

ULISES NAVARRO AGUIAR
PhD student, Business &
Design Lab, School of
Business, Economics and Law
University of Gothenburg,
Sweden

DESIGN STRATEGY: TOWARDS A POST-RATIONAL, PRACTICE-BASED PERSPECTIVE

BY ULISES NAVARRO AGUIAR

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ABSTRACT

This paper critically reflects on the concept of design strategy as deployed in design management literature. It starts by describing current discourses in the wider field of strategy research and then discusses how, by conforming to orthodox theories in strategic management, design management literature has tended to overlook alternative streams of strategy research. In many instances, studies in design strategy adopt taken-for-granted assumptions from rational planning approaches, and analyses of firm performance tend to take precedence over actors and their actions. Thus, it highlights the need for new lines of inquiry grounded in practice, letting go of the economic rationality and theoretical abstractions that have permeated mainstream strategy research. Hence, for future studies, it suggests a post-rational, practice-based perspective to advance our understanding of strategy as it relates to design management.

INTRODUCTION

Over the last decade, design has been capturing the attention of many scholars in the broad field of management and organization studies (Rylander, 2009; Stigliani and Ravasi, 2012). This thrust of interest in design is obviously coupled with the rise of the 'design thinking' discourse throughout the second half of the 2000's, which emerged as "an approach meant to harness the creativity of the designer within the context of business" (Collins, 2013, p. 36). As pointed out by Rylander (2009), the rise of this discourse concurs with other trends in management oriented towards innovation. Without a doubt the hype created by 'design thinking' stretched the scope of the design management field, raising design awareness at large.

However, design management as a field of research is still in emergence seeking to establish itself in its own right. In the late 80's, the launch of the Design Management Review and the Design Management Journal, the periodical publications from the Design Management Institute, prompted more systematic discussions and research to understand the business and organizational side of design. The former uses the Harvard Business Review as a role model while the latter follows a scholarly direction. These publications have served as a vehicle for discussion in the development of the field, but for the most part, have remained quite focused on case studies (Kim and Chung, 2007), and not so much on theory development.

As an emerging field, design management has tended to 'borrow' theory and concepts from management studies to

apply them in design contexts (Erichsen and Christensen, 2013). These adaptations result in the acceptance of takenfor-granted assumptions that remain unquestioned or even plainly ignored, such is the case of existing research connecting design and strategy. From the outset, design management research has been more acquainted with the design research community than with the management research community (Erichsen and Christensen, 2013), which has caused a certain degree of naïveté in its approach to management theory. In the quest for a wider audience and relevance in practitioner settings, much of the design management literature has embraced well-established and orthodox theories in strategic management, referring to only a few prominent authors in the field —e.g. Michael E. Porter, Jay B. Barney—but overlooking contrasting schools of thought, and lacking a critical perspective. While some studies have used design as a metaphor for strategy-making, borrowing concepts from design theory (Liedtka, 2000; Heracleous and Jacobs, 2008; Hatchuel, et al. 2010), the actual practices of strategy-making in a design management context have seldom been studied in their discursive and material dimensions that transcend the economic rationality and managerialism that have permeated mainstream strategy discourses. Hence, the purpose of this paper is to contribute to the development of critical discussions connecting strategy research and design management studies, in order to challenge the deployment of orthodox notions of strategy in design management.

WHY DESIGN STRATEGY NOW?

On the most basic level strategy is defined as a plan of action designed to achieve a long-term or overall aim (Oxford Dictionary). Etymologically, it derives from the Greek word strategos which means 'generalship' or 'commandership', which in turn is composed by stratos (army) and agein (to lead). As Carter et al. (2009) note, strategy is essentially "a post-Second World War, largely US invention, with undoubted roots in military thinking" (p. 2).

Today, strategy is undoubtedly one of the most influential fields in management. Carter (2013) even calls it "the master concept of contemporary times" (p. 1047). One does not have to be a business-savvy person to recognize its importance. Indeed, strategy provided new language and practices through which organizations understand and organize (Carter, 2013). It exerts a determining influence over the practice of organizing and the study of organizations that impacts all corporate functions, including design.

These days there is a widespread recognition that

design is relevant for business. The integration of design approaches for innovation purposes in organizations is now commonplace. To talk about the strategic importance of design has arguably become a truism. Kim and Chung (2007) highlight the shift in roles from design as a function in product development, towards design as a strategic asset for firms. As they note, there is a "tendency to emphasize the importance of strategy in design management as a way of improving design's contributions" (Kim and Chung, 2007, p. 45). In the last decade, product-centered discourses have come to be replaced by strategy-centered discourses mainly focused on innovation.

This elevation of design in the eyes of the wider public has prompted questions about the strategic value of design, which is why discussions connecting design and strategy have become so prominent. Despite this overhaul in reputation, there is not a consistent understanding of 'design strategy' in the literature (Äijälä and Karjalainen, 2012). In some cases 'design strategy' refers to the long-term planning of brand and product development of a company, in other cases it refers to the set of decisions leading to the physical or functional attributes of a new product or new line of products, in other cases it refers to creative methods for strategy formulation, and still in other cases it refers to an overall design vision or a design style. In practice, the marriage between strategy and design is unfolding in different manners and under different labels such as 'design strategy', 'strategic design', or even 'design thinking'. As mentioned before, this advancement in the strategic standing of design and the expansion of its scope of work has been tied to the debated rise of 'design thinking', in conjunction with the growing influence of international design consultancies —e.g. IDEO, frog, Continuum—, which have stepped into the realm of strategy consulting, adopting more creative roles in the formulation of strategy for corporate clients, including 'strategy visualizers', 'core competency prospectors' (Seidel, 2000), and incorporating user knowledge and design research methods to enhance strategic decision-making (Chhatpar, 2007). The aim of this paper is not to present a comprehensive review of approaches to the definition of design strategy in the literature, but to problematize how the term is often deployed, so as to propose new lines of inquiry rooted upon alternative conceptualizations of strategy. In order to achieve this, a rough overview of four streams of strategy research is now presented.

FOUR STREAMS OF STRATEGY RESEARCH

As pointed out before, research in the discipline of strategy is in a rather mature stage. It is also witnessing the emergence of new approaches that both, confront and build upon, previous studies. Thus, an overview of the basic concepts underpinning each one of these streams is now presented (see Figure 1).

Rational Planning Approach

Historically, two leading proponents of business strategy research—today considered the founding fathers of strategic management—emerged in Cold War North America of the 1960's: Alfred D. Chandler and Igor H. Ansoff. Economics provided ready-made frameworks to this new emerging field of strategy which found legitimacy this way in a context of prevailing "modernist scientism" (Whittington, 2004, p. 64). Strategic management grew alongside management consultancies fostering the development of superior tools and methods for formulating better strategies for corporate clients (Mathiesen, 2013). Ansoff's analytics were further developed by Porter in the 1980's with the introduction of new concepts and models such as "competitive advantage", "value chain", "five forces analysis" (Porter, 1980; Porter, 1985). In this discourse, strategy is conceptualized as a rational and logical planning endeavor performed by top management and commonly known as 'strategic planning'. I will refer to this as the rational planning approach—also referred to as the design school, the positioning school or the industrial organization view of strategy—, which represents the still dominant and more traditional school of strategic management. According to this view, a company has competitive advantage when it is implementing a valuecreating strategy to acquire and develop competencies and resources that cannot be easily emulated by other competitors in order to outperform them, emphasizing firm performance (Porter, 1980). In this understanding, strategy is about consolidating actions to create or maintain a defendable position in an industry. The unit of analysis is referred to as "the firm" and the typical level of analysis is "the industry".

Despite its widespread influence, this approach has been severely criticized. In the 1990's, a certain unconformity with traditional models started to emerge, basically claiming that there was a lack of practical relevance (Campbell and Alexander, 1997). This model of strategy formulation assumes that managers, through careful planning, are able to identify sources of competitive advantage and direct their business accordingly (Alvesson and Willmott, 1995).

A managerialist stance that assumes that top managers at the corporate headquarters have all the information they need to make the best decisions. According to Ezzamel and Willmott (2004), rational planning is "governed by a normative compulsion to prescribe" (p. 45), in a relentless attempt to dictate how strategy should be. Strategy takes place in striking isolation, since scholars in this stream pay little attention to the influence of the institutional context in all strategic decision-making. Despite this criticism, Michael Porter is still considered the leading authority in business strategy and the rational planning approach is still at the core of MBA courses on strategy (Mathiesen, 2013).

Resource-based Approach

The resource-based view (RBV) of the firm has become a strong discourse in strategic management. This stream of strategy research developed as a complement to the rational planning approach, also based upon economic frameworks. However, the focus is diverted from the industry level of analysis upheld by rational planning approaches, in which the bases for firm performance are outside the firm, towards firm-level resources and capabilities that generate competitive advantage, explicitly looking at internal sources and assessing why firms in the same industry might differ in performance (Jarzabkowski, 2008; Kraaijenbrink et al., 2010). Thus, its key proposition is that if a firm is to attain a sustainable competitive advantage, it must acquire and control valuable, rare, inimitable, and non-substitutable resources and capabilities, in addition to fostering a state in which the organization can absorb and apply them (Barney, 1991). Resources are all assets, capabilities, organizational processes, information, knowledge controlled by a firm, as Barney (1991) argues.

The key proposition of RBV is shared by several related analyses (see Kraaijenbrink et al., 2010): core competences, dynamic capabilities, and the knowledge-based view. For instance, dynamic capability theory emerges as an improved development within RBV accounting for a more dynamic view of resources and capabilities within the firm.

The RBV theory has made an important contribution by expanding the conceptual lens of traditional strategic management. However, it has also been heavily criticized. It has been argued that valuable, rare, inimitable, and non-substitutable resources —a key element in the theory proposed by Barney (1991)— are neither necessary nor sufficient for sustainable competitive advantage, plus the concepts of 'value' and 'resource' have been reckoned as too indeterminate to constitute useful theory (Kraaijenbrink et

al., 2010). On another front, this view has been criticized for its conceptual and methodological limitations still bounded to economic rationality, since it fails to deliver a coherent account of strategy-making, namely how capabilities are developed and modified over time (Jarzabkowski, 2008). It could be argued that the rational planning and the resourcebased approach still suffer from 'physics envy' (Carter, 2013).

Process Approach

Henry Mintzberg is perhaps considered the most emblematic figure in the process approach, also known as the emergent school or the action school. Basically, he argues that strategic planning is an unrealistic enterprise, and critiques the idea that strategy can be created in a formal process (Mintzberg, 1992). In his view, strategy is emergent rather than intended, and it arises as a series of incremental decisions that form recognizable patterns after some time (Mintzberg, 2007). As a result, strategy can only be studied retrospectively. For Mintzberg (1992; 1994), it makes no sense creating a division between formulation and implementation, as he conceives strategy-making as a process whereby ideas "bubble up" from the bottom to the top of the organization. Middlemanagers play a crucial role as they are the ones who often come up and act upon these ideas to make them work in the organization. Thus, from this view, strategy is "a negotiated outcome of competing values and conflicts of interest" (Ezzamel and Willmott, 2004, p. 44).

The process approach in its different branches set forth by Mintzberg, Bower-Burgelman, Pettigrew, and others, breaks with the assumption that strategy is a top-down endeavor. It also introduces a dynamic view of strategy as a process in which the role of the strategist is problematized, and provides a humanizing perspective to strategy research (Jarzabkowski, 2008), one that takes into account the messy, political and sometimes irrational nature of organizations. This approach clearly resonates with the neo-instutationalist perspectives in organization studies, and provides more tools to investigate the human dimensions of the organization that were somehow lost in the economic theories of the rational planning approach. The approach here is post-rational as the focus is on how strategy actually unfolds in organizations (Pettigrew, 2007) as opposed to the rational planning approach whose focus lies on prescription and the definition of an ideal state of the firm.

Although this stream of research unveils interesting counterpoints to the rational planning approach, it has also been subjected to criticism. For instance, Mintzberg's work has been criticized for focusing only on grass roots strategies that emerge within the organization, negating agency in strategy-making, and centering the attention on the messy emergence of strategy that overlooks the relationship between formal intent and emergence (Jarzabkowski, 2008).

Strategy-as-practice Approach

As a an emerging movement in strategy research, strategy-as-practice (SAP) re-conceptualizes strategy as something that people *do* in organizations rather than something organizations *have* (Johnson *et al.*, 2007), with a "focus upon the way that actors interact with the social and physical features of context in the everyday activities that constitute practice" (Jarzabkowski, 2004, p. 529). In this sense, strategy is considered not only as an attribute of firms but also as an activity undertaken by people (Johnson *et al.*, 2003). The focus is not on firm performance —contrasting with other approaches—but on 'strategizing', in an attempt to uncover what it is exactly that practitioners do when they do strategy (Whittington, 2004). In mainstream strategy research, strategies are theorized as somehow disembodied, but SAP places human and socio-material interaction at the core,

for "if sustainable advantage can be achieved and sustained it is likely this is because such advantage is lodged in the interactive behaviours of people in organizations" (Johnson *et al.*, 2007, p. 8). Proponents of this current describe it as a "concern with what people do in relation to strategy and how this is influenced by and influences their organizational and institutional context" (Johnson *et al.*, 2007, p. 7).

Some of the criticism against this approach points to the fact that SAP draws from a number of varied theoretical inspirations leading to vagueness, which impedes the emergence of a proper school of thought (Mathiesen, 2013). It has also been criticized for the adoption of unclear and contradictory definitions of the concept of practice (Carter *et al.*, 2008). Also, it is still a matter of debate whether SAP is only a re-branding of the process approach, as both are postrational analyses and rely upon sociological perspectives to understand strategy-making. Furthermore, it has been suggested that SAP is managerialist and conservative in its understanding of strategy, failing to engage critically with it (Carter, 2013).

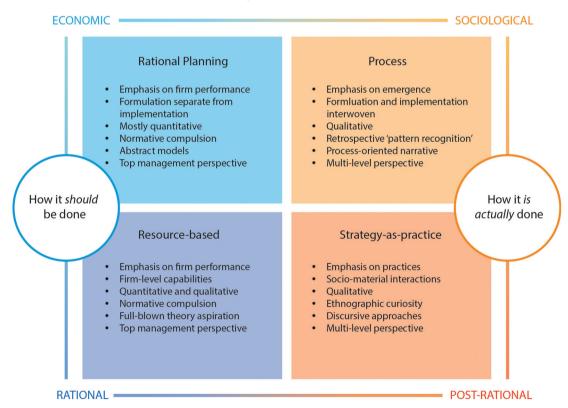


Fig. 1. Four streams of strategy research

ASSESSING DESIGN STRATEGY DISCOURSES

As Erichsen and Christensen (2013) point out, there are two visible trends in design management research, which are attributed to different generations of researchers: (1) infusing management approaches in design contexts, and (2) infusing design approaches (i.e. design thinking) in management contexts. This partition has led to different deployments of the connection between design and strategy. The notion of design itself can be treated in different ways in its relation to strategy. Sometimes design is narrowly treated as a practice of shaping material objects, some other times it is about a set of creative methods that can be applied to solve business problems, and some other times it is broadly conceptualized as a way of thinking or an attitude (for a review on 'design thinking', see Johansson Sköldberg et al., 2013). Stevens and Moultrie (2011) make a distinction between 'design strategy' and 'strategic design'. While the former refers to a long-term plan for implementing design at a product level, the latter refers to the successful exploitation of design throughout the firm. This semantic distinction is useful in the development of their argument but the two concepts are interchangeable at times in design management literature.

Infusing management approaches in design contexts

The first generation of design management researchers tend to present a picture of design as a key organizational resource that brings about many benefits for the firm, namely differentiation, brand recognition, development of successful and profitable products, development of a creative culture, creation of new markets —just to name a few—, and ultimately, superior performance and sustainable competitive advantage. For instance, Cooper et al. (1998) rely on a rational planning approach to strategy, characterizing design as yet another -somewhat overlooked resource for the firm to attain sustainable competitive advantage and affirm its position within the competitive landscape. This view assumes that clever design strategies lead to good design, translated into graphics, products, and environments in an organization, which, in turn, boosts firm performance. The sequential logic of this proposition denotes quite an orthodox view of strategy that fails to acknowledge the influence of institutional forces in shaping decisions. Approaching design from such a narrow perspective is not helpful, because it reduces design to rational economic frames, and submits it to performance standards that are not well-suited to the nature of the design project, which is based upon another epistemology. However, it is important to point out that, back in the 1990's, design was seldom

addressed as a strategic issue for companies, so it does not come as a surprise that design management scholars were using business speech and popular management concepts to appeal to a wider audience of management practitioners and academics, building the case for design in business. Thirteen years after the aforementioned publication, looking in retrospective at the development of the field of design management, Cooper and Junginger (2011) affirm that:

> "One of the ways in which it has tried to remain relevant is by picking up emergent themes of the day. This has allowed design management to capture the imagination of business leaders for a moment but it has also meant that it neglected its own research into design and almost abandoned its roots. A lot of energy was spent on fitting design into the management paradigms and with aligning design processes with those that were established and accepted in management." (p. 18)

For instance, drawing from the rational planning approach, Mallick (2000) uses contingency theory and the notion of strategic fit in product design. Borja de Mozota (2002) uses the value chain concept in connection with design management, to look at competitive advantages through design. Grzecznowska and Mostowicz (2004) discuss how design can improve competitiveness and profitability. Jun (2008) discusses how design strategy can be defined as strategic planning for markets. Also, Borja de Mozota (2006) uses the balance scorecard model in her analysis of the four powers of design. Indeed, the case for good design leads to better performance is a common trait in most of these studies. However, this single-minded conceptualization overlooks many social aspects and institutional elements that influence the practice of design in the organizational context.

Also, many studies incorporate notions belonging to the RBV approach to strategy. For instance, Jevnaker (2000) and Rosensweig (2011) take up the concept of dynamic capabilities to explain how design resources can be leveraged more effectively. Borja de Mozota and Kim (2009) argue that, in order to attain competitive advantage through design, firms need to consider design as a core competency as opposed to strategic fit. Undoubtedly, the focus on internal aspects is a step forward in the study of design strategy, but the discourse is still centered on firm performance, whereas actors and situated practices that build these so-called "design capabilities" are out of sight. The RBV framework is not fully equipped to unpack the notion of capabilities in a

theoretical explanation as it remains trapped in disembodied notions of strategy.

Most studies that draw from the rational planning approach, conceptualize design as a function in product development, and focus on controlling and managing design for competitive advantage in an output-focused discourse. In contrast, most studies that draw from the RBV approach, conceptualize design as a resource or core competency, and focus on the management and development of internal design capabilities for competitive advantage. Whereas for the former, the link between design and strategy could be described as using design (as a function) as part of a firm's strategy, for the latter it could be described as building design (as an internal capability) as part of a firm's strategy. While understandable, the use of popular strategic management concepts is counterproductive because it locks design into positivistic descriptions (Johansson-Sköldberg et al., 2013). The conceptualization of design as a resource for the firm, in the rational planning approach and the RBV vein, detaches design from practice and transforms it into another organizational process to hone and exploit, disregarding lived experience, actors and their actions. Indeed, analyses of firm performance tend to take precedence over actors and their actions.

Infusing design approaches in management contexts

The emergence of design thinking as a discourse in design management has highlighted the designer's skill and way of thinking as potential enablers to address managerial and strategic problems in a more creative way. Within this discourse, there is a clear aspiration of revitalizing the management field through the use of design approaches (Rylander, 2009). It is undeniable that this has prompted important —and still on-going—conversations about the role of design in organizations, making it a hot topic in the business agenda. However, there are some aspects that are problematic in the 'next-big-thing' thrill that followed the rise of 'design thinking'. The buzz in practitioner-oriented literature demystified, at the risk of oversimplification, the practice of design to management audiences, making it more graspable. Indeed, a large part of this literature embraces process and/or method oriented discourses that can only go so far, since they overlook tacit dimensions of knowledge in the practice of designing.

Many studies in this vein revolve around the idea of integrating design methods and/or designers in strategy development. For instance, Sanchez (2006) suggests that designers have skills and methods that can complement

more traditional market and industry analyses, namely, deep user knowledge and visualization skills. In the same line of thought, Chhatpar (2007) argues that the iterative, user-centric methodologies of design can supplement the rigor of traditional analytical approaches to allow for moreaccurate and flexible evaluation of strategic options. In this perspective, design is conceptualized as a set of creative human-centered methods that should support strategymaking activities. Studies adopting this angle advocate for design to have an active role in strategic management. Thus, design methods are viewed as complementary tools in the development of strategy, becoming some sort of 'addon' to existing strategic management processes. Hence, in this method-focused conceptualization, the link between design and strategy could be described as using design (as a creative methodology) to facilitate a firm's strategy-making process. Although this perspective embodies an alternative to traditional strategic thinking, and represents a new way of connecting design and strategy, the risk of conceptualizing design as a set of creative problem-solving methods, is that the actual experience of designing is abstracted away, potentially overshadowing other valuable perspectives of the design practice (Jahnke, 2012). Other studies in this vein focus on the way designers think in terms of general principles, using design as a metaphor for strategy-making and arguing that strategists should think like designers. This type of work resonates with the Managing as Designing movement (Boland & Collopy, 2004) and also Martin (2009) who suggest that managers should use design thinking as a way to approach indeterminate organizational problems. Hence, in this conceptualization, the link between design and strategy could be described as using design (as a way of thinking that managers should learn) to facilitate a firm's strategy-making process.

If our understanding of the connection between design and strategy is to improve, the discussion needs to go beyond the instrumental deployment of design as an approach for strategists to think more creatively. Future studies need to engage with the politics of organizational life and *experienced* design practice. Indeed, abstract explanations that obscure the messiness of context —e.g. power and politics, institutional arrangements, identity, materiality—still prevail. Studies seeking to infuse design approaches in management contexts are seldom critical of orthodox strategic management, and are rather advocating for design integration.

Perhaps in the more systematic attempt to align design and strategy perspectives to date, Stevens and Moultrie

(2011) set out to build a framework to identify design's strategic contributions. They go about it by importing four foci from research in strategic management: (1) competitive forces, (2) strategic fit and value creation, (3) resources and capabilities, (4) strategic vision. These broad categories serve as placements of contributions in a dialogue between strategic management and design management literature. However, their attempt at characterizing design's strategic contributions is mostly limited to rational planning and RBV approaches. Mintzberg (1994) is also referenced in the 'strategic vision' category, a concept that he proposes in an effort to challenge the idea of 'strategic planning' prevalent in traditional approaches. Interestingly, SAP perspectives remain largely ignored in Stevens' and Moultrie's (2011) analysis. This constitutes a potentially fertile avenue for future research. Introducing design's contribution by adopting orthodox perspectives might be important to reach audiences, but as Johansson and Woodilla (2011) assert:

> "we believe it is just as important – and even required from a Scandinavian perspective- for a research area to encompass different paradigms so that the range of underlying assumptions becomes broader and deeper. In particular, a research area that does not include critical and reflexive research is in danger of being too shallow." (p. 472)

CONCLUSION

As previously mentioned, mainstream assumptions in strategic management are still tied up to the notion of rational planning and the resource-based view of the firm, evidencing how modernism and Cartesian logic underpin the very foundations of strategy (Carter et al. 2009; Whittington, 2004). The rational planning approach, with its outside-in focus, has been heavily criticized as it distorts effective strategy processes (Mintzberg, 1987), and detaches the attention from practice (Whittington, 2004). Also, the resource-based view, a complementary orthodox discourse, with its inside-out focus, has been criticized for its conservative doctrine and economic assumptions, trying —but failing— to include explanations of socially complex forms of competitive advantage (Carter et al., 2009; Jarzabkowski, 2008). Interestingly, research linking design and strategy tends to adhere to these orthodox views, overlooking other streams of research, such as the process approach and strategy-as-practice. Indeed, Erichsen and Christensen (2013) draw attention to the fact that research in design management seldom reflects or includes indepth research on different schools of thought in strategy scholarship and tends to "only scratch the surface of the research themes in management" (p. 115). It could be argued that design strategy discourses have tended to be normative and prescriptive in an attempt to outline how design strategy should be, conforming to a restraining economic rationality. In current research, there is a clear lack of concern with experienced practice and contextual factors decisive in shaping activity.

Rarely has design been explicitly connected to strategy using an approach founded on experienced practice, and little has been said about the way designers actually 'strategize' in their organizations. This is most probably due to the widespread belief that strategy results from one-off decisions which are made in secret corporate rooms, and then implemented down through a hierarchy (Johnson et al., 2007). Thus, future studies should embrace post-rational analyses of strategy and adopt more critical viewpoints when looking at the interrelation and interdependence between strategizing and designing, and the politics associated with this relationship in the organizational context. SAP constitutes a novel approach to strategy research that might generate richer discussions of how things work, weaving together individual activities and the emergent strategy outcome. A practice-based perspective that takes into account socio-materiality might provide key elements to discover alternative contributions of design to the research and practice of strategy, going beyond the functionalism that has prevailed in design management research (Johansson & Woodilla, 2011).

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