The effects of internal and external barriers on Vietnamese students' entrepreneurial intention

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ABSTRACT

This study aims to investigate the effects of internal barriers, including personal traits and cognitive conditions, and external barriers, including normative and regulative structures, on entrepreneurial intention among Vietnamese students. By collecting data from 437 students at high schools, universities and colleges in Vietnam, authors employ a quantitative method such as certain descriptive statistics, explorative analysis (EFA), KMO and Bartlett test, correlation coefficient analysis, and logistic regression to examine the relationship between entrepreneurial barriers with different issues including personal traits, cognitive condition, normative and regulative structures, and entrepreneurial intention. The research results show that all four independent variables; namely barriers related to personal traits, cognitive condition, normative and regulative structures had negative effects on entrepreneurial intention. Particularly, cognitive conditions are seen as the most influential barrier to entrepreneurial intention, followed by personal traits, regulative and normative structures.

Keywords:
Internal and external barriers
Entrepreneurial intention
Vietnamese students

1. Introduction

The reasons of why students do or do not intent to run their own business have been interested by many researchers in entrepreneurship literature (Iakowleva et al., 2014; Moriano et al., 2012; Krueger et al., 2000; Kolvereid, 1996). Entrepreneurs play a crucial role in developing the national economy, well-being of a society (Iakowleva et al., 2014), innovation and employment (Kelley et al., 2011). Entrepreneurial barriers have long been researched as significant factors discouraging the establishment of new venture (Lien et al., 2002; Adekiya & Ibrahim, 2016). Carayannis et al. (2003), Franke and Lüthje (2003) and Pittaway and Cope (2007) stressed that an individual’s intention to start up a business is shaped by his or her perception of barriers involved in entrepreneurship, cultural and traditional values, legislative and regulative environment. Administrative difficulties, poor infrastructure, bank’ hesitation to provide financial support for new projects, unsupportive and adverse culture to entrepreneurial activities are likely to become obstacles to individual’s entrepreneurial desirability (Shinnar et al., 2009; Barba-Sánchez & Atienza-Sahuoillo, 2018; Ismail et al., 2009; Krueger, 1993). However, the concept of barriers still lacks in almost all studies of entrepreneurial intention to date.

Although the concept of entrepreneurship has become more universal in the world, almost all entrepreneurial intention studies were conducted in Western countries, where the entrepreneurial ecosystem and the market economy has been developed. There are only few studies of entrepreneurship carried out in transitional economies such as Vietnam, especially in findings the effects of entrepreneurial barriers to start-up intention among youths. As a result, this research gap should be fulfilled. The primary objective is to investigate the effects of internal (personal traits & cognitive conditions) and external (normative & regulative structures) barriers on entrepreneurial intention among Vietnamese students. This study also provides a useful sightseeing of youths’ entrepreneurship to policy makers, educational managements and governments in order to foster students’ entrepreneurship, develop entrepreneurial ecosystem and enhance business environment. In addition, authors also hope
that this study will bring an interesting insight to researchers and academic staffs. The questionnaire surveys were distributed to students at high schools, universities, colleges and institutes in Vietnam, yet most of these universities, colleges and institutes located in the North of Vietnam. Even though more than 800 questionnaires were distributed to Vietnamese students, only 437 questionnaires were fulfilled and meet our expectations for employing in this study. In addition, certain descriptive statistics such as frequency, percentage, mean and standard deviation were implemented to analyze the demographic layouts of respondents. After that, explorative factor analysis (EFA), KMO and Bartlett test were utilized to examine the reliability of the scales and the suitability of data for explorative factor analysis. Correlation coefficient analysis also was applied to investigate the relationship between internal barriers (personal traits & cognitive conditions), external barriers (normative & regulative structure) and entrepreneurial intention.

This study is organized in the following manner: First, theoretical background involving in entrepreneurship, entrepreneurial intention, entrepreneurial barriers and hypotheses is represented. Second, research methodology and conceptual framework are described. Third, authors presents the research results and discussion. Finally, conclusion and recommendation for further research will be performed.

2. Literature review

2.1. Entrepreneurship and Entrepreneur

There are many definitions for entrepreneurship developed over the few recent decades. Schumpeter (1960) considered that entrepreneurs are people who create new products or services in new or existing market and entrepreneurship becomes one of the most important factors in countries’ economic growth (Schumpeter, 1960, p.12; De Bruin et al., 2006, p. 686). “The environment itself creates entrepreneurship” (Bernat et al., 2016, p. 271), the reason is that operating organizations have a must for reacting quickly to unanticipated changes, they also need “to adapt to unpredicted outcomes of the predicted changes” (Timmons, 1990). Kirzner (1985) defined that entrepreneur as a person who might optimize information in such a way in order to discover the new and improved business opportunities (Korpya, 2012). Talpas (2014, p.198) considered entrepreneurship as a process that can be recognized throughout business activities by showing effective leadership within uncertain market, risks and competitive conditions, while Zimmer and Scarborough (1996, p.19) claimed that entrepreneurs can also be known as the owners who, with skillful manner, who are able to associate various factors of production, transform to a smaller economic resources into a bigger platform effectively and rising profits. Also, entrepreneurship is the process of creating and building new venture and new business organization (Shane & Venkataraman, 2000), that not only provides goods and services, creates job opportunities but also contributes to the development of economy and the national income. Lin et al. (2017) argued that “it is the process of designing, launching and running a new business”, and it also tends to some topics such as policy, government programs, entrepreneurial training, funds, etc. that not only promotes the development of starting a new business but it also supports entrepreneurs in their business activities. In addition, OECD (2006) stresses that entrepreneurship is defined as a process, where entrepreneurs establish and develop enterprises to supply new products and services, or create additional value to products and services.

2.1. Entrepreneurial intention

Krueger and Brazeal (1994) defined entrepreneurial intention as the intent to set up a new business, or the intent to be self-employed (Douglas & Shepherd, 2002) or the intent to own a business (Crant, 1996). There are many reasons such as personal circumstances, social and political issues and business environment, which might become either big obstacles or motivated factors to transform this intent becoming a reality. Thus, entrepreneurial intention is perceived as an essential and fundamental condition to be a nascent entrepreneur. Whereas entrepreneurship is determined as the emergent process of an organization (Gartner et al., 1992), an individual’s intention to pursue an entrepreneurial career is crucial to this process (Lee et al., 2011, p.126). Moreover, entrepreneurial intention is considered the first step in a series of action to found an organization (Bird, 1988), yet Fishbein and Ajzen (1975) argued that intentions toward a behavior can be seen as important indicators of that behavior. In other words, intentions are still seen as the best predictor of individual behavior (Krueger, 2008). According to Ajzen (1991), who introduced Theory of Planned Behavior, intentions are determined by social/subjective norms and perceived behavioral control. Social norms are considered individual’s perception of his or her behavior that is consistent with significant thoughts of others, while perceived behavior control is the range of the target behavior within the ability of a decision maker (Esfandiar et al., 2017; Bygrave & Hofer, 1991). Do and Dadvari (2016) also defined entrepreneurial intention as an attentive state of mind that reflects personal experience, awareness and interest toward planned entrepreneurial activity.

2.2. Entrepreneurial barriers

Entrepreneurial intention is also defined as an interested sense of an individual to perform an own business activity with willingness to take risks. Douglas and Shepherd (1997) believe that becoming an entrepreneur is associated with the attitude of an individual to look at the freedom and risks. A person who has high intention to run a business would have a more positive attitude to face the obstacles and barriers. Gorji and Rahimian (2011) divided entrepreneurial barriers into three categories. First, personal barriers include individual characteristics (lack of business idea, lack of time, lack of courage, fear of failure) and educational barriers (lack of business knowledge and skills, lack of qualifications). Second, organizational barriers include
lack of capital, lack of physical resources and marketing problems. Thirdly, environmental barriers include social-cultural barriers, rules and regulations. Finally, financial constraints are the key barriers to entrepreneurship. Another entrepreneurial barrier is the negative attitude towards entrepreneurship (Smith & Beasley, 2011). Financial situation almost certainly is the vital problem to entrepreneurship (Finnerty & Krzyzostofik, 1985; Chuah et al., 2016). Financial barriers such as lack of funding, or financial difficulty are also interested by many researchers (Birdthistle, 2008; Shinnar et al., 2012; Smith & Beasley, 2011). Besides, lack of social capitals such as support by family (Martin et al., 2004) and friends (Baughin & Neupert, 2003) might become obstacles to entrepreneurship.

2.2.1. Personal traits

Personal traits commonly described by many researchers is seen as the need for achievement, self-courage, self-confidence, locus of control, ambiguity tolerance and self-efficacy (Shane, 2003; Gurlov & Atns, 2006). In contrast, Cunningham and Lischeron (1991) stated that personal traits are shaped by personal values (honesty, duty, responsible and ethical behavior), the need for achievements and risk-taking. In addition, Individual characteristics such as motivation (Iakovleva et al., 2014), courage (Birdthistle, 2008), self-efficacy (Zhao et al., 2005), fear of risks (Giacomin et al., 2011), and financial situation (Finnerty & Krzyzostofik, 1985; Matlay et al., 2014) have negative or positive impacts on entrepreneurial intention. Thus, lack of confidence, lack of courage and fear of failure, and lack of self-efficacy might act as personal constraints to start-up intention of an individual in the context of transitional economy in Vietnam.

H1: Students’ entrepreneurial intention is negatively affected by barriers regarding of personal traits.

2.2.2. Cognitive conditions

Cognitive conditions are often defined as individuals’ real skills and knowledge of each individual obtained through training and role modelling (Iakovleva et al., 2014). In addition, education also plays an important role in developing the essential knowledge and skills to entrepreneurship. Lack of knowledge and skills are also seen as serious barriers to entrepreneurial intention (Shinnar et al., 2009). Educational skills and competence also are seen as set of capabilities essential to entrepreneurship (Sitaridis & Kitsios, 2017). Robertson et al. (2003) argued that lack of such capacities can become a serious obstacle towards the choice of running an own business. While experience acts as a fundamental factor (Ribeiro et al., 2014), knowledge and skills are also necessary to entrepreneurial self-efficacy (Saleh, 2014). In this study, the impacts of barriers related to cognitive conditions on entrepreneurial intention among students in the context of transitional economy in Vietnam will be considered.

H2: Students’ entrepreneurial intention is negatively affected by barriers regarding of cognitive conditions.

2.2.3. Normative structures

Normative structures reflect shared norms, national cultures and values, which can be shaped by the collective programming of the mind in order to distinguish the members of society or ethnic group from another (Hofstede, 1997). The lens of entrepreneurs regarding of perceived opportunity for starting up a business can be affected by national culture. Thus, normative structures can function as either a positive factor or considerable barriers to entrepreneurship (Morrison, 2000). In a certain culture, the image of entrepreneurship can be negatively affected by lack of entrepreneurial role models, the absence of an entrepreneur in the family members or social structures, for example (Hawkins, 1993; Pruett et al., 2009). In addition, some other entrepreneurial barriers are driven from normative structures such as lack of social network or subjective norms (Singh Sandhu et al., 2011), high competition in the market (Franke & Lüthje, 2004), lack of entrepreneurial role models (Ledyaela et al., 2008), lack of business idea and lack of perceived opportunities (Franke & Lüthje, 2004; Iakovleva et al., 2014), corruption (Ledyaela et al., 2008; Stamboulis & Barlas, 2014) and bureaucracy (Finnerty & Krzyzostofik, 1985). In the context of developing countries such as Vietnam, where normative structures are often seen as significant obstacles to entrepreneurship, the following hypothesis are proposed to test the relationship between normative barriers and student’ entrepreneurial intention.

H3: Students’ entrepreneurial intention is negatively affected by barriers regarding of normative structures.

2.2.4. Regulative structures

Regulative structures reflect formal laws, regulations and rules of each country. The complexity of legal system and the confusing law and regulation are also seen as another external barrier to entrepreneurship (Ledyaela et al., 2008). Besides, time spending for registrations procedures (Kopycińska et al., 2006; Iakovleva et al. 2014; Thompson, 2009), law and regulation constraints driven from the complexity an inconsistency of legal system (Baughn & Neupert, 2003), and frequently changing and difficult labor regulation are often considered entrepreneurial barriers (Franke & Lüthje, 2004; Choo & Wong, 2006). Moreover, the high tax and fiscal is also perceived as the considerable barriers to entrepreneurship (Sesen & Pruett, 2015). In the transitional economy context of Vietnam, where the entrepreneurial ecosystem has still not been developed, the influence of regulative barriers on entrepreneurial intention should be tested.
3. Methodology

This study mainly focuses on investigating the impacts of internal barriers (personal traits, cognitive conditions) and external barriers (normative & regulative structures) on entrepreneurial intention among Vietnamese students. In terms of research techniques, quantitative approach such as certain descriptive statistics, explorative factor analysis (EFA), KMO and Bartlett test, correlation coefficient analysis, and logistic regression are used to test the relationship between independent and dependent variables.

Even though over 800 questionnaires were sent into students at high schools, universities, colleges and institutes in Vietnam, only 437 students (N=437) were considered suitable. The surveys were designed and divided into 2 sections, which are based on the objective of the study, theoretical background and hypothesizes. In the first section, demographic questions are designed to obtain respondent’s information such as ages, genders, education, field of study, current professional activities, and the level of willingness to take the risks. In the second section, the questions are employed to show the viewpoints of respondents regarding of entrepreneurial barriers including personal traits, cognitive conditions, normative and regulative structures, which is based on six-point Likert scale. The final question in terms of entrepreneurial intention is based on nominal scale, which represented as either 0 (no) or 1 (yes).

From literature review part, the hypothesized model is proposed in Fig. 1 as follows:

![Fig. 1. Research framework](image)

The research framework also could be transformed into the following equation:

\[
\ln (Y) = \ln (\text{Entrepreneurial Intention}) = \ln \left( \frac{p(Y=1)}{p(Y=0)} \right) = \beta_0 + \sum_{i=1}^{4} \beta_i X_i + \varepsilon \tag{1}
\]

The Eq. (1) can be also written as following:

\[
Y = \text{Entrepreneurial intention} = e^{\beta_0 + \sum_{i=1}^{4} \beta_i X_i + \varepsilon}
\]

where \(Y\) refers to entrepreneurial intention (EI), \(X_i\) refers to independent variables such as personal traits (PT), cognitive conditions (CC), normative structures (NS) and regulative structures (RS)

4. Results

4.1 Demographic profile

Demographic information of respondents and type of current professional (working) activities is introduced in Fig. 2. The results of descriptive statistics of sample demographics indicate that a major proportion of respondents aged from 20 to 24 years old (76.7%), compared with only 15.5% and 7.8% respondents who aged from 18 to 19 years old and over 24 years old respectively. Moreover, the percentage of female respondents’ accounts for 56.3%, which is 12.6% higher than that of male respondents. Noticeably, the figure for students who are non-economic field makes up 63.4%, which is nearly twofold higher than the figure for economic students (only 36.6%). In addition, while almost all respondents are university/college students (71.4%), the minor proportion of respondents is high school students (4.8%) and master students (13.8%).
In terms of type of current professional (working) activities, more than half (58.5%) of students are studying and looking for a job, but 25.2% students are only studying, 14.2% of them are studying and working for a company, and only 2.1% respondents are studying and running a business. Authors also examine the willingness to take risks among Vietnamese students, which is represented in Fig. 3. Overall, 44.5% students believe that their willingness to take risks are high and very high (32.6% at high level, and 11.90% at very high level). However, a significant proportion of respondents state that their willingness to take risks were in neutral level (26.3%) and nearly 30% respondents represent for low and very low level.

Table 1 presents some descriptive statistics for variables related to entrepreneurial barriers. There are means and standard deviations of each component of four independent variables.

<table>
<thead>
<tr>
<th>Variables</th>
<th>Components</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Internal barriers</td>
<td>Personal Traits</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Lack of courage</td>
<td>3.1670</td>
<td>1.72329</td>
</tr>
<tr>
<td></td>
<td>Lack of confidence</td>
<td>2.6590</td>
<td>1.51461</td>
</tr>
<tr>
<td></td>
<td>Fear of failure, risks, and debt</td>
<td>3.0482</td>
<td>1.51467</td>
</tr>
<tr>
<td></td>
<td>Lack of self-efficacy</td>
<td>3.2151</td>
<td>1.42534</td>
</tr>
<tr>
<td>Cognitive condition</td>
<td>Lack of entrepreneurial knowledge and skills</td>
<td>3.2752</td>
<td>1.45505</td>
</tr>
<tr>
<td></td>
<td>Lack of experiences and competencies</td>
<td>2.4279</td>
<td>1.65968</td>
</tr>
<tr>
<td>External barriers</td>
<td>Normative structures</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Corruption</td>
<td>3.7936</td>
<td>1.30533</td>
</tr>
<tr>
<td></td>
<td>Bureaucracy</td>
<td>2.9153</td>
<td>1.46978</td>
</tr>
<tr>
<td></td>
<td>Lack of role models &amp; family background</td>
<td>2.0183</td>
<td>1.71197</td>
</tr>
<tr>
<td></td>
<td>Lack of social support (subjective norms)</td>
<td>3.1465</td>
<td>1.52097</td>
</tr>
<tr>
<td>Regulative structures</td>
<td>The complexity of registration procedure</td>
<td>2.7117</td>
<td>1.50357</td>
</tr>
<tr>
<td></td>
<td>The complexity of regulations</td>
<td>2.7826</td>
<td>1.46546</td>
</tr>
<tr>
<td></td>
<td>Frequently changing and tough labor regulations</td>
<td>3.1465</td>
<td>1.32602</td>
</tr>
<tr>
<td></td>
<td>High taxes &amp; fiscal</td>
<td>3.0732</td>
<td>1.38774</td>
</tr>
</tbody>
</table>

Note: N= 437, 0=irrelevant, 1=very insignificant, 2=insignificant, 3=moderately significant, 4=very significant, 5=most important

Source: Authors’ elaborations based on research study
The radar chart given in Fig. 3 represents the examination of respondents regarding to entrepreneurial barriers. 86.3% students believe that lack of social support is the main barriers to run a business, while lack of courage (70.1%), lack of entrepreneurial knowledge and skills (72.4%), high taxes & fiscal (71.3%), corruption (79.8%), lack of self-efficacy (71.6%), fear of failure, risks, and debt (67.2%), bureaucracy (65.7%) also considered the big obstacles to start up a business.

4.1. Factor analysis and reliability

The statistics software SPSS 20.0 has been implemented to carry out explorative factor analysis (EFA) by employing three indicators such as KMO measure (Kaiser-Meyer-Olkin), Bartlett’s test of sphericity and Eigenvalue for four independent variables such as internal barriers (Personal Traits-PT & Cognitive Conditions-CC) and external barriers (Normative Structures-NS & Regulative Structures-RS) composing of 14 attributes. Moreover, some tools of descriptive statistics were also implemented to show the demographic information of the samples. In addition, multiple regressions were conducted to identify the effects of independent variables (PT, CC, NS and CN) on dependent variable (EI). As mentioned, entrepreneurial intention (EI) is measured as the nominal variable in this study, which only had two value including 0 (no) and 1 (yes). Thus, Table 2 and Table 3 only indicate the Cronbach’s Alpha and KMO test for independent variable.

Table 2
Summary of variables

<table>
<thead>
<tr>
<th>Variables</th>
<th>Number of items</th>
<th>Cronbach's Alpha</th>
</tr>
</thead>
<tbody>
<tr>
<td>Personal Traits (PT)</td>
<td>4</td>
<td>0.674</td>
</tr>
<tr>
<td>Cognitive Conditions (CC)</td>
<td>2</td>
<td>0.639</td>
</tr>
<tr>
<td>Normative Structures (NS)</td>
<td>4</td>
<td>0.641</td>
</tr>
<tr>
<td>Regulative Structures (CN)</td>
<td>4</td>
<td>0.762</td>
</tr>
</tbody>
</table>

According to the results from Table 2, Cronbach’s coefficients alpha of all variables ranges from 0.639 to 0.762. Thus, the all variables’ Cronbach’s alpha values are acceptable for testing reliability of the scale. Moreover, 58.331% of variance is explained in the factor analysis and it is also good for validation. The results of KMO and Bartlett test for independent variable is introduced in Table 3. KMO value made up 0.872 of the group of independent variables. It reveals that data is appropriate to investigate and only shows a perfect correlation between variables, as a result, the factor analysis can be implemented. Technically, with 437 students, the factor loadings of EFA should be higher than 0.30. The value of KMO must range from
0.5 to 1.0 in order to be acceptable. In addition, the Bartlett’s test of sphericity significant level must be lower than 0.05 (Pallant, 2005). the Bartlett’s test result of 0.000 in Table 3 indicates that variables are suitable for factor analysis.

### Table 3
KMO and Bartlett’s Test

<table>
<thead>
<tr>
<th>Type of variables</th>
<th>Independent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kaiser-Meyer-Olkin Measure of Sampling Adequacy.</td>
<td>0.872</td>
</tr>
<tr>
<td>Bartlett’s Test of Sphericity</td>
<td>Approx. Chi-Square 2376.888</td>
</tr>
<tr>
<td></td>
<td>df 91</td>
</tr>
<tr>
<td></td>
<td>Sig. 0.000</td>
</tr>
</tbody>
</table>

*Source: Authors’ elaborations based on research study*

### Table 4
Correlation coefficients between variables

<table>
<thead>
<tr>
<th></th>
<th>EI</th>
<th>PT</th>
<th>SE</th>
<th>SC</th>
<th>CN</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>EI</strong></td>
<td>Pearson Correlation</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Sig. (2-tailed)</td>
<td>0.010</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>PT</strong></td>
<td>Pearson Correlation</td>
<td>-0.123**</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Sig. (2-tailed)</td>
<td>0.010</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>CC</strong></td>
<td>Pearson Correlation</td>
<td>-0.143**</td>
<td>0.644**</td>
<td>1</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Sig. (2-tailed)</td>
<td>0.003</td>
<td>0.000</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>NS</strong></td>
<td>Pearson Correlation</td>
<td>-0.090</td>
<td>0.685**</td>
<td>0.568**</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>Sig. (2-tailed)</td>
<td>0.059</td>
<td>0.000</td>
<td>0.000</td>
<td></td>
</tr>
<tr>
<td><strong>RS</strong></td>
<td>Pearson Correlation</td>
<td>-0.074</td>
<td>0.648**</td>
<td>0.488**</td>
<td>0.690**</td>
</tr>
<tr>
<td></td>
<td>Sig. (2-tailed)</td>
<td>0.124</td>
<td>0.000</td>
<td>0.000</td>
<td>0.000</td>
</tr>
</tbody>
</table>

Note: N=437; *: p < 0.05, **: p < 0.01 (2-tailed).

*Source: Authors’ elaborations based on research study*

Table 4 presents the correlation coefficients between dependent variable (EI) and four independent variables (PT, CC, NS, and RS). There are negative relationships between internal barriers such as personal traits and entrepreneurial intention (r = -0.123, p-value = 0.010), cognitive conditions and entrepreneurial intention (r = -0.143, p-value = 0.003). In addition, external barrier including normative structures (r = -0.090, p-value = 0.059) and regulative structures (r = -0.074, p-value = 0.124) also have negative effect on entrepreneurial intention. Thus, with the higher significance level, internal barriers (four barriers related to personal traits including lack of courage, lack of confidence, fear of failure, self-efficacy and two barriers involved in cognitive conditions including lack of entrepreneurial knowledge and skills, lack of experience) have strongest influences on entrepreneurial intention negatively. In addition, external barriers including normative structures (corruption, bureaucracy, lack of role model & family background, lack of social support -subjective norms) and regulative structures (the complexity of registration procedure, the complexity of regulations, frequently changing and tough labor regulations, high taxes & fiscal) also have negative effects on entrepreneurial intention, but at the lower significance level.

### 4.2. Logistic regression

As entrepreneurial intention (EI) is measured as nominal variable, the Binary Logistic Regression is used to predict the effect of internal and external barriers on Vietnamese students’ entrepreneurial intention. Particularly, Binary Logistic Regression has been implemented to show how barriers in terms of personal traits, cognitive conditions, normative structures and regulative structures influence on entrepreneurial intention among Vietnamese students.

### Table 5
Model summary

<table>
<thead>
<tr>
<th>Step</th>
<th>-2 Log likelihood</th>
<th>Cox &amp; Snell R-Square</th>
<th>Nagelkerke R Square</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>581.626a</td>
<td>0.022</td>
<td>0.030</td>
</tr>
</tbody>
</table>

*Estimation terminated at iteration number 3 because parameter estimates changed by less than 0.01*

*Source: Authors’ elaborations based on research study*

Table 5 illustrates that since $-\text{Log Likelihood} = 581.626 \text{ (this number is rather big)}$. Thus, although the significance of model is not high as expected, Table 6 shows that this model can predict 59% dependent variable (EI) following independent variables (PT, CC, NS and RS).

### Table 6
Classification Table

<table>
<thead>
<tr>
<th>Observed</th>
<th>Predicted</th>
<th>Percentage Correct</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>EI</td>
<td>1</td>
</tr>
<tr>
<td>0</td>
<td>231</td>
<td>27</td>
</tr>
<tr>
<td>1</td>
<td>152</td>
<td>27</td>
</tr>
</tbody>
</table>

*Overall Percentage 59.0*

*a. The cut value is 0.500*

*Source: Authors’ elaborations based on research study*
Table 7 reports variables in the equation, which provides a measure of the contribution of each predictor variable (PT, CC, NS and RS) to criterion variable (EI). As a result of research, cognitive conditions (CC) has strongest impact on entrepreneurial intention ($\beta_1=-0.176, p=0.081$), followed by personal traits ($\beta_2=-0.136, p=0.358$), regulative structures ($\beta_3=0.041, p=0.754$), and normative structures ($\beta_4=0.012, p=0.936$).

Table 7
Variables in the Equation

<table>
<thead>
<tr>
<th>Step 1*</th>
<th>B</th>
<th>S.E.</th>
<th>Wald</th>
<th>df</th>
<th>Sig.</th>
<th>Exp (B)</th>
</tr>
</thead>
<tbody>
<tr>
<td>PT</td>
<td>-0.136</td>
<td>0.148</td>
<td>0.845</td>
<td>1</td>
<td>0.358</td>
<td>0.873</td>
</tr>
<tr>
<td>CC</td>
<td>-0.176</td>
<td>0.101</td>
<td>3.044</td>
<td>1</td>
<td>0.081</td>
<td>0.838</td>
</tr>
<tr>
<td>NS</td>
<td>0.012</td>
<td>0.147</td>
<td>0.006</td>
<td>1</td>
<td>0.936</td>
<td>1.012</td>
</tr>
<tr>
<td>RS</td>
<td>0.041</td>
<td>0.133</td>
<td>0.098</td>
<td>1</td>
<td>0.754</td>
<td>1.042</td>
</tr>
<tr>
<td>Constant</td>
<td>0.383</td>
<td>0.326</td>
<td>1.379</td>
<td>1</td>
<td>0.240</td>
<td>1.467</td>
</tr>
</tbody>
</table>

a. Variable(s) entered on step 1: PT, CC, NS, RS.

Source: Authors' elaborations based on research study

Thus, the Eq. (1) could be completed as follows:

\[
\ln (Y) = \ln (\text{Entrepreneurial intention}) = 0.383 + 0.041 \times \text{Regulative structures} + 0.012 \times \text{Normative structures} - 0.176 \times \text{Cognitive condition} - 0.136 \times \text{Personal traits} + \epsilon
\]

In other words,

\[
Y = \text{EI} = e^{0.383 + 0.041 \times \text{Regulative structures} + 0.012 \times \text{Normative structures} - 0.176 \times \text{Cognitive condition} - 0.136 \times \text{Personal traits} + \epsilon}
\]

5. Conclusion

The purpose of this study was to examine the effects of internal barriers (personal traits & cognitive conditions) and external barriers (normative & regulative structures) on entrepreneurial intention. The research results have indicated that both internal and external barriers including personal traits, cognitive conditions, normative and regulative structures have maintained negative influences on entrepreneurial intention among Vietnamese students. Specifically, cognitive conditions were perceived as the most influential obstacle to entrepreneurial intention. Thus, education managers should provide training courses of entrepreneurial skills and knowledge for students. Regulative and normative structures were also seen as the significant barriers to students’ start-up intention. Therefore, the government and lawmakers should have appropriate policies to ameliorate the entrepreneurial ecosystem in Vietnam.

Although, this study brings a new insight to entrepreneurial field and contributes to the fulfillment of research gap in this topic in Vietnam, there are some limitations. First, authors only focused to investigate the direct effect of four barriers on entrepreneurial intention but the further researches should extend the research model by supplementing mediating variables, or employing different variables in order to show the new viewpoint about this topic. Second, the quantitative method through the availability sample can been seen as a restriction of this study, the further research should use the different approach to collect data in order to increase the significance level.

References


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