INVESTIGATION OF PERSONALITY TRAITS FOR PREDICTING THE ENTREPRENEURIAL SATISFACTION

Ulfat Abbas, Irfan Ullah Arfeen, Wahbeeah Mothi and Usman Aslam

ABSTRACT

This research investigated the relationship between personality traits and satisfaction of entrepreneurs of Pakistan. Three specific personality traits factors e.g., need for achievement, locus of control and risk-taking propensity were selected on the bases of previous quality literature. Diverse structured questionnaires were used for data collection on the bases of 7 dimensions of Likert scale. Sample of 212 entrepreneurs engaged in 4 sectors of Sialkot was selected on the bases of convenience sampling technique. Moderate correlation was determined among need for achievement, locus of control and entrepreneurial satisfaction. Multiple linear regressions used for acceptance or rejection of proposed hypotheses. Need for achievement and locus of control had moderate positive relationship with Entrepreneurial Satisfaction but risk taking propensity was insignificant association with Entrepreneurial Satisfaction. Cross sectional study, self reported data collection technique as well as convenience sampling was the main limitations of this study. This research highlighted that which personality traits lead highly to Entrepreneurial Satisfaction.

Key Words: Personality Traits, Need for Achievement, Locus of Control, Risk Taking Propensity, Entrepreneurial Satisfaction

INTRODUCTION

To overcome the challenges of unemployment in a specific self employed personnel who serve the country is a requirement of Pakistan and not those who served by the nation. It is general agreement among peoples having different thinking that for economic development of any country both developing and developed, self-employed persons are the most important. Mulhern (1995) highlighted that small enterprises having less than 10 employees are better in providing working places than bigger companies. Small enterprises contribution to net growth of jobs is significant in both underdeveloped and developed countries (Mead & Liedholm, 1998). Lumpkin and Dress in their study on entrepreneurship finds that in creation of new ventures, expansion of existing ventures, development in term of social, technological and economic of any country, entrepreneurship have a vital role (Lumpkin & Dess, 1996). Olakitan and Ayobami (2011) argue that among many factors of success, entrepreneur him/herself is most important determinant. Majority of Scholars argue that entrepreneurs have a certain characteristics which differentiate them from general public and they are small in numbers (Marcua, Iordanescua, & Iordanescua, 2012). There exist huge research in different countries on personality of entrepreneur and

scholars find out different personality factor associated with personality of entrepreneur (R. Brockhaus & Horwitz, 1986; David C McClelland, 1961).

According to author's knowledge no such research so far conducted in Pakistan which investigates personality of entrepreneurs.

>Aim of this study is to provide help to entrepreneurs in understanding impact of their own personality on the success of entrepreneurial venture and Entrepreneurial satisfaction. This will help them utilize their own personality trait for the success of their venture. Moreover, this study will provide guidance to potential entrepreneurs for the study of personality traits and their impact on success of venture. This study has several objectives:

- > To investigate need for achievement among entrepreneurs
- To find internal/external locus of control among entrepreneurs
- To find Risk taking propensity among entrepreneurs
- To find Entrepreneurial Satisfaction among entrepreneurs

There are many characteristics of personality which grab attention of scholars. In literature one can easily find different personality traits associated with entrepreneurs' personality. Caliendo, Fossen, and Kritikos (2014) point out that there are two ways to analyze personality construct; Big Five model or specific personality characteristics. Some researcher argue in favor of Big Five model, whereas other oppose in term that it is more general model and required research on specific personality characteristics (Dudley, Orvis, Lebiecki, & Cortina, 2006). Barrick (2005) highlighted that specific characteristics more suitable than big five model because these describe entrepreneurial activities more accurately in time, place and role context. Koh (1996) point out some key feature of entrepreneur which are also pre-condition for this process including high Need for Achievement, internal Locus of control, moderate Risk taking Propensity, high Tolerance for Ambiguity, high self confidence and innovation.

David C McClelland (1961) found that entrepreneurial behavior is associated with personality characteristic of individual including Need for Achievement, Tolerance for ambiguity, Risk taking Propensity, perception of responsibility for success or failure etc. McClelland's (1961) work was pioneering in entrepreneur's personality trait including Need for Achievement, Locus of control and Risk taking Propensity. Characteristics in his studies not only work as motivator in start of venture, but also influenced success of venture (Dunkelberg & Cooper, 1982; Hornaday & Aboud, 1971; Timmons, 1978). After huge literature review of personality traits, R. H. Brockhaus (1982) find Need for Achievement, Risk taking Propensity and internal locus of control as consistent traits of entrepreneurs (Göksel & Aydintan, 2011; Mueller & Thomas, 2001). They rate self efficacy, social skills and opportunities recognition higher. Similar study is conducted by Makhbul in Malaysia highlighted that high self efficacy and internal locus of control are necessary characteristics to compete in current global competitive market (Makhbul & Hasun, 2010).

LITERATURE REVIEW

Olakitan and Ayobami (2011) argue that among many factors of success, entrepreneur him/herself is most important determinant. Financial institutes associated with venture, stressed on personality characteristics of entrepreneurs. Further categories different characteristics of successful entrepreneurs into three main characteristics including N-Ach, internal L-O-C and risk-taking behavior. Personality research is not only important area of study, but also having critical role in entrepreneur's personality research (Rauch & Frese, 2000) and unit of analysis is individual in these studies (Korunka, Scharitzer, Carayon, & Sainfort, 2003).

Personality:

Rauch and Frese (2000) point out that personality trait of entrepreneurs predict his/her behavior. Major character of entrepreneurship is entrepreneur him/herself, so it is important to study individual entrepreneur, in order to understand the process of entrepreneurship (Poon et al., 2006). Koh (1996) point out some key feature of entrepreneur which are also pre-condition for this process including high N-Ach, internal L-O-C, moderate Risk-Pro, high T-Amb, high self confidence (S-Eff) and innovation. David C McClelland (1961) found that entrepreneurial behavior is associated with personality characteristic of individual including N-Ach, T-Amb, Risk-Pro, perception of responsibility for success or failure etc. McClelland's (1961) work was pioneering in entrepreneur's personality trait including N-Ach, L-O-C and Risk-Pro. Characteristics find in his studies not only work as motivator in start of venture, but also influenced success of venture (Dunkelberg & Cooper, 1982; Hornaday & Aboud, 1971; J.A. Timmons, 1978).

Need for Achievement (N-Ach):

Concept of need for achievement was first presented by David C McClelland (1961) and argue that since beginning human being have desire to accomplish, need to excel, succeed or achieve. To satisfy this need an individual tend to be an entrepreneur. Although there are not many research evidence which support personality traits, but still there exist evidence which proved relationship between need for achievement and entrepreneurship (Johnson, 1990). According to Elliot (2006) Need for achievement consisting two parts one is hope for success and second is fear of failure.

Among all personality traits which are researched, N-Ach grabs most attention of the scholars. David Clarence McClelland (1953) defines N-Ach as behavior of individual towards competing with excellence. According to David C McClelland (1961) preferences for challenge, innovativeness and personal responsibility are building blocks of N-Ach. These are not only motivation factor for startup of entrepreneurial venture, but also contribute for the success of it (Hornaday & Aboud, 1971). Shaver and Scott (1991) argue that N-Ach has longest history among all psychological characters associated with entrepreneurs. David C McClelland (1961) ranked high N-Ach as a key

trait for entrepreneurs, recognized leadership characteristic (Lumpkin & Dess, 1996). Individual with high N-Ach are more self-confidence, having high Risk-Pro (David C McClelland, 1965).

David C McClelland (1961) argues that some qualities related to N-Ach have their contribution in success of venture. Brockhaus found that higher N-Ach is one of the most important personality factor which play significant role in success of new start-up (R. H. Brockhaus, 1982). In the light of these evidence from literature author hypothesized that

H1: Higher Need for achievement (N-Ach) has a positive relationship with Entrepreneurial Satisfaction.

Locus of Control (L-O-C):

Locus of control is one of the most studied personality traits of entrepreneur. It was first introduced by Julian Rotter in early 1950s. Rotter (1966) defines L-O-C as perception of individual that what is the cause of events which took place in his/her life? In other words, belief of one person about the events which took place in one's life are due to his/her own actions (internal L-O-C) or he/she has no control on those events (External L-O-C).

Concept of L-O-C is first introduced by Rotter (1966) and Rotter (1966) expand this concept further. Internality and Externality are two dimensions of L-O-C (Rotter, 1975). Internality refers to believe about outcome is due to one's own actions, whereas externality is view that outcome is due to luck, chance, fate etc. (Fagbohungbe & Jayeoba, 2012). defined L-O-C as perception of individual about punishment and reward in his/her life. It is perceived control over life events (Rotter, 1966). David C McClelland (1961) define entrepreneur as individual taking responsibility by himself and not depending upon others. L-O-C is another concept which grabs wide attention of scholarly research. It is a belief that individual's actions lead to outcome. Individuals with external L-O-C have belief that outcome of any action is not in control of their own, but there are some external forces which governs these outcomes. Contrary to this individuals with internal L-O-C are in belief that outcome of any action is due to personal efforts and capabilities (Rotter, 1966). As David C McClelland (1961) already point out that high N-Ach individual like to work in situation, where they have control over the outcome directly or they are able to see their efforts as predictor of outcome of event. Rotter (1966) extends this point and argue that individual with internal L-O-C are more likely to proffered entrepreneurship as in entrepreneurial setup they can see outcome as the consequence of their abilities and efforts.

R. H. Brockhaus (1982) ranked internal L-O-C as an important success factor along with higher achievement need and higher propensity to take risk. Caliendo et al. (2014) provide evidence that there is positive relationship between internal L-O-C and entrepreneurship status. It was highlighted in number of previous studies that positive relationship exist between L-O-C and success of entrepreneurial venture

(Begley & Boyd, 1987; Evans & Leighton, 1989; Thomas & Mueller, 2000). So this leads author to second hypothesis

H2: There is positive relationship between Internal Locus of Control (L-O-C) and entrepreneurial satisfaction.

Risk-taking Propensity (Risk-Pro):

It is a concept which grabs attention of scholars since beginning of entrepreneurship. Modern era of this concept starts in late 1970s and early 1980s when different models were developed in order to make distinguished between entrepreneurs and employees in grounds of risk. It is suggested by Palmer (1971) that we can test entrepreneur psychologically by measuring individual's attitude, perception and management of risk. It is already stated that there are many definitions of entrepreneurship. According to Noah (1961) International dictionary of Webster (Third edition) entrepreneur is a person who organize an economic venture, particularly one who is organizer, owner, manager and risk taker accompanied with business. It is also stated in Standard Dictionary of Funk and Wagnairs (1958) that entrepreneur is a person who start a business and having full control over its functions and take risk to operate its daily process (R. H. Brockhaus, 1980). Schumpeter (1954) argues that J. S. Mill was first economist who use term entrepreneur in field of economics. In his study Mill (1848) describes functions of entrepreneur as direction giver, controller, superintendent and risk-taker. He further argues that Risk-Pro is the quality which distinguished entrepreneurs from managers.

There is positive relationship between Risk-Pro and intention to start and stay in business (Zhao, Seibert, & Lumpkin, 2010). Caliendo, Fossen, and Kritikos (2010); (2009) find that risk aversion has impact on entry to self-employment and individual having less risk aversion attitude are most probably to enter in self employment. He also point out that self-employees have higher Risk-Pro than employees. Further highlighted by same Author, those individuals with medium Risk-Pro have more probability to stay in self employment when he compared them with those who have low or very high Risk-Pro. To investigate Risk-Pro and Ent-Sat author hypothesized that

H3: The relationship between Higher Risk-taking propensity (Risk-Pro) and entrepreneurial satisfaction is positive.

Entrepreneurial Satisfaction (Ent-Sat):

Satisfaction is a state of mind which evaluate appraisal of something. It is contentment as well as enjoyment. It is stable and evanescent. Although income of entrepreneurs is often low as compare to employed individuals, (Hamilton, 2000) but satisfaction with job is higher in entrepreneurs than salary workers, (Clark & Senik, 2006; B. S. Frey, Benz, & Stutzer, 2004). There exist different definitions of Ent-Sat. Different authors define it according to their requirement. In this study author will be agreed with definition of Ent-Sat given by Kautonen and Palmroos (2010) that satisfied

entrepreneur is one who is willing to continue in entrepreneurship and not preferred paid employment.

Rose (2003) point out that there are two levels of job satisfaction; extrinsic satisfaction which is comprises of material or instrumental aspects like salary, job security and career opportunities and intrinsic satisfaction is satisfaction with quality of work like, nature of work and social relationship. In this research author will included questions related to income from current business to measure extrinsic satisfaction and work traits questions will be measure intrinsic level of satisfaction.

Papzan et al. (2008) report significant relationship between N-Ach, Internal L-O-C and success of rural entrepreneurs. Internal L-O-C has significance and positive relationship with entrepreneurial satisfaction (Rauch & Frese, 2000). Kautonen and Palmroos (2010) argue that entrepreneurs possess some traits which are more suitable for entrepreneurship including internal L-O-C, self-determination and high Risk-Pro etc. which are significantly relevant to entrepreneurial satisfaction and success (Hornaday & Aboud, 1971; David C McClelland, 1961).

Personality Traits Need for Achievement Locus of Control Risk taking Propensity Conceptual Frame work of Model

RESEARCH METHODOLOGY

Sample Selection

According to Sekaran (2000) population is group of things, peoples or event in which researcher is interested to investigate. As it is not possible to investigate whole population because it is both expensive as well as time consuming. So scholars select a subset from population which represent the whole population (Sekaran, 2000) and used data which is collected from that subset (Sample) as information for research (L. Frey, Botan, & Kreps, 2000). A handsome quantity of entrepreneurs especially in manufacturing concern are registered in Sialkot Chamber of Commerce, but majority of entrepreneurs operating in service, wholesale and retail sector are not registered. Therefore, author did not get list of entrepreneurs and select sample randomly from all

entrepreneurs. Exact number of entrepreneurs is unknown, so author use sampling frame as unknown. A sample of 385 entrepreneurs using convenience sampling technique was selected with the help of online sample size calculator with default values (precision of 5% and confidence level 95%) (http://sampsize.sourceforge.net/iface/). When sampling frame is not well defined or unknown, researcher mostly used non-probability sampling for sample selection (Battaglia, Link, Frankel, Osborn, & Mokdad, 2008). So convenience sampling technique of non-probability sampling is used to select sample.

Measuring Instrument

Multiple diverse Instruments used for data collection in this research which are related to five independent and one dependent variable. These are "A revised 10-items version of the achievement motives scale (AMS-R)" by (Lang & Fries, 2006) was used to measure N-Ach. For measurement of L-O-C author used scale of (Pettijohn, 1992). A scale developed by Meertens and Lion (2008) was used for the measurement of Risk-Pro. Ent-Sat was taken from study of (Kautonen & Palmroos, 2010).

Table 1: Scales & its Sources

<u>Scale</u>	<u>Item</u>	<u>Source</u>
A revised 10-items version of the achievement motives scale (AMS-R)	10	Lang and Fries (2006)
I-E Locus of Control questionnaire	20	Pettijohn (1992)
Risk propensity scale	7	Meertens and Lion (2008)
Entrepreneurial Satisfaction scale	10	Kautonen & Palmroos (2010)

Data Analysis Techniques

First test was to check reliability and validity of scales therefore pilot study was conducted

Descriptive statistics makes raw data into a meaningful form to make it able to understand, re-arrange, interpret and manipulate. Correlation technique used to investigate the relationship among variables. Multiple regression technique was applied to determine the simultaneous impact of personality traits on entrepreneurial satisfaction.

RESULTS AND ANAYSIS

Table 2: Type of Industry

	<u>Frequency</u>	<u>Percent</u>	<u>Cumulative</u> <u>Percent</u>
Retail	41	19.3	19.3
Whole Sale Services Manufacturing Total	36	17	36.3
	66	31.1	67.5
	69	32.5	100
	212	100	

41 entrepreneurs (19.3%) are taken from retail industry. It includes retail shops of computer, mobiles, sports, hardware, garments, and stationary business. Majority of the retail stores belong to Dramanwali, Sadar, China Chowk, Paris road and Rungpura areas. 36 entrepreneurs (17%) are involved in Wholesale business which includes computer hardware wholesale stores, stationary, garments, sports, and electronics.

Procedure

212 fully completed questionnaires received from respondents which show a satisfactory response rate of approximately 56% from four sector of business i.e. Retail (19.3%), Whole Sale (17%), Service (31.1%) and Manufacturing (32.5%). Response rate is satisfactory as it is according to recent studies in which Antoncic (2009) in a similar study in Slovenia gets 160 usable responses from entrepreneurs whereas Makhbul and Hasun (2010) in their study at entrepreneurs of Malaysia and collected 163 usable questionnaire. Halim, Muda, and Amin (2011) gets 105 responses from Malaysian entrepreneurs in which response rate was 60%.

Descriptive Analysis

Table 3: Mean and Standard Deviation

Descriptions	<u>Sat</u>	N-Ach	Risk_Pro	LOC
N	212	212	212	212
Missing	0	0	0	0
Mean	5.3035	5.7052	3.9371	5.186
Std. Deviation	1.10789	1.14979	1.62717	1.41277
Minimum	2.44	1.4	1	1.56

Table 3 highlighted the means and standard deviations of personality traits and Ent-Sat. Means are description of central tendency of each variable, where as standard deviation highlighted the variation in the opinions of entrepreneurs. A high value of mean shows the more agreeableness of the respondents with questions, whereas lower mean show disagreement. Means of Three variables i.e., N-Ach, L-O-C and Ent-Sat, are in high side which show availability of these traits in entrepreneurs of Sialkot. Entrepreneurs of Sialkot generally possess these three traits more as compare to Risk-Pro which shows lower mean value.

Reliability Analysis

Table 4: Cronbach's Alpha

<u>Scale</u>	Cronbach's Alpha	Cronbach's Alpha	
	Coefficient (Pilot Study-	Coefficient (Final-	
	<u>125)</u>	<u>212)</u>	
Entrepreneurial	0.806	0.767	
Satisfaction			
Need for	0.885	0.912	
Achievement			
Risk-taking	0.703	0.798	
propensity			
Locus of control	0.897	0.953	

Detail of Cronbach's alpha coefficient is presented in the Table-4, which is above the significant level of .7 for all scales within the sample of this research. It indicates that all scale are reliable (Cronbach, 1951). So there is no threat to internal reliability and consistency of these scales. All the scales have alpha above acceptable level which prove reliability as good. The highest alpha with value .953 was of L-O-C scale, where as lowest alpha value contains Ent-Sat scale which is .767.

Correlation Analysis

Table 5: Correlation Test

Personality Traits	ENTREPRENEURIAL	<u>Sig.</u>
	SATISFACTION	
Need for	0.537	0
achievement	0.453	0
Locus of Control	0.084	0.112
Risk taking		
propensity		

Table-5 shows Pearson correlation test results which applied to check the relationship between different personality traits and Ent-Sat. Relationship between N-Ach and Ent-Sat was moderate positive with value of .537 at confidence level of 99%. Relationship between L-O-C and Ent-Sat also shows similar result with a little variation where value was .453. Relationship was moderate positive at 99% confidence level. Correlation between Risk-Pro and Ent-Sat was near to zero with value of .084 but not significance at confidence level of 95% respectively.

Hypothesis Testing

Standard multiple linier regression analysis was conducted in order to examine hypothesized relationship between five independent variables (N-Ach, L-O-C, Risk-Pro,) and Entrepreneurial Satisfaction. Results of multiple linear regression analysis are presented in Table 6.

Table	6. Multi	nle Regr	ession /	Analysis
Lante	o. wiain	DIC IXCEI	CSSIUII	THALY 515

	<u>Unstandardized</u> <u>Coefficients</u>		Standardized Coefficients		
<u>Model</u>	<u>B</u>	<u>Std.</u> Error	<u>Beta</u>	<u>T-Value</u>	Sig.
(Constant)	1.906	.389		4.899	.000
N-Ach	.272	.078	.282	3.480	.001
Risk_Pro	.049	.038	.072	1.297	.196
LOC	.142	.054	.181	2.637	.009

- a. Dependent Variable: Sat
- b. R = .604, $R^2 = .365$ Adjusted $R^2 = .349$, F value = 23.631

Hypothesis 1 proposed a positive relationship between higher N-Ach and entrepreneurial satisfaction. A significant regression coefficient beta 0.282, t(212)= 3.48 at 0.001 is showing support for hypothesized relationship which mean entrepreneurs having high N-Ach also score higher in entrepreneurial satisfaction. Value of beta shows that increase in one unit of N-Ach in entrepreneurs will also increase 0.282 in entrepreneurial satisfaction. Our finding are in line with Göksel and Aydintan (2011) Tong, Tong, and Loy (2011) and .

Hypothesis 2 proposed that there is positive relationship between internal locus of control and entrepreneurial satisfaction. Value of regression coefficient beta was 0.181, value of t was t (212) = 2.637 and significance level p was 0.009 which show support for

hypothesized relationship. Although relationship was not as strong as in case of N-Ach, but still there was significance positive relationship which shows that entrepreneurs with internal L-O-C has positive relationship with entrepreneurial satisfaction. In other word individual with high internal locus of control are more satisfied with entrepreneurship as compare to those having external locus of control.

Hypothesis 3, It was proposed in hypothesis 3 that there is positive relationship between Risk-Pro and entrepreneurial satisfaction. Beta coefficient value of 0.072 and t value of 1.297 was not significance with p = 0.196 which is > .005 level of significance. Thus that hypothesized relationship not proved.. Individual with high Risk-Pro may not have high entrepreneurial satisfaction.

DISCUSSION OF RESULTS

Significance relationship between Need for achievement (N-ach) and Entrepreneurial Satisfaction (Ent-Sat) found which provide support to hypothesized relationship. This means that entrepreneurs having high N-Ach are more satisfied with entrepreneurial venture. Zaman (2013) conducted a similar study at university students of Peshawar region to investigate six psychological characteristics (N-Ach, L-O-C, T-Amb, Risk-Pro, innovativeness and self confidence) and entrepreneurial inclination of students. Finding of that study are somewhat similar to this study with only difference is at Risk-taking propensity (Risk-Pro).

Hypothesis 2 proposed positive relationship between internal locus of control (L-O-C) and Entrepreneurial Satisfaction (Ent-Sat). Empirical analysis also confirmed the hypothesized relationship which means that entrepreneurs who having internal L-O-C are entrepreneurially satisfied. In other words internal L-O-C is function of Ent-Sat. Result of internal locus of control (L-O-C) is similar to previous studies of Makhbul and Hasun (2010) M. M. Khan et al. (2011) and AYODELE (2013).

A positive relationship between Risk-taking propensity (Risk-Pro) and Entrepreneurial Satisfaction (Ent-Sat) was hypothesized in hypothesis 3 which is not supported by empirical evidence. There is no relationship between Risk-Pro and Ent-Sat in entrepreneurs of Sialkot.

CONCLUSION AND RECOMMENDATION

A proposed model which links personality traits with entrepreneurial satisfaction (Ent-Sat) was tested using three personality traits i.e. Need for achievement, Locus of control, Risk taking propensity. Using multiple linier regressions it was tested that certain personality traits constantly associated with entrepreneurial personality have or not impact on Ent-Sat. In particular it was found that three out of three personality traits which are N-Ach, internal L-O-C are predictor of Ent-Sat but one personality traits i.e. Risk-Pro did not predict Ent-Sat.

There exists only a few studies on personality of entrepreneurs in Pakistan which were conducted at students who are potential entrepreneurs and not actual, but this study was

conducted at actual entrepreneurs of one of the most famous and industrial city of Pakistan (Sialkot). Thus it is pioneering work which provides a detailed picture of personality of Pakistani entrepreneurs. Although Entrepreneurial Satisfaction (Ent-Sat) is not only function of personality traits, but there are many other aspects which determined it but this study will provide initial thought for further research on topic. It is more important to conduct a longitudinal study with bigger sample to see big picture of personality of Pakistani entrepreneurs. Moreover, this study provides information about entrepreneurs of one city which may not be applicable to whole country because of difference of sub-cultures in Pakistan.

REFERENCE

- Antoncic, B. (2009). The entrepreneur's general personality traits and technological developments. World Academy of Science, Engineering and Technology, 53, 236-241.
- Barrick, M. R. (2005). Yes, personality matters: Moving on to more important matters. Human Performance, 18(4), 359-372.
- Begley, T. M., & Boyd, D. P. (1987). A comparison of entrepreneurs and managers of small business firms. Journal of management, 13(1), 99-108.
- Brockhaus, R., & Horwitz, P. (1986). The Art and Science of Entrepreneurship. The Psychology of the Entrepreneur. Ed. DSR Smilor. Cambridge, MA: Ballinger, 25-48.
- Brockhaus, R. H. (1980). Risk taking propensity of entrepreneurs. Academy of management Journal, 23(3), 509-520.
- Brockhaus, R. H. (1982). The psychology of the entrepreneur. Encyclopedia of entrepreneurship, 39-57.
- Caliendo, M., Fossen, F., & Kritikos, A. (2010). The impact of risk attitudes on entrepreneurial survival. Journal of Economic Behavior & Organization, 76(1), 45-63.
- Caliendo, M., Fossen, F., & Kritikos, A. S. (2014). Personality characteristics and the decisions to become and stay self-employed. Small Business Economics, 42(4), 787-814.
- Caliendo, M., Fossen, F. M., & Kritikos, A. S. (2009). Risk attitudes of nascent entrepreneurs—new evidence from an experimentally validated survey. Small Business Economics, 32(2), 153-167.
- Clark, A. E., & Senik, C. (2006). The (unexpected) structure of "rents" on the French and British labour markets. The Journal of Socio-Economics, 35(2), 180-196.

- Cronbach, L. J. (1951). Coefficient alpha and the internal structure of tests. psychometrika, 16(3), 297-334.
- Dudley, N. M., Orvis, K. A., Lebiecki, J. E., & Cortina, J. M. (2006). A meta-analytic investigation of conscientiousness in the prediction of job performance: examining the intercorrelations and the incremental validity of narrow traits. Journal of Applied Psychology, 91(1), 40.
- Dunkelberg, W. C., & Cooper, A. C. (1982). Entrepreneurial typologies. Frontiers of entrepreneurship research, 1-15.
- Evans, D. S., & Leighton, L. S. (1989). Some empirical aspects of entrepreneurship. The American Economic Review, 519-535.
- Fagbohungbe, O. B., & Jayeoba, F. I. (2012). Locus of Control, Gender and Entrepreneurial Ability. British Journal of Arts & Social Sciences, 11(1).
- Frey, B. S., Benz, M., & Stutzer, A. (2004). Introducing procedural utility: Not only what, but also how matters. Journal of Institutional and Theoretical Economics (JITE)/Zeitschrift für die gesamte Staatswissenschaft, 377-401.
- Frey, L., Botan, C. H., & Kreps, G. (2000). Investigating communication. NY: Allyn & Bacon.
- Gist, M. E. (1987). Self-efficacy: Implications for organizational behavior and human resource management. Academy of management review, 12(3), 472-485.
- Göksel, A., & Aydintan, B. (2011). Gender, business education, family background and personal traits: A multi dimensional analysis of their affects on entrepreneurial propensity: Findings from Turkey. International Journal of Business and Social Science, 2(13), 35-48.
- Gürol, Y., & Atsan, N. (2006). Entrepreneurial characteristics amongst university students: some insights for entrepreneurship education and training in Turkey. Education+Training, 48(1), 25-38.
- Halim, M. A. S. A., Muda, S., & Amin, W. A. A. W. M. (2011). Locus of Control: A Basis for Creative Entrepreneurs in Krfatangan Malaysia, Terengganu.
- Hamilton, B. H. (2000). Does entrepreneurship pay? An empirical analysis of the returns to self-employment. Journal of Political economy, 108(3), 604-631.
- Hornaday, J. A., & Aboud, J. (1971). Characteristics of Successful Entrepreneurs1. Personnel psychology, 24(2), 141-153.

- Kautonen, T., & Palmroos, J. (2010). The impact of a necessity-based start-up on subsequent entrepreneurial satisfaction. International Entrepreneurship and Management Journal, 6(3), 285-300.
- Koh, H. C. (1996). Testing hypotheses of entrepreneurial characteristics: a study of Hong Kong MBA students. Journal of Managerial Psychology, 11(3), 12-25.
- Korunka, C., Scharitzer, D., Carayon, P., & Sainfort, F. (2003). Employee strain and job satisfaction related to an implementation of quality in a public service organization: a longitudinal study. Work & Stress, 17(1), 52-72.
- Lang, J. W., & Fries, S. (2006). A revised 10-item version of the Achievement Motives Scale: Psychometric properties in german-speaking samples. European Journal of Psychological Assessment, 22(3), 216. Lefcourt, H. M. (1976). Locus of control.
- Lumpkin, G. T., & Dess, G. G. (1996). Clarifying the entrepreneurial orientation construct and linking it to performance. Academy of management Review, 21(1), 135-172.
- Makhbul, Z. M., & Hasun, F. M. (2010). Entrepreneurial success: an exploratory study among entrepreneurs. International Journal of Business and Management, 6(1), p116.
- Marcua, G., Iordanescua, C., & Iordanescua, E. (2012). The influence of the psychological factors upon the entrepreneurial tendency in crisis environments. Procedia-Social and Behavioral Sciences, 33, 473-477.
- Markman, G. D., & Baron, R. A. (2003). Person–entrepreneurship fit: why some people are more successful as entrepreneurs than others. Human resource management review, 13(2), 281-301.
- McClelland, D. C. (1953). The achievement motivation: Appleton-Century-Crofts.
- McClelland, D. C. (1961). 77ie achieving society: Princeton, NJ: Van Nostrand.
- McClelland, D. C. (1965). N achievement and entrepreneurship: A longitudinal study. Journal of personality and Social Psychology, 1(4), 389.
- Mead, D. C., & Liedholm, C. (1998). The dynamics of micro and small enterprises in developing countries. World development, 26(1), 61-74.
- Meertens, R. M., & Lion, R. (2008). Measuring an Individual's Tendency to Take Risks: The Risk Propensity Scale1. Journal of Applied Social Psychology, 38(6), 1506-1520.
- Mill, J. S. (1848). Principles of Political Economy With Some of Their Applications to Social Philosophy. 1857. George Routledge and Sons, Manchester.

- Mueller, S. L., & Thomas, A. S. (2001). Culture and entrepreneurial potential: A nine country study of locus of control and innovativeness. Journal of business venturing, 16(1), 51-75.
- Mulhern, A. (1995). The Sme Sector In Europe-a Broad Perspective (Vol. 33, pp. 83-87): Int Council Small Business West Virginia University Bureau Business Research Box 6025, Morgantown, Wv 26506-6025.
- 83-87): Int Council Small Business West Virginia University Bureau Business Research Box 6025, Morgantown, Wv 26506-6025.
- Noah, W. (1961). Websters Third New International Dictionary of the English Language. Springfield: G. & C. Merriam Co, 212.
- Olakitan, O. O., & Ayobami, A. P. (2011). An investigation of personality on entrepreneurial success. Journal of Emerging Trends in Economics and Management Sciences, 2(2), 95-103.
- Palmer, M. (1971). The application of psychological testing to entrepreneurial potential. California management review, 13(3).
- Pervin, L. (1980). Personality: Theories, assessment, and research: New York: John Wiley & Sons, Inc.
- Pettijohn, T. F. (1992). Psychology: A concise introduction: Dushkin Publishing Group.
- Rauch, A., & Frese, M. (2000). Psychological approaches to entrepreneurial success: A general model and an overview of findings. International review of industrial and organizational psychology, 15, 101-142.
- Rauch, A., & Frese, M. (2007). Let's put the person back into entrepreneurship research: A meta-analysis on the relationship between business owners' personality traits, business creation, and success. European Journal of Work and Organizational Psychology, 16(4), 353-385.
- Robinson, P. B., Stimpson, D. V., Huefner, J. C., & Hunt, H. K. (1991). An attitude approach to the prediction of entrepreneurship. Entrepreneurship theory and practice, 15(4), 13-31.
- Rose, M. (2003). Good deal, bad deal? Job satisfaction in occupations. Work, Employment & Society, 17(3), 503-530.
- Rotter, J. B. (1966). Generalized expectancies for internal versus external control of reinforcement. Psychological monographs: General and applied, 80(1), 1.
- Rotter, J. B. (1975). Some problems and misconceptions related to the construct of internal versus external control of reinforcement. Journal of consulting and clinical

Schumpeter, J. A. (1954). History of economic analysis: Psychology Press.

Sekaran, U. (2000). Research methods for business: A skill-building approach: John Wiley & Sons.

Shaver, K. G., & Scott, L. R. (1991). Person, process, choice: The psychology of new venture creation. Entrepreneurship Theory and practice, 16(2), 23-45.

Stewart Jr, W. H., & Roth, P. L. (2001). Risk propensity differences between entrepreneurs and managers: a meta-analytic review. Journal of applied psychology, 86(1), 145.

Thomas, A. S., & Mueller, S. L. (2000). A case for comparative entrepreneurship: Assessing the relevance of culture. Journal of International Business Studies, 287-301.



Ulfat Abbas: MS Scholar of Virtual university of Pakistan. He has completed his MBA from VU with attractive CGPA. His areas of interest in research are Personalities of entrepreneurship, entrepreneur success, and entrepreneurial satisfaction. He is interested to start his PHD from well recognized institute. E-mail: mb120400105@vu.edu.pk or jafery514@gmail.com



Dr. Irfan Ullah Arfeen: Assistant Professor of the Department of Management Sciences, and Deputy Director, Board of Advanced Studies and Research (BASR) at the Virtual University of Pakistan. he spent one year as Doctoral Research Visitor at the Manchester Institute of Innovation Research (MIoIR), Manchester Business School in the University of Manchester, United Kingdom. He published his research papers in the impact factor and HEC recognized journals. He has presented many research papers in different conferences. Also, he got full sponsorship to present his paper in ICTD 2012 which was hosted by the Georgia Institute of Technology, USA. He participated in short course titled "Seminar on e-Governance for Developing Countries" sponsored by Ministry of Commerce, PR of China. E-mail: m.irfanullah@vu.edu.pk



Ms. Wahbeeah Mohti: Ph.D scholar (Finance), Muhammad Ali Jinnah University Islamabad. I am associated with Virtual University of Pakistan since 2.5 years as a faculty member. I have presented my first paper in 2nd AIB-MENA conference Dubai, UAE. My four research papers are in under review process in different HEC recognized journals. And three papers are in Pipe line.



Usman Aslam: MS in Business Administration from Virtual university of Pakistan. He has gotten 2nd position in his MS degree from VU. His areas of interest are especially in change management i.e., organizational cynicism, organizational change, personality traits, organizational context, Job satisfaction/dissatisfaction, employee's withdrawal. Numerous resourceful papers are under publications in HEC recognized national and international journals.

 $E\text{-}mail\text{:}\,mb120400163@vu.edu.pk\quad or\quad usmanbest786@gmail.com$

E-mail: wahbeeah.mohti@vu.edu.pk or beeah_awan@yahoo.com