Analysis of Expansive Fiscal Policy and Grant on International Trade in Indonesia

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ABSTRACT

This study aims to determine the long-term and short-term effects of Government Expenditure, External Debt, and Grants variables on the Current Account Balance. This model uses the Vector Error Correction Model (VECM) model to achieve a longterm and short-term balance. This study uses secondary data from world banks during the period 1983-2022 in Indonesia. This study proves that in the long run, Government Expenditure and Grants have a significant effect on the Current Account Balance. However, External Debt did not have a significant effect on the Current Account Balance. On the other hand, in the short term, Government Expenditure, External Debt, and Grants did not show a significant influence on the Current Account Balance. This study emphasizes the importance of the role of the Current Account Balance as the main pillar in assessing the level of economic progress in Indonesia. Expansive fiscal policy through increased government expenditure can strengthen the economy, especially when there is a surplus in the Current Account Balance. In addition, external debt can be used to cover the current account deficit, which ultimately has the potential to create a surplus. The influence of grants also has the potential to expand the reach of international trade, which has a positive impact on the Current Account Balance.

ABSTRAK

Penelitian ini bertujuan untuk mengetahui pengaruh jangka panjang dan jangka pendek variabel Pengeluaran Pemerintah, Utang Luar Negeri, Hibah terhadap Neraca Transaksi Berjalan. Model ini menggunakan model Vector Error Correction Model (VECM) untuk mencapai keseimbangan jangka panjang dan jangka pendek. Studi ini menggunakan data sekunder dari world bank selama periode waktu 1983-2022 di negara Indonesia. Penelitian ini membuktikan bahwa dalam jangka panjang Pengeluaran Pemerintah dan Hibah berpengaruh signifikan terhadap Neraca Transaksi Berjalan. Namun Utang Luar Negeri tidak berpengaruh signifikan terhadap Neraca Transaksi Berjalan. Disisi lain, dalam jangka pendek Pengeluaran Pemerintah, Utang Luar Negeri, dan Hibah tidak menunjukkan pengaruh signifikan terhadap Neraca Transaksi Berjalan. Penelitian ini menekankan pentingnya peran Neraca Transaksi Berjalan sebagai pilar utama dalam menilai tingkat kemajuan ekonomi di negara Indonesia. Kebijakan fiskal ekspansif melalui peningkatan pengeluaran pemerintah dapat memperkuat perekonomian, terutama saat terjadi surplus pada Neraca Transaksi Berjalan. Selain itu, Utang Luar Negeri dapat digunakan untuk menutup defisit Neraca Transaksi Berjalan, yang pada akhirnya berpotensi menciptakan surplus. Pengaruh Hibah juga berpotensi memperluas jangkauan perdagangan internasional, yang berdampak positif terhadap Neraca Transaksi Berjalan.

1. INTRODUCTION

As a country with abundant resources, Indonesia continues to strive to realize sustainable development. To support this goal, Indonesia needs various goods and services obtained both domestically and abroad (Sailirrizqi & Adinugraga, 2023). In this effort, Indonesia establishes close international relations, especially

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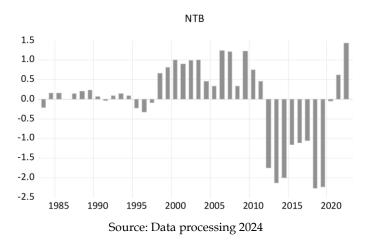


Figure 1. Indonesia's Current Balance Sheet 1983 - 2022

in the field of international trade. This activity involves economic transactions between countries based on mutual agreements (Rizka et al., 2023; Rizki et al., 2022; Siswanto et al., 2023). International trade and the current account balance have an important role in the economy (Altayligil & Cetrez, 2020; Takhi, 2020). The current account balance, as one of the main indicators, illustrates the advantages that countries obtain in global trade through increased revenues, capital transfers, specialization of low-cost goods and services, and increasingly sharp competition in international markets (Soo et al., 2023). The diversity of resources and potential owned by each country is the main driving factor for the creation of a current account balance (Suryanto & Kurniati, 2022).

The state of Indonesia's current account balance between 1983 through 2022 shows fluctuations with changes in the value of ups and downs erratic. Judging from 2012 – 2020, the current transaction balance in Indonesia experienced a deficit (negative). A large current account deficit indicates poor performance and economic vulnerability. Meanwhile, the deficit also indicates a lack of savings, therefore it must borrow from other countries. However, in 2021 – 2022, the current account balance recorded a (positive) surplus of US\$ 3,510,715,050.4 in 2021 and US\$ 13,215,134,910.4 in 2022. A nation's current account balance sustains a surplus (positive) by broadening the analysis of factors influencing its performance. Grants and expansionary fiscal policy are the components that build to the current account balance. The state income report which provides a comprehensive picture of the financial health and economic situation of a country can be represented by the current account balance (Ozturk & Coltu, 2018).

During the 2021-2022 current account surplus period, Indonesia recorded more revenue from foreign transactions than expenditure. This condition reflects lower payments than receipts from the exchange and transfer of goods and services, indicating a current account surplus. The surplus has a positive impact because it signals higher income than expenditure, creating a competitive economy in trade activities (Braml & Felbermayr, 2019; Sumiyati, 2022). The government also supports the stability of the current account balance by implementing an expansionary fiscal policy aimed at stimulating the economy through an increase in state government expenditure. This step is a response to the decline in people's purchasing power, so that government expenditure plays an important role in maintaining the balance of the current account (Boug et al., 2023; Indrawati et al., 2024; Shevchuk & Kopych, 2018).

Furthermore, expansionary fiscal policies integrated with external debt management play a strategic role in boosting economic growth amid global uncertainty, strengthening Indonesia's position in facing global economic challenges (Tang et al., 2023). External debt is one of the important instruments in maintaining economic balance, especially when there is a deficit in the current account. In a deficit situation, external debt is used to close the gap and support the stability of the current account (Ramadhan et al., 2021). Indonesia's current account surplus demonstrates the country's ability to generate sufficient revenue from international trade, while strengthening its capacity to service external debt obligations, whether in currency, goods, or services (Metusalak et al., 2024).

On the other hand, unilateral transfers, through grants and international assistance, have a strategic role in influencing the position of Indonesia's current account balance. Grants that Indonesia receives in the form of money or goods contribute to the reduction of the current account deficit, especially when receipts

outweigh expenditures (Gawande, 2016; Hollander et al., 2024). The fluctuations in grants received from time to time are a challenge, but their potential contribution to Indonesia's global trade capacity is significant. With increased trade capacity, grants can expand Indonesia's position in international trade and support the creation of a current account surplus (Cetrez, 2022).

Review conducted Aronov et al. (2019) assessing structural changes in international trade using linear regression, taking into account the characteristics of different variable responses. Some variables show a direct, indirect, or no impact on other variables, while others take time to accurately show their effects. Both short-term and long-term relationships between variables were examined using the Vectore Error Correction Model (VECM). This study discusses Indonesia's international trade by highlighting the current account surplus as an effort to strengthen Indonesia's negotiating position in the global environment. The research focuses on international trade, expansionary fiscal policy, and grants. The study integrates new variables, namely expansionary fiscal policy through government expenditure and external debt, as well as grants to enrich the analysis.

Previous studies conducted by Glebocki & Ralf (2024) centralizing fiscal policy in several EU countries by focusing on principles of economic stability and economic integration among its member countries. The EU's focus is often divided on issues of stability and integration between countries, which can slow the implementation of policies in certain member states against rapid economic change. This study supports the idea of maintaining a current account surplus through an expansionary fiscal policy. Indonesia's expansionary fiscal policy has a higher degree of flexibility in formulating expansionary fiscal policy without having to consider cross-country harmonization, as happened in the European Union. This allows the Indonesian government to quickly respond to domestic and global economic changes as per national needs, without being constrained by supranational frameworks (Sumiyati, 2022; Widiastuti et al., 2023). Expansionary fiscal policy in Indonesia has the advantage of harnessing the potential of natural resources, demographics, and policy flexibility, making it more adaptive and has a direct impact on economic growth This shows that Indonesia has a great opportunity to strengthen the current account balance and economic stability through the implementation of targeted and responsive expansionary fiscal policy (Latifah & Rosyadi, 2024).

This study offers a unique contribution by exploring fiscal policy in the form of expansionary fiscal policy in Indonesia. Expansionary fiscal policy is the main factor in this study. This expansionary fiscal policy leads to an increase in government expenditure and the existence of external debt. The increase in state spending on infrastructure projects and social programs directly encourages the improvement of national economic competitiveness and equitable development. Also, external debt in expansionary fiscal policy as a tool to support financing. There is an important gap in research that discusses fiscal policy focusing on the principles of economic stability and economic integration in the European Union. Although there are a number of studies assessing the fiscal policy of the European Union, there is still a significant gap in the literature on the implementation of expansionary fiscal policy in Indonesia.

This research is important because it is remembered that research Previously, it focused more on fiscal policy by emphasizing the principles of economic stability and economic integration in the European Union, but has not studied in depth the optimization of expansionary fiscal policy in the context of developing countries such as Indonesia. This research offers an in-depth analysis of how expansionary fiscal policies can be optimized to drive economic growth, especially in times of economic weakness. In addition, the fiscal policy principles of the European Union provide an opportunity to enrich Indonesia's policy strategy in the face of global uncertainty (Setiawan et al., 2020). This study aims to fill the gap by exploring how expansionary fiscal policy in Indonesia can be strengthened, by assessing the relevance of the use of grants, government spending, and external debt in supporting national economic stability. The research provides more targeted policy guidance, given that Indonesia's economic characteristics are different from those of EU countries, and that appropriate fiscal policy can be key in overcoming the challenges of global uncertainty facing Indonesia. The purpose of this study is to analyze the short-term and long-term relevance of expansionary fiscal policies, which include government spending and external debt, as well as grants to Indonesia's current account balance.

2. THEORETICAL FRAMEWORK AND HYPOTHESES

2.1 Current Account Balance

The balance of payments (BOP) is intrinsically linked to international trade as it meticulously documents all economic exchanges between a nation and the global economy, encompassing both tangible (goods) and

intangible transactions (services). A country's balance reflects its trade balance, which is a key component of the BOP. The surplus shows that exports exceed imports, while the deficit shows the opposite, impacting the country's foreign exchange reserves and the overall health of the economy (Genta Nuraini & Yulianti, 2019). The main focus of the country is to use its abundant natural resources to produce and export goods. This strategy finds its roots in David Ricardo's enlightening theory of comparative advantage, where nations hone their skills in crafting goods with diminished opportunity costs, thereby amplifying the effectiveness and volume of international trade. This concept posits that even when a nation lags in the production of every product relative to another, both can reap rewards from commerce by honing in on their unique efficiencies. Theory has become the basis of economic thought, influencing trade policy and economic integration efforts.

Yi (2021) outlining the reasons behind international trade regarding the current account balance, depending on the level of development of a country, changes in trade may have different implications for the continuation of trade. Trade liberalization in developing countries usually causes capital outflows, while in developed countries it results in capital inflows. According to Metusalak et al. (2024) these dynamics contribute to global current account imbalances, suggesting that successful trade reforms can significantly impact international financial conditions. Tosun (2022) revealed that understanding current account fluctuations is essential for assessing economic stability and estimating potential financial disasters. These insights encompass the significance of the current account equilibrium, its prowess in forecasting financial downturns, the fulfillment of budgetary strategies, and the repercussions of commercial treaties.

2.2 Government Expenditure and Current Account Balance

The allocation of government funds and the equilibrium of the current account hold crucial importance in maintaining economic equilibrium. A rise in public sector investments can ignite domestic consumption and bolster investment, which in turn could sway the current account balance through an uptick in the importation of goods and services. However, if the expenditure is directed to projects that support domestic production capacity or increase export competitiveness, this could reduce the current account deficit or even create a surplus (Kidochukwu et al., 2022; Wang, 2022). This approach is supported by Keynesian economics, which underlies expansionary fiscal policy, emphasizing the importance of aggregate demand in driving economic growth and stability. This theory proposes a reduction in taxes and an increase in government expenditure as a measure to stimulate demand and recover the economy from a recession. During a recession, when private sector demand weakens, government intervention is needed to encourage consumption and investment, thus restoring economic balance.

Demirtas (2023) stated that the government can boost economic growth through expansionary fiscal policy, which is dictated by increased government expenditure, especially in times of economic sluggishness. Maheswaranathan & Jeewanthi (2021) revealed that by accelerating government expenditure as part of an expansionary fiscal policy plan, this can significantly increase economic development. Government consumption and gross fixed capital formation benefited from higher budget allocations and faster budget realization, thereby improving overall economic performance. Similar studies were also conducted Glebocki & Ralf (2024) examine the remarkable influence that fiscal policy can exert on the dynamic relationship between the current account balance and the fiscal balance. Wahyudi (2020) it has been articulated that the implementation of an expansionary fiscal policy seeks to augment government spending with the objective of stimulating economic growth, thereby enhancing aggregate demand. Research conducted by Hailil et al. (2021) it has been asserted that the equilibrium of the current account is profoundly influenced by public expenditure, thereby positioning government outlays as a crucial factor affecting the current account balance. Therefore, the first hypothesis is as follows:

H1: Government expenditure, as proposed by Keynesian economics (Keynes, 1936), positively affecting the current account balance by increasing aggregate demand through the implementation of expansionary fiscal policy.

2.3 External Debt and Current Account Balance

External debt can affect a country's current account balance through changes in private investment, consumption, and government expenditure. Well-managed external debt can increase private investment, consumption, and government expenditure, thus having a positive impact on the current account balance (Asnawi et al., 2023). Robert argues that foreign debt can be an instrument to accelerate economic

development if managed wisely. However, it also emphasizes the significant risks that can arise, such as economic dependence and the potential for a debt crisis, if the management is not optimal. One of the main points is the importance of careful planning and debt allocation to productive investments. Robert emphasized that the return on the use of debt must be greater than the costs incurred, to avoid economic burdens that can hinder long-term growth.

According to Kohler (2022) basic surplus countries can use the position to support expansionary policies without significantly increasing external debt through offline foreign investment and maintaining favorable credit conditions. Wallace (2018) the presented analysis illustrates the correlation between fluctuations in the current account balance and the magnitude of external debt, wherein external debt possesses the capacity to influence the balance by diminishing the deficit and augmenting the surplus via enhanced trade liberalization. Mqolombeni et al. (2023) revealed that developing countries tend to develop faster when they have a low amount of external debt, especially government debt. Therefore, while government expenditure and expansionary fiscal policies can boost growth, keeping external debt levels low is essential for maintaining sustainable economic growth (Lahiani et al., 2022; Mehta & Derbeneva, 2023). In accordance with research Thi & Tong (2023) according to his interpretation, the current account balance is heavily influenced by external debt. Therefore, the second hypothesis is as follows:

H2: External debt, as theorized by Robert (1967), positively affects the current account balance through optimally managed productive investment financing.

2.4 Grants and Current Account Balance

Experts who focus on global equilibrium theory often assess how unilateral transfers affect that equilibrium. One tactic relevant in this situation is the idea that unilateral transfers can reinforce international standards governing the distribution of wealth. These economists see remittances, foreign aid, and other unilateral transfers as tools to support the economies of developing countries. This approach is supported by Morgenthau's theory, which asserts that international politics is centered on national power and interests. In the context of grants, Morgenthau sees them as a strategic tool for donor countries to strengthen their political or economic influence, with the aim of achieving national benefits such as regional stability or access to resources that in turn affect economic and trade relations between countries.

Previous research by Stone et al. (2020) unilateral transfers, especially grants, are of great importance in international economic and social policy. These transfers, which involve the transfer of resources from one country or entity to another without a direct exchange of goods or services, often do not go back to the literature on the subject that examines several points of view, such as its implications for the economy, welfare, and policy. Pickles (2020) given that the size of the economy and the proportional contribution of external causes differ between industrialized and developing countries, this is particularly relevant when discussing capital transfers in the two regions. Through research Gawande (2016) shows how grants have a major impact on current account balances.

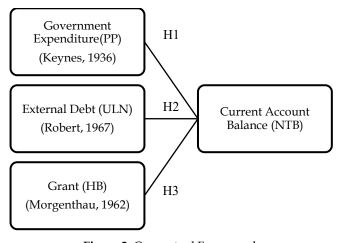


Figure 2. Conceptual Framework

H3: Grants, as in theory (Morgenthau, 1962), positively affect the current account balance by strengthening the economic stability of the recipient country and supporting the strategic interests of the donor country.

The conceptual framework of this study, illustrated in Figure 2, is based on relevant theories and previous research discussed, which affects the current account balance.

3. RESEARCH METHOD

This study uses a quantitative approach method. A quantitative approach is used in this study to evaluate causal relationships and dynamics between variables objectively and measurably and deeply, so that it is relevant to evaluate interactions and causal relationships between variables systematically. This research utilizes secondary data obtained through intermediaries or from internal research topics based on written or document-based. All data used in this study was obtained from World Bank. The relevance of this approach lies in its ability to analyze time series data covering a long period from 1983 to 2022 in Indonesia. The 40-year period in this study can guarantee a good and stable analytical relationship (Poórová et al., 2023; Teubler & Riemer, 2021). Over a period of 40 years, it can also generate perspectives to study economic dynamics broadly. Overall, 40 years of observational data tend to be more stable than data in monthly or quarterly periods (Dupuis et al., 2024).

The data processing of this research was carried out using the Vectore Error Correction Model (VECM). There is an analytical sequence used in this study ranging from stationarity test, determination of optimal lag, Granger causality test, cointegration test, Impulse Response Function (IRF) analysis and Forecast Error Variance Decomposition (FEVD) analysis. VECM analysis allows for more accurate analysis of dynamics and interactions between variables in the long and short term. All variables used are corresponding data after being translated into natural logarithms (LN) except for current account balance statistics which can be negative or expressed as a percentage. The following is a list of data sources for this study.

Table 1. Variable Operational Description

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No.	Variable	Description	Data Source		
1	Current account balance (BoP, current US\$)	The equilibrium of the current account represents the summation of net exports encompassing both commodities and services, in addition to net primary income and net secondary income.	World Bank		
2	General government final consumption expenditure (Constant LCU)	All existing expenditures by the government pertaining to the procurement of goods and services, encompassing remuneration for personnel, are encapsulated within the aggregate final consumption expenditure of the general government, previously referred to as general government consumption. It covers the majority of national defense and security spending, but excludes government military spending, which is a part of the government's capital formation.	World Bank		
3	External debt stocks, total (DOD, current US\$)	The overarching external obligation encapsulates the aggregate of fleeting liabilities, IMF funding, and enduring public, publicly-backed, and uncollateralized private commitments; fleeting liabilities comprise all borrowings with a primary term of one year or less, alongside overdue interest on prolonged obligations; the grand total of foreign liabilities represents the complete quantity of debts owed to non-residents that may be	World Bank		

No.	Variable	Description	Data Source
4	Grants, excluding technical cooperation (BoP, current US\$)	settled with currency, commodities, or services. A grant is defined as a legally binding commitment that requires a certain amount of funds to be available for disbursement without repayment requirements.	World Bank

Source: Data processing 2024

In the context of this study, the Vector Error Correction Model (VECM) technique seeks to match short-term and long-term associations. By addressing short-term dynamics and long-term equilibrium relationships, VECM is used to find correlations in time series data. This method extends the Vector Auto Regression (VAR) model to accommodate non-stationary data by combining cointegration relationships. Thus, VECM allows for a deeper analysis of variable interactions over time. Generally, VECM is considered a special extension of the VAR model, which is designed to handle datasets where cointegration between variables exists.

There are several steps to complete before deciding which model to use for this study. Specifically, the stationary test is a form of inferential analysis technique that begins with the testing stage of the root test unit (*Unit Root Test*), which is one of the prerequisites for applying VECM analysis with the data used must be stationary (Huang et al., 2024). To prove the level of stationary data, the following model is applied:

$$Y_1 = \delta Y_{t-1} + U_t....(1)$$

By reducing the equation by Y_{t-1} . The left and right segments produce the following results:

$$Y_t - Y_{t-1} = \delta Y_{t-1} - Y_{t-1} + U_t$$
 (2)

$$\Delta Y_t = (\delta - 1)Y_{t-1} - U_t \dots (3)$$

Alternatively, it can be expressed like this:

$$\Delta Y_t = \beta Y_{t-1} + U_t \tag{4}$$

In the case of stationary tests, the ADF type in equation 4 can be used to confirm the following hypotheses: In fact, the stationary test when $H_1: \beta < 0$ (does not pocket a unit/stationary root) when (i.e., has a unit/non-stationary root) $H_0: \beta = 0$ (Fuddin, 2020).

In the second test, the ideal lag point is determined using the optimal lag test by applying the *Akaike Information Criterion* (AIC) (Kitamura, 2024). It can be formulated as follows:

$$AIC = In \frac{\sum \hat{u}_i^2}{n} + \frac{2k}{n}.$$
 (5)

Where is the number of remaining quadrants $\sum \hat{u}_i^2$, k shows the observation of independent variables, while n is the total amount of data. The model can be considered stable if the VAR stability test shows a root modulus value requirement of less than one.

Third, the degree of correlation between variables or causal relationships between extrinsic and endogenous components is determined using the Granger causality test (Zou et al., 2024). The Granger causality test triggers a value provision when there is no causal relationship between the variables in the study if the significance threshold α is set at 5% or if the probability value is more than 0.05. On the other hand, if the level of significance α is set at 5% or the probability value is less than 0.05, then there will be a causal relationship with the occurrence of causality.

Fourth, by using *Johansen's Cointegration Test* technique in the cointegration test to confirm whether the results of long-term balance and mobility of the relationship between variables are found. The hypothesis in *Johansen's Cointegration Test* is H_0 (does not have a cointegration equation) while H_1 (has a cointegration equation). The statistics used in testing the hypothesis are:

$$LR_{tr}(\mathbf{r}) = -\mathbf{r}\lambda \sum_{i=r+t}^{n} In \ (1-i)$$
 (6)

It can be seen that T is the number of periods, r is the cointegration rank, n is the endogenous variable, and

 $\lambda 1$ is an estimator of the eigen.

VECM views all variables as endogenous. In the sense that VECM sees each variable as having the capacity to influence or be influenced by every other variable (Sepita et al., 2024). VECM can be said to ignore exogenous variables. This study focuses on determining the relationship that arises from Government Expenditure (PP), External Debt (ULN), and Grants (HB) to the Current Account Balance (NTB) in Indonesia with the VECM equation model as follows:

Current Account Balance (NTB)

$$NTB = C_1 + a_{1i} \sum_{i=1}^{k} PP_{t-k} + a_{1i} \sum_{i=1}^{k} ULN_{t-k} + a_{1i} \sum_{i=1}^{k} HB_{t-k} + \varepsilon_1....(7)$$

Government Expenditure (PP)

$$PP = C_2 + a_{2i} \sum_{i=1}^{k} NTB_{t-k} + a_{2i} \sum_{i=1}^{k} ULN_{t-k} + a_{2i} \sum_{i=1}^{k} HB_{t-k} + \varepsilon_2$$
(8)

External Debt (ULN)

$$ULN = C_3 + a_{3i} \sum_{i=1}^{k} NTB_{t-k} + a_{3i} \sum_{i=1}^{k} PP_{t-k} + a_{3i} \sum_{i=1}^{k} HB_{t-k} + \varepsilon_3....$$
(9)

Grants (HB)

$$HB = C_4 + a_{4i} \sum_{i=1}^{k} NTB_{t-k} + a_{4i} \sum_{i=1}^{k} ULN_{t-k} + a_{4i} \sum_{i=1}^{k} HB_{t-k} + \varepsilon_4....$$
(10)

Each equation describes the relationship between the dependent variable (NTB, PP, ULN, HB) and other variables that act as independent variables. Notation C_n is a constant, ε_{nt} is residual, and k is the optimal amount of lag.

Each variable exhibits an unforeseen impact on the balance of the current account, which is scrutinized through the application of the Impulse Response Function (IRF) and the Forecast Error Variance Decomposition (FEVD). The Impulse Response Function (IRF) elucidates the manner in which a specific variable responds to disturbances emanating from other variables, whereas the Forecast Error Variance Decomposition (FEVD) assesses the degree to which each variable contributes to the fluctuations in forecast errors. These two analyses are important to understand the dynamic interaction between the Current Account Balance (NTB), Government Expenditure (PP), External Debt (ULN), and Grants (HB) in the VECM model.

4. DATA ANALYSIS

Stationary Test

This study applies Vector Error Correction Model (VECM) analysis in a stationary test to assess whether data passes the test specifically, if the probability value is below 0.05. The t-count value of each variable must be greater than the critical test value in order for the stationery test to pass or be met. Based on the ADF test, Table 2 displays the results of the stationery test in the study.

URT Test CV(5%) Variable **ADF Test** CV(1%) CV(10%) Prob Information NTB Level -1.91131 -3.61045 -2.93899 -2.60793 0.32390 Not stationary 1stdifferenc -4.98884 -3.61559 -2.94114 -2.60907 0.00020 Stationary 2stdifferenc -4.98884 -3.63290 -2.94840 -2.61287 0.00000 Stationary PP level -0.54374 -3.61045 -2.93899 -2.60793 0.87140Not stationary 1stdifferenc -8.29684 -3.61559 -2.94114 -2.60907 0.00160 Stationary 2stdifferenc -8.29684 -3.62102 -2.94343 -2.61026 0.00000 Stationary ULN level -2.24133 -3.61559 -2.94114 -2.60907 0.19570 Not stationary 1stdifferenc -3.41680 -3.61559 -2.94114 -2.60907 0.01650 Not stationary 2stdifferenc -8.26835 -3.62102 -2.94840-2.61026 0.00000 Stationary HB level -1.86501 -3.61045 -2.93899 -2.60793 0.33480 Not stationary 1stdifferenc -6.45826 -3.61559 -2.94114 -2.609070.00000 Stationary -3.61559 2stdifferenc -6.36007 -2.94840-2.609070.00000 Stationary

Table 2. Stationary Test Results

Source: Data processing 2024

Based on the conclusion of the stationary test above, indicates that the stationarity of the data is at the level of the second difference, while the data for the level and first difference states that the results are not stationary. It was found that the results at the second difference level showed that the variables of Current Account (NTB), Government Expenditure (PP), External Debt (ULN) and Grants (HB) Having a lower chance of α (5%) and the ADF (Statistical Augmented Dickey-Fuller) value exceeded the threshold value. Thus, for all variables of the Current Balance (NTB), Government Expenditure (PP), External Debt (ULN) and Grants (HB) have been stationary. After confirming the stationery, the next step is to determine the optimal lag. Determining optimal lag is crucial because insufficient lag can ignore dynamic relationships between variables, while excessive lag can lead to inefficiencies in the model (Jacobson et al., 2019).

The results of the optimal lag test showed the values of several criteria (LR, FRE, AIC, SC and HQ) that determined the lag value of 4 as the *optimal lag*. The minimum *Akaike Information Criterion* (AIC) value indicates the ideal determination of the optimal lag length. Up to lag 4 has the value of the merits of the model. The output results of the *AR Roots Table* show that the model is already in the stable category, which is marked with a modulus value of less than 1 (one). The determination of the optimal lag is to ensure the accuracy of the relationship between variables, so it is an important basis for Granger's causality test to identify significant influences between variables.

Granger's causality test shows the relationship between causality and causality between the Government Expenditure variable (logPP) and the Foreign Debt variable (logULN) by mentioning the prob value of 0.01950 < 0.05. Identifying that rising government expenditure often requires additional funding through external debt. This is consistent with the Nailufar et al. (2023), which stated that fiscal pressure due to high state spending was accompanied by an increase in external financing needs. The implications of these findings show the importance of efficient spending management to minimize dependence on long-term external debt. On the other hand, the external debt variable (logULN) does not have a causal relationship with the Government Expenditure variable (logPP). This could indicate that government expenditure is more influenced by domestic fiscal policy than external debt conditions. These findings can be the basis for policy recommendations that encourage national priority-based budget planning without relying too much on external funding (Inscriptions & Ekananda, 2023).

Lag Optimal

Table 3. Optimal Lag Test Results

Lag	LogL	LR	FPE	AIC	SC	HQ
0	-755.87390	NA	3.04e+14	44.69846	44.87803*	44.75970*
1	-739.90090	27.24799	3.07e+14	44.70005	45.59791	45.00625
2	-727.86530	17.69947	4.04e+14	44.93325	46.54940	45.48440
3	-705.10970	28.10987*	3.04e+14	44.53586	46.87030	45.33197
4	-684.44840	20.66123	2.91e+14*	44.26167*	47.31439	45.30274

Source: Data processing 2024

Granger Causality Test

Table 4. Results of the Granger Causality Test

Null Hypothesis	Obs	F-Statistic	Prob
LOGPP does not guarantee because NTB	36	0.50191	0.73460
NTB does not Granger Cause LOGPP		0.92276	0.46520
LOGULN does not guarantee because NTB	36	1.37721	0.26810
NTB does not Granger Cause LOGULN		0.36642	0.83040
LOGHB does not guarantee because NTB	36	0.35628	0.83740
NTB does not Granger Cause LOGHB		0.40422	0.80390
LOGULN does not guarantee because LOGPP	36	1.34213	0.28000
LOGPP does not Granger Cause LOGULN		3.52108	0.01950
LOGHB does not guarantee because LOGPP	36	1.81311	0.15540
LOGPP does not Granger Cause LOGHB		1.71840	0.17500
LOGHB does not guarantee because LOGULN	36	3.83404	0.01360

Null Hypothesis	Obs	F-Statistic	Prob
LOGULN does not Granger Cause LOGHB		0.41756	0.79450

Source: Data processing 2024

Furthermore, the prob value of 0.01360 < 0.05 in the External Debt variable (logULN) and the Grant variable (logHB) shows a strong causal relationship. Because the prob value is greater than 0.05. There is a causality relationship because grants are financial assistance that is not required to be paid back. A country's borrowing obligations can be reduced by receiving assistance, thereby reducing the country's overall debt burden (Shitile & Sule, 2019). In contrast to the Grant variable (logHB), there is no causal relationship with the External Debt variable (logULN). It shows that the grants received are not likely to be significant enough to directly influence the decision to borrow abroad. This highlights the importance of a more integrated strategy in utilizing grants to reduce dependence on external debt (Grajzl et al., 2024). Then it can be concluded that other factors do not cause causal relationships with each other. The granger causality test indicates a relationship between the variables tested, but cannot prove a long-term relationship between these variables. Therefore, a cointegration test is needed to identify whether there is a stable long-term relationship between the variables concerned.

It can be inferred that H_0 is accepted from the cointegration test results shown in Table 5. This is because the trace statistic value of 93.43087 is greater than the critical value at the 5% significance level of 47.8561, while the probability value of 0.00000 is smaller than α (0.05). These results show that there is a long-term correlation between the current account variables, government expenditure, external debt, and grants. With the cointegration of the model, this analysis can be continued using the VECM method. To assess the relevance of long-term and short-term relationships between variables, the t-table value of 2.028094001 is used. If the t-count is > (more) than the t-table, then the influence is considerable; if the t-count is < (smaller) than the t-table, then the effect is none.

The Table 6 presents the results of the VECM model analysis which describes the long-term relationship between current account balance variables, government expenditure, external debt, and grants. In a long-term relationship, government expenditure variables and grant variables have proven to have a significant effect on the current account balance. This is shown by the t-count values of 5.34946 and -6.66581 respectively. With a government expenditure coefficient of 1.18E+11, it indicates that an increase in government expenditure of 1% will have an impact on an increase in the current account balance of 1.18E+11%. Previous research by Hailil et al. (2021) in the long term, public sector outlays have demonstrated a considerable influence on the current account equilibrium, indicating that variations in the magnitude of governmental spending can alter the balance of transactions involving goods, services, and capital within a nation's economic framework. The research Murshed (2019) the findings derived from the analysis demonstrate that grants exert a considerable impact on the long-term stability of the current account balance, suggesting that the distribution of grants can influence a nation's financial equilibrium by altering the exchange of goods and services across borders.

Cointegration Test

Table 5. Co-Integration Output

Hypothesized	Eigenvalue	Trace	0.05	
No.of CE (s)	-	Statistic	Critical Value	Prob. **
None*	0.81876	93.43087	47.85613	0.00000
At most 1*	0.44587	37.06886	29.79707	0.00610
At most 2*	0.28072	17.58976	15.49471	0.02380
At most 3*	0.18415	6.71631	3.84146	0.00960

Trace test indicates 4 cointegrating eqn(s) at the 0.05 level

Source: Data processing 2024

Table 6. Long-Term Cointegration Test

Cointegrating Eq:	D (NTB(-1)2)	D (LOGPP(-1),2)	D LOGULN(-1),2)	D LOGHB(-1),2)
CointEq 1	1.00000	1.18E+11	1.93D+10	-3.30E+10
		[5.34946]	[0.86004]	[-6.66581]

^{*} denotes rejection of the hypothesis at the 0.05 level

^{**}MacKinnon-Haug-Michelis (1999) p-values

Note: The (-1) sign is the lag length, the [] sign is the absolute sign

Source: Data processing 2024

Table 7. Short-Term Cointegration Test

Variable	T-count	Coefficient
D (NTB(-1),3)	0.01292	0.01030
D (LOG_PP(-1),3)	1.38101	1.28E+11
D LOG_ULN(-1),3)	0.41949	2.15E+10
D LOG_HB(-1),3)	-1.64622	-4.61E+10

Note: The (-1) sign is the lag length

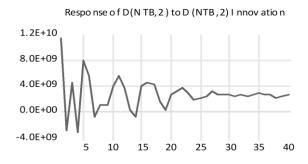
Source: Data processing 2024

Likewise, the grant variable has a coefficient of -3.30E+10 which means that if each grant increases by 1%, it will affect the increase in the current account balance by -3.30E+10%. In the analysis Van et al. (2019) said that the external debt variable in the long term does not have a significant impact on the current account balance. In this research, the external debt variable has a t-calculated value of 0.86004 < the t-table of 2.028094001, so it does not affect the current account balance. In addition to long-term relationships, there is also a VECM model in the short term.

The findings of this study show that, in the short term, the Government Expenditure variable (logPP) shows a contrasting relationship with its long-term behavior. In the short term, the Government Expenditure variable (logPP) did not have a significant effect on the Current Account Balance (NTB), so it did not have a significant impact on the current account balance during this period. Previous research by Sujianto & Azmi (2020) shows that government expenditure in the short term does not sufficiently affect the current account balance. Temporary fluctuations in government expenditure are not directly related to international flows of goods and services, so fiscal policy in the short term needs to focus more on domestic economic stability rather than the direct impact on international trade. The results of the analysis show that the t-calculated value for Government Expenditure (logPP) is 0.01292 < (smaller) compared to the t-table value of 2.028094001. Similarly, the t-calculated value for External Debt (logULN) is 0.41949 < (smaller) than the ttable value of 2.028094001. This shows that there is no significant relationship between the External Debt (ULN) variable and the Current Account Balance (NTB) in the short term. This is supported by research Altayligil & Çetrez (2020) the external debt exhibits negligible influence on the current account balance in the short run, as the allocation of debt-derived funds typically necessitates a considerable duration before being directed towards productive endeavors that can subsequently affect the flow of goods, services, or capital. Furthermore, the ramifications of debt are more likely to manifest in the long term, as the investments financed by debt commence to generate discernible outcomes within the economy. The Current Account Balance (NTB) variable is not significantly affected by the Grant variable (logHB), it states that the t-count value is -1.64622 and the t-table value is 2.028094001 which means that the t-count value is smaller than the t-table value. Previous research by Somantri & Sukardi (2019) it shows that the grant variable does not have a significant short-term impact on the current account balance because the impact is more pronounced on the domestic sector, such as social and infrastructure programs.

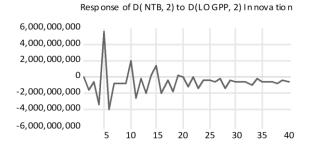
So the state needs to direct grants to sectors that can strengthen exports or attract investment to increase its impact on the current account balance. In this study, in the short term, the variables of Government Expenditure (logPP), External Debt (logULN), and Grants (logHB) were also found to have no significant effect on the current account balance (NTB). From the test cointegration shows a stable relationship in the long and short term, so the IRF test is needed to analyze the dynamics of the variable response to its changes. Thus, the IRF test provides a deeper understanding of the interaction of variables in the period.

Impulse Response Function (IRF)



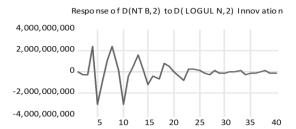
Source: Data processing 2024

Figure 3. Impulse Response Function (IRF) Current Account Balance to Current Account Balance



Source: Data processing 2024

Figure 4. Impulse Response Function (IRF) Current Account Balance to Government Expenditure



Source: Data processing 2024

Figure 5. Impulse Response Function (IRF) Current Account Balance to External Debt

The Impulse Response Function (IRF) uses second difference level data because the Impulse Response Function (IRF) test at the level and the first difference level shows results that are not stationary. Through the second difference level, it is known that the variable of the Current Balance (NTB) has pressure from itself in the first quarter is quite strong. In the second to fourteenth quarters, the Current Account Balance (NTB) gave a negative response. Meanwhile, in the fifteenth to fortyth quarters, the Current Account (NTB) gave a positive response that was above the horizontal line. Gregori & Giansoldati (2023) stated that shocks from the temporary current account balance had a positive effect and then caused fluctuations. Overall, the current account response impulse shows short- and long-term dynamics influenced by economic policies and external factors. Shocks in NTB can affect the balance of trade, investment, and economic stability, making it important for responsive and sustainable policies to maintain the health of current accounts (Das, 2016).

It can be seen that the response of the Current Account Balance (NTB) variable to the shock of government expenditure in the first quarter was not a response. It is known that the Government Expenditure shock (logPP) had a negative impact which decreased in the second quarter as seen from the IFR line leaning

downward and being below the horizontal line. Meanwhile, the Current Account Balance (NTB) in the fifth quarter responded positively and was above the horizontal line. From the twentieth quarter to the fortieth quarter, the Current Account Balance (NTB) responded negatively which tended to decline below the horizontal line. In the analysis (Jiang & Li, 2023) claimed that the current account balance reacts to shocks caused by government expenditure. The current account balance is greatly influenced by changes in government expenditure due to direct links with economic sectors that contribute to international flows of goods and services. Therefore, wise and targeted spending policies are key to positively influencing the current account response in the long term (Tiengmany et al., 2023).

It is known that the response of the Current Account Balance (NTB) variable marks that the External Debt shock (logULN) began to experience an increasing positive trend in the second quarter as seen from the IFR line which tends to rise and is above the horizontal line. In the fifth quarter, the current account balance responded negatively, this was marked by an IFR line that slanted downwards and showed that it was below the horizontal line. From the fifth to the fortieth quarter, the current balance sheet gave a fluctuating response because it experienced positive and negative trends, showing an upward and downward trend. From research (Michail & Savvides, 2018) evidence shows that shocks originating from foreign debt can affect the current account balance. External debt shocks can affect the current account balance (NTB) both positively and negatively, depending on its management. If debt is used for productive projects, such as infrastructure and export development, the current account balance could improve due to increased economic capacity and foreign exchange reserves. However, if debt is used for consumption or unproductive projects, a high debt burden can worsen the current account balance, increase interest payments and reduce foreign exchange reserves (Kikuchi & Tobe, 2022).

It is clear that the response of the current account balance variable to disturbances in the grant variable shows an increasing direction during the second quarter, exceeding the baseline indicated by the horizontal axis. In the third quarter, the current account balance responded negatively, as seen from the line that tended to decline. The IFR line which tends to rise shows that the current account balance is again responding positively above the horizontal line. In the next quarter until the fortieth kurt, the current account continues to respond positively and negatively as seen from the horizontal line that tends to rise and fall, which can be said to fluctuate. Coleman & Cuestas (2023) supports the Impulse Response Function (IRF) that unilateral transfer shocks in grants affect the current account balance differently across countries. Shock grants or unilateral transfers exert varying influences on a nation's current account balance, contingent upon the specific economic policies and market conditions prevailing in each case. When allocated judiciously, grants can yield a beneficial effect by bolstering production capacity and enhancing competitiveness. However, in countries with a high reliance on foreign aid or weak fiscal policy, the impact could fluctuate or worsen dependence (Altayligil & Cetrez, 2020).

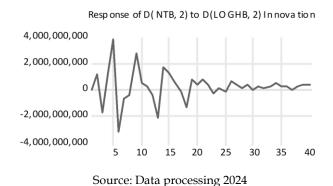


Figure 6. Impulse Response Function (IRF) Current Account Balance to Grants

Forecast Error Variance Decomposition (FEVD)

Table 8. Decomposition test

Period	S.E	D(NTB,2)	D(LOGPP,2)	D(LOGULN,2)	D(LOGHB,2)
1	1.14E+10	100.0000	0.00000	0.00000	0.00000
2	1.19E+10	97.04179	1.90336	0.02885	1.02601
3	1.28E+10	95.55186	1.82759	0.05350	2.56705
4	1.39E+10	86.69261	7.49577	2.84808	2.96355
5	1.76E+10	74.46077	14.18327	4.77077	6.58519
6	1.91E+10	71.18374	16.28267	4.25449	8.27911
7	1.92E+10	70.78472	16.33862	4.53589	8.34077
8	1.94E+10	69.72662	16.17791	5.87299	8.22248
9	1.96E+10	68.32274	15.91567	5.72804	10.0335
10	2.03E+10	67.36246	15.78324	7.44350	9.41080
11	2.12E+10	68.49373	15.97999	6.86629	8.65999
12	2.15E+10	69.31602	15.51655	6.73177	8.43566
13	2.18E+10	67.76610	15.97377	7.09520	9.16493
14	2.19E+10	67.36338	15.84808	7.04626	9.74228
15	2.23E+10	67.84016	15.50947	7.00169	9.64867
16	2.29E+10	68.45925	15.56432	6.69712	9.27932
17	2.33E+10	69.42949	15.05058	6.55609	8.96384
18	2.35E+10	68.88623	15.40095	6.56716	9.14566
19	2.35E+10	68.77263	15.38233	6.61452	9.23060
20	2.36E+10	69.16011	15.17900	6.52688	9.13401
21	2.39E+10	69.44992	15.08214	6.41140	9.05654
22	2.42E+10	70.02972	14.72468	6.37227	8.87334
23	2.44E+10	70.19367	14.81087	6.27042	8.72504
24	2.45E+10	70.32672	14.74665	6.24804	8.67859
25	2.46E+10	70.53455	14.65373	6.20123	8.61049
26	2.47E+10	70.71556	14.54184	6.13939	8.60321
27	2.49E+10	71.13891	14.31883	6.05759	8.48466
28	2.51E+10	71.29406	14.36937	5.97078	8.36579
29	2.52E+10	71.56033	14.22699	5.91064	8.30204
30	2.54E+10	71.82280	14.12014	5.84620	8.21085
31	2.55E+10	72.02222	14.03404	5.79350	8.15024
32	2.56E+10	72.29344	13.91598	5.72967	8.06090
33	2.58E+10	72.42790	13.90110	5.67441	7.99659
34	2.59E+10	72.65586	13.76581	5.62516	7.95318
35	2.61E+10	72.93116	13.65547	5.55602	7.85736
36	2.62E+10	73.17882	13.54975	5.49418	7.77726
37	2.64E+10	73.40634	13.45945	5.43751	7.69669
38	2.65E+10	73.53178	13.42733	5.39753	7.64336
39	2.66E+10	73.71741	13.33167	5.35198	7.59894
40	2.67E+10	73.92961	13.24445	5.29330	7.53265

Source: Data processing 2024

By looking at *Forecast Error Variance Decomposition* (FEVD), it can be seen that in the first quarter, the variable Current Account (NTB) contributed 100% to the level of the current account balance itself. Meanwhile, the variables of Government Expenditure (logPP), External Debt (logULN) and Grants (logHB) in the first quarter have not yet contributed. The contribution to the formation of the Current Account Balance (NTB) variable in the first quarter is the current account (NTB) variable itself, there is support in this study (Afonso & Silva, 2017) it was stated that there was a contribution in the first quarter to the formation of the Current Account Balance (NTB) variable, which subsequently influenced the current account balance (NTB) itself. However, as time went on in the second quarter, the current account balance was affected by Government Expenditure (logPP) contributing 1.90%, the External Debt variable (logULN) in the second quarter contributed 0.03% and the Grant variable (logHB) contributed 1.03%, which was supported by research

(Afonso & Opoku, 2023) it was stated that government expenditure had a notable contribution to the current account balance during the second quarter. It continued to shift until the fortieth quarter, namely the Current Account Balance (NTB) contributed 73.93%, while Government Expenditure (logPP) contributed 13.24% and External Debt (logULN) in the fortieth quarter contributed 5.29% and Grants (logHB) contributed 7.53%.

5. DISCUSSION

The final results of the processing from this researcher present the absence of independent variables (independent variables) and bound variables (dependent variables). Sometimes the international trade variable that is reflected in the Current Account Balance (NTB) becomes a bound variable (dependent variable) and sometimes becomes an independent variable (independent variable).

Current Account Balance

According to research Hailil et al. (2021) the balance of the current account functions as a vital economic metric that summarizes a country's interactions with the international community, incorporating continuous trade in commodities and services, net earnings, and financial transfers, thus offering significant perspectives on investment behaviors, capital flows, and levels of indebtedness. The balance of the current account is significantly affected by fiscal policies, financial grants, and various external economic determinants. The balance of economic prosperity is significantly shaped by the interplay between the surplus of the current account and the execution of a progressive fiscal strategy (Moura et al., 2020). On the other hand, grants and the current account balance have a reciprocal relationship that supports global economic stability and prosperity while strengthening international trade (Novi & Perdana, 2021). Lin & Kueh (2019) it was proclaimed that over an extended period, the balance of the current account reveals a consistent and unwavering connection. Meanwhile, in the short term, fluctuations can occur due to the influence of one-way or two-way causal relationships. The administration must handle fiscal policy with precision to ensure the current account balance remains stable and to enhance grants that bolster the trade balance. Integrated long-term policies must be designed to strengthen the competitiveness of the global economy and reduce the risk of dependence on external factors (Çetrez & Altaylıgil, 2022)

Government Expenditure on the Current Account Balance

Government expenditure as a fiscal policy instrument that functions to encourage economic development through budget allocation for public goods, investment, and consumption (Glebocki & Ralf, 2024). Government expenditure significantly influences the current account balance by steering economic activities, particularly the relationship between public goods and private consumption. An escalation in government expenditure indicates proactive measures are being implemented to foster economic growth within a nation. Government expenditure is a key determinant of economic health and directly or indirectly affects a variety of indicators, including the current account balance (Ilori et al., 2022; Jørgensen & Ravn, 2022). Rosiana & Laut (2022) it demonstrates that the enduring advantages derived from the current account balance are attributable to governmental investments aimed at augmenting production, which in turn enhances the overall economy. However, in the short term, the relationship does not directly reflect the complexity of the relationship, including the time it takes to get a return on investment or direct impacts such as changes in the amount of debt. The importance of effectiveness-oriented government expenditure management. In the short term, the government needs to allocate budgets to sectors that have a direct impact on the trade balance, such as strengthening the export sector and import substitution. In the long term, investment in infrastructure, education, and technology must be a priority to create sustainable competitiveness that supports the current account surplus (Francis, 2019).

The examination conducted within the framework of the Vector Error Correction Model (VECM) indicates that governmental spending exerts a considerable impact on the balance of the current account over an extended temporal horizon, with an estimated t-calculated value of 5.349496. However, in the short term, the effect is not significant, as indicated by the t-count value of 1.38101 which is below a significant threshold. Gafor & Mohmmed (2023) emphasizing the importance of proper fiscal management to support economic stability.

External Debt to Current Account Balance

External debt (external debt) is a loan obtained from international sources to support development financing, close the budget deficit, and promote economic stability. External debt comes from the government and

private sectors, with each having a different role and risk to the dynamics of the national economy. External debt The government is generally used for infrastructure development, public services, and social programs, so it has the potential to have a major impact on economic growth. In contrast, private external debt tends to be used for business and trade purposes, which is more flexible but risks economic instability if the private sector defaults. Consequently, the collaboration between governmental entities and private sector organizations in the administration of external indebtedness is essential for preserving equilibrium in the current account and ensuring the stability of the national economy (Silva, 2020). The external debt has the potential to influence the current account balance by reallocating resources to enhance export capabilities, facilitate import substitution, or improve economic efficiency. When expertly handled, external debt has the power to enhance the current account balance by fueling economic expansion. Conversely, if debt spirals into unproductivity, it may exert greater strain on the current account balance, leading to increased interest and principal payments in the future (Nurwulian & Astutik, 2023). Therefore, it is important for the government to ensure that the external debt is well managed and allocated to projects that will strengthen the economy (Suhairi et al., 2024). Previous research by Kelikume & Otonne (2022) he explained that external debt can accelerate short-term economic expansion by encouraging development investment and covering the budget deficit. However, to reap long-term benefits, foreign debt must be used productively, such as for investments in projects that increase production capacity. Otherwise, unproductive debt can actually cause economic problems and increase the debt burden in the future. Previous research by Küfeoğlu (2022) revealed that increasing the use of external debt for productive projects can create new jobs and improve labor skills, thereby promoting sustainable economic growth. In addition, investment in infrastructure and strategic sectors will create opportunities for local entrepreneurship and broader industrial development, which in turn reduces the unemployment rate and improves the quality of life of the community.

According to the revelations of the research, external debt exerts no tangible influence on the equilibrium of the current account, whether in the immediate or distant future. In the long term, this is shown by a t-calculated value of 0.86004, while in the short term, a t-calculated value of 0.41949 also confirms that there is no significant influence of external debt variables on the current account balance. This indicates that without proper utilization, external debt is ineffective in affecting the economic balance. The ramifications of economic policy underscore the significance of channeling debt towards productive investments, which are essential for fostering economic growth and enhancing the current account equilibrium (Uchendu & Anyanwu, 2024).

Grants to the Current Account Balance

Grants as financial aid provided without a repayment obligation, which can be used to fund development, education, health, or infrastructure projects (Piqqa et al., 2023). Grants are divided into development, humanitarian, technological, and environmental grants, according to their goals and recipients. Sources of grants generally come from donor countries with economic surpluses or international institutions such as the World Bank and IMF, which aim to assist recipient countries in addressing economic challenges and supporting sustainable growth (Gillani & Gillani, 2023). Grants, on the other hand, can provide the financial boost needed by development projects without increasing the debt burden, thereby improving the current account position (Podsiadło, 2018). Previous research by Pruce (2023) careful distribution and planning of grants is essential in their use. The effect of grants on the current account balance can be limited if the distribution is inefficient. However, when used appropriately, grants can support strategic sectors such as infrastructure, education, and health, which in turn improves welfare, reduces poverty, and supports economic growth. Appropriate allocation will strengthen social and economic stability without increasing the debt burden. Previous research by Boucekkine et al. (2018) short-term grants can improve the current account balance and provide fiscal space, i.e. give the government more freedom in expenditure without increasing debt. To be effective, grants must be allocated to projects that improve production, competitiveness, and economic stability, which will support long-term economic growth and well-being. In this case, the government sets priorities in the allocation of grants, ensuring that investment is directed to strategic sectors that have the potential to drive innovation and efficiency (N & Appakova, 2020).

The analysis of the Grant variable (HB) shows that the grant has a significant influence on the current account balance in the long term which is shown by a t-calculated value of -6.66581. However, in the short term, the grant did not have a significant effect on the current account balance with a t-count value of -1.64622. The long-term effect of grants on current account balances suggests that appropriate allocation of

funds can strengthen economic stability, while insignificant short-term results indicate the need for further evaluation of grant distribution strategies to achieve desired economic policy objectives (Gafor & Mohmmed, 2023).

6. CONCLUSION, IMPLICATION, SUGGESTION, AND LIMITATIONS

Based on the results of the estimates conducted in this study, it was found that international trade through the current account balance in Indonesia during the period 1983-2022 was influenced by various factors, including expansionary fiscal policies and grants. The study found indicators of expansionary fiscal policy measured using government expenditure and external debt variables. This examination underscores the significance of robust expansionary fiscal policies in fortifying the current account stance by demonstrating that governmental expenditures and subsidies exert a substantial long-term influence on the current account equilibrium. On the other hand, external debt has no visible long-term effect on the current account balance. In addition, short-term studies show that the current account balance is not significantly affected by any of the variables of government expenditure, external debt, and grants, having a significant influence on the current account balance. External debt does not have a significant effect in the long run because its effectiveness depends on proper allocation. If used for productive investments, debt can increase income and improve the current account balance. However, if not managed properly, debt actually adds to the burden and worsens the deficit.

The results of this study show that the current account surplus has positive implications for economic policy, including increasing fiscal space for government expenditure, foreign debt, and strengthening aid in the form of grants. To maintain positive current account conditions and avoid deficits, it is important for the government to manage fiscal policy wisely. The government can ensure that state expenditure does not exceed revenue on a sustainable basis. Careful management is necessary to appropriately manage the surplus and prevent over-reliance on external cash flows. In addition, appropriate expansionary fiscal policy can help maintain economic stability. Policies are focused on managing productive expenditure, such as investment in infrastructure, education, and technology, which can drive long-term economic growth. To maintain and increase the current account surplus, the government needs to take prudent and sustainable measures. The government must ensure that the surplus is not used excessively or for unproductive needs. Infrastructure improvements play a key role in maintaining economic growth, as they can increase industrial productivity and competitiveness. Priority is given to the business world by providing resources and incentives that support innovation and product creation. The current account surplus is expected to be maintained and increased through integrated policies. This research has several limitations. First, this research only focuses on Indonesia so that the results cannot be generalized to other countries or the global region. This research is limited to the Indonesian context, which is influenced by a number of specific factors. First, volatile political conditions can affect the consistency of economic policies. Second, the main focus of Indonesia's economic policy on infrastructure development and poverty alleviation makes the results of this study tend to be different if applied in countries with other economic priorities. Third, Indonesia's market structure, which is dominated by domestic consumption and exports of raw commodities, such as palm oil and coal, affects economic transaction patterns. In addition, bureaucratic challenges and the level of dependence on foreign investment are also constraints that make these findings less relevant for countries with different market structures and economic policies. Second, the study is limited to three main variables: government expenditure, external debt and grants. Although these three variables are relevant, there are no other variables such as exchange rates, or other macroeconomic factors that play an important role in shaping the current account balance.

REFERENCES

Afonso, A., & Opoku, P. K. (2023). The nexus between fiscal and current account imbalances in OECD economies. *Applied Economics*, 55(13), 1389–1406. https://doi.org/10.1080/00036846.2022.2097188

Afonso, A., & Silva, J. (2017). Current account balance cyclicality. *Applied Economics Letters*, 24(13), 911–917. https://doi.org/10.1080/13504851.2016.1240333

Altayligil, Y. B., & Cetrez, M. (2020). Macroeconomic, institutional and financial determinants of current account balances: a panel data assessment. *Journal of Economic Structures*, 9(1), 1–23. https://doi.org/10.1186/s40008-020-00225-1

- Aronov, I. Z., Rybakova, A. M., Salamatov, V. Y., Tangaeva, A. V., & Galkina, N. M. (2019). Application of Chow Test to Estimate the Effect of Mutual Recognition Agreements. *International Journal of Mathematical*, *Engineering and Management Sciences*, 4(3), 591–600. https://doi.org/10.33889//ijmems.2019.4.3-047
- Asnawi, A., Hasyim, P., Anwar, K., & Roni, M. (2023). The Effect of Foreign Debt, Foreign Investment (Fdi), and Government Spending on Economic Growth in 5 Asean Countries. *Journal of Malikussaleh Public Economics*, 6(1), 20. https://doi.org/10.29103/jmpe.v6i1.12138
- Boucekkine, R., Fabbri, G., & Pintus, P. A. (2018). Short-run pain, long-run gain: the conditional welfare gains from international financial integration. *Economic Theory*, 65(2), 329–360. https://doi.org/10.1007/s00199-016-1019-7
- Boug, P., Brasch, T. Von, Cappelen, Å., Hammersland, R., Hungnes, H., Kolsrud, D., Skretting, J., Strøm, B., & Vigtel, T. C. (2023). Fiscal policy, macroeconomic performance and industry structure in a small open economy. *Journal of Macroeconomics*, 76(C), 1–29. https://doi.org/10.1016/j.jmacro.2023.103524
- Braml, M. T., & Felbermayr, G. J. (2019). What Do We Really Know about the Transatlantic Current Account? *CESifo Economic Studies*, 65(3), 255–274. https://doi.org/10.1093/cesifo/ifz012
- Cetrez, M. (2022). Trade Openness, Income Levels, Economic Growth, and Current Account Balances. *Journal of Economics and Administrative Sciences*, 23(3), 760–773. https://doi.org/10.37880/cumuiibf.1101244
- Çetrez, M., & Altaylıgil, Y. (2022). The Role of Macroeconomic Stability in Current Account Balances. *Istanbul Journal of Economics*, 72(2), 1–30. https://doi.org/10.26650/istjecon2022-1172316
- Coleman, S., & Cuestas, J. C. (2023). Has the current account broken up with its fundamentals in Central and Eastern Europe? *International Journal of Finance and Economics*, 28(1), 962–980. https://doi.org/10.1002/ijfe.2458
- Das, D. K. (2016). Determinants of current account imbalance in the global economy: a dynamic panel analysis. *Journal of Economic Structures*, 5(1), 1–24. https://doi.org/10.1186/s40008-016-0039-6
- Demirtaş, T. (2023). Discussions on the Growth Efficiency of Expansionary Fiscal Policy via Monetary Policy in Shrinking Periods: Wide Range of Country Analysis. *Modern Economy*, 14(10), 1347–1365. https://doi.org/10.4236/me.2023.1410069
- Dupuis, S., Göttsche, F., & Wunderle, S. (2024). Temporal stability of a new 40-year daily AVHRR Land Surface Temperature dataset for the Pan-Arctic region. *Print Repository*, 857(1), 1–46. https://doi.org/10.5194/egusphere-2024-857
- Francis, U. N. P. P. . (2019). Effectiveness for the Value of Money on Capital Expenditure in Nigerian Public Sector. *Research Journal of Finance and Accounting*, 10(10), 7–15. https://doi.org/10.7176/RJFA/10-10-11
- Fuddin, M. K. (2020). Determination Of State Economic Activities Developing Countries In East Asia & Camp; Pacific Using Classical Approaches. *Research Square*, 1(3), 1–22. https://doi.org/10.21203/rs.3.rs-24900/v1
- Gafor, N. M., & Mohmmed, D. A. (2023). An Analytical Study of the Effectiveness of Fiscal Policy Tools in Achieving Economic Stability in Iraq. *Russian Law Journal*, 11(11), 405–414. https://doi.org/10.52783/rlj.v11i11s.1976
- Gawande, A. (2016). Crafting Chaos: The Classification of Unilateral Transfers under the Current Account at Bretton Woods and its Impact on Remittances to the Indian State of Kerala. *Undergraduate Economic Review*, 13(1), 1–30. https://doi.org/10.7916/D8RV25DP
- Genta Nuraini, P., & Yulianti, I. (2019). Different Periods on Balance of International Payment. *International Journal of Tax Economics and Management*, 2(2), 1–18. https://doi.org/10.35935/tax/22.181
- Gillani, A. S., & Gillani, D. Q. (2023). Sector Specific Aid Inflow, Institutional Quality and Human Development in Selected Developing Countries. *Journal of Economic Impact*, 5(1), 64–68. https://doi.org/10.52223/jei5012307
- Glebocki, H., & Ralf, K. (2024). The effects of European fiscal discipline measures on current account balances. *International Economics and Economic Policy*, 21(1), 251–283. https://doi.org/10.1007/s10368-024-00587-y
- Grajzl, P., Srhoj, S., Cepec, J., & Mörec, B. (2024). A by-product of big government: the attenuating role of public procurement for the effectiveness of grants-based entrepreneurship policy. *Small Business Economics*, 62(3), 895–916. https://doi.org/10.1007/s11187-023-00788-w
- Gregori, T., & Giansoldati, M. (2023). Do current and capital account liberalizations affect economic growth in the long run? *Empirical Economics*, 65(1), 247–273. https://doi.org/10.1007/s00181-022-02324-3

- Hailil, A. K., Kun, S. S., & Rocha, D. S. M. (2021). Current Account Balance In Emerging Asia. *Studies in Business and Economic*, 16(1), 12–25. https://doi.org/10.2478/sbe-2021-0002
- Hollander, H., Havemann, R., & Steenkamp, D. (2024). The macroeconomics of establishing a basic income grant in South Africa. *South African Journal of Economics*, 92(1), 57–68. https://doi.org/10.1111/saje.12363
- Huang, W., Wang, H., & Wang, S. (2024). A structural VAR and VECM modeling method for open-high-low-close data contained in candlestick chart. *Financial Innovation*, 10(97), 1–29. https://doi.org/10.1186/s40854-024-00622-6
- Ilori, A. E., Paez-farrell, J., & Thoenissen, C. (2022). Fiscal policy shocks and international spillovers. *European Economic Review*, 141(C), 1–26. https://doi.org/10.1016/j.euroecorev.2021.103969
- Indrawati, S. M., Satriawan, E., & Abdurohman. (2024). Indonesia 's Fiscal Policy in the Aftermath of the Pandemic. *Bulletin of Indonesian Economic Studies ISSN:*, 60(1), 1–33. https://doi.org/10.1080/00074918.2024.2335967
- Jacobson, N. C., Chow, S. M., & Newman, M. G. (2019). The Differential Time-Varying Effect Model (DTVEM): A tool for diagnosing and modeling time lags in intensive longitudinal data. *Behavior Research Methods*, 51(1), 295–315. https://doi.org/10.3758/s13428-018-1101-0
- Jiang, M., & Li, J. (2023). Government spending shocks and default risk in emerging markets. *PLOS ONE*, 18(7), 1–16. https://doi.org/10.1371/journal.pone.0288802
- Jørgensen, P. L., & Ravn, S. H. (2022). The inflation response to government spending shocks: A fiscal price puzzle? *European Economic Review*, 141(5), 1–43. https://doi.org/10.1016/j.euroecorev.2021.103982
- Kelikume, I., & Otonne, A. (2022). Debt-Led-Growth Hypothesis (DLGH) and Productive Constraints: An Empirical Evaluation of African Economies. *International Journal of Management, Economics and Social Sciences*, 11(1), 48–74. https://doi.org/10.32327/ijmess/11.1.2022.3
- Keynes, J. M. (1936). The General Theory of Employment, Interest and Money. In *Hardcourt: Brace and Word* (Vol. 31, Issue 196).
- Kidochukwu, O. C., A, I. M., & Chukwuyem, E. P. (2022). Public Expenditure and Economic Growth: Justification of Keynes Hypothesis Using Nigerian Data. *International Journal of Advanced Economics*, 4(8), 159–166. https://doi.org/10.51594/ijae.v4i8.394
- Kikuchi, T., & Tobe, S. (2022). Does Foreign Debt Contribute to Economic Growth? *SSRN Electronic Journal*, 10(10), 1–21. https://doi.org/10.2139/ssrn.4034414
- Kitamura, Y. (2024). The price discovery in the renminbi/USD market: Two spot, two swap, and three forward FX rates. *International Review of Financial Analysis*, 95(A), 1–14. https://doi.org/10.1016/j.irfa.2024.103362
- Kohler, K. (2022). Capital flows and geographically uneven economic dynamics: A monetary perspective. *Economy and Space*, 54(8), 1510–1531. https://doi.org/10.1177/0308518X221120823
- Küfeoğlu, S. (2022). SDG-9: Industry, Innovation and Infrastructure. *Emerging Technologies*, 11(1), 349–369. https://doi.org/10.1007/978-3-031-07127-0_11
- Lahiani, A., Mtibaa, A., & Gabsi, F. (2022). Fiscal Consolidation, Social Sector Expenditures and Twin Deficit Hypothesis: Evidence from Emerging and Middle Income Countries. *Comparative Economic Studies*, 64(4), 710–747. https://doi.org/10.1057/s41294-022-00183-6
- Latifah, L. L., & Rosyadi, S. (2024). Analisis Kebijakan Fiskal Pasca Pandemi Covid-19 Studi Kasus Indonesia. *El-Mal: Jurnal Kajian Ekonomi & Bisnis Islam*, 5(3), 1787–1801. https://doi.org/10.47467/elmal.v5i3.799
- Lin, S. X., & Kueh, J. (2019). Determinants of Current Account Balance in Six ASEAN Countries: A Panel Analysis Approach. *International Journal of Economics and Finance*, 11(7), 129. https://doi.org/10.5539/ijef.v11n7p129
- Maheswaranathan, S., & Jeewanthi, K. M. N. (2021). Empirical Investigation of the Influence of Fiscal Policy on Sri Lanka'S Economic Growth From 1990 To 2019. *Asian Journal of Economic Modelling*, 9(2), 122–131. https://doi.org/10.18488/journal.8.2021.92.122.131
- Mehta, D., & Derbeneva, V. V. (2023). Asymmetry Effect of Tax and Public Debt on Private Consumption Spending in Russia. *Econometric Models of Tax Reforms*, 9(3), 359–375. https://doi.org/10.15826/jtr.2023.9.3.147
- Metusalak, T. D. M., Rahma, I. N., & Yasin, M. (2024). Menganalisis Neraca Pembayaran Sebagai Tolak Ukur Kemampuan Perekonomian Nasional dalam Menopang Transaksi Transaksi Internasional. *Jurnal Ekonomi, Akuntansi Dan Manajemen*, 2(2), 312–319. https://doi.org/10.30640/trending.v2i2.2364

- Michail, N., & Savvides, A. (2018). Intra Euro Area Capital Flows and the Current Account Balance. *SSRN Electronic Journal*, 2(1), 1–44. https://doi.org/10.2139/ssrn.3243260
- Morgenthau, H. (1962). A Political Theory Of Foreign Aid*. In Political Science (Vol. 56, Issue 2).
- Moura, B. A., Tiryaki, G. F., & Teixeira, D. N. (2020). Fragilidade fiscal e os ciclos econômicos no Brasil pós-Plano Real: evidências de um modelo de fator dinâmico associado à análise VAR. *Nova Economia*, 30(2), 517–549. https://doi.org/10.1590/0103-6351/5056
- Mqolombeni, N., Tewari, D. D., & Ilesanmi, K. D. (2023). Exploring The Role of High Government Debt on Economic Growth: A Nonlinearity and Threshold Analysis for Africa's Developing Countries. *Economies*, 11(51), 1–15. https://doi.org/10.3390/economies11020051
- Murshed, M. (2019). An empirical investigation of foreign financial assistance inflows and its fungibility analyses: Evidence from Bangladesh. *Economies*, 7(3), 1–25. https://doi.org/10.3390/economies7030095
- N, Y. N. G. N., & Appakova, G. N. (2020). Innovation Projects As A Base Of Economic Development. *Reports of the National Academy of Sciences of the Republic of Kazakhstan*, 2(330), 171–178. https://doi.org/10.32014/2020.2518-1483.47
- Nailufar, F., Ichsan, I., Sari, C. P. M., & Juliansyah, H. (2023). the Effect of Government Spending, Domestic Investment and Foreign Debt on Gross Domestic Product in Indonesia. *Journal of Malikussaleh Public Economics*, 6(1), 31–41. https://doi.org/10.29103/jmpe.v6i1.12139
- Novi, M., & Perdana, A. (2021). Analisis Fenomena Defisit Anggaran Dan Defisit Transaksi Berjalan Di Indonesia (1990-2019). *Diponegoro Journal of Economics*, 10(1), 1–15. https://doi.org/10.14710/djoe.30001
- Nurwulian, Z., & Astutik, E. P. (2023). Analisis Pengaruh Pinjaman Dari Pihak Asing Terhadap Pertumbuhan Ekonomi Di Indonesia. *Jurnal Maneksi*, 12(1), 158–162. https://doi.org/10.31959/jm.v12i1.1426
- Ozturk, S., & Coltu, S. (2018). The Analysis Of Sustainability Of Current Account Deficit In Selected OECD Countries (1995-2015). *Bingöl Üniversitesi Sosyal Bilimler Enstitüsü Dergisi*, 8(16), 37–48. https://doi.org/10.29029/busbed.391021
- Pickles, A. J. (2020). Transfers a deductive approach to gifts, gambles, and economy at large. *Current Anthropology*, 61(1), 11–29. https://doi.org/10.1086/706880
- Piqqa, R., Andriyani, D., & Husein, R. (2023). The Effect of Health, Education, Infrastructure and Economic Growth Expenditures on the Human Development Index in Aceh Province. *Journal of Malikussaleh Public Economics*, 5(2), 35. https://doi.org/10.29103/jmpe.v5i2.10288
- Podsiadło, P. (2018). Grants and tax subsidies as the main forms of state aid a perspective of the state of public finance. *Optimum. Economic Studies*, 2(92), 90–109. https://doi.org/10.15290/oes.2018.02.92.08
- Poórová, J., Jeneiová, K., Blaškovičová, L., Danáčová, Z., Kotríková, K., Melová, K., & Paľušová, Z. (2023). Effects of the Time Period Length on the Determination of Long-Term Mean Annual Discharge. *Hydrology*, 10(88), 1–10. https://doi.org/10.3390/hydrology10040088
- Prasasti, S. R., & Ekananda, M. (2023). Does Fiscal Policy Matter? A Study on Economic Crises in Indonesia. *Journal of Economics and Policy*, 16(1), 13–27. https://doi.org/10.15294/jejak.v16i1.37532
- Pruce, K. (2023). The Politics of Who Gets What and Why: Learning from the Targeting of Social Cash Transfers in Zambia. *European Journal of Development Research*, 35(4), 820–839. https://doi.org/10.1057/s41287-022-00540-2
- Ramadhan, M., Aji, B., & Wijayanti, D. (2021). Analisis Kebijakan Fiskal Terhadap Pertumbuhan Ekonomi di Indonesia. *Aplikasi Bisnis*, 20(1), 379–389. https://doi.org/10.20885/jabis.vol20.iss1.art7
- Rizka, W. A., Sembiring, S. O. B., Wulandari, K. D., & Matondang, K. A. (2023). Contribution of International Trade in Import Export in Indonesia. *Indonesian Journal of Advanced Research*, 2(7), 837–846. https://doi.org/10.55927/ijar.v2i7.4332
- Rizki, A., Islam, U., Raden, N., & Lampung, I. (2022). Dampak Covid-19 Terhadap Perdagangan Internasional Perspektif Islam. *Jurnal Bina Bangsa Ekonomika*, 15(01), 160–166. https://doi.org/10.46306/jbbe.v15i1.133
- Robert, E. L. (1967). Adjustment Costs and the Theory of Supply. In *Political Economy* (Vol. 75, Issues 4, Part 1).
- Rosiana, E. I., & Laut, L. T. (2022). The Role Of Government Expenditure, Investment And Exchange In Affecting Economic Growth In Indonesia. *Jurnal Ekonomi-Qu*, 12(2), 239. https://doi.org/10.35448/jequ.v12i2.17503
- Sailirrizqi, S., & Adinugraga, H. (2023). The Impact of Economic Globalization on The Indonesian Economy.

- *Jurnal Ekonomi Pembangunan, Manajemen Dann Bisnis, Akuntansi, 3*(2), 131–139. https://doi.org/10.52300/jemba.v3i2.9694
- Sepita, H., Kartika, M., & Putra, W. (2024). The Effect of Selected Macroeconomic Variables on Sharia Mutual Funds in Indonesia: A Multidimensional Analysis with VECM Approach. *Asian Journal of Economics, Business and Accounting*, 24(7), 105–116. https://doi.org/10.9734/ajeba/2024/v24i71395
- Setiawan, L., Simanulang, A. P., & Prasojo, W. (2020). Reflections on Implementation of the Framework Medium-Term Fiscal in Indonesia. *Jurnal Anggaran Dan Keuangan Negara Indonesia (AKURASI)*, 2(2), 163–174. https://doi.org/https://doi.org/10.33827/akurasi2020.vol2.iss2.art82
- Shevchuk, V., & Kopych, R. (2018). Assessing Fiscal Sustainability in Ukraine: TVP and VAR / VEC Approaches. *Entrepreneurial Business and Economics Review*, 6(3), 73–87. https://doi.org/10.15678/EBER.2018.060305
- Shitile, T. S., & Sule, A. (2019). Reassessing the efficacy of foreign aid and grants in poverty reduction in Nigeria. *Asian Economic and Financial Review*, 9(4), 450–460. https://doi.org/10.18488/journal.aefr.2019.94.450.460
- Silva, J. (2020). Impact of public and private sector external debt on economic growth: the case of Portugal. *Eurasian Economic Review*, 10(4), 607–634. https://doi.org/10.1007/s40822-020-00153-2
- Siswanto, C. A., Kurniawan, W., & Birahayu, D. (2023). Indonesia's Participation In IE-CEPA: An Obligation or Policy? *Jurnal Penelitian Hukum De Jure*, 23(2), 255. https://doi.org/10.30641/dejure.2023.v23.255-272
- Somantri, I., & Sukardi, H. A. (2020). Pengaruh Kurs dan Produk Domestik Bruto Terhadap Neraca Transaksi Berjalan Melalui Pendekatan Error Correction Model (ECM). *Jurnal Ekonomi Manajemen Perbankan*, 2(1), 1–10. https://doi.org/10.32897/jemper.v2i1.250
- Soo, X.-L., Kueh, J. S.-H., Ab-Rahim, R., & Yau, J. T.-H. (2023). Current Account Imbalances in Asia's Countries: The Contributing Elements. *International Journal of Academic Research in Business and Social Sciences*, 13(6), 2245–2258. https://doi.org/10.6007/ijarbss/v13-i6/17378
- Stone, D., Porto de Oliveira, O., & Pal, L. A. (2020). Transnational policy transfer: the circulation of ideas, power and development models. *Policy and Society*, 39(1), 1–18. https://doi.org/10.1080/14494035.2019.1619325
- Suhairi, S., Lestari, A., Zahra, A., Lubis, S. Z. K. A., & Rozi, Y. F. (2024). Strategi Dan Kebijakan Ekspor Impor Atau Perdagangan Internasional Terhadap Pertumbuhan Ekonomi. *Jurnal Minfo Polgan*, 12(2), 2643–2647. https://doi.org/10.33395/jmp.v12i2.13342
- Sujianto, A. E., & Azmi, M. F. U. (2020). Associative Study on Government Spending, Inflation, Trade Balance, and Gross Domestic Product. *Ekuilibrium: Jurnal Ilmiah Bidang Ilmu Ekonomi*, 15(1), 27–37. https://doi.org/10.24269/ekuilibrium.v15i1.2020.pp27-37
- Sumiyati, E. E. (2022). Macroeconomic Factors and Current Account Deficit in Indonesia. *Journal of Economics and Business*, *5*(4), 8–18. https://doi.org/10.31014/aior.1992.05.04.455
- Suryanto, S., & Kurniati, P. S. (2022). Analisis Perdagangan Internasional Indonesia dan Faktor-Faktor yang Memengaruhinya. *Intermestic: Journal of International Studies*, 7(1), 104–122. https://doi.org/10.24198/intermestic.v7n1.6
- Takhi, H. (2020). Current Account Deficit: Is This A Major Problem For A Country Like India. *International Journal of Multidisciplinary Research (IJMR)*, 8(10), 198–210. https://doi.org/10.36713/epra11560
- Tang, S., Wang, B., Xiao, Y., Yang, J., & Liu, Y. (2023). Research on the Influence of Fiscal Policy on Enterprise Value. *Advances in Economics and Management Research*, 5(1), 393–403. https://doi.org/10.56028/aemr.5.1.393.2023
- Teubler, F., & Riemer, M. (2021). Potential-vorticity dynamics of troughs and ridges within Rossby wave packets during a 40-year reanalysis period. *Weather and Climate Dynamics*, 2(3), 535–559. https://doi.org/10.5194/wcd-2-535-2021
- Thi, P., & Tong, M. (2023). Impacts of Foreign Debt on Vietnam's Sustainable Development. *ResearchGate*, 2(1), 605–623. https://doi.org/10.1007/978-981-99-0490-7_37
- Tiengmany, S., Thinphaisonh, C., Yawdhacksa, V., Xaisongkham, S., Capital, V., & City, Z. (2023). Government Spending and Exchange Rate in ASEAN Countries: Evidence from ARDL and Toda &Yamamoto Approach. Research Journal of Finance and Accounting, 14(10), 81–90. https://doi.org/10.7176/RJFA/14-10-09
- Tosun, T. T. (2022). Analysis of the Current Account Balance in the Turkish Economy with NARX: A Non-linear Approach. *Journal of International Trade and Economic Researches*, 6(1), 1–14.

- https://doi.org/10.30711/utead.1081318
- Uchendu, W. C., & Anyanwu, S. O. (2024). Sectoral Utilization of Foreign Exchange and the Policy Implications for Economic Growth in Nigeria (1997 2022). *International Journal of Economic Policy*, 4(1), 27–43. https://doi.org/10.47941/ijecop.1644
- Van, C. Le, Nguyen, V. P., Gauchard-Barbier, A., & Le, D. A. (2019). Government expenditure, external and domestic public debt, and economic growth. *Journal of Public Economic Theory*, 21(1), 116–134. https://doi.org/10.1111/jpet.12324
- Wahyudi, W. (2020). The Relationship Between Government Spending and Economic Growth Revisited. *International Journal of Economics and Financial Issues*, 10(6), 84–88. https://doi.org/10.32479/ijefi.10614
- Wallace, O. I. (2018). External debt and current account adjustments: The role of trade openness. *Cogent Economics and Finance*, 6(1), 1–42. https://doi.org/10.1080/23322039.2018.1446247
- Wang, X. (2022). Expansionary Fiscal Policy, Corporate Governance and Corporate Value. *BCP Business & Management*, 27(1), 27–33. https://doi.org/10.54691/bcpbm.v27i.1948
- Widiastuti, N., Fitrady, A., & Widodo, T. (2023). Assessing Fiscal Sustainability in Indonesia. *Jurnal Ekonomi Dan Studi Pembangunan*, 15(1), 101–123. https://doi.org/10.17977/um002v15i12023p101
- Yi, Y. (2021). An Overview of International Capital Flows and Its Impact on Chinese Financial Market. *Sciences*, 275(E3), 3–7. https://doi.org/10.1051/e3sconf/202127501015
- Zou, X., Sun, L., Lan, T., Fan, C., Liu, S., Zhao, H., & Qiu, J. (2024). The effects of weather factors on road traffic casualties: Analysis on provincial panel data of China from 2006 to 2021. *Heliyon*, 10(17), 1–14. https://doi.org/10.1016/j.heliyon.2024.e36788