MACROECONOMIC EFFECTS OF HIV AND AIDS: EMPIRICAL EVIDENCE FROM SUB-SAHARAN AFRICA

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UNIVERSITI UTARA MALAYSIA
JUNE 2016
MACROECONOMIC EFFECTS OF HIV AND AIDS: EMPIRICAL EVIDENCE FROM SUB-SAHARAN AFRICA

Thesis Submitted to
School of Economics, Finance and Banking,
Universiti Utara Malaysia,
in Fulfilment of the Requirement for the Degree of Doctor of Philosophy
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ABSTRACT

A review of previous studies on the macroeconomic effect of HIV/AIDS suggests that the effect of HIV infection after it has converted to AIDS has not been considered in empirical studies. Realising that HIV is associated with rising morbidity and AIDS is associated with rising mortality and morbidity, this study considered both in the macroeconomic analysis. Both the HIV and AIDS could have important and different consequences on the macroeconomic performance of national economies. This study investigates the effects of HIV prevalence rate and AIDS on economic growth and aggregate labour productivity in sub-Saharan Africa. It also evaluated the impact of health expenditure on HIV prevalence rate. The sensitivity of the results was examined within two alternative sub-samples – Eastern and Southern Africa (ESA) and the Rest of sub-Saharan Africa (RSA). Panel data from 42 countries for the year 1990-2013 were used. The study estimated an empirical growth equation within an augmented Solow model and applied the dynamic system generalised method of moment estimator. HIV prevalence rate was found to have significant negative effects on GDP per capita growth and aggregate labour productivity in both the full sample and the two sub-samples. The effects did not differ between the sub-samples. AIDS was found to have positive influence on GDP per capita in all the samples. It also positively influences aggregate labour productivity measured by GDP per person employed in all samples but RSA. This is however, not beneficial to both economic growth and aggregate labour productivity. Rather, it is detrimental as it was attributable to decrease in populations and total employment instead of economic growth. There was no evidence that health expenditure has a significant negative effect on HIV prevalence rate in either the full sample or any of the sub-samples. Policy makers should ensure that adequate resources are committed towards preventing people from acquiring new HIV infection as well as averting the disease to convert to AIDS. Health awareness should also be promoted through education for better population health status.

Keywords: HIV prevalence rate, AIDS, GDP per capita growth, aggregate labour productivity, health expenditure
ABSTRAK


Kata kunci: kadar kelaziman HIV, AIDS, pertumbuhan KDNK per kapita, agregat produktiviti buruh, perbelanjaan kesihatan
DECLARATION

Some part of the work presented in this thesis has been published as articles in the following journal:


ACKNOWLEDGEMENT

In the name of ALLAH, the most beneficent and the most merciful, all thanks and gratitude are due to HIM. This research work has a lot of efforts to acknowledge and appreciate. First, I remain grateful to Almighty ALLAH (SWT) who has spared my life and gave me the opportunity to undergo this important programme.

I appreciate my able supervisor Dr. Shamzaeffa Samsudin for her scholarly inputs, remarkable observations and patience during all discussion as well as academic leadership that made this work a success. She has been extremely generous with her time and whenever she go through my work, her feedback often made the entire writing shine with stronger theoretical arguments and more insightful analysis. I am also grateful to my co-supervisor Dr. Shazida Jan Mohd Khan for her constructive comments and valuable suggestions.

I am also thankful to Associate Professor Dr. Lim Hock Eam and Dr. Cheah Yong Kang of School of Economics, Finance and Banking, University Utara Malaysia for valuable comments and suggestions during my research proposal defense. I equally appreciate the effort of UUM for granting me a dissertation finishing grant.

I want to use this opportunity to reiterate my unreserved appreciation to my late parents – Alhaji Maijama’a Umaru and Hajia Nana Khadijah for their parental role, guidance and moral support while alive. Thanks to my brothers and sisters for their continued support and prayers. I would like to register special appreciation and heartfelt gratitude to my dearest wife, Jamila and our sweet and wonderful children for their patience, sacrifice and prayers.

Due for acknowledgements also are Nasir Jajere, Abubakar Arabi, Saidu Mahamuda, Yunusa Umar and Abdullahi Ibrahim for their moral and financial supports, Abdullahi Yelwa for his effort in ensuring my TETFUND study grant. I am equally grateful to Mohammed Umar, Aliyu Alhaji Jibrilla and Murtala Musa for their helpful instructions on STATA package and GMM.

Finally, my gratitude goes to the management of Abubakar Tatari Ali Polytechnic Bauchi for providing me with the opportunity to further my studies overseas.
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<tr>
<td>AIDS</td>
<td>Acquired Immune-deficiency Syndrome</td>
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<tr>
<td>CDC</td>
<td>Centres for Disease Control and Prevention</td>
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<tr>
<td>ESA</td>
<td>Eastern and Southern Africa</td>
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<td>GDP</td>
<td>Gross Domestic Product</td>
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<td>GMM</td>
<td>Generalized Method of Moments</td>
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<td>GNI</td>
<td>Gross National Income</td>
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<td>HAART</td>
<td>Highly Active Antiretroviral Therapy</td>
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<td>HIV</td>
<td>Human Immune-deficiency Virus</td>
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<tr>
<td>H₀</td>
<td>Null Hypothesis</td>
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<td>IMF</td>
<td>International Monetary Fund</td>
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<td>MMWR</td>
<td>Morbidity and Mortality Weekly Report</td>
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<td>Ordinary Least Squares</td>
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<tr>
<td>R₂</td>
<td>Regression Two</td>
</tr>
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<td>RSA</td>
<td>Rest of Sub-Saharan Africa</td>
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<td>SSA</td>
<td>Sub-Saharan Africa</td>
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<td>TB</td>
<td>Tuberculosis</td>
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<td>UNAIDS</td>
<td>Joint United Nations Programme on HIV/AIDS</td>
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<td>UNDP</td>
<td>United Nations Development Programme</td>
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<td>UNPD</td>
<td>United Nation Population Division</td>
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<td>US</td>
<td>United States</td>
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CHAPTER ONE
INTRODUCTION

1.1 Background to the Study

Health which is central to individual’s well-being is among the basic objectives of growth and development. Therefore, enhancing the health status of the vast majority of the populace, especially in developing countries that are prone to diseases is not only an end in itself, but also a means to achieve other ends – poverty reduction, better living standards and consequently macroeconomic development (Todaro & Smith, 2005). Essentially, health is a fundamental component of economic growth. That is, it is an important input in the form of human capital in the aggregate production function and a prerequisite for raising productivity. In essence, the health status of individuals and societies determined the vigour with which they pursue productive activities. All other human positions, status or material wealth are regarded second to individuals or societal health (Bhargava, Jamison, Lau, & Murray, 2001).

Health influences society’s output directly or indirectly. Directly, healthy workers are more energetic and robust, that is, can endure a longer period of work and have a clear mental reasoning, hence capable of augmenting the level of output. Indirectly, improvement in health is an incentive to education and learning process of children, because healthier children have higher cognitive ability. Better education received means more efficiency and higher productivity which implies more income and economic growth. Greater health also means lower morbidity; hence people can increase their savings for investment purposes rather than spending the money on
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