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In Quest of Legitimacy: The Theoretical and Methodological Foundations of Entrepreneurship Education Research

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Abstract

This special issue editorial discusses the current state of entrepreneurship education research and identifies the ways in which the three quite different papers comprising this Special Issue contribute to advancing the theoretical and methodological foundations of the field. In doing so the introduction seeks to describe how and why entrepreneurship education research may struggle for legitimacy along with the complexities of working in this field. This Special Issue raises questions about entrepreneurship education research and through the featured papers, provides some responses. The special issue itself, however, is presented as part of an ongoing discussion about the nature and role of entrepreneurship education research more widely intended to provoke further, critical engagement with the topic and stimulate further theoretical and methodological development.

Keywords

Entrepreneurship education, entrepreneurship education research, entrepreneurship pedagogy, entrepreneurship didactics, ethics and epistemology

Introduction

Despite the proliferation of entrepreneurship and enterprise education witnessed in recent years, the growing entrepreneurship education literature demonstrates the need for additional and robust intellectual foundations both at theoretical and methodological levels (Pittaway & Cope, 2007). Often in the entrepreneurship education literature, the pedagogies are described but the papers lack conceptual and methodological foundations, inadequately describe the nature of interventions and adopt a less-than-convincing critical perspective. Most of the studies focus on a posteriori contributions of teaching experiences. Instructor narratives are often based on implicit, taken-for-granted, assumptions about learning theories with little reflection, theoretical and didactical knowledge or time for practitioner reflexivity. As a consequence, justification for learning activities and appropriate evaluation processes can be left wanting.

Considering the current state of knowledge in entrepreneurship education (see for example, Béchard and Grégoire, 2004; Edelman, Manolova and Brush, 2008; Honig, 2004; Neck and Greene,2011; and Pittaway and Cope, 2007), Fayolle (2013) recently called for a pragmatic and critical approach in the development of future perspectives on entrepreneurship education research stressing the importance of building theoretical foundations, bridging disciplines and communities (research and practice) and increasing critical thinking perspectives in relation to the field. In response to these ongoing discussions about the nature of entrepreneurship education and its prospects for further development, this special issue presents the current state-of-the-art in entrepreneurship education.

In addressing questions of The Theoretical and Methodological Foundations of Entrepreneurship Education Research, this introduction develops three fundamental challenges for entrepreneurship education and shows how the articles selected for this issue contribute to each of those challenges. The three selected papers represent a broad horizon of interesting topics, from plotting the recent history and construction of the field, to current

experiences in different educational contexts and finally, considering the future in terms of a conceptual framework for the development of entrepreneurship education. While contributing as a set to this special issue, as readers will discover, each contribution has particular merit.

Entrepreneurship Education Today

In the context of current economic and societal crises, entrepreneurship education is increasingly regarded as a powerful engine of social and economic transformation; interest in new venture creation is growing. The latest Global Entrepreneurship Monitor survey (2016), conducted in 60 countries reveals that 66% of adults consider entrepreneurship to be a good career choice and half of them believe they have the capacities to engage in entrepreneurial activity. Since the 2000s, states across the world have intensified prescriptive measures to develop education in and through entrepreneurship at all levels of their education systems from primary school to higher education (Kyrö, 2015; Rizza and Amorim Varum, 2011). Pedagogical innovations and initiatives in entrepreneurship education ranging from raising awareness to supporting entrepreneurs are booming everywhere, further accelerated by the emergence of MOOCs (Verzat et al. 2016) and the increased use of new technologies.

Nevertheless, research in entrepreneurship education is a young field still in need of legitimation. The earliest structured efforts in understanding entrepreneurship education approaches are to be found in the work of such reflexive practitioners as Gibb (Gibb 1987) and Kearney (Kearney 1999; Kearney 1992). The first courses in entrepreneurship were given at Harvard in 1947 before being developed in American business schools across the country following the 1973 and 1979 oil crises. Yet, the first special issue devoted to entrepreneurship education was only published in 1991 (Katz 2003; Kuratko 2005).

Several systematic reviews of the literature have been published since (Gorman, Hanlon, and King 1997; Pittaway and Cope 2007; Mwasalwiba 2010; Naia et al. 2014; Byrne, Fayolle, and

Toutain 2014; Fayolle 2013; Li Ge and Xu-mei Peng 2012) leading to the following findings: first; the offer in entrepreneurship education increases constantly but remains fragmented; second; the pedagogical objectives and expected outcomes are complex and hard to define without a broad consensus on the nature of the entrepreneurship phenomenon and its associated soft skills and third, available studies are mostly of a descriptive nature. As such, they do not explain whether the teaching methods and approaches are adapted to the various types of learners and expected outcomes or what contextual factors contribute to increased effectiveness.

As early as 2005, Béchard, a scholar in Education Science, suggested with Grégoire that the questions raised by these types of studies were too narrow because they reflected limiting visions of education (Béchard and Grégoire, 2005). They show that up until then most research focused on socio-economic (what is the contribution of entrepreneurship education to growth or economic performance at a national or regional level?), academic (what contents?) and individualistic approaches (what are the individual needs of learners?), at the expense of psycho-cognitive, socio-cognitive and ethical questions. This position is shared by Fayolle (Fayolle 2013, Verzat 2015) who proposes three research orientations to advance this discussion: first; focusing on specific concepts and processes; second; crossing the disciplinary borders of entrepreneurship to tap into the theories and methods of education science and third, developing reflexive knowledge about two key elements of Béchard and Grégoire's model (2009): the pedagogical practice adopted more or less consciously by the teacher and the factors in the institutional context that make this practice possible.

These recommendations raise numerous challenges for researchers in entrepreneurship education. Using concepts inspired by Education Science and based on contributions by Kyrö (2015), Frank and Landström (2016) and Verzat, Toutain, et al. (2016), we would like to address three of these challenges here.

The first challenge is of a disciplinary nature

In education science, didactics refers to the study of teaching processes in relation to a field of knowledge within a scientific discipline or a professional curriculum. The first question could be framed thus: what specific hard skills, know-how and social skills ("savoir-être") should entrepreneurship education engineering help us articulate? What operations should educators propose in order to enable these articulations?

Several concepts derived from the didactics of mathematics (Brousseau 1986, Brousseau 1990, Chevallard 2007) and the history of scientific concepts (Bachelard 1934) may be useful in determining the pedagogical engineering concepts relevant for entrepreneurship: the 'didactic situation' serves to differentiate various training situations from one another, whether the stakes are problem-solving and subsequent success, the formulation of a non-ambiguous message or item of knowledge, or the validation of a judgment or assumption. To each of these situations correspond several dialectical forms (action-retroaction, validation-refutation, modelling-dialogue). Depending on the type of situation and the degree of conceptualisation of the skills that must be acquired, the teacher may use various types of "didactic transpositions" in order to present impersonal scientific (hard) knowledge regardless of its context of emergence (objects, properties or problems) in a form and sequence compatible with their appropriation by students. The "didactic contract" characterises the implicit expectations and assumptions between the trainer and the trainees and between the trainees themselves. Finally, the notion of "epistemological obstacle" is fundamental to analyse what acts as an obstacle to the understanding of real world phenomena. Among potential obstacles, didacticians are particularly wary of empirical evidence stemming from everyday life, erroneous assumptions linked to existing explanatory systems in the minds of students as well as over-generalising pronouncements. These obstacles are key stages that must be cleared and represent teaching goals in their own right (Martinand 1996).

When applying these concepts to the type of learning targeted in the field of entrepreneurship and the type of situation(s) in which they emerge, several questions arise: what is the right degree of complexity and uncertainty of the problems that need to be solved depending on the students' levels? In what sequence? Who has the responsibility of this didactic transposition and what shape does it take if entrepreneurial knowledge stems as much from real problems as from scientific constructs? What implicit contracts bind the various stakeholders of an entrepreneurship training situation (students, coaches, entrepreneurial milieu, representatives of the education institution)? What dialectics enable the effective articulation of tacit entrepreneurial knowledge such as opportunity identification, the commitment of stakeholders, the qualification of affordable losses or the control of action in uncertainty? What are the misrepresentations and erroneous beliefs that must be dispelled to enable entrepreneurial reasoning?

The contribution to this issue from Korsgaard, Thrane, Plenker and Neergaard offers a clear example of how to orientate research to produce knowledge in relation to the first challenge. Reflecting on the critique of entrepreneurship education developing in recent years (see for example Fayolle, 2013), the authors draw on the work of Shane and Venkataraman (2000) to develop a conceptual framework for entrepreneurship education. Having developed their framework, the authors detail a number of implications for the practice of entrepreneurship education. From the perspective of entrepreneurship educators, perhaps the most challenging implication offered by Korsgaard, Thrane, Plenker and Neergaard lies in understanding how to move from providing standard classes and towards more individualised learning that enables students to pursue the opportunities that are most personally relevant to them.

The second challenge is pedagogical

Didactics focuses on the internal structure of the necessary skills and their articulation to real life, whereas pedagogy is more about a learner's psycho- and socio-cognitive learning processes. Recurrent questions relate notably to the active role of the student, of the external mediator, and the relevance of the confrontation (socio-cognitive conflict), the cooperation and/or competition between learners, and the interaction between personality and knowledge construction. All these questions relate to learning process theories at play in the education system. For this reason, most authors refer to educational paradigms. Indeed, these theories implicitly determine teacher practices (Carlile and Jordan 2005) and so, format learner roles and expectations. They form the cultural substrate of society's expectations and beliefs towards the education system and serve to determine the performance criteria of education institutions.

Three main educational paradigms have been identified since the nineteenth century[1]: the transmission paradigm based on scientific positivism and the cognitive theory of learning presents the teacher as the expert in objective knowledge whose job it is to help students memorise and appropriate such knowledge The functionalist paradigm focuses on the conception of pedagogical objectives and learning activities that are then evaluated by the teacher/educator. Finally, the constructivist – later socio-constructivist – paradigm highlights the motivation of learners and the emotional factors that contribute to maintaining it, the mediating role of the environment (facilitating coach, co-learners, stakeholders) in order to engage the learners and support their perseverance in learning at the cognitive, conative and affective levels.

[1] However, the distinction between the various paradigms is not absolutely definite as some authors, such as Bandura and Piaget create articulations between them. Moreover, scholars interested in the history of education paradigms do not always concur on the contents of the various paradigms (Barr and Tagg 1995; Bourdoncle and Lessard 2002; De Ketele 2000; Ramsden 2003; Thousand, Villa, and Nevin 1998; Carlile an Jordan 2005).

In entrepreneurship, current practices are varied, from formal lectures to the support of innovative projects and case studies. They imply de facto all education paradigms. This raises questions because entrepreneurship education seems theoretically much more coherent with socio-constructivist approaches (Gibb 1987; Gibb 2002; Sarasvathy and Venkataraman 2011; Löbler 2006; Verzat, Toutain, et al. 2016; Bechard and Gregoire 2009). Do all practices regardless of the various paradigms that underpin them lead to the same results? Should we endorse Kyrö's view that entrepreneurship education offers a radically new vision of learning because of its creative, responsibility-inducing and risk-exposed dimension (Kyrö, 2015). To this day, it is hard to answer this question because there is too little empirical data describing teacher beliefs, real practices and outcomes for learners beyond entrepreneurial intention (Pittaway and Cope 2007; Martin, McNally, and Kay 2013).

The current crisis of education systems around the world converges with the growing interest in entrepreneurship and the associated freedom to learn and act in a creative environment. At the same time, education research has highlighted the characteristics of contexts that are conducive to learning, in other words, contexts in which learners get involved, persevere and speak up when they have not understood. These characteristics include respecting learner need for self-determination (Ryan and Deci 2000), the notion of 'flow', that is to say a state of concentration that brings satisfaction simply from the pleasure of concentrating on a task, of understanding and being understood (Csikszentmihalyi 1990), cooperative learning (Hattie 2009; Johnson and Johnson 1987) and the art of feedback, as provided by the teacher in order to make this sense of satisfaction perceptible (Heutté 2011). They relate to the attitude of the trainer as a transformational rather than a transactional leader (Harrison 2011). The role of positive emotions in entrepreneurship education is starting to be recognised (Arpiainen et al. 2013). However, numerous questions remain unanswered as to the specific roles played by each of these factors in any given context and how to foster them. Indeed teachers are not

always aware of the implicit teaching models they practice (Ramsden 2003b): their practices often differ from the perception they have of them and the perceptions that learners have of them and all these perceptions are embedded in national and local educational cultures (Kyrö 2015).

In relation to this pedagogical challenge, the second article, by Janssen, Giacomin and Shinnars focuses on contemporary experience of the entrepreneurship education learning environment. In their study, the authors compare optimism and overconfidence among university students in India, Spain and the United States of America. They further explore the impact this has on entrepreneurial intentions. Among their findings, Janssen, Giacomin and Shinnars report that the students, while not over-confident, were overly optimistic with regards to the benefits associated with being an entrepreneur. Discussing this finding, the authors suggest that university students have an 'overly-rosy' view of the experience of being an entrepreneur. Readers who are engaged in working with university students interested in pursuing entrepreneurship will benefit from the insights generated through this research paper, as might students of entrepreneurship considering their post-university career!

The third challenge is epistemological and ethical

One of the aims of research in entrepreneurship education is to analyse existing education programmes rigorously and objectively. However, in the context of the current global crisis, researchers in entrepreneurship education are expected to not only show rigour but to also produce useful knowledge: how can entrepreneurship teaching contribute to the creation of value for society? What do we know today about the best educational practices? Are they relevant for all learners? Can they be transferred from one context to another? Is it possible or even desirable to transform the education system in order to make learners of all ages more enterprising and better adapted to a world that is ever more complex and uncertain? (Fayolle

2013, Verzat 2015). Although research in entrepreneurship first emerged to answer such questions, Frank and Landström (2016) show that the discipline has undergone a phase of academic institutionalisation, which has progressively shifted it away from the practical perspective it had initially. Today the quality of entrepreneurship research is measured based on its visibility in the best academic journals, which implies increasing specialisation into highly specific questions and methods associated with a select few authors.

A good illustration of this evolution is given by the third article by Loi, Castriotta and Di Guardo who report the results of their co-citation analysis conducted in the entrepreneurship education literature. Basing their analysis on the study of works covering almost a quarter of a century, the authors explore 'the intellectual structure of entrepreneurship education' by drawing out central themes and inter-connections to be found within the literature. The article will be apposite reading particularly for researchers engaged in understanding the entrepreneurship education field, as it raises a number of issues for researchers in entrepreneurship and more particularly, in entrepreneurship education.

Elsewhere in the literature, Frank and Landström (2016) report a growing tension in the community in relation to the objectives of research between scientific rigour and practical relevance. Based on interviews with eight focus groups of junior and senior researchers in entrepreneurship, they highlight two main problem areas between researchers and practitioners: the origin and nature of the issues investigated and the lack of collaboration in the knowledge creation and dissemination process. They argue in favour of greater applicability rather than technical, normative or theoretical knowledge. This position supposes to address real problems in the field as well as theoretical gaps, to learn how to share and disseminate mostly tacit knowledge that is hard to verbalise, to take into account the identity and emotional reasons that are at the heart of research engagement and more generally to diversify the criteria for researcher recognition.

In keeping with Fayolle (2013), Kyrö (2015) notes that education research has mostly focused on the what and the how, forgetting to address the axiological, ontological and epistemological dimension despite its potential in addressing the why too. Yet the adoption of education paradigms implies beliefs about learning, about the values and expected outcomes of learning, and more generally about the values of entrepreneurship and entrepreneurial action. For Kyrö, entrepreneurship teaching relates to the holistic development of the human being in its cognitive, affective and conative dimensions. It has to do with developing the freedom to choose one's life, to develop one's autonomy and creative action in a complex and uncertain world. Based on examples of radical pedagogical innovations Verzat et al. (2016) show that their teaching model and innovation process are coherent with the values of action-research advocating the development of autonomy and empowerment. In other words, explaining the pedagogical and didactic principles of entrepreneurship is possible via a research process implying an epistemological choice that does away with the traditional positivist paradigms. In education, action-research implies a reflexive posture from teachers, critical debates that reveal value oppositions between the stakeholders and spiralling action-reflexion loops (Winter 1996, Zeichner 2001, Koshy 2009).

This type of research thus implies an ethical conduct in line with the epistemological debate. First of all because the reflexive work in education is never simple: it requires an increased level of consciousness about practices that relate to the notion of habitus (Bourdieu 1972, Bourdieu 1980), that is to say stable internalised and unconscious dispositions. Teaching practices are linked to a 'practical unconscious' (Piaget 1974, Vergnaud 1994, Vermersch 1994) involving the teacher's relation to knowledge, error and power. It touches upon his/her self-image, his/her self-confidence, in one word, his/her identity (Perrenoud 2001). To become aware of one's habitus is unnatural and triggers reluctance and embarrassment. It may be done through a simple reflexive analysis (Schön 1983, Schön 1996) calling upon

one's capacity to know 'in action' (Saint Arnaud 1992). In order to go beyond the evidence, the routines of the 'taken-for-granted', education researchers use structured research designs such as peer-exchange, mutual observation, metacommunication with students, clinical writing, video-training, explication interviews, life stories, experimentation and experience (Perrenoud 1996). These attitudes necessarily imply methodology and ethics in order to arouse the person's consciousness without doing violence to them, at least never intentionally.

The second ethical concern in relation to entrepreneurship education research is linked with the exposure of learners to risk and uncertainty. In this line of thought (Lundmark and Westelius 2014) argue for better self-reflection from researchers as regards the underlying beliefs and values underpinning their work. Two metaphors illustrate the latent beliefs and values at play in entrepreneurship research. Entrepreneurship is sometimes presented as an elixir, some vital remedy promising emancipation, social development, the creation of wealth and employment through freedom of action and innovation made possible thanks to an open market and the optimistic belief in success. This vision tends to exclude, overlook or minimise the bitter facets of the potion, such as the existence of wealth-generating illegal and criminal activities, of externalities that innovating companies cannot manage, or necessity entrepreneurship (as opposed to opportunity entrepreneurship), with entrepreneurs who can barely make a living from their business.

The second metaphor, borrowed from the evolutionist theory, refers to entrepreneurship as mutant gene, some strategic knowledge that generates variations and allows for the natural selection of the best-adapted organisations. In this approach prediction is impossible as the changes introduced may be intentional but emerge from divergence brought about by short-sighted actors bounded by their limited rationality. These changes are not always the most desirable for society at large and the overall generated growth is not necessarily related to the number of variations produced but rather to how adapted they are to the context.

Showing similar reserve regarding entrepreneurship education research Verzat and Toutain (2016) highlight the need to be vigilant towards the bitter facets and selection processes regarding the practices and expected outcomes of entrepreneurship education. Is it reasonable to think that all learners can develop their entrepreneurial capacities and to elevate responsibility-taking and the fight against uncertainty as a behavioural norm for everyone? Should we support the development of projects whose outcomes are hard to predict or warn entrepreneurs against the risks early on? Based on sociological works by Ehrenberg 1998, Ehrenberg 1998, Ehrenberg 1995, and Perrenoud 1999, we know that the normalisation of autonomy makes individuals more vulnerable. Thanks to Watzlawick and Beavin 1967, we also know that autonomy develops from one's self-image and perceived encouragements but cannot be decreed. Finally, we know, thanks to the insights of work psychologists and sociologists how important solidarity and cooperation are and what stress-induced consequences arise when the economic competition is excessive. In those conditions, how can we foster freedom-oriented behaviours without falling into paradoxical injunctions? How can we benefit from the entrepreneurial dynamics that enables individuals to prove their worth to themselves and others through the creation of market value without being overwhelmed by economic competition and the obligation of performance which brings human beings down to the level of instrumentalised resources? All these questions should be at the heart of future research in entrepreneurship education.

Conclusion

Taken as a set, the articles in this special issue serve to offer a response to charges that entrepreneurship education '…appears to be one of those phenomena where action and intervention have raced far ahead of the theory, pedagogy and research needed to justify and explain it.' (Rideout and Gray, 2013: 346). The articles reflect meaningful engagement with

theory and consideration of the implications for practice. As each featured article is careful to intimate through identifying avenues for further research however, this special issue is a contribution to an ongoing debate and a developing research field. Amongst the conclusions we might draw from the contributions featured here is that challenges and opportunities continue to present themselves in the theoretical and methodological development of entrepreneurship education research. We hope that after reading the contributions, our readers will be inspired to join the debate.

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