

NIGERIA'S ACCESSION TO THE CONVENTION: Opportunities and Prospects for Implementation

By

Dr Bukar Abba Gana

Department of Environmental Management

Faculty of Environmental Technology

Abubakar Tafawa Balewa University, Bauchi, Nigeria.

Tel: +234 8023288952; E-mail: bagana@atbu.edu.ng; babbaganatt@gmail.com

Being a Paper Presented at the National Workshop on the Water Convention, held at
Fraser Suites Hotel, Abuja, on 28th July, 2022

ORGANISATION OF THE PRESENTATION

- A) Baseline Assessment of Nigeria's:
 - i) Population Dynamics
 - ii) Water Resources and their Management
 - iii) River Niger
 - iv) River Benue
 - v) Lake Chad
 - vi) OPPRTUNITIES in Acceding to the Water Convention
 - vii) PROSPECTS for the implementation

Baseline Assessment: Population Dynamics

- 37.8 Million in 1952
- 55.7 Million in 1963
- 79.8 Million in 1973
- 88.5 Million in 1991
- 140 Million in 2006
- 211.4 million projected for 2021.
- Children under the age of 15 were 44.0%,
- Children between 15 and 65 years of age were 53.2%
- Above 65 years were 2.7%
- The major contributors to Nigeria's population growth are early marriages, high birth rates, and a lack of family planning

Baseline Assessment: Water Resources

- Nigeria is blessed with abundant Water Resources
- Annual rainfall of 4000mm in the coastal south and 500mm in the extreme north,
- Freshwater of approximately 224 billion m³ annually
- Substantial volume of ground water resources in aquifers
- two major drainage systems;
- i) the Niger– Benue system, contributing 23% of supply, and
- ii) the Komadugu – Yobe inland drainage system
- Much of the Niger – Benue system discharge flows into the Atlantic,

Baseline Assessment: Water Resources Cont'd

- The Inland drainage system dries up 80kms to the Lake Chad.
- Thus, Nigeria is an economically water – scarce country
- water supply of 1,499 m³/capita
- This is just below the Falkenmark Water Stress threshold of 1,500 m³/capita due to Nigeria's large population (211M),
- Withdrawals are low relative to supply (9.67 percent) and well below the SDG 6.4.2 water stress threshold.

Water Resources Management

- At Regional Level – The Joint/Multilateral Bodies (NBA, LCBC)
- At National Level (FMWR)
 - i) The 12 RBDAs,
 - ii) The Water Act (2004)
 - iii) The Nigeria Hydrological Services Agency (NIHSA),
 - iv) The National Water Resources Institute (NWRI),
 - v) The Nigeria Integrated Water Resources Management Commission (NIWRMC)
- At State Level – Ministries and their Agencies
- Others – LGAs, Private Sector, NGOs, CBOs etc
- Lack of adequate and effective framework

Baseline Assessment Transboundary Waters

- Nigeria shares three transboundary water basins namely River Niger Basin, River Benue Basin and Lake Chad
- RIVER NIGER BASIN is shared by 9 countries, namely, Benin Republic, Burkina Faso, Cameroon, Chad, Cote d'Ivoire, Guinea, Mali, Niger and Nigeria).
- RIVER BENUE BASIN is shared by Cameroon, Chad and Nigeria
- LAKE CHAD BASIN is shared by Cameroon, Chad, Niger and Nigeria

River Niger – Basin area by country

Country	Total area of the country (km ²)	Area of the country within the basin (km ²)	As % of total area of basin (%)
Guinea	245857	96880	4.3
Côte d'Ivoire	322462	23770	1.0
Mali	1240190	578850	25.5
Burkina Faso	274000	76621	3.4
Algeria	2381740	193449	8.5
Benin	112620	46384	2.0
Niger	1267000	564211	24.8
Chad	284000	20339	0.9
Cameroon	440	89249	3.9
Nigeria	770	584193	25.7
For Niger basin		2273946	100.0

The Niger Basin

- Algeria and Chad together cover about 9% of the total Niger River basin, but there are almost no renewable water resources in these areas.

Source: FAO Dept. of Natural Resources Mgt. and Environment, 2022

Baseline Assessment River Niger

- 4200 km long from Guinea Highlands, through the Sahara desert, to the Niger Delta
- The water in the Niger River basin is partially regulated through dams.
- In Mali the Sélingué Dam on the Sankarani River,
- at Sotuba just downstream of Bamako,
- at Markala, just downstream of Ségou,
- The Kandadji Dam in Niger
- used to generate hydropower and for Irrigation.

BaselineRiver Niger

- the Kainji, Shiroro, Zungeru, and Jebba Dams in Nigeria
- The water resources of the Niger River are under pressure because of increased water abstraction for irrigation.
- We need to keep watch that if these Dams are built, there should not be adverse consequences downstream in Nigeria

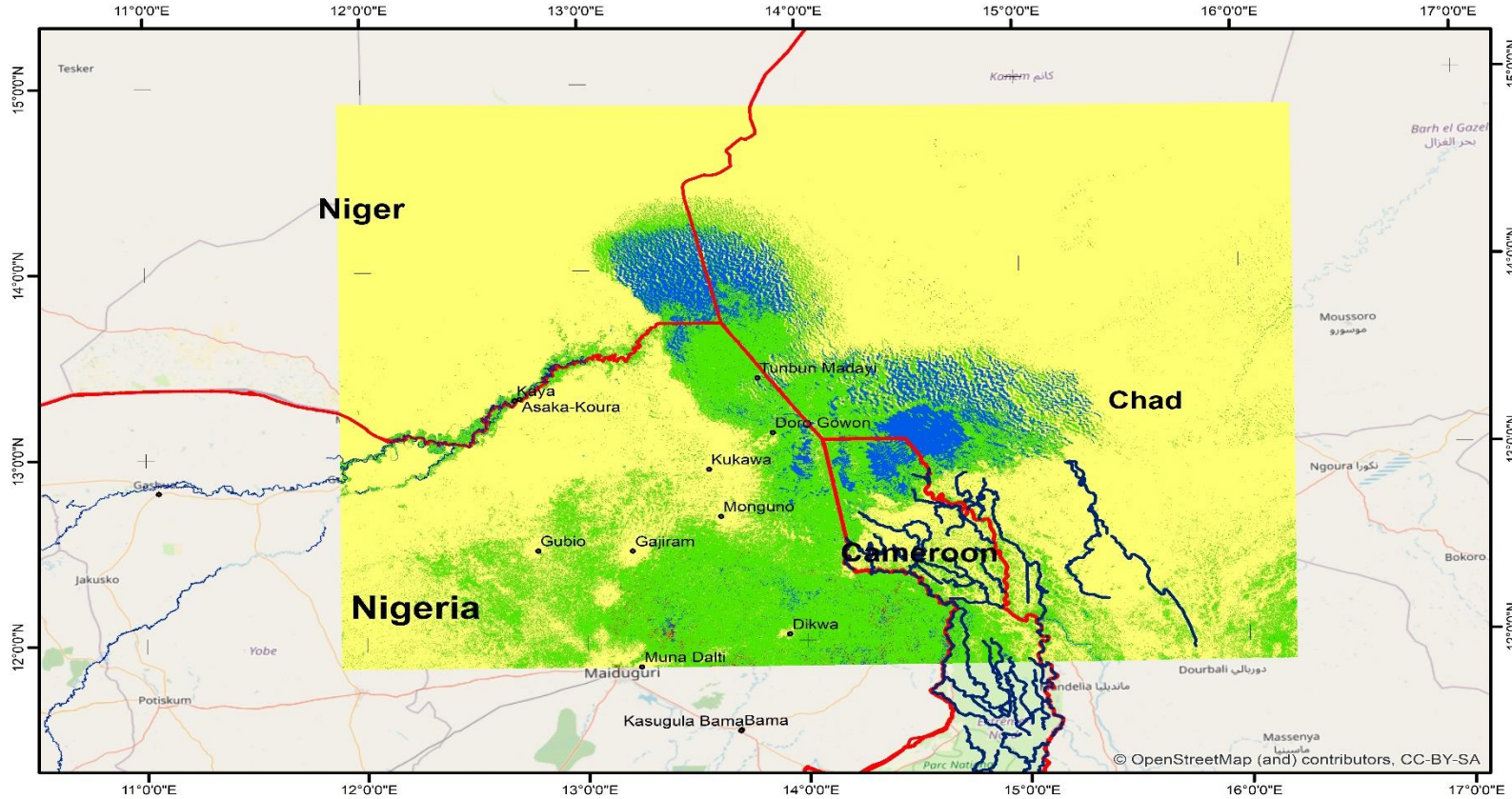
Baseline Assessment River Niger continued

- There is the water charter under the Niger Basin Authority which guides to take care of adverse effects downstream
- The Dams are to be financed by credible bodies like the world Bank who take Environmental Impact Assessment issues seriously into account

River Benue

- It originates from the Adamawa Plateau in northern Cameroon,
- It flows to west through the town of Garoua and Lagdo Reservoir in the Cameroon, and into Nigeria south of the Mandara mountains, passing through Jimeta, Ibi and Makurdi before meeting the Niger River at Lokoja
- The Kashimbila/Gomovo Multipurpose Buffer Dam at River Katsina-Ala in Takum Local Government Area of Taraba State
- The plant will provide 40 MW to the national grid

The Lake Chad



Source: Idakwo V.I (2022)
 GIS and Remote Sensing Specialist@
 DE-VICKSGEOSPATIAL.CO. (08163225311)

Coordinate System: Minna UTM Zone 32N
 Projection: Transverse Mercator
 Datum: Minna
 False Easting: 500,000.0000
 False Northing: 0.0000
 Central Meridian: 9.0000
 Scale Factor: 0.9996
 Latitude Of Origin: 0.0000
 Units: Meter

Legend

2022 Landcover

- Baresurface & Sand Dunes
- Vegetation
- Waterbody
- Builtup Areas
- International boundary
- Major River
- Settlements



Lake Chad

- Lake Chad has receded to about 10% of its original size and more rapidly over the last 50 years.
- The south Chad Irrigation Project that was established in the 1970s at shores of the Lake is now 40 kilometers away.
- River Yobe system which is the main source of recharge for the Lake from Nigerian side is now seasonal, without water during dry season. It dries up 80 kilometers to the Lake.
- This situation is further threatened by a feared river capture of the logone – Chari system, by river Benue head stream, to result in discharging into the Atlantic Ocean via the Benue.
- The Chari River flows from the Central African Republic through Chad into the Lake Chad, and principal tributary, the Logone River.
- It provides 90 percent of the water flowing into Lake Chad.

Opportunities in acceding to the Water Convention

- Convention contributes to:
 - Strengthening cooperation and prevention of conflicts over transboundary waters;
 - Promoting sound water management and protection at national level; and
 - Implementation of Integrated Water Resources Management, (IWRM), which is which is at the heart of SDG 6.5
- “a process that promotes coordinated development and management of water, land and related resources in order to maximise economic and social welfare in an equitable manner without compromising the sustainability of vital ecosystems”
Global Water Partnership, (2000)

Opportunities in acceding Cont'd

- water resources are under growing pressures from climate change, population growth, energy production and agriculture
- Cooperation on shared water resources is therefore vital to secure peace and stability,
- The Water Convention is an international environmental agreement and a unique international legal instrument and intergovernmental platform
- Provide support for integrated basin development,
- economic development and growth,
- the protection of natural resources and sustainable development,
- Energy, water resources, agriculture, animal husbandry, fisheries, forestry, Tourism
- Water – energy – food security Nexus

OpportunitiesCont'd

- Since the Water Convention's global opening in 2016, Chad (2018), Senegal (2018), Ghana (2020), Guinea-Bissau (2021) and Togo (2021) acceded
- The Convention has three central obligations or principal pillars:
 - 1) Prevent, control and reduce transboundary impacts
 - 2) Promote the use of transboundary waters in a reasonable and equitable way, and ensure their sustainable management,
 - 3) Prompt cooperation through agreements and joint bodies

Prospects for Implementation

- It establishes the principles and rules which form the basis for countries to work together (development of soft-law instruments like guidelines, recommendations, model provisions)
- It promotes cooperation on transboundary surface and ground waters and strengthens their protection and sustainable use of fresh water
- The Convention assists policy processes and technical cooperation from a global, regional, national and basic levels in addressing challenges
- It defends the rights and defines the obligations of both upstream and downstream countries.

Prospects for Implementation Cont'd

- The convention assists parties in negotiating agreements between countries, supporting their implementation as well as joint bodies
- Parties to the Water Convention implement the convention by:
 - entering into bilateral and multilateral agreements,
 - setting up joint bodies for transboundary water cooperation,
 - exchanging data and information,
 - carrying out joint monitoring and assessment of transboundary waters
 - taking other measures in line with their obligations under the convention

Prospects for Implementation cont'd

- The main tool to support the implementation of the water convention is its program of work which is adopted every three years by the meeting of parties
- The program of work is shaped to address political and technical challenges of Parties and non-Parties in managing their transboundary water resources.
- Thematic Capacity Building activities on issues such as climate change adaptation, water – food – energy – ecosystem nexus
- Facilitating financing for Transboundary Water Cooperation
- Its institutional framework ensures that no country is left alone to implement the convention

Prospects for Implementation Cont'd

- It also develops guidance to parties in such areas as adaptation to climate change and water allocation
- The National Policy Dialogues (NPD) on Integrated Water Resources Management form a part of the work program of the Water Convention.
- NPDs are a platform for policy discussions and preparation and implementation of National Policy Documents such as Governmental and Ministerial orders
- Building peace and stability, economic development and growth, the protection of natural resources and sustainable development.
- provides a simple, non-confrontational, non-adversarial, transparent and supportive mechanism to facilitate and support implementation of the Convention.

Conclusions

- At Regional Level
- Engage riparian countries for fairness in sharing the water resources Nigeria being at the course
- Utilise more of rivers Niger and Benue waters to support development projects rather than discharge into the Atlantic by impounding for HEP generation to power industries and for irrigation farming, Tourism etc
- Revive Lake Chad to sustain economic growth and improved livelihood through river diversions eg. River Hawul; River Congo

Conclusions cont'd

- Building peace and stability, economic development and growth, the protection of natural resources and sustainable development
- Cooperation on shared water resources to secure peace and stability, economic development and growth, the protection of natural resources and sustainable development in the country

- At National Level
- Develop needed institutional and legal framework to invoke effective participation of the catchment levels in the development of their area.
- Develop comprehensive plan covering the entire statute, those of federal government and the catchment areas;
- Develop Grievances redress mechanism for close relationship between the federal, state and local governments to avoid conflicts;
- Provide strict laws to prohibit point source pollution and control erosion;
- Give independence to the integrated water resources management commission and the guidelines on water and sanitation
- Support catchment area with relevant laws and operational mechanisms for collaborations in utilising the ecosystem services in their catchment areas.

THANK YOU FOR LISTENING