

Chapter 2

Exploring the Impact of Web 2.0 on Knowledge Management

Thomas Bebensee
Google Ireland Ltd., Ireland

Remko Helms
Utrecht University, The Netherlands

Marco Spruit
Utrecht University, The Netherlands

ABSTRACT

Web 2.0 and Knowledge Management (KM) have a considerable overlap. It appears promising to apply Web 2.0 applications for supporting and improving sharing and creation of knowledge. Yet, little research examining the impact of Web 2.0 on KM has been conducted. This chapter presents research examining the suitability and impact of Web 2.0 applications on KM in organizations. Two extensive exploratory case studies were conducted involving 11 interviews with key personnel of two student-run organizations. It is demonstrated how Web 2.0 applications can be used for a number of KM practices mostly related to the areas of asset management and knowledge creation and innovation. Moreover, they suggest that among all the Web 2.0 principles, User-Generated Content and Unbounded Collaboration exert the biggest influence on creating and sharing of knowledge within organizations. The study contributes to the general understanding of how Web 2.0 and KM practices can be interlinked with each other.

INTRODUCTION

Today, an increasing amount of organizations recognize the importance of their workforces' knowledge as assets leveraging competitive advantage (Drucker, 1999). This development gave rise to the emergence of Knowledge Management (KM). The KM discipline describes how knowledge-intensive organizations can develop

a strategy and design an approach to manage the creation, sharing and application of knowledge in order to perform better and reach their overall strategic goals (Dalkir, 2005).

After the dot-com crash in 2001, a new trend emerged on the Web that is often referred to as "Web 2.0" (O'Reilly, 2007). Although the name suggests a new release in a technical sense it is rather a new approach of how users and devel-

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opers face the Web. The key idea of Web 2.0 is putting the user at the center. It enables people to participate, collaborate and interact with each other. Web 2.0 has become a mass phenomenon. The social-networking site Facebook counts more than 400 million active users (Facebook, 2010), exceeding the population of USA, and the collaborative encyclopedia Wikipedia contains more than 15 million articles (Wikipedia, 2010) created by a collective of internet users.

As Web 2.0 applications have brought about significant change to how we use the Internet nowadays, companies have begun adopting Web 2.0 applications such as wikis and social networking for leveraging and improving their core processes often referred to as “Enterprise 2.0” (Chui, Miller, & Roberts, 2009). McAfee states “Enterprise 2.0 tools have the potential to usher in a new era” (McAfee, 2006). As more than half of the 2,800 executives surveyed 2007 by McKinsey indicate that they are satisfied with their companies’ return on investment in Web 2.0 technologies, adopting Web 2.0 applications also seems to be interesting from an economic point of view.

One of KM’s key aspects is also concerned with fostering interaction and collaboration, commonly referred to as “Socialization” (Nonaka, 1994). According to Levy (2009) KM and Web 2.0 are considerably close to each other. Therefore, it seems interesting to apply Web 2.0 principles to KM. Could this potentially lead to a new era of KM, a “Knowledge Management 2.0” that changes our understanding of it in a similar way as Web 2.0 changed our understanding of the Web?

A literature research revealed a number of publications describing the implications of Web 2.0 on KM (cf. Hustad & Teigland, 2008; Levy, 2009). However, none of them has systematically studied the impact of Web 2.0 applications on KM. This is where this research joins in. By conducting two extensive exploratory case studies in organizations that use Web 2.0 applications for KM, we would like to shed light on the following research question:

How can organizations use Web 2.0 applications for managing knowledge and which impact can they have on organizational KM?

The research contributes to the general understanding of how Web 2.0 applications can be used to support or enable KM. The results are captured in a framework of Web 2.0 applications, the KM 2.0 Spectrum, and an impact model, the KM 2.0 Impact Model. The KM 2.0 Spectrum can be used as an orientation by organizations that are interested in bolstering up their KM practices by adopting Web 2.0 applications. It provides an overview of the KM aspects that may benefit from Web 2.0 applications. They are provided with suggestions and insights into which Web 2.0 applications can be used for KM. From a scientific point of view, the research contributes to the general understanding of Web 2.0 by proposing a model that relates different aspects of Web 2.0 with each.

BACKGROUND

This section introduces the main concepts related to the research question: KM and Web 2.0. Furthermore, related literature on Web 2.0 in the context of KM is summarized and discussed. Finally, we introduce some literature concerning the impact of technology on organizations that we use as a basis for the impact model that will be introduced later on.

KNOWLEDGE MANAGEMENT

In today’s economy increasingly more companies base their competitive advantage on what they know, how efficiently they use what they know and how quickly new knowledge can be acquired and used (Davenport & Prusak, 1998). These developments have led to emergence of the KM discipline that can be defined as follows:

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