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Factors Affecting Membership Of Sustainable Oil Palm Grower Cooperative (KPSM) Among Independent Oil Palm Smallholders In Malaysia

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ABSTRACT: This study examined the factors affecting Sustainable Oil Palm Grower Cooperative (KPSM) membership among independent oil palm smallholders. Proportionate sampling was used to determine 400 samples of the respondents in the 30 KPSMs operation area. Data processing, descriptive (frequency and cross tabulation) and analytical analysis (multiple regression) were performed using SPSS software. The regression model summary R² = 0.618 indicates that 61.8% of the variance in the KPSM membership status was explained by the independent predictor variables in the model. The study found that there were nine factors which significantly influenced respondents in the decision to become members of the KPSM. The factors were gender, non-farm occupation, knowledge of cooperatives, community/society involvement, household income, commitment, perception, management, and communication. Greater effort on cooperative education, training and public enlightenment are required in order to increase participation of smallholders in cooperatives. Future work on successful cooperatives should focus on studies of relationship between members' participation and cooperative management and activities.

Key words: Oil palm growers; cooperatives; independent smallholders; sustainable

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I. INTRODUCTION

The concept of cooperatives was formally introduced in this country in 1922 by the British colonial government, primarily to encourage savings and to combat indebtedness, among farmers and government servants. After gaining independence in 1957, the then Malayan Government continued—to acknowledge cooperatives as an important instrument to eradicate poverty and enhance the socio-economic standards of living of the people. A cooperative is defined as an organization of autonomous persons who voluntarily organize to fulfill their common economic, social, and cultural needs and aspirations through a jointly owned and democratically controlled enterprise registered under Malaysian Co-operative Societies Act 1993 (Act 502). Cooperatives are managed based on the values of self-help, self-responsibility, democracy, equality, equity and solidarity. All cooperatives around the world are guided by the seven principles:-

- i) Voluntary and open membership cooperatives are voluntary organizations, open to all persons who are entitled to use their services, and willing to accept the responsibilities of membership.
- ii) Democratic member control cooperatives are democratic organizations controlled by their members, who actively participate in setting the policies and decision making.
- iii) Member economic participation cooperative operations focus on servicing the needs of their members. A trading cooperative distributes surpluses to its members proportional to the business deals with the cooperative.

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- iv) Autonomy and independence cooperatives are autonomous, self-help organizations controlled by members.
- v) Education, training, and information cooperatives provide education and training for their members, elected representatives, managers, and employees so they could contribute effectively to the development of the cooperatives.
- vi) Cooperation among cooperatives cooperatives enhance and strengthen the movement of the cooperatives by working together in local, national, regional, and international structures.
- vii) Concern for community cooperatives work for the sustainable development of their communities through policies approved by their members.

A cooperative is sustained by a democratic structure comprised of the members, the board of directors, committees, management, and staff. The components of the cooperative structure are interlinked as illustrated in Figure 1. Members invest in the cooperative, set its objectives, participate in policy making, and basically govern the operations of the cooperative. Members elect the board of directors at the cooperative annual general meeting (AGM). In turn, the board of directors represents the members and is more closely involved in the operations of the cooperative. The board would also be responsible for hiring and supervising the cooperative manager. Committees may be established to work on specific aspects of the operations of the cooperative.

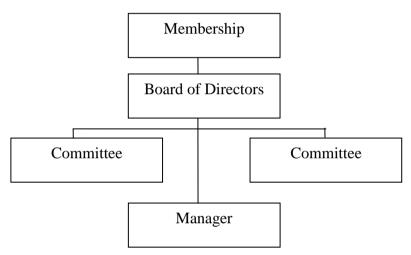


Figure 1: Example of cooperative structure.

II. SUSTAINABLE OIL PALM GROWER COOPERATIVE (KPSM)

The government has been encouraging people to work in cooperatives, including smallholders. Smallholders are defined as family-based enterprises producing oil palm from less than 40.46 hectares of land. Smallholders could be divided into two broad categories, namely—organized smallholders and independent smallholders. An organized smallholder is defined as a grower who cultivates oil palm with the direct support of either the government or the private sector. This support comes in the forms of technical assistance and inputs of seed stock, fertilizers, and pesticides. Independent smallholders are the exact opposite of organized smallholders (Idris *et al.*, 2009). At the end of 2013, there were a total of 192,198 registered smallholders, cultivating a total area of 748,292.51 ha.

Independent smallholders usually face various problems, such as being offered lower FFB prices from fruit dealers, high cost of agriculture inputs, lower incomes, and lower FFB yields and qualities. *Sustainable Oil Palm Grower Cooperative* (KPSM) was established specifically to group independent smallholders under a cooperative. The objective of the cooperative is to encourage and empower smallholders to manage their requirements, and focus on oil palm management. There are several steps involved in forming a cooperative:-

- i) Establish a steering committee;
- ii) Submit the proposal for the establishment of the cooperative to Malaysia Co-operative Societies Commission (SKM);
- iii) Brief and promote the cooperative;
- iv) Conduct a preliminary meeting; and
- v) Formally register the cooperative with SKM.

As of December 2013, a total of 30 KPSMs (Table 1) has been established throughout Malaysia, with a total membership of 2,169 smallholders. Although these figures could be an indication of support from the oil palm

smallholders, KPSM membership was still low compared with the number of smallholders in the cooperative operational areas, which-totaled 50,040 smallholders. The map of KPSMs as illustrate in Figure 2.

Table 1: List of KPSM and its membership by states

No	KPSM	State State	No. of Member		
1	Jasin	Melaka	76		
2	Kuala Selangor		16		
3	Kuala Langat	Selangor	29		
4	Temerloh		55		
5	Bera	Pahang	55		
6	Maran		44		
7	Besut	Terengganu	12		
8	Selama		55		
9	Teluk Intan	Perak	65		
10	Batang Padang		12		
11	Kluang		30		
12	Kulaijaya	Johor	25		
13	Yong Peng		41		
14	Tongod		226		
15	Kinabatangan		157		
16	Kunak	Sabah	50		
17	Beluran		63		
18	Keningau		89		
19	Tungku	Sabah	12		
20	Tawau		73		
21	Saratok		419		
22	Belaga		242		
23	Serian		49		
24	Selangau		155		
25	Marudi		59		
26	Limbang	Sarawak	12		
27	Long Lama		12		
28	Asajaya		12		
29	Sarikei		12		
30	Lawas		12		
	Total	l	2,169		



Figure 2: Map of 30 KPSMs.

Arua (2004), cited by Ibitoye (2012), viewed cooperatives as an important tool of improving the living conditions of farmers. Bhuyan (2007) concludes that cooperatives have been specially seen as significant tools for creation of jobs and for the mobilization of resources for income generation.

Cooperative organizations have been seen by most people as a form of social enterprise as well as grassroots organizations with potential in helping people. Various researches on cooperative role in community development in countries around the world, and their role in the eradication of poverty, confirmed the importance of cooperatives (Birchall *et al.*, 2009). As a grassroots organization, it is the people in the cooperative that should be given the most attention. As a typical social economic enterprise organized and run by the people, naturally they themselves would ensure that they reap the benefits of their labour. People referred here are the cooperative members. It is important to evaluate cooperative membership because the success or failure of the organization highly depends on its members (Azmah *et al.*, 2012).

Member participation, commitment, and loyalty were becoming important and complex. Sensitive issues might arise during the development and progress of the cooperatives. Commitment and trust of cooperative members in their directors were influenced by their economic backgrounds, ages, and experiences in the cooperatives (Osterberg *et al.*, 2007). Trust among cooperative members was also important in determining group unity and performance (Hansen *et al.*, 2002). As cooperative membership size became bigger and more heterogeneous, this would likely affect members' commitment, democratic control, and cooperative success (Fulton *et al.*, 2001). The links between membership, patronage, and investment would also affect the cooperative progress (Pischke *et al.*, 2004).

Considering the factors which influenced the participation of members of agricultural cooperatives in Tehran, Arayesh and Mammi (2010) concludes that there was a significant and positive relationship between the members' ages, education levels, number of shares (in cooperatives), and the resultant profits, and the levels of their participation in decision- making of the cooperatives. Arayesh (2011) finds that there was a significant relationship between political, economic, managerial, and social factors among the participating agricultural cooperative members. A study by Azmah (2012) shows that age and occupation also influenced the membership of cooperatives. Jensen (1990) in a study finds that experienced farmers expressed "quality services" as the criteria in choosing between being a member and or non-member in a cooperative.

The objectives of this study are to determine the social demographic profile of the respondents and to evaluate the factors that influence respondents to become members of the KPSM.

III. METHODS AND MATERIALS

i) Survey Method and Questionnaire

The survey population was independent oil palm smallholders in the cooperative area in Malaysia, covering 50,040 smallholders. The 400 independent oil palm smallholders were sampled, consists of two categories, namely, members (200 respondents) and non-member (200 respondents). Proportionate sampling method was used to determine the number of samples from each cooperative area. The calculation for the sample size was based on a formula by Krejcie and Morgan (1970):

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s = X^2 NP (1 \square P) \div d^2 (N \square 1) + X^2 P (1 \square P)
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s = required sample size.

 X^2 = the table value of chi-square for 1 degree of freedom at the desired

confidence level (3.841).

N = the population size.

P = the population proportion (assumed to be 0.50 since this would provide the

maximum sample size).

d = the degree of accuracy expressed as a proportion (0.05).

The random sampling technique was used to select the respondents from cooperative membership as listed in the membership database. The respondents from non-member were identified by KPSM's managers in their cooperative operational areas as they looked for new members. The data collection for the study was carried out through a face to face interview and self-administered questionnaires. The questionnaires consist of three parts; Part A pertaining respondent profile, Part B regards respondent's knowledge and involvement in cooperative and the last part regarding factors that contribute smallholders towards cooperative. Self-administered questionnaires were used for the respondent that does not have time for face-to-face interviewed.

ii) Statistical Analysis

The Statistical Package for Social Science (SPSS) version 20 was used to analyze data from this study. Descriptive statistics such as frequency and cross tabulation were used to describe and analyze the background data for the respondent and their participation in cooperative. Stepwise multiple linear regression analysis was used to analyze factors that could influence the choice of becoming a cooperative member or otherwise. In stepwise method, the most powerful variable introduced into the regression equation until a probability of F to enter p <0.05 and F to remove p > 0.10. The regression equation can be expressed as follow:-

$$Y = \square + \square X_1 + \square_2 X_2 + \square_3 X_{3+} \square_4 X_{4+} \square_5 X_5 + \square_6 X_{6+} \square_7 X_7 + \square_8 X_{8+} \square_9 X_{9+} \square_{10} X_{10+} \square_{11} X_{11+} \square_{12} X_{12+} \square_{13} X_{13+} \square_{12} X_{13+} \square_{13} X_{13+} \square_{13} X_{13+} \square_{14} X_{14+} \square_{15} X_{15+} \square_{15} X$$

 $\square_{14}X_{14+}$

Where;-Y = Membership status

 $X_1 = Age$

 $X_2 = Gender$

 X_3 = Education level

 X_4 = Household income

 $X_5 = Non-farm occupation$

 X_6 = Knowledge in cooperative

 $X_7 = Community/society involvement$

 X_8 = Attended cooperative courses

 $X_9 =$ Vector of commitment factor

 X_{10} = Vector of perception factor

 X_{11} = Vector of management factor

 X_{12} = Vector of communication factor

 X_{13} = Vector of economic factor

 $X_{14} = Logistic factor$

 $\alpha = constant$

 β_{i} = coefficients

 $\varepsilon = error$

IV. RESULTS AND DISCUSSION

i) Demographic Profile of Respondents

a) Gender and age of KPSM members

The result shows that the majority of the respondents were male (83%) and 17% were female. This indicates that more men in the study area were involved in the oil palm industry than women. Figure 3 illustrates the cross tabulation of membership in Sustainable Palm Oil Growers Cooperative (KPSM) against gender. The result shows that men were more inclined to be members of cooperatives than women. This was because men were more directly involved in the sector compared to women. This was probably due to the characteristics of the job in this sector which required tough tasks, such as harvesting and maintaining the farm area.

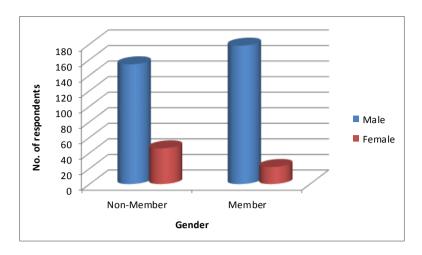


Figure 3: Membership in KPSM against gender.

In term of respondents based on age, the result indicates that the average age of respondents was 52 years and that the range was between 20 to 88 years. This result also was in agreement with the findings by Aniedu $et\ al.\ (2007)$, who observed that small-scale farmers were mainly about 50 years of age and above. Majority of the respondents (81.3%) were above 41, and the least was at the age group of below 30. Figure 4 illustrates that respondents in the age range above 51 were more inclined to be members of cooperatives compared to respondents in the age range below 40. Respondents in the age range of 41 – 50 did not show any noticeable difference as to whether they become members of cooperatives or not. KPSM was established specifically to assist smallholders in oil palm management and in increasing their incomes. Therefore, the factor that respondents were of rather mature ages to manage their farm, more or less drove them to join cooperatives to enable the management of their farms to be managed by the cooperative.

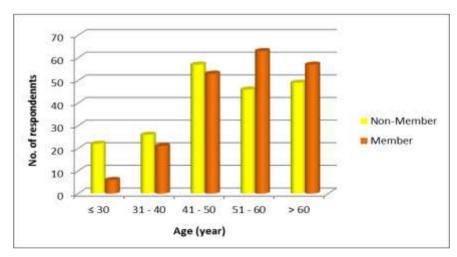


Figure 4: Membership in KPSM against age of respondents.

b) Marital status

On marital status, majority of the respondents were married (93.8%). About 4.3% of them were single, and the remaining 2% were either widows or widowers. Figure 5 illustrates that most married respondents were more inclined to be members of cooperatives, whereas singles or widows/widowers were either less or not interested to become members of cooperatives. The success of a cooperative depends on the sense of responsibility of all members in order to make it become a reality. These involvement, support, cooperation, and sense of responsibility require high levels of commitment. Married respondents normally had high commitment and responsibility towards their families. As such, they were more responsible and participated in cooperatives.

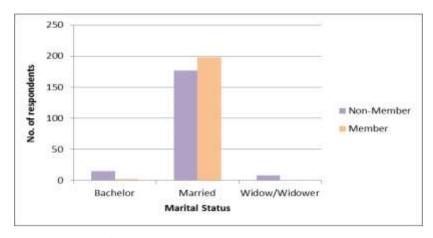


Figure 5: Membership in KPSM against marital status.

c) Educational status

The education status of the respondents reveals that only 7.7% of the respondents had no formal education. About 22.5% received primary education, 53.8% completed up to secondary education, and the remaining pursued tertiary education, or its equivalent. More than half of the respondents had secondary education. In summary, about 92.2% of the respondents were literate. In terms of participation in cooperatives, respondents with secondary education were less inclined to be members of cooperatives compared to those with primary and tertiary education (Figure 6). This figure shows the cross-tabulation between education and skills. Respondents who had had some levels of education would become members of the cooperative. However, only 29% of the respondents with secondary education were more likely to not be a member of the cooperative. This is maybe due to insufficient explanation pertaining to cooperative to this group.

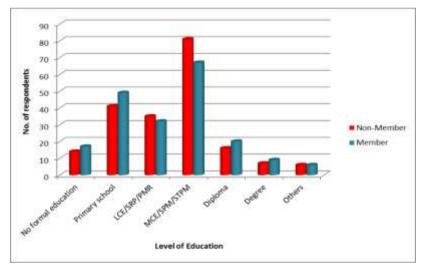


Figure 6: Membership in KPSM against level of education.

d) Type of smallholder

As for the status of smallholders, it shows that 62.5% of the respondents were fulltime smallholders, and 37.5% were part timers. Most of the part time smallholders (52.4%) worked as government servants or in the private sectors, 18.9% as contractors/traders, and 28.7% worked in other areas, such as rubber tappers, counsellors, lorry drivers, and pensioners. This study shows that respondents who worked as government servants or in the private sectors were not so interested to become members of KPSM compared to those who worked in other sectors (Figure 7). It may be due to the fact that they were tied up with work, and they had other responsibilities to accomplish.

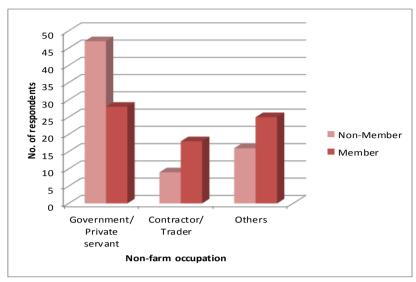


Figure 7: Membership in KPSM against non-farm occupation.

e) Experience in oil palm management

Meanwhile for years of experience of respondents had with the oil palm industry shows the highest numbers of respondents (40.5%) had more than 10 years' experience in oil palm. The number of years of experience on the range below one year was the lowest, comprised only seven respondents. In terms of involvement in KPSM membership, respondents with more than 10 years' experience in oil palm were more inclined to be members of KPSM compared to respondents with less than 1 year experience (Figure 8). Their experiences in managing oil palm holdings individually could probably be the driving force for them to work in a group to facilitate a systematic oil palm management.

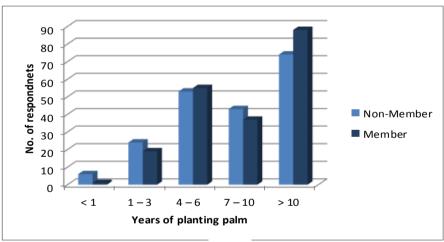


Figure 8: Membership in KPSM against years of experience in oil palm.

f) Level and source of income

In term of respondents' source of income, 70.5% of the respondents' sources of income were from sales of fresh fruit bunches (FFB), 22.8% from salary, and 6.8% from other sources, such as allowances from their children and pension. Respondents who depended on oil palm as the source of income and other sources were more inclined to be members of KPSM compared to salaried respondents (Figure 9). One of the issues often raised by smallholders was that they were offered low fresh fruit bunch (FFB) prices from third parties. As such, by joining KPSM, they had an alternative and they were empowered to defend their rights to obtain optimum FFB prices.

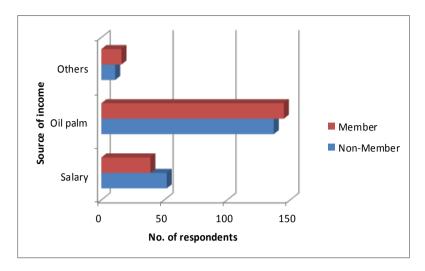


Figure 9: Membership in KPSM against source of income.

In this study also indicates that more than 30% of the respondents earned monthly incomes below RM1,000. Meanwhile, 29%, 20%, 3.3%, and 16.8% of the respondents earned monthly incomes ranging between RM1,001 – RM2,000 (USD270 – USD539); RM2,001 – RM3,000; RM3,001 – RM4,000, and more than RM4,000, respectively. Figure 10 indicates that respondents with monthly incomes of less than RM2,000 were not interested to become members of KPSM compared to respondents earning more than RM2,000. This was because their monthly incomes had been used to support their monthly needs, such as basic necessities and household costs.

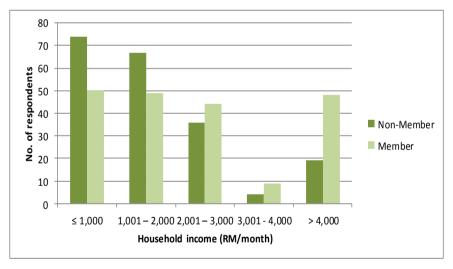


Figure 10: Membership in KPSM against respondents' household income (IUSD = RM3.71).

g) Involvement KPSM Members in Community of Social Activity

In terms of the respondents' involvements in external activities, half of the respondents (52.5%) showed no involvement while 31.8% of them had involved as committee members in their community/society. As many as 16% of the respondents were involved in other activities, such as head of the village, *Iman masjid* and *tuai rumah*. Meanwhile, Figure 11 indicates that most respondents who were involved in the community/society activities would like to become members of KPSM. Respondents who did not, were more inclined to not be members. There were many reasons why people did not involve in external activities, such as inadequate community communication, too much work, no benefits to be gained, and lack of time.

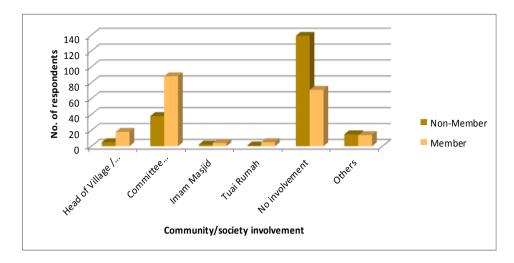


Figure 11: Membership in KPSM against respondents' community/society involvement.

In terms of involvement as a cooperative member in other cooperatives, the majority of the respondents (79%) did not join any cooperative; only 21% of the respondents were members of cooperatives such as *Pertubuhan Peladang Kawasan* (PPK), RISDA and mosque cooperatives. The low awareness of the importance of cooperatives in society was the reason for low participation in cooperatives. Besides that, other contributing factors were the facts that people were less willing to cooperate, lend a hand, spend time, and invest in cooperatives. However, there were also those with no cooperative experience who joined KPSM because they saw the benefits of doing so. Figure 12 indicates that non-member respondents in other cooperatives would probably become KPSM members. As shown in Figure 11, 46.2% of the respondents (146 respondents) had become members of KPSM.

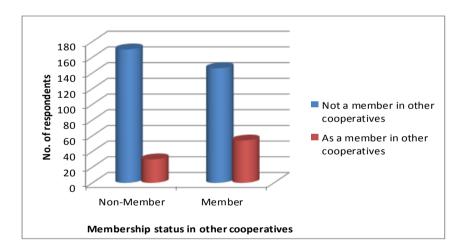


Figure 12: Membership in KPSM against respondents' membership in other cooperatives.

h) Knowledge of members on cooperative

As regards knowledge about cooperatives (Figure 13), 46.8% of the respondents understood, 40.3% hardly understood, 9% did not understand, and only 4% understood well. Respondents under the categories of "understand well" and "understand", were inclined to become members of KPSM. As anticipated, respondents who hardly understood and did not understand were inclined to not participate in any cooperative. Knowledge is a familiarity, an awareness or understanding of something, such as information, descriptions, or skills, which is acquired through experience or education by perceiving, discovering, or learning. The acceptance level of knowledge of each individual is different and information delivery methods affect the levels of their acceptance. Therefore, the respondent who hardly understood or did not understand of the information submitted would not or less likely to accept and follow the activities.

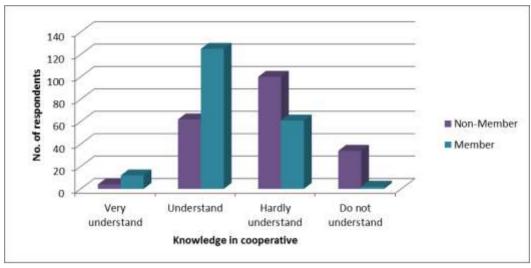


Figure 13: Membership in KPSM against respondents' knowledge in cooperative

In term of the distribution of the respondents who attended relevant cooperative courses, only 28.25% had attended courses. Most respondents (60.2%) had attended courses organized by the Cooperative College of Malaysia (MKM), followed by the Malaysian Cooperative Societies Commission (32.7%), 29.2% by the Malaysian Palm Oil Board (MPOB), 12.4% by ANGKASA, and only 7.1% by other agencies, such as Pertubuhan Peladang Kawasan (PPK), schools and mosques. Figure 14 indicates that respondents who had never attended any course were more inclined to not participate in any cooperative. Only 37.6% of the respondents (108 respondents) who never attended any course become members of KPSM. People were reluctant to participate in a community activity when they did not have enough information to act responsibly. They simply did not know how to act. Thus, they would avoid participating as long as possible or until they had what they believed to be sufficient information.

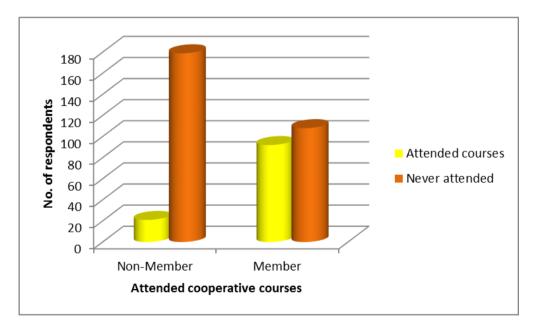


Figure 14: Membership in KPSM against respondents' attended cooperative courses.

ii) Respondents' Perception on Sustainable Oil Palm Growers Cooperative (KPSM)

The respondents' perception of the factors affecting KPSM membership was assessed on a Likert 5-point scale (1 = strongly disagree, 5 = strongly agree) using a set of six vectors. These six vectors were communication, perception, management, commitment, logistics, and economics. The specific variables evaluated under each of these six vectors are listed in Table 2.

Under communication, the variables were; informed about the establishment of KPSM, received information about KPSM was very clear, provided with up-dated information, and time frame of receipt of information. Respondents agreed that being informed about KPSM and receiving clear information of the same would affect their decision making on whether or not to become members of KPSM. However, respondents responded as neither agree nor disagree for the variables 'provide up-dated information', and 'the time frame of receipt of information'.

In terms of perception, respondents agreed that cooperatives were suitable for smallholders and believed that cooperatives would assist smallholders to improve their socioeconomic levels. Respondents agreed that if the committee would always discuss with members/smallholders in planning for cooperative activities, it would attract smallholders to join cooperatives. In addition, an efficient cooperative management was one of the factors contributing to the participation of cooperative members.

For commitment, respondents agreed that factors such as responsibility, willingness to join, encouragement and support influenced them on whether to participate or not in cooperatives. On the other hand, respondents agreed that the distance between their dwellings to the cooperatives did not affect their decision makings as to whether to join cooperatives or not. Lastly, respondents agreed that offer of rebates and payment of dividends would attract the interests of smallholders to participate in cooperatives. However, respondents responded as neither agree nor disagree pertaining to the payment of fees and shares.

Table 2: Respondents' Perception on the Factors Affecting the KPSM Membership

	Score Measure						
		1 2 3			4 5		
Vector	Variable	Strongly disagree	Disagree	Neither agree nor disagree	Agree	Strongly agree	Mean
Communication	Have been informed about establishment of KPSM	8	28	88	222	54	3.72
	Explanation about KPSM very clear	12	26	92	228	42	3.66
	Progress and achievement of KPSM have been updated to smallholders/members	23	113	143	96	25	2.97
	Information of KPSM was timely received	33	148	97	92	30	2.85
Perception	Believed KPSM will provide assistance to improve smallholders income	1	0	26	226	147	4.30
	Suitable organization for smallholders	1	2	29	226	142	4.27
	Would join KPSM although have not seen the success stories	42	92	116	109	41	3.04
	Not influence with negative cooperative experience by other smallholders	9	70	102	146	73	3.51
Management	Committee discusses and gets an opinion in planning the activities	0	4	35	268	93	4.13
	Management competency	7	29	53	259	52	3.80
	Informed of management plan	4	83	157	119	37	3.26
	Opportunity to voice concerns	11	86	150	114	39	3.21
Commitment	Responsible to work together in developing palm smallholders	0	5	38	267	90	4.11
	Interested to join outside activity,	3	17	40	247	93	4.03

	including being cooperative member						
	Have time and willing to join KPSM	12	48	117	149	74	3.56
	KPSM encouraged me to actively involved in community activities	1	12	52	263	72	3.98
	Participate and support in all KPSM activities	2	9	54	242	93	4.04
Logistics	Distance between my house with cooperative did not hinder my joining it	5	26	51	239	79	3.90
Economics	Fees and shares not burdensome to pay	9	53	115	165	58	3.53
	Get advantage in terms of rebates and dividends	6	19	54	217	104	3.99

iii) Factors Influencing Respondents to Become KPSM Members

The multiple regression analysis was used to determine the contribution of the independent variables towards variance of KPSM membership status. The analysis shows that the nine predictor variables were found to be of significance in explaining membership status. The nine predictors were as follows: gender, non-farm occupation, knowledge about cooperative, community/society involvement, household incomes, communication, perception, management, and commitment factors. The $R^2 = 0.618$ indicates that 61.8% of the variance in the KPSM membership status was explained by the independent predictor variables in the model. Table 3 shows the summary of the multiple regression analysis on independent variables that had effects on the dependent variable (KPSM membership status). The factors consisted of gender, occupation other than as oil palm smallholder, knowledge about cooperative, community involvement, household incomes, commitment – responsible to work together, perception – belief that KPSM would assist smallholders, management – committee to discuss and get an opinion in planning activities, and communication – informed about the establishment of KPSM. In general, the model had significantly explained 61.8% of the variation in the KPSM membership status. The correlation coefficient and coefficient of determination were calculated as equal to r = 0.786 and $R^2 = 0.618$.

This regression model summarises that 61.8% of the changes of the dependent variables were contributed by the nine factors. Thus, the regression was significant (F 9,133) = 22.563, p < 0.01.

Table 3: Regression Analysis on Factors Affecting Membership Status

Variable	Beta	t value	Summary
(Constant)	-1.157	-5.411**	F = 22.563**
Gender (0=male, 1=female)	168	-2.202*	$R^2 = 0.618$
Non-farm occupation	.098	2.967**	
Knowledge about cooperative	.256	3.863**	
Community/Society involvement (0=no, 1=yes)	.151	2.443*	
Household income	4.710E-005	3.535**	
Responsibility to work together (0=no, 1=yes)	.215	2.494*	
Belief in KPSM	.214	4.164**	
Committee to discuss with members/smallholders	.235	2.603**	
(0=n0, 1=yes)			
Informed about KPSM	.285	3.727**	

Note: * and ** indicate significant levels at 5% and 1%, respectively

This study shows that gender influenced the tendency of respondents whether or not to be members of KPSM. It proves that men were more inclined to be involved in cooperatives compared to women. The tendency for men to be a member was 0.168 times than women. For respondents who had jobs other than in the oil palm sector, it shows that the tendency for respondents who worked as a contractor / trader to be a member was 0.098 times compared to the respondents who worked as government/private servant. It also finds that respondents who had more knowledge, that was 1 point higher in cooperative, were 0.256 times more inclined to be members of the cooperatives, compared with respondents who were less knowledgeable in cooperatives. For

example, if respondents could increase their knowledge from 'hardly understand' to 'understand well' in cooperatives, the tendency to become members would increase by 0.512 times (0.256 x 2). Respondents who were involved in external activities, were 0.151 times more likely to join KPSM, compared to those who were not. Apart from that, it is shown that there was a tendency for respondents with high household incomes to be members of KPSM compared to those with low household incomes. According to the model, an increment of RM100 of monthly household income would increase the tendency to become members of KPSM by 0.0047 times.

The study also finds that respondents with high responsibilities to work together with cooperatives in developing oil palm smallholders were more inclined to become members of KPSM. The tendency of respondents with high responsibilities to become members was 0.215 times more compared to those with slight responsibilities. Generally, positive perceptions lead to positive actions. Respondents who believed that cooperatives were able to assist and group smallholders under one organization were 0.214 times more likely to join KPSM. Besides, the receptiveness of committee members to discuss and seek the opinions of the members or smallholders in management produced positive effects to attract membership. Respondents were more inclined to become members of KPSM by 0.235 times, if the committee made the point to discuss and seek the opinions of members or smallholders, compares to the committee who did not. Respondents who received and obtained complete information pertaining to the establishment and progress of the cooperatives were 0.285 times more likely to participate in cooperatives. However, in this study, some factors expected to affect membership status were actually insignificant, such factors as age, levels of education, attendance of cooperative courses, economics, and logistics.

V. CONCLUSION

From this survey, it could be concluded that most of the respondents were male, full-time smallholders, and of average age of 52. These facts could possibly be attributed to the oil palm sector being dominated by men. Majority of the respondents had completed formal education. Hence, this study concluded that members of KPSM comprised those who were literate. Respondents who had more than 10 years oil palm planting experience, were more inclined to become members. Their experiences in managing oil palm holdings individually could probably be the driving force for them to work in a group to facilitate a systematic oil palm management. Meanwhile, most part-time smallholders who worked as either government servants or in the private sectors, were less inclined to become members of KPSM. It may be due to the fact that they were tied up with work, and they had other responsibilities to accomplish. Factors affecting the smallholders on whether or not to become members of KPSM were gender, non-farm occupation, knowledge about cooperatives, community or society involvement, household income, commitment, perception, management, and communication. These factors significantly influenced the smallholders in the decision to become members of KPSM. In order to increase the participation of smallholders in cooperatives, greater efforts on cooperative education, training and public enlightenment are required. At the same times, the activities of the cooperative should be in line with the requirements of members and should benefit the same. Future research could also study the relationship between members' participation and cooperative management and activities in order to obtain more complete information for the success of the cooperative.

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