



**THE WILLINGNESS ON PURCHASING AN AGRICULTURE
INSURANCE AMONG FRUITS FARMERS IN SELANGOR**

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ABSTRACT

The Willingness On Purchasing an Agriculture Insurance Among Fruits Farmers in Selangor

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Abstract : Agriculture is an economic sector that is exposed to an array of risks such as climate change, pest's attack, disease and others. In its attempt to sustain and protect this sector, the Malaysian government in its budget 2013 has initiated an insurance plan to help farmers reduce losses resulting from natural disasters. The objective of this research is to identify major risks encountered by fruit farmers in Selangor, Malaysia. Besides this research is to evaluate the average price that farmers are willing to take Agriculture Insurance. Moreover, the research wants to examine factors affecting willingness to take Agriculture Insurance by fruits farmers. The data was collected from 160 respondents from fruits farming communities in Selangor by using purposive sampling technique. Questionnaires were used as instruments for data collection. From this research, major risk that faced by fruits farmers is crop diseases. Then for average price, fruits farmers willing to make extra effort to their crop to get a low premium rate. The computer software package SPSS system was used to get the findings for an analysis. These findings showed that perceived price, premium, insurance product knowledge and local insurance judgments are the most affecting factor towards willingness on purchasing an agriculture insurance. The government should take the strategic lead for financial inclusion and insurance for rural and agricultural communities. They should ensure that insurance is included in the national agricultural policy as a part of a broader strategy that creates capacities and incentives for agricultural risk management.

Keywords: Agriculture Insurance, Willingness to purchase, Risk

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CHAPTER 1: INTRODUCTION

1.1 PREAMBLE

Agriculture Insurance is one of the insurance that protects against loss of or damage to crops or livestock. Because of the inherent risks and potential for widespread catastrophic losses associated with agricultural production, insuring farmers and ranchers has always posed a challenge. In addition, due to vast improvements in technology the agriculture insurance has been introduced by insurance industry. The insurance company offering such services visits the farm, inspects the crop and animals as well as the structures. When the evaluation is complete, the farmer gets the quote on which he has to pay the premium. Buying agriculture insurance is an important part of an investment and it gives farmers protection against any misfortune in the future.

Agriculture insurance has a lot of scope to grow and develop. At the moment, only a fraction of farmers in developing countries opt for agriculture insurance because of its irregular pay-outs. New techniques need to be developed so that agriculture insurance becomes a regular business practice. A bad agriculture should just be a normal part of business. It shouldn't be a life threatening event causing mass farmer suicides. Insurance for agriculture involves paying out premiums to the insurance company.

Agriculture insurance covers the financial risk against unforeseen event that farmers are exposed for their tillage. Depending on the policy coverage of such risk include nature disaster, loss of revenue due to decline in the prices of agriculture commodities, fire, insect damage. This issue has its own act follows by all farmers to avoid from case of damage to crops getting higher. The act that implemented in Malaysia for plant and fruit safety was named Plant Quarantine 1976.

1.2 BACKGROUND OF STUDY

This study and research is to analyze the willingness of fruits farmers on apply a agriculture insurance in Selangor. This chapter provides an overview of the research. Chapter one cover the research background, problem statement, research objectives, research questions, operational definition and chapter summary. This agriculture sectors in Malaysia is the one of the main source of income to the country. Hence more than half of farmers in Malaysia didn't take the insurance for cover their crops.

Agriculture insurance is a risk management control, structured to equal out agriculture risks and reduce the consequence of natural disasters, especially to small-scale farmers. The common risks associated with agriculture include natural disasters such as droughts, floods, pests and diseases. Susceptibility of agriculture to these disasters is compounded by the outbreak of epidemics and man-made disasters such as fire, sale of spurious seeds, fertilizers and pesticides, price crashes, scrupulous middlemen, etc. All these events, which are beyond the control of farmers, severely affect production and farm income.

It is one of the concern if huge lost happened to the farmers. This insurance is introduced to minimize the losses that have to face by the farmers. The study shows that farmer's awareness of crop insurance is low. Majority of the farmers were not aware of crop insurance as at the time of the study. The respondents who were aware of crop insurance viewed it as a basic tool for risk mitigation.

Any vertebrate or invertebrate animal (including the eggs of such animal), fungus, bacterium, virus, viroid, mycoplasm like organism and or any other organism which is or is capable of being injurious to plants and includes any dangerous pest. Unfortunately, the coverage given by the sector of private insurance is not enough. Hence, Malaysian farmers are exposed and vulnerable to natural phenomena such as drought, crop diseases, floods, hail and change the climate, pest outbreaks and windstorms (Zuriah and Heizal, 2002).

However, to understand the willingness to purchase agriculture insurance among fruits farmers , research should be carried out. There are several factors impacting farmers towards the readiness of buying agricultural insurance. Researchers have identified 4 factors that affect the willingness to purchase. This will give the impact towards fruits farmers on their willingness to purchase for agricultural insurance.

1.3 RESEARCH PROBLEM

In this global era, technology has become an integral part in our lives. The saying “world is at your fingertips” has become predominant nowadays. Agriculture insurance industry boomed in this country since 1930. Since then, there has been many large insurance company “stepping their foot” in to the agriculture insurance industry. Due to the lack of knowledge about the importance agriculture insurance for their crops, the farmers did not take this as a serious matter.

Malaysia being an economy in transition, poses a different position in crop insurance compared to other developing in this countries. Due to the lack of knowledge about the importance agriculture insurance for their crops, the farmers did not take this as a serious matter. Based on (Asian Pacific Adaptation Network , 2013) , as one of the main reasons farmers did not willing to take this insurance is because of the costs for purchase is expensive. Development of well-functioned insurance tool to protect the poor farmers from agriculture and income risks has become an important issue in developing counties (Clarke, Das, Nicola, & Hill, 2012).

Developing countries with very low catastrophe insurance penetration represent a challenging and under-served market for the private insurance sector. Entrepreneurs are beginning to find ways to provide insurance for the lower end of the market, particularly through micro-insurance products that are made accessible by support from civil society and the public sector. This market is only feasible if premiums are affordable to the poor, which opens an opportunity for negotiators seeking opportunities for helping the most vulnerable adapt to climate.

According to (Joshua Anamsigiya et.al,2019) although similar studies have been carried on agriculture product and its respective the willingness among farmers, however this research is directed mainly and only towards Ghana farmers. This particular research is designed and directed on Ghana farmers and the factors influencing the willingness for the application of an endogenous treatment effect model.

1.4 RESEARCH OBJECTIVES

This purposed of this study are:

- Identify major risks encountered by the fruits farmers in Selangor.
- To evaluate the average price that fruits farmers are willing to take agricultural insurance in Selangor.
- Examine factors affecting willingness to take insurance by fruits farmers.

1.5 RESEARCH QUESTIONS

The main research question in this study are:

- What is the major risk encountered by fruits farmers?
- What is the factors affecting willingness to pay for agriculture insurance among fruits farmers in Selangor.

1.6 SIGNIFICANCE OF STUDY

This research is very helpful for farmers to get a information about the importance and benefits of having agriculture insurance. This research helped the farmers to understand the information about the benefits of willingness to pay for agriculture insurance. This research helped the farmers to understand the information about the coverage in agriculture insurance.

This study provides an insight to researchers on the analysis of willingness towards agriculture insurance. The insurance company can benefit when the respective firm is able to cater. The needs of community and this will induce a higher sales and purchase for agriculture insurance. For the future this research can be used by other institution, insurance companies and public

1.7 LIMITATIONS OF STUDY

The research is focused on the fruits farmers in Selangor Darul Ehsan, which is the large scale of research for the study. The limitation to distribute the questionnaire to fruits farmers in Selangor Furthermore, lacked of time that have been faced by the researcher. It's hard to make an appointment because of our schedule not same as their office hours. However, this study including the fruits farmers in selected area. The selected area that have been chosen are by researcher:

1. Fruits farmer at Selangor Darul Ehsan, Malaysia.

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Due to time frame that given in completing this research is approximately 15 weeks only, it is insufficient for the researcher to conduct the survey with wider coverage. Research is limited in a geographical coverage that only focuses in Selangor Darul Ehsan, Malaysia area. This help is minimized the cost involved in conduct the research.

1.8 CHAPTER SUMMARY

This chapter is about problem statement, objectives and research questions that researchers want to achieve during this research. This also include willingness of apply the agriculture insurance and factors influencing for taking the agriculture insurance among farmers in Selangor Darul Ehsan, Malaysia. Although some studies have examined the willingness, few have linked to others aspects. Insurance instruments are only one of many activities involved in managing risks of natural hazards. Most specifically preferences contributing to the perception of individual perspectives. Understanding the influence of willingness on apply the insurance for allow farmers to taking a better insurance for their crops.

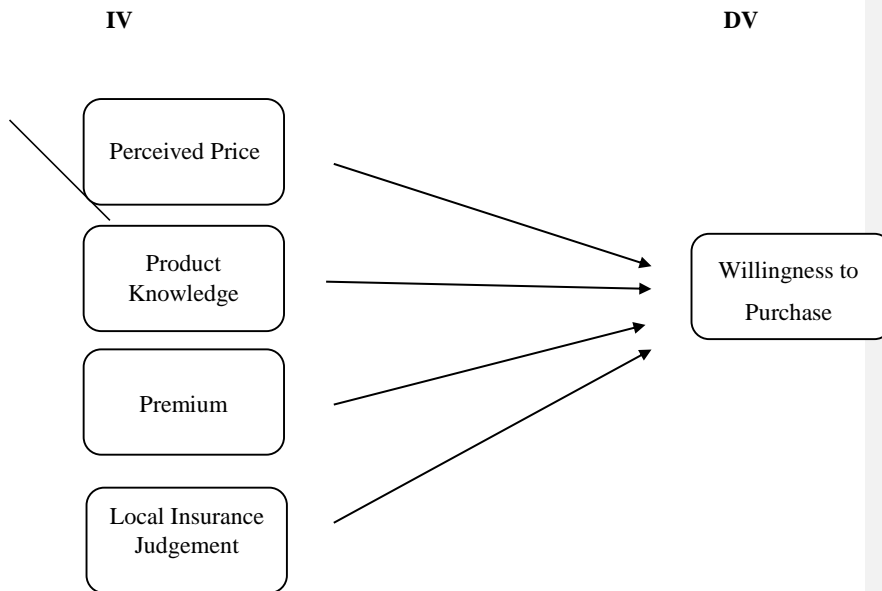
CHAPTER 2: LITERATURE REVIEW

2.1 PREAMBLE

In this chapter, focus on discussion of literature review, conceptual framework and chapter summary. The literature review consists of dependent and independent variable that related to the research topic and research objectives in Chapter One. Following by conceptual framework, formed based on the research objectives and research questions. In this section, researcher explained the nature and directions of the relationship between dependent and independent variable. The last part is chapter summary to summarize the content of this chapter.

2.2 CONCEPTUAL FRAMEWORK

A conceptual framework is used to understand the place of -- and inform the direction of -- a research project. According to (Osadebamwen Anthony Ogbeide, Randy Stringer & Christopher Ford ,2015), this theoretical framework unveils willingness to purchase for the health benefit of organic wine and the factors that influence it. Willingness to pay (WTP) is one method that is commonly used to determine the amount consumers would pay for products or the attributes of the products. Based on the (Laroche et al,2000) noted that WTP for perceived healthy products is growing as there is mounting and convincing evidence supporting consumer pro-organic product behaviour.



2.2.1 PERCEIVED PRICE

Price risk caused by potential volatility in prices and production risk resulting from uncertainty about the levels of production that primary producers can achieve from their current activities. It is likely that these major risks will increase in the future—price risk due to liberalization of trade and production risk caused by the effects of climate change. The trend towards agricultural specialization is likely to continue which will increase these risks as producers rely on the production of a smaller range of crops and consequently cannot diversify risks as effectively. (Intensification: P. f. 2014)

2.2.2 PREMIUM

In all of the aspects in marketing mix, price is the one that create sales profit-all the others are costs. The price of an item is clearly an important determinant of value of sales made. Price is really determined by a discovery of what customers perceive is the value of the item on sale. Premium rate is the financial cost of obtaining an insurance cover. Usually paid as lump sum during the duration of the policy of policyholder. A failure to pay premium will make the policy cancel automatically. (Wenner and Arias.,2003)

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2.2.3 PRODUCT KNOWLEDGE

Product knowledge is an essential sales skill. Understanding products' features allows to present the benefits accurately and persuasively. Customers respond to enthusiastic sales staff who are passionate about the products and eager to share the benefits with them. According to (Shu-Hsien Liao et.al,2009), demand chain management focuses not only on generating growing power from customers to purchase merchandises on the supply chain; but also on exploring satisfaction, participation and involvement from customers in order for enterprises to understand customer needs and wants. According to (Elizabeth Cowley & Andrew A Mitchell, 2003), lower knowledge consumers tend to learn only the brand information that is appropriate for a usage situation at encoding and do not organize brands by subcategory in memory. Alternatively, higher knowledge consumers learn brand information appropriate for different usage situations and organize this information by product subcategories.

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2.2.4 LOCAL INSURANCE JUDGEMENT

Local Insurance judgments are people view of insurance. The other feature is that on the very low-probability events, which is where insurance is most valuable, people say is not going to happen to them. It means, they don't have to worry about it and they can protect their self. Insurance is a way of managing risks. When they can buy insurance, will be transfer the cost of a potential loss to the insurance company in

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exchange for a fee, known as the premium. Insurance companies invest the funds securely that can grow and pay out the claim. Not only that, it's include the person who run a small business or family farm by managing the risks of its self. Not only that the owner, business and employee coverage are provided for group benefits and retirement plans for employees. (Hualin Xie 1, 2019)

2.3 LITERATURE REVIEW

2.3.1 PERCEIVED PRICE

According to (Boyd et al. 2011) showed that in their study, the amount of risk taken on by farmer show a positive relationship with the attitude to purchase crop insurance. The positive coefficient shows that as farmers take on more risk, they are more likely to purchase crop insurance. This measures how much risk the farmers facing while taking care of their crops. In addition to this, previous risk record of the farm that can influence the purchase of crop insurance.

Innovations in risk transfer for natural disasters in lower-income countries such as weather index insurance products, can be used to shift various weather-related risks. The financial and technological innovations in the insurance market provide an alternative for dealing with agricultural risk, especially in relation to climate change (Itturioz, 2009).

The experience from high-income countries such as Europe, USA, and other developed countries, agriculture is well developed through innovation and technologies and it's more of commercial agriculture. A well established agricultural insurance market guarantees produce on production and price related risk. (Wenner and Arias, 2003)

2.3.2 PREMIUM

Policyholder pays a contribution to a fund in the form of a premium, commensurate with the risk he or she introduces. The insurer uses these funds to pay the losses (indemnities), suffered by any insured.

Study shows that the price (premium) of the crop insurance is the most influential factor that determines the farmers' decision to avail insurance or not. (Ginder and Spaulding, 2006)

Europe & USA countries, the government provides subsidies on premium to farmers and some operational subsidies to private insurers to cover some of the administrative costs associated with agricultural insurance contract. (Wenner and Arias.,2003)

Aidoo et al. (2014) analyzed the willingness of farmers to participate in crop insurance program and the factors which influence the decision to pay the amount of premium for crop insurance program. The findings revealed that age of the farmers, land tenure system under practice and the educational level of the farmers were the major factors which influence the willingness to participate, Moreover education, amount of savings, on-farm income, land tenure and the farm size were the factors that determine the amount of premium which farmers were willing to pay for crop insurance program.

2.3.3 PRODUCT KNOWLEDGE

According to (Ray ,2001), crop insurance can cushion the shock of disastrous crop losses in bad year and help to ensure a considerable measure of security in farm income over the years. Agricultural insurance looks into how risks and uncertainties can be effectively managed to the advantage of the farmers in the present and also in the future. This can help in stabilizing agriculture and in turn the economy at large. Agricultural insurance is therefore a necessary part of the institutional infrastructure essential for the development of agriculture, which is mainly a high risk enterprise.

All these factors lead towards decline in agriculture production and farm income which is crucial to the livelihood of poor farmers in Pakistan as agriculture sector is dominated by small farmers who constitute about 90% of the total farmers. So in this situation, agriculture insurance could be best for poor farmers to deal with the climate and production volatility as it is economically viable, cost reducing and risk sharing institutional mechanism which helps the risk averse farmers to go towards high risk and high profit activities and facilitate them with post-disaster liquidity which secures their livelihood and speed up the recovery process. (Government of Pakistan, 2010)

2.3.4 LOCAL INSURANCE JUDGEMENT

The financial and technological innovations in the insurance market provide an alternative for dealing with agricultural risk, especially in relation to climate change. Risk is unavoidable, but a manageable element in the agricultural production and marketing businesses. (Iturrioz, 2009)

Livestock, fisheries, and forestry, agricultural insurance essentially geared to covering losses from adverse weather events, which is beyond farmers' control. In many parts of the developing world, the agricultural insurance market for catastrophic risk has grown considerably. (Power,2008)

The development of insurance market can help the rural poor against any specific shock. Producers, adoption of innovative agricultural insurance enables them to better deal with bad events when they occur. This is essential to improving their livelihood in the short-run and their opportunities in the long-run in the use of new agricultural technologies. (Hill, 2010)

According to (Iturrioz, 2009;Wenner and Arias, 2003), a well-established agricultural insurance market guarantees produce on production and price related risk. In these countries, the government provides subsidies on premium to farmers and some operational subsidies to private insurers to cover some of the administrative costs associated with agricultural insurance contract.

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2.3.5 WILLINGNESS TO PAY

To identified the factors which affect the willingness to pay for crop insurance in the rain-fed areas, Soon Valley and Talagang situated in Pakistan and found out that the willingness to pay is mainly affected by household assets, economic status and membership of community organization. (Akhter Ali,2013)

The government and insurance companies must understand the needs of farmers that effect their willingness to participate and willingness to pay for crop insurance. Because this awareness of demand would facilitate the policy makers to the structure the insurance policies according to the needs of people. (Barnett, B.J. & Mahul, O, 2007)

The trend around the world is to promote and subsidize agricultural insurance as the common practice for optimal risk management. In theory, the difference between farmers willingness to pay (WTP) for insurance and the actuarially fair premium needs to be calculated and then financed by the state. (Juanchang & Jiyu 2010; Herbold 2010)

2.4 CHAPTER SUMMARY

In conclusion, researchers have explained about the concept that are related to this research. Researchers have stated some past research findings that related the variables that influence Willingness to Purchase Agriculture Insurance among Community of Farmers in Selangor .

CHAPTER 3: RESEARCH METHODOLOGY

3.1 INTRODUCTION

This chapter focus on the research methodology. Methodology here refers to the various method and technics used when this research is carried out. This chapter discuss and highlight on the methodology which is used to analyse the data collected, how the research is carried out. In this chapter, proper research procedure is indeed followed. This chapter encompasses several sub-sections such as research design, population and samples, questionnaire, pilot test, reliability and validity and chapter summary. To complete this research, the most suitable research design has been used in order to ensure reliability and validity of the given information. In research the method research plays an important role. It covers the research design, sampling techniques, instruments, research procedure and data analysis. It is because, those who did not use the right method, would not be able to collect or analyse the data perfectly.

3.2 RESEARCH DESIGN

This research design was start with collecting the literature review from the past research. The literature review was based on the term that the researcher used in this research. To complete this research, there are two methods being used to getting the information or data.

The survey that the researcher used is distributed the questionnaires to the farmers. The respondents were from community of farmers in Selangor Darul Ehsan. The researcher used the SPSS system to analyse data that have been collected from the respondent. The final results were in percentage and mean according to the SPSS system. There were two method used for data collected, which is primary and secondary data.

3.3 DATA COLLECTION METHOD

Primary data is data that is collected by a researcher from first-hand sources, using methods like surveys, interviews, or experiments. It is collected with the research project in mind, directly from primary sources.

This questionnaire will be distribute over 160 copies through hands over and distribute survey form randomly to completed by fruits farmers of Selangor. This method will ease us in the final stage of data coding, data analysis and data interpretation by making the process simply and simple. This kind of data collection method that chosen to be used because of reliability, simple, direct response, east to achieve and using multiple choice questions can reduce the possibility of uncertainty in results .

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3.4 POPULATION AND SAMPLES

The population and the samples were the farmers from all around the Selangor. The population was selected because the researchers are students from Polytechnic Sultan Salahuddin Abdul Aziz Shah, Shah Alam Selangor. To obtain the cooperation of all parties that will be involved, it is an important factor in data collection process. The number of respondents will be the sample for the study are determine by using Krejcie and Morgan (1970). There were 160 respondents that involved in this study. Based In figure 3.1.

N	S	N	S	N	S	N	S	N	S
10	10	100	80	280	162	800	260	2800	338
15	14	110	86	290	165	850	265	3000	341
20	19	120	92	300	169	900	269	3500	346
25	24	130	97	320	175	950	274	4000	351
30	28	140	103	340	181	1000	278	4500	354
35	32	150	108	360	186	1100	285	5000	357
40	36	160	113	380	191	1200	291	6000	361
45	40	170	118	400	196	1300	297	7000	364
50	44	180	123	420	201	1400	302	8000	367
55	48	190	127	440	205	1500	306	9000	368
60	52	200	132	460	210	1600	310	10000	370
65	56	210	136	480	214	1700	313	15000	375
70	59	220	140	500	217	1800	317	20000	377
75	63	230	144	550	226	1900	320	30000	379
80	66	240	148	600	234	2000	322	40000	380
85	70	250	152	650	242	2200	327	50000	381
90	73	260	155	700	248	2400	331	75000	382
95	76	270	159	750	254	2600	335	1000000	384

Note: N is Population Size; S is Sample Size
Source: Krejcie & Morgan, 1970

3.5 SAMPLING METHOD

Purposive sampling is a sampling technique in which researcher relies on his or her own judgment when choosing members of population to participate in the study. A purposive sample also is a non-probability sample that is selected based on characteristics of a population and the objective of the study. This sampling method may prove to be effective when only limited numbers of people can serve as primary data sources due to the nature of research design and aims and objectives

3.6 RESEARCH INSTRUMENT

Questionnaire was used to gather data from the respondents. This part will discuss on how to create questionnaire. The questionnaires are divided into five parts, which are Section

SECTION	CONSTRUCTS	QUESTIONS	SOURCES
A	DEMOGRAPHIC	1. Gender	
		2. Age	
		3. Marital status	
		4. Race	
		5. Salary range	
B	WILLINGNESS TO PURCHASE	1. I prefer to buy agriculture insurance	
		2. I would consider purchase agriculture insurance in the future.	

		<p>3. I would consider to recommend my friends with agriculture insurance</p> <p>4. It makes me desire to buy agriculture insurance after reading online review or comment</p> <p>5. I intend to try agriculture insurance discussed in the online review or comment</p>	<p>Liew Yean Sien (2015)</p>
C	PERCEIVED PRICE	<p>1. Price is an important criterion when I purchase a agriculture insurance</p> <p>2. I am more likely to buy agriculture insurance that are on offer.</p> <p>3. I compare prices of agriculture insurance product with other competing insurance before I make a purchase.</p>	<p>PANG SUK MIN (2015).</p>

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		<p>4. Agriculture insurance are reasonably priced compared to other insurance.</p>	
		<p>5. Overall, I purchase agriculture insurance because they are in reasonable price.</p>	
D	PREMIUM	<p>1. Agriculture insurance premium is affordable.</p>	Liew Yean Sien (2015)
		<p>2. Agriculture insurance premium worth with the coverage.</p>	
		<p>3. I look for more description product available when purchase agriculture insurance.</p>	

		4. I tend to buy the lowest premium offered that will fit my needs.	
		5. I am willing to make extra effort to fund a low premium rate for agriculture insurance.	
E	INSURANCE PRODUCT KNOWLEDGE	1. I know about agriculture insurance	Nomadic Matt (2019).
		2. I know the importance of having agriculture insurance	
		3. I know the scope of coverage in agriculture insurance.	
		4. I can cover if my crop is damage.	
		5. I know the process of claim for agriculture insurance	

F.	LOCAL INSURANCE JUDGEMENT	1. Agriculture insurance are carefully manage.	Ulvi Cenap Topçu (2015).
		1. Agriculture insurance are usually quite reliable and reasonable.	
		2. Agriculture insurance products are usually a good value for the money.	
		3. Agriculture insurance should go for compulsory long term protection.	
		4. Agriculture insurance show a very clever use of coverage and claim process	

3.7 DATA ANALYSIS METHOD

Descriptive analysis refers to the information of raw data into form that will make researchers easy to understand and interpret. Descriptive statistic provided by frequencies. Frequencies is procedure that provides statistical and graphical displays which are useful in presenting many types of variables. The purpose of frequencies is to demonstrate the values such as the numbers and percentages for different categories of a single categorical variable. (Zikmund, 2003).

3.8 RELIABILITY ANALYSIS

Reliability analysis is determined by obtaining the proportion of systematic variation in a scale, which can be done by determining the association between the scores obtained from different administrations of the scale. Thus, if the association in reliability analysis is high, the scale yields consistent results and is therefore reliable.

Reliability Statistic

Table 3.1: Reliability Statistic

Reliability Statistics	
Cronbach's Alpha	N of Items
.905	29

3.9 RELIABILITY TEST

Table 4.3 Reliability Statistic for Actual Research

Variable	Cronbach's Alpha
Perceived Price	0.758
Premium	
Insurance Product Knowledge	
Local Insurance Judgement	

As stated in table 4.3 above, all Cronbach's Alphas were more than 0.6. According to the rules of Thumb for Cronbach's Alpha, the strength of association is considered poor when the Alpha Coefficient range is less than 0.6.

Strength of association is moderate when the Alpha Coefficient is range from 0.6 to 0.69 and the range from 0.7 to 0.79 is considered good strength of association. Furthermore, 0.8 to 0.89 will be in very good strength of association. Lastly, if the Alpha Coefficient range is more than or equal to 0.9, that represented excellent strength of association.

From the table 4.3, the reliability statistics of perceived price, premium, insurance product knowledge and local insurance judgement shown good strength of association.

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3.10 PILOT TEST

Before the questionnaire is distributed to the actual respondents, the pilot study is done to estimate the quality level of the questionnaires. The researchers have distributed 30 questionnaires to the respondents which is the farmers in Selangor, Malaysia, the pilot study was held on week 6, after the proposal defend is finished and the topic is already being confirmed by the evaluator. The purpose of pilot study is:

- i) To identify that the farmers can understand the question well.
- ii) To analyse whether the question is related with the correspondents.
- iii) To identify whether the objective of research will be achieving through questionnaires.

3.11 CHAPTER SUMMARY

In conclusion, the researcher has explained about the research design that has been use in this research. The researcher stated that this research is use questionnaires as the instrument. This SPSS system and the researcher can run with the further research.

Commented [sh10]: Abis dh? Mana data analysis method?

CHAPTER 4: DATA ANALYSIS AND FINDINGS

4.0 INTRODUCTION

After all the questionnaire had been collected from the research sample, the next process is to get the information from the various aspects of the respondents involved. The researcher has been collected 152 questionnaires and all the information will be presented by table and pie chart. The finding was made based on the section in the questionnaires. In conclusion, finding and analysis the data is important to obtain the result that has been collected by the researcher.

4.1 **DEMOGRAPHIC PROFILE**

This researcher divided into some section, Section A is demographic, B is dependent variable of willingness on purchasing agriculture and section C is independent variable of willingness on purchasing agriculture insurance among fruit farmers in Selangor. The finding was made based on the section in the questionnaires to make data analysis

This researcher also has distributed 160 sets of survey questionnaires to the respondent. There are 8 sets of questionnaire being fault replied, blank and missing by respondent. However, researchers using the remaining 152 sets of survey questionnaire to make data analysis.

Commented [sh11]: Utk demographic, kita x guna descriptive analysis. Descriptive ni include mean, varians, standard deviation etc.

Table 4.1 Table of content based on demographic profile

DEMOGRAPHIC	FREQUENCY	PERCENTAGE (%)
Gender		
• Male	97	63.8
• Female	55	36.2
Age		
• 24 – 30 years' old	34	22.4
• 31 – 40 years' old	52	40.8
• 41 – 50 years' old	35	23.0
• 50 years old and above	21	13.8
Marital status		
• Single	54	35.5
• Married	98	64.5
• Divorced	-	-
• Widow	-	-
Race		
• Malay	75	49.3
• Chinese	77	50.7
• Indian	-	-
• Others	-	-
Salary range		
• Below RM5000	94	61.8
• RM5100 – RM10000	37	24.3
• RM10100 – RM20000	-	-
• RM20100 and above	21	13.8

Table 4.1 present the demographic profile of the respondents. There is a total of 152 respondents are participated in the survey. Since, this research studies about willingness on purchasing agriculture insurance among fruits farmers in Selangor. Based on the result, respondents are 97 male respondents that are 63.8% and 55 female respondents that are 36.2% of the total respondents.

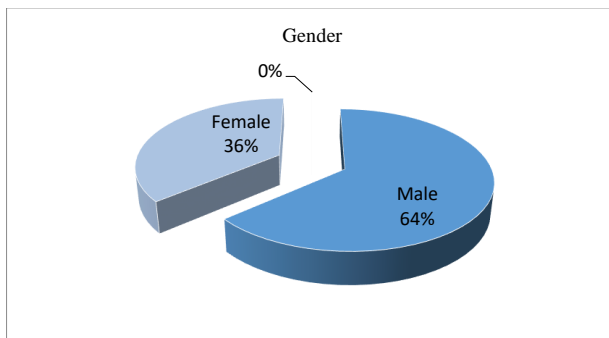
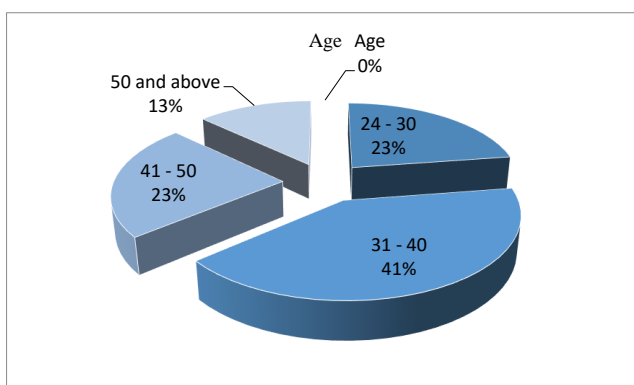
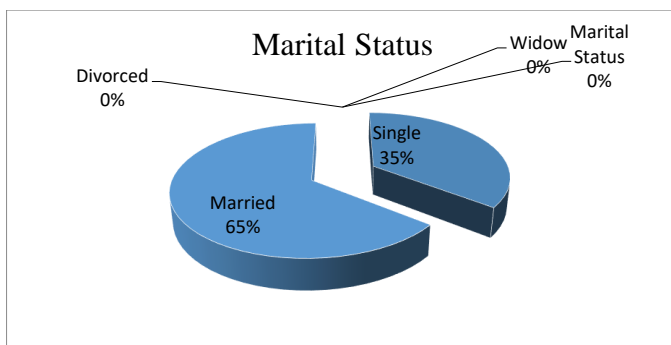


Table 4.1 Demographic

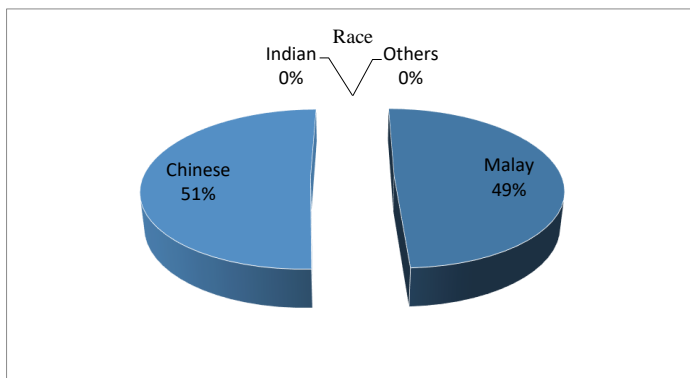
Next, respondents' age group is categorized under four different groups. The first group is from age of 24 to age 30, which are 34 respondents or 2.24% of the total respondents. The next category is between the age of 31 to age 40, which are total of 62 respondents or 40.8%. While the next group is from age of 41 to age 50, which are total of 35 respondents or 23.0%. The last group age is from ages of 50 and above, which are total of 21 respondents or 13.8%.



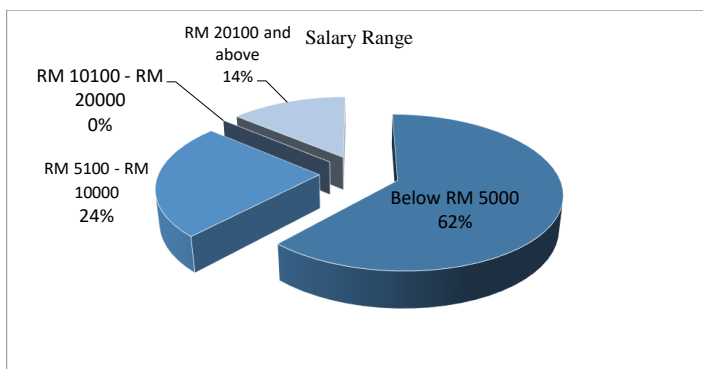
Thirdly, the respondents' current marital status is categorized into four different statuses that are single, married, divorced and widow. Out of the total sample of 152, 54 respondents or 35.5% of the total respondents are single. While respondents who fall into the "Married" category are 64.5% of the total is 98 respondents. Then for divorced and widow is nil.



Furthermore, respondents' race is categorized under four different groups. The first group is Malay, which are respondents with 75 respondents or 49.3% of the total respondents. The next category is Chinese, which a total of 77 numbers of respondent or 50.7%. The third and fourth category is Indian and Others which is nil.



Lastly, the majority of the respondents who answered the survey with a salary range of below RM5000 are 94 respondents or 61.8%. While the second highest is RM5100 to RM10000 which is 37 respondents or 24.3%. The third category with 21 respondents or 13.8% are which consists of RM20100 and above. Lastly, Rm10100 to RM20000 is nil.



4.2 CENTRAL TENDENCIES MEASUREMENT OF CONTRAST

Table 4.2 Table of content based on descriptive analysis of each construct

CONSTRUCT	MEAN	STD.DV
Willingness to Purchase		
WTP1: I prefer to buy agriculture insurance	2.07	0.862
WTP2: I would consider purchase agriculture insurance in the future	1.71	0.697
WTP3: I would consider to recommend my friends with agriculture insurance	2.09	1.082
WTP4: It makes me desire to buy agriculture insurance after reading online review or comment	2.35	0.937
WTP5: I intend to buy agriculture insurance discussed in the online review or comment	2.67	1.114
Overall Willingness to Purchase	2.1789	0.74874
Perceived Price		
PP1: Price is an important criterion when I purchase a agriculture insurance	1.45	0.699
PP2: I am more likely to buy agriculture insurance that are on offer	1.60	0.871
PP3: I compare prices of agriculture insurance product with other competing insurance before I make a purchase	1.82	0.917
PP4: Agriculture insurance are reasonably priced compared to other insurance	3.25	0.816
PP5: Overall, I purchase agriculture insurance because they are in reasonable price.	3.38	0.935
Overall Perceived Price	2.3000	0.62699

Premium		
PR1: Agriculture insurance premium is affordable	3.36	0.979
PR2: Agriculture insurance premium worth with the coverage	2.75	0.992
PR3: I look for more description product available when purchase agriculture insurance	2.44	0.988
PR4: I tend to buy the lowest premium offered that will fit my needs	1.64	0.768
PR5: I am willing to make extra effort to fund a low premium rate for Agriculture insurance	2.03	0.763
Overall Premium	2.4421	0.55559
Insurance Product Knowledge		
IPK1: I know about agriculture insurance	2.36	1.124
IPK2: I know the importance of having agriculture insurance	3.00	1.110
IPK3: I know the scope of coverage in agriculture insurance	3.07	1.134
IPK4: I can be cover if my crops is damage	3.09	0.956
IPK5: I know the process of claim for agriculture insurance	2.72	1.051
Overall Insurance Product Knowledge	2.8461	0.72440
Local Insurance Judgement		
LIJ1: Agriculture insurance are carefully manage	2.43	0.706
LIJ2: Agriculture insurance are usually quite reliable and reasonable	2.14	0.655
LIJ3: Agriculture insurance products are usually a good value for the money	2.25	0.791
LIJ4: Agriculture insurance should go for compulsory long term protection	2.37	0.734
LIJ5: Agriculture insurance show a very clever use of coverage and claim process	2.19	0.648
Overall Local Insurance Judgement	2.2763	0.35654

The table 4.2 above shows descriptive statistics on willingness to purchase, perceived price, premium, insurance product knowledge and local insurance judgement. From the result above, willingness to purchase is dependent variable of the research with mean of 2.1789, meanwhile perceived price, premium, insurance product knowledge and local insurance judgement are independent variables. Result of the sample shown insurance product knowledge has the highest mean among the other variables with 2.8461. Followed by premium which is 2.4421. The local insurance judgement has the lowest Mean in the 4 variables which is 2.2763. This indicated most respondents agreed that the insurance product knowledge play a significant role in affecting their willingness on purchase agriculture insurance. In contrast, local insurance judgement is least important factor in influencing among fruits farmers on purchasing agriculture insurance.

Commented [sh12]: What does those calculated mean means?

The standard deviation for insurance product knowledge was the highest among the other factors, which is 0.72440. Next, the standard deviation for perceived price and premium are 0.62699 and 0.55559 respectively. The local insurance judgement has the lowest standard deviation which is 0.35654. This indicates that the values in the data collected from the respondents are close and similar to each other.

Commented [sh13]: 1st time sy baca org interpret SD gini. Gelak jap. Hahaha... baiki balik!

4.3 INFERENCE ANALYSIS

4.3.1 PEARSON CORRELATION ANALYSIS

Table 4.4 Correlations

		Correlations				
		MEAN WTP	MEANPP	MEANPR	MEANIPK	MEANLIJ
MEAN WTP	Pearson Correlation	1	.179**	.392**	.076	.530**
	Sig. (2-tailed)		.027	.000	.352	.000
	N	152	152	152	152	152
MEAN PP	Pearson Correlation	.179**	1	.765**	.229**	.321**
	Sig. (2-tailed)	.027		.000	.005	.000
	N	152	152	152	152	152
MEAN PR	Pearson Correlation	.392**	.765**	1	.242**	.270**
	Sig. (2-tailed)	.000	.000		.003	.001
	N	152	152	152	152	152
MEAN IPK	Pearson Correlation	.076	.229**	.242**	1	.062
	Sig.(2-tailed)	.352	.005	.003		.446
	N	152	152	152	152	152
MEAN LIJ	Pearson Correlation	-.530**	.321**	.270**	.062	1
	Sig. (2-tailed)	.000	.000	.001	.446	
	N	152	152	152	152	152
*. Correlation is significant at the 0.05 level (2-tailed).						
**. Correlation is significant at the 0.01 level (2-tailed).						

Table 4.4 shows the result of Pearson correlation between the independent variables perceived price, premium, insurance product knowledge, local insurance judgement and dependent variable willingness on purchasing an agriculture insurance among fruits farmers in Selangor. The Pearson correlation among independent variable is below 0.900 and between 0.530 and 0.765.

The table shows perceived price and willingness to purchase of the willingness on purchasing agriculture insurance among fruits farmers in Selangor are positive relationship. The result in table shows p-value equal to 0.000 while less than alpha 0.05. Furthermore, the correlation coefficient value is 0.179, this shows the perceived price is influence willingness to purchase of agriculture insurance among fruits farmers in Selangor.

The table shows premium and willingness to purchase of agriculture insurance among fruits farmers in Selangor are positive relationship. The result in table shows p-value equal to 0.000 while less than alpha 0.05. Furthermore, the correlation coefficient value is 0.392, this shows the premium can influence willingness to purchase of agriculture insurance among fruits farmers in Selangor.

The table shows insurance product knowledge and willingness to pay of agriculture insurance among fruits farmers in Selangor are positive relationship. The result in table shows p-value equal to 0.000 while less than alpha 0.05. Moreover, the correlation coefficient value is 0.076, this shows the premium moderately influence willingness to pay of agriculture insurance among fruits farmers in Selangor.

The table shows local insurance judgment and willingness to pay of agriculture insurance among fruits farmers in Selangor are positive relationship. The result in table shows p-value equal to 0.000 while less than alpha 0.05. Moreover, the correlation coefficient value is 0.530, this shows the premium moderately influence willingness to pay of agriculture insurance among fruits farmers in Selangor.

4.4 MULTIPLE REGRESSIONS

Table 4.5 Model Summary

Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of Estimate
1	.653	.426	.411	.57476

According to Table 4.5, the R value = 0.653, R Square = 0.426 and Adjusted R Square = 0.411. R² shows that 42.6 percent of the willingness to purchase can be explained by perceived price, premium, insurance product knowledge and local insurance judgment. This also indicates that the relationship between the dependent variable and independent variables are moderate. However, there are 57.4 percent of the variation in willingness to purchase is explain by other factors. Therefore, the researcher can conclude that the relation is moderate.

Table 4.6 ANOVA^a

Anova						
Model		Sum of squares	df	Mean square	F	Sig.
1	Regression	36.092	4	9.023	27.313	.000
	Residual	48.561	147	.330		
	Total	84.563	151			

The table 4.6 above presented the significant value is at 0.000 ($p < 0.05$). Therefore, the null hypothesis is rejected and the alternative hypothesis is accepted. The 4 independent variables are significantly contributing to the willingness on purchasing agriculture insurance among fruits farmers.

Table 4.7 Coefficients

Coefficients						
Model		Unstandardized coefficients		Standardized coefficients	t	Sig.
		B.	Standard Error	Beta		
1	(constant)	3.794	.441		8.601	.000
	MEANPP	-.527	.118	-.441	-4.451	.000
	MEANPR	.770	.132	.571	5.846	.000
	MEANIPK	.074	.067	.071	1.092	.227
	MEANLIJ	-1.095	.140	-.571	-7.807	.000

From Table 4.7, coefficients show the higher beta the most important factors of influence willingness to purchase agriculture insurance among fruits farmers, the result shows premium is the most important factors that influence willingness to purchase because of carries beta of 0.571. While, insurance product knowledge is the second highest factors that influence willingness to purchase among fruits farmers with the beta of 0.071. Yet, perceived price and local insurance judgement are the least of factors that influence willingness to purchase which having beta of -0.441 and -0.571. The result of table 4.7 coefficient shows the importance of willingness to purchase agriculture insurance among fruits farmers is accordingly with premium, insurance product knowledge, perceived price and local insurance judgment.

The multiple regression equation can be formed as below:

$$C = A + PRX1 + IPK2X2 + PP3X3 + LIJ4X4$$

Whereas:

C = Willingness to purchase among fruits farmers

A = as constant, Value of Y when X become zero

X1 = Dimension of willingness to purchase

PR1 = Premium

IPK2 = Insurance Product Knowledge

PP3 = Perceived Price

LIJ4 = Local Insurance Judgement

Therefore, the multiple regression equation can be formed as:

$$C = 3.794 - 0.770X1 + 0.074X2 + (-0.527) X3 + (-1.095) X4$$

4.4.1 TEST OF SIGNIFICANT

Hypothesis I

H0: Premium has no relationship towards fruit farmers' willingness to purchase agriculture insurance.

H1: Premium has positively relationship towards fruit farmers' willingness to purchase agriculture insurance.

Based on Table 4.7, the premium ($p = 0.000$) p-value is lower than significant level of 0.05. Therefore, since the p-value is lower than 0.05, H0 is rejected and H1 is accepted. In this case, Premium has significant relationship towards fruit farmers' willingness to purchase agriculture insurance.

Hypothesis II

H0: Insurance product knowledge has no relationship towards fruit farmers' willingness to purchase agriculture insurance.

H1: Insurance product knowledge has positively relationship towards fruit farmers' willingness to purchase agriculture insurance.

Based on Table 4.7, the insurance product knowledge ($p = 0.000$) p-value is lower than significant level of 0.05. Therefore, since the p-value is lower than 0.05, H0 is rejected and H1 is accepted. In this case, insurance product knowledge has significant relationship towards fruit farmers' willingness to purchase agriculture insurance.

Hypothesis III

H0: Perceived price has no relationship towards fruit farmers' willingness to purchase agriculture insurance.

H1: Perceived price has positively relationship towards fruit farmers' willingness to purchase agriculture insurance.

Based on Table 4.7, the perceived price ($p = 0.000$) p-value is lower than significant level of 0.05. Therefore, since the p-value is lower than 0.05, H0 is rejected and H1 is accepted. In this case, perceived price has significant relationship towards fruit farmers' willingness to purchase agriculture insurance.

Hypothesis IV

H0: Local insurance judgement has no relationship towards fruit farmers' willingness to purchase agriculture insurance.

H1: Local insurance judgement has positively relationship towards fruit farmers' willingness to purchase agriculture insurance.

Based on Table 4.7, the local insurance judgement ($p = 0.000$) p-value is lower than significant level of 0.05. Therefore, since the p-value is lower than 0.05, H_0 is rejected and H_1 is accepted. In this case, local insurance judgement has significant relationship towards fruit farmers' willingness to purchase agriculture insurance.

4.5 CONCLUSION

In conclusion, different analysis methods have been used in order to analyse the different types of data obtained. Firstly, descriptive analysis has been used for interpreting data on respondent's general information. The general information where descriptive analysis method has been used includes respondent's gender, age, marital status, race, salary range, occupation and department. On the other hand, reliability analysis has been used in order to test the reliability of the four independent variables. The data collected are tested for their measure of central tendency. From the analysis, trust has emerged as the most prominent variable. Besides that, data has been analysed using the Pearson Correlation Coefficient, which is an indicator of the strength of degree of association among the variables. The Multiple Regression is a statistical measure on the degree of relationship between the independent variables with the dependent variable. In a nutshell, all the analysis has proven that all the independent variables have significance on the willingness on purchasing agriculture insurance among fruits farmers.

CHAPTER 5: CONCLUSIONS AND RECOMMENDATIONS

5.0 INTRODUCTION

This chapter reviews the summary of statistical analysis in the past chapter, discussion of major findings, managerial implications of study, limitation of study and recommendation for future research. Furthermore, conclusion was made for the whole chapter in this research project.

5.1 SUMMARY OF STATISTICAL ANALYSIS

5.1.1 DESCRIPTIVE ANALYSIS

Among the 160 questionnaire that distributed randomly to the Farmers in Selangor areas, there are 8 questionnaires are fault replied due to the ambiguity or incomplete in their answering, so the total sample size is 152. In the 152 sets collected questionnaire, all the respondents are farmers because this research is study on Willingness on purchasing an agriculture insurance among fruits Farmers.

This research is generally study on Farmers willingness to purchase, so the age group is categories into four ranges. The first range is from 24 – 30 years old, most of the respondents that fall under these categories are 12 people because we conduct in the farm area. There are 42 of our respondents are from the age group of 31 – 40 years old, 78 of our respondents are from the age group of 41 – 50 years old, 20 of our respondents are from the age group of 51 years old and above and this categories of people are mostly an adult.

From the result that collected, most of the respondents are farmers because the research is study of willingness to purchase and most of the community in Selangor that plant the crops are fruits famers.

5.1.2 SUMMARY OF SCALE MEASUREMENT

In this research, each variable was tested using Cronbach's Alpha for the reliability. According to the Table 4.3 shown in Chapter 4, perceived price, premium, insurance product knowledge and local insurance judgment has been tested used Cronbach's Alpha. From the result, show that all variables has shown its value to be more than 0.6 which is 0.758.

5.1.3 INFERENTIAL ANALYSIS: PEARSON CORRELATION ANALYSIS

From the result of Pearson correlation analysis, the correlation between willingness to purchase and perceived price is 0.179, premium was 0.392, insurance product knowledge was 0.076 and local insurance judgment is 0.530. The results show all the independent variables perceived price, premium, insurance product knowledge and local insurance judgment have the positive significant relationship but moderately influence the willingness to purchase of agriculture insurance among fruits farmers in Selangor.

5.1.4 MULTIPLE REGRESSION

Multiple regression analysis is to test the relationship between the independent variable perceived price, premium, insurance product knowledge and local insurance judgment has the significant positive relationship with dependent variable willingness to purchase of agriculture insurance among fruits farmers in Selangor. Adjusted r square is 0.411, which can indicate the moderate relationship of independent variables perceived price, premium, insurance product knowledge and local insurance judgment is only 41.1% with dependent variable willingness to purchase. Besides that, the model is describing good for the four independent variables and dependent variable which shows F value is 27.313 which significant at the level of 0.000.

Multiple regression equation:

$$C = 3.794 - 0.770X_1 + 0.074X_2 + (-0.527) X_3 + (-1.095) X_4$$

Whereas:

C = Willingness to purchase among fruits farmers

A = as constant, Value of Y when X become zero

X1 = Dimension of willingness to purchase

P1 = Premium

IPK2 = Insurance Product Knowledge

PP3 = Perceived Price

LJ4 = Local Insurance Judgement

5.1.5 DISCUSSION OF MAJOR FINDINGS

Hypothesis	Significant	Conclusion
<p>H0: Premium has no relationship towards fruit farmers' willingness to purchase agriculture insurance.</p> <p>H1: Premium has positively relationship towards fruit farmers' willingness to purchase agriculture insurance.</p>	<p>B = 0.770 p = 0.000 < 0.05</p>	<p>H0 is rejected, H1 is accepted</p>
<p>H0: Insurance product knowledge has no relationship towards fruit farmers' willingness to purchase agriculture insurance.</p> <p>H1: Insurance product knowledge has positively relationship towards fruit</p>	<p>B = 0.074 p = 0.227 < 0.05</p>	<p>H0 is rejected, H1 is accepted</p>

farmers' willingness to purchase agriculture insurance.		
<p>H0: Perceived price has no relationship towards fruit farmers' willingness to purchase agriculture insurance.</p> <p>H1: Perceived price has positively relationship towards fruit farmers' willingness to purchase agriculture insurance</p>	<p>B = - 0.527 p = 0.000 < 0.05</p>	<p>H0 is rejected, H1 is accepted</p>
<p>H0: Local insurance judgement has no relationship towards fruit farmers' willingness to purchase agriculture insurance.</p> <p>H1: Local insurance judgement has positively relationship towards fruit farmers' willingness to purchase agriculture insurance.</p>	<p>B = - 1.095 p = 0.000 < 0.05</p>	<p>H0 is rejected, H1 is accepted</p>

5.2 IMPLICATIONS OF THE STUDY

Based on the analysis and the discussion in the previous chapter, it is clear to us that the premium has an impact on the community willingness to purchase. The premium of agriculture insurance has a direct influence on the willingness to pay among farmers. From the survey done and the results obtained, a high percentage of farmers agreed that willingness to participate and pay for agriculture insurance. Findings show that farmers were interested to pay minimum amount of premium to purchase for agriculture insurance. This strong perceived positive premium of the agriculture insurance sites has induced willingness to purchase. This is also likely to induce more people to willing and purchase agriculture insurance. According to Ginder & Spaulding (2006) shows that the price (premium) of the crop insurance is the most influential factor that determines the farmers' decision to avail insurance or not. It is especially needed in the case of willingness among fruits farmers to purchase agriculture insurance.

Besides that, perceived price is also one of the major factors influence fruits farmers willing to purchase towards agriculture insurance. A potential volatility in prices and production risk resulting from uncertainty about the levels of production that primary producers can achieve from their current activities. Aidoo et al. (2014) analyzed the willingness of farmers to participate in crop insurance program and the factors which influence the decision to pay the amount of premium for crop insurance program. So in this situation, crop insurance could be best for poor farmers to deal with the climate and production volatility as it is economically viable, cost reducing and risk sharing institutional mechanism which helps the risk averse farmers to go towards high risk and high profit activities and facilitate them with post-disaster liquidity which secures their livelihood and speed up the recovery process.

5.3 LIMITATIONS OF THE STUDY

5.3.1 LIMITED GEOGRAPHICAL COVERAGE

Although the objective of the research is achieved, there are still few shortcomings in conducting this research. First, due to time frame that given in completing this research is approximately 15 weeks only, it is insufficient for the researcher to conduct the survey with wider coverage. Research is limited in a geographical coverage that only focuses in Selangor. This help is minimized the cost involved in conduct the research.

5.3.2 INVOLVEMENT OF CERTAIN GROUP ONLY

This research is targeted on fruits farmers in Selangor, there are 22.4 per cent of the respondent are fall under the age group of 24-30 years old while 40.8 per cent is 31-40 years old meanwhile 23.0 per cent is 41-50 years old and 50 years old and above is 13.8 per cent. This may affect the research result of willingness on purchasing agriculture insurance. Besides, results only represent the interest among fruit farmers. Thus, the result can only represent certain group on willingness to purchase.

5.3.3 SMALL SAMPLING SIZE

In this research, the number of questionnaire that has been distributed is 160 copies but the valid questionnaires that could be used in data collection and processing is only 152 copies. The 152 valid questionnaires may not represent the whole target group's willingness to purchase of fruit farmers, as the research only focus on fruit farmers in Selangor.

5.3.4 CONSIDERATIONS OF OTHER VARIABLES

Based on the Model Summary table 4.5, R square is 0.426 which means the four variables perceived price, premium, insurance product knowledge and local insurance judgment are influencing the dependent variable willingness to purchase.

5.4 RECOMMENDATION OF THE FUTURE RESEARCH

5.4.1 LARGE GEOGRAPHICAL COVERAGE

Selangor is a very strategic geographic area. The state of Selangor also has the largest economy in Malaysia in terms of gross domestic product (GDP). Selangor has the large population in Malaysia. The larger the geographic area covered, represent the more reliability of the result. In the previous research of willingness on purchasing an agriculture insurance are more focus in Selangor, this will cause the reliability of result because the large number of population in this state. Therefore, future researchers can try to cover as much as Selangor area of willingness on purchasing an agriculture insurance.

5.4.2 INVOLVEMENT OF DIFFERENT SEGMENT GROUP

In this research, our respondent is mainly on male which is 97 out of 152 total respondents and 55 from female. The narrow of respondents helps to determine the willingness on purchasing an agriculture insurance of the target respondent but not represent the whole population of all gender. Thus, we recommended the future research can be conduct in different segment group such as student, senior citizens or others.

5.4.3 INCREASE SAMPLING SIZE

Lastly, in our research, our respondent is 160 but because of invalid and unreturned questionnaires had cause the respondent decrease to 152 when the entire questionnaires have been collected. Thus, the result of our research are not enough convincing and represent the population. Therefore, in the future research should include more sampling size and alert the probability of uncertainty of invalid data and unreturned questionnaires.

i. CONSIDER OF OTHER VARIABLES

The moderate relationship of R square show in the table 4.6 between the independent variables and dependent variable, to determine the strong relationship in the future research. We suggest that the future researcher can consider other variable like quality of agriculture insurance, product and benefit offered, effective claiming process or new type of coverage include, which may carry more strong relationship to influence the willingness on purchasing an agriculture insurance.

5.5 CONCLUSION

In conclusion, our research had attained the main objective which is to Identify major risks encountered by the fruits farmers in Selangor, to evaluate the average price that fruits farmers are willing to take agricultural insurance in Selangor and to Examine factors affecting willingness to take insurance by fruits farmers. Four determinants of willingness to purchase are identified and examined in this study, which is Perceived Price, Insurance Product knowledge, Premium and Local Insurance Judgement. On the other hand, all of the hypotheses are supported and it showed that premium is the most influencing on willingness to purchase of agriculture insurance among fruits farmer in Selangor. Besides that, limitations and recommendation for prospect research was included in the study by helping the Agriculture Insurance company to understand the consumers need and want towards Agriculture Insurance. This will formulate effective strategies to retain customer and thus increase profitability. This research will also contribute to academic who wish to conduct study in related field to gain deeper insights.

APPENDIX 1



COMMERCE DEPARTMENT

QUESTIONNAIRE

Dear Survey Participant,

Your help is greatly needed. Our group members name as followed, final year Diploma in Insurance at Polytechnic Sultan Salahuddin Abdul Aziz Shah, Shah Alam, Selangor.

Names:	Matric No.
MUHAMMAD SHAHIR AZIM BIN SHARUM	08DIN17F2002
NOR DIANA BINTI AWANG AHMAD	08DIN17F2004
UMIE NADRAH BINTI ABDUL GHANI	08DIN17F2009

The researchers are student of Diploma in Insurance Semester 5 and would like to carry out a survey about **The Willingness on Purchasing an Agriculture Insurance Among Fruits Farmers in Selangor**. This research is for academic purpose and fulfill the objectives of course DPB6043 – Business Project. We appreciate your involvement for spend some time to answering the questions accurately and honestly.

Thank you for time and support.

Sincerely,

DIN5 Students.

QUESTIONNAIRE

Topic: The Willingness on purchasing an agriculture insurance among fruits farmers in Selangor.

Dear valued respondents,

This research undertakes as a part of business research project of Insurance program in Polytechnic Sultan Salahuddin Abdul Aziz Shah (PSA). The questionnaire is aimed to use for study about the Willingness on purchasing an agriculture insurance among fruits farmers in Selangor. All of your responses were treated as confidential. Kindly respond to the questions and we thank you for your cooperation.

SECTION A: DEMOGRAPHIC

Please answer the following questions by ticking (/) the appropriate box.

1. GENDER:

MALE

FEMALE

2. AGE

- 24-30 YEARS OLD
- 31 – 40 YEARS OLD
- 41– 50 YEARS OLD
- 50 YEARS OLD AND ABOVE

3. MARITAL STATUS

- SINGLE
- MARRIED
- DIVORCED
- WIDOW

4. RACE

- MALAY
- CHINESE
- INDIAN
- OTHERS (PLEASE STATE): _____

5. SALARY RANGE

BELOW RM 5000

RM5100 – RM 10000

RM 10100 – RM 20000

RM 20100 and above

SECTION B: DEPENDENT VARIABLES ON THE WILLINGNESS ON PURCHASING AN AGRICULTURE INSURANCE AMONG FRUITS FARMERS IN SELANGOR.

Based on your opinion, please answer the questions by ticking (/) the most appropriate number to indicate how far you agree or disagree with each statement by using the following scale:

1	2	3	4	5
Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree

Adapted from: Liew Yean Sien "Factors Influencing Consumers' Purchase Intention

A. WILLINGNESS TO PURCHASE		1	2	3	4	5
1.	I prefer to buy agriculture insurance					
2.	I would consider purchase agriculture insurance in the future					
3.	I would consider to recommend my friends with agriculture insurance					
4.	It makes me desire to buy agriculture insurance after reading online review or comment					
5.	I intend to try agriculture insurance discussed in the online review or comment					

Towards Online Group Buying in Malaysia". (2015).

SECTION C: INDEPENDENT VARIABLES OF THE WILLINGNESS ON PURCHASING AN AGRICULTURE INSURANCE AMONG FRUITS FARMERS IN SELANGOR.

	B. PERCEIVED PRICE	1	2	3	4	5
1.	Price is an important criterion when I purchase a agriculture insurance					
2.	I am more likely to buy agriculture insurance that are on offer.					
3.	I compare prices of agriculture insurance product with other competing insurance before I make a purchase					
4.	Agriculture insurance are reasonably priced compared to other insurance.					
5.	Overall, I purchase agriculture insurance because they are in reasonable price.					

Adapted from: PANG SUK MIN “Factors influencing consumer’s willingness to purchase”. (2015).

	C. PREMIUM	1	2	3	4	5
1.	Agriculture insurance premium is affordable					
2.	Agriculture insurance premium worth with the coverage.					
3.	I look for more description product available when purchase agriculture insurance					
4.	I tend to buy the lowest premium offered that will fit my needs					
5.	I am willing to make extra effort to fund a low premium rate for Agriculture insurance					

Adapted from: Liew Yean Sien “Factors Influencing Consumers’ Purchase Intention Towards Online Group Buying in Malaysia”. (2015)

	D. INSURANCE PRODUCT KNOWLEDGE	1	2	3	4	5
1.	I know about agriculture insurance					
2.	I know the importance of having agriculture insurance					
3.	I know the scope of coverage in agriculture insurance					
4.	I can be cover if my crops is damage.					
5.	I know the process of claim for agriculture insurance					

Adapted from: Nomadic Matt “10 Common Insurance Questions and Misconceptions Answered”. (2019).

	E. LOCAL INSURANCE JUDGEMENT	1	2	3	4	5
1.	Agriculture insurance are carefully manage					
2.	Agriculture insurance are usually quite reliable and reasonable					
3.	Agriculture insurance products are usually a good value for the money					
4.	Agriculture insurance should go for compulsory long term protection					
5.	Agriculture insurance show a very clever use of coverage and claim process					

Adapted from: Ulvi Cenap Topçu “Willingness on buy a foreign product in relation of attitude of customers”. (2015).

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