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Entrepreneurship and project management relationships: So far so good? Dialogic conversation and Luhmannian perspective

Abstract:

Are Entrepreneurship and Project Management fields so far from each other? And is it so good? This paper proposes a critical viewpoint with content dependent on the author opinion and interpretation with two thesis. Thesis 1: Entrepreneurship and Project Management should converge because of the potential issues they shared and action-oriented links. Thesis 2: those two disciplines should stay separated because of the existence of two distinct discourses. We aim at highlighting the reasons supporting our two different thesis.

The argument, grounded on a *Luhmannian* lens (Luhmann, 1989, 1995, 2005), is that a research field is a self-reproducing social system.

This research argue that Project Management and Entrepreneurship are sharing both the same issues, and partly similar practices but with its own autonomous discourse and code.

Project management and entrepreneurship are grounded on same recent methods, structure and same startup culture as an ideology but different codes, discourse and carrying communications. Simple words as success, innovation, opportunity and performance have different meanings.

At the end this dialogical conversation, Entrepreneurship and Project Management should stay "far from each other" as they do not share the same discourse and code. This distance allows each discipline, to develop in its own way and may create a fruitful creative tension between these two applied science fields.

Key words: Project Management, Entrepreneurship, epistemology, autopoiesis

Article classification: viewpoint

Introduction

Both Projects and Entrepreneurial ventures are considered as powerful catalysts of economic prosperity and social progress. Currently, more than 25% of global economic activity takes place as projects, and in some emerging economies it exceeds 35%. For instance, World Development Indicators (2014) data¹ indicate that 24% of the world's \$75 trillion gross domestic product (GDP) is gross capital formation², which is almost entirely project-based. In the meantime, only 62% of projects meet original goals/business intent, 53% are completed within original budget, 49% are completed on time, 45 % experience scope creep, 32% are encountering budget lost and 16% are deemed failure (PMI, 2016, p.5). As PMI report states (2016, p.5) "*More critical is the money that continues to be wasted when projects aren't managed well. We see US\$122 million wasted for every US\$1 billion invested due to poor project performance*". And the situation is not improving over time.

Following those practical challenges, theorists have demonstrated theoretical connections. A historical study of 161 American SMEs by Covin and Slevin (1989) has established a correlation between an entrepreneurial posture and an organic structure. Team projects represent the archetypes of innovative structure for established firms. It helps to redefine or rejuvenate themselves, their positions within markets and industries, or the competitive arenas in which they compete. Those two literature streams have shared a common label: "*corporate entrepreneurship*" (Covin and Miles, 1999, p.47). But things have changed with the arrival of new kinds of firms: start-ups which proposed an original way to work together. How managing start-up development through a succession of exploration projects is now the question (Midler and Silberzhan, 2008)? Is it possible to use project management methods in the creation of a start-up business plan (Kisnyte, 2016)?

We need to define what we call project management and entrepreneurship here.

There are several definitions of Project Management. If we take the widely-used Project Management Institute (PMI) definition "*Project management is the application of knowledge, skills, tools, and techniques to project activities to meet the project requirements*" (PMI, 2013, p. 4), with a project being defined as "[...] *a temporary endeavor undertaken to create a unique product, service, or result.*" (PMI, 2013, p.3).

For entrepreneurship, we take the accepted definition of entrepreneurship as processes of discovering and exploiting business opportunities (Shane et Venkataraman, 200). This article is based on wider understanding of entrepreneurship, emphasizing that entrepreneurial acts may also happens in existing organizations (take over, franchising for example), including public authorities and voluntary associations.

¹ From World Bank Indicators web site url
<http://data.worldbank.org/indicator/NE.GDI.TOTL.ZS>: accessed on November 24 2016).

² Gross capital formation (formerly gross domestic investment) consists of outlays on additions to the fixed assets of the economy plus net changes in the level of inventories. According to the 1993 SNA, net acquisitions of valuables are also considered capital formation.
(<http://data.worldbank.org/indicator/NE.GDI.TOTL.ZS>: accessed on November 24 2016).

Consequently, Project Management and Entrepreneurship receive more and more interest and support from a wide variety of horizons. Observing this situation, an increased socio-economic weight and impact with high failure rate, academics have paid a special interest to Project Management and Entrepreneurship, trying to address the perceived dissatisfaction and offer possible explanations as well as way for improvements and higher success. Thus, for over thirty years, Project Management and Entrepreneurship are developing remarkably among management and organization studies. The historical perspective reveals that these two multidisciplinary fields were built in parallel on very distinct sets of mind and cultures (Fouché, 2011). However, the two disciplines aim at a similar endeavor: the transformation of abstract ideas into materialized organizations and deliver benefits. In addition, some authors emphasize that "*in real practice, the connections between entrepreneurship and project practice appear stronger*" and call for linking the two "*segregated communities*" (Kuura et al., 2014, p. 214).

Analyzing the link between the two fields through scientometrics approach, Fouché (2011, p. 328) concludes, with no ambiguity, to a divergence and that

"beyond a common belonging to Management sciences, Entrepreneurship and Project Management are actually not converging at the academic level. It is even sensible that with time, the disciplines tend to share less and less research drivers. It is consistent with the efforts achieved by the two scholarly communities to develop a mature research, ever more unified if possible." (Fouché, 2011, p. 10).

While many researches focus on linking entrepreneurship and project management, having convergence as underlying goal (Bröckling, 2016; DeFillippi and Spring, 2004; Frederiksen, L., and Davies, 2008; Kurra et al., 2014; Lindgren and Packendorff, 2003; Lundin et al., 2015), our purpose is to offer a dialogical conversation between two theses: 1) entrepreneurship and project management should converge vs. 2) entrepreneurship and project management should stay separated. Thus, we are not looking for synthesis or consensus, but rather, we aim at tentatively highlighting the underlying reasons supporting the two different theses, and to suggest possible avenues for "*productive misunderstanding*" between the two fields (Seidl, 2007, p. 206; Teubner, 2000, p. 408). And in doing so, to address the following questions: are entrepreneurship and project management fields so far from each other? And is it so good?

For this conversation, we focus on the two *research fields* (Kuura et al., 2014, p. 223), the discourses in both fields (Bröckling, 2016) and their "*structural coupling*" – "*the basic mechanism of this mutual stimulation between different discourses – despite their autonomy – can be described as 'structural coupling' (Luhmann, 1995)*" (Seidl, 2007, p. 209), although we may touch on *practice*, specially while talking about some shared "*labels*" between the two disciplines (Nicolai, 2004. p.955).

The conversation is organized in three sections, one for each thesis leading a phase of discussion/conclusion suggesting areas where divergence and convergence seem to be relevant, and underlining what it means for both research fields (Fiol, 2001).

Thesis 1: Entrepreneurship and Project Management should converge because of the potential action-oriented links

Despite that Entrepreneurship and Project Management have developed quite separately, those young disciplines share same issues.

First, both are to achieve a sustainable competitive advantage (Fiol, 2001). For instance, in industrial services, project managers invest in the entrepreneurial learning skills of their team (Matthyssens and Vandenbempt, 1998). They need to be innovative, proactive and proposing new solutions. In short, project teams are entrepreneurially-oriented and that stimulate corporate entrepreneurship (Dess and Lumpkin, 2005). In a recent research on 145 ICVs, Covin et al. demonstrate that internal corporate venture is contingent upon their ability to adjust their value proposition as the venture develop (Covin et al. 2015). Firms engaging in "*internal corporate venturing activity can facilitate the recognition of product-market opportunities, the development of new organizational capabilities, the discovery of new technological possibilities, and the creation of new strategic trajectories*". (Covin et al. p. 762).

Second, a new organization - project or venture - share the same market pressure specially for innovative products or services. Both face uncertainty. New entrants have to learn from, by and about the market. For example, an "incubation period" is often said to exist when new technology-based firms introduce novel products to the market (Christensen and Raynor, 2003). Entrepreneurs and project managers are searching for clarification by markets of how and why particular value propositions are or are not appealing. Agile organizations methods are appropriate for entrepreneurs and project managers. They are considered as those that learn fast and are effective. Stettina and Horz (2015) propose a research based on 30 interviews conducted in 14 large European organizations to understand how those entrepreneurial methods to learn quickly and inexpensively about the market could be applied in project management. This study contributes to the understanding of agile project management methods applied in IT project portfolios. Agile methods have been implemented bottom-up in the majority of our cases. This is reflected in the fact that characteristics perceived as agile can be mostly found on the project level and portfolio level. They point out the danger of lack of commitment of senior management (Stettina and Horz, 2015). Digital native entrepreneurs are less confronted to that problem.

Third, new venture and project-based enterprises are composed of social actors embedded in networks. Entrepreneurs used collaborative relationships that convey the information and resources required to carry out new projects. Ferriani et al. 2009 analyze the performance determinants of project-entrepreneurs, namely the individuals who are responsible for launching and carrying out those projects. They argue that project-entrepreneurs' performance is related to their degree of centrality within the social network, and their familiarity with the selected project-team as captured by the distribution of ties among team members. They test the hypotheses within the Hollywood Film Industry over the period 1992–2003. The findings point to the existence of diminishing returns to centrality and performance benefits from assembling teams that combine old-timers and newcomers (Ferriani et al. 2009).

Fourth, Entrepreneurship and Project Management share the same teams management processes. "Small is beautiful". This phrase could describe both fields in the sense that: teams are small, coherent, multidisciplinary and highly-result oriented. Teams members are often deviant from socially accepted norms (Lin et al. 2016). They are concentrated in the same physical locale which foster creativity (McKeever et al., 2016). Both the project manager and the entrepreneur generate deep personal loyalty among their team members. In both cases teams are highly

autonomous, responsible and incentive-driven. Project teams at Google are a case in point: while Google employees are encouraged to devote 20% of their time to personal projects, they are expected to deliver upon those projects within a relatively short time frame. As the following Google slogan exemplifies, “*fail early fail fast!*”. In other words, employees devoting their time to non-performing projects can expect early dismissal. Entrepreneurs and project managers have irregular schedules and are not prone to engage in routine skullduggery (Barczak and Wilemon, 1989). Fixed daily routines are often nonexistent in start-ups because they not yet had the time to emerge. Similarly, project managers often choose to eschew such routines in an attempt to reproduce the entrepreneurial culture. Start-ups are by definition vulnerable and often short-lived so that teams are often temporary. That being said, however, in highly entrepreneurial areas such as Silicon Valley or Route 128 in Massachusetts the same *individuals* often tend to move from one project/team to another. A central argument about employment mobility in regional clusters concerns the opportunities for new Learning. The concept of “boundaryless career” was recently tested in a French cluster Minalogic (Culié et al., 2014) with 42 interviews this research has highlighted how inter-firm collaborations can lead to the development of individual career capital, and in turn boost individual psychological mobility.

Fifth, an emerging common discourse about effectuation/causation: dichotomy or continuum is possible thanks to the convergence of those two fields (Alvarez and Barney, 2013). It is often argued that causation is more prevalent in project management while effectuation is more dominant in entrepreneurship. As Brettel et al. (2012) have shown on 123 RandD projects, effectuation is positively related to success in highly innovative contexts and causation approaches are beneficial in projects with low levels of innovativeness. It is not the field that is determinant but rather the degree of innovativeness (Brettel et al 2012).

Thesis 2: entrepreneurship and project management should stay separated because of the existence of two distinct discourses

Considering the richness and inherent complexity of a research field, it seems to be relevant to focus on discourses and narratives and to look at the stories told within the field to make sense of them and to gain a full picture of its line of thoughts (Tsoukas and Hatch, 2001).

Typically, this kind of study allows to unveil various schools of thought within a field. Both in project management (table 1) and entrepreneurship (table 3) several typologies have been suggested with some commonalities and differences. Table 2 shows, for the Nine Schools exposed by Bredillet (2010) and Turner et. (2013), the key idea associated with each school and the metaphor we have adopted to reflect it.

Insert Table 1

Insert Table 2

Insert Table 3

Contrary to project management, entrepreneurship is beyond the field in management studies (Huang and Knight, 2017). The reason is because historical inspirations of literature on the entrepreneur rely mainly on economic, psychological and sociological authors.

The foundation of our argument, grounded on a *Luhmannian* lens (Luhmann, 1989, 1995, 2005), is that a research field is a self-reproducing social system. This leads us to take what Seidl names a "*systemic-discursive perspective*" (Seidl, 2007, p. 199) and to apprehend a given research field as an *autopoietic* communication system operationally closed (Hernes and Bakken, 2003, p. 1515) with its own autonomous discourse and code (Seidl, 2007, p. 202). Indeed, each system "*possesses its individual code, according to which its communications are meaningful*" (Seidl, 2007, p. 202).

Project management and entrepreneurship are grounded on different codes carrying communications. Project management research discourse is built on the code *success*. Whatever the school of thought and the research onto-epistemological or paradigmatic lens, the purpose of project management research is ultimately to improve project success. This can be seen most explicitly (or implicitly) in the way scientific publications set the scene, justify their relevance and claim to contribute to the research field. Entrepreneurship research discourse is formed around the code *opportunity* (Alvarez and Barney, 2013; Shane, 2012; Vogel, 2016). This code is independent from the onto-epistemological or paradigmatic perspective taken by a research work. Entrepreneurship research is fundamentally about contributing, in a way or another, to unveil opportunities, "*made*" or "*found*" (Garud and Giuliani, 2013). Thus, the two fields "differ fundamentally in the way they process meaning" because communications are encoded in a different way (Seidl, 2007, p. 203). Project management or entrepreneurship research are examined according to their own criteria making them meaningful within their own system of discourse. For instance, the concept of "*performance*" is not constructed the same way and doesn't convey the same meaning for the two fields. In project management the variable *performance* is usually related to the success of a project according to defined goals to be met at the end of the project, whereas in entrepreneurship *performance* may relate to growth, future profit, or any specific goals pursued by an entrepreneur and this at different time horizons.

One may say that the two fields are sharing some similar general concepts. However, as explained above, "*the same words have different meanings in different contexts or discourses. Thus, the transfer of a set of labels from one discourse to another is associated with a (mostly unnoticed) re-interpretation, i.e. with a change of its meaning.*" (Seidl, 2007, p. 206). Thus, when referring to a shared *label*, e.g. innovation (Kuura et al, 2014, p. 216), this *label* is understood in a different way in each field, making any attempt of common use vain. We can, as matter of illustration, state that the label "start-up" has a different focus and meaning in project management and in entrepreneurship: a project start-up phase (i.e. planning) (Midler and Silberzahn, 2008) or business start-up being one form of an entrepreneurial act involving four phases - "*the idea, pre-start-up, start-up and post-start-up phase*" (Kuura et al., 2014, pp. 220, 224).

Thus, "*a discourse cannot receive an input of meaning from another discourse*" (Seidl, 2007, p. 207). This aspect is described as "*productive misunderstanding*" (Teubner, 2000, p. 408): "*In a precise sense, interdiscursive translation is impossible. Here lies the paradox of today's babylonian language confusion. Between the discourses, the continuation of meaning is impossible*

and at the same time necessary. The way out of this paradox is misunderstanding. One discourse cannot but reconstruct the meaning of the other in its own terms and context and at the same time can make use of the meaning material of the other discourse as an external provocation to create internally something new." (Teubner, 2000, p. 408).

Following Luhmann, introducing labels, i.e. concepts, from outside is the source of "perturbation" in the operationally closed discursive systems, i.e. the research fields. These labels are re-interpreted according to the specific code of each system, and may create new idiosyncratic meaning in each system. Considering the two fields as an ecology of discourses (Seidl, 2007, p. 208), the shared concepts or labels are "*a source of mutual stimulation between different discourses – despite their autonomy*", and their operational closure. This phenomenon is described as "*structural coupling*" (Luhmann, 1992, p. 1432). Through structural coupling, different discourses can "*adjust with regards to each other*" (Seidl, 2007, p. 209).

In summary, whatever the shared labels or concepts, apparent influence in a way or another between the two fields or from a tierce field, each field remain a distinct discursive operationally closed system with its own communication code.

Discussion and conclusion

To our first question "are entrepreneurship and project management fields so far from each other?" the answer is Yes! We can argue that the two fields are grounded on two different discourses and codes, and therefore "*differ fundamentally in the way they process meaning*" (Seidl, 2007, p. 205). Project Management and Entrepreneurship researches have also two distinct institutional status, exemplifying the distance between them.

The academic status of a research discipline can be assessed but the number and the impact factors or related journals, and by the place the discipline have in the University academic organization (is this a faculty, a school, a department, a discipline or subject matter expertise within a department, and so on).

Based on the Scopus database journal list, table 4 summarizes some key facts and figures. First, considering the active publications, we find 25 journals in entrepreneurship (E) and 6 journals in project management (PM). Second, observing the 2015 Impact per Publication (IPP), 4 journals in entrepreneurship have an IPP higher than 2, the highest being 4, 223, while 2 journals in project management have a score above this threshold with the highest being 3,424. Third, paying attention to the coverage of the journals (All Science Classification Codes (ASJC)), it appears that PM journals are mainly covering Business, Management and Accounting (code 1400) and Environmental Science (2300), in more details : Business and International Management (1403), 1404 Management Information Systems (1404), marginally Management of Technology and Innovation (1405), Strategy and Management (1408), and Sustainability and the Environment, Management, Monitoring, Policy and Law (2308). E journals have a broader coverage including Business, Management and Accounting (1400), Decision Sciences (1800), Economics, Econometrics and Finance (2000), Energy (2100), and Social Sciences (3300), i.e. Business, Management and Accounting (miscellaneous) (1401), Business and International Management (1403), 1404 Management Information Systems (1404), Management of Technology and Innovation (1405), 1406 Marketing (1406), Strategy and Management (1408), Information

Systems and Management (1802), Economics and Econometrics (2002), Renewable Energy (2105), Sustainability and the Environment, Management, Monitoring, Policy and Law (2308), Development (3303), Education (3304), Gender Studies (3318) and Urban Studies (3322).

The difference between number of journals, in the impact factors of the top journals in each discipline, and in the breadth of coverage plead for acknowledging a distinction between the two fields, a difference of status and focus (Table 4).

Considering our second question "is it so good?", there is no easy answer. Looking for transdisciplinary research is useful only if it helps to better tackle grand challenges and makes "*a difference which makes a difference*"! (Bateson, 1972, p. 315).

We can argue that Project Management and Entrepreneurship are sharing both the same issues, and partly similar practices as exposed above in Thesis 1. In the meantime, and beyond these issues both field are, at least partly, including societal aspects such as sustainability, environment, resources efficiency and effectiveness, green aspects, social entrepreneurship, social design and innovation, computing and technological development (e.g. AI, machine learning, quantum computing) all impacting their discursive and socio-material practices (Orlikowski, 2007; Mantere and Vaara, 2008).

"*What is the difference that makes [possibly] a difference*"? (Bernstein, 1982). And how to move forward?

We may find some inspirational thinking process in "*Luhmann's general, transdisciplinary concept of autopoiesis*" (Seidl and Becker, 2005, p. 25). Many social researchers failed in their endeavors to apply the concept of autopoiesis in social science, trying to transfer the original biological concept (Maturana and Varela, 1980) directly from one field to the other. In contrast, Luhmann did not use the concept directly to the social domain but abstracted "*from the originally biological concept a general, transdisciplinary concept of autopoiesis. This transdisciplinary concept of autopoiesis was then be open to re-specifications by the different disciplines*" (Seidl and Becker, 2005, p. 25).

A possible way forward, matter of illustration only, is to start by acknowledging that both project management and entrepreneurship are applied sciences aiming at coping with institutional organizing tensions and competing demands (Smith and Lewis, 2011; Smith and Tracey, 2016). From there, we can move to a general science level, and beyond each specific discourse and code (although each discursive system remains. It is not an integration but rather, another dimension and addition to the ecology of discourses adding "another level" of structural coupling. The two fields are, indeed, part of the general scientific discourse (code true/false). Thus, instead of borrowing and blending, and transferring "laterally" and directly concepts from practice to practice or theory to theory, and practice to theory (such as done in Kuura et al.' s paper (2014, p. 223), we move "upwards" through abstracting from each field, general and transdisciplinary concept. In our illustration, we suggest considering the general concept of paradoxical organizing as transdisciplinary concept open to re-specifications by the different disciplines. Indeed, as aptly demonstrated by Smith and Lewis (2011) and Smith and Tracey (2016), a theory of paradox offers a relevant ground to better understand and explain organizing tensions, and how to cope with competing organizational demands, and to suggest our cyclical responses enable organizational sustainability.

Figure 1 summarizes the process of abstraction / re-specification, as well as the distinct logics and specific organizing perspectives. At general science level, we can find *Structural Realist*

organizing aiming at discovering fundamental structure of the universe through pure research, and *Foundationalist* organizing, looking for hidden patterns in data through induction. At applied science level, we have *Instrumentalist* organizing seeking for truth-independent problem solving and *Strong Paradigm* organizing intending to create scientific paradigm and exploit its implications. Finally, not represented in figure 1 as this logic can be found at various levels and in different fields, *Critical Realist* organizing, focusing on people emancipation from prevailing structures of power and oppression. (Kilduff et al., 2011, p. 299).

Insert Figure 1

At the end this dialogical conversation, we can put forward some main points.

Entrepreneurship and Project Management should stay "far from each other" as they do not share the same discourse and code. This distance allows each discipline, to develop in its own way and may create a fruitful creative tension between these two applied science fields.

In the meantime, it would "be good" to build on the shared issues and move, through an abstraction process, to a deeper conceptualization and general science lens allowing to tackle grand societal challenges in a more fruitful way. And this would allow to through re-conceptualizations to foster the development of the two disciplines in a more enlightened way!

Insert Table 4

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