# THE CHURCH: ASSET AND AGENT IN ACHIEVING SUSTAINABLE WATER SUPPLY IN NIGERIAN URBAN ENVIRONMENTS

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*In the last decades there has been a growing National concern on urban water supply and environmental sustainability. This concern is precisely because of the unbridled commoditization of ground and surface water with little or no regard for the urban ecosystems that depend on water. As this trend exacerbates, ecosystem's health in many Nigerian urban environments have been affected. It has therefore become imperative to include a broad spectrum of intellectual disciplines to help articulate solutions to the challenges of urban water supply. In the past the role of the church in this area had been unrecognized. But, realizing that solutions to urban environmental challenges require a multidisciplinary approach, this paper argues that the church as both asset and agent is most useful in conscientizing and transforming people to adopt a new mindset- a behavioral attitude required to halt the progression of environmental degradation in general and specifically improve urban water supply in Nigeria.*

## Introduction

Water is a source of life and a natural resource that sustains the environment and supports livelihoods. However, population growth and rapid urbanization has created a severe scarcity of urban water supply as well as tremendous impact on the urban natural environment. Added to this, is the anthropogenitic activities on global climate whose effects confront humanity as it reduces access to drinking water, limits access to food, and negatively impacts the ecosystems health, particularly in Africa, and other developing countries including Nigeria; although global climate change affects all human populations across the globe; but it hits those living in poverty the hardest.

The call by the Church and to the church as community of faith is to protect the most vulnerable and to be stewards of God's earth, our *Oikos.* This means we must act; we must do some self-examination, and be self aware and educated to what we can do to be good care-takers of this precious *oikos.* (Alokwu, 2013) This has become imperative as the issue of scarcity of water is becoming critical-yes, about reaching crisis level!

Water scarcity in many Nigerian urban environments has been attributed to urban *shift*-a conceptualization of rural-urban drift of people which is generally associated to the continuous migration of people in search of better jobs and opportunities ( Kalipeni 1994, UNCHS 1996). Failure to find sustainable jobs in the urban areas forces most of the new immigrants to settle in unplanned settlements. In Nigeria for example, many urban population lives in unplanned settlements where social services are grossly inadequate or are not at all in existent. The table below provides a characterization of the challenges associated with rural-urban migration in Nigeria.

| Unemployment | Two-third (2/3) of migrants from rural to urban centers in the age group of between 15-29 years are unemployed. Unemployment has its adverse effect on the environment and its resources, the society and |
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| | especially the poor themselves. |
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| Poverty | High rates of rural migration to urban cities and low levels of economic growth are causing an increase in urban poverty. This in turn exacerbates water supply situation. |
| Environmental pollution and degradation | The informal economy of urban settlements in many Nigerian urban environments contribute to the degradation of the environment through: haphazard disposal of industrial by-products; poorly constructed residential and workplaces with large amount of soil and water pollution; and poorly enforced emissions regulations for factories and motor vehicles |
| Health problems | In many Nigerian urban environments, overpopulated slums exhibit high rates of disease due to unsanitary conditions-a direct result of insufficient water supply. This affects the environmental health system of the urban population. As a result, there is a heavy burden of diseases and infections such as malaria, diarrhea, malnutrition. |
| Other Social Problems | "Slum" dwellers located in illegal settlements with insufficient housing and inadequate water supply for sanitation are seen as the "breeding grounds" for social problems such as crime, drug addiction and alcoholism. These issues raise problems in the political, social, and economic arenas. |

*(WHO Undated in Alokwu, 2013)*

The problem of urban migration in Nigeria and elsewhere has received renewed attention especially as it affects sustainable urban water supply (Meyers and Muhajir 1997). Collaborative efforts geared towards solving the problem of sustainable urban water supply has been noted.(Banerjee: 2008) However, previous studies and researches have not regarded the church as both "asset" and "agent" in contributing positively to the solution of urban water supply and urban sustainability. In order to contribute in filling this knowledge gap, this paper focuses on the role of the church as asset and agent in improving urban water supply for the growing number of urban dwellers especially the poor (this will help to improve urban sustainability). The role of the church, one has note would be a great boost to the efforts in achieving urban sustainability in Nigeria-of which water supply is an important component.

**Conceptualizing Urban Sustainability in the Context of Urban Water Supply**
As noted above urban migration has placed additional pressure on the ability of government at various levels to provide adequate social services including water supply, to its teeming population. In the pursuit of social and economic activities, the urban people especially the poor engage in activities that make the urban environment unsustainable.

The growing concern and the subsequent discussion around the concept of sustainable cities have generated a substantial academic and policy literature (Nwaka 1996, Ogu, 1997, Rakodi, 1997, Habitat International 2005). There are many competing and often contradictory definitions of urban sustainability (Pearce and Watford, 1993, WCED, 1987, Dokun 2008). The most widely known definition of "sustainability" either of development or of cities comes from the Brundtland Commission, which defined sustainable development as "development that meets the needs of the present without compromising the ability of future generations to meet their own needs (United Nations, 1987). The term sustainable development from where the concept of urban sustainability

comes, goes beyond the boundaries of science and business development and trade, to include human development, values, and differences in cultures. In fact, many organizations are referring to sustainable human development as opposed to sustainable development in order to emphasize issues such as the importance of gender equality, participation in decision-making processes, and access to education and health. (Mitlin and Satterthwaite 1996) The absence of conceptual consensus in this regard explains the lack of clarity regarding the term.

In spite of the cacophony of meaning of the concept, it is however fast gaining ground as an ideal environmental concept to which cities should aspire. Sustainable city is a reminder, nay, a caveat that our natural resources especially in our urban environments are limited and are in fact, in danger of running out and that development beyond certain levels could not only jeopardize the ecosystems health, but that the continued existence of humanity on the surface of earth is also under serious threat. Urban Sustainability contextually, refers to the establishment of urban forms and processes that are both more environmentally benign (Habitat International 2005:35), in which improvement in the quality of human life is achieved in harmony with improving and maintaining the health of ecological systems; and where a healthy economy's industrial base supports the quality of both human and ecological systems" (http://www.indigodev.com/Sustain.html). Underpinned by fundamental views on what urban sustainability constitutes, the concept denotes concerted and deliberate efforts aimed at reversing, and where possible, halting those trends that pose threats to ecosystems health and the well-being of urban environments in general. Urban sustainability proponents such as Burgess, Carmona, and Kolstee, eds. 1997, Berry 1994, argue that by dealing with such issues as urban water supply, solid waste, sanitation, sewage, land-use, transportation, housing, energy efficiency, social conflict and poverty (these could jeopardize the ecosystems health), urban environments can be turned into more livable environments.

In order to achieve urban sustainability, Wamback (2001), advocates for a behavioral change towards creating a sustainable society. Wamback's idea of sustainable society is exactly the same with the concept of urban sustainability. He defined sustainable society to mean "a society whose renewable resources are consumed no faster than they can be renewed and non-renewable resources are consumed no more rapidly than renewable substitute can be found" To put it succinctly, urban sustainability is the idea that urban inhabitants have been deeply conscientized that they make development choices which respect the relationship between the three "E's" of-economy, ecology, and equity and is more intergenerational in its thinking, attitude and interaction with the entire ecosystem.
One of the distinguishing features of urban sustainability is that urban inhabitants value healthy ecosystems, use resources efficiently, and actively seek to retain and enhance a locally based economy. There is a pervasive volunteer spirit, and partnerships between and among government, the business sector, and non-profit organizations and other stake holders, are common. Public debate in these communities is engaging, inclusive, and constructive. Unlike traditional community development approaches, sustainability strategies emphasize: the whole community (instead of just disadvantaged neighborhoods); ecosystem protection; meaningful and broad-based citizen participation; and economic self-reliance (Satterthwaite, 2012).

**Inadequate Urban Water Supply-Impediment to Urban Sustainability**
The forgoing discourses have been very instructive regarding urban water supply. In order for the urban water cycle to function effectively, it needs to be supported by appropriate

infrastructure in good working condition. Protecting the infrastructure used to treat and transport water (including sources, treatment plants, and distribution systems) is an important step in ensuring the safety of drinking water. However, in most urban environments worldwide, there has been years of neglected maintenance to water storage, treatment, and distribution systems. Poorly maintained water supply systems can generally be traced to insufficient financial resources and poor management. This deterioration in the water infrastructure threatens the quality and reliability of all water services. Cities in developing countries in addition to the acute water stress are already faced by enormous backlogs in shelter, infrastructure and sanitation services thereby deteriorating urban environmental sustainability. This is because the large urban populations will demand larger proportions of water while simultaneously decreasing the ability of ecosystems to repair itself in order to maintain ecosystems equilibrium.

Inadequate water supply which has been noted above as one of the challenges of urban environments in Nigeria could not only deteriorate sanitation situation, but also threaten urban environmental sustainability. Throughout history water has confronted humanity with some of its greatest challenges (Palen, 2000).

A large and increasing proportion of the people without adequate water supplies live in urban areas. A large population of city residents lives in slums where water supplies are either inadequate or non-existent. Approximately 80% of households have less than 30 litres of water per person per day (Uzomah and Scholz, 2002). In many urban areas, water companies, tanker drivers and vendors who manage water supplies do not appear to consider the urban poor, as they supply richer people who can afford it. As a result the urban poor are left to look for other sources of water supply which in many cases are not safe enough for human consumption. The shortage of water for daily hygiene, together with the lack of clean drinking water, is the cause of a high level of water-related diseases such as diaharriah, malaria and others. Almost 2 million children die each year for want of a glass of clean water and adequate sanitation. A lot of people are forced to spend hours searching for and collecting water thereby restricting them from other choices of engagements. As water-borne infectious diseases hold back poverty reduction and economic growth in some of the third world countries including Nigeria, the prospect for human development and ecosystems health is also threatened by a deepening global water crisis (Todaro and Smith, 2009). In order to halt the progression of the global water crisis, the Millennium Development Goal 7, target 10, seeks to halve the proportion of people without sustainable access to safe drinking water and basic sanitation by 2015 (Todaro and Smith, 2009: 208).

In order to meet the Millennium Development Goal 7, target 10 one expects economic considerations of urban water supply to rank very high in urban planning in Nigeria. This, however, is not the case. The economic involvement in water supply has rather been low in comparison with other infrastructural facilities. The thinking and practice which regards water as a social service that has to be commoditized tends to exacerbate the problem of urban water inadequacies thereby undermining its importance in urban cities.

The above is in spite of the efforts by the National Water Supply and Sanitation Policy, launched in 2000 and currently being reviewed. The National Water Supply and Sanitation Policy spelt out the roles of the tiers of Government, the private sector, development agencies, non governmental institutions and the beneficiary communities in developing and managing water resources in Nigeria. The policy aims to:

- Ensure affordability of water supply and sanitation services for the citizens.
- Guarantee affordable access for the poor to basic human need of (20 litres of water per day per capita) level of water supply and sanitation services (One latrine per 10 persons). (Oyebande, 1978)

**The Church as Asset and Agent in Urban Water Supply**

I do not think that our environmental problems are technology problems per se but are human problems, attitude and leadership problems. When we see our water, our environment as a gift first, as a web that connects us all, we can serve that environment with our brilliant technology. Our attitude can make the difference! This is because our perception of water has been reduced to a commodity. We need a transformation of consciousness-from commodity to gift! The church as an agent of reconciliation reminds people that we are water-from the beginning of creation in Genesis, to new life in Christ, the Living Water, in the Gospel to Revelation which says, "See I am making all things new…to the thirsty I will give water as a gift from the spring of the water of life." (Rev. 21:5-6)

There is no doubt that what is needed to address the current water challenges in our urban cities and achieve urban sustainability, is to include a broad spectrum of synergy initiatives to involve concerned groups who are willing to make contributions towards improving water supplies. This suggestion is premised on a careful study of environmental initiatives which suggests that international bodies, national governments, policy planners and even environmentalists had in the past emphasized the techno-scientific options to such an extent that they seem to ignore and undermine the role of both the indigenous knowledge system and church heritage in environmental sustainability discourse (Gosovic, 1992 xv). One can only explain this attitude by a suggestion from (Ibe, 2003:11) that the introduction of religion into environmental discourse and efforts would threaten or compromise objectivity, scientific investigation, professionalism and democratic values. However this suggestion is in my opinion bias, the reasons are too simplistic and insubstantial because environmental investigations are not always conducted from scientific perspectives. Hunn (1999: 25-26) argues that scientific methodology is merely one way, and not the only way, to investigate and acquire knowledge in order to provide solutions to humanity's multifarious problems. There are a whole range of avenues through which solutions to environmental problems could be pursued. One of such is religious engagement. Religion has a definite role to play in urban environmental sustainability. According to Ian, 1996: 4-7, Cobb, 1994, religious understanding and attitude contributes and shapes our conception of the world and the dynamics of its institutions and social arrangements. This "cosmic dynamics" has therefore necessitated the need to draw science more closely and fully into a working relationship with religion/theology. This view on the important role of religion in environmental concerns and the need for a relationship between religion and science was supported by the former General Secretary of the World Council of Churches, Philip Potter. In a keynote address at the Conference on Faith, Science and the Future in 1979, Potter posited that an intensification of the dialogue between science and religion would chip away the wall of separation that once stood between them (Roger 1980: 21-29). This dialogue which is part of the church's response to environmental discourse is fundamentally important for two reasons. Firstly, it created a platform in which both theologians and practitioners in other fields of sciences would feel at home to engage in meaningful discussions about not only the very existence of the universe, but mainly on the need for its conservation and its governance. Secondly, it has the potential to create a self

consciously moral society grounded on respect for God's creation thereby relegating individualism, materialism and the anthropocentric-induced desire to subjugate nature which would invariably enhance environmental conservation. This view is corroborated by Mische, in Conradie, 2008 :64) that:

> Science and technology alone cannot resolve ecological threats. Nor can governments or the laws they promulgate ... Sustaining the integrity of creation thus requires not only the external laws government enact to deal with belligerent behaviour, but also inner governance, laws internalised in our hearts and minds and the will to live by them ... Church praxis has special relevance for the development of inner governance and a culture of ecological responsibility. Religions carry the archetypes, symbols, meanings, values and moral codes around which people coalesce and define themselves, their sense of the sacred, and their relationships with each other and the natural world.

The above underscores the importance of the church as asset and agent in engaging in environmental issues but more importantly the needed synergy between the church and other bodies committed to environmental sustainability. It is in this regard, that the church as a community of God's people could make an important contribution towards ameliorating the urban water problems and urban environmental sustainability through the use of its theological resources. Biblical scholars and theologians interested in development issues are unanimous; that theological resources rooted in the insights of the Bible is a great resource for addressing societal problems including socio-economic and other development concerns. Therefore, getting the church in Nigeria to be involved in the search for solution to Nigeria's environmental challenges would be of immense benefit since Christians constitute a large segment of Nigerian society.

**Of Agency and Assets**
In a world of social injustice, economic inequity, environmental degradation, conflict and human right violations, Christians are asking more clearly than ever before what the role of the church is in all these. Public theology as a church asset seeks to address these questions by providing theological resources for the church as agent of change to have a more creative and pragmatic engagement in public issues. It is an interdisciplinary theological field which theologically deals with issues which reside in the public domain on which the church is obliged to speak and act decisively in the exercise of its prophetic ministry (Forrester 1997:31) If the church as agent of change fails to provide the needed theological resources to guide Christians in their public undertakings such as the issue under discussion, it loses its relevance in the society (Bonion 2004:131). This is because according to (De Gruchy 2006:36), in the absence of such theological resource and engagement people tend to "forget context, they turn abstract, detached, ideological, remote …" in matters of faith. With the provision of theological resources the church would actually be engaged in "doing theology instead of thinking theology" According to (Bufel 2007) thinking theology makes theology an abstract thing but doing theology empathizes it and translates theories into reality. The above perception of the church as asset and agency would assist the church in Nigeria to respond meaningfully to the socio-political and economic challenges plaguing the nation including of course the challenges of urban water supply.

Therefore in dealing with the problem of urban water challenges the church is expected to be an important role player in urban renewal. It is expected to engage in "doing theology" instead of "thinking it" by the use its public theology to draw the attention of the relevant authorities to this

sticky situation. This is because ordinarily the urban poor who are most vulnerable to health hazards of the unsanitary conditions occasioned by inadequate urban water supplies, lack the wherewithal to make their voices to be heard. The church could represent the voice of the urban poor at the government quarters to demand on their behalf such things as their well being do require such as water supplies. Water is a blessing from God that enhances our well being, Isaiah 35: 1-7. The provision of this essential gift of God will make the urban poor have a feeling of the abundant life which Christ promised in John 15: 10. Abundant life may mean nothing to a majority of the urban poor who do not have access to safe and clean drinking water. Abundant life becomes a mere rhetoric and a meaningless concept when the urban poor can only hear the words of Jesus that: "Whoever gives even a cup of cold water to one of these little ones in my name … will not lose their reward" (Matthew 10.42), if they cannot have access to water. Many urban poor are thirsty, despite an abundance of water around them. They are searching for clean water in order to survive. If the church could not identify with them in their struggle for water to survive and experience the abundant life which Christ promised, the church could not be absolved from the sin of neglect of the poor which Christ spoke against in Matt….

The church should re-appraise its commitment to the least of the society in the light of Jesus command about caring for the needy by adopting the concept of what Groody, 2007:17 calls the "preferential option for the poor". This engagement is a show of solidarity with the poor and protest against the inhuman situation of poverty in which they live. This re-appraisal has to be premised on the understanding that the poor do not only reflect the image of God but are also part of the body of Christ-the church. In this respect, Groody, 2007 opines that "the church is, and wants to be, the church of all people and especially the church of the poor". This phrase gives much impetus to the engagement of the church on the questions the urban poor is constantly asking about issues of inadequate water supply that confronts them.

The church should include in its catechism and liturgy the integrity of creation and values of water as a way of creating awareness on the need for people to appreciate the environment in general and water in particular as a gift from God and not a resource to be commoditized. In doing this the church could occasionally organize teaching sessions to highlight the theology of water which is fundamental to Christianity. In theologizing water, Christians should be made to understand that through the sacrament of Baptism, God, in a very real sense, communicates Himself to His people through water. Of all the substances He could have chosen to make Himself present in and through which to visibly identify His people, He chose water. The sacrament of baptism is instructive in dealing with the issue of water as the premise for Christian care and responsibility. In exercising its prophetic ministry the church should use the theology of water in relation to the sacrament of baptism as both a powerful and timeous opportunity to communicate the message that water is salvific as well as a sacrament, and not a commodity to be possessed. In this regard, the church should teach that water is given to grace our lives with life and health and pleasure. It is anticipated that the church as agent of change through its teaching will change people's wrong perception that water is a commodity to be possessed. People will understand that God owns water and that we are stewards. When we see our water and our environment as God's gift, as a web that connects us all, then we can serve that environment with our brilliant technology.

**Conclusion**

The paper has raised a fundamental issue-that there is an urgent need to include a broad spectrum of synergy initiatives in the effort towards improving urban water supply in order to achieve urban environmental sustainability. The church as both asset and agent through its public theology will engender attitudinal change of majority of people who hitherto had been ignorant about the effects of wanton destruction of the environment. The church's theological resources in this context will be used to remind people that the story of the great flood was because of the wickedness of humankind and that the environment changing weather patterns in our day and the lack of clean water are in many ways due to our wickedness, our selfishness and greed, our pleasure and convenience habits which if not checked will bring a catastrophic end to our *Oikos.*

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