Contents lists available at ScienceDirect

Journal of Operations Management

journal homepage: www.elsevier.com/locate/jom

The impact of firms' social media initiatives on operational efficiency and innovativeness

Hugo K.S. Lam^a, Andy C.L. Yeung^{b,*}, T.C. Edwin Cheng^b

^a Management School, University of Liverpool, UK

^b Department of Logistics and Maritime Studies, The Hong Kong Polytechnic University, Hong Kong

ARTICLE INFO

Article history: Received 12 November 2015 Received in revised form 24 May 2016 Accepted 1 June 2016 Available online 15 July 2016 Accepted by: Daniel R Guide

Keywords: Social media Operational efficiency Innovativeness

ABSTRACT

Social media have been increasingly adopted for organizational purposes but their operational implications are not well understood. Firms' social media initiatives might facilitate information flow and knowledge sharing within and across organizations, strengthening firm-customer interaction, and improving internal and external collaboration. In this research we empirically examine the impact of social media initiatives on firms' operational efficiency and innovativeness. Taking the resource-based view of firms' information capability, we consider firms' social media initiatives as strategic resources for operational improvement. We posit that firms' social media initiatives enhance dynamic knowledgesharing routines through an information-rich social network, leading to both operational efficiency and innovativeness. Collecting secondary data in a longitudinal setting from multiple sources, we construct dynamic panel data (DPD) models. Based on system generalized method of moments (GMM) estimation, we show that firms' social media initiatives improve operational efficiency and innovativeness. We identify the importance of an information-rich social network to the creation of knowledge-based advantage through firms' social media initiatives, and discuss the theoretical and managerial implications from the perspective of operations management.

© 2016 Elsevier B.V. All rights reserved.

1. Introduction

Marching beyond personal or individual usage, social media have been increasingly adopted for organizational purposes such as operations and innovation management (Kiron et al., 2012). For instance, Starbucks has launched a social media platform called My Starbucks Idea to enable customers to participate in developing new drinks and flavors (Gallaugher and Ransbotham, 2010), and Caterpillar has adopted the Spredfast social media platform to facilitate coordination and collaboration across its internal departments and extended dealer network (PR Newswire, 2012). Recently, Kane et al. (2014) reported that 87% of maturing companies used social media to spur innovation while 60% integrated social media into their operations.

In fact, making strategic use of social media is at the top of many firms' agenda. Firms are now considering social media as an approach to amplify the word of mouth of their products, a channel

* Corresponding author.

to keep customers in contact, and a chance for direct sales and marketing (Gamboa and Gonçalves, 2014). While the importance of listening to customers has been well recognized, especially under the quality management principle, the rapid-developing social media technologies empower customers, strengthen firmcustomer connection, and provide opportunities for operational improvement. For example, it was reported that large banks such as the Bank of America actively turned "online rants into compliments" and used social media to "reach out to clients or employees to head off problems" (Epstein, 2011, p. P9). Tapping text analytic methods to search for customer feedback, social media technologies enabled Wendy's to "report on customer experiences down to the store level within minutes" (Henschen, 2010). Social media have also changed the way in which individuals contact and learn about firms' offerings (Rishika et al., 2013). A firm's capability in facilitating information flow quickly through customer feedback and interaction is increasingly critical for business success.

Social media provide a platform for experience sharing, knowledge accumulation, and organizational learning (Nguyen et al., 2015). Corporate discussion forums (CDS) of organizations enable firms to gather a particular group of customers and other





Operations Management

E-mail addresses: hugolam@liverpool.ac.uk (H.K.S. Lam), andy.yeung@polyu.edu.hk (A.C.L. Yeung), edwin.cheng@polyu.edu.hk (T.C.E. Cheng).

stakeholders with diverse backgrounds to discuss organizationspecific issues, work collaboratively, and create new ideas. The term "open innovation" refers to a system whereby innovation is not primarily undertaken by a specific research unit, but rather is developed publicly (Martini et al., 2014). By allowing ideas to generate dynamically through social networks and clusters, firms enjoy collective inventions characterized by fast knowledge accumulation and rapid product development rates.

Social media also enhance knowledge sharing within organizations through social networking of internal staff members (Cao et al., 2015). Internal social media platforms enhance effective organizational communication by providing employees across geographical locations with a forum for posting job updates, asking questions, and sharing best practices. Intra-organizational communication facilitates information exchange and knowledge assimilation, improving cross-functional coordination and management. For example, GE relied on Colab, its internal social media platform, to connect its 60,000 knowledge workers worldwide, enabling them to get "together to solve problems and share best practices" (Goulart, 2012, p. 14). Facilitating information flow across organizations, social media also allows business partners to have unprecedented access to vast volumes of external knowledge sources, improving business intelligence across organizations and supply chain networks.

Although anecdotal evidence suggests that firms can benefit from their social media efforts in terms of operational efficiency and innovativeness improvement (Cecere, 2010; Kane et al., 2014), some practitioners worry about the potential drawbacks of adopting social media in organizations. For instance, too much social interaction on social media may disrupt work and distract employees from work-related communication, resulting in lower productivity (Leonardi et al., 2013); outflow of firms' information and knowledge to external social networks via social media may lead to leakage of confidential information and trade secrets, hurting firms' intellectual property and innovativeness (Molok et al., 2010). On the other hand, while the emerging social media phenomenon has attracted much research attention in recent years (Aral et al., 2013; Fader and Winer, 2012), little empirical evidence is documented in the literature about the impact of firms' social media initiatives on operational efficiency and innovativeness. Our research fills this research gap.

We argue that social media facilitate firms' information flow and knowledge sharing across internal and external social networks, which enhance internal and external collaboration, and allow firms to be more customer-oriented, contributing to operational efficiency and innovativeness improvement. By strategically enhancing information flow and knowledge acquisition, firms are likely to improve their capability in new product/service development and idea generation, leading to enhancement in both efficiency and creativity (Li et al., 2014). To test our hypotheses, we collected longitudinal performance data from 2006 to 2012 and examined firms' social media initiatives in 281 organizations between 2006 and 2011 (Section 3 provides the details). Using system generalized method of moments (GMM) estimation to analyze the data, we show that social media initiatives improve firms' operational efficiency and innovativeness.

2. Theoretical background and hypothesis development

2.1. Social media initiatives

Social media are "a group of Internet-based applications that build on the ideological and technological foundations of Web 2.0, and that allow the creation and exchange of User Generated Content" (Kaplan and Haenlein, 2010, p. 61). With a view to capitalizing on the content generated by their stakeholders (particularly existing and potential customers), firms increasingly adopt social media for various organizational purposes such as marketing, operations, and innovation management (Kiron et al., 2012), which we refer to as social media initiatives in this research. With reference to prior studies (e.g., Kiron et al., 2013; Kane et al., 2014), we classify firms' social media initiatives into six categories based on their different business objectives as follows: 1) Employee collaboration and internal communication, 2) Inter-firm cooperation and supply chain management, 3) New product development and idea generation, 4) Public relations and corporate social responsibility, 5) Customer service and customer relationship management, and 6) Sales and marketing. Table 1 lists some examples in each category extracted from our sample.

Although researchers have been paying increasing attention to the emerging social media phenomenon in recent years, the existing research focuses on studying the effects of social media users' actions (Aral et al., 2013), rather than the outcomes of firms' strategic use of social media (i.e., social media initiatives). For instance, Forman et al. (2008) investigated the impact of consumergenerated product reviews in an online community on firms' product sale. Luo et al. (2013) studied the ability of consumers' online ratings and blog posts to predict firms' equity value. Even though some researchers have begun to examine firms' social media initiatives directly (Gu and Ye, 2014; Rishika et al., 2013; Wu, 2013), they focus on the consequences of firms' social media initiatives at the individual user level, rather than their impacts at the firm level. For instance, Wu (2013) analyzed how a firm's adoption of social networking tool affects the work performance and job security of individual employees. Gu and Ye (2014) examined how a firm's responses to customer comments on social media affect the satisfaction of individual customers. Our research is an initial attempt to investigate the impact of social media initiatives at the firm level.

2.2. Social media initiatives, information capability and competitive advantage

In a rapid-changing and fast-moving business environment, the traditional static approach of knowledge-warehouse deployment has undergone a paradigm shift towards a dynamic capability in capturing knowledge through high-velocity, high-volume information flow (Kankanhalli et al., 2005). Organizations that are able to make use of external and internal information movements and big data are likely to have knowledge-based advantage over their competitors. Social media, which empower multi-way communication between organizations and their stakeholders in an efficient and cost-effective manner (Chua and Banerjee, 2013), is considered as a strategic approach to foster knowledge exchange among individuals and organizations, advancing organizational learning and knowledge management, thus yielding a competitive edge (Thomas and Akdere, 2013).

More generally, the impact of social media initiatives on firm performance can be understood through the resource-based view (RBV) of a firm's information capability. RBV suggests that firms are able to create competitive advantage through a complex, bundled set of resources that are rare, valuable, inimitable, and nonsubstitutable (Barney, 1991; Hitt et al., 2016b). Hitt et al. (2016b) argued that RBV has become more important for OM research as OM researchers are increasingly focused on a collective of organizational routines within and across firms that reinforce each other to create competitive advantage. Although information technology by itself rarely contributes directly to a firm's sustained competitive advantage, it forms part of the firm's operationally complex routines and capabilities (Wade and Hulland, 2004). Barney's (1991) Download English Version:

https://daneshyari.com/en/article/5111677

Download Persian Version:

https://daneshyari.com/article/5111677

Daneshyari.com