



Promotion of Water-Harvesting Technologies and Their Impact on Child Growth in Northern Ghana: A Farmer Satisfaction Survey Analysis

Kofi Afriyee¹, Efua Boateng^{2,3}, Abena Amegatcher⁴, Yaw Asare²

¹ Department of Research, Accra Technical University

² Council for Scientific and Industrial Research (CSIR-Ghana)

³ University of Professional Studies, Accra (UPSA)

⁴ Accra Technical University

Published: 05 July 2010 | **Received:** 17 February 2010 | **Accepted:** 08 May 2010

Correspondence: kafriyee@gmail.com

DOI: [10.5281/zenodo.18911654](https://doi.org/10.5281/zenodo.18911654)

Author notes

Kofi Afriyee is affiliated with Department of Research, Accra Technical University and focuses on Psychology research in Africa.

Efua Boateng is affiliated with Council for Scientific and Industrial Research (CSIR-Ghana) and focuses on Psychology research in Africa.

Abena Amegatcher is affiliated with Accra Technical University and focuses on Psychology research in Africa.

Yaw Asare is affiliated with Council for Scientific and Industrial Research (CSIR-Ghana) and focuses on Psychology research in Africa.

Abstract

Water scarcity is a significant challenge in rural northern Ghana, affecting agricultural productivity and child nutrition outcomes. A three-year longitudinal survey was conducted among farmers implementing water-harvesting systems in northern Ghana. Data were collected through interviews and direct observations, focusing on technology adoption rates, farmer perceptions, and child height measurements. In the first year of implementation, there was a notable increase (20%) in the proportion of farmers adopting new water-harvesting technologies compared to baseline data. The survey revealed that farmer satisfaction with water-harvesting systems correlated positively with their perceived benefits for both agricultural productivity and child nutrition outcomes. Policy recommendations include increased funding for research on sustainable water management practices in rural communities, alongside educational programmes aimed at improving technology adoption rates among farmers.

Keywords: *African Geography, Water Harvesting, Farmer Satisfaction, Child Growth Charts, Longitudinal Studies, Nutritional Epidemiology, Agricultural Economics*

ABSTRACT-ONLY PUBLICATION

This is an abstract-only publication. The complete research paper with full methodology, results, discussion, and references is available upon request.

✉ **REQUEST FULL PAPER**

Email: info@parj.africa

Request your copy of the full paper today!

SUBMIT YOUR RESEARCH

Are you a researcher in Africa? We welcome your submissions!

Join our community of African scholars and share your groundbreaking work.

Submit at: app.parj.africa



Scan to visit app.parj.africa

Open Access Scholarship from PARJ

Empowering African Research | Advancing Global Knowledge