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AN ANALYSIS OF THE UNDERLYING MOTIVES FOR AGRICULTURAL ENTREPRENEURSHIP INTENTION IN PAKISTAN

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ABSTRACT

The purpose of this report is to empirically investigate the association between sustainable entrepreneurship with agricultural entrepreneurial intention among Pakistani agri-entrepreneurs. The article explores how the outcomes of a successful entrepreneurial education system - self-efficacy, opportunities, and business angel influence agricultural entrepreneurs' intentions to pursue a career in agricultural entrepreneurship. The study was conducted in Southern Punjab, Pakistan among agrientrepreneurs. A total of 200 sample was collected. The structural model and the hypotheses were tested using the two-step PLS-SEM (Measurement Model Assessment & Structural Model Assessment) process in SmartPLS 3.0 software. While for descriptive analysis SPSS 23 software were used. The current study demonstrates that, with the exception of opportunity perception, all of the identified factors have positive correlations with agricultural entrepreneurial intention to varied degrees. Also, sustainable entrepreneurship was found to have a direct impact on agricultural entrepreneurial intention. Thus, in order to minimise reliance on paid work, improve economic conditions, and lower the rate of graduate unemployment among youngsters, their focus should be directed toward entrepreneurship especially in agricultural sector (as the portion of value addition in GDP of Pakistan is higher than any other sector) by developing the right attitude, attaining necessary skills in addition having requisite knowledge about the importance of entrepreneurship in building economies as well as growing societies. To the best of the authors' knowledge, this is one of the first research to investigate the impacts and mediation of sustainable entrepreneurship on agricultural entrepreneurial intention among agri-entrepreneurs in a developing country - Pakistan.

Keywords: Entrepreneurship, Agricultural Entrepreneurship, Agricultural Entrepreneurial Intention, Entrepreneurial Education, Entrepreneurial Self-efficacy, Opportunity Perception, Business Angel, Sustainable Entrepreneurship

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INTRODUCTION

Several studies have shown that personal characteristics can affect the performance of entrepreneurs, and several psychological/cognitive factors have been correlated with the creation of these entrepreneurial intentions and the entrepreneurial process itself (Ferreira, Raposo, Rodrigues, Dinis, & Paço, 2012). Entrepreneurship can improve job growth, the development of human capital, and customer satisfaction, nonetheless, the investigation has revealed that merely a minor percentage of individuals turn out to be entrepreneurs (Okpara, 2007). Corresponding to a significant interpreter of these activities, entrepreneurial intention is a key component of the success of entrepreneurial activities (Liñán, 2004).

In recent years, it has become increasingly apparent that the conception of the role of agriculture in economic progression by both economists and policymakers has undergone a major evolution (Khanna & Solanki, 2014). More or less no highly potential land is remained in most of sub-Saharan Africa and significant parts of Asia, according to estimates gathered by the Millennium Ecosystem Assessment (MEA). According to the World Bank collection of development indicators, the agricultural sector is adding the value, agriculture accounts for 4.003% of GDP, raw materials of agricultural exports 1.457% of merchandise exports, employment in agriculture 27.266% of total employment (modelled ILO estimate) in the world as reported in 2018. In different developed countries like; Australia the agriculture adding the value of 3% of GDP, Canada 6.7% of GDP and Germany with 0.8% of its GDP. While in developing countries like; China the agriculture sector is adding the value of 7.9% of GDP, Malaysia 8.8% of GDP, Sudan 39% of GDP, and Kenya 34% of GDP. Similarly, the in the neighbouring countries of Pakistan the agricultural sector is participating in in form of value addition of GDP such as; Iran 9.5% of GDP, India 15.41% of GDP, Bangladesh 12.68% of GDP.

Alsos, Carter, and Ljunggren (2011) specified that entrepreneurship in the agricultural sector seems like a resource of transforming the sector and of bringing new economic growth to rural areas. It is also sustained that several entrepreneurship studies are motivated by market price volatility and the need to take advantage of marketing opportunities to diversify and generate revenue for corporate entrepreneurship (Barbieri & Mahoney, 2009; Hansson, Ferguson, Olofsson, & Rantamäki-Lahtinen, 2013). Over the last decade, economic liberalization decreased the defence of agricultural markets and a rapidly evolving, more critical population has drastically changed this situation. Increasingly, agricultural firms have to respond to market vagaries, evolving customer preferences, improved environmental legislation, new product quality standards, chain management, food protection, sustainability, and so on. The current situation of agricultural sector in Pakistan is worrying in the long term, owing to the lack of interest on the part of the higher authorities in this significant field (K. F. Z. Ahmad et al., 2013).

For new entrants, creativity, and portfolio entrepreneurship, these reforms have paved the way. It is documented by leaders, practitioners as well as scientists that besides sound management and craftsmanship, farmers and cultivators are becoming heavily

reliant on entrepreneurship to stay afloat in the future (Gerard McElwee, 2008; Pyysiäinen, Anderson, McElwee, & Vesala, 2006). Anyhow, some of the researchers revealed that in Pakistan there is a lack of new business in agriculture and value addition in agriculture products. There is a need to focus on agriculture entrepreneurship (Haque, 2007). Entrepreneurial self-efficacy, grounded on social cognitive theory (Bandura, 1997), is the 'power of a person's confidence that he or she can fulfill the different roles and tasks of entrepreneurship successfully" (Chen, Greene, & Crick, 1998). While the demand for entrepreneurial financing, i.e. financing for risky, creative projects, has gained growing courtesy in the economic and monetary literature over the past few decades (Chemmanur & Fulghieri, 2014). But an increasing field of research into entrepreneurship pursues to recognize fundamental causes that promote or promote people to participate in entrepreneurial activity. the importance and value of entrepreneurship and its education, there has been a substantial increase in the figure and eminence of entrepreneurship curriculums at universities and colleges (Finkle & Deeds, 2001; Kuratko, 2005; Matlay, 2005). Entrepreneurship can provide real opportunities through creativity as well as new business prospects for college graduates who want to be financially and economically self-sufficient (Ajzen, 1991). In comparison to any other nation, Pakistan has the lowest rate of promoting entrepreneurship at universities and business schools.

This current study is developed for contributing to current efforts and assimilate the influencing arenas of agricultural entrepreneurial intention in Pakistan, and that could may also be important for developing agricultural entrepreneurial intentions through proper awareness on factors such as opportunity perception, risk perception, self-efficacy, social networks, business angles, and the moderating effects of gender and entrepreneurial education. The core purpose of this research is to identify the relationships of these variables and their effects on agricultural entrepreneurial intention.

Literature Review

Related Theory

Entrepreneurial Intention and Theory of Reasoned Action

A. I. Fishbein (1980) proposed that theory of reasoned action (TRA) offers a general theoretical model of actions based on attitudes and social values. On the other hand, another study found that perhaps the relationship among behaviour and attitudes is always at finest shaky (e.g., Corey (1937); LaPiere (1934), some investigators also advocate for the abolition of the attitude model in its entirety (Wicker, 1969). However, M. Fishbein and Ajzen (1974) noted that by measuring attitudes and behaviours at the same level of specificity, the inconsistency between attitudes and behaviours could be improved. The most fascinating aspect of Ajzen's theory, according to Lans, Gulikers, and Batterink (2010), is that intentions in a particular context are seen as powerful predictors of individual behaviour.

Entrepreneurial Intention and Social Cognitive Theory

In the 1960s, Albert Bandura (1986) created social cognitive theory out on social learning theory. In 1986, it was called the social cognitive theory, and it posits that learning occurs in what seems like a social context, with both a dynamic as well as reciprocal interaction between the individual, their environment, including their behaviour. Social cognitive theory is distinguished by its 'triadic reciprocality' (Bandura, 1986), that pertains to the interaction of personal (cognitive, emotional, and

biological) elements, individual behaviours, as well as environmental events in framing intents that anticipate individual action. We make contributions to the literature. We apply social cognitive theory to the study of entrepreneurial aspirations by examining the triadic reciprocity between cognitive characteristics (such as entrepreneurial self-efficacy) and individual intentions to start a business. The influence of one's perceived capacity to be an entrepreneur on one's desire to engage in such behaviour. Further, researcher tested hypotheses on a unique dataset composed of agri-entrepreneurs, comparing those who experienced such an environment working as entrepreneurs in sector to those entrepreneurs who did not participate in such an experience.

Definitions, Relationships, and Hypotheses

Agricultural Entrepreneurial Intentions

Entrepreneurship starts when individual wishes to pursue a start-up. However, there is a lack of knowledge about its factors that influence entrepreneurial intention, especially in developing countries (Nabi & Liñán, 2013). But entrepreneurial intention research shows several factors that contribute to the intention of the individual to start a company, including the personality of the individual and the environmental background (Lüthje & Franke, 2003; Nabi & Liñán, 2013). Research claims that intentions are a central predictor of the planned behaviour that occurs (Bagozzi, Baumgartner, & Yi, 1989; Kolvereid, 1996; Liñán, 2004).

The techniques used to research agriculture will benefit from general entrepreneurs hip as well (Borch & Forsman, 2001; Carter, 1998; McNally, 2001). The majority of the literature is geared toward general entrepreneurial behaviour rather than a specific industry (Alsos et al., 2011). The concept of agricultural entrepreneurship has sparked debate among academics (Lans, Seuneke, & Klerkx, 2020; Gerard McElwee, 2008; G McElwee & Robson, 2005; Vik & McElwee, 2011). Agriculture has the highest value addition in GDP, employment rate, and other sectors as well of developing country especially Pakistan. So, this sector can grow more with production and participate in the enhancement of the economy within less time than any other sector can do. The only thing which can help to overcome crises facing these days and increase productivity fast is agriculture. If the government of Pakistan develops strategies that empower the agricultural entrepreneurial intention within the country, the future can be secured by any kind of famine or other related crises.

H1: Sustainable entrepreneurship exercises the strongest influence on agricultural entrepreneurial intention.

This research as noted earlier incorporates the influence of factors (external and internal) and makes a significant contribution to agricultural entrepreneurial intention. Thus, the following are the main factors affecting the agricultural entrepreneurial intention in Pakistan.

Entrepreneurial Education and Agricultural Entrepreneurial Intention

Entrepreneurship success is related to entrepreneurial intent, down-to-earth functioning, and the accumulation of unique business processes, but it is also linked to qualification experience. Entrepreneurship courses have become increasingly common among graduate and undergraduate students (Finkle & Deeds, 2001). According to ODEP (2008), entrepreneurial education is able to help students change their minds about working for themselves and equip them with either the skills they'll need to run a company (Karimi, Chizari, Biemans, & Mulder, 2010). Three factors are critical in the entrepreneurial education process: 1) Using the entrepreneurship method,

identifying marketing opportunities and developing a business framework, service, as well as product to exploit it 2) assembling and assigning the necessary resources in order to explore and transforming a situation into such an opportunity throughout the hopes for living apart from the uterus, 3) establishing, planning, conducting, as well as managing a corporate enterprise which acts on time (Williams, 2004).

H2: Entrepreneurial education will be positively related to agricultural entrepreneurial intention.

H3: Entrepreneurial education will be positively related to sustainable entrepreneurship.

Entrepreneurial Self-efficacy and Agricultural Entrepreneurial Intention

Entrepreneurial self-efficacy refers to an individual's belief that he or she seems to be capable of executing the activities and duties of an entrepreneur. A theoretical model proposed by Boyd and Vozikis (1994) recommended entrepreneurial self-efficacy as a significant explanatory component in evaluating both the potency of entrepreneurial intentions as well as the likelihood that both these intentions would therefore result in entrepreneurial behaviour. A role-specific self-efficacy is entrepreneurial self-efficacy (Bandura, 1997), as well as self-efficacy is seems to be a risk-taking action indicator (Bandura, 1997), a core feature of entrepreneurs (N. Ahmad & Seymour, 2008). The significance of entrepreneurial self-efficacy in deciding key entrepreneurial features and being a predictor of entrepreneurial intentions (Chen et al., 1998; Venugopal, Viswanathan, & Jung, 2015; Zhao, Seibert, & Hills, 2005) and in both entrepreneurial research and practice, subsequent actions (Bird, 1988; Krueger & Carsrud, 1993) makes entrepreneurial self-efficacy a critical build.

H4: Entrepreneurial self-efficacy is most influential on agricultural entrepreneurial intention.

H5: Entrepreneurial self-efficacy is most influential on sustainable entrepreneurship.

Opportunity Perception and Agricultural Entrepreneurial Intention

Almost all entrepreneurs have a subjective and idiosyncratic perception of opportunity. Different actors interpret different realities, for example, because of their past interactions or because of the way knowledge is framed (Long, 2003). Opportunity-related information created by others can have a major impact on the perception of individual opportunities in two ways: knowledge formation that underlies opportunities and knowledge transmission. According to entrepreneurship literature, identifying and pursuing opportunities is dependent on the entrepreneur's expertise in addition to the gathering of contextual information (Shane, 2003). In this regard, social media sites play a critical role in obtaining access to additional data, which helps to raise awareness and recognize opportunities (Arenius & De Clercq, 2005; Birley, 1985; Ramos-Rodriguez, Medina-Garrido, Lorenzo-Gómez, & Ruiz-Navarro, 2010; Singh, Hills, Hybels, & Lumpkin, 1999).

Agricultural opportunity research has mostly been carried out in studies with established farmers: farmers who have diversified, grown or innovated their farms see e.g. (Lans, Van Galen, Verstegen, Biemans, & Mulder, 2014; Methorst, 2016). While Several recent agricultural entrepreneurship studies concentrate on farmers' aptitude to generate new opportunities, organized either as new business projects or as part of an established business organization (Bryden, Bell, Gilliatt, Hawkins, & MacKinnon, 1992). Researchers use opportunity scanning and export behaviour for entrepreneurs'

proactivity, reflecting their positive sense of entitlement toward pursuing possibilities both inside and outside of their immediate environment (Muñoz-Bullón, Sánchez-Bueno, & Vos-Saz, 2015). Variances in former knowledge and motivation can clarify differences in the way of attention of entrepreneurs towards features of the communal and natural environment, and thus their recognition of opportunities for sustainable development (Patzelt & Shepherd, 2011). Recently Arafat, Saleem, Dwivedi, and Khan (2020) studied the relationship between opportunity and agricultural entrepreneurship and concluded that it has an impact on agricultural entrepreneurship.

H6: Opportunity perception will be positively related to agricultural entrepreneurial intention.

H7: Opportunity perception will be positively related to sustainable entrepreneurship.

Business Angel and Agricultural Entrepreneurial Intention

High-net-worth individuals seeking to invest in extremely early-stage (seed) enterprises with which they have no familial links are known as business angels (Drover, Wood, & Zacharakis, 2017). Between 2001 and 2013, business angels invested approximately eight times much more than venture capitalists (Carpentier & Suret, 2015). In other words, business angels do more than just spend money in new companies through their entrepreneurial background and experience but also invest their expertise and time (Chua & Wu, 2012). Arafat et al. (2020) discussed the relationship of business angels with agricultural entrepreneurship, according to which business angels increase the number of entrepreneurs in the agricultural sector. Collewaert (2012) identified the relationship between business angel and entrepreneurial intention. Therefore, we hypothesize:

H8: Business angel will be positively related to agricultural entrepreneurial intention.

H9: Business angel will be positively related to sustainable entrepreneurship.

Sustainable Entrepreneurship as Mediator

According to Kalsoom and Qureshi (2019) sustainability attitudes are strongly bounded with environmental issues. Ajzen (1991) concluded that attitude is a significant antecedent of behavioural intention. Liñán, Chen, and practice (2009) claims that attitude is the most important factor in determining entrepreneurship goals. In a recent study on agricultural based sustainable entrepreneurship, Sargani, Zhou, Raza, and Wei (2020) discovered that sustainability attitude is an essential variable of sustainable entrepreneurial aspirations.

H10: Sustainable entrepreneurship will exert a significant influence on entrepreneurial education and agricultural entrepreneurial intention as mediator.

H11: Sustainable entrepreneurship will exert a significant influence on entrepreneurial self-efficacy and agricultural entrepreneurial intention as mediator.

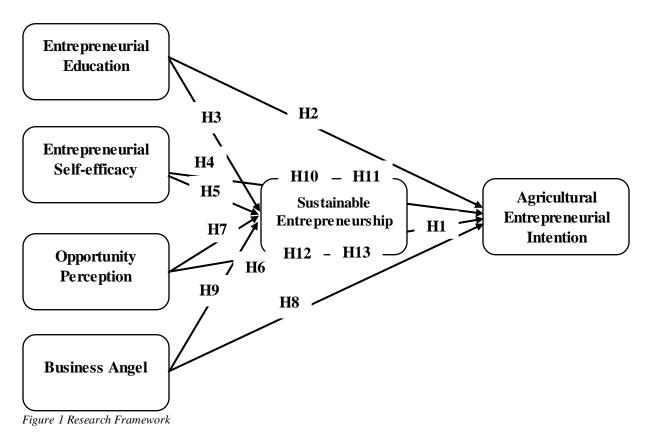
H12: Sustainable entrepreneurship will exert a strong influence on opportunity perception and agricultural entrepreneurial intention as mediator.

H13: Sustainable entrepreneurship will exert a strong influence on business angel and agricultural entrepreneurial intention as mediator.

Research framework

The influence between social and cognitive variables on the agricultural entrepreneurial intention at the start-up level is investigated in this study. Entrepreneurial education,

entrepreneurial self-efficacy, opportunity perception and business angel are variables including the mediating impact of sustainable entrepreneurship are studied in the current research.



Research Methodology

Quantitative Casual Research

As name shows, it is clear that each aspect has its consequences and such type of research assist us to acknowledge or construct a link between dependent and independent variables (Kumar, 2018). In this research approach, a systematic method is applied for some sort of analysis statistically or numerically and such an approach is based on a large number of sample representatives (Ranjit, 2011). By this we will be able to identify that how independent variables like entrepreneurial education, self-efficacy, social network and business angel have influence upon dependent variable like agricultural entrepreneurial intention in the presence of a mediator risk perception.

Unit of Analysis

The study intends to put the hypotheses towards the test as well as discover the link between variables of the study at the business unit level. So, the unit of analysis for the current study is any business unit of different industries related to agriculture such as sugar mills, oil and ghee mills, flour mills, cotton factories, tea making industries, etc. working within Southern Punjab Pakistan.

Sampling

For this research work, the researcher chose a non-probability sampling technique. According to Zikmund, Babin, Carr, and Griffin (2003), in a non-probability sampling technique where the elements don't have a known or predetermined chance of being

chosen as a subject. The main reason why we do sampling is to save cost, time, and effort. Moreover, in a set of inferential figures, Comrey and Lee (1992) provided samples. A poorer sample will be found with fewer than 50 participants; a sample of 100 will be weak; 200 will be adequate; a sample of 300 will be considered good; 500 will be very good, while 1000 will be excellent. Keeping in view it was decided to take 200 randomly sample from the population to analyse the factor of entrepreneurial education, self-efficacy, social network and business angel towards agricultural entrepreneurial intentions as well as the mediation effect of risk perception.

Target Population

The term "population" has a slightly different meaning in statistics than it does in everyday speech, and sample pertains towards the population, which frequently contains too several individuals to study conveniently, so an investigation is often limited to one or more samples drawn from it and can be easily understood. Sekaran and Bougie (2010) added that the population of the study is the collection of persons, events, or objects that a researcher wants to conclude based on a derived sample. So, the target population for this research would be all males/females, married or single; engaged in any kind of official (industries and organization) or self-owned business related to the agricultural sector of Pakistan.

Development of Research Instrument

A comprehensive self-administrative questionnaire was prepared. The sections of survey of questionnaire were conducted in two phases. First section to gather demographical data and the second section to measure items of variables. The research questions of variables and mediator has been adopted from the prior literature of published studies. The five factor Likert scale, Strongly Agreed, Agree, Neutral, Disagree and Strongly Disagree has been utilized. The scale which is distributed among the student clearly related with the questions of the variables for desired results.

Agricultural Entrepreneurial Intention Scale

Table 1 Items of Agricultural Entrepreneurial Intention

1 My professional goal is to become an entrepreneur 2 I will make every effort to establish and operate my own business 3 I am seriously considering starting a business 4 I am determined to become a professional business manager 5 I am determined to develop my business into a high-growth enterprise 6 I plan to start my own business within 2 years after graduation

Source: J.-H. Wang, Chang, Yao, and Liang (2016)

Entrepreneurial Self-efficacy Scale

Table 2 Items of Entrepreneurial Self-efficacy

Item

- 1 When working on difficult tasks, I am certain that I will complete them
- 2 I believe that I can succeed in most endeavours that I focus on
- 3 I can successfully overcome many challenges
- 4 I am confident that I can perform effectively in various tasks
- 5 Compared with other people, I can perform effectively in most tasks

6 I can perform effectively in a difficult situation

Source: J.-H. Wang et al. (2016)

Opportunity Perception Scale

Table 3 Items of Opportunity Perception

Item

- 1 There are many opportunities for new product innovation
- 2 The industry offers many opportunities for technological innovation
- 3 There are many opportunities for growth in this industry

Source: Y. L. Wang, Ellinger, and Wu (2013)

Business Angel Scale

Table 4 Items of Business Angel

Item

- 1 The business angels feel personal satisfaction from involvement in entrepreneurial business
- 2 The business angels helping their friends to set up their businesses
- 3 The business angels supporting the production of goods and services which are useful for society
- 4 The business angels are participating for fun
- 5 The business angel finances a venture for a positive impression, reputation in the community
- 6 The business angels have other non-financial motives
- 7 The business angels participate to increase their tax incentives

Source: Harrison and Mason (2005); Ramadani (2009)

Sustainable Entrepreneurship Scale

Table 5 Items of Risk Perception

Item

- If I would set up my own business, it will undoubtedly positively impact society's weakest members
- 2 If I would start my business, I will help in world poverty reduction
- 3 If I would start my business, I will prefer to positively impact the surrounding society and environment
- 4 If I would start my business, I will provide suitable income opportunities to others in society
- 5 If I would start my business, I will use locally available, cost-effective and recyclable inputs

Source: Davidsson (1995)

Results and Analysis

The analysis chapter is comprised of the validation of all variables discussed in research model. A questionnaire survey was conducted and the results of have been analysed through software SPSS 23 and Smart PLS 3.0.

Response Rate

The researcher spread the 400 questionnaires to the businessmen and students of entrepreneurship that are working in the agriculture sector in Southern Punjab, Pakistan by using the convenience sampling technique (a type of non-probability sampling technique).

Table 6 Response Rate

Questionnaire Delivered	Questionnaire Received	Questionnaire received i complete form	Response Rate n
250	230	200	86%

Model Fitness

Table 7 Model Fitness

	Saturated Model	Estimated Model
SRMR	0.081	0.081

Demographics

Such kind of characteristics which gives research respondents personal information is known as demographics. To know the gender and age, demographic data was also collected and the detailed interpretations of collected data analysis are described below:

Gender

Table 8 Gender

Gender						
		Frequency	Percent	Valid Percent	Cumulative	
					Percent	
Valid	Male	200	100.0	100.0	100.0	

The results showed that there are only males which are currently owning the agricultural businesses in Southern Punjab Pakistan.

Age

Table 9 Age (In years)

Age							
		Frequency	Percent	Valid	Cumulative		
				Percent	Percent		
Valid	Under 30 years	54	27.0	27.0	27.0		
	30- 39 years	54	27.0	27.0	54.0		
	40- 49 years	69	34.5	34.5	88.5		
	50 years and above	23	11.5	11.5	100.0		
	Total	200	100.0	100.0			

As the results showed the higher number of businesses are currently owning by the people having age group of 40-49 years.

Construct Validity and Reliability

Reliability and validity are two initial requirements used in PLS-SEM research to test our model (Hair, Ringle, & Sarstedt, 2013).

Table 10 Construct Validity & Reliability

Constructs	Cronbach's	Composite	Average Variance
	Alpha	Reliability	Extracted (AVE)
AEI	0.812	0.863	0.515
BA	0.84	0.879	0.515
EE	0.736	0.829	0.559
SE	0.823	0.876	0.585
ESE	0.803	0.86	0.511
OP	0.725	0.808	0.6

Abbreviations: SE=Sustainable Entrepreneurship, AEI=Agricultural Entrepreneurial Intention, EE=Entrepreneurial Education, ESE= Entrepreneurial Self efficacy, OP= Opportunity Perception, BA=Business Angel

Discriminant Validity

Fornell-Larcker and HTMT are the ways to calculate discriminant validity.

Fornell-Larcker Criterion

Table 11 Fornell-Larcker

Tuble 11 Totheu-Eureker							
Constructs	AEI	BA	EE	SE	ESE	OP	
AEI	0.718					_	
BA	0.568	0.718					
EE	0.525	0.521	0.748				
SE	0.639	0.717	0.547	0.765			
ESE	0.547	0.568	0.471	0.634	0.715		
OP	0.211	0.153	0.205	0.201	0.257	0.775	

Heterotrait-monotrait ratio HTMT:

Table 12 HTMT

	AEI	BA	EE	SE	ESE	OP
AEI						
BA	0.648					
EE	0.657	0.589				
SE	0.75	0.826	0.653			
ESE	0.662	0.656	0.557	0.765		
OP	0.226	0.185	0.283	0.209	0.308	

Quality Criteria

Following are the ways to analyse quality criteria.

R-Square

Table 13 R-square

	R Square	R	Square
		Adjusted	
AEI	0.484		0.47
SE	0.61		0.602

The value of \mathbb{R}^2 shows the strength of the relationship or we may say that regression of the relation.

F-square

Table 14 F-square

	AEI	BA	EE	SE	ESE	OP
AEI						
BA	0.016			0.329		
EE	0.046	0.046		0.047		
SE	0.08					
ESE	0.028	0.028		0.13		
OP	0.003			0.00)1	

Hypothesis Testing:

Test of direct and mediating relationship of hypothesis are as follows:

Direct Effects

Table 15 F-square

	Hypothesis	Original	Sample	Standard	T Statistics	P Values
		Sample (O)	Mean (M)	Deviation	(O/STDEV)	
H1	SE -> AEI	0.325	0.33	0.09	3.597	0
H2	EE -> AEI	0.245	0.243	0.081	3.032	0.003
H3	$EE \rightarrow SE$	0.165	0.154	0.061	2.704	0.007
H4	ESE -> AEI	0.256	0.251	0.089	2.888	0.004
H5	$ESE \rightarrow SE$	0.287	0.285	0.067	4.308	0
H6	$OP \rightarrow AEI$	0.051	0.053	0.062	0.813	0.416
H7	$OP \rightarrow SE$	0.022	0.032	0.049	0.445	0.656
H8	$BA \rightarrow AEI$	0.287	0.292	0.07	4.106	0
H9	$BA \rightarrow SE$	0.465	0.474	0.057	8.214	0

Mediation

Table 16 Mediation

	Hypothesis	Original	Sample	Standard	T	P
		Sample (O)	Mean (M)	Deviation	Statistics	Values
H1	EE -> SE -> AEI	0.054	0.051	0.026	2.056	0.04
0						
H1	$ESE \rightarrow SE \rightarrow AEI$	0.093	0.094	0.035	2.691	0.007
1						
H1	$OP \rightarrow SE \rightarrow AEI$	0.007	0.011	0.017	0.412	0.68
2						
H1	$BA \rightarrow SE \rightarrow AEI$	0.151	0.156	0.044	3.434	0.001
3						

Discussion and Conclusion

The problem explored in quantitative way. The study was descriptive in nature and survey method was used to gather information. Descriptive statistics analysis (mean,

frequencies and standard deviation) and inferential statistics. This study can provide deep understanding of agricultural entrepreneurial intentions and their relevancy with entrepreneurial education, self-efficacy, social networks and business angel, and mediating effect of risk perception.

The study covers following objectives (1) To investigate the relation between entrepreneurial education, entrepreneurial self-efficacy, opportunity perception, business angel and risk perception with agricultural entrepreneurial intention. (2) To investigate the mediating effect of risk perception between entrepreneurial education, entrepreneurial self-efficacy, opportunity perception, business angel and agricultural entrepreneurial intention.

In this current study hypotheses are accepted and rejected keeping in view the t-values and the p-values as a level of significance. The hypothesis having a t-value that is above the 1.64 that were supported and accepted and the rejected hypothesis are those having a t-value less than 1.64. From SmartPLS 3.0 represents all hypotheses of the initial phase of the study, where H1, H2, H3, H4, H5, are supported and H6, H7 and H12 are not supported.

The aim of this study is to determine the evaluation of agricultural entrepreneurial intentions and their relevancy with entrepreneurial education, entrepreneurial self-efficacy, opportunity perception and business angel, and mediating effect of sustainable entrepreneurship. The research here determined results; Results obtain from primary data support and not support the study hypothesis; this research provide contribution in theoretical and practically.

Limitations

A researcher requires plenty of time and resources to acquire the best findings from such an important investigation. Because this research was done at the student level, there was inadequate time and funds for the investigation. This study was only limited to Southern Punjab, Pakistan. Same respondents are to meet which is not to be done and assumed level is to be taken. Because participation in the study was elective, the sample group's quality and size were determined by the willingness of the target population. The suggestion is that the study's generalizability is compromised in some way.

Suggestions and Future Research

The concept of agricultural entrepreneurial intention is very essential for the welfare of the generations as well as our society and growth of agriculture industry; the study is to be conducted through a rigorous process as longitudinal studies are conducted. Further studies may be conducted to deeply analyse the agricultural competence and their implementation through longitudinal research. And adding a new antecedents of agricultural entrepreneurial intention could be more beneficial for getting better results.

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