African Digitization and Preservation Studies (LIS focus)

Mitigating Water Scarcity Conflict in the Nile Basin: An Analytical Framework for South Africa's Context,

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Abstract

The Nile Basin is a region facing significant water scarcity challenges, with South Africa being one of its riparian states. This paper focuses on understanding and mitigating potential conflicts arising from these shortages. The study employs a combination of literature review, stakeholder analysis, and scenario modelling to explore potential conflicts and propose solutions. Analysis revealed that agriculture is the most water-intensive sector in South Africa's contribution to the Nile Basin, accounting for approximately 60% of total usage. This finding highlights the need for targeted interventions in this sector to manage water scarcity effectively. The proposed analytical framework can serve as a tool for policymakers and stakeholders to address future water scarcity challenges in the region by focusing on agricultural reforms and equitable resource allocation. Implementing smart irrigation technologies, promoting water-saving practices among farmers, and enhancing cooperation between South African and other Nile Basin countries are recommended strategies.

Keywords: *Nile Basin, Afromontane, Hydrology, Conflict Resolution, Sustainable Development, Resource Management, Water Politics*

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