

Gender, Indigenous Peoples Presence and Water Assessment for the Transboundary Mono River Basin

Component 3 of G4DR - D3.8



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Executive Summary

Incorporating gender and social inclusion (GESI) into water management, including transboundary groundwater management, is widely viewed as critical to unlocking the full benefits of interventions aimed to improve management toward realization of a range of worthwhile goals such as food security, climate resilience and poverty reduction. Nonetheless, guidance and recommendation tailored to interventions in specific zones of activity is often absent or vague. The goal of this report is to generate tailored recommendations for incorporating GESI into activities in the Mono Basin (shared by Benin and Togo), as part of Groundwater for aDvancing Resilience (G4DR) project activities.

Groundwater is a critical resource for water and food security, particularly in rural and peri-urban areas. However, its governance and use are deeply influenced by gender norms, socioeconomic inequalities, and limited institutional inclusiveness. Women, youth, and marginalized groups are central to groundwater use but remain marginalized in its governance. This assessment examines how GESI dimensions intersect with groundwater management in the Mono. Key findings include:

- Gender, agricultural land and water uses: Women play a central role in small-scale food production but face constraints in accessing irrigation infrastructure, pumps, and credit.
- Gender, sanitation, and health: Limited access to groundwater for sanitation disproportionately affects women and girls, impacting menstrual hygiene, maternal health, and disease burdens.
- Decision-making and empowerment: Women and marginalized groups are underrepresented in groundwater governance structures, limiting their influence and participation.
- Youth and groundwater: Youth are key labourers in groundwater-dependent activities but are frequently excluded from governance and capacity-building programs.
- Vulnerable and marginalized groups: Intersectional factors such as disability, ethnicity, and poverty shape groundwater access and governance, often to the detriment of marginalized communities.

The assessment highlights the need for equitable access, inclusive governance, and socially responsive groundwater planning to achieve the Sustainable Development Goals (SDGs) and ensure water security. Recommendations include improving education and technical training, enhancing land and resource rights, ensuring inclusive governance, expanding gender-sensitive infrastructure, supporting groundwater-based livelihoods, and strengthening climate resilience and data systems.

By making GESI central to groundwater management, the project aims to address inequalities, enhance sustainability, and improve the legitimacy of groundwater systems.

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1. Introduction: Integrating gender equality and social inclusion into groundwater management

Groundwater is not merely a hydrological asset—it is a social, cultural, and economic lifeline. Its value cannot and should not be reduced to volumetric extraction figures alone. As the World Bank (2023) emphasizes, groundwater underpins water and food security, playing a vital role in poverty reduction, livelihoods enhancement, and climate-resilient development. For billions, especially in rural and peri-urban areas, it is the primary—sometimes only—source of clean water. Despite this, groundwater remains largely invisible in policy and governance, often mismanaged and overexploited due to its nature as a common-pool resource that lacks clear mechanisms for equitable and sustainable stewardship.

Within the framework of the Sustainable Development Goals (SDGs), groundwater is directly and indirectly tied to several key goals. It is foundational to SDG 6 (clean water and sanitation) but also contributes meaningfully to SDG 1 (poverty eradication), SDG 2 (zero hunger), SDG 5 (gender equality), SDG 11 (sustainable cities), SDG 13 (climate action), and SDG 15 (life on land). Realizing the transformative potential of groundwater for these goals requires an explicit and intentional focus on Gender Equality and Social Inclusion (GESI)—not as an afterthought, but as a central design and implementation principle.

1.1. Objectives and Approach

In this assessment, we examine how GESI dimensions intersect with groundwater management in the transboundary Mono Basin, shared by Benin and Togo, to generate recommendations for incorporating GESI into groundwater management. Our analysis is guided by the following considerations:

- Context: i) How gendered inequalities in education, income, land tenure, and poverty influence groundwater access and decision-making; and ii) The role of intersectionality in shaping groundwater vulnerability and resilience.
- Gender, agricultural land and water uses: i) The divide between male-dominated commercial irrigation and female-led smallholder production; and ii) Constraints in women's access to irrigation infrastructure, pumps, and credit.

- Gender, sanitation, and health: i) How lack of groundwater access affects menstrual hygiene, maternal health, and disease burdens; and ii) The role of women in ensuring household water quality and health.
- Decision-Making and Empowerment: i) Degree and depth of women’s and marginalized groups’ involvement in groundwater committees, planning, and governance; and ii) Strategies for transformative inclusion, leadership development, and accountability.

Box 1: Statement on Indigenous and Local Communities in the Mono Basin

The Groundwater for Advancing Resilience (G4DR) project operates within defined basin case sites across its participating countries. These basins are among the most densely populated regions in their respective contexts, marked by long-standing histories of migration, intermarriage, and overlapping settlement patterns. Consequently, they are ethnically diverse and socially complex areas where community identities are mixed and fluid rather than clearly delineated. Many villages and settlements comprise members of multiple ethnic groups as well as migrants from neighbouring regions, forming a mosaic of cultural, linguistic, and social affiliations.

Within this setting, the term “indigenous communities” does not refer to a single, isolated group or tribe. Instead, it applies more broadly to larger ethnic groups and their associated village clans and lineages, whose members coexist within these shared landscapes. As such, in implementing its activities, the G4DR project inherently works with these indigenous and traditional peoples, though not by singling them out as separate entities. They are a prevalent and integral part of the population in all our basin sites, contributing to the diverse social and ecological knowledge systems that underpin local water management practices. Within the G4DR basins, the project context is therefore best understood in terms of a diversity of ethnic and traditional groups whose collective knowledge and practices are essential to sustainable groundwater management.

The findings and recommendations presented in this report take into full consideration this diversity of ethnic and cultural composition across the G4DR basins. All analysis and proposed actions reflect an awareness of the complex social fabric within which groundwater governance operates, ensuring that interventions are inclusive, context-sensitive, and responsive to the realities of mixed and interdependent communities. In doing so, the report acknowledges that

local participation, knowledge, and customs are central to achieving equitable and sustainable outcomes.

The G4DR team is committed to upholding the principles of Free, Prior and Informed Consent (FPIC) in all community interactions and engagements. This includes ensuring that participation in project activities is voluntary, based on transparent communication, and undertaken with full awareness of the project's objectives, potential impacts, and expected outcomes. All field activities adhere to ethical standards of respect, inclusivity, and cultural sensitivity, recognizing and valuing the diverse identities, traditions, and governance systems present across the basin communities.

1.2. Gender and groundwater

Women and girls are central actors in groundwater use but remain marginalized in its governance. They are primarily responsible for domestic water collection, sanitation, small-scale farming, and family health, all of which are deeply reliant on groundwater. Yet, decision-making roles in groundwater governance structures, including community water user associations and local government forums, are often occupied by men. As a result, the systems governing this critical resource frequently fail to reflect or respond to women's priorities and lived realities.

Studies, including those by Nigussie et al (2018) and Nigussie and Mandara (2017), have shown stark gender disparities in:

- Uses of groundwater (e.g., irrigation vs. domestic and hygiene needs);
- Access to infrastructure and technologies, such as boreholes and pumps;
- Involvement in groundwater monitoring and planning;
- Voice and influence in decision-making bodies; and
- Capacity to adapt to changes like aquifer depletion and contamination.

Women's participation is often symbolic rather than substantive. Social norms, cultural expectations, time poverty due to care responsibilities, and lack of technical training serve as persistent barriers. Nigussie and Mandara (2017) reminds us that numerical representation alone—such as fulfilling quotas—does not guarantee empowerment. Genuine participation requires creating enabling environments that value women's knowledge, support their leadership, and address power asymmetries in both formal and informal governance systems.

1.3. Youth and groundwater

Youth represent both the present and the future of groundwater stewardship. In many regions, young people—particularly those in rural settings—are key labourers in smallholder agriculture, water fetching, and livestock care, all of which depend heavily on groundwater. However, youth are frequently excluded from groundwater governance, policy dialogues, and capacity-building programs (Nigussie and Mandara, 2017).

Key challenges include:

- Limited access to land and water rights, which constrains productive use.
- Lack of representation in water user associations or planning committees.
- Underrepresentation in groundwater-related vocational and technical education; and
- Few economic incentives or employment opportunities in groundwater management or conservation.

Integrating youth meaningfully requires targeted investments in skills development, access to data and innovation (e.g., digital water monitoring tools), entrepreneurship, and mechanisms that enable youth voice in institutional processes. This not only addresses intergenerational equity but also leverages the dynamism and innovation capacity of young people in adapting to groundwater challenges exacerbated by climate change and population growth.

1.4. Vulnerable and marginalized groups and groundwater

Beyond gender and age, vulnerability in groundwater access and governance is shaped by intersecting factors such as disability, ethnicity, caste, indigeneity, geographic isolation, and poverty status. Many marginalized communities live in areas where groundwater quality is poor, aquifers are overdrawn, or infrastructure is inadequate or discriminatory (Adams et al, 2018).

For example:

- Indigenous groups may have traditional water knowledge systems that are ignored in formal water governance.
- Persons with disabilities may face physical barriers in accessing community wells or boreholes.
- Ethnic minorities in politically marginalized areas may be bypassed in infrastructure planning.

Inclusion here must go beyond "invitation to participate"—it must involve deliberate efforts to recognize, accommodate, and empower these groups in water resource planning and benefit-sharing. Legal frameworks, institutional mandates, and implementation mechanisms must align to

protect customary rights, ensure non-discriminatory access, and promote socially just water allocation.

2. Methods

By making GESI central to groundwater management, we not only address longstanding inequalities but also enhance the sustainability, resilience, and legitimacy of groundwater systems. Equitable access, inclusive governance, and socially responsive groundwater planning are prerequisites for achieving the SDGs and ensuring water security.

For this assessment, we consulted various data sources in Benin and Togo, which share the Mono River Basin (see Figure 1). These sources provided general information and insights into the basin, its people, and their livelihoods linked to GESI and groundwater management. Additionally, we conducted field visits and spoke with community members in four communities to discuss pertinent issues. The goal of the discussions were to gain on-the-ground insights into issues already identified through data and literature rather than gathering extensive data. Figure 1 shows the location of the villages that we visited, namely: Houéyogbé and Athiémé in Benin and Datcha and Korikossa (Nangbeto) in Togo. Findings from these discussions is presented in Section 3 of this document. (Annex 1 provides more details with regards to these visits)

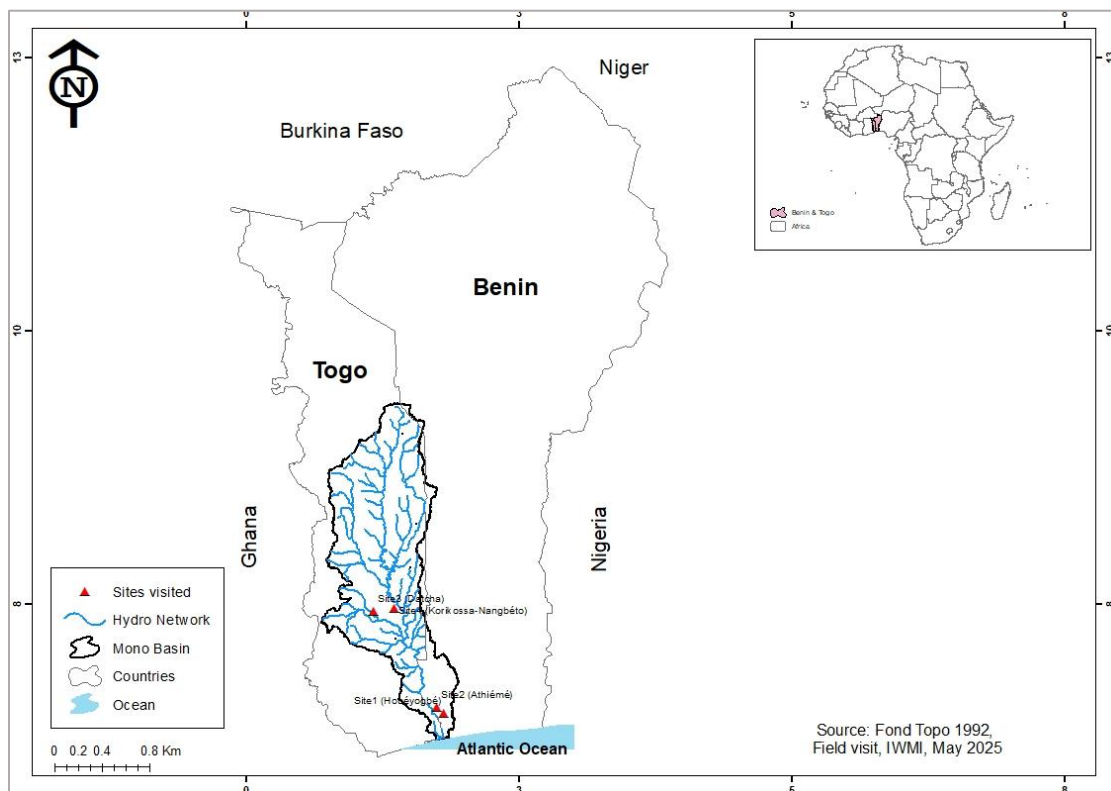


Figure 1. Sites visited during the gender and water assessment mission in the Mono Basin

3. Findings

Groundwater plays a crucial role in ensuring water and food security, particularly in rural and peri-urban regions of the Mono River Basin, which spans parts of Togo and Benin. However, its governance and use are deeply influenced by entrenched gender norms, socioeconomic inequalities, and limited institutional inclusiveness. Applying a GESI lens to groundwater management is essential not only to achieve equitable outcomes but also to enhance sustainability, resilience, and community ownership.

Despite the centrality of groundwater to daily life, particularly for women and youth, decision-making power over its use and infrastructure development remains heavily male-dominated. Women, youth, and marginalized groups are often left out of formal governance spaces, despite bearing the greatest burden of water collection and being primary users of groundwater for domestic and agricultural activities.

3.1 Socio-economic context

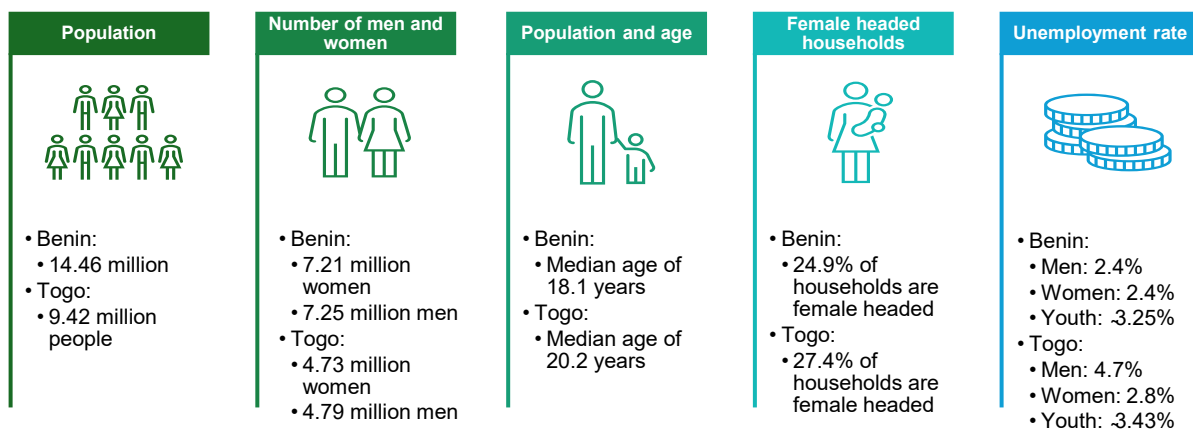


Figure 2: Representation of socio-economic context data for Benin and Togo (MacroTrends, 2025; Worldometer, 2025; TheGlobalEconomy.com, 2024a; TheGlobalEconomy.com, 2024b; Trading Economics, 2024; World Bank, 2024a)

According to the GWP (2024) the estimated population of the Mono Basin is approximately 4 million people. Estimated population in the Togolese portion of the Mono Basin is approximately 2.5 to 2.6 million people (around 2018 estimate) (GWP, 2024), according to regional growth rates and population data from national censuses. This implies that the population in the Beninese portion is estimated to 1.4 to 1.5 million people. However, it is noteworthy that 88% of the basin lay in Togo, while 12% lay in Benin. Therefore, there is a higher population density in the Beninese

portion of the basin than in the Togolese portion (yy people/km²). According to the most recent general population census (INSAE, 2018), women comprised most of the population in the basin at 51.57%, compared to 48.43% for men.

The Mono Basin is characterized by a young and predominantly rural population (MAP & UNCDF, 2017). Women represent over half of the population, and youth (ages 15–35) make up more than 60% in both Togo and Benin (UNICEF, 2021a). However, both countries are marked by significant disparities in education, employment, and access to resources across gender and age lines (World Bank, 2020a).

In Togo, 69% of rural households live below the poverty line, and female-headed households have a poverty rate of 57.5% (World Bank, 2021a, UNDP, 2020). Similarly, in Benin, 24.9% of households are headed by women, with female-headed households more concentrated in the Mono region (FAO, 2019; INSAE, 2018). Employment is predominantly informal, with women concentrated in lower-paid, insecure jobs (ILO, 2022a). Women own only 13% of land in Benin and face similar barriers in Togo (FAO, 2019; UN Women, 2021a).

3.2 Implications of gendered inequalities for groundwater management in the Shire

3.2.1 Education gap – implications for groundwater access and management in the Shire

In Benin and Togo, the education gap stands at 36% (UNESCO UIS, 2021) highlighting the disparity between male and female literacy rates and school completion. Despite national efforts, female educational attainment remains significantly lower (UN Women, 2021b), limiting women's ability to engage in technical roles, groundwater governance, and economic leadership. Gender disparities in education—where adult female literacy in Togo is 41% compared to 77% for men—restrict women's access to technical information about groundwater systems (World Bank, 2021b; Togo Ministry for Education, 2019). This affects their ability to engage in governance structures, access vocational training, or adopt water-saving technologies. In Benin, efforts to expand girls' education are ongoing, but the digital divide remains stark, limiting both women's and girls' access to data, training, and innovation (FAO, 2020; UNICEF, 2022).

- **Management risk:** The gender disparities in education in Benin and Togo present significant risks and opportunities in groundwater management. The limited educational

attainment among women restricts their ability to access technical information about groundwater systems, which in turn affects their participation in governance structures and vocational training programs. This lack of access to technical knowledge and training poses a risk to effective groundwater management, as it limits the pool of skilled individuals who can contribute to sustainable practices and decision-making processes.

- **Opportunity:** Addressing these gender disparities also presents opportunities for improving groundwater management. By expanding educational opportunities for women and girls, and bridging the digital divide, it is possible to enhance their access to data, training, and innovation. This can empower women to take on more technical roles and engage more effectively in groundwater governance. Additionally, promoting GESI in educational initiatives can lead to a more diverse and inclusive workforce, which can drive innovation and improve the overall effectiveness of groundwater management strategies.

3.2.2 Income gap – implications for groundwater access and management in the Shire

In Benin and Togo, income disparities between men and women are significant, with women earning on average 30% less in Benin and 32% less in Togo (ILOb, 2022; World Bank, 2021c). These disparities are largely due to occupational segregation, informality, and limited access to productive assets, which restrict women's capacity to pay for water, invest in water technologies, or manage water-related businesses (UN Women, 2021c). As a result, women often struggle to contribute to borehole maintenance or household water tariffs and bear a higher financial burden when potable water is monetized.

- **Management risk:** The income disparities in Benin and Togo present significant risks and opportunities in groundwater management. Women's limited earnings restrict their ability to pay for water, invest in water-related technologies, and participate in entrepreneurial ventures. This financial constraint affects their capacity to contribute to borehole maintenance or household water tariffs, posing a risk to effective groundwater management
- **Opportunities:** Addressing these income disparities also presents opportunities for improving groundwater management. By GESI in economic initiatives, it is possible to enhance women's financial capacity to invest in water technologies and manage water-related businesses. This can empower women to take on more significant roles in groundwater governance and contribute to sustainable practices and decision-making

processes. Additionally, bridging the income gap can lead to a more diverse and inclusive workforce, driving innovation and improving the overall effectiveness of groundwater management strategies.

3.2.3 Land tenure gap – implications for groundwater access and management in the Shire

According to the FAO Gender and Land Rights Database (FAO, 2019), women in Benin own approximately 13% of land; in Togo, women's ownership is about 18%, implying 87% and 82% are male owned, respectively. Despite progressive land laws, such as Togo's 2018 land code, implementation lags, especially in rural areas (République Togolaise, 2018; World Bank, 2022). Without secure land, women cannot access water rights, credit, or irrigation investments—all of which are critical for groundwater-based livelihoods. Limited land ownership severely restricts women's and youth's access to irrigation, water rights, and groundwater-related services. In Benin, only 6% of women have legally secured land rights; in Togo, land is overwhelmingly owned by male household heads (USAID, 2021, Landesa, 2020). Without land, women cannot secure credit for water infrastructure or be recognized as formal stakeholders in water user groups. For example, in both customary and statutory systems, land in Togo is typically held in the name of male household heads, limiting women's legal recognition in resource governance, including water (UN-Habitat, 2020; OECD, 2019).

- **Management risk:** The limited land ownership among women in Benin and Togo presents significant risks and opportunities in groundwater management. The lack of secure land rights restricts women's access to water rights, credit, and irrigation investments, which are essential for groundwater-based livelihoods. This limitation affects their ability to participate in groundwater governance and access vocational training programs, posing a risk to effective groundwater management. Without secure land, women cannot contribute to sustainable practices and decision-making processes, limiting the pool of skilled individuals who can manage groundwater resources effectively.
- **Opportunities:** Addressing these land ownership disparities also presents opportunities for improving groundwater management. By strengthening the implementation of progressive land laws and ensuring that women have secure land rights, it is possible to enhance their access to water rights, credit, and irrigation investments. This can empower women to take on more significant roles in groundwater governance and contribute to sustainable practices. Additionally, promoting GESI in land tenure initiatives can lead to a

more diverse and inclusive workforce, driving innovation and improving the overall effectiveness of groundwater management strategies.

3.2.4 Poverty among female-headed households – implications for groundwater access and management in the Shire

Women in Benin report higher levels of moderate to high lived poverty than men—81% of women compared to 75% of men (Afrobarometer, 2022). While not a direct monetary poverty rate, this indicates significantly greater deprivation among female-headed and female-managed households. In Togo, poverty is more prevalent in female-headed households (45.7%) than in male-headed ones (45.2%) (World Bank, 2024b). These households are more likely to lack access to quality water infrastructure, face health vulnerabilities, and be excluded from economic opportunities. This heightened vulnerability to water scarcity, climate shocks, and groundwater contamination is exacerbated by limited resilience capacity, making it harder for these households to cope with groundwater depletion or contamination, especially during climate extremes.

- **Management risks:** The high poverty rates among female-headed households in Benin and Togo present significant risks and opportunities in groundwater management. The lack of access to quality water infrastructure and economic opportunities heightens their vulnerability to water scarcity, climate shocks, and groundwater contamination. This limited resilience capacity poses a risk to effective groundwater management, as it restricts the ability of these households to cope with groundwater depletion or contamination, especially during climate extremes.
- **Opportunities:** addressing these poverty rates also presents opportunities for making groundwater more accessible. By promoting GESI in economic initiatives, it is possible to enhance the resilience capacity of female-headed households. This can empower women to take on more significant roles in groundwater governance and contribute to sustainable practices and decision-making processes. Additionally, bridging the poverty gap can lead to a more diverse and inclusive workforce, driving innovation and improving the overall effectiveness of groundwater management strategies.

3.3 Mono Basin: Gender and agricultural land and water uses

Women play a central role in small-scale food production, often using groundwater for homestead gardening (Alaofè et al, 2016). Despite this, their access to irrigation infrastructure remains limited. In Benin, women’s work includes sowing, weeding, watering, harvesting, and post-harvest

processing, while in Togo, women dominate subsistence farming. Yet only a small fraction of water infrastructure is planned with women's agricultural needs in mind (Alaofè et al, 2016).

Typically, West Africa cultural norms restrict women's ability to inherit or purchase land, making it harder to secure long-term access to water (Ravikumar et al, 2023). Programs to modernize agriculture have struggled to fully incorporate women's needs into infrastructure planning (Ravikumar et al, 2023).

3.4 Gender, sanitation, and health

Limited access to groundwater for sanitation disproportionately affects women and girls. In Benin, only 13% of households have access to improved sanitation (Gaffan (2022)). While exact national figures for safely managed systems in Togo are scarce, the WHO/UNICEF Joint Monitoring Programme indicates rural sanitation coverage in Benin is approximately 7% basic and suggests even lower levels for Togo. In West Africa, safely managed sanitation often falls below 10 % in rural areas (WHO/UNICEF Joint Monitoring Programme, 2020). The absence of menstrual hygiene facilities leads to school absenteeism among adolescent girls (UN Women, 2024), and women's health is compromised due to exposure to unsafe environments when collecting water or using public latrines.

Women also face risks of harassment and violence when accessing water and sanitation facilities in isolated or poorly lit areas (Tallman et al, 2023). These issues are often not addressed in water infrastructure planning, which remains dominated by male perspectives. For example, in 2020, women comprised less than 4 % of municipal councillors, meaning water infrastructure decisions are overwhelmingly male led (Comair, 2022).

3.5 Decision-making and empowerment

Despite legal frameworks in both countries mandating gender parity in water governance (e.g., Benin's ACEP regulations), women remain underrepresented in groundwater decision-making bodies (ACEP, 2021). In Benin's national assembly, women hold only 6% of seats (Interparliamentary Union, 2023). In Togo, representation has risen but remains under 20% in most sectors (UN Women, 2022).

Water user associations and committees often operate with male leadership, while women participate only symbolically (World Bank, 2020b). Customary norms frequently override statutory rights, further limiting women's roles (World Bank, 2020b). Youth are also largely absent from

decision-making spaces and vocational training programs related to groundwater (UNICEF, 2021b).

3.6 Summary of field visit discussions

Based on the focus group discussions across the four communities, several common issues and themes emerged related to groundwater access, governance, equity, and climate impacts. These can be grouped into five overarching categories:

3.6.1 Awareness and perceptions of groundwater

- All communities recognize the value of groundwater, often preferring it over surface water.
- There's a shared perception that deeper groundwater is cleaner or safer, though technical knowledge (e.g., about quality or recharge rates) is limited.
- Some communities express cultural or spiritual interpretations of water-related changes, though awareness of climate change is growing.

3.6.2 Water access usage and burden

- Groundwater is critical for both domestic and agricultural needs, but physical access is unequal:
 - In some communities, infrastructure exists but is unaffordable for poorer households.
 - In others, there are no boreholes, and surface water is used out of necessity despite poor quality.
- Women bear the heaviest burden of water collection, and this burden is exacerbated by cultural restrictions (e.g., menstruation taboos limiting movement).
- Both infrastructural and sociocultural barriers affect equitable access to groundwater, with women disproportionately impacted.

3.6.3 Governance, leadership, and inclusion

- Governance structures range from well-organized (e.g., associations with treasurers) to non-existent.

- Where women are involved in leadership, they are often effective advocates for inclusion, but in many communities, women and youth remain underrepresented, especially at decision-making levels.
- In some communities, women are trusted with financial roles (e.g., treasurer, water seller), but this often comes with disproportionate risk.

3.6.4 Climate change and livelihood

- Communities are seeing signs of climate change: shifting rain patterns, wind, receding surface water, etc.
- Impacts are more acutely felt by agricultural groups, especially where irrigation infrastructure is lacking.
- Traditional climate knowledge is no longer sufficient — communities express a need for external data and planning tools.
- Resilience planning is needed, especially to link climate forecasting to groundwater use and agricultural planning.

3.6.5 Cross-cutting needs identified by communities

- Technical support: for groundwater quality, storage, irrigation, and agronomy.
- Infrastructure: boreholes, pipes, and water storage systems.
- Capacity building: for groundwater planning, governance, and community education

Table 1: Summary: Common themes across all communities

Category	Shared Issue
Awareness	Strong value placed on groundwater, but lack of technical understanding
Access and burden	Infrastructure gaps; access often determined by income and gender norms
Governance and inclusion	Varies widely; women’s leadership is impactful but not widespread
Climate and livelihoods	Recognition of changes; limited tools for planning or adaptation
Expressed needs	Boreholes, inclusive governance, technical knowledge, gender-sensitive planning

4. Recommendations

In this section, we provide two sets of recommendations. The first set addresses broader and more general GESI-related issues in relation to groundwater access and management. The objective behind these recommendations is to highlight the pervasive and systemic issues that still plague the Mono Basin, and they can also be used for wider reference. The second set of recommendations is very focused and specific to the G4DR project. They are tailored to what the project can realistically achieve and make an impact with during its course, considering the contextually relevant issues of the Mono Basin itself.

4.1. Broad recommendations

4.1.1 Improve education and technical training

- Expand gender-responsive vocational training in groundwater technologies.
- Promote digital literacy and ICT access for women and youth

4.1.2 Enhance land and resource rights

- Strengthen enforcement of gender-equal land tenure laws.
- Promote joint land titles and facilitate credit access for women.

4.1.3 Ensure inclusive governance

- Enforce quotas and support meaningful participation of women and youth in groundwater governance.
- Provide leadership training and mentorship for women and marginalized groups.

4.1.4 Expand gender-sensitive infrastructure

- Prioritize safe, proximate boreholes and rainwater harvesting systems.
- Design sanitation systems with menstrual hygiene needs in mind.

4.1.5 Support groundwater-based livelihoods

- Fund micro-enterprises and water-based businesses led by women and youth.
- Provide targeted subsidies or loans for irrigation and water access.

4.1.6 Strengthen climate resilience and data systems

- Include women and youth in the design and implementation of monitoring and early warning systems.
- Collect disaggregated data to inform inclusive planning

4.2. Specific recommendations for G4DR

4.2.1 Groundwater management

- Expand knowledge on groundwater distribution: Enhance the understanding of the spatial distribution of different groundwater to inform better management practices.
- Guidance on borehole drilling: Develop and disseminate guidelines for drilling boreholes that minimize the risk of encountering saline water.
- Addressing saline borehole sites: Develop strategies for managing situations where potential borehole sites near communities are likely to yield saline water

4.2.2 Community awareness and support

- Local sensitization on water quality: Conduct community awareness programs on water quality risks and the benefits of local water storage solutions.
- Provide community support through knowledge products at community level: There's widespread willingness to adopt groundwater-based solutions, but information gaps exist regarding quality, sustainability, and planning.

4.2.3 Gender and social inclusion

- Intentional inclusion: Meaningful participation of women and youth in water governance is inconsistent and needs to be intentionally supported and protected.
- Gender-sensitive planning: Ensure infrastructure placement and roles consider women's lived realities and restrictions.

5. Conclusion

Groundwater management in the Mono River Basin cannot be effective without addressing entrenched gender inequalities and social exclusion. Women, youth, and marginalized communities are central to the use and stewardship of groundwater, yet they remain peripheral in decision-making and infrastructure development. Applying a GESI lens ensures not only more equitable outcomes but also enhances resilience, governance quality, and sustainability. A paradigm shift toward inclusive, community-led groundwater management is essential for realizing the SDGs and securing water futures for all.

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7. Annexe 1

Field visits were conducted in four communities in the Mono Basin, namely Houéyogbé and Athiémé in Benin and Datcha and Korikossa (Nangbeto) in Togo.

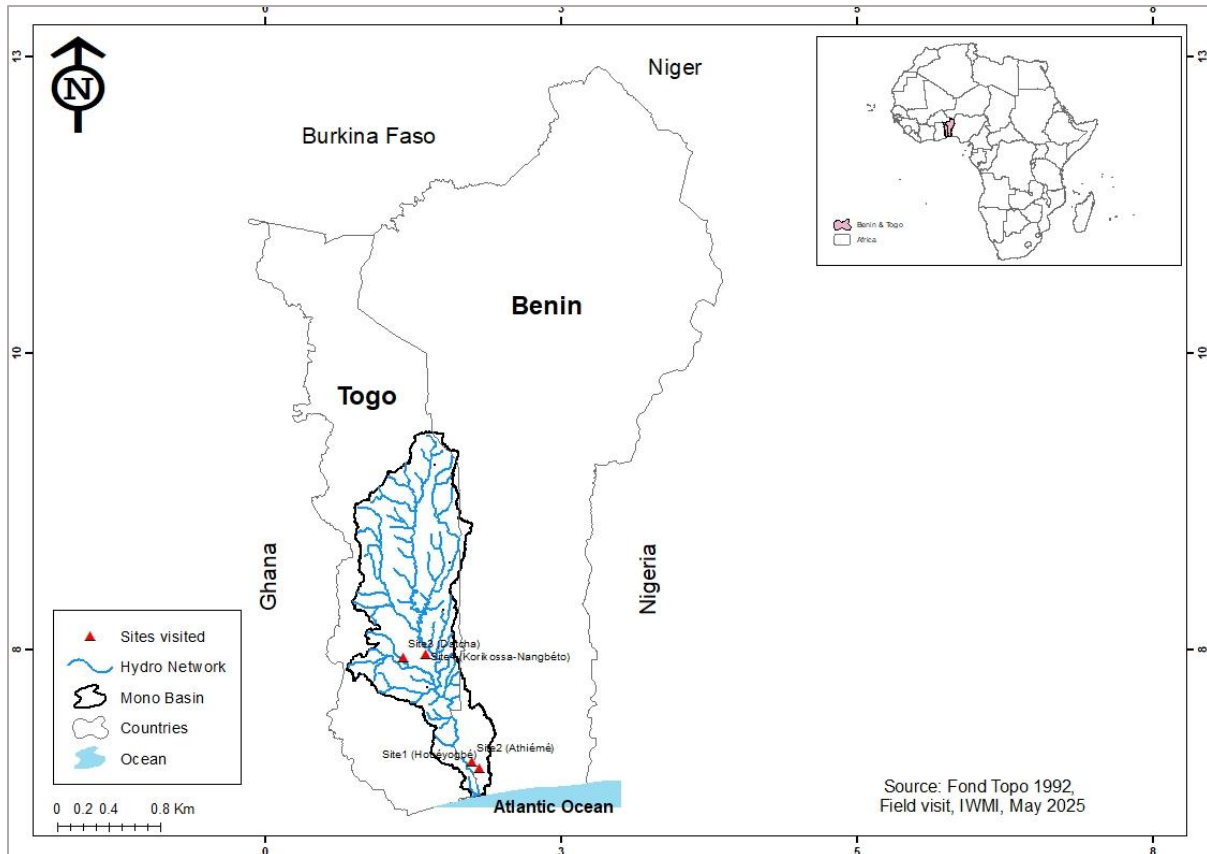


Figure 1: Map of the Mono Basin

In each of these communities, a group discussion was conducted. Although the team aimed to keep the group size between 10 and 15 participants, many people showed interest in the project and voluntarily joined the discussions. Given the exploratory nature of these discussions, the team felt comfortable with this approach and made every effort to include diverse voices."

BENIN		
Community	Houéyogbé Community	Athiémé Community
Selection	G4DR country coordinator, local government representative and committee chair	G4DR country coordinator, local government representative and community Chief

Number of participants	Approx 15 people in attendance consisting of men and women	Approx 15 people in attendance consisting of men and women
Representation	Water Committee	Market garden cooperative

TOGO		
Community	Datcha Community	Korikossa (Nangbeto) Community
Selection	G4DR country coordinator, local government representative and committee chair	G4DR country coordinator, local government representative and Union chair
Number of participants	Approx 16 people in attendance consisting of men and women	Approx 25 women in attendance
Representation	Association of Users of Drinking Water and Sanitation Services (AUSEPA)	Market gardeners Union (different district chairs and committee members)

Group discussion themes:

1. Awareness and Perception of Groundwater

- Understand people (emphasis on youth or women) know about groundwater's role in their community and its risks/opportunities.
- Misconceptions, myths, or traditional beliefs related to underground water.

2. Water Access, Usage, and Burden

- Explore women's daily interactions with groundwater: fetching water, household usage, irrigation support, etc.
- Understand time, distance, and safety concerns in accessing water for the community.

3. Decision-Making and Leadership in Water Governance

- Assess people's (emphasis on youth or women) current participation in water-related committees or decisions.
- Understand social or cultural barriers to leadership roles in local water governance (emphasis on youth or women).

4. Impacts of Climate Change on Livelihoods

- Discuss how climate variability (droughts/floods) has affected farming, food security, and domestic roles.

- Identify coping strategies and indigenous knowledge systems.

5. Inclusion in Training and Capacity Building

- Gauge interest and accessibility to training, new technologies (e.g., solar pumping), and groundwater monitoring tools.
- Explore barriers and motivations for participating in groundwater-related capacity-building.