BUSINESS MODELING FOR EARLY ENTREPRENEURIAL VENTURES

BENEDICTE BRØGGER
Dept. of Innovation and Economic Organization
The Norwegian School of Management
benedicte.brogger@bi.no

ABSTRACT

The main question in the paper is if participatory business modeling could help entrepreneurs in the early stages of their ventures when resources are scarce and all tasks need to be done simultaneously. The discussion in the paper draws on experiences from an entrepreneurial internship program arranged by the Norwegian School of Management and Oslo Innovation Centre during the summer of 2010. 13 master-students-cum-interns worked in start-up companies and were active participants in real-life business modeling processes. The stakeholders in this specific learning process were entrepreneurs, interns and supervisors. The paper raises the question if it could be possible to include formal business modeling methods to improve on the process. Furthermore, could it be feasible to include also other stakeholders earlier in the process?

INTRODUCTION

Early entrepreneurial ventures are cases of real-life, real-time business modeling processes. The value proposition may be diffuse. The different functions of the company have not yet been sorted out and there is a lack of operating resources. The entrepreneurs try to do everything at once. Eventually the company finds its form, but that may take months at best, usually it takes years.

Interns working in such situations have the opportunity to get a good grasp of all aspects of doing business. They also have a hard time making sense of and connecting the different inputs they get. Each task that the intern does is connected to other necessary tasks in very apparent ways, but the configuration of tasks may change from week to week. The interns are in a learning situation, where much is open to consideration and interpretation. Theories and models become meaningful, and even actually useful. The interns may serve as well tuned sounding boards for the entrepreneurs. However, entrepreneurs are busy doing things, and has little time to engage in systematic reflection with students who may not have grasped all that is at stake.

This is why business modeling could serve to give order and direction to the explorations of both the intern and the entrepreneur. This again raises the question if other stakeholders could productively be included in the creative process of business modeling.

LITERATURE AND THEORY

Business modeling refers to a diverse range of concepts and methods for systematizing processes of value creation or innovation in and between companies. A business model is a representation of key features of the value creation process. Much effort in the business modeling literature is devoted to ensuring the best or correct content of the representation, which means attention to the constituent elements of the model. The *business model canvas* merges related approaches to business modeling into a unified methodology (Ostwerwalder & Pigneur 2010). Its main object is a blank template, or canvas, divided into nine columns that each concerns one part of a value creating process. The blanks may then be filled in as a means to assess the present situation and also to identify other opportunities. The main emphasis of this methodology is to ensure a best possible content of the model and a representation that simulates key features of the value creation components of an enterprise. A related approach is *Disruptive innovation* technology. This method to identify and analyze business opportunities makes use of the features of competitor's products and services to determine the unique selling point of one's own (Christensen 2003). In this approach, products, services and technologies are placed in the foreground.

Designing a model and its actual realization are two very different problems. The business model is only a representation. This representation can function both as a 'model of' and a 'model for' (Geertz 1973:93) the value creation process. As a 'model of' the process, the representation functions as a description of its existing, constituent parts. As a 'model for', it represents different configurations of opportunities. It may therefore serve as both a scenario and a plan. As a plan, it is a representation of action, but it is not the actual action. To design a business model is not the same as to execute one.

The distance between the two types of tasks may be reduced if business modeling is designed as a type of 'situated action' (Suchman 2007:70). Suchman demonstrated that practical effects of instructions and manuals is not determined by wording of documents or features of objects, no matter how well designed they are. It is the action in situ that generates the practical results. Suchman's study is of users who try to make sense of photocopier instructions. It reveals the difference between what planners plan for, and what users actually do (Suchman 2007:109-175). In case of the entrepreneurs it is the formalization of actual relationships that determines the shape of the business. The model is not decided in advance, but emerges as the process unfolds. This is why early entrepreneurial venturing may be thought of as real-life, real-time business modeling. The entrepreneurs are both planners and users at the same time.

The entrepreneur is only the first of several potential stakeholders in the business. These include amongst others investors, partners, suppliers, customers and employees. In order to realize any business model, sooner or later actual users or stakeholders will have to be included in the process. The form of the process then is extremely critical: who, where, when and how of the process needs careful consideration. In addition, that is not something that should be decided beforehand. The questions on how and on what conditions must itself be debated as part of a participatory process (Emery and Purser 1996).

The problem of user inclusion has been dealt with in the participatory innovation literature. Inclusion of users in design processes has been shown to improve the fit between user need and product design (Buur and Matthews 2008). That indicates the benefit of open processes and broad participation. However, studies of user inclusion are mainly concerned with the product or technology design. When it comes to commercialization, other concerns become more pressing. The *open innovation* perspective states on the one hand that uses of external ideas and movements across institutional boundaries should be part of companies' innovation processes. On the other, there are considerable risks connected with innovation that involve separate enterprises, not least the need to protect one's own financial investments (Chesbrough 2005). Hence the premises on which the participants contribute must also be thematized.

In case of the interns, they are present to learn. In some respects that make them less risky collaborators than an investor or banker, or even a supplier or customer who has an actual vested, material interest in a company. The internship literature is mainly focused on the interns' learning experience, both for practical learning and deep learning about ways of being in the world (Sweitzer and King 2009; Wilson 1981). Some attention has also been devoted to the outcomes of the internships for the intern companies and for academic institutions when the internships are part of academic programs. The main lesson from this body of work is the importance of the human interaction. The intern needs guidance and someone to share experiences with in a type of truly interest-free dialogue setting. Hence, the internship literature does have some of the same practical quality as that the business modeling literature, but unlike it, emphasizes the form of individual, experiential learning necessary to generate new knowledge.

During an internship there must be a scope for both action and reflection. Without the action there will be no practical learning or outcomes, but without the reflection the intern will become a copycat repeating any old routine. An action-reflection-based process of inquiry will allow the participants to explore not only the content of their knowledge, but also the process that brings it forth as well as the premises on which it rests – the interests or forces that are in motion (Coghlan and Brannick 2005).

Drawing on these diverse sources, it seems that what needs to be carefully attended to and discussed in a participatory business modeling process in an early entrepreneurial venture is:

- The content of the business model itself.
- The form of the modeling process, including the participants, instructions, time frames, tools and equipment, concepts, location, action and reflection cycles.
- The premises for the modeling, especially the working out of differences of interests.

The case description below will illustrate is neither the content, nor the form or the premises of the process of real-life business modeling were systematically dealt with during the internships. This did affect the progress of the internship work and the interns' opportunities to contribute.

THE CASE

The Norwegian School of Management is a private business school, with 20 000 students enrolled in undergraduate and graduate, executive, and doctoral programs. The main campus is located in Oslo, Norway. The Entrepreneurial Internship Program is an elective 12 credit course offered to Master-students at the Department of innovation and economic organization.

The first pilot course was offered during the summer of 2010 with 13 interns who worked full time in 9 start-up companies in incubators at Oslo Innovation Centre. Preparations started in January, and the actual internship began in June and lasted until mid-August. There were three types of stakeholders in this program, the supervisors, the interns, and the entrepreneurs. I will deal with each type of stakeholder and their expressed interests in the program in turn. This gives a broad and general outline of the program and the scope for participation.

The Norwegian School of Management's interest in an internship program sprang from a need to allow students to gain first-hand practical experience with innovation and entrepreneurship. The interns' academic supervisor (the author of this paper) was responsible for the overall design of the course, as well as for following up of the progress of the interns during the program. Hence, the supervisor was not a stakeholder in the business development for its own sake. The academic component of the internship work was a term paper. The students' also participated at a weekly reflection-and-writing workshop. The idea was that this would enable the interns to return to the entrepreneurs with well founded recommendations for how their work could contribute to the growth of the company. In reality it proved to be more useful for sorting out problems and misunderstandings. It also gave the students a chance to reflect on their own work experience and that of the others.

Oslo Innovation Centre is a limited company owned by a number of public and private institutions. About 140 research institutions, companies and organizations are located in the Centre and its three incubators. It also offers seed and venture capital for starts-ups. Most of the interns worked in start-up companies located in one of the incubators. A few worked in companies that had come one step further and had moved out of the incubator. The Centre representative-cum-supervisor helped the interns with practical matters like phones and desks, communal affairs like pubs and lunches. The incubator managers facilitated the initial contact with the companies, and also helped with specific problems for a few of the interns. The agreements between the Centre and the start-ups were based on contractual agreements between independent business parties. Therefore, any agreement about uses of techniques and tools for growth had to be made independently with each company. Each intern therefore had a unique learning situation in terms of tools and methods used in the company.

Of the intern companies, two were in the software business, two in services, and five in high-tech or manufacturing. The companies had from 1-3 full time employees, with an additional 2-3 temporary employees or part-timers. Two of the companies had moved out of the incubators and were defined as past the "valley- of death"-stage of venture financing. Neither had actually gained a stable source of revenue, but managed to secure enough ad hoc business to not operate at a loss. All entrepreneurs were concerned with not losing control of their technology, product and company, so there was considerable secrecy relating to patents and brands, business strategies, and financial information. There were also constant meetings and negotiations with potential partners and the configurations of relationships shifted rapidly. This affected the interns' workdays. In this, they were very much part of a real-life business modeling experience. The entrepreneurs all agreed that their main motivation for accepting interns was the gain of extra, unpaid hands. They also got highly motivated staff. Most of the entrepreneurs had had interns earlier. The extent to which they had prepared a set of well defined tasks and measurable outcomes differed considerably. The learning goals were already defined, but the specific learning objectives of the internship had to be agreed with the company. A blank confidentiality form and work task description form were sent out in advance to both entrepreneurs and interns, but only a few used the forms.

The students' motivations ranged from gaining a network in Norway, to learning how to start a company, in addition to gaining 12 credits. In general, the interns' tasks were of two main kinds, market and customer analyses or web-related work. In addition was the "gruntwork" that interns customarily do, like photocopying invoices or sorting documents. Only two students were initiated through a truly well prepared process. Not surprisingly, their intern companies were the two safely past the "the valley of death".

During the first few weeks the interns were busy simply trying to understand their company, its markets, customers, products, finances, but most of all, the entrepreneur. After that, the interns got more and more absorbed with actually accomplishing the tasks they had been given or had assigned to themselves. They found it hard to be specific, and harder still to define measurable indicators to follow their progress (and the occasional regress). The entrepreneurs were themselves very busy working out their own indicators, which they needed in order to convince investors, customers and suppliers to do business with them. Even those interns who had specific learning objectives found their tasks changing along the way according to the company's most pressing issues. The quality of their relationship with the entrepreneur also played a role. The interns' experiences illustrate the challenges of designing a participatory process in early entrepreneurial ventures, which hardly exist and change rapidly. Below are descriptions of four different situations that illustrate the challenges. Details of each case have been adjusted in order to ensure anonymity.

COMPANY A – MANUFACTURER IN THE VALLEY OF DEATH, YET RELUCTANT TO ENTER MARKET

This company had developed a product to aid in home and institutional care. The technology behind the product was developed by an engineer and one of the founders of the company several years before they were accepted in the incubator. As part of that deal the company also acquired the first round of financing in the form of seed capital. At that time a managing director and co-owner took over the daily operations and the launch of the product. At the time of the internship the company faced two critical issues: whether to operate in the home market only or to go global directly, and how to get the much needed second round of financing. The intern in the company produced market analyses, both for Norway and other countries in other parts of the world, but these were not actually used for anything. The same happened with proposals on how to sell and develop a sales organization, areas where the intern, who had a background in sales and marketing, had special competence. The company people were more interested in talking about how to improve their technology, and collaborating with their suppliers on this. The intern's ability to participate in the discourse on technology was limited, and the directors' limited grasp of marketing did not allow them to benefit from the intern's competence.

COMPANY B – SOFTWARE DEVELOPER IN THE VALLEY OF DEATH YET UNABLE TO COMMUNICATE THE PRODUCT TO INVESTORS.

The entrepreneur in this company worked according to an innovative business model, in the form of a network of professional software developers from many different countries. The model was based on a type of generative partner-platform known from the social media industry. The company's technology was so complex that neither customers nor investors or interns were able to grasp what value it could possibly have for them. In that company, the intern changed work tasks about every third day, according to the most pressing concerns. The entrepreneur was explicit about the premises for participation, embodying an open source paradigm, and the form of the process was also fairly predetermined. However, as the content of the technology was so hard to communicate, the whole business modeling effort failed to produce the desired results. Investors did not understand what they were supposed to invest in, and customers likewise did not know what to use the technology for. The intern in the end suggested that the entrepreneur develop a professional consultancy business from the ad hoc consultancy work that kept the company afloat economically.

COMPANY C – SERVICE PROVIDER, DEALING WITH THE INTANGIBLE NATURE OF THE PRODUCT OFFERED

The entrepreneur of this company had an idea for a service that would also professionalize a fairly immature industry. The intern was given precise tasks and was followed up with regular feedback sessions. However, because the innovation was a service and a way of doing business rather than a tangible product, the intern did not understand the company's value proposition. It was therefore at first difficult to find concrete ways to make sense of the tasks given. The intern spent the first weeks gathering information about competitors and learning the ways of the company. Only then could a realistic work plan for the internship be made. Through the founder's extensive network in the industry, the company gradually managed to secure enough business to break even. However, the intern saw that the founder had a hard time making the market understand and pay for the added value of the service offered. Customers found it hard to grasp how it differed from the conventional way of doing business in the same manner as the intern had had initially.

Through the intern's efforts to sort out what the company was all about, or perhaps the founder's need to explicate on it, the company's business model become more elaborate and clear. However, the emergence of a well integrated and communicable model happened haphazardly and due to no small amount of patience from both the entrepreneur and the intern.

COMPANY D MANUFACTURE – A STRATEGIC DECISION NOT MADE

In this company, the second round of financing was secured. The product was patented. It was a generic, but key component in other products and the company was setting itself up as a supplier to other producers. The question on how to communicate with the market was high on the agenda. As part of this challenge, the intern was first assigned the task of redesigning the company's web page. The intern had programming background and was well up to the task, but constantly ran aground on the fact that the owners of the company could not agree on who the webpage was for. One owner claimed that since their product was truly new and demands for it had to be generated, they should target individual consumers who were the end users. Another owner claimed that the webpage had to serve as an extended intranet for the company's business partners because they were the actual customers. The third owner wanted a bit both solutions, an open website and a closed partner web. The owners did not manage to agree even when the form of the webpage was reformulated as an important strategic issue and not an operations decision to be made by the intern. In desperation, the intern finally ended up recommending an entirely new value proposition, a generative pull-strategy that led different customers segments along to places that fitted with their needs. That was a truly entrepreneurial feat, which however was not really acknowledged by the company because the people involved did not have the knowledge to appreciate what the intern suggested.

DISCUSSION

The reason for considering the use of business modeling methods is based on a key insight from the internship program - how the entrepreneurs handled a number of issues and relationships concurrently. That included financing, product development, marketing and sales, management and administration. The entrepreneurs had neither the time nor the money to concentrate on one issue at a time. Furthermore, they based their activities mainly on tacit knowledge. Formal business modeling could be a way for them to explicate their knowledge. It could also give the entrepreneurs opportunities for experimenting in a manner that is less costly that doing everything in real-life, without the structure and freedom provided by a learning process.

One would think that participatory business modeling could be a way for entrepreneurs to engage with other key stakeholders early in the process. It could possibly reduce some of the uncertainty by making it possible for each party to connect and reconnect their different types of knowledge, interests and concerns. However, there are some aspects of the early entrepreneurial situation that makes this extra challenging. This is because the content, the form and the premises of the process need to be worked out simultaneously. This is why I suggest experimenting with business modeling next time round in the internship program. The content-focused business modeling methodology needs to be supported with tools to steer the form and identify the premises of the processes.

The participatory base of the program also needs to be broadened. The pilot program was designed in such a manner that the participatory dimension only included the students. During the evaluation, the entrepreneurs, the interns and the supervisor expressed a wish to have earlier and deeper collaboration between interns and entrepreneurs as well as some form of entrepreneur-to-entrepreneur reflections. It would allow both entrepreneur and intern to play around with the different elements that make up the company in a way that seem useful to both to help meet their different needs. Furthermore, it would allow them to spell out not only the content and details about the form, but also to reflect on the premises for participation. A process that involves interns and entrepreneurs should be relatively interest-free situation in which to begin to test out conditions for participatory business modeling in early entrepreneurial ventures. That which worked could then more easily be implemented directly.

The use of business modeling methods in the next program could then provide valuable insights on how such a process could be designed more broadly. A future possibility would then be to include other groups of stakeholders. This could either be done in the entrepreneur's place, or possibly in a business modeling lab. If designed with due consideration to the three key components of participatory business modeling, content, form and premise, the stakeholders could experiment with different configurations of the model, while at the same time developing the premises for their collaboration. This could possible save time and resources. It could also mean that the apparatus needed to realize the business model was assembled at an earlier stage than many entrepreneurs manage at present. These possibilities would need to be tested and explored and are therefore topics for further study.

ACKNOWLEDGEMENTS

Thanks to the pilot interns and entrepreneurs who did all the hard work. Thanks also to Professor Knut Sogner at the Norwegian School of Management and Monika Svanberg and Cecilie Nordbø at the Oslo Innovation Centre.

REFERENCES

Buur, J. and Matthews, B. 2008. 'Participatory innovation', International Journal of Innovation, 12(3), pp:255-273.

Chesbrough, H. W. 2005. Open innovation. The new imperative for creating and profiting from technology. Harvard Business Press.

Christensen, C. 2003. The innovator's dilemma: The revolutionary book that will change the way you do business. New York: Harper Business.

Coghland D. and Brannick, T. 2005. Doing action research in your own organization. London: SAGE.

Emery, M and Purser, R. 1996. The Search Conference. A powerful method for planning organisational change and community action. San Francisco: Jossey Bass.

Geertz, G. 1973.The Interpretation of cultures. New York: Basic Books.

Osterwalder, A. and Pigneur, Y. 2010. Business model generation. A handbook for visionaries, game changers and challengers. Hoboken, N.J: Wiley.

Suchman, L.S. 2007. Human-macine-configurations. Plans and situated actions. 2nd ed. Cambridge University Press.

Sweitzer, H.F. and M.A. King. 2009. The successful internship. Personal, professional and civic development. Brooks/Cole. CENGAGE Learning.

Wilson, S. 1981. Field instructions. Techniques for supervisors. New York: The Free press.