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Securing One's Own Job or Developing One's Firm: The Entrepreneurial Objective when Starting a Business

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Abstract:*I This paper deals with entrepreneurs' objectives when starting a business. At the very beginning of the firm, the entrepreneur chooses to secure their jobs or to develop their firms. We provide evidence on the determinants of individuals' aim using a rich database made of an entrepreneur survey gathering entrepreneur and firm characteristics. We implement probit models on di erent subsamples to emphasize some covariate e ects. People who are the most discriminated on the labor market are more likely to create their own job than developing the firm.*
Keywords*: entrepreneurship, individual objectives.*

1. INTRODUCTION

In recent years, a growing interest has developed on entrepreneurship and self-employment. The Schumpeterian approach (Aghion and Howitt, 1997) advances the idea that entrepreneurial dy-namism is the key to innovation and growth. He/she is indeed a means to spread innovation (Schumpeter, 1934); he/she is also a potential employer when he/she decides to grow her firm. In that respect "the Entrepreneur is the single most important player in a modern economy" (Lazear, 2003). However research on entrepreneurship generally faces a lack of information on entrepreneurs themselves. The literature (Lazear, 2003; Poschke, 2008; Berglann, 2009) tries to identify en-trepreneurs and the self-employed by determining who they are and why they choose to undertake. Research generally focuses on the decision to become an entrepreneur or to become (remain as) a paid worker and establishes entrepreneurs' profiles. In that respect, models of occupational choice (Lazear, 2003; Poschke, 2008) show that the number of individual skills, the initial amount of capital are determinants of the decision to start a business. They also point to the fact that entrepreneurs are less risk averse than other people. Social networks play an important role in this decision in the sense that many entrepreneurs in emerging countries have relatives and/or friends who are entrepreneurs (Djankov et al., 2005). The decision is also analyzed through earning di erentials between the self-employed and paid workers. Self-employed people tend to earn less than paid workers, but they receive non-pecuniary and fringe benefits operating as compensations (Hamilton, 2000). A proportion of them aim at becoming their own bosses and taking advantage of other fringe benefits (Hamilton, 2000). Another fraction of individuals become entrepreneurs in the Schumpeterian sense (Schumpeter, 1934) that is they want to "build an empire". Following these observations, entrepreneurs have particular profiles in comparison to paid workers and they have di erent objectives when starting a firm are di erent for each entrepreneur.

The purpose of this paper is to investigate the determinants of entrepreneurs' main objectives when they start their businesses. The database identifies two intentions: securing one's job on the one hand (protection motive), developing the firm in terms of investment and personnel on the other (developing motive). We assume that, when stating their firms, firm-specific and entrepreneur-specific characteristics influence the decision between the two objectives. Section 2 presents the literature related to

entrepreneurship and self-employment, explaining main findings and di erences between choosing self-employment or entrepreneurship and paid employment. The related literature examines who wants to become an entrepreneur and liquidity constraints that people have to face. Section 3 shows the data that section 4 uses. The dataset includes entrepreneur and firm characteristics. Their richness in describing human capital and entrepreneurial background allows one to establish how individual characteristics play a role in the entrepreneurial decision. Females are in a larger proportion in the subsample "to secure their own job" than their male counterparts. Section 4 presents the econometric methods and discusses the role of di erent elements in the decision to secure one's own job or to develop the firm. Section 5 presents the results. Statistically the di erences between both objectives are seen through a few variables: status on the labor market before starting, initial amount of capital. Females are more likely to start a firm to secure their own jobs than their male counterparts; craftsmen are more likely to start for the same purpose than others. We find that people who are the most discriminated on the labou market seem to be more likely to create their job. Section 6 concludes.

2. RELATED LITERATURE

A growing interest on entrepreneurship has recently developed in economic literature. Researchers underline this form of employment because "entrepreneurs make up a substantial proportion of the labor force" (Poschke, 2008). Entrepreneurs are all the more important so as they employ or are likely to employ other people. Entrepreneurship and self-employment have been mainly investigated through the decision to become an entrepreneur/self-employed or remain as paid workers. Key determinants have been distinguished: occupational qualifications, family resources, gender and works environment (Berglann, 2009).

Models of occupational choice (Lazear, 2003; Poschke, 2008) are used to determine the type of people the more likely to undertake. Lazear (2003) establishes a model of occupational choice where an individual chooses to become an entrepreneur (multi-skilled) or to specialize (one single skill) that is whether the individual chooses to learn several skills and then undertake, or whether she prefers specializing in one particular skill to become a paid employee. As an application, Lazear investigates a database of Stanford alumni and emphasizes that entrepreneurs have more balanced talents that span number of di erent skills whereas specialists have a comparative advantage in a single skill. "Entrepreneurs are people who are multi-skilled either because of their endowment or because they acquire skills that they lack". On the one hand people who specialize invest in only one skill; on the other hand "those who become entrepreneurs may invest in one skill, but if they do so, it will be the skill in which they are weak". Entrepreneurs are the only individuals who may invest in several skills. He also points to the fact that "the proportion of individuals who are entrepreneurs increases with the income bracket examined". Entrepreneurs possessing high amounts of capital to start are less risk averse than others.

Poschke (2008) proposes a model of occupational choice to show that the relation between entrepreneurship and education is U-shaped i.e. people with low or high levels of education are more likely to be entrepreneurs than people with intermediate levels of education. Then "a substantial fraction (more than 10% in the U.S.) of people who become entrepreneurs "out of necessity" and not to pursue an opportunity". That is, even if they do not have a good opportunity, people decide to become entrepreneurs because they need to create

This is explained by heterogeneity of labor market prospects combined with the quality of each project. Entrepreneurs do not know the quality of their projects as long as they do not operate it. If, when started, the project is of a low quality, then the entrepreneur may cease it to start a better one.

Motivation to undertake and projects are thus among the conditions to start a successful business. Poschke establishes that most of the firms are small and new firms are and remain small. In fact, some of them are started by individuals who consider their firm as a source of extra income adding to their current job. This statement is consistent with stylized facts establishing that high entry, and exit, rates are the fact of small firms (Baldwin, 1995, Bartelsman et al., 2003).

In the context of emerging countries, Djankov et al. (2005) established a profile of entrepreneurs based on surveys from Russia, Brazil, China, India, and Nigeria. Three perspectives are investi-gated: The role played by economic, political and legal institutions in fostering or restricting en-trepreneurship. Then they focus on the social variables shaping entrepreneurship, namely the role of cultural values (Cochran,

1971) and social networks (Young, 1971). They also concentrate on entrepreneurs' individual characteristics that are as follows: Need for independence (McClelland, 1961), their psychological traits could be summed up as a belief linked to an impact of personal e orts on outcomes (McGhee and Crandall, 1968; Lao, 1970) and then their attitudes towards the risk and individual self-confidence (Liles, 1971). Djankov et al. eventually find that the Russian institutional environment has an impact on the determination of the scope for entrepreneurship.

Social network also operates as a determinant in the decision to become an entrepreneur. They find that many people family and friends are entrepreneurs too: "individuals whose relatives and school friends are entrepreneurs are themselves more likely to be entrepreneurs". Finally, "individual characteristics including educational background, performance on a test of cognitive ability, personal confidence, greed, and willingness to take risks are also important determinants of entrepreneurship, echoing the claims of Schumpeter and others". Djankov et al (2007). find similar results on their Chinese survey and draw very close conclusions.

On Brazilian data Djankov et al. (2007) make a comparison between entrepreneurs, failed entrepreneurs (those who stop their business) and non-entrepreneurs in order to isolate the e ects of institutional, sociological and individual characteristics. In the questionnaire they address, a test of cognitive ability shows that entrepreneurs do better than non- entrepreneurs.

They used the answers to the test to measure self-confidence (is the the individual overconfident or under-confident). No significant di erences were found between entrepreneurs and non-entrepreneurs. They also determine that entrepreneurs' networks are a matter of fact in the decision of starting a business. In particular, entrepreneurs' parents were more likely to be entrepreneurs or manager working with subordinates and they come from wealthier families. Brazilian entrepreneurs do not present more risk-loving attitude than non-entrepreneurs.

As an extension to those studies showing that entrepreneurs' profiles are substantially di er-ent from those of workers, one should suggest that di erences among entrepreneurs are relevant. An early entrepreneurial literature focuses on a few behaviors such as the faculty of judgment in economic organization that is an evaluation ability (Knight, 1921); the use and spread of new technologies and inventions that is exploitation (Schumpeter, 1934); and the ability to take ad-vantage of opportunities, that is discovery (Kizner, 1973). An more recent literature distinguishes entrepreneurs and self-employed people: Lazear (2003) defines an entrepreneur as "someone who responds a rmatively to the question "I am among those who initially established the business". In other words those individuals are responsible for the basic project, they hire the initial team and obtain at least some early financing. So he or she must be able to organize, manage people and business rather than only doing a single job.

This definition is not theoretically and empirically equal to the definition of self-employment: A self-employed person is defined as needing no other employees and, in terms of skills, a self-employed handyman needs a combination of skills less im-portant than for entrepreneurship. This distinction is a subject of American research (Davis et al., 2007). The American legislation defines an economic entity as a firm from the moment it employs at least one worker. Davis et al. (2007) use the terms of non-employer and employer to respec-tively qualify self-employed people (recorded with identity number) and businesses employing paid workers (recorded with firm identifier). No distinction is made in France. Each entity is recorded as a firm even if it is an employer or a non-employer.

As surveyed by Blanchflower and Oswald (1998) and Blanchflower et al. (2001), many people would like to be self-employed and Blanchflower et al. (2001) show that a majority of people would like to become entrepreneurs. The entrepreneurial spirit is more developed in the United States than in Europe. But little information about people who

want to run their own businesses are available. Comparing preferences of being self-employed or independent, Blanchflower et al

(2001) observe that the probability to prefer self-employment is decreasing in age whereas the probability to be self-employed is increasing in age. They also show that self-employed people have higher job satisfaction than the employed. As an extension of occupational choice models and job satisfaction, Hamilton (2000) studies earning di erentials in self-employment and paid employment. He distinguishes three types of explanation: (i) investment and agency models (e.g. Lazear and Moore, 1984) argue that self-employment di erentials arise from di erences between earning profiles across sectors; (ii) matching and learning models (e.g. Roy, 1951; Jovanovic, 1982) emphasize that earning di erences result from the sorting of workers into paid and self-employment on the basis of heterogeneous sector-specific abilities; (iii) self-employment earning di erentials may reflects variations in working conditions across sectors.

But those explanations are hardly evaluated by empirical studies examining the di erence between the average earning of paid employees and those of self-employed workers (Rees and Shah, 1986; Evans and Leighton, 1989). On average, male entrepreneurs tend to have higher initial earnings growth in a new business than paid employees starting a new job. The potential wages of entrepreneurs are not significantly di erent from those of paid employees.

On a panel data of a US income survey, Hamilton (2000) constructs self-employment/paid employment earning di erentials and examines the role of self-selection in the explanation of these di erentials. Comparing average earning profiles, he finds that jobs in paid employment o er both higher initial earnings and greater earnings growth. Despite these facts, many workers are willing to enter and remain in self-employment. Hamilton (2000) finds that self-employment o ers non-pecuniary benefits, "such as being your own boss". Entrepreneurs accept to earn less than paid employees because of non-pecuniary benefits provided by business ownership.

Among people with an entrepreneurial spirit, why do so few become entrepreneurs? One reason is liquidity and finance constraints (Evans and Jovanovic, 1989, Blanchflower and Oswald, 1998). Due to credit rationing, individuals who decide to become entrepreneurs have to accumulate assets in order to start viable businesses and to be able to support entry costs. They often raise capital thanks to personal or family funds. Blanchflower and Oswald (1998) find that, all else equal, people with greater family assets are more likely to switch to self-employment from employment.

This kind of people is more likely to do so because they dispose of amounts of capital su cient to start a business and avoid problems of liquidity constraints.The existence of liquidity constraints and credit rationing is explained by the fact that secured loans (those with collateral) are a rational response by bankers to imperfect knowledge of the di erent projects.Indeed, bankers imperfectly know or do not know at all whether a project will work or not and they cannot distinguish feasible projects from unfeasible projects.They consequently tend to limit access to credits.

The literature related to entrepreneurship generally focuses on the characteristics of entrepreneurs and on the decision to become an entrepreneur versus remaining as a paid employee. It draws up profiles of people who become entrepreneurs. It also studies earnings di erentials between self-employment and paid workers and find that even if self-employed people earn less than paid employees, they benefit from non-pecuniary advantages. Self-employed and entrepreneurs do not pursue necessarily a financial opportunity. People's decisions are thus motivated by di erent en-trepreneurial aspects and entrepreneurs do not pursue the same objective.

But little is known about the objectives linked to the decision to start a business or that follow directly the start up. As an extension to those works, this paper explores the individual decision between securing one's own job or developing the started firm in terms of jobs and investments. The first objective should be considered as a protection motive. The second one could be seen as a development motive. This objective could be considered as a preview to entrepreneurs' will to hire people.

The protection motive could be the prelude to a further the second that is entrepreneurs declare at the begin-ning that they rather prefer securing their jobs and, as they are well established, then they should

decide to develop the businesses. The following sections propose simple estimations to show the determinants of each objective.

3. SOURCES

In this paper, we use an original and rich dataset from a survey of entrepreneurs (SINE).

3.1 SINE Database

The SINE ("système d'information sur les nouvelles enterprises") survey is a permanent observatory system of start-ups. Its objective is to follow a generation of newly created firms during five years. There are three generations of firms but we concentrate on the 2002 cohort. Firms can enter the market all year long and the year is divided in two semesters for interrogation. All firms are surveyed three times:

The first interrogation occurs in the early entry, the second one three years after birth and the third one five years after birth. The firms of the 2002 first semester received their first questionnaire in September 2002.

The second one was given in October 2005. All firms were surveyed again in September 2007. Firms surveyed operate in the manufacturing sector, construction, commerce and services (except financial activities). Agriculture is also excluded.

The SINE database consists of 44,321 observations (We apply weights (i.e. the inverse of poll rate) to any empirical work. Our descriptive following statistics are weighted by the variable provided by the dataset.)and 771 variables. SINE includes micro-firms, in particular those of the services sector that represent the major part of start-ups, i.e. nearly 60% of new firms are created in the commerce and repair sector, and in other services (services to households and to firms).

3.2 Descriptive Statistics and Definitions

This section presents statistics about entrepreneurs' objectives and some of their characteristics.Remarks on Subsamples and Variable of Interest: Entrepreneurs' Objective

Our variable of interest is the objective of entrepreneurs, the choice they make between securing their own jobs (49%), and developing the firm in terms of employment and investments (41%). Around 10% chose nothing[2].(hese 10% can be divided in two groups: firms are inactive from september 2002 for the first group, entrepreneurs who should cannot choose between the objectives)

Considering two subsamples, A denoting people who want to secure their own job, and B denoting people who want to develop their firms. As they potentially begin their businesses with workers or they should hire workers, people in subsample A cannot be likened to self-employed people. The definition of people in A is larger than self-employment.

Thus, they should be referred to as "self-protectors" as their main objective is to protect their jobs. People in B should be referred to as "developers".

We find similar proportions in each covariate between self-protectors and developers and also between each one and the general sample. In fact a few covariates present di erences. The percentage of CEO or managers is higher among developers than self-protectors and the percentage of paid employees and people without professional activity is higher among self-protectors than developers.

Di erences are also seen in terms of motivation: individuals in self-protectors are more likely to be without employment, willing to start up and individuals in developers are more likely to have opportunities and a taste for entrepreneurship.

The starting amount capital is generally higher among developers than self-protectors, a higher percentage of people in developers is present in the groups of highest capital and higher percentage of people in self-protectors in the groups of lowest capital (Table 5).

Finally, people in self-protectors largely answered 'no' to the question of future employees hiring in the next twelve months. (See Table 2)

In the sample, 54.5% of self-protectors were unemployed and 16% of inactive people (Table 1). The decision an entrepreneur has to make implies two logics we discuss in the following section.

Table 1: Variable of Interest: Entrepreneurs' Objective

Objective	Freq.	Pct.	Freq.	Pct.	Freq.	Pct.
	Total		In Activity		Unemployed	
No answer	9,129	9.82	3,411	7.07	1,910	6.43
Securing One's Job	45,258	48.68	21,742	45.08	16,190	54.53
Develop the Firm	38,579	41.50	23,076	47.85	11,591	39.04
Total Nb of Obs.	92,966		48,229		29,691	

Source: Sine survey 2002

Note: statistics were weighted by the inverse of poll rate

Individuals Characteristics, Human Capital

More than two thirds of entrepreneurs in the sample are male entrepreneurs (70%). They are on average 38 years-old with minimum of 18 and maximum of 82. They mostly have CAP/BEP, Diploma higher than the baccalauréat, or even no diploma (See Table 3). Those results are con-sistent with the U-shaped relation between entrepreneurship and education (Poschke, 2008) that is people with low diploma and people with high diploma are more likely to start a business.

People starting a new business are mostly in employment (52%), but a substantial proportion of them are unemployed people (32%) potentially to exit this status, 13% of non-workers (3% did not answer). The percentage of people benefiting from social minima are only 9.5% (6% RMI, 3.5% ASS). People in this situation are rarely able to gather enough money to realize a project. 78% of individuals want to be self-employed or entrepreneurs in a sustainable way and 12% in a limited duration (10% did not answer).

Financing

As Evans and Jovanovic (1989) show, firm financing matters. As a general remark, entrepreneurs in SINE possess modest initial amounts of capital: around 70% of them have less 16,000 Euros (see table 5), with 19.5% having less than 2,000 Euros. 20.5% have between 16,000 and 80,000, and 10% more than 80,000 Euros. The covariate denoting the starting amount of capital corresponds to the total of spendings linked to procedures of the firm formation, setting-up in premises, production equipment and machine purchases, stocks formation, patents or licenses and other investments. In that context, the government and/or the banks should finance projects possessing low amounts of capital: 58% of entrepreneurs did not get any bank loan, and 70.5% of individuals did not receive any public benefits. Among those who received one, 52.3% received the ACCRE[3] (Aide aux Chômeurs Créateurs et Repreneurs d'Entreprises, Unemployed Entrepreneurs and Takeover Benefits), 12% received the EDEN[4] (Encouragement au Développement d'Entreprises Nouvelles, New Firm Development Support),18% the PCE[5] ([5]Prêt à la Création d'entreprise, Firm Starting-up Loan) and 18% local or regional benefits or exemptions.

4 . METHODOLOGY

This section describes the empirical methodology used to model entrepreneurs' decision. We in-vestigate the main objective of a sample of entrepreneurs: "What is your main objective? " (SINE survey 2002). Two possibilities are given: (i) "Essentially secure your own job"; (ii) "Largely de-velop your firm in terms of employment and investment". This paper aims at observing the impact of di erent individual-specific and firm-specific covariates on entrepreneurs' objectives.

We delete missing observations of the variable of interest. Missing values represent around 10% of the 'objective' variable. Some answers to the objective prove to be irrelevant: entrepreneurs were interviewed about their point of view about the future, some of them answered "sell the firm" or "close the firm". There is a contradiction between those answers and any of the main objective. We then obtain 38,610 observations.

The objective is binary and involves two logics. First, the unemployed individual's decision: because she cannot find a job, the unemployed decides to create his/her own job.

Paid workers can possibly decide to stop their current jobs to start a business, expecting higher returns to self-employment or to get independence from bosses. This kind of entrepreneurs does not correspond to Schumpeterian entrepreneurs. We refer to them as self-protectors. Second, a will to grow and to be successful as described by Schumpeter (1934). The Schumpeterian entrepreneur has the desire "to create an empire" and has a "winner's will, creates without respite, because he can do nothing else". It may be first characterized by a desire to discover entrepreneurship and then "create an empire". Entrepreneurs are less risk-aversion than other people and thus are ready to take more risks in starting a business. In the case of developers, people aim at hiring workers and increasing their capital. This kind of individual is probably nearer the Schumpeterian entrepreneur ("The empire builder") than self-protectors.

Table 6 presents the following models: (i) model 1 includes only a few individual characteristics (gender, age, nationality, previous situation, motivation, point of view about the future, minimum social beneficiary); (ii) includes the previous variables, financing (Initial amount of capital, type of subsidies, sources of financing), previous background, entrepreneurial network and the decision to hire workers within twelve months; (iii) includes the previous ones and firm characteristics (who set up the project, type of creation, subsidiary company, sector, region of location).

5. RESULTS

This section provides results of the estimations of the three models describing the e ects of en-trepreneurs' characteristics on the objective: (i) first model includes a set of individual character-istics; (ii) the same set and financing variables (e.g. initial amount of capital); (iii) includes the previous ones and firm characteristics.

The significance of almost each variable does not change when we add other covariates. Only their coe cient values tend to decrease when adding controls to the initial model. The signs on the coe cients are generally plausible in modeling the decision to secure one's job. Table 6 summarizes the main results.

Probit 1

Females are more likely to secure their own jobs than males. They are more likely to choose self-employment to have more flexible schedules, "the presence of dependent children raises the probability of self-employment" (Dawson et al., 2009). They possibly enter self-employment to avoid gender or statistical discriminations (Dickinson and Oaxaca, 2006, Dawson and al., 2009). In another way, "women are more likely than men to choose self-employment in order to balance work and home commitments" (Dawson et al., 2009) and is an alternative to part-time jobs largely accompanied with inequalities. Self-employment could be a way to avoid inequalities on labor market and thus corresponds to the idea of self-protection.

Entrepreneurs older than 50 are more likely to become self-protector (related to any other age bracket). As self-employment is part of the definition of self-protector, those estimations are consistent with the fact that the probability of being self-employed is increasing in age (Blanchflower et al., 2000).On the labor market, the probability to find a job decreases in age of low skilled unemployed people. Human capital depreciation is often pointed by employers to discriminate older workers. As a result, older unemployed people should enter entrepreneurship.

In the case of paid workers, the possibility to accumulate capital increases in age, Older individuals are more likely to accumulate capital and increase their personal resources to start a business (Blanchflower and Oswald, 1998).

Non-European people are more likely to be developers than self-protectors. An explanation could be found in the network e ect: individuals living out of France who have family or friends living in France may be interested in create a business thanks to this network. A positive e ect of networks on the decision to become developer was found confirming this idea (see results below).

Unemployed people are divided in two groups in the database, those who are less than one year unemployed and those who are more than one year unemployed. Only the second one has an e ect on the decision when starting up. People who are more than one year unemployed are more likely to secure their job than employed people. This behavior is the

expression of a need for money or job (in particular to get compensation). An aggregate variable 'unemployed' with no distinction in the length of unemployment has no significant e ect on the decision. When controlling for financing and sectors, unemployment has no significant e ect.

'C.E.O. before starting up' are more likely to become developer than 'self-employed before starting up'. This is consistent with the hypothesis on the variable of interest and the two logics we expose in section 4.

The decision to become entrepreneurs is motivated by di erent factors. 'Opportunity' and the 'entrepreneurial taste' plays a negative role in the decision to secure the job in relation to 'new idea'. A 'new idea' is consistent with the innovation notion and thus fit with the Schumpeterian definition.

An opportunity could be seen through a punctual increase in financial means, for example a gift or an inheritance, that allows one to run a project, in particular setting up an innovation (a new idea). 'Being independent' is significantly positive in relation to 'new idea'. 'Being independent' corresponds to the idea of self-employment and, in that sense, fits with the empirical fact that self-employment is attractive for non-pecuniary benefits as being one's own boss (Dawson et al., 2009; Poschke, 2008) 'With no employment, chose to start up' and 'With no employment, obliged to start up' are significantly positive in the decision to secure one's job. This corresponds to the typical case of people eager to exit unemployment to improve their situation as discussed above.

Within six months, entrepreneurs who want to 'sustain the current balance' or do not have an opinion on the future ('do not know') are more likely to be self-employed than those who want to 'develop the firm'.

"Educational attainment is significantly related to the probability of self-employment" (Dawson et al., 2009) and "the relation between what entrepreneurship is and education is U-shaped" (Poschke, 2008). Education has an impact on the decision to become an entrepreneur.

Thus, assuming that qualification or diploma should have an impact on the decision to secure one's job or developing the firm is relevant. However, our models state that human capital have no real impact on the entrepreneurial objective.

Probit 2

Considering the lowest initial amount of capital as the reference, other amounts have a signifi-cantly negative impact on the probability to become self-protector rather than developer.

People with low amounts of capital are found to be more likely to become self-protector. Unemployed people and minimum social beneficiaries are less able to gather high capital to start a firm, they are also in need of finding a job to exit precariousness. However the model does confirm this intuition and unemployment have a small e ect (probit 2) and even no e ect on the decision in case of probit3.

Evans and Jovanovic (1989) show that people are often obliged to fall back on personal resources. In this model, personal bank loans and personal resources are highly significant and those individuals are more likely to secure their own jobs than those who got bank loan by means of the firm. People starting thanks personal resources

People with no entrepreneurial network are more likely to become self-protector. Djankov et al. (2008) report that entrepreneurs often know entrepreneurs among their family or school and university friends. In our case, when individuals become developers, they are more likely to use their entrepreneurial network than individuals who become self-protectors.

People declaring they will not hire workers within twelve months after starting (and those who do not know) are more likely to secure their own jobs than those willing to hire workers(When controlling for the number of workers at the beginning, same e ects are found. Moreover when 'no workers' is taken as the reference, then one worker or more are negatively correlated to the fact of securing the job. Entrepreneurs who have no workers when they start are more likely to secure their jobs than others.)

Probit 3

Individuals who participate to the setting-up of the project are determinants in the choice made by the entrepreneur. Taking setting-up the project 'alone' as the reference, all the modalities are highly significant and negative. That is when an individual starts a firm with anybody else, then he or she decides

to develop the firm rather securing the job. Starting with an organism supporting firm creation is not significant.

Sectors are not highly significant determinants of the decision, except 'education, health, social activities' and 'construction' which are highly significant and positive in relation to the food indus-try. When individuals start projects in those sectors, they are more likely to choose to secure their jobs than developing the firm.

Transportation is not negligible and is 5% positively significant. For example, people are more likely to be self-employed in taxi driver jobs and need not hiring workers.

Individuals who start up (ex nihilo creation) are more likely to secure their jobs than those who buy out a firm to the last employer. Starting up is more consistent with securing one job rather than buyback because in the latter case, there exist responsibilities, employees etc. to be managed whereas self-employed people avoid problems of personnel management.

Subsidiary firm entrepreneurs are less likely to start up to secure their jobs than others. In fact, subsidiaries are part of large groups which the main goal is to expand. The largest proportions of subsidiary firms are composed of top executives and blue-collar workers. In that respect, individuals who get involved in subsidiary firms corresponds to developer profile.

The Parisian Region (Ile-de-France) lowers the probability to start up to secure one's job. Un-employed people are more likely to find jobs, even in the informal economy to need not starting a business to have a job. People in province may have less access to employment, in particular in regions of high unemployment rates and spatial mismatch.

Taking the Parisian Region as the reference, four regions have a significantly positive e ect on the decision to secure the job. They correspond to regions where unemployment exit is di cult (Duguet et al., 2009).

When introducing juridical category (natural person or corporate boby), we find that the region has no e ect on the individual decision. Results on other variables are very similar to those of table 6. Being a 'natural person' increases the probability to decide to secure one's job.

6. CONCLUDING REMARKS

The existing literature provides an overview of the determinants and empirical aspects of the deci-sion to become an entrepreneur or remain as a paid worker, the reason of choosing self-employment and its returns. As an extension to these analysis, this paper is an attempt to study the individual decision when starting in terms of creating one's own job or starting up to develop a firm. A simple model to study entrepreneurs' decision is provided to analyse French data from a survey of a five-year cohort of firms started in 2002. The resulting base includes entrepreneur and firm characteristics allowing the catching of specificities.

This paper has established that gender (females and older people are more likely to secure their job rather than to develop the firm), age, personal point of view (motivation and point of view about the future), institutions (subsidies and bank loan), financing and initial amount of capital, professional background have an impact on the probability to secure one's job rather than starting up to develop the firm. Economic sectors have not important e ects on this decision. The probability of starting up to secure one's job decreases with the initial amounts of capital, and a priori with the probability to get bank loans, as it it positively correlated with these amounts (no real e ect of bank loan was found in this study). This decision shares many determinants with the the decision to become an entrepreneur or remain as a paid worker.

The dataset does not allow one to take innovation into account. However, an innovative en-trepreneur would become developer the firm rather than being self-protector. Although SINE is composed of three temporal questionnaires, the question about the decision between securing the job or developing the firm is only asked in the first one. Thus we cannot follow the decision tempo-rally and check whether each entrepreneur change its mind in time.

The dataset do not include any variable related to risk. Thus individual behavior in terms of risk aversion cannot be controlled.This paper does not take into account the potential endogeneity of the initial amount of capital or the gettingof subsidies and/or bank

loans. Moreover, as financial resources and the initial amount of capital have an impact on the entrepreneurial objective (Table 6) further research should study the importance of financing and the impact it could have on the objective, in particular when it is supposed endogenous.

7.ANNEXES

Entrepreneurs are assumed to be less risk adverse than other people. They chose to start firms for two reasons: (i) securing one's employment which is called self-employment (or non-employer) in the literature; (ii) developing the firm which is called entrepreneur (or employer). What is the origin of the choice?

One can assume that the profile of the entrepreneurs of the two subsamples are di erent. However, descriptive statistics tend to show that the profiles are very similar between the two subsamples.

Table 2: Descriptive Statistics: Generalities

	Total		*Objective 1*		*Objective 2*	
	Freq.	Pct.	Freq.	Pct.	Freq.	Pct.
Gender						
Male	65,826	70.81	29,928	66.13	29,846	77.36
Female	27,140	29.19	15,330	33.87	8,733	22.64
Previous Situation before Starting						
No Answer	2,831	3.05	17	0.04	.	.
Self-employed	9,932	10.68	4,528	10.00	4,575	11.86
CEO	7,975	8.58	2,253	4.98	5,101	13.22
Paid employee	54,642	58.78	28,289	62.51	22,818	59.15
Student	3,416	3.67	1,944	4.30	1,299	3.37
No Prof. Activity	14,170	15.24	8,227	18.18	4,786	12.41
Previous Activity						
No Answer	2,845	3.06	11	0.02	3	0.01
In Activity	48,229	51.88	21,742	48.04	23,076	59.81
Unem. less than one Year	16,381	17.62	8,461	18.70	6,903	17.89
Unem. more than one Year	13,310	14.32	7,729	17.08	4,688	12.15
No Activity	12,201	13.12	7,315	16.16	3,909	10.13

Source: SINE survey 2002 Note: Objective 1 refers to "Securing one's employment" and Objective 2 refersto "Developing the firm"

Table 3: Descriptives Statistics: Human Capital

	Total		Objective 1		Objective 2	
Diploma	Freq.	Pct.	Freq.	Pct.	Freq.	Pct.
No Answer	2,812	3.02	9	0.02	4	0.01
No Diploma	14,898	16.03	7,839	17.32	5,705	14.79
CEP, BEPC	8,505	9.15	4,546	10.04	3,283	8.51
CAP/BEP	23,456	25.23	11,520	25.45	10,286	26.66
Techn. of Prof. BAC	8,774	9.44	3,931	8.69	4,289	11.12
General BAC	7,250	7.80	3,527	7.79	3,175	8.23
Higher Dipoma	27,271	29.33	13,886	30.68	11,837	30.68
Qualification						
No Answer	38,346	41.25	16,974	37.50	15,761	40.85
Top Executive	9,915	10.67	4,555	10.06	4,699	12.18
Foreman	5,002	5.38	2,241	4.95	2,459	6.37
Middle-Class Job	6,928	7.45	4,200	9.28	2,286	5.93
Employee	20,726	22.29	10,979	24.26	8,485	21.99
Worker	12,049	12.96	6,309	13.94	4,889	12.67
Received Prof. Training						
No answer	2,951	3.17	37	0.08	3	0.01
Yes, after Asking	10,029	10.79	5,105	11.28	4,300	11.15
Yes, because Imposed	17,793	19.14	9,004	19.89	7,696	19.95
No Training	62,193	66.90	31,112	68.74	26,580	68.90
Total Nb of Obs.	92,966					
Weight						

Source: SINE survey 2002 Note: Objective 1 refers to "Securing one's employment" and Objective 2 refers to "Developing the firm"

CEP, BEPC: Middle school diploma; CAP/BEP: Professional Skill Certificate or Professional Diploma; Techn. of Prof. BAC: Professional Baccalaureate or Professional High School Diploma; General BAC: High School Diploma; Higher Diploma: all sorts of diploma French students can get after passing High School Diploma

Table 4: Descriptive Statistics: Motivation

	Total		*Objective 1*		*Objective 2*	
	Freq.	Pct.	Freq.	Pct.	Freq.	Pct.
Motivation						
New Idea	1,332	1.51	359	0.81	801	2.09
Independence	4,755	5.40	3,064	6.95	1,290	3.37
Entrepreneurial Taste	12,958	14.71	4,953	11.23	7,281	19.00
Opportunity	21,304	24.18	8,502	19.28	11,388	29.72
Example from Network	10,821	12.28	4,784	10.85	5,535	14.45
Unem., Choice	15,909	18.05	9,691	21.97	5,436	14.19
Unem., Constraint	4,577	5.19	3,355	7.61	928	2.42
Other reason	16,459	18.68	9,400	21.31	5,658	14.77
Missing Values	4,851		1,150		262	
Point of View about the Future						
Develop the Firm	41,075	44.18	7,500	34.51	11,039	60.60
Sustain current Firm	27,743	29.84	8,328	38.32	4,378	24.03
Recover di . Sit.	4,832	5.20	1,175	5.41	1,014	5.57
Close the Firm	2,008	2.16	670	3.08	122	0.67
Sell the Firm	4,447	4.78	408	1.88	140	0.77
Does not know	12,861	13.83	3,652	16.80	1,524	8.37

Source: SINE survey 2002 Note: Objective 1 refers to "Securing one's employment" and Objective 2 refers to "Developing the firm"

Table 5: Descriptive Statistics: Comparison between Subsamples in Financing

Initial Amount of Capital	*Total*		*Objective 1*		*Objective 2*	
	Freq.	Pct.	Freq.	Pct.	Freq.	Pct.
No Answer	3,024	3.25	59	0.13	9	0.02
Less than 2,000	18,038	19.40	12,550	27.73	4,015	10.41
2,000 to 4,000	10,891	11.72	6,587	14.55	3,684	9.55
4,000 to 8,000	17,493	18.82	8,569	18.93	7,596	19.69
8,000 to 16,000	15,350	16.51	7,142	15.78	7,315	18.96
16,000 to 40,000	12,248	13.17	5,022	11.10	6,470	16.77
40,000 to 80,000	6,820	7.34	2,613	5.77	3,777	9.79
More than 80,000	9,102	9.79	2,716	6.00	5,713	14.81
Public Benefits						
No Answer	3,101	3.34	104	0.23	24	0.06
Yes	24,241	26.08	12,569	27.77	10,296	26.69
No	65,624	70.59	32,585	72.00	28,259	73.25
Bank Loan						
No Answer	3,112	3.35	102	0.23	25	0.06
Yes	36,292	39.04	16,144	35.67	17,447	45.22
No	53,562	57.61	29,012	64.10	21,107	54.71
Social Minimum Beneficiary						
No Answer	3,004	3.23	67	0.15	34	0.09
RMI	5,584	6.01	3,244	7.17	1,926	4.99
ASS	3,280	3.53	1,892	4.18	1,148	2.98
No One	81,098	87.23	40,055	88.50	35,471	91.94

Source: SINE survey 2002
Note: Objective 1 refers to "Securing one's employment" and Objective 2 refers to "Developing the firm"

Table 6: Estimations on entrepreneurs' objectives. Determinants of Securing One's Job

	Model 1		Model 2		Model 3	
Paramètre	Estimation	Std. Error	Estimation	Std. Error	Estimation	Std. Error
Intercept	-0.1277	0.5895	-0.6329	0.6406	-1.1091***	0.0749
Male	-0.2228***	0.0158	-0.1158***	0.0170	-0.1027***	0.0173
Age						
Less than 25	Ref.					
25 to 29	0.0809**	0.0327	0.0367	0.0347	0.0198	0.0349
30 to 34	0.1290***	0.0321	0.1131***	0.0344	0.0799**	0.0345
35 to 39	0.2279***	0.0324	0.2219***	0.0347	0.1730***	0.0348
40 to 44	0.2587***	0.0336	0.2405***	0.0361	0.2612***	0.0376
45 to 49	0.3318***	0.0351	0.3151***	0.0376	0.2690***	0.0381
50 and more	0.4918***	0.0346	0.3988***	0.0373	0.3463***	0.0373
French	Ref.					
EU Foreigner	-0.0500	0.0344	-0.0475	0.0368	0.0357	0.0369
Foreigner non EU	-0.2505***	0.0332	-0.1180***	0.0349	-0.0740**	0.0346
Previous Professional Status						
Self-Employed	Ref.					
CEO, Manager	-0.3974***	0.0319	-0.2884***	0.0351	-0.2591***	0.0350
Student	0.1809***	0.0462	-0.00959	0.0506	-0.00911	0.0502
No Activity	0.0618**	0.0307	-0.0167	0.0334	-0.0301	0.0328
Previous Status						
Paid Employee	Ref.					
Unempl. More than One Year	0.0696***	0.0256	0.0507*	0.0277	0.0180	0.0268
Inactive	0.2186***	0.0267	0.0918***	0.0293	0.0704**	0.0293
Motivation						
New Idea	Ref.					
Being Independent	0.2090***	0.00809	0.1697***	0.00881	0.1552***	0.00887
Entrepreneurial Taste	-0.1547***	0.00496	-0.1211***	0.00531	-0.1220***	0.00531
Opportunity	-0.0344***	0.00373	-0.0174***	0.00402	-0.00803**	0.00408
With No Job, Decided to Start	0.0431***	0.00341	0.0362***	0.00364	0.0351***	0.00362
With No Job, Obliged to Start	0.0732***	0.00483	0.0602***	0.00518	0.0580***	0.00518
Other Reason	0.0203***	0.00247	0.0114***	0.00265	0.0103***	0.00263
Point of View about the Future						
Develop the Firm						
Sustain current Firm	0.5997***	0.0156	0.3377***	0.0171	0.3543***	0.0174
Recover di . Sit.	.2337***	0.0299	0.0345	0.0319	0.0410	0.0321
Does Not Know	0.6534***	0.0220	0.3646***	0.0241	0.3561***	0.0242

Table 7: Estimations on entrepreneurs' objectives. Determinants of Securing One's Job (continued)

Subsidies					
ACCRE	Ref.				
EDEN		-0.1127***	0.0406	-0.1192***	0.0394
PCE		-0.1481***	0.0411	-0.1512***	0.0410
Financial Resources					
Entrep. Bank Loans	Ref.				
PCE, EDEN		0.0563***	0.0196	0.0458**	0.0196
Personal Bank Loan		0.0147**	0.00745	0.00608	0.00687
Other Types of Loan		-0.0264***	0.00745	-0.0264***	0.00742
Personal Resources		0.00963**	0.00379	0.0132***	0.00353
Contrib. from Capital Stock Cies		-0.0339***	0.00960	-0.0308***	0.00961
Other Companies Contribution		-0.0721***	0.00777	-0.0464***	0.00808
Initial Amount of Capital					
Less than 1,524	Ref				
1,524 to 3,811		-0.1765***	0.0280	-0.1422***	0.0283
3,811 to 7,622		-0.2998***	0.0251	-0.2435***	0.0252
7,622 to 15,244		-0.3093***	0.0261	-0.2498***	0.0260
15,244 to 38,112		-0.4087***	0.0286	-0.3373***	0.0280
38,112 to 76,244		-0.4749***	0.0337	-0.3885***	0.0331
More than 76,244		-0.6700***	0.0329	-0.5617***	0.0320
Entrep. Network		-0.0506***	0.0158	-0.0340**	0.0157
Future Hiring	Ref.				
No Fut. Hiring		1.2495***	0.0200	1.2154***	0.0204
Does Not Know		0.5056***	0.0196	0.4914***	0.0198
Project Set-up					
Alone	Ref.				
With the Spouse				-0.0552***	0.0198
With a Family Member				-0.2735***	0.0218
With a Member of the Prev. Firm				-0.3001***	0.0368
With Members of the Actual Firm				-0.3023***	0.0892
Firm Type					
Repurchase from Previous Employer					
Ex Nihilo Creation				0.1195***	0.0203
Subsidiary				-0.3169***	0.0377
Crafstmanship				-0.0660***	0.0210
Sector					
Food Industry	Ref.				
Education, Health				0.4805***	0.0591
Construction				0.1303***	0.0464
Region					
Ile-de-France				-0.0769***	0.0245
Observations	38,610	38,610		38,610	
Likelihood Ratio	7,150.08	13,283.84		13,668.15	

Source: SINE survey 2002

Notes: Stars indicate statistical significance at the 90% (*), 95% (**) and 99% (***) level, respectively.

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