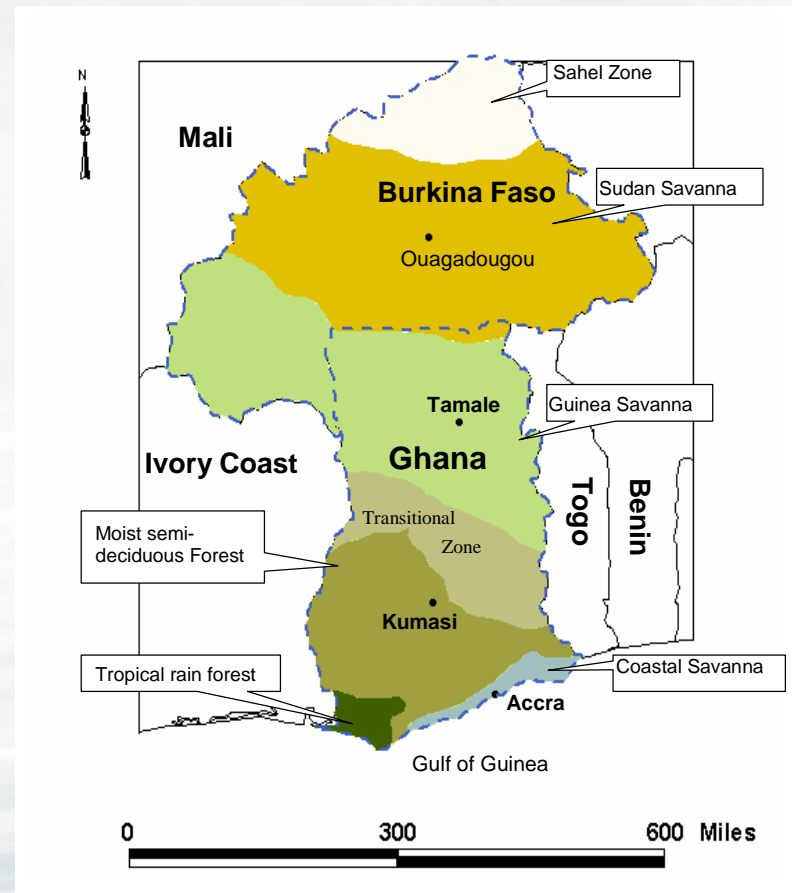


West African Research Agenda

Coordinated by
IWMI's Ghana Office



Thematic Overview

1. IWRM in the Volta and Niger basins
2. Understanding technology adoption & dissemination
3. Assessing realities, potential & limitations of groundwater use
4. Developing irrigation policies
5. Minimizing malaria
6. Adding value to liquid and solid waste

1. IWRM in the Volta and Niger basins

Impacts of land & water management (land-use changes, in/formal irrigation, reservoir construction, trans-boundary water allocation, etc.) on social, economic, hydrological and environmental & health characteristics at different scales

Projects: GLOWA-Volta, CP Small Reservoirs, CP Trans-boundary Water Governance, CA-Volta, CP informal irrigation (in pipeline)

Geographical focus: Ghana, Burkina Faso (and Mali) Limpopo, Sao Francisco

Partners: ZEF, SEI, IFPRI, WARDA, NARES (SARI, INERA, WRI, UG, ..), WRC, PhD students; IWMI-SA/HQ

2. Understanding technology adoption and dissemination

Documentation of best practices and technologies for farm- and rangeland management (rainwater harvesting, supplementary irrigation, water lifting devices, soil fertility restoration) with emphasis on

- a) the analysis of factors facilitating or limiting adoption
- b) the documentation of the impact of these practices on livelihoods and food production
- c) the development of corresponding manuals and dissemination guidelines

Projects: VW workshop linking different networks; part of the “Investment study”; two proposals

Geographical focus: SSA, West Africa
(Niger, Mali, Burkina Faso, Senegal, Ghana)

Partners: EnterPrise Works, FAO, Humboldt University Berlin; IWMI-SA

3. Assessing realities, potential & limitations of groundwater use

Pilot study based on surveys of secondary (grey or project) literature

Geographical focus: Ghana, Burkina Faso, Mali and Niger

Project: CA (similar studies in Eastern and Southern Africa)

4. Irrigation Policy Development

Support of the development of a stakeholder-based irrigation policy which addresses informal irrigation, private sector involvement, management transfer, etc.

- **Projects:** FAO-TCP (approved), one proposal
- **Geographical focus:** Ghana, Subregion (proposed)
- **Partners:** GIDA/MoFA + GhanaWP, FAO

Subproject: Policy dialogue towards the recognition of (wastewater) irrigated urban and peri-urban agriculture

- **Project:** RUAF - International Network of Resource Centres on Urban Agriculture and Food Security
- **Geographical focus:** Ghana, Nigeria (2005), Sierra Leone (2005)
- **Partners:** Networks of *Urban Harvest* & RUAF (IAGU, MDP, UN-Habitat; CIP)

Linked to wastewater studies, Theme 5

5. Minimizing malaria risk associated with irrigation

Projects: (a) Malaria and Urban Agriculture (one staff PhD), (b) Malaria risk mapping in the Volta Basin (part of GLOWA-Volta)

Geographical focus: Ghana (requires extension e.g. to Burkina Faso, Togo, Mali, Senegal, Benin)

Partners: Liverpool School of Tropical Medicine, Noguchi Institute, KCCR, KNUST, KMA, AMA, FAO

6. Safe & viable options for solid and liquid waste recycling

Adding value to municipal organic waste and wastewater for crop production in urban and peri-urban areas

Solid waste

Nutrients

Nightsoil

Organic matter

Water

Wastewater

6.1 Re-use options for liquid & solid waste incl. black water in agriculture

To analyse the actual viability of “win-win situations” for municipalities and farmers through

- (i) composting of municipal organic waste,
- (ii) co-composting of solid waste with nightsoil, and
- (iii) direct nightsoil application

Projects: Canada, Switzerland, France

Geographical focus: Four cities in Ghana and Burkina; subregional consultancies

Partners: EAWAG/SANDEC, Waste Management Depts., local universities, MoFA

6.2 Reducing health risk from polluted irrigation water

- To assist WHO with options for health risk reduction which go beyond current guidelines
- Multiple foci approach on different entry points for risk reduction (pollution source, farm, market, household, policy level)

Projects: CP (in pipeline), two staff PhDs

Geographical focus: Ghana & Burkina Faso
(subregion through consultancies)

Partners: WAU, local universities, RUAF,
=> knowledge dissemination partners

Thanks

