



ANALYSIS OF POVERTY IN AREA III CIREBON

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ABSTRACT

This research is a study of the effect of population, mean years of school, life expectancy, and COVID-19 on poverty in Region III Cirebon districts/cities, which include Cirebon City, the Cirebon Regency, the Majalengka and Kuningan Regencies, and the Indramayu Regency. The type of data in this research is secondary data for the 2010-2021 time series and cross-sectional data for five regions, while the data analysis technique used is panel data regression analysis. Based on the analysis's findings, it was discovered that 1) There is no significant effect between population on poverty; 2) there is a significant influence between the average length of schooling on poverty; 3) there is a significant influence between life expectancy and poverty; 4) there is a significant influence between the COVID-19 dummy on poverty; 5) the fourth variable in the study together has a significant effect on poverty; and 6) the four independent variables in the study can explain changes in the poverty dependent variable by 85.09 percent.

Keywords: Population, Mean Years of School, Life Expectancy, COVID-19, Poverty

ABSTRAK

Penelitian ini merupakan penelitian mengenai pengaruh jumlah penduduk, rata-rata lama sekolah, angka harapan hidup, dan COVID-19 terhadap kemiskinan di kabupaten/kota Wilayah III Cirebon yang meliputi Kota Cirebon, Kabupaten Cirebon, Kabupaten Indramayu, Kabupaten Majalengka, dan Kabupaten Kuningan. Jenis data dalam penelitian ini adalah data sekunder runtun waktu tahun 2010-2021 dan data silang lima daerah, sedangkan teknik analisis data yang digunakan adalah analisis regresi data panel. Berdasarkan hasil analisis ditemukan bahwa: 1) Tidak terdapat pengaruh signifikan antara jumlah penduduk terhadap kemiskinan; 2) terdapat pengaruh signifikan antara rata-rata lama sekolah terhadap kemiskinan; 3) terdapat pengaruh signifikan antara angka harapan hidup terhadap kemiskinan; 4) terdapat pengaruh signifikan antara dummy COVID-19 terhadap kemiskinan; 5) keempat variabel dalam penelitian secara bersama-sama berpengaruh signifikan terhadap kemiskinan; dan 6) keempat variabel bebas dalam penelitian dapat menjelaskan perubahan pada variabel terikat kemiskinan sebesar 85,09 persen.

Kata Kunci: Jumlah Penduduk, Rata-Rata Lama Sekolah, Angka Harapan Hidup, COVID-19, Kemiskinan

JEL: J10; I35; I32

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Introduction

The high number of poor individuals in these locations is one sign that poverty is still a concern in many parts of Indonesia. A person's average monthly spending per person can be used to calculate their percentage of poverty, which is expressed as a percentage. According to the [BPS \(2023a\)](#), the poverty line represents the minimum amount of rupiah required to meet necessities for food and non-food items, totaling 2,100 kilocalories per person per day. The percentage of poor people can also be defined as representing conditions where people cannot meet basic and other needs according to specific quality-of-life standards.

In Indonesia, one area with a relatively high percentage of poor people is West Java Province. Figure 1 shows that in 2020 - 2021, West Java Province had the fourth-highest percentage of poor people on Java Island, followed by Banten Province and DKI Jakarta Province. Figure 1 depicts the proportion of those living in poverty or the poverty rate in West Java Province and other provinces on Java Island.

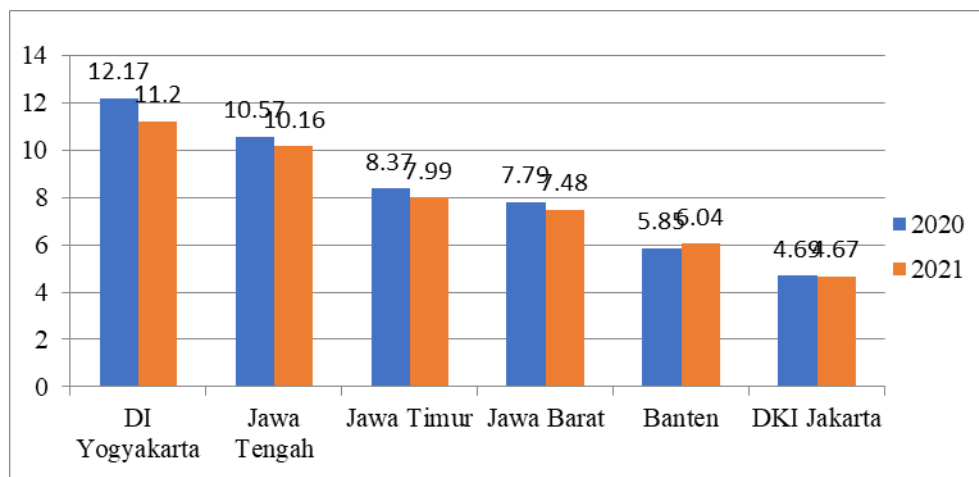


Figure 1: Percentage of Poor Population by Province in Java Island, 2020 – 2021

Source: [BPS \(2022b\)](#), Data Processed

Regarding the percentage of poor people in West Java Province, although there has been a decrease in the poverty percentage from 7.79 percent to 7.48 percent, this is still not enough when looking at the development priorities of West Java Province every year, including the massive infrastructure development both are still in the planning stages or have already been realized, such as the construction of the Cileunyi-Sumedang-Dawuan (Cisumdawu) toll road, the Cikopo-Palimanan (Cipali) toll road and the West Java International Airport (BIJB) Kertajati which was completed on May 25, 2018.

Many regions and several districts/cities contribute to the high percentage of poor people in West Java Province, namely districts/cities in Region III Cirebon or commonly called Ciayumajakuning, which includes Cirebon City, the Cirebon Regency, the Majalengka and Kuningan Regencies, and the Indramayu Regency. The following data shows the percentage of poor people in Region III Cirebon.

From Figure 2, It is evident that although the district/city poverty rate in Region III Cirebon is still lower than the poverty rate in Tasikmalaya City, the district/city poverty rate in Region III Cirebon can be categorized as high when compared to other districts/cities in West Java Province. Even four of them are included in the top five regions with the highest poverty rate in West Java Province, which includes Kuningan Regency, Indramayu Regency, Majalengka

Regency, and Cirebon Regency, with their respective poverty percentages of 13.10 percent, 13.04 percent, 12.33 percent, and 12.30 percent.

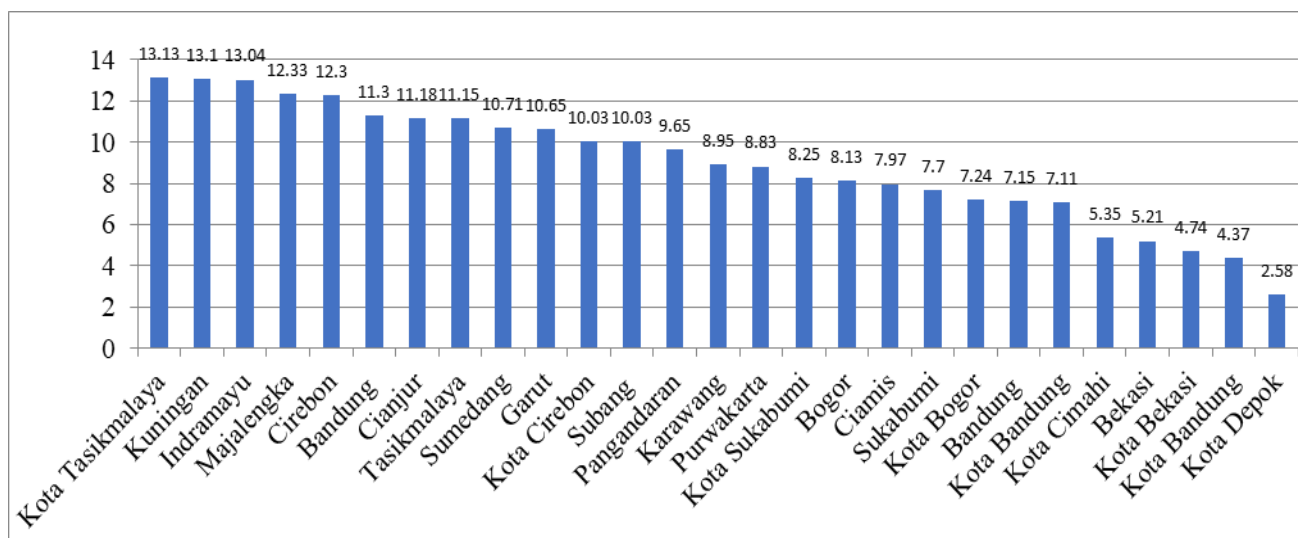


Figure 2: Percentage of Poor Population by Regency/City in West Java Province, 2021

Source: [BPS \(2022c\)](#), Data Processed

When translated, the reason for the districts/cities in Region III Cirebon to be in the spotlight is because of the problem of poverty, not only because of the high percentage of poor people, which at the same time also plays a role as a region that contributes the most significant percentage of poverty in West Java Province, but also because of development, especially from infrastructure, which is very massive in the regency/city.

Apart from the infrastructure development taking place in the districts/cities in Region III Cirebon/Ciayumajakuning, the large population is also a concern and may be one of the factors causing the high level of poverty in the districts/cities in Region III Cirebon. It follows Nelson and Leibstein's statement that rapid population growth in developing countries can cause people's welfare not to improve, and welfare can decrease in the long term ([Trisnu & Sudiana, 2019](#)).

In addition to the increase in population, the quality of human resources or aspects of human development needs to be examined for its effect on the poverty level. If jobs and basic facilities such as education and health, including food needs, are not met, then the increase in population will also increase the number of poor people.

Related to the aspect of human development, investment in human resources will not only contribute significantly to economic growth but will also contribute to increasing welfare. In addition, development has various problems and should occur in all aspects of people's lives, including economic, social, political, and cultural aspects. The focus on infrastructure development in Region III Cirebon is unfortunate if human development, as reflected in education indicators, still needs to be higher than in several other districts/cities in West Java Province.

Apart from education, indicators of human development are also reflected in the level of public health, such as the Life Expectancy Rate (AHH). According to the [BPS \(2023b\)](#), AHH is the estimated average lifespan of a person starting at birth. Like AHH, the [Gunung Kidul District Health Office \(2018\)](#) defines life expectancy as the number of years people have lived to a certain age or the average remaining chance of life.

Apart from AHH, the emergence of Corona Virus Disease 2019 (COVID-19) in early 2000 directly impacted public health and indirectly impacted people's welfare. It can be seen from the reduced income and increased unemployment due to declining company revenues and the closure of various businesses, which required termination of employment.

Considering the issues that have been raised, it is essential to examine how the influence of human development indicators such as education and health, as well as the large population on the high poverty problem in districts/cities region III Cirebon, given that West Java province is also the province with the largest population in Indonesia (BPS, 2023a).

Literature Review

According to Huda (2015), poverty is a condition where a person cannot fulfill what he needs fundamentally, where disability other than basic needs does not include poverty. Meanwhile, the Ministry of National Development Planning (Bappenas) defines poverty as the inability of an individual or a community to live a dignified life (Arsyad, 2010). Meanwhile, BPS (2023b) views poverty as a form of economic incapacity used to meet basic food and non-food needs by measuring expenditure share. Residents are classified as poor if they have an average monthly expenditure per capita below the poverty line.

Education is one of the many ways to improve a person's quality of life economically and socially, as well as to overcome inequalities to achieve equality and create a prosperous life. According to Education is a deliberate and planned effort to establish an environment for learning and a process for learning in which students actively explore their potential to have spiritual and religious power, self-control, personality, intelligence, and a noble character, as well as the skills required by himself, society, nation, and state. This effort is described in Law Number 20 of 2003 concerning the National Education System. Quantitative Education can be projected by the average length of schooling, defined as the number of years used by the population in undergoing formal Education, where the maximum average length of schooling based on The United Nations Development Program and BPS standards is 15 years. Regarding the influence of the average length of schooling on poverty, the results of To'oki et al. (2022) show that the average length of schooling negatively and significantly impacts poverty.

Health is an investment in human resources to achieve equality and create a prosperous life. It is because, either directly or indirectly, an increase in health will affect the increase in labor productivity, increasing income. The level of public health can be projected by life expectancy, where an increase in life expectancy can be a measure seeing the extent to which the health of individual people is developing because healthy individuals will have the possibility of living longer (Dores & Koto, 2014). Meanwhile, COVID-19 is a contagious illness brought on by a recently identified form of coronavirus, a family of viruses that can harm humans or animals. Regarding the effect of life expectancy on poverty, the results of research by Hasanah et al. (2021) show that life expectancy significantly negatively affects the poverty rate. Meanwhile, regarding the influence of COVID-19 on poverty, Wibisono (2022) explained that The COVID-19 epidemic significantly contributed to the rise in the population of people experiencing poverty.

Based on the 2020 population census, what is meant by residents are Indonesian citizens (WNI) and foreigners who live in Indonesian territory and have resided/ intend to stay for at least one year (BPS, 2022a). The population results from demographic processes: fertility, mortality, and migration. If income and other factors are assumed to be constant, in addition to reducing per capita income, having more family members will make it harder for people to meet their basic requirements, raising the likelihood of falling into a cycle of poverty.

The findings of [Azizah et al. \(2018\)](#) indicate that population has a favorable and significant impact on poverty concerning this issue. [Sianturi et al. \(2021\)](#) further demonstrates that the rate of population expansion significantly and favorably impacts poverty.

Methods

The objects in this study are poverty (poverty percentage/percentage of poor people), population, the average length of schooling, life expectancy, and dummy COVID-19 in districts/cities region III Cirebon. This research adopted a quantitative methodology with descriptive methods. A literature review was used to conduct this research. The data used were secondary time series data from 2010 to 2021 and cross-data of five regencies/cities in Region III Cirebon, which includes Cirebon City, the Cirebon Regency, the Majalengka and Kuningan Regencies, and the Indramayu Regency.

In general, this research has two types of variables: the independent variable and the dependent variable. The independent variables consist of the population (JP), the average length of schooling (RLS), life expectancy (AHH), and dummy COVID-19 (DC), while the dependent variable is poverty (KM). Based on the independent and dependent variables, the following is the equation for this study.

$$KM = f(JP, RLS, AHH, DC) \quad (1)$$

In the meantime, a panel-data regression analysis method using a semi-log regression model was applied for the data analysis in this work. Regression methodology, called panel data regression, mixes cross-data with time series data ([Basuki & Prawoto, 2016](#)). The data analysis model used in this study is the regression analysis model as follows:

$$KM_{it} = \beta_0 + \beta_1 \log JP_{it} - \beta_2 RLS_{it} - \beta_3 AHH_{it} + \beta_4 DC + e_{it} \quad (2)$$

One of three models, CEM, FEM, or REM, can be used to execute panel data analysis procedures. Meanwhile, to identify the best appropriate model for this study, three tests were used, namely: 1) Chow's test to test CEM and FEM; 2) the Hausman test to test FEM and REM; and 3) the Lagrange Multiplier test to test CEM and REM. After selecting the model, classical assumption and hypothesis testing were carried out.

Four tests are performed regarding the classical assumption test, including the normality test, multicollinearity test, heteroscedasticity test, and autocorrelation test. Meanwhile, the hypothesis testing carried out included the significant individual parameter t-test (t-test), the simultaneous significant F test (F test), and the coefficient of determination (R^2). Hypothesis testing can be described as follows.

- 1) Test the significance of individual parameters t. Using this test, we can observe how the independent variable affects the dependent variable. Because in the previous section, the direction of the relationship of each independent variable to the dependent variable was already known, the t-test in this study used a one-tailed test, where the statistical hypothesis used was a variable that had a positive relationship with poverty, namely:
 - a) $H_0: \beta_1, \beta_4 \leq 0$, there is no significant effect on poverty between the population variable and the COVID-19 dummy.
 - b) $H_a: \beta_1, \beta_4 > 0$, a significant influence exists between the population variable and the COVID-19 dummy on poverty.

With a significant level (α) of five percent, the criteria for decision-making on the hypothesis of a variable that is suspected of having a significant effect on the direction of a positive relationship are:

- a) If the $t_{\text{statistic}} > t_{\text{table}}$ or probability value < 0.05 , then H_0 is rejected, and H_a is accepted, meaning that there is a significant influence on poverty between the population variable and the COVID-19 dummy.
- b) If the $t_{\text{statistic}} \leq t_{\text{table}}$ or probability value ≥ 0.05 , then H_0 is accepted and H_a is rejected, meaning there is no significant effect on poverty between the population variable and the COVID-19 dummy.

Meanwhile, the statistical hypothesis used is a variable that has a negative relationship with poverty, namely:

- a) $H_0: \beta_2, \beta_3 \geq 0$, no significant effect exists between the variable school years and life expectancy on poverty.
- b) $H_a: \beta_2, \beta_3 < 0$, there is a significant influence on poverty between the average school years and life expectancy variables.

With an α of five percent, the criteria for deciding on the hypothesis of a variable that is suspected of having a significant effect on the direction of a negative relationship are:

- a) If the $t_{\text{statistic}} < t_{\text{table}}$ or probability value < 0.05 , then H_0 is rejected, and H_a is accepted, meaning that there is a significant influence between the variable average length of schooling and life expectancy on poverty.
- b) If $t_{\text{statistic}} \geq t_{\text{table}}$ or probability value ≥ 0.05 , then H_0 is accepted and H_a is rejected, meaning there is no significant effect on poverty between the variable average length of schooling and life expectancy.

2) Simultaneous significant test F. This test is used to see the effect of the independent variables on the dependent variable together. The statistical hypothesis used is:

- a) $H_0: \beta_1, \beta_2, \beta_3, \beta_4 = 0$, the population variables, the average length of schooling, life expectancy, and dummy COVID-19 have no significant effect on poverty.
- b) $H_a: \beta_1, \beta_2, \beta_3, \beta_4 \neq 0$, the population variables, the average length of schooling, life expectancy, and dummy COVID-19 together significantly affect poverty.

With an α of five percent, the decision-making criteria for the hypothesis above are:

- a) If $F_{\text{statistic}} > F_{\text{table}}$ or probability value < 0.05 , then H_0 is rejected and H_a is accepted, meaning that the variables of population size, the average length of schooling, life expectancy, and the COVID-19 dummy substantially impact poverty when combined.
- b) If $F_{\text{statistic}} < F_{\text{table}}$ or probability value > 0.05 , then H_0 is accepted and H_a is rejected, meaning that the variables of population, the average length of schooling, life expectancy, and dummy COVID-19 together have no significant effect on poverty.

3) The coefficient of determination measures the model's capacity to explain the differences in the dependent variable. The independent variable offers nearly all the information required to forecast the difference in the dependent variable if the R^2 value is close to one and vice versa if the R^2 value is close to 0.

Results and Discussion

Estimation Results

This section presents the results and discussion regarding the influence of the variables on population size, average school years, life expectancy, and the COVID-19 dummy in the districts/cities of Region III Cirebon. There are several stages of data analysis: 1) Test the model's accuracy; 2) classical assumption testing; and 3) t-test, F-test, and coefficient of determination tests are used for hypothesis testing.

The stages of model testing or model accuracy testing consist of two stages including: 1) The first stage is to choose the model that is most suitable for this study using the Chow test, where after testing, it is found that FEM is the best model compared to CEM because of the probability value the Chow test is less than the five percent significance level; 2) the second stage is to choose the most suitable model using the Hausman test (Lagrange Multiplier test is not used because based on the Chow test it is found that CEM is not the best model), where after testing it is found that FEM is the best model compared to REM because of the probability value of the Hausman test less than the 5% significance level.

After testing the most appropriate model and finding that FEM is the most suitable model for this study, the next stage is testing the classical assumptions, which consists of four stages, including **Normality test**, where by using the histogram of the residuals and comparing the values jarque-bera is known to have no normality problem because the probability of jarque-bera is more than 0.05; **Multicollinearity test**, where after testing using a correlation matrix, there is no multicollinearity problem because the value of the correlation coefficient between independent variables is less than 0.90; **Heteroscedasticity test**, where after testing using the Glejser test, there is no heteroscedasticity problem because the probability value of the independent variable is more than 0.05; and **Autocorrelation test**, where after testing using the Durbin Watson (DW) test there is no autocorrelation problem because the DW (d) value is greater than the upper limit value on DW (dU) (1.7671). The 4d value is more significant than dU.

The third stage, carried out after model testing and classical assumption testing, is hypothesis testing. After processing the data using FEM, the following is how the regression equation is created:

$$KM_{it} = 105.7381 + 1.060668 \log JP_{it} - 2.673271 RLS_{it} - 1.246666 AHH_{it} + 1.721458 DC_{it} \quad (3)$$

Based on the regression equation above, it is known that each independent variable has the following coefficients: 1) The population has a coefficient of 1.060668; 2) the average length of schooling has a coefficient of -2.673271; 3) life expectancy has a coefficient of -1.246666; and 4) dummy COVID-19 has a coefficient of 1.721458. The results of the t-test are as follows.

Table 1: t-test Results

Variable	t-Statistic	t-table	Probability	Conclusion
Total population	0.244765	2.004045	0.8076	Not significant
Average School Years	-3.835140	-2.004045	0.0004	Significant
Life expectancy Rate	-2.656373	-2.004045	0.0106	Significant
Dummy COVID-19	3.813546	2.004045	0.0004	Significant

From the results of the tests that have been carried out as contained in Table 1, the conclusions that can be drawn are: 1) The total population has a $t_{\text{statistic}}$ value of 0.244765 ($0.244765 < 2.004045$) and a probability value of $0.8076 > 0.05$, then H_0 is accepted and H_a is rejected, meaning that there is no significant effect between the population variable on poverty; 2) the average length of schooling has a $t_{\text{statistic}}$ of -3.835140 ($-3.835140 < -2.004045$) and a probability value of $0.0004 < 0.05$, then H_0 is rejected and H_a is accepted, meaning that there is a significant influence between variable average length of school to poverty; 3) life expectancy has a $t_{\text{statistic}}$ of -2.656373 ($-2.656373 < -2.004045$) and a probability value of $0.0106 < 0.05$, then H_0 is rejected and H_a is accepted, meaning that there is a significant influence between the number variables life expectancy against poverty; 4) the COVID-19 dummy has a $t_{\text{statistic}}$ of 3.813546 ($3.813546 > 2.004045$) and a probability value of $0.0004 < 0.05$, then H_0 is rejected and H_a is accepted, meaning that there is a significant influence between the dummy COVID-19 variables 19 against poverty.

Based on data processing outcomes, an F-statistic value of 35.65614 was obtained, and F-table was at a five percent significance level of 2.769431 ($35.65614 > 2.769431$). The test results also obtained a probability value (probability F-statistic) of 0.000000, which is smaller than 0.05. So, it can be concluded that H_0 is rejected and H_a is accepted, meaning that the variable population, average length of schooling, life expectancy, and the COVID-19 dummy together significantly affect poverty.

Meanwhile, based on the regression results, the coefficient of determination is 0.850857. It means that the independent variables of population, the average length of schooling, life expectancy, and dummy COVID-19 can explain changes in the poverty-bound variable of 85.09 percent, and the remaining 14.91 percent is explained by other variables outside those listed in the models.

Discussion

The Influence of Total Population on Poverty in District/City Region III Cirebon

Based on the regression results, a coefficient of 1.060668 is obtained with a probability of 0.8076 and a $t_{\text{statistic}}$ of 0.244765. At the 95% confidence level, it is known that there is no significant effect between the population variable on poverty in the district/city region III Cirebon. The results obtained are the same as previous studies conducted by [Mahsunah \(2013\)](#) and [Wiradyatmika & Sudiana \(2013\)](#), where the results concluded that partial population size has a positive and insignificant effect on poverty. [Hilmi et al. \(2022\)](#) also show that population size does not significantly affect the poverty rate.

There is no significant effect of population on poverty due to the composition of the district/city population in Region III Cirebon, in which people of productive age dominate. The domination of productive age in the composition of the population is ideal because there will be a lot of workforces available, which in the next stage can reduce the dependency burden. Most of the population will not significantly reduce the ability of other family members to meet their basic needs. They have a more significant opportunity to be absorbed in employment, even though their salary is relatively low because most of the population still works in the agricultural sector.

Effect of Average Length of School on Poverty in District/City Region III Cirebon

Based on the regression results, a coefficient of -2.673271 is obtained with a probability of 0.0004 and a $t_{\text{statistic}}$ of -3.835140. At the 95% confidence level, it is known that there is a negative effect and significance between the average length of schooling variable on poverty

in the district/city region III Cirebon. The results obtained are the same as previous research conducted by [Zebua et al. \(2015\)](#) and [Adinugraha \(2016\)](#), where the results show that the average length of schooling has a negative relationship and a significant effect on poverty. The research results obtained by [To'oki et al. \(2022\)](#) also show that the average length of schooling negatively and significantly impacts poverty.

In addition, the regression results in this study also strengthen the theory, which states that education can reduce poverty. Simmons in [Todaro \(2006\)](#) explains that education is a means of escaping poverty. The more education a person has, the better their chances are of finding employment that will allow them to live as far away from poverty as possible. Todaro and Smith (2003) in [To'oki et al. \(2022\)](#) argue that the education system implemented in an area will impact the individual characteristics and the economy of the community in that region. [To'oki et al. \(2022\)](#) also argued that one factor in poverty's causes is education, which has become a primary demand of society. Previously, [Hasibuan et al. \(2019\)](#) argued that the low level of education raises new problems, such as increasing unemployment and poverty in these variables.

Effect of Life Expectancy on Poverty in District/City Region III Cirebon

Based on the regression results, a coefficient of -1.246666 is obtained with a probability of 0.0106 and a $t_{\text{statistic}}$ of -2.656373. At the 95% confidence level, it is known that there is a significant negative effect between the variables of life expectancy on poverty in districts/cities region III Cirebon. The findings confirm previous studies by [Hasanah et al. \(2021\)](#), which showed that life expectancy considerably impacts the poverty rate in a negative relationship direction. Life expectancy can reflect the development or condition of public health; [Zahra et al. \(2019\)](#) explained that low levels of health and nutrition would result in low body resistance and decreased brain thinking power, which hinders activities in the workplace. Obstructed work can certainly reduce productivity. Suppose this happens to residents in conditions of a minimum standard of living. In that case, the population's standard of living may have decreased due to the loss in production, leading to a rise in the poverty rate.

The Effect of COVID-19 on Poverty in District/City Region III Cirebon

Based on the regression results, a coefficient of 1.721458 is obtained with a probability of 0.0004 and a t_{count} of 3.813546. At the 95% confidence level, it is known that there is a significant positive effect of the COVID-19 dummy variable on poverty in the district/city region III Cirebon. The results obtained are the same as previous research conducted by [Wibisono \(2022\)](#), where the findings demonstrate that the COVID-19 epidemic significantly increased the impoverished population.

The positive relationship between COVID-19 and poverty can be due to the increasingly widespread transmission of COVID-19 with a very high transmission rate, making the pandemic last longer. It affects almost all sectors of the economy. This impact will directly be felt by people who work in almost all sectors, especially the service sector and the informal sector, especially during the early days of the pandemic when social restrictions were being intensively carried out, where the impact felt by workers ranged from reduced wages to termination of employment. This condition causes the ability to meet minimum life needs to decrease. Apart from the economic sector, the impact of the COVID-19 pandemic has also directly affected public health, which has caused the community to be unable to carry out their usual work activities, which in the long term has had an impact on people's ability to meet their daily needs and this will have a very crucial effect on people who previously marginalized or on the threshold of the poverty line.

The Influence of Total Population, Average Years of Schooling, Life Expectancy, and Dummy COVID-19 on Poverty in District/City Region III Cirebon

Based on the regression results, it is known that the probability value F is 0.000000 and Fstatistic is 35.65614. The total population, average length of schooling, life expectancy, and the COVID-19 dummy significantly affect poverty in the district/city region III Cirebon. The coefficient of determination of 0.850857 indicates that the independent variables are population, the average length of schooling, and life expectancy, and the COVID-19 dummy can explain changes in the poverty-bound variable of 85.09 percent and the remaining 14.91% is determined by other variables outside those listed in the model.

Conclusion

Considering the findings of the investigation and the discussion in the preceding section, this study produced the following conclusions: 1) With the direction of a positive relationship, there is no significant effect between the variable population size and poverty; 2) the average length of schooling variable has a significant negative effect on poverty; 3) the variable life expectancy variable has a significant negative relationship with poverty; 4) the COVID-19 dummy variable has a significant positive relationship with poverty; and 5) the total population, average length of schooling, and life expectancy all have significant positive relationships with poverty; and 6) the independent variables of population, the average length of schooling, life expectancy, and the COVID-19 dummy can explain changes in the poverty-bound variable of 85.09 percent and the remaining 14.91 percent is explained by other variables outside those listed in models.

Based on the results of an analysis of poverty in Region III Cirebon, with the domination of the productive age population, it is found that the population has a positive relationship with poverty. It is hoped that the district/city government of Region III Cirebon can help increase employment opportunities with relatively high wages because what is more important than just the availability of jobs is how the working population can fulfill their life and fundamental needs with the income they receive. Because until now, the majority of the population is still working in the agricultural sector, the government is expected to make an actual policy oriented towards the welfare of farmers so that farmers and residents who work in the agricultural sector have a better standard of living.

The average length of schooling has a negative relationship and a significant influence on poverty in the district/city region III Cirebon, so the government can provide direct assistance or scholarships to the underprivileged school-age population to reduce dropout rates and increase continuing rates between levels of education. Given the importance of education so that people can be absorbed in jobs with relatively higher incomes, the government can encourage a catch-up program for residents whose age is over the school-age limit so that it can directly increase the level of education.

Life expectancy has a negative relationship and a significant influence on poverty in districts/cities Region III Cirebon, so the government can review preventive policies related to infectious diseases, considering that the population in districts/cities Region III Cirebon is huge. In addition to prevention, equity and improvement of health facilities must also be a concern so that the public can obtain the best health facilities and infrastructure apart from being easy to access.

Dummy COVID-19 significantly negatively affects poverty in districts/cities Region III Cirebon. Therefore, the government can carry out preventive efforts by administering

vaccines and early detection through screening, equity, and improvement of health facilities and services, and more massive socialization to the public to improve healthy lifestyles and implement health protocols in daily activities. The government's bureaucratic system in health services must also be a concern so that people can access health services more easily and quickly.

References

- Adinugraha, M. D. (2016). Analisis Pengaruh Pertumbuhan Ekonomi, Ratarata Lama Sekolah, dan Jumlah Pengangguran Terhadap Jumlah Penduduk Miskin di Provinsi DIY [Analysis of the Effect of Economic Growth, Average Years of Schooling, and Number of Unemployed on the Number of Poor Population in DIY Province]. In *Universitas Islam Indonesia*. <https://dspace.uui.ac.id/handle/123456789/1558?show=full>
- Azizah, E. W., Sudarti, S., & Kusuma, H. (2018). Pengaruh Pendidikan, Pendapatan Per Kapita, dan Jumlah Penduduk terhadap Kemiskinan di Provinsi Jawa Timur [The Influence of Education, Per Capita Income, and Total Population on Poverty in East Java Province]. *Jurnal Ilmu Ekonomi*, 2(1), 167–180. <https://doi.org/10.22219/jie.v2i1.6976>
- Basuki, A. T., & Prawoto, N. (2016). *Analisis Regresi dalam Penelitian Ekonomi & Bisnis: Dilengkapi Aplikasi SPSS & Eviews [Regression Analysis in Economics & Business Research: Equipped with SPSS & Eviews Applications]*. Jakarta: PT Rajagrafindo Persada.
- BPS. (2022a). Hasil Sensus Penduduk 2020 [2020 Population Census Results]. In BPS. <https://www.bps.go.id/pressrelease/2021/01/21/1854/hasil-sensus-penduduk-2020.html>
- BPS. (2022b). *Persentase Penduduk Miskin (PO) Menurut Provinsi dan Daerah 2021-2022 [Percentage of Poor Population (PO) by Province and Region 2021-2022]*. BPS. <https://www.bps.go.id/indicator/23/192/1/persentase-penduduk-miskin-menurut-provinsi.html>
- BPS. (2022c). *Persentase Penduduk Miskin (Persen), 2020-2022 [Percentage of Poor Population (Percent), 2020-2022]*. BPS West Java Province. <https://jabar.bps.go.id/indicator/23/51/1/persentase-penduduk-miskin.html>
- BPS. (2023a). *Jumlah Penduduk Hasil Proyeksi Menurut Provinsi dan Jenis Kelamin (Ribu Jiwa), 2018-2020 [Total Population Results of Projection by Province and Gender (Thousands of People), 2018-2020]*. BPS. <https://www.bps.go.id/indicator/12/1886/1/jumlah-penduduk-hasil-proyeksi-menurut-provinsi-dan-jenis-kelamin.html>
- BPS. (2023b). Kemiskinan dan Ketimpangan [Poverty and Inequality]. In BPS. <https://www.bps.go.id/subject/23/kemiskinan-dan-ketimpangan.html#subjekViewTab5>
- BPS. (2023c). *Kependudukan [Population]*. BPS. <https://www.bps.go.id/subject/12/kependudukan.html>
- Dores, E., & Koto, J. (2014). Pengaruh Angka Melek Huruf dan Angka Harapan Hidup terhadap Jumlah Penduduk Miskin di Propinsi Sumatera Barat [The Effect of Literacy Rate and Life Expectancy on the Number of Poor People in West Sumatra Province]. *Economica: Jurnal Program Studi Pendidikan Ekonomi STKIP PGRI Sumatera Barat*, 2(2), 126–133. <https://doi.org/10.22202/economica.2014.v2.i2.225>
- Hasanah, R., Syaparuddin, S., & Rosmeli, R. (2021). Pengaruh angka harapan hidup, rata-rata lama sekolah dan pengeluaran perkapita terhadap tingkat kemiskinan pada Kabupaten/Kota di Provinsi Jambi [Effect of life expectancy, average length of schooling and per capita spending on poverty levels in district/cities in Jambi Province]. *E-Jurnal Perspektif*

- Ekonomi Dan Pembangunan Daerah*, 10(3), 223–232. <https://doi.org/10.22437/pdpd.v10i3.16253>
- Hasibuan, S. N., Juanda, B., & Mulatsih, S. (2019). Analisis Sebaran dan Faktor Penyebab Kemiskinan di Kabupaten Bandung Barat [Analysis of Distribution and Factors Causing Poverty in West Bandung Regency]. *Jurnal Agribisnis Indonesia (Journal of Indonesian Agribusiness)*, 7(2), 79–91. <https://doi.org/10.29244/jai.2019.7.2.79-91>
- Hilmi, H., Nasir, M., Ramlawati, R., & Peuru, C. D. (2022). Pengaruh Jumlah Penduduk Dan Pengangguran Terhadap Tingkat Kemiskinan Di Kabupaten Tolitoli [The Effect of Total Population and Unemployment on Poverty Levels in Tolitoli Regency]. *GROWTH: Jurnal Ilmiah Ekonomi Pembangunan*, 1(1), 20–27. <https://stiemmamaju.e-journal.id/GJIEP/article/view/80>
- Huda, N. (2015). *Ekonomi pembangunan Islam [Islamic development economics]* (1st ed.). Jakarta: Prenadamedia Group.
- Mahsunah, D. (2013). Analisis Pengaruh Jumlah Penduduk, Pendidikan, dan Pengangguran terhadap Kemiskinan di Jawa Timur [Analysis of the Influence of Population, Education, and Unemployment on Poverty in East Java]. *Jurnal Pendidikan Ekonomi (JUPE)*, 1(3), 1–17. <https://doi.org/10.26740/jupe.v1n3.p%25p>
- Sianturi, V. G., Syafii, M., & Tanjung, A. A. (2021). Analisis Determinasi Kemiskinan di Indonesia Studi Kasus (2016-2019) [Poverty Determination Analysis in Indonesia Case Study (2016-2019)]. *Jurnal Samudra Ekonomika*, 5(2), 125–133. <https://doi.org/10.33059/jse.v5i2.4270>
- The Gunung Kidul District Health Office. (2018). *Usia Harapan Hidup (UHH) [Life Expectancy]*. Gunung Kidul District Health Office.
- To'oki, A. S., Tope, P., & Thaha, K. (2022). Pengaruh Rata-Rata Lama Sekolah dan Harapan Lama Sekolah terhadap Kemiskinan di Provinsi Sulawesi Tengah Tahun 2015-2019 [The Influence of Average Length of School and Old Expectations of Schooling on Poverty in Central Sulawesi Province in 2015-2019]. *Journal of Indonesia Development and Economics Analysis*, 15(1), 12–19. <http://jurnal.untad.ac.id/jurnal/index.php/eji/article/view/19254/12809>
- Todaro, M. (2006). *Pengembangan Ekonomi Dunia Ketiga. Edisi Kedelapan [Third World Economic Development. Eighth Edition]*. Jakarta: Erlangga.
- Trisnu, C. G. S. P., & Sudiana, I. K. (2019). Pengaruh Pertumbuhan Penduduk, Pengangguran, dan Pendidikan terhadap Kemiskinan Kabupaten/Kota Provinsi Bali [The Influence of Population Growth, Unemployment, and Education on Poverty in Districts/Cities of Bali Province]. *E-Jurnal Ekonomi Pembangunan Universitas Udayana*, 8(11), 2622 – 2655. <https://ojs.unud.ac.id/index.php/eep/article/view/48204>
- Wibisono, R. (2022). Analisis Dampak Pandemi COVID-19 terhadap Resiko Peningkatan Kemiskinan di Indonesia [Analysis of the Impact of the COVID-19 Pandemic on the Risks of Increasing Poverty in Indonesia]. *SALAM: Islamic Economics Journal*, 3(1), 21–40. <https://doi.org/10.24042/slm.v3i1.12271>
- Wiradyatmika, A. A. G. A., & Sudiana, I. K. (2013). Pengaruh Jumlah Penduduk Jumlah Penyerapan Tenaga Kerja dan Pengangguran terhadap Jumlah Penduduk Miskin di Kabupaten Buleleng [The Effect of Total Population, Total Absorption of Labor and Unemployment on the Number of Poor People in Buleleng Regency]. *E-Jurnal Ekonomi Pembangunan Universitas Udayana*, 2(7), 314–349. <https://ojs.unud.ac.id/index.php/>

eep/article/view/5837

- Zahra, A., A, A. F., Afuwu, H., & R, R. A. (2019). Struktur Kemiskinan Indonesia: Berapa Besar Pengaruh Kesehatan, Pendidikan, dan Kelayakan Hunian [Indonesia's Poverty Structure: How Much Influence Health, Education, and Eligibility]. *Jurnal Inovasi Ekonomi*, 4(2), 67–74. <https://doi.org/10.22219/jiko.v4i02.9856>
- Zebua, W. N., Bakce, D., & Hadi, S. (2015). Analisis Faktor-Faktor Dominan yang Mempengaruhi Kemiskinan di Provinsi Riau [Analisis Faktor-Faktor Dominan yang Mempengaruhi Kemiskinan di Provinsi Riau]. *Indonesian Journal of Agricultural Economics (IJAE)*, 6(2), 158–167. <https://doi.org/10.31258/ijae.6.2.158-167>