Contents lists available at ScienceDirect





Journal of Business Research

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

Unabsorbed slack resource deployment and exploratory and exploitative innovation: How much does CEO expertise matter?



Pooya Tabesh^a, Dusya Vera^{b,*}, Robert T. Keller^b

^a Cameron School of Business, University of St. Thomas-Houston, 3800 Montrose Blvd, Houston, TX 77006, United States of America ^b C. T. Bauer College of Business, University of Houston, 334 Melcher Hall, Houston, TX 77204, United States of America

ARTICLE INFO	A B S T R A C T
Keywords: Unabsorbed slack Exploration Exploitation R&D Innovation CEO expertise	Unabsorbed slack resources are critical for organizational innovativeness and success but research regarding the relationship between unabsorbed slack and firm outcomes has resulted in mixed findings. We build on upper echelons theory to shed light on the mostly overlooked role of decision makers in slack resource deployment. We investigate how the CEO's expertise influences slack resource deployment in computer software firms' exploratory and exploitative activities. Using panel data, our findings show that unabsorbed slack is associated with an increased share of exploration and a decreased share of exploitation in firm's activities. These relationships are weakened in firms led by CEOs with longer firm tenure or wider functional background breadth. In the case of CEOs with technical education, the negative relationship between slack and exploration becomes positive, while the link between slack and exploration becomes negative. Additionally, our post-hoc analysis

reveals a more precise non-linear account of the main effect relationships.

1. Introduction

Unabsorbed slack (UAS) resources are readily-available uncommitted resources, such as cash flows or liquidities, that can be easily recovered or assimilated into technical activities of the firm (Bourgeois, 1981; Singh, 1986). Firms with the luxury of slack resources at hand are believed to be better off in pursuing their strategies (Chen, Yang, and Lin, 2013). The effects of available slack resources on different firmlevel outcomes such as financial performance (e.g., Tan & Peng, 2003), social performance (e.g., Shahzad, Mousa, & Sharfman, 2016), innovation (e.g., Marlin & Geiger, 2015), and growth (e.g., Mishina, Pollock, & Porac, 2004) have been investigated. The findings, however, have not been consistent, and little consensus has emerged regarding the way firms utilize slack resources (Natividad, 2013; Marlin & Geiger, 2015). Although a relatively large body of literature on this question exists, two theoretical problems have hindered progress towards a cumulative understanding of these resources.

First, the mixed findings are rooted in part in the varied impact of UAS resources. In line with the classic debates over benefits and costs of slack (e.g., Cyert & March, 1963), empirical research on outcomes of UAS has been equivocal, and researchers have reported positive, negative, and curvilinear effects for the relationships between UAS and firm-level outcomes such as firm performance and innovation (e.g., Vanacker, Collewaert, & Zahra, 2017).

Second, while most of the research focuses on the direct relationships between UAS and its outcomes, boundary conditions of how and when UAS influences outcomes are still unclear (Daniel, Lohrke, Fornaciari, and Turner Jr, 2004; Marlin & Geiger, 2015). Recently, a handful of environmental (e.g., dynamism, threat, complexity, and regulations) and organizational (e.g., firm size, age, and recent performance) characteristics have been addressed as moderators to explicate the relationship between UAS and its outcomes (e.g., Voss, Sirdeshmukh, & Voss, 2008; Deb, David, & O'Brien, 2017; Vanacker et al., 2017). The main assertion in these studies is that depending on the context, UAS might have positive or negative influences on outcomes.

We analyze these problems in this article. Our main purpose is to build on Upper Echelons theory (Hambrick & Mason, 1984), which views the organization as a "reflection of its top managers," and to examine the role of the CEO-the most powerful decision maker in the firm-in the process through which UAS resources impact firms' exploratory and exploitative activities. CEOs and top management teams (TMTs) orchestrate deployment of resources, including slack, to shape firms' strategic orientations (Carpenter, Sanders, & Gregersen, 2001; George, 2005). Unfortunately, characteristics of major organizational decision makers have rarely been studied in slack research.

Using panel data from firms in the computer software industry, our study departs from and advances prior research on the boundary

* Corresponding author.

https://doi.org/10.1016/j.jbusres.2018.08.023

Received 29 May 2017; Received in revised form 19 August 2018; Accepted 20 August 2018 0148-2963/ © 2018 Elsevier Inc. All rights reserved.

E-mail addresses: tabeshp@stthom.edu (P. Tabesh), dvera@uh.edu (D. Vera), keller@uh.edu (R.T. Keller).

conditions of slack deployment by highlighting the impact of CEO expertise–specifically firm tenure, functional background type, functional background breadth, and technical educational background–in UAS resource utilization towards exploration and exploitation. Exploration is comprised of activities such as variation, risk taking, and experimentation, while exploitation is related to selection, refinement, and efficiency-enhancing initiatives (March, 1991), with top managers deciding investments in these processes.

This study contributes to the strategic management literature in three important ways. First, this research is among the first that builds on upper echelons theory to explicitly investigate the impact of decision maker characteristics on UAS resource deployment, and to position CEO expertise as a key contingency factor that shapes firms' allocation of excess resources. Second, we perform a series of exploratory post-hoc analyses that reveal a more precise, non-linear account of the relationships among UAS, exploration and exploitation that inform debates about the mixed-findings in the literature. Third, our results provide additional explanations for the impact of human capital resources (e.g., CEO expertise) on exploratory and exploitative efforts (see Lavie, Stettner, & Tushman, 2010). Implications for CEO selection, development, and succession, and future research directions are discussed.

2. Research background

2.1. Slack resources

Different types of slack resources exist (Bromiley, 1991; Cheng & Kesner, 1997). Unabsorbed Slack resources are readily-available uncommitted resources, such as cash flows or liquidities, that can be easily recovered or assimilated into technical activities of the firm (Bourgeois & Singh, 1983). Absorbed (recoverable) slack resources are less accessible resources that have already been absorbed as costs into operations (e.g., excess overhead costs), but can be recovered in the time of adversity (Bourgeois & Singh, 1983). Finally, potential slack refers to the ability of firms to secure potential future resources (e.g., debt financing) in the external environment (Bourgeois, 1981). Various types of slack resources have different characteristics and affect outcomes differently (e.g., Tan & Peng, 2003). In this study we maintain focus on UAS resources that are liquid in nature and provide the highest level of flexibility for managers to redeploy them in different activities in a discretionary manner (Finkelstein & Hambrick, 1996; Lee, 2015). We also acknowledge that UAS resources can be short-term in nature and can be immediately (e.g., within a year) consumed in organizational activities (e.g., Nohria & Gulati, 1996). The project that receives the investment, however, may be a long- or short-term project.

According to the behavioral theory of the firm, availability of UAS resources can promote innovative efforts by relaxing internal controls, reducing conflicts, and fostering a culture of experimentation (Bourgeois, 1981). Researchers, however, have also reported instances in which UAS resources, specifically in excessive amounts, can deteriorate the outcomes of innovative activities because of "diminishing discipline in selection, ongoing support, and termination of innovative projects" (Nohria & Gulati, 1996, p. 1249). Although behavioral theorists tend to expect the UAS' benefits to overweigh the costs (Tan & Peng, 2003; Marlin & Geiger, 2015), empirical evidence has been mixed and researchers have reported positive, negative, or curvilinear effects for the relationship between UAS and innovativeness (e.g., Nohria & Gulati, 1996; Kim & Bettis, 2014).

Most of these studies have focused on overall innovation. UAS resources, however, might have different implications for different aspects of organizational innovative activities (Greve, 2007). In order to generate a nuanced view of the relationships among UAS managerial characteristics and different innovative activities, we differentiate the effects of UAS in relation to firms' exploratory and exploitative efforts in the context of the computer software industry.

2.2. Exploration and exploitation

Firms search locally to solve their problems through recombination of preexisting knowledge in exploitative activities. Conversely, exploratory activities are associated with distant search in unfamiliar domains by moving away from existing knowledge bases to address emerging needs of customers (Benner & Tushman, 2002). In technological innovation exploration involves the creation of radically new knowledge, whereas exploitation involves the incremental development of existing technologies (Levinthal & March, 1981; Benner & Tushman, 2003).

Some scholars view exploration and exploitation as independent activities and orthogonal constructs (e.g., He & Wong, 2004). Others recognize that because of resource constraints, exploration and exploitation are not independent, and there is a trade-off between them as they compete for limited resources (March, 1991; Benner & Tushman, 2003). Birkinshaw and Gupta (2013: p. 294) propose that, even when conceptualizing exploration and exploitation as orthogonal, it "seems unlikely that a firm can deliver the highest level of achievement on both dimensions simultaneously," and suggest that managers make decisions of where to position their firms in terms of exploration and exploitation. In our study, we build on the view of exploration and exploitation as extremes of a continuum, which is most explicit about the inherent trade-offs between these processes (Levinthal & March, 1993; Le, Park, & Kroll, 2014).

That exploration and exploitation exist on a continuum does not preclude their coexistence at certain levels. That is, a manager can choose to evenly distribute resources in a pool towards exploration and exploitation, or can decide to allocate them in different proportions. In sum, because of resource limitations, increasing support for exploratory efforts tends to decrease the organizational capability to invest in exploitative efforts and vice versa.

3. Theory

A firm's tendency to exploit or explore is affected by multiple environmental, organizational, and managerial factors (Marín-Idárraga, Hurtado González, & Cabello Medina, 2016). In this regard, characteristics of the industry (e.g., dynamism, institutional pressures), the firm (e.g., resource availability), and the decision makers (e.g., risk attitudes, preferences) influence the firm's focus on exploration versus exploitation (Lavie et al., 2010). Within the dynamic context of computer software industry, we first examine the role of UAS as an organizational antecedent of exploration and exploitation. Then, we build on upper echelon's theory to discuss the moderating effects of various aspects of CEO expertise on the link between UAS and exploitation.

3.1. Main effect hypothesis

In pursuing highly exploratory strategies, managers need to make significant investments in searching for new horizons and developing unfamiliar products and technologies. Investment in such activities is inherently risky because of the uncertainties associated with their future outcomes (Greve, 2003). In the presence of high levels of UAS, it is more likely for managers to invest in risky projects that would have not been considered feasible in times of scarcity (Cyert & March, 1963). Abundance of UAS relaxes the structural and mental constraints for

Download English Version:

https://daneshyari.com/en/article/11020426

Download Persian Version:

https://daneshyari.com/article/11020426

Daneshyari.com