

#### A Construction of Entrepreneurial Personality Tests: Testing Archetype Personality Inventory in Entrepreneurship

Bimo Wikantiyoso<sup>1</sup>, Benedicta Prihatin Dwi Riyanti<sup>2</sup>, Angela Oktavia Suryani<sup>3</sup>
Atma Jaya Catholic University of Indonesia<sup>1,2,3</sup>
Jl. Jenderal Sudirman Kav.51 Jakarta Selatan 12930, Indonesia
Correspondence Email: Bimo.Wikantiyoso@atmajaya.ac.id
ORCID ID: 0000-0003-3902-3907

#### **ABSTRACT**

VUCA is about a hyper-competitive and unpredictable environment. It stands for volatility, uncertainty, complexity, and ambiguity. Personal attributes are necessary to navigate the VUCA environment. Studies in entrepreneurship show that narratives help people to connect different experiences. Literature shows that a narrative journey can be described through archetypes and relate to entrepreneurial behavior. This study aims to construct and validate measurements of entrepreneurial personality by adapting Pearson & Marr's archetype inventory test within the entrepreneurial context. This study was conducted as an assessment of the measurement psychometric attributes consisting of 12 archetypes. Explanatory Factor Analysis (EFA) was carried out by Oblimin rotation resulting in 60 final items. This study involved 154 small and medium entrepreneurs in Jakarta and West Java.

**Keywords:** Archetypes, Entrepreneurial Personality, Exploratory Factor Analysis, Psychometry, Reliability, Validity

#### INTRODUCTION

A hyper-competitive and unpredictable external environment have increased the difficulty of solving problems. The relatively stable and predictable market conditions in the 20th century are no longer the case. Our current conditions are highly different. This condition refers to VUCA, standing for uncertainty, volatility, complexity, and ambiguity – the characteristics of the modern world we live in (Santoso & Singgih, 2019).

The term was suggested by the Military Academy in the United States to describe today's world, which is volatile, uncertain, complex, and ambiguous. Volatility refers to the speed, magnitude, and dynamics of change, while uncertainty is about the uncertainty of a problem and event (Horney, Pasmore, & O'Shea, 2010). Complexity is a picture of the chaos that all organizations face, and ambiguity describes the obscurity of reality and the mixture of meanings of a condition.

Organizations today must face sudden and continuous changes over time (Kok & van den Heuvel, 2019). In this world of VUCA, companies are faced with rapidly changing world conditions calling for their entrepreneurial ability improvement to adapt to these changes and survive the world market (Bekmezc, 2013). Among the various business forms, SMEs face the same challenges. They usually have the most number of large companies in any country in the world. This implies the important role of entrepreneurs, as owners and managers of SMEs.



Entrepreneurship is contributing greatly not only to developing countries such as Indonesia but also to developed countries such as the US and European countries. Their government has recognized that entrepreneurship has a major contribution as a catalyst for the country's economic growth (Wuisang, Korompis, & Lempas, 2019). Small and Medium Enterprises (SMEs) are the main drivers of the Indonesian economy. Data from the Ministry of Cooperatives and Small and Medium Enterprises of the Republic of Indonesia (2015) states that in 2012, around 99.99% of Indonesia's economy was supported by SMEs (Putra, Kepramareni, & Suryandari, 2019).

On the important role of entrepreneurship, several studies have been carried out by experts in various fields, such as psychologists. They initially emphasized the characteristics of entrepreneurship. The personality approach in examining entrepreneurship has so far emphasized data that perceives individuals only at a certain point in time or compares their behavior between two points in time so that dichotomous theoretical explanation models are often used to identify characteristics tied to certain psychological aspects in influencing business (Brandstätter, 2011), including the aspect of achievement (Collins, Hanges, & Locke, 2004), willingness to take risks (Rauch, Wiklund, Lumpkin, & Frese, 2009), intention to start a business (Zhao, Seibert, & Lumpkin, 2010). This research emphasizes the understanding of a complete entrepreneurial figure with a sustainable process.

Several studies in Indonesia show that entrepreneurship is a continuous dynamic process. They must continue to devote time and energy to provide products or services and generate money, personal satisfaction, and freedom (Utami & Mulyaningsih, 2016) Entrepreneurship is the process of creating something new and making a profit from it (Wartomo, 2017). Riyanti, Cahyani & Sungkowo concluded that the key to the success of SMEs is personality factors, namely creative-innovative entrepreneurial behaviors. Their research explained personality traits are more dominant than leadership characters and change agent characters.

Zelekha, Yaakobi, & Avnimelech (2018) found that the interaction of individual personal traits with culture significantly affects children from an early age. Children raised in high-anxiety families are more likely to become employees after their first failed entrepreneurial venture. This condition supports fewer individuals with a tendency to be highly anxious to become and or remain to be entrepreneurs (Zelekha et al., 2018). This is in line with Muis (2017) arguing that individuals with entrepreneurial passion significantly affect their ability to recognize business ideas in their environment and this ability becomes a trigger to create spontaneous opportunities, which eventually becomes a significant variable for taking business risks.

The entrepreneurial approach that examines dynamic processes appears strongly in the archetype approach. This approach seeks to distinguish the factors that make a person a consistent entrepreneur, a dedicated individual, or a fully determined entrepreneur from those who are just trying to do business. This research will take a perspective outside of a static approach by using a dynamic personality approach such as archetype. Personal dynamics in the management of personal resources and environmental interactions can be explained by an archetype approach (Campbell, 2004; Pearson, 2002; Becker & Neuberg, 2019)



An individual also creates a self-construction of how he/she wants to be interpreted by the audience. Humans tend to present themselves to others that they are good people. Entrepreneurs in today's society are considered 'good people' as they provide jobs and wealth for their communities (Hytti, 2003). In psychology, a narrative or story is defined as a representation of whole events centered around the goal of the protagonist or the person telling the story. The narrative follows a formal grammar or schema consisting of several related elements, including narrative structuring, trigger incidents, intensified actions, resolution, and conclusion (Mar, 2018)

A person who "has" a living narrative in the same sense as him/her with particular characteristics, goals, plans, and values. All aspects of this story can be integrated into "I" as a result of the process of forming oneself (McAdams, 1996). Pilotta (2016) stated that entrepreneurs are heroes in society. They take the stages of the journey since they dare to decide to take a different path from most people. According to Muzychenko, they must build something unique or special to create the desired new kind of needs. To build this differentiation, they must continue to develop themselves and survive the conditions that give them pressure and the development of their startup company (Muzychenko, 2008).

The aforementioned studies underline the importance of a perspective towards a scientific understanding of entrepreneurship to identify and an in-depth examination of personality characteristics (Brandstätter, 2011). However, despite the intensive research, the existing entrepreneurship literature is lacking in terms of integrating the definition of entrepreneurial personality as a coherent whole between personal and environmental interactions (Obschonka & Stuetzer, 2017).

Research focusing on individuals as dynamic systems characterized by stability and plasticity as well as intra-individual dynamics between more stabile psychic components and more volatile components has become the dominant perspective in modern psychology. Holistic models are largely not dominant in contemporary entrepreneurship research (Obschonka & Stuetzer, 2017). Therefore, modern personality research models in contemporary research are to incorporate different personality components within the personality structure to obtain a holistic picture of the individual (McAdams & Pals, 2006)

Recent research has shown that archetypes reflect dynamic patterns of perception, memory, and action, which resonate with ancient motivational and emotional systems. Archetypes describe how symbolic forms emerge from sub-symbolic. Archetypes also spark new thinking to better explain how the mind effectively represents the complexities and challenges of social life. Combining basic patterns (archetypes) with the novelty at hand (individual or cultural differences) may have several benefits (Becker & Neuberg, 2019). Narrative can be an important tool for studying archetypes for the character development of a causal structure can describe the types of interactions a person with archetypal characters might have (Green, Fitzgerald, & Moore, 2019).

Archetypes can be defined as a natural consequence of our basic social life goals interacting in three dynamic platforms: online representations of reality by mental simulation systems, histories of personal experiences that construct particular representations of human abstraction systems, and evolutionary dynamics weaving together a web of cognitive and affective capacities owned by all normally developed humans (Becker & Neuberg, 2019).



This research was conducted to provide a perspective on entrepreneurial personality, from the perspective of the hero journey archetype. The archetypal perspective raises the question of whether narrative stories that provide stronger links to basic biological and social systems can provide a framework for the scientific body from which to start systematically researching entrepreneurship. This study was conducted to examine the measurement of psychometric attributes involving 288 items consisting of 12 archetype hero journeys. This study also tests the validity of internal constructs by conducting Explanatory Factor Analysis (EFA).

As findings become increasingly saturated from evolutionary, social, developmental, and cognitive psychology, current developments in research are trying to clarify traditional conceptualizations of archetypal representations to explain the most current ways people perceive the social world. A new conceptualization of the social-cognitive representation system is needed, and we argue that a better view of the archetypes of C. Jung is an important part of the available solutions (Becker & Neuberg, 2019). Archetypes are understood as individual learning processes. Individuals have an active (at a certain time) and a dominant (persistent) archetype. This learning process will shape the individual to continue to develop into a whole person, who is able to accept themselves as they are and be well accepted by the existing environment (Campbell, 2004).

Thus, archetypes are natural consequences of our fundamental social goals played out in three dynamic platforms: the representation of reality by mental simulation systems, the history of personal experiences that construct certain concrete representations of these systems, and evolutionary dynamics that select the web of cognitive and affective capacities all normally developed humans have (Becker & Neuberg, 2019). Archetypes become the aspiration that strengthens beliefs related to how the world works or should function. Archetypes activate the overall self-function in interaction with the world so that it can foster a self-concept in the present. This growth of self-concept allows for the spontaneous process of learning and discovery (Sanford, 2014)

Studying the dynamics of the characteristics of a deep psychological journey for entrepreneurs is a logical step in studying entrepreneurship, by exploring the implications of individual journey narratives in entrepreneurship according to their archetypal journey (Burke, Fitzroy, & Nolan, 2008). Individuals have a purpose in life and how the journey to achieve changes over time (McAdams & Olson, n.d.). In integrating their own needs and environmental conditions, each individual has a different narrative journey along with the stages of life through which he/she passes (Wrosc, Scheier, Miller, Schulz, & Carver, 2003). Sanford (2014) added that archetypes are to understand how entrepreneurs using the narratives of their life experiences, can help explain the relationships between individuals and entrepreneurial functions.

Narratives are usually defined in psychology as temporary representations of coherent events focused around the goal of the protagonist or storyteller. Narratives follow a formal grammar or schema consisting of several related elements, including plot settings, trigger incidents, actions that increase in intensity, resolution, and conclusions (Mar, 2018). The "hero's journey," where the main character leaves every day's or habitual worlds, finds a mentor and overcomes challenges. These stories can model the more subtle aspects of success in social environment interactions, such as enduring suffering toward a goal or finding a suitable mentor to get guided by life's tasks (Green et al., 2019). In some studies, individual archetypes pass through stages of journeys, which



can be grouped into several types of archetypes into a narrative. The stages of an individual journey as the "hero's journey". The stages of a hero journey include the preparation stage, journey stage, and intermediate stage (Pearson, 2002).

The concept of archetypes as a hero's journey has been reviewed by experts. Campbell (2004), who uses storytelling analysis or stories from world myths, stated that in an archetypal journey a person will transcend three stages, such as the stages of journey departure, initiation, and return. Pearson and Marr (2002), by looking at the hero journey interactions, found 12 types of archetypes. Pearson has built a concept of measuring instrument known as Pearson Marr Archetype Inventory (PMAI) (McPeek, 2008).

Pearson Marr Archetype Personality Model is used as a reference in building archetype understanding. This model consists of 12 types of archetypes that describe the 3 stages of the journey from preparation, journey, and return (Mark & Pearson, 2001). The Pearson Marr Inventory is a personality model that seeks to explain the growing human personality through an archetypal journey (Person & Marr, 2002).

At the preparatory stage, what develops and dominates is a personal ego, striving for security and success. The intermediate stage is a stage to discover and express the true self, power, and freedom. The journey stage is a stage to start a real-life journey to seek truth, interpret how to be real and authentic. The archetype seeker, destroyer, lover, and creator pass the stages of the journey. At the stage of the journey, what dominates is the soul. At the intermediate stage, what dominates is the self, which shows the path for the individual's achievement to become a whole and better person. The transition is passed by taking responsibility, changing and healing, learning new things, and enjoying everything (Pearson, 2002).

There are 12 types of archetypes; they are innocent, orphan, caregiver, seeker, destroyer, lover, creator, ruler, magician, sage, and jester. The innocent is an archetype showing those who are full of trust and optimism for everything and trying to find safety and comfort for themselves. The life goal that an innocent type wants to achieve is a sense of security in any situation and condition so that he has a fear of being neglected from the environment. Individuals of this type face problems by denying every problem or by seeking help that aims to gain a sense of security.

The orphan is an archetype that shows individuals who think realistically and show themselves free and independent because they do not have anything. A person of this archetype will try to find self-safety and self-comfort.

The caregiver is an archetype of individuals who are full of compassion for others, by showing real concern through behavior to help everyone. Their goal to achieve is to provide help to others who are injured, both physically and mentally.

The seeker is an archetype showing individuals who are full of ambition to discover new things and ambition of the desire to have full autonomy over themselves and their environment. Their goal to achieve is to find a better life.

The destroyer is an archetype showing "anger" to break down barriers that allow the process of forming new life to fail. The goal to achieve is a complete individual change and the environment into something new (metamorphosis).



The lover is an archetype that shows passion and commitment to give love to all humans. The lover's individual life goal is unity, which is equipped with the ability to commit and passion to do what is loved.

The creator is an archetype of individuals who prioritize individualism and form new identities believed to be better than before.

The ruler is an archetype of responsible individuals and controlling their new identity by providing rules to be obeyed.

The magician is an archetype of those who have certain powers to launch changes that occur and provide comfort for new situations. The goal to achieve is change (transformation).

The sage is an archetype denoting individuals filled with wisdom. The goal to achieve is the real truth. Their life goal is to gain understanding and discover the truth of everything, as well as to gain knowledge, wisdom, and enlightenment for life.

The jester is an archetype denoting individuals with happiness and independence. The goal to achieve is a situation filled with joy and happiness. Their life goal is to obtain happiness, life, and satisfaction, by fulfilling the task of believing in the process and enjoying every journey they pass with the ability to experience freedom and happiness.

#### **RESEARCH METHOD**

The preparing a measurement instrument of this research comprises 5 stages. First, the writer wrote the items. All items consist of variations and contextualizations of entrepreneurial behavior from archetypal inventories. Second, conducting interviews with entrepreneurs to ensure that the statement items are fully contextual with their daily activities. Third, we submitted our first questionnaire consisting of 288 items and sent it to Atma Jaya students as a try-out. Based on the results of this trial, the researcher conducted a validity and reliability test and obtained 144 items that passed the criteria. There are 12 items for each archetype. Fourth, with a questionnaire that had passed the validity and reliability test calculations, the questionnaire was then submitted to participants of entrepreneurs in Jakarta and West Java. The fifth is to test the validity and reliability of the measurement instruments.

The entrepreneurial personality archetype personality inventory test consists of items with a description of a situation/problem followed by 6 self-assessment scales. For example, a question of "I believe that my need to run a business, will always be available" is given 6 rating options of 1 (highly unsuitable) to 6 (highly suitable).

Of all the items, the subject was asked to provide a preference scale that was considered the most appropriate for his condition. The larger the scale given, the more appropriate these conditions are in accordance with the conditions of the subject. This test instrument used a Likert scale with the first consideration. The Likert scale is easily responded by the second subject. There is no true-false statement in the test tool (inventory test), in this case, it is suitable for this measuring instrument in the form of inventory. The



expected response is that the subject chooses one of the answer options provided and is considered the closest to the subject's self-condition.

After producing the question items as the first stage of starting the research, in the second stage, we asked 10 entrepreneurs about their business experiences: dilemmas, challenges, conflicts, and how they developed solutions to the problems, by conducting semi-structured interviews. All the ten participants are members of the Small and Medium Enterprises social media network. They have a business going on for more than 5 years and they were willing to be our research respondents. In the third stage, we involved 220 Atma Jaya University Jakarta students as respondents to try out the measuring instruments. In the fourth stage, we recruited 200 entrepreneurs who have businesses in the SMEs category in Jakarta and West Java. The characteristics of their business were following the characteristics of SMEs regulated in the Law of the Republic of Indonesia Number 20 of 2008 concerning Micro, Small, and Medium Enterprises. All participants in this study were recruited using the convenience sampling method.

To get the context of real behavior about entrepreneurship, interviews are necessary to involve both novice and successful entrepreneurs. Due to time constraints, we only involved a few entrepreneurs at the time of testing. Several entrepreneurs mentioned that they had difficulty understanding the statement items and their context in entrepreneurial life because of the large number of items. They reported fatigue to complete 144 items and we continued to encourage them to complete their responses. With the final result of the research instrument being 60 question items, this issue can be reduced.

To get sufficient respondents, we held workshops on HR Management for small businesses and attended entrepreneurship meetings or symposia. During the event, we distributed questionnaires and explained the purpose of data collection. We also explained how to fill out a questionnaire to ensure participants understand and willing to answer all items. When participants answer questions, we guide them one by one and respond quickly when they find something they did not understand. We found that the convenience sampling applied in this study is relatively weak, due to the underrepresentation of the population. However, we tried to select participants by complying with the definition of an SME in government law and through SME associations. Given these drawbacks, we suggest that the results be confirmed in future studies and design a structured sampling method before collecting data.

Data collection was carried out by distributing paper and pens and online questionnaires to research participants. In distributing the printed version, we gathered participants in the entrepreneurship exhibition at the Indonesia Convention Exhibition Serpong, West Java during the Trade Expo Indonesia which was held in October 2019. In this event, we invited respondents to fill out the research instruments. To distribute the online version to entrepreneurs, we used social media networks.

The psychometric method used in this study follows the psychometric testing method developed Anastasi & Urbina (1997), and Crocker & Algina (1986), namely the content validity test, internal construct validity, and internal reliability. Regarding the content validity, researchers asked experts to evaluate items and calculate the weight of each choice. In the item analysis, we examined the homogeneity and discrimination functions of items by examining the correlation between item scores and total scores. A positive



and significant correlation illustrates the homogeneity (uniformity) of the constructs. The items (behaviors) are parts of the total score (construct). While the correlation illustrates the function of item discrimination where individuals with high scores will get high scores in the total score. This means that these items are able to distinguish individuals with high and low competence. In the internal construct validity test, the researcher used the exploratory factor analysis (EFA) method to identify the dimensions formed from this measuring instrument, while for the internal reliability the researcher applied the Cronbach's alpha test on each dimension that was formed.

The Explanatory Factor Analysis (EFA) was carried out because it was considered an effective method to explore new instrument structures at an early stage and provide evidence of construct validity (Flora & Flake, 2017). We tested the EFA analysis on our instrument. The requirements that must be met in the EFA are a Kaiser-Meyer-Olkin (KMO) value greater than 0.5 and Bartlett's Test value less than 0.05. At the factor formation stage, an analysis of Initial Eigenvalues was carried out on the results of factor analysis with a value of 1.00 and a cumulative value of at least 50% for the factor component. The recommended factor loading value is  $\geq$  0.5. Each component has a minimum of three items, and the reliability of the initial Cronbach alpha data is  $\geq$  0.7 (Garson, 2012)

#### **RESULTS AND DISCUSSION**

Based on interviews with 10 entrepreneurs, we created a trial questionnaire from 288 items. Each item was evaluated by participants. Overall, these items are relevant to day-to-day entrepreneurial activities. Furthermore, testing the quality of the instrument according to quantitative psychometric standards involving 220 respondents. However, only 212 data from 220 participants could be analyzed (Response rate: 96.36%). The participants were students from Jakarta and West Java.

After conducting the try-out, we completed a questionnaire consisting of 144 items. Each archetype consists of 12 items. Furthermore, testing the quality of the instrument according to quantitative psychometric standards involved 200 respondents. However, only 154 data from 200 participants could be analyzed (Response rate: 77%). The participants were entrepreneurs from Jakarta and West Java.

The results of the homogeneity and item discrimination test with the total item correlation method show that some items had a poor discrimination function as indicated by the negative coefficient and the coefficient size below 0.30. By this analysis, there were 144 items selected as items that meet the requirements with the correlation coefficient in the range between 0.3 - 0.8. (see Table 1). The next method for determining the validity of the instrument was tested internally using the Exploratory Factor Analysis (EFA) method. The EFA with 144 items guided us to eliminate another 84 items, therefore in the final analysis we had 60 items. From this item, the EFA suggests extracting the item into two dimensions (see Table 3). This test is significant with the KMO and Bartlett test of 0.84 roundness, p <0.001, and the total variance explains about 40.12% (see Table 2). The rotation method is Oblimine, since we found a strong correlation between these dimensions (r> 0.40).

The item distribution scattered in each Archetypes concluded that the orphan, warior, sage and jester archetypes consist of one dimension. While the other archetypes



obtained two dimensions. For the innocent construct, the two dimensions produced by the researcher were given the name inocent optimistic  $\alpha=0.863$  (n = 3) and inocent believer  $\alpha=0.916$  (n = 2). For the caregiver archetype construct, the caregiver prioritizes others  $\alpha=0.859$  (n = 3) and the caregiver providing benefits  $\alpha=0.881$  (n = 2). The seeker who is always looking has  $\alpha=884$  (n = 2) and the seeker who wants to keep changing has  $\alpha=880$  (n = 3). The lover who satisfies others has  $\alpha=0.909$  (n = 3) and the lover who wants to be with other people has  $\alpha=0.913$  (n = 2). The self-questioning destroyer has  $\alpha=0.934$  (n = 2) and the self-questioning destroyer has  $\alpha=0.865$  (n = 3). Imaginary creator has  $\alpha=0.874$  (n = 2), the confident creator has  $\alpha=0.881$  (n = 3). The ruller who tries to fulfill promises has  $\alpha=0.908$  (n = 2) and the ruller who leads has  $\alpha=0.833$  (n = 3). The magician who wants to be guided has  $\alpha=0.833$  (n = 3) and the magician who believes in miracles has  $\alpha=859$  (n = 2) (see Table 3).

The results of the EFA test corroborate Mcpeek's research stating that the scores on each archetype preference in PMAI include various archetype scores, and each dominant archetype remains influenced by other archetypal preferences (McPeek, 2008). The results of this test prove that there are other dimensions of archetype scores tested.

Table 1. Correlation of Item Coefficients

Archetype	Item tested	Item Accepted	Correlation range	Cronbach's coefficient	
Innocent	24	12	.483655	.892	
Orphan	24	12	.419705	.873	
Warrior	24	12	.543750	.913	
Caregiver	24	12	.451711	.902	
Seeker	24	12	.348622	.831	
Lover	24	12	.302708	.875	
Destroyer	24	12	.440605	.847	
Creator	24	12	.421614	.853	
Ruler	24	12	.530699	.908	
Magician	24	12	.768501	.923	
Sage	24	12	.469744	.913	
Jester	24	12	.302718	.884	

Table 2. KMO and Bartlett Test Results

Archetype	KMO & Bartletts					
	SA	ACS	df	Sig		
Inocent	0,779	490,461	28	.000		
Orphan	0,769	339,394	10	.000		
Caregiver	0,848	737,214	45	.000		
Destroyer	0,643	221,551	10	.000		



Seeker	0,818	517,201	36	.000
Warior	0,778	222,152	15	.000
Creator	0,658	210,376	10	.000
Lover	0,661	240,221	10	.000
Magician	0,798	263,907	15	.000
Ruller	0,742	470,147	28	.000
Jester	0,872	1.103.912	55	.000
Sage	0,778	226,653	10	.000

Table 3. Results of EFA

No	Archetype	Item Examples	D1	D2
1	Innocent	I am sure that my business needs will always be available.	0,863	
		I just know people who I easily entrust for work.		0,916
2	Orphan	In my opinion, other people in business will disappoint each other.	0,744	
3	Warrior	In my opinion, the existence of competition makes business more attractive.	0,79	
4		I always put other people's requests first.	0,859	
	Caregiver	I find it useful when I can share the results of my efforts with others.		0,881
5	Seeker	I'm always looking for ways to increase my capacity.  I find it difficult to calm down when running my	0,884	
			0,88	
6	Lover	I felt that it was a pleasure to build new relationships between my colleagues.	0,909	
		I believe that the presence of a complementary partner will make the business run even better.		0,913
7	Destroyer	I feel like I'm avoiding tough problems	0,934	
Destroyer		I feel business experiences make me think about who I am.		0,865
8	Creator	I feel like I have a good imagination.	0,874	
	Cleator	I believe my decisions have had a profound impact on my life.		0,881
9	Ruller	I feel in charge of keeping my promises.	0.908	
	Rullei	I feel like I can lead others.		0.883
10	Magic	I feel a lot of valuable experience that can be used as a reference for others to solve their problems.	0,833	
	iviagic	I believe a bigger power can help me through the problems of the business world		0,859
11	Sage	I feel that my actions are always objective according to facts.	0,845	



12	Jester	I feel t	hat my	actions	are	always	objective	0.878	
	Jesiei	I feel that my actions are always objective according to facts.					0.070		

#### CONCLUSIONS

This study aims to develop an entrepreneurial archetype personality inventory instrument. The instrument was built by implementing the recommended EFA to explore the structure of the newly developed instrument and to test the validity of the instrument. Psychometric test results show that the entrepreneurial personality archetype inventory instrument consisting of 60 items extracted into 12 constructs of archetypes is valid and internally reliable.

Although the test shows good validity and reliability of the instrument, it is still necessary to consider its implementation in a practical context. The instrument measures more aspects of personality archetypes that have not yet been manifested in real life. Thus, the archetypes are potentials and considered flexible and adaptive to the context in which behavior patterns are needed. The most appropriate method for explaining personality archetypes is by conducting in-depth interviews with respondents to get a complete narrative of their lives. With all the limitations, this instrument can still be used to assist entrepreneurship curriculum programs to get an overview of the entrepreneurial personality theme in carrying out entrepreneurial activities. Also, given the variables involved in this study, it does not mean that the instrument is useful for prediction. The instrument cannot be used as a single instrument to predict business success, because we did not correlate it with criteria that represent business success or achievement. We suggest testing the predictive ability of the instrument in future studies.

#### **REFERENCES**

- Anastasi, A., & Urbina, S. (1997). *Psychological Testing* (6th ed.). Hoboken, NJ: Prentice-Hall
- Becker, D. V., & Neuberg, S. L. (2019). Archetypes reconsidered as emergent outcomes of cognitive complexity and evolved motivational systems. *Psychological Inquiry*, 30(2), 59-75.
- Bekmezc, M. (2013). Taking competitive advantage by business model innovation. Journal of Management & Economics, 20(1), 291–314.
- Brandstätter, H. (2011). Personality aspects of entrepreneurship: A look at five metaanalyses. *Personality and Individual Differences*, *51*(3), 222–230.
- Burke, A. E., Fitzroy, F. R., & Nolan, M. A. (2008). What makes a die-hard entrepreneur? Beyond the "employee or entrepreneur" dichotomy. *Small Business Economics*, 31(2), 93-115. https://doi.org/10.1007/s11187-007-9086-6
- Campbell, J. (2004). *The hero with a thousand faces*. Princeton, NJ: Princeton University Press.
- Collins, C. J., Hanges, P. J., & Locke, E. A. (2004). The relationship of achievement motivation to entrepreneurial behavior: A meta-analysis. *Human Performance*, 17(1), 95-117.
- Flora, D. B., & Flake, J. K. (2017). The purpose and practice of exploratory and confirmatory factor analysis in psychological research: Decisions for scale development and validation. *Canadian Journal of Behavioural Science*, 49(2), 78-88.
- Garson, G. D. (2012). Testing statistical assumptions. Asheboro, NC: Statistical



- Publishing Associates.
- Green, M. C., Fitzgerald, K., & Moore, M. M. (2019). Archetypes and narrative processes. *Psychological Inquiry*, *30*(2), 99-102.
- Horney, N., Pasmore, B., & O'Shea, T. (2010). Leadership agility: A business imperative for a VUCA world. *People & Strategy*, 33(4), 32-38.
- Hytti, U. (2003). Stories of entrepreneurs: Narrative construction of identities (Doctoral Dissertation). Turku University, Finland.
- Kok, J., van den Heuven, S. C. (2019). *Leading in a VUCA World integrating leadership*. Cham, Switzerland: Springer Open
- Mar, R. A. (2018). Stories and the promotion of social cognition. *Current Directions in Psychological Science*, *27*(4), 257-262.
- Mark, M., & Pearson, C. S. (2001). The hero and the outlaw: Building extraordinary brands through the power of archetypes. New York: McGraw-Hill.
- McAdams, D. P. (1996). Personality, modernity, and the storied self: A contemporary framework for studying persons. *Psychological Inquiry*, 7(4), 295–321.
- McAdams, D. P., & Olson, B. D. (n.d.). Personality development: Continuity and change over the life course. *Annual Review of Psychology, 61,* 517-542.
- McAdams, D. P., & Pals, J. L. (2006). A new big five: Fundamental principles for an integrative science of personality. *American Psychologist*, *61*(3), 204–217.
- McPeek, R. W. (2008). The Pearson-Marr archetype indicator and psychological type. *Journal of Psychological Type*, 68(7), 52–67.
- Muis, I. (2017). Identitas wirausaha, entrepreneurial passion, pengenalan peluang, dan pengambilan risiko sebagai faktor dalam keberhasilan wirausaha pada wirausahawan opportunity dan wirausahawan necessity (Doctoral Dissertation). Universitas Indonesia, Jakarta.
- Muzychenko, O. (2008). Cross-cultural entrepreneurial competence in identifying international business opportunities. *European Management Journal*, *26*(6), 366–377.
- Obschonka, M., & Stuetzer, M. (2017). Integrating psychological approaches to entrepreneurship: the Entrepreneurial Personality System (EPS). *Small Business Economics*, 49(1), 203–231.
- Pearson, C. S. (2002). What story are you living. Gainesville: Center for Application of Psychological Type, Inc.
- Pearson, C. S., & Marr, H. K. (2002). *Introduction to archetypes: A companion for understanding and using the Pearson-Marr Archetype Indicator*. Gainesville, FL: Center for Applications of Psychological Type.
- Pilotta, J. J. (2016). The entrepreneur as hero?. In V. Berdayes, J. Murphy (eds.), *Neoliberalism, economic radicalism, and the normalization of violence* (pp. 37-52). Cham, Switzerland: Springer.
- Putra, I. G. C., Kepramareni, P., & Suryandari, N. N. (2019). Empowerment program, entrepreneurial competence and business growth SME in Denpasar. *Asia Pacific Journal of Management and Education*, *2*(2), 1-10.
- Rauch, A., Wiklund, J., Lumpkin, G. T., & Frese, M. (2009). Entrepreneurial orientation and business performance: An assessment of past research and suggestions for the future. *Entrepreneurship: Theory and Practice*, *33*(3), 761-787.
- Riyanti, B. P. D., Sandroto, C. W., & Warmiyati, M. (2016). Effect of soft skill competencies and hard skill competencies toward intention to become entrepreneur of vocational graduates. *International Research Journal of Business Studies*, *9*(2), 119-132.
- Sanford, C. (2014). The responsible entrepreneur four game changing archetype. San



- Francisco: Jossey Bass.
- Santoso, A., Singgih, D. R., & Hidayat, D. (2019). How to sustain in a vuca world: a conceptual study on start-ups in how to sustain in a Vuca world: A conceptual study on start-ups in Indonesia. *Journal of Business and Entrepreneurship*, 7(2), 12-20.
- Utami, E. N., & Mulyaningsih, H. D. (2016). Pengaruh kompetensi kewirausahaan terhadap kinerja UMKM. *Majalah Bisnis dan Iptek*, *9*(2), 98-109.
- Wartomo. (2017). Pengembangan kompetensi kewirausahaan pelaku ukm yang tinggal di pinggiran aliran Sungai Progo Yogyakarta berbasis nilai karakter dan kearifan lokal. *Jurnal Ekonomi dan Perbankan*, 2(1), 48-59.
- Wrosch, C., Scheier, M. F., Miller, G. E., Schulz, R., & Carver, C. S. (2003). Adaptive self-regulation of unattainable goals: Goal disengagement, goal reengagement, and subjective well-being. *Personality and Social Psychology Bulletin*, 29(12), 1494-1508.
- Wuisang, J. R. H., Korompis, C., & Lempas, J. D. (2019). Analysis of entrepreneurship education on entrepreneurship attitude students Economic Education Department Faculty of Economic Manado State University. *Asia Pacific Journal of Management and Education*, 2(2), 1-16.
- Zelekha, Y., Yaakobi, E., & Avnimelech, G. (2018). Attachment orientations and entrepreneurship. *Journal of Evolutionary Economics*, *28*, 495-522.
- Zhao, H., Seibert, S. E., & Lumpkin, G. T. (2010). The relationship of personality to entrepreneurial intentions and performance: A meta-analytic review. *Journal of Management*, *36*(2), 381-404.