

IJML Vol 3 No. 3 October 2024 | ISSN: 2963-8119 (print), ISSN: 2963-7821 (online), Page 161-170

MILLENNIAL'S RATIONAL DECISION CHOICE TO BECOME FARMERS IN TERMS OF ECONOMIC'S CHARACTERISTIC IN SUKOHARJO

Indah Susilowati^{1*}, Siti Nur Arofah², Muhammad Fahrur Rozi³, Hira Davika⁴

Diponegoro University, Indonesia

Article Hi	story
Received	: September
Revised	: September
Accepted	: October
Published	: October

Corresponding author*: <u>sitinurarofah07@students.u</u> ndip.ac.id

No. Contact:

Cite This Article:

DOI: https://doi.org/10.56127/ijm l.v3i3.1798 Abstract: The purpose of this research is to identify the factors that influence the interest of the younger generation in working in the rice farming sector in Polokarto District, Sukoharjo Regency. The method used in this research is the binary logistic regression model, which is a logistic regression with two categories or binomial on its dependent variable. The data in this study were obtained from primary and secondary data. Secondary data were obtained from relevant agencies or government institutions, including data on the number of labor forces and rice farmers in 2022 in Polokarto District. Primary data were obtained directly from the labor force working in the rice agriculture sector in Polokarto District. Descriptive analysis through observation techniques, in-depth interviews (wawancara mendalam). The population in this study was conducted in the Polokarto District with specific criteria. And the sample consists of 100 rice farmers and non-farmers aged (15-39 years) with a distribution of 20 farmers from each of the five villages (Polokarto, Karangwuni, Wonorejo, Kenokorejo, Bakalan) in the Polokarto District. The results of this study indicate that the variables of Wages, Land Area, and Gender partially have a positive and significant effect on the interest of the younger generation to work in the agricultural sector. The number of dependents has a negative and significant effect, while education does not have an effect on the interest of the younger generation to work in the agricultural sector.

Keywords: Interest in Work, Agriculture, Young Generation, Wages

INTRODUCTION

In the rural nation of Indonesia, agriculture is the main industry fostering economic development. In order to achieve food security, boost competitiveness, absorb workers, reduce poverty, and boost foreign currency profits, agriculture is strategically important to the country's economy [1]. Since the majority of Indonesians still depend on agriculture for their livelihoods and it can endure shocks, it should be given high priority in the country's growth.

According to statistics, the industrial sector continued to grow from 27.15 percent in 2009 to 42.5 percent in 2021, while the agricultural sector's share of GDP decreased from 15.29 percent in 2009 to 10.72 percent in 2021 [2] Thus, it may be said that the agricultural sector has undergone a structural change to become the non-agricultural sector. The largest employer, with 32.41 million people (or 29.76 percent of the Indonesian total), is the agriculture industry [3]. On the other hand, Figure 1 below shows that Indonesia's farmer population has been declining:



Source: (BPS, 2022)

Indah Susilowati, Siti Nur Arofah, Muhammad Fahrur Rozi, Hira Davika

Based on Figure 1, the number of people employed in the agriculture industry fell from 42.36 million to 32.41 million between 2012 and 2021. A lack of human resources in the agricultural field is a result of a number of intricate issues in the agricultural sector, ranging from upstream to downstream, which affect the low competitiveness of products, especially the low regeneration of farmers [4].

There are only around 2.9 million young farmers in Indonesia between the ages of 25 and 34, which is much less than the 7.8 million farmers in the 45–54 age range. At 3.8 million, the number of farmers over 64 is likewise higher than the number of young farmers. According to the data, just 2.7 million persons, or 8% of the population, are young farmers under the age of 25. Given that the number of young farmers fell by 415,789 between 2018 and 2021, the figure is probably going to decline.

The youth farmer regeneration issue has grown to be a major force unsettling the agriculture industry [5]. Minimal farmer regeneration is a problem in practically every commodity, including rice cultivation. Given that rice is a basic necessity for the Indonesian people, this occurrence has grown to be a very serious issue. A protracted food catastrophe may result from rice farmers' inability to regenerate over the long term [6].

In 2021, Central Java Province produced 5.54 million tons of rice, the most in all of Indonesia [7]. With 2.88 million farmers cultivating rice fields over 1.1 million hectares, the Central Java Province's high productivity is proportionate to its big farmer population. With a production level of 67.42 quintals/ha, Sukoharjo Regency is home to one of the rice granaries in Central Java Province [8].

During a single harvest period in 2021, Sukoharjo, one of the regencies in Central Java Province with a prominent rice cultivation industry, produced 370,305 tons of dry unhusked rice. Being one of Central Java's rice granaries, Sukoharjo Regency should be in line with the sizable labor force involved in agriculture, especially in the production of rice commodities. Comparing the distribution % of agricultural labor absorption to other Central Javan regencies and cities, however, reveals that it is still rather low.

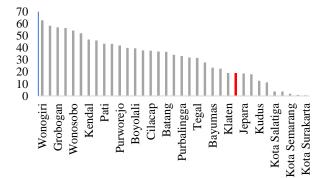


Figure 2. Distribution of the Percentage of Agricultural Labor Absorption by Region in Central Java Province in 2020 (in percent)

Source: (Provinsi Jawa Tengah dalam Angka, 2021)

The agricultural industry in Sukoharjo Regency still faces many challenging issues, particularly with regard to farmer regeneration, as seen by the low proportion of labor absorption in this sector. The main industry in Sukoharjo Regency is agriculture, which contributes 27.9 percent of the GDP, the second-highest percentage after the processing sector at 30 percent [9]. As a result, the public should be encouraged to work in agriculture, particularly in the rice industry. Nonetheless, Sukoharjo Regency's farmer population has been trending downward, as seen in Figure 3 below:

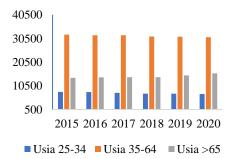


Figure 3. Sukoharjo Regency's Farmer Population by Age Group, 2014–2020 Source: (Dinas Pertanian dan Perkebunan Provinsi Jawa Tengah, 2022)

As seen in Figure 3, the majority of farmers in Sukoharjo Regency are between the ages of 35 and 64, with young farmers between the ages of 25 and 34 accounting for just around 13% of all farmers. The data indicates that there are less and fewer young farmers each year. Given that farmers' poor regeneration eventually contributes to a decline in the output of agricultural products, particularly food, this situation has grown to be a significant issue. Rice is the primary crop grown by farmers in Sukoharjo Regency. As seen in Table 1 below, Polokarto District is one of the biggest rice-producing districts.

Table 1. Productivity of Paddy Rice in the form of Milled Dried Grain (MDG) in Sukoharjo Regency
in 2020

Sub-district	Harvest Area (ha)	GKG Production (ton)	Productivity (ton/ha)
Weru	4.722	29.867	6.33
Bulu	2.240	14.507	6.48
Tawangsari	4.112	26.342	6.41
Sukoharjo	5.952	38.127	6.41
Nguter	5.515	34.954	6.34
Bendosari	5.193	32.735	6.30
Polokarto	6.790	46.613	6.27
Grogol	2.197	13.667	6.22
Baki	2.667	16.616	6.23
Kartasura	1.167	6.933	5.94
Total	4.086	25.063	6.17

Source: (Kabupaten Sukoharjo dalam angka, 2021)

According to Table 1, Polokarto produces 46,613 tons of Milled Dried Unhusked Rice (GKG) annually, making it the subdistrict in Sukoharjo Regency with the largest production. Despite having the biggest harvested area and output, the fact indicates that, with a productivity level of 6.27, it is still below other subdistricts. [10] assert that human resource (HR) issues impact productivity, and that in the agricultural sector, a lack of HR results in suboptimal use of land availability.

Table 2. Polokarto District's harvest area,	rice production,	, and number	of rice farmers pe	r village in
	2021			

2021			
Country	Harvest	Productivity	Total
Country	Area (ha)	(ton)	Farmer
Kemasan	672	5457	1342
Mranggen	569	4605	1221
Kenokorejo	508	4104	992
Wonorejo	442	3656	623
Bakalan	436	3594	452

Source: (Balai Penyuluh Pertanian Kecamatan Polokarto., 2022)

Table 2 indicates that the Polokarto District's rice production hubs are dispersed across five villages— Kemasan, Mranggen, Kenokorejo, Wonorejo, and Bakalan—and employ 9,543 farmers in total. Most farmers in these five villages grow the rice types IR 64 and pepe, and more recently, they have begun cultivating IP 400. According to the Polokarto [8], the lack of enthusiasm in rice cultivation among the younger generation is a complicated problem. In Polokarto District, the number of young farmers has decreased, as Table 3 below illustrates:

Table 3. The Number of Rice Farmers by Age Group in Polokarto District from 2015-2020

Year	Age 25-34	Age 35-64	Age >65	Total
2015	586	4532	2212	7330
2016	578	4556	2212	7346
2017	550	4423	2201	7174
2018	543	4431	2042	7016
2019	502	4429	1987	6918
2020	502	4429	1987	6918

Source: (Balai Penyuluh Pertanian Kecamatan Polokarto., 2022)

Table 3 indicates that, with the exception of those in the 25–34 age range, the number of farmers in Polokarto District declined between 2015 and 2020. There are about 500 farmers between the ages of 25 and 34. Eight percent of the total petani. The data points to a crisis in millennial farmers' regeneration, which affects production because of less-than-ideal land usage. [11] claim that this phenomena has the potential to cause a protracted food catastrophe.

In Polokarto District, a number of internal and external variables impact the younger generation's interest in rice growing [12]. The aforementioned internal variables pertain to education, which, according to Widadi (interview findings December 18, 2022), significantly influences the younger generation's decision to work in other industries or farm. In Polokarto District, the majority of rice farmers have completed elementary school (60 percent) and junior high school (30 percent), according to the data [13]. Since some individuals associate agriculture with blue-collar labor that demands more skill than knowledge, this supports the theory that interest in farming declines with education [14].

A person's decision to become a farmer is not necessarily influenced by their degree of schooling. According to Kristanto (interview December 19, 2022), regardless of their level of education, the younger generation in Polokarto District, ages 20 to 35, whose parents own agricultural property, tends to continue the farming industry. According to [15] research, land ownership is a major factor in determining the profitability of agricultural endeavors, which is why younger generations are interested in agricultural operations.

The way that farming is practiced over generations is intimately tied to land ownership (agricultural) [16]. According to the research by [1], a lot of people, particularly in villages, decide to pursue farming as a career based on local potential since it is a tradition passed down from their ancestors that is thought to be perpetuated. According to Ammeisa Rahayuni (interview result December 19, 2022), rice farmers in several areas in Polokarto District believe that farming is a way to honor ancestors as well as a means of making a living.

One of the elements influencing the younger generation's decision to become farmers is gender. A male person is more likely than a female to become a farmer. This is supported by statistics that indicate over 90% of rice farmers in Polokarto District are men[8]. According to [17] research, there is a preponderance of male labor in the agricultural sector because some people believe that males are physically stronger and that farming is generally linked with hard labor.

The size of the family and the number of children in the household affect young farmers' desire to leave the agricultural industry and enter the non-agricultural one. [18] Someone will be motivated to raise their salary in order to satisfy their demands if they have family obligations. This has a lot to do with the idea that being a farmer is a reflection of poverty [5]. The Polokarto District's rice farmers earn between Rp 2,000,000 and Rp 5,000,000 on average every harvest period, which is indicative of this fact. [13] The degree of home duties eventually has a significant influence on the next generation's propensity to select a field of work.

Conducting research on the younger generation's interest in farming as a career is crucial to gaining a thorough understanding of how low agricultural regeneration happens, particularly in Polokarto District, Sukoharjo. Young people's likelihood of farming is impacted by factors such as home duties, income, gender, education, and land ownership. The factors influencing the younger generation's interest in working in the rice agriculture sector in Polokarto District, Sukoharjo Regency, are discussed in this study based on this explanation.

RESEARCH METHOD

The dependent variable chosen in this study is the interest of individuals working in the agricultural sector in Polokarto District, with five selected villages including Polokarto, Karangwuni, Wonorejo, Kenokorejo, and Bakalan, measured based on categories. Interest in working is categorized into interest in working in agricultural activities = 1 and interest in working in non-agricultural activities = 0. The independent variables in this study are wages, land ownership, education, family dependents, and gender: these variables are measured based on the gender of respondents who choose to work in the agricultural sector, with males = 1, and females categorized as = 0.

The data used in this research are primary and secondary data. Secondary data were obtained from relevant agencies or government institutions, including data on the number of labor force and rice farmers in 2022 in Polokarto District. Primary data were obtained directly from the labor force working in the rice agriculture sector in Polokarto District for descriptive analysis through observation techniques and in-depth interviews.

The following criteria were used to select the population for the study: (1) the working-age population (15–39 years) who work as rice farmers, both landowners and laborers; (2) the working-age population (15–39 years) who have received formal education; and (3) the working-age population (15–39 years) whose

families own rice fields. A population is "a generalization area consisting of objects and subjects that have certain characteristics and are determined by the researcher to be studied and then concluded" [19]

A sample is a part of the quantity and characteristics possessed by a population, so sampling must use a specific method based on existing considerations. [19] The sampling technique used in this research is probability sampling with the random sampling method, which is a sampling technique that gives all members of the population an equal chance to be selected as research samples. The sample in this study was set at 100 rice farmers and non-farmers aged (15-39 years) with a distribution of 20 farmers from each of the five villages (Polokarto, Karangwuni, Wonorejo, Kenokorejo, Bakalan) in the Polokarto District.

One of the elements that significantly influences the effectiveness and efficiency of a research project is the data gathering methodology. Both primary and secondary data were used. Field observation, document analysis and literacy statistics from pertinent government agencies, interviews, literature reviews, and questionnaires are the methods utilized to obtain data for this study.

The logistic regression approach is the data analysis technique employed in this study. adopted to examine the variables, which are dummy variables, that impact the younger generation's (15–39 years old) enthusiasm in pursuing careers in rice cultivation in Polokarto District. The logistic regression model's flexibility stems from the fact that it does not rely on the assumption that the independent variables in the model are normal [20]. Further, logistic regression ignores heteroscedasticity and uses varying independent variables [21] In this study, a binary logistic regression model—a logistic regression with two categories or a binomial on its dependent variable—was employed [22]. The basic equation function model of this research is as follows:

Y = f (wage, land area, education, family dependents, gender)

In logistic regression, the variables are dummy variables ranging between 0 and 1, so the econometric equation of this study is as follows:

 $\ln(p/(1-p))=\beta 0+\beta 1$ Wagei + $\beta 2$ Landareai + $\beta 3$ Educationi + $\beta 4$ Fam.Depeni + $\beta 5$ genderi + e

Describtions;

Statistical testing to determine whether the variables or models used are significant or not, both individually and as a whole. The statistical tests conducted are: Individual parameter significance test (z-test), Coefficient of determination (*R*2), Likelihood Ratio Test.

RESULT AND DISCUSSION

Polokarto District is an area with an agricultural-based sector, particularly food commodities such as rice. The majority of the rice varieties planted are Ir 64 and Pepe. The rice commodity in Polokarto District significantly contributes to the total rice production in Sukoharjo Regency. This fact is in line with the large number of rice farmers in Polokarto District, reaching 6,919 farmers in 2020, as shown in Table 4.

	Age 25-	Age 35-	Age	
Year	34	64	>65	Total
2015	586	4532	2212	7330
2016	578	4556	2212	7346
2017	550	4423	2201	7174
2018	543	4431	2042	7016
2019	502	4429	1987	6918
2020	502	4429	1987	6918

 Table 4. The Number of Rice Farmers in Polokarto District from 2015-2020

Source: (Balai Penyuluh Pertanian Kecamatan Polokarto., 2022)

Based On Table 4, It Shows That The Number Of Farmers In Polokarto District Has Decreased, Especially Farmers Aged 25-34 Years, With The Smallest Number. This Reality Is Very Dangerous Because It Affects The Low Regeneration Of Farmers, Especially Since The Rice Farming Sector Is A Staple Food.

The perception that farming is a blue-collar job makes the younger generation reluctant to engage in agriculture. Another perception states that the interest in working in the agricultural sector is driven by the expanse of land previously inherited from parents, so whether they like it or not, they have to cultivate the inherited land.

The Interest Of The Younger Generation In Polokarto District To Work In The Agricultural Sector Is Influenced By Various Factors Besides The Size Of The Land And Expectations Regarding Wages. In Determining The Type Of Work, Income Or Wages Become A Consideration For Each Individual. A Rational Individual Will Choose A Job With A Higher Wage Level Than Other Jobs. The Number Of Family Dependents Also Influences An Individual In Choosing Their Type Of Work. The More Dependents There Are In The Family, The More Likely The Individual Will Choose A Job With Wage Certainty. In Contrast, In The Agricultural Sector, Wage Levels Are Uncertain And Prices Often Fluctuate.

The Workforce In The Agricultural Sector Is Dominated By Men. According To Giatno, A Young Farmer Activist In Sukoharjo Regency, This Happens Because Farming Is Considered A Rough Job And Is Associated With Men, Resulting In Very Few Women Deciding To Work In The Rice Farming Sector.

The number of samples used in this study is 100 people within the age range of 15-39 years in Polokarto District. The characteristics of the respondents in this study are viewed from several variables including wages, land area, education, number of dependents, and gender. The majority of respondents in Polokarto District work in the rice farming sector, accounting for about 73 percent of the total respondents. The expectation of farming wages because of the minimum wage is lower compared to not because of the minimum wage, indicating that respondents believe working in the agricultural sector is not influenced by wage expectations based on the minimum wage.

Variable	Coefficient	Std. Error	z-Statistic	Prob.
С	1.413340	1.678306	0.842123	0.3997
Wage	2.226716	1.561509	1.926002	0.0139
Land Area	0.000190	0.001025	2.185250	0.0030
Education	-0.039393	0.123290	-0.319517	0.7493
Family Dependensts	-0.456776	0.157738	-2.895788	0.0038
Gender	0.074406	0.404458	2.183965	0.0040
McFadden R-squared	0.790375	Mean dependent va	ur	0.773810
LR statistic	70.99006	Avg. log likelihood	l	-0.112072
Prob(LR statistic)	0.000000			
Obs with Dep=0	19	Total obs		86
Obs with Dep=1	65			

Tabel 5. Probit Regression Result

Wald Test (Partial Z Test)

- Wages Have A Significant Impact On Interest In Working In The Agricultural Sector, As Indicated By The Wage Variable's Coefficient Value Of 2.226716 And Significance Probability Value Of 0.0139<0.05.
- 2. The land area variable has a significant impact on the younger generation's interest in working in the agricultural sector, as evidenced by its coefficient value of 0.000190 and significance probability value of 0.0030 < 0.05.
- 3. The Education Variable Has A Coefficient Value Of -0.039393 With A Significance Probability Value Of 0.7493 > 0.05, Education Does Not Have A Significant Influence On The Interest Of The Younger Generation To Work In The Agricultural Sector.
- 4. The number of family dependents has a significant impact on the younger generation's interest in working in the agricultural sector, as indicated by the variable's coefficient value of -0.456776 and significance probability value of 0.0038 < 0.05.

5. A young guy is significantly more interested in working in the agricultural sector than a young woman, according to the gender variable, which has a coefficient value of 0.07446 and a significance probability value of 0.0040 < 0.05.

Simultanity Test (Likelihood Ratio Lr)

The Independent Variables (Gender, Wages, Land Area, Years Of Education, And Number Of Family Dependents) Collectively Have A Significant Impact On The Younger Generation's Interest In Working In The Rice Farming Sector, According To The Regression Results, Which Show That The Likelihood Ratio (Lr) Value Is 70.99006 With A Lr Test Probability Value Of 0.0000 < 0.05.

Goodness Of Fit Model Test

The Mcfadden R-Squared Value, Which Measures The Coefficient Of Determination, Is Used To Quantify How Variable The Independent Variables Are In Explaining The Dependent Variable. The Mcfadden R-Squared Value Is 0.790375, According To Table 5. This Shows That 79% Of The Younger Generation's Interest In Working In The Rice Agriculture Sector Can Be Explained By The Independent Variables (Gender, Wages, Land Area, Years Of Education, And Number Of Family Dependents), With 21% Coming From Variables Not Included In The Model.

Regression Model Suitability Test

A fit between the research model and the research data is assessed using the Regression Model Feasibility Test. The Chi Square value, which is determined by examining the output findings of the Hosmer and Lemeshow's Goodness of Fit Test, may be used to determine this in the Model Feasibility Test. The outcome may be ascertained by comparing the output findings' significance probability with a 5% significance threshold.

Tabel 6. Hosmer and Lemeshow's Result Test

H-L		
Statistic	27.8221 Prob. Chi-Sq(8)	0.1725
Andrew		
S		
Statistic	68.2472 Prob. Chi-Sq(10)	0.0000
Statistic	00.24721100. CIII-Sq(10)	0.0000

The Hosmer And Lemeshow Test Results For The Model Feasibility Test Have A Chi Square Probability Of 0.1725, According To Table 6. It Is Confirmed That H0 Is Accepted By The Test Results, Which Show That The Criteria Are Consistent With The Feasibility Of The Regression Model. The Data From The Research Observations And The Estimated Logistic Regression Model Did Not Differ, According To The Chi Square Value Of 0.7893 > 0.05. This Shows That The Regression Model Is Thought To Be Workable And Suitable For The Study.

Discussion

The Z-Statistic Value Results For Every Independent Variable Determining Individual Interest In A Career In Rice Agriculture In Polokarto District. Table 7 Below Shows How The Odds Ratio Value Was Calculated:

Table 7. Odds Ratio Value			
Variabel	Koefisien	Odds Ratio = e^koefisien	
С	1.413340	4.11	
Wage	2.226716	9.28	
Land Area	0.000190	1.00	
Education	-0.039393	-0.96	
Family Dependensts	-0.456776	-0.63	
Gender	0.074406	1.08	

The Effect Of Wages On The Interest Of The Younger Generation To Work In The Rice Agriculture Sector

The Wage Variable Has A Coefficient Value Of 2.226716 With An Odds Ratio Of 9.28 And A Positive Value, Meaning Individuals Who Expect Wages In The Agricultural Sector To Match The Minimum Wage Have A 9.28 Percent Higher Interest In Farming Compared To Those Who Expect Wages In The Agricultural Sector To Be Below The Minimum Wage, Assuming Ceteris Paribus. Wages Are The Level Of Income That Greatly Determines A Person's Interest In Working. Based On Rahmad, A Young Farmer From Polokarto District, He Stated:

"If I work in the agricultural sector, it's because it suits me, sir. So if calculated monthly, I earn 2-3 million, which is already higher than the minimum wage. If I didn't earn that much, I might work in a more profitable sector, like a bank or another place with a fixed salary."

Expectations Regarding Wages In The Agricultural Sector That Meet Minimum Standards Encourage Young Generations To Work In The Agricultural Sector. The Results Of This Study Align With [14], Who States That Income Levels Significantly Affect Individuals' Interest In Working In The Agricultural Sector.

The Effect Of Land Area On The Interest Of The Younger Generation To Work In The Rice Agriculture Sector

The Land Area Variable Has A Coefficient Value Of 0.000190 With An Odds Ratio Value Of 1.00 And Is Positive, Meaning That The Larger The Land Area Owned By An Individual, The More It Will Significantly Increase Interest In Farming By 1 Percent, Assuming Ceteris Paribus. The Land Area Directly Reflects The Production Results Of Rice Commodities And The Income Received From Agricultural Yields. Therefore, The Larger The Land Area Owned, The More The Agricultural Sector Will Be Highly Sought After By The Younger Generation.

The Results Of This Regression Are In Line With [14] Research Titled "Analysis Of Factors Affecting The Interest Of Labor To Remain In The Agricultural Sector (Case Study Of Pujon District)" Which States That Land Area Influences The Interest In Working As A Farmer. Sumarsi In An Interview On December 17, 2022, Stated:

"I decided to become a farmer because my father's inherited rice field is very vast, and the harvest is more than enough to meet my living needs rather than working in a factory with a minimum wage. Since I also didn't graduate from vocational school, I just focused on farming the land of my parents" Then Rahmat, as the respondent, also stated:

"I chose to work as a rice farmer because I inherited the land from my grandfather. If I don't cultivate it, who else will? Besides, if the land is quite large, it can be profitable. So, it's like a perfect match for me." Based On The Statement, It Can Be Concluded That For Individuals Who Have Large Land Areas, The Profits From Farming Are High, Making Working In The Agricultural Sector Promising For Meeting Needs. Therefore, If The Land Area Is Small, The Interest In Becoming A Farmer Is Low, Because The Price Of Rice Commodities Tends To Be Unstable And Harvests Are Greatly Affected By The Seasons, As Stated By Islah In An Interview On January 12, 2023:

"The area of my rice field is only 700 meters, not much, so farming rice for me is just a side job while working at the plywood factory. The harvest is only enough for food, not for sale, especially if the harvest fails, sometimes I don't bring any rice home at all."

The Effect Of Land Ownership Is One Of The Factors That Affects A Person's Decision To Work In The Agricultural Sector. The Conversion Of Land To The Industrial Sector And The Establishment Of Factories And Other Buildings Also Contribute To The Reduction Of Agricultural Land.

The Effect Of Education On The Interest Of The Younger Generation To Work In The Rice Agriculture Sector

The Education Variable Has A Coefficient Value Of -0.039393 With An Odds Ratio Of -0.96 And A Negative Value, Meaning That The Higher The Education, The Lower The Interest In Working In The Agricultural Sector By 0.96 Percent Assuming Ceteris Paribus. Education Reflects The Level Of Knowledge Possessed By Each Individual, Which Will Influence A Person's Choice Of Work. Sugiatmo, As The Head Of The Bpp Polokarto Subdistrict, Stated In An Interview (December 4, 2022) That The Actual Number Of Young People Working In The Rice Agriculture Sector Is Statistically Quite Low. This Reality Is Partly Influenced By The Level Of Education.

"Children who graduate from high school or university are usually rarely interested in farming; they choose office jobs, perhaps because of the uncertainty of income. In addition, the large number of family dependents encourages them to work with a fixed income. If farming doesn't guarantee income, then look for something stable that provides a monthly income."

Expectations Regarding Higher Education Are To Obtain Jobs With High Wages, This Contrasts With The Reality Of Working In The Agricultural Sector, Especially In Indonesia. Because The Wages From Farming Are Considered Less Profitable. Yasin, One Of The Young Generations In Polokarto District, Stated:

"Farming, in my opinion, is difficult; it can be profitable on one hand but detrimental in a short time. Uncertain prices, lack of technology, and low government support, especially in price regulation, make us young people reluctant to farm. Besides, we have a higher education, right? The expectation is to get an office job, not to become manual laborers like farming."

Respondents Working In The Agricultural Sector Are Dominated By Elementary And Middle School Graduates, With Only A Few Completing High School Or Higher Education. Based On Kristanto, As A Young Farmer, He Stated:

"I didn't finish high school. Well, if you only graduated from middle school, you can usually only become a farmer. You can't work in other sectors either because the requirement is at least a high school diploma or a bachelor's degree. It's different for my friend who graduated with a bachelor's degree; he got an office job and didn't want to work in the agricultural sector either. The income is also uncertain."

Higher Education Tends To Decrease Individuals' Interest In Working In The Agricultural Sector, Especially Among The Younger Generation. Increasing Knowledge Expands A Person's Opportunities To Work In Other Sectors That Are Considered More Profitable, Particularly Formal Jobs.

The Effect Of Family Dependents On The Interest Of The Younger Generation To Work In The Rice Agriculture Sector

The Variable Of The Number Of Family Dependents Has A Coefficient Value Of -0.456776 With An Odds Ratio Of -0.63, Indicating A Negative Value. This Means That The More Family Dependents There Are, The Lower The Interest In Working In The Agricultural Sector By 0.63 Percent, Assuming Ceteris Paribus. Family Dependents Indicate The Level Of Household Expenditure, Where The More Dependents There Are, Assuming A Constant Income, Individuals Tend To Seek Additional Income Or Work In Other Sectors With Higher Earnings. Sutikno, As The Respondent, Stated:

"If farming has uncertain income, then if the family burden increases, of course, I will look for a job with a stable and higher income. If farming is the only option, it's not feasible because the income is not guaranteed."

The Results Of This Study Are In Line With [14], Who Stated That The More Dependents A Family Has, The Lower The Interest For An Individual To Work In The Agricultural Sector. This Is Because, In Reality, Working In The Agricultural Sector Is Fraught With Uncertainty In Obtaining Income Due To The Unpredictable Harvest Yields.

The Effect Of Gender On The Interest Of The Younger Generation To Work In The Rice Agriculture Sector

The Gender Variable Has A Coefficient Value Of 0.074406 With An Odds Ratio Of 1.08 And A Positive Value, Meaning That Young Men Have A 0.63 Percent Higher Interest In Working In The Agricultural Sector Compared To Women, Assuming Ceteris Paribus. Gender Plays A Significant Role In Determining A Person's Choice Of Employment Status. Farming Is Identified With Rough Work, Thus Dominated By Male Labor. Sumarni, As A Respondent In The Interview (January 12, 2023), Stated:

"The woman is faced with a difficult choice; on one hand, she has to manage household chores and social activities, and if there is someone who is truly interested, perhaps work. But of course, if the job is farming, it's not possible because farming is a rough job that requires strong hands, and women can only help a little bit."

The Results Of The Research Are In Line With The Findings Of [12], Which State That Individuals Of The Male Gender Have A Greater Opportunity To Decide To Work In The Agricultural Sector, Especially If Their Parents Are Farmers And Own Productive Land.

CONCLUSION

Based On The Research Results, The Following Conclusion Can Be Drawn:

- 1. The variables of wages, land area, number of dependents, and gender partially have a significant influence on the interest of the younger generation to work in the agricultural sector.
- 2. The Education Variable Partially Has No Significant Effect On The Interest Of The Younger Generation To Work In The Agricultural Sector. That Is, The Higher The Individual's Education, The More They Tend To Choose To Work In Sectors Other Than The Rice Agricultural Sector.

- 3. The Wage Variable Has The Greatest Influence With A Probability Of 9.28 Percent On The Interest Of The Young Generation In Polokarto District To Work In The Rice Agriculture Sector. This Is Because Wages Are An Important Factor In Influencing An Individual's Interest In Working In The Agricultural Sector. The Uncertainty Of Wages Or Income In The Rice Agriculture Field And The Frequent Fluctuations In Prices In The Agricultural Sector Are Factors That Cause An Individual To Choose Not To Work In The Rice Agriculture Sector.
- 4. The variable of the number of family dependents has the smallest influence with a probability of 0.63 percent on the interest of the younger generation in Polokarto District to work in the rice farming sector.
- Independent Variables (Wages, Land Area, Number Of Dependents, Education, And Gender) Simultaneously Have A Significant Impact On The Interest Of The Young Generation In Polokarto District To Work In The Rice Agriculture Sector.

REFERENCES

- [1] S. N. Arofah and A. H. Setiawan, "Analisis Determinan Penawaran Tembakau (Studi Kasus: Fenomena Patron-Klien Antara Petani Tembakau Dan Tengkulak Di Desa Katekan, Kecamatan Ngadirejo, Temanggung)," *BISECER (bus. Econ. Entrep.*, vol. 5, no. 1, p. 19, 2022, doi: 10.61689/bisecer.v5i1.291.
- [2] BPS, "Distribusi Sektor Pertanian Terhadap PDRB Indonesia," 2021.
- [3] L. Muta'ali, *Dinamika Peran Sektor Pertanian Dalam Pembangunan Wilayah Di Indonesia*. UGM PRESS, 2021.
- [4] U. Isbah and R. Y. Iyan, "Analisis peran sektor pertanian dalam perekonomian dan kesempatan kerja di Provinsi Riau," *J. Sos. Ekon. Pembang.*, vol. 7, no. 19, pp. 45–54, 2016.
- [5] R. Saleh, I. Oktafiani, and M. Y. Sitohang, "Sulitnya Regenerasi Petani pada Kelompok Generasi Muda," J. Stud. Pemuda, vol. 10, no. 1, pp. 1–17, 2021.
- [6] I. K. Suratha, "Krisis Petani Berdampak Pada Ketahanan Pangan di Indonesia," pp. 67–80, 2013.
- [7] BPS, "Jumlah Petani di Indonesia Tahun 2012-2021," 2022.
- [8] Dinas Pertanian dan Perkebunan Provinsi Jawa Tengah, "Produksi Padi tiap Kabupaten/Kota di Provinsi Jawa Tengah," 2022.
- [9] N. Setyowati, "Analisis Peran Sektor Pertanian Di Kabupaten Sukoharjo," *Sepa*, vol. 8, no. 2, pp. 174–179, 2012.
- [10] T. N. Padilah and R. I. Adam, "Analisis Regresi Linier Berganda Dalam Estimasi Produktivitas Tanaman Padi Di Kabupaten Karawang," *FIBONACCI J. Pendidik. Mat. dan Mat.*, vol. 5, no. 2, p. 117, 2019, doi: 10.24853/fbc.5.2.117-128.
- [11] E. Y. Arvianti, M. Masyhuri, L. R. Waluyati, and D. H. Darwanto, "Gambaran Krisis Petani Muda Indonesia," *Agriekonomika*, vol. 8, no. 2, pp. 168–180, 2019, doi: 10.21107/agriekonomika.v8i2.5429.
- [12] D. Khaafidh, M dan Poerwono, "Faktor-Faktor yang Mempengaruhi Keputusan Tenaga Kerja untuk Berkerja di Kegiatan Pertanian," *J. Econ.*, vol. 2, no. 2, pp. 1–13, 2013.
- [13] Balai Penyuluh Pertanian Kecamatan Polokarto., "Luas Panen, Produksi Padi, dan Jumlah Petani di Kecamatan Polokarto," 2022.
- [14] N. Y. Afifah, "SEKTOR PERTANIAN (Studi Kasus Kecamatan Pujon)," 2014.
- [15] L. C. Rodríguez and J. A. G. Casimiro, "How to make prosperous and sustainable family farming in Cuba a reality," *Elem. Sci. Anthr.*, vol. 6, no. December 2018, 2018, doi: 10.1525/elementa.324.
- [16] D. A. Iyai, "Pengaruh nilai budaya lokal terhadap motivasi bertani Suku Arfak di Papua Barat," *J. Peternak. Sriwij.*, vol. 5, no. 1, 2016.
- [17] Y. A. Gobel, "Determinan Faktor Yang Berhubungan Dengan Keterlibatan Pemuda Pedesaan Pada Program Ketahanan Pangan Di Desa Molowahu Kabupaten Gorontalo," *Agrilan J. Agribisnis Kepul.*, vol. 9, no. 2, pp. 170–189, 2021.
- [18] T. Pranadji and G. S. Hardono, "Dinamika Penyerapan Tenaga Kerja Pertanian," 2015.
- [19] I. Ghozali, *Aplikasi analisis multivariate dengan SPSS*, vol. 40. 2005.
- [20] I. Ghozali, Aplikasi Analisis Multivariate dengan Program IBM SPSS 25. 2018.
- [21] D. N. Gujarati and D. C. Porter, *Dasar-dasar ekonometrika, Basic econometrics*. Jakarta: Salemba Empat, 2015.
- [22] A. Kuncoro, *Microeconomic determinants of economic growth in East Asia*. Citeseer, 2001.