Determinant Factors of National Entrepreneurial Activity: a Cross-Country Study

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Abstract
The purpose of this study was to understand the phenomenon of entrepreneurship activity with a coherent paradigm that has not been widely explored. Entrepreneurship has been regarded as one of the important factor that support growth and socioeconomic development of a country because it can provides so many jobs, which ultimately will improve the welfare state and competitive advantage. Prior studies have been conducted research which is none of the comprehensive approach taken to explain the factors that encourage entrepreneurial activity that occurred in various countries around the world. This study found that Individualism negatively significant influence TEA which means the higher level of individualism of a country the lower Entrepeneurial activity. Moreover, cost enforcing contracts significantly influence national entrepreneurial activity which means the higher level of cost enforcing contracts the higher level of TEA.

Faktor-Faktor Penentu Aktivitas Kewirausahaan Nasional: Sebuah Studi Lintas Negara

Abstrak
Tujuan penelitian ini adalah untuk memahami fenomena kegiatan kewirausahaan dengan paradigma yang kohesif yang belum banyak dieksplor. Kewirausahaan merupakan faktor penting dalam mendukung pertumbuhan dan kemajuan sosio-ekonomi sebuah negara karena dapat menyediakan kesempatan kerja yang pada akhirnya dapat meningkatkan kesejahteraan dan keunggulan kompetitif sebuah negara. Studi-studi sebelumnya belum melakukan pendekatan komprehensif yang dapat menjelaskan factor-faktor yang mendorong aktivitas kewirausahaan pada lintas negara. Studi ini menemukan bahwa individualisme secara negatif mempengaruhi aktivitas kewirausahaan keseluruhan yang berarti bahwa semakin tinggi tingkat individualisme sebuah negara semakin rendah aktifitas kewirausahaan negara tersebut. Selanjutnya, aspek cost enforcing contracts secara signifikan mempengaruhi aktifitas kewirausahaan nasional yang berdampak pada semakin tinggi cost enforcing contracts semakin tinggi pula aktifitas kewirausahaan keseluruhan.

JEL Classification: M5, M52
INTRODUCTION

Entrepreneurship has gained considerable attention not only from academics, but also from the government and policy makers. Entrepreneurship has been regarded as one of the important factors that support growth and socioeconomic development of a country, being able to provide so many jobs, which ultimately will improve the welfare state and competitive advantage (Shaban et al., 2014). Further, many experts argue that entrepreneurs (entrepreneurship) is the main catalyst to encourage the countries in a spiral of ever increasing economic prosperity, and consequently, the entrepreneur is often viewed as the wealth of a nation that eternal (Salimath, 2006; Maksimov et al., 2017). Therefore, many countries in the world then try to increase the potential and entrepreneurial activity in the country by creating a supportive institutional infrastructure and support the emergence of new ventures. For example, providing infrastructure support, tax incentives, grants for the establishment of new businesses and so forth.

Although entrepreneurship has become one of academic study for over 200 years (Morris, 1998; Terjesen et al., 2016), but a multidisciplinary approach to understanding the phenomenon of entrepreneuri aktivitas with a coherent paradigm has not been much explored (Aldrich & Baker, 1986). Few previous studies have been conducted with a view from every perspective, it’s just, none of the comprehensive approach taken to explain the factors that encourage entrepreneurial activity that occurred in various countries around the world (Lee & Peterson, 2000; Cho & Jung, 2014). There are at least three approach that is often done to understand the context of entrepreneurial activity is on the individual approach, environmental or contextual and cultural. Entrepreneurial approach that focuses on the individual is to look at a person’s personality characteristics that encourage entrepreneurial activity. Characteristics that are often assessed as a tendency to take risks (Begley & Boyd, 1987; Stuetzer et al., 2013), high need for achievement (McClelland & Burnham, 1976) or internal locus of control (Brockhaus & Horwitz, 1986). All of this is seen to be the main catalyst that drives the wheels of the economy (Berger & Luckman, 1967; Cowling et al., 2015). Environmental or contextual approach is more to see entrepreneurship as a response or reaction to environmental conditions that exist, which may encourage or even hamper the success of entrepreneurship (Lee & Peterson, 2000; Cho & Jung, 2014). Environmental factors may include family support, support systems, capital facilities, existing local communities and governments, all of which can affect the entrepreneurial activity (Bloodgood et al., 1996; Guerrero et al., 2016). Economic factors, such as taxes, ease of import, the rate of inflation; political factors such as government deregulation, free trade policies, increased labor productivity (Morris, 1998; Hopenhayn et al., 2018) and social factors that are closely related to cultural factors or the values embraced by local communities (Sexton & Bowman, 1985; Castaño et al., 2015) such as social networks (Aldrich & Zimmer, 1986). The third approach, associated with cultural dimensions. Entrepreneurship differ from one culture to another culture. Hofstede (1980) proves the existence of the relationship between cultural dimensions-range of power, uncertainty avoidance, individualism/ collectivism and maskulinity/ femininity and a country’s economic growth.

As described above, even though entrepreneurship has been seen as a critical factor for the growth of the economy of a country, but surprisingly enough, that comparative studies across cultures or countries to look at the determinants of entrepreneurial activity has not been much done (Salimath, 2006). Using data from entrepreneurial activity in the Doing Business Report 2007 and the General Entrepreneurship Monitor 2007, research was conducted using the environmental approach (contextual) and culture to see the entrepreneurial activity of countries in the world.
This study aimed to look at the determinants of a country’s level of entrepreneurship. Two main factors which predicted determine a country’s entrepreneurial activity is contextual or environmental factors and cultural factors. Environmental factors include availability of capital, tax, trade deregulation, availability of manpower. Four cultural dimensions (Hofstede, 1980), is used to explain the cultural phenomenon of a country. In addition, this study also aimed to see whether differences in the determinants of entrepreneurship rates between countries both developed and developing.

**Hypothesis Development**

**Relationship of Environmental factors or contextual and entrepreneurial activity**

Patterns, motives, goals that define an entrepreneurial activity will be different in each individual, industry, country and geographical (Morris & Lewis, 1995), that entrepreneurial activity is situational so it will be different in each context and a certain level. As an example of entrepreneurial activity in the United States greatly affects the living standards and economic growth whereas the duration of the same period in Mexico does not have significant entrepreneurial activity on economic growth (Morris & Lewis, 1995). Situational factors on entrepreneurial activity can be reviewed on three aspects of entrepreneurial activity, among others: the tendency, innovativeness, risk taking, proactiveness (Morris & Lewis, 1995). Furthermore, a framework that illustrates the factors or determinants that affect the entrepreneurial activity. A meta analysis study showed there is association between social capital and economic performance (Westlund & Adam, 2010). Table 1 illustrated that the determinants of entrepreneurial activity are classified into three parts, namely: environmental infrastructure (logistics, finance, economics, politics, law, social), environmental turbulence (dynamic, complex, challenging), and the last factor is the experience of personal environment from members of the community (family, education, labor relations and role models) that affect entrepreneurial activity.

The condition of a country will be highly influenced by several things including: logistics, finance, economic, political, legal and social aspects that represent the state of society in a country. For example in Indonesia, the social aspect can greatly affect the investment climate or to try, so that social support for establishing a business affect entrepreneurial activity. Economic factors such as per capita GDP plays a role in promoting entrepreneurial activity within a country (Spencer & Gomez, 2002; Acs et al., 2018). In addition, government regulatory factors and the unemployment rate can also affect a country’s entrepreneurial activity. These factors

<table>
<thead>
<tr>
<th>Table 1. Entrepreneurship Determinants</th>
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<tr>
<td>Market condition</td>
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</tr>
<tr>
<td>Competition</td>
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<td>Access to market</td>
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<td>Patents</td>
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<td>Communication R&amp;D</td>
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affect the various levels of entrepreneurial activity, among others, on a macro scale that is why a country more "entrepreneurship" than any other country or at the micro scale why someone more "entrepreneurship" of other individuals (Wu et al., 2007). The role and importance of entrepreneurship will have an impact on the stages of economic development and economic growth itself (Schumpeter, 1934).

Historically turbulence environment are also factors that have a large percentage in the development of new products or technological innovations. Therefore, the entrepreneurial process can be enhanced by environmental turbulence, with the state of a dynamic environment, challenging, or complex would affect the entrepreneurial activity (Morris & Lewis, 1995; Indarti et al., 2016). Differences business environment will affect an organization in responding to the environment, so this will impact on the type or structure of an organization. Environment is stable and predictable will match the structure or the mechanistic type of organization, whereas a more dynamic environment and changing (volatile) would be more suited to organizations that are organic which makes it possible to be able to take decisions faster and responsive to change. It can be concluded that the "change" is a catalyst in entrepreneurial activity (Morris & Lewis, 1995; Bocconcelli et al., 2018). It is also suggested by Thornton (1999) and Verheul et al. (2002), that rapid technological change can affect the various levels of entrepreneurial activity.

Studies that examine the influence of personal experiences of individuals in entrepreneurial activity has a lot of attention. Current studies are more focused on finding entrepreneurial develop some individual characteristics and personal life experience of what directs a person to develop the entrepreneurial personality (Morris & Lewis, 1995; Van Stel et al., 2005; Alhidari et al., 2015). Family background, relationship between parents and children and family income would affect the independence of the person in view of its future. In the seminar, entrepreneurship and development held in 2007 the World Bank formulated determinant indicators or factors that affect entrepreneurship can be determined by several factors.

H1: Contextual factors/ environment such as economics, regulation, taxation affecting national entrepreneurial activity.

Cultural Factors and Entrepreneurial Activity

Culture is a collective subjectivity, in which culture can be divided into a set of values, norms and beliefs. Hofstede (1980) identified the culture into five parts, namely power distance, uncertainty avoidance, individualism vs. collectivism, masculinity vs. femininity and long-term and short-term orientation. Power distance is defined as the degree of inequality in the relationship between superiors and subordinates. The second dimension is uncertainty avoidance which is the level of tolerance of a society towards uncertainty. Therefore, people in countries with a culture of uncertainty avoidance will tend to be risk takers, like the easily replaced or moving one job to another. Later in the third dimension is individualism (versus collectivism) is the level of one's view that the purpose of independent work of his organization. For example, people individualism will emphasize aspects such as professionalism, achievement of targets, the need for achievement. In contrast to collectivism has always tried to keep the achievement in the group. In the fourth dimension is masculinity culture where people are going to put on materialism, while emphasizing harmonization femininity and relationships. Following the identification and definition of several cultural dimensions by Hofstede (1980) and Trompenaars (1994).

Hofstede (1980) states that the culture of the country is a "collective programming" of the mind that distinguishes one country to another. According to Van de Ven (1993), culture has an important role in the legitimacy and enabling (enabling) entrepreneurship behavior. Furthermore, researchers, international entrepreneurship researcher found that state culture, values, beliefs and norms affect a country’s entrepreneurial orientation (Solesvik et al., 2014;
Castaño et al., 2015). Furthermore, Hofstede’s (1980) found that the cultural dimension relates to the level of state innovation. In addition, individualism and low power distance positively influence inventiveness. In addition, The intention to become entrepreneurs is positively related to the cultures (risk tolerance and independently) (Salimath, 2006; Castaño et al., 2015; Solesvik et al., 2014). However, Tan (2002) instead found that when compared to the cultural context, national environment more influence on the perception of entrepreneurs for environment and strategic orientation.

When a country has a high power distance then this will affect the behavior of dependence, on the contrary when a low power distance will be more cherished independence. People who have low power distance will have a mental self-reliance, look at all people have equal status and equal rights (Wu et al., 2007). When someone is not satisfied in its organization, and thinks that he can always stand on its own then it can he fulfilled by owning their own business (Wu et al., 2007). Furthermore, when high power distance of a country, then they will view that dependence as a “nature”, they will keep working on his organization, although not pleased at the organization’s policy.

H2a: Power distance is negatively related to national entrepreneurial activity

The second dimension of national culture is uncertainty avoidance. In principle, human life faced with uncertainty about the future. Individuals in different countries will behave differently in the view or the face of uncertainty (Cumming et al., 2014; Sambharya, & Musteen, 2014). People who have low uncertainty avoidance will tend to have tolerance to unclear structures, tolerant of differences of ideas and people, driven to innovation and not standardized and formal (Hostede’s, 2001). One case studies on art institutions propose that entrepreneurial experience consists of three social processes, first of uncertainty because the organization had to deal (deal) with some uncertainty, transformation because there are too many errors, and reflexivity as all activities are interdependent (Lowe, 1995).

Someone who decides to become an entrepreneur will tend to have the courage to take risks. In addition, the entrepreneur is a challenging profession in some people. Someone who has a high entrepreneurial spirit that not only uses the background theory alone but also to use his intuition in reading opportunities. So from the above explanation can be formulated hypothesis as follows:

H2b: Uncertainty avoidance negatively associated with national entrepreneurial activity

The third dimension of culture is individualism versus collectivism. As explained in advance, people who have high individualism will tend to be independent or not depends on others, prioritize initiatives and launch activities from the self (self-started activities) (Wu et al., 2007; Liñán et al., 2016). Entrepreneurship relies on individual action and also on the maturity in seeing an opportunity or opportunities that exist in the market. In other words, clever entrepreneurs who take advantage of the opportunity or opportunities will be more successful in business. In countries with high individualism will have to start the activity behavior of her own. In other words, when individualism is high then people will take the initiative to create or establish a company itself so that will impact the entrepreneurial activity of a country.

H2c: Individualism will be positively related to national entrepreneurial activity

The fourth dimension is the dimension of masculinity. A country that has high levels of masculinity that will tend to focus on achieving results and on the side of the material. Masculinity refers to the nature of the assertive and decisive in dealing with an issue or problem (Giazitzoglu & Down, 2017). Entrepreneurship research showed no significant difference between female or male entrepreneurs in the entrepreneurial (Wu et al.,). Women and men together on the need for independence and mo-
neither, both need to be able to recognize or read the business opportunities in order to become successful (Birley, 1989; Mueller & Thomas, 2001; Wu et al., 2007). The national entrepreneurial activity is negatively related to masculinity. So it can be hypothesized that:

**H2d:** Masculinity does not relate significantly to the national entrepreneurial activity

**METHOD**

This study consists of two independent variables, namely: cultural dimensions adopted from Hofstede’s index scores and contextual variables/ environment obtained from the “Global Entrepreneurship Monito 2008”. We use Global Entrepreneurship Monito 2008 due to this report which established to explore in detail how the impact of entrepreneurs on the economic system change and adaptation (Wu et al., 2007). This aims to ensure the empirical assessment of data collection and entrepreneurial activity. There are 43 countries involved in this study (Table 2). Hofstede cultural dimension consist of four dimensions, namely power distance index, individualism, masculinity and uncertainty avoidance. While the contextual factors, among others, consists of several factors, including: starting to business, dealing with business, employing workers, registering property, getting credit, protecting investors, paying taxes, trading across borders, enforcing contracts, closing a business.

Until now, there are various problems in measuring national entrepreneurial activity, it is because in each country apply different parameters in classifying entrepreneurship. Wu et al. (2007) stated that entrepreneurs are people who are actively starting a business, but this is disputed by Cox and Jennings (1995) who argue that the entrepreneur is a person who engages in self-employed in a company.

National entrepreneurial activity was measured by using the total entrepreneurial activity (TEA), which is calculated from the number of people who are actively starting a new business. TEA reflects the individual who build new businesses, which are classified into two phases which started a business (start-up phase) and phase in the initial period of business. In this study, the variables used to measure a country’s entrepreneurial activity using TEA data obtained from the 2008 GEM report.

**Table 2.** Country Lists The Sample of The Study

<table>
<thead>
<tr>
<th>Factors Driven Economies</th>
<th>Efficiency-Driven Economies</th>
<th>Innovation-Driven economies</th>
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<tbody>
<tr>
<td>Angola</td>
<td>Argentina</td>
<td>Belgium</td>
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<tr>
<td>Bolivía</td>
<td>Brazil</td>
<td>Denmark</td>
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<td>Bosnia and Herzegovina</td>
<td>Chile</td>
<td>Finland</td>
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<tr>
<td>Colombia</td>
<td>Croatia</td>
<td>France</td>
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<td>Ecuador</td>
<td>Dominican Republic</td>
<td>Germany</td>
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<tr>
<td>Egypt</td>
<td>Hungary</td>
<td>Greece</td>
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<td>India</td>
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<td>Iran</td>
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<td>Macedonia</td>
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<td></td>
<td>Mexico</td>
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<td>Peru</td>
<td>Japan</td>
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<td></td>
<td>Romania</td>
<td>Republic of Korea</td>
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<td></td>
<td>Russia</td>
<td>Netherlands</td>
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<td></td>
<td>Serbia</td>
<td>Norway</td>
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<td></td>
<td>South Africa</td>
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<td></td>
<td>Turkey</td>
<td>Spain</td>
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<td></td>
<td>Uruguay</td>
<td>United Kingdom</td>
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<td></td>
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<td>United States</td>
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</tbody>
</table>
RESULT AND DISCUSSION

We have a sample size 31 for national cultural dimension (Hofstede) and contextual factors. The cultural dimension i.e. individualism is negatively related to Total Entrepreneurship Activity (TEA) \( (p < 0.05) \).

Table 3 showed that cultural dimensions (e.g. individualism and uncertainty avoidance) negatively significant \( (\beta = -0.331, p < 0.05) \). It means that our hypotheses that uncertainty avoidance negatively associated with national entrepreneurial activity supported. Interestingly, individualism negatively related to TEA opposite with our hypotheses that individualism will be positively related to entrepreneurial activity on national entrepreneurial activity \( (\beta = -0.791, p < 0.05) \). In other word the more individualism oriented in a country, the less citizen involved in entrepreneurial activity.

Table 3. Cultural Dimensions

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>T</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(Constant)</td>
<td>B</td>
<td>17.325</td>
<td>9.120</td>
</tr>
<tr>
<td></td>
<td>Individualism</td>
<td>-.153</td>
<td>-.632</td>
<td>-4.391</td>
</tr>
<tr>
<td>2</td>
<td>(Constant)</td>
<td>24.641</td>
<td>3.860</td>
<td>6.384</td>
</tr>
<tr>
<td></td>
<td>Individualism</td>
<td>-.191</td>
<td>-.791</td>
<td>-5.110</td>
</tr>
<tr>
<td></td>
<td>Uncertainty avoidance</td>
<td>-.078</td>
<td>-.331</td>
<td>-2.140</td>
</tr>
</tbody>
</table>

Interestingly we found that opposite with our hypothesis that individualism will be positively related to national entrepreneurial activity. It may This is similar to previous study in which it happened because nowadays to build or start a business people need a help from some networks. Team and and collectivism become more and more important to entrepreneurial activity. In Asia Country such as India the collective norm as shared perception of the society influence how people behave and in turn influence how they doing business which predominantly determined to establish the harmony between individual to individual or individual to society. Beside that and uncertainty avoidance negatively affecting national entrepreneurial activity it means our hypothesis supported. As hofstede found that people who have low uncertainty avoidance will tend to have tolerance to unclear structures, tolerant of differences of ideas and people, driven to innovation and not standard-
CONCLUSION AND RECOMMENDATION

The paper shown that the uncertainty avoidance negatively influence total entrepreneurial activity. In addition individualism surprisingly influence the total entrepreneur activity. Furthermore, getting credit and labor tax influence the activity of entrepreneurship of the country. Entrepreneurship has been regarded as one of the important factors that support growth and socioeconomic development of a country because it can provides so many jobs, which ultimately will improve the welfare state and competitive advantage. In this study national entrepreneurial activity are manifested by Total Entrepreneurial Activity (TEA) that reflect an individual who build new businesses. However, no scholar have explore factors that could be determinants of entrepreneurial activity. This study trying to explore determinants factor entrepreneurial activity into two dimension e.g contextual dimensions and cultural dimensions. Previous study only using cultural dimensions to national entrepreneurial activity.

The sample size is only 43 countries it would be consequence to statistical power to draw significant solutions. That is why future research should add sample to have general and comprehensive finding. Similar to study of national culture seems to be measured at national level, but the entrepreneurial activity focuses more on the individual level even though the measure is an aggregate one (Wu et al, 2007). In addition, other factors such as economic factor or poverty rate might be take into account for further study. Furthermore, further study should use the more recent data such as Global Entrepreneurship Monitor 2017-2018 or use panel data to understand the causal effect of the study which can be figure out from various time series of the data.

DAFTAR PUSTAKA


