THE FAILURE TO OBTAIN VC FINANCING IN THE PRE START-UP PHASE: EVIDENCE FROM THE PORTUGUESE CONTEXT

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ABSTRACT

In this paper we propose contributing to deepening the knowledge on access to venture capital concerning the pre start-up phase of the innovative firms, identifying the reasons mentioned by nascent entrepreneurs as responsible for the lack of success in obtaining VC. The main reasons cited for not obtaining venture financing were small size of the VC market and limited public policies to support venture capital participation. The sub-sample of nascent entrepreneurs that based their financing proposals on more complete business plans included at the top of their list "lack of interest of the venture capitalists in pre start-up phase investments".

Key Words: Venture Capital; Nascent Entrepreneur; Innovative Firms.

EXECUTIVE SUMMARY

The study of access to venture capital is a crucial issue in the entrepreneurial finance literature. Most of the studies carried out focus on the supply perspective with several authors highlighting the scarcity of the studies on venture capital which adopted a demand perspective. In this paper we propose contributing to deepening the knowledge on this topic concerning the pre start-up phase of the innovative firms, identifying the reasons mentioned by nascent entrepreneurs as responsible for the lack of success in obtaining venture capital.

The empirical data in this paper comes from a survey administered to 63 Portuguese innovative nascent entrepreneurs who tried to obtain venture capital and were not successful. In this survey the nascent entrepreneurs were asked to assess the relative importance of 13 criteria that were identified in previous research. The sample was subsequently segmented according to the "quality of the business plan" criterion.
The data were initially summarised using univariate statistics. The nonparametric Mann-Whitney U-test was used to identify differences between the categories relative to the "quality of the business plan" criterion.

The main reasons cited for not obtaining venture financing were: 1) small size of the venture capital market in Portugal; 2) limited public policies to support venture capital participation; 3) lack of interest of the venture capitalists in pre start-up phase investments; 4) unwillingness of venture capitalists to provide small amounts of capital.
The sub-sample showed that the nascent entrepreneurs that based their financing proposals on more complete business plans included at the top of their list "lack of interest of the venture capitalists in pre start-up phase investments".

The conclusions of this paper serve as a wake-up call to the policy markers in Portugal to be more aggressive in relation to the public policies giving support to venture capital. It also confirms that venture capital operators pay little attention to the investment in the pre start-up phase and tend to ignore the financing requests asking for a lower amount.

1. INTRODUCTION

The characteristics associated with innovative firms, such as high risk and uncertainty, information asymmetries and initial lack of tangible assets, raise additional financing problems for these firms (Sjogren & Zackrisson, 2005). These problems are especially delicate during the creation and initial phase of the firms and are more keenly felt in countries that have a culture geared towards bank financing. The characteristics of innovative firms make bank financing an unsuitable solution, and venture capital (VC) is the most appropriate method given that the provider of the capital participates fully in the opportunities and risks and, in contrast to the banks, does not look at the issue of collateral, instead undertaking an in-depth analysis of the projects. Therefore, the study of access to VC financing is a crucial issue in the entrepreneurial finance literature. However, in some countries, such as Portugal, informal VC carries little weight, forcing the innovative nascent entrepreneurs to seek formal VC despite it still being a developing market and one where the statistics indicate that there is a certain reluctance to invest during the creation and initial phase of firms.

The previous research into access to VC financing generally opted for an approach from the supply perspective, identifying above all the investment criteria of the Venture Capitalists (VCs) in more advanced phases of the firm and in contexts where the VC is more developed. Several authors have highlighted the scarcity of studies on VC which adopt a demand perspective (Mason & Harrison, 1999; Brush, Carter, Greene, Hart & Gatewood, 2002; Carter, Brush, Greene, Gatewood & Hart, 2003; Amatucci & Sohl, 2004).

Bozkaya & Potterie (2008) carried out a study that includes identification of the factors that Belgian TBSF entrepreneurs cited to explain the difficulties in obtaining VC financing in the early stage of the firm. In this paper we aim to contribute to deepening the knowledge on this topic concerning the pre start-up phase of the innovative firms, identifying the reasons mentioned by the Portuguese nascent entrepreneurs as responsible for the lack of success in obtaining formal VC. We did so by using a sample of nascent entrepreneurs that were not successful when the tried to obtain formal VC financing (henceforth referred to simply as VC) during the pre start-up phase of their innovative firms. Innovative firms are considered those that base their productive activity on an innovation or advancement in the productive or social environment that result in new products/services or processes, based on the application of knowledge (OECD, 2001).

The research questions

Our goal is to contribute to the knowledge about VC financing, analysing the perception of the innovative nascent entrepreneurs concerning the contribution that a wide-ranging set of factors had on the failed attempts to obtain VC financing during the pre start-up phase of their firms.

In particular, the current study examines three central questions:

(1) How do nascent entrepreneurs rank the importance of different factors when evaluating the reasons for failure to obtain VC financing?

(2) Does the nascent entrepreneur´s degree of planning influence the evaluation of these factors?

(3) Is there a difference in the evaluation of each of the factors by the subgroups of nascent entrepreneurs, whereby these subgroups resulted from the application of the "quality of the business plan" criterion?

The remainder of our paper is structured as follows. In the next section we briefly review the literature to contextualise the issue of access to VC financing. Section 3 presents a description of how the sample was compiled, the procedures used to obtain the data and the methods. The results of our analysis are presented in section 4. They are discussed in section 5 and the conclusions are outlined in section 6.

2. LITERATURE

2.1 VCs' expectations of rates of return and quick exit

Venture capitalists require higher than expected rates of return for early-stage investments due to the greater risk exposure (Pintado, Lema & Van Auken, 2007). Mason & Harrison (1999), Murray & Lott (1995) and Dorf & Byers (2005) mentions rates of return in the 40 percent - 70 percent range for evaluation of investments in the initial phase (seed and start-up stages). The expectations of the VCs as regards the rates of return was cited by the Belgian entrepreneurs of technology-based small firms (TBSF) as the second cause for the difficulties in obtaining VC financing in the early-stage (Bozkaya & Potterie, 2008).The high return rates in assessing the potential investment may also explain the rejection of most of the VC financing requests in Portugal.

The VCs do not intend to remain as long-term investors in the firms they help finance (Florida & Martin, 1990). Large investors are more willing to supply funds to venture capital firms if they feel that they can later recoup their investment (Jeng & Wells, 2000). Therefore, a viable exit mechanism is extremely important for the VCs. In the opinion of the entrepreneurs of technology-based small firms in Belgium the expectations of the VCs in relation to a quick exit was the main reason behind the difficulties in obtaining VC financing in the early-stage of their firms (Bozkaya & Potterie, 2008).

In 2005 in Europe the main disinvestment method used was the trade sale (25 percent), while there was also a modest number of IPOs (EVCA, 2006). In Portugal the trade sale is also the most common occurrence, with no IPO that year. It is likely that in a country like Portugal with an underdeveloped IPO Market the exit mechanism will be cited as a factor that retracts the investments of the VCs.

2.2 Stage of development / amounts of capital and venture capital investments

Although Kaplan & Stromberg (1999, 2001) states that over a third of the VCs' investments in the USA are made when the firms have not yet obtained profits, several studies concluded that the VCs are somewhat reluctant to finance the early-stage of firms (Pellón 1999;

Hulsink & Meeusen-Henniger, 1999; Jud & Kremshofer, 2000) and prefer firms in a more advanced phase (Timmons & Sapienza, 1992; Timmons & Bygrave, 1997). The financing of the initial phase of firms directly affects the VCs' investment analysis, especially as regards the assessment of the risk and potential return (Carter & Van Auken, 1994; Pintado, Lema & Van Auken, 2007).

The statistical data on Europe (EVCA, 2006) backs up this analysis and shows that the amount of VC Investments in the expansion phase is substantially greater than in the seed and start-up stages. While in 2005 in Europe the seed and start-up phases represented 26.5 percent of the investment made by the VCs, in Portugal the percentage was around half this figure (13 percent) which leads us to surmise that the relative lack of interest of VCs in investing in firms that are in an initial phase may be found to be one of the reasons cited by the Portuguese nascent entrepreneurs for the rejection of their proposals by the VCs.

The size of the investment may also hinder the obtaining of the VC financing. Small investments are ignored by some venture capitalists (Timmons & Sapienza, 1992). The preferred targets of the VCs are businesses that need a relatively high investment sum. Dorf & Byers (2005) states that in the USA only investments over 1 million USD are of interest to the VCs. The fixed costs of the due diligence that is carried out to protect the interests of the VCs and their shareholders prevent low value investments. In Europe, Bozkaya & Potterie (2008) surveyed Belgian entrepreneurs of technology-based small firms who had difficulty in obtaining VC financing in the early-stage of their firms and concluded that one of the factors pointed out by the entrepreneurs for their failure was the lack of interest of the VCs to provide small amounts of capital.

2.3 Technological support and business planning

The entrepreneurial initiatives can also be differentiated according to the technology they use, which can stimulate the interest of the investors. According to Shane & Stuart (2002) the exclusivity licences or patents can be important resources for the success of the firm, and Teece (1986) even goes so far as to say that in some situations they are the major resource of a firm in the start-up phase. The literature points out a positive relationship between the existence of patents and the future increase in the value of the firms (Hall & Trajtenberg, 2005), which makes them attractive for VCs. Venture capital operators gives precedence to investment in firms that possess exclusive singular and valuable new technology (Poser, 2003). As a consequence it is possible that the lack of patents may hinder access to investment supplied by the VCs.

The business plan enables the nascent entrepreneurs to translate their idea into a business. Before all else, the business plan is the calling card of the entrepreneur to present the idea of the business to all entities related to it. It is an important aspect to analyse the technical, economic and financial viability of the initiative. Through the financial forecasts included in the business plan the entrepreneur can estimate the funding needed and the dates it has to be obtained.

Berger & Udell (1998) and Delmar & Shane (2003) refers to the importance of the business plan to obtain external finance. The business plan is also essential to attract VC financing, and its preparation is a crucial task in the process to obtain venture capital financing. The information it contains referring to the entrepreneurial initiative and the entrepreneur / team make it a basic tool for the decision concerning the financial participation by the VCs

(MacMillan, Siegel & Narasimha, 1985; MacMillan & Narasimha, 1987; Rhea, 1989; Tyebjee & Bruno, 1986). Pintado & Lema (2004) conclude that the business plan is analysed meticulously by the VCs, who demand that it be shown by the firm's entrepreneurs prior to the start of negotiations (due diligence).
The perception by the nascent entrepreneur that the business plan is especially important in the process to obtain VC financing can lead the nascent entrepreneurs to cite the poor quality or defective presentation of the business plan as one of the reasons for rejection of capital by the VCs.

2.4 Characteristics of the nascent entrepreneur

The curriculum of the entrepreneur and the team members who will work with him is one of the selection criterion for investment that is most mentioned in the literature on venture capital (Franke, Gruber, Harhoff & Henkel, 2008). The VCs especially value industry experience, start-up experience and management experience (Tyebjee & Bruno, 1984; MacMillan, Siegel & Narasimha, 1985; MacMillan & Narasimha, 1987; Bruno & Tyebjee, 1985; Gorman & Sahlman, 1989; Fried, Hisrich & Polonchek, 1993; Rah, Jung & Lee, 1994; Fried & Hisrich, 1994; Zacharakis & Myer, 1995; Muzyka, Birley & Lelux, 1996; Wright, Robbie & Ennew, 1997). The self-assessment may lead the nascent entrepreneurs to conclude that one of the reasons for investment refusal by the VCs is linked to the assessment of the capacities of both themselves and their team.

Studies on VCs place an emphasis on the role of active investors through monitoring (Kaplan & Stromberg, 2001) which consumes a lot of time and significantly reduces the entrepreneur decision-making and control (Denis, 2004). Poutziouris, Chittenden & Michaelas (1998), in a study carried out in the UK concluded that in the small firms there is a natural control aversion. Although later studies refer that there is less aversion from the NTBF owner-managers when compared to proprietors of small firms (Berggren, Oloffson & Silver, 2000; Hogan & Hutson, 2005) it is possible that the strong feeling of possession that is present in the creation phase of the firm may lead the nascent entrepreneur to raise objections as regards yielding part of the control to the VCs. Control aversion can be viewed by the nascent entrepreneurs as one of the reasons for refusal of investment by the VCs.

2.5 Knowledge and capacities of the venture capitalists

The VCs generally include staff in their workforce with high qualifications (for example MBAs) who may understand the different kinds of business but who may find it difficult to understand the technology that is presented to them. This is especially true when having to deal with more innovative projects, given that true innovation involves complex technology (some of which may be groundbreaking). Small-scale VCs specialise in different industries or segments of industries that they know well and do not always have the capacity to assess projects based on truly groundbreaking technology. This lack of technological understanding and the lack of specific knowledge and skills of the venture capitalists may also be seen by the nascent entrepreneurs as a factor that contributes to the rejection of the investment by the VCs.

2.6 Public policies giving incentives to venture capital financing

The development of innovative firms, important actors in the innovation system, is a necessary prerequisite of a healthy economy. These firms are the initial driving forces that

bring about the advancement of technology and the dissemination of the innovations and new technology also in the traditional sectors. It is consensual that the return on innovation surpasses the private gain for society. Certain problems rooted in “market failures”, such as poor provision of finance, seem to impair the functioning of the innovation system in Europe (EC, 2002).

Acknowledgement of the significant return for society in tandem with some dysfunctions not only justify public intervention but actually call for aggressive policies in order to make sure the innovation system gives its best contribution to the economic and social development. Hence, different policies, including those that encourage the VC financing, are needed to make it easy to facilitate and stimulate the development of innovative firms. In the case of VC, there is a wide array of public policies. Clarification of the legal framework regulating the activity, attribution of tax benefits and direct government funding are perhaps some of the most well-known government schemes (Jeng & Wells, 2000). Whether or not these government schemes are in place can be a factor that pushes forward or inhibits the investment of the VCs. The Portuguese nascent entrepreneurs may also link their failure to obtain VC on poorly implemented or simple lack of government schemes such as these.

2.7 Specificities of the venture capital market in Portugal

Although the activity is growing, the venture capital market in Portugal is still of a small scale. According to the Portuguese Association of Venture Capital and Development (APCRI, 2007) at the end of 2005 the funds under management totalled €1158 M and the portfolio at cost €669 K. That year the investment sum reached € 245 M and encompassed 135 firms, while disinvestment in 90 firms reached €176 M. The seed phase (13 investments) and start-up phase (53 investments) accounted respectively for 2 percent and 11 percent of the total investment in 2005. This small size of the VC market in Portugal may be one of the factors that contribute to the failure of the Portuguese nascent entrepreneurs in obtaining VC financing.

In small economies there is a real problem in identifying the venture capitalists in comparison to large economies (EC, 2002). In Portugal the first regulation governing the practices of the venture capital industry dates to 1991. However, the activity only received a boost after the changes made to the legislation in 2002. Since then the governmental agencies and the associations have made a big effort to disseminate the venture capital, but as it is a relatively recent option, there may well still be a lack of information about the venture capital activities in Portugal and this can also make it difficult for the nascent entrepreneurs to identify the VCs.

3. METHODOLOGY

3.1 Sample

Our study used a sample of nascent entrepreneurs (a person who is now trying to start a new business) and involved two phases. The first identified a set of nascent entrepreneurs who were currently attempting to create an innovative firm. These nascent entrepreneurs were then monitored for a period of time (26 months) at the end of which they answered a follow-up questionnaire to ascertain the results of their efforts to obtain venture capital in the pre start-up phase. We define the pre start-up phase as the period from the business idea to the date of the first sale. The association between the start-up of the firm and the first sale has

been consistently used in the literature (Gatewood, Shaver & Gartner, 1995; Carter, Gartner & Reynolds, 1996; Newbert, 2005), so we also used these criteria in this study to identify the end of the pre start-up phase. The initial sample we used in this study consisted of 476 nascent entrepreneurs (individuals and teams) who entered three innovative business ideas contests that took place in Portugal in the 2nd and 3rd quarters of 2004, organised by government entities under the aegis of the Ministry of the Economy. Out of the 141 answers obtained, 61 were excluded because the nascent entrepreneur stated that he had not attempted to obtain venture capital, returned incomplete answers or there were doubts about the innovative nature of the firm, 17 were excluded because the nascent entrepreneur stated that he had obtained venture capital, meaning that the final sample was reduced to 63 nascent entrepreneurs who attempted and did not manage to obtain venture capital, which translates into 13.24 percent of the initial sample.

3.2 Questionnaire and methods

The first section of the questionnaire collected information about the characteristics of the nascent entrepreneur and the business initiative. These questions included (1) "kind of innovation proposed" so as to ascertain that the firm was indeed innovative and "description of the planning carried out" in order to evaluate the quality of the business plan (strong/few).

In the second section of the questionnaire the nascent entrepreneurs were asked to assess the relative importance of 13 criteria that were identified in previous research. This section was based on Bozkaya, Romain & Van Pottelsberghe (2003) previous model used to survey non-listed Belgian technology-based firms in 2002/2003.

The 13 variables that make up the second section were measured using a five-point Likert scale: 5 was " extremely important", 4 was " very important", 3 was " mildly important", 2 was " not very important" and 1 was " unimportant".

Questions included (1) lack of VCs' interest in pre start-up phase investments; (2) unwillingness of VCs to provide small amounts of capital; (3) lack of understanding of the specific technology presented by many VCs; (4) lack of registered patents; (5) poor or defective quality of the presentation of the business plan; (6) lack of entrepreneurial and managerial skills of the nascent entrepreneur and/or the management team; (7) Concerns over loss of control in the firm to be created; (8) VCs' expectations about rates of return; (9) VCs' expectations about the chances of quick exit; (10) lack of information about the VC activities in Portugal; (11) lack of VCs specific knowledge and skills; (12) limited public policies to support VC participation; (13) small size of the VC financing market in Portugal.

The data were initially summarised using univariate statistics. The sample was subsequently segmented according to the quality of the business plan (strong/few). The nonparametric Mann-Whitney U-Test was used to identify differences between the two categories relative to the "quality of the business plan" criterion.

4. RESULTS

Table 1 shows the univariate statistics obtained both for the sample (N = 63) and the sub-samples that resulted from the application of the "quality of the business plan" criterion. Table 1 also includes the results of the nonparametric Mann-Whitney U-test of differences between means, which was used to identify differences between the categories relative to the

"quality of the business plan" criterion.

The scores obtained in the sample (column 1) suggest that the small size of the venture capital market is considered the major factor by the nascent entrepreneurs behind the failure to obtain VC financing in Portugal. The second factor was considered the limited public policies to support venture capital participation. Other important factors are the lack of VCs' interest in pre start-up phase investments and the unwillingness of VCs to provide small amounts of capital. The aspects linked to the characteristics of the nascent entrepreneur (entrepreneurial and managerial skills and control aversion) that were also assessed are considered the factors that least contributed to rejection of the proposals by the VCs.

TABLE 1
Factors Behind the Failure to Obtain VC Financing in the Pre Start-up Phase: Mean and Standard Deviation and Mann-Whitney Test of Differences Between Means by Categories

Variables	All Nascent Entrepreneurs (1)		Quality of Business Plan (2)			
	Mean	S.D.	Strong		Few	
			Mean	S.D.	Mean	S.D.
VAR1	3.6667	1.40276	3.9000	1.20961	3.5581	1.48488
VAR2	3.4127	1.43274	3.7000	1.38031	3.2791	1.45284
VAR3	3.3810	1.49654	3.5500	1.43178	3.3023	1.53584
VAR4	2.7778	1.51811	3.3000(*)	1.65752	2.5349(*)	1.40321
VAR5	2.8254	1.28941	2.7000	1.38031	2.8837	1.25754
VAR6	2.1746	1.05555	2.0500	0.99868	2.2326	1.08753
VAR7	2.1270	1.12869	1.9500	1.19097	2.2093	1.10320
VAR8	3.2063	1.28463	3.2000	1.15166	3.2093	1.35503
VAR9	3.2222	1.17012	3.5500	0.99868	3.0698	1.22271
VAR10	3.1746	1.30186	3.2500	1.11803	3.1395	1.39012
VAR11	3.3492	1.28463	3.3500	1.08942	3.3488	1.37812
VAR12	3.8889	1.19287	3.3000(**)	1.26074	4.1628(**)	1.06749
VAR13	3.9841	1.00791	3.6000(**)	1.09545	4.1628(**)	0.92402
Valid N (listwise)	63		20		43	

(*) Significant at 10 percent (**) Significant at 5 percent (***) Significant at 1 percent
VAR1: Lack of VCs' interest in pre start-up phase investments
VAR2: Unwillingness of VCs to provide small amounts of capital
VAR3: Lack of understanding of the specific technology presented by many VCs
VAR4: Lack of registered patents
VAR5: Poor or defective quality of the presentation of the business plan
VAR6: Lack of entrepreneurial and managerial skills (n. entrepreneur /management team)
VAR7: Concerns over loss of control in the firm to be created
VAR8: VCs' expectations about rates of return
VAR9: VCs' expectations about the chances of quick exit
VAR10: Lack of information about the VC activities in Portugal
VAR11: Lack of VCs specific knowledge and skills
VAR12: Limited public policies to support venture capital participation
VAR13: Small size of the VC financing market in Portugal.

Column 2 of Table 1 splits the initial sample according to the "quality of the business plan" criterion. While the nascent entrepreneurs who put a big emphasis on the planning stated that failure to attract VC was due to the lack of interest by the Venture Capitalists in investing in pre start-up phase and in small investments, in contrast the nascent entrepreneurs who attached less importance to planning pointed to the public policies with regard to support venture capital participation and the small size of the VC market in Portugal as the main justifications for their failure to obtain VC financing. We found statistically significant differences ($p \leq 0.05$) in relation to these last two variables that are considered especially relevant for those who backed up their proposals on incomplete or poorly prepared business plans. Also in the "lack of registered patents" the probability value (p) is less than or equal to 0.10, and it is the nascent entrepreneurs who put a big emphasis on planning who most believed that the lack of patents significantly contributed to the rejection of their proposals.

5. DISCUSSION

In this study the nascent entrepreneurs who failed to obtain VC financing during the pre start-up phase of the innovative firms assessed the contribution of different factors explaining this fact. A first set of factors that was assessed is related to the specificities of the Portuguese venture capital market (size, dissemination, opportunities for a quick exit and public policies). The results obtained as regards this first set of factors show that there is a perception that the small size of the venture capital market and the limited public policies to support VC participation can make a crucial contribution to the VCs' decision. When we subdivide the sample according to the "quality of the business plan" criterion, it emerges that the subgroup that gave more emphasis to producing a complete business plan attaches less importance to these two factors than those who spend less time on the business planning. This leads us to surmise that suitable planning of the business would have made it easier for this subgroup to gain access to the VCs, attenuating the idea that the small size of the venture capital market and the improper public policies are to blame for failing to attract venture capital. Despite the fact the VC industry is relatively recent in Portugal, the people surveyed did not raise questions regarding the information available about this kind of financing. The VCs' expectation of a quick exit is viewed as an important factor by the nascent entrepreneurs who make up the subgroups of the sample that gave more emphasis to the planning.

These results are similar to those obtained by Bozkaya & Potterie (2008) as regards the question of information about the venture capital market. The results obtained in both studies devalued its importance. With regard to assessing the public policies to support venture capital participation the two studies brought to the fore their importance although the results of our study provide more conclusive findings. Given that Belgium and Portugal are EU countries this concern has reached the EU authorities and today it is evident that they are concerned about this problem. The expectations of a quick exit factor does not, in our study, match the importance that it did in Bozkaya & Potterie (2008) study where it is considered the most important condition as regards influencing access to VC financing in the early-stage. This comparison and the following ones have their limitations, as in Bozkaya & Potterie (2008) study the underlying question was "VC financing for my high-tech start-up firm has difficulties because of:" whereas in this study the nascent entrepreneurs were asked to assess the relative importance of 13 factors behind the failure to obtain VC financing in the pre start-up phase.

A second set of factors that was assessed is related to the venture capitalists. The contribution for the failure of their expectations about rate of return, their lack of interest in low investments in pre start-up phase, the understanding of the technology presented and their specific knowledge and skills were also assessed by the nascent entrepreneurs. The results obtained match the previous research that points out the interest of the VCs in investing in firms at a more advanced phase. In effect, there seems to be a conviction among the surveyed sample that the pre start-up phase of the firm is not the preferred phase of VCs to channel their investment (3rd most mentioned factor in the sample). This conviction is even stronger in the subgroup that put emphasis on producing high-quality business plans – in this subgroup it was mentioned as the major factor. This subgroup seems to doubt the technological knowledge of the VCs who turned down their requests for financing despite not bringing their specific knowledge and skills into doubt. Surprisingly, the VCs' expectations about rates of return, one of the VCs' selection criteria most referred to in the literature, was not viewed as an important factor by the nascent entrepreneurs surveyed. The nascent entrepreneurs also believe that the VCs may take a dim view of proposals that request low venture capital amounts. To sum up, the results of this second set of factors seem to indicate that there is a belief, especially among the nascent entrepreneurs with high-quality business plans, that the VCs are not overly concerned about the forecast rates of returns, but they do not fully understand the technology, have minimum investment benchmark amounts and are afraid to invest in firms in a pre start-up phase. These results differ from those obtained by Bozkaya & Potterie (2008) in relation to the VCs' expectations of rates of return and lack of understanding of specific technology by many VCs, which concluded that for the Belgian TBSFs the first factor is the second most important cause behind the difficulties in gaining access to the VC financing in the early-stage and the second factor is not even considered among the most important. The results are partially identical in relation to the lack of VCs interest in early-stage investments and lack of VC executives' specific knowledge and skills. The unwillingness of VCs to invest smaller sums was mentioned in both the studies, and in Portugal there is a subgroup that considers that the VCs pay particular attention to this factor in the final decision: the nascent entrepreneurs who place emphasis on producing a high-quality business plan (2nd most important factor). Has the business process with this subgroup evolved to the point that it has clearly become a question of the minimum amounts for investment of the VCs?

A third group of factors is related to the characteristics of the nascent entrepreneur or the management team (willingness to yield part of the control and entrepreneurial / managerial skills) and the business initiative (existence of a patent and quality of the business plan). With regard to the characteristics of the nascent entrepreneurs, the results show, as in the study by Bozkaya & Potterie (2008), that the surveyed nascent entrepreneurs do not believe these characteristics were important factors behind the rejection of their proposals by the VCs. We surmise that the commonly mentioned control aversion of small business entrepreneurs, much talked about in the literature, is not especially noticeable among the nascent entrepreneurs behind innovative business ideas, confirming the results of previous studies by Berggren, Oloffson & Silver (2000) and Hogan & Hutson (2005).

Finally, the results referring to the characteristics of the business initiative showed that the lack of a patent is not considered by the sample as a decisive factor behind the failure to obtain VC financing, but it is one of the factors that results in differences in opinion in the subgroups established based on the "quality of the business plan" criterion, whereby the entrepreneurs that put more emphasis on the business plan attached more importance to this factor.

6. CONCLUSIONS

This paper has been an attempt to investigate the reasons underlying the lack of success in obtaining the VC financing. We did so from the demand perspective using a sample of nascent entrepreneurs that were not successful when, during the pre start-up phase of their innovative firms, they attempted to obtain VC financing. This approach has rarely been taken in previous research which usually opted for the supply perspective and focused on more advanced phases of the firm, which are recognised to be of more interest to the VCs. We also split up the initial sample according to the "quality of the business plan" criterion so as to enable a more refined analysis and identification of the factors that differentiate the two subgroups resulting from the application of the "quality of the business plan" criterion.

The findings enable us to draw the conclusion that the Portuguese nascent entrepreneurs believe the structural aspects of the Portuguese venture capital market should be attributed a significant share of the blame for the lack of success. The main reasons cited for not obtaining venture capital financing were: 1) small size of the VC market in Portugal; 2) limited public policies to support VC participation; 3) lack of interest of the VCs in pre start-up phase investments; 4) unwillingness of VC suppliers to provide small amounts of capital. The sub-sample showed that the nascent entrepreneurs that based their financing proposals on more complete business plans included at the top of their list "lack of interest of the VC suppliers in pre start-up phase investments". The factors that most differentiate the nascent entrepreneurs who put emphasis on a high-quality business plan and those who did not make the business plan a high priority are the importance given to the public policies to support VC participation and the influence of the small size of the venture capital market in Portugal, both of which are attributed importance by the second subgroup.

We believe that these results can contribute to understanding the role played by the different factors in the process to obtain VC financing during the pre start-up phase of innovative firms. The conclusions of this paper serve as a wake-up call to the policy makers in Portugal to be more aggressive in relation to the public policies giving support to venture capital. It also confirms that venture capital operators pay little attention to the investment in the pre start-up phase and tend to ignore the financing requests asking for a lower amount.

However, as with all research, there are several limitations. We now outline some of these limitations as well as the possible avenues of future research. The results obtained refer specifically to a given context (Portugal). To ascertain whether our conclusions can be generalised to other contexts further research is necessary in other countries to validate our results. The sample comprises nascent entrepreneurs identified from contests held for innovative business ideas. In future research, an effort can be made to identify a random sample of innovative nascent entrepreneurs. Our analysis focused only on formal VC financing. In future studies this analysis can also look at informal venture capital or compare the different kinds of VC. Issues related to gaining access to venture capital, which have huge and wide-ranging potential for research and where it is not easy to obtain suitably large samples, can be explored through qualitative methods such as case studies. This alternative approach can be useful to assess the influence of other factors (for example characteristics of the business) or to focus specifically on some of the stages of the process to obtain venture capital financing.

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