A POSITION PAPER ON

"CREATING FUNDING FOR GIRLS' EDUCATION THROUGH GREEN BONDS: A WIN-WIN FOR CLIMATE CHANGE MITIGATION AND REDUCED POPULATION GROWTH"

DAVID TEMITOPE[i],   RENATA KONADU[ii] AND KWAME ANANE FREMPONG[iii]

Temitope@paccpolicy.org   Renata@paccpolicy.org   Kwame@paccpolicy.org

Introduction and Background

In recent times, incidents of unprecedented weather disasters including floods, droughts, heat waves and hurricanes have become the leading headlines on media platforms for discussions all over the world. In retrospect to 2017, the USA, Nepal, Sierra Leone, India, Bangladesh among other countries suffered the consequences of these weather catastrophes which claimed not only human lives but also displaced and destroyed the diverse species of fauna and flora. Though some people may want to associate these incidents with natural factors, human-induced causes cannot be brushed off especially as climate change anxiety increases. As a result, there is the need for immediate measures to be implemented in order to reduce greenhouse gas emissions and build climate change resilient economies.

A current study by Population Education in 2016 revealed that there is a synchronised relationship between the increase in climate change effects and growth in global population. The United Nations population prospects report 2017 pointed out that the world's population will increase to 9.8 billion in 2050 from the current 7.6 billion. Out of the estimated 2.2 billion growth level, Africa's population is projected to grow by 1.2 billion while the remaining 1 billion would be noticed in Asia and the other continents. In 2010, for instance, the United Nations fact sheet reported carbon dioxide emissions per capita of 0.8 metric tonnes for Sub-Saharan Africa. When considered alongside the tremendous anticipated population growth rate, one can easily envisage the possible climate change effects if solutions are not enforced sustainably. Even at the current population, the effects of climate change are likely to persist if renewable energy sources and other environmentally friendly activities are not employed.

In addition to making human lives better, engaging in environmental activities could also yield some economic benefits and attract investors. For example, the United Nations Population Fund (UNFPA) estimated that most Sub-Saharan African countries could gain demographic dividends of at least $500 billion per year. From the 1960s to the 1990s, many countries in East Asia experienced a demographic boom, with a sharp spike in population growth followed by a fall in fertility rate. This was accompanied by a period of dramatic economic growth: in the three decades to 1995 as per capita income in East Asia increased by a remarkable 6% each year, lifting tens of millions out of poverty. Plan International highlighted in their report that Africa could learn from how East Asia profited from its demographic boom, by expanding access to

education at all levels, particularly for girls. According to Homi Kharas, Brookings Institution - interim Vice President and Director – Global Economy and Development, "Education is the cheapest, most cost-effective mechanism for reducing emissions". In addition, Paul Hawken's Drawdown Project report 2017 revealed that, girls' education and family planning are the fifth and sixth most important solutions to climate change respectively out of the list of 100. Researchers on this Drawdown project established a link between girls' education and fertility rate, especially in Africa and Asia. Kwauk and Braga of the Brookings Institution in their recent article on "3 ways to link girls' education actors to climate change" referred to girls as "agents of change in the pursuit of sustainable development and equitable climate action. Thus, emphasizing that quality girls' education can help tackle both the problems of increased population and climate change effects.

Why Should Green Bond Fund Girls' Education?

According to (United Nations Educational, Scientific and Cultural Organisation) UNESCO's estimates, 130 million girls between the age of 6 and 17 are out of school and 15 million girls of primary-school age—half of them in sub-Saharan Africa— will never enter a classroom. Furthermore, Plan International report "Because I am a Girl: Africa report 2012 - Progress and obstacles to girls' education in Africa" revealed that 47 out of 54 African countries, girls have less than a fifty percent chance of going to secondary school. Evidence has showed that some of the common challenges girls faced in accessing quality education include low family income, living in remote locations, non-commutable distances, lack of wash facilities at schools to cater for puberty needs, domestic chores especially sourcing for water, and early marriage among others. Some of these challenges climate change actors have highlighted such as fetching water and early marriage are mostly caused by climate change effects. As stated in the World Bank report, more than 41,000 girls under the age of 18 marry every day and putting an end to the practice would increase women expected educational attainment, and with it, their potential earnings. Ending child marriage has been estimated to generate more than $500 billion in benefits annually. Also, UNICEF (United Nations Children's Fund) reported that 272 million school days are missed every year due to diarrhea which arises as a result of lack of safe water and sanitation in schools, thus, discouraging girls from attending schools in their period of menstruation.

Nonetheless, projects are being implemented underway to help tackle some of these challenges. For example in Ghana- Under the Secondary Education Improvement Project, 3,450 senior high school girls (ages 15-17) are currently benefiting from scholarships, which pay for their tuition and provide other items, including books and uniforms, necessary to complete three years of senior high school education. Also in Nigeria, the lifetime of the State Education Sector Project saw an increase in Junior Secondary School completion for girls from 7 percent in 2007 to 34 percent in 2011 in the Kaduna State. Despite these efforts, many African nations are struggling to raise the necessary funds needed to promote sustainable quality education and maintain green economies. Nobel laureate Malala Yousafzai during her visit to Maiduguri, Nigeria, said "While most people don't count it as one of our world's most pressing problems, evidence shows that girls' education is the best investment we can make to grow economies, improve the air we breathe, reduce the risk of violent conflict and advance public health".

Therefore, the question is how do we invest in girls' education and still ensure that the stress on building climate change resilient economies is not lost? Certainly, there are different sources and means of financing national and macro projects targeting girls' education which includes bonds, gift aids and grants. Among these sources is Green Bonds which are issued to raise finance in support of climate change solution programs. Manuel Lewin, Head of Responsible Investment at Zurich Insurance put it this way "Green bonds are a tool for corporate issuers that want to communicate how they are thinking strategically about climate change and whether they are investing to capitalise on the opportunities it presents." The green bond market has enjoyed strong growth and progressive standardisation in the last two years, with issuance jumping 105 percent last year alone to a record $100 billion, according to data compiled by Thomson Reuters and the Climate Bond Initiative. With the Paris Agreement in throttle, and countries need to meet their National Determined Contributions (NDCs) amidst public budget strains and bank lending capabilities restrictions green finance (green bond) has been projected to hit $1 trillion by (Conference of Parties) COP 2020 when nations will need to update their NDCs or submit new ones. A report by the Organization for Economic Co-operation and Development (OECD) estimated that green bond market could increase to between $4.7 trillion and $5.6 trillion by 2035, with an annual increase of between $620 million and $720 million.

Though it appears that most governments in Africa are planning on issuing Green bonds in the near future, it seems the focus is entirely on carrying out environmental friendly projects. Nigeria as the seventh highly populated nation in the world is set to issue its first sovereign green bond within next few months. However, the receipts from the bonds are intended to be used for renewable energy, agriculture and transport projects. It is not very surprising that education is not in the list of projects that the estimated $63.6 million would be funding. Perhaps, this could be due to the fact that education might have already being captured in the national budget. Nevertheless, since the allocated budgeted funds seems not to be sufficient to provide the quality education necessary, it is prudent to consider the other sources of finance that would be geared towards the same agenda and also help achieve sustainable development goals. By issuing green bonds, governments will have augmented funds to construct new school buildings in strategic places, provide toilet and washing facilities, Information Communication Centres (ICT) and laboratories that will students, most especially, girls in acquiring entrepreneurial and requisite skills for personal development.

Call for Action

Considering the research findings from Paul Hawken's Drawdown and the substantiated arguments by Brookings International, there is substantial evidence supporting the assertion that girls' education helps mitigate climate change. This is a huge call to all climate change global actors, especially, national leaders to join President Emmanuel Macron of France in supporting climate research such as presented in this paper. With green bonds, quality and sustainable education and training skills can be provided to girls all over the world and most importantly the highly populated areas in Africa and Asia. Of course, there are gaps in the evidence that calls for further exploration and investigation. However, the reality remains that population growth is a global concern; girls' quality education is the primary solution to population and climate change and Green bonds are the means to achieving these sustainable development goals. We believe that it is time to view girls' education as a "green asset" to be funded by green bonds alongside environmental projects to help build climate change resilient economies.

REFERENCES

Climate Bonds (2017): Available at:
https://www.climatebonds.net/files/files/Q3-2017-Market-Summary.pdf. [Accessed on December 27, 2017]

Corbet, S. (2017). *France Awards Climate Scientists With 'Make Our Planet Great Again' Grants.* Available at: http://time.com/5059597/france-climate-scientist-grants/. [Accessed on January 3, 2018]

Hawken, P. (2017). *Drawdown: The Most Comprehensive Plan Ever Proposed to Reverse Global Warming.* New York, New York: Penguin Books.

Katsomitros, A. (2017). *Green Bonds: Thinking Strategically about Climate Change.* Available at: https://www.worldfinance.com/banking/green-bonds-thinking-strategically-about-climate-change. [Accessed on January 3, 2018]

Kharas, H. (2016). *Climate Change, Fertility and Girls' Education.* Available at: https://www.brookings.edu/blog/future-development/2016/02/16/climate-change-fertility-and-girls-education/. [Accessed on January 4, 2018]

Kwauk, C. and Braga, A. (2017): *3 Ways to Link Girls' Education Actors to Climate Action.* Available from : https://www.brookings.edu/blog/education-plus-development/2017/09/27/3-ways-to-link-girls-education-actors-to-climate-action/. [Accessed on December 29, 2017]

Mohamed, F. (2017*). Girls' Education is the Best Investment We Can Make to Grow the World's Economies.* Available at: https://qz.com/1119055/malala-fund-ceo-girls-education-is-the-best-investment-to-grow-the-worlds-economies/. [Accessed on December 30, 2017]

OECD (2017), *Mobilising Bond Markets for a Low-Carbon Transition*, OECD Publishing, Paris.
Available at: http://dx.doi.org/10.1787/9789264272323-en

Plan International (2012): Available at:
https://plan-international.org/because-i-am-a-girl. Accessed on December 5, 2017

Population Education (2016). *How Does Population Growth Impact Climate Change?* Available
at: https://populationeducation.org/content/how-does-population-growth-impact-climate-change. [Accessed on January 4, 2018]

Pradhan, E. (2015): *Female Education and Childbearing: A Closer Look at the Data.* Available
at: http://blogs.worldbank.org/health/female-education-and-childbearing-closer-look-data.
[Accessed on December 23, 2017]

UNICEF (2010): Available at:
https://www.unicef.org/media/media_53234.html. Accessed on December 21, 2017

United Nations Population Fund (2016): Available at:
http://www.unfpa.org/resources/sub-national-estimates-human-capital-indicators-localizing-investments-demographic#. Accessed on January 1, 2018

World Bank. 2012. *Nigeria - State Education Sector Project (English)*. Washington, DC: World
Bank. Available at:
http://documents.worldbank.org/curated/en/185241468288691016/Nigeria-State-Education-Sector-Project

---

[i] David Temitope is a Research Fellow-Policy Analyst at PACC Policy

[ii] Renata Konadu is a Research Fellow-Environment and Health at PACC Policy

[iii] Kwame Anane Frempong is the Executive Director of PACC Policy