



Acquihires by SMEs as a strategic response to industry digitalization

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ABSTRACT

As digital technologies pervade established industries, their constituent firms are likely to become technologically dependent upon industry outsiders due to increased mobility of strategic resources and porosity of inter-industry boundaries. We conceptually study this global phenomenon and argue that firms in established industries mitigate their cross-industry resource dependence arising from digitalization via corporate venturing. Unlike their larger counterparts, small and medium enterprises (SMEs) in established industries may pursue alternatives to traditional corporate venturing practices such as mergers, acquisitions, joint ventures, or corporate venture capital investments. Specifically, we propose that SMEs may use acquihiring as a response to mitigate their technological dependence on digital outsiders. This study conceptualizes the “who, what, when, where, why, and how” of acquihiring by SMEs in established industries. In doing so, it contributes to the literature on cross-industry M&A strategies for SMEs in the digital era, entrepreneurial exits, and novel modes of corporate venturing.

KEYWORDS

Industry digitalization; acquihires; small business M&A strategy; digital technology; entrepreneurial exits

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Introduction

The wide diffusion of digital technologies across industries and geographies has recently drawn attention from management and organization scholars (Menz et al., 2021). The affordances, convergence, and generativity of software and hardware technologies have been theorized as the driving force behind the creation of digital artifacts, infrastructure, and platforms (Nambisan, 2017). Scholars have examined not only the novel business opportunities created by digital ecosystems (Autio et al., 2018) but also the paradoxical choices faced by platform-dependent entrepreneurs (Cutolo & Kenney, 2021). As digital behemoths such as Amazon begin to rapidly enter long-standing industries, research has been initiated into the influence of digital technologies on firm and industry boundaries (Afuah, 2003) and novel forms of strategic resources for sustainable competitive advantage (Haskel & Westlake, 2017).

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However, extant research into the disruptive impact of digital technologies on innovation and growth in society (Si et al., 2022) and, more specifically, on

established global industries such as energy, food, insurance, manufacturing, or transport remains meager. The swift development of technologies such as artificial intelligence, blockchain, cybersecurity, quantum computing, and robotics is further widening the gap between digital-centric phenomena in business and academic understanding thereof. As an increasing share of the global economy is rapidly captured by digital platforms and ecosystems, there is an urgent need for scholarly investigation into their impact on firms in established industries (Nambisan et al., 2019). Small and medium enterprises (SMEs), in particular, are likely to face adverse effects as they become increasingly dependent on digital firms outside their industry for novel forms of strategic resources such as algorithms, data, secure communication networks, and enterprise software (Hartmann & Henkel, 2020). Yet, we have a limited understanding of the strategic actions undertaken by firms in established industries in response to digitalization (Tilson et al., 2010) which, arguably, increases the mobility of strategic resources and the porosity of inter-firm and inter-industry boundaries (Yoo et al., 2012).

Therefore, this paper conceptually explores the question: “How can firms – especially SMEs – in established industries strategically manage their growing reliance on digitalized industry outsiders?” The technological dependence of constituent firms in established industries is likely to spur them into strategic initiatives such as mergers and acquisitions (M&A), joint ventures (JV), or alliances, as suggested by resource dependence theory (Drees & Heugens, 2013; Pfeffer & Salancik, 1978). Such corporate venturing actions (Kuratko, 2017) are likely to cross industrial and geographic borders, as firms strive to mitigate their dependence on digital outsiders – often high-tech corporations – by acquiring strategic resources, particularly in the form of highly skilled human and intellectual capital.

After comparing different modes of corporate venturing in terms of the degree of coupling, execution speed, access to strategic resources, and investment risk, we highlight acquihiring as a suitable mode of corporate venturing for firms in established industries to acquire human talent with prowess in digital technologies (Polsky & Coyle, 2013). An acquihire is an inter-company transaction where “a company purchases a start-up in order to obtain desired talent, usually its founders and certain employees, and thereafter often kills the corporation or at least jettisons its products” (Nolan, 2015). Such acquisitions, centered on access to digital technologies and talent, are increasingly prevalent in established industries ranging from agriculture (Listcorp, 2022), consumer products (Globe Newswire, 2022), and energy management (SMS PLC, 2022) to professional services (Generational Equity, 2021), utility infrastructure (Geospace, 2021), and warehousing (Logistics Business, 2022).

In exploring acquihires, this study draws upon extant M&A literature (King et al., 2021) to argue against large, cross-industry acquisitions given the adverse effects of unrelated acquisitions due to misalignment of factors such

as managerial incentives, organizational culture, firm strategy, or technology (Graebner et al., 2017; Welch et al., 2020). This study also compares acquihiring, essentially the buying of teams (Sawicki, 2014), with corporate venture capital (CVC) investments into technology start-ups and traditional piecemeal hiring to illustrate the suitability of acquihiring as a strategic response to industry digitalization. 85

We propose that, as a strategy to mitigate technological dependence on industry outsiders, acquihiring may offer advantages to SMEs in established industries – in addition to the benefits often accrued by their larger counterparts via acquihires. Scholars have primarily investigated M&A activity by SMEs through the lens of innovation and performance within industries (for example, Arvanitis & Stucki, 2015; Cloudt et al., 2006; Lockett et al., 2011; Mawson & Brown, 2017), not digitalization across industries. Therefore, this study addresses the paucity of M&A research on small businesses affected by digital technologies by exploring pre-acquihiring and post-acquihiring phases to conceptualize the “who, what, when, where, why, and how” of this strategic action by SMEs. In doing so, we discuss what constitutes acquihiring success, as measured by retention of the acquihired teams, and how this can be maximized by SMEs in their endeavor to compete with digitalized outsiders. 90 95 100

This paper contributes to small business theory and practice in a number of ways. First, it contributes to the emerging literature on how digital technologies influence firm strategy in established industries (Bharadwaj et al., 2013; Danuso et al., 2022; Hanelt et al., 2021). Second, it invokes resource dependence theory (Drees & Heugens, 2013) to explain firms’ strategic reactions to digitalization and, thereby, contributes to the literature on corporate venturing as a strategic response to cross-industry resource dependence. Third, it contrasts SMEs in established industries with their larger counterparts (Nason et al., 2015) in the context of mitigating technological dependence via acquihires and, in doing so, provides novel insights into small business M&A strategy, particularly in long-standing industries under threat of disruption by digital outsiders. Fourth, the paper factors in the sellers’ perspective during acquihiring and, in doing so, contributes to the literature on entrepreneurial exits (DeTienne & Wennberg, 2015). Focusing on an important global phenomenon, specifically that of digitalization, we also provide actionable insights for small businesses seeking to survive and thrive in the dynamic digital ecosystem (Nambisan & Baron, 2019). Moreover, for top management teams at SMEs, we provide specific, pre-acquihiring and post-acquihiring factors that may influence acquihiring success. 105 110 115

Digital technologies and resource mobility

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Theorists have proposed that digital technologies are firstly generative in that they carry the “capacity to produce unprompted change driven by large,

varied, and uncoordinated audiences” (Zittrain, 2006: p. 1980). Secondly, these technologies provide affordances, defined as “an action potential, that is, to what an individual or organization with a particular purpose can do with a technology or information system” (Majchrzak & Markus, 2012: p. 3). Thirdly, they enable convergence across products, business models, and even industries (Yoo et al., 2012). Together, these characteristics enable the creation of digital artifacts, infrastructure, and platforms (Nambisan, 2017). While software technologies such as artificial intelligence (AI) and cloud computing have garnered more attention from researchers (Glikson & Woolley, 2020), equally important are the implications of hardware automation, networking infrastructure, and robotics (Brynjolfsson & McAfee, 2014; von Briel et al., 2018). To capture this ubiquitous adoption of digital technologies, scholars have defined *digitalization* as the “sociotechnical process of applying digitizing techniques to broader social and institutional contexts that render digital technologies infrastructural” (Tilson et al., 2010: p. 749). Thus, the scope of digitalization extends far beyond that of the information and communication technology (ICT) industry or even the broader “digital” industry that is the domain of high-tech behemoths such as Alphabet, Amazon, Apple, Meta, Microsoft, and Tesla.

Notably, digital technologies transform strategic resources from primarily tangible and immobile to primarily intangible and mobile (Haskel & Westlake, 2017). While digitalization does not necessarily imply virtual or software-only products, digital artifacts are fundamentally different from their analog counterparts in terms of editability, ephemerality, and expansibility (von Briel et al., 2018). They can be re-combined, re-purposed, and distributed in far more flexible and numerous ways than is possible in the physical world. Moreover, digital products can be mass customized, upgraded “over the air,” and designed to collect highly granular, real-time data that can then be algorithmically analyzed at scale (Nambisan, 2017).

Thus, the digitalization of established industries shifts economic value from traditional fixed assets such as property, plants, and equipment to data, algorithms, and digital products (Hartmann & Henkel, 2020). The inherent mobility of these digital resources poses conceptual threats to traditional views on sustainable competitive advantage, which assume that (a) strategic resources are perfectly immobile (Barney, 1991), (b) industry structure determines firm conduct and thereby performance (Bain, 1968), and (c) substantial entry barriers exist in established industries (Porter, 1980). First, the assumption of resource immobility may break down as the most valuable firm resources become primarily digital – consider Google’s search algorithm, LinkedIn’s database of professionals, or Facebook’s social media platform. Second, the industry structure itself is subject to disruption via digitalization and may no longer serve as a determinant of firm performance (Menz et al., 2021). Third, so-called entry barriers to established

industries may be dissolved by their digitalization, enabling “digital outsiders” to disrupt established industries. For example, Airbnb’s entry into the hotel industry, Tesla’s entry into the automotive industry, and Uber’s entry into the public transportation industry illustrate the fragility of traditional entry barriers in the digital era. Similarly, Amazon’s rapid entry into the retail and supply chain industries has been enabled by its cloud computing platform, automated supply chains, and digital presence (Lai et al., 2018). 170

Digital technologies and industry boundaries

In a world where digital technologies are pervasive, the increasing porosity of industry boundaries may accelerate the increasing mobility of resources. Digitalization enables the rapid exchange of data, knowledge, and processes across value chains and thus blurs the boundaries between firms and industries (Afuah, 2003; Yoo et al., 2012). Organizational and industrial boundaries of competence and power (Santos & Eisenhardt, 2005) are both likely to become porous due to digitalization. For example, the dominance of Apple’s and Google’s mobile phone platforms and application programming interfaces (Nambisan & Baron, 2019; Wulf & Blohm, 2020), and the associated paradoxes faced by platform-dependent entrepreneurs (Boudreau et al., 2021; Cutolo & Kenney, 2021), demonstrate how digitalization can enable firms to expand their boundaries of power. While these platforms have undoubtedly benefited independent entrepreneurs (Fan et al., 2021), the focal firms have captured most of the value created via digitalization. Similarly, Microsoft’s acquisition of the code repository GitHub (Rikap & Lundvall, 2020) illustrates how firms extend their boundaries of competence outside their industries, enabled by the innate mobility of strategic resources in the digital context (Dahlander & Magnusson, 2008). 175 180 185 190

As digital technologies become a key determinant of competitive advantage, the traditional fixed boundaries between firms and their suppliers, buyers, or competitors (Porter, 1980) are being replaced by more fluid and flexible modes of engagement with the digital ecosystem (Autio et al., 2018). Amazon, for example, sells third-party products alongside its own, thus acting as a channel partner as well as a competitor for its sellers (Zhu & Liu, 2018). Furthermore, Amazon’s partners can access its highly automated warehouses (Lai et al., 2018), thus expanding Amazon’s influence on its ecosystem while also facilitating its penetration of the traditional supply chain industry. Such partnering strategies leverage “the rise in coordination possibilities, enabled by the rapid progress of information and communication technologies” (Adner, 2017: p. 50) and thereby extend industry boundaries through digitalization. 195 200 205

Industry digitalization and technological dependence

Unlike Alphabet, Amazon, or Apple, most firms are likely to depend upon, not develop, digital artifacts, infrastructure, and platforms. Moreover, firms in established industries may be compelled to depend on digital firms outside their industries. The consequences of such inter-industry dependence can be seen in the \$19 billion loss to US businesses due to an outage of cloud computing platforms (Lloyd's, 2018) and the disruption faced by shipping companies and airlines due to a malfunction of Akamai's Internet servers (Washington Post, 2021). Thus, technological dependence may range from AI algorithms, data, and information security (Pieters & van Cleeff, 2009) to chips, sensors, and semiconductor equipment (Adner & Kapoor, 2010). Such dependence may manifest in many forms, for example, patent citations (Vagnani, 2015), intellectual property lawsuits or licenses (Czarnitzki & Van Criekingen, 2019), or the procurement of goods and services from oligopolistic digital outsiders (Smyrnaio, 2018).

Prior research has found that the nature of technology can influence the level of a firm's resource dependence on industry outsiders and thereby affect organizational outcomes such as acquisitions, alliances, or financial performance (Lenox et al., 2010; Steensma & Corley, 2000; Thomke & Kuemmerle, 2002; Vagnani, 2015). While these studies focused on production constraints, prior theorizing suggests that the constraints created by digital technologies are of a fundamentally different nature (Adner et al., 2019), and the production of digital goods consisting of nonphysical bits and bytes is not limited in any traditional manner (Varian et al., 2004). From an industry perspective, the fast-emerging digital world differs from the traditional physical world in many important ways.

First, the marginal costs of producing digital goods such as data, algorithms, or software are often negligible (Belleflamme, 2016; Rifkin, 2014), whereas their upfront cost of research, development, engineering, and deployment may be prohibitive for firms in established industries. For example, it could cost "between £7.5 to £22.5 billion to create the technology to develop a search engine of comparable scale to Google" (UK Competition and Markets Authority, 2019), whereas the cost of serving a single search query via the Internet may arguably be nearly zero. Second, network effects and externalities dominate the digital era, where a platform's value grows exponentially with the number of users and displacing it is unviable for most competitors (Cusumano et al., 2019). Scholars have argued that "the economy is an expression of its technologies" (Arthur, 2009: p. 10) and the current global economy is, arguably, an expression of digitalization. Specifically, economic returns are likely to accrue to an increasingly smaller set of digital platforms, driven by the phenomenon of increasing returns in digitalized industries (Arthur, 1996) as opposed to diminishing returns in traditional industries. Moreover, this "new

world of business” is likely to be characterized by a rapid accrual of users and customers by new entrants who leverage the network effects enabled by digital platforms to disrupt established industries (Arthur, 1996; Cusumano, 2022). 250

Third, the use of open-source software and public data may enable the rapid development of new products and confer a competitive advantage to digital outsiders (Wen et al., 2016). Finally, firms in an established industry can get locked into partnerships with oligopolistic digital suppliers such as cloud computing platforms or electronic payment gateways, and thereby face substantial switching costs (Chen & Hitt, 2006). In sum, the increasing mobility of strategic resources and the porosity of industry boundaries due to digitalization are likely to compel firms in established industries – those that are decades or centuries old and range from chemicals, communications, energy, and health care to housing, hospitality, supply chain, and transportation – to depend on digital outsiders as they struggle and strive to balance the feasibility of developing proprietary digital resources with the expediency of leveraging or acquiring outside ones. Accordingly, we propose: 255 260

Proposition 1. *The digitalization of an established industry is likely to increase the cross-industry technological dependence of its constituent firms.* 265

Technological dependence and corporate venturing

Technological dependence, voluntary or otherwise, motivates firms to plan and execute strategies that mitigate their dependence on external resources (Adner & Kapoor, 2010; Vagnani, 2015). This imperative to reduce dependence is one of the central tenets of resource dependence theory (RDT), which posits that organizations strive to reduce the environmental uncertainty associated with their access to vital resources (Pfeffer & Salancik, 1978). Specifically, RDT predicts that decision-makers at organizations will mitigate the uncertainty of access to environmental resources by exercising strategic options such as “(a) mergers/vertical integration, (b) joint ventures and other inter-organizational relationships, (c) boards of directors, (d) political action, and (e) executive succession.” (Hillman et al., 2009: p. 1404). These predictions have garnered substantial scholarly attention and been validated in empirical studies (Casciaro & Piskorski, 2005; Drees & Heugens, 2013), especially for inter-organizational relationships within established industries. 270 275 280

Notably, some of the key strategic actions predicted by RDT fall under the purview of external corporate venturing, which is a core component of corporate entrepreneurship strategy (Ireland et al., 2009; Kuratko, 2017) and central to organizational outcomes (Corbett et al., 2013; Narayanan et al., 2009; Zahra & Covin, 1995). Yet, there is limited extant research (for example, Biniari et al., 2015) on firm strategy in general, and corporate venturing in 285

particular, in the context of resource dependence arising from industry digitalization (Menz et al., 2021). This lacuna is surprising and demands scholarly attention given that corporate venturing strategies are particularly relevant for firms in an established industry to combat competitive threats from digital outsiders (Bierwerth et al., 2015; Dess et al., 2003). The emergence of oligopolistic AI, cloud, and mobile computing platforms, driven by the mobility of strategic resources and porosity of industry boundaries, requires a commensurate strategic response by firms in established industries (Wareham et al., 2014). Yet, there remains a meager understanding in extant literature about how cross-industry resource dependence due to the digitalization of established industries spurs the impacted firms to pursue corporate venturing strategies such as acquisitions.

Equity and non-equity corporate venturing

External corporate venturing consists of equity and non-equity practices (Miles & Covin, 2002; Sharma & Chrisman, 1999). Practices that involve equity include strategic mergers and acquisitions, corporate venture capital investments, and joint ventures (Colombo & Murtinu, 2017; Keil, 2004; Schildt et al., 2005). Non-equity practices include alliances and partnerships centered on co-innovation, high-growth markets, and technology sourcing (for example, Dushnitsky & Lavie, 2010; Dutta & Hora, 2017; Keil et al., 2008; Teng, 2007). Recently, novel non-equity practices have emerged in the form of corporate accelerators, hackathons, and incubators (Galbraith et al., 2019; Kohler, 2016; Shankar & Shepherd, 2019). Moreover, strategic alliances are accelerating with the advent and rapid penetration of digital technologies such as AI, cloud computing, and robotics across industries (He et al., 2020).

Equity-based corporate venturing practices, typically within an industry, are oriented toward dyadic relationships that require due diligence, effort, and time to materialize. For example, the lifecycle of corporate venture capital investments can be up to a decade (Parhankangas & Arenius, 2003). Moreover, acquisitions may not always positively contribute to firm performance (Benson & Ziedonis, 2009; King et al., 2004) despite the substantial investment made in the entire process from acquiree search and engagement to due diligence and integration (Hunt et al., 2019). Nevertheless, equity-based external corporate venturing practices can enable firms in established industries to reduce the technological dependence arising from digitalization. This mitigation of dependence may be achieved via direct acquisition of digital resources in M&As or privileged access to strategic resources in joint ventures and corporate venture capital investments.

Non-equity corporate venturing practices tend to preserve strategic flexibility and fall into the “less invasive” category of inter-organizational arrangements in the context of RDT (Drees & Heugens, 2013). For example, corporate

accelerators (Kohler, 2016; Shankar & Shepherd, 2019) and incubators (Galbraith et al., 2019) are forms of arms-length, strategic actions designed to attract entrepreneurial ventures toward a focal firm and thereby help it acquire insights related to new business models, industries, and technologies. Similarly, strategic partnerships enable the rapid formation of flexible, loosely coupled arrangements across industries and geographies (Nambisan & Luo, 2021; Nambisan et al., 2019) with a progressive path toward more complex alliances (Rothaermel & Boeker, 2008). However, non-equity modes of corporate venturing, by virtue of their loose coupling, limit the degree of control that firms in established industries can exert on strategic digital resources outside their industries. Conversely, equity modes of corporate venturing involve tighter coupling between firms and greater control over strategic resources via the acquisition of various assets such as capital, digital, human, intangible, and physical assets. However, large-scale acquisitions accordingly increase the legal boundaries of the acquiring firms and, thereby, their risk exposure (Santos & Eisenhardt, 2005).

Notably, firms in established industries are likely to cross not only industrial, but also geographic boundaries as they seek to acquire strategic digital resources and, thereby, mitigate technological dependence. Thus, tapping into global reservoirs of digitalized assets is likely to become an integral part of corporate venturing strategy, despite ongoing trends in technological nationalism and deglobalization (Zahra, 2021). In sum, cross-industry corporate venturing, in equity and non-equity modes, is central to firms' strategic response to technological dependence arising out of the digitalization of established industries. Accordingly, we propose:

Proposition 2. In response to the digitalization of their established industry, technologically dependent firms will increasingly cross industry boundaries in their corporate venturing practices.

Acquihires as a mode of corporate venturing

Modes of corporate venturing, whether equity or non-equity, differ in risk and reward. Mergers and acquisitions (M&As), for example, involve a substantial investment of capital and executive effort and may require years to fructify but can fetch a variety of strategic resources and create significant value. Moreover, M&As may fail to realize the expected value for stakeholders (King et al., 2021) due to rich premia, structural or functional misalignment, and challenges faced during post-M&A integration (Devers et al., 2020; Welch et al., 2020). Conversely, strategic alliances may involve less effort, capital, and execution time but cannot fully resolve resource dependence (Drees & Heugens, 2013). Novel forms of external corporate venturing, such as

corporate accelerators, hackathons, and incubators, may be even faster to implement (Drover et al., 2017; Shankar & Shepherd, 2019), arguably facilitated by digitalization, but such practices depend upon finding highly skilled talent “capable of not only working with start-ups, but also skilled in navigating corporate structures” (Kohler, 2016: p. 354). 370

Figure 1 compares the relative speed, investment, and degree of coupling for various modes of corporate venturing. It includes “acquihires,” which are acquisitions of high-tech start-ups by buyers primarily interested in acquiring human capital with technical prowess (Polsky & Coyle, 2013). Unlike a typical M&A transaction, a typical acquihire (a) is smaller in deal size, (b) can be executed faster, and (c) involves the acquisition of a pre-revenue, small business with predominantly technical staff (Fantasia, 2016). Thus, acquihires may not only involve less risk for the buyer, compared to M&As or joint ventures, but may also optimally balance control over external resources with the time taken to consummate the deal and, thereby, realize the expected value for the acquirer. Moreover, given the inherent mobility of digital artifacts and assets across inter-firm and inter-industry boundaries, firms in established industries are likely to mitigate their resource dependence primarily through the acquisition of labor with prowess in digital technologies and, perhaps, digital intellectual property (IP) assets, such as copyrighted software, datasets for machine learning, technology patents, or trade secrets related to AI algorithms. 375 380 385

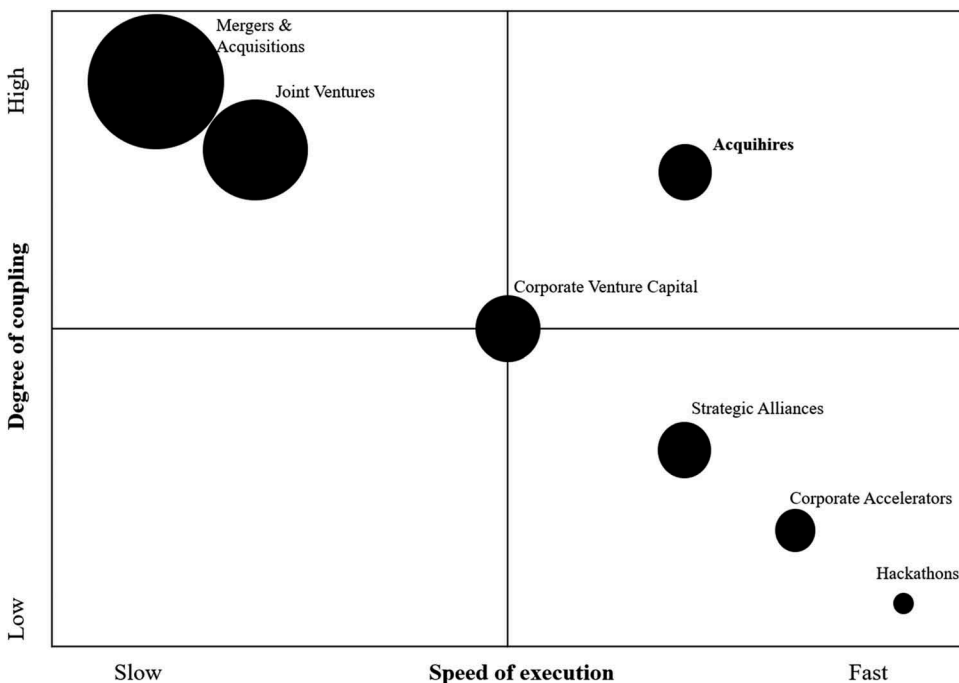


Figure 1. Modes of external corporate venturing. Size of circle illustrates the relative investment of financial capital and executive effort.

Table 1. Acquiiring versus Corporate Venture Capital (CVC) and traditional hiring.

<i>Acquirer perspective</i>	CVC	Acquiiring	Traditional Hiring
Speed of execution	Low	Medium	High
Leverage in deal negotiation	Low	Medium	High
Control over external resources	Low	Medium	High
Scale of value creation	High	Medium	Low
Technology and market insights	High	Medium	Low
Organizational learning from deals	High	Medium	Low

Acqui hires versus corporate venture capital investments and traditional hiring

To access highly skilled human capital and digital IP assets, firms may alternatively pursue corporate venture capital (CVC) investments (Dushnitsky & Lenox, 2005). CVC involves the creation of a separate pool of risk capital to fund an investment portfolio composed of high-tech, growth-oriented entrepreneurial ventures (Drover et al., 2017). While CVC investments may provide firms with access to human talent and novel technologies, CVC funds involve not only larger investment risks but also require commensurate capacity and expertise in their top management teams (TMTs) to govern CVC operations (Anokhin et al., 2016). For firms interested solely in human talent with technical prowess, an alternative is organic hiring which involves recruiting new staff with technological expertise relevant to the firm’s innovation, R&D, and product development activities. However, traditional piecemeal hiring is inefficient and fails to provide team-specific capital (Jaravel et al., 2018). In comparison, acquihires, with their emphasis on buying cohesive teams united in purpose, offer a compelling alternative for rapid and efficient access to high-skilled labor (Chen et al., 2021).

Table 1 compares acquihires with CVC and traditional hiring. CVC investments are often made via syndicates with professional co-investors, (for example, venture capital firms) and hence offer only indirect access to strategic external resources. Moreover, CVC payoffs can be significantly greater than those from acquihires, but the outcomes of a CVC portfolio are often subject to the preferences of lead investors in future rounds of financing (Keil et al., 2010). Conversely, piecemeal organic hiring lacks insights into novel technologies or markets and creates limited value in knowledge-intensive settings (Jaravel et al., 2018; Teodoridis, 2018). Therefore, acquihires are arguably a favorable mode of corporate venturing, particularly for talent acquisition by firms in established industries impacted by digitalization. Accordingly, we propose:

Proposition 3. In response to the digitalization of their established industry, technologically dependent firms are more likely to engage in cross-industry acquihiring than in other equity modes of corporate venturing such as CVC investments, joint ventures, or mergers and acquisitions.

Acquisition of digital talent by firms in established industries

The high-tech industry, given its dependence on high-skilled labor in high volumes, has been the most active in digital talent acquisition via M&A and has, accordingly, received most of the scholarly attention (for example, Chatterji & Patro, 2014; Chaudhuri & Tabrizi, 1999; Chen et al., 2021; Gautier & Lamesch, 2021; Graebner & Eisenhardt, 2004; Graebner, 2009). However, as digital technologies pervade established industries, their constituent firms, too, require human talent with technical prowess. Accordingly, large corporations in established industries have begun to address their technological dependence by engaging in cross-industry corporate venturing activity, such as M&A, centered on digital technologies and innovation (Danuso et al., 2022; Hanelt et al., 2021).

Notably, the adverse impact of unrelated diversification on M&A performance (King et al., 2021) has yet to inhibit such cross-industry M&A activity driven by digitalization. Moreover, unlike many growth-oriented enterprises in the high-tech industry, large firms in established industries have significant, stable cash flows that can be used to service financial debts that may arise out of acquisitions of large, high-tech firms. However, several obstacles exist to prolific acquisitions of large targets in the high-tech industry by large acquirers in established industries impacted by digitalization. First, the high-tech industry is characterized by digital oligopolies (Smyrnaio, 2018) operating as proprietary, data-driven platforms (Cusumano, 2022). Acquisitions of such large, digitalized firms, for example, Amazon or Airbnb, by their equally large counterparts, for example, Walmart or Marriott, in established industries are likely to face substantial performance risks arising from the complexity of nested effects and the sustained drain on executive and managerial capacity during integration (Zorn et al., 2019). Moreover, increasing antitrust and regulatory concerns about the oligopolistic behavior of giant digital platforms may further reduce the likelihood of such M&A transactions (Hovenkamp, 2022).

Second, the outsized compensation offered to highly skilled employees in the high-tech industry, even in smaller firms, is unlikely to be palatable at large scale to traditional corporates in established industries where the labor share of income is significantly lower (Manyika et al., 2019). Third, emerging trends in deglobalization, nationalism, and protectionism may increase the effort, expense, regulatory oversight, and risk exposure associated with large acquisitions across country and continental boundaries (Hemphill, 2010; Zahra, 2021). Therefore, even though corporations in established industries may seek to mitigate their technological dependence arising out of digitalization through external corporate venturing, they may face substantial barriers in consummating large-scale, cross-industry M&As and thus continue to face

a scarcity of “genius” human talent with prowess in digital technologies (Benzell & Brynjolfsson, 2019). 465

While they could engage in numerous acquihires of high-tech start-ups amidst highly competitive bids from digital behemoths (Varian, 2021), the valuation premia and the costs of due diligence, deal negotiation, and post-acquihire integration may not result in a commensurate volume of highly skilled talent acquisition. Moreover, talent retention – the primary risk in 470
acquihiring – is likely to disproportionately affect large firms in established industries who attempt frequent acquihires in a bid to rapidly acquire digital talent (Makinen et al., 2012).

Acquisition of digital talent by SMEs in established industries

Unlike their larger counterparts, SMEs in established industries may be 475
better suited to engage in opportunistic acquihires as a strategic response to technological dependence arising from industry digitalization for a number of reasons. First, SMEs neither need highly skilled digital talent at scale nor need to engage in large M&A transactions. Second, organizational inertia at SMEs is likely to be lower – and hence decision-making likely to be faster – 480
than that at large firms in established industries (Josefy et al., 2015). The fast execution of acquihires is particularly important in the digital age, given the rapidity of digital technology evolution and obsolescence (Nambisan, 2017). Third, the risks of value erosion during post-acquisition integration (Graebner et al., 2017) may be lower at SMEs than 485
their larger counterparts due to greater flexibility in cultural, functional, and structural alignment between the acquirer and the target (Bauer & Matzler, 2014; Devers et al., 2020). Also, research shows that SMEs are more likely to withdraw from mergers and acquisitions as signs increasingly indicate they may be unsuccessful (Weitzel & McCarthy, 2011), thus 490
cutting their losses sooner and conserving capital for future acquisitions. Finally, compared to their larger counterparts, SMEs are more likely to realize economic value from acquihires by retaining talent through proactive communication, engagement, and trust-building by their TMTs (Graebner et al., 2017). 495

The suitability of acquihires for SMEs also finds support in prior scholarly work that has sought to differentiate M&A activity by SMEs from that of large corporations (Hussinger, 2010; Mawson & Brown, 2017). For example, scholars have found SMEs to be more likely than their larger counterparts to avoid value-destroying M&A transactions (Weitzel & McCarthy, 2011). Moreover, 500
given their limited resources, SMEs’ motivation to acquire stems primarily from firm-level considerations such as growth, innovation, or performance (Arvanitis & Stucki, 2015; Cefis & Marsili, 2015) instead of CEO hubris or narcissism (Devers et al., 2020).

Notably, equity-based strategic actions such as acquisitions can extend the firm's legal boundaries and, thereby, may increase the risk exposure of the acquirer (Santos & Eisenhardt, 2005). However, such risks may be less severe in cross-industry acquihires, which are primarily designed for digital talent acquisition by SMEs unlike in large M&As, which may involve customer and supplier commitments, financial debt, and legal entanglements (Ott, 2020). In sum, acquihires may represent a compelling strategic fit for SMEs in established industries impacted by digitalization since acquihiring provides SMEs a balance between execution speed, access to strategic digital resources, and risk exposure. Therefore, we propose:

Proposition 4. In response to the digitalization of their established industry, technologically dependent SMEs are more likely than their larger counterparts to engage in cross-industry acquihiring.

Defining the success of acquihires by SMEs in established industries

This study has discussed the “why” and “where” of acquihires by SMEs, specifically proposing that SMEs in established industries strategically use acquihires to manage and mitigate resource dependence arising out of digitalization. Furthermore, these acquihires are likely to cross industrial and geographic boundaries as SMEs tap highly skilled human capital from global reservoirs of digital talent. We now explore the “when” and “what” aspects of acquihires by SMEs by first defining acquihiring success.

During the pre-acquihire phase, when an SME is likely exploring and courting multiple targets for a potential acquihire, the acquirer's attention is focused on the likelihood of closing an acquihire deal (Welch et al., 2020). Once a suitable target has been identified, the focus shifts to due diligence and negotiation (Howson, 2017) with the attendant risks of delays due to competitive bids or loss of momentum (Luypaert & De Maeseneire, 2015). Once an acquihire deal is executed, the second phase – post-acquihire integration – is expected to create economic value for the acquirer (Graebner et al., 2010). In the context of acquihires, the sharp focus on acquiring labor with technical prowess implies that *success* in the final phase ought to be measured as retaining the acquired talent (Kim, 2020; Kristiana et al., 2021). Indeed, employee turnover has been identified as the biggest risk in acquihiring (Makinen et al., 2012; Ng & Stuart, 2019; Ranft & Lord, 2000) and, therefore, employee retention may be the most suitable measure of acquihiring success.

Furthermore, SMEs in established industries may be less susceptible to the typical risk factors in acquihiring for a number of reasons. First, the adverse impact of acquihiring on retention has been tied to the intentional discontinuation of the projects and products of the target company (Polsky & Coyle,

2013). Notably, these retention issues are largely found to occur in the context of the high-tech industry, especially Silicon Valley, where digital oligopolies constantly acquire and, subsequently, terminate the acquiree's projects in favor of their competing ones (Nolan, 2015; Varian, 2021). However, this source of employee dissatisfaction and turnover may be less severe among firms in established industries, whose motivations to acquire are substantially different from those of large corporations in the high-tech industry (Danuso et al., 2022; Hanelt et al., 2021).

Second, employee turnover in technology-centric acquires is found to be influenced by factors such as (a) complementarity of technologies between the acquirer and the target (Bakir & Karim, 2021), (b) social norms and the threat of informal sanctions in the high-tech industry (Polsky & Coyle, 2013), and (c) degree of autonomy for the acquired employees (Ranft & Lord, 2000). Since SMEs in established industries do not compete with firms in the high-tech industry and may have less organizational bureaucracy, inertia, and rigidity compared to their larger counterparts (Lavie et al., 2011), the acquires they undertake are less likely to suffer from employee turnover arising from mismatches in technology, social expectations, or managerial hierarchy. Moreover, the non-compete agreements (McAdams, 2019) that often bind acquired teams are unlikely to be violated when these employees join firms outside of the high-tech industry.

Pre-acquire success factors for SMEs in established industries

Having demonstrated the importance of acquires by SMEs in established industries impacted by digitalization as well as identified employee retention as a suitable metric for assessing acquiring success, we now explore the key considerations involved during the pre-acquisition phase (Welch et al., 2020). Extant research on SME adoption of digital technologies, such as digital marketing (Saura et al., 2021), e-commerce (Bharadwaj & Soni, 2007), IT (Cragg et al., 2013), software-as-a-service (Kim et al., 2017), and social media (Eggers et al., 2017), finds that SMEs in established industries are primarily adopters and consumers, not developers or innovators of digital technologies. We propose four dimensions – specifically timing, technology, market, and financing – that may help determine the level of alignment between SMEs and candidates for acquires.

First, SMEs in established industries access digital talent via acquires at a relatively later stage of the technology hype cycle (Gartner, 2018), conceptualized as the typical evolution of a novel technology starting from an innovation trigger and a VC-funded frenzy to a plateau of productivity after a “bust” of the initial hype (Gartner, 2018). Specifically, success in acquiring by SMEs in established industries is most likely for acquires executed during the “trough of disillusionment” phase of the hype cycle. Notably, under the

broad umbrella of digital technologies are various categories such as 3D 585
printing, AI, autonomous vehicles, blockchain, or quantum computing
(Gartner, 2018b). Each of these categories further consists of sub-domains.
For example, AI consists of chatbots, deep learning, machine learning, seman-
tic search, and many more technologies (Gartner, 2021). Therefore, acquihires
by SMEs may involve careful selection of relevant hype cycles for specific 590
digital technologies pertinent to their industry.

Second, ventures that use a greater degree of open-source digital technol-
ogies, instead of primarily proprietary or patented technologies, are likely to be
more suitable acquihiring targets for SMEs in established industries. Open-
source technologies are publicly available, cost-effective, and require minimal 595
capital investment by SMEs to customize or enhance the acquired IP assets
(Macredie & Mijinyawa, 2011). Moreover, even if an acquihire does not
involve access to software code, the technical skills garnered via the acquisition
of teams are likely to be centered on open-source digital technologies. Finally,
pre-acquisition due diligence is likely to be more efficient for open-source 600
software (Popp, 2013), especially for SMEs with limited expertise in cutting-
edge digital technologies and limited experience in filing or asserting patent
rights (Sawicki, 2014).

Third, a strategic fit between the SME acquirer and the digitalized
acquiree with respect to market traction is critical. Not only does this require 605
alignment between customer type, such as business, government, or con-
sumer and customer geography (Dyer et al., 2004), but it also calls for
successful proof-of-technology, proof-of-concept, and pilot deployments by
the target. These indicators of traction help avoid risks in digital technology
development that an SME in an established industry is unlikely to bear or 610
overcome. Conversely, the full-fledged commercial launch of products and
services by a potential target is likely to deter an SME acquirer due to
a misalignment of markets and customers. Therefore, successful acquihires
by SMEs are likely to favor adequate technology validation over extensive
customer validation (Blank, 2013). 615

Finally, we argue that the valuation premia paid by SME acquirers, and
hence the success of such acquihires, are likely to be most favorable when the
target ventures have raised risk capital from angel investors, crowdfunds,
government agencies, accelerators, or incubators, but not from professional
or corporate venture capital funds. Here, SME acquirers seek to leverage the 620
confidence displayed by external investors in an early stage venture while
avoiding the transaction complexity, multilateral negotiations, and rich acqui-
sition premia associated with targets funded by VC or high-tech CVC firms.
Moreover, timing their acquihires during the “trough” stage of the technology
hype cycle can further help SMEs negotiate favorable valuations for worth- 625
while targets that are unlikely to garner interest from “disillusioned” VCs and
CVCs. In sum, we propose:

Proposition 5. The success of acquihires, as a strategic response by an SME to industry digitalization, is influenced by considerations of hype cycle timing, proprietary technology, market traction, and stage of financing during the pre-acquihire phase. 630

Key stakeholders in acquihires by SMEs in established industries

In discussing the “what” and “when” of acquiring by SMEs, this study has proposed that SMEs seeking to mitigate resource dependence arising from industry digitalization are likely to successfully acquihire at the “trough of disillusionment” stage in the technology hype cycle. Moreover, the role of open-source technologies, an optimal degree of market traction, and a pre-VC financing status have been highlighted as factors likely to augment acquiring success. We now explore the “who” and “how” aspects of acquihires by SMEs. 635

The role of TMTs in M&A activity has been extensively discussed (Devers et al., 2020; Welch et al., 2020) and TMT involvement is found to be crucial for M&A performance (Nadolska & Barkema, 2014). In the context of acquihires by SMEs, an adaptation of a common M&A practice, specifically the use of M&A advisors (Hunter & Jagtiani, 2003), is deemed especially relevant. The cross-industry nature of digital acquihires calls for experts to support the SME’s TMT throughout the acquisition process. Specifically, digital technology experts assist the SME’s CIO or CTO in technical due diligence while acquihire experts, native to the high-tech industry, assist the SME’s TMT with prospecting, negotiation, and deal closure. Figure 2 shows these stakeholders likely have counterparts at the target, such as the founder-CEO, cofounders, 640 645 650 and the technical lead.

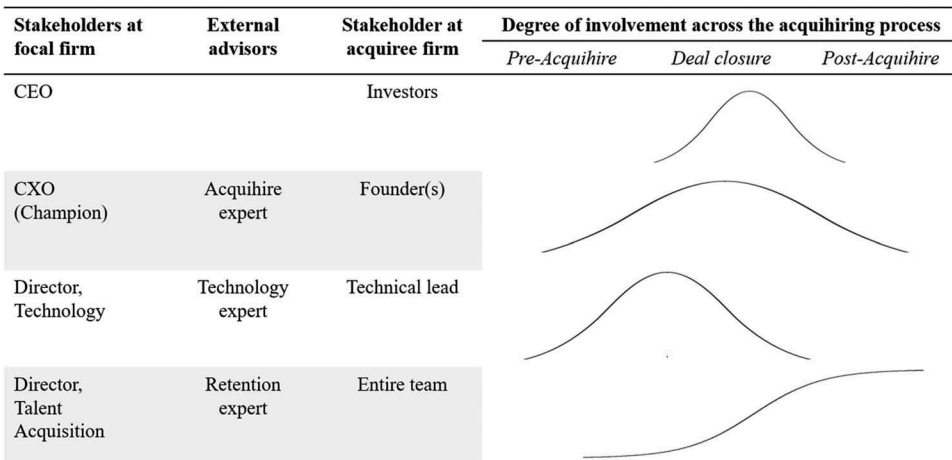


Figure 2. Key stakeholders in acquihires.

Figure 2 also depicts the longitudinal involvement of each stakeholder across the acquiring process. Finally, it highlights the importance of employee retention to the success of digital acquirers by capturing the crucial roles of (a) talent acquisition stakeholders at the acquirer, (b) the entire team being acquired, and, likely, (c) an external talent retention expert. 655

Post-acquire success factors for SMEs in established industries

Next, we consider the post-acquire phase focusing on the turnover of acquired employees and founders – the primary impediment to acquiring success (Ng & Stuart, 2019; Ranft & Lord, 2000). Retention of the acquired pool of digital talent requires broad and deep integration of the target with the acquirer during the post-acquire phase along multiple dimensions (Graebner et al., 2017). First, structural integration of the target into the acquirer calls for clarity on the organizational reporting structure post-acquisition and extensive interaction between acquirer and acquiree teams (Graebner et al., 2017). Moreover, the centrality of autonomy (Zaheer et al., 2013) and status (Ranft & Lord, 2000) to acquiring success highlights the need for entrepreneurial latitude for acquired employees in their roles as experts on digital technologies. Finally, the SME TMT must provide evidence of their commitment to the transaction, in the form of internal announcements and press releases, to relay the importance of the acquired team to the acquirer's mission and goals (Ranft & Lord, 2000). Together, these signals of structural integration are likely to mitigate organizational mismatch – a key driver of post-acquire turnover (Kim, 2020). 660

Second, functional integration of the target into the acquirer typically calls for managerial actions that align business units, departments, information systems, and external interfaces (Graebner et al., 2017). However, in the SME context, functional integration is likely to center on digital talent and technologies acquired through the acquire and managerial actions to maximally leverage these dynamic capabilities in the form of human capital with technical prowess (Chatterji & Patro, 2014) and thus facilitate access to the tacit knowledge embedded in the acquired talent pool (Fantasia, 2016). Moreover, opportunities for the entrepreneurial team to engage with customers and partners are likely to further motivate retention by signaling growth opportunities (Bakir & Karim, 2021) and eliciting positive emotions (Graebner et al., 2010). 675

Third, sociocultural integration of the target into the acquirer involves matters of identity, justice, and trust (Graebner et al., 2017). Culture is arguably the biggest deterrent to success in acquiring by SMEs since entrepreneurial teams operating under norms of the high-tech industry must acculturate themselves to traditional norms in established industries as both parties work toward congruence (Nahavandi & Malekzadeh, 1988). Here, 680

extensive communication and appreciation by SME TMT and close interaction between acquirer and acquiree teams are likely to bridge cultural gaps (Stahl & Voigt, 2008), minimize mismatch (Kim, 2020) and, thereby, improve retention (Goecke et al., 2018). Thus, sociocultural integration is rooted in behavioral aspects of M&A and calls for the alignment of values at the individual, group, and organizational levels (Devers et al., 2020). Finally, the importance of autonomy to post-acquihire retention (Ranft & Lord, 2000; Zaheer et al., 2013) requires that the essence of the target's entrepreneurial and technological culture be preserved by the SME post-acquihire. 695

Fourth, financial integration of the target into the acquirer revolves around monetary factors such as fixed compensation and incentives tied to retention and referrals. Here, the seller's perspective is focal since founders likely have financial pressures that can be resolved and financial goals that can be met via an exit (Graebner & Eisenhardt, 2004; Graebner et al., 2010). While high-tech start-ups typically incentivize long-term retention through stock options, an SME acquirer would have to design compensation structures that reward loyalty and referrals by the acquired team. Here, external experts in talent retention can play a central role by bridging the gap in compensation norms between established and high-tech industries. Accordingly, we propose: 700 705 710

Proposition 6. The success of acquihires, as a strategic response by an SME to industry digitalization, is influenced by considerations of structural integration, functional integration, socio-cultural integration, and financial integration during the post-acquihire phase. 715

Organizational learning through serial acquihires by SMEs

Having discussed the definition and driving factors of success for SMEs as they pursue acquihires in response to industry digitalization, this study now explores a final consideration in acquihiring for SMEs – the opportunity to improve the odds of acquihiring success via organizational learning. M&A literature has established the value of experiential learning for serial acquirers, finding the strongest support for friendly, repeated acquisitions of a similar nature (for example, Halebian & Finkelstein, 1999; Muehlfeld et al., 2012). Moreover, scholars have linked acquisition success to moderate levels of acquisition activity (Laamanen & Keil, 2008) with deliberate learning during post-acquisition integration as a focal mechanism through which the likelihood of acquisition success increases over time (Barkema & Schijven, 2008; Zollo & Singh, 2004). 720 725

In the acquihiring context, with its emphasis on external knowledge, organizational learning by SMEs manifests as absorptive capacity (Sun & Anderson, 2010), which has been theorized to influence the success of 730

technological acquisitions (Ahuja & Katila, 2001) and digital transformation (Siachou et al., 2021). Relatedly, scholars have highlighted the importance of “partnering and knowledge acquisition capabilities (that is, absorptive capacity)” (Ahsan & Fernhaber, 2019: p. 61) in acquisitions, aided by learning mechanisms such as articulation and knowledge codification (Graebner et al., 2017). Building upon this, we argue that SMEs in established industries impacted by digitalization may benefit from organizational learning via a planned rhythm of acquihires to build absorptive capacity and cross-industry networks, which further help realize value from the acquired resources (Ahsan, 2017). 735 740

New network ties acquired via serial acquihiring may be particularly relevant for SMEs in established industries, whose extant networks may thus get bridged to those in the “digital” or “information and communications technology” industry. Such inorganically acquired social capital, when seamlessly bonded with the acquirer, can “encourage more information sharing, collaboration, and creation of specialized knowledge” (Musteen & Ahsan, 2013: p. 427), further augmenting the success of acquihires. Notably, the systematic creation of absorptive capacity and effective use of acquired network ties may be contingent upon a dedicated “acquired talent retention” function at SMEs, analogous to a dedicated M&A function at their larger counterparts (Trichterborn et al., 2016). Here, explicit executive support for organizational learning would drive the codification of the tacit knowledge held by the acquired team and subsequent transfer to relevant stakeholders across the acquirer (Fantasia, 2016). Moreover, such institutionalization of the acquihiring process may enable SMEs to strategically benefit from a compounding of social capital, wherein new cross-industry ties lead to more acquihires which further act as bridges to new networks (Musteen et al., 2017). Accordingly, we propose: 745 750 755

Proposition 7. The success of acquihires, as a strategic response by an SME to industry digitalization, is positively related to the number of prior acquihires of a similar nature, provided there exists a dedicated talent retention function in the SME. 760

Acquihires as entrepreneurial exits

While the preceding sections have evaluated the buyers’ perspective on acquihires, their relevance in the context of industry digitalization equally depends on the sellers’ motivations, particularly since acquihiring success is centered on the retention of the acquired talent. To consider the perspective of the founders and venture teams being acquihired, we draw upon extant literature on entrepreneurial exits (DeTienne & Wennberg, 2015). Defined as “the 765 770

process by which the founders of privately held firms leave the firm they helped to create; thereby removing themselves, in varying degree, from the primary ownership and decision-making structure of the firm” (DeTienne, 2010: p. 203), an entrepreneurial exit may involve the exit of the founder(s) or the entire team, as in the case of acquihires. Arguably, entrepreneurial teams have greater agency in acquihires compared to acquisitions of later-stage, VC-funded start-ups or larger companies, where numerous stakeholders are likely to influence and control the exit. Therefore, considerations of the entrepreneurial mind-set (Daspit et al., 2021) and motivation (Murnieks et al., 2020) of acquired teams are crucial to acquihiring processes and outcomes for a number of reasons. 775

First, scholars have suggested that entrepreneurial intentions to exit are driven not only by age, education, and business experience, but also by behavioral, cognitive, and social factors (DeTienne & Cardon, 2012). In the case of acquihires driven by industry digitalization, founders may be psychologically motivated to “cut their losses” in the face of unmet goals and redeploy their entrepreneurial and technical expertise via alternate means, for example, via the acquirer. Second, entrepreneurs may pursue exits via acquihires due to work stress or emotional exhaustion (Sardeshmukh et al., 2021), particularly after the “peak of inflated expectations” and during the “trough of disillusionment” phases of the hype cycle when risk capital has become scarce, technological reality fails to meet the hype, and viable business models are yet to emerge (Gartner, 2018). While impulsive quitting is unlikely to drive entrepreneurs in the acquihiring context, negative affect or felt moral obligations toward their teams (Maertz & Campion, 2004) might play a meaningful role in founders’ decisions to exit their nascent ventures, with acquihires serving as a relatively positive outcome compared to a distress sale or liquidation (Wennberg et al., 2010). 785 790 795

Third, the paradox that entrepreneurs face as their firms grow and yet they progressively lose control (Wasserman, 2003) may create a disincentive to weather challenging economic and market conditions in the pursuit of long-term growth. Instead, an entrepreneurial exit via an acquihire may provide financial and psychological safety to founding teams, whose technical competence is likely to remain valuable in digitalized industries. Arguably, the intentions and motivations of the entrepreneurial team are pertinent to acquihiring success, which is primarily determined by the voluntary retention and successful deployment of acquired human talent. 800 805

Finally, exiting teams may prefer acquihires by SMEs over those by larger firms for reasons such as autonomy, independence, and responsibility (DeTienne et al., 2015; Sauermann, 2018). In comparison to their larger counterparts, SMEs may provide a more flexible operating environment to venture teams comfortable with agility, and may also look to the acquired teams for proactive leadership in digitalization, the primary driver of 810

acquihires as argued in this paper. Conversely, acquired teams may be restricted in their ability to exercise strategic discretion at large firms with established hierarchies and processes. A greater degree of professional freedom at SMEs may also enable opportunity recognition and evaluation by founders who, after being acquired, may eventually turn into serial entrepreneurs (Dabić et al., 2021). Moreover, entrepreneurs may orient their exits toward SMEs, instead of larger firms, since the emotions of acquired teams may influence the success of post-acquisition integration (Vuori et al., 2018).

Alternatives to acquiring by SMEs

Building upon the preceding exploration on the mutual fit between SMEs and acquired entrepreneurial teams, we now evaluate the strategic alternatives available to the former in the wake of digitalization of established industries. Specifically, we examine offshoring as an alternative to acquiring by SMEs, who may seek to mitigate the disruption caused by industry outsiders by accessing external human capital with technological expertise. Scholars have used the lens of intellectual capital to suggest that SMEs may adopt offshoring of service activities, particularly when faced with a human capital deficit (Musteen et al., 2017). Faced with an urgent need for talent with technical prowess, SMEs in established industries may seek to “supplement their stock of human capital” by offshoring knowledge-intensive processes such as engineering, innovation, and research and development (Musteen & Ahsan, 2013: p. 424).

To assess the tradeoffs between acquiring and offshoring as alternative strategic responses to industry digitalization, we draw upon literature on the stage-wise adoption of digital technologies by traditional firms (Verhoef et al., 2021). Offshoring may be a suitable mechanism for the “digitization” of business information, processes, or services at SMEs in established industries facing digitalization. Here, the cost, scale, and speed demands of the analog-to-digital transition are likely suited to offshoring or outsourcing strategies. Digital transformation, alternatively, may call for a strategic balance between in-house human talent focused on core activities and offshoring of non-core activities (Autio et al., 2018; Pereira et al., 2019). While scholars have theorized that research and innovation, and not necessarily cost, can be important considerations in offshoring decisions (Musteen & Ahsan, 2013), the threats posed by industry outsiders to SMEs in established industries may preclude the offshoring of strategic activities centered on digital technologies. This competitive constraint on SMEs may make acquiring more suitable than offshoring, driven by the imperative to not only access but also protect and control human capital with technical prowess.

Furthermore, the journey toward digital transformation, “a change in how a firm employs digital technologies, to develop a new digital business model

that helps to create and appropriate more value for the firm” (Verhoef et al., 2021: p. 889), may require a continued acquisition of human talent. Here, SMEs may prioritize digital business strategy, which is critical to survival and growth in the wake of industry digitalization (Nambisan et al., 2018), over digitization of specific processes or services, which may be better suited for offshoring in the pursuit of operational efficiency. Therefore, SMEs may increasingly prefer acquiring over offshoring as they progress from digitization to digital transformation, with the entry of disruptive industry outsiders acting as an accelerant. Moreover, the pursuit of multiple acquisitions along this journey toward digital transformation will contribute to organizational learning (Haleblian & Finkelstein, 1999) as SMEs repeatedly engage in target search, due diligence, negotiation, and post-acquisition integration.

Finally, the “knowledge access versus knowledge acquisition” trade-off (Grant & Baden-fuller, 2004) between offshoring and acquiring decisions by SMEs may be influenced by the strategic importance and purpose of digital technologies (Mani et al., 2006). When SMEs are oriented toward the long-term development of new products and services powered by digital technologies, offshoring may serve as an inorganic, scalable alternative to access human capital with technological expertise. Conversely, when SMEs are motivated to rapidly evaluate and integrate digital technologies to mitigate disruption by industry outsiders, they may favor acquisitions as an organic, governable alternative. Since acquiring and offshoring are not mutually exclusive alternatives, SMEs may pursue both, in sequence or in parallel, with the overarching goal of addressing their human talent deficit (Musteen & Ahsan, 2013).

Challenges to acquisitions by SMEs

SMEs may face a host of challenges in their pursuit of acquisitions. Internally, limits to absorptive capacity may arguably hinder acquiring success. Scholars have found that value creation from acquisitions usually accrues to “acquiring organizations when acquisition growth is coupled with the development of acquisition capabilities, i.e., with the accumulation, storage, and exploitation of fresh organizational knowledge” (Salvato et al., 2007). To the extent that SMEs are limited in – or fail to develop – their absorptive capacity to continually monitor, recognize, and exploit opportunities to acquire knowledge-intensive resources (Musteen & Ahsan, 2013), they may struggle to effectively identify, acquire, or integrate human capital with technical prowess.

Externally, SMEs must confront the competitive threat posed by larger firms that are likely to have greater resources, stronger brands, and stronger motivations for engaging in acquiring. We suggest multiple factors that may determine the extent and outcome of this challenge to acquiring by SMEs. First, the motivations of large firms in established industries to engage in

acquisitions must be considered. Scholars have found that corporate acquisitions are often motivated by executive “narcissism, overconfidence, extraversion, and promotion orientation” (Devers et al., 2020: p. 884), wherein larger acquisitions fuel heightened self-image reinforcement. The significantly smaller scale of acquihires, compared to acquisitions of larger targets, is unlikely to fulfill executive expectations of self-aggrandizement or self-esteem. Moreover, acquihires primarily involve early stage ventures with largely intangible resources in the form of human and technological capital (Nolan, 2015). Thus, the time, effort, and opportunity cost incurred in evaluating an array of acquihiring candidates may not provide commensurate monetary or psychological rewards for executives at large firms. 900

Second, acquisition activity by large firms is often cyclical in nature, with corporate venture capital (CVC) often the initial mode of investment into entrepreneurial ventures, sometimes followed by the eventual acquisition of investees (Benson & Ziedonis, 2010). CVC investments tend to be pro-cyclical in nature (Drover et al., 2017), wherein the frequency and size of investments undertaken by large firms are often aligned with the technology hype cycle (Gartner, 2018). As a new technology attracts investor and entrepreneur attention and rises to the “peak of inflated expectations,” large firms are likely to plow increasing amounts of capital, via CVC investments and acquisitions, into new ventures centered on the focal technology. 910 915

However, the eventual failure to meet technological hype may result in executive aversion toward technological innovation and risk-taking during the “trough of disillusionment” (García-Granero et al., 2015) and, therefore, a downturn in CVC activity. Notably, executives at large firms are likely to face greater scrutiny than those at SMEs (Josefy et al., 2015) and, hence, may respond faster to both the “boom” and “bust” phases of these cycles, resulting in a corresponding abundance and scarcity of CVC and acquisition activity. Therefore, while SMEs are likely to be outbid by their larger counterparts in acquisition activity near the “peak” of the hype cycle, they may face relatively lower competitive threats during the “trough.” 920 925

Third, environmental munificence (Dess & Beard, 1984) may have an influence on acquihiring by firms in established industries. When the broader economic environment is munificent, often evidenced by an abundance of risk capital, executives are likely to pursue sustained growth. This strategic orientation toward expansion is likely to manifest as a wave of acquisitions (McNamara et al., 2008) by large firms and, therefore, pose a potential competitive threat to their SME counterparts who are interested in acquihires. Conversely, in environments that are more penurious, executives at large firms are likely to orient towards survival and stability, with a corresponding downturn in acquisition activity (McNamara et al., 2008), with acquihires likely to be least favored due to the lack of product or market validation. Thus, an environment characterized by scarcity may arguably favor acquihiring by 930 935

SMEs instead of larger firms, who may have less latitude in undertaking counter-cyclical acquisition strategies. 940

In sum, based on contextual considerations of the alignment between the motivations of buyers – specifically SMEs and large firms in established industries – and sellers – specifically entrepreneurial firms with prowess in digital technology – we propose:

Proposition 8. The likelihood of acquiring by SMEs is likely to be positively associated with a) their progress toward digital transformation and b) the pace of entry of digitalized outsiders into their industry, but negatively associated with c) corporate venture capital activity in their industry and d) environmental munificence. 945

Discussion 950

This study draws upon recent theorizing of firm strategy in the digital era (Menz et al., 2021; Nambisan, 2017) to propose that the digitalization of established industries may increase the scale and scope of technological dependence of its constituent firms. Furthermore, resource dependence theory (Pfeffer & Salancik, 1978) is invoked to suggest that firms are likely to engage in cross-industry corporate venturing to mitigate their resource dependence on industry outsiders, specifically digitalized firms in the ICT, and broader high-tech, industries. In comparing different modes of corporate venturing (Kuratko, 2017), we propose that acquiring may be suitable for firms, particularly SMEs, in established industries to acquire human talent with technical prowess (Polsky & Coyle, 2013). Furthermore, we conceptualize the “who, what, when, where, why, and how” of acquiring by SMEs impacted by industry digitalization. 955 960

Implications for theory

The propositions developed in this study address the lacuna in extant research on firm digitalization (Menz et al., 2021), especially the influence of digital technologies on SMEs which remain under-investigated compared to large corporations in established industries (Danuso et al., 2022; Hanelt et al., 2021). Using the notions of mobility of strategic resources and porosity of industry boundaries, this paper contributes to our understanding of inter-industry technological dependence in the digital age. Moreover, by invoking extant theoretical and empirical work on resource dependence (Drees & Heugens, 2013), we contribute to the literature on corporate entrepreneurship, specifically positioning corporate venturing as a strategic action used by firms to mitigate resource dependence arising from the impact of digital technologies. 965 970 975

Despite their importance to the overall socioeconomic context, SMEs remain neglected in scholarly work on corporate venturing in the digital era (Arvanitis & Stucki, 2015; Cefis & Marsili, 2015). Therefore, we explore corporate venturing practices for SMEs with an emphasis on acquihires as a suitable strategy for accessing digital resources in the form of talented teams and, in doing so, provide conceptual insights into small business M&A strategy, particularly in established industries facing disruption by digital outsiders. We also draw upon organizational learning literature to explore how serial acquihiring by SMEs may compound the advantages that accrue from the strategic acquisition of technical talent. Finally, this paper examines the sellers' perspective in the acquihiring context and, in doing so, contributes to literature on entrepreneurial exits (DeTienne & Wennberg, 2015), an important component of the entrepreneurial process.

Implications for practice

The phenomenon at the center of this conceptual study, that of industry digitalization, has critical implications for firm strategy and performance (Menz et al., 2021; Nambisan, 2017). Therefore, in evaluating the impact of digital technologies on established industries and their constituent firms, this study provides insights for practitioners who seek to navigate their businesses through the dynamic, global, and sometimes hostile, digital ecosystem (Nambisan & Baron, 2019). Specifically, we suggest that TMTs at SMEs consider acquihiring as a novel mode of corporate venturing well suited to address their technological dependence. This strategic response by incumbents to the disruption of their industry by technology-led outsiders is likely to become not only urgent and salient for an increasing number of SMEs, but it may also act as a fast and flexible mode of venturing which can then be augmented by traditional corporate venturing practices. Moreover, we provide several considerations for the pre-acquihiring and post-acquihiring phases and discuss their influence on acquihiring success. Finally, we examine the benefits to SME stakeholders of serial acquihires through the lens of organizational learning in the M&A context (Muehlfeld et al., 2012).

Limitations and future research

This conceptual study has some limitations. First, it does not discuss the impact of environmental, macroeconomic, or regulatory factors on the digitalization of SMEs in established industries and their strategic response to mitigate resource dependence. Second, it does not investigate individual-level factors such as the cognitive bases and values of SMEs' upper echelons, which may influence their strategic choices and actions in response to industry digitalization (Neely et al., 2020). Third, while this paper develops testable

propositions with the intent for future empirical confirmation, it does not identify ways to operationalize the theorized constructs. 1015

Nevertheless, there are available measures that could be used in future empirical studies that seek to test and refine the propositions developed herein. For example, the degree of digitalization of an established industry could be measured using digital maturity models (Thordsen et al., 2020) or digital business intensity (Nwankpa & Datta, 2017). Novel, firm-level constructs such as digital orientation (Kindermann et al., 2021; Quinton et al., 2018) could also be adapted to measure the degree to which digital technologies have pervaded an established industry. Similarly, a firm's technological dependence may be measured using a count of its patents that, in turn, cite patents assigned to digital outsiders, with an emphasis on Cooperative Patent Classification (CPC) codes for digital technologies (for example, G06 and H04). Moreover, equity-based corporate venturing practices may be measured as the annual sum of (a) acquisitions, (b) joint ventures, (c) CVC investments, and (d) acquihires undertaken by a firm (for example, Titus et al., 2017). Non-equity external corporate venturing practices may be measured as the sum of alliances, partnerships, accelerators, and incubators. 1020 1025 1030

Future research is required to operationalize and examine the factors proposed for the pre-acquihiring and post-acquihiring phases, with retention of acquihired employees (Makinen et al., 2012) suggested as the measure of the focal dependent variable – acquihiring success. Scholars may also consider evaluating the influence of SME size on the propositions put forth in this study. SMEs vary widely in size, whether measured using the number of employees, ownership structure, or revenue, and this size variance within SMEs may influence their strategic actions and performance outcomes (Drnevich & West, 2021). For example, in the acquihiring context, small businesses on the higher end of the SME size range may be better positioned than those on the lower end, based on financial, operational, and technological requirements for successful acquisition and integration. Conversely, the acquired teams may view an acquisition by a relatively small SME more favorably in terms of post-acquisition cultural integration and operational flexibility than a buyout by a much larger SME with more rigid hierarchies and processes. 1035 1040 1045

Conclusion

The rapid and relentless diffusion of digital technologies across industries and geographies demands greater attention from management and organization scholars. Established industries, in particular, are facing disruption by outsiders equipped with digital artifacts, infrastructure, and platforms. This phenomenon is the focal topic of this paper, which argues that the digitalization of an established industry is likely to increase the technological 1050 1055

dependence of its constituent firms, who may pursue cross-industry corporate venturing strategies to mitigate this resource dependence. We propose that SMEs in established industries may be well positioned to pursue novel corporate venturing practices, specifically acquihires, to access and control strategic digital resources in the form of human talent with technical prowess. This work helps to provide scholars with an avenue for further theoretical and empirical research at the intersection of digital technologies and small business management. For entrepreneurs and SME leaders, the key takeaway is the strategic use of acquihiring as a compelling response to the risk of disruption by industry outsiders at the forefront of the digital economy.

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References

- Adner, R. (2017). Ecosystem as structure: An actionable construct for strategy. *Journal of Management*, 43(1), 39–58. <https://doi.org/10.1177/0149206316678451>
- Adner, R., & Kapoor, R. (2010). Value creation in innovation ecosystems: How the structure of technological interdependence affects firm performance in new technology generations. *Strategic Management Journal*, 31(3), 306–333. <https://doi.org/10.1002/smj.821>
- Adner, R., Puranam, P., & Zhu, F. (2019). What is different about digital strategy? From quantitative to qualitative change. *Strategy Science*, 4(4), 253–261. <https://doi.org/10.1287/stsc.2019.0099>
- Afuah, A. (2003). Redefining firm boundaries in the face of the internet: Are firms really shrinking? *Academy of Management Review*, 28(1), 34–53. <https://doi.org/10.2307/30040688>
- Ahsan, M. (2017). The right people at the right time—the place does not matter. *Academy of Management Review*, 42(1), 145–148. <https://doi.org/10.5465/amr.2015.0276>
- Ahsan, M., & Fernhaber, S. A. (2019). Multinational enterprises: Leveraging a corporate international entrepreneurship lens for new insights into subsidiary initiatives. *Journal of International Management*, 25(1), 51–65. <https://doi.org/10.1016/j.intman.2018.07.002>
- Ahuja, G., & Katila, R. (2001). Technological acquisitions and the innovation performance of acquiring firms: A longitudinal study. *Strategic Management Journal*, 22(3), 197–220. <https://doi.org/10.1002/smj.157>

- Anokhin, S., Peck, S., & Wincent, J. (2016). Corporate venture capital: The role of governance factors. *Journal of Business Research*, 69(11), 4744–4749. <https://doi.org/10.1016/j.jbusres.2016.04.024> 1095
- Arthur, W. B. (1996). Increasing returns and the new world of business. *Harvard Business Review*, 74(4), 100.
- Arthur, W. B. (2009). *The nature of technology: What it is and how it evolves*. Simon and Schuster.
- Arvanitis, S., & Stucki, T. (2015). Do mergers and acquisitions among small and medium-sized enterprises affect the performance of acquiring firms? *International Small Business Journal*, 33(7), 752–773. <https://doi.org/10.1177/0266242614522280> 1100
- Autio, E., Nambisan, S., Thomas, L. D., & Wright, M. (2018). Digital affordances, spatial affordances, and the genesis of entrepreneurial ecosystems. *Strategic Entrepreneurship Journal*, 12(1), 72–95. <https://doi.org/10.1002/sej.1266> 1105
- Bain, J. S. (1968). *Industrial organization*. Wiley.
- Bakir, B., & Karim, S. (2021). Reconfiguration through acqui-hires: Redeployment and retention of human capital post-acquisition. SSRN. <https://doi.org/10.2139/ssrn.3912332>
- Barkema, H. G., & Schijven, M. (2008). How do firms learn to make acquisitions? A review of past research and an agenda for the future. *Journal of Management*, 34(3), 594–634. <https://doi.org/10.1177/0149206308316968> 1110
- Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management*, 17(1), 99–120. <https://doi.org/10.1177/014920639101700108>
- Bauer, F., & Matzler, K. (2014). Antecedents of M&A success: The role of strategic complementarity, cultural fit, and degree and speed of integration. *Strategic Management Journal*, 35(2), 269–291. <https://doi.org/10.1002/smj.2091> 1115
- Belleflamme, P. (2016). The economics of digital goods: A progress report. *Review of Economic Research on Copyright Issues*, 13(2), 1–24.
- Benson, D., & Ziedonis, R. H. (2009). Corporate venture capital as a window on new technologies: Implications for the performance of corporate investors when acquiring startups. *Organization Science*, 20(2), 329–351. <https://doi.org/10.1287/orsc.1080.0386> 1120
- Benson, D., & Ziedonis, R. H. (2010). Corporate venture capital and the returns to acquiring portfolio companies. *Journal of Financial Economics*, 98(3), 478–499. <https://doi.org/10.1016/j.jfneco.2010.07.003>
- Benzell, S. G., & Brynjolfsson, E. (2019). *Digital abundance and scarce genius: Implications for wages, interest rates, and growth* (No. w25585). National Bureau of Economic Research.
- Bharadwaj, A., El Sawy, O. A., Pavlou, P. A., & Venkatraman, N. V. (2013). Digital business strategy: Toward a next generation of insights. *MIS Quarterly*, 37(2), 471–482. <https://doi.org/10.25300/MISQ/2013/37:2.3>
- Bharadwaj, P. N., & Soni, R. G. (2007). E-commerce usage and perception of e-commerce issues among small firms: Results and implications from an empirical study. *Journal of Small Business Management*, 45(4), 501–521. <https://doi.org/10.1111/j.1540-627X.2007.00225.x> 1130
- Bierwerth, M., Schwens, C., Isidor, R., & Kabst, R. (2015). Corporate entrepreneurship and performance: A meta-analysis. *Small Business Economics*, 45(2), 255–278. <https://doi.org/10.1007/s11187-015-9629-1> 1135
- Biniari, M. G., Simmons, S. A., Monsen, E. W., & Pizarro Moreno, M. I. (2015). The configuration of corporate venturing logics: An integrated resource dependence and institutional perspective. *Small Business Economics*, 45(2), 351–367. <https://doi.org/10.1007/s11187-015-9635-3>
- Blank, S. (2013). Why the lean start-up changes everything. *Harvard Business Review*, 91(5), 63–72. 1140

- Boudreau, K., Jeppesen, L. B., & Miric, M. (2021). The paradox of platform-based entrepreneurship: Competing while sharing resources. *SSRN Electronic Journal*. <https://doi.org/10.2139/ssrn.3897435>
- Brynjolfsson, E., & McAfee, A. (2014). *The second machine age: Work, progress, and prosperity in a time of brilliant technologies*. WW Norton & Company. 1145
- Casciaro, T., & Piskorski, M. J. (2005). Power imbalance, mutual dependence, and constraint absorption: A closer look at resource dependence theory. *Administrative Science Quarterly*, 50(2), 167–199. <https://doi.org/10.2189/asqu.2005.50.2.167>
- Cefis, E., & Marsili, O. (2015). Crossing the innovation threshold through mergers and acquisitions. *Research Policy*, 44(3), 698–710. <https://doi.org/10.1016/j.respol.2014.10.010> 1150
- Chatterji, A., & Patro, A. (2014). Dynamic capabilities and managing human capital. *Academy of Management Perspectives*, 28(4), 395–408. <https://doi.org/10.5465/amp.2013.0111>
- Chaudhuri, S., & Tabrizi, B. (1999). Capturing the real value in high-tech acquisitions. *Harvard Business Review*, 77(5), 123–132. 1155
- Chen, P. Y., & Hitt, L. M. (2006). Information technology and switching costs. In T. Hendershott (Ed.), *Handbook on economics and information systems* (Vol. 1, pp. 437–470). Amsterdam, The Netherlands: Elsevier. [http://dx.doi.org/10.1016/S1574-0145\(06\)01008-7](http://dx.doi.org/10.1016/S1574-0145(06)01008-7)
- Chen, J., Hsieh, S., & Zhang, F. (2021). Hiring high-skilled labor through mergers and acquisitions. *SSRN*. <https://doi.org/10.2139/ssrn.4134426> 1160
- Cloodt, M., Hagedoorn, J., & Van Kranenburg, H. (2006). Mergers and acquisitions: Their effect on the innovative performance of companies in high-tech industries. *Research Policy*, 35(5), 642–654. <https://doi.org/10.1016/j.respol.2006.02.007>
- Colombo, M. G., & Murtinu, S. (2017). Venture capital investments in Europe and portfolio firms' economic performance: Independent versus corporate investors. *Journal of Economics & Management Strategy*, 26(1), 35–66. <https://doi.org/10.1111/jems.12170> 1165
- Corbett, A., Covin, J. G., O'Connor, G. C., & Tucci, C. L. (2013). Corporate entrepreneurship: State-of-the-art research and a future research agenda. *Journal of Product Innovation Management*, 30(5), 812–820. <https://doi.org/10.1111/jpim.12031> 1170
- Cragg, P., Mills, A., & Suraweera, T. (2013). The influence of IT management sophistication and IT support on IT success in small and medium-sized enterprises. *Journal of Small Business Management*, 51(4), 617–636. <https://doi.org/10.1111/jsbm.12001>
- Cusumano, M. (2022). The evolution of research on industry platforms. *Academy of Management Discoveries*, 8(1), 7–14. <https://doi.org/10.5465/amd.2020.0091> 1175
- Cusumano, M. A., Gawer, A., & Yoffie, D. B. (2019). *The business of platforms: Strategy in the age of digital competition, innovation, and power*. Harper Business.
- Cutolo, D., & Kenney, M. (2021). Platform-dependent entrepreneurs: Power asymmetries, risks, and strategies in the platform economy. *Academy of Management Perspectives*, 35(4), 584–605. <https://doi.org/10.5465/amp.2019.0103> 1180
- Czarnitzki, D., & Van Criekingen, K. (2019). New evidence on determinants of intellectual property litigation: A market-based approach. *International Journal of the Economics of Business*, 26(1), 93–115. <https://doi.org/10.1080/13571516.2019.1553289>
- Dabić, M., Vlačić, B., Kiessling, T., Caputo, A., & Pellegrini, M. (2021). Serial entrepreneurs: A review of literature and guidance for future research. *Journal of Small Business Management*, 1–36. <https://doi.org/10.1080/00472778.2021.1969657> 1185
- Dahlander, L., & Magnusson, M. (2008). How do firms make use of open source communities? *Long Range Planning*, 41(6), 629–649. <https://doi.org/10.1016/j.lrp.2008.09.003>
- Danuso, A., Giones, F., & da Silva, E. R. (2022). The digital transformation of industrial players. *Business Horizons*, 65(3), 341–349. <https://doi.org/10.1016/j.bushor.2021.04.001> 1190

- Daspit, J. J., Fox, C. J., & Findley, S. K. (2021). Entrepreneurial mindset: An integrated definition, a review of current insights, and directions for future research. *Journal of Small Business Management*, 1–33. <https://doi.org/10.1080/00472778.2021.1907583>
- Dess, G. G., & Beard, D. W. (1984). Dimensions of organizational task environments. *Administrative Science Quarterly*, 29(1), 52–73. <https://doi.org/10.2307/2393080> 1195
- Dess, G. G., Ireland, R. D., Zahra, S. A., Floyd, S. W., Janney, J. J., & Lane, P. J. (2003). Emerging issues in corporate entrepreneurship. *Journal of Management*, 29(3), 351–378. [https://doi.org/10.1016/S0149-2063\(03\)00015-1](https://doi.org/10.1016/S0149-2063(03)00015-1)
- DeTienne, D. R. (2010). Entrepreneurial exit as a critical component of the entrepreneurial process: Theoretical development. *Journal of Business Venturing*, 25(2), 203–215. <https://doi.org/10.1016/j.jbusvent.2008.05.004> 1200
- DeTienne, D. R., & Cardon, M. S. (2012). Impact of founder experience on exit intentions. *Small Business Economics*, 38(4), 351–374. <https://doi.org/10.1007/s11187-010-9284-5>
- DeTienne, D. R., McKelvie, A., & Chandler, G. N. (2015). Making sense of entrepreneurial exit strategies: A typology and test. *Journal of Business Venturing*, 30(2), 255–272. <https://doi.org/10.1016/j.jbusvent.2014.07.007> 1205
- DeTienne, D. R., & Wennberg, K. (Eds.). (2015). *Research handbook of entrepreneurial exit*. Edward Elgar Publishing.
- Devers, C. E., Wuorinen, S., McNamara, G., Halebian, J., Gee, I. H., & Kim, J. (2020). An integrative review of the emerging behavioral acquisition literature: Charting the next decade of research. *The Academy of Management Annals*, 14(2), 869–907. <https://doi.org/10.5465/annals.2018.0031> 1210
- Drees, J. M., & Heugens, P. P. (2013). Synthesizing and extending resource dependence theory: A meta-analysis. *Journal of Management*, 39(6), 1666–1698. <https://doi.org/10.1177/0149206312471391> 1215
- Drnevich, P. L., & West, J. (2021). Performance implications of technological uncertainty, age, and size for small businesses. *Journal of Small Business Management*, 1–36. <https://doi.org/10.1080/00472778.2020.1867733>
- Drover, W., Busenitz, L., Matusik, S., Townsend, D., Anglin, A., & Dushnitsky, G. (2017). A review and road map of entrepreneurial equity financing research: Venture capital, corporate venture capital, angel investment, crowdfunding, and accelerators. *Journal of Management*, 43(6), 1820–1853. <https://doi.org/10.1177/0149206317690584> 1220
- Dushnitsky, G., & Lavie, D. (2010). How alliance formation shapes corporate venture capital investment in the software industry: A resource-based perspective. *Strategic Entrepreneurship Journal*, 4(1), 22–48. <https://doi.org/10.1002/sej.81> 1225
- Dushnitsky, G., & Lenox, M. J. (2005). When do firms undertake R&D by investing in new ventures? *Strategic Management Journal*, 26(10), 947–965. <https://doi.org/10.1002/smj.488>
- Dutta, D. K., & Hora, M. (2017). From invention success to commercialization success: Technology ventures and the benefits of upstream and downstream supply-chain alliances. *Journal of Small Business Management*, 55(2), 216–235. <https://doi.org/10.1111/jsbm.12334> 1230
- Dyer, J. H., Kale, P., & Singh, H. (2004). When to ally and when to acquire. *Harvard Business Review*, 82(7–8), 109–115.
- Eggers, F., Hatak, I., Kraus, S., & Niemand, T. (2017). Technologies that support marketing and market development in SMEs—Evidence from social networks. *Journal of Small Business Management*, 55(2), 270–302. <https://doi.org/10.1111/jsbm.12313> 1235
- Fan, T., Schwab, A., & Geng, X. (2021). Habitual entrepreneurship in digital platform ecosystems: A time-contingent model of learning from prior software project experiences. *Journal of Business Venturing*, 36(5), 106140. <https://doi.org/10.1016/j.jbusvent.2021.106140>

- Fantasia, R. (2016). Acqui hiring: A new process for innovation and organizational learning. In F. Ricciardi, & A. Harfouche (Eds.), *Information and communication technologies in organizations and society* (pp. 205–214). Springer. https://doi.org/10.1007/978-3-319-28907-6_13 1240
- Galbraith, B., McAdam, R., & Cross, S. E. (2019). The evolution of the incubator: Past, present, and future. *IEEE Transactions on Engineering Management*, 68(1), 265–271. <https://doi.org/10.1109/TEM.2019.2905297> 1245
- García-Granero, A., Llopis, Ó., Fernández-Mesa, A., & Alegre, J. (2015). Unraveling the link between managerial risk-taking and innovation: The mediating role of a risk-taking climate. *Journal of Business Research*, 68(5), 1094–1104. <https://doi.org/10.1016/j.jbusres.2014.10.012> 1250
- Gartner. (2018). *Understanding gartner's hype cycles*. <https://www.gartner.com/en/documents/3887767>
- Gartner. (2018b). *5 trends emerge in the gartner hype cycle for emerging technologies*. <https://www.gartner.com/smarterwithgartner/5-trends-emerge-in-gartner-hype-cycle-for-emerging-technologies-2018> 1255
- Gartner. (2021). *Gartner identifies four trends driving near-term artificial intelligence innovation*. <https://www.gartner.com/en/newsroom/press-releases/2021-09-07-gartner-identifies-four-trends-driving-near-term-artificial-intelligence-innovation>
- Gautier, A., & Lamesch, J. (2021). Mergers in the digital economy. *Information Economics and Policy*, 54, 100890. <https://doi.org/10.1016/j.infoecopol.2020.100890> 1260
- Generational Equity. (2021). *Generational equity advises computer deductions in its sale to Futuris company*. <https://www.genequityco.com/press-releases/computer-deductions-in-sale-to-futuris-company>
- Geospace. (2021). *Geospace technologies corporation acquires advanced water IoT technology company Aquana, LLC*. <https://www.businesswire.com/news/home/20210707005831/en/Geospace-Technologies-Corporation-Acquires-Advanced-Water-IoT-Technology-Company-Aquana-LLC> 1265
- Glikson, E., & Woolley, A. W. (2020). Human trust in artificial intelligence: Review of empirical research. *The Academy of Management Annals*, 14(2), 627–660. <https://doi.org/10.5465/annals.2018.0057> 1270
- Globe Newswire. (2022). *Alliance consumer group acquires HALO, a leading portable power products company with an extensive IP portfolio*. <https://www.globenewswire.com/en/news-release/2022/01/06/2362603/0/en/Alliance-Consumer-Group-Acquires-HALO-a-Leading-Portable-Power-Products-Company-With-an-Extensive-IP-Portfolio.html>
- Goecke, T., Michaelis, B., & Schweizer, L. (2018). Retention strategies in M&A processes—an exploratory case study on turnover during mergers and acquisitions in the German software industry. In S. Finkelstein & C. L. Cooper (Eds.), *Advances in mergers and acquisitions* (Vol. 17, pp. 165–184). Emerald Publishing Limited. <https://doi.org/10.1108/S1479-361X20180000017008> 1275
- Graebner, M. E. (2009). Caveat venditor: Trust asymmetries in acquisitions of entrepreneurial firms. *Academy of Management Journal*, 52(3), 435–472. <https://doi.org/10.5465/amj.2009.41330413> 1280
- Graebner, M. E., & Eisenhardt, K. M. (2004). The seller's side of the story: Acquisition as courtship and governance as syndicate in entrepreneurial firms. *Administrative Science Quarterly*, 49(3), 366–403. <https://doi.org/10.2307/4131440> 1285
- Graebner, M. E., Eisenhardt, K. M., & Roundy, P. T. (2010). Success and failure in technology acquisitions: Lessons for buyers and sellers. *Academy of Management Perspectives*, 24(3), 73–92. <https://doi.org/10.5465/amp.24.3.73>

- Graebner, M. E., Heimeriks, K. H., Huy, Q. N., & Vaara, E. (2017). The process of postmerger integration: A review and agenda for future research. *The Academy of Management Annals*, 11(1), 1–32. <https://doi.org/10.5465/annals.2014.0078> 1290
- Grant, R. M., & Baden-fuller, C. (2004). A knowledge accessing theory of strategic alliances. *Journal of Management Studies*, 41(1), 61–84. <https://doi.org/10.1111/j.1467-6486.2004.00421.x>
- Haleblian, J., & Finkelstein, S. (1999). The influence of organizational acquisition experience on acquisition performance: A behavioral learning perspective. *Administrative Science Quarterly*, 44(1), 29–56. <https://doi.org/10.2307/2667030> 1295
- Hanelt, A., Firk, S., Hildebrandt, B., & Kolbe, L. M. (2021). Digital M&A, digital innovation, and firm performance: An empirical investigation. *European Journal of Information Systems*, 30(1), 3–26. <https://doi.org/10.1080/0960085X.2020.1747365> 1300
- Hartmann, P., & Henkel, J. (2020). The rise of corporate science in AI: Data as a strategic resource. *Academy of Management Discoveries*, 6(3), 359–381. <https://doi.org/10.5465/amd.2019.0043>
- Haskel, J., & Westlake, S. (2017). *Capitalism without capital*. Princeton University Press.
- He, Q., Meadows, M., Angwin, D., Gomes, E., & Child, J. (2020). Strategic alliance research in the era of digital transformation: Perspectives on future research. *British Journal of Management*, 31(3), 589–617. <https://doi.org/10.1111/1467-8551.12406> 1305
- Hemphill, T. A. (2010). The ‘new protectionism’: Industrial policy barriers to cross-border mergers and acquisitions. *Competition & Change*, 14(2), 124–148. <https://doi.org/10.1179/102452910X12587274068196> 1310
- Hillman, A. J., Withers, M. C., & Collins, B. J. (2009). Resource dependence theory: A review. *Journal of Management*, 35(6), 1404–1427. <https://doi.org/10.1177/0149206309343469>
- Hovenkamp, H. (2022). President Biden’s executive order on competition: An antitrust analysis. *Arizona Law Review*, 64(2). <https://doi.org/10.2139/ssrn.3887776>
- Howson, P. (2017). *Due diligence: The critical stage in mergers and acquisitions*. Routledge. 1315
- Hunter, W. C., & Jagtiani, J. (2003). An analysis of advisor choice, fees, and effort in mergers and acquisitions. *Review of Financial Economics*, 12(1), 65–81. [https://doi.org/10.1016/S1058-3300\(03\)00007-7](https://doi.org/10.1016/S1058-3300(03)00007-7)
- Hunt, R. A., Townsend, D. M., Asgari, E., & Lerner, D. A. (2019). Bringing it all back home: Corporate venturing and renewal through spin-ins. *Entrepreneurship Theory and Practice*, 43(6), 1166–1193. <https://doi.org/10.1177/1042258718778547> 1320
- Hussinger, K. (2010). On the importance of technological relatedness: SMEs versus large acquisition targets. *Technovation*, 30(1), 57–64. <https://doi.org/10.1016/j.technovation.2009.07.006>
- Ireland, R. D., Covin, J. G., & Kuratko, D. F. (2009). Conceptualizing corporate entrepreneurship strategy. *Entrepreneurship Theory and Practice*, 33(1), 19–46. <https://doi.org/10.1111/j.1540-6520.2008.00279.x> 1325
- Jaravel, X., Petkova, N., & Bell, A. (2018). Team-specific capital and innovation. *The American Economic Review*, 108(4–5), 1034–1073. <https://doi.org/10.1257/aer.20151184>
- Josefy, M., Kuban, S., Ireland, R. D., & Hitt, M. A. (2015). All things great and small: Organizational size, boundaries of the firm, and a changing environment. *The Academy of Management Annals*, 9(1), 715–802. <https://doi.org/10.5465/19416520.2015.1027086> 1330
- Keil, T. (2004). Building external corporate venturing capability. *Journal of Management Studies*, 41(5), 799–825. <https://doi.org/10.1111/j.1467-6486.2004.00454.x>
- Keil, T., Maula, M., Schildt, H., & Zahra, S. A. (2008). The effect of governance modes and relatedness of external business development activities on innovative performance. *Strategic Management Journal*, 29(8), 895–907. <https://doi.org/10.1002/smj.672> 1335

- Keil, T., Maula, M. V., & Wilson, C. (2010). Unique resources of corporate venture capitalists as a key to entry into rigid venture capital syndication networks. *Entrepreneurship Theory and Practice*, 34(1), 83–103. <https://doi.org/10.1111/j.1540-6520.2009.00366.x> 1340
- Kim, J. D. (2020). Startup acquisitions as a hiring strategy: Worker choice and turnover. SSRN. <https://doi.org/10.5465/AMBPP.2020.12959abstract>
- Kim, S. H., Jang, S. Y., & Yang, K. H. (2017). Analysis of the determinants of Software-as-a-Service adoption in small businesses: Risks, benefits, and organizational and environmental factors. *Journal of Small Business Management*, 55(2), 303–325. <https://doi.org/10.1111/jsbm.12304> 1345
- Kindermann, B., Beutel, S., de Lomana, G. G., Strese, S., Bendig, D., & Brettel, M. (2021). Digital orientation: Conceptualization and operationalization of a new strategic orientation. *European Management Journal*, 39(5), 645–657. <https://doi.org/10.1016/j.emj.2020.10.009>
- King, D. R., Dalton, D. R., Daily, C. M., & Covin, J. G. (2004). Meta-analyses of post-acquisition performance: Indications of unidentified moderators. *Strategic Management Journal*, 25(2), 187–200. <https://doi.org/10.1002/smj.371> 1350
- King, D. R., Wang, G., Samimi, M., & Cortes, A. F. (2021). A meta-analytic integration of acquisition performance prediction. *Journal of Management Studies*, 58(5), 1198–1236. <https://doi.org/10.1111/joms.12636> 1355
- Kohler, T. (2016). Corporate accelerators: Building bridges between corporations and startups. *Business Horizons*, 59(3), 347–357. <https://doi.org/10.1016/j.bushor.2016.01.008>
- Kristiana, Y., Panjaitan, A., Goeltom, V. A., & Prasetya, A. B. (2021). Managing employee retention in mergers and acquisitions: A systematic review. *International Journal of Social Policy and Law*, 2(4), 44–54. <https://doi.org/10.8888/ijospl.v2i4.75> 1360
- Kuratko, D. F. (2017). Corporate entrepreneurship 2.0: Research development and future directions. *Foundations and Trends in Entrepreneurship*, 13(6), 441–490. <https://doi.org/10.1561/03000000082>
- Laamanen, T., & Keil, T. (2008). Performance of serial acquirers: Toward an acquisition program perspective. *Strategic Management Journal*, 29(6), 663–672. <https://doi.org/10.1002/smj.670> 1365
- Lai, G., Liu, H., & Xiao, W. (2018). “Fulfilled by Amazon”: A strategic perspective of competition at the e-commerce platform. SSRN. <https://doi.org/10.2139/ssrn.3270958>
- Lavie, D., Kang, J., & Rosenkopf, L. (2011). Balance within and across domains: The performance implications of exploration and exploitation in alliances. *Organization Science*, 22(6), 1370–1517–1538. <https://doi.org/10.1287/orsc.1100.0596>
- Lenox, M. J., Rockart, S. F., & Lewin, A. Y. (2010). Does interdependency affect firm and industry profitability? An empirical test. *Strategic Management Journal*, 31(2), 121–139.
- Listcorp. (2022). *Acquisition - Oyster cloud agritech*. <https://www.listcorp.com/asx/e33/east-33-limited/news/acquisition-oyster-cloud-agritech-2721058.html> 1375
- Lloyd’s. (2018). *Cloud down*. <https://www.lloyds.com/clouddown>
- Lockett, A., Wiklund, J., Davidsson, P., & Girma, S. (2011). Organic and acquisitive growth: Re-examining, testing and extending Penrose’s growth theory. *Journal of Management Studies*, 48(1), 48–74. <https://doi.org/10.1111/j.1467-6486.2009.00879.x>
- Logistics Business. (2022). *Stow Robotics acquires iFollow*. <https://www.logisticsbusiness.com/materials-handling-warehousing/warehouse-vehicles-agvs/stow-robotics-acquires-ifollow/> 1380
- Luybaert, M., & De Maeseneire, W. (2015). Antecedents of time to completion in mergers and acquisitions. *Applied Economics Letters*, 22(4), 299–304. <https://doi.org/10.1080/13504851.2014.939370>
- Macredie, R., & Mijinyawa, K. (2011). A theory-grounded framework of open source software adoption in SMEs. *European Journal of Information Systems*, 20(2), 237–250. <https://doi.org/10.1057/ejis.2010.60> 1385

- Maertz, C. P., Jr., & Campion, M. A. (2004). Profiles in quitting: Integrating process and content turnover theory. *Academy of Management Journal*, 47(4), 566–582. <https://doi.org/10.2307/20159602> 1390
- Majchrzak, A., & Markus, M. L. (2012). Technology affordances and constraints in management information systems (MIS). In E. Kessler (Ed.), *Encyclopedia of management theory* (pp. 832–836). Sage Publications.
- Makinen, M., Haber, D., & Raymundo, A. (2012). Acqui-hires for growth: Planning for success. *Venture Capital Review*, 28, 31–42. 1395
- Mani, D., Barua, A., & Whinston, A. B. (2006). Successfully governing business process outsourcing relationships. *MIS Quarterly Executive*, 5(1), 4.
- Manyika, J., Mischke, J., Bughin, J., Woetzel, J., Krishnan, M., & Cudre, S. (2019). A new look at the declining labor share of income in the United States. *McKinsey Global Institute Discussion Paper*, 1–64. 1400
- Mawson, S., & Brown, R. (2017). Entrepreneurial acquisitions, open innovation and UK high growth SMEs. *Industry and Innovation*, 24(4), 382–402. <https://doi.org/10.1080/13662716.2016.1244764>
- McAdams, J. M. (2019). Non-compete agreements: A review of the literature. *SSRN Electronic Journal*. <https://doi.org/10.2139/ssrn.3513639> 1405
- McNamara, G. M., Haleblian, J., & Dykes, B. J. (2008). The performance implications of participating in an acquisition wave: Early mover advantages, bandwagon effects, and the moderating influence of industry characteristics and acquirer tactics. *Academy of Management Journal*, 51(1), 113–130. <https://doi.org/10.5465/amj.2008.30755057>
- Menz, M., Kunisch, S., Birkinshaw, J., Collis, D. J., Foss, N. J., Hoskisson, R. E., & Prescott, J. E. (2021). Corporate strategy and the theory of the firm in the digital age. *Journal of Management Studies*, 58(7), 1695–1720. <https://doi.org/10.1111/joms.12760> 1410
- Miles, M. P., & Covin, J. G. (2002). Exploring the practice of corporate venturing: Some common forms and their organizational implications. *Entrepreneurship Theory and Practice*, 26(3), 21–40. <https://doi.org/10.1177/104225870202600302> 1415
- Muehlfeld, K., Rao Sahib, P., & Van Witteloostuijn, A. (2012). A contextual theory of organizational learning from failures and successes: A study of acquisition completion in the global newspaper industry, 1981–2008. *Strategic Management Journal*, 33(8), 938–964. <https://doi.org/10.1002/smj.1954>
- Murnieks, C. Y., Klotz, A. C., & Shepherd, D. A. (2020). Entrepreneurial motivation: A review of the literature and an agenda for future research. *Journal of Organizational Behavior*, 41(2), 115–143. <https://doi.org/10.1002/job.2374> 1420
- Musteen, M., & Ahsan, M. (2013). Beyond cost: The role of intellectual capital in offshoring and innovation in young firms. *Entrepreneurship Theory and Practice*, 37(2), 421–434. <https://doi.org/10.1111/j.1540-6520.2011.00477.x> 1425
- Musteen, M., Ahsan, M., & Park, T. (2017). Smes, intellectual capital, and offshoring of service activities: An empirical investigation. *Management International Review*, 57(4), 603–630. <https://doi.org/10.1007/s11575-017-0315-1>
- Nadolska, A., & Barkema, H. G. (2014). Good learners: How top management teams affect the success and frequency of acquisitions. *Strategic Management Journal*, 35(10), 1483–1507. <https://doi.org/10.1002/smj.2172> 1430
- Nahavandi, A., & Malekzadeh, A. R. (1988). Acculturation in mergers and acquisitions. *Academy of Management Review*, 13(1), 79–90. <https://doi.org/10.2307/258356>
- Nambisan, S. (2017). Digital entrepreneurship: Toward a digital technology perspective of entrepreneurship. *Entrepreneurship Theory and Practice*, 41(6), 1029–1055. <https://doi.org/10.1111/etap.12254> 1435

- Nambisan, S., & Baron, R. A. (2019). On the costs of digital entrepreneurship: Role conflict, stress, and venture performance in digital platform-based ecosystems. *Journal of Business Research*, 125, 520–532. <https://doi.org/10.1016/j.jbusres.2019.06.037>
- Nambisan, S., & Luo, Y. (2021). Toward a loose coupling view of digital globalization. *Journal of International Business Studies*, 52(8), 1646–1663. <https://doi.org/10.1057/s41267-021-00446-x>
- Nambisan, S., Siegel, D., & Kenney, M. (2018). On open innovation, platforms, and entrepreneurship. *Strategic Entrepreneurship Journal*, 12(3), 354–368. <https://doi.org/10.1002/sej.1300> 1445
- Nambisan, S., Wright, M., & Feldman, M. (2019). The digital transformation of innovation and entrepreneurship: Progress, challenges and key themes. *Research Policy*, 48(8), 103773. <https://doi.org/10.1016/j.respol.2019.03.018>
- Narayanan, V. K., Yang, Y., & Zahra, S. A. (2009). Corporate venturing and value creation: A review and proposed framework. *Research Policy*, 38(1), 58–76. <https://doi.org/10.1016/j.respol.2008.08.015> 1450
- Nason, R. S., McKelvie, A., & Lumpkin, G. T. (2015). The role of organizational size in the heterogeneous nature of corporate entrepreneurship. *Small Business Economics*, 45(2), 279–304. <https://doi.org/10.1007/s11187-015-9632-6>
- Neely, B. H., Jr., Lovelace, J. B., Cowen, A. P., & Hiller, N. J. (2020). Metacritiques of upper echelons theory: Verdicts and recommendations for future research. *Journal of Management*, 46(6), 1029–1062. <https://doi.org/10.1177/0149206320908640> 1455
- Ng, W., & Stuart, T. (2019). Acquired: Retained or turned over? *SSRN Electronic Journal*. <https://doi.org/10.2139/ssrn.3461723>
- Nolan, S. (2015). Talent for sale: The need for enhanced scrutiny in judicial evaluation of acqui-hires. *The Hastings Law Journal*, 67(3), 849. 1460
- Nwankpa, J. K., & Datta, P. (2017). Balancing exploration and exploitation of IT resources: The influence of digital business intensity on perceived organizational performance. *European Journal of Information Systems*, 26(5), 469–488. <https://doi.org/10.1057/s41303-017-0049-y>
- Ott, C. (2020). The risks of mergers and acquisitions—analyzing the incentives for risk reporting in Item 1A of 10-K filings. *Journal of Business Research*, 106, 158–181. <https://doi.org/10.1016/j.jbusres.2019.08.028> 1465
- Parhankangas, A., & Arenius, P. (2003). From a corporate venture to an independent company: A base for a taxonomy for corporate spin-off firms. *Research Policy*, 32(3), 463–481. [https://doi.org/10.1016/S0048-7333\(02\)00018-5](https://doi.org/10.1016/S0048-7333(02)00018-5) 1470
- Pereira, V., Munjal, S., & Ishizaka, A. (2019). Outsourcing and offshoring decision making and its implications for businesses-A synthesis of research pursuing five pertinent questions. *Journal of Business Research*, 103, 348–355. <https://doi.org/10.1016/j.jbusres.2019.07.009>
- Pfeffer, J., & Salancik, G. R. (1978). *The external control of organizations: A resource dependence perspective*. Harper & Row. 1475
- Pieters, W., & van Cleeff, A. (2009). The precautionary principle in a world of digital dependencies. *Computer*, 42(6), 50–56. <https://doi.org/10.1109/MC.2009.203>
- Polsky, G. D., & Coyle, J. F. (2013). Acqui-hiring. *Duke Law Journal*, 63(2), 281–346.
- Popp, K. M. (2013). *Mergers and acquisitions in the software industry: Foundations of due diligence*. Books on Demand. 1480
- Porter, M. E. (1980). *Competitive strategy: Techniques for analyzing industries and competitors*. Free Press.
- Quinton, S., Canhoto, A., Molinillo, S., Pera, R., & Budhathoki, T. (2018). Conceptualising a digital orientation: Antecedents of supporting SME performance in the digital economy. *Journal of Strategic Marketing*, 26(5), 427–439. <https://doi.org/10.1080/0965254X.2016.1258004> 1485

- Ranft, A. L., & Lord, M. D. (2000). Acquiring new knowledge: The role of retaining human capital in acquisitions of high-tech firms. *The Journal of High Technology Management Research*, 11(2), 295–319. [https://doi.org/10.1016/S1047-8310\(00\)00034-1](https://doi.org/10.1016/S1047-8310(00)00034-1)
- Rifkin, J. (2014). *The zero marginal cost society: The internet of things, the collaborative commons, and the eclipse of capitalism*. St. Martin's Press. 1490
- Rikap, C., & Lundvall, B. Å. (2020). Big tech, knowledge predation and the implications for development. *Innovation and Development*, 1–28. <https://doi.org/10.1080/2157930X.2020.1855825>
- Rothaermel, F. T., & Boeker, W. (2008). Old technology meets new technology: Complementarities, similarities, and alliance formation. *Strategic Management Journal*, 29(1), 47–77. <https://doi.org/10.1002/smj.634>
- Salvato, C., Lassini, U., & Wiklund, J. (2007). Dynamics of external growth in SMEs: A process model of acquisition capabilities emergence. *Schmalenbach Business Review*, 59(3), 282–305. <https://doi.org/10.1007/BF03396752> 1500
- Santos, F. M., & Eisenhardt, K. M. (2005). Organizational boundaries and theories of organization. *Organization Science*, 16(5), 491–508. <https://doi.org/10.1287/orsc.1050.0152>
- Sardeshmukh, S. R., Goldsby, M., & Smith, R. M. (2021). Are work stressors and emotional exhaustion driving exit intentions among business owners? *Journal of Small Business Management*, 59(4), 544–574. <https://doi.org/10.1111/jsbm.12477> 1505
- Sauermann, H. (2018). Fire in the belly? Employee motives and innovative performance in start-ups versus established firms. *Strategic Entrepreneurship Journal*, 12(4), 423–454. <https://doi.org/10.1002/sej.1267>
- Saura, J. R., Palacios-Marqués, D., & Ribeiro-Soriano, D. (2021). Digital marketing in SMEs via data-driven strategies: Reviewing the current state of research. *Journal of Small Business Management*, 1–36. <https://doi.org/10.1080/00472778.2021.1955127> 1510
- Sawicki, A. (2014). Buying teams. *Seattle University Law Review*, 38(2), 651.
- Schildt, H. A., Maula, M. V., & Keil, T. (2005). Explorative and exploitative learning from external corporate ventures. *Entrepreneurship Theory and Practice*, 29(4), 493–515. <https://doi.org/10.1111/j.1540-6520.2005.00095.x> 1515
- Shankar, R. K., & Shepherd, D. A. (2019). Accelerating strategic fit or venture emergence: Different paths adopted by corporate accelerators. *Journal of Business Venturing*, 34(5), 105886. <https://doi.org/10.1016/j.jbusvent.2018.06.004>
- Sharma, P., & Chrisman, J. J. (1999). Toward a reconciliation of the definitional issues in the field of corporate entrepreneurship. *Entrepreneurship Theory and Practice*, 23(3), 11–28. <https://doi.org/10.1177/104225879902300302> 1520
- Siachou, E., Vrontis, D., & Trichina, E. (2021). Can traditional organizations be digitally transformed by themselves? The moderating role of absorptive capacity and strategic interdependence. *Journal of Business Research*, 124, 408–421. <https://doi.org/10.1016/j.jbusres.2020.11.011> 1525
- Si, S., Hall, J., Suddaby, R., Ahlstrom, D., & Wei, J. (2022). Technology, entrepreneurship, innovation and social change in digital economics. *Technovation*, 102484.
- SMS PLC. (2022). *Strategic investments*. <https://www.sms-plc.com/investors/regulatory-news/>
- Smyrniotis, N. (2018). *Internet oligopoly: The corporate takeover of our digital world*. Emerald Group Publishing. <https://doi.org/10.1108/9781787691971> 1530
- Stahl, G. K., & Voigt, A. (2008). Do cultural differences matter in mergers and acquisitions? A tentative model and examination. *Organization Science*, 19(1), 160–176. <https://doi.org/10.1287/orsc.1070.0270>

- Steensma, H. K., & Corley, K. G. (2000). On the performance of technology-sourcing partner- 1535
ships: The interaction between partner interdependence and technology attributes. *Academy
of Management Journal*, 43(6), 1045–1067. <https://doi.org/10.2307/1556334>
- Sun, P. Y., & Anderson, M. H. (2010). An examination of the relationship between absorptive
capacity and organizational learning, and a proposed integration. *International Journal of
Management Reviews*, 12(2), 130–150. <https://doi.org/10.1111/j.1468-2370.2008.00256.x> 1540
- Teng, B. S. (2007). Corporate entrepreneurship activities through strategic alliances:
A resource-based approach toward competitive advantage. *Journal of Management
Studies*, 44(1), 119–142. <https://doi.org/10.1111/j.1467-6486.2006.00645.x>
- Teodoridis, F. (2018). Understanding team knowledge production: The interrelated roles of
technology and expertise. *Management Science*, 64(8), 3625–3648. [https://doi.org/10.1287/ 1545
mnsc.2017.2789](https://doi.org/10.1287/ 1545
mnsc.2017.2789)
- Thomke, S., & Kuemmerle, W. (2002). Asset accumulation, interdependence and technological
change: Evidence from pharmaceutical drug discovery. *Strategic Management Journal*, 23(7),
619–635. <https://doi.org/10.1002/smj.242>
- Thordsen, T., Murawski, M., & Bick, M. (2020). How to measure digitalization? A critical 1550
evaluation of digital maturity models. In *Conference on e-Business, e-Services and e-Society*
(pp. 358–369). Springer, Cham. https://doi.org/10.1007/978-3-030-44999-5_30
- Tilson, D., Lyytinen, K., & Sørensen, C. (2010). Digital infrastructures: The missing is research
agenda. Research commentary. *Information Systems Research*, 21(4), 748–759. [https://doi.
org/10.1287/isre.1100.0318](https://doi.
org/10.1287/isre.1100.0318) 1555
- Titus, V., Jr., House, J. M., & Covin, J. G. (2017). The influence of exploration on external
corporate venturing activity. *Journal of Management*, 43(5), 1609–1630. [https://doi.org/10.
1177/0149206314562426](https://doi.org/10.
1177/0149206314562426)
- Trichterborn, A., Zu Knyphausen-aufseß, D., & Schweizer, L. (2016). How to improve
acquisition performance: The role of a dedicated M&A function, M&A learning process, 1560
and M&A capability. *Strategic Management Journal*, 37(4), 763–773. [https://doi.org/10.
1002/smj.2364](https://doi.org/10.
1002/smj.2364)
- UK Competition and Markets Authority. (2019). *Online platforms and digital advertising
market study*. [https://www.gov.uk/cma-cases/online-platforms-and-digital-advertising-
market-study](https://www.gov.uk/cma-cases/online-platforms-and-digital-advertising-
market-study) 1565
- Vagnani, G. (2015). Exploration and long-run organizational performance: The moderating
role of technological interdependence. *Journal of Management*, 41(6), 1651–1676. [https://
doi.org/10.1177/0149206312466146](https://
doi.org/10.1177/0149206312466146)
- Varian, H. R. (2021). Seven deadly sins of tech? *Information Economics and Policy*, 54, 100893.
<https://doi.org/10.1016/j.infoecopol.2020.100893> 1570
- Varian, H. R., Farrell, J., & Shapiro, C. (2004). *The economics of information technology*.
Cambridge University Press. <https://doi.org/10.1017/CBO9780511754166>
- Verhoef, P. C., Broekhuizen, T., Bart, Y., Bhattacharya, A., Dong, J. Q., Fabian, N., &
Haenlein, M. (2021). Digital transformation: A multidisciplinary reflection and research
agenda. *Journal of Business Research*, 122, 889–901. [https://doi.org/10.1016/j.jbusres.2019. 1575
09.022](https://doi.org/10.1016/j.jbusres.2019. 1575
09.022)
- von Briel, F., Davidsson, P., & Recker, J. (2018). Digital technologies as external enablers of new
venture creation in the IT hardware sector. *Entrepreneurship Theory and Practice*, 42(1),
47–69. <https://doi.org/10.1177/1042258717732779>
- Vuori, N., Vuori, T. O., & Huy, Q. N. (2018). Emotional practices: How masking negative 1580
emotions impacts the post-acquisition integration process. *Strategic Management Journal*,
39(3), 859–893. <https://doi.org/10.1002/smj.2729>
- Wareham, J., Fox, P. B., & Cano Giner, J. L. (2014). Technology ecosystem governance.
Organization Science, 25(4), 1195–1215. <https://doi.org/10.1287/orsc.2014.0895>

- Washington Post. (2021). *Major internet outage along East Coast causes large parts of the Web to crash — again*. <https://www.washingtonpost.com/business/2021/07/22/internet-outage-amazon-airbnb-delta/> 1585
- Wasserman, N. (2003). Founder-CEO succession and the paradox of entrepreneurial success. *Organization Science*, 14(2), 149–172. <https://doi.org/10.1287/orsc.14.2.149.14995>
- Weitzel, U., & McCarthy, K. J. (2011). Theory and evidence on mergers and acquisitions by small and medium enterprises. *International Journal of Entrepreneurship and Innovation Management*, 14(2–3), 248–275. <https://doi.org/10.1504/IJEIM.2011.041734> 1590
- Welch, X., Pavićević, S., Keil, T., & Laamanen, T. (2020). The pre-deal phase of mergers and acquisitions: A review and research agenda. *Journal of Management*, 46(6), 843–878. <https://doi.org/10.1177/0149206319886908> 1595
- Wen, W., Ceccagnoli, M., & Forman, C. (2016). Opening up intellectual property strategy: Implications for open source software entry by start-up firms. *Management Science*, 62(9), 2668–2691. <https://doi.org/10.1287/mnsc.2015.2247>
- Wennberg, K., Wiklund, J., DeTienne, D. R., & Cardon, M. S. (2010). Reconceptualizing entrepreneurial exit: Divergent exit routes and their drivers. *Journal of Business Venturing*, 25(4), 361–375. <https://doi.org/10.1016/j.jbusvent.2009.01.001> 1600
- Wulf, J., & Blohm, I. (2020). Fostering value creation with digital platforms: A unified theory of the application programming interface design. *Journal of Management Information Systems*, 37(1), 251–281. <https://doi.org/10.1080/07421222.2019.1705514>
- Yoo, Y., Boland, R. J., Jr., Lyytinen, K., & Majchrzak, A. (2012). Organizing for innovation in the digitized world. *Organization Science*, 23(5), 1398–1408. <https://doi.org/10.1287/orsc.1120.0771> 1605
- Zaheer, A., Castañer, X., & Souder, D. (2013). Synergy sources, target autonomy, and integration in acquisitions. *Journal of Management*, 39(3), 604–632. <https://doi.org/10.1177/0149206311403152> 1610
- Zahra, S. A. (2021). International entrepreneurship in the post Covid world. *Journal of World Business*, 56(1), 101143. <https://doi.org/10.1016/j.jwb.2020.101143>
- Zahra, S. A., & Covin, J. G. (1995). Contextual influences on the corporate entrepreneurship-performance relationship: A longitudinal analysis. *Journal of Business Venturing*, 10(1), 43–58. [https://doi.org/10.1016/0883-9026\(94\)00004-E](https://doi.org/10.1016/0883-9026(94)00004-E) 1615
- Zhu, F., & Liu, Q. (2018). Competing with complementors: An empirical look at Amazon.Com. *Strategic Management Journal*, 39(10), 2618–2642. <https://doi.org/10.1002/smj.2932>
- Zittrain, J. (2006). The generative internet. *Harvard Law Review*, 119(7), 1974–2040. <https://doi.org/10.1145/1435417.1435426>
- Zollo, M., & Singh, H. (2004). Deliberate learning in corporate acquisitions: Post-acquisition strategies and integration capability in US bank mergers. *Strategic Management Journal*, 25(13), 1233–1256. <https://doi.org/10.1002/smj.426> 1620
- Zorn, M. L., Sexton, J. C., Bhussar, M. S., & Lamont, B. T. (2019). Unfinished business: Nested acquisitions, managerial capacity, and firm performance. *Journal of Management*, 45(4), 1488–1516. <https://doi.org/10.1177/0149206317708855> 1625