

# Nile Eco-VWU

## Nile Ecosystems Valuation for Wise-Use Research Project



### Case Study Brief

## *Dinder National Park, SUDAN*

### BACKGROUND

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The Blue Nile originates from the steep mountains of the Ethiopian Plateau and has a total length of 1,450 kilometres (900 mi), of which 800 km in Sudan. On its way North, the Blue Nile is joined by 2 tributaries (Rahad River and Dinder River), where **Dinder National Park (DNP)** is found adjacent to Sudan border with Ethiopia. DNP designated as Wetland of International Importance (Ramsar site) at 2005.

Dinder wetland boundaries follow the Rahad river at latitude 12° 26 N and longitude 35 ° 02 E continuing in a north western direction up to latitude 12 ° 42 N and 34° 48 E at River Dinder. It further continues up to latitude 12° 32 N and longitude 34 °32 E along KhorKenana. It then diverts slightly to the South East, to latitude 11 ° 55 N and longitude 34 ° 44 E, to be enclosed by the Sudan- Ethiopian border. Elevation: (At Ethiopian plateau topping is 3133 m asl. It ranges from 515m asl at the South-Eastern to 100 m asl at North- Eastern reaches of the park in the Sudan.

Dinder wetland covers an area of 1.084.600 hectares (**10.291Km<sup>2</sup>**). It lies along the transition ecotone zone between two floristic regions; the Ethiopian high plateau and the arid Saharan- Sudanian biomes. It also lays along the boundary of two major faunal realms of the world i.e. the paleoartic and Ethiopian region, with high diversity of the floral and faunal communities.

### CURRENT ECOSYSTEM SERVICES

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- Back swamps have distinctive environmental, social and economic values.
- Bird-life is generally rich along the whole of the Nile, which constitutes one of the main routes of migration to and from Africa.
- Acacia nilotica forests provide an important breeding habitat and support the many population of migratory and resident birds species.



- Fishing and basin cultivation are important economic practices in the Nile reservoirs and back swamps.
- There are about 40 mayas and pools formed by meanders and oxbows along the Rahad and Dinder rivers drainage systems in DNP.
- Most of the back swamps are local communities' traditional cultivation farm.
- The back swamps are important because they are source of water and of the most nutritious grasses to the herbivores (wild and domestics) specially during the most severe part of the dry season.

## CHALLENGES

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- Acacia nilotica forests are facing tree felling for their economic values for construction and furniture.
- Balance between Socio-economic values and conservation towards sustainable development and wise management.
- Soil erosion from the upstream of the basin and the subsequent sedimentation in the down- stream area is an immense problem threatening the existing and future water resources development in the Nile basin.
- Other problems and threats to Wetlands:
  - 1) Horizontal expansion of agricultural
  - 2) Urban development in wetland areas
  - 3) Loss of vegetation covers and increased sedimentation.



## GENDER AND EQUITY

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It is clear that the social and cultural structures impact the access to the resources, services and affect the decision-making process. It is noted that youth men and women's participates in the activities, Men and women's participation in, and benefits gained from relevant decision making give them some power in regional irrigation initiatives, and resource recovery and reuse. But it should be mentioned that women lack engagement in decision making and policy development (at all levels) on agriculture, and use of land and ecosystems. Also assessing the opportunities including access to land and water, there are no equal opportunities for women and men for productivity and income.

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**NBCBN Project: "Nile Ecosystems Valuation for Wise-Use, Nile-Eco-VWU"**

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