

Social Welfare Analysis: Economic Study of Human Development Index, Income Inequality, and Poverty in Aceh and North Sumatra Provinces

Feny Fadiya¹, Mahlina Putri Manurung², Annisah Saajidah³, Armin Rahmansyah Nasution⁴, Audina Pratiwi⁵, Krisnawati Silaban⁶, and Melani Manginar Sirait⁷

Medan State University

email: fenyfadiya08@gmail.com

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Abstract

This study was conducted with the aim of knowing how much social inequality occurs between Aceh province and North Sumatra province. The method in collecting and processing data uses descriptive qualitative, where the data obtained is described through graphs as a measure of inequality. The samples in this study are; Human Development Index, Net Income and poverty. The results of this study are 1) The Human Development Index is at an unequal point where North Sumatra province is below Aceh province. 2) Through the net income graph, North Sumatra province is dominantly higher than Aceh province. 3) The poverty index of Aceh province is greater than that of North Sumatra province. 4) Through the processed data, North Sumatra province has superior inequality than Aceh province with two samples that are larger. Based on this research, the author makes a suggestion for the government to increase the policy of increasing employment for regions that do not have large revenues, and pay more attention to the efficiency of fiscal policies that have a direct impact on poverty.

1. Introduction

Social Welfare is all rights that must be received by every individual in society on the basis of improving the quality of life to achieve a more just and prosperous life. These basic individual rights can be in the form of basic rights to education, health, employment and social protection. In this case, social welfare seeks to improve the quality of life of society through just economic development, equality and social protection for each individual.

Social welfare can be said to be an important aspect in assessing the level of welfare of society as a whole. The Indonesian government has attempted to improve social welfare through various means, one of which is by launching various programs and policies such as the Family Hope Program (PKH) and the National Health Insurance Program (JKN). In an in-depth analysis of social welfare it can be measured through several indicators; such as the Human Development Index (HDI), Income Inequality and Poverty. Social welfare certainly has relevance to economic policy, especially public policy, this is because various public or social policies made by the

government certainly have a direct impact on every individual in society. As is the case with the Family Hope Program (PKH) policy which was launched by the government to help poor families overcome poverty and to improve the quality of human resources themselves, especially in the fields of education and health in poor groups. Therefore, the Human Development Index (HDI), income inequality and poverty are appropriate and relevant variables in measuring the level of social welfare, especially in the North Sumatra and Aceh regions.

Inequality in society is still felt today. The occurrence of gaps or gaps in welfare between regions or areas will encourage income inequality and increase poverty between regions or areas. (Adelman and Morris, 1973 in Jhingan, 2013).

Based on the Central Statistics Agency's report regarding income, if measured based on the net income of self-employed workers in Aceh province, there was a decrease in 2021 amounting to 291.3, this is the largest fluctuation compared to 2022. Meanwhile, in North Sumatra there was a decrease in 2021,

but experienced quite a large increase in 2022, namely 348.7.

Table 1
Human Development Index (HDI)
(Percentage %) (3 years)

Province	2020	2021	2022
Aceh	71.99	72.18	72.80
North Sumatra	71.77	72.00	72.71

Source: Central Statistics Agency (BPS) Human Development Index

The Human Development Index is an important indicator in determining the level of social welfare in the concept of development level in a country. This index can be used to measure success in efforts to build the quality of human life. HDI also explains how residents can access the results of development in terms of income, education, health and so on.

Table 2
Average Income Clean a month Worker Try Own (Rupiah)

Province	2020	2021	2022
Aceh	1 630.8	1 339.5	1 447.3
North Sumatra	1 587.2	1 472.6	1 821.3

Source: Central Statistics Agency (BPS)

A worker's net income for a month is a month's reward or income, whether in the form of money or goods obtained by someone who works with the status of their own business, a freelance worker in the agricultural sector or a freelance worker in non-agriculture. Index is an indicator in measuring the level of welfare of a social community, because from the income level of an area we can find out other indicators such as poverty and so on.

Table 3
Poverty (Percentage P2/%) (3 years)

Province	2020	2021	2022
Aceh	0.83	0.81	0.78
North Sumatra	0.45	0.38	0.34

Source: Central Statistics Agency (BPS)

Poverty is a definite problem faced by all countries, especially developing and underdeveloped countries. Poverty is an

individual's inability from the economic side. For fulfilling needs basic food and not food being measured from their ability to fulfill basic needs (basic needs approach). By general, poverty can be caused by many matters. According to (Todaro & Smith, 2015) poverty can happen No Because No own commodity but Because the public is not capable enough of optimizing functions and benefits from the commodity.

Well-being social which is independent variable in study This becomes reject measuring inequality between one area with others, in study this is what happened subject of study is Aceh and North Sumatra Province areas. Well-being social is conditions in which society can fulfill their needs based on their good material and non-material needs, such as health, education, housing and a healthy environment. Social well-being also includes equality and justice in distribution of source power and opportunity, as well as active public participation in economic and social development. In the context of public economy, social welfare can be achieved through sustainable and inclusive economic development, which in economic growth must be accompanied by well-being social equality. This matter can be achieved through various policies from supportive government efforts alleviation poverty, income equality, increasing access to basic services, and also empowering the public. Achievement efforts are key from this study, so can be known comparison between second subject study This in the context of social well-being.

The data obtained as a whole comes from the Central Statistics Agency (BPS) which is the initial data for the hypothesis to determine the level of inequality in social welfare between the provinces of Aceh and North Sumatra. Research was carried out by analyzing economic index graphs that were relevant to social welfare variables. Furthermore, the data collected using the learning method is used to produce new knowledge related to the research carried out.

With the large amount of related data that has differences between the provinces of Aceh and North Sumatra, the three year time period becomes the formulation of the problem of inequality related to research variables.

2. Literature Review

2.1 Welfare Social

Literally, prosperity means security and safety of life. The word prosperity means prosperity, which describes the concept of a situation where everyone, both as individuals and as members of society, can fulfill their needs easily.

Walter A. Friedlander, Social welfare is a system of social services and organized institutions aimed at helping individuals and groups to achieve satisfactory standards of life and health as well as personal relationships and social possibilities, they develop their abilities to the maximum extent possible and increase their well-being. adapted to the needs of families and communities.

Welfare theories can generally be divided into three types: classical utilitarian theories, neo-classical welfare theories, and new contractarian approaches. The classic utilitarian approach emphasizes one's pleasure or satisfaction (utility). can be measured and improved. Different levels of pleasure experienced by the same individual can be compared quantitatively. The principle for individuals is to improve their welfare as much as possible. Meanwhile, for society, improving the welfare of its group is a principle adhered to in its life. Neo-classical welfare theory popularized the theory of the Pareto Optimality principle. The Pareto Optimality Principle states that society gets better off and not worse off. This principle is a necessary condition for achieving a state where social welfare is maximal. Apart from the Pareto optimality principle, Neo-classical welfare theory explains that the welfare function is a function of satisfaction of all individuals.

Utilitarianism theory provides support for achieving social welfare experiences felt by the beneficiary community. So that the more

people receive benefits and obtain profits from an object or process, the desired goal in the form of prosperity or happiness will be achieved.

Normatively, welfare issues are usually regulated in Law Number 11 of 2009 concerning Social Welfare (Social Welfare Law), which replaced Law Number 6 of 1974 concerning Requirements for Social Welfare Trees. In Article 1 paragraph (1) of the Social Welfare Law, it is emphasized that: "Social welfare is a condition where the material, spiritual and social needs of citizens are met to obtain a decent living and are capable of developing themselves, so that they are able to carry out social functions."

2.2 Human Development Index (HDI)

Index development man is something development carried out focuses on development source Power accompanies humans with economic growth. Resource development Power man in a way physical and mental means improving capacity base later residents will enlarge the opportunity to be able to participate in the sustainable development process. Human Development Index or the Human Development Index (HDI) is used to measure the extent of success in human life and measure achievements of human development based on a number component based quality of life.

2.3 Inequality Income

In Lot's case, income inequality is one of the main problems in developing countries. Economists most often use individual income dividends to calculate the income of each individual or household. (Todaro & Smith, 2004).

Abnormalities that occur in an area will have an impact on the welfare of the people in that area. There is a relationship between the human development index and income inequality. (Becker Agus Iman Solihin, 1995) states that HDI has a negative impact on inequality. He then conducted further studies on How formal education helps economic

growth and found that higher labor productivity was associated with the level of formal education, this is in line with the source of the Human Power theory which states that education affects economic growth and will reduce economic growth. gap. According to this theory, individual productivity determines population growth. With increasing income, everyone is affected by higher education so that population economic growth can be encouraged.

Sukirno (2006) explains that there are two scales for measuring income inequality, namely relative inequality and absolute inequality. The first shows that inequality can be measured by factors that have absolute values. The second shows differences in income distribution by comparing the share of total income earned by individuals or groups with the total income of society.

The extent to which individuals within a community have different levels of access or participation in the group's national income" is the definition of income inequality, according to Smith and Todaro (2006). The higher savings rate in aggregate is caused by a more unequal distribution of income, because rich people tend to save more than poor people. This results in more investment measures and more economic growth.

Myrdal (1957) also explained the inequality between regions. The theory of economic underdevelopment and development focuses on regional disparities at the national and global levels. Myrdal used draft propagation and backwash effects to explain this. The spread effect or spillover effect is a beneficial influence that includes the investment of Genre activity from the center of growth to the surrounding region. The impact of backwash is a bad impact which includes: the influx of human resources and capital from surrounding or peripheral areas into the core area, resulting in a lack of development capital needed to balance development in the core area. Myrdal's opinion is that the magnitude of the backwash effect compared to the spread

effect in underdeveloped countries causes regional inequality. Capital movements tend to increase regional inequality because increasing demand for regional income will encourage investment which ultimately increases income. Additionally, greater investment coverage in development centers may lead to capital scarcity in underdeveloped areas.

2.4 Poverty

Amartya Sen said that poverty is defined not only as a lack or inability but also in terms of what individuals are allowed to do and what they are not able to do. This includes material deficiencies, physical disabilities, and social aspects. This perspective shows that poverty is a global social issue, meaning it is a problem that hinders human prosperity and civilization (Suharto, 2013).

Poverty in Indonesia remains a pressing issue for discussion and resolution, due to its relationship with unemployment and social inequality. Poverty continues to be a significant problem. Therefore, solutions must be comprehensive and address the various factors influencing poverty. It is important to examine the various aspects of public poverty from social, economic, psychological, and political perspectives. Limited social connections contribute to social aspects of poverty (Tantoro, 2014).

Every government in Indonesia must prioritize the problem of poverty. Both past and present governments have implemented various poverty mitigation programs, including Direct Cash Assistance (BLT) programs that provide free education and health services in several provinces, as well as various public subsidy programs. However, these programs have not yet fully succeeded in improving the well-being of the poor in Indonesia. The level of poverty in Indonesia is illustrated here (Septa et al., 2019).

There are many definitions of poverty. The first understanding is based on the material lack that covers daily needs such as food, clothing, shelter, and health services. In

this understanding, poverty is seen as a scarcity of basic goods and services. The second understanding relates to social needs, including dependency, social exclusion, and the inability to participate in public life. This includes aspects of learning and access to information. Social exclusion differs from poverty because it encompasses political and moral problems, not just economic issues. The third understanding focuses on the inability to achieve adequate income and wealth. According to Solikaturun (2004), the definition of “adequate” varies significantly in political and economic contexts worldwide.

According to Kotze (in Hikmat, 2004: 6), poor people often have significant potential to access resources through existing opportunities. Although external help may be used, it cannot be assumed that people will remain dependent on it. Since people cannot survive and thrive in isolation from other societal groups, this approach to empowerment is considered unsuccessful. Isolation causes individuals to be passive and worsens their situation.

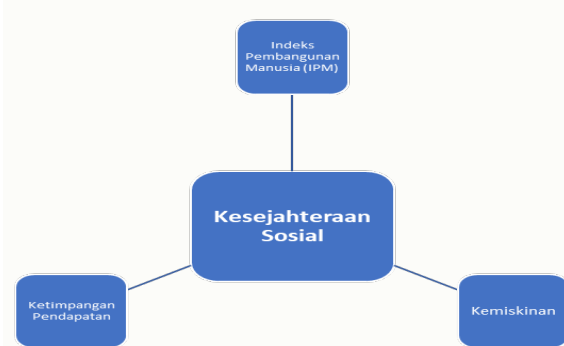
According to Supriatna (1997:90), poverty is a condition characterized by many limitations beyond the individual's control. Low levels of education, employment productivity, income, health, and nutrition, as well as a cycle of helplessness, contribute to poverty. Limited access to both formal and informal education can perpetuate poverty due to the lack of informal educational opportunities.

3. Research Methods

This research uses a descriptive qualitative approach method with economic perspective graphs which are then described and then compared between two research subjects, namely Aceh and North Sumatra Provinces to be used to produce a comprehensive and contextual picture of social welfare inequality. The research data collection technique uses secondary methods where data is obtained from the regional Central Statistics

Agency (BPS). according to the study. This research article was prepared using a systematic literature review method by taking various sources from relevant articles that have reliable scientific knowledge with the variables discussed for development material.

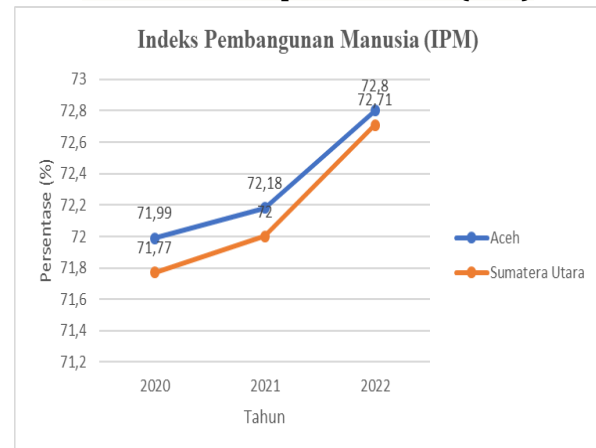
4. Results and Discussion



Human Development Index (HDI)

Graph 1

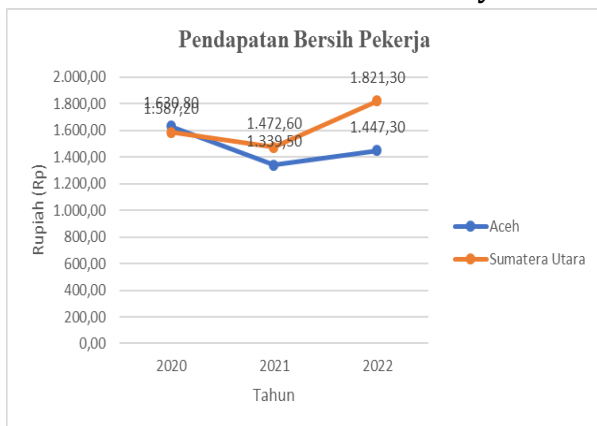
Human Development Index (HDI)



From graphic data on can be seen that Aceh Province dominates own Well-being social in matter human development index (HDI) is said to be more superior than North Sumatra. If analyzed, yes seen that the respective graph lines for Aceh and North Sumatra experience significant increase over the year stated. Aceh experienced steep rise with an upward trend line. Aceh has The Human Development Index (HDI) was the highest in 2022, namely 72.8 percent, and the lowest in 2020, namely 72.7 percent. Meanwhile in North Sumatra it is the same experience steep rise with an upward trend line. Although both of them experience increase, Aceh's Human Development Index

(HDI) is more superior compared to North Sumatra. With the highest HDI namely in 2022 and the lowest in 2020. With this graphic data analyst, got it seen that inequality occurs between Aceh and North Sumatra matter Human Development Index (HDI) although line graph experience increase. Inequality human development index (HDI) can occur because of a number of factors like, low number hope life moment of birth, low number literate letters, average years of schooling, as well as per capita expenditure.

Graph 2
Income Clean a month Worker Try Alone

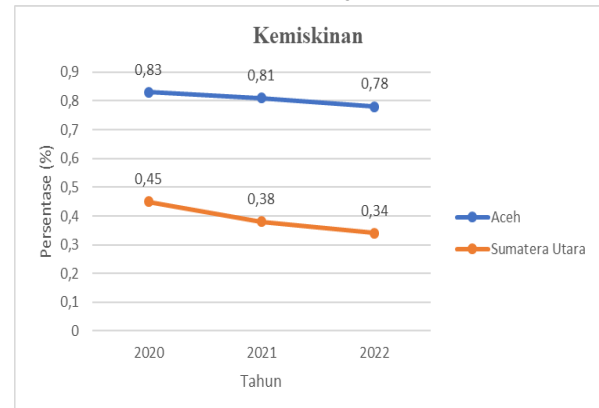


From the graphic data above, it can be analyzed that this is the accumulated average monthly net income of workers. Where are you? experiencing inequality. It can be seen that between the provinces of Aceh and North Sumatra it fluctuates. In the line graph you can see that each has increased and decreased. However, the increase in North Sumatra's index this time is more dominant than Aceh. North Sumatra experienced a decline in 2021 from 1,587.20 to 1,472.60 but experienced a fairly high increase in 2022, reaching 1,821.30 and making this year the highest net income for workers.

Meanwhile, Aceh and North Sumatra also experienced a similar thing, namely a line graph that went up and down. Aceh experienced a decrease in 2021 from 1,630.80 to 1,339.50. In 2020, Aceh had a higher line graph than North Sumatra, but there was a sharp decline in 2021, but it rose again in 2022, namely 1,447.30. However, the increase in figures could NOT reach the highest figure in

2020. Therefore, 2020 was the highest year for net worker income.

Graph 3
Poverty



Based on the poverty graph, it can be analyzed that poverty in Aceh Province can be categorized as quite high compared to North Sumatra. Each province experienced a decline in successive years, but the poverty level in North Sumatra was quite low compared to Aceh. The lowest percentage of poverty levels in 2022 will be in Aceh and North Sumatra. Inequality in the poverty graph. This can be seen to be very large from the quite large difference in graph lines and percentages. In 2022, both Aceh and North Sumatra Provinces will experience a reduction in poverty rates, but when compared to the two there is still quite a gap or distance. In 2022, Aceh's poverty rate is 0.44 percent higher than North Sumatra's which only reaches 0.34 percent.

In measuring the level of poverty, the Central Statistics Agency uses a design for the ability to fulfill basic needs (basic needs approach). Poverty is a form of inequality in social welfare. Because the Gini Ratio value in Aceh Province is almost close to 1, indicating an increasingly high level of inequality.

5. Closing

5.1 Conclusion

Based on the entire research graph and economic analysis that has been carried out. Researchers draw several important points as research conclusions, namely:



1. Analysis of the graph of the dependent variable first on the human development index (HDI) produces a disparity that Aceh Province has a higher human development resource index compared to North Sumatra Province. This can be seen from the graph of the trend line for Aceh Province which is higher and constant above the trend line for North Sumatra Province.
2. Graphic analysis of the second dependent variable on the net and productive income inequality index shows that North Sumatra Province has a higher index value compared to Aceh Province. Even though in the first year of the research period North Sumatra Province was below Aceh Province, the net income development index for North Sumatra Province increased by more so that Aceh Province's net income was below North Sumatra Province.
3. Graphic analysis of the third dependent variable on the poverty index, produces inequality which indicates that the Aceh Province index has a higher poverty index than North Sumatra Province. This is relevant to reject the measurement of the net income index, where the net income index for North Sumatra Province is higher than for Aceh Province, so this affects the poverty index, because income will affect a person's poverty level.
4. Based on all the dependent variables, it can be concluded that the independent variable or social welfare is measured through three graphs of economic variables. North Sumatra Province dominates with two indexes greater than Aceh Province, namely the Net Income Index and Poverty Index. This can mean that the socio-economic gap in North Sumatra Province is higher than that of Aceh Province. Although in terms of human resource development, North Sumatra Province is still below Aceh Province.

5.2 Suggestions

Through the overall discussion and analysis of the study, the author determines

proposals related to this problem in terms of income, the Aceh Province government can further improve the policy of increasing the number of workers or working capital, so that the total income of the people of Aceh Province increases further. This policy will affect the poverty reduction index if the income of the population of Aceh Province increases. If based on the Human Development Index, North Sumatra Province can further improve the quality of Human Resources by increasing training and education, so that the quantity of experts and the human development index through the level of human ability can increase more than the previous index.

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