

# The Implication of Financial Globalization on the Economic Growth of Cameroon

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## ABSTRACT

Capital account liberalization characterized by the free flow of capital into and out of an economy, has increased rapidly in recent years. This increase can potentially influence performance in trade, investment and the economy as a whole, through technological transfer. In this respect, this study aimed at examining the effect of financial globalization on the economic growth of Cameroon. The data for the study was collected from the World Development Indicators of the World Bank and the International Financial Statistics of the International Monetary Fund from 1970-2014. The estimation was carried out using the Ordinary Least Squares Technique. The results of the study showed that financial globalization has a positive and statistical significant effect on the economic growth of Cameroon. Other results indicated that the growth rate of Cameroon rate has been influenced positively by both human and physical capital. The study therefore recommends that government should pursue policies aim at liberalizing the capital account operations.

**KEYWORDS:** *Financial Globalization, Growth, Cameroon*

**JEL:** *F14, F21, F40*

## 1. Introduction

The wave of globalization since the mid-1980s has been marked by a surge in capital flows among industrial countries and more notably, between industrial and developing countries (Prasad et al., 2005). In fact, no economy wants to live in isolation, as many foster to engage in international economic relations. These capital flows have been associated with high growth rates in some developing countries, while a number of countries have experienced periodic collapse in growth rates and significant financial crises over the same period. Financial globalization is a vital engine for middle income emerging economies that intends to achieve sustainable high levels of income and stability as their counterparts in the advanced economies (Summers, 2000). Furthermore, Obstfeld (2008) points out that in the long term a financial system which is open internationally is likely to be more competitive, transparent and efficient in allocating scarce resources. This notwithstanding, many researchers (Stiglitz, 2002; Rodrik, 1998) hold strongly that financial globalization embodies large risks which far outweigh anticipated benefits. In this respect, financial globalization can produce crisis, instability and losses, which are reflected in the abrupt adjustments in exchange rate, damages in the economic structure and in the prices, with inflation and low salaries. This argument is supported by the numerous financial crises experienced in the world, notably the 2009 world financial crisis.

Financial globalization can be considered as a means through which financial markets of the various countries of the globe are integrated. This can facilitate the free movement of financial resources across national boundaries without facing any restrictions (Eichengreen and Bordo, 2002). Accordingly, financial globalization accompanied by capital account liberalization permits the free movement of financial resources across national frontiers, for an efficient global allocation of resources into their most productive uses so as to spur economic growth and reduce extreme poverty and global imbalances. Measures of the De jure (capital controls) and De facto (financial flows/stocks) are used to assess the extent of a country's financial openness or integration with the rest of the global economy. The differences between them are important when assessing and evaluating the effects of financial integration.

In most empirical studies, the De jure measures have been used which is based on legal restrictions on cross border capital flows to assess the degree of financial openness. Such controls take the form of; controls on inflows versus outflows; quantity versus price controls and restrictions on foreign equity holdings based on information from the IMF's Annual Report on Exchange Arrangements and Exchange Restrictions ( AREAER)

developed by Quinn (1997), Miniane (2004), Chinn and Ito (2002), Mody and Murshid (2005) and Edwards (2005). Some researchers used a “shared” measure, reflecting the fraction of years in the sample in which a country’s capital account was opened. On the other hand, De facto measures are quantity-based measures of integration using actual flows or realized capital flows due to a country’s De facto integration with the global financial markets. In this respect, it is important to determine whether integration can be measured using gross flows (the sum of total inflows and total outflows) or net flows (the difference between inflows and outflows). However, the choice is a function of the precise issue one is interested in addressing. A more direct measure of financial integration or openness is based on estimated gross stock of foreign assets and liabilities as a ratio to GDP. This preserves the sense of measuring De facto integration and removes many of the problems associated with flow data (such as volatility, and measurement errors). For some purposes, such as the analysis of risk sharing, stock measures are more appropriate.

The role of financial integration has increased the international debate on economic and social issues. This is reflected by the fact that there is commonality of interests between high incomes and low incomes countries in solving the problems that transcend national boundaries. Issues such as extreme poverty, indebtedness, underdevelopment, trade imbalance, refugee population, organized crime, drug trafficking and AIDS are seen as global problems requiring co-ordinated action. Likewise the liberalization of the capital account, openness of the labour, good and capital markets occurred since the mid-1980s. Thus, the integration of the global economy to enhance the free flow of goods, services and financial resources (such as Foreign Direct Investment (FDI), remittances, foreign loans) are essential for promoting economic growth and development in poor countries. This flow however, has not significantly reduced the growing inequality between the developed and the developing countries. As a result, there has been an intense debate in both academic and policy circles on the effects of financial globalization in both developed and developing economies.

It is against this backdrop that the objective of this study is to examine the effect of financial globalization on the economic growth of Cameroon using Ordinary Least Squares (OLS) estimation technique. The rest of the paper is organized as follows; the section on literature review makes an overview of the existing empirical literature on the effect of financial globalization on economic growth, while the section on estimation framework and data description presents the estimation methodology and describes the data used in the analyses. The empirical results obtained through the OLS are presented and discussed in section four, while the last section presents the conclusion and policy implications of the study.

## 2. Literature Review

Globalization is the process of increased integration and interdependence of countries, their people, governments and private sectors, economically, socially, politically, technologically and culturally. Financial globalization is therefore the liberalization of national financial and capital markets for the free flow of cross-border capital. The cross-border capital include; debts, portfolio equity and direct investment-based financing. Gerd (2007) points out that global gross capital flows in 2000 amounted to 7.5 trillion dollars, a fourfold increase over 1990. The growth in cross-border capital also resulted in larger net capital flows, rising from 500 billion dollars in 1990 to 1.2 trillion dollars in 2000. United Nations (2000) report that FDI inflows by transnational corporations rose to 865 billion dollars in 1999 and have surpassed 1 trillion dollars in 2000. Through private direct investment, developing countries are participating more than ever before in the global production network which according to the United Nations (2000) consisted of 63,000 transnational corporations worldwide with around 690,000 foreign affiliates producing about 14 trillion dollars of goods and services in 1999.

Capital account liberalization which can be considered as a process of allowing a free flow of funds in and out of a country’s economy is an essential step in the process of economic development (Prasad et al., 2008). Liberalizing the capital account is an inevitable step along the path of economic development for capital poor countries. Capital account liberalization would permit financial resources to flow from capital-abundant countries where expected returns are low to capital-scarce countries where expected returns are high. The flow of resources into the liberalizing countries would reduce their costs of capital, increase investment and raise outputs (Fischer, 1998). However, international capital flow tends to be highly sensitive to the conduct of macroeconomic policies, the perceived soundness of the domestic banking system and unforeseen economic and political development. These are likely to influence the flow of funds into and out of a capital-needy economy and thus affect economic growth and development.

On the empirical front, studies have been conducted to systematically examine whether financial integration has an effect on economic growth. The findings have been mixed depending on the study. Some of the studies found that financial globalisation have no effect on economic growth (Alesina, Grilli, and Milesi-Ferretti, 1994; Grilli and Milesi-Ferretti, 1995; Rodrik, 1998). Grilli and Milesi-Ferretti (1995) examined the relationship between capital account restrictions and growth using a sample of 61 countries and a five-yearly panel pooled IV estimation technique. Their results showed no evidence of a robust correlation between capital account restrictions with growth. A similar result is obtained by Rodrik (1998) while conducting a cross-section OLS study for 95 countries to examine the effect of financial openness on growth. Rodrik measured financial openness using a binary index to capture capital controls and obtained results that showed that financial openness had no significant effect on economic growth. Meanwhile, Arteta, Eichengreen and Wyplosz (2001) obtained results showing that financial integration has a positive effect on economic growth for rich and middle income countries. Klein and Olivei (2000) studying developed and developing countries found results indicating that financial globalisation had a positive and statistical significant effect on growth in Developed countries while in developing countries the effect was positive but statistically insignificant

Other studies (Quinn, 1997; Klein and Olivei, 2000; Bekaert, Harvey and Lundblad, 2001; Quinn and Toyoda 2008) have obtain results indicating that globalization of the financial sector has a positive effect on economic growth. Employing a finer and more informative version of the same de jure openness measure, Quinn and Toyoda (2008) used a better de jure measure of financial globalization and obtained results supporting a significant and positive effect existing between capital account liberalization and economic growth. Vanassche (2004) in a cross section study involving 45 countries obtained results showing that financial openness has a positive and significant effect on sectoral value added growth. However, the results showed that the effect is greater for sectors that depend more on external financing. Edwards (2001) and Edison et al. (2004) also obtained results that showed that financial liberalization has a positive influence on economic growth.

The review above clearly shows that the effect of financial globalization is mixed. Though there is evidence to show that a positive effect exists between financial globalization and economic growth, the effect seems to be statistically significant mostly in developed countries that have well developed financial markets. In developing economies the effect is mostly statistically insignificant. Moreover, studies focusing on developing countries are grossly insufficient, thus a need to conduct more empirical studies in these countries so as to be able to better appreciate the effect of financial globalization in these economies.

### 3. Empirical framework and Data Description

The empirical model to examine the effect of financial globalization on economic growth in Cameroon can be specified as follows;

$$LGDPPC_t = \alpha + \alpha_1 KOPEN_t + \alpha_2 LSEC_t + \alpha_3 LCREDIT_t + \alpha_4 LDIVEST_t + \varepsilon_t \quad (1)$$

Where  $LGDPPC_t$  is the log of real per capita income,  $KOPEN_t$  is the capital account liberalization index,  $LSEC_t$  is the log of secondary school enrolment (used as proxy for human capital);  $LCREDIT_t$  is the log of the domestic credits to investors;  $LDIVEST_t$  is the log of domestic investment (used as proxy for physical capital) and  $\varepsilon_t$  is the error term. For estimation of equation (1), the Ordinary Least Squares (OLS) technique is used.

The study used secondary data which was collected from the World Development Indicators. The capital account liberalization index was obtained from the IMF's International Financial Statistics. It is important when using time series data to examine the stationarity property of the variables used in the estimation by applying the unit root test. Table 1 presents both the Phillips Perron and Augmented Dickey Fuller test for unit root.

**Table 1. Unit root test for Stationarity**

Variable	Levels		First Difference		Implied Order of integration
	Test Statistic	P-value	Test Statistic	P-value	
<b>Phillips Perron</b>					
LGDPPC	-1.952	0.3078	-4.210	0.006	I(1)
LSEC	-2.141	0.2283	-6.552	0.0000	I(1)
LCREDIT	-2.55	0.6494	-4.426	0.0003	I(1)
KAOPEN	-2.221	0.1987	-7.384	0.0000	I(1)
LINVEST	-2.266	0.1832	-4.681	0.0001	I(1)
<b>Augmented Dickey Fuller</b>					
LGDPPC	-1.600	0.4838	-3.968	0.0016	I(1)
LSEC	0.900	0.9931	-6.066	0.0000	I(1)
LCREDIT	-1.083	0.7221	-4.730	0.0001	I(1)
KAOPEN	-2.177	0.2147	-7.463	0.000	I(1)
LINVEST	-1.019	0.7462	-4.199	0.0007	I(1)

Source: Computed by Authors

From Table 1, the absolute values of the test statistics at levels are consistently less than the absolute critical values, thus the null hypothesis cannot be rejected for both the Phillips Perron and Augmented Dickey Fuller test. This implies the existence of a unit root in all the variables used in the model, thus a need to verify the existence of stationarity in the first difference. From the P - values, it can be deduced that all the variables are stationary after the first difference thus the variables are integrated of order one, that is I(1). This means that in the estimation, the first difference of the variables are used as specified in equation (2).

$$\Delta LGDPPC_t = \alpha + \alpha_1 \Delta KOPEN_t + \alpha_2 \Delta LSEC_t + \alpha_3 \Delta LCREDIT_t + \alpha_4 \Delta LDIVEST_t + \varepsilon_t \quad (2)$$

A summary statistics (without natural logs) of the variables is presented in Table 2, while the pairwise correlation result is presented in Table 3.

**Table 2. Summary statistics**

Variable	Observation	Mean	Standard Deviation	Minimum	Maximum
Investment (\$)	44	2.66E+09	1.19E+09	6.60E+08	4.80E+09
GDPPC(\$)	44	937.6777	168.6669	683.505	1356.13
Secondary enrolment	44	24.48281	10.61276	6.543	52.2456
Domestic credit	42	16.8918	8.046355	6.53804	31.2423
Capital Account Index	44	0.256603	0.120825	0.06059	0.41109

Source: Computed by Authors

From the pairwise correlation table, it is observed that a positive correlation exists between per capita income and the independent variables included in the regression. This indicates that an increase in these variables (capital account liberalization, investment, secondary enrolment and domestic credit) will be associated with an increase in the per capita income.

**Table 3: Pairwise Correlation Matrix**

	LGDPPC	LSEC	LCREDIT	KAOPEN	LINVEST
LGDPPC	1.000				
LSEC	0.3584**	1.0000			
LCREDIT	0.5001***	-0.3584**	1.0000		
KAOPEN	0.2056*	-0.3307**	0.4734***	1.0000	
LIVEST	0.8218***	0.7551***	0.1828	-0.0985	1.0000

Note: \*\*\*, \*\* and \* indicates a 1%, 5% and 10% level of significance

Source: Computed by Authors

The table also shows the nature of the relationship existing between the independent variables. It is observed that a negative but statistically insignificant correlation exist between capital account openness and domestic investment. Capital account is also found to have a negative and statistically significant correlation with secondary school enrolment. The correlation coefficients can also be used as a prelude to determine the presence

of multicollinearity. In this regard high correlation values (greater than 0.70) such as observed between investment and secondary school enrolment can potentially indicate the presence of multicollinearity between the variables. This was verified further by using the Variance Inflation Factor (VIF) presented in Table 4.

**Table 4. The VIF Test for Multicollinearity**

Variable	VIF	1/VIF
LSEC	1.11	0.904063
LDCREDIT	1.10	0.910401
LINVEST	1.04	0.965611
KAOPEN	1.02	0.980821
Mean VIF	1.06	

**Source: Computed by Authors**

From the VIF table, it is observed that both the individual VIF and the mean VIF coefficients are less than 2.5. By implication, multicollinearity is not a problem for the variables specified in the regression model.

#### 4. Presentation and Discussion of Results

The empirical results of the effect of financial globalization on the economic growth of Cameroon are presented in Table 5.

The key variable, capital account liberalization has a positive and statistically significant effect on economic growth. The result shows that an increase in capital account liberalization results to an increase in GDP per capita. Precisely, the coefficient of capital account liberalization is 0.1278, which implies that if capital account globalization increases by 1%, economic growth will improve by 0.1278%. Thus, capital account liberalization is instrumental in promoting economic growth in Cameroon.

**Table 5. Empirical Results on the Effect of Financial Globalization on Growth**

Variables	Coefficients	Standard Error	t-statistics	Probability
$\Delta$ KAOPEN	0.1278*	0.0716	1.78	0.083
$\Delta$ LSEC	0.2538***	0.0338	7.50	0.000
$\Delta$ LDCREDIT	0.8728**	0.0390	2.24	0.031
$\Delta$ LINVEST	0.1772***	0.0580	3.05	0.004
CONSTANT	0.0062	0.0091	0.68	0.498
F-statistic (4, 37)	77.85	Probability (F - Statistic) = 0.0000		
R – Square	0.8938			
Adjusted R- square	0.8823			
Durbin-Watson Statistics (5, 41) = 1.9699				
Jarque-Bera Test Statistic for normality	Chi <sup>2</sup> (2) = 0.31		Probability value = 2.339	
Breusch-Pagan/ Cook-Weisberg test for Heteroscedasticity	Chi <sup>2</sup> (1) = 0.11		Probability value = 0.7396	

**Note: \*\*\*, \*\* and \* indicates a 1%, 5% and 10% level of significance**

**Source: Computed by Authors**

The result of capital account liberalization is in agreement with the theoretical benefits of financial globalization identified by Prasad et al. (2003) which includes augmentation of domestic savings, lower cost of capital owing to better risk allocation, transfer of technology and the development of financial sector which lead to higher economic growth. The result is also in line with the view of Fischer (1998) who asserts that capital account liberalization facilitates a more efficient global allocation of savings and help channel resources into their most productive uses, thus, increasing economic growth and welfare. The result is further supported by the predictions made by the neoclassical theoretical model or framework that liberalizing the capital account of a capital-poor country would temporarily increase the growth of its GDP per capita. According to the theorists, the temporary increase in growth matters, because it permanently raises the country's standards of living.

Other results from Table 5 showed that there exist a positive relationship between secondary school enrolment and GDP per capita income. The coefficient of secondary school enrolment is 0.2538 which implies that an

increase in secondary school enrolment by 1% will result to a 0.2538% increase in economic growth (GDP per capita). Domestic credit to the private sector also has a positive and statistical significant effect on GDP per capita. This implies that financial sector development results to a 0.8728% increase in the level of GDP per capita. Similarly, an increase in the domestic investment increases GDP per capita by 0.1772%.

Table 5 also presents statistical test for overall fit of the model, test for heteroscedasticity, Jacque Berra test for normality and the Durbin Watson test for serial correlation. The result for multiple coefficient of determination is 0.8938, which signifies that about 89.38% of the variation in GDP per capita can be explained by the variables included in the model. The F-test statistics shows that the overall model is statistically significant. The Durbin Watson test-statistic for this analysis is 1.97 which falls in the region of no serial correlation, thus, the necessary assumption of residuals (forecast errors) being independent from one time period to another is satisfied. The Breusch-Pagan test is statistically insignificant, thus the specified model has constant variance (i.e. homoscedastic). The normality test from the Jacque Berra test shows that the residual is normally distributed.

## 5.2 Conclusion and policy recommendations

This study examined the effect of financial globalization on the economic growth of Cameroon. Financial globalization in this context was captured using the capital account liberalization index from the International Financial Statistics data base of the IMF, while the other variables were obtained from the World Development Indicators World Bank database. The estimation was carried out using the Ordinary Least Squares (OLS) technique. To ensure that the results were valid, econometric tests such as the Durbin Watson, Jacque Berra, Variance Inflation Factor (VIF) and Breusch-Pagan test were conducted. These tests validated the assumptions of the OLS.

The empirical results showed that capital account liberalization has a positive and statistically significant effect on the economic growth of Cameroon. The result therefore confirmed the hypothesis that financial globalization through financial resource flows from capital-abundant countries were expected returns are low to capital-scarce countries will bring numerous advantages such as technological transfer, reduction in costs of capital, increase investment and outputs. These numerous advantages bring with it improvement in economic growth and development. Other empirical results showed that secondary school enrolment, domestic credit to investors and gross domestic investment had a positive and statistical effect on the economic growth.

In the light of the findings in this study government should pursue economic policies aimed at liberalizing the capital account operations that can enhance capital flows such as the unrestricted convertibility of currencies, capital transactions and related payments or transfers but that does not rule out the maintenance of measures required for financial system stability. The government should design economic policies that enhance financial intermediation or deepening by liberalizing the domestic financial system. Given that the financial system in Cameroon is dominated by Microfinance Institutions, the government should develop a strategy aimed at increasing domestic investment by facilitating the migration of the informal sector towards the formal sector.

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