

FINANCIAL INFLOWS AND INCLUSIVE DEVELOPMENT IN SUB-SAHARAN AFRICA

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ABSTRACT

In the last decade, sub-Saharan Africa (SSA) has witnessed an influx of foreign cash inflow, which has played a crucial role in financing development projects and stimulating economic growth. However, its impact on inclusive human development in SSA remains a subject of debate. This study investigates the impact of financial inflows on inclusive human development in SSA using annual data from 1990 to 2023. The panel data were analysed using the System Generalized Method of Moments (GMM) estimation technique because of its advantage in taking care of the problem of endogeneity. Inclusive development was captured using the inequality-adjusted human development index to capture adjustments in inequality. The result of the study revealed that foreign direct investments and external borrowing had positive and significant impact on inclusive development in SSA, while remittances and portfolio investments were not significant in explaining inclusive development. The study concludes that foreign direct investments and borrowing have the potential to catalyse inclusive development in SSA. For SSA countries to enhance the developmental impact of financial inflows, the study recommends that financial inflows should be aligned with national development priorities by channelling them towards critical sectors such as education, health and infrastructural investment.

Keywords: Human development index, financial inflows, foreign direct investment, inclusive development

JEL classification: F24, F35, H63, O15

1. Introduction

The COVID-19 pandemic led to a steep decline in global human development as a result of lockdown measures and deep recession in most economies. The World Bank estimated that an additional 26 million to 40 million people would be pushed into extreme poverty (World Bank, 2020). The disruption in economic activities due to the pandemic also led to a drastic loss in tax revenue and domestic savings, especially in developing countries, including sub-Saharan Africa. The pandemic also, exacerbated the challenges in sourcing external financial support for growth and development. For instance, a report by UNCTAD in 2022 shows that capital inflows to low income countries declined from a pre-pandemic high of \$8.3 billion to a mere \$1.2 billion in the second quarter of 2021 (Okpala et al., 2024). The limited ability to mobilize funds for investment has been a major bane to development as poverty, inequality and unemployment continued to worsen, in the region (Adeniyi et al., 2022). Sub-Saharan Africa (SSA) is richly endowed with human and material resources, but despite these great potentials, the region remains the poorest in the world. Countries within the region are riddled with high poverty, unemployment and other macroeconomic vulnerabilities (Ekpo, 2021).

Financial inflows available to a nation include remittance inflows, foreign aid – comprising official development assistance (ODA) and grants, external loans, foreign direct investment (FDI), and foreign portfolio investment (FPI). Cash flows such as foreign aid, FDI and portfolio investment enable multi-national companies to register their physical presence in the host nation. Foreign aid to Africa is about 9.2% of the GDP while workers remittances account for about a third of total external financial inflow to Africa (African Union, 2020). According to UNCTAD, after two years of declines, FDI flows to Africa reached \$46 billion in 2019. This growth was due to an influx of inward resource seekers. The primary FDI destinations in SSA, such as Nigeria, South Africa, Ethiopia, Senegal, Rwanda, and Mozambique, are expected to recover quickly. According to Rao and Hassan (2012), governments borrow money from abroad to balance their budgets. In other words, many SSA economies borrow to finance a large chunk of the country's budget and to service accrued debts. The International Monetary Fund (IMF) and World Bank have loaned over \$150 billion to SSA, yet the

region is still highly underdeveloped (IMF, 2022). Foreign capital inflow is expected to stimulate development where capital/savings accumulation is inadequate for a country with a youthful and innovative population and untapped natural resources (UNCTAD, 2013). Remittances, like other foreign financial inflows, play a vital role in achieving sustainable development but what is not clear is whether the environment is suitable for them to significantly impact SSA because African countries are still ravaged with multidimensional poverty (World Bank, 2022). It has been argued that the growth effects of FDI and other forms of capital on recipient economies are realizable only if certain conditions are met in the host countries (Oaikhenan & Udegbunam, 2008).

Previous studies on financial inflows focused mainly on the impact of single capital inflow on economic growth thereby creating a gap in the literature on the developmental impact of financial inflows. The emphasis on economic growth alone however, has created empirical controversies on the effectiveness of financial inflows on the recipient countries (Depken et al., 2021, Abduvaliev & Bustillo, 2019). Furthermore, a few studies (see Arogundade et al., 2020; Asongu & Leke, 2019) on financial inflows and human development did not consider the roles of external debt and foreign portfolio investment despite the increasing rate of external borrowings by SSA countries. The present study focuses on the impact of different sources of financial inflows (remittances, FDI, external borrowing, foreign aid and foreign portfolio investment) on human development in SSA using panel data from 1990 to 2022 to fill the identified research gaps. This analysis goes beyond the scope used by previous studies and adopts a more robust technique of analysis, the two-step system GMM estimator, due to its value in taking care of the problem of endogeneity of some explanatory variables.

2. Literature Review

External finances can be grouped into two broad categories – official and private capital inflows. In this study, five different sources of foreign capital inflow: foreign direct investments, foreign portfolio investments, foreign aid, external debt or borrowing and migrant remittances, were considered. For the domestic economy to close the savings gap, as well as foreign exchange and fiscal gaps; there must be a substantial inflow of capital from within or

outside the nation (Bacha, 1990). Foreign direct investment has the potential to enhance the domestic economy through the development of human capital, international trade integration, and technology spillover (OECD, 2002). According to Addison and Tarp (2015), financial inflows channelled to healthcare, education, and safe water and sanitation increase developmental inclusion. Remittance inflows promote not only investments, but also boost consumption and at the same increase output and aggregate demand (Pradhan et al., 2008). To support growth and development, external borrowing is also viewed as capital that can be used to fill the funding gap in emerging nations (Eaton, 1993).

2.1 Major external financial inflows into SSA

External capital flows into SSA have significantly improved in the last decade. According to projections, these flows surpassed \$200 billion in 2014, which is a fourfold increase from 2000 (African Economic Outlook [AEO, 2023]. Figure 1 provides an illustration of the progression of the narrative. Over the last ten years, there has been a constant increase in FDI, remittances (REMI), and external debt (ExD) (AEO, 2023). The three aforementioned financial resources are the primary sources of capital from abroad coming into the sub-region.

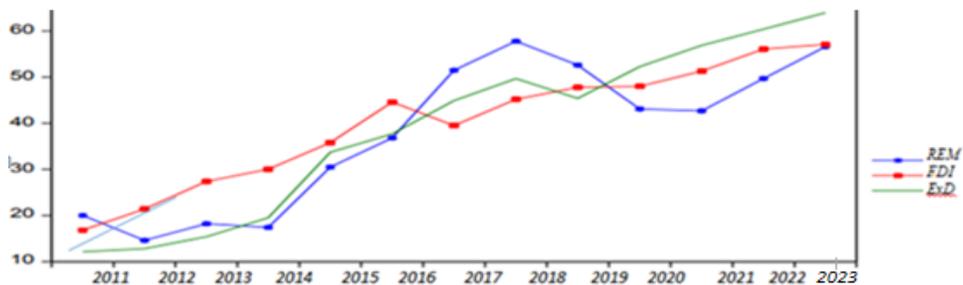


Figure 1: Financial inflows to sub-Saharan Africa (% GDP) 2010-2023

Source: African Economic Outlook (2023).

2.2 External financial inflows and inclusive growth in sub-Saharan Africa

The IMF (2021) states that remittance inflows into SSA increased from 42% in 2010 to 51% in 2018, making them the primary source of external financing in the developing countries. Remittances have exceeded US\$5 billion in FDI and over US\$300 billion in official development assistance (ODA). Sub-Saharan African countries such as Lesotho (15.5%), Cape Verde (12.4%), Liberia (8%), Comoros (7.5%), and Senegal (7.4%) are at the top of the list of countries with sizable remittances relative to GDP. However, receiving nations are not without issues as a result of these financial inflows. Markusen and Venables (1999) assert that FDI has the potential to displace domestic investment. According to Niyonkuru (2016), the receiving countries may develop a mindset of dependency as a result of foreign financial inflows, and its misuse may prevent success. Remittance inflows may lead to a moral hazard issue, which lowers the labour force participation rate (Chami et al., 2003). Moreover, the burden of debt servicing obligations can impede economic growth if borrowed funds are not wisely utilized.

2.3 Theoretical underpinnings

The two-gap model created by Chenery and Strout (1966 as quoted in Todaro & Smith, 2012) serves as the theoretical foundation for this study, which asks whether foreign financial inflows can promote growth. According to the model, the main causes of developing countries' need for foreign financial inflows are the tragedy of poverty and a severe lack of savings. Hence, the relationship between these two factors, external financial inflows and inclusive development, is the tragedy of poverty and the significance of external financial inflows in reducing such poverty. The fundamental idea behind the two-gap concept is that most developing countries are either lacking in foreign exchange to finance imports of intermediate products and necessary capital, or they are not saving enough domestically to support investment opportunities.

Similarly, Asiedu et al. (2012) opined that the Harrod-Domar model underscores the importance of foreign inflows. Bridging the finance gap is very vital for long-term growth; and borrowing as well as development aids from outside sources are the most viable means for the continent to fill this

finance gap. Incidentally, Africa is currently facing financial deficits because the invested capital is less than the required investments needed to achieve sustainable development. According to Asiedu et al. (2012), the shortcomings of the Harrod-Domar model, which is dependent on development assistance, are the main motivating factor behind the need for other types of foreign investments in Africa. Understanding inclusive development in Africa necessitates shifting the emphasis from just structural adjustment measures to the development of human capital in light of the continent's rising rates of poverty. Therefore, determining how to achieve inclusive development requires examining the effects of various external financial inflows on inclusive human development in SSA.

2.4 Empirical literature review

Researchers have carried out a number of empirical studies on the significance of financial inflows in different economies. For instance, Jugurnath et al. (2016) examined the effect of FDI on economic growth in SSA from 2008 to 2014 and discovered that FDI enhances SSA's economic growth. In the same vein, Dinh et al. (2019) in a study of 30 developing countries discovered that FDI slows economic growth in the short term but accelerates growth in the long run. The study used time series data from 2000 to 2014 which was analysed using both fully modified ordinary least square (FMOLS) and the vector error correction model (VECM). In a study examining the relationship between FDI and economic growth in Vietnam from 1997 to 2018, Nguyen (2020) finds a positive and significant relationship between the FDI and economic growth. Joshua et al. (2021) found that FDI significantly contributes to the growth in GDP of SSA countries using data from 1990 to 2018 and the autoregressive distributed lag (ARDL) technique. In contrast, some studies revealed no correlation between FDI and economic growth in Jordan or transition economies (see Louzi & Abadi, 2011; Lyroudi et al., 2004).

Studies on how foreign aid affects growth are also available. Yiew and Lau (2018) examined how official development assistance affected economic growth in 95 different countries. Using the fixed effect, random effect, and pooled OLS estimation techniques, they discovered that while foreign aid initially hindered economic growth, over time it had a positive influence.

Kargbo and Sen (2014), using the bounds test approach, found that foreign aid played an efficient role in the pro-poor growth of Sierra Leone. Using FMOLS and dynamic OLS, Moolio and Kong (2016), in a study of the Association of South-East Asian Nations (ASEAN), found that foreign aid positively impacted the growth of the sampled countries from 1997 to 2014.

Adedokun (2017) used the generalized method of moments (GMM) to examine the relationship between foreign aid and economic growth in SSA from 1996 to 2012. The study discovered that foreign aid had an insignificant negative impact on economic growth. They identified governance practices and the level of foreign aid as critical indicators for delivering effective foreign aid in SSA. Sothan (2017) in a study on how foreign aid affects economic growth in Cambodia, maintains that foreign aid is only advantageous in the short term and not in the long run. Yahyaoui and Bouchoucha (2021) however argue that the detrimental impact of foreign aid on economic growth is mitigated by its interaction with institutional quality. This suggests that with the right institutions, foreign aid can be successful in promoting economic growth.

Abduvaliev and Bustillo (2019) investigated the effect of remittances on economic growth and poverty reduction in the Commonwealth of Independent States (CIS) from 1998 to 2016 and discovered that remittances had a considerable beneficial impact on economic growth during the period. On the contrary, Oshota and Badejo (2014) concluded that remittance inflows slowed economic growth in Nigeria. Olayungbo and Quadri (2019) on the other hand discovered that remittances had a positive and significant impact on economic growth in both the short and long run. Adjei et al. (2021), in a study on the relationship between remittance inflows and economic growth, concentrated on West African countries from 2004 to 2018 while Depken et al. (2021) studied Croatia, and both studies conclude that there is a causal link between remittance inflows and economic growth. This implies that remittances play an essential role in a country's economic growth. Their study contradicts Sutradhar (2020) who found that remittances hampered economic growth in Bangladesh, India, and Sri Lanka from 1977 to 2016.

Another important source of financial inflows is borrowing or debt from outside sources. Joshua et al. (2020) used time series data from 1981 to 2018 using the ARDL technique to study the effect of external debt on the South

African economy. Their conclusion demonstrates that external debt boosted growth in the economy. Senadza et al. (2018) also used a panel of 39 nations to study the impact of external debt on economic growth in SSA between 1990 and 2013. Using the GMM estimation technique, the result showed that external debt hinders economic growth in SSA countries. Joshua et al. (2021) studied the relationship between FDI and economic development and found a negligible effect. This result contradicts previous studies that found FDI to have a significant impact on economic growth. This is understood bearing in mind that economic development is deeper than economic growth.

The empirical literature review shows that, despite conflicting results, a great deal of attention has been given to the relationship between some financial inflows such as FDI, remittances and foreign aid, and economic growth. Surprisingly, little is known about empirical examination of the effect of foreign debt and foreign portfolio investments on development despite SSA countries' reliance on borrowing. Hence, there is a need to explore the extent to which different forms of foreign capital inflows contribute to inclusive human development in SSA. The present study addresses the identified gap by estimating how financial inflows such as remittances, foreign aid, FDI, debt and foreign portfolio investment affect inclusive human development in SSA. In addition, this study used the two-step system GMM estimation technique on panel data for 44 SSA countries spanning 1990 to 2022, thereby broadening the scope of previous studies. Understanding the developmental impact of foreign capital inflows is important for policy makers seeking to design strategies that will maximize the positive impact of external financial resources.

3. Methodology

This study investigates how financial inflows contribute to inclusive human development in sub-Saharan African countries, using panel data from 44 countries in SSA based on data availability. Financial inflows include foreign direct investment, remittances, foreign aid (captured using official development assistance), portfolio investments, and borrowing. The data were analysed using the system GMM estimator, a dynamic econometric model.

3.1 Model specification and estimation technique

3.1.1 Model Specification

The theoretical framework is predicated on the idea that more capital inflows result in increased economic development and growth. Therefore, using a basic endogenous growth model, where output is a linear function of capital, the relationship between capital inflows and growth can be explained as follows:

$$Y = AK \quad (1)$$

A surge of capital inflows means a larger pool for investment and growth. If income is properly channelled, it will lead to development. From the theoretical framework, the study adopts the following model to examine how financial inflows affect inclusive human development.

$$IHDI_{i,t} = \delta_0 + \delta_1 RMI_{i,t} + \delta_2 FDI_{i,t} + \delta_3 ODA_{i,t} + \delta_4 EXB_{i,t} + \delta_5 FPI_{i,t} + \delta_6 GDPp_{i,t} + u_{i,t} \quad (2)$$

where, *IHDI* is inequality adjusted human development index.

Consistent with recent studies on inclusive development, *IHDI* was used as a proxy for inclusive human development (Huang & Quibria, 2013; Asongu et al., 2015). The explanatory variables are remittance inflows (*RMI*), foreign direct investment (*FDI*), foreign aid captured using official development assistance (*ODA*), external borrowing (*EXB*), and foreign portfolio investment (*FPI*); while real gross domestic product per capita (*GDPp*) is the control variable. Previous empirical research on foreign financial inflows, including Olayungbo and Quadri (2019), Adedokun (2017), and Yahyaoui and Bouchoucha (2021), have extensively used these variables. Individual country is represented by *i* at time *t*, δ_0 is the intercept, $\delta_1 - \delta_6$ are the parameters to be estimated. Data that were not in percentages were logged. The *u* term is the stochastic error term with the usual properties of normality, zero mean and constant variance. Variable measurements and sources are presented in Table 1.

Table 1: Variable Description, Measurement and Sources

| Variable | Descriptions/Measurements | Sources |
|--|---|----------------------------------|
| Dependent variable | | |
| Inequality adjusted human development index (IHDI) | captures the level of human development while adjusting for inequality in health, education and income. | UNDP, 2023 |
| Independent variables | | |
| Remittance inflows (REMI) | personal transfers (% of GDP) | IMF World Economic Outlook, 2024 |
| Foreign direct investment (FDI) | net inflows (% of GDP) | |
| External borrowing (ExB) | external debt inflows (% of GDP) | |
| Foreign portfolio investment (FPI) | net inflows (% of GDP) | |
| Official development assistance (ODA) | (constant 2021 US\$) | |
| Control variables | | |
| GDP per capita | (constant 2021 international \$) | WDI, 2023 |

Source: Authors' compilation, (2024)

3.1.2 *Estimation Technique*

This panel study covering 44 SSA countries (see Appendix) was analysed using the generalized method of moments (GMM). It should be noted that there are two basic approaches to the application of the GMM model; the first-difference GMM estimator and the system GMM estimator. The first-difference GMM is usually associated with some statistical problem such as weak instruments, provoked by highly persistent regressors (Bond et al., 2001 as cited in Metu et al., 2019). The system-GMM estimator is expected to overcome this problem by estimating a system of two simultaneous equations. It integrates the first difference and level equations, using the lagged levels of the explanatory variables as the level equations' instruments (Blundell & Bond, 1998). Hence, this study adopts the two-system GMM estimator due its greater efficiency over a one-step system GMM.

4. Empirical Results and Discussions

4.1 Descriptive statistics

The descriptive statistics of the variables were estimated in order to show variables distribution in its raw state and the summary is presented in Table 2. Foreign portfolio investment had the lowest mean value (0.004) for the

selected SSA countries. The results also show that the mean and median values did not differ much. The data showed an asymmetric distribution, with gross domestic product per capita, foreign portfolio investment and external borrowing having more than two units off the mean value. Similar to foreign direct investment, the mean and median of remittance inflows were relatively close, indicating low variability and a nearly symmetric distribution.

Also, every series had a probability value less than 0.05%, which means that at the 5% level of significance, the null hypothesis of normal distribution is rejected. This can be attributed to the cross-sectional and heterogeneous nature of the data. The use of panel data will however take care of these problems during the estimation process.

Table 2: Summary of Descriptive Statistics

| | IHDI | REM | FDI | ODA | EXB | FPI | GDPp |
|--------------|----------|----------|----------|-----------|----------|-----------|-----------|
| Mean | 0.358172 | 4.810118 | 3.993136 | 0.099608 | 76.66662 | 0.004088 | 5256.974 |
| Median | 0.338000 | 1.829988 | 2.325365 | 0.007958 | 51.27249 | 2210290. | 3584.098 |
| Maximum | 5.708000 | 134.9337 | 247.7431 | 0.000135 | 3843.311 | 0.000274 | 29468.95 |
| Minimum | 0.012882 | 0.000000 | 0.001280 | -19549999 | 0.000000 | 0.000000 | 231.2241 |
| Std. Dev. | 0.238048 | 13.23357 | 11.21125 | 0.009988 | 172.0273 | 0.001809 | 4948.062 |
| Skewness | 19.48033 | 6.851274 | 18.02297 | 4.189071 | 18.20185 | 8.113357 | 2.071489 |
| Kurtosis | 437.6405 | 56.69058 | 384.8966 | 45.15819 | 394.6653 | 97.56691 | 7.272182 |
| Jarque-Bera | 4641739. | 74841.93 | 3586643. | 45032.97 | 3771468. | 224401.3 | 863.2600 |
| Probability | 0.000000 | 0.000000 | 0.000000 | 0.000000 | 0.000000 | 0.000000 | 0.000000 |
| Sum | 209.5309 | 2813.919 | 2335.984 | 0.000583 | 44849.97 | 0.0002311 | 3075330. |
| Sum Sq. Dev. | 33.09344 | 102274.4 | 73404.24 | 5.82E+20 | 17282532 | 0.0008921 | 0.0000110 |
| Observations | 585 | 585 | 585 | 585 | 585 | 585 | 585 |

Source: Authors' estimation (2024).

From Table 3, remittance inflow is the only variable that showed negative correlation with inclusive development (*IHDI*) while other variables indicated

positive correlation with human development. It can be observed that none of the variables is above 0.80, which shows that the variables are not correlated.

Table 3: Correlation Matrix

| | IHDI | REM | FDI | ODA | EXB | FPI | GDPp |
|------|-----------|-----------|-----------|-----------|-----------|----------|----------|
| IHDI | 1.000000 | | | | | | |
| REM | -0.032640 | 1.000000 | | | | | |
| FDI | 0.320927 | -0.006897 | 1.000000 | | | | |
| ODA | 0.460532 | -0.166467 | 0.471214 | 1.000000 | | | |
| EXB | 0.449853 | -0.037196 | 0.354435 | 0.453196 | 1.000000 | | |
| FPI | 0.049118 | -0.062363 | -0.023634 | -0.008946 | -0.032351 | 1.000000 | |
| GDPp | 0.130120 | -0.160031 | -0.035035 | -0.206334 | -0.043829 | 0.331203 | 1.000000 |

Source: Authors' estimation, (2024).

4.2 Panel unit root tests

Before the regression is estimated, the time series properties of the variables must be checked to correctly apply the appropriate panel regression technique which is most suitable for variables that are integrated of I(0) and purely I(1) and not for I(2) (Pesaran, Shin & Smith, 2001). Hence, the panel unit root test was performed using the Augmented Dickey Fuller-Fisher Chi-square. The decision rule is to reject H_0 if the absolute value is greater than the 5% critical value, otherwise it is accepted. The panel unit root test result is presented in Table 4.

Table 4: Unit root test

| Variables | ADF test at levels | 5% critical value at level | ADF test (first diff.) | 5% critical value (first diff.) | Order of integration | Remarks |
|-----------|--------------------|----------------------------|------------------------|---------------------------------|----------------------|------------|
| IHDI | (-1.402131) | (-2.864432) | (-4.268808) | (-2.864734) | I(1) | Stationary |
| REM | (-7.757873) | (-2.863573) | | | I(0) | Stationary |
| FDI | (-11.41156) | (-2.863377) | | | I(0) | Stationary |
| ODA | (-8.904203) | (-2.863342) | | | I(0) | Stationary |
| EXB | (-14.74038) | (-2.863530) | | | I(0) | Stationary |
| FPI | (-6.209616) | (-2.869134) | | | I(0) | Stationary |
| GDPp | (-5.98478) | (-2.863273) | | | I(0) | Stationary |

Source: Authors' estimation (2024).

Table 4 shows that from the unit root result, the variables have mixed order of integration $I(0)$ and $I(1)$. Inclusive human development (*IHDI*) is the only variable that is stationary at the first difference. Other variables such as remittance inflows (*REM*), official development assistance (*ODA*), external borrowing (*EXB*), foreign portfolio investment (*FPI*) and gross domestic product per capita (*GDPp*) were stationary at levels.

4.3 The results of the GMM system estimation

The panel system GMM estimation results of this study are presented in Table 5.

Table 5: General Method of Moment Analysis

Dependent Variable: LOG(IHDI)

| Variable | Coefficient | Std. Error | t-Statistic | Prob. |
|--------------------|-------------|--------------------|-------------|----------|
| IHDI(-1) | 0.801493 | 0.070226 | 11.41299 | 0.0000 |
| REM | 0.000276 | 0.000172 | 1.607753 | 0.1085 |
| FDI | 0.011296 | 0.002127 | 5.311870 | 0.0000 |
| ODA | 0.022711 | 0.004612 | 4.929483 | 0.0000 |
| EXB | 0.000544 | 0.000125 | 4.352911 | 0.0000 |
| FPI | 0.001912 | 0.027912 | 0.680854 | 0.4963 |
| GDPp | 0.068007 | 0.014506 | 0.470693 | 0.6381 |
| C | -0.023583 | 0.026508 | -0.889645 | 0.3741 |
| R-squared | 0.875832 | Mean dependent var | | 0.361453 |
| Adjusted R-squared | 0.874192 | S.D. dependent var | | 0.246874 |
| S.E. of regression | 0.087565 | Sum squared resid | | 4.063809 |
| Durbin-Watson stat | 1.687586 | J-statistic | | 12.95854 |
| Instrument rank | 9 | Prob(J-statistic) | | 0.000318 |

Source: Authors' estimation, (2024)

From Table 5, remittances had a coefficient of 0.00028, which implies that a 1% increase in remittance inflows to SSA will cause an insignificant increase in inclusive human development by 0.028%. This insignificant value could be attributed to the fact that most diaspora remittances coming to SSA

are not recorded because they come in through informal channels. This finding supports those of Abduvaliev and Bustillo (2019), Olayungbo and Quadri (2019), and Adjei et al. (2021) who found that remittances had a positive impact on development and growth. However, contrasts with Chami et al. (2012), Oshota and Badejo (2014), and Sutradhar (2020), who found a negative relationship between remittance inflows and development.

Foreign direct investment had a positive and significant impact on human development. This positive relationship with inclusive development means that an increase in foreign direct investment will increase inclusive development significantly. When foreign direct investment is properly targeted towards infrastructural development, it will promote human development through spillover from technological transfers. The result is also in line with previous studies such as Jugurnath et al. (2016) and Nguyen (2020) who found a positive and significant relationship between foreign direct investment and economic development in SSA. However, this finding differs from those of Dinh et al. (2019) and Joshua et al. (2021) who found a positive but insignificant impact of foreign direct investment on economic development in SSA. The disparities in the findings may be attributed to the differences in the scope of study.

Similarly, official development assistance had a positive coefficient (0.023) which shows that a 1% increase in inflow through official development assistance will significantly increase inclusive development in the SSA by 2.3%. This result could be a spillover of foreign aid which is often targeted at development projects by the donor agencies. The finding supports those of Yiew and Lau (2018), Moolio and Kong (2016), and Kargbo and Sen (2014), but is at variance with the findings of Yahyaoui and Bouchoucha (2021), Adedokun (2017), and Sothan (2017), who concluded that an increase in the inflow of official development assistance affects development negatively.

External borrowing had a positive coefficient of 0.0005 and a significant probability value showing that it affects human development. Hence an increase in external borrowings in SSA will significantly increase inclusive human development in the region by 0.05%. This outcome shows that if borrowed funds are properly managed and invested more in productive purposes, they would improve human development in SSA. This result is in

line with the findings of Joshua et al. (2020) who found a positive and significant impact of debt on development in SSA countries. However, it is at variance with the findings of Senadza et al. (2018), Kharusi and Ada (2018), and Onakoya and Ogunade (2017), who found a negative and insignificant impact of borrowing on economic growth. On the other hand, foreign portfolio investment had a positive and insignificant impact on human development. The coefficient of 0.019 indicates that a 1% increase in portfolio investment will cause an insignificant increase of 0.19% on inclusive development in SSA. Moreover, GDPp had a positive and insignificant impact on inclusive human development in the region. With a coefficient of 0.068, it suggests that, during this period, a percentage increase in GDP per capita, led to an insignificant effect on inclusive human development (IHDI) in SSA. This is in line with the most current research on inclusive human development by Asongu and Odhiambo (2020). Generally, the result also shows that about 87% of the dependent variable is explained by the independent variables, given the R-square and adjusted R-square values of 0.875 and 0.874 respectively.

5. Summary and Recommendations

This study investigated the impact of financial inflows on inclusive human development in SSA from 1990 to 2023. Panel data from 44 SSA countries were analysed using the system GMM estimator. Inclusive human development is development that will promote equitable, inclusive and integrated development, hence, it was captured using inequality-adjusted human development index. The disruption in economic activities has affected the ability of SSA countries to mobilize domestic funds needed for development, hence there is a need to fill the financing gap using foreign capital inflows. Financial inflows captured in this study include remittances, foreign direct investment, official development assistance, foreign portfolio investment and external borrowing.

The results indicate that different measures of external financial inflow had different impacts on inclusive human development in SSA within the study period. Portfolio investments and remittances were not significant in enhancing inclusive human development in SSA. On the other hand, external borrowing, foreign direct investment and foreign aid had positive and

significant impacts on inclusive human development in the region. From the results, inclusive human development in the previous year had the highest significant impact on present inclusive human development. We conclude that financial inflow is needed in SSA to achieve inclusive human development. Hence, enhancing these positive channels of financial inflows should become the major concern of the policy makers in the region. Based on the findings, it is recommended that SSA countries can promote sustainable, equitable and inclusive development by creating incentive frameworks to attract remittances to productive investments. This can be achieved by reducing the transaction costs for remittances so that more funds can reach recipient households. The government should align these foreign inflows with national development priorities such as health, education, infrastructural development and other national development projects. This paper suggests that further studies on foreign financial inflows and human development should examine the role of institutions for better understanding and robust policy analysis due to disparities in governance in the different economies.

References

- Abduvaliev, M., & Bustillo, R. (2019). Impact of remittances on economic growth and poverty reduction amongst CIS countries. *Post-Communist Economies*, 1–22. Retrieved from <https://doi.org/10.1080/14631377.2019.1678094>
- Addison, T., & Tarp, F. (2015). Aid policy and the macroeconomic management of aid. *World Development*, 69, 1-5.
- Adedokun, A. J. (2017). Foreign aid, governance and economic growth in sub-Saharan Africa: Does one cap fit all? *African Development Review*, 29(2), 184-196.
- Adeniyi, O., Adegbite, A., & Yusuf, A. (2022). Mobilizing investment resources for inclusive development in Sub-Saharan Africa: Challenges and prospects. *Journal of African Development Studies*, 34(2), 45–60.
- Adjei, M., Bo, Y., Nketiah, E., Adu-Gyamfi, G., & Obuobi, B. (2020). The effects of remittances on economic growth in West Africa. *Journal of Human Resource and Sustainability Studies*, 8(3), 312-329.
- African Economic Outlook, AEO. (2023). *Africa and its Emerging Partners*. Abidjan: African Development Bank (AfDB).
- African Union. (2020). African continental free trade area. Addis Ababa: African Union.

- Arogundade, S., Biyase, M., & Eita, H. (2021). *Foreign direct investment and inclusive human development in sub-Saharan African countries: Does local economic conditions matter?* Economic and Well-being Research Group.
- Asiedu, E., Freeman, J.A., & Nti-Addae, A. (2012). Access to credit by small businesses: How relevant are race, ethnicity, and gender? *American Economic Review*, 102(3), 532-537.
- Asongu, S., Efobi, U., & Beecroft, I. (2015). Inclusive human development in pre-crisis times of globalization-driven debts. *African Development Review, African Development Bank*, 27(4), 428-442.
- Asongu, S.A., & Leke, I.J. (2019). External flows and inclusive human development in sub-Saharan Africa. *International Journal of Happiness and Development*, 5(1), 33-56.
- Asongu, S.A., & Odhiambo, N.M., (2020). Income levels, governance and inclusive human development in sub-Saharan Africa. *Applied Research in Quality of Life*, DOI: 10.1007/s11482-019-09755-8.
- Bacha, E.L. (1990) A three-gap model of foreign transfers and the GDP growth rate in developing countries. *Journal of Development Economics*, 32, 279-296.
- Blundell, R., & Bond, S. (1998). Initial conditions and moment restrictions in dynamic panel data models. *Journal of Econometrics*, 87(1), 115-143
- Bond, S.R., Hoeffler, A., & Temple, J.R. (2001). GMM estimation of empirical growth models. Available at SSRN 290522.
- Chami, R., Fullenkamp, C., & Jahjah, S. (2003). *Are immigrant remittance flows a source of capital for development?* IMF Working Paper WP/03/189. <https://www.imf.org/external/pubs/ft/wp/2003/wp03189.pdf>
- Depken, C.A. II, Nikšić Radić, M., & Paleka, H. (2021). Causality between foreign remittance and economic growth: Empirical evidence from Croatia. *Sustainability*, 13, 12201.
- Dinh, T.T.H., Vo, D.H., The Vo, A., & Nguyen, T.C. (2019). Foreign direct investment and economic growth in the short run and long run: Empirical evidence from developing countries. *Journal of Risk and Financial Management*, 12(4), 176.
- Eaton, J. (1993). Sovereign debt: A primer. *World Bank Economic Review*, 7(2), 137–172.
- Ekpo, A.H. (2021). Governance, growth and development in sub-Saharan Africa: A revisit of the evidence. *The Nigerian Journal of Economic and Social Studies*, 63(2), 153-186.
- Huang, Y., & Quibria, M.G. (2013). *The global partnership for inclusive growth*. WIDER Working Paper No. 2013/059.
- International Monetary Fund. (2022). Regional Economic Outlook: Sub-Saharan Africa, Navigating Headwinds. *World Economic and Financial Surveys*, 0258-7440.
- International Monetary Fund (IMF). (2021). World Economic Outlook Database.
- International Monetary Fund (IMF). (2024). *World Economic Outlook Database, April 2024*. International Monetary Fund. <https://www.imf.org/en/Publications/WEO/weo-database/2024/April>

- Joshua, U., Babatunde, D., & Sarkodie, S.A. (2021). Sustaining economic growth in sub-Saharan Africa: Do FDI inflows and external debt count? *Journal of Risk and Financial Management, 14*(4), 146.
- Jugurnath, B., Chuckun, N., & Fauzel, S. (2016). Foreign direct investment and economic growth in sub-Saharan Africa: An empirical study. *Theoretical Economics Letters, 6*(4), 798-807.
- Lyroudi, K., Papanastasiou, J., & Vamvakidis, A. (2004). Foreign direct investment and economic growth in transition economies. *South-Eastern Europe Journal of Economics, 2*(1), 97-110.
- Kargbo, P. M., & Sen, K. (2014). Aid categories that foster pro-poor growth: The case of Sierra Leone. *African Development Review, 26*(2), 416-429. <https://ideas.repec.org/a/bla/afrdev/v26y2014i2p416-429.html>
- Kharusi, S.A., & Ada, M.S. (2018). External debt and economic growth: The case of emerging economy. *Journal of Economic Integration, 33*(1), 1141-1157.
- Louzi, B.M., & Abadi, A. (2011). The impact of FDI on economic growth in Jordan. www.arpapress.com/volumes/vol8issue2/IJRRAS_8_2_16.pdf
- Markusen, J.R., & Venables, A.J. (1999). Foreign direct investment as a catalyst for industrial development. *European Economic Review, 43*(2), 335-356.
- Metu, A.G., Maduka, O.L., Eze, A.E., & Ajudua, E. (2019). Impact of fiscal policy on inclusive growth in Nigeria. *African Journal of Sustainable Development, 9*(2), <https://www.ajol.info/index.php/ajsd/article/view/205972e>
- Moolio, P., & Kong, S. (2016). Foreign aid and economic growth: Panel cointegration analysis for Cambodia, Lao PDR, Myanmar, and Vietnam. *Athens Journal of Business and Economics, 2*(4), 417-428.
- Nguyen, C.H. (2020). The impact of foreign direct investment, aid and exports on economic growth in Vietnam. *The Journal of Asian Finance, Economics and Business, 7*(10), 581-589.
- Niyonkuru, F. (2016). Failure of foreign aid in developing countries: A quest for alternatives. *Business and Economics Journal, 7*(3), 1-9.
- Oaikhenan, H.E., & Udegbonam, R.I. (2008). Openness, capital flows and economic growth in Nigeria: Empirical evidence. *The Nigerian Journal of Economic and Social Studies, 50*(2), 257-281.
- OECD. (2002). Foreign direct investment for development: Maximising benefits, minimising costs. <https://www.oecd.org/investment/investmentfordevelopment/1959815.pdf>
- Okpala, J.C., Aduku, E.B., Nwokoye, E.S., & Nwogwugwu, U.C. (2024). Capital inflows and Nigeria's transformation recovery. *The Nigerian Journal of Economic and Social Studies, 66*(1), 69-93.

- Olayungbo, D.O., & Quadri, A. (2019). Remittances, financial development and economic growth in sub-Saharan African countries: Evidence from a PMG-ARDL approach. *Financial Innovation*, 5(1), 1-25.
- Onakoya, A.B., & Ogunade, A.O. (2017). External debt and Nigerian economic growth connection: Evidence from autoregressive distributed lag approach. *Journal of Economics and Development Studies*, 5(1), 66-78.
- Oshota, S.O., & Badejo, A.A. (2014). The impact of remittances on economic growth in Nigeria: An error correction modeling approach. *Zagreb International Review of Economics and Business*, 17(2), 21-43.
- Pradhan, G., Upadhaya, M. and Upadhaya, K. (2008). Remittances and economic growth in developing countries. *The European Journal of Development Research*, 20, 497-506.
- Rao, B.B. & Hassan, G.M. (2012). Are the direct and indirect effects of remittances significant? *The World Economy*, Wiley Blackwell, 35(3), 351-372. <https://ideas.repec.org/a/bla/world/v35y2012i3p351-372.html>
- Senadza, B., Fiagbe, A.K. & Quartey, P. (2018). The effect of external debt on economic growth in sub-Saharan Africa. *International Journal of Business and Economic Sciences Applied Research (IJBESAR)*, 11(1), 61-69.
- Sothan, S. (2017). Causality between foreign direct investment and economic growth for Cambodia. *Cogent Economics & Finance*, 5(1), 1277860.
- Sutradhar, S.R. (2020). The impact of remittances on economic growth in Bangladesh, India, Pakistan and Sri Lanka. *International Journal of Economic Policy Studies*, 14(1), 275-295.
- Todaro, M.P., & Smith, S.C. (2012). *Economic development*. Pearson UK.
- United Nations Conference on Trade and Development. (UNCTAD, 2013). Trade and development report 2013: Growth, structural transformation and policy challenges (UNCTAD/TDR/2013). UNCTAD.
- World Bank. (2020). *Poverty and shared prosperity 2020: Reversals of fortunes*. October. Washington DC: World Bank.
- World Bank. (2022). *Remittances remain resilient but likely to slow*. United States: World Bank. <https://www.knomad.org/publication/migration-and-development-brief-38>
- Yahyaoui, I., & Bouchoucha, N. (2021). The long-run relationship between ODA, growth and governance: An application of FMOLS and DOLS approaches. *African Development Review*, 33(1), 38-54.
- Yiew, T.H., & Lau, E. (2018). Does foreign aid contributes to or impeded economic growth. *Journal of International Studies*, 11(3), 21-30.

Appendix

List of countries selected for the study

Angola, Benin, Botswana, Burkina Faso, Burundi, Cape Verde, Cameroon, Central African Republic, Chad, Comoros, Democratic Republic of Congo, Côte d'Ivoire, Ethiopia, Equatorial Guinea, Gabon, Gambia, Ghana, Guinea, Guinea Bissau, Kenya, Lesotho, Liberia, Malawi, Madagascar, Mali, Mauritania, Mauritius, Mozambique, Namibia, Niger, Nigeria, Rwanda, Sao Tome & Principe, Senegal, Sierra Leone, South Africa, Sudan, Seychelles, Tanzania, Togo, Uganda, Zambia, Zimbabwe