

Can fiscal transfers effectively reduce poverty in the Gorontalo Province?

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DOI: 10.22437/ppd.v11i6.28489	Received: 28.09.2023	Revised: 22.11.2023	Accepted: 18.01.2024	Published: 29.02.2024
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Abstract

The central government has increasingly diversified and expanded fiscal transfers to local authorities to enhance community welfare rapidly. However, in Gorontalo, although poverty rates have declined, the pace of reduction has slowed despite an increase in the value of transfers. This study aims to identify the fiscal transfer mechanisms most effective in reducing Gorontalo's poverty rate. It focuses on several types of fiscal transfers, including the Special Allocation Fund (DAK), Village Fund Allocation (ADD), Family Hope Program (*Program Keluarga Harapan*, PKH), Smart Indonesia Program (*Program Indonesia Pintar*, PIP), and Social Assistance. Utilizing panel data regression analysis covering all six districts/cities in Gorontalo Province over the last five years (2018-2022) and employing the Fixed Effects Model (FEM), the findings suggest that PIP assistance has the most significant impact on poverty reduction, although its effects are more long-term. Moreover, the study finds that while ADD transfers notably enhance community welfare, the two-decade-long DAK transfers have inadvertently worsened poverty levels in Gorontalo. This issue stems from the DAK's allocation formula, which does not directly target the income improvement of low-income populations. Both PKH and Social Assistance have shown little positive effect on poverty alleviation in the region. Consequently, the study recommends that the government prioritize expanding and funding enhancement of PIP assistance, considering many underprivileged individuals remain unreached by this support. Additionally, it suggests increasing the ADD to accelerate development in poverty-stricken rural areas.

Keywords: *Fiscal transfer, Gorontalo, Poverty reduction*

JEL Classification: H53, I32, I38

INTRODUCTION

Poverty is a global phenomenon, prevalent not only across the world but also within specific regions like Gorontalo, Indonesia. It presents a significant obstacle to development, which is intricately tied to the capacity of developing countries to elevate their living standards (Kingsbury et al., 2004). An unwavering commitment is essential to combat poverty within the framework of development. As a result, addressing

poverty has been prioritized as the foremost objective in the international development agenda encapsulated by the Sustainable Development Goals (SDGs). The SDGs set forth an ambitious objective: to eliminate extreme poverty by 2030 for all people (Kamruzzaman, 2016). The complexity of poverty, characterized by many indicators and underlying causes, demands a collaborative effort from multiple stakeholders. This includes providing cash and non-cash assistance to ensure the well-being of all citizens.

Beyond the direct efforts to alleviate poverty through cash transfers, other fiscal mechanisms, such as balancing funds, are pivotal to augmenting regional finances. Within these fiscal mechanisms lies a targeted and conditional aid form known as the Special Allocation Funds (DAK). The effectiveness of DAK transfers in reducing poverty rates has been documented (Arham & Hatu, 2020a). However, the deployment of DAK has evolved to encompass two main categories: physical and non-physical DAK. Research by Nugroho et al. (2021) reveals that these two varieties of DAK have differing impacts on poverty alleviation. Specifically, it was found that DAK aimed at education and health sectors significantly reduces poverty, whereas DAK designated for infrastructure does not significantly reduce poverty levels.

The initiation of regional autonomy in 2001, marked by the introduction of financial assistance through Balancing Funds, Profit Sharing, and General Allocation Funds (DAU), was aimed at bolstering the fiscal capabilities of regional governments. Despite these efforts, such fiscal transfers have not successfully tackled the persistent poverty in Gorontalo Province, especially within its rural locales. These areas remain noticeably underdeveloped, highlighting the insufficiency of existing fiscal policies in addressing the nuances of rural poverty.

In response to these challenges, a significant strategy was adopted in 2015 to enhance regional financial support through the Village Fund Allocation (ADD). This initiative was tailored to accelerate development efforts at the village level specifically. The Village Fund is structured similarly to other transfer mechanisms, like the DAU, but with a critical distinction: it is directly managed by village administrations. This approach is predicated on the belief that direct management by local governments can more effectively influence poverty alleviation in these areas.

This belief is supported by several studies, which collectively affirm the positive impact of Village Fund allocations on poverty reduction. Research by Arham & Payu (2019), Daforsa & Handra (2019), and Putra et al. (2023) provides empirical evidence that ADD transfers play a pivotal role in mitigating poverty, particularly in rural settings.

Although fiscal transfers, including DAK, DAU, and ADD, have seen annual increases, their correlation with poverty reduction rates in Gorontalo Province appears less direct. Initially, with the establishment of Gorontalo Province's definitive government in 2002, the value of balancing funds was IDR 134,380 billion. By 2009, this amount had escalated to IDR 457,525 billion. Despite this significant escalation in transfer funds over six years, the corresponding decrease in poverty rates was more pronounced during this period. From 2010 to 2022, even as transfer funds continued to increase, the rate at which poverty decreased became more gradual, as illustrated in Figure 1. This trend suggests a diminishing impact of fiscal transfers on poverty alleviation in Gorontalo Province, raising questions about the efficiency of the existing transfer mechanisms in tackling socio-economic challenges.

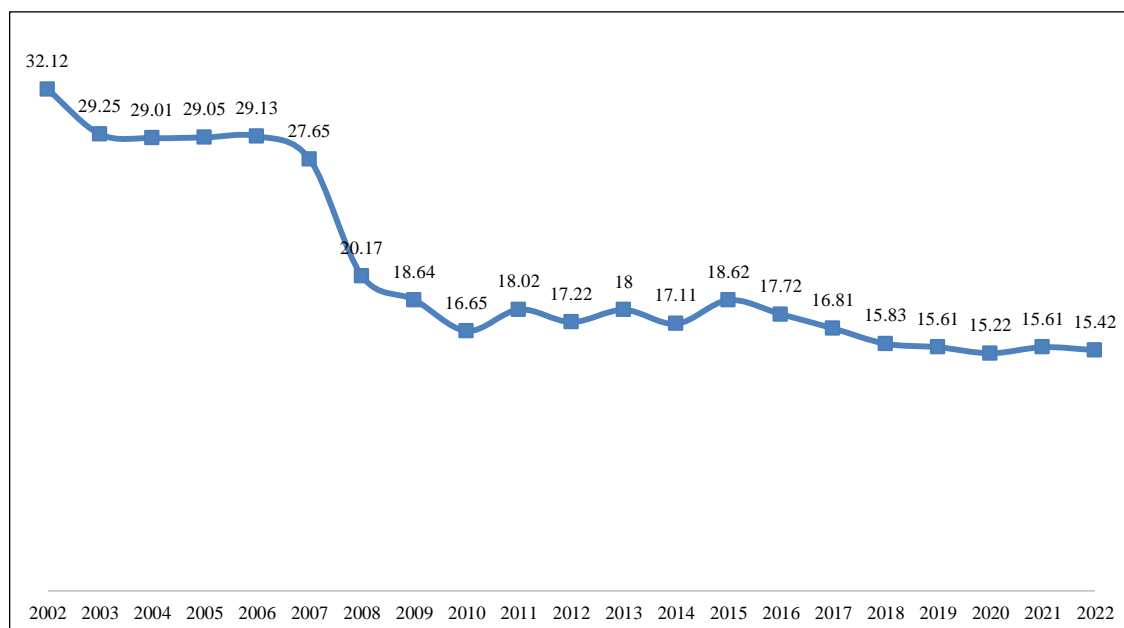


Figure 1. Poverty rate (percent) in Gorontalo Province, 2002 - 2022

Source: Central Bureau of Statistics, Processed. (2023).

Whether conditional or unconditional, fiscal transfers can significantly accelerate poverty reduction efforts. When effectively administered with autonomy in budget allocation, priority setting, accountability, and appropriate responsiveness, these transfers can substantially mitigate poverty (Yeoh et al., 2012; Duah et al., 2018; Hussain et al., 2021). Consequently, governments establish social protection programs that include cash and non-cash assistance, incorporating both conditional and unconditional elements. According to Loureiro (2012), Piperata (2016), and Zulkhibri (2016), conditional cash transfer programs are identified as an effective strategy for poverty alleviation in many developing countries. This perspective is further supported by Marshall & Hill's (2015) study, which highlighted that implementing a conditional cash assistance program led to a significant decrease in poverty levels.

Despite varying outcomes presented in different studies, scepticism remains about the effectiveness of conditional assistance programs in poverty alleviation (Delgado, 2018). While there are empirical discrepancies regarding the impact of cash assistance on poverty, a broad agreement exists that households benefiting from conditional cash assistance programs play a crucial role in reducing child labour, especially among boys, and simultaneously enhance household consumption and investment (Kabeer & Waddington, 2015). Consistent with Slater's (2011) arguments and corroborated by Martínez & Maia (2018), cash transfers are increasingly recognized as a core element of social protection strategies to tackle poverty and vulnerability in developing nations.

Each government administration in Indonesia has launched distinct assistance programs to combat poverty. Under President Joko Widodo's leadership, a comprehensive strategy was adopted to tackle the widespread issue of poverty, highlighted by the execution of seven key social protection initiatives. This research focuses on four critical components within this suite of programs:

1. The Smart Indonesia Program (*Program Indonesia Pintar*, PIP) is a pivotal element of the government's efforts to enhance the accessibility and quality of education. PIP is dedicated to mitigating educational access disparities, especially for students from disadvantaged backgrounds across Indonesia.

2. The Family Hope Program (*Program Keluarga Harapan*, PKH), aimed at improving the quality of human resources with a particular focus on education and health. It targets extremely poor households (RTSM/KSM), emphasizing support for the most vulnerable segments of the population.
3. The Social Food Assistance is designed to reduce the economic strain on recipient groups by providing crucial support for their rice-based nutritional requirements. This program plays a critical role in ensuring food security for the beneficiaries.
4. The Village Fund Program is intended to boost rural communities' welfare, enhance the quality of human life, and effectively combat poverty in rural areas. This initiative reflects President Joko Widodo's administration's comprehensive approach to addressing the complex challenges of poverty in Indonesia.

By examining these programs, the research aims to shed light on the multifaceted strategy employed by the Indonesian government to alleviate poverty, focusing on improving its citizens' education, health, and overall well-being.

In addition to initiatives launched by the central government, regional governments are also implementing social protection programs, including cash and non-cash assistance. These programs aim to aid underprivileged families who may not benefit from assistance transfers from the central government. As a result, social protection measures vary significantly across different regions. For example, in Gorontalo, support is available for residents lacking adequate housing by providing Livable Houses (*Rumah Layak Huni*). Further support includes regular local government support and assistance for microbusiness actors.

Despite these efforts by regional governments to aid economically disadvantaged families, the distribution of assistance across districts/cities is not uniform, and the provision of support is not guaranteed annually. Due to data instability, this inconsistency leads to the exclusion of the social protection model developed by regional governments as a research variable. This research examines social protection through cash transfer programs from the central government administered by regional governments in Gorontalo Province, including the PIP, the PKH, and Local Government Support. Additionally, fiscal transfers in DAK and ADD are considered control variables to ensure a thorough analysis.

The PIP offers financial support, broadens access, and provides educational opportunities to children from low-income or vulnerable families. PIP aims to facilitate access to secondary education for school-age children through formal and informal pathways, including Grades A to C and special education. The program has four primary objectives: to assist financially challenged students in accessing education; to prevent dropouts and encourage students to return to school; to support economically disadvantaged parents in affording their children's education; and to ensure the successful completion of compulsory 9-year basic education. The Indonesian government targets these efforts specifically at individuals facing economic hardships to eliminate illiteracy and ensure that everyone attains at least a junior high school education.

The implementation of PIP fosters an optimistic outlook that children from impoverished and vulnerable backgrounds will have the opportunity to pursue higher levels of education, thus reducing the occurrence of school dropouts. Notably, as of 2022, a significant portion of the workforce comprises elementary school graduates (48.62%) and junior high school graduates (15.07%). The challenge of lower education levels becomes particularly acute in the formal sector labour market, out of poverty.

Education is fundamental in accelerating poverty reduction efforts, as supported by studies from Song (2012), Mihai et al. (2015), and Liu et al. (2021). Further research by Tarabini & Jacovkis (2012) and Hofmarcher (2021) underlines the critical role of education in significantly lowering poverty rates.

Numerous studies have delved into the nexus between education and poverty, scrutinizing aspects such as government expenditure mechanisms (Arham & Naue, 2015; Hidalgo-Hidalgo and Iturbe-Ormaetxe, 2018), the correlation between the average length of schooling and poverty reduction (Sudaryati et al., 2021), and the influence of school participation rates on poverty levels (Arham et al., 2022). Despite the extensive research, the literature addressing the PIP lacks conclusive evidence on its direct impact on poverty alleviation. Generally, PIP is associated with enhanced access to education, decreased dropout rates, and improved school attendance (Uriyalita et al., 2020; Nurokhmah, 2021). A parallel can be drawn with a similar program in China, which provides conditional cash assistance and has significantly curtailed school dropout rates (Mo, 2013). This is in line with the findings of Baird et al. (2014), which highlight that conditional and unconditional cash assistance programs can facilitate educational access for disadvantaged families more effectively than in the absence of such support.

However, it is important to acknowledge that the benefits of cash transfers, including those provided by PIP, do not automatically lead to an immediate decrease in poverty. Therefore, the short-term empirical effectiveness of PIP as a tool for poverty reduction remains uncertain. PIP, as part of broader government-led cash transfer efforts, aims to ensure the continuation of education for economically disadvantaged individuals. It underscores the importance of recognizing the link between education and long-term decreases in poverty rates. Hence, in this research, the PIP variable is crucial, addressing a significant gap in existing literature by examining its novel contribution to the study of education's role in poverty alleviation.

Alongside the PIP, another primary initiative of President Joko Widodo's government is the PKH. PKH offers conditional social assistance to impoverished families to hasten poverty reduction efforts. It provides support primarily in education and healthcare, acting as a means of social protection for the community by the government. Although PKH targets education and healthcare—areas with potential for long-term benefits—a study by Resina (2022) indicates that PKH significantly reduces poverty and positively impacts welfare in Indonesia. However, it's noted that not all recipient families utilize the grants specifically for the education and healthcare of school-age children; some divert these funds for general household expenses (Malinao et al., 2022).

Social assistance represents a pivotal model of government aid aimed at reducing poverty, a strategy sustained through various government administrations. This policy has been embraced due to its effectiveness in alleviating poverty (Wu & Ramesh, 2014) despite increased reliance on social assistance in some countries since the 1980s. Riphahn (2003) posits that the potential rise in social aid utilization may be attributed to rational individuals recognizing and benefiting from such support. However, this trend might reverse as resources dwindle and the negative stigma associated with dependency on assistance grows. Furthermore, Verme (2016) notes that despite the expansion in population coverage and expenditure on cash assistance marking social assistance policies in recent years, there hasn't been a corresponding significant enhancement in welfare outcomes.

Elevating social assistance is crucial for poverty reduction in developing countries and plays a significant role in boosting the appeal and success of elections in nations that implement such programs (Tekgüç, 2018). Thus, social assistance initiatives have objectives beyond poverty alleviation, incorporating political ambitions, especially within electoral dynamics. Recent research in various countries highlights that recipients of social assistance programs tend to exhibit higher voting rates for incumbents (Corrêa, 2022). Specifically, a study by Dharma et al. (2022) confirms this trend in the Indonesian electoral context, demonstrating a direct relationship between the social assistance budget and the incumbent’s vote acquisition in regional elections. Furthermore, from a more global perspective, social assistance in European countries is recognized as a means to combat poverty and as a distributive tool with wide-ranging effects (Nelson, 2013).

Based on various theories and empirical findings, the effect of fiscal transfers or cash assistance on poverty reduction remains uncertain. Furthermore, the existing literature scarcely directly connects cash assistance, particularly the PIP, to poverty alleviation, highlighting a significant gap that necessitates further investigation. Therefore, this study is dedicated to identifying the most impactful fiscal transfer for mitigating poverty in Gorontalo, a national province with the fifth-highest poverty rate. Given the persistently elevated poverty levels, there is an urgent requirement for developing policy formulations and transfer mechanisms that effectively tackle poverty within Gorontalo's specific context. This objective underscores the critical need for targeted research that can effectively inform and optimize policy interventions to reduce regional poverty.

METHODS

The study employs a quantitative approach to examine the influence of fiscal transfers on poverty in Gorontalo Province, utilizing secondary data from 2018 to 2022 across six districts/cities. This data, sourced from the Central Statistics Agency (BPS), the Directorate General of Balance of the Ministry of Finance, the Ministry of Education, Culture, Research, and Technology, and Regional Governments, merges time series with cross-sectional data to reduce collinearity among variables and improve efficiency. The analysis focuses on the relationship between fiscal aids such as District Allocation Funds (DAK), Village Fund Allocation (ADD), Program Indonesia Pintar (PIP) funds, Family Hope Program (PKH), and Social Assistance (SA) with the poverty levels across the districts/cities.

The econometric analysis employs panel data equation models, specifically a model that includes variables for DAK, ADD, PIP, PKH, and SA, as well as an error term, to explore the impact of these fiscal transfers on poverty.

The empirical model is outlined as follows:

$$Pov_{it} = \beta_0 + \beta_1 DAK_{it} + \beta_2 ADD_{it} + \mu_3 PIP_{it} + \mu_4 PKH_{it} + \mu_5 SA_{it} + \varepsilon_{it} \dots \dots \dots (1)$$

where *it* denotes the district or city (*i*) over the research period from 2018 to 2022 (*t*), and ϵ represents the error term.

This model is designed to provide a systematic, descriptive, and precise depiction of the relationship between these fiscal transfers and community welfare. The study assesses various indicators of poverty and the fiscal aspects of regional development, including the allocation of ADD, distribution of PIP scholarships, PKH support for needy families, and SA to mitigate economic shocks or policy impacts.

The analysis uses statistical testing tailored for panel data, including the Hausman test, to choose between the Fixed Effects Model (FEM) and other potential models. The FEM was selected based on the test outcomes and refined with coefficient covariance weighting via the white cross-section method to address autocorrelation concerns. The study's methodological framework aims to understand the complex dynamics between direct and indirect fiscal transfers and poverty in Gorontalo Province, providing insights into how government policies and financial assistance impact community welfare.

Table 1. Research variables, operational definition and measurements

Variable	Operational definition	Measurement
Poverty (Pov)	The rate of poverty in districts/cities	Per cent
Special Allocation Fund (DAK)	The Special Allocation Fund represents a portion of the conditional balancing fund allocated to every district/city in the Gorontalo region.	Rupiah
Village Fund Transfer (ADD)	The allocation of the Village Fund received by each district in Gorontalo.	Rupiah
Smart Indonesia Program (PIP)	Scholarship assistance is provided through the Smart Indonesia Program for high school students in each district/city, aimed at underprivileged children holding a Smart Indonesia Card (KIP).	Rupiah
Hope Family Programme (PKH)	The PKH program provides conditional social assistance to economically disadvantaged families identified as PKH beneficiaries across districts and cities in Gorontalo Province.	Rupiah
Social Assistance (SA)	The government provides financial aid or material support to mitigate social risks extended to eligible families in each district and city within Gorontalo Province.	Rupiah

RESULTS AND DISCUSSION

Results

Gorontalo Province has a notably high poverty rate of 15.42% in 2022, ranking fifth nationally, despite its relatively small population of 1.17 million. This contrasts with West Sulawesi Province, which has a population of 1.46 million but a lower poverty rate of 11.29%. Both provinces underwent expansion around the same time, which might lead one to expect a quicker reduction in poverty rates in Gorontalo Province, given its considerable population size. However, in the two decades since becoming an independent province, Gorontalo has seen a slow decline in poverty rates, even though the budget for various types of transfers to the province has significantly increased. Figure 1 illustrates that the pace of poverty reduction in the last ten years has decelerated compared to the initial years following Gorontalo's establishment as a separate entity from North Sulawesi.

The primary cause of high poverty rates in Gorontalo Province is attributed to rural poverty, which has seen an uptick over the past five years. Rural poverty increased from 23.86% in 2018 to 24.52% in 2022, while urban poverty marginally rose from 4.45% to 4.49% in the same timeframe. The more substantial increase in rural areas underscores that the primary contributors to poverty are the five districts that depend on agriculture as the main engine of economic growth, as indicated in Figure 2.

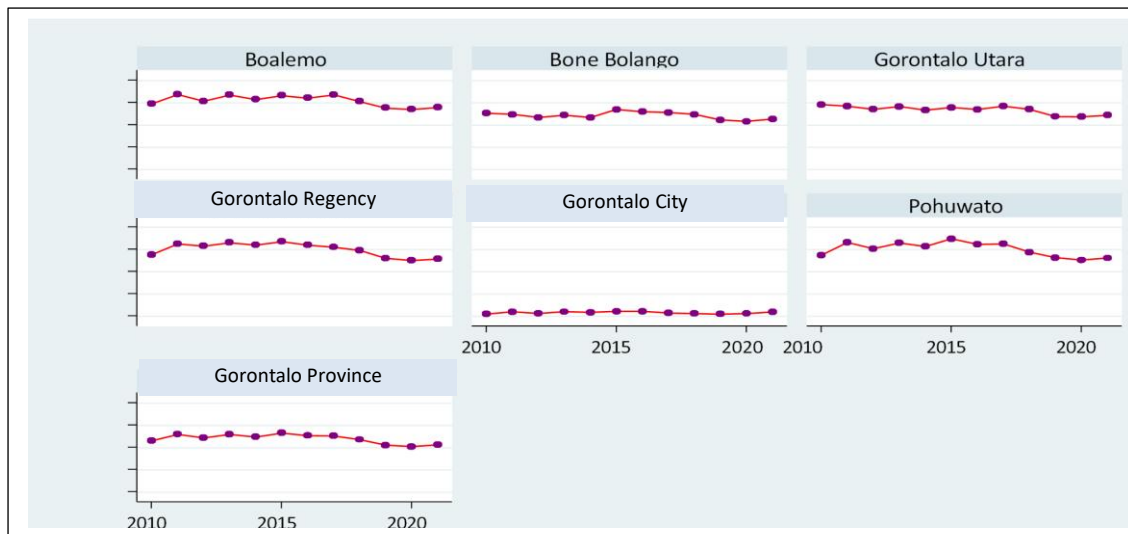


Figure 2. Poverty in districts/cities and Gorontalo Province

Source: Central Statistics Agency, Processed. (2023)

The data provided serves as a crucial reference for devising strategies to combat poverty in Gorontalo, with a particular focus on rural areas. Despite the introduction of village funds in 2015 to address poverty, there has been no substantial decline in poverty rates, especially in rural regions. The ADD has paradoxically coincided with an increase in rural poverty rates despite yearly increases in fund allocations. This trend, as illustrated in Figure 3, indicates a pressing need for district governments to go beyond merely supervising the execution of programs financed by village funds. They must take a proactive role in collaborating with village governments to develop annual program plans.

Crafting initiatives specifically targeted at addressing rural poverty is imperative. Relying solely on the current strategy, prioritizing budget allocation efficiency and the prevention of fund misuse, is unlikely to effect significant change in the rural poverty landscape over time. A re-evaluation of approaches and the introduction of innovative, tailored programs are essential to reduce rural poverty in Gorontalo significantly.

Given the observation from Figure 3, which juxtaposes fiscal transfers against the backdrop of rural poverty, indicating a positive correlation, it is imperative to bolster this observation with empirical evidence.

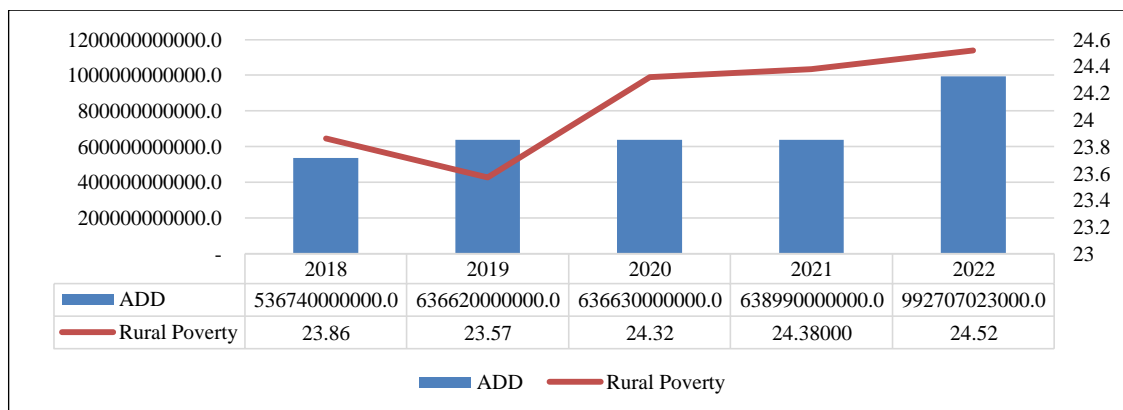


Figure 3. Comparison of ADD and rural poverty in Gorontalo, 2018 – 2022

Source: Central Statistics Agency, (2023).

The preliminary phase involves showcasing descriptive statistics for regressing all pertinent variables. The outcomes of these descriptive statistics are compiled in Table 2. This step is crucial for understanding the data's distribution, central tendency, and dispersion, which will inform subsequent analyses and interpretations.

Table 2. Descriptive statistics

Variable	Obs	Mean	Std.Dev	Min	Max
POV	30	15.81633	4.742667	5.450000	20.33000
DAK	30	1029175.	299739.8	555882.0	1617417.
ADD	30	543043.6	281883.6	0.000000	884666.0
PIP	30	49858.53	40946.43	17216.00	220428.0
PKH	30	3992.100	1888.914	1912.000	8410.000
SA	30	6.80E+09	5.67E+09	7.50E+08	2.04E+10

Based on Table 2, it can be inferred that the descriptive statistics are derived from a sample of 30 observations. The ADD exhibits the lowest minimum value (0.000000), whereas the SA variable showcases the highest maximum value (2.04E+10). The poverty variable registers the lowest mean value (15.81633), and the SA variable records the highest mean value (6.80E+09). The subsequent phase in evaluating the impact of each variable on poverty entails conducting regression analysis using a panel data methodology. This analysis encompasses three distinct approaches, and selecting the most appropriate one necessitates testing, as outlined in Table 3.

Table 3. Hausman test output

Correlated Random Effect – Hausman Test			
Wquatio: Untitled			
Cross-section random effects test			
Test Summary	Chi-Sq. Statistic	Chi-Sq.d.f	Prob
Random cross-section	423.111677	5	0.000

Based on Table 3, the p-value for Cross-section F is 0.0373, which falls below the significance threshold ($\alpha=0.05$), leading to the rejection of the null hypothesis (H_0). This outcome suggests that the Fixed Effects Model (FEM) is the preferred choice. A regression analysis is conducted, and a detailed summary of the regression results is presented in Table 4.

Table 4. Summary of regression results

Variable	Coefficient	Std. Error	t-Statistic
C	18.33929	2.182261	8.403804
DAK	3.04E-07	8.48E-07	1.358543*
ADD	-5.29E-06	2.41E-06	-2.193519*
PIP	-8.31E-06	4.40E-06	-1.8879398**
PKH	9.30E-05	0000306	0.303748
SA	1.19E-11	3.22E-11	0.370530
R-Squared	0.990841	AIC	1.957502
Adjusted Square	0.986020	DW	1.676450
F-Statistic	205.5437		

Source: *Data Analysis Results*, (2023).

Description: ** 1%, * 5%, and * 10% significance levels.

Discussion

Based on the information presented in Table 4, it is clear that the various fiscal transfers (aid) initiated by the government over the last five years have had a mixed

impact on poverty reduction. Only the PIP and the ADD have effectively reduced poverty rates. The PIP, a cornerstone of President Joko Widodo's administration, is pivotal in long-term poverty alleviation efforts. However, the short-term efficacy of the PIP program in assisting smaller communities is limited, as highlighted by Suryahadi and Izzati's 2018 study. Despite this, the impact of PIP extends beyond poverty reduction; research conducted by Rahmatullah and Rahmatullah in 2021 demonstrates that PIP significantly boosts school attendance rates. Furthermore, studies by Ninghardijanti et al. in 2022 and Budiman in 2023, along with Ninghardjanti et al. in 2023, indicate that PIP contributes to reducing school dropout rates, promoting educational equity, and enhancing overall educational outcomes.

Additionally, the ADD, introduced following the enactment of Law No. 6 of 2014 on Village Governance, has been identified as another effective fiscal transfer in combating poverty. This program's success, particularly in rural areas, is supported by findings from Arham & Hatu (2020), which confirm the positive impact of village fund allocations on improving poverty conditions.

The DAK, established 23 years ago in 2001 alongside the implementation of regional autonomy, was initially designed to support national programs in education, health, and the environment at the regional level. Over time, the scope of DAK expanded, and it was subsequently categorized into physical and non-physical DAK. Regression analyses from the past five years indicate that DAK transfers have not yielded significant benefits for impoverished communities, suggesting a deviation from its original focus and objectives. This observation is consistent with the findings of Sugiyanto et al. (2018), which highlighted that only DAK allocations directed towards education, health, trade infrastructure, and transportation have notably impacted reducing poverty levels.

Non-physical DAK encompasses a variety of programs, including School Operational Assistance (BOS), Early Childhood Education Operational Assistance (BOP PAUD), Professional Allowance for Civil Servant Teachers (PNSD), Additional Income for PNSD Teachers, Special Allowance for PNSD Teachers in Special Regions, Health Operational Assistance (BOK), Family Planning Operational Assistance (BOKB), Cooperative and SME Capacity Enhancement Fund (PK2UKM), and Civil Registration Administrative Services Fund (Adminduk). From 2019 onwards, new categories of non-physical DAK were introduced, such as Education Equality Operational Assistance (BOP Kesetaraan), Museum and Cultural Park Operational Assistance, Tourism Services Fund, and Waste Management Service Cost Assistance (BPLS). However, these additions have not been effective in significantly addressing poverty. Consequently, while some physical DAK programs have the potential to mitigate poverty, others may inadvertently contribute to its persistence.

In examining the impact of the PKH on poverty reduction, it is observed that its direct effect in alleviating poverty is relatively minimal. This observation contrasts with the findings of Rohmi & Pahlevi (2021), who argue that PKH demonstrates a negative correlation with poverty levels, suggesting that an increase in the PKH budget is associated with a decrease in Indonesia's poverty rate. Despite this, the direct influence of PKH assistance on poverty reduction appears to be limited. However, it is important to note that PKH assistance has been instrumental in improving enrollment and attendance rates in elementary schools among disadvantaged communities, as indicated by Hadna et al. (2017). This suggests that while the immediate benefits of PKH

assistance might not be overtly significant, its long-term contributions to educational participation could yield considerable advantages.

A significant concern is the inadequate amount and limited duration of PKH assistance provided to poor families for educational purposes. This situation often leads to a preference for employment over education among many children from these families, as highlighted by Lee & Hwang (2016). Addressing this issue requires the government to extend the duration, increase the amount of PKH assistance, and introduce additional support measures, such as scholarship programs. Implementing these enhancements is crucial for accelerating the improvement of poverty rates.

Demonstrates limited effectiveness. This category encompasses social protection programs targeted at individuals impacted by government adjustments in public goods prices. The modest impact of social assistance on poverty alleviation can be attributed to the variation in quality and coverage of these programs across different regions (Cook & Pincus, 2014). Furthermore, empirical evidence suggests that families receiving social assistance frequently allocate funds for purposes beyond basic needs, which include obtaining credit and purchasing cigarettes. This spending pattern is consistent with the findings of Valeriani et al. (2022), which suggest that social assistance affects the expenditure habits of recipient families, covering food, cell phone credit, and even business capital.

To improve the effectiveness of social assistance in reducing poverty, Nugroho et al. (2021) propose its integration with conditional cash assistance. This approach is recommended based on the potential for a more significant impact on poverty reduction in rural and urban settings. The integration ensures that social assistance addresses immediate financial needs and encourages behaviours that contribute to long-term poverty alleviation, such as investing in education and health.

CONCLUSION AND RECOMMENDATIONS

Conclusion

Gorontalo has entered its third decade as an autonomous province, marking notable advancements in physical development despite a limited budget. The region has seen a swift decline in poverty rates initially. Still, the deceleration in poverty reduction has positioned Gorontalo as the fifth poorest province in the nation, despite increasing allocations from the National Budget (APBN) and fiscal transfers, along with annual increases in the Regional Budget (APBD) value. This situation underscores the necessity for a thorough investigation, prompting this study. The expectation that government fiscal transfers would effectively mitigate poverty, considering their diverse range and growing amounts, has not been met, highlighting the importance of this analysis.

Our findings reveal several key insights. First, the PIP is the most impactful fiscal transfer over five years, significantly influencing school participation and dropout rates at the elementary and junior high school levels. PIP's implementation not only fosters human resource development but also positively affects labour productivity, leading to an expansion in formal employment opportunities and enhancing welfare for underprivileged families. Second, the ADD has effectively combatted poverty in rural areas, catalyzing rural development and significantly improving village community well-being, human life quality, and poverty alleviation. Third, the allocation of DAK has worsened poverty, primarily due to the unfocused use of non-physical DAK and a

mismatch between allocated amounts and regional needs. Fourth, the PKH has not significantly impacted poverty reduction, with some beneficiaries using the funds for direct consumption rather than education and health. Lastly, Social Assistance has provided support but has not significantly contributed to poverty rate reduction, with recipients often allocating a substantial portion of assistance towards consumption beyond basic necessities.

Recommendations

Based on these conclusions, it is clear that not all forms of transfers are effective in reducing poverty. Therefore, the government must consider several recommendations. Firstly, there is a need to expand and fairly distribute PIP assistance, improving the accuracy of target recipient data and streamlining distribution. Secondly, recalibrating ADD values and strengthening allocation for empowerment initiatives are crucial, as well as leveraging the ADD derived from regional taxes and levies. Thirdly, enhancing the allocation of DAK to stimulate economic growth and directly combat poverty, especially in disadvantaged areas, is essential. Lastly, integrating various forms of transfers and assistance into a cohesive system, such as combining PIP with PKH or the Healthy Indonesia Program (PIS) with PKH, can expedite poverty reduction efforts, complemented by a commitment to refining target recipient data for improved effectiveness and efficiency.

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