# National Culture, Motivations for Entrepreneurship and Entrepreneurial Intentions: a Comparison of Taiwan and Vietnam



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# National Culture, Motivations for Entrepreneurship and Entrepreneurial Intentions: a Comparison of Taiwan and Vietnam

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#### Abstract

The aim of this cross-national research is double. First, it contributes to better understanding the role of national cultures as specific variables that enable academic researchers and public policy makers to explain the motivations for entrepreneurship and entrepreneurial intentions. Second, it sets light on the linkages between national cultures, motivations for entrepreneurship and entrepreneurial intentions in the Taiwan-Vietnam context. Specifically, this research uses three Hostede's cultural values such Power Distance (PDI); Uncertainty Avoidance (UAV) and Long-term Orientation (LTO) for comparison of Taiwan and Vietnam. Data were gathered from 124 Taiwanese undergraduate students at Tunghai University, Taichung City, and from 162 Vietnamese undergraduate students from Hanoi University, Hanoi capital. Fixed Factor analysis was run to condense the 30 items into desirable entrepreneurial motivational factors. Binary logistic regression was performed to identify the impacts of cultural values, motivations for entrepreneurship on the entrepreneurial intentions with a dummy variable for Taiwan and Vietnam. The research results cultural values of Long-term Orientation (LTO); Uncertainty Avoidance (UAV) and Power Distance (PDI) exert their impacts on the entrepreneurial intentions to a different degree between Taiwan and Vietnam. Furthermore, the entrepreneurial motivational factors such "Respect"; "Autonomy"; "Change"; "Income" would have positive relation to better probability of entrepreneurial intentions, and the remaining motivations for entrepreneurship such as "Competition" and "University Support" would have a negative relation to the entrepreneurial intentions. Logistic regression exponential beta coefficients show that the two "University Support" and "Competition" motivational factors would have a stronger impact on the entrepreneurial intentions for Vietnamese students than for Taiwanese counterparts. Recommendations were drawn for both Taiwan and Vietnam policy makers to improve their respective entrepreneurship cultures as well as the higher education with the aims to support the entrepreneurship development in Taiwan and Vietnam.

**Keywords**: Cultures; entrepreneurial intentions, Taiwan, Vietnam.

#### 1. Introduction

Researchers have long realized that societies vary in their ability to create and sustain entrepreneurial activities (Schumpeter, 1934; Autio & Kelley & Klofsten & Parker & May, 2001; GEM 2019; Hofstede, 1980; Hayton & George & Zahra, 2002). In the last few decades, there has been a growing interest in cross-national entrepreneurship (Hayton et al., 2002; Minola & Criaco & Martin, 2016; Thai & Turkina, 2014). A key question of why some countries foster entrepreneurship better than others is still left with mixed answers (Douglas and Shepherd, 1999; Thomas and Muller, 2001; Turker, 2008; Valliere, 2019). While various explanations have been offered to set some light on these societal differences, an ever-growing body of literature posits that cultural differences between nations are one of the primary determinants of a nation's level of entrepreneurial development (Krueger & Lin~a'n & Nabi 2013; Ulhøi, 2005).

Several scholars have called for further research in order to address the impact of national culture on the entrepreneurial motivations and how these motivations for entrepreneurship are related to the entrepreneurial intentions (Antonia M. García-Cabrera & Gracia García-Soto 2008; Lin~a'n & Fernandez-Serrano; 2014); Mokyr 2013; Swierczek and Ha 2003<sup>a</sup>). While previous research has explored the relationship between national culture and rates of innovation (Swierczek & Jatusripatak, 1994; Stephan & Pathak 2016; Viet, 2916), few studies have been conducted to figure out the extent to which cultural characteristics exert an impact on the relationship between motivations for entrepreneurship and the entrepreneurial intentions, especially in a cross-national settings (Davey & Plewa & Struwig, 2011; Lin~a'n & Chen, 2009; Thomas & Mueller, 2000).

This research addresses the identified gap of knowledge given Taiwan-Vietnam context. The samples of this study come from undergraduate students in Vietnam and Taiwan. The use of these two countries allows the author to distinguish the separate influences of national culture, and entrepreneurial motivations on the entrepreneurial intent. From a practical perspective, Vietnam is a transition economy in the early stages of developing market institutions (Thang et al., 2009). However, Taiwan is a market economy which has legitimized and supported private firms for over half a century (Chand & Ghorbani, 2011; Cheng Tun-jen, 2001; Thai & Turkina, 2014). This two-country typical setting help the author deconstruct which entrepreneurial motivations are influenced by cultural factors, consequently leading to the entrepreneurial intentions among Taiwanese and Vietnamese respondents. Therefore, the focus of this research is put on this often-neglected topic in an effort to test these potential relationships in the context of national cultural values of Taiwan and Vietnam.

The nature of this research facilitates the understanding of the past mixed findings on cultural values, motivations for entrepreneurship, and the entrepreneurial intentions

- (D'Andrade, 2008; Thang et al, 2009; Terjesen & Hessels, 2016). With their unique historical and socio-economic and political differences based on which this comparative research is carried out, several academic-cum-practical contributions can be added to the entrepreneurship literature in general, and the public policies on the entrepreneurship development for Taiwan and Vietnam in particular. The following objectives are, therefore, to be achieved with the aims at:
- (a) Extending views of the relationship between national cultures and entrepreneurial intentions by considering the appropriate Hofstede's national culture dimensions and adding these cultural dimensions into the research model given the differences in cultural characteristics of the Taiwan and Vietnam.
- (b) Providing more insight into why a certain culture seems to have a natural inclination towards developing and sustaining entrepreneurial activity, while the other culture seems to have less affinity towards doing so.
- (c) Examining the difference in the extent to which the national culture exerts impacts on the motivations for entrepreneurship that lead to the entrepreneurial intentions given the research focus to be put on the comparison of Taiwan and Vietnam.

#### 2. The context

### 2.1. Taiwan-Vietnam relationship

The direct-line distance between Taiwan and Vietnam is about 1,016 miles (or approximately 2,000 km). It roughly takes 3 hours by commercial airplanes to cover. Indeed, this over-the-sea-and-marine air route might be so far away, on a basis of ancient-time standards, that the relationship between Taiwan and Vietnam is too good to be true. Coupled with this, Taiwan and Vietnam seem not to be on an economically equal footing: the former one has 12<sup>th</sup> ranking, while the latter occupies the 67<sup>th</sup> place of the 2019 Global Competitiveness Index 4.0 (World Economic Forum, 2019). **Table** 1 shows a considerably wide gap of economic development and achievements between Taiwan and Vietnam.

Several scholars such as Booker & Katsuhiro & Huang (2012) have been skeptical about the benefits of Taiwan-Vietnam relationship by putting it, "in general, China and Vietnam are most similar cases.... The differences lie primarily in scale". This reasoning is made to imply that Taiwan would have difficulty in dealing with Vietnam, so would it with China. Ironically, one distinctive fact has been ignored. That is, China already launched the 1979 border war with Vietnam, while taking saber-rattling acts or keeping a firm stance of One-China Policy with Taiwan. All of these very facts, therefore, can give rise to asking a question: is really this relationship a mutually beneficial marriage between Taipei and Hanoi? A glance at the contemporary history might set out some hints.

Table 1. Taiwan and Vietnam at a quick economic glance

Indicators	Taiwan	Vietnam
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Population in million	23.5	91.7					
GDP in billion USD	532.6	191.5					
GDP per capita in USD	22,267	1,980					
World Bank Ease of Doing Business	11/190	67/190					
World Bank Starting a business rating	19/190	121/190					
WEF Global Ranking Competitiveness	5.3/7; 13/138	4.3/7; 67/138					
Economic Development Phase	Innovation	Efficiency					
Small Medium-size Enterprise contribution to	29%	40%					
GDP							
Structure (% of Agriculture; Industry;	4.9; 35.9;59.2	40.3; 25.7;34					
Services)							

Source: World Economic Forum 2019 and CIA 2019

After the World Was 2 ended, the Kuomintang armed forces followed the victorious allies to arrive in Vietnam for the first time since August 1945. The purpose of this arrival was to disarm the defeated Japanese Imperial army from the 16<sup>th</sup> parallel upward to the Northern Vietnam in accordance to the Potsdam peace accord (Wikipedia, 2019). This could be superficially considered as the first-ever contact between Taiwan and Vietnam. The two sides had no formal diplomatic relationship when Chiang Kai Shek moved his government to Taiwan, and Vietnam lay back in the arms of PRC China for the ideological support and military aid during the American war.

The twist and turn in the course of history, however, have opened up an opportunity for the establishment of Taiwan-Vietnam relationship in 1992 on an official basis, and under the scrutiny of PRC led by China Communist Party. Vietnam's 'Doi Moi' Policy has transformed its centrally planned economy into an open, market-oriented and globally integrated environment in which Taiwanese businesses could see chances to survive and thrive (Dent, 2005; Booker et al., 2012). The Taipei Administration has followed in the footsteps of Taiwanese businesses in its decision to 'Go South.' Hanoi and Taipei has successfully concluded international agreements together in order to protect their respective businesspeople, and thus opening a new chapter for their relationship since the Post-Cold war era (Tu Lai, 2019; Booker et al, 2012; Dent, 2005).

The establishment of a cultural, educational and socio-economic relationship has brought benefits for Taiwan and Vietnam in spite of constantly being under a pressure and economic coercion from China PRC (Tanner, 2017). While there has been an argument on Taiwan's usage of economic resources in exchange for political gains from Vietnam, it is undeniable that Taiwanese businesspeople have been attracted by the Vietnamese government's outward call since the launch of 'Doi Moi' Policy in 1986. Taiwan's eagerness to invest in Vietnam even culminated when Taiwanese

business people have taken into consideration the huge potential domestic market, inexpensive and abundant, well-educated labor force, copious natural resources (Booker et al, 2012, Tu Lai, 2019).

It can be said that Taiwan and Vietnam have managed to establish a mutually beneficial relationship because of both 'Pull' and 'Push' factors (Siu Wai-Sum, 2005; Kelly, 2018; Ku, 1999; Booker et al, 2012). Up to the present time, the total investment by Taiwanese firms, mainly small businesses, in Vietnam has exceeded the amount of more than US\$31 billion (MEA, 2018). The Taiwanese FDI has taken mainly the forms of manufacturing garment, textile, machinery, and electronics, and thus significantly contributing to the Vietnamese war-torn economy's annual exports. Taiwan's Foreign Direct Investment (FDI) has been considered as the third favorite one, just after Japanese and American investors in the country. There remain, however, massive untapped potentials for cooperation between Vietnamese and Taiwanese firms in setting up manufacturing supply chains or better integration into the world economy and globalization (Vietnam News, 2019). On the part of Vietnam, according to statistics from MEA Investment Commission, up to 2018 Vietnam has invested around 63 million US dollars in Taiwan, with the major targets for investment being wholesale and retailing, accommodation and food service (MEA, 2018).

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Figure 1. Approved Outward Investment by countries in million USD

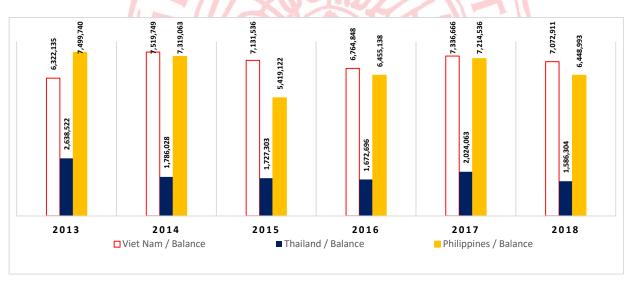
Sources: Ministry of Economic Affairs (ROC) 2018

**Figure 1** indicates that over the past 15 years Taiwan investment has been poured in Vietnam with an upward increase. This might be, sometimes, viewed as an effort on the part of Taipei Administration to transform its economy in the face of new opportunities and challenges since the beginning of the 21<sup>st</sup> Century (Cheng Tun-jen, 2001). Therefore, Taiwan FDI has seen Vietnam's market as a lucrative market to reap: from just a humble amount of 94 million USD in 2005, the Taiwanese Foreign Direct

Investment (FDI) has sky-rocketed up to 683 million USD only in 2017 for licensed projects in Vietnam (MEA, 2018).

Figure 2 demonstrates the trade balance that Taiwan has been in possession with selected ASEAN countries over the 2013-2018 period. Over these 6 years, Vietnam has surpassed Thailand and the Philippines to become one of the top trading partners of Taiwan. The trade balance has exceeded 7 billion USD in favor of Taiwan (MEA, 2018), meaning that Vietnam has imported more goods and services from Taiwan than its counterpart. This trade balance seems to be continuously strengthened much more, and to a greater extent when both Taiwan and Vietnam are the ones that both benefit a great deal from the US-China trade war (UNCTAD, 2019). However, Taiwan and Vietnam are economically different in terms of their economy size and the stages of economic development. The economic inter-dependence, or the level of integration into the world supply chain and globalization, would also be major issues for both Taiwan and Vietnam to deal with so that the full potential for an actually beneficial relationship could be materialized in an effective manner (Executive Yuan, 2019; UNCTAD, 2019).

Figure 2. Trade balance between Taiwan, Vietnam, Thailand and the Philippines



Sources: Ministry of Economic Affairs (ROC) 2018

Viewed from another angle, Vietnam has been considered as an active provider of foreign migrant workers for Taiwan's productive industries given the fact that Taiwanese population has reached the peak of an aging society, and thus, facing the labor shortage. By the end of October 2019, the number of Vietnamese migrant laborers working in various industries of Taiwan's economy has amounted to 224 thousand migrant workers, which took a place just right after Indonesia (Ministry of Labor; ROC, 2019).

In terms of education exchange, the number of Vietnamese students studying in

Taiwan's Colleges and Universities has expanded upwards on a yearly basis. They [Vietnamese students] take the fifth ranking regarding the total admissions, just after mainland China, Malaysia, Hong Kong, Japan (Ministry of Education; ROC, 2019). The relationship between Taiwan and Vietnam has also taken the form of crossnational marriage as well. According to statistics released in August, 2017, the number of Vietnamese spouses in Taiwan has reached 98,128 individuals, accounting for 62.9 percent of the total number of foreign-born brides in Taiwan (Taiwan News, 2017).

Yet, the rosy picture of Taiwan-Vietnam relationship has been blurred by several scandals recently. A strong anti-China animosity and hatred have resulted in the protest. The violence and deaths occurred after some 1,000 workers at the Vung Ang Economic Zone in the province's Ky Anh district took to the streets. It quickly turned out to be violent as clashes broke out between Chinese and Vietnamese workers near a giant Taiwanese-owned steel plant, which was torched by a mob. Some perpetrators was brought to court and put into jail (The Vietnamese, 2019). A few months later, the Vietnam marine life disaster, also known as the Formosa scandal has occurred. This was a water pollution crisis breaking out in Ky Anh district, Ha Tinh Province, Vietnam from April 6<sup>th</sup> 2016 and lasted several days. The Vietnamese government was seeking \$500 million in compensation from the Formosa Ha Tinh Steel Corporation for the chemical spill, which killed marine life and poisoned people's marine livelihood along 120 miles of coastline in central Vietnam (The New York Times, 2016). Yet, it has not been done with 152 rogue Vietnamese tourists who just abandoned their tour groups shortly after arriving at their hotels in Kaohsiung in December 2018. This led the Taiwanese police to scale up the severe round-up of the illegal immigrant worker, and thus postponement of the "Kuan Hung Pilot Project" (觀宏專案). This was, to a certain extent, damaging the efforts in the implementation of New Southbound Policy by Taipei Administration (Taiwan News, 2019).

# 2.2. Entrepreneurship development in Taiwan and Vietnam

While entrepreneurship originates at the individual level, realization is achieved at the firm level (Elfving & Carsrud & Brännback, 2009). Start-ups, innovations, or entrepreneurial activities can be meaningful indicators tor measure the national economic achievement (Aloulou, 2015). Therefore, Global Entrepreneurship Monitor (GEM) has provided a framework to analyze how SMEs can successfully reap the market opportunities, and to highlight what role the entrepreneurship would play in enterprise creation or growth process as the main mechanism driving macro-economic growth (GEM, 2019). Viewed in this way, the entrepreneurship and Small Medium Enterprise (SME) development can be understood interchangeably (SMEA, 2019; UNCTAD, 2004).

Table 2 Comparison of entrepreneurship development between Taiwan and Vietnam

Indicators	Taiwan	Vietnam
Entrepreneurial spirit index	<u>0.37</u>	0.26
Perceived Opportunities	26.6	<u>46.4</u>
Perceived capabilities	25.9	<u>53.0</u>
Fear of failure	39.2	<u>46.6</u>
Entrepreneurship intentions	<u>25.7</u>	25.0
Total Early Stage Entrepreneurial Activity	8.6	<u>23.3</u>
Established Business Ownership Rate	12.1	<u>24.7</u>
Entrepreneurial Employee Activity	<u>8.1</u>	0.6
Motivational Index	3.7	<u>4.6</u>
Female/Male Total Early Stage	0.56	<u>1.14</u>
Entrepreneurship (1)	As !	
Innovation	<u>20.2</u>	13.19
High Status to Entrepreneurs	60.1	<u>74.8</u>
Entrepreneurship As a Good Career Choice	<u>71.1</u>	62.1

Source: Global Entrepreneurship Monitor 2018

The 2018 GEM data as listed Table 2 indicates a major difference in the entrepreneurship development between Taiwan and Vietnam. As Vietnam has just moved its economy towards market-oriented direction, the entrepreneurship context seems to place a great deal of emphasis on opportunity and capability perceptions. This opportunistic-prone nature of Vietnam's entrepreneurship environment leads to the scoring of "Total Early Stage Entrepreneurial Activity" as well as the "Established Business Ownership Rate" which are higher than those of Taiwan. While the GEM Entrepreneurial Intention Indexes of Taiwan and Vietnam are comparatively equal on scoring of around 25, there seems to be a considerable gap in terms of the GEM Motivational Index. That is, Vietnam has a higher score (4.6) than that of Taiwan (3.7). Another interesting difference in entrepreneurship development between Taiwan and Vietnam can be seen in the fact that the GEM indicator on "High Status to Entrepreneurs" scored higher in Vietnam (74.8) than in Taiwan (60.1). Yet, the indicator "Entrepreneurship as a Good Career Choice" has higher scores in Taiwan (71.1) than in Vietnam (62.1). This opposing phenomenon can be explained by Taiwan's long-time engagement in the market economy while Vietnam has just embarked on the free market mechanism since early 1990s when the 'Doi Moi' Policy came into effect (Swierczek and Ha, 2003<sup>b</sup>).

In order to boost the entrepreneurship development, the Taipei Administration has been spearheading a favorable entrepreneurial framework for SME sector in Taiwan (SMEA, Ministry of Economic Affairs 2019). This manifests in the number of

indicators as presented in **Table 3**. Taiwan exceeds Vietnam and Oceania in a such underlined and bolded indicators as "Taxes and Bureaucracy"; "Government Entrepreneurship Program"; "Entrepreneurship Education at School Age"; "Entrepreneurship Education at Post-School Age"; "R&D Transfer"; "Entry Regulations"; "Physical Infrastructure". On the contrary, Vietnam surpasses Taiwan on such indicators as "Government Policies: Support and Relevance"; "Commercial and Legal Infrastructure"; "Internal Market Dynamics"; and "Cultural and Social Norms". Both Taiwan and Vietnam trails behind Asia Oceania on the indicator "Entrepreneurial Finance" which is 4.69 instead of 4.56 for Taiwan and 3.79 for Vietnam (GEM 2018). However, Taiwan economy is mainly based on the small business development both domestically and internationally, Taiwanese authorities should pay a serious attention to shortly modernize the policy making process favorable for entrepreneurship development (SMEA; Ministry of Economic Affairs, 2018).

Table 3. GEM national entrepreneurial framework for Taiwan and Vietnam

Indicators	Taiwan	Vietnam	Asia Oceania
Entrepreneurial Finance	4.56	3.79	<u>4.69</u>
Government Policies: Support and	4.0	<u>5.01</u>	4.66
Relevance	44/		
Taxes and Bureaucracy	<u>4.91</u>	4.03	4.05
Government Entrepreneurship Program	4.93	3.39	4.25
Entrepreneurship Education at School Age	3.92	2.89	3.49
Entrepreneurship Education at Post-School	4.84	4.32	4.61
Age			//
R&D Transfer	4.44	3.67	3.99
Commercial and Legal Infrastructure	4.65	4.69	4.65
Internal Market Dynamics	6.10	6.91	5.95
Entry Regulations	4.61	4.55	4.25
Physical Infrastructure	7.18	7.11	6.57
Cultural and Social Norms	5.63	<u>6.05</u>	5.27

Source: Global Entrepreneurship Monitor 2018

Several scholars have argued that the Small and Medium Enterprise (SME) sector is the typical success story for both Taiwan and Vietnam (Yu Fen Chen and Lai M, 2010; Siu Wai-Sum, 2005). Taiwan's small and medium enterprises have been given extensive assistance in order to respond to changing global market conditions by expanding domestic demand, fast-tracking industrial upgrades and improving the local business environment (Taiwan Today, 2019). In Taiwan, there are 1.46 million SMEs which are the backbone of the economy. These SMEs constitute 97 percent of the private sector and employ nearly 9 million employees (SMEA, 2019).

In a recent release of the 2019 White Paper, it has been revealed that Taiwan's SME are making their best to participate in global value chains (Chun-Liang Chen, 2019). Taiwanese SMEs' revenues totaled NT\$12.264 trillion (approximately US\$400 billion), an increase of 1.99 percent. In 2018, there were 533,000 female-owned SMEs, accounting for 98.67% of all female business owners. Approximately 59.98% of the business owners are wholly-owned, and nearly 50% (49.62%) are engaged in wholesale and retail business. This rate is as high as 91.57% as compared to 88.60% of male SME owners, thus exceeding a difference of 2.97 % as compared to the previous year (SMEA, 2019).

As for Vietnam's SME development, the figures from the 2019 Vietnamese White Book published by the Ministry of Investment and Planning (MPI) indicate that there are more than 700 thousands operating SMEs throughout Vietnam. The cities of Ho Chi Minh and Hanoi have the highest number with the percentage of 32% and 20% out of the total SMEs respectively (Ministry of Investment and Planning, 2019). Vietnam's SME total sales revenues reached 20,660,000 billion VND that was equivalent to US\$900 million in 2017. This is an increase of 18.5% as compared to that of 2016 (Ministry of Investment and Planning, 2019). The pre-income tax for Vietnamese SMEs also amounted to 291,000 billion VND (an equivalent of \$US 11 million) at 33.3% for the year of 2018. The services industry attracted the largest percentage of Vietnam's SMEs (52%), followed by the construction industry (25%) and agriculture (23%). On average, there are 8 small businesses for 1000 households in Vietnam, employing 8.8 million laborers which accounted for 60.6% in 2017 at an increase of 2.7% as compared to that of 2016 (Ministry of Investment and Planning, 2019). The United Nations University report shows that Vietnam's SMEs have been faced with such constraints to growth as shortage of capital, decreasing market demand for SME's products/services, or harsh competition (United Nations University, 2016).

As for the Vietnamese women-owned small businesses, the situation seemed to be unfavorable. Firstly, there has been no official definition of a women-owned SME in any government policy. This disadvantage raises the question of legitimacy for women SME owners. Secondly, Vietnam's women-owned SMEs are primarily micro and small businesses in nature, accounting for 25% of the country's SMEs. Important is the backbone of Vietnamese family economy, mainly operating in rural or remote and mountainous areas, they are, however, still considered as the backbenchers in many public policy making occasions (HAWASME & MBI, 2016). This argument also goes in line with what has been found in the study of Quan & Mort & D'Souza (2015).

#### 3. Literature Review

#### 3.1. National Cultures

How does national culture relate to levels of entrepreneurial activity? This question is raised by several scholars such as Hayton and George and Zahra (2002); Krueger Lin~a'n and Nabi (2013) Lin~a'n and Fernandez-Serrano (2014). Mokyr (2013); Shapero and Sokol (1982); Valliere (2014). If Entrepreneurial activities are considered an important source of technological innovation (Anokhin and Schulze 2009) and economic growth (Baumol and Strom, 2007), the influence of national culture can hinder that process to a various degree. Some scholars such as Abbey (2002); Collins & Hanges & Locke (2004) argue that cultural values determine the social worth assigned to entrepreneurial practices and thereby influence the social status of the entrepreneur and the social direction of the entrepreneurial process. Therefore, understanding the influence of national culture on entrepreneurship is of considerable theoretical and practical value (Brancu & Guðmundsdóttir & Gligor & Munteanu, 2015).

The effects of culture on entrepreneurship are not confined to direct influences on the individual (Stephan & Pathak, 2016). Culture also shapes the environment and institutions for the individual, exerts an impact on formation and operation of social institutions to either help or hinder entrepreneurship (Valliere, 2014).

Culture may be defined as a "collective mental programming distinguishing the members of one group or category of people from others" (Brancu and Guðmundsdóttir and Gligor and Munteanu, 2015; Hofstede, 2001). The elements that frame such mental programming are values that are transmitted throughout generations in a society, resulting in the formation of certain motivations, attitudes, and behavioral patterns (Abbey 2002; Antonia &García-Cabrera & Gracia García-Soto, 2008).

Ample empirical evidence suggests that national culture has a significant impact on the rates and types of national entrepreneurial activity (e.g. Bogatyreva, 2019; Chand and Ghorbani, 2011; Dalby and Lueg and Stenskov and Pedersen and Tomoni, 2014; Garcia-Cabrera and Garcia-Soto, 2008; Sánchez-García and Mayens and Morúa and Hernández Sánchez, 2018). Taking into account the empirical evidence on the impact of national culture on entrepreneurship, it seems plausible to surmise that it is also at work facilitating or impeding the translation of entrepreneurial intentions into start-up activity (Hayton and George and Zahra, 2002).

This cross-national research explores the effect of country-level cultural values using Hofstede's cultural dimensions framework. In his pioneering and still widely influential work, Hofstede (2019) identified six main cultural dimensions that affect people's behavioral patterns: individualism/collectivism, power distance, uncertainty avoidance, masculinity/femininity, long-term/short-term orientation, and

indulgence/restraint. Even though Hofstede's cultural values approach is not without limitations (Swierczek & Ha, 2003<sup>a</sup>), it represents a concise taxonomy of significant cultural dimensions for explaining the behavioral preferences of people in a given society and continues to be widely used in cross-cultural studies of entrepreneurship (Bogatyreva and Edelman and Mnolova and Osieyeskyy and Shirokova, 2019) With this in mind, this research theorizes about the effect of different dimensions of national culture following Hofstede (2019) taxonomy.

Power Distance (PDI)

This dimension deals with the fact that all individuals in societies are not equalit expresses the attitude of the culture towards these inequalities amongst those individuals. Power Distance is defined as the extent to which the less powerful members of institutions and organizations within a country expect and accept that power is distributed unequally (Hofstede, 2019).

Taiwan has a relatively high score of 58 on this dimension which indicates that it is a hierarchical society. This means that people accept a hierarchical order in which everybody has a place and which needs no further justification. Hierarchy in an organization is seen as reflecting inherent inequalities, centralization is popular, subordinates expect to be told what to do and the ideal boss is a benevolent autocrat (Hofstede, 2019).

On the contrary, Vietnam, with scores of 20, is a collectivistic society. This is Vietnam's demonstration in a close long-term commitment to the "member" group, be that a family, extended family or extended relationships. Loyalty in a collectivist culture is paramount and overrides most other societal rules and regulations. Such a society fosters strong relationships, where everyone takes responsibility for fellow members of their group. In collectivistic societies, offence leads to shame and loss of face. Employer/employee relationships are perceived in moral terms (like a family link), hiring and promotion take account of the employee's in-group. Management is purely related to the handling of groups (Hofstede, 2019).

*Individualism (IDV)* 

The fundamental issue addressed by this dimension is the degree of interdependence a society maintains among its members. It has to do with whether people's self-image is defined in terms of "I" or "We". In Individualist societies people are supposed to look after themselves and their direct family only. In Collectivist societies people belong to 'in groups' that take care of them in exchange for loyalty (Hofstede, 2019).

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Kapasuwan, 2009). Such a society fosters strong relationships, where everyone takes responsibility for fellow members of their group. In collectivistic societies, offence leads to shame and loss of face. Employer/employee relationships are perceived in moral terms (like a family link), hiring and promotion take account of the employee's in-group. Management is the management of groups (Brancu and Guðmundsdóttir and Gligor and Munteanu, 2015; Hofstede, 2019).

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Masculinity (MAS)

A high score (Masculine) on this dimension indicates that the society will be driven by competition, achievement and success, with success being defined by the winner / best in field – a value system that starts in school and continues throughout organizational life. A low score (Feminine) on the dimension means that the dominant values in society are caring for others and quality of life (Hofstede, 2019). A Feminine society is one where quality of life is the sign of success and standing out from the crowd is not admirable. The fundamental issue here is what motivates people, wanting to be the best (Masculine) or liking what you do (Feminine).

Taiwan scores 45 on this dimension, a lower intermediate and is thus considered a slightly Feminine society. In Feminine countries the focus is on "working in order to live", managers strive for consensus, people value equality, solidarity and quality in their working lives. Conflicts are resolved by compromise and negotiation. Incentives such as free time and flexibility are favored. Focus is on well-being, status is not shown. An effective manager is a supportive one, and decision making is achieved through involvement (Brancu and Guðmundsdóttir and Gligor and Munteanu, 2015; Hofstede, 2019).

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effective manager is a supportive one, and decision making is achieved through involvement (Brancu and Guðmundsdóttir and Gligor and Munteanu, 2015; Hofstede, 2019).

Uncertainty Avoidance (UAI)

The dimension Uncertainty Avoidance has to do with the way that a society deals with the fact that the future can never be known: should we try to control the future or just let it happen? This ambiguity brings with it anxiety and different cultures have learnt to deal with this anxiety in different ways. The extent to which the members of a culture feel threatened by ambiguous or unknown situations and have created beliefs and institutions that try to avoid these is reflected in the score on Uncertainty Avoidance (Brancu and Guðmundsdóttir and Gligor and Munteanu, 2015; Hofstede, 2019; Russell, 2014)..

Taiwan scores 69 on this dimension and thus has a high preference for avoiding uncertainty. Countries exhibiting high Uncertainty Avoidance maintain rigid codes of belief and behavior and are intolerant of unorthodox behavior and ideas (Hofstede 2019). In these cultures there is an emotional need for rules (even if the rules never seem to work) time is money, people have an inner urge to be busy and work hard, precision and punctuality are the norm, innovation may be resisted, security is an important element in individual motivation (Shiri and Shinnar and Mirakzadeh & Zarafshani, 2017).

Vietnam scores 30 on this dimension and thus has a low preference for avoiding uncertainty. Low UAI societies maintain a more relaxed attitude in which practice counts more than principles and deviance from the norm is more easily tolerated (Thuan, 2015). In societies exhibiting low UAI, people believe there should be no more rules than are necessary and if they are ambiguous or do not work they should be abandoned or changed. Schedules are flexible, hard work is undertaken when necessary but not for its own sake, precision and punctuality do not come naturally, innovation is not seen as threatening (Kalitanyi and Bbenkele, 2018).

Long Term Orientation (LTO)

This dimension describes how every society has to maintain some links with its own past while dealing with the challenges of the present and future, and societies prioritize these two existential goals differently. Normative societies, which score low on this dimension, for example, prefer to maintain time-honored traditions and norms while viewing societal change with suspicion (Hofstede, 1980). Those with a culture which scores high, on the other hand, take a more pragmatic approach: they encourage thrift and efforts in modern education as a way to prepare for the future (Lin~a'n & Fernandez-Serrano, 2014).

Taiwan scores 93, making it a pragmatic, long-term orientation culture. Societies with this orientation show an ability to adapt traditions to a modern context i.e.

pragmatism, a strong propensity to save and invest, thriftiness, perseverance in achieving results and an overriding concern for respecting the demands of Virtue. The countries of South East Asia and the Far East are typically found at the long-term end of this dimension (Gupta, 2018; McPherson, 2017),

Vietnam scores 57, making it a pragmatic culture. In societies with a pragmatic orientation, people believe that truth depends very much on situation, context and time. They show an ability to adapt traditions easily to changed conditions, a strong propensity to save and invest, thriftiness and perseverance in achieving results (Stephan & Pathak, 2016; Swierczek and Ha, 2003<sup>a</sup>).

Indulgence (IND)

One challenge that confronts humanity, now and in the past, is the degree to which small children are socialized. Without socialization we do not become "human". This dimension is defined as the extent to which people try to control their desires and impulses, based on the way they were raised (Grace, 2002). Relatively weak control is called "Indulgence" and relatively strong control is called "Restraint". Cultures can, therefore, be described as Indulgent or Restrained (Gupta, 2018; Hofstede, 2019).

100 93 90 80 70 69 70 58 **57** 60 49 45 50 40 40 30 30 20 17 20 10 PDI UAI IDV MAS LTO IND Vietnam ■ Taiwan

Figure 3 Comparison of National Culture between Taiwan and Vietnam

Source: Hofstede 2019

As indicated in **Figure 3**, Taiwan and Vietnam score similarly on such national culture values as Individualism Index (17 versus 20); Masculinity (45 versus 40) respectively. While there are several other possible factors, these differences in Hofstede's national culture values might come from the fact that Taiwan and Vietnam national culture originate from the Confucianism culture (Thang & Bryant & Rose & Tseng and Kapasuwan, 2009; Ku 1999). Since Taiwan slightly excels Vietnam on the Indulgence scores of 49 versus 35 with a close margin, this national cultural value is not included in the cross-national research.

Taiwan and Vietnam national cultural values are remarkably different in Power Distance with Vietnam (58) scoring higher than Taiwan (58). Taiwan national culture values have higher Uncertainty Avoidance scores of 69 as opposed to Vietnam's scores of 30. The last Hofstede national culture value of Long-term Orientation reveals the fact that Taiwan widely surpasses Vietnam at the scores of 93 against 57.

Taking different national cultural values in measuring the motivations for entrepreneurship and entrepreneurial intents is in line with several previous authors. For example, to measure the impact of national cultures on the relationship between entrepreneurial orientation and performance, Swierzcek and Ha (2003b) use the Hofstede's (1980) national culture dimension of Uncertainty Avoidance only in their analysis because of their distinctive difference between Taiwanese and Vietnamese SMEs. Garcia-Cabrera & Garcia-Soto (2008) make the use of two national cultural values of Individualism and Masculinity to identify the cultural differences and entrepreneurial behavior in an intra-cultural analysis. Mokyr (2013) argues the modus operandi of cultural entrepreneurs might differ from period to period, yet, all the same, cultural values have similarities in identifying the impacts they have on the entrepreneurship development across nations.

In summary, this research adopts only those national culture values which are distinctively different between Taiwan and Vietnam in order to figure out the impacts of those representative national cultures on the motivations for entrepreneurship and entrepreneurial intent. That is to say, **Power Distance (PDI)**; **Uncertainty Avoidance (UAV)**; **and Long-term Orientation (LTO)** are to be used in this research to explore the answers to the research questions in the comparison of Taiwan and Vietnam. Unlike the corporate culture as mentioned in the study conducted by Moslehpour & Pham & Bilgicli & Nguyen (2016) on comparison of Taiwan and Vietnam, these typical national cultural values are being used in this cross-national research with the use of the multivariate data analytical approach. The detailed description comes in the following paragraph of this research.

# 3.2. Motivation for Entrepreneurship and Entrepreneurial Intentions

Motivations for Entrepreneurship or Entrepreneurial motivations are attributable the motives to array, manipulate and master organizations, human resources or ideas in the form of small businesses (Ferreira & Mario & Raposo & Ricardo & Anabela Dinis & Arminda, 2012). Individuals with highly entrepreneurial motivations have a tendency of becoming entrepreneurs (Solesvik, 2012). A meta-analysis of 41 articles conducted by Collins & Hanges & and Locke (2004) discover that entrepreneurial motivations are significantly and positively related to the choice of entrepreneurial career paths. Segal & Borgia & Schoenfeld (2005) postulate that "Because motivation plays an important part in the creation of new organizations, theories of organizational creation that fail to address this notion are incomplete". Furthermore,

Ferri & Ginesti & Spano & Zampella (2019) reported that the lack of empirical research into entrepreneurial motivation was still evident.

Different models have been used to explore entrepreneurial motivations. However, these models still lack cultural substances to predict intentions and behavior in a crosscultural setting (Swierczek & Ha, 2003<sup>a</sup>). Cognitive models suggest that "Motivation is conceptualized as the product of expectancy, instrumentality, and valiancy" (Solesvik, 2012). Process models consider the influence of higher levels of expected rewards from the entrepreneurial activity in comparison to wages paid to employees, as a main motive of selecting entrepreneurial career paths (Collins & Hanges & and Locke, 2004). Economic-based models advocate the role of risk in forming entrepreneurial motivations (Swierczek & Ha, 2003b). People with higher levels of risk tolerance are more motivated to be self-employed (Douglas and Shepherd, 1999; Davey & Plewa & Struwig, 2011). Entrepreneurial motivations are multifaceted and consist of general motivations (need for achievement, locus of control, vision, desire for independence, passion, and drive) and task-specific motivations (e.g. goal setting and self-efficacy). All of these entrepreneurial motivations have been discussed extensively by Segal & Borgia & Schoenfeld, (2005). When Exploring factors motivating entrepreneurial intentions among Italian university students, Ferri & Ginesti, Spano and Zampella (2019) suggest that entrepreneurial motivation is country specific, and the cross-cultural setting should be used to test the validity of the theories on motivations for entrepreneurship and entrepreneurial intentions which are often developed in the Western context. Hessels & Gelderen & Thurik (2008), referring to evidence from 36 countries, also suggest that entrepreneurial drive, which is a part of entrepreneurial motivation, is distinctively varied in different countries.

Aloulou (2015) postulates that entrepreneurial intentions is a state of mind that people have, opting for the creation of a new company or the creation of value within existing organizations; the commitment to perform the necessary behavior to carry out an entrepreneurial initiative. Authors such as Anokhin & Schulze (2009); and Krueger & Lin~a′n & Nabi (2013) consider intentions as the best predictor of planned behavior, such as starting a business. The findings of several studies have found a positive effect between intention and entrepreneurial behavior (Brancu and Munteanu 2012, Bogatyreva & Edelman & Mnolova & Osieyeskyy & Shirokova (2019).

According to García & Mayens & Morúa & Sánchez (2018), there have been two of the most researched models in order to explore the entrepreneurial intentions. They are: theory of Planned Behavior (TPB) and Shapero's model of the Entrepreneurial Event (EEM). These models have been widely discussed with the aims to support the relationship between entrepreneurial behavior and entrepreneurial intention (Myer, 2014).

The Theory of Planned Behavior (TPB) developed by Ajzen (1991) is based on

intentions people possess to carry out their behavior. These intentions can be predicted by the following elements: attitudes towards behavior, subjective norms and perceived behavioral control. The first, attitude towards behavior is defined as the degree in which a person has a favorable or unfavorable evaluation or assessment of the behavior in question (Ajzen, 1991). The second, subjective norm, refers the perceived social pressure whether to carry out the behavior or not (Ajzen, 1991), in other words, the opinion of how third parties - such as family, friends or teachers - influences the individual. The third is the degree of perceived behavioral control that, according to Ajzen (1991), is the viability of performing a perceived behavior, since it is not always completely subject to the person's will (Ajzen, 2002). Ultimately, within the TPB as Ajzen (1991) puts it, its core substance is the intention of people to perform a certain behavior. Intentions, therefore, capture the motivational factors that influence a behavior, as well as the amount of effort they are willing to exert to achieve it (Ajzen, 1991).

At its core, the TPB, however, is concerned with the prediction of intentions. Behavioral, normative and control beliefs as well as attitudes, subjective norms and perceptions of behavioral control are assumed to feed into and explain behavioral intentions. Whether intentions predict behavior depends in part on factors beyond the individual's control, i.e. the strength of the intention—behavior relation is moderated by actual control over the behavior (Ajzen 2011).

The entrepreneurial event model or EEM developed by Shapero & Sokol (1982) explains entrepreneurial intentions in terms of perceived desirability, perceived feasibility and propensity to act. The perceived desirability is a credible behavior that means a person is interested in the entrepreneurial world and has a favorable attitude towards entrepreneurial behavior, although the perceived feasibility represents the awareness to have the talent, skills and resources necessary to bring the entrepreneurial activity to fruition. Lastly, the propensity to act stands for a proactive personality (Esfandiar & Sharifi-Tehrani & Pratt & Altinay, 2019).

It shares a common focus with Ajzen's TPB, as both theories presume that the relationship between intentions and actions is linear, so the former is regarded as a proxy for the behavior that the individual puts in place. This represents the main limitation of such approaches, and despite the relevant results obtained by employing these views, leaves room for more advancement (Ferri & Ginesti & Spano & Zampella, 2019). Furthermore, Schlaegel and Koenig (2014) signal that the TPB and EEM are interrelated, but not overlapping, models and that the main differences can be identified in relation to specific contextual elements, to date quite neglected despite being crucial over the entrepreneurial pathway (Segal & Borgia & Schoenfeld, 2005). Recently, Esfandiar & Sharifi-Tehrani & Pratt & Altinay (2019) update the pioneering version of Krueger's (2009) integrated model of entrepreneurial intention combining

TPB and EEM, and demonstrate that desirability is the main determinant of entrepreneurial intention, followed by self-efficacy, feasibility, opportunity, attitude and collective-efficacy, whereas social norms have no influence. This argument is strengthened much more by the Krueger & Reilly & Carsrud's study (2009). They compare these two models by investigating the higher education students. It is demonstrated that both models are robust but, as expected, TPB's exogenous variables do not explain entrepreneurial intention as strong as the exogenous variables in the EEM.

Although Krueger (2009) indicates that intention impacts action or behavior, there is a significant distinction between an individual's intention toward a behavior i.e., goal intention and what he or she will actually do in the future regarding the intention i.e. action. Setting a goal intention by individuals does little to help researchers measure individual's actual behavior and this has been acknowledged as a limitation in most research involving entrepreneurial intentions (Esfandiar & Sharifi-Tehrani & Pratt and Altinay, 2019). It might be argued that a longitudinal study would be more appropriate with which to examine the intention-behavior nexus. However, this per se is not without methodological biases. A relevant example is a survey of individuals' intention to start a new business carried out by Guerrero & Rialp & Urbano (2008). They found that, of the student samples being researched, the number of individuals intending on starting their own or co-owned business in the next three years is approximately two times smaller than those individuals intent on starting such a business later. This poses the problem of time lag which relates to a long period of time between intention and actual behavior in entrepreneurship research, particularly when student samples are chosen.

# 3.3. Conceptual framework and hypothesis development

It is widely believed that an individual's engagement in entrepreneurial action is more consistent with some cultures than others. Theories of entrepreneurial intentions posit that individuals take into account not only their own abilities, skills, and evaluation of the probability of failure, but also how their shift to entrepreneurial action is consistent with the culture dominating in their society (Bogatyreva & Edelman & Mnolova & Osieyeskyy & Shirokova, 2019). Ample empirical evidence suggests that culture has a significant impact on the rates and types of national entrepreneurial activity. Taking into account the empirical evidence on the impact of culture on entrepreneurship, it seems plausible to surmise that it is also at work facilitating or impeding the translation of entrepreneurial intentions into start-up activity (Baughn & Cao & Le & Lim & Neupert, 2006)..

This cross-national research explores the effect of country-level cultural values using Hofstede's cultural dimensions framework. In his pioneering and still widely influential work, it is revealed that identified six main cultural dimensions that affect

people's behavioral patterns: individualism/collectivism, power distance, uncertainty avoidance, masculinity/femininity, long-term/short-term orientation, and indulgence/restraint. Even though Hofstede's cultural values approach is not without limitations it represents a concise taxonomy of significant cultural dimensions for explaining the behavioral preferences of individuals in a given society and continues to be widely used in cross-cultural studies of entrepreneurship. With this in mind, this research theorizes about the effect of different dimensions of national culture following Hofstede's taxonomy.

Entrepreneurship is important for economic development, innovation, job creation and poverty alleviation (Ward et al, 2019; GEM, 2019; Turker, 2009). Before there can be entrepreneurship, however, there must be motivations for it (Ferreira et al, 2012). Over the years many models have been used to predict the entrepreneurial intentions which are considered as potential. However there is still a gap with regards to relationship between motivations for entrepreneurship and entrepreneurial intentions in which national culture plays mediating factors (Aloulou, 2015).

This cross-cultural research takes over previous studies on entrepreneurial intention while addressing the gap in an effort to make the public policy purpose more realistic. Therefore, its research design is built upon the conceptual framework which is adapted from the works of adapted from Shapero and Sokol (1982), Ajzen 1991; Elfving & Carsrud & Brännback (2009) and Prodan and Drnovsek (2010); Davis & Campbell & Hildon & Hobbs & Michie (2015).

Ajzen (1991) proposes that the theory of planned behavior (TPB) could provide a solid model because of its ability for explaining or predicting entrepreneurial intentions, taking into account the dynamic issues by which individuals decide on, and engage in, a particular course of action (Autio, 1999; Davis & Campbell & Hildon & Hobbs & Michie, 2015). However, in recent years, the process-based approach of studying entrepreneurial motivations and intentions has become widely used (Carsrud & Brannback, 2011). In their study, Autio & Kelley & Klofsten & Parker & May (2001) suggested that research of the entrepreneurial intent should be designed in a way that the framework must aim to develop and to test a model that incorporates situational variables, focusing on environments that can be manipulated. An ideal environment is the university through which students pass on their way toward working life (Davis & Campbell & Hildon & Hobbs & Michie, 2015; Autio & Kelley & Klofsten & Parker & May, 2001; Solesvik, 2011).

Acting upon this suggestion, this cross-national research uses the conceptual framework presented in **Figure 4**. This is adapted from the model of Autio & Kelley & Klofsten & Parker & May, (2001); Elfving & Carsrud & Brännback (2009) with remarkable modifications, taking into account the undergraduate students and their cultural values. This was confirmed by Autio et al 2001; Carsrud & Brannback (2011;

Antonia & García-Cabrera & Gracia García-Soto (2008), who found a high occurrence of nascent entrepreneurs among students and urged the need to cover the cultural values. The other researchers have also adopted these argument in their studies in an effort to explore the entrepreneurship phenomenon as "pull" factor (Autio et al, 2001; Benzing & Chu & Callanan, 2004; Bergman & Hundt & Sternberg, 2016; Carsrud & Brannback, 2011; Turker, 2009). Therefore, in this cross-cultural conceptual framework, general attitudes toward the entrepreneurship act as the pre-requisites in shaping the entrepreneurial motivators (García & Mayens & Morúa & Sánchez, 2018). Personal characteristics are viewed as influencing general attitudinal dispositions and the motivations for entrepreneurship as a career alternative (Bergman & Hundt & Sternberg, 2016). The selected national culture dimensions (i.e. Long-term-Orientation; Power Distance; and Uncertainty Avoidance), as described in the literature reviewed, serve as independent variables in the conceptual framework.

Respect
- Competitiveness
- Change
- Autonomy
- University

National Cultural Values
- Power Distance
- Uncertainty Avoidance
- Long-term Orientation

Intentions

Intentions

Intentions

Figure 4. Conceptual Framework for the research

Source: Adapted from Autio et al. (2001)

In order to test the impact of national culture and motivations for entrepreneurship on the entrepreneurial intention as diagramed in **Figure 4**, a set of research hypotheses was formulated, as it follows:

H<sub>1</sub>: Taiwan has a higher level of entrepreneurial intention than Vietnam because of its higher Power Distance score on this national culture dimensions.

 $H_2$  Taiwan has a higher level of entrepreneurial intention than Vietnam because of its higher Uncertainty Avoidance score on this national culture dimensions.

H<sub>3</sub> Taiwan has a higher level of entrepreneurial intention than Vietnam because of it higher Long-Term Orientation score on this national culture dimensions.

H<sub>4</sub>. Across Taiwan and Vietnam, motivations for entrepreneurship are positively related to the entrepreneurial intentions.

The logic behind the adoption of this operationalization was that these construct items were confirmed to have high reliability Cronchbach Alphas in Western settings, but not much in the Asian context (Swierczek & Ha, 2003<sup>a</sup>). Fixed factor analysis would be performed to condense those 30 item-statements into a more meaningful set of desirable variables (Field, 2005; Kalitanyi & Bbenkele, 2018; Swierczek & Ha, 2003<sup>b</sup>). Principal components analysis were used to identify and establish the factors. The Eighen Value, the Cronbach Alpha Reliability and percentage of variance explained should be used to determine the factor loadings and communalities (Aloulou, 2015; Autio et al, 2001; Benzing & Chu & Callanan, 2005; Friedman, 2010; Hair & Rolph & Anderson Ronald & William, 2010). Logistics regression analysis would be used to test the extent to which motivation factors and academic performance exert an influence on shaping the entrepreneurial intentions.

## 4. Research design and methods

## 4.1. Questionnaire

The survey questionnaire was first developed in English with 30 items operationalized by motivations for entrepreneurship (See Appendix 2). The items adapted have been modified slightly in order to be consistent with the objectives and the group of samples considered in this research. Two independent bilingual translators applied a translation-back-translation method to the questionnaire, so as to ensure the equivalence of the items in both languages. That is, the original English version was first translated into Chinese and Vietnamese by two bilingual native Chinese and Vietnamese respectively. To resolve the discrepancies in the translations, some modifications in grammar and sentence structure were undertaken among the Chinese and Vietnamese translators.

The other two different bilingual counterparts were then solicited to translate the Chinese and Vietnamese versions of questionnaire back into English. This procedures was accomplished and based on the argument that most of the instrumentation had been designed in the West, and evidence of cross-cultural validity of the variable operationalization was scant (Goupta, 2018; García & Mayens & Morúa & Sánchez, 2018; Swierczek & Ha, 2003<sup>a</sup>;). To verify the accuracy and quality of the translations, pre-tests using both the original and translated Chinese and Vietnamese versions of questionnaires were conducted on bilingual respondents (Elfving & Carsrud & Brännback, 2009). The results showed that both versions produced the same pattern of responses, confirming that the translated questionnaire was sufficiently reliable and used in the surveys for data collection in respective Chinese and Vietnamese universities.

The questionnaire is composed of three parts. The first part is concerned with personal information and demographic characteristics. The second part demonstrates the construct of entrepreneurial motivations which consist of 30 item-statements. The

operationalization of motivations for entrepreneurship is designed on the 5-point Likert scale measurements. These general attitude items, designed in such a way, would allow the researchers to capture the perception of the research respondents with regards to the entrepreneurial motivational factors. Perceived information would be collected with circling of the number in on this 5 point Likert scale.

For the entrepreneurial intentions, there are 4 choices to be put into this construct. These choices are: (1) Start up and run business on your own upon graduation; (2) Work for governmental organizations; (3) Work in the private sector as a hired employee; (4) other choice to be specified. When it came to the data analysis, these four choices were re-grouped into only two categories of business start-up intention: students with choice (1) were coded as "intend to startup businesses" and students who fell in the remaining three choices were coded as "not intend to startup businesses". This newly created dependent variable, known as "binary variable" would then be used in the logistic regression analysis in the later stage.

### 4.2. Respondents

One problem of the 'trait' line of research is that it focuses on ex-post situations, on entrepreneurs who already have started a small business (Autio & Kelley & Klofsten & Parker & May, 2001). By collecting personality data on an entrepreneur after the entrepreneurial event, the researcher makes an assumption that the entrepreneur's traits, attitudes, and beliefs do not change because of the entrepreneurial experience itself (Entrialgo & Iglesias, 2016). Criticizing the ex-post rationalization tendency of 'trait' studies, Franco & Haase & Lautenschlager (2010) postulate that individuals rarely behave consistently in different times and situations, their personality traits are not good predictors of future action. Therefore, to demonstrate causality, researchers should put their focus on individuals before entrepreneurial events (Autio & Kelley & Klofsten & Parker & May, 2001; Entrialgo & Iglesias, 2016; Franco & Haase & Lautenschlager, 2010). Based on these solidified arguments, university students are determined to be the key informants (or survey respondents) of this cross-cultural research.

The respondents of this research were Taiwanese and Vietnamese undergraduate students who were studying at the Tunghai University, Taichung city (Republic of China, Taiwan) and Hanoi University (Socialist Republic of Vietnam). At the beginning of the survey, they were given a short introduction to the purpose. Higher education in Taiwan and Vietnam shows that undergraduate students with management majors are sufficiently equipped with first-hand knowledge and skills to startup their businesses. The higher education students decide to gain more practical experience by taking their internship in the designated firms or companies for a certain amount of time (Quoc & Thanh, 2019; Yu Feng Chen & Lai M, 2010). Upon the internship completion, they are supposed to present the findings of their research

studies. This is, therefore, implicitly understood that they should become "maturely knowledgeable' as the business managers. Elfving & Carsrud & Brännback (2009) and Davey & Plewa, & Struwig (2011) also agree that undergraduate student respondents who were close enough to graduation, tend to contemplate important career choices, such as that of self-employment versus working for others 4.2. The Survey

Surveys were conducted in Taiwan and Vietnam for the October-December period, 2019 with the use of self-administered questionnaire. In Taiwan, the research respondents were Taiwanese undergraduate students from the Taichung University, located in the heart of entrepreneurship-prone Taichung city, Republic of China (Taiwan). In Vietnam, the undergraduate students were from Vietnam University. Both Taiwanese and Vietnamese student respondents were studying at their final academic year. Study of undergraduate student with management backgrounds was strongly argued and supported by Autio & Kelley & Klofsten & Parker & May (2001); Entrialgo & Iglesias, 2016; Franco & Haase & Lautenschlager, (2010). They suggested that there should be more efforts to continuously build on, and to gear the future entrepreneurial intent studies towards implying the policy design purposes. In general, undergraduate students were expected to make career decisions imminently after, and often before, graduation (Autio & Kelley & Klofsten & Parker & May, 2001). A small in-depth survey of undergraduate students in both Taiwanese and Vietnamese universities indicates that their career preferences could be influenced by fashionable career options. This indicates a carefully semantic meaning of each statements on the questionnaire to precisely capture the entrepreneurial motivations and entrepreneurial intentions among higher education students, especially in cross-cultural context (Entrialgo & Iglesias, 2016). Finally, it has been shown that career aspirations among adolescents are significantly predictive of eventual career choice (Ferreira & Mario & Raposo & Ricardo & Anabela Dinis & Arminda do Paco, 2012). Therefore,

Following Gurel & Altinaya & Daniele (2010) recommendation, as the screening stage aimed at investigating entrepreneurial intentions before they occur. This research used the convenient sampling of Taiwanese and Vietnamese undergraduate students who have been studying in Taichung city, Republic Of China (ROC), Taiwan and Hanoi University, Social Republic of Vietnam (SRV), with the focus on gender balance. Surveys were completed anonymously during regular class time, with a response rate of 100 percent. Young Taiwanese and Vietnamese lecturers were also asked to solicit their participation in the survey, interview, and data entry after proper survey trainings. Prior to the main survey, a rehearsal survey was conducted for the young lecturers and researchers on the purpose to demonstrate the sequential steps that need to be taken while the survey process was taking place. This was aimed to ensure that the accurate information would be collected both in Taiwan and Vietnam.

## 5. Findings and analysis

The demographic characteristics of Taiwanese and Vietnamese respondents appear in **Table 4.** Total sample was 286 which split into 124 Taiwanese and 162 Vietnamese students. In terms of gender, there were 90 female Taiwanese students (72.6%) and 34 male Taiwanese students (27.4%). This gender composition seems to be unequal with more female Taiwanese student respondents over male Taiwanese respondents.

Table 4 Descriptive characteristics of Taiwan and Vietnam respondents

Categories		Tai	wan	Vietnam		
	Categories	N	%	N	%	
	Female	<u>90</u>	<u>72.6</u>	78	48.1	
Gender	Male	34	27.4	<u>84</u>	<u>51.9</u>	
	Total A	124	100	162	100	
	Start up business on your own	<u>38</u>	30.6	38	23.5	
	Joint venture with some one	10	8.1	46	28.4	
Entrepreneurial	Work for government	36	29.1	<u>75</u>	<u>46.2</u>	
Intentions	organization		L			
The chicions	Work in Private sector	37	29.8	3	1.9	
	Other Choices	3	2.4	11		
	Total	124	100	162	100	
	Mother	36	29.0	18	11.1	
	Father	21	16.9	51	31.5	
Who is the most	Friend	18	14.5	<u>63</u>	<u>38.9</u>	
influential person	Yourself	<u>46</u>	37.1	8	4.9	
	Other reason	3	2.4	22	13.6	
	Total	124	100	162	100	
	Business man	36	29.0	23	14.2	
The must easier of	Government officer	8	6.5	27	16.7	
The profession of that most	Paid employee in private sector	16	12.9	<u>91</u>	<u>56.2</u>	
influential person	Semi-government officer	14	11.3	7	4.3	
influential person	Other	<u>50</u>	<u>40.3</u>	14	8.6	
	Total	124	100	162	100	
	Low Family Income	17	13.7	<u>73</u>	<u>45.1</u>	
	Average Family Income	<u>50</u>	<u>40.3</u>	<u>37</u>	<u>22.8</u>	
Family income	High Family Income	<u>30</u>	<u>24.2</u>	25	15.4	
	Very High Family Income	27	21.8	27	16.7	
	Total	124	100	162	100	

**Source**: data processing from the survey in Taiwan and Vietnam 2019.

On the contrary, the gender percentage for Vietnamese student respondents was relatively equal. Namely, female Vietnamese respondents amounted to 74 which accounted for 48.1% while the number of male Vietnamese student respondents was 84 which took 51.9% share of the total Vietnamese sample. In terms of entrepreneurial intentions, the student respondents were asked to tick one of the four choices. A share of 30.6% of Taiwanese respondents showed their intention of starting up a business on their own, while this percentage was 23.5% among Vietnamese students. The Vietnamese student respondents tended to enter into a joint venture with someone with a percentage of 28.4%. It was striking to pinpoint the difference between Taiwanese and Vietnamese student respondents in seeking the employments as workers for government organizations. The Vietnamese respondents expressed their intent of working for governments with a rather large percentage (46.2%), while only 29.1% of total Taiwanese respondents wanted to take this type of job in the future. It was worth of noticing that 29.8% of total Taiwanese student respondents would seek a job in the private sector, while this percentage was only 1.9% for Vietnamese student counterparts.

When it came to the influence that someone has on the student respondents in Taiwan and Vietnam was presented in the lower part of the Table. While there were 37.1% of total Taiwanese student respondents who were dependent on themselves for the decisions they chose to make, there were 38.9% of the total Vietnamese student respondents were reliant on their friends, and 31.5% of Vietnamese students considered their father as the most influential person with regards to the start-up decision they chose to make. This fact shows a striking implication for the discussion in the following part of this research.

The profession of the most influential person in Taiwanese and Vietnamese sample was also different the two countries. While there were 56.2% of the Vietnamese student respondents showed that these most influential person were the ones working in the private sector as a paid employment, 40.3% of Taiwanese student respondents found theirs protégés had employments in "Other" category which did not belong to all of the categorizations of the jobs. This might need a further verification in the next stage of the research.

Table 5 Fixed factor analysis of entrepreneurial motivations

Factors	1	2	3	4	5	6
RES2	0.707					
RES4	0.631					
RES3	0.579					
RES5	0.569					
RES6	0.524					
RES1						
COM4		0.698				
COM1		0.692				
COM2		0.692				
COM5		0.678				
COM3						
AUT1			0.808			
AUT2			0.797			
AUT4			-0.552			
AUT5						
AUT3						
INC3				0.861		
INC4				0.792		
INC2				0.596		
INC1						
CHG2					0.810	
CHG3					0.741	
CHG1					0.688	
CHG4						
UNI5						0.754
UNI4						0.722
UNI2						0.610
UNI6						0.583
UNI3						
UNI1						
Cronbach Alpha Reliability	0.6	0.63	0.63	0.54	0.69	0.63
Eigenvalues	1.91	1.82	1.72	1.7	1.68	1.6
% Variance Explained	31%	38%	34%	43%	42%	37%
Kaiser-Meyer-Olkin	0.587	0.707	0.58	0.55	0.56	0.66
Statistics KMO	0.000	0.000	0.000	0.000	0.000	0.000

Source: data processing from the survey in Taiwan and Vietnam 2019.

Finally, the difference in the family income indicates interesting implications among the Taiwanese and Vietnamese counterparts. There were 45.1% of Vietnamese total sample which fell into the category of "Low Family Income" as compared to the 40.3% share of Taiwanese respondents which belonged to the category of average family income. While this research did not have a sound evidence to verify this difference among Taiwanese and Vietnamese survey respondents, types of entrepreneurship such as "Opportunistic" for Taiwanese respondents and "Necessity" for Vietnamese counterparts as specifically described in Global Entrepreneurship Monitor could be an explanation. The Vietnamese survey respondents are pulled into their entrepreneur's profession because of their low family income level, while the Taiwanese counterparts are pushed into their entrepreneurship by the opportunity, not by the family income status.

On the next stage of this cross-cultural research, the data were process with the use of the SPSS 21 software. Results indicated that the Kaiser-Meyer-Olkin (KMO) test values were acceptable with statistical significance and close to the 0.6 suggested by Hair & Rolph & Anderson & Ronald & William (2010). This, coupled with the total 264 Taiwanese and Vietnamese respondents meeting the rule-of-thumb requirement five to 1, implied the sample size was sufficient for factor analysis. Furthermore, the normality test of the 30-item constructs was acceptable with the *Skewness-Kurtosis* statistically acceptable for further multivariate data analysis (See **Appendix 1**).

The entrepreneurial motivations were factor-analyzed to condense the data into confirmed and desirable variables. The factor loadings of the entrepreneurial motivational constructs are shown in the Table above. The 30 items were loaded highly on six confirmed and desirable entrepreneurial motivational factors as described in the conceptual framework. They are labeled as "Respect" (factor 1); "Competition" (factor 2); "Autonomy" (factor 3); "Income" (factor 4); "Change" (factor 5); and "University support" (factor 1). All of these newly created have Eigenvalues larger than 1.0. This confirmed the results of factor analysis were robust for further analysis (Hair & Rolph & Anderson & Ronald & William, 2010). The six-factor solution just obtained also have factor loadings which exceed the cut-off threshold of 0.5. The total variance explained exceeded more than 50%, thus confirming the six factor solution was acceptable (Ozaralli & Rivenburgh, 2016; Swierczek & Ha, 2003a).

This research follows the procedures as proposed by Hair et al (2010); Ozaralli & Rivenburgh (2016); Swierczek & Ha (2003<sup>a</sup>) to calculate the newly variables as identified by the fixed factor-analyzing. That is, the average scores of these items with factor loadings of more than 0.5 would generate the required variables for hypothesis testing. Items with factor loadings of less than 0.5 cut-off points were removed from the average factor scoring. The Cronbach Alpha Reliability values for these six newly

created factors showed that they were acceptable according to the threshold proposed by (Hair & Rolph & Anderson & Ronald & William, 2010).

This research used the national cultural values which were calculated by Hofstede (2019). The multivariate data analysis also requires that dependent variables be randomly continuous metric. That is, the three national cultural values for Taiwan and Vietnam such as Long-term Orientation (LTO); Uncertainty Avoidance (UAV) and Power Distance (PDI) were first created in Excel with the use of RAN function. These randomly generated cultural values would then be imported into SPSS data based in accordance with the Taiwanese and Vietnamese respondents. The newly created SPSS data base was added with a dummy variable for Taiwan (equal to 0) and Vietnam (equal to 1). The binary logistic regression was run to generate the results for hypothesis testing with SPSS 20 software.

Table 6 Binary Logistic Regression results for Taiwan and Vietnam

	Tuble of Binary Englisher Regression results for Turvan and victuali								
	Variables	Beta	S.E. Wald df Sig.		Exp(B) 95% C		.I.for EXP(B)		
v arrautes								Lower	Upper
	Country	43.64	14.47	9.088	1	0.003	(9)*10 <sup>19</sup>	4273194	1.89E+33
	LTO	-0.116	0.132	0.772	1	0.380	0.890	0.687	1.154
	UAV	1.242	0.383	10.52	1	0.001	3.464	1.635	7.338
	PDI	-0.707	0.360	3.847	1	0.050	0.493	0.243	1.000
St	Respect	0.193	0.222	0.752	1	0.386	1.212	0.785	1.873
	Competition	-0.145	0.223	0.424	1	0.515	0.865	0.558	1.340
ep 1a	Autonomy	0.127	0.200	0.403	1	0.525	1.136	0.767	1.682
1	Change	0.856	0.185	21.29	1	0.000	2.353	1.636	3.383
	Income	0.065	0.166	0.152	1	0.696	1.067	0.770	1.478
	University	-0.044	0.207	0.046	1	0.831	0.957	0.637	1.436
	Support	0.011	0.207	0.0.0	•	0.051	0.567	0.037	11.150
	Constant	-38.1	17.64	4.67	1	0.031	0.000		
		Om	nibus Te	sts of N	/lode	l Coeffic	ients		
				Chi-square		df		Sig.	
	Step			50.95		10		0.000	
	Block	:		50.95		10		0.000	
]	Logistic regression model statistics			50.95		10		0.000	
			M	lodel Su	ımm	ary			
	Step -2 Log lik			elihood Cox & Snell R <sup>2</sup>			Nagelkerke R <sup>2</sup>		
	1 34			13.837a			0.163		0.218

**Source:** data processing from the survey in Taiwan and Vietnam 2019.

**Note:** (a) Dependent variable: Entrepreneurial intention (Intent to start-up business = 1; Non-intent = 0); (b) Dummy variable "Country": Vietnam = 1; Taiwan = 0;

To predict the entrepreneurial intentions among Taiwanese and Vietnamese student respondents, the use of the logistic regression was carefully checked with the normality requirements. The Kurtosis and Skewness results as presented in Appendix 1 ensures that these requirements were met with statistically significance. This multivariate data analysis procedure is described in more detail.

From the beginning, "Country" predictor was entered into logistic regression as a dummy variable with Taiwan equal to zero (0) and Vietnam equal to 1, followed by cultural values for Power Distance (PDI); Uncertainty Avoidance (UAV); and Longterm Orientation (LTO) which were subsequently added into the binary logistic regression as dependent predictors.

Next, six entrepreneurial motivation variables were put into the logistic regression model to explore their influence on the entrepreneurial intentions among Taiwanese and Vietnamese student respondents. The Omnibus tests of model coefficients showed that the chi-square reached the value of 50.95 with a statistically significance at 0.001. This indicated the model was statistically significant fit of the data collected in Taiwan and Vietnam. The Cox & Snell R<sup>2</sup> as well as Nagelkerke R<sup>2</sup> showed the acceptability and robustness of the logistic regression model with these pseudo R-squares (Field, 2005; Hair & Rolph & Anderson & Ronald & William, 2010).

Then, variables in the logistic regression equation were examined by looking at the Wald statistics and its significance which should be below 0.05. The values of Exponential Beta Coefficients were also interpreted in order to quantify the influence of independence on the entrepreneurial intentions. If the value is greater than 1 then as the predictor increases, the odds of the outcome occurring increases (Field 2005). Conversely, a value less than 1 indicates that as the predictor increases, the odds of the outcome occurring decreases (Field, 2005). The Exponential Beta coefficient (9)\*10<sup>19</sup> of the independent predictor "Country" indicates the positive relation to the probability of the entrepreneurial intention as a dependent variable. As Vietnam was coded as 1, this result shows that Vietnamese respondents are inclined to have a higher level of entrepreneurial intention than Taiwanese counterparts. The prediction of the binary logistic regression was statistically significance at 0.000 level, and confirming that the Vietnamese respondents are predicted to have more entrepreneurial intention than Taiwanese counterparts.

For the three national cultural values such as "Long-term Orientation" (LTO), "Uncertainty Avoidance" (UAV), and "Power Distance" (PDI) the examination of the Exponential Beta coefficients would be taken and understood in a similar way. Specifically, only Uncertainty Avoidance was predicted to be positively related to the probability of entrepreneurial intention because of its Exponential Beta Coefficients larger than 1 at a statistical significance of 0.001. As Vietnam sample was coded as a dummy variable of 1, therefore, the national culture value of Uncertainty Avoidance

(UAV) showed that Vietnamese respondents were more entrepreneurially intended than Taiwanese respondents in this research. That is, the second Hypothesis was rejected.

As opposed to the above mentioned "Uncertainty Avoidance" (UAV), the national culture values for such variables as Long-term Orientation (LTO) and Power Distance (PDI) negatively predicted the entrepreneurial intentions among Taiwanese and Vietnamese student respondents in this research. This is because the exponential Beta coefficients for Long-term Orientation (LTO) and Power Distance (PDI) are 0.380 and 0.05 respectively which were less than 1. This implication confirmed the fact that Vietnamese national cultural value for Long-term Orientation would lead to the lower probability of being entrepreneurially intended than Taiwanese student respondents. The same argument could also be made for the national cultural value of Power Distance (PDI). The examination of the exponential Beta coefficient for PDI also confirmed that Vietnamese respondents have a lower probability of being entrepreneurially intended in this research That is to say, the first hypothesis was rejected while second hypothesis were accepted.

The entrepreneurial motivations such as Respect; Autonomy; Change and Income showed good prediction of the entrepreneurial intentions among Taiwanese and Vietnamese students. This is because the exponential Beta coefficients for those three dependent variables were 1.212; and 1.136; and 2.353; and 1.067 respectively. These entrepreneurial motivation factors showed higher levels of positive relations with the probability of entrepreneurial intentions for Vietnamese students than Taiwanese counterparts. The remaining entrepreneurial motivation variables (i.e. Competitions; and University Support) seemingly showed the negative correlations with the probability of entrepreneurial intentions among Vietnamese and Taiwanese student respondents in this research. The results of examining confirmed the partial acceptance of the fourth hypothesis. That is, for four motivations for entrepreneurship such as "Respect"; "Autonomy"; "Change" and "Income", the four hypothesis was accepted across Taiwan and Vietnam, and for the remaining two motivations for entrepreneurship such as "Competition" and "University Support", and this hypothesis was rejected.

Both for Taiwan and Vietnam, these six motivations for entrepreneurship are being considered as the "pull" and "push" factors to some extent. When the exponential Beta Coefficients are examined and ranked in accordance to the largest value, the "Change" motivation would come first. The motivations for entrepreneurship such as "Respect" and "Autonomy" would take the second and the third rankings. The motivation "Income" would come as the fourth factor in terms of ranking among these entrepreneurial factors in Taiwan and Vietnam. That is, "Income" or money is not a prime motive to lure the would-be entrepreneurs in the entrepreneurship profession.

Table 7. Classification Table for Binary Logistic Regression

			Predicted				
			1=entrepreneurial	%			
Observed		entrepreneuri	Correct				
		non-entrepreneurial	entrepreneurial				
		intent	intent				
	1=entrepreneuria	Non-entrepreneurial	114	40	74.0		
	1 intent;	intent	114		/4.0		
Step	0=non-						
1	entrepreneurial	Entrepreneurial intent	52	80	60.6		
	intent						
	Overall Percentag	e			67.8		

**Source:** data processing from the survey in Taiwan and Vietnam 2019.

The results of the classification table above showed the predictive precision for this logistic regression model. The overall percentage reached 67.8% of the cases in which the model fit into the dataset of Taiwanese and Vietnamese respondents. This percentage was quite sufficient for the author to confirm that the logistic regression model was sufficiently robust for this research.

### 6. Discussion and policy implications

The conceptual model constructed in this cross-national research has also policy implications. This is aimed at boosting the entrepreneurship development in Taiwan and Vietnam that share some similarity in national cultures (Benzing & Chu & Callanan, 2005). The results of this research showed that national cultural values did have considerable influences on the entrepreneurial intentions for both Taiwanese and Vietnamese respondents to a various degree. However, the generalization of the research results should be handled with utmost care.

The first national cultural value is concerned with Power Distance which is an important contextual variable in the research model. Vietnamese society is high on Power Distance (PDI). Therefore, Vietnamese individuals accept an unconditional hierarchical social order and are obedient to those who are in possession of higher authority (Hofstede, 2019). Resources and information often end up being concentrated in the hands of the more powerful figure heads. As the involvement in start-up activities is usually resource consuming, such a context may frustrate the transition to the entrepreneurial action for those who are less powerful (Hessels & Gelderen & Thurik, 2008). Social inequality shapes perceptions of legitimate behaviors for different groups and may impact individuals' ability and desire to track and exploit entrepreneurial opportunities Brancu & Guðmundsdóttir & Gligor & Munteanu (2015). This in turn may widen the entrepreneurial intention-action gap, as

opportunity recognition is part of entrepreneurial action. Further, individuals in high power distance societies subconsciously perceive the chances to succeed to be unequally distributed Bergman & Hundt & Sternberg (2016). Thus, Vietnamese individuals show a higher level of probability to embark on entrepreneurial intention because of either the push factor or the necessity entrepreneurship. In their study, Quoc & Thanh (2019) conclude that the need for achievement has a significant impact on the students' entrepreneurial intentions. Cuong (2017) also confirms that the attitude toward entrepreneurship and perceived behavior control are positively related to entrepreneurial intention among Vietnamese students who major in international business study.

In contrast, Taiwanese society has a lower score of Power Distance as compared to Vietnam. Taiwan is, therefore, considered as the one with being intrinsic to the entrepreneurial intention. This is because low power distance breeds intolerance to hierarchical relationships and enhances a higher degree of independence and autonomy (Krueger & Linan & Nabi 2013; Brancu & Guðmundsdóttir & Gligor & Munteanu; 2015). These facts would facilitate the translation of entrepreneurial intention into action. The results of the logistic regression model confirmed this argument concerning the difference in the extent to which the Power Distance (PDI) of Taiwanese respondents are more entrepreneurially intended than Vietnamese counterparts in this research. This result was also in line with what has been argued by Brancu & Munteanu & Gligor (2012) that cultural distances of Power Distance among the two group of students from Romania and Island do have influence on the entrepreneurial process.

The second national cultural value of Uncertainty Avoidance is worth of mentioning in this cross-national research. According to Hofstede (2019), Uncertainty Avoidance refers to "the extent to which the members of culture feel threatened by uncertain or unknown situations". Because of Vietnam's culture characterized by low levels of uncertainty avoidance, Vietnamese individuals are generally considered to be more conducive to entrepreneurial entry. However, Moslehpour & Pham & Bilgicli & Nguyen (2016) explained this this by citing the fact that working and living tightly go hand-in-hand. Therefore, the would-be Vietnamese entrepreneurs tend to do something meaningful in their life. Brancu et al. (2015) attributes this characteristic to the cultivation of values such as openness to new ideas, extraversion, or achievement orientation. If taking the argument of Bogatyreva & Edelman & Mnolova & Osieyeskyy & Shirokova (2019) one more step further, this research has sufficient grounds to conclude that Vietnamese individuals who are more comfortable with uncertainty and ambiguity than Taiwanese counterparts. Therefore, Vietnamese counterparts can appropriate a first-mover rent (Kirman & Lowe & Gibson, 2006). This serves as a solid motive to move from intention to entrepreneurial action because

of the moderating role of the national cultural values on the entrepreneurial intentions (Bergman & Hundt & Sternberg, 2016). In the case of Nguyen Ha Dong who has become a top-rising star young Vietnamese billionaire with his most downloaded game applications in 2014, the success story of this extraordinary entrepreneurship can be attributed to his by-passing the Vietnamese high cultural value of Power Distance, and he had to sacrifice his maturity in return (Forbes, 2019).

The difference between Taiwan and Vietnam cultural values of Uncertainty Avoidance may also lead to the ex-post entrepreneurship (Hayton & George & Zahra, 2002), and can be attributable to what has been found in the 2018 GEM data also indicate that Vietnamese entrepreneurs are more likely than Taiwanese partners to engage into action planning regardless of the demotivating uncertainty at the early start-up stages. This action planning is an important mechanism of translating entrepreneurial intentions into start-up behavior (Brancu & Munteanu & Gligor, 2012). In contrast, Taiwanese society is characterized by a stronger uncertainty avoidance than Vietnam (Hofstede, 2019; Moslehpour et al, 2010). Therefore, the engagement into the entrepreneurial process is expected to evoke emotions of action doubt which have been found to hinder the translation of entrepreneurial intentions into actual behavior (Autio & Kelley & Klofsten & Parker & May, 2001). The results of logistic regression confirmed this difference in the relation between Uncertainty Avoidance and the probability of being entrepreneurially intended between Taiwan and Vietnam. Because of higher level of Uncertainty Avoidance, Taiwan is less likely than Vietnam to show an association between motivation for entrepreneurship and entrepreneurial intention.

The third national cultural value covered in this research is the Long-term Orientation. Taiwan has its societal characteristics with long-term orientation which is equal to 93 as opposed to 57 of Vietnam (Hofstede 2019). It is characterized by values related to future gains such as perseverance, frugality, and thrift as compared to Vietnam. As its country has just been opened to the outside world since the embarkation on 'Doi Moi' policy in 1986, Vietnamese individuals seem to be shorterterm orientated than Taiwanese counterparts. This exhibit qualities such as following through on one's promises and social obligations, personal steadfastness, and protection of one's "face" (Hofstede, 2019). Additionally, Vietnamese individuals vary in terms of attitudes towards the past, present and future, which creates a basis for differences in socially legitimized practices. Antonia & García-Cabrera & Gracia García-Soto (2008) conclude that a long-term orientation produces more pragmatic attitudes, which are associated with "classic capitalistic views". Therefore, Vietnamese Shorter-term Orientation is believed to have a positive impact on entrepreneurial cognition as opposed to its Taiwanese counterparts. Once the intention is formulated, long-term orientation may foster action planning which is a powerful mechanism of translating intentions into goal-oriented behavior (Gielnik et al., 2014). Additionally, involvement into entrepreneurial activity presumes high risks that usually take substantial time to be repaid (D'Andrade, 2008). Therefore, Vietnam's culture characterized by stronger short-term orientation may push people to opt for employment in an already established organization with stable and transparent paycheck schedule and not to act on their entrepreneurial intentions unless the rewards are very high and very quick, which in reality rarely happens (Entrialgo & Iglesias, 2016). At the same time, individuals from long-term oriented societies are better prepared to wait for entrepreneurial rewards Garcia-Cabrera & Garcia-Soto (2008). Therefore, a long-term orientation may eventually trigger the translation of intentions into actions, and this has led the author to conclude that Taiwan is more likely than Vietnam to show an association between motivation for entrepreneurship and entrepreneurial intention. As García & Mayens & Morúa & Sánchez (2018) put it "a higher level of Long-term Orientation exerts a stronger impact on the entrepreneurial intentions".

Apart from the influence of entrepreneurial motivations for entrepreneurship such as "Respect"; "Competition"; "Autonomy", "Income", and "Change" on the probability of entrepreneurially intended, the results of this cross-national research revealed that only two subsets of proposed model were significant predictors of entrepreneurial intention. The first factor is considered as "External environment". This educational support indicates mainly a supportive university environment. According to Turker (2009), should universities provide adequate knowledge, and stir up inspirations for entrepreneurship, the possibility of choosing an entrepreneurial career might increase among young people. The influence of university support on the entrepreneurial intention, either in Taiwan or Vietnam, may boil down to the numerous policy initiatives, such as business incubator programs. These programs should be designed to support the emergence of new, technology-based firms from universities. Continued efforts should be geared towards the revision of the business curriculum programs in a way that it helps raise the image of entrepreneurship in the university environment (OECD, 2005).

Quite often, such programs try to influence behavior only, not to turn the entrepreneurial intention into reality, or at least to bring about other cognitive factors that influence behavior (Turker, 2009). The findings of the present study indicate two types of university support. On the one hand, it takes the form of "hardware" parts which consist of the infrastructure to start the new firms. On the other hand, it could be the "software" parts which are embedded in good ideas for a new firm. It is also clear from the results of the study that the business start-up intent among Taiwanese and Vietnamese university students is influenced by the image of entrepreneurship. They choose to start their businesses as a career alternative because of getting

respected (Yu Fen Chen & Lai, 2010).

The second group of entrepreneurial motivational factors boils down to the intrinsic nature. For such a society with a less long-term orientation as Vietnam, the motivation for more income could be powerful. Coupled with higher level of power distance, the attitude toward competition is also quite positive and dominant. The results of this Ex-Ante research are in line with what Benzing & Chu and Callanan (2004) have found in their Ex-Post study on the regional comparison of motivations of the Vietnamese entrepreneurs. Ex-Post motivations of Vietnamese entrepreneurs include (1) Capability of providing job security, (2) Attainment of public recognition, and (3) Proofs of being able to successfully run a business of their own. Vietnamese entrepreneurs are very aware of competition which is a source of problems for their business success.

This cross-national research points out that the entrepreneurial conviction emerges as the most important influential factor on the entrepreneurial intention. The results of this research was also in line with what had been argued by Swierczek & Jatusripatak (1994) in their study on exploring entrepreneurship cultures in South East Asia; and by Thang & Bryant & Rose & Tseng & Kapasuwan (2011) on their exploration of the cultural values, market institutions, and entrepreneurship potential with a context of the United States, Taiwan, and Vietnam.

There might be separate implications for Taiwan and Vietnam respectively, the entrepreneurial intentions among Taiwanese and Vietnamese university students must be enhanced by fostering their attitude toward entrepreneurship in universities because it serves as a solid foundation for turning the entrepreneurial intent into a successful entrepreneurial career (Valliere, 2019). Yu Fen Chen and Lai (2010) points to Taiwanese-specific motivational factors such as family and economic environments which are considered as important to realize the entrepreneurial intentions. Vietnamese-specific cultural value may not follow the same patterns as compared to Taiwanese counterparts. Role models, advice from fathers, or success story of friends can be the most influential factors to transform the entrepreneurial intentions into reality among Vietnamese counterparts.

Both in Taiwan and in Vietnam, university supports play an important role and embark on a realistic course of actions, when the country-level cultural values are held up. Such actions could entail, for example, establishing and signaling clear intellectual property right policies at the university. Or the universities could use successfully distinguished alumni person in teaching, and fostering a positive image of entrepreneurship as a career alternative (Wang & Wong, 2004). Stronger practical measures should have an indirect positive influence on entrepreneurial behavior by modernizing the incubator centers both in Taiwanese and Vietnamese university. The next suggestions should be concerned with the curriculum development. As soon as

the Industrial Revolution 4.0 has gathered it acceleration, the curriculum for undergraduate students in both Taiwan and Vietnam still seems to be academic in its nature. The curriculum development is still trailing behind what is happening in real worlds. Take one specific European country for an example, Germany is working their best to narrow this gap by formalizing and introducing their country-specific block chain strategy into university higher education. Therefore, the lesson for Taiwan and Vietnam is that Taiwanese and Vietnamese policy makers, and the education administrators need to take this fact into account when working on the curriculum development which should be designed in a way that it should encourage the entrepreneurial intents among the Taiwanese and Vietnamese students when they are still in their respective university (Baughn et al 2006; Bergman et al, 2016; Turker, 2009, Ward A. et al, 2019).

While this research does not have evidence with regards to cross-national exchange of university education between Taiwan and Vietnam in order to lift up the entrepreneurial motivations and entrepreneurial intentions, there might be some space for Taiwan and Vietnam administrators to learn from each other in modernizing their policy on entrepreneurship education. Vietnamese students have been flocking to Taiwan to study, hoping for better chance to seek employments in Taiwanese enterprises in Vietnam. In the meantime, exchange education in Vietnamese university might not be the most opted action among Taiwanese students, and thus, reducing the importance of New Southbound Policy that Taipei Administration has been aimed to boost.

The limitation of this research shows that the logistic regression model explains 67.8 per cent of cases in the entrepreneurial intention. While this percentage of precise prediction is acceptable, there is a space for the improvement of the prediction percentage of the logistic regression model. To improve the robustness, more effort should be taken to get larger samples from both Taiwan and Vietnam (Brancu & Munteanu & Gligor, 2012; Fellnhofer & Muller 2018). On the one hand, this result might be satisfactory, since most previous research using linear models typically explain less than 40 per cent of the variance (Lin~a'n and Chen, 2009). Yet, on the other hand, the construct of "Income" motivational factor presents a low reliability which is slightly below 0.6, meaning that the factor loadings should be improved by taking more sampling both in Taiwan and Vietnam (Swierczek and Ha, 2003<sup>b</sup>; Benzing & Chu & Callanan, 2005; Hair et al., 2010). The geographical representativeness of the sampling might be another limitation to the generalizability of the research results. This is because the samples were only acquired in Taichung city, Taiwan and in Hanoi, Vietnam. The sampling representativeness can be improved by scaling up the survey further into the other regions of Taiwan and Vietnam. On the post-fellowship stage, it is suggested that more samples be taken in Taipei capital of Taiwan and in the Central

Region of Vietnam. These additional sampling can be used in the data processing in order to achieve a better reliability test quality. Therefore, it would assist in making the sampling more sufficient. This scale of sampling may assist in making the multivariate data analysis such as factor analysis and logistic regression more robust (Field, 2005; Hair & Rolph & Anderson & Ronald & William, 2010).

The last limitation of this cross-cultural research is the negligence of the "push" factors that are related to the family background. As the study of Gray & Foster & Howard (2005) indicate two-thirds of the business owners were "pulled" and one-third was "pushed" into entrepreneurship due to various circumstances. Entrepreneurs were pulled or drawn into self-employment due to an "opportunity to buy a business" or they spotted "a good market opportunity." With some, they either inherited a family business or their business involved their field of educational study such as pharmacy or dentistry or gourmet restaurants. This implies a good direction for future research in both Taiwan and Vietnam.

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#### **APPENDICES**

# **APPENDIX 1** Normality test of the variables

			Std.					
	Mean		Deviation	Variance	Skewness		Kurtosis	
						Std.		Std.
Variables	Statistic	Std. Error	Statistic	Statistic	Statistic	Error	Statistic	Error
Respect	3.33	0.04	0.63	0.40	-0.02	0.14	0.62	0.29
Competition	3.89	0.04	0.70	0.49	-0.76	0.14	0.78	0.29
Autonomy	2.68	0.04	0.67	0.45	0.16	0.14	-0.38	0.29
Change	3.60	0.05	0.86	0.74	-0.18	0.14	-0.59	0.29
Income	3.28	0.05	0.84	0.71	-0.10	0.14	-0.13	0.29
University support	3.33	0.04	0.71	0.51	-0.04	0.14	0.14	0.29
Power Distance	64.88	0.33	5.59	31.2	-0.24	0.14	-1.90	0.29
Uncertainty Avoidance	52.64	0.88	14.81	219.4	0.27	0.14	-1.94	0.29
Long-term orientation	85.04	0.47	7.96	63.3	-0.91	0.14	3.12	0.29

## APPENDIX 2 Survey Questionnaire Items for comparison of Taiwan and Vietnam

1 = NOT likely at all 4 = Likely

2 = Quite Unlikely 5 = MOST likely

3 = Just OK 99= Missing value

Items	Scale	
RES1. Entrepreneurs are generally highly educated.		
RES2. If I would start my own firm, I would be more respected by my friends and colleagues.	12345	
RES3.Entrepreneurs are more likely to succeed than people working in other professions.	12345	
RES4.Entrepreneurs have to work harder for their income than people working in other professions.		
RES5.I am confident that I would succeed if I started my own firm or jointly set up the firm.		
RES6.I have the skills and capabilities required to succeed as an entrepreneur.		
COM1. I work harder in situations where my performance is compared against that of others.		
COM2. Winning is important in both work and normal life.		
COM3. It annoys me when other people perform better than I do.		
COM4. Competition generally is good, since it keeps you alert and more focused on your goals.		
COM5.I am always trying to accomplish new things, to do better than the average.		
AUT1. Working for established employers is more important for me than freedom to pursue my own ideas.		
AUT2. I prefer employment security, even if I would have less autonomy.		

AUT3. I like to take initiative, make things happen, even if this means greater stress and working longer.	12345
AUT4. It would be easy for me to start my own firm.	12345
AUT5. To start my own firm would probably be the best way for me to take advantage of my education.	12345
INC1. People who start new firms provide valuable contributions to their country's economic prosperity.	12345
INC2. If someone has a high income, that is a sign that he/or she has had success in his/her life.	12345
INC3. It is important for me to make a lot of money.	12345
INC4. Money is important, since it gives you freedom.	12345
CHG1. I find that working in stable and routine environments is so boring.	12345
CHG2. I need constant change to remain stimulated, even if this would mean higher uncertainty.	12345
CHG3. When a change occurs, it is more important to consider first the opportunities not the threats	12345
CHG4. There is a well-functioning support infrastructure in place to support the start-up of new firms.	12345
UNI1. I know many people in my university who have successfully started up their own firm.	12345
UNI2. In my university, people are actively encouraged to pursue their own ideas.	12345
UNI3. In my university, you get to meet a lot of people with good ideas for new firm.	12345
UNI4. In my university, I always have a chance to meet lots of people with good ideas for a new firm.	12345
UNI5. The university has clear policy on the intellectual ownership of ideas developed during studies.	12345
UNI6. The course in my university prepare people well for entrepreneurial career.	12345

