "ambush marketing and broadcast media rights infringement", and a socio-political safeguard, to prevent athletes from posting unexpected scandals or political comments (Hutchins and Mikosza, 2010).

The organizational ways of controlling online interaction are also revealed in the literature in detail. Based on the International Olympic Committee (IOC) guidelines and regulations, media managers focused on prevention, by educating athletes and keeping an eye on any risk factors (Hutchins & Mikosza, 2010). The combination of prevention and identifying risk factors worked out in Beijing, in terms of limiting open-ended dialogue in online spaces; the measures protected the brands, images and reputations of sports and sportspeople (Hutchins & Mikosza, 2010). As a result, the authors argue that these measures become "a potential part of the Olympic media sport content economy" (p.291). The strategic policies at international and national levels (the IOC and National Olympic Committees), and the media management techniques at the team and individual athletes' levels together, leverage "the radical mediatization of Olympic sport", thus "limiting the impact of networked digital communications to an evolutionary, not revolutionary effect" (p.292). In this sense, it is evident that the new platform can hardly be immune from traditional, hierarchical models of media technology.

Another angle of the controlling force is discussed in Lessig's Code Version 2.0 (2006). He takes one chapter to explore the "architecture of control" and concludes that "the nature of Internet is the product of its design", which is "to reveal who someone is, where they are, and what they are doing" (p. 38). As the product of the contrived design, the net could be pushed to change from unregulable space to "the perfectly regu-

lable space" (Lessig, 2006, p. 38). Interestingly, Lessig thinks that the changes "are not being architected by government", but "demanded by users and deployed by commerce" (p. 38).

Other literature has perceived Web 2.0 as a business model from an economic perspective (OECD, 2007; Harison and Barthel, 2009). OECD's (2007) report on Participative Web and User-Created Content indicates that commercial firms begin to play a very active role in "supporting, hosting, searching, aggregating, filtering and diffusing" the User-Created Content (UCC) online. This is evident because "an increased number of established media and Internet businesses have acquired UCC platforms for commercial purposes" (OECD, 2007).

Turning the initially non-commercial platform into a business tool, the OECD's report points out the benefits UCC bring to business, and when the Web 2.0 applications expand, new use of participative web technologies that meet the market's need will be developed (OECD, 2007). This could be a positive advantage for both the business industry and the development of future technology.

There are also other angles of analyzing the forces positioned to the new media technology. For example, Napoli (2008) examines the forces of "massification" when exploring the relationship between old and new media, indicating that any new medium could be constrained by "a set of stable and influential social and institutional forces" (Napoli, 2008, p. 33).

In the book *The Wealth of Networks*, Benkler (2006) puts forward the "networked information economy" but thinks that the "networked public sphere" cannot be controlled by mass media owners. His main argument is that many clusters online are based on mutual interest, not on capital investment, thus, "it is more difficult to buy attention on the Internet than it is in the mass media outlets, and harder still to use money to squelch an opposing view" (Benkler, 2006, p. 11).

To sum up, the literature has revealed that some political and economic forces have positioned the initially "innocent" Web 2.0 platform. However, to some extent, this can be counter argued by the fact that it is hard for any power to manipulate the interactive platform.

WHICH WAY IS THE FUTURE: LIMITATIONS AND FUTURE RESEARCH

Researches of the new media platform of Web 2.0 have yet to keep up with the rapid developments in the new technology (OECD, 2007; Castells, 2007; Harison & Barthel, 2009). It is too soon to make any

confident predictions about any likely developments in the future.

However, some inherent features of certain media technologies are valuable to investigate in order to have a coherent understanding of the future. Legislative approaches and censorship issues at national and global levels require further exploration and analysis.

Practical questions related to the internet governance for a nation, such as “Do you really think we need a government agency regulating software code?” “How can you argue for an architecture of cyberspace that disables the government’s ability to do good?”, put forward by Lawrence Lessig are also expected to be answered in the near future. The complex relationship between different interest groups emerged in the Web 2.0 platform will also be an interesting area to explore.

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