

## The Effect of Economic Growth Rate, Human Development Index, and Open Unemployment Rate on Poverty in East Java Province 2019-2023

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### ABSTRACT

The aim of this study is to determine the relationship between the East Java province's poverty rate and the open unemployment rate, economic growth rate, and human development index from 2019 to 2023. Panel data regression analysis and a comparative causal approach utilizing the fixed effects model (FEM) are two examples of the quantitative methods used in this study. These findings demonstrate that the poverty rate is negatively impacted by the economic growth rate, negatively impacted by the human development index, and positively impacted by the open unemployment rate. In addition, during the study period, these factors significantly affected the degree of poverty in the province of East Java.

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## INTRODUCTION

Poverty occurs when individuals or groups are unable to meet basic needs to achieve economic well-being, such as clothing, food, housing, and health and education standards (Husna & Muhammad, 2017). According to the World Bank (2004), one of the main causes of poverty is the lack of adequate resources and income to meet these basic needs. In addition, poverty is also influenced by various other complex factors, such as geographic location, gender, income level, unemployment, health, education, and access to goods and services (Kemenuh, 2017). Poverty is now not only understood in economic terms, but also as the inability to fulfill basic human rights, such as access to clean water, food, employment, and protection from violence, which are essential for a dignified life (Fajri et al., 2016).

Poverty has a wide impact, not only hampering social welfare but also the economic progress of a country. High poverty rates can increase the cost of economic development and worsen social inequality, which ultimately hinders economic growth itself (Kusuma, 2016; Darmawan & Wenegama, 2017). Therefore, inclusive and sustainable economic growth is the main indicator of the success of economic development, one of which is reflected in the reduction of poverty rates. If a country does not achieve good economic growth, social and economic problems such as poverty will worsen (Ningsih & Andiny, 2021). The rate of economic growth also reflects the ability of a region to utilize existing potential, and is a measure of the progress of community welfare and national development (Litawati, 2013).

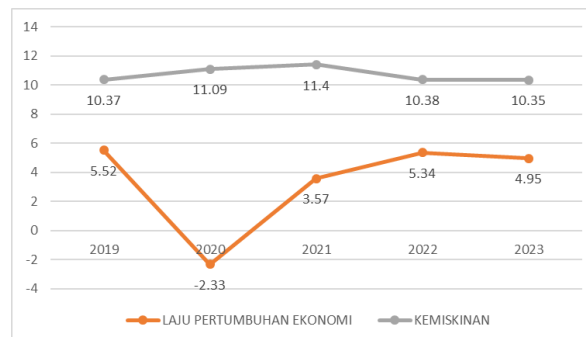


Figure 1. Poverty Percentage and Economic Growth Rate of East Java Province 2019-2023

Source: BPS East Java Province 2024 (processed data)

Based on the graphic above, the East Java region shows a poverty trend that is not always in line with the rate of economic growth, reflecting more complex dynamics in achieving community welfare. In 2019, the poverty rate was recorded at 10.37%. However, the poverty rate increased in 2020 and 2021. This increase coincided with the impact of the economic crisis due to the COVID-19 pandemic, which disrupted many sectors of the economy, caused job losses, and decreased people's purchasing power. Although in 2022 and 2023 the poverty rate showed a decline again, the decline did not fully reflect a stable recovery.

On the other hand, the economic growth rate graph in Figure 1.1 shows a different picture. In 2019, in East Java the economic growth rate was recorded at

5.52%, but in 2020, the East Java economy experienced a sharp contraction with a growth rate of -2.33% due to the impact of the pandemic. From 2021 to 2023, the economy has again shown a positive trend with an increasing growth rate, reflecting the post-pandemic economic recovery process. However, this recovery was not immediately followed by a rapid decline in poverty rates, indicating an imbalance between poverty alleviation and economic growth. This imbalance is caused by various very complex aspects. The drastic decline in demand due to social restrictions reduced consumption and investment, while supply chain disruptions hampered production. The increase in unemployment also caused people's purchasing power to decline, and economic uncertainty made business actors more careful in investing. In addition, government policies in the form of fiscal and monetary stimulus may have long-term consequences, such as increased debt and inflation. All of these factors slow down the process of rapid and sustainable economic recovery, including poverty reduction.

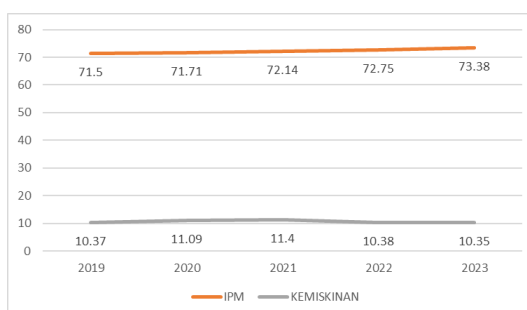


Figure 2. Poverty Percentage and Human Development Index of East Java Province 2019-2023

Source: BPS East Java Province 2024 (processed data)

The data shows an increasing trend in the Human Development Index, but this increase is not accompanied by a consistent decrease in poverty. Although the quality of life of the people of East Java has improved, the poverty rate has not shown a significant decrease. This indicates a mismatch between the increase in the HDI and the decrease in poverty. Based on the data shown in Figure 2, there is a difference in the trend of the relationship between the poverty rate and the human development index from 2019 to 2023. During this period, the HDI showed a consistent increase every year. This shows that the overall quality of life of the people of East Java continues to improve in various aspects, such as education, health, and the economy. However, this condition is not followed by a stable trend of decreasing poverty rates. This phenomenon illustrates that although the HDI in East Java continues to increase, poverty reduction is unstable, which may reflect the success of government policies and programs that focus on improving the quality of life of the people, despite economic challenges. This phenomenon may also indicate that despite fluctuations in the number of people experiencing poverty, investment in education, health, and infrastructure continues to have a long-term positive impact. For example, effective social protection programs and better access to health and education services may have helped people to improve their

capabilities and quality of life, so that the HDI continues to increase even though overall economic conditions are not always stable.

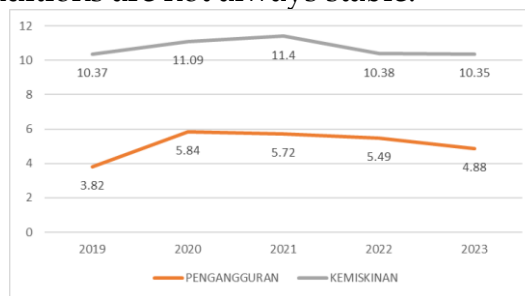


Figure 3. Poverty Percentage and Open Unemployment Rate in East Java Province 2019-2023

Source: BPS East Java Province 2024 (processed data)

Based on the information in Figure 3, the unemployment rate in 2019 was recorded at 3.82%, reflecting a relatively stable labor market. However, in 2020, there was a significant spike to 5.84%. This increase can be explained by the major impact of the COVID-19 pandemic, which caused a sharp decline in economic activity, mass layoffs, and disruption to key economic sectors. Furthermore, in 2021 to 2023, the TPT began to show a significant decline, reflecting a gradual economic recovery, increased employment opportunities, and the implementation of various policies to stimulate employment, such as economic stimulus programs and improvements to sectors affected by the pandemic. Meanwhile, the poverty rate also experienced similar fluctuations. In 2019, the poverty rate was 10.37%. However, in 2020 and 2021, the poverty rate increased due to economic pressures from the pandemic, decreasing household income, and reduced purchasing power. Although it began to decline in 2022 and 2023, the decline was not stable enough to describe a full economic recovery.

The phenomenon that emerged from this data is the misalignment between the trend of declining unemployment rates and the inconsistent decline in poverty. Although the decline in unemployment rates occurred in the period 2021 to 2023, it was not always accompanied by a stable decline in poverty rates. This raises fundamental questions about the effectiveness of economic and social policies that have been implemented to encourage post-pandemic economic recovery. Further research is needed to explore the factors that influence the difference between declining unemployment rates and declining poverty rates, as well as the role of government programs in creating an inclusive and sustainable recovery.

## LITERATURE REVIEW

### *Trickle-Down Effect Theory*

The trickle-down effect was first proposed by Arthur Lewis in 1954 and further developed by Ranis and Fei in 1968. In the 1950s and 1960s, this concept became a major focus in studies of economic development in developing countries, often referred to as Least Developed Countries (LDCs). This theory states that progress achieved by a group of people will automatically flow downward, creating jobs and various economic opportunities. In turn, this is

expected to facilitate a more equitable distribution of the results of economic growth. The implications of this theory suggest that economic growth will be accompanied by a flow that moves vertically from the rich to the poor. The benefits of economic growth will be felt first by the rich, and in the future, the poor will begin to benefit when the rich begin to spend from the results of economic growth that have been received.

H1: Poverty in East Java is thought to be influenced by the rate of economic growth.

### ***Rostow and Musgrave's Theory***

According to Rostow and Musgrave, the human development index plays a crucial role in economic development through education and health. Adequate education and health will allow production factors to be maximized. Population growth brought on by extensive human progress raises consumption levels. Government policies on human development, as evidenced by the government budget and its realization, have an impact on the human development index's value. More economic growth will be made possible by this.

The degree to which human development influences both physical and non-physical aspects such as intelligence and standard of life and health is measured by the Human Development Index (HDI). The HDI uses three primary dimensions to gauge a nation's average level of accomplishment. Initially, life expectancy is determined by taking the life expectancy at birth. The second factor is education level, which is determined by the average length of time spent in school and the literacy rate of those who are at least 15 years old. Third, per capita consumption is used to measure the wellbeing level. Together, these dimensions form a scale with a range of values from 0 to 100.

H2: It is suspected that the human development index has an effect on poverty in East Java.

### ***Keynesian Theory***

According to Keynes' Theory, unemployment occurs due to low aggregate demand. This is caused not only by external factors, but also by low levels of consumption. According to Keynes, economic growth is not hampered by free market production. Keynes argued that when the number of workers increases, wages tend to fall, which then reduces people's purchasing power for products and services. As a result, businesses suffer losses and are unable to absorb more workers. Keynes proposed that the government play an active role in maintaining the level of aggregate demand, so that the tourism sector can contribute to creating jobs. The government has a responsibility to ensure that aggregate demand remains stable, while the tourism sector is tasked with providing job opportunities. Thus, the main goal to be achieved is to maintain people's income and purchasing power, so that it can prevent the worsening of recession conditions and overcome the resulting unemployment.

H3: It is believed that poverty in East Java is influenced by the open jobless rate.

H4: The poverty rate in East Java Province is thought to be influenced concurrently by the open unemployment rate, the human development index, and the pace of economic growth.

This study examines the impact of the open unemployment rate, human development index, and economic growth rate on poverty in East Java using a

quantitative methodology. The relationship between these variables is illustrated in a conceptual framework, which highlights the simultaneous and partial effects of independent variables on the dependent variable. Data from 2019 to 2023 are analyzed using panel data regression to identify causal relationships.

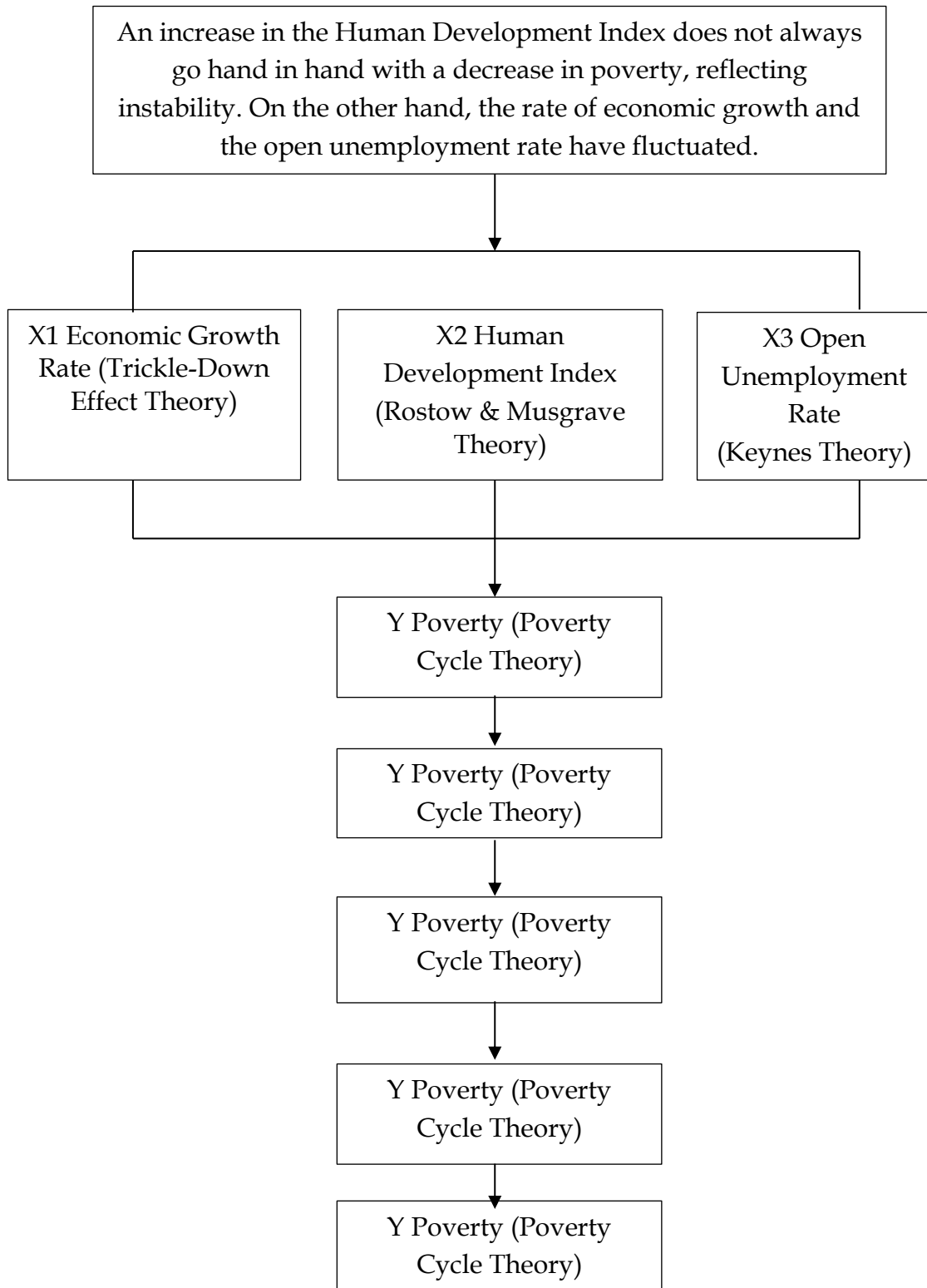


Figure 4. Theoretical Framework

## METHODOLOGY

This study employs a quantitative technique with panel data regression analysis to investigate the relationship between poverty levels in East Java Province over the 2019–2023 period and the economic growth rate, Human Development Index (HDI), and Open Unemployment Rate (TPT). The Central Statistics Agency (BPS) provided the secondary data, which was then subjected to model selection tests such the Chow, Hausman, and Lagrange multiplier tests before being analyzed using the Fixed Effect Model (FEM) approach. To confirm the validity of the regression model employed, this study also performed a number of traditional assumption tests, such as the multicollinearity, heteroscedasticity, and normality tests. By using this method, the study seeks to empirically analyze the factors that lead to poverty in East Java and to determine the link between independent and dependent variables, either concurrently or partially.

## RESEARCH RESULTS

### 1. Classical Assumptions

#### a. Normality Test

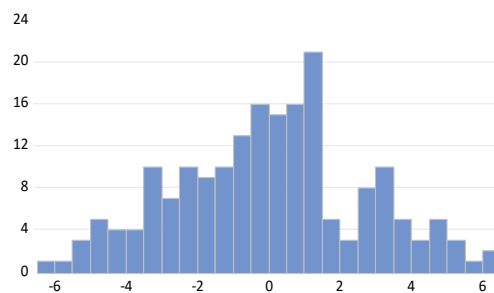


Figure 5: Normality Test Graph

Source: Data processed with E-Views 12 (2024)

Table 1. Normality Test

Jarque-Bera	1.357802
Probability	0.0507174

Source: Data processed with E-Views 12 (2024)

The Jarque-Bera test value, based on the results, is 1.357802 with a probability of  $0.0507174 > 0.05$ . The data's normal distribution may be inferred from this. This demonstrates that the data satisfies the normal distribution assumption.

#### b. Heteroscedasticity Test

Table 2. Heteroscedasticity Test

Variable	Coefficient	Std. Error	t-statistic	Prob.
C	-4.882213	5.512228	-0.885706	0.3772
LPE	-0.012045	0.017800	-0.676674	0.4997
IPM	0.060851	0.070329	0.865228	0.3883
TPT	-0.083812	0.052325	-1.601760	0.1113

Source: Data processed with E-Views 12 (2024)

The heteroscedasticity test table indicates that variable X1 has a probability value of  $0.4997 > 0.05$ . For variable X2, the probability value is  $0.3883 > 0.05$ , and for variable X3, it is  $0.1113 > 0.05$ . These findings suggest that there is no heteroscedasticity in variables X1, X1, and X3. The reason for this is because every variable has a value higher than 0.05.

c. Multicollinearity Test

Table 3. Multicollinearity Test

	LPE	IPM	TPT
LPE	1,000,000	0.054770	-0.228631
IPM	0.054770	1,000,000	0.571880
TPT	-0.228631	0.571880	1,000,000

Source: Data processed with E-Views 12 (2024)

Based on the table above, the correlation coefficient of X1 and X2 is  $0.054770 < 0.80$ , the correlation coefficient of X1 and So it can be concluded that variables X1, X1, X3 are free from the multicollinearity test.

2. Hypothesis Testing

a. Partial Test (T-Test)

Table 4. t-Test Results

Variable	Coefficient	Std.Error	t-Statistic	Prob.
C	24.89094	3.429317	7.258280	0.0000
LPE	-0.012471	0.012471	-3.167727	0.0019
IPM	-0.205633	0.048036	-4.280797	0.0000
TPT	0.155984	0.035652	4.375145	0.0000

Source: Data processed with E-Views 12 (2024)

Based on the table above, the regression analysis model can be explained as follows:

$$Y = 24.89094 - 0.012471X1it - 0.205633X2it + 0.155984X3it$$

The explanation is as follows:

- 1) The derived constant value, 24.89094, is positive. This indicates that the average poverty rate (Y) is predicted to be 24.89094 if the economic growth rate (X1), human development index (X2), and unemployment rate (X3) are all at a constant or zero condition.
- 2) The regression coefficient for the economic growth rate (X1) is recorded at -0.012471. This means that, assuming other variables remain constant, every 1% increase in the economic growth rate (X1) will cause a decrease in the poverty rate (Y) by 0.012471. This coefficient has a probability value of 0.0019 and an estimated t value of -3.167727, which is higher than the t table value of 1.65304. This demonstrates that the poverty rate (Y) is significantly impacted negatively by the rate of economic growth.

- 3) The Human Development Index's (X2) regression coefficient is -0.205633. This indicates that a 1% improvement in the Human Development Index (X2) will result in a 0.205633 drop in the poverty rate (Y), providing all other factors stay the same. For X2, the probability value is 0.0000 and the t-statistic is -4.280797, both of which are higher than the t-table (1.65304). This suggests that the poverty rate (Y) is significantly impacted negatively by the Human Development Index.
- 4) The open unemployment rate (X3) has a regression coefficient of 0.155984. This indicates that, assuming all other factors stay the same, the poverty rate (Y) will rise by 0.155984 for every 1% increase in the open unemployment rate. While the probability value is 0.0000, the t-statistic that was achieved is 4.375145, which is greater than the t table of 1.65304. These findings suggest that the poverty rate (Y) is positively and significantly impacted by the open jobless rate.

b. Simultaneous Test (F Test)

Table 5. t-Test Results

F-Statistic	451.7261
Prob (F-Statistic)	0.000000

Source: Data processed with E-Views 12 (2024)

With a probability value (significance) of  $0.000000 < 0.05$  and an F-statistic of  $451.7261 > f\text{-table } 2.65$ ,  $H_0$  is rejected and  $H_1$  is accepted. This indicates that the poverty rate (Y) is influenced concurrently by the open unemployment rate (X3), the human development index (X2), and the pace of economic growth (X1).

c. Determination Coefficient Test (R2)

Table 6. t-Test Results

R-Squared	0.991821
Adjusted R-Squared	0.989626

Source: Data processed with E-Views 12 (2024)

The adjusted  $R^2$  value was found to be 0.989626. This means that 98.96% of the variation in poverty levels (Y) can be explained by the independent variables, namely the economic growth rate (X1), human development index (X2) and unemployment rate (X3). Furthermore, the remaining variables of 1.04% are influenced by additional factors not included in the study model. Since the independent variables included account for nearly 99% of the variation in the dependent variable (poverty), the model has a very excellent fit, as indicated by the modified  $R^2$  of 0.989626. The effect of extraneous variables accounts for the remaining 1.04%.

## DISCUSSION

### *The Influence of Economic Growth Rate on Poverty*

The regression analysis's findings indicate that East Java's poverty rate is negatively impacted by the rate of economic expansion, which is in line with the initial hypothesis that economic growth affects poverty. The economic theory underlying this is the "trickle-down effect" theory introduced by Arthur Lewis in 1954, which states that the benefits of economic growth will permeate all levels of society, creating jobs and economic opportunities for the poor. In this context, poverty alleviation can be achieved through fair income redistribution and equitable economic growth.

However, poverty reduction resulting from economic growth is highly dependent on the distribution of benefits felt by the poor. If the distribution is uneven, even though there is economic growth, social and economic inequality can actually increase, worsening poverty conditions among low-income communities. Therefore, in addition to focusing on economic growth, development policies must pay attention to equal access to education, health, and infrastructure so that the benefits of growth can be enjoyed by all levels of society. More equitable economic development will play a role in reducing poverty effectively.

This study is in line with the findings of other studies such as Suryandari (2018) who stated that economic growth in the Special Region of Yogyakarta has a negative impact on poverty, and Purnama (2017) who found a negative effect of economic growth on poverty in North Sumatra. In contrast, research by Putri & Yuliana (2023) and Wulandari & Ratnasari (2022) shows that the rate of economic growth does not have a significant effect on poverty levels, especially in certain areas such as Probolinggo City and Regency. This shows the need for a more targeted development strategy, especially in increasing the labor absorption sector so that economic growth can effectively reduce poverty.

### *The Influence of the Human Development Index on Poverty*

The results of the regression analysis show that the Human Development Index (HDI) has a partial negative effect on the poverty rate in East Java. This means that when the HDI increases, the poverty rate tends to decrease, and vice versa. This finding is in accordance with the development theory that emphasizes the important role of the education and health sectors in economic development. Improving the quality of education and health can maximize production factors, which drive economic growth and increase public consumption. Therefore, policies that focus on improving the quality of life through better education, health, and living standards can reduce poverty and support inclusive economic growth.

This study is in line with the findings of Andykha et al. (2018) and Prasetyoningrum and Sukmawati (2018), which also showed a negative effect of the HDI on poverty. Increasing the HDI contributes to increased work productivity, which ultimately increases people's income and meets decent living needs. The HDI measures three basic aspects of human development, namely longevity, education, and living standards, all of which play an important role in

reducing poverty. This finding strengthens the understanding that the HDI is an important indicator in assessing development efforts in a region.

The findings of Purboningtyas et al. (2020) and Goni et al. (2022), which claimed that HDI had no discernible impact on poverty, are in conflict with the conclusions of this study. This difference may be caused by external factors such as government policies, regional economic conditions, and access to education and health. Therefore, a more comprehensive development policy is needed, including increasing employment opportunities that are in accordance with workforce skills and equalizing access to education and health services. With the right approach, increasing HDI can be more effective in reducing poverty sustainably in various regions.

### ***The Influence of Open Unemployment Rate on Poverty***

The results of the regression analysis show that the open unemployment rate has a positive effect on the poverty rate in East Java Province. This means that if the unemployment rate increases, the poverty rate will also increase, and vice versa. This finding is in line with Keynes' theory, which states that unemployment can worsen poverty by reducing aggregate demand. Unemployment causes people's income to decrease, which leads to decreased purchasing power and quality of life, thus worsening poverty conditions. In Keynes' theory, government intervention is needed to maintain aggregate demand, for example by investing in sectors that absorb a lot of labor, such as tourism and infrastructure.

This study supports the view that unemployment not only impacts the economy, but also social aspects, such as welfare, health, education, and living standards. Prolonged unemployment creates a cycle of poverty that is difficult to break, because it impacts people's purchasing power and quality of life. Therefore, government policy should focus on reducing unemployment through community empowerment, skills training, and support for small and medium enterprises. These programs can help people adapt to changes in the labor market, which in turn can reduce unemployment and poverty rates.

The findings of this study are in line with the studies of Ishak et al. (2020) and Sagala et al. (2023), which shows that open unemployment has a positive effect on poverty in several areas. However, this finding is contrary to the research of Usman & Diramita (2018), which states that unemployment does not have a significant effect on poverty in the Riau Islands Province, due to other factors such as high levels of education and family income. To reduce the negative impact of unemployment on poverty, synergy is needed between the government, private sector, and society, including investment in the creative industry sector, employment policy reform, and financing programs for small and medium enterprises. With the right strategy, it is hoped that unemployment rates can be reduced, and poverty can be reduced significantly.

### ***The Influence of Economic Growth Rate, Human Development Index, and Open Unemployment Rate on Poverty***

The human development index (HDI), the open unemployment rate, and the pace of economic growth all significantly impact the poverty rate in East Java

Province, according to the findings of the regression analysis. This result is consistent with Handayani's (2022) study, which found a similar effect in Central Java Province, and Estrada's (2020) study, which demonstrates that the three variables simultaneously have a positive and significant effect on the poverty rate in Bali Province during the 2009–2013 period. This result is consistent with the trickle-down effect theory, which holds that while unequal benefit distribution might impede efforts to alleviate poverty, economic development can do so by boosting employment, income, and consumption.

The HDI is a significant indication of people's quality of life, including their access to health care, education, and living conditions, according to Rostow and Musgrave's idea. An increase in the HDI indicates that people have a greater opportunity to participate in productive economic activities, thereby reducing poverty rates. Communities with a higher HDI tend to have better access to basic services and opportunities to improve their standard of living, which directly impacts individual and group productivity.

Conversely, Keynesian theory explains the negative relationship between poverty and the open unemployment rate. People who experience high unemployment have lower incomes, less purchasing power, and a higher chance of falling into poverty. Additionally, unemployment has a detrimental effect on social facets like health and education, which eventually makes poverty more severe. In general, unemployment rates, HDI, and economic growth all have an impact on poverty. strong unemployment can nevertheless restrict the beneficial effects of these variables on reducing poverty, even while strong economic growth and HDI can assist lessen the burden of unemployment.

## **CONCLUSIONS AND RECOMMENDATIONS**

Based on the results of the study, it can be concluded that the Economic Growth Rate partially has a negative effect on poverty. This is in accordance with the theory that economic growth can reduce poverty rates, although the uneven distribution of benefits from growth can worsen social inequality. The Human Development Index also partially shows a negative effect on poverty. This finding is in line with the view that improving the quality of life through better education, health, and living standards can help reduce poverty rates. The Open Unemployment Rate partially has a positive effect on poverty. This unemployment condition results in declining purchasing power, quality of life, and ultimately worsens poverty. Simultaneously, the Economic Growth Rate, Human Development Index, and Open Unemployment Rate have an effect on poverty, indicating that policies that integrate economic growth, improving the quality of life, and reducing unemployment are very important to reduce poverty in East Java Province.

Based on the research results, several recommendations that can be put forward include, first, inclusive economic growth needs to be encouraged so that its benefits are evenly distributed across all levels of society, by developing the small and medium business sector, creative economy, and community-based industry to create jobs. Second, access to education, health services, and a decent standard of living must continue to be improved through scholarship programs,

skills training, quality health services, and adequate basic infrastructure. Third, the creation of job opportunities can be encouraged by strengthening workforce skills, industry-based training, and encouraging entrepreneurship, as well as strengthening synergies between the business world and education. Fourth, a comprehensive approach to economic development, improving quality of life, and reducing unemployment is needed so that its impact on poverty reduction is more optimal, with collaboration between various sectors to create effective and sustainable policies.

### ADVANCED RESEARCH

Every study has limitations, including this study. One limitation is the limited variables analyzed, in this study only focused on the Economic Growth Rate, Human Development Index (HDI), and Open Disturbance Rate (TPT), without considering other factors such as fiscal policy or investment that can also affect poverty. In addition, the study period which only covers 2019-2023 is relatively short and can be affected by short-term fluctuations, especially due to the COVID-19 pandemic. Another limitation is that it includes aggregate data for the provincial level, so it does not capture differences between districts/cities in East Java which may have different economic characteristics. In addition, this study relies entirely on secondary data from the Central Statistics Agency (BPS), although valid, it still has limitations in capturing social and economic dynamics in more depth.

To overcome these limitations, further research can add other variables such as investment and social policy for a more comprehensive analysis. In addition, the study period can be extended so that long-term trends are more visible. Future studies can also conduct analysis per district/city to understand poverty variations at the regional level and combine quantitative methods with qualitative approaches such as interviews or case studies to gain a broader understanding. With these improvements, future research is expected to provide deeper insights and more targeted policy recommendations in poverty alleviation efforts.

### REFERENCES

- Abdullah, M. (2015). Quantitative Research Methodology. In *Aswaja Pressindo*.
- Adha, AAN, & Rachmawati, L. (2023). The Effect of Human Development Index and Open Unemployment Rate on The Number of The Poor People in East Java Province. *Independent: Journal of Economics*, 3 (3), 131-140.
- Aini, SN (2023). The Influence of Economic Growth, Education, Unemployment, and Income Inequality on Poverty in East Java Province. *Development Economics Bulletin*, 4 (1).
- Al Wijdan, F., Amaliah, I., & Mafruhah, AY (2022). The Effect of Economic Growth Rate, Human Development Index, Open Unemployment Rate, on Poverty Level in Garut Regency 2010-2020. In *Bandung Conference Series: Economics Studies* (Vol. 2, No. 2, pp. 343-350).
- Amelinda, DV, & Rachmawati, L. (2022). The Effect of Poverty Level and Economic Growth Rate on the Human Development Index of Tulungagung Regency. *Independent: Journal of Economics*, 2 (1), 159-174.

- Andhykha, R., Handayani, HR, & Woyanti, N. (2018). Analysis of the influence of PDRB, unemployment rate, and HDI on poverty levels in Central Java Province. *Media Ekonomi Dan Manajemen*, 33 (2).
- Anggoro, D., & Kriswibowo, A. (2023). Analysis of the Effect of Gross Regional Domestic Product, Unemployment and Human Development Index on Poverty in East Java, Indonesia. *International Journal of Economics Development Research (IJEDR)*, 4 (1), 383-394.
- Ardian, R., Syahputra, M., & Desmawan, D. (2022). The effect of economic growth on the open unemployment rate in Indonesia. *Journal of Economics, Business and Management*, 1 (3), 190-198.
- Arif, NH Economic Growth and Poverty in Indonesia1.
- Aris. (2021). gramedia blog. Retrieved from gramedia.com: <https://www.gramedia.com/literasi/stratifikasi-sosial/>
- Aprillia, A. (2016). The Influence of Economic Growth, Open Unemployment Rate, and Human Development Index on Poverty Levels (Case Study in Malang Raya 2004-2013). *FEB Student Scientific Journal*, 3 (2).
- Berliani, K. (2021). The Influence of Unemployment Rate, Education Level and Population Growth Rate on the Poverty Rate of the Population of West Java Province in 2015-2020. *Syntax Literate; Indonesian Scientific Journal*, 6(2), 872
- Damayanti, A., & Perdini, WLF (2022). The Effect of Open Unemployment Rate and Population Growth on Poverty Levels in Malang City. *Journal Of Economics*, 2 (1), 1-15.
- Daniel, H., Purba, N., & Simamora, N. (2023). The Effect of Economic Growth, Open Unemployment Rate and Human Development Index on Poverty in North Sumatra. *Indonesian Journal of Advanced Research*, 2 (5), 391-402.
- Dhinnessa Prabowo, MM (2023). The Influence of Unemployment, Poverty, Human Development Index, and Population on Economic Growth in Central Kalimantan Province. *Indonesian Journal of Economics and Statistics*, 27-36.
- Estrada, AAE, & Wenagama, IW (2020). The effect of economic growth rate, human development index and unemployment rate on poverty rate. *E-Journal of Development Economics, Udayana University*, 9 (2), 233-261.
- Febrihana, P. (2024). *Analysis of the Influence of Open Unemployment Rate, District Minimum Wage, and Social Assistance Expenditure on Poverty Levels in Sampang Regency, Bangkalan Regency, Sumenep Regency, and Probolinggo Regency* (Doctoral dissertation, UPN Veteran East Java).
- Goni, N., Kalangi, JB, & Tolosang, KD (2022). The Effect of Government Expenditure and Human Development Index on Poverty Levels in Southeast Minahasa Regency. *Scientific Periodical Journal of Efficiency*, 22 (5), 121-132.
- Gujarati, D.N. (2003). Basic Econometrics. In *The Economic Journal* (4th ed., Vol. 82, Issue 326). McGraw-Hill. <https://doi.org/10.2307/22300>
- Gujarati, D. N., & Porter, D. C. (2009). Basic Econometrics. In *Introductory Econometrics: A Practical Approach* (5th ed.). McGraw-Hill.

- Handayani, N. (2024). The Influence of Human Development Index, Economic Growth and Unemployment on Poverty in Districts/Cities in Central Java Province in 2017-2019. *Diponegoro Journal of Economics*, 11 (1), 26-36.
- Quantitative, PP (2016). *Qualitative and Quantitative Research Methods and R&D*. Alfabeta, Bandung.
- Mardiko, T.F., & Rospida, L. (2023). Analysis Of the Effect of Economic Growth, Percentage of Poor People, And Open Unemployment Rate on The Human Development Index in East Kalimantan Province. *Journal of Economics*, 12 (04), 2368-2374.
- Mataheurilla, BR, & Rachmawati, L. (2021). The Influence of Human Development Index, Unemployment, and Poverty on Economic Growth in Malang Regency. *Independent: Journal of Economics*, 1(3), 129-145.
- Maulina, KR (2022). The Influence of Open Unemployment Rate, Economic Growth and Human Development Index (HDI) on Poverty Level in Aceh Province for the Period 2017-2021 Reviewed from an Islamic Economic Perspective. 48-53.
- Murdiyanto, E. (2020). *Qualitative Research (Theory and Application with sample proposals)*.
- Naiola, F.N., Peilouw, C.T., & Junias, D.T.S. (2023). Effect Of Economic Growth on Poverty Level and Unemployment Rate as Mediation in East Nusa Tenggara Province. *Journal of Economics*, 12 (04), 1053-1059.
- Nani, N. (2022). *Step By Step Panel Data Regression Analysis Using Eviews*.
- Ningsih, D., & Andiny, P. (2018). Analysis of the influence of inflation and economic growth on poverty in Indonesia. *Jurnal Samudera Ekonomika*, 2 (1), 53-61.
- Purboningtyas, I., Sari, IR, Guretno, T., Dirgantara, A., Agustina, D., & Al Haris, M. (2020). Analysis of the Influence of Open Unemployment Rate and Human Development Index on Poverty in Central Java Province. *Jurnal Saintika Unpam: Jurnal Sains dan Matematika Unpam*, 3 (1), 81.
- Purnama, NI (2017). Analysis of the influence of economic growth on poverty levels in North Sumatra. *Journal of Economics*, 17 (1), 163054.
- Putri, RHN, & Yuliana, I. (2023). The effect of economic growth on poverty rates with unemployment as a mediator in Probolinggo. *Fair Value: Scientific Journal of Accounting and Finance*, 5 (6), 2691-2700.
- Prasetyoningrum, AK, & Sukmawati, US (2018). Analysis of the influence of the Human Development Index (HDI), economic growth and unemployment on poverty in Indonesia. *Equilibrium: Journal of Islamic Economics*, 6 (2), 217-240.
- Ramadanisa, N., & Triwahyuningtyas, N. (2022). Analysis of Factors Affecting the Human Development Index in Lampung Province. *SIBATIK JOURNAL: Scientific Journal in the Fields of Social, Economic, Cultural, Technology, and Education*, 1 (7), 1049-1062.
- Rahmaningtyas, V., & Adianita, H. (2023). The Effect of Open Unemployment Rate, Education Level, and Labor Force on Poverty in Indonesia 2018-2022. *International Journal of Economics Development Research (IJEDR)*, 4 (3), 2044-2054.

- Rodliyah, D. (2023). The Effect of HDI, Unemployment, and Investment on GRDP and Poverty. *Efficient: Indonesian Journal of Development Economics*, 6 (2), 199-209.
- Rumatiga, FFB (2020). *The Influence of Human Development Index and Economic Growth on Poverty Levels in Papua Province 2013–2017* (Doctoral dissertation, Atma Jaya University Yogyakarta).
- Salsabil, I., & Rianti, W. (2023). The effect of economic growth, education level, health and population growth on poverty levels. *Journal of Economics and Business Research*, 15-24.
- Sagala, RS, & Utami, BC (2023). The effect of economic growth and open unemployment rate (TPT) on poverty in Pelalawan district. *Niara Journal*, 15 (3), 514-524.
- Suryandari, AN (2018). The Influence of Economic Growth, Education, and Health on Poverty Levels in the Special Region of Yogyakarta Province in 2004-2014. *Journal of Education and Economics*, 7 (1), 33-41.
- Syafnidawaty. (2020, november 4). raharja university. Retrieved from raharja.ac.id: <https://raharja.ac.id/2020/11/04/apa-itu-populasi-dan-sampel-dalam-penelitian/>
- Syahrum, S., & Salim, S. (2014). Quantitative research methodology.
- Yuniarti, Q., & Imaningsih, N. (2022). The Effect of Economic Growth, Poverty Level and Human Development Index on the Open Unemployment Rate in Sidoarjo Regency. *Ekonomis: Journal of Economics and Business*, 6 (1), 44-52.
- Yuliara, IM (2016). Multiple Linear Regression Module. *Udayana University*, 2 (2), 18.
- Zakaria, J. (2020). The Influence of Economic Growth, Education and Unemployment on the Poverty Rate in Makassar City. *Paradoks: Journal of Economics*, 3 (2), 41-53.