

**Ecole Normale Supérieure d'Atakpamé
(TOGO)**



(ENS-ATAKPAME) - Département de Physique-Chimie

**4TH FRIEND WATER CONFERENCE ON THE
HYDROLOGY OF THE GREAT RIVERS OF
AFRICA REPORT; FROM NOVEMBER 13 TO 20,
2021, COTONOU, BENIN**

Presented by LAMBONI Batablinè,

**Support of International Association of
Hydrological Sciences**

November 27, 2021

1 Introduction

Actors involved in fields related to hydrology have been meeting in Cotonou since Tuesday, November 16, as part of the 4th International Conference of Large African River Basins. For three days, they exchanged views on the issues of water resources management in the major African hydrological basins. Thus, during the three days of work, 239 researchers presented the results of their research in order to promote management education around hydrological basins in a context of climate change.

The conference was supported by sponsors and contributors from all over the world.

2 Opening, Procedure and Closure of the conference

Build the capacities of water researchers and technicians and discuss issues of water resource management in large African hydrological basins. This is the main objective of this international conference on the theme: "the hydrology of the great rivers of Africa". To this effect, Benin has been chosen to host this edition.

This conference is nothing more than a series of exchanges of ideas in the context of environmental changes. Thus, the coordinator of the FRIEND Water network of West and Central Africa (WCA), Ernest AMOUSSOU after having expressed his gratitude to the assistance, allowed himself to present the program of this congress. Indeed, this edition is structured in two phases which are summed up in training and communications.

The first phase has been consisted more clearly of training stakeholders on topics related to hydrometeorological events and hydrological modeling in a context where access to data is very difficult.

More than 50 young researchers and technical managers have registered to benefit from the various training courses.

Short course on Satellite for Hydrology An introductory course on the use of satellite data in hydrology: basic principles and use cases over several African basins. This 3 half-day course have been introduced the basic concept of satellite monitoring of some essential hydrological variables: rainfall; river water height and discharge; water surface extension ; soil moisture; variability of the total water stock inside a basin and also water color as an indicator of water quality and sedimentary transport.

Satellite data is also useful for producing land use and land cover maps, map the hydrographic network or topographical information. This training is open to people seeking for information on the family of the GR hydrological models who would like to get an overview about the potential use of the airGR and airGRteaching packages.

During the three days of communication (From November 16 to November 18), 239 researchers have presented the results of their research with the aim of promoting management education around hydrological basins in a context of climate change.

Eleven (11) sub-themes grouped into 229 communications have been planned to enhance this conference.

"At the end of this conference, four journals will be identified to publish the papers resulting from this conference" added Professor Nelly KELOME, vice rector in charge of university cooperation, representative of the rector of the University of Abomey Calavi, Professor Félicien AVLESSI.

Oral communications are presented either in French or in English. Only communications of which at least one of the authors has paid the registration fees are published in Acts.

From more than 230 abstracts, 132 papers were submitted to the PIAHS issue, and 56 were eventually accepted after a double peerreviewing process involving 122 reviewers from 21 countries, Oral communications and posters: Oral communications lasted 20 minutes (15 minutes of presentation and 5 minutes of questions and answers). Presentations are saved in Powerpoint or beamer format and provided, at from a USB key, to the person in charge of technical aspects at at least 10 minutes before the start of each session.

The blue room of the Cotonou Convention Center served as the setting for the international scientific conference on development organized by the FRIEND Water network of West and Central Africa (WCA). Having started on the morning of November 16, it ended on November 18, 2021. Several state and university personalities were present at this event

3 Participation

After being selected to present our work titled: Future changes in precipitation, evapotranspiration and streamflows in the Mono Basin of West Africa which has been accepted for communication, we have submitted a file to apply for funding to the International Association of Hydrological Sciences (SYSTA) which was accepted after a study.

This trip was a great opportunity for me which allowed me to share my knowledge with others and also benefiting from researchers, criticism or suggestions from others for the improvement of my research methods.

Our article was Published by Copernicus Publications on behalf of the International Association of Hydrological Sciences <https://doi.org/10.5194/piahs-384-283-2021>.

4 Acknowledgements.

All my gratitude to the International Association of Hydrological Sciences and local organizers who gave me financial support and took charge of my participation in 4th International Conference on the Hydrology of the Great Rivers of Africa, Cotonou, Benin. We are also grateful to the anonymous reviewers whose thoughtful and constructive comments have improved the quality of the article.

5 Financial support.

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6 Annexe: illustrative photos and sponsors



Figure 1: illustrative photo of Opening conference



Figure 2: illustrative photo of Dr LAMBONI in the Mono river (training courses)



Figure 3: illustrative photo of Dr LAMBONI et his colleagues in the Mono river (training courses)



Figure 4: illustrative photo of Dr LAMBONI et his colleagues in the Mono river (training courses)

6 ANNEXE: ILLUSTRATIVE PHOTOS AND SPONSORS



Figure 5: illustrative of sponsor