## ARTICLE IN PRESS

#### Research Policy xxx (xxxx) xxx-xxx



Contents lists available at ScienceDirect

### **Research Policy**



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

# Towards evidence-based management of external resources: Developing design propositions and future research avenues through research synthesis

Kari Tanskanen<sup>a,\*</sup>, Tuomas Ahola<sup>b</sup>, Anna Aminoff<sup>c</sup>, Johanna Bragge<sup>d</sup>, Riikka Kaipia<sup>e</sup>, Katri Kauppi<sup>d</sup>

<sup>a</sup> Aalto University School of Science, Department of Industrial Engineering and Management, PB 15500, 00076 Aalto, Espoo, Finland

<sup>b</sup> Tampere University of Technology, Department of Industrial Management, PB 541, 33010 Tampere, Finland

<sup>c</sup> VTT Technical Research Centre of Finland, PB 1000, 02044 VTT, Espoo, Finland

<sup>d</sup> Aalto University School of Business, Department of Information and Service Economy, PB 21210, 00076 Aalto, Helsinki, Finland

<sup>e</sup> Chalmers University of Technology, Department of Technology Management and Economics, 412 96 Gothenburg, Sweden

#### ARTICLE INFO

Keywords: Evidence-based management Interdisciplinarity Research synthesis Alliances Supply chains

#### ABSTRACT

The general question of how best to access and leverage resources that reside outside the boundaries of the focal firm has become increasingly important for companies during the last decennia, and scholars across management disciplines have responded with increasing research efforts. However, managers still seldom base their decisions on scientific evidence. Research on managing external resources is carried out in disciplinary silos and it is extremely difficult for managers to make sense of the vast amount of scientific studies. The success story of medicine as the first domain to widely adopt evidence-based practices has been an exemplar for other disciplines such as management to address the prevailing research-practice gap. Through a systematic review and synthesis of 601 articles in six academic journals representing three management disciplines we develop design propositions for supporting evidence-based management of external resources in firms. Our analysis reveals external resource management (ERM) research to be concentrated on six distinct, yet interrelated, themes. We adopt the CIMO-logic (Context, Intervention, Mechanism, Outcomes) for developing the set of design propositions within each of the research themes. A key scientific contribution is our identification of future research opportunities and directions to advance science in the field of ERM.

#### 1. Introduction

Management of resources beyond firm boundaries is advanced as a key issue for firm competitiveness (Dyer and Singh, 1998; Gulati, 2007; Pfeffer and Salancik, 1978). External (network) resources encompass "resources that accrue to a firm from its ties with key external constituents including – but not limited to – partners, suppliers, and customers, and thus exist outside a firm's boundaries" (Gulati, 2007, p. 3). Managing the external resources has become a major task for firms, including selection of the right combinations of internal and external resources for capturing business opportunities, finding the best available external resources, effectively utilizing the external resources, and influencing the decisions and resource allocation of business partners. The share, relative importance, complexity and opportunities of external resources for firms have been multiplied during the latest decades (Axelsson et al., 2005; Monczka, 2010; Van Weele, 2010). As a consequence, one of the key challenges of extant management is the

imbalance between the relative importance of external resources and the traditional organizational capabilities to manage those external resources. Researchers from various disciplines have responded with growing interest to the broad question of how to best leverage resources that reside outside the boundaries of the focal firm. In management research, interest has been exhibited by three disciplines in particular. Marketing and operations/supply chain management (OM/SCM) represent boundary spanning functions of the organization, while strategic management takes an overarching view of the field. Research in these management disciplines has been carried out under different labels, however. Marketing scholars' extensive study of the leverage of external resources has been conducted under the relationship marketing discourse (e.g., Spekman and Carraway, 2006). Closely related issues have been studied in strategic management under alliance management (e.g., Schreiner et al., 2009; Sluyts et al., 2011) and strategic networks (e.g., Gulati et al., 2000) discourses, and in OM/SCM within the headings of supply chain and buyer-supplier relationship

\* Corresponding author.

http://dx.doi.org/10.1016/j.respol.2017.04.002

Received 8 June 2016; Received in revised form 28 March 2017; Accepted 3 April 2017

0048-7333/ © 2017 The Author(s). Published by Elsevier B.V. This is an open access article under the CC BY license (http://creativecommons.org/licenses/BY/4.0/).

E-mail addresses: kari.tanskanen@aalto.fi (K. Tanskanen), tuomas.ahola@tut.fi (T. Ahola), anna.aminoff@vtt.fi (A. Aminoff), johanna.bragge@aalto.fi (J. Bragge), riikka.kaipia@aalto.fi (R. Kaipia), katri.kauppi@aalto.fi (K. Kauppi).

management (e.g., Braunscheidel and Suresh, 2009; Paulraj and Chen, 2007).

In spite of the huge amount of research on organizations and management, managers seldom base their decisions on scientific evidence. Instead, they most commonly make decisions based on weak evidence such as their personal preference, unsystematic experience, and advice from business books or consultants. (Pfeffer and Sutton, 2006; Rousseau, 2006; van Aken and Romme, 2009). The success story of medicine as the first domain to widely adopt scientific evidencebased practices has been an exemplar for other disciplines such as management (Briner et al., 2009; Denyer et al., 2009; Rousseau, 2006). Although evidence-based management (EBM) is not a new idea, it is becoming increasingly popular in management research as a way to close the prevailing "research-practice gap" (van Aken and Romme, 2009; Rousseau, 2006).

Properly conducted systematic reviews enable practitioners to use research evidence to inform their decisions, thus depicting a cornerstone of evidence-based management (Briner et al., 2009; Tranfield et al., 2003). Naturally, the lack of using research evidence in management decisions may stem from several factors, such as managers' urge to keep their personal freedom to run their organization, the diverse background and education of managers, long time lags and little feedback involved in managerial decisions. Yet the key barrier is that managers commonly are unaware of scientific evidence, since very few managers read academic literature. In addition, as academic literature is primarily targeted for a scientific audience, it is both difficult to locate and comprehend for many practitioners (Rousseau, 2006). Evidence-based management draws on multiple types of evidence such as monitoring data, surveys, and financial information, but a proper summary of explicit research-based knowledge is a valuable supplement for making evidence-informed decisions (Briner et al., 2009).

Design-oriented research synthesis, aiming at developing design propositions, produces relevant input to evidence-based management (van Aken and Romme, 2009). Meta-analysis is the preferred approach to synthesis in many disciplines, but it is problematic in management given variations in study designs. Thus, suitable and comparable quantitative data is seldom available (Denyer et al., 2008). In management research, literature reviews commonly follow a narrative approach, which enables addressing a wide range of research questions with the aim of mapping the existing intellectual territory. Narrative synthesis typically identifies gaps in the existing literature and results in specifying research questions for filling the voids in the body of knowledge (Denyer et al., 2008; Tranfield et al., 2003). Design-oriented research synthesis, in turn, builds particularly on a realist approach, with the goal of informing practice about how interventions (I) work in different contexts (C), and increasing understanding of the generative mechanism (M) through which certain outcomes (O) emerge. This outline is coined as the CIMO-logic. Apart from meta-analyses that combine quantitative data from several studies and analyse the data using statistical methods, the design-oriented approach regards studies as cases and relies on qualitative methods for synthesizing their results. (Denyer et al., 2008).

We adopt the design-oriented approach for synthesizing results from 601 studies about managing external resources in three management disciplines. Our purpose is to advance evidence-based management (EBM) of external resources and to identify new avenues for advancing future research in the field.<sup>1</sup> Towards this end, we first establish how past research of managing external resources in the three management disciplines informs EBM, and second, we analyse the knowledge-trade and disciplinary integration of ERM studies across the three management disciplines in order to identify gaps in research. We carry out both

qualitative and quantitative analyses of the systematically selected articles from six journals in strategic management, marketing, and OM/ SCM on the topic of managing external resources. First, we synthesize the results of the sample articles by adopting the CIMO-logic, developing understanding of the relationship between problem in context, management of interventions, and the generative mechanisms through which they produce the intended outcomes. Through this analysis, we aim to develop design propositions to be used in evidence-based management, and moreover, to infer areas where research is still needed.

Second, we carry out two quantitative analyses to strengthen our research evidence: a cross-citation analysis and computational content analysis based on text-mining techniques. The aim of the quantitative analyses is to complement the qualitative analysis in an effort to identify opportunities for joint theory development in the field of external resource management across management disciplines through knowledge trade and disciplinary integration. This is important for advancing research in the field, since knowledge trade across domains, and more temporary subdomains or "research fronts," feeds scientific growth (Pratt et al., 2012; Shafique, 2013) and helps to elevate the level of a scientific field's paradigm development (Pfeffer, 1993). Interdisciplinarity is also important for advancing evidence-based management, since the problems managers in firms face often cannot be classified to a single discipline, and need to be approached from multiple perspectives (Linderman and Chandrasekaran, 2010).

Previous studies of scholarly exchange propose that the limited knowledge trade observed between management disciplines exerts a dampening effect (Linderman and Chandrasekaran, 2010; Merchant et al., 2003; Sanders et al., 2013). Merchant et al. (2003) observe, for example, that researchers studying organizational incentive systems seem to lock quickly into a single research discipline and ignore developments and insights from others. This tendency, they aver, has significantly hindered research progress in accounting, and Sanders et al. (2013) maintain that the lack of cross-referencing between disciplines has slowed the accretion and build-up of supply chain management theory as well. Perhaps the most convincing evidence of the tendency to build disciplinary silos in management research is provided by Linderman and Chandrasekaran (2010), whose analysis of operations management, finance, management, and marketing journals found citing of articles outside one's discipline to be uncommon, with only 0.45% to 15.39% of citations in each discipline being from other disciplines. Previous studies show both the importance and lack of knowledge-trade between management disciplines, but they do not tell us much about how to proceed with disciplinary integration. Our qualitative content analysis acquires an overall view of the sample studies in order to assess whether the level of knowledge trade is associated with thematic proximity, and a complementary computational content analysis is conducted to objectively analyse similarities and differences in the concepts and terms utilized in the sample articles. In addition, we carry out a cross-citation analysis for studying quantitatively the knowledge trade between the three management disciplines.

Through the complementary analyses, we aim to answer the following research questions:

RQ1: How does the research in strategic management, marketing, and operations/supply chain management inform evidence-based management of external resources: what is known and what is not yet known?

RQ2: Do the three management disciplines effectively trade knowledge in the academic studies of external resource management (ERM)?

RQ3: What are the future research opportunities for further advancing evidence-based management in the field of ERM through research design and through disciplinary integration?

 $<sup>^1</sup>$  This study is a part of a strategic research initiative of the Finnish Funding Agency for Innovation (TEKES), the aim of which was to advance both research and practice in the field of external resource management.

Download English Version:

# https://daneshyari.com/en/article/5103947

Download Persian Version:

https://daneshyari.com/article/5103947

Daneshyari.com