REVISTA ESPACIOS

Analysis of factors that affect poverty in Indonesia

Análisis de los factores que afectan la pobreza en Indonesia

Asrol ASROL 1; Hafsah AHMAD 2

Contents

ABSTRACT:

The success of economic development conducted by the government is one of the parameters that describe the level of poverty. The high level of poverty indicates that development programs implemented by the government, especially poverty reduction programs, have not been optimal. Many physiological factors affect poverty, but the responsive factors differ across countries. In this study, we attempt to analyze the factors that affect poverty in Indonesia. Multiple regression equation models were built for this study by using the Ordinary Least Squares (OLS) method. The data used in this study were time-series data related to poverty during the period 2000–2014. The results showed that the most poverty-responsive factors were gross domestic product, average education duration, life expectancy, and government infrastructure expenditure. The finding reveals that poverty can be alleviated by improving the quality of economic growth for the entire community, increasing HDI through the average length of education and life expectancy, and job creation by investment. Other factors include national budget expenditures related to direct government budget increase of expenditures for infrastructure and improvement of family planning programs, and provision of free health care.
Keywords: average education duration; joblessness; population size; life expectancy; poverty

RESUMEN:

El éxito del desarrollo económico llevado a cabo por el gobierno es uno de los parámetros que describen el nivel de pobreza. El alto nivel de pobreza indica que los programas de desarrollo implementados por el gobierno, especialmente los programas de reducción de la pobreza, no han sido óptimos. Muchos factores fisiológicos afectan la pobreza, pero los factores de respuesta difieren entre los países. En este estudio, intentamos analizar los factores que afectan la pobreza en Indonesia. Se construyeron modelos de ecuaciones de regresión múltiple para este estudio utilizando el método de mínimos cuadrados ordinarios (OLS). Los datos utilizados en este estudio fueron datos de series de tiempo relacionados con la pobreza durante el período 2000-2014. Los resultados mostraron que los factores más sensibles a la pobreza fueron el producto interno bruto, la duración media de la educación, la esperanza de vida y el gasto gubernamental en infraestructura. El hallazgo revela que la pobreza se puede aliviar mejorando la calidad del crecimiento económico para toda la comunidad, aumentando el IDH a través de la duración promedio de la educación y la esperanza de vida, y la creación de empleos mediante la inversión. Otros factores incluyen los gastos del presupuesto nacional relacionados con el aumento directo del presupuesto del gobierno de los gastos para infraestructura y la mejora de los programas de planificación familiar, y la provisión de atención médica gratuita.
**Palabras clave:** duración media de la educación; el

1. Introduction

Many economists interpret economic growth from different perspectives. Suryana (2000) defines economic growth as an increase in gross domestic product (GDP) regardless of the size of population growth and without any changes in economic structure. Boediono (1999) defines economic growth as a process of increasing per capita output in the long term. Sukirno (2007) argues that economic growth indicates two different aspects of understanding in macroeconomic analysis. In one aspect, economic growth is used to illustrate that the economy develops and reaches a higher level of prosperity, although economic growth is also used to describe economic problems in the long term. According to Todaro (2000), economic growth is the country's long-term capacity building that is concerned with providing economic goods for people. The main objectives of economic development are not only economic growth but also poverty reduction, prevention of income inequality, and provision of employment in the context of an evolving economy. The success of development conducted by local governments is not only measured by the gross regional domestic product (GRDP) but also observed from the level of poverty (Todaro 2000).

Economic growth is an indicator of success in a country and is necessary to reduce poverty. One parameter is effective economic growth. Thus, the distribution of growth should spread to every income class, including the poor. Directly, this parameter indicates that economic growth must occur in the sectors where many poor people are involved, such as the agricultural or labor-intensive sectors. Indirectly, an effective government role is needed to distribute economic growth that can only occur in the modern sector, such as capital-intensive services (Siregar and Wahyuniarti 2008). The definition of poverty is different because the problem is complex and multidimensional. Poverty is not only related to the economic dimension, but also has expanded into social, health, education, and political dimensions. Todaro (2006) explains that poverty is the inability to meet minimum living standards that match level of life need for food, shelter, clothing, etc. Meanwhile, according to the Indonesian Central Bureau of Statistics (2007), poverty is the inability of individuals or households to meet minimum standards of basic necessities that include both food and facility needs as measured using the poverty line. Bappenas (2010) defines poverty as a condition in which a person or group of people are unable to organize their lives to a level that is considered humane. This definition comes from a rights-based approach that recognizes that the poor possess the same basic rights as other community members. Todaro and Smith (2006) argue that the high level of poverty in a country depends on two main factors: (1) average national income level and (2) width and narrowness of the gap in income distribution.

Economic growth achieved in Indonesia during the period 2000–2014 reached 5.36%. In 1998, the Asian economic crisis directly affected the Indonesian economy. At the time, Indonesia's GDP only reached IDR 955,753.5. Various policies are undertaken by the government to address economic problems. The Indonesian economy slowly continues to improve. In 2000, the GDP reached IDR 1,389,769.9 and continued to increase until 2014, reaching IDR 10,542,693.5. During the period 2011–2014, Indonesia's economic growth slowed down because of the sluggishness in several business fields such as mining and quarrying, industry, and trade. The mining and quarrying delays were caused by contractions in oil, gas, coal, and lignite mining in 2014. The slowdown in the processing industry was due to contractions in the coal industry and oil refinery and the slowing down of several other non-oil and gas industries. In addition, Indonesia's economic slowdown was caused by decreases in prices of the main commodities produced by oil, gas, palm oil, and rubber. However, these commodities are dominated by business communities. The low prices of these commodities caused the low enthusiasm of people to produce goods and services and resulted in low income and household and government expenditures. Figure 1 shows the growth of the Indonesian economy for the period 2000–2014.

Figure 1
Economic growth of Indonesia, 2000–2014 (BPS Indonesia 2015)
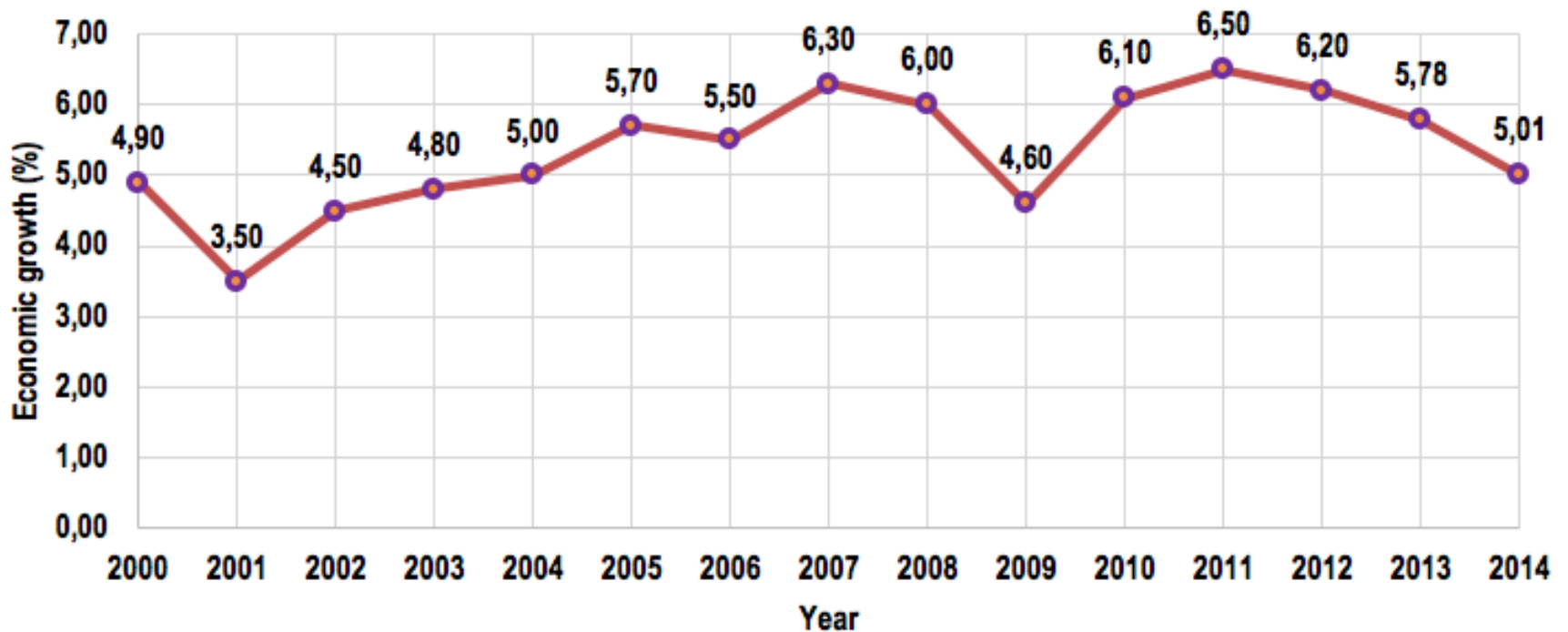
According to the Indonesian Central Bureau of Statistics, the number of poor people in the country was 28,513.570 (11.16%) in 2015. However, based on the depth of the severity index, of poverty remains high. Poverty is a complex and multidimensional problem. The issue of poverty is not limited to the percentage number of the poor. Another dimension includes the depth and severity of poverty. To minimize the number of poor people, poverty policy should also be able to reduce the depth and severity of poverty (BPS Indonesia 2015). Figure 2 shows the population of poor people in Indonesia for the period 2000–2014. The government must seriously strive to overcome poverty by improving employment and public services such as education and health. The government program to alleviate poverty has supplied Direct Cash Assistance (BLT) that will provide aid for poor families every month. These efforts have not completely reduced the poverty incidence.

Figure 2
Population of poor people in Indonesia, 2000–2014 (BPS Indonesia 2015)
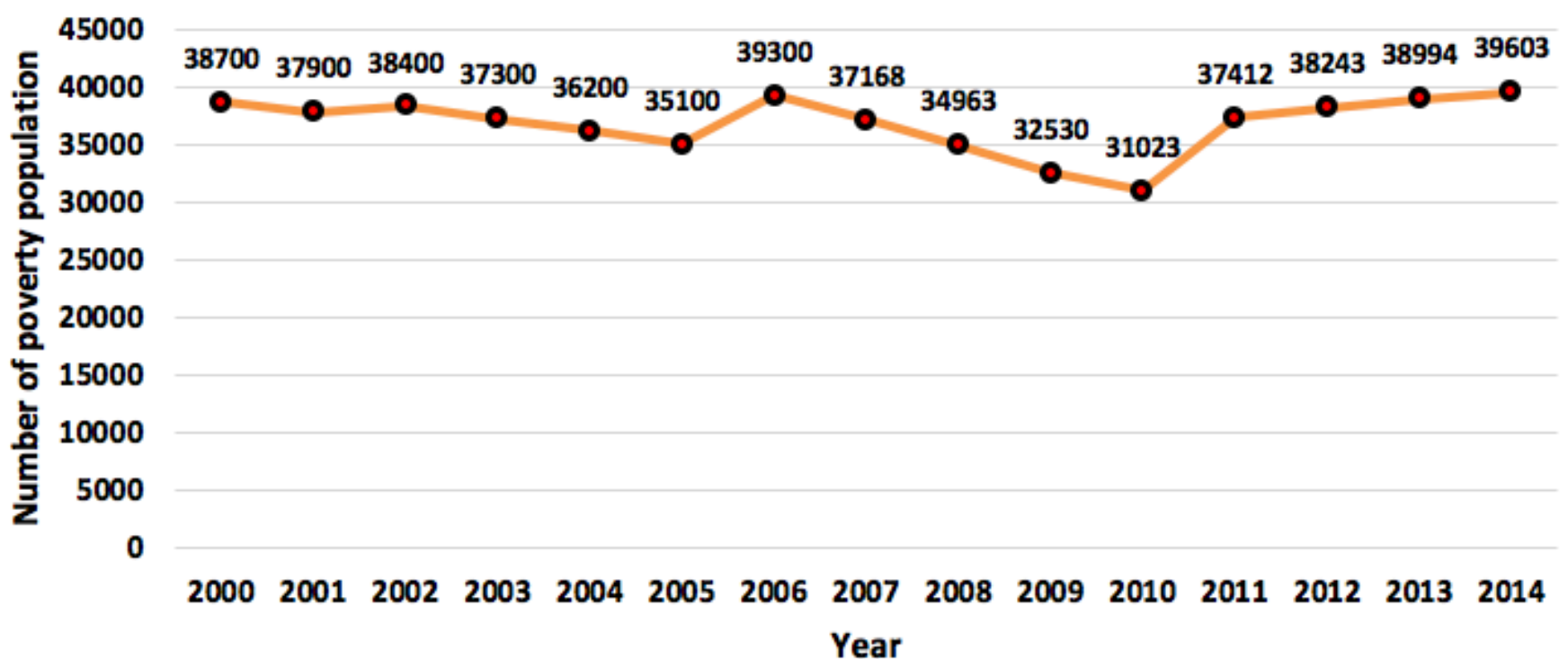
2. Literature review

Many factors affect poverty in a region. Wongdesmiati (2009) suggests that such factors include population, GDP, and life expectancy. Additional variables for the above three factors are the level of education and health and the number of unemployment (Prastyo 2010; Chen, 2008; Permana 2012; Susilowati and Wahyudi 2014; Ribut et al., 2014; Atta et al., 2014; Wiradinata et al., 2015; Sudiana et al., 2015; Arshanti et al., 2015; Lekobane et al.,

2016; Dongugkang, 2014; Ananda 2015; Pyndyck 1991). In addition, poverty can also be affected by investment, economic growth, and local government expenditures (Brata 2005; Auwalin et al., 2009; Deffrinica 2015; Dauda et al., 2016). Based on these descriptions, in this study, we aim to analyze the factors that affect poverty in Indonesia. The results of the analysis are important to formulate recommendations for poverty alleviation in Indonesia.

2.1 Poverty Concept

Poverty is a complex and multidimensional problem because it does not only relate to the economic dimension but has also expanded into social, health, education, and political dimensions. Poverty is often defined as a condition in which a person is unable or does not possess sufficient income to meet basic life needs such as food, clothing, shelter, education, and health. People who are unable to meet the minimum basic needs can be categorized as poor according to the Central Bureau of Statistics. The poverty baseline refers to the minimum requirement of 2,100 kcal per capita per day, plus the minimum nonfood requirements, which comprise the need for housing, clothing, schooling, and transportation, as well as the needs of households and other individuals. The amount of expenditures (in IDR) to meet the minimum basic needs of food and non-food is called the poverty line (BPS Indonesia 2015). Bappenas (2010) defines poverty as a condition of a person or group of people who are unable to fulfill their basic rights to maintain and develop a dignified life. According to BPS Indonesia (2009), conceptually the definition of poverty can be considered from two sides: (a) absolute poverty and (b) relative poverty.

2.2. Economic Growth

Economic growth is often used as an indicator to measure the level of economic development (economic achievement) of a country. According to Budiono (1999), economic growth is a process of increasing national output per capita in the long run, thereby indicating elements of change and economic growth indicators over a fairly long period. According to Todaro and Smith (2006), economic growth comprises the three main factors of (a) capital accumulation, (b) population growth and labor force, and (c) technological advancement. The problem of poverty cannot be solved simply by expecting the trickle-down effect of economic growth. Siregar and Wahyuniarti (2008) argue that economic growth is a requirement to reduce poverty. In addition, economic growth is also used as an indicator of the successful development of a region. One requirement of poverty reduction is the successful economic growth in every class of society, including the poor. Wongdesmiwati (2009) finds that a negative relationship exists between economic growth and poverty levels. The increase in economic growth is expected to reduce the level of poverty. This relationship indicates that acceleration of economic growth is important to reduce poverty.

2.3 Population Size

According to Sukirno (2006), population is a fundamental problem in the economic development of a region. Uncontrolled population growth will result in the absence of economic development goals, namely, the welfare of the people and poverty reduction. The growth of the population can be a constraint factor and a direction of development. Specifically, population growth can be a constraint factor in the development of high population growth with high economic growth, thereby decreasing productivity and increasing unemployment. Thus, the burden of development is increased, which can become a driving factor because of (a) increasing the number of workers and (b) expanding the market because the broad market of goods and services is determined by the income of the people and the population. The high population growth rate is a problem faced by many developing countries. Population problems include high fertility and mortality rates, of which the former is higher. Such high fertility rates can be attributed to early marriage and lack of knowledge about family planning, whereas the high mortality rate caused by the quality of public health remains low. According to Todaro and Smith (2006), capital development can be reliable if a large population is followed by adequate quality of human resources. However, a low quality of human resources will become a burden on the development of a

country. Many studies have indicated a positive relationship between the population and the number of poor people. Other studies conducted by Siregar and Wahyuniarti (2008) and Wongdesmiati (2009) suggest a positive relationship between a large population and increasing numbers of poor people.

2.4 Education

Education plays a major role in increasing the ability of a developing country to adopt modern technology and develop the capacity for sustainable growth and development (Todaro and Smith, 2006). Based on the regulation of the Republic of Indonesia, Number 20, Year 2003, education is a conscious and planned effort to create an atmosphere of learning and learning process such that learners actively develop their potential for spiritual power, self-control, personality, and intelligence, as well as the skills needed by society and country. Todaro (2000) argues that education positively affects economic growth because the availability of skilled and educated workers is an important condition in the ongoing process of economic development. In addition, to attain sustainable development, the education sector is strategic, especially in encouraging the accumulation of capital that can support production and other economic activities. Education and poverty indicate a considerable linkage because the former can enhance the ability of individuals to develop via mastery of knowledge and skills. Siregar and Wahyuniarti (2008) find that education is measured by looking at the number of people who graduated from junior high school, high school, and diploma, which indicated a significant effect on reduction in the population of poor people. This finding indicates that human capital development via improving education is an important determinant in the process of decreasing the number of poor people.

2.5. Health

According to Todaro and Smith (2006), one of the core aspects of prosperity is health. Health is an important aspect of sustainable development and is a requirement for increased productivity. Healthy and strong human resources (HR) are important basic aspects of capital in the development of clean water supply, access to health services, good nutrition, adequate food availability, and pollution-free housing, all of which contribute to the health of the population. If a number of these factors are ignored, the health risk of the population will be affected, thereby ultimately hindering the realization of sustainable development. Health is one of the key indicators of national development and prosperity. Thus, health should be a main aspect of sustainable development. Health is a benchmark of the success of the development of a nation and state. Furthermore, health is a human right. Life expectancy is one tool to evaluate government performance in improving the welfare of the population in general and the degree of health in particular. Life expectancy represents the average age that a person can reach in the prevailing mortality situation in his/her community. If the life expectancy of an area is low, then health development has not been successful, and a higher the life expectancy indicates that health development in the area is successful (BPS Indonesia, 2015).

2.6. Budgeting

Unemployment is a labor problem in many countries. A person is unemployed if he/she has been classified as part of the labor force and is actively looking for a job at a certain wage level but does not obtain the job he/she wants. Unemployment can lead to a decline in people's incomes, thereby causing a decrease in the level of prosperity achieved by the community (Sumarsono 2003). According to Sukirno (2005), the income reduction caused by unemployment leads to a decrease in the level of prosperity. Unemployment can lead to economic and social problems in the life of an unemployed person. The decline in the welfare of people because of unemployment increases their chances of being caught in a cycle of poverty because they have no income. If a country has a high unemployment rate, then political and social turmoil will have adverse effects on community welfare and long-term economic development prospects. Furthermore, education is a factor that determines the dynamics of poverty (Park et al. 2017; Ayala et al. 2017; Stampini et al. 2016).

2.7. Investment

Harrod–Domar theory posits a positive relationship between the level of investment and the rate of economic growth. This theory essentially emphasizes the need for investment to create economic growth. According to Nurkse (1953), the circle of poverty in developing countries can be cut with the formation of capital. Thus, capital formation is seen as one factor and also as the main factor in economic development (Jhingan, 2008). Furthermore, economic development is the process of capital formation of social and economic overhead. The formation of capital can be attained if the rate of capital formation in the country is sufficiently fast; that is, when the income of the larger community is invested rather than used for consumption. Capital formation also creates market expansion, thereby helping to eliminate market imperfection by creating social and economic overhead capital. Consequently, investment can reduce the poverty chains from both the supply and demand sides. Sukirno (2006) explains that investment is classified as an autonomous aggregate shopping component; that is, the prevailing level of investment is not affected by national income. Barahona (2016) argues that the unemployment rate could reduce the level of income and affect poverty. Keynes's analysis shows two important factors that determine investment, namely, interest rates and future expectations about the state of economic activity.

2.8. Government Expenses

According to Sukirno (2006), government spending represents the total expenditures used for the benefit of the community. Expenditures to provide education and health facilities, expenditures to provide police and soldiers, salary expenditures for government employees, and expenditures for infrastructure development are made for the benefit of the community. Government spending is also considered as an autonomous expenditure because national income is not an important factor that affects the government's decision to determine its spending budget. Todaro (2006) argues that government expenditures can affect economic activities. In addition, government expenditures can create the various infrastructures needed in the development process, as well as a component of aggregate demand that will increase and boost production or GDP, as long as the economy has not reached full employment levels.

3. Research methodology

In this study, we used secondary data in the form of time series data for the period 2000–2014. These data were obtained from the Indonesian Central Bureau of Statistics, BAPPENAS, and other sources in the form of scientific journals and textbooks. The multiple regression models with OLS method was used for analysis. The regression equation model is formulated as follows:

$$TPO = b_0 + b_1 GDP + b_2 JP + b_3 RLS + b_4 AHH + b_5 TPT + b_6 GEI + b_7 INV + +U \quad \dots\dots\dots\dots\dots\dots\dots\dots (1)$$

Where JPM = number of poverty in Indonesia (person)
GDB   = PDB constant price without oil and gas (million IDR)
JP   = number of population in Indonesia (person)
RLS = average of education time (year)
AHH = length of education (year)
TPT   = open unemployment level (person)
GEI   = government infrastructure expenses (billion IDR)
INV   = investment (million IDR)
b_0 = intercept
$b_1...b_7$ = regression coefficient
u_t = residual
t   = 1, 2, 3, 4, 5 (data time series, 2000–2014)

To prove the hypothesis, we use an analysis of 90% confidence level or tolerance *level of significance* α = 0.01 (10%). To know the factors that affect poverty in Indonesia, we used t-test. If Pr |t| < 0.1, then H_o is rejected then H_1 is accepted. The hypothesis aims to test the following aspects:
 a) economic growth is negatively affected by the number of poor people;
 b) the number of influential residents positively affects the population of poor people;
 c) the average length of education negatively affects the number of poor people;
 d) life expectancy numbers negatively affect the number of poor people;
 e) open unemployment rate positively affects the number of poor people;
 f) government infrastructure spending negatively affects the number of poor people; and
 g) investment negatively affects the number of poor people.

An effective econometric model must meet the classical assumption test by conducting multicollinearity test, autocorrelation, heteroscedasticity, and normality (Widarjono 2009; Verbeek et al., 2000; Pindyck 1998; Gujarati 2011). After the value of regression coefficient is obtained, the value of elasticity is calculated. The calculation is used to determine the degree of susceptibility of the dependent variable to the changes that occur in the dependent variable in an equation, namely, short-term and long-term elasticity (Hessie 2009). The following formulas are used:

$$E_{SR} = a_t \frac{\bar{X}_t}{\bar{Y}_t} \quad \dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots, \quad (2)$$

$$E_{LR} \frac{E_{SR}}{1 - \text{coefficient Lag change dependent}} \quad \dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots\dots, \quad (3)$$

where E_{SR} = short-term elasticity of dependent variable, Y is variable independent, X_t; E_{LR} = short-term elasticity of dependent variable Y to variable independent X_t; $\bar{X}_t$ = average value of independent variable X ke-t; $\bar{Y}_t$ = average value of dependent variable Y ke-t; a_i = prediction parameter of independent variable t. If the rate of elasticity is greater than mean dependent variable Y, then E_{SR} is responsive to the variable independent X_t. If the value of elasticity is less than mean variable dependent Y, then it is not responsive to variable independent X_t.

4. Results and discussion

By referring to the explained research method, to obtain good results on a model that is analyzed by the ordinary least squares method, we must conduct classical assumption tests, namely, multicollinearity test, autocorrelation, heteroscedasticity, and normality. Multicollinearity test results indicated that the variance inflation factor (VIF) value of all independent variables was below 10, in which the maximum limit of VIF was 10. Based on the VIF value of all independent variables, we conclude that the built model did not indicate multicollinearity. Furthermore, the built model did not experience autocorrelation problems. This phenomenon can be found in the Durbin–Watson (DW) value on the model to be close to 2 (equal to 2.01). In addition, the problem of heteroscedasticity also did not occur when the value of probability obs * R-squared of 48.04% > a, i.e., 10%, so H0 is accepted. Normality test using a Shapiro–Wilk statistic test of 0.92 indicated a significant difference with 0.08 at the real level of 10%. Thus, the built model is normally distributed. Table 1 shows that the value of determination coefficient (R2) of the research model obtained was 97.81%. Furthermore, 97.81% of poverty variables can be explained by GDP, population,

education, health, unemployment rate, government infrastructure, and investment variables, whereas the remaining 2.19% is explained by other variables that are not included in the model.

Table 1
Estimation results of factor model for poverty in Indonesia

Variable	Parameter Estimate	Standard Error	t Value	Pr > |t|	Variance Inflation Factor	E_{SR}
Intercept	28216	14143	2	0.0645	0	-
GDB	-0.00036041	0.00014208	-2.54	**0.0228**	6.32252	**-0.067**
JP	0.01413	0.02971	0.48	0.6411	8.27324	-
RLS	-256.65794	233.70902	-1.1	**0.1894**	1.67024	**-0.05**
AHH	-333.50349	150.63223	-2.21	**0.0427**	4.15505	**-0.62**
TPT	245.11935	204.87531	1.2	0.2501	5.0339	
GEI	-15.48712	8.12471	-1.91	**0.076**	1.91076	**-0.25**
INV	0.00726	0.00853	0.85	0.4081	7.07169	
LTPO	0.81037	0.09411	8.61	<.0001	5.33837	
	$R^2 = 97.81\%$	Pr > F = 0,001		DW = 2,01		

The estimation model in Table 1 shows that four variables indicated a significant effect on poverty, namely, GDP, average length of education, life expectancy, and government expenditures for infrastructure. The estimation showed that GDP indicated a negative and significant effect on $a = 10\%$. The average regression coefficient of education length was -0.00036041. Thus, if the average length of education increases by one year, then the number of poor people will decrease by 0.00036041 billion. GDP indicated a negative elasticity of 0.067; thus, an increase of 1% in GDP would reduce the number of poor people by 0.067%. Thus, poverty was negatively responsive to GDP. The average length of education indicated a negative and significant effect on $a = 20\%$. The regression coefficient of education length is -256.65794. Thus, if the average length of education increased by one year, the poor population will decrease to be equal to 256.65794 people. The average length of education indicates a negative elasticity of 0.05, thereby showing that every 1% increase in the average length of education will decrease the number of poor people by 0.05%. According to prior studies (Arsyad 2010; Ke-Mei Chen et al. 2014; Christoph et al. 2016; Siposne 2014), education indicates an important role in reducing poverty over the long term. Therefore, via training programs, direct or indirect knowledge and skills can improve the productivity and effectiveness of the poor. Reducing the poor population can be done by increasing the average length of education through the implementation of the 12-year compulsory education program by providing scholarships to poor students. Investment in education is expected to address the poverty chain in Indonesia.

Life expectancy negatively affects the number of poor people with $a = 10\%$. The regression coefficient of life expectancy is -333.50349. Thus, if life expectancy is increased in one year, then the number of poor people will decrease by as much as 333.50349. Life expectancy indicated a negative elasticity value of 0.62. In other words, for every 1% increase in life expectancy, the number of poor people will decrease by 0.62%. The result suggests that life expectancy is the most important factor for reducing the number of poor people. This result is in agreement with the theory in which countries with better health indicate a longer life expectancy of the population. Thus, such countries economically indicate a chance to earn higher income. Arsyad (2010) explains that interventions to improve health are an important policy tool for reducing poverty. Thus, increasing life expectancy can be conducted by providing free health services to poor households and improving the nutritional quality of toddlers and mothers. Government infrastructure spending indicated a negative effect on the number of poor people with $a=10\%$. The regression coefficient value of the government infrastructure spending amounted to -15.48712. Thus, if the number of unemployed increases by 1 billion, then the number of poor people will be reduced by 15.48712. Government expenditures for infrastructure indicated an elasticity of -0.25, which means that a 1% increase in government infrastructure spending will reduce the number of poor people by 0.25%.

5. Conclusion

Our research analysis indicates that the factors that affect poverty in Indonesia are GDP, average length of education, life expectancy, and government spending on infrastructure. Policies to promote economic growth, education, and health and government spending on infrastructure positively affect the declining number of poor people, and the combination of these policies can reduce the number of poor people in the country. To alleviate poverty, we propose the following policies: (1) growth should be increased through the creation of a conducive investment climate and labor-intensive environment, (2) the population should be controlled through family planning programs, (3) health should be improved through the provision of free health care services and improved nutritional quality of infants and mothers, and (4) expenditure on infrastructure development must be increased through the realization of a budget that also focuses on poverty alleviation by means of programs to improve education, health, housing services, and subsidies.

Acknowledgment

References

Ananda, I.A. (2015). Pengaruh Pertumbuhan Ekonomi Dan Indeks Pembangunan Manusia (IPM) Terhadap Kemiskinan Pada Kawasan Perbatasan dan Non Perbatasan Di Provinsi Kalimantan Barat. Jurnal Ekonomi Daerah (JEDA) Vol 1, No 1 (2015): Jurnal Magister Ekonomi Untan.Publisher: Jurnal Ekonomi Daerah (JEDA).

Arsyad, L. (2010). Ekonomi Pembangunan. STIM YKPN, Yogyakarta.

Arshanti, K.N. and Wirathi, I.G.A.P. (2015). Pengaruh Investasi Terhadap Pengentasan Kemiskinan Melalui Mediasi Pertumbuhan Ekonomi Provinsi Bali. E-Jurnal Ekonomi Pembangunan Universitas Udayana Vol. 4, No. 5, Mei 2015 (pp. 348 – 607). Publisher: E-Jurnal Ekonomi Pembangunan Universitas Udayana.

Atta, U. K., Sabor, A., Hussain, A., Sadiq, S., and Mohsin, A.Q. (2014). Poverty assessment as a multidimensional socio-economic concept: the case of the Rawalpindi region in Pakistan. Asia Pacific Journal of Social Work Vol. 24, No. 4.

Auwalin, I. (2009). Halving Poverty in Indonesia. Journal of Indonesian Economy and Business JIEB Volume 24, No.3, September 2009. Publisher: Faculty of Economics and Business, Universitas Gadjah Mada.

Ayala, L., Canto, O., and Rodríguez, J.Q. (2017). Poverty and the business cycle: A regional panel data analysis for Spain using alternative measures of unemployment. The Journal of Economic Inequality.

BarahonaI, I. (2016). Poverty in Mexico: Its relationship to social and cultural indicators. Journal Social Indicators Research.

Bappenas (2010). Bab 16 Penanggulangan Kemiskinan. http:// www. Bappenas .go.id/files/5413/6082/ 9497 / bab- 16 - penanggulangan-kemiskinan.pdf.

BPS Indonesia (2015). Statistik Indonesia. Badan Pusat Statistik Indonesia, Jakarta.

Brata, A.G. (2005). Investasi Sektor Publik Lokal, Pembangunan Manusia Dan Kemiskinan. Lembaga Penelitian - Universitas Atma Jaya, Yogyakarta.

Budiono (1999). Teori Pertumbuhan Ekonomi. BPFE, Yogyakarta.

Chen, K.M. and Wang, T.M. (2015). Determinants of Poverty Status in Taiwan: A Multilevel Approach. Social Indicators Research.

Christoph, B., Sabin, B., Wiesmann, U., Andreas, H. (2016). A Different Perspective on Poverty in Lao PDR: Multidimensional Poverty in Lao PDR for the Years 2002/2003 and 2007/2008. Journal Social Indicators Research.

Dauda, R.S. (2016) Poverty and Economic Growth in Nigeria: Issues and Policies. Journal of Poverty Vol. 21, 2017-Issue 1.

Deffrinica (2015). Pengaruh Pertumbuhan Ekonomi dan Pengeluaran Pemerintah Terhadap Kemiskinan Di Kalimantan Barat Tahun 2009-2013. Jurnal Ekonomi Daerah (JEDA) Vol 1, No 1 (2015).

Dongugkang. (2014). Factors affecting poverty among people with disabilities and antipoverty policies in South Korea. Journal Asia Pacific Journal of Social Work and Development Vol. 24, 2014 - Issue 4.

Siposne Nandore,E. (2014) Interpretation of Poverty in St. Louis County, Minnesota. Applied Research in Quality of Life.

Hessie, R. 2009. Analisis Produksi dan Konsumsi Beras Dalam Negeri serta Implikasinya terhadap Swasembada Beras Indonesia. Skripsi Departemen Ekonomi Sumberdaya dan Lingkungan, Fakultas Ekonomi dan Manajemen, Institut Pertanian Bogor, Bogor.

Jhingan, M.L.(2008) Ekonomi Perencanaan dan Pembangunan. PT. Raja Grafindo Persada. Jakarta.

Lekobane, R. and Seleka, B. (2017) Determinants of Household Welfare and Poverty in Botswana, 2002/2003 and 2009/2010, Journal of Poverty, 21(1), pp. 42-60.

Nurkse, R. (1953). Problems of Capital Formation in Underdeveloped Countries. New York: Oxford University Press

Park, E.Y, and NamJ. (2017). Influential Factors of Poverty Dynamics among Korean Households that Include the Aged with Disability. Applied Research in Quality of Life. https://link.springer.com/content/pdf/10.1007%2Fs11482-017-9523-x.pdf. Published online: 123 Maret 2017.

Permana, A.Y (2012) Analisis Pengaruh PDRB, Pengangguran, Pendidikan, dan Kesehatan terhadap Kemiskinan di Jawa Tengah Tahun 2004-2009. Jurnal IESP Fakultas Ekonomika dan Bisnis, Universitas Diponegoro 1(1):1.

Prastyo, A.A (2010) Analisis Faktor-faktor yang Mempengaruhi Tingkat Kemiskinan (Studi Kasus 35 Kabupaten/Kota di Jawa Tengah Tahun 2003-2007). Skripsi Fakultas Ekonomi, Universitas Diponegoro, Semarang.

Pyndyck, R. S and D. L Rubenfield. (1991). Econometric Models and Economic Forcasts. Third Edition McGraw-Hill Inc, New York.

Ribut, N., Wahyuni, T. and Damayanti, A. (2014). Jurnal Ekonomi dan Pembangunan Indonesia Vol 14, No 2 (2014): Januari page. 128-144. Publisher:Department of Economics-FEB UI.

Siregar, H and Wahyuniarti, W. (2008) Dampak Pertumbuhan Ekonomi Terhadap Penurunan Jumlah Penduduk Miskin.

Stampini. M., Robles., and Saenz, M. (2016). Poverty, vulnerability, and the middle class in Latin America. Journal Latin American Economic Review.

Sudiana, I. W., and Sudiana, I. K. (2015) Pengaruh PDRB, Pendidikan dan Struktur Tenaga Kerja Terhadap Kemiskinan di Provinsi Bali. E-Jurnal Ekonomi Pembangunan Universitas Udayana Vol. 4, No. 6, Juni 2015 (pp. 608 - 745).

Suryana. (2000) Teori-teori Pertumbuhan Ekonomi. Ekonomi Pembangunan: Teori, Masalah dan Kebijakan. Yogyakarta: UPP AMP YKPN

Sukirno, S. (2005) Makro Ekonomi: Teori Pengantar. PT.Raja Grafindo Persada, Jakarta.

Sukirno, S. (2006) Ekonomi Pembangunan: Proses, Masalah dan Dasar Kebijakan. Kencana, Jakarta.

Sumarsono, Sonny. 2003. Ekonomi Manajemen Sumber Daya Manusia dan Ketenagakerjaan. Graha Ilmu, Yogyakarta.

Susilowati, D. and Wahyudi. M.S. (2015). Pertumbuhan Ekonomi, Indeks Pembangunan Manusia, Utang Luar Negeri Dan Kemiskinan (Kajian Teoritis Di Indonesia). Jurnal Ekonomika Bisnis Vol 6, No 1 (2015).

Todaro, M. P.(2000) Pembangunan Ekonomi di Dunia Ketiga, Edisi Ketujuh. Erlangga, Jakarta.

Todaro, M. and Smith (2006) Pembangunan Ekonomi di Dunia Ketiga, Edisi Kesembilan. Erlangga. Jakarta.

Verbeek, M. (2000) A Guide to Modern Ecomometrics. John Wiley & Sons Ltd, Chichester.

Widarjono, A. (2009) Ekonometrika Pengantar dan Aplikasi untuk Ekonomi dan Bisnis. Ekonisia, Jakarta.

Wiradinata, K. I., and Nengah, K. (2015) Analisis Pengaruh Upah Minimum, Tingkat Pendidikan Dan Tingkat Pengangguran Terhadap Tingkat Kemiskinan Di Provinsi Bali Periode Tahun 1995-2012. E-Jurnal Ekonomi Pembangunan Universitas Udayana Vol. 4, No. 6, Juni 2015 (pp. 608 - 745). Publisher: E-Jurnal Ekonomi Pembangunan Universitas Udayana.

Wongdesmiati (2009) Pertumbuhan Ekonomi dan Pengentasan Kemiskinan di Indonesia: Analisis Ekonometrika.

1. Department of Agricultural Economics and Agribusiness, Universitas Islam Riau Jl. Kaharuddin Nasution No. 113 Marpoyan, Pekanbaru, Riau, Indonesia Email: asrol@agr.uir.ac.id

2. Faculty of Business and Accountancy, University of Selangor, Selangor, Malaysia. Email: hafsah@unisel.edu.my

[Index]

[In case you find any errors on this site, please send e-mail to webmaster]