WORLD BANK GROUP
Water and Social, Urban, Rural & Resilience

WATER PARTNERSHIP PROGRAM

TOOLKIT

Water and Sanitation Services:

Achieving Sustainable Outcomes with Indigenous Peoples in Latin America and the Caribbean

Team composition and acknowledgments

A multi-sector team with specialists from the Water and the Social, Urban, Rural and Resilience Global Practices of the World Bank carried out this work. The Team was led by Lilian Pena-Pereira Weiss (Sr. Water and Sanitation Specialist), co-led by Dianna Pizarro (Sr. Social Development Specialist) and Miguel Vargas -Ramirez (Sr. Water and Sanitation Specialist), and supported by Ximena Traa-Valarezo (Social Development Consultant), Franz Rojas (Sr. Water and Sanitation Specialist), Fernando Laca (Sr. Water and Sanitation Specialist), Koffi Ekouevi (Sr. Economist Specialist), Ella Lazarte (Water and Sanitation Specialist), Graciela Sanchez Martinez (Sr. Social Development Specialist), Santiago Scialabba (Social Development Specialist), Sophie Theis (Consultant), Ananda Paez (Consultant), Sophie Ayling (Consultant) and Elizabeth Eiseman (Consultant). The graphic design of this document was carried out by Shinny Montes. The main author of the document was Clémentine Stip (Junior Professional Associate).

The Team would like to express their gratitude to the regional Indigenous representatives who participate in the World Bank Latin American and Caribbean Indigenous Peoples Dialogue through *Foro Indígena Abya Yala* for their comments and guidance throughout the preparation of the Toolkit and for their support connecting the Team with national level Indigenous organizations. The Team would also like to thank the governments and WSS agencies in Panama, Nicaragua, Paraguay, Argentina, Peru, Colombia and Bolivia for their extensive and generous collaboration, openness and time throughout the organization and realization of the visits. Additionally, the Team benefitted from advice and insights from several experts in the fields of WSS and Indigenous peoples' engagement, including representatives from the Inter-American Development Bank, the German Development Bank (KfW) and the Swiss Agency for Development and Cooperation (COSUDE) as well as several NGOs involved in the WSS sector and Indigenous stakeholders outside of the countries chosen for the field visits. Finally, this work would not have been possible without the financial support of the Water Partnership Program.

DISCLAIMER

The conclusions and recommendations presented in this document were gathered by the team based on interviews with stakeholders and were complemented by a desk review. The views expressed herein do not by any means reflect official positions or opinions of any of the countries visited or that of the World Bank.

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Executive Summary

The objective of this Toolkit is to provide practical guidance and operational tools to promote the inclusive delivery of sustainable Water Supply and Sanitation (WSS) services to Indigenous peoples in Latin America and the Caribbean (LAC).

The World Bank estimates that 43 percent of the approximately 42 million Indigenous peoples in LAC live in poverty and that 24 percent live in extreme poverty.[1] These poverty rates are more than twice the levels found among the non-indigenous population. While the number of Indigenous peoples living in poverty has fallen over recent years, the poverty gap between Indigenous and non-indigenous Latin Americans has stagnated or, in the worst cases, widened.

In LAC, Indigenous peoples are 10 to 25 percent less likely to have access to piped water and 26 percent less likely to have access to improved sanitation than the region's non-indigenous population.[2] Lack of access to WSS services perpetuates chronic poverty by contributing to poor health, infectious skin and gastrointestinal diseases, and malnutrition, among other ailments. Extending the human right[3] of access to WSS services to Indigenous peoples represents the final step for many LAC countries to reach universal water coverage.

To effectively and permanently close this coverage gap, LAC countries need to extend WSS services sustainably and inclusively to Indigenous communities. Local service providers in Indigenous communities have historically been more likely to "slip" into failed service provision than in non-indigenous communities.[4] The field work carried out for this Toolkit indicated that adoption[5] and use of WSS systems is lower and slower in Indigenous communities[6] largely because of investors' and service providers' lack of knowledge and limited attention to Indigenous peoples' unique social and cultural characteristics. Oftentimes, Indigenous communities are avoided by WSS project planners and proponents due to their lack of understanding of how to carry out projects in collective or semi-autonomous Indigenous territories, the remoteness of these areas, and the high associated per capita cost of a potential operation, among other reasons. In general, the WSS sector has lacked a participatory framework tailored to Indigenous peoples with specific principles to guide stakeholder engagement processes, participatory strategies, and the selection and implementation of investments to promote sustainable outcomes for WSS projects with Indigenous peoples. The preparation of this Toolkit recognizes the need for further analysis and work beyond the traditional approaches to work in rural areas, to be able to deliver suitable results for and with Indigenous peoples.

1 World Bank, 2015.

2 World Bank LAC Equity Lab, 2015. http://globalpractices.worldbank.org/teamsites/Poverty/LACDataLab/Site Pages/services.aspx

3 In 2010 the United Nations (UN) Resolution 64/292 acknowledged that clean drinking water and sanitation are essential to the realization of all human rights.

4 Data from the *Sistema de Información de Agua y Saneamiento Rural (SIASAR)*, a regional information system owned and managed by member countries to track rural WSS indicators related to access, quality of services and overall sector sustainability. See Annex 5 for more information on SIASAR.

5 Adoption means the acceptance of and ownership over a given WSS system, including community consultations, understanding of water-related diseases and health consequences of poor WASH, construction and future operation and maintenance. Definition from Perez, E., et al. (2012).

6 See also Coimbra, C. et al. (2013) and Barber, M. and Jackson, S. (2011).

This Toolkit draws on the findings of interviews, consultations, and field visits carried out in 37 Indigenous communities[7] in seven Latin American countries (Panama, Nicaragua, Paraguay, Argentina, Peru, Colombia and Bolivia) where the World Bank or other development actors have implemented WSS projects. A multi-disciplinary World Bank team, which included WSS engineers, anthropologists, social specialists and economists, among others, carried out the fieldwork. Through interviews with all the stakeholders (governments, WSS institutions including their decentralized units, Indigenous organizations, NGOs, other development agencies and beneficiaries) involved in the roll-out of these projects, this on-the-ground work was able to synthesize lessons learned from a range of perspectives from actual interventions. The lessons from the field presented in this Toolkit were also informed by a desk review, interviews with WSS, NGOs and Indigenous experts and representatives outside of the countries chosen for the field visits.

The recommendations in this Toolkit specify how to take these characteristics into account in the delivery of WSS services to Indigenous peoples while combining them with established good practices for good quality and sustainable WSS service delivery to low-income groups, particularly in rural areas. These good practices for sustainable service delivery in the WSS sector (such as the demand-responsive approach, participatory approaches, trainings and communication with users, water committees establishment, sanitation behavior change, etc.) are emphasized throughout the document as field work demonstrated that these elements, together with other provisions for governance and socio-cultural tailoring, are critical for successful interventions with Indigenous peoples.

The Toolkit identifies three key principles that drive successful WSS projects with Indigenous peoples: **respect**, **ownership** and **sustainability**.

As opposed to other low-income groups, Indigenous peoples often: (i) subscribe to organizational and governance structures that are different from the rest of society; (ii) maintain extensive traditional knowledge around their land, natural resource base, and environment; (iii) utilize unique practices and cultural norms around water collection, storage, distribution, sanitation and hygiene; and (iv) hold strong beliefs and practices around the well-being of the collective versus the individual, leading to a higher degree of social cohesion, unique traditions and structures of community organization, and different norms around communal contributions.

When Indigenous peoples actively participate in the development of a WSS project and their customs, traditional, knowledge and organizational structures and are **respected** throughout the project cycle, they are more likely to develop **ownership** over the services and the results tend to be **sustainable** over time.

7 The communities were located in rural, peri-urban and urban settings in order to ensure the widespread applicability of this Toolkit.

The Toolkit analyzes each of these principles in depth and provides concrete recommendations on how specialists designing a WSS project with Indigenous peoples can best incorporate these principles throughout the project cycle.

This document targets project managers and field practitioners tasked with the implementation of WSS interventions in Indigenous areas, but it also provides guidance for policy makers and Indigenous leaders aiming to articulate specific demands from the WSS sector in their countries.

The Toolkit's ***key policy-level recommendations*** for each of the three principles of engagement are summarized below.

Respect requires the recognition of Indigenous peoples' unique and valuable world views and forms of organization through their active involvement throughout the project cycle.

- WSS sector institutions need to build a meaningful dialogue with Indigenous organizations, traditional structures and authorities to ensure that Indigenous priorities are effectively integrated in the sector. Indigenous authorities at national and regional levels have the capacity and interest to define sector priorities, develop policies, and prioritize investments, and should play an active role in the design and implementation of projects that would benefit their populations. These priorities can be articulated in a jointly developed national strategy that outlines a methodology for fair and transparent investment targeting, ongoing participation, project implementation, and specific relevant cultural dimensions.

- WSS sector institutions need to specifically target investments to Indigenous territories and tailor approaches for engagement, intervention design, and operation and maintenance support to these territories in order to close current regional coverage gaps. Investment allocations must be fair and transparent and the eligibility criteria for projects and budget availability be public. In addition, WSS institutions need to include personnel with the expertise and capacity to guide and advise on institutional policies and strategies to effectively reach Indigenous peoples.

- Though project teams can be under pressure to fast-track implementation, time requirements should not deter them from carrying out informed consultations and respecting a thorough participatory process.

- Women are strong behavior change agents and keepers of traditional knowledge. Women should be engaged from project onset so that their views and local know-how and influence can be incorporated throughout the project.

Ownership builds on the principle of respect for engaging with Indigenous peoples and allows a community to define the value of WSS services for their community and actively participate to design, implement, use and maintain its WSS system accordingly.

- At the community level, Indigenous beneficiaries and their local traditional authorities must be involved in all key decision-making processes throughout the development and implementation of WSS projects to ensure that the intervention meets community needs and respects their world vision and cultural practices. A successful engagement strategy respects traditional hierarchies and cultural preferences in establishing clear rules for: participation, communication of key information among stakeholders and decision-making processes.

- A demand-responsive approach is essential for building ownership; however, it should be tailored to Indigenous contexts by providing technological options based on traditional knowledge, practices, and local capacity, and developing culturally appropriate community contribution schemes to foster ownership.

- Even when local capacity and interest does not exist for system operation and maintenance, ownership is critical to ensure effective communication and a functional relationship with external service providers.

Sustainability in the provision of WSS services requires user ownership combined with specific, institutionalized mechanisms for O&M that reflect Indigenous peoples' customs and norms, including tailored technical assistance and active beneficiary involvement.

- To avoid the failure of WSS services over the long-term, adequate time and resources have to be invested in the "soft" side[8] of these interventions to promote a respectful approach and the development of ownership by Indigenous beneficiaries. Consultations and knowledge of local traditional structures should inform the design of sound management structures for the WSS services, for example to create and build capable and credible local water committees with sustainable financing arrangements.

- Though there is a general perception that Indigenous peoples should not and do not want to pay for WSS services, findings reveal that Indigenous beneficiaries recognize the importance of WSS services and are willing to provide a meaningful contribution to sustain them, through either monetary or "alternative" payment models (such as in-kind work or locally-produced materials).

- The sustainability of decentralized services requires the establishment by the WSS sector of technical assistance and institutional support mechanisms in particular for the O&M phase, involving periodic site visits, just-in-time professional support, and the mobilization of external parties, as necessary. In Indigenous areas, this regular technical support should work with existing traditional structures, aim to strengthen local capacity, and be defined through consultations.

In addition, the graphic below displays a summary of the main technical recommendations of the Toolkit along the structure of the subproject cycle according to these principles. The page numbers indicate the specific sections corresponding to these concepts in the document.

8 As opposed to the "hard" or infrastructure side of interventions, the "soft" side consists in all the social, technical and capacity-building work carried out in addition to infrastructure delivery.

Respect
Pag. 23

To identify the appropriate indigenous and WSS actors to engage in demand identification:

- Understand the legal and institutional framework for the Indigenous and WSS sectors
- Map the stakeholders, their mandates, and relationships
- Build a multi-disciplinary WSS project team with Indigenous peoples-specific skills

To prioritize investments in a transparent, inclusive, and respectful manner:

- Assess whether the existing prioritization mechanism effectively represents local demand
- Follow a demand-responsive approach that respects cultural norms
- Consider using a social discount rate to better reflect the value of the investment

To design an effective intercultural engagement strategy:

- Identify, with the community, acceptable and inclusive consultation modalities that enable meaningful input from women
- Establish clear rules and procedures for participation and decision-making
- Ensure adequate budget for social analysis and consultation

Ownership
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To establish service provision and management structures:

- Consult beneficiaries' preferences for service provision and management model
- Establish management arrangements over the WSS service early in the project process
- Ensure transparency through clear rules, statutes, and communication mechanisms
- Diagnose technical and management capacity needs of service provision and management entity and develop trainings

To design a culturally appropriate WSS solution:

- Incorporate community practices, beliefs, and preferences into system scale, technologies, and solutions
- Solicit and learn from traditional knowledge on source protection, climate, water treatment, and sanitation
- Balance technical and acceptability criteria
- Present options for community approval through iterative and participatory process

To balance system construction costs and effective ownership promotion:

- Agree with beneficiaries on the quantity and nature of their contribution to construction
- Plan flexible procurement processes that respond to local preferences, geographic and supply chain challenges
- Ensure contractor's capacity to work with Indigenous peoples
- Organize a ceremony for system handover to officially transfer the system to the community after construction

Sustainability
Pag. 75

To secure long-term behavior change around the WSS service:

- Incorporate cultural norms around sanitation and hygiene into technological options and tailored training
- Study the potential for reuse from a cultural and market standpoint

To establish fair and transparent tariffs that cover service provision costs:

- Highlight the distinction between payment for water and payment for water service
- Establish tariffs transparently to cover service provision costs
- Consider use of alternative payment mechanisms, such as labor for operation and maintenance
- Support management entity to establish rules for tariff compliance

To provide tailored, long-term technical assistance:

- Strengthen the technical assistance providers' capacity to work with Indigenous communities and authorities
- Use Indigenous-specific indicators to track progress and establish public information systems for transparency
- Establish culturally appropriate mechanisms for beneficiary feedback and grievance redress

Project Cycle: 1 Pre Identification 2 Identification 3 Design 4 Construction 5 PostConstruction

In the projects visited, these essential components of project sustainability were not always incorporated. In particular, fieldwork revealed a serious disconnect between the stated priorities for the sector with Indigenous peoples and the specific approaches applied at the project level. Where some of these essential components were being incorporated into the project cycle, they often missed other important components that would promote a holistic and more successful engagement.[9]

This disconnect made evident the need for a comprehensive framework for collaboration among stakeholders when working with dispersed rural Indigenous communities[10] for sustainable WSS service delivery. The toolkit aims to provide such a framework, consolidating existing knowledge in the sector and connecting practitioners with specific approaches and tools to overcome constraints, fill knowledge gaps, and better serve marginalized Indigenous communities.

9 These findings align with analysis of participatory projects in Manzuri, G., and Rao, V. "Localizing Development - Does Participation Work?" The World Bank: Washington, DC. 2013.

10 Though the field work involved visits to urban, peri-urban and rural settings, the team found that those Indigenous peoples living in the most remote areas maintained their cultural norms and practices the most, while those closer to cities considered themselves less Indigenous. As such, the recommendations of this Toolkit are tailored to rural Indigenous peoples, though they also applied in some peri-urban cases such as Panama and Bolivia.

1. Introduction

Indigenous peoples in Latin American and the Caribbean (LAC) are 10 to 25 percent less likely to have access to piped water and 26 percent less likely to have access to improved sanitation solutions than the region's non-indigenous population.[11] Historically, Indigenous peoples have been marginalized from the development process in their own countries and still suffer discrimination from the mainstream societies today.[12] Oftentimes, Indigenous territories are overlooked or avoided by Water Supply and Sanitation (WSS) project planners and proponents[13] given their lack of understanding of how to engage or carry out projects[14] in collective or semi-autonomous Indigenous territories, the remoteness of these areas, and the high associated per capita cost of a potential operation, among other reasons. From a political economy standpoint, policy makers may lack incentive to focus on these groups where they do not participate actively in the political sphere and do not represent a large pool of potential political support. When WSS implementing agencies do carry out projects in Indigenous territories, they generally do not have the tools or experience necessary to ensure that the WSS system is built in a way that respects local customs, instills a sense of ownership in the beneficiaries and promotes services sustainability. The resulting projects oftentimes fail, discouraging further investments in the territories. The significant gap in Indigenous peoples' access to WSS services, a basic human right[15] that is closely linked to economic and social wellbeing, alongside the lack of established tools in the sector to guide engagement in Indigenous territories, motivated the creation of this Toolkit. **The objective of the Toolkit is to provide practical guidance and operational tools to improve the inclusion of, engagement with, and delivery of sustainable WSS services to Indigenous peoples in LAC in order to permanently close the WSS service gap.**[16]

The Toolkit summarizes the findings of interviews, consultations, and field visits carried out by a multi-sector, multi-national World Bank Team in 37 Indigenous communities[17] located in urban, peri-urban and rural areas in seven LAC countries (Panama, Nicaragua, Paraguay, Argentina, Peru, Colombia and Bolivia) where the World Bank or other development actors had implemented WSS projects with Indigenous peoples.

11 World Bank LAC Equity Lab, 2015. http://globalpractices.worldbank.org/teamsites/Poverty/LACDataLab/Site Pages/services.aspx

12 Davis, S. "Indigenous Peoples, Poverty and Participatory Development: The Experience of the World Bank in Latin America." » Multiculturalism in Latin America. Palgrave Macmillan UK. Pp. 227-251. 2002.

13 "Project teams" refers to the implementing agency, the government and other development partners who are involved in implementing WSS initiatives on the ground.

14 "Project" refers to any WSS intervention at the community-level.

15 In 2010 the United Nations (UN) Resolution 64/292 acknowledged that clean drinking water and sanitation are essential to the realization of all human rights.

16 The Toolkit applies to both water and sanitation services. Where specificities apply to either water or sanitation, they are flagged in the document.

17 The term "communities" will be used throughout the document to refer to urban, peri-urban and rural communities.

2. Background

Sustainable Water Supply and Sanitation Services for Indigenous Peoples: The Last Mile

Definition of Indigenous Peoples as per World Bank Indigenous Peoples Policy (OP/BP 4.10)

Indigenous peoples are understood to be "distinct, vulnerable, social and cultural group," with the following characteristics: (a) self-identification as members of a distinct Indigenous cultural group and recognition of this identity by others; (b) collective attachment to geographically distinct habitats or ancestral territories in the project area and to the natural resources in these habitats and territories; (c) customary cultural, economic, social, or political institutions that are separate from those of the dominant society and culture; and (d) an Indigenous language, often different from the official language of the country or region.

The map on the next page provides an overview of the number of Indigenous peoples in each country of Latin America and the percentage of total population they represent.

A Persistent Coverage Gap between Indigenous and Non-Indigenous Populations

While the number of Indigenous peoples living in poverty has fallen over recent years, the socio-economic development gap separating them from other Latin Americans has stagnated or, in the worst cases, widened.[18] The World Bank estimates that 43 percent of Indigenous peoples in Latin America live in poverty, and 24 percent live in extreme poverty. These percentages are more than double the poverty levels found among Latin America's non-indigenous people.[19]

This disparity translates to greater gaps in access to basic services for Indigenous peoples, and thus greater inequality, reduced development opportunities, and serious health and socio-economic repercussions.[20] In particular, Indigenous peoples lag behind in access to both improved water and improved sanitation services. In LAC, access to improved Water Supply and Sanitation (WSS) services for Indigenous peoples represents the final step for many countries to achieve universal improved[21] coverage.[22]

18 In 2010 (the latest census data available), Indigenous peoples represented eight percent (approximately 42 million) of LAC's total population and owned or controlled 23 percent of the land through collective tenure regimes. World Bank 2015 and Rights and Resources Initiative, "Who owns the World's Land? A global baseline on formally recognized Indigenous and community land rights."

19 World Bank. "Indigenous Latin America in the Twenty-First Century." 2015. Washington, DC: World Bank.

20 World Bank. 2003. World Development Report 2004: Making Services Work for Poor People. World Bank. World Bank. https://openknowledge.worldbank.org/handle/10986/5986 License: CC BY 3.0 IGO.

21 According to the Joint Monitoring Program (JMP) standards, an improved drinking-water source is defined as one that, by nature of its construction or through active intervention, is protected from outside contamination, in particular from contamination with fecal matter. Access to improved water supply services is thus defined as the number of people with access to an improved source of drinking water with a minimum level of quality and quantity. Similarly, an improved sanitation facility is defined as one that hygienically separates human excreta from human contact. Access to improved sanitation is thus defined as the number of people with access to an improved sanitation facility.

22 According to the Joint Monitoring Program (JMP) 2015 data, LAC presents over 90% access of improved water and 83% access to improved sanitation solutions.

Indigenous Peoples in Latin America

By the year 2010, an estimated 45 million indigenous people lived in Latin America, accounting for 8.3 % of the region's population. The United Nations has championed the promotion of their rights through the use of different resources and special regulations for this purpose.

Percentage of indigenous people out of total population
Total number of indigenous population

Mexico 15.1 % — 17 million
Honduras 7 % — 537,000
Panama 12.3 % — 420,000
Colombia 3.4 % — 1.6 million
Guatemala 41 % — 5.9 million
Venezuela 2.7 % — 725,000
El Salvador 0.2 % — 14,500
Brazil 0.5 % — 900,000
Nicaragua 8.9 % — 520,000
Ecuador 7 % — 1 million
Costa Rica 2.4 % — 105,000
Bolivia 62.2 % — 6.2 million
Peru 24 % — 7 million
Paraguay 1.8 % — 113,000
Chile 11 % — 1.8 million
Uruguay 2,4 % — 77,000
Argentina 2,4 % — 955,000

At present, there are 826 indigenous peoples. An additional 200 are estimated to be living in voluntary isolation.

The countries with the greatest number of indigenous peoples are:

Brazil	305
Colombia	102
Peru	85
Mexico	78
Bolivia	39

Many indigenous peoples are in danger of physical or cultural disappearance:

Brazil	70
Colombia	35
Bolivia	13

ECLAC encourages the region's countries to put public policies in practice which:

1) are based on standards of indigenous peoples' rights

2) include their perspectives and contributions to the region's development

3) consolidate improvements in their well-being and living conditions, political participation and territorial rights

4) promote the construction of multicultural societies that benefit us all

ECLAC

Source: Guaranteeing indigenous people's rights in Latin America: progress in the past decade and remaining challenges, ECLAC –http://www.cepal.org/publicaciones/default.asp?idioma=IN

Despite a general expansion of basic services over the last decade, only 71 percent of Indigenous peoples have access to piped water, compared to 90 percent of non-indigenous peoples. These gaps are even more pronounced in some countries. The percentile difference in access to piped water for Indigenous versus non-indigenous people is 43 percent in Colombia, 34 percent in Panama, 26 percent in Nicaragua and 21 percent in Peru. Figure 2 highlights the access gap for Indigenous populations in various LAC countries.

Figure 1

Access to Piped Water Services in LAC Countries, Indigenous vs. Non-Indigenous (Source: LAC Equity Lab[23])

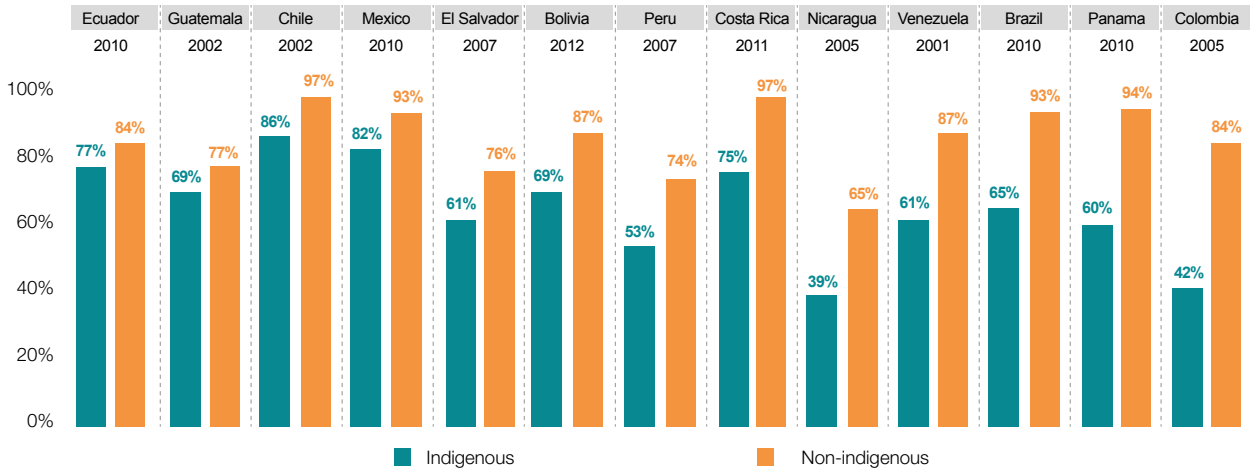
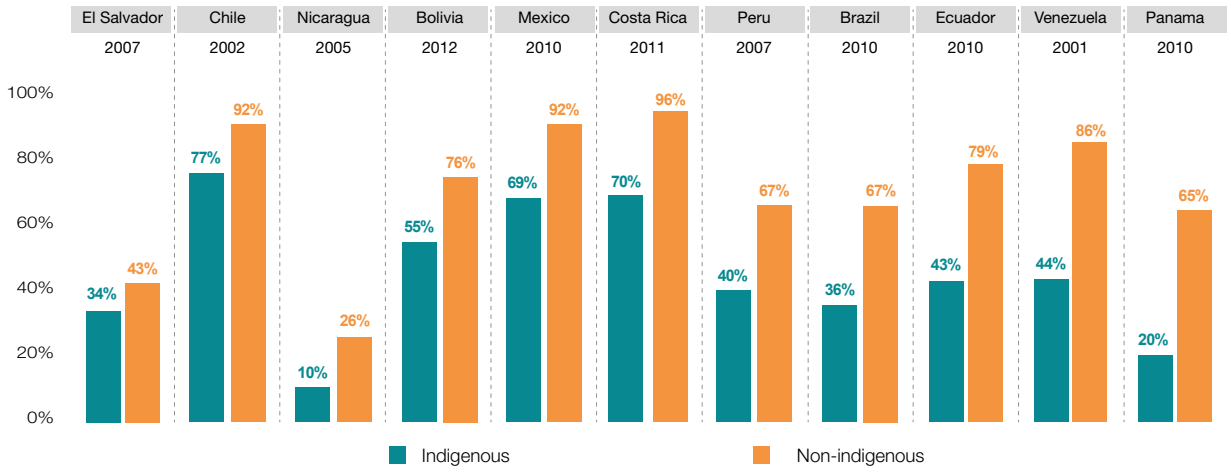


Figure 2

Access to Improved Sanitation Services in LAC Countries, Indigenous vs. Non-Indigenous (Source: LAC Equity Lab)



23 World Bank LAC Equity Lab, 2015. http://globalpractices.worldbank.org/teamsites/Poverty/LACDataLab/Site Pages/services.aspx.

Notes: The data reported is based on the most recent census available. The indigenous population was estimated using self-identification in all cases, except for Peru where indigenous people (IPs) are defined by mother language of the household head. In Bolivia only individuals older than 15 were asked if they self-identified as indigenous; thus the reported value extrapolates the percentage of indigenous population in the segment 15 years of age or older to the segmend 14 years of age ou younger. In Nicaragua, creoles and mestizoa are not included as IP though they are usually listed as IP in official data. Update 9/18/2014.

The gap is even starker when it comes to access to improved sanitation. The average difference in access to improved sanitation between Indigenous and non-indigenous populations is 26 percent. In Ecuador, this difference reaches 36 percent, in Panama 45 percent, and in Venezuela 42 percent.

One of the reasons for the coverage gap is that approximately 50 percent of LAC's Indigenous peoples live in rural communities that are oftentimes remote. As such, they suffer from the typical socio-economic inequalities found between urban and rural populations.[24] In LAC, investment in rural WSS services has traditionally been eclipsed by the urban sub-sector, which has the triple advantage of stronger political weight, clearer institutional set-up (such as well-established, urban-focused water utilities) and greater economies of scale than the rural sub-sector. In addition, government investment in rural areas tend to focus on the most populous and accessible communities to the detriment of isolated areas, where Indigenous communities often reside.

However, Indigenous peoples lag behind compared to other populations within the rural sub-sector as well. In rural Nicaragua, improved sanitation coverage is at 72 percent for the non-Indigenous population, as opposed to 63 percent for Indigenous peoples.[25] This number lowers to 19 percent when considering only the Indigenous peoples from the remote and isolated Alto-Wangki y Bocay area. In addition to coverage, the sustainability of Indigenous communities' rural WSS systems is "at risk" in 70 percent of Nicaraguan Indigenous communities compared to 55 percent of the systems in non-indigenous communities. Even within the limited investments targeted to rural areas, a more concerted effort to benefit Indigenous peoples is needed.

A Tailored Approach to Achieve Sustainable WSS Services with Indigenous Peoples

Historically, LAC countries have focused on the construction of physical infrastructure to extend WSS services. This is reflected in the technical makeup of the teams that work in public WSS agencies, in the indicators and targets established for the sector, and in the budget and timeframe allocated for WSS systems' construction. However, achieving *sustainable* WSS services goes beyond extending access to improved WSS infrastructure. It requires that communities, which, given their location, often are responsible for managing their own systems, present the commitment, the capacity and the necessary assistance to operate and maintain the systems. The "soft" side of WSS investments, including social aspects and participatory approaches, are essential to the long-term sustainability of the services.

The challenge of achieving sustainable service provision is more pronounced in Indigenous territories than non-indigenous territories. The "standard" WSS project approach is not always appropriate for Indigenous peoples. Their unique cultural, social, linguistic, and geographic characteristics are often overlooked in the rush to deliver infrastructure. As a result,[26] many Indigenous communities do not develop a sense of ownership over the systems, which limits the long-term sustainability of the investment.

24 To cite an example, regionally, Indigenous people living in urban settings are 1.5 more likely to have access to electricity and 1.7 times more likely to have access to piped water than their rural counterparts. (World Bank 2015).

25 Source: the Rural Water and Sanitation Information System (SIASAR).

26 As outlined in the Ownership section, this rush is one of the several causes of lack of ownership.

As opposed to other low-income groups, Indigenous peoples often: (i) subscribe to organizational and governance structures that are different from the rest of society; (ii) maintain extensive traditional knowledge around their land, natural resource base, and environment; (iii) utilize unique practices and cultural norms around water collection, storage, distribution, sanitation and hygiene; and (iv) hold strong beliefs and practices around the well-being of the collective versus the individual, leading to a higher degree of social cohesion, unique traditions and structures of community organization, and different norms around communal contributions.

The development of this Toolkit confirmed that tailoring WSS services to Indigenous peoples' needs improves the sustainability and management of the services. Furthermore, the services can become catalysts for broader community development initiatives, resulting in numerous positive externalities. This was witnessed in Bolivia for instance, where water committees were raising funds and planning additional community development projects or in other countries where the legal status of the water committee was leveraged to mobilize resources from external sources. Unfortunately, many WSS agencies in LAC do not have specific units, policies or trained specialists with the resources, time, tools, and methodologies to effectively engage with Indigenous peoples and to tailor strategies, solutions, and service delivery accordingly.

LAC Countries and International Movements to Promote the Inclusion of Indigenous Peoples

Over the past three decades, the Indigenous peoples' movement has made significant progress in LAC in regard to the acceptance and adoption of specific rights for Indigenous peoples. These rights are founded on the concept that Indigenous peoples are and have a right to be different and respected, and that they have unique governance and social structures, cultures, knowledge, territory, and control over their natural resources, as well as unique aspirations and visions for their wellbeing. The most notable advance in Indigenous peoples rights in Latin America is reflected in the overwhelming number of countries from the region that have ratified the International Labor Organization (ILO) Indigenous and Tribal Peoples Convention No. 169 (ILO 169), which emphasize Indigenous peoples' rights to economic and social wellbeing, including improved sanitation and health. Of the 22 countries that have ratified[27] ILO 169, 15 are from LAC. In efforts to implement ILO 169 and recognize Indigenous peoples' rights, many countries in the region have also adopted specific sector policies and programs in education, health, natural resource management or administration of public resources to promote inclusion of Indigenous peoples and recognition and respect for their vision for development.

However, more often than not, the recognition of these rights on paper has not translated into concrete improvements for Indigenous peoples or recognition of their unique vision, contributions to society, or aspirations to live by a different world view. As mentioned above, most countries still do not have the necessary resources or skills to extend tailored WSS services to Indigenous territories, and discrimination remains a barrier in the deployment of interventions to Indigenous areas. This Toolkit

27 The ratification of ILO 169 requires that a Country adopt within its constitution the Convention's internationally recognized principles and rights for Indigenous peoples.

provides the motivation and the know-how to put these conventions into practice for the WSS sector.

Beyond Closing the Coverage Gap: The World Bank's Approach

The Bank's Indigenous Peoples Policy (OP/BP 4.10). The World Bank's commitment to environmental and social sustainability is enshrined in 10 operational environmental and social policies, commonly referred to as the Bank's safeguards. The Bank's Policy on Indigenous peoples, OP/BP 4.10, is one of two social safeguard policies that are applied to all Bank investment lending. OP/BP 4.10 defines the term "Indigenous Peoples"[28] and establishes that all Bank investment operations must: (i) respect Indigenous peoples' human rights; (ii) identify, assess, and avoid/mitigate or compensate for adverse impacts on Indigenous peoples; and (iii) adopt the necessary measures to ensure that Indigenous peoples receive culturally appropriate intervention benefits when they are present within the intervention's area of influence. The processes required by the Policy to achieve these objectives include: (i) the preparation of a social assessment to identify and assess potential impacts or benefits of the project on the affected/beneficiary Indigenous population; (ii) a process of free, prior and informed consultation with the affected/beneficiary Indigenous communities and/or their representatives both to inform the social assessment, as well as to identify specific actions (proactive and/or mitigation) that should be incorporated into intervention design; (iii) the preparation of an Indigenous Peoples Planning Framework, in cases where subproject areas are unknown, and once project areas are known, an Indigenous Peoples Plan that documents the specific actions and processes adopted by the intervention (proactive and/or mitigation); and (iv) a process to document that the Indigenous Peoples Plan and the overall intervention affecting/benefiting the Indigenous peoples has their broad community support.

The World Bank's Water and Sanitation Sector Agenda. The Water Global Practice's agenda focuses on extending universal and sustainable access to high quality WSS services. Access to such sustainable services over time is an essential component of reaching the World Bank's Twin Goals of poverty reduction and shared prosperity. From an intervention standpoint, this focus includes providing adequate and cost-efficient infrastructure, tailoring technical solutions and levels of service to the context of each beneficiary group, adopting a demand (user)-responsive approach, promoting cost recovery at least for O&M costs, integrating water resources management (WRM) in order to ensure reliable water availability[29] and strengthening WSS sector institutions in order to ensure lasting and good quality service provision. This strategy is fully aligned with the UN's new Sustainable Development Goals (SDG) related to WSS, in particular Goal 6 (see Box 1). **The Toolkit is aligned with and fully supports both the World Bank's Water Global Practice's sector strategy as well as the Bank's Indigenous Peoples policies.[30] Furthermore, the practical guidance of the Toolkit goes beyond strategy to provide a set of concrete recommendations to put these policies into practice.**

In many Latin American countries, Indigenous peoples represent the last mile to universal and sustainable WSS services coverage. Meeting the Twin Goals will require reaching Indigenous peoples with quality lasting WSS services.

28 As the term "Indigenous peoples" has a broad and wide set of definitions, the definition provided in the Bank's Policy was used to define field visits. See methodology section for the definition.

29 Within the Toolkit, WRM is only addressed through a focus on source protection and preservation through seasonality. A broader discussion of water resource management is beyond the scope of the Toolkit.

30 These recommendations are also aligned with the World Bank World Development Report 2004: Making Services Work for Poor People.

Box 01

Sustainable Development Goal 6

"Ensure availability and sustainable management of water and sanitation for all."

The specific targets for Goal 6 which directly relates to this Toolkit are as follows:

- **6.1** By 2030, achieve universal and equitable access to safe and affordable drinking water for all.
- **6.2** By 2030, achieve access to adequate and equitable sanitation and hygiene for all and end open defecation, paying special attention to the needs of women and girls and those in vulnerable situations.
- **6.b** Support and strengthen the participation of local communities in improving water and sanitation management.

Field Research as Background on the Report

The recommendations in this toolkit were developed and tested through field research investigating actual WSS interventions in 37 Indigenous communities in seven countries (See map on next page). These communities were selected for the study based on the presence of an ongoing or recently closed intervention in each country's Indigenous territories, the inclusion of noteworthy implementation arrangements or methodologies, and representation of diversity in socio-cultural and geographical contexts to ensure the broader applicability of the Toolkit (for more information, see Annex XX: Methodology for the Toolkit). In each community, key informant interviews were conducted with indigenous communities and their WSS institutional representatives on the process of introducing a WSS intervention into the community. The lessons learned in the toolkit also build on a desk review and interviews with WSS and Indigenous peoples experts, as well as Indigenous stakeholders outside of the countries chosen for the field visits.

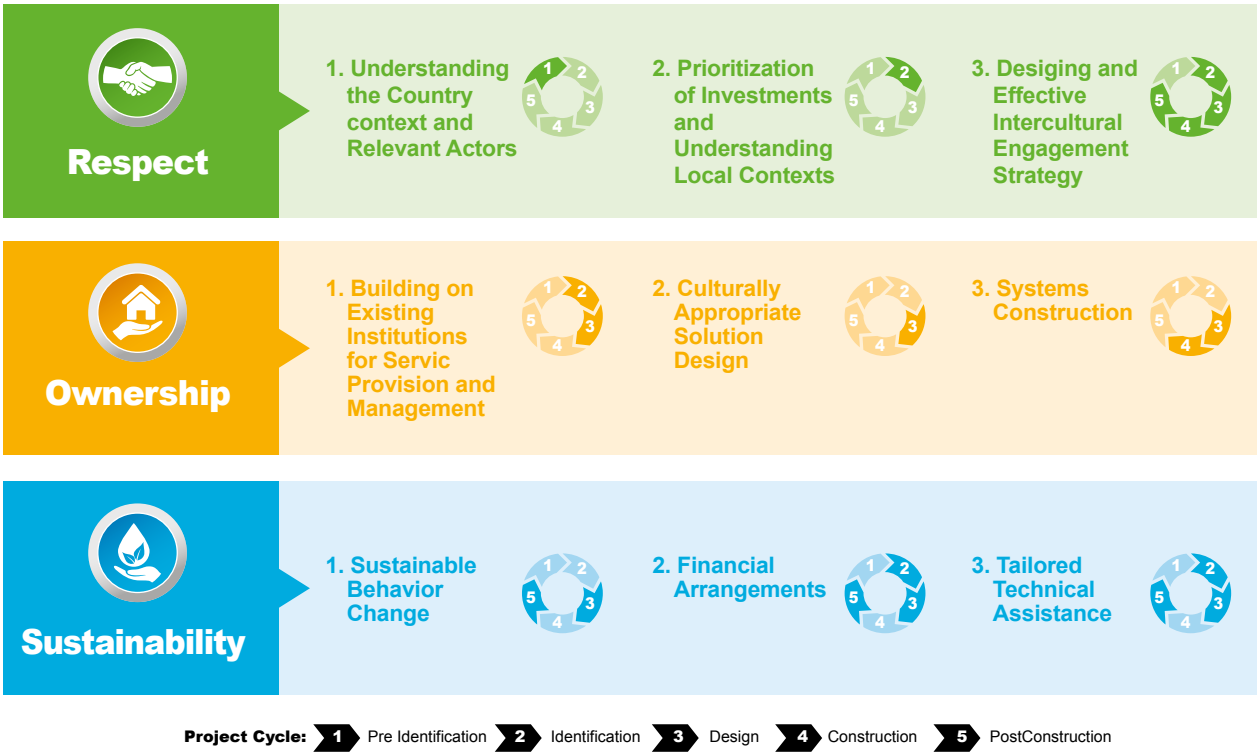
Structure of the Toolkit

This Toolkit is organized around the three underlying principles that revealed essential to extend sustainable WSS coverage in Indigenous territories: **Respect**, **Ownership** and **Sustainability**. These principles build on each other: Respect is required to foster Ownership, and both Respect and Ownership are key for Sustainability. In order to illustrate this evolution, these principles compose the three main sections of the document.[31] Each section contains detailed information on how to integrate the key principle into the project cycle as well as critical questions WSS practitioners should consider when designing and implementing WSS projects in Indigenous territories. The figure below illustrates the progression of the document.

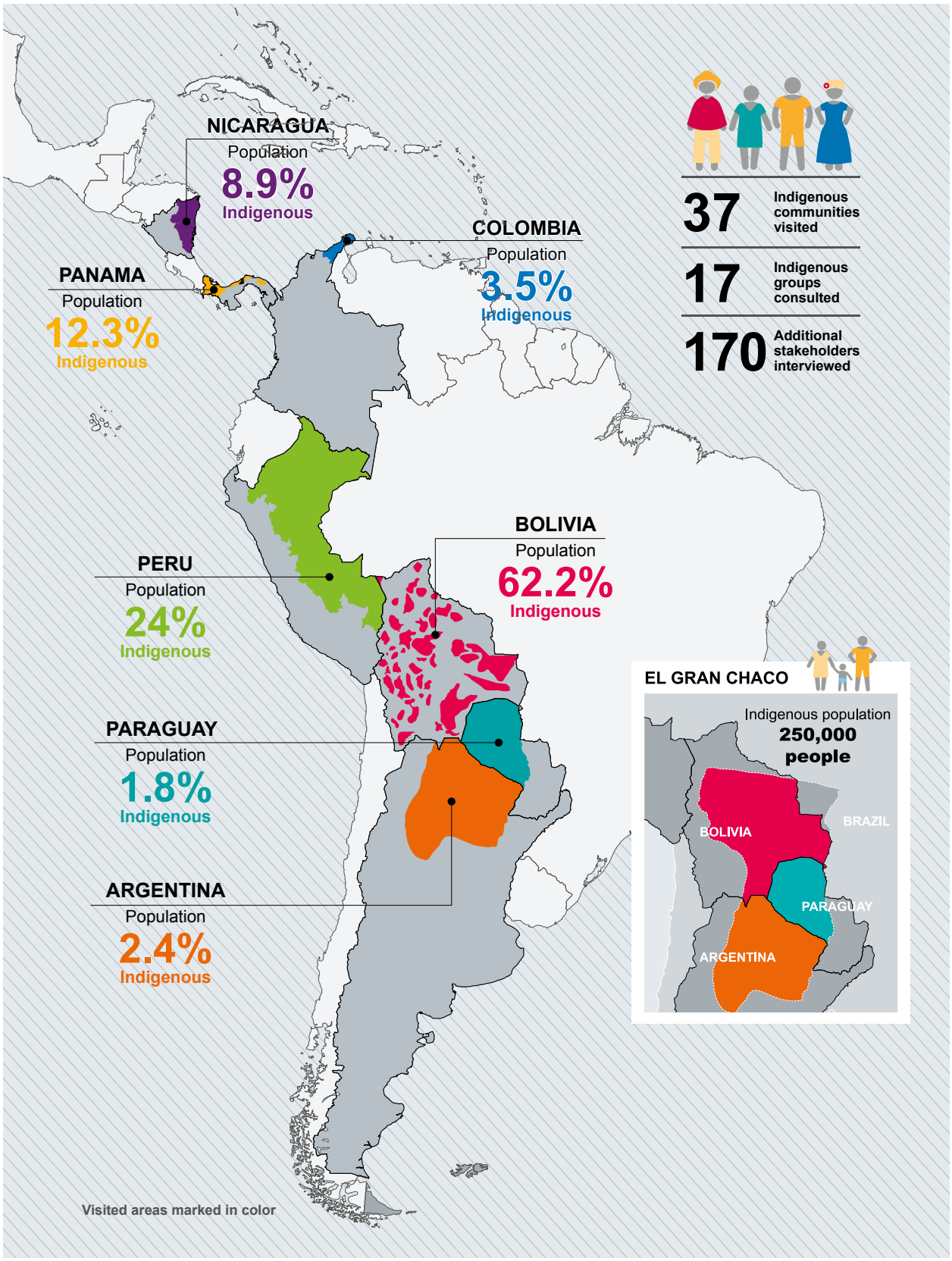
The document also provides practical tools and examples in the annexes. These tools are represented by a " 🔧 " inserted throughout the text in the corresponding sections, where the number on the symbol refers to the corresponding annex where this tool can be found.

31 This division is meant to help point out specific moments in the project cycle when these concepts can be applied for a more practical implementation of the Toolkit recommendations, but by no means indicates that respects is only relevant during identification, or that sustainability shouldn't' drive interventions from the onset.

Figure 3
Incorporating Respect, Ownership and Sustainability in the Project Cycle



The project cycle graphic above will be repeated next to each chapter, to indicate at what stage of the project the recommendations should be applied.


NICARAGUA
Population
8.9%
Indigenous
COLOMBIA
Population
3.5%
Indigenous
PANAMA
Population
12.3%
Indigenous
BOLIVIA
Population
62.2%
Indigenous
PERU
Population
24%
Indigenous
PARAGUAY
Population
1.8%
Indigenous
ARGENTINA
Population
2.4%
Indigenous
37
Indigenous communities visited
17
Indigenous groups consulted
170
Additional stakeholders interviewed
EL GRAN CHACO
Indigenous population
250,000
people
BOLIVIA
BRAZIL
PARAGUAY
ARGENTINA
Visited areas marked in color

3. Respect

The recognition and respect for Indigenous peoples' values, cultures, traditional organizations, and preferences in designing and implementing WSS projects.

Respect is one of the key principles of the UN's Declaration on the Rights of Indigenous Peoples[32] and is probably the most important principle guiding any engagement with Indigenous peoples, organizations or leaders. Indigenous peoples throughout the world have suffered historic injustices, genocide, and dispossession of their lands, territories, and resources in the name of colonization, nation building, assimilation, and development. In many LAC countries, Indigenous peoples have only officially gained the right to participate in their national societies as equal citizens within the past fifty years. The full enjoyment of this right has been severely hampered, however, by social norms condoning discrimination and racism and structural barriers that perpetuate exclusion and segregation.

The relationship between governments, Indigenous peoples and external actors has been tarnished by a deep accumulation of mistrust and betrayal. **For this reason, the only possible entry point to effectively engage and work with Indigenous peoples is one based on respect for differences in world views and approaches.** This respect must translate into treating Indigenous leaders and communities as equal partners in the development process with a unique set of knowledge and contributions to make (see Box 2).[33] Moreover, the principle of *Respect* also includes fair political attention and investment allocation, two basic elements in developing any unserved area.

Box 02

Respect for Indigenous Peoples' Unique World View

Each indigenous group has a specific "cosmovision" or world view, i.e., "the structured view of nature and the universe in relation to man"[34] that is rooted in a shared ancestral experience. This world vision has emerged over time from Indigenous peoples' interactions with their land, environment and the associated stories they have passed down over generations.

This world view guides Indigenous peoples' relationships to each other, their community, their environment, their governance systems, concept of time, and resilience in often very challenging natural environments. Their millennial knowledge transferred from one generation to the next is what has equipped them to survive and thrive within these environments with little or no external intervention, so this knowledge is in many cases specifically adapted to the local environment and deeply held. For successful engagement with Indigenous peoples and a joint development process to improve their quality of life, it is essential to understand how this world view will influence a community's organization, decision making, engagement with internal and external actors, timeframes, behaviors and belief system around water, sanitation and hygiene, among other basic services.[35]

At the moment of intervention identification, the important aspects to consider are the Indigenous group's organization at the national, regional and communal level and any protocols to engage these actors. During intervention preparation, preliminary consultations and desk research can help incorporate relevant decision-making rules and participation norms in the engagement strategy. The more detailed design of a specific project's management and technological characteristics should take into account results from the consultation process about a community's preferences and traditional knowledge. Specific guidance on how to incorporate a specific Indigenous community's cosmovision into an intervention is outlined throughout this Toolkit.

32 UN. United Nations Declaration on the Rights of Indigenous Peoples. General Assembly A/RES/61/295. Adopted on 13 September 2007.

33 Tinoco, M., et al. "Water Co-operation between Cultures: Partnerships with Indigenous Peoples for Sustainable Water and Sanitation Services." Aquatic Procedia. 2, Pp. 55-62. 2014. also outlines the request from Indigenous communities in Nicaragua to be treated as partners in the development process.

34 Broda, J. "Political Expansion and the Creation of Ritual Landscapes: A Comparative Study of Inca and Aztec Cosmovision." Cambridge Archaeological Journal. 25 (01). February 2015. pp 219-238.

35 Jiménez, A., Cortobius, M., Kjellén, M. 2014b. provide an analysis of existing literatura on Indigenous peoples'cosmovision, WSS services and the need for such an approach.

This section provides recommendations for demonstrating respect for an Indigenous community in background research on country and community context, prioritizing investment areas and target communities, and designing an effective intercultural engagement strategy. The section starts with guidance on assessing relevant aspects of the legal framework and institutional landscape, including state obligations to uphold Indigenous rights and service delivery to Indigenous communities, actors and their responsibilities in service delivery, and criteria to consider when building an effective project team with the capacity to work with Indigenous peoples. Next, the section discusses prioritization of WSS investments, including mechanisms to identify demand from a community, respond to demand, and justify the viability of investing in Indigenous communities. Finally, the section addresses key criteria for designing an effective intercultural engagement strategy throughout the project cycle.

1. Understanding the Country Context and Relevant Actors

The first step to design a WSS intervention with Indigenous communities is to establish a constructive engagement with the right actors. This requires a clear understanding of the legal and institutional framework for Indigenous organizations and the WSS sector, who the relevant actors are, how they make decisions from both a legal and cultural stand point, how they are organized and resourced, and a multi-disciplinary and strengthened project team.

a. Legal and Institutional Framework

A country's legal and institutional framework provides a blueprint for project teams to understand the rules of engagement at the national, regional and community levels and the actors to involve in identifying priorities for a WSS intervention focused on Indigenous peoples. Depending on the project team (its role and composition) it may not seem relevant to carry out an analysis as detailed as the one described below, especially given that changes at the legal or institutional level are often beyond the scope of an intervention. However, the definition of a new WSS intervention does provide the opportunity to bring these actors – who may not regularly coordinate – together to discuss issues at the intersection of their areas of competence. Through this platform, actors from both the Indigenous peoples and WSS sectors can voice their priorities and needs to inform project design. Project teams may also find that these exchanges provide inputs to larger institutional strengthening and coordination efforts, like the establishment of a WSS-Indigenous peoples group (like the *Mesa Interinstitucional de Agua y Saneamiento para el Chaco,*[36] *in Paraguay*) or the beginning of a national strategy planning process.

Begin with a review of the national legal framework associated with Indigenous peoples and the WSS sector. In particular, project teams should review the relevant legal framework that dictates the government's formal engagement and mandate with the country's Indigenous peoples to understand how Indigenous peoples, their rights and territories are recognized by national laws, how government entities and other actors are to engage with them, and whether a specific provision (or any rules) for the provision of WSS services to the country's Indigenous peoples is legally mandated. In addition, reviewing the legal framework facilitates a basic understanding of the mandated roles and responsibilities within the WSS sector for service delivery to rural and Indigenous peoples, and whether within that mandate specific rights, processes, or sociocultural adaptations are required. This step is required by the World Bank's Indigenous Peoples Policy as part of any project's social assessment, and the results have to be documented in the project's Indigenous Peoples Plan or Planning Framework. This task is most often carried out by the consulting team or social

36 The *Mesa Interinstitucional de Agua y Saneamiento* para el Chaco is a multi-stakeholder platform whose representation is led by SENASA, the rural WSS agency, and convened by the WSS Direction *(Dirección de Agua Potable y Saneamiento)*, which is also the entity leading policy-making for the WSS sector nationally in Paraguay. It is composed of all the governmental agencies working in the Chaco (including the National Emergency Secretariat) and includes representatives from all the NGOs working in that region, as well as representatives from interventions funded by multi-lateral agencies like the World Bank and the Inter-American Development Bank.

specialists charged with the social assessment. The legal framework represents an important entry point to understand the local structure and enabling environment, and will in turn provide a source of inputs to the definition of participatory processes.

In LAC, the most common legal instrument that outlines Indigenous peoples' rights is ILO 169. ILO 169 holds the status of an international treaty; once ratified by a country, it is incorporated into that country's constitution. In LAC, the following countries have ratified the ILO 169: Argentina, Bolivia, Brazil, Chile, Colombia, Costa Rica, Dominica, Ecuador, Guatemala, Honduras, Mexico, Nicaragua Paraguay, Peru and Venezuela. In addition, many LAC countries have also passed constitutional reforms or Indigenous peoples laws. These laws usually outline the nationally recognized Indigenous communities, their unique or special rights for self-governance and land and natural resource ownership and use, specific requirements for consultation and participation and, if applicable, the legal arrangements for public resource transfers. An assessment of the implications of these laws for the design of the WSS intervention can inform the engagement strategy, WSS services management and land and infrastructure ownership, for example.

What is the Level of Autonomy of the Country's Indigenous Communities?

The level of autonomy of a country's Indigenous communities will dictate how a project team engages with them (through a representative Indigenous organization, the government, or directly). It depends largely on the country's formal recognition of the Indigenous peoples' territory, systems for self-government, and management of resources. Most countries still delegate the role of basic infrastructure and service provision to municipal or national agencies, rather than transfer public resources directly to Indigenous authorities. This distribution has historically limited Indigenous peoples' ability to exercise their autonomy regarding basic services management and can lead to their exclusion from certain interventions. In Colombia and Bolivia, however, this is slowly starting to change. Examples of countries where semi-autonomous or autonomous territories and systems of self-government are recognized include: Nicaragua, Panama, Colombia, and Bolivia.

In other countries in the region, as in Peru and Mexico, recognition of Indigenous peoples' land rights has been limited to collective titling at a community - rather than ethnic - level, thus breaking up broader connections and governance structures based on ethnicity. As a result, the community's general assembly makes all decisions around communal self-government, and communities often participate in broader regional networks (often mixed with other ethnic groups) that then link to national level organizations. For example, the Amazonian Indigenous communities in Peru participate in local federations that are represented in regional organizations or coordinators that are then represented in two national organizations, namely the Inter-ethnic Association for the Development of the Peruvian Selva (*Asociación Interétnica de Desarrollo de la Selva Peruana* –AIDESEP) and the Confederation of Amazonian Nationalities of Peru (*Confederación de Nacionalidades Amazónicas del Perú* - CONAP). Other countries have systems that are hybrids, recognizing variant levels of self-governance and autonomy in decision-making and land rights.

Bolivia, 2010:
Ley Nº 031 Marco de Autonomías y Descentralización

In Bolivia, as part of the country's process to officially become a plurinational State, current reforms are underway to allow for indigenous territories to be registered and recognized with the same legal and administrative status as municipalities. Once implemented, this reform will allow indigenous authorities to directly receive resource transfers from the State and manage these resources and service provision as would any municipality. Within these autonomous territories, decision-making power over natural resources depends on the country and is set by the legal framework.

Colombia, 2014: Presidential Decree 1953

In October of 2014, Colombia passed a Presidential Decree to establish a special regime with the functions, financing, monitoring, control, and strengthening mechanisms through which Indigenous territories will receive public resource transfers to autonomously and directly manage the provision of education, health and basic water and sanitation services within their territories.

How are the Country's Institutions Structured for Indigenous Peoples and WSS?

Based on the entities identified in the legal framework analysis, review the institutional framework for Indigenous peoples and WSS. This step involves understanding how Indigenous peoples are organized and how the government and WSS sector interface with them, taking into account both legal and customary or "traditional" structures. This requires identifying the various organizations involved in government and WSS sectors to determine who to consult and engage throughout the project cycle and which public agencies might have a key role in facilitating this process. **The public entities charged with promoting Indigenous peoples' policies should serve as the first reference point for WSS agencies planning to extend services to Indigenous communities.**

In many of the countries visited, there was a government agency (such as the *Vice-Ministerio de Asuntos Indígenas* in Panama, the *Ministerio de Cultura* in Peru, or the *Instituto Paraguayo del Indígena* in Paraguay) responsible for coordinating and promoting Indigenous peoples' policies and programs. Although the degree of coordination between these entities and WSS agencies varies greatly, improved coordination opens the possibility for more effective engagement, more efficient use of public resources, and better alignment between WSS sector policies and the broader Indigenous policies for the country. **Project teams can encourage this type of coordination by requesting and facilitating the joint articulation of intervention priorities and organizing regular meetings on project progress with actors from the WSS sector and Indigenous organizations.**

In some countries, the organizational structures governing Indigenous communities have been created and imposed by the governments and are perceived by the communities as illegitimate, or even as an attempt to undermine their traditional governance systems. In other cases, the perception of these externally imposed structures may have a varied level of acceptance depending on the ethnic group or community. Understanding these potential intricacies of legal versus traditional Indigenous government structures is essential in designing an effective engagement strategy and identifying the right actors to engage first.

Project teams should note whether or not the entity in charge of WSS service provision has a specific strategy to reach Indigenous peoples. Does the entity target investments towards Indigenous areas and adopt culturally appropriate measures for intervention approaches? Where no such strategy – or policy prioritizing the roll-out of services to Indigenous peoples – exists, its development could be proposed as a component of the engagement process, or even as a component of the intervention. If Indigenous peoples are part of the service area defined in the organization's mandate or mission, specific lines of action should be defined to reach them with tailored approaches. For example, in Bolivia, there are limited national policies or programs that ensure the Indigenous cultural adaptation of methodologies for WSS projects. However, Bolivia does have a well-developed regulatory framework for the WSS sector that requires the application of community development and training methodologies, incentives and requirements for the establishment and legalization of water committees,[37] and a specific menu of WSS alternatives. This well-developed tool provides a strong platform for the adaptation of Indigenous-specific consultation approaches, as it already mandates thorough engagement with beneficiary communities.

37 Community-based organizations composed of community members who volunteer to manage their WSS systems.

Key questions:

- What level of autonomy is recognized under national law in regards to Indigenous peoples land rights, self-government, resource management, and service delivery? Is this a common approach for the entire country or have these rights evolved over time with different Indigenous peoples enjoying different levels of rights?
- Does the Government include within its administrative structure a Ministry, Vice Ministry or agency that is mandated to promote Indigenous peoples rights and policies in the Country?
- Does this agency have any specific policy, strategy or dialogue with Indigenous peoples that would be relevant or could serve as a platform for WSS policy-setting, service provision or engagement with Indigenous authorities?
- Does the Government have a specialized approach or sector strategy regarding basic services, in particular WSS, for Indigenous peoples? If not, can one be prepared or adapted within the context of engagement?
- Who is the rural WSS sector institution? Is it well-structured and does it have a decentralized presence close to Indigenous territories? Does the institution have experience working in Indigenous communities? If not, can the project strengthen the rural WSS institutionally towards enhancing the WSS-Indigenous peoples approach?

b. Stakeholder Mapping and Engagement

Identify the key actors for the intervention, mapping their respective roles, relationships, political and social weight, and level of interest in the project's benefits.

For stakeholder[38] mapping it is essential that the WSS specialist works very closely with a social scientist or specialist who fully understands the Indigenous legal framework, organizations, actors, and social and cultural context. The stakeholder mapping exercise will identify the key agencies, or counterparts, for developing WSS projects, building on the list of actors and autonomy structure identified earlier. The stakeholder mapping should capture the mandate of each actor as well as identify coordination, resourcing, accountability, and reporting relationships between actors.[39] This is a key element to building strategic allies early in the project cycle and avoiding conflict by helping to define an overall engagement, participation, and consultation strategy that ensures respect for Indigenous customary authorities and representation structures.

38 Stakeholders are people directly or indirectly affected by a project, who have an interest in it.

39 NetMap is one tool that can complement the stakeholder mapping by providing a methodology with specific questions to analyze power dynamics between institutions. More information is available at https://netmap.wordpress.com/about/

Potential stakeholders include:	Specific areas of intervention		
a. Authorities in charge of the WSS sector (water authority, water utility, regulator, ministries of finance, health, environment, etc.) at the central, regional and local level. b. Authorities in charge of representing or interacting with Indigenous peoples at the central, regional and local level. For example, ministry or vice-ministry responsible for Indigenous affairs at the national level.	N		
c. Indigenous governments at the local level (community or aggregation of communities) recognized as the representatives of potential Indigenous beneficiaries.			C
d. The Indigenous organizations at central, regional and local levels without a formal structure of representation, including organizations that represent communities and/or other sub-regional organizations, as well as organizations with specific advocacy agendas and/or capacity for training and project implementation.	N	R	C
e. Local authorities from municipalities and/or provinces and technical teams responsible for WSS services locally (for example, the municipal water and sanitation units, UMAS, in Nicaragua).		R	
f. Community leaders and relevant local-level organizations, such as Indigenous and non-indigenous women's organizations and community associations, schools, or health posts, and water committees where applicable.			C
g. NGOs working in the WSS sector and/or with Indigenous peoples.	N	R	C
h. Local actors who may interact with potential Indigenous beneficiaries around land use and resource management (farmers and other rural groups, among others).			C

Legend: N National R Regional C Community

For each stakeholder, identify, where applicable:

- The level they operate at (national, regional, community) and how these levels relate to one another
- Their role in Indigenous peoples representation and
- Their role in the Indigenous peoples' autonomy structure
- Their role in WSS policy and sector strategies
- Their role in WSS service provision and project development in Indigenous communities and territories
- Their relationship to other actors and existing coordination and reporting

In most cases, distinct engagement strategies should be pursued at the national, regional and community levels. During intervention prioritization, the project team would primarily engage stakeholders at the national level. The identification of specific intervention areas should be done in conjunction with national and regional actors. Finally, communal-level stakeholders are most relevant in the definition, design and implementation of specific projects within a larger national or regional intervention. More details on engagement strategies can be found in the next section.

NATIONAL

- The first point of contact for strategic or policy dialogue and investment planning should happen at the national level.
- In addition to working closely with the national WSS agencies and government agencies charged with Indigenous peoples' policies, national Indigenous organizations should also be engaged in early discussions. During the interviews conducted for this study, national organizations representing Indigenous peoples' interests emphasized their desire to be involved in decision-making regarding the screening and selection of targeted Indigenous territories.
- The scope of discussions that should take place early on with national organizations include: consultation on sector policies and strategies, national intervention design, safeguard approaches, identification of sub-regions or territorial beneficiary areas, operational strategies, and roles in monitoring and evaluation (M&E).
- This is also an important level to define prioritization criteria and to emphasize a focus on Indigenous areas.

REGIONAL

- At the regional level, there tends to be a greater level of familiarity and understanding of community demands, systems and experiences.
- It is often the regional level WSS agency staff and Indigenous governments or organizations that serve as the most effective interlocutor between the project team and the potential beneficiary communities.
- At this level, organizations or territorial level governments can also play a critical role in supporting the prioritization of beneficiary communities because they have closer and more regular interactions with the communities they represent.
- In addition, regional level stakeholders are ideally suited to help with M&E and provide or facilitate ongoing technical assistance to communities over the project life cycle.

COMMUNITY

- This level is where the demand originates, agreements on WSS services governance are established, adequate technology and system designs are defined, financing and O&M arrangements are agreed, and investments are implemented.
- Although some countries and Indigenous groups have established protocol for entering an Indigenous community, in practice, approaching communities with the support of regional or national Indigenous authorities or organizations (or other NGOs with ample experience and credibility among the communities to be approached) proves effective. Indeed, they tend to know the local actors, can easily work through the potential intercultural barriers and facilitate communication and trust building.

The table below outlines more specifically the tasks that each stakeholder-level should be involved in.

Task	National	Regional	Community
1. Formulation or implementation of WSS policies and strategies for Indigenous peoples and the sector	X		
2. Advice on application of Indigenous peoples legal framework and strategies	X		
3. Overall project design, implementation arrangements, leading institutions, macro level project objective, scope and financing	X		
4. Coordination of engagement and initial approach at community level, intercultural mediator and interlocutor	X*	X	
5. Prioritization of communities based on community needs and demands		X	X
6. Direct engagement and participation with the Indigenous community, including the selection of the most appropriate technology, selection of the water source, preparation of the engineering designs and works implementation, definition of the WSS systems management model (eg. formation of water committee, O&M arrangements, tariffs, etc), etc.		X	X
7. The provision of technical assistance and institutional support role once the system is in operation		X	
8. Monitoring and Evaluation (M&E) of the WSS systems at a local, regional and national levels	X	X	X
9. Implementation of regional/local grievance redress mechanism and communication and information flow at the regional level		X	X
10. National monitoring and response to grievance redress mechanism	X	X	

* Depending on country size and level of decentralization.

Beyond national level organizations, there may be relevant Indigenous organizations or NGOs working at the regional level. In the Chaco region, there are many collaborations happening between NGOs at the transboundary level (*Red Chaco* across Argentina, Bolivia and Paraguay) and among organizations within a given country (*Mesa Interinstitucional de Agua del Chaco* in Paraguay) to address the particularities of the region. This type of coordination is key in promoting aligned interventions and sharing best practices in the sector and in the region where organizations are working in similar geographical, physical and cultural contexts, or with one Indigenous group across country boundaries.

Key questions:

- Who is responsible for intervention targeting mechanisms, project cycle definition and implementation, and, finally, provision of technical assistance and institutional support once the system is in operation? Can their responsibilities be strengthened through the intervention?
- If Indigenous organizations and/or beneficiaries are not participating in the WSS service delivery scheme, how can they be further integrated in defining the responsibilities outlined above?
- Are there other national Indigenous organizations or NGOs that are active in the sector but do not officially represent Indigenous peoples? If so, do they have a bias, experience, or affiliation with certain Indigenous groups or regions or do they demonstrate a capacity and understanding of Indigenous peoples at a national level? What are their potential roles in supporting strategic engagement on overall policy and strategy issues and/or investment prioritization and service delivery?
- Are there other actors, such as local farmers, non-indigenous communities, or concessionaires that could threaten the project design, in particular the water source, and implementation?
- Are there local dynamics that could undermine participatory processes and project success and sustainability?

c. Building a Project team[40] to work with Indigenous Peoples

Engaging and working effectively with Indigenous peoples requires local staff capable of assessing needs to design a locally-tailored approach. In this sense, the inclusion of social specialists with in-depth understanding and experience working with Indigenous peoples in the specific regions or areas where a project will be implemented is essential for both implementing agencies and contractors. These social specialists must have an understanding of the WSS sector and of the project cycle of WSS interventions to ensure that all consultations carried out throughout the project specifically inform the intervention. Field work showed the importance of approaching consultations and participatory processes as a gateway towards a deeper understanding of Indigenous communities, but also with a specific work plan and WSS-related questions to be answered to avoid dispersing these valuable conversations.

To complement the work of the social specialist, additional training can be provided to WSS engineers in sector agencies to increase their understanding of Indigenous peoples in order to ensure more effective provision of infrastructure and training to these populations. Such training also equips engineers to work more proactively with the Indigenous peoples specialists mentioned above. Most project teams interviewed had the mandate to

40 The project team includes the implementing agency, which is usually the government entity responsible for the provision of WSS services in the country or within a sub-sector, though it may also be an NGO, a private operator or a consortium of government agencies. In Bolivia, EMAGUA – *Entidad Ejecutora de Medio Ambiente y Agua* – and FPS – *Fondo Nacional de Inversión Productiva y Social* – are in charge of infrastructure construction while SENASBA – *Servicio Nacional para la Sostenibilidad de Servicios en Saneamiento Básico* – accompanies with social work and capacity building.

provide services to Indigenous peoples, but not all were equally equipped to do so.

Institutions can strengthen their implementation teams by: hiring specialized consultants, collaborating with an organization that has this expertise, or implementing a special training program for the existing engineering and social teams. For example, in Paraguay, Asunción-based *Servício Nacional de Saneamiento Ambiental (*SENASA) successfully hired a consultant specifically to manage Indigenous topics in El Chaco (this person identified as Indigenous and had particular knowledge on the area of intervention), and in Argentina, the project team hired the NGO *Fundación Gran Chaco* to support the application and monitoring of social processes. Alternatively, the project team can establish agreements directly with Indigenous organizations to support cultural mediation and engagement with communities. This can help increase ownership at many levels and serve to build longer-term capacity for Indigenous organizations as active partners in WSS projects. **Regardless of the approach, the consultants, organization, or newly specialized staff should oversee the consultation process and ensure that the beneficiaries' (and traditional authorities') inputs are the basis of the decision-making process.**

Figure 4
A beneficiary demonstrates her water tap in Panama

Hire staff who speak the local Indigenous language(s) on project teams – or the contractor's social team - to enable more fluid communication with the Indigenous community and show respect for their culture, which in turn contributes to earning their trust. Many communities rely heavily on a few community members who are fluent in both Spanish/Portuguese and their native languages to serve as intercultural interpreters or facilitators with external parties. However, to avoid the risk of an over-reliance on these few actors, and/or any potential manipulation of this role, it is essential to ensure broad community understanding of concepts through communicating in local languages. In some cases, implementing agencies' regional decentralized staff may speak the language, but more often than not, they depend on regional indigenous organizations or NGOs to serve as both cultural and linguistic interpreters. For example, the NGO Water for People in Bolivia has Quechua-speaking staff accompany all field visits to translate when beneficiaries prefer to speak their own language. In the Peruvian Amazon, the *Programa Nacional de Saneamiento Rural* (PNSR) hires local social specialists who speak the Indigenous languages. In the Paraguayan Chaco, the District Authorities *(Intendentes)* always work with interpreters from the local communities. From a project perspective, linguistic realities should be assessed at the outset, taking into account potential gender differences within communities (see Gender section in the Ownership chapter). When necessary, the project team should ensure that socialization or training tools are delivered in relevant Indigenous languages as well.

Figure 5
Signs posted for construction of a water pipeline, translated by the local Q'OM community, Argentina

Develop specialized tools and training curricula targeted for Indigenous peoples, adapting existing documents where applicable. Most implementing agencies have training manuals, brochures, videos, and training curricula for community interventions. These tools are particularly important for training on topics such as water committee constitution, O&M and tariff setting and payment. Social specialists trained to work with indigenous people should be in charge of developing culturally appropriate instruments (printed or methodological)[41] and carrying out consultations to validate the applicability of the instruments with the intended beneficiary groups. This adaptation is important given that rural Indigenous peoples may not identify or assimilate information as well if materials use symbols or animals from urban or foreign contexts. Staff hired as Indigenous peoples specialists should also oversee the application of the instruments in the project cycle. A good example of such tools is the Water and Sanitation Manual (MEPAS) developed in Nicaragua (see Box 3 below).

41 Alternative communication, training and socialization methodologies can also be employed such as radio programs, storytelling or role play when appropriate, as literacy levels may be low in some communities.

Box 03

A Good Practice from Nicaragua - the MEPAS

The Nicaragua rural WSS agency FISE has institutionalized a policy to implement rural WSS projects irrespective of the source of financing, the Manual for WSS Projects (MEPAS, *Manual de Ejecución de Proyectos de Agua, Saneamiento*). FISE has elaborated an annex for this manual dictating the specific provisions to be applied in the Northern and Southern Caribbean Coastal Regions (RACCN and RACCS).

To reflect the local reality and engage with Indigenous and Afro-descendant communities in a culturally appropriate manner throughout the project cycle, this annex includes regional adaptations related to:

- The methodology to carry out consultations,
- Technical specifications,
- Costs,
- Counterpart funding,
- Project timelines and
- Procurement rules.

The customized strategy also includes a monitoring system to ensure that traditional authorities participate in the project cycle, that communities approve the project design, that training is provided to the beneficiaries in the local language, and that the beneficiaries are organized to protect the water source and operate and maintain the system once it is built.

During the identification stage, an assessment of the capacity of project teams to work with Indigenous peoples can help identify important gaps and the relevant training and resources needed to foster the skills and environment for successful projects in Indigenous areas. Accordingly, tailored capacity building can be designed and carried out – or teams adequately complemented - prior to implementation.

Key questions:

- What relevant Indigenous institutions, organizations and/or authorities does the project team need to communicate with regularly?
- What is the capacity of the project team in terms of social specialists and engineers trained to work with Indigenous peoples both at a centralized and decentralized level?
- What are the language needs of the target indigenous communities?
- Does the project team have staff who speak the local Indigenous language(s)?
- What specialized methodology, tools and training curricula can be developed, adapting existing documents where possible, for working with Indigenous peoples?

2. Prioritization of Investments and Understanding Local Contexts

What factors should a project take into account when choosing which community should be targeted for a WSS investment? This section addresses effective decision-making around investment prioritization, including the selection of the community and intervention. Doing so in a way that is respectful entails appropriate communication with Indigenous representatives and traditional leaders and ensuring that the criteria for selection and overall selection process are transparent and cross-checked with relevant actors.

a. Mechanisms for Demand Identification and Prioritization of Investments

Involve the right Indigenous representatives in the identification and prioritization process. The government rules for targeting and selecting beneficiary areas differ from country to country. However, there is often a disconnect between the government's established mechanisms for prioritization and the actual priorities or decision making processes in Indigenous territories. Not involving any, or not involving the correct Indigenous representatives is a common mistake of WSS projects that undermines ownership and partnership.

Develop a clear understanding of the government's mechanisms to identify and prioritize needs for WSS services to assess if they reflect the meaningful participation of Indigenous peoples. Sometimes, communities interact directly with the central government in order to convey their need for WSS solutions, while in other cases these demands have to go through a municipal or regional representative. For example, in Panama, in the case of a non-indigenous community, requests reach the Ministry of Health through the different levels of regional governments. However this process circumvents the traditional authorities of Panamanian Indigenous territories, the Indigenous Congresses and Councils. Bypassing the territorial Indigenous authorities can result in projects that do not respond to a territorial-level development vision and priorities, and risks alienating a valuable interlocutor and a key partner for services sustainability. More importantly, the aggregation of demands through these authorities helps present them as a more unified and strategic ask, thus amplifying the voice of these communities and giving them a higher profile. Many Indigenous communities in Panama will not engage or allow external parties to enter if the *Saila*, or traditional leader, has not coordinated the visit or provided authorization. As such, not engaging traditional authorities in this case may hamper the project team's ability to capture Indigenous communities' demands.

Oftentimes, national and regional Indigenous organizations can also facilitate the communication between individual Indigenous communities, central governments and funding agencies to ensure the community's needs are prioritized. A thorough understanding of the traditional forms of organization at the local level, how communities communicate their demands, and what bodies represent these demands is essential for respectful investment prioritization. If tensions are unveiled between organizations, guiding factors should be based on levels of representation and technical, economic, or other criteria used for investment choices. In Nicaragua, Municipal Plans were elaborated to assess community WSS needs in each municipality and prioritize the most urgent interventions. Through a questionnaire, the project team calculated a series of WSS indicators that yielded a "priority score." The highest priorities in the municipality were then chosen based on funds availability and WSS needs, and the final list validated by the Indigenous Territorial Governments and autonomous Regional Governments. The use of a scoring system enabled the project team to agree on communities' selection based on a verifiable and transparent set of factors. Developing a thorough information system with indicators on WSS coverage and management practices can also help project teams identify the neediest communities and elaborate alternative intervention mechanisms, such as institutional strengthening and training on specific WSS aspects that service providers are failing on, for example. **Validating the list of prioritized communities with the relevant national and regional Indigenous organizations ensures their support of the intervention, alignment with their vision for territorial development and respect for the traditional structures.**

Key questions:

- What is the process for articulating local-level WSS needs and priorities? Are there points of contention in information sharing in Indigenous territories?
- Have selection criteria been clearly articulated and communicated? Were these criteria consulted with national level Indigenous organizations or Authorities?
- Have indicators been developed to help assess community WSS needs more objectively?
- Is there a leading Indigenous organization widely recognized and respected among Indigenous peoples that could centralize their demands and carry out a first round of prioritization? Have the customary governance structures at all appropriate levels been involved in this process?

b. Mechanisms for Demand Response

When possible, carry out a diagnosis to ensure that prioritization is transparent. Assessing needs with the community from an early stage also enables the project team to respond to the community's specific demands (see Box 4). Carrying out a diagnosis of local needs before designing a project can improve transparency by enabling verification of key information (such as actual population, demand, restrictions) and promoting realignment of priorities to maximize the project's positive impact. This is particularly relevant when engaging with Indigenous communities since oftentimes there is little documented information available at the community level. Additionally, indigenous communities usually have little opportunity to voice their demands, and their demands, when voiced up, often reveal specific cultural practices and local solutions (such as appropriate water sources) that should be taken into account in the design of the intervention. In Bolivia, the NGO Water for People carries out a diagnosis of community needs and refines the intervention design in that community accordingly. This strategy effectively involved beneficiary communities and built on the communities' value system of collective wellbeing.

The demand-responsive approach (DRA) applied by Water for People led them to 1) meet the demands of the community in full, leaving no beneficiaries behind, and 2) foster collaboration with the beneficiaries from an early stage, respecting their vision for their own development. In contrast, in the fieldwork for this toolkit, several other programs were visited where the project prioritization and design had minimal, if any basis, on the diagnosis of community needs. The results were lamentable, with toilets built for empty homes and inhabited homes excluded from benefits. To avoid such pitfalls, social assessments must incorporate practical WSS-related questions beyond cosmovision and natural resources to provide a representative snapshot of the state of WSS and hygiene behaviors and preferences within a community.

Though DRA has been part of the good practices of WSS development since the 1990s, fieldwork showed project teams still struggle to successfully apply DRA principles. In many instances, the institutions in charge of the rural WSS sector did not have the capacity to implement DRA approaches in their regular operations where it was mandated by the sector's strategy or the donor. This pitfall is linked to the general fragility of the rural sector, in particular: weak staffing (in quantity and quality),

especially in decentralized offices, and overall lack of resources to implement a DRA, which is a time and resource-intensive process. In order to carry out such an approach, rural WSS agencies need staff dedicated to the social aspects of WSS interventions and participatory processes in general. Where efforts were invested towards a DRA approach, there was sometimes a disconnect between the consultations being carried out and project-specific goals, reflecting the need for more coordination between social and technical teams. As such, the weak application of DRA methodologies did not always translate into sustainable WSS outcomes. However, when DRA insights on an Indigenous community's preferences informed the engagement strategy and project implementation, the results were often sustainable.

The entity responsible for social work in Bolivian government WSS projects, SENASBA (*Servicio Nacional para la Sostenibilidad de Servicios en Saneamiento Básico*), learned from community demands that they needed to phase in payment for water services before system construction, so community members could get used to the regular fee, and create a reposition fund for the system. Similarly, community feedback pointed them to establish women-only water committees in those Aymara communities where women were in charge of decision-making.

Box 04

The Demand-Responsive Approach

The Demand-Responsive Approach (DRA) became prominent in development literature in the late 1990s in response to the Dublin Principles, wherein water was defined as an economic and social good to be managed at the lowest appropriate level.[47] DRA refocuses development on the involvement of the beneficiaries themselves throughout the project cycle. Though this approach is fundamental to the rural WSS sector, it is particularly important when working with Indigenous beneficiaries, whose demands are rarely assessed systematically, respecting traditional authorities, prior to an intervention.

The guiding principle of DRA is that WSS services provision must be driven by demand from the users, who therefore become central actors in the initiation, planning, implementation and management of the services. This model provides an alternative to supply-driven interventions, where WSS systems were built according to assumed needs without consulting the beneficiaries on their actual demands.

In the case of Indigenous peoples, DRA promotes

- Carrying out consultations throughout the engagement process and according to a culturally appropriate strategy (see next section),
- Using the information gathered in project design, implementation and O&M.

DRA can be challenging to apply in Indigenous communities given the particularities of indigenous social organization, belief systems, and lack of trust in outsiders, and sometimes project teams struggle to gather concrete input on project design from DRA processes with indigenous communities, unsure how to translate information on cultural beliefs and cosmovision into tangible and sector-relevant project guidance.

DRA involves users from a very early stage to foster ownership over their WSS services by enabling beneficiaries to choose the level of service they want and are willing to pay for. To apply DRA successfully with Indigenous communities, the approach should be carried out with respect for:

Continue

42 World Bank and WSP. Summary of Proceedings from the Regional Workshop on Demand-Responsive Approach. Volume 1. June 23-26, 1997. Mangochi, Malawi.

- The traditional Indigenous structures and cultural norms for the consultation processes (such as consulting with the traditional authority first, before opening the dialogue with the broader community),
- The definition and validation of demands (by coordinating with Indigenous organizations and consulting with beneficiaries to corroborate needs identified by higher-level representatives), and
- Community participation overall (through consultations on specific preferences and traditional knowledge to include in technological solution design and seeking community approval in an assembly on the technological choice).

The recommendations in this Toolkit align with DRA principles and provide specific guidance for conducting DRA and interpreting DRA results in Indigenous contexts. In particular, the section on *Designing an Effective Intercultural Engagement Strategy* (in this chapter) highlights mechanisms for communication with Indigenous communities and points out when to use consultations to gather specific project-related information from Indigenous beneficiaries throughout the project cycle. The Ownership chapter guides project teams through the application of the knowledge gathered through consultations in the choice of a management model and technological solution that respond to the community's demands while balancing Indigenous-specificity with technical expertise. The section on Systems Construction also specifically addresses Indigenous beneficiaries' contribution to the construction of their system and the importance of a handover ceremony in officially transferring the system to the Indigenous community. Finally, the Sustainability chapter builds on rural WSS sector best practices regarding behavior change, payment for services and technical assistance provision and explains how these important components should be addressed in an Indigenous context.

An important element of demand-response for Indigenous peoples lies in understanding past conflicts relating to WSS in a given group or community. The historical context and past issues may influence a group's willingness to engage with or trust outside actors. These issues may have occurred at the level of a specific community or a whole area or territory, and may touch on water resources, lack of previous consultations before an infrastructure intervention, or disregard for traditional rules and norms.

Key questions:

- Has the project team carried out a diagnosis of local needs to corroborate that the intervention meets the demands of the target Indigenous community?
- Can these priorities be verified through consultations in a sample group of communities or through focus groups with Indigenous organizations?
- Has the project team put in place provisions for Indigenous women to participate in these processes? (see gender section in the Ownership section)
- Does the target Indigenous areas present any past issues or stories of trauma linked to resource management, WSS or development in general?

c. Justifying the Viability of Interventions in Indigenous areas

When assessing the viability of interventions in Indigenous areas, use social and economic benefits metrics beyond a traditional ERR analysis. Apart from demand identification, project teams may find justifying the viability of projects in remote Indigenous areas difficult due to their high per-capita costs. Most WSS projects require a traditional cost-benefit analysis to justify carrying out an investment. Historically, the economic rate of return used for WSS interventions has not consistently shown investments in Indigenous territories to be economically viable, especially for those projects that require water transfers over large distances to remote areas or expensive extraction and treatment systems for difficult-to-access or highly contaminated local water sources. However, traditional economic assessment tools do not always successfully capture and are able to quantify all the beneficial dimensions when providing WSS services to Indigenous peoples. Benefits related to redressing social imbalances, ensuring human rights, or reasserting national sovereignty in certain territories have intrinsic value for policy makers and the population as a whole, but they are elusive to quantify in a project cost-analysis. Often, additional qualitative economic analysis based on interviews with Indigenous authorities and future Indigenous beneficiaries helps substantiate the overall set of benefits associated with improved access to WSS services.

By using a social discount rate, the potential benefits of projects in Indigenous areas that seem too costly at first sight may be captured more realistically. The Discount Rate Guidance Note[36] produced by the Sustainable Development Department at the World Bank provides some insights on the social discount rate, which consists in using lower discount rates where beneficiaries may not experience such fast or high growth as the national average, proposing to not discount future costs and benefits at all in the most extreme cases. The benefits usually associated with WSS interventions (health benefits, disability-adjusted life years, access to water for productive uses) all have associated social benefits that can be better valued through the application of a social discount rate. Other benefits to take into account and evaluate qualitatively (these may be out of the scope of the project but could be considered) are:

- At the community level: increased community participation around WSS management, representation of women, capacity-building through targeted trainings responding to community needs, improved communication with the local (non-Indigenous) government and WSS entities, recognition of cosmovision and traditional knowledge in project design and implementation.

- At the regional and national level: increased or improved coordination with the WSS sector, articulation of WSS-related priorities for Indigenous areas, recognition of traditional organization and structure, recognition of cosmovision and traditional knowledge in sector priorities and methodologies.

Additionally, when defining the methodology of intervention, the priority of providing sustainable services – wherein investments do not have to be repeated in the same communities due to lack of maintenance and ownership over their systems – can be weighed qualitatively.

In the countries visited, tangible motivations for investing in remote Indigenous areas despite potentially high costs included: equity measures, redress for impacts linked to historical conflicts, as part of territorial strategies or retribution for previously incurred environmental damages. Furthermore, the recognition of the human right to access to water and sanitation[44] in 2010 acknowledged that clean drinking water and sanitation are essential to the realization of all human rights and further strengthens the argument for focusing on Indigenous areas and closing the 'last mile' of the service gap.[45]

43 World Bank. "Discounting Costs and Benefits in Economic Analysis of World Bank Projects." 2016.

44 Through UN Resolution 64/292 in 2010.

45 Jiménez, A., Cortobius, M., Kjellén, M. "Working with indigenous peoples in rural water and sanitation: Recommendations for an intercultural approach." SIWI, Stockholm. 2014a.

Key questions:

- Would the application of a social discount rate be relevant as part of the economic analysis? If yes, has a comprehensive set of social benefits (common factors like health benefits, time use, and complementary ones such as increased participation and representation) been taken into account?

3. Designing an Effective Intercultural Engagement Strategy

Consultations are recommended at every stage of the project cycle, for a variety of actors and objectives. At the outset of a project, the project team should initiate discussions to identify the most acceptable, effective, and inclusive format that consultations should take throughout the project cycle. Defining the terms of consultations at the outset of a project lays the foundation for respectful and informative engagement with the community.

a. Mechanisms for Communication and Engagement

Use appropriate consultation methodologies when launching a WSS intervention to ensure the meaningful participation of all Indigenous beneficiaries. Informed consultations are a two-way street: project teams provide information on the potential project and receive inputs and participation commitments from potential stakeholders and beneficiaries. This participation can take the form of informed conversations about the project with a platform for questions and answers, feedback provision by the future users and approval of key decisions. When well-conducted, consultations also avoid miscommunication around the intentions of the project team and the availability of resources. The consultation process is essential in building trust where there might be fundamental disagreements (between central government and Indigenous organizations for example) and in ensuring that local knowledge is respected and incorporated into projects.

Ask indigenous organizations' and authorities' recommendations for the proper modalities of engaging with communities. These modalities include announcements, assemblies, focus groups discussions, key informant interviews, and are described below.

 Assembly	 Announcement	 Focus group discussions	 Key stakeholder interviews
Description			
• Also called community meeting • Common platform for decision-making in Indigenous communities • Convened by the local traditional authorities with attendance from the entire community • Can be used throughout the project cycle to share information on progress or collect beneficiary financial contributions • Involves a questions and answers session for all to participate • Participation of the local authorities (mayor, municipal technical staff), the local Indigenous authorities, the implementing agency or contractor staff, including social specialists for facilitation, and all future beneficiaries (community members) of the WSS systems	• Information is shared with the community, either at an assembly, a public meeting where attendance is not obligatory or through other communications means (posters, media, radio, house visits) • Can be used to disseminate information, eligibility criteria, project scope, objectives and rules of engagement • Anyone may participate, though the information sharing is often one-way	• Meetings held in smaller groups, often targeting a specific sub-group of the community such as elders, women, young people, or the future WSS committee members. • Appropriate when consulting on a specific topic and when in-depth information is sought • Session should be structured around a particular topic and set of questions • Can provide a platform for conflict resolution	• Interviews carried out with single informants identified for their particular perspectives, expertise or role in the target community (Indigenous authorities, teachers, community organizations leaders, randomly selected beneficiary, local government, representative of a WSS institution, specialists) • Platform to interact with higher-level authorities/ organizations • Carried out during pre-identificationand identification to inform intervention design • Can help delve into a particular topic or issue
Benefits			
The presence of the majority of the community often represents a positive social pressure to contribute and promotes transparency Ideal to formalize community approval and decisions	Provides a quick way to share key information on the project When using written material, can help document important project information and remind community members later on Announcements from traditional authorities can be very effective	The smaller size helps gather insightful contributions from informants with time to elaborate with follow-up questions Can provide a safer space for discussion as informants may feel less threatened with people of the same sub-group Allows for groups who may feel uneasy speaking up in an assembly to voice their preferences and concerns	Allows for in-depth discussion of certain topics with key actors Especially helpful at the beginning of an intervention to gauge different perceptions and understand communication rules in the target community
Look out for			
Communities may want to hold a closed assembly where the project proponent or local Indigenous interlocutor will be invited to present. The project proponent would then be asked to leave during community deliberations and the conclusions or decisions then presented in a separate open assembly. May not necessarily provide an ideal platform for the participation of all groups Norms regarding gender roles in public spaces should be considered and potentially counterbalanced with proactive steps to include women and marginalized community members This modality requires mediation from local Indigenous authorities	May not include a space for discussion Can be perceived as top-down information sharing This modality requires participation (or at least approval) from local Indigenous authorities Most effective when the information communicated builds on the results of previous participatory sessions This does not provide a way to check if beneficiaries have understood the information shared as intended This modality requires participation (or at least approval) from local Indigenous authorities	Not appropriate for official approval as it may not provide community-wide representation Subject to community rules: some Indigenous communities may have specific rules about certain sub-groups (women, youth) meeting among themselves or with outsiders, in which case facilitators can be considered This modality requires approval from local Indigenous authorities	Not appropriate for official approval as it only represents one person's perspective Subject to community rules: some Indigenous communities may have specific rules about certain sub-groups (women, youth) meeting with outsiders, in which case facilitators can be considered This modality requires approval from local Indigenous authorities

Based on inputs from traditional authorities, an intercultural engagement strategy should be defined for the project that respects traditional hierarchies and cultural preferences in establishing clear rules for participation, communication of key information among stakeholders and establishes how decisions are made and documented. Highlight point people for the project team to communicate with, relevant protocols for organizing meetings in the community, including prior information requirements, community preferences regarding meeting structures, noteworthy community rules regarding individuals' participation, and how to document procedures, conclusions, and decisions (attendance list, meeting agreements or acts, pictures, etc.). Also include particular requests on the format of training (participants, organization) and the topics the project team plans to cover. In this strategy, include provisions to incorporate women's perspectives into the consultation process throughout the project design and implementation.[46]

Carrying out proper and respectful consultations may require additional time during project design and implementation. Though project teams can be under pressure to fast-track implementation, time requirements should not deter them from carrying out informed consultations and respecting a thorough participatory process. If a program's scope includes numerous communities and timeframes to secure financing are short, one solution is to agree on the scope and procedures for more in-depth community level consultation and participation processes through for an example, an Indigenous Peoples Planning Framework. This approach, however, requires that certain flexibility is allowed for in project design so that the community priorities and preferences can be incorporated prior to making investments. Continuously sharing information in accessible ways throughout this process will help keep stakeholders well informed of project stage and procedures, while building in flexibility for designs and activities to respond to community feedback. In Indigenous territories, building and establishing trust takes time, as people can be reluctant to engage until they see results, and traditional decision-making processes require time. A clear framework and/or protocol regarding what information will be shared, by when, and how decisions will be made and documented can greatly reduce these timeframes.

In La Guajira, Colombia, the Regional Government, *Gobernación*, imposed that no requests be made of beneficiaries until they could see the physical system working, under the assumption that Indigenous beneficiaries would not believe a system was coming or want to contribute to its construction until that moment. The project team respected this request and worked with Indigenous authorities and local NGOs to agree on system type and carry out the whole intervention, and only involved beneficiaries once results were visible. These idiosyncrasies require flexibility on the part of project teams to assure community members of the beneficial nature of a project through information sessions at project onset. For example, in Misiones, Argentina, the traditional leaders, *Caciques,* require consultations to be carried out in two stages: one day with only indigenous peoples present in order to strengthen their governance system, so that the second day they can be consulted by non-indigenous utility representatives. Fulfilling such a demand would lengthen the consultation process, doubling its time, however respecting this timeline was essential for the intervention to build support from the *Caciques* and their communities. **Time and resources wisely invested in the culturally appropriate identification of projects and the preparation of an engagement strategy can greatly reduce future implementation delays, while ensuring that the full benefits of interventions in Indigenous areas are realized and further sustained.**

46 For additional guidance on designing an intercultural approach, see Jiménez, A., Cortobius, M., Kjellén, M. 2014a.

Key questions:

- Which modality and platform is best suited to share information and consult with the beneficiaries at project onset?
- Are there subgroups (such as women) that may feel uncomfortable expressing themselves in a public setting like an assembly? If so, how can they be encouraged to participate without jeopardizing local traditions?
- Are there particular traditional communication rules that influence information sharing in the community or neighborhood?
- Would it facilitate the process to have an Indigenous or local intermediary provide initial explanations and allow for internal deliberations prior to having external actors participate?
- Have the traditional authorities and/or the beneficiaries indicated certain preferences related to the timeline or sequencing of information-sharing and consultations?
- Does the timeline of the proposed intervention respect and account for local communication rules and processes?

b. The Central Role of Consultations

Free, prior and informed consultation with broad community support is the requirement of the Bank's Policy on Indigenous peoples. The principles behind each word are critical to ensure meaningful consultation. Beneficiaries should feel **free** to be present and express their views, even if they contradict what the project proposes or its intended outcome. Information should be provided to stakeholders in an accessible and timely way, prior to the consultation to allow for meaningful and informed feedback. Throughout project and solution identification, these consultations should take place in the form of community meetings, key informant interviews and focus groups, and should always entail at least two iterations – where information is provided, communities have the opportunity to analyze and deliberate this information, and provide informed feedback, and then proposed solutions are reported back – demonstrating how feedback has been incorporated.

Broad community support to move forward with a project based on agreed designs, water sources, payment schemes, and responsibilities should be achieved and documented prior to making any final investments decisions for a given community. As part of their methodology for engaging with Indigenous peoples, FISE in Nicaragua has established a series of such sessions to present the technology options to a given community and give them all the information necessary for decision-making around their preferred solution. The information collected during consultations should be carefully recorded to ensure it is taken into account at all points of project development and implementation. Additionally, continuity in the social team assigned to particular projects can help guarantee that the consultations inform the process as a whole and avoid harming the trust relationship built during the initial stages. Mechanisms should be designed for every project to ensure ongoing participation, two-way information flows, and grievance redress during all stages of the project cycle (see *Citizen Feedback and Grievance Redress Mechanisms* section in the Sustainability chapter).

For projects with multiple works or lack of specificity in project areas, the World Bank uses a tool called

an **Indigenous Peoples Planning Framework**[47] to establish upfront the rules of the game for engagement, consultation and preparation of specific measures for project design and delivery adaptation through the preparation of Indigenous Peoples Plans. If such a Framework has been prepared in proper consultation with Indigenous organizations and representatives, the community level processes are normally clear and more efficient.

The table below summarizes the different topics to address in consultations and the relevant moment in the project cycle. The elements brought up here are described in more detail in specific sections of the document, however this is meant to provide a roadmap for consultations along the project cycle. Where applicable, separate consultations should be conducted for men and women (see Gender section in the Ownership chapter).

Project cycle phase	Topic of the consultation	Methodological comments	Modality
Pre-Identification 	• Information gathering for project conceptual scope • Legal and institutional framework • Stakeholder mapping • Investment prioritization • Budget restrictions	These interviews of representatives from various national and regional level organizations aim to respond to the questions under sections III-1 and III-2. They may also help identify protocols and rules for engagement in the target community.	
Pre-Identification 	• Introduction of the project team to the community through the traditional authorities	This may not be a 'consultation' per se but is an important first step to approach the community.	
Pre-Identification 	• Agreement on Decision-making processes, project cycle and project criteria, and particular procedures for community engagement • Perceived and expected benefits from the intervention • *General* expected contributions and responsibilities from the community/ beneficiaries and existing community economic contribution schemes	This first consultation should help define a clear procedure for future consultations, decision-making processes and their documentation. Particular care should be taken in validating perceived benefits not to raise expectations beyond the scope of the project through clear communication on the intended intervention. As part of the 'rules of the game,' expected community contributions and responsibilities should be discussed (and can be addressed in more detail later in the design phase). This is also a good moment to ask about existing community economic contribution schemes and gauge if a tariff or alternative payment would be appropriate.	
Identification 	• Corroboration of community demands for WSS services and identification of training needs	Can separate sessions with those to be responsible for WSS services management and the rest of the community, or men and women.	

Continue

47 More information on this tool can be found on the World Bank website.

Project cycle phase	Topic of the consultation	Methodological comments	Modality
Identification 	• Management model	Present options for WSS services management. Discuss specific tasks, responsibilities and community rules. If the choice is to have a WSS committee, the mechanisms for its formation and composition should be established at this stage. If elected, a specific session can be organized. If the services are to be managed by any other third party, this entity should be presented and the relationship and responsibilities around management discussed clearly.	 
Identification 	• Community approval of management model	A decision (vote) may be taken at the end of the previous session or may occur in a specifically organized assembly. This may also take the form of an agreement. Either way, this moment and associated decision need to be documented.	
Design 	• Traditional knowledge, community cultural norms and preferences around WSS uses and hygiene • Other local actors and potential conflicts • Past experiences with the WSS sector • Expected community contributions • Identifying location for system construction • Preferences on system handover • Verification of long-term availability of water resources	Take into account traditional knowledge of the local environment, natural resources and climate/seasonality aspects. Contributions should be discussed based on existing community economic contribution schemes (if any) and the need for a tariff or alternative payment explained as needed to the community members. Inputs from the session should inform the elaboration of a menu of technological options that respects required technical standards while incorporating traditional knowledge (see relevant section for more details).	 
Design 	• Presentation of an adapted menu of technological options, including O&M implications for tariff levels for each option • Management model • Community contributions to construction	This session should provide a platform for community members to get to know each option and its O&M and economic implications (tariff or alternative). This is in part a presentation from the project team and should be done in a way that is easy to understand for Indigenous beneficiaries (scale model, pilot latrine, pictures, diagrams, photos or videos, for example). Community contribution to system construction (and a rotating fund, if applicable) should be defined at this point. If necessary, several sessions can be organized for more in-depth sessions on each topic.	 

Continue

Project cycle phase	Topic of the consultation	Methodological comments	Modality
Design 	• Community approval of the technological option for water • Household validation for sanitation solutions proposed • Community approval of tariff or alternative • Community approval of contribution to construction	A decision (vote) may be taken at the end of the previous session or may occur in a specifically organized assembly. This may also take the form of an agreement. Either way, this moment and associated decision need to be documented. These may be organized as separate sessions for different topics.	
Design 	• Presentation for approval of the final design	The project team presents the final design to the community and the associated payment structure. As before, this presentation should be done in a format easily understandable by the community. If there are concerns or requests for modification, the project team can justify the technical reason for each aspect or adjust the design. Final Approval and endorsement may be delayed to a separate session. This moment and associated decision need to be documented.	
Design/ Construction/Post-Construction 	• Meeting requested by the community (leader or members) • Training workshops • Conflict resolution	As needed throughout the project cycle.	 
Post-Construction 	• System handover	A culturally appropriate ceremony to formalize the 'transfer' of WSS infrastructure to the community and inaugurate the systems, with emphasis that formal ownership resides now with the community.	

Key questions:

- Have the principles of free, prior and informed consultation been respected? Has broad community support been achieved and does the scope of this support cover all critical aspects of project design?
- What instruments do the Indigenous communities use to deliberate and document community decisions? Are there mechanisms in place to thoroughly record or document the process?
- Does the engagement strategy include a comprehensive plan and timeline to address all the topics outlined in this section?

c. Gender aspects

Incorporating women's perspectives into the consultation process throughout the project cycle ensures the project will serve all members of the community, but engaging with women requires specific provisions when working with Indigenous peoples. As in other rural or vulnerable groups, women oftentimes play the key role of managing water in Indigenous communities. Indigenous women have a traditional link to water by shouldering the primary responsibility to fetch water, use it to cook and wash, and treat it before giving it to their families. Women who do not have access to piped water often spend many hours traveling to a water source, which directly affects their quality of life and productivity. For instance, in the peri-urban neighborhood of Ibeorgun in Panama, water is only available for a few hours per day starting at 1 am. Women and even young children have to wake up in the middle of the night to collect water from a nearby standpipe.

Field visits showed that due to this close daily interaction with water, Indigenous women hold and transmit traditional ecological knowledge. Women tend to know about traditional practices of water harvesting, preservation and purification, and have historically passed that knowledge down to younger generations. For example, in the Argentinian Chaco, Wichi women pointed out certain plants that indicated the proximity of a water source. Women also play a vital role in promoting the behavior change necessary to encourage Indigenous peoples to consume piped water rather than potentially contaminated water from the river, practice handwashing, or employ sanitary facilities. As expressed by a Guna woman from Panama, "mothers understand that polluted water makes their children sick and so they will push the community to adopt clean water and teach children to use latrines if that means their families will be healthier."

Working directly to address women's priorities can help dispel some misconceptions. Water collection is often used as an example of a socialization ritual that, if taken away through the installation of a piped system or household solution for example, could threaten the social fabric of a community. However, in Nicaragua, while the overall beneficiary's preferences were to piped system with household connections, focus groups with women helped identify the need for a communal water point to wash clothes and provide such a meeting point. The project subsequently built this into the system to provide a meeting point for women to gather around water and carry out their chores while socializing. Seeking women's input can help incorporate traditional knowledge and cultural norms around WSS into projects.

Understanding women's needs related to a WSS project entails gathering information on:

- Women's domestic uses of water (e.g. drinking, cooking, hygiene, cleaning)
- Women's productive uses of water (e.g. homestead gardening, livestock tending, livelihood activities like pottery)
- Beliefs and current practices around water, sanitation, and hygiene
- Preferences related to water sources for these needs (e.g. quality, cost, location, quantity)

Gender dynamics differ between Indigenous communities and cultural norms require specific strategies of engagement with women. This desire was voiced repeatedly during field visits. Some Aymara communities in the Bolivian highlands left all decision-making to women and refused to allow men on their WSS committees, whereas in Ecuador sometimes women are not allowed to speak in public but will influence and have the final say in decision-making once outsiders have left the community. Ideally, a thorough consultation process will provide space to discuss women's concerns and needs and ensure they are incorporated in subsequent steps of the project cycle. However, a community's specific cultural norms around gender will influence a project team's ability to carry this out. In the Paraguayan Chaco, Ayoreo women demand to be approached first when projects involve WSS, even before the community's leaders, because they are traditionally in charge of managing those resources. In this case, parallel consultations for men and women were recommended, but project teams should make sure to verify that traditional authorities are informed and supportive before taking such measures.

Overall, women were more willing to share their knowledge and experience on WSS in women-only spaces. Separate, sex-disaggregated focus group discussions for men and women is standard practice for participatory needs-assessment and qualitative research. Not only do they reduce inhibitions to sharing opinions, sex-disaggregated focus groups often show stark differences in men and women's opinions on the same topic when interviewed separately.

Three general norms around women's participation emerged in fieldwork: (i) women are involved in community decision-making with men; (ii) women advise men behind closed doors but do not speak in public; and (iii) women actively make decisions and their opinion matters more than men's, particularly on issues considered to be in the domain of women, like WSS. Although each of these different participation modalities allowed for women to express their needs and preferences to a certain extent, the degree of women's power to voice their opinions and influence decisions in the community can vary significantly, in ways that are not necessarily correlated with the participation modality. For example, in some contexts women do not participate publicly but maintain substantial influence through private channels, and in other settings where women appear to participate actively, these vocal women may not be representative of other women in the community, given their social status or family ties to community leaders.

Project teams can investigate if women's participation in community-level decision-making effectively represents their water-related needs and preferences through the following approaches:

- Consult Indigenous community leader(s) to understand community rules around which women can participate in community decisions, which decisions, and when and how they can participate
- Ask women from different segments of the community what their perception is of their ability to raise their concerns and influence community decisions
- Learn from experiences from other sectors (health, education, local government) that have worked with the community to engage women and promote women's participation
- Consider steps for culturally appropriate engagement, such as choosing women facilitators to work with groups of women, working with existing women's groups or forming women's groups that can discuss issues in private before raising them to men, or engaging male allies with decision-making power who listen to women's demands

Project teams can decide to what extent they seek to influence gender norms in the community. In communities where gender norms do not formally allow women to participate publicly, there is significant scope for projects to create opportunities for women to share their input in ways that are acceptable and non-threatening to the community. Teams can also explain that this approach is necessary to ensure that all members of the community benefit from the WSS intervention being developed. When possible, secure community leader's permission for engaging with women in private.

Consult women on format and content of training they would like to receive, keeping in mind traditional norms and technical soundness. Women in Paraguay expressed their wish to receive training on water for productive uses (bread making, products they could sell, small-scale gardening) as part of an upcoming project in their community. Women may also make specific requests regarding the format of these trainings: specific modes of information sharing, for example all oral (especially if literacy is low), or focus on anecdotal evidence rather than expressed opinions. In the Argentinian Chaco, women requested to use the consultations as a way to document the traditional stories of their community around natural resources management. The outcome was transcribed and printed along with one of the women's illustrations. This same group also requested the construction of a women's center, where consultations and all project-related meetings with women were to be held subsequently. This project contribution helped create a safe space for these women to share their knowledge and opinions.

Take into account women's language requirements. Indigenous women oftentimes have less ability to understand and speak Spanish or Portuguese than men due to lack of educational opportunities and limited external contacts. When necessary, socialization or training tools delivered in relevant indigenous languages will help foster their understanding and participation. Written materials may not always be effective depending on literacy levels. As in the Argentina example mentioned above, illustrations and transcription of oral storytelling is a strong tool to tease out women's perspectives and traditional knowledge.

Soliciting and responding to women's input makes for a more respectful and effective project. Women's needs should be explicitly sought out in consultations throughout the project in a format that is culturally acceptable as well as representative of all women in the community.

Key questions:

- How are decisions currently made in the community? Who has input and who has the final say? What are current modalities in which women participate in community decision-making?
- What is the perception of women in the community regarding their ability to express their opinions and influence community decisions? Do certain women have more influence in the community and, if so, how well do they represent other women?
- Are there existing women's groups or forums for women to discuss their needs with one another and voice their opinions?
- What are norms surrounding outsiders' ability to hold discussions with women, and what are ways to make this more culturally acceptable? For example, would female facilitators make sex-disaggregated focus group discussions acceptable?
- Do consultations, trainings and workshops include specific provisions to ensure meaningful consultation of women and capitalize on their position as behavior change agents in their families and communities?
- Are there any social or cultural rituals that could be affected by the installation of a WSS system? If so, have these been frankly discussed and assessed with beneficiary women?
- Where are there opportunities for the project to incorporate women's views, preferences, and local traditional knowledge into the project?
- What are the language requirements of the women in the target Indigenous community? Does the team have staff speaking that language and a methodology for non-written languages, if applicable?

Key recommendations for RESPECT

Understanding the Country Context and Relevant Actors for Indigenous peoples and WSS

1. Understand the legal and institutional frameworks of the country that pertain to Indigenous peoples and become cognizant of engagement rules and protocols for Indigenous organizations, i.e. who to contact and how.

2. Identify key actors from both: (i) Indigenous representation; and (ii) Government - both WSS sector and Indigenous interlocutor. Carry out a stakeholder mapping exercise, mapping the different roles and responsibilities at the intersection of the WSS sector and Indigenous organizations and authorities, with particular attention to intervention targeting mechanisms and responsibilities along the project cycle.

3. Identify the existence of any country (or sub-national) WSS strategy targeting Indigenous peoples; if inexistent, try to build one for the project context. Such a strategy should aim at aligning the local Indigenous peoples' framework with the WSS sector and have a systems wide or transformational impact beyond a specific project.

4. Assess the previous experience and existing capacity of the project team (and collaborating organizations) in working with Indigenous peoples on WSS-specific projects and topics. Based on the results of this assessment, define a tailored training program to strengthen relevant areas in Indigenous peoples-specific aspects and/or complement the teams with social experts and trained engineers.

Prioritization of Investments and Understanding Local Contexts

1. Understand the intervention prioritization mechanism in place and use this knowledge to assess and verify that the projects being proposed are representative of Indigenous territorial priorities and local demands.

2. Carry out a diagnosis before an intervention to ensure the project responds to each community's needs in a way that respects their customs and traditions.

3. Wherever possible, follow a demand-responsive approach that respects the cultural norms of the target Indigenous group and use resulting insights to tailor implementation.

4. Study the local historical context and how the particular Indigenous community may have interacted with WSS or broader water/development projects in the past to inform the engagement strategy.

5. When assessing the viability of interventions in Indigenous areas, account for social and economic benefits beyond a traditional ERR analysis through qualitative work. Consider using a social discount rate.

Continue

Designing an Effective Intercultural Engagement Strategy

1. Identify the best mechanism to engage relevant stakeholders, ensuring that those subgroups that may not speak up in front of others have a platform in which they can comfortably participate.
2. Assess the local social fabric and incorporate existing ties and rules in consultations and implementation arrangements.
3. For all participatory processes, follow the principles of free, prior and informed consultation and ensure well documented broad community support for critical design elements.
4. Establish and agree early on systems to ensure ongoing participation, two-way information flows, and grievance redress during all stages of the project cycle.
5. Invest time upfront in designing appropriate approaches and align project timelines with traditional decision-making processes.
6. Actively engage women from the project's onset and throughout its development, implementation and post-construction social work to ensure that their views and traditional ecological knowledge are taken into account.
7. Design and carry out tailored training for women so they can best fulfill their role as behavior change agents.

4. Ownership

Ownership is a community's commitment to adopt and use WSS services and to operate and maintain the system.

Ownership is achieved when a community recognizes the value of WSS services and takes responsibility to care for its WSS system. **Ownership builds on a foundation of respect and reflects a community's commitment to define, implement, use and look after their WSS solutions.** The beneficiary group's ownership over not only the physical infrastructure (the system) but also the service provision (the process) ensures that the project will have a lasting impact. To promote ownership, Indigenous beneficiaries and their traditional authorities must be engaged and involved in all the key decision making processes from the identification stage to design, construction, service delivery, and O&M. To achieve ownership, the representative Indigenous authorities must be fully on board and serve as an entry point for communication with the community. The technological solutions developed for Indigenous territories should be demand-based and tailored to their culture and environment in order to be fully adopted and used. As mentioned in the Respect section, the project team needs to have skilled staff that can spend ample time with the beneficiary communities to build trust, mutual understanding and allow for meaningful participation throughout project design and construction. This also requires ongoing technical assistance during the implementation phase in activities such as supporting the consolidation of the WSS governance structure by helping a WSS committee to attain legal status, and the provision of continued training to ensure technical information is passed on appropriately.

This section discusses steps to promote ownership and buy-in from an Indigenous community. First, the section discusses how projects can build on and integrate with existing institutional structures for service provision and management, and provides guidance on developing tailored trainings to build capacity to manage a WSS system. Next, the section walks the reader through culturally-appropriate solution design including decisions to be made with communities on aspects of the system like scale, water source, and technology. Finally, the section suggests considerations for systems construction, including different construction models, contributions from beneficiaries, specific provisions for procurement, and system handover to the community.

1. Building on Existing Institutional Structures for Service Provision and Management

Assessing community social organization can help inform the model of service provision and management that will be most effective for the community. Water committees may function well in communities with high social cohesion, but in other Indigenous communities, working with a water utility or a hybrid/third party model may be more productive. Water committees that are formed early in the project cycle, that receive training and support from another technical entity, and that establish transparent regulations to define the responsibilities of the committee and of the beneficiaries, tend to be most successful over time for developing ownership and sustainably maintaining the system and service delivery. The community managed model is the most popular in LAC rural areas.

a. The Importance of Social Cohesion and Collectivity

The stronger the social cohesion or fabric, the reciprocity between community members, and the open communication between the beneficiaries and the service provider, the more likely the beneficiaries are to value and pay for the WSS services they receive. In general, well-organized Indigenous communities are more likely to sustain WSS services. This was demonstrated in the peri-urban Guna community of Ibeorgun in Panama, where IDAAN affirmed that it was much easier to collect contributions than it was in neighboring areas where Indigenous populations lived amongst non-indigenous Panamanians. Similarly, in Cochabamba, Bolivia, the closer to the city (further from their traditional way of life) and the larger the community was, the more the social fabric and traditional organization was stretched thin. In these communities, field work showed higher levels of social conflict, a lack of respect for the water committee's governance and rules, lower willingness to pay for WSS services, and disinterest in carrying out their responsibilities towards the WSS services in general. These dynamics help identify the rules to be established for the functioning of a

local WSS governance structure and can inform any training needed around its operation (for example on elections of board members or arrangements for tariff collection).

The social cohesion in a community can be assessed as part of an early-on diagnosis by evaluating how much community members organize (Are there community organizations? How many community members do they represent? How often do they meet? What is their say in community decisions?) and how trusting they are of other community members (Are there family ties between may households? Would community members leave their children under the care of a neighbor?).

Key questions:

- How strong is the social cohesion and the reciprocity in a given Indigenous community and how can it be taken into account to promote sustainable services?
- Does the local social cohesion lend itself to community-management?

b. Establishing Responsibility for Service Provision and Management

Hold consultations to define the entity or group responsible for service provision and management of the WSS system and the associated services. Even if the country has a clear "go-to" model in the sector, the final management model choice must be in line with the local traditional Indigenous structure and the effort that Indigenous community members want to invest in the management of their system. Respecting the beneficiaries' opinion regarding the O&M of their system is key to build ownership on their part. Systems can be:

- **Locally managed** through the creation of a water board or committee at the community or neighborhood level. Examples of locally managed water systems can be found in Nicaragua and Bolivia. The limitation of this model is that as communities and neighborhoods grow in size (most likely in peri-urban or urban settings), the social fabric of groups often erodes and users become more like customers. The committee, which is oftentimes made up of local volunteers, may consequently have more difficulty managing the users and their compliance with payments and usage rules critical for system sustainability.

- **Utility managed**, as is the case for the systems operated by IDAAN in Panama. The success of this model depends on the utility's overall performance and the availability of social specialists and technical staff trained to work with Indigenous peoples.

- **Managed through a hybrid system with participation of a third party entity**. This may be done through technical assistance from an NGO, the water utility or the local government to a water committee, as in the cases studied in Nicaragua and Bolivia, or through private sector participation, as in the case studied in the Amazonian region of Peru. In Peru, the PNSR hired a company to operate the 65 systems they built in indigenous communities.

The choice between these different service provision and management models depends on the setup of the local sector. For example, in Nicaragua, where municipalities receive institutional strengthening from the central government (FISE) to provide technical assistance to rural communities, the establishment of a water committee at the community level, supported by municipal governments, is the norm, and the sector is very well equipped to ensure the sustainability of this model. Similarly, in Panama water committees are created and trained before and during project construction for administration and management of

the water system installed. In Argentina, regional water utilities are set up to manage WSS services for all residents (urban and rural) of each Province. In the case of the Chaco Province for example, the SAMEEP Water Utility is directly in charge of providing WSS services to Indigenous areas.

Though field work did not evidence a one-size-fits-all solution for management of WSS services in Indigenous communities, successful service provision and management models visited all involved entities with clear communication mechanisms with the WSS services users, taking into account traditional authorities and trainings to build capacity where needed.

Results from field investigation showed that for disperse rural areas the most successful management in the projects visited was done through WSS committees with clear statutes and regulations, with support (regular and good quality technical assistance) from an outside entity (state/provincial/municipal WSS unit/utility or NGO). The results of the mapping exercise and the consultations carried out during solution identification (see Respect chapter) should be used to inform the method by which the water committee is created and how its members are elected, respecting the traditional structure of authority in place at the community or neighborhood level.

Clear communication mechanisms with the WSS services users. Water committees in Nicaragua hold assemblies at least twice a year, sometimes up to once every month, for community members to voice their concerns, demands and appreciation. Even in cases of household rainwater harvesting systems in Paraguay, community members explicitly expressed their wish to have a community representative responsible for centralizing demands of technical assistance for repairs to the Municipality.

Taking into account traditional authorities. In La Guajira, Colombia, in order for a committee to be recognized by the community, the Traditional Authority would automatically have to be the head of the committee. In Boquerón Alto, Bolivia, the responsibility for service provision and management was rotated every year among community members. This practice shows particularly strong social cohesion among members of the Indigenous community.

Training. Rural water committees in Panama received specific capacity building on system O&M, tariffs and conflict resolution in order to prepare them for their role as service providers.

For the water committee model to be successful, however, it should be constituted as early in the project implementation process as possible. Early constitution of the water committee enables committee members to engage in the realization of the system, making decisions related to its nature, construction, and management, and increasing their overall knowledge and ownership of the system. Committee members also have more time to prepare for their management roles.

In more concentrated areas, the most effective WSS management model may be to collaborate with a water utility equipped with a strong social team with Indigenous peoples expertise.

Clear communication mechanisms with the WSS services users. In peri-urban areas of Panama, IDAAN has established a schedule of visits to the Indigenous communities they serve to regularly check up on users' satisfaction and communicate information on services, with a specialized social team, in addition to the utility's existing communication systems.

Taking into account traditional authorities. In successful examples of such collaboration, the Indigenous community usually enters into an agreement wherein service provision is 'delegated' to the utility.

Training. Developing partnerships between firms, NGOs and the public sector can also promote capacity building, as was done in Argentina through the involvement of Fundación Gran Chaco to train the local water utility SAMEEP in working with Indigenous peoples of the region.

Peri-urban areas showed successful examples of both models above, with WSS committees working best in those communities further from the city with stronger social fabric. As the communities' size and proximity to urban areas served by major water utilities increased, the water committees' performance or relevance tended to decrease.

The presence of a well-defined management model that is appropriated by the community is a key element to service sustainability as it increases the likelihood that the users will be committed to paying for services to support continuous O&M of their systems.

Key questions:

- Are consultations designed to identify a preference on the part of the beneficiary Indigenous community regarding the management of the system?
- Does the target Indigenous community fall within the service area of an existing WSS service provider? Does this service provider have the capacity to work with Indigenous peoples?
- Would the establishment of a water committee be appropriate/feasible in the target community or should other management models be explored?
- Is there a traditional structure that the management model should be adapted for or include?
- Who would the Indigenous beneficiaries trust to be responsible for system management and O&M?

c. Capacity Building for Service Provision and Management

Ensure adequate and ample training on administration, tariff setting, and technical operation and maintenance of WSS services throughout the project cycle. In general, water committees constituted through the project are more likely to require in-depth training than an established service provider like a water utility. This section focuses on topics linked to the training of community members in the management of their WSS services. If local government or a WSS utility is in charge of service provision, their capacity to work with Indigenous peoples should be assessed as indicated in the *Building a Project Team to work with Indigenous peoples* section of the Respect chapter.

Design trainings based on consultations with beneficiaries on their particular needs, interests, and preferences for training delivery.

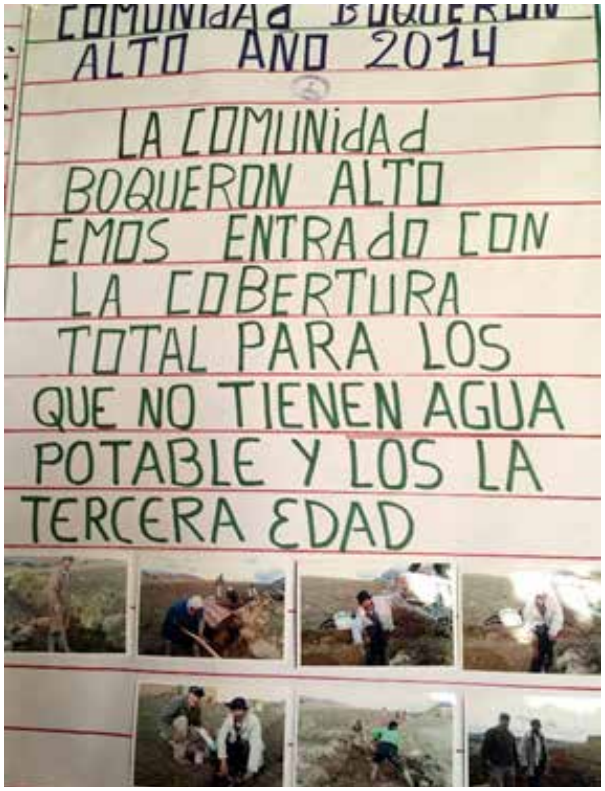
Particular training needs can be identified, such as:

- Language, literacy,
- The need for separate sessions for men and women (see Gender Aspects section in the *Respect* chapter),
- Pre-existing knowledge on water resources management,
- Administration and technical WSS concepts (note that these may be shared through collective traditional knowledge in the form of stories, for example),
- Cultural norms and practices around WSS and hygiene, and
- Traditional structures to take into account in assigning responsibility for service provision management and O&M.

Support water committees in establishing statutes and regulations for the functioning of the committee. In the successful cases visited, these statutes and regulations contained clear rules for the training of community members on O&M topics and for the election of committee board members. In several cases, the committees even had mandates to cut the service of those who did not pay. Some committees developed innovative rules that focused on ensuring long-term sustainability. For example, in Boquerón Alto, near Cochabamba in Bolivia, all community members participate in monthly WSS meetings and are fined for not attending. This allows an easy rotation among water committee members, as the entire community is trained and aware of their system's demands and issues and the requirements for sustained service provision.

In communities that neither have water committees nor clear responsibilities assigned to community members for system maintenance, broken system infrastructure usually remains unused until an outside actor like the municipality notices and repairs the system if funds are available. This was the case in some communities of the Paraguayan Chaco, where households waited for the municipality to fix their rainwater harvesting systems as there was no clear agreement on maintenance responsibility. In contrast, when there is an officially established water committee that has received ample training on administration, tariff setting and technical maintenance throughout the project, the committee takes responsibility to correct the issue or seeks immediate help from specific authorities or partners.

Figure 6
Certificate (left) and Mission Statement (right) of the Boquerón Alto WSS Committee, Bolivia



The section on *Financial Arrangements* (Sustainability chapter) outlines the important notions to include in trainings on tariff setting.

Key questions:

- Do consultations tackle the community's training needs and preferences? How will these inform the training plan?
- Does the training plan address the clear definition of rules regarding WSS services in place (service cuts, payment, responsibilities)?

2. Culturally Appropriate Solution Design

This section presents several aspects for decision-making with the community on culturally appropriate solution design, including the reach and scale of the system, water sources, water uses, management model, and technological choice. Indigenous communities' locally specific knowledge on water resources and traditional water treatment can be of tremendous benefit in informing solution design.

a. Deciding on System Scale

Take into account the community's norms and preferences regarding system scale, including: proximity to the house, level of interactions with others, community organization and reciprocity for O&M and management, existing sanitation practices, and relationship to the water source, to name a few. Water systems can be constructed at the household level, community or neighborhood level, or multi-community level. In field visits, Indigenous peoples, depending on their location, expressed preferences for the three different scales. Most of the successful cases encountered, however, used small-to-medium community WSS systems.[48] In these successful cases, there was a clear mechanism for community engagement and systematic technical assistance. Communities that employed household level rainwater harvesting usually had low ownership of the systems and limited community mobilization for O&M, either to carry it out themselves or to ask an outside actor (like the municipality) to do so. Despite the lower O&M requirements of these simple household systems, the decentralization of responsibilities and low levels of technical assistance generated a systemic lack of ownership and resulted in infrequent maintenance and consequent contamination of the systems. **Regardless of the system scale, agree on a clear management arrangement and a systematic technical assistance mechanism with the users to ensure the transparent establishment of O&M responsibilities, tariff levels, payment procedures and the level of service.**

Key questions:

- What is the most appropriate scale for the WSS system, given the traditional structure of the community, their O&M capacity and existing WSS institutional structures (such as proximity of a WSS Utility or community interest in forming a water users association)?

48 The Team did not have the opportunity to assess any multi-community level systems. Argentina was the only place the Team visited where Indigenous communities were organized at a multi-community level and requested a large aqueduct system. The system had not been built at the time of the visit, rendering conclusions on sustainability difficult to make

b. Water Source and Climate Change

Incorporate local traditional knowledge on water resources in intervention design. Indigenous peoples' traditional knowledge of their land and natural resource base is a major contributing factor to their resilience in often very challenging natural environments, over millennia. This knowledge, which has stood the test of time and elements, is critical when identifying water sources, assessing potential impacts of seasonal changes, threats of contamination, and topography for the most effective design. Failure to engage and incorporate this local knowledge into project design can jeopardize the viability of the system and undermine ownership. Indigenous peoples often live on the land of their ancestors, where meaningful tradition and history are attached. Most indigenous communities recognize the value of water as a source of life and as life itself. Oral tradition collected in this study tells of animism and anthropomorphic figures protecting the sources of water, which are often considered sacred and a place of social interactions essential to maintain the local social fabric. **Balance the traditional value of a water source with technical concerns to promote use and ownership, carrying out specific information sessions on the benefits of sources new to the community (such as quality of groundwater) if needed.**

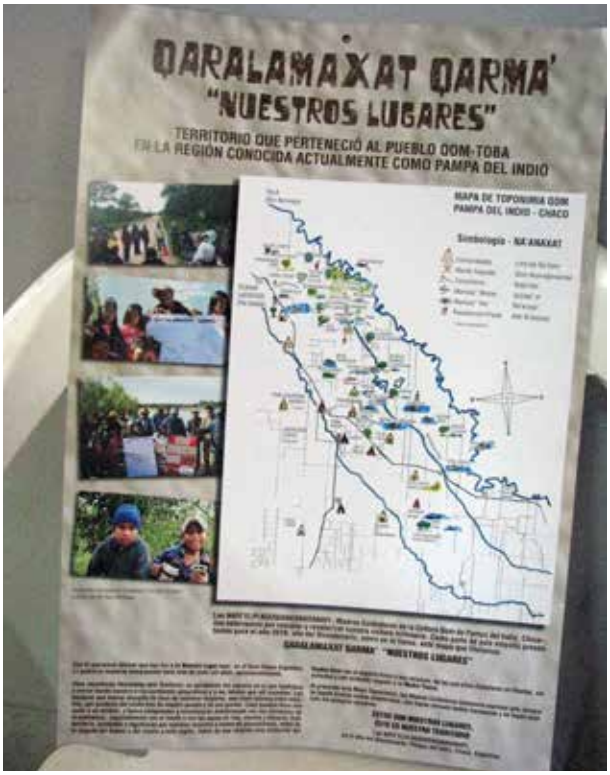
Provisions for source protection over time will depend on the local land rights and community arrangements. In many LAC countries, the provision and formalization of rights for potable water use have been gaining priority over other uses, with programs in Peru focusing specifically on ensuring that Andean and *Campesino* communities have rights to an adequate amount of water for the population's use before irrigation rights are recognized. Drawing from the legal analysis and stakeholder mapping exercises carried out earlier in the project cycle, project teams can work in conjunction with a community to devise a water source protection plan that respects traditional organization, community practices and land ownership for conflict mitigation. A good practice that draws on the World Bank's safeguards involves the community (or project) purchasing the land where the water source is located, or negotiating for that land to be transferred into the community's name. In Nicaragua, there are successful examples of title transfers from nearby landowners and from community members to the community as a whole. This is particularly relevant where water use allocation is tied to land rights. If other local actors use the area around the water source – for example farmers or another community – stakeholder engagement and mediation may be required to ensure the rules around source protection are respected for its sustainability over time.[49] In Panama, the water committee of the Ipeti Embera community explained that they had gathered enough money through tariff collection to purchase land around their water source to protect it from nearby farming activity.

Incorporate Indigenous communities' climate change concerns in source choice and system design for long-term sustainability. These concerns may include increasing seasonality and variability of a water source, nearby pollution from cattle, industrial or other sources that may be exacerbated by floods and droughts, and intensifying weather events. Many of the Indigenous communities interviewed acknowledged and deeply felt the consequences of climate change in their everyday lives. For example, many people complained of the delay of the first rain by several months and the crop-destructing intensity of the rain when it did come. Many Indigenous communities are also concerned with the depletion of groundwater and surface water resources. In the Argentine Chaco, communities pointed out that they used to be able to walk to the river, but that now they had to use a bike or motorbike in order to get to the closest water point. In Paraguay, elders in Ebetogue, Municipality of Filadelfia,

49 In-depth analysis of conflict resolution techniques is beyond the scope of this Toolkit. Carrying out an assembly and inviting these other stakeholders to discuss directly with Indigenous authorities may provide a good starting point to this dialogue.

complained that the younger community members were not absorbing traditional coping mechanisms anymore, such as the use of a root shaped like an onion, the “IBI,” which retains water like a sponge, and is used in case of extreme droughts to find small pockets of water. **Recording this type of knowledge and ensuring these ancestral practices are perpetuated in WSS interventions could help communities adapt to difficult climate conditions in the future.**

Figure 7
Map of water points and associated community systems elaborated in conjunction with community members, Argentina



Key questions:

- Where has the Indigenous community traditionally collected their water from? Is this technically compatible with the project options? Is training on alternative water sources needed to justify other options to the Indigenous community?
- Is there a plan for source protection? Are there specific land and water rights provisions to include in this plan?
- Does the community own the land at the location of the source, and if not, can it be ceded or purchased?
- Are traditional accounts of climate and variability resilience being recorded and incorporated into project design?

c. Water Use

The beneficiary community’s water use practices help determine source location and system design. In general, the amount of water used by Indigenous communities depends to a great extent on the amount of water available. In water-rich Panama, the average per capita water use in Indigenous areas is 50 liters (13.2 gallons) per person per day, compared to 25 liters (6.6 gallons) per person per day in the Kasiche Desert Community of La Guajira, Colombia. Note that these numbers are very low compared to the average urban water use of 200 and 60[50] liters per person per day in each country respectively. Where water is scarce, the burden on women and children to fetch

50 Superintendencia de Servicios Sanitarios (SSPD). “Informe Anual de los Servicios Sanitarios en Colombia.” 2007.

water is larger, and water conservation concerns are more important. Water uses also differ between Indigenous communities, with some groups, like the Guarani, reporting more rituals around water uses. In La Guajira, two types of reservoirs were found in each community: one for human consumption, and another one for animal consumption, since water for animals is of utmost importance to the Wayúu lifestyle. Wayúu communities also demonstrated traditional knowledge for reservoir protection, which shows that conjunctive use has been practiced for a long time. Water supply for appropriate hygiene and sanitation behaviors must also be considered (see *Long-term Behavior Change* section in the Sustainability chapter).

In general, field visits revealed openness towards the idea of having water meters. Indigenous informants associated meters with a fair allocation of water quantity and price. Water meters are a new concept in most Indigenous communities given that water use is mostly determined by available supply. However, provided with information around water uses, water-sharing, water-savings and pricing, some of the Indigenous communities interviewed expressed their approval of installing water meters to ensure that those with highest water use bear the economic burden and pay accordingly. This was the case in Ibeorgun, Panama, where Guna women laughed as they each acknowledged how many family members were using their household water supply and identified which neighbors would pay the highest price once the program rolled in and meters were installed. In general, many Indigenous communities interviewed deemed volumetric charges to be a fair way to allocate payment for water services.

Key questions:

- Have the target beneficiaries been consulted on their water use habits and concepts of fairness regarding water sharing, distribution and pricing?
- What traditional knowledge on water use should be taken into account in technology selection to promote adoption?
- Does the project plan to propose the option of water meters? Will this be incorporated into the consultation and training plans?

d. Technological Choice

Appropriate solutions combine what is technologically sound from a WSS expert standpoint (in terms of water quantity, quality, and reliability) with local and cultural preferences. These two components are by no means mutually exclusive, but the added work that their combination represents often deters project teams from consulting with Indigenous beneficiaries on technology adaptation. In the Paraguayan Chaco, one of the communities visited complained about an intervention from the Ministry of Housing wherein single-size water tanks had been installed for rainwater harvesting

in all homes, regardless of family size or water use. As a result, families often ran out of water and had to rely on emergency tanker trucks, despite having fully functioning rainwater harvesting systems and brand new roofs.

Design technologies that are compatible with indigenous peoples' traditional water treatment systems. For example, in Ibeorgun, a peri-urban Guna community in Panamá, women described the traditional sand filters they were familiar with using to treat turbid river water before it entered the pipe system to their community. Incidentally, as the Guna originally lived on sand islands off the coast of Panama City where water could be naturally filtered using that medium, these women had carried with them the tradition of filtering water in this way and were successfully treating their current water source. Similarly, in the Paraguayan Chaco ceramic filters are commonly used as point-of-use treatment technology as the clay is easily found in the neighboring environment. These traditional options are conventionally used to improve water quality and their incorporation into menus of options where possible helps incorporate effective existing practices linked to water treatment. **Traditional Indigenous knowledge goes beyond source identification and can provide surprising technological insights.**

Box 05

Water and Cosmovision for the Indigenous peoples in Argentina

In the World Bank's Norte Grande Project in Argentina, a lot of work was done with the *Madres Cuidadoras de la Cultura Q'OM* (the caring mothers of the Q'OM culture) during project preparation. They directed the implementation agency (SAMEEP[51]) team to key locations to find water. As part of a roads intervention, which was implemented before the WSS one, support was given to the women's organization to rescue the Q'OM culture by recording stories from their oral tradition through the production of bilingual materials. Some of the recorded stories were about water and its importance to life.

Water bodies are sacred places for many Indigenous groups in Argentina's Gran Chaco. For example, the Mocoví Indigenous peoples believe that gods used to live in lakes with feminine spiritual caregiver, the "cuidadoras de lagunas." In the rivers, little black creatures watch the rivers for any resource abuse. The Guaraní (Indigenous group present throughout the Chaco across Paraguay, Argentina, Bolivia and Brazil), on the other hand, revere waterfalls as the home of the goddess Imaraguí, who ascended into heaven. For the Mocoví and Wichí (Indigenous groups present in Northern Argentina), water is an element of the cosmos and a natural resource that forms part of the indigenous vision of the territory, as it lies on top, inside and below the land.

Local informants expressed their concern that water today is contaminated, whereas before it could be drunk straight from the sky, a sacred life-giving resource harvested from the *aljibes*.[52] However, this concern also highlights an understanding of water quality problems and the fact that *"Nowadays to have clean water it must be filtered through rocks"* (as explained by a local).

51 *Servicio de Agua y Mantenimiento Empresa del Estado Provincial*, the state company in charge of water services in the Chaco State in Argentina.
52 Household-level rainwater harvesting systems.

Figure 8
Ceramic filter, Paraguayan Chaco

The risk of a prescriptive menu of technical options is that WSS specialists as well as beneficiaries tend to limit their desires to the options offered without allowing for adaptations based on context or local needs. For example, in Paraguay the latrine has become the status quo, incentivizing isolated indigenous communities to demand what they have seen built in neighboring villages. The latrines built, however, are not necessarily the most culturally appropriate or health-beneficial solution given their lack of ventilation and the absence of associated training for appropriate use (see *Sanitation behaviors* section in the Sustainablity chapter).

The need for flexibility in technical design was exemplified by community members in La Guajira, who expressed a preference for latrines without a door, where the fourth wall is not straight but curved inwards to protect the dry hole on the ground, and the top is left open with no roof for aeration. As opposed to normal latrines, deemed too enclosed and claustrophobic, these "open" designs provide enough space and air flow for beneficiaries to feel comfortable actually using them, rather than reserving them for storage. They also give the user the impression of being outside, which was particularly valued in the Wayúu communities of La Guajira. However, this open space may not provide for the darkness and heat required for a latrine to be considered ventilated (wherein a vent directs flies and odors towards the outside) and thus does not meet the standards of an improved sanitation solution. In general, projects offered Indigenous peoples the same technological solutions they offered non-indigenous communities, with little room for adaptation. Where project budget or the need to scale up does not provide the resources and time for this iterative process, Indigenous beneficiaries must be thoroughly informed, through consultations and training, on the benefits and features of the different options at their disposal. Field work showed that when solutions were well-understood and approved by the community, use and ownership ensued, promoting sustainability. **Assess community requests to ensure that they meet standards for improved sanitation services. In cases where community demands cannot be incorporated into design for health or technical reasons or lack of resources, present the hybrid solution to the community and explain clearly why certain aspects cannot be included.**

Box 06

Urine diverting dry toilets – the success story of Bolivia

In Bolivia, surprising levels of ownership among Indigenous communities[53] for urine diverting dry toilets and associated compost systems could be found. In particular, each family could clearly explain the composting process and had been safely treating and using the toilet outputs with impressive results. For example, potatoes treated with the humus and pesticide made from processed urine showed no sign of worm infestation, whereas the potatoes planted nearby with chemical fertilizers were full of worm holes (see picture below).

Figure 9
Left: Potatoes treated with chemical fertilizer (left) and potatoes treated with processed urine fertilizer (right).
Right: UDDT with drying material.

Each family had been separating urine and storing it in bottles or buckets for planned use as an organic pesticide. The use of urine was highly accepted by the beneficiaries as it built on traditional practices where urine is used for medicinal purposes, as detergent for washing clothes, and as an occasional shampoo treatment for hair. The compost feature for feces was also highly valued by the community as it provided additional autonomy for their lifestyles, which are based on self-sustaining farming practices. All families visited were able – and excited – to give a detailed explanation of both the urine and the feces treatment processes.

53 The NGOs Adra and Water for People had projects in these areas.

Provisions to Include in a Menu of Appropriate Technological Options

Based on the findings of this report, the proposed technological solutions should take into account:

For water

- Availability, quality and seasonality of the water source
- Availability of funds, co-financing arrangements
- Availability of materials for construction and O&M
- Locally available and traditionally used materials
- Number of people to be served (scale), per capita consumption levels and different water uses
- Geographic conditions (type of soil, water table)
- Gradient of the ground (wells, gravity-fed systems and pumping systems)
- Beneficiaries' capacity to pay, accordingly to the type of solution
- Local traditional experiences, preferences, culture and cosmovsion
- Options for water treatment and water storage
- Operation and maintenance requirements and arrangements

For sanitation

- Type of supra-structure accordingly to users' preferences and financing availability
- Type of infra-infrastructure, accordingly to the geographic conditions (soil, water table, water sources, etc.)
- Availability of materials for construction and O&M
- Locally available and traditionally used materials
- Number of people using each unit (scale)
- Availability of funds, co-financing arrangements
- Cosmovision around water and soil contamination
- Local traditional experiences
- Potential for resource reuse
- Operation and maintenance requirements and arrangements

Though there is a general perception that Indigenous peoples do not want piped water because it represents an 'imprisonment' of the sacred resource, none of the field visits carried out as part of this work substantiated this stereotype. Instead, Indigenous peoples seemed eager to have access to clean water brought directly to their home. Nevertheless, there may be conflicts associated with harvesting and directing water out of its natural place. Based on the community demand diagnosis, the traditional ecological knowledge, and cultural norms around WSS, a menu of specific technological options can be drawn up for presentation and validation from the target community. In all cases, project teams are responsible for carrying out the sustainability analysis of the proposed solutions to ensure they meet sector quality standards and can be properly operated and maintained by the responsible entity. **Securing approval for a specific technological option based on full information and in a free, prior and informed consultation environment will help ensure ownership over the chosen solutions in the long run.**

Key questions:

- Are there particular perceptions of water that may influence technological designs and overall WSS system adoption and use? How are they being incorporated in project implementation?
- What traditional knowledge on water treatment should be taken into account in technology selection to promote adoption?
- Have Indigenous beneficiaries (including women) been consulted regarding their functional preferences for WSS solutions?
- Are there locally available materials or parts that could be used in technology design?
- How can these insights be combined with conventional engineering knowledge to identify technological options that respect the local cultural norms and meet standards for improved WSS service provision?

3. Systems Construction

Who contributes labor and/or financing for the construction of the model influences the community's sense of ownership over the WSS system. A number of options, including some non-traditional possibilities, can be considered for beneficiaries' contributions to construction and maintenance of the system in order to cultivate a sense of ownership. Procuring locally available and familiar construction materials and formally handing over the system to the community also encourage ownership.

a. Different Construction Models

Choose a construction model that responds to Indigenous beneficiaries' expectations regarding their degree of involvement in the process. While different construction models can work effectively in Indigenous territories, the degree of involvement of beneficiaries in the construction process should always be discussed and the reasons for their involvement should always be clearly articulated. The most common construction models and specific recommendations on how to adapt them to promote acceptance among Indigenous beneficiaries are presented below:

- **Hiring a firm or contractor** to carry out the construction. In this model, the implementing agency handles the bidding process and hires the firm. The key for successful implementation of this model is to ensure that the bidding documents are disclosed to the local people and that they are kept informed throughout the selection and contracting processes. It is also important to require that the firm have one or more social specialists on its team with knowledge of the local Indigenous context and language and knowledge of consultation processes. If this option is not feasible, the implementing agency should request that the contractor coordinate its work with the implementation agency's social specialists. In addition, Indigenous peoples sometimes request training on the construction process and/or to have local people directly involved in the construction. It is also a good practice to recommend that contractors (through bidding documents) observe the principle of

"proximity" and hire locals capable of carrying out the project tasks. **These practices build local capacity and increase ownership over the WSS system and services by directly involving beneficiaries in the physical materialization of their system.**

- **Community-driven development (CDD),** wherein the beneficiaries build their own system with support from the central and/or regional government or an NGO.[54] More specifically, the beneficiaries are responsible for managing funds, procuring goods, managing contractors and overall works implementation with oversight from the project team. This model has been very successful in Nicaragua where it is called *Proyecto Guiado por la Comunidad* (community-driven project) and where it has been shown to reduce implementation times significantly and build strong community ownership over systems, with oversight from FISE and the municipality.[55] Before a community is 'approved' for this implementation model (communities are also in charge of managing funds), the national rural WSS rector, FISE, evaluates their capacity through a standard questionnaire assessing existing levels of community organization and participation, technical, accounting and financial contribution capacity. Although this method fosters ownership over the WSS system from the beginning, **the capacity of the community to actually manage the works should be carefully analyzed and, if needed, the project team should enhance the communities' capacity before and/or in parallel to the construction. Close supervision by the project team is also required.**

The field visits indicated a strong correlation between Indigenous beneficiaries being involved in the construction of their own system and their subsequent ownership over the system**.** In particular, field work shows that CDD models are more conducive to ownership. World Bank work on carrying out CDD interventions in Indigenous communities aligns with the findings of this Toolkit and recommends the participation of Indigenous authorities, incorporation of local cultural norms and the local language and strong support and training to communities.[56] **Regardless of the model chosen, the integration of the technical and social components throughout the construction process (and the entire project cycle in general) is essential to ensure the success of a WSS project in an Indigenous community**.

Key questions:

- Do the beneficiaries have the capacity and interest to participate in system construction? What is the best mechanism to have them participate while respecting local cultural norms?
- Are provisions in place to ensure the articulation of social and technical work around a tailored methodology?

b. Beneficiaries Contribution

Beneficiaries who contribute to the construction of the WSS systems in some way (cash, labor, meter, materials) tend to have higher ownership over the system after it is built. This was widely confirmed during the field visits. Developing a contribution plan in consultation with

54 For more information on the implementation of CDD projects in the World Bank, see Wong, S. "What have been the impacts of World Bank Community-Driven Development Programs? CDD impact evaluation review and operational and research implications." The World Bank: Washington, DC. 2012.

55 In some countries, legislation may create different constraints.

56 Seminar on How to Involve Indigenous Peoples and Ethnic Minorities in CDD Projects – Thursday, December 17, 2015. World Bank.

the beneficiaries is key in promoting ownership and future sustainability of the WSS systems. Various contribution and payment mechanisms were encountered during fieldwork.

However, the level of beneficiary participation in putting together a project depends to a great extent on the natural environment and the history of participation of each indigenous group. For example, indigenous peoples who depend on water harvesting through individual solutions (*aljibes* in the Paraguayan Chaco) are less likely to feel compelled to participate and contribute to a communal pool of funds, as their service does not inherently depend on the construction of a community-level system or of other community members' systems. In the Chaco, community participation was sometimes discarded as a "colonial practice" (practice imposed by the past Hispanic colonizers to mandate certain 'ways of life') that was not part of the norm for community members. In the Paraguayan Chaco, Indigenous peoples tended to be skilled at infrastructure building, but they would not work on their own WSS systems without payment, and therefore their labor could not be considered an in-kind contribution. **Beyond being engaged in system construction, however, there are several ways that beneficiaries can contribute to the development of a WSS solution in their own community, such as supporting water source protection, system O&M, and administration.**

Box 07

A financing policy to foster sustainability

In Nicaragua, community participation is institutionalized in all of FISE's projects through the rural WSS agency's manual for project implementation, which includes an annex with particular specificities for the Caribbean Coast of the country, where the majority of Nicaragua's Indigenous population resides. Participatory schemes are included in the manuals' bidding documents for design consultants and contractors.

Based on the manuals, Indigenous and non-indigenous beneficiaries pay a contribution to the total cost of the project in installments, which are collected by the water committee. The amount of this contribution was formerly 10 percent, however, the revised manual currently allows for flexibility based on the type of intervention in order to incentivize beneficiaries to take care of their WSS systems.

- If a community's water system is relatively new but has fallen into disrepair due to lack of maintenance, the community and the municipality are expected to provide a higher financial contribution for the system replacement or reconstruction.
- If, on the other hand, the intervention consists of building a new system for a community that has not had a new system for 10 years, then the national government will pay for the majority of the system's construction. As such, the government's contribution is linked to the community's level of care for its own system, incentivizing maintenance over the long-term.

In parallel, the policy also points the government's funds allocation towards unserved communities rather than communities that already have a system and request expansion, rehabilitation or a more sophisticated level of service (moving from shared wells to piped connections, for example). In the case of piped systems, each family is also responsible for buying their meter before the system is constructed. This requirement ensures that users are aware of the cost of water and that, despite the ready availability that a household tap brings, they will be conscious of their water use, and pay accordingly. In all cases, contributions should be discussed thoroughly at project onset and agreed in community consultations.

Key questions:

- In a given context, what is the most appropriate way for the beneficiaries to participate in the development of the WSS system (in-kind, in cash, or other)?

c. Specific provisions for procurement

Adjust procurement processes to local realities. Indigenous communities are usually located in remote areas, where there is no easy access to materials and construction equipment. This distance can influence the cost of the works and also the availability of bidders and providers. In Nicaragua for example, project costs have proven to be between two and four times greater in the Caribbean Coast due to lack of access and limited local capacity. Though the market is slowly developing in decentralized urban centers, construction and engineering firms tend to concentrate in the nation's capital, Managua, which is also where most common construction materials and tools have to be transported from. Keep these specificities in mind and provide flexibility in terms of budgeting and procurement methods to allow for more efficient works contracting and implementation. For example, project teams may want to carry out an assessment of the market before bidding out works or institutional strengthening interventions, in order to refine the terms of reference and bidding documents requirements accordingly.

When possible, use local construction materials that Indigenous peoples are familiar with (sand, pebbles, wood) and establish local supply chains for important system components and hygiene products. This is particularly important when dealing with harsh environments like El Gran Chaco and La Guajira, where materials may be scarce and travel distances to replace them very large. For example, the materials used by government projects in El Chaco could not resist the fierce weather, and informants reported that systems would break down very quickly. The use of local materials can also help bring down costs and make an easy supply chain for repairs. In the southeastern Amazon, Rainforest Flow promoted a project where the floor of the sanitation facility in a school was entirely paved with stones the children had collected from the rainforest. Other examples witnessed through the fieldwork included promoting the development of localized sanitation markets to promote availability of sanitation solution components. There are some materials, particularly for sanitation, that Indigenous peoples may refuse to be in contact with. As part of the World Bank-supported Handwashing Initiative in Peru, workshops were organized with women to teach them how to make their own handwashing soap using material they could easily procure (recycled bottles, water and a piece of laundry soap), creating a locally accessible supply chain for handwashing materials. Provide local supply alternatives – or create a supply chain when necessary – for hygiene products like soap and sanitary pads to ensure the maintenance of hygiene behaviors developed through project trainings.

Where access is difficult, collaborating with other sectors reduces costs and increases benefits. Combining interventions so that they include various services at once enable project teams to coordinate material transport, integrated capacity-building to beneficiaries, and has been shown to maximize benefits. Roads construction combined with water use and management trainings (to avoid greywater discharge on the new roads, for example) increased project impacts in Peru.[57] Improving road

57 Remy Simatovic, M. I., Impacto del Programa Caminos Rurales sobre la Democracia y la Ciudadanía en el Ámbito Rural. World Bank. 2007.

access also yields improvements in basic services like access to WSS.[58] The Paraguayan Chaco, where the most common household water solutions are rainwater collection harvesting systems, would be a good place to combine water and housing interventions. Roof rehabilitation could improve yield for rainwater collection, and the materials could be brought in all at once.

Ensure that all contractors working with the Indigenous community have the capacity to do so. Any contractor– whether a firm hired to design the technological solutions and conduct consultations or the construction firm – should complement their team with trained social specialists with Indigenous peoples-specific experience. Ideally, they should speak the local language and have knowledge of the local cultural context and of WSS issues, to ensure those remain a priority. Contractors must also respect the rules defined in the engagement strategy. Include these requirements in the bidding documents and to make this agreement official in the firm's contract. To the possible extent, prioritize firms with experience dealing with the type of conditions encountered in the target Indigenous area to encourage flexible implementation. Those include procurement of goods in remote areas, difficult transportation conditions, lack of access to specialized equipment, and extreme climatic conditions.

Key questions:

- What are the conditions of the local market? Are there providers/ contractors available near the beneficiary areas or interested in getting contracts in remote, disperse areas?
- Are the interventions budgeted according to the local conditions and local market?
- Are relevant construction materials, system components, equipment and hygiene products readily available in the area? If not, can the project support the development of a local supply chain? Are there alternatives locally available?
- Can specific clauses be included in the design and/or construction firm's contract to require capacity in working with Indigenous peoples and under the conditions found in Indigenous areas?

58 GRADE. Elaboración de la Evaluación de Impacto Económico, Social, Institucional y Ambiental del Programa de Caminos Rurales. 2007.

d. System Handover

Once the system has been built, organize a handover ceremony to officially transfer the responsibility for system O&M to the relevant group through a ceremony. Often, in dispersed rural communities in LAC, the community will become the owner of the infrastructure and will be responsible for its upkeep. In Indigenous territories, it is particularly important that a ceremony be organized around the transfer of assets to ensure that the users have a sense of true ownership over the system and the services it brings. Additionally, the community may have particular beliefs around use and refuse to adopt the system if it is not transferred properly, even if only symbolically. Even in areas where a national or local WSS agency, or WSS utility, owns the infrastructure, it is recommended to organize such a ceremony to foster proper use and appropriation of the services on the part of the community.

Key questions:

- Is the system properly finalized and ready to be transferred to the community?
- What are the cultural norms and traditions to take into account in organizing a handover event?

Key recommendations for OWNERSHIP

Building on Existing Institutional Structures for Service Provision and Management

1. Carry out an assessment of the local social fabric and how it may affect service provision and management arrangements.
2. Conduct consultations on Indigenous beneficiaries' preferences on the most appropriate WSS service provision and management model.
3. Establish management arrangements over the WSS service early in the project implementation process, ensuring they have clear communication mechanisms with the WSS services users and take traditional authorities into account.
4. Provide ample training on administration, tariff setting, and technical O&M throughout the project to the entity responsible for service provision and management. Emphasize the need to have clear statutes, regulations, definition of roles, and transparency mechanisms. Assess the need for these trainings as part of an early-stage local diagnosis.

Culturally Appropriate Solution Design

1. Conduct consultations on Indigenous beneficiaries' preferences for system scale and the different technologies or solutions (including the corresponding costs associated with each solution).
2. Consult with Indigenous beneficiaries on their local traditional ecological knowledge and cultural norms regarding water source, climate change and resilience and traditional practices for water use and treatment. Incorporate these technological insights in the elaboration of a tailored menu of options.
3. Account for traditional understandings of sanitation, waste disposal and hygiene behaviors in the selection of sanitation solutions to promote adequate use and adoption.
4. Elaborate a specific menu of technological options based on community-expressed preferences around functionality and use. Present this menu to the beneficiaries for selection through an iterative consultation process, ensuring that traditional protocols are respected.
5. Study the supply chain for both system repair materials and products necessary for the maintenance of hygiene behaviors (soap, sanitary pads). Where the supply chain is not established, work with the beneficiaries to develop supply mechanisms.

Continue

Systems Construction

1. Select the most appropriate construction model to balance sector policy, Indigenous-specific mechanisms, local preferences identified through consultations, and technical requirements.
2. Integrate the social work with the technical aspects of construction to ensure results from the consultations are respected throughout the project cycle.
3. System construction is a key moment to materialize community commitment. Establish a uniform strategy for community members' contribution to system construction, be it in cash, labor, meter, materials, or other.
4. Assess the accessibility of the community (distance, terrain), the proximity of construction firms, materials and equipment availability, and cultural particularities of Indigenous territories to inform the planning of procurement processes.
5. Contractually require any contractor working with an Indigenous community to have specialized social specialists on their team or to coordinate closely with the social specialists from the project team.
6. Agree on and organize a system handover ceremony to officially transfer the system to the community after construction.

5. Sustainability

For WSS services to be sustainable, it is essential that adequate technology for each context be implemented, and that clear and legitimate mechanisms for O&M and responsibilities be in place in a way that is respectful of Indigenous rules and norms.

Sustainability of WSS services means that when components of the WSS system begin to fail and service quality to suffer, there is a structure in place and a commitment to repair and restore them for continued improved service provision The sustainability of WSS services relies on adequate resources (availability of water, system components, operation inputs like chemicals and financial resources), appropriate technology, established mechanisms for effective O&M, a clear delegation of responsibilities and, perhaps most significantly, a high-level of user ownership of the system. In Indigenous communities, maintaining consistent consultation and engagement throughout the project cycle plays a key role in achieving sustainable WSS service delivery.

This section provides guidance on developing training to sensitize community members on hygiene and sanitation and yield lasting behavior change, discusses how to establish culturally acceptable financial arrangements, and suggests approaches to provide accessible and responsive technical assistance, including monitoring and evaluation systems, and citizen feedback and grievance and redress mechanisms for long-term, effective service provision.

1. Sustainable Behavior Change

For the benefits of a WSS intervention to be sustainable, beneficiaries will require sensitization to learn and practice appropriate hygiene and sanitation behaviors. All trainings and communication work with Indigenous communities need to build on existing, specialized knowledge and be adapted for cultural beliefs and practices to achieve learning and behavior change.

a. Hygiene

Health benefits associated with improved sanitation systems rely on good hygiene practices.[59] Hygiene promotion (personal,[60] in household, and surroundings) needs to accompany any WSS intervention, but in Indigenous communities proper "audience research" will inform hygiene training and methods to reflect the community's current practices and beliefs surrounding hygiene.

In many countries, Indigenous peoples are still less likely to employ proper hygiene practices. According to the Rural Water and Sanitation Information System (SIASAR), analysis of data collected in Panama and Nicaragua showed that Indigenous peoples are less likely to wash their hands than non-indigenous individuals. In Panama, when asked how often they washed their hands after using the bathroom, 82 percent of Indigenous peoples reported "sometimes" and 8 percent "never," while none responded "always."[61] In Nicaragua, while the general Indigenous population has similar handwashing practices to non-indigenous peoples (with Indigenous peoples only slightly more likely to never wash their hands, 16 percent vs. 6 percent), 68 percent of the more isolated Indigenous population of Alto Wangki y Bocay reports never washing their hands. Box 7 outlines two examples of hygiene promotion initiatives that integrated creativity and cultural understanding to create effective hygiene promotion strategies. In addition, the FOAM[62] and SaniFOAM[63] behavior change frameworks, which were developed specifically for promoting hygiene, are useful tools for designing effective hygiene programs.

59 With the arrival of the SDGs, aspects related to hygiene have gained as much relevance as the provision of the sanitation hardware.

60 Key aspects of personal hygiene include handwashing with soap, consumption of treated water and menstrual hygiene management.

61 Sample: 45 communities from the Comarcas (Indigenous territories) registered to date in the SIASAR.

62 Coombes, Yolande and Devine, Jacqueline. (2010). Introducing FOAM: A Framework to Analyze Handwashing Behaviors to Design Effective Handwashing Programs. Water and Sanitation Global Scaling Up Project, Working Paper. Available on: http://www.wsp.org/sites/wsp.org/files/publications/WSP_IntroducingFOAM_HWWS.pdf

63 Devine, Jacqueline. (2009). Introducing SaniFOAM: A Framework to Analyze Sanitation Behaviors to Design Effective Sanitation Programs. Water and Sanitation Global Scaling Up Project, Working Paper. Available on: http://www.wsp.org/sites/wsp.org/files/publications/GSP_sanifoam.pdf.

Box 08

Examples of Hygiene Promotion Initiatives

Hygiene plays a key role in realizing the full benefits of access to improved WSS services. Evidence from fieldwork showed that Indigenous women were more likely than other community-members to be aware of the health consequences of poor hygiene. Women play a key role in promoting hygiene in their communities and are key partners in shifting behaviors long-term.

The NGO Rainforest Flow worked with Matsigenka, Huachipaeri and Quecha families in the southeastern Amazon region of Peru, focusing on experiential training that would help integrate hygiene-related knowledge into everyday life. For example, using a mobile laboratory, they carried out water analyses with mothers and showed them bacteria grown on the petri dish from water that looked clean to the eye. A microscope available at the health post provided a similarly eye-opening experience by revealing bacteria floating in clean-looking water. By working so closely with families, the NGO helped mothers better understand how important good sanitation practices are to their health.

Figure 10
Young girls clean the communal sink; Project Tayakome

Photo courtesy of Rainforest Flow.

The sink was built at the school along with the bathrooms in Tayakome. The kids conduct bi-weekly maintenance of the sink as part of their hygiene education with the village health promoter.

As part of the project, children are taught about environmental stewardship and good hygiene practices at school and are given responsibility for daily maintenance of the school latrines and surrounding areas. With this practical and technical knowledge, young WSS committee members were able to teach visiting government engineers and health personnel about the eco-friendly way their systems worked. In order to maintain accountability despite the high rotation of teachers, health promoters and WSS committee members are appointed in each community and responsible for house to house visits as well as training each new teacher, thus maintaining the knowledge within the community. The WSS committees established and trained through this project take full care of tariff collection and O&M. The committees contact Rainforest Flow to procure certain system parts when replacement is needed.

The World Bank-supported Handwashing Initiative in Peru is another successful example of community mobilization around hygiene promotion. Radio shows translated to the local Quechua dialects motivated village-wide games in the central plaza in which children would learn to 'kill' bacteria with soap through fun and interactive role-playing. In Peru, the education and health sectors generally have the necessary structure to reach dispersed populations, in particular through municipal units. By coordinating closely with Municipalities, the project ensured that measures for behavior change were maintained over time. After a pilot in 5,000 schools, the handwashing methodology designed as part of the project was integrated into the national environmental education guidelines for teachers in 2011.

Design handwashing facilities with locally available, low-tech materials for effective hygiene promotion and sustainable behavior change. In La Guajira, an installation called "tip-tap" was used to promote handwashing close to the sanitation facilities. This device consists of a plastic detergent-type bottle with a handle that is hung onto a tree branch and filled with water. When tipped over by hand or foot-lever tied to a string, water flows through the bottle mouth enabling handwashing without contamination. See Specific Provisions for Procurement section in this chapter for more information.

Though field work did not reveal particular pre-existing practices around handwashing specifically (before interventions), cultural norms around cleanliness and care for children provided important entry points for the promotion of improved hygiene behaviors, as shown in the examples of Box 7. In Bolivia, protection of the local environment and associated health impacts encouraged community members to gather their trash and make sure waste products from their dry toilets was properly handled through the use of personal safety equipment (full-body suite, goggles, hair net and mask). WSP highlights that in LAC in general, the sense of a "collective identity" is particularly strong and provides an entry point for behavior change through cultural norms, or 'what everyone else is doing.'[64]

This conclusion applies to Indigenous communities in LAC where social cohesion tends to be stronger. **Assemblies and community-level training can play on these cultural norms to foster behavior change.**

Figure 11
Woman demonstrating the use of a Tip-tap in La Guajira

64 WSP. Integrating Behavior Change and Hygiene in Public Policy: Four Key Dimensions. Lessons from the Conference "Beyond Infrastructure: Integrating Hygiene in Water and Sanitation Policy in Latin America and the Caribbean." November 2013.

Although the hygiene solution should always be tailored to the community's needs, good practices[65] include:

Constructing a handwashing facility close to the sanitation solution in order to facilitate handwashing after using the latrine or toilet and before handling foods.

Ensuring soap is readily available or easy to procure to promote long-term use (in some communities the water committee would purchase it for the whole community and sell it or distribute it).

Including hygiene promotion (personal, in household and surroundings) in the training carried out for any WSS project.

Positioning a trashcan next to the latrine/toilet to promote proper disposal of paper and other trash.

Positioning laminated graphic instructions, which are adapted to the local context, on handwashing, proper use of latrine/toilets, water filtering, and trash disposal, next to the element, i.e., tip-tap, toilets, water filter, trashcan, and kitchen.

Though no active resistance to hygiene behaviors was encountered in the field work, practitioners interviewed highlighted that thorough training made a real difference in Indigenous beneficiaries' acceptance of new behaviors. Two type of community interventions in Bolivia were very illustrative of this point. On the one hand, communities received education campaigns around handwashing, trash collection and safe waste handling practices (for dry toilets) in their own language, while in the other type of intervention, communities were given little accompaniment from the social team. The latter type of intervention resulted in communities that were littered with trash, reported only using constructed sinks for food preparation (no handwashing) and had disconnected the urine diverter of their toilets to infiltrate the liquid into the soil along with greywater, right next to the unprotected well they drew water from. None of these dangerous practices were found in those communities that had received training in their own language, and beneficiaries reported that trash collection was important in respecting their ancestors' heritage and land.

65 The Team identified these good practices during the field visits and confirmed their importance with field practitioners.

Key questions:

- Have consultations revealed local and/or traditional hygiene practices or preferences? How are they being incorporated into the project hygiene training?
- Will appropriate training be carried out to accompany the infrastructure component to promote hygiene practices?
- Is there a supply chain in place for soap provision, especially if the project targets an isolated area? If not, how can the beneficiaries be involved in establishing one?
- Have culturally adapted hygiene promotion materials been developed and rolled out to hang near handwashing facilities after their construction?

b. Sanitation behaviors and products reuse

One of the important evidence from the fieldwork is that, contrary to stereotypes, Indigenous peoples do use and maintain sanitation solutions, be they latrines or toilets, when those solutions are developed in close collaboration with future users and according to their culture, views and needs. A study of sanitation behaviors in four Indigenous cultures in Bolivia[66] showed that poor latrine use was linked to lack of technical and construction support to the Indigenous communities interviewed, leading to fear of using the 'black hole,' where evil creatures could breed and children fall. Indigenous beneficiaries interviewed also reported that latrines were not built according to the traditions they use for their homes, which in turn gives them the reputation of being too dark, too closed, and unsafe. Others reported not understanding what the latrines were for, or complained that they had bad experiences using the latrines (flooding in the rainy season and the presence of large flies due to the heat of the sun). However, field work showed that the NGOs Adra and Water for People were successful in addressing such concerns in their projects through community trainings and by building on beneficiaries' perception and existing knowledge.

For example, in the Bolivia Altiplano, urine-diverting dry toilets (UDDT) were particularly appropriate given the strong historical culture of reusing both urine (in medicinal treatments and agriculture) and humus from treated feces (in agriculture). Indigenous beneficiaries recounted stories of the cleansing nature of processed urine (after storage in a warm place) and how their grandparents sometimes used it as shampoo. As such, Indigenous beneficiaries perceived the UDDT as part of a larger cycle of safe and productive reuse and reported using it regularly and teaching their children to do so. Box 6 presents additional evidence of this successful reuse story. Examples of de facto reuse were also observed in Panama, La Guajira (Colombia) and Peru, mostly for irrigation purposes and linked to lack of disposal solutions for greywater. However, the success of reuse remains subject to demand for the products and sound handling and quality control.

66 WSP. Sanitation and Culture. 1999.

Building on cosmovision can reveal important existing knowledge regarding sanitation. The Guarani and Moxeña living in the low plains of Bolivia, recognize that their pigs get sick from eating feces and therefore keep a clear division in between living spaces, crops, animals, and excreta. Their cosmovision is based on "harmonious alternation" between nature and man: both contain good and evil, and breaking the individual or social balance of good and evil could bring disease. As water plays a strong role in their rituals, defecating in rivers is forbidden as it dirties them. They associate the contact with excreta with diseases like diarrhea. Interventions in these communities must build on this knowledge to justify the use of improved sanitation solutions.

In contrast, some indigenous communities' cultural beliefs may lead to an unwillingness to practice specific sanitation disposal practices and to reuse. Employees of SENASBA (involved in long-term WSS sustainability) reported that the strong Bolivian belief in the Pacha Mama sometimes led Indigenous communities to reject latrines altogether, due to the culturally offensive nature of burying untreated feces in the earth. As such, latrines had to be built with elevated tanks in order to avoid soiling the earth, otherwise beneficiaries refused to use them. In Peru, when latrines were placed too close to households, they were not used due to the cultural belief that one should not go to the bathroom close to where one eats. However, examples of successful cases that promoted improved sanitation use and behaviors while still respecting indigenous cosmovision and cultural beliefs were found. In Peru for example, behavior change promotion through educating children in school has achieved important impacts as children go home and share the knowledge with their elders.[67] The NGO Rainforest Flow successfully used this model to encourage latrine use take-up and handwashing.

Research from Peru shows that behaviors tend to be influenced in clusters, meaning households with a regular supply of soap are more likely to have clean bathrooms and well-groomed children, but also more likely to use those bathrooms.[68] **Jointly designed hygiene and sanitation behavior change campaigns and trainings are more likely to impact communities, especially when cultural norms (social cohesion) are taken into account**. Research also shows that painting these behaviors as valuable within the community – associating them to status, makes women more likely to fulfill their role as behavior change agents and promote change in their families.[69] Reminders such as printed material placed in strategic areas of the community – near bathrooms, in communal spaces, on the way to the forest or other places where people are likely to defecate in the open – can help build this social pressure. Such materials should be in the local language and should feature drawings where literacy is low or the language is not written.

Key questions:

- What sanitation preferences and behaviors have been expressed by the Indigenous beneficiary group, if any, and how have they been incorporated into the solutions design?
- Where are the sites and locations for proper disposal of excreta that does not conflict with the community cosmovision?
- Has a joint hygiene and sanitation behavior change campaign been considered?
- Is there potential for reuse from a cultural standpoint and demand for its products?

67 WSP. Integrating Behavior Change and Hygiene in Public Policy: Four Key Dimensions. Lessons from the Conference "Beyond Infrastructure: Integrating Hygiene in Water and Sanitation Policy in Latin America and the Caribbean." November 2013.

68 Ibid.

69 Ibid.

2. Financial Arrangements

Are tariffs for water always rejected by Indigenous communities? Project fieldwork found this was not the case. Financial arrangements are often acceptable and preferred by Indigenous peoples, especially when project teams can explain why paying for the water service is necessary for system sustainability. This section outlines the importance of fair and transparent tariff setting and alternative ways for communities to contribute to operation and maintenance.

a. Paying for the Water Service

Payment for water is generally a controversial topic, as water is considered to be both a basic human right[70] and a scarce economic resource. This is particularly true in the case of Indigenous peoples, for whom water is often considered a sacred resource gifted from the environment that, according to certain cosmovisions, should not be changed or tempered with. However, there is an important distinction to be made between water as a natural resource (for which costs are rarely transferred to the user[71]) and the water *service* provided through an operating system. The water service involves costs such as transport of the water to one's home, or to a local collection point, and treatment. These additional aspects need to be covered through financial means, otherwise the system may run at a deficit and require sustained external support. The most common way of providing financial means to support the O&M of water services is through the collection of tariffs by the service provider (which could range from a community water committee to a water utility). Research shows that payment for water services helps users value access to clean water and promotes service sustainability by covering operating costs and providing a fund for repairs and other maintenance tasks, such as source protection, for example.

Both perspectives were encountered during field visits, but the majority of Indigenous peoples (be it leaders, Indigenous organizations or beneficiaries) interviewed agreed that water services should be paid for according to consumption. For these people, paying for water services was a sign of the precious nature of the resource. In Panama, IDAAN representatives affirmed that in Colón's peri-urban area Indigenous peoples were actually the only users who paid for their water service on time. In Bolivia, all water committees visited charged tariffs (though some of them charged fixed amounts every month).

Charging monetary tariffs, however, is not the only way Indigenous peoples can cover service provision costs. There are other culturally acceptable mechanisms, such as organizing a fair (*minga*) to raise funds when the system needs repair, or exchanging natural resources or goods, such as wood or a chicken, for the monthly payment.

These contributions have to remain meaningful and contribute to the functioning of the system. The most effective non-monetary contribution, however, remains time and labor for the operation and maintenance of the system. The community can establish a schedule wherein different tasks are assigned to participating community members in exchange for water service. These may be relatively simple but essential tasks, such as distributing water bills or doing house visits to share specific information to users, or more technical tasks that require specific training (chlorinating the water, opening and closing valves, keeping the books of the water committee). If the community decides to use this approach, training needs can be identified through consultations early on to ensure all community members are equipped to carry out relevant tasks. In the community of Boquerón Alto, in Bolivia, all community members attended technical trainings so that water committee members could rotate every year to anyone in the community.

70 The United Nations General Assembly explicitly recognized the human right to water and sanitation on 28 July 2010, through Resolution 64/292, acknowledging that access to clean drinking water and sanitation is essential to all other human rights.

71 In Latin America, one of the very few exceptions is Chile, were the payments for water resources is well-established throughout the Country. Some other countries (such as Brazil) may also present arrangements for water resources payment but only applied in a few areas.

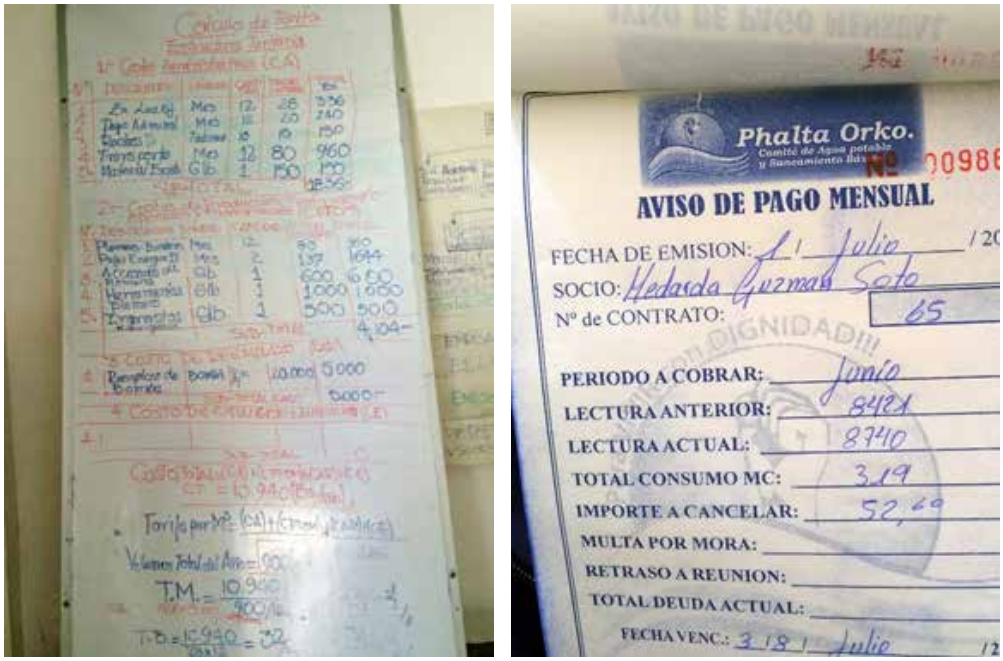
Key questions:

- Does the consultation process include a session on payment for water services to ensure Indigenous beneficiaries understand the importance of a meaningful contribution to sustain their water service provision?

b. Tariff Setting and Collection

The tariff should be set in a transparent manner, with a clear breakdown of costs available for all to check, so that users understand where their payments are going. Water committees are responsible for ensuring proper equitable service to all tariff-paying members. Water committees in rural areas usually establish the tariff in consensus with the users and are responsible for tariff collection and administration. In many cases, the tariff is set during an assembly where all beneficiaries are present to ensure scrutiny and accountability of the water committee's operations. In Bolivia, certain Indigenous communities would post a sheet with the tariff calculation on the wall of the community center for all to see. The different components of the water service (transport, treatment, disposal) should be delineated clearly for transparency. Where an alternative mode of payment is chosen, such as contribution through labor and time for O&M, an agreement must be outlined and validated in an assembly setting. Monitoring who and who does not pay every pay period builds accountability with a monetary tariff, but in the case of an alternative payment scheme it also ensures equity between community members. In several cases where beneficiaries are not paying water tariffs on time, the procedure of cutting off the household supply as a punishment has been developed and put in place by Indigenous beneficiaries themselves (through the water committee).

Figure 12
Tariff calculation and water bill, Phalta Orko, Bolivia



When a utility is providing service to an Indigenous community, the regulator[72] must have oversight to promote equity between all beneficiaries. Although utilities usually have set tariffs for entire service areas, in some cases utilities may consider subsidizing tariffs to promote equity among beneficiaries (based on income or property value, for example). Indigenous peoples often qualify for these reduced water services tariffs; however, project teams must ensure that the service provider communicates the importance of conservation despite the reduced price.

Regardless of the tariff model, regular contribution should be established early in the project cycle given its essential role in promoting the sustainability of services. In some cases, extensive social work may be necessary to build a culture of payment among water users. In general, well-organized Indigenous communities are accustomed to contributing resources for the community's common good, and implementing a contribution mechanism for water services is straightforward. This was exemplified in field work through the practice of fairs to raise funds for repairs. In cases where the community is not well-organized, however, the agency delivering the WSS system, the local government or local partners need to work closely with the community and its leaders to define and implement a sustainable contribution mechanism. In those areas that are more densely populated, such as peri-urban areas, field work showed slightly better success in tariff collection on the part of established water utilities (like IDAAN in Panama) compared to water committees (as was the case in certain areas close to La Paz in Bolivia). Establishing such a contribution plays a key role in building community members' ownership over their system and generating resources for regular system O&M, therefore ensuring service sustainability.

In most cases, the sanitation solutions implemented were latrines and therefore did not require regular O&M or a 'sanitation service' per se to ensure sustainability. In cases where the beneficiaries were required to extensively maintain their sanitation solution, as was the case with UDDTs in Bolivia, communities that had received proper training were dedicated and diligent about the task. For communities connected to a sanitary sewer to transport wastewater to a treatment plant, a portion of the tariff should be clearly allocated for this purpose.

Key questions:

- Do consultations include a session on Indigenous beneficiaries' WSS services payment preferences?
- Is there a transparent tariff setting methodology in place?
- Where an alternative mode of payment is chosen, how will the WSS committee/ service provider secure official adherence and monitor the proposed scheme?
- What are appropriate consequences in the community for dealing with users who do not pay?

3. Tailored Technical Assistance

As the WSS system goes into operation, accessible and responsive structures for trouble-shooting and gathering feedback on the services provided ensure that the community has a support structure to respond to unanticipated and evolving needs, and generate learning for future project development.

72 National agency responsible for regulating WSS services provision, in particular tariff setting.

a. Mechanisms for Technical Support to Indigenous Areas

The standard good practices for any rural WSS intervention outline that regular, good quality technical assistance is essential to ensuring the sustainability of WSS services at the local level, especially when local water committees are managing the system. Training is provided by the project team throughout implementation, but technical assistance provides continued support from the initiation of the project cycle and into post-construction. This technical assistance entails a continuation of trainings as new water committee members are elected or assigned and according to the committee's demands, regular visits to check on the quality of administration and system O&M by the committee, and support in carrying out these functions through technical inputs, advice and facilitation.

In the case of WSS interventions in Indigenous communities, establish a mechanism for technical assistance early in the project cycle, building trust by taking into account the traditional structure and practices of the target Indigenous community.[73] In Bolivia, the NGOs Water for People and Adra made the creation and staffing of a Basic Services Unit (*Dirección de Servicios Básicos*) within each municipality of project intervention a condition for the transfer of funds. These units serve as long-term technical assistance providers to the water committees, and they carry out trainings and regular follow-up after works implementation. These units are also trained by the NGOs to work with the isolated Indigenous communities within their attendance areas. During field visits, water committees from Cochabamba in Bolivia reported attending trainings and capacity-building sessions twice a year.

Establishing a more decentralized unit (at the municipal or provincial level, or through decentralized units of a water utility) whose role is focused on providing technical assistance streamlines problem solving and helps define clear training strategies geared towards Indigenous areas. This Unit should be located relatively close to the target communities and count on professionals that have knowledge and capacity to work with Indigenous peoples. This support could alternatively be provided through a water utility, NGO or through the Indigenous organizations themselves, with proper training and personnel. For example, the NGO Rainforest Flow in Peru reported that, several years after they had worked with Manu communities in the Amazon, the water committee would know when to call them to procure specific replacement parts or when they could not solve a technical issue, though in most cases the committee could perform minor distribution line repairs and resolve conflicts on their own.

Technical assistance providers who work in Indigenous communities must:

- Understand the region and its context.
- Be located relatively close to the target communities in order to allow for frequent contact with beneficiaries.
- Understand the local social fabric and be able to identify and recognize the appropriate organizational structures.
- Respect the indigenous community's cosmovision and promote its inclusion in technical solutions.
- Speak the local language and/or learn pertinent communication mechanisms.
- Plan according to a timeline that takes into account the local customs and does not jeopardize achieving the technical assistance goals.
- Understand the local way of life and promote its respect in design processes.
- Take cultural uses of the land (sacred spaces, for example) into account in solutions identification.

73 For more information on long-term supportive relations see Jiménez, A., Cortobius, M., Kjellén, M. 2014a.

Box 09

Local Technical Assistance Providers – the Case of Peru

The Amazon region in Peru provides a good example of culturally appropriate technical assistance. Although the National Rural Sanitation Program (PNSR) is a government program that provides technical assistance in the implementation of WSS works in rural areas throughout Peru, the PNSR's personnel in the Peruvian Amazon – a region with a high concentration of Indigenous communities – presented the characteristics listed above and truly connected with the beneficiaries they worked with.

"I have worked with them for a long time, now I coordinate with indigenous and rural communities within the area of responsibility of our PNSR office. I can speak the awajun language and I know the Apu [highest traditional authority] of each community with whom the implementing boards, the JASS, work closely. I visit them regularly, I know the beneficiary families, I hear about the projects carried out by other organizations, and I am informed of the regional meetings that bring together over 180 communities, as well as the results of their discussions. I feel truly blessed."

Technical Coordinator of the Bagua Grande office, PNSR.

The contribution above shows a technical assistance provider who fulfills many of the requirements to work successfully in Indigenous areas: he has earned the local Indigenous communities' trust by working with them for a long time, speaks the local language, coordinates directly with the traditional authorities (Apu) who work closely with the water boards, and is regularly informed of local traditional meetings, their development, and their issues of interest.

Key questions:

- Is there an established sectoral mechanism for technical assistance provision? If so, how is it adapted in Indigenous areas?
- Which entities have the knowledge and capacity to carry out that role? Are they trained to work with Indigenous peoples?
- How can the intervention help develop a curriculum specific to Indigenous peoples and/or foster its application?

b. Monitoring and Evaluation

Sound monitoring and evaluation (M&E) ensures that the benefits of an intervention are maintained over time. In the case of WSS services, M&E serves to assess how systems function over time and any future need of the beneficiary community (for example, missing parts for repair, a septic tank that has filled up, or the need to identify a new water source to accommodate for a growing population). Establishing a framework for M&E in the development, implementation and post-completion of the project can serve to systematize feedback and streamline possible responses on behalf of the technical assistance provider.

A sound M&E framework incorporates indicators that track key steps in the promotion of Indigenous peoples' participation, infrastructure improvements linked to the intervention, the progress of "soft" measures for behavior change and capacity-building, and the sustainability of the administration and physical components of the project. Additionally, Indigenous authorities and beneficiaries may suggest indicators they would like to track as part of project implementation.

Systematically collecting and publishing data nationally or provincially on the quality and coverage of WSS services at the community level can help project teams and government institutions objectively prioritize investments based on the level of need. Monitoring of community-level indicators can then be aggregated at the regional and national level in order to carry out comparisons and identify the neediest areas. The SIASAR, which has been rolled out in seven LAC countries,[74] has enabled governments to not only monitor coverage gaps but also the sustainability of the rural WSS systems through a set of indices. Another important contribution of the SIASAR is that it enables member countries to collect information about all communities in the country, not only those with working or recently built systems, thus providing a good idea of where new investments are needed, but also where technical assistance could help foster sustainable service without a significant monetary investment. Because it substantiates intervention targeting, this type of information system can be particularly useful in justifying projects in Indigenous communities due to their higher-than-usual coverage gaps and below-average sustainability. Additionally, an institutionalized information system can help track national WSS services sustainability over time.

Key questions:

- Does the intervention have a M&E framework in place that disaggregates numbers linked to Indigenous beneficiaries?
- Do the indicators measure progress on the inclusion and participation process?
- Do the indicators account for the measurement of sustainability elements?
- Does the sector have a systematic and publicly available database for relevant indicators and does it disaggregate Indigenous information?

74 Nicaragua, Panama, Honduras, Dominican Republic, Peru, Costa Rica, and Mexico.

c. Citizen Feedback and Grievance and Redress Mechanisms

Projects need effective mechanisms to receive and register grievances, concerns, or complaints, and to record actions taken to solve these problems. Feedback mechanisms help facilitate conflict resolution between the project team and beneficiaries, or between beneficiaries including non-Indigenous beneficiaries or actors. Such a system normally falls under the responsibility of the WSS committee, with the possibility to elevate demands or complaints to the technical assistance provider.[75]

Indigenous peoples, however, may not feel comfortable communicating their concerns through conventional channels. **The project team needs to work with the Indigenous community to develop acceptable mechanisms for grievance, redress, and general transparency as part of the engagement strategy, and ensure their thorough implementation.**

Establishing transparent mechanisms for WSS service users to communicate their concerns, complaints, or even satisfaction with the system operator or services ensures that their input is incorporated in future operations. Community involvement in supervising the work of the different actors involved in the implementation of the WSS project is the best way to promote accountability on the part of these actors. Measures to promote this participation must be discussed and agreed early as part of consultations. Grievance mechanisms establish procedures that can elevate severe complaints to the court. For example, in Sahsa, a rural community in Nicaragua, the Indigenous Territorial Government submitted officiallycomplaints to FISE that were discussed in the General Community Assembly.

In most other Indigenous communities interviewed, concerns and complaints were presented locally by beneficiaries to the social specialists or the on-site contractor. More serious complaints (i.e. about the contractor) were taken directly to the government institution responsible for the project. If the community may mistrust outsiders, a community leader can be appointed for Indigenous beneficiaries to report their concerns. This trusted emissary could then synthesize complaints and share them with the relevant authority. Alternative grievance-reporting mechanisms include anonymous written complaints, anonymous voting mechanisms, with stones placed in urns or baskets to indicate an opinion or prioritize an issue, and anonymous phone complaints.

Key questions:

- Where can comments and complaints be directed? What communication mechanisms are appropriate for the community, and do all target Indigenous beneficiaries feel comfortable using them?
- Are Indigenous beneficiaries willing to provide community oversight and how?
- Can the grievance/redress mechanism be adapted to Indigenous cultural norms around participation, taking into account specific sub-groups? Have Indigenous beneficiaries pointed out specific measures to do so?
- How can the information garnered inform future processes to ensure Indigenous beneficiaries' concerns are heard and addressed?

75 The fieldwork team was not exposed to any record of grievances either at community or at regional or central levels.

Key recommendations for SUSTAINABILITY

Sustainable Behavior Change

1. Incorporate hygiene promotion in all sanitation projects through the development of culturally and locally appropriate trainings, with particular attention to existing behaviors based on traditional beliefs and the requirements for the maintenance of new ones (materials, technological design, appointed and/or trained community members).
2. Ensure cultural norms around sanitation are incorporated in technological options and tailored training is designed accordingly where necessary.
3. Carefully study the service chain for the possibility of reuse, especially in resource-scarce environments, where local agricultural activity permits or where local Indigenous practices have involved reuse in the past.

Financial Arrangements

1. Highlight the distinction between payment for the water resource (often rejected) and payment for the water service (usually more palatable).
2. Discuss payment for water services by promoting a transparent tariff-setting mechanism during beneficiary consultations. Also discuss rules regarding missed payments, tariffs increases, and other administrative elements at this time.
3. In some communities, alternative payment mechanisms may be more acceptable than cash contributions. However, they should always be meaningful.
4. When the sanitation solution requires regular O&M from the beneficiary or involves additional service, the tariff-setting should undergo the same process as the water service and/or benefit from extensive sensitization.

Continue

Tailored Technical Assistance

1. Ensure that the entities responsible for technical assistance provision are known to the Indigenous authorities and respect protocols for entering and communicating with Indigenous beneficiaries. Share with Indigenous authorities the role of the relevant sector entities and any rules for technical assistance provision, and agree with them on arrangements and procedures for regular support. The entity responsible for technical assistance provision must have decentralized capacity to regularly visit Indigenous areas.

2. Assess the capacity of the sector entities for technical assistance provision and experience working with Indigenous communities, and if needed, propose strengthening measures so they can effectively provide regular assistance and training programs specific to the Indigenous communities they support.

3. Define a sound monitoring and evaluation framework at project or intervention scale and explore the possibility of expanding it beyond the project. Include indicators disaggregated by ethnicity (whether a beneficiary ascribes to an Indigenous identity or not) and measure process-based progress, and long-term sustainability in partnership with beneficiaries.

4. Create a publicly accessible information system to promote transparency regarding the status of the sector and the prioritization of interventions.

5. Evaluate whether the Indigenous community feels comfortable with conventional communication channels for grievance, redress, and feedback provision. When relevant, work with Indigenous beneficiaries to establish culturally appropriate grievance and redress mechanisms to facilitate user feedback and promote transparency.

6. Final remarks

This final section provides a summary of the main takeaways from this work, including a sub-section on a few '*fact-checking*' findings that emerged directly from the field work and contradict some usual perceptions about working with Indigenous peoples. This final section also highlights the structural barriers that, if not overcome, may jeopardize the effectiveness of future engagement with Indigenous peoples despite the application of the recommendations included here. Finally, the next steps of this work are outlined.

1. Main "takeaways" from the development of this Toolkit

As opposed to other low-income groups, Indigenous peoples often: (i) subscribe to organizational and governance structures that are different from the rest of society; (ii) maintain extensive traditional knowledge around their land, natural resource base, and environment; (iii) utilize unique practices and cultural norms around water collection, storage, distribution, sanitation and hygiene; and (iv) hold strong beliefs and practices around the well-being of the collective versus the individual, leading to a higher degree of social cohesion, unique traditions and structures of community organization, and different norms around communal contributions.

This section outlines the main takeaways to address these characteristics in developing sustainable WSS services with Indigenous peoples.

RESPECT

- **Delivering high quality, well-accepted, and sustainable WSS services to Indigenous peoples depends on coordination among the key actors from the WSS and Indigenous peoples/social sectors.** Collaboration among key actors from these sectors should ideally start at the highest governmental level as early as possible in the project cycle. The joint articulation of intervention priorities and regular meetings on implementation progress can provide stepping stones for this collaboration. Due to the institutional complexities of each country, however, this may not always be possible. Nevertheless, this coordination between sectors (or between approaches) should at the very least take place at the community level.

- **The "soft side" (social mobilization, community capacity building, and Indigenous leadership engagement) is as important as the hardware (infrastructure) aspects in delivering WSS services**. For Indigenous communities, applying the demand-responsive approach, which includes active dialogue with the beneficiaries and Indigenous leaders, is fundamental in defining the infrastructure that will be delivered and how it will be managed afterwards.

OWNERSHIP

- **In order to build trust with Indigenous peoples, it is important to engage with their leadership and traditional institutions early in the project process.** When Indigenous authorities and beneficiaries participate in project planning and design, develop *ownership* over the project, and make a commitment (for example, to make payments or contribute labor) to be part of the project, it is more likely they will follow through on agreements and be active partners throughout the development, implementation, and operation of the WSS services.

SUSTAINABILITY

- **It is important to provide continued "post-construction" support to Indigenous communities in order to ensure the long-term sustainability of WSS services**. Continued engagement with the community after the official close of the project is critical to the long-term sustainability of the WSS services. Even when community management models are operating successfully, long-term sustainability requires an institutionalized structure for technical support to the communities. Professionals trained in specific aspects related to Indigenous peoples and anchored in well-capacitated WSS sector institutions with sound technical expertise will be able to provide this support.

2. Structural Barriers

It is important to recognize that complex social, political, and institutional structural barriers still present challenges to effectively apply the key principles and actions provided in this Toolkit for a sound engagement with Indigenous peoples. These structural barriers are summarized below. On the one hand, these barriers are rooted in centuries of tense relations between Indigenous peoples and Governments; on the other, they also relate to recurrent institutional challenges strongly present in the Social Development and WSS Sectors that go beyond working with Indigenous peoples.

- **Historical discrimination against communities outside of the mainstream** recurrently leads to lack of voice, political representation and economic power that together reduce marginalized communities' ability to influence how policies are formed and investments prioritized. Historically, Western societies have justified the imposition of a world view on Indigenous peoples based on an assumption of superiority in vision around progress, development and well-being. This sense of superiority in many countries in LAC is still socially and culturally accepted, and outright discrimination of non-mainstream populations that hold distinct world visions is common place. This is further exacerbated by conflicts generated from the clash of world visions and disrespect of rights over natural resources and land use that further fuels discrimination and breaks down dialogue.

- **Weak institutional structure for Indigenous representation and for the WSS Sector (in particular rural WSS) renders institutions unable to respond adequately to Indigenous peoples' demands.** In most of the countries in LAC, the institutional structure to support the development of policies and the implementation of key Indigenous engagement principles (such as recognizing land rights, traditional indigenous

organizations, and carrying out meaningful consultations, among others) is either weak or non-existent. The lack of definition of key aspects such as tenure laws and resource management often creates severe obstacles for the development of systematic interventions at scale in Indigenous areas.

- Similarly, although most countries have a well-defined arrangement for WSS services provision in urban areas, the rural WSS institutional arrangements are frequently dispersed, under-staffed, under-funded and under-represented in higher levels of government. Additionally, water institutions often **lack specific knowledge to work in remote and unique social-cultural environments,** thus demotivating them from engagement, or making their engagement less effective. The institutional development barrier is often associated with a **political system that rewards physical interventions,** which tend to be located in populated and accessible urban areas. The majority of funds and overall institutional efforts in the WSS Sector still go to urban areas, which are more easily reached and generate quicker, cheaper results and political visibility.

Changing the mindset of political leaders in order to prioritize investments and institutional efforts towards the most vulnerable, traditionally excluded, and poor communities (namely, Indigenous peoples) is a long-term transformational process that requires strong leadership, partnership with Indigenous authorities, and targeted approaches that allow for trial and error. Higher-level advocacy work, such as international agreements like the Sustainable Development Goals supported by the United Nations, the World Bank's Twin Goals, or collaboration with international development partners, could help re-direct efforts to the most needful areas and supply open-minded political leaders with the knowledge and tools to break through these barriers and promote inclusive development for their countries.

3. Fact-Checking

The fieldwork carried out for this Toolkit challenged several commonly held misconceptions on Indigenous peoples' WSS preferences and habits. For example:

Reluctance to use and adopt sanitation solutions by Indigenous peoples. It is common to hear that Indigenous peoples will resist using toilets because of their centuries-old open defecation practices. *In fact, field experience reveled that when social and engineering work is done well, with thorough iterative consultations, tailored sanitation solutions, and community capacity building (in particular involving women), Indigenous peoples demand, adopt and use sanitation solutions*.

Rejection of piped water and water treatment. It is often said that Indigenous peoples reject piped water systems and water treatment because piping or treating the water would change its natural composition. *In fact, if the community receives appropriate training, preferably in their local language, on the health benefits and comfort associated with a piped water supply and water treatment, Indigenous peoples demand, appreciate, and are willing to contribute (either financially or through other means) to an improved water system*.

Unwillingness to pay for water services. Many people believe that Indigenous peoples are not willing to pay for water services. *Contrary to popular belief, Indigenous peoples are ready to contribute to WSS services projects and their operation, either in monetary or in-kind contributions. In fact, in many cases, Indigenous peoples are keen on having water meters to promote rational water use and equitable water sharing among the families.*

And finally,

Working with Indigenous peoples is too complex and difficult to achieve desired outcomes. Initially, engaging with Indigenous peoples may appear overly complex due to the additional layers of coordination required and the need for a customized approach. *When treated as development partners, Indigenous communities actively pave the way for successful project delivery. So long as the Indigenous traditions and organizational structure are respected, the projects are defined with Indigenous peoples' active participation, and ownership for the WSS system is established, project development and implementation tends to be smooth and the results tend to be sustainable. Project teams need to allocate time and resources for a demand-responsive approach to project design, implementation, and evaluation that respect the specificities of Indigenous practices and organization. It is true that WSS services in Indigenous communities require unique and flexible approaches with specialized knowledge of the community, but it is not significantly more complex or time-consuming than a demand-driven approach to providing WSS services to other communities. The elaboration of a country-specific strategy and implementation methodology agreed between WSS sector institutions and Indigenous organizations will also streamline these processes. Furthermore, success is possible, sustainable, and extremely impactful when the project respects Indigenous actors and creates ownership over the intervention.*

Author's Note

This report has been circulated internally in the World Bank for quality assurance. The findings and recommendations are all based on analysis and reflection on the interviews carried out through the field work. However, this final document will be validated through a consultation process with the various entities that took part in the fieldwork, namely government organizations, Indigenous organizations, NGOs and beneficiary representatives. A list of these organizations is available in Annex 9.

This material will be transferred to an interactive web platform format to facilitate access by all stakeholders. The web platform will include video material gathered throughout the field visits.

Further studies on this topic could include specific analysis on Afro-descendants. Additionally, similar assessments and Toolkit development could be targeted for other sectors (such as education and health) in order to contribute to a comprehensive development agenda for Indigenous peoples in LAC. Finally, more resources should be spent on adapting existing successful methodologies and tools mentioned in this Toolkit for application in Indigenous contexts.

Annexes

Annex 1. Detailed Legal Framework

This Annex provides a detailed overview of the international legal tools recognizing indigenous peoples' rights and country-by-country legal framework profiles regarding indigenous peoples.

From a **legal standpoint**, three documents stand out in the recognition of indigenous peoples and their rights:

1. The **International Labor Organization Convention No. 169 on the Rights of Indigenous and Tribal Peoples**, created in 1989, established the following principles: (i) the right of Indigenous Peoples to self-determination; (ii) the right to be consulted; (iii) the right to decide their own development priorities; (iv) the right to preserve their own institutions; (v) to cross-boundary contacts and cooperation; (vi) customs and customary law. The convention's provisions are binding, and States are under the obligation to respect, fulfill, and protect the Indigenous peoples' rights affirmed therein. In most cases the provisions are self-executing. In other words, they apply regardless of whether the state has complied with its obligation to issue laws and regulations facilitating their implementation.[76] The implementation of related laws and tools is subject to close monitoring by the international community. **All the countries included in this study have ratified the ILO Convention No. 169 on the Rights of Indigenous and Tribal Peoples, except for Panama**, though the *Vice-Ministerio de Asuntos Indigenas* affirmed they were working on this process. Overall in Latin America, 15 countries have ratified ILO C 169.
2. The **United Nations Declaration on the Rights of Indigenous Peoples** was issued in September 2007 by the United Nations Assembly and is an international instrument aiming to establish the rights that "constitute the minimum standards for the survival, dignity and well-being of the indigenous peoples of the world." (Article 43) The Declaration goes on to guarantee the rights of Indigenous peoples to enjoy and practice their cultures and customs, their religions, and their languages, and to develop and strengthen their economies and their social and political institutions. The Declaration is the product of almost 25 years of deliberation by United Nations member states and indigenous groups. Thus far, the only two non-signatories of the United Nations Declaration on the Rights of Indigenous Peoples are the USA and Canada.
3. The national Constitutions are a tool in the application of both documents stated above, as they are the domestic documents officially recognizing indigenous peoples' existence and rights within a country, including tailored information on the different nations or pueblos and their territorial affiliations. Latin American constitutions include the recognition of indigenous peoples, communities, and ethnic groups, though there is no uniformity in the format or content across the region, as highlighted in the comparative table below. In particular, the official recognition of the traditional indigenous authorities is not always included, nor are the "alleys" for communication (which organization or authority to talk to first when engaging) systematically defined.

76 World Bank, 2015.

Country	Constitutional Recognition	Other laws for Indigenous Rights	Control over natural resources
Argentina	1994. Art. 75 para. 17 recognizes the pre-existence, ethnic and cultural, of the Indigenous Peoples of Argentina. It guarantees respect to their identity and the right to bilingual and intercultural education, the legal personality and possession of their territories. It promotes their protagonism through their own institutions. It guarantees their participation to management of natural resources of the lands they occupy.	1995. Decree 757. The Constitution of Province of El Chaco grants the legal property of lands occupied by Indigenous Peoples. 2000. It ratified ILO 169.	
Pluri-National State of Bolivia	2009. It contains sweeping reforms to strengthen the social and political rights of indigenous Peoples. Art 2: The pre-colonial existence of nations and rural native indigenous peoples and their ancestral control of their territories, their free determination, consisting of the right to autonomy, self-government, their culture, recognition of their institutions, and the consolidation of their territorial entities, is guaranteed within the framework of the unity of the State, in accordance with this Constitution and the law.	1991. It ratified ILO 169. 2000. Presidential Decree 25.894: all Indigenous languages are official. 2001. Presidential Decree 26.330 guarantees Health Insurance to Indigenous and *Originarios* peoples.	
Colombia	1991. (Ref. 2009) Art. 7. The Constitution recognizes and protects the ethnic and cultural diversity in the country. The Indigenous languages are official in their territories. (Art. 10). The territorial Indigenous “resguardos” are communal property, administrated by Indigenous Councils. (Art 329).	1991. It ratified ILO 169. 1992. Decree 715 creates the National Committee of Indigenous Rights. 1996. Decree 1397 creates the National Commission of Indigenous Territories and the Mesa Permanente de Concertación of pueblos and Indigenous Organizations.	
Nicaragua	1987. (Ref. 2005) The Nicaraguan Constitution recognizes the existence of Indigenous Peoples and the right to maintain and develop their identity and culture, their forms of social organization and administration of their local affairs, maintaining the forms of communal property of their lands and the possession, use, and enjoyment of said land. The communities of the Atlantic Coast of Nicaragua establish themselves as an autonomous regime in the present Constitution.	1987. Law 28. Autonomy Law. 1993. Law 162. Official use of Indigenous languages of the Atlantic Coast. 2003. Law 445. It recognizes the communal property of the Indigenous Peoples and ethnic communities of the Autonomous regions of the Atlantic Coast of Nicaragua, and Bocay, Coco, Indio and Maiz rivers. 2010. It ratified the ILO 169.	The right to land titling was sanctioned by the National Assembly in 2003 through the Communal Law of Indigenous Peoples (Ley 445). Among other things, Ley 445 promotes the rational use of the waters, forests, and communal lands for the benefit and enjoyment of their peoples, and the overall preservation of the ecological system.

Continue

Country	Constitutional Recognition	Other laws for Indigenous Rights	Control over natural resources
Panama	1972. (Ref. 2004). Art. 90. The State recognizes and respects the ethnic identity of Indigenous communities. Art. 108. On the right to education. The State will develop education programs for Indigenous peoples, according to their cultural patterns. Art. 124. The State will grant special attention to *campesino* and Indigenous communities to ensure their participation in the social, economic and political life of the nation.	2011. It ratified ILO Agreement # 169. 1952 Creation of the National Directorate of Indigenous Policies. 1953 – Comarca Guna Yala 1983 – Comarca Emberá. 1996 – Comarca Madungandi 1997 – Comarca Ngabe Bugle 2000 – Comarca Wargandi 2000. Law 20. Special Intellectual Property Regime for the Collective Rights of Indigenous Peoples. 2000. Ruling of the Third Chamber of the Supreme Court of Justice, which establishes the need for indigenous peoples' consent before carrying out development projects on their territories. 2011. It ratified ILO 169.	
Paraguay	1992. Art. 62. The Constitution recognizes the existence of indigenous peoples, defined as cultural groups prior to the formation and organization of the Paraguayan state. Art.63. It guarantees indigenous peoples' customary rights to preserve their ethnic identity, and develop political, social, economic, cultural and religious organizations.	1981. Law 904: Estatuto de Comunidades Indígenas. 1999. ILO 169, ratified by Law 234.	
Peru	1933. The Constitution recognizes Indigenous peoples in the country as native communities Art. 207. Indigenous communities have legal personality. Art 205. Each Municipal Council will include one representative selected by the indigenous communities as established by the law.	1994. Peru ratified ILO 169. 1986, 2002. It guarantees Legal personality to the *Rondas Campesinas y Nativas* to support legal functions of the State. According to the 2007 census, 44% of the population is Indigenous (51 groups) residing mostly in the highlands. However in practice, Indigenous peoples living on the Central Highlands are referred to as "campesinos" despite the fact that they are of indigenous descent[77]. Some of them struggle to be recognized as indigenous peoples, while others prefer to be recognized as *mestizos*.	

77 The Agrarian Reform (1968-1979) organized highlands' inhabitants into 300 farmers' cooperatives. The Indigenous background became secondary.

Additional legal tools include:

- ILO 169: http://www.ilo.org/dyn/normlex/en/f?p=1000:11200:0::NO:11200:P11200_COUNTRY_ID:102536
- The Inter-American Development Bank compiled an extensive legal database on Indigenous Peoples rights in Latin America, including jurisprudence, for each country and sector up to 2012. This tool serves as an excellent reference point to initiate legal research. http://www.iadb.org/Research/legislacionindigena/leyn/
- Bolivia Autonomy and Decentralization Law: http://www.ine.gob.bo/indicadoresddhh/archivos/alimentacion/nal/Ley%20N%C2%BA%20031.pdf
- Colombia Decree 1953: https://www.minjusticia.gov.co/Portals/0/DECRETO%201953%20DEL%2007%20DE%20OCTUBRE%20DE%202014.pdf

Annex 2. Institutional Frameworks in the Countries Visited

The table below outlines the different organizations in charge of the WSS sector and Indigenous representation in the countries visited during field work, as well as their functions.

Location	Gov. institution responsible for norms setting	Gov. institution responsible for water infrastructure	Gov. institution responsible for overseeing water service provision
Ngobe Bugle, Panama	Ministry of Environment	Ministry of Health	Rural: Ministry of Health Urban: IDAAN
Caribbean Coast, Nicaragua	National Institute of Aqueducts and Sewerage (INAA)	Rural: Social Emergency Investment Fund (FISE) Urban: the WSS public utility ENACAL	Rural: Social Emergency Investment Fund (FISE) and Municipalities Urban: the WSS public utility ENACAL
La Guajira, Colombia	The Water Regulation Commission (CRA in the Ministry of Housing, Cities and Territory (CRA)	Sub-national government entity (Gobernación)	Municipalities
Selva, Peru	National Superintendence for Sanitation Services (SUNASS - regulator), Ministry of Housing, Construction and Sanitation	Rural: National Rural Sanitation Program (PNSR) Urban: Public WSS utilities.	Rural: Ministry of Housing, Construction and Sanitation of the Ministry of Development and Social Inclusion (MIDIS), Fund for Economic Inclusion in Rural Areas (FONIE) Urban: Public WSS utilities.
Altiplano, Bolivia	Vice-Ministry of Water Supply and Sanitation	Implementation Agency for Environment and Water (EMAGUA) and National Fund for Productive and Social Investment (FPS)	Vice-Ministry of Water Supply and Sanitation
Gran Chaco, Paraguay	Regulating Entity for Sanitary Services (ERSSAN)	Ministry of Public Works and Credit	National Environmental Sanitation Service (SENASA), National Emergency Secretariat (SEN)
Impenetrable Chaco, Argentina	National Entity of Sanitation Hydraulic Works (ENOHSA)	Provincial State Company for Water Service and Maintenance (SAMEEP)	SAMEEP

Gov. institution responsible for Indigenous peoples	National/ subnational Indigenous Organizations	Who decides project targeting for indigenous areas?
Vice-Ministry of Indigenous Affairs	4 Indigenous Congresses of the *Comarcas* (officially recognized Indigenous territories)	Ministry of Health
Regional and Territorial Gov. of the Caribbean Coast for the North and South regions (RACCN and RACCS)	Regional and Territorial Gov. of the Caribbean Coast for the North and South regions (RACCN and RACCS)	Municipalities
Ministry of Interior	Indigenous Associations	Regional or local Governments Autonomous Regional Agencies
Ministry of Culture (MINCU)	National and regional Indigenous organizations	Ministry of Housing, Construction and Sanitation
Vice-Ministry of Indigenous Autonomies	Autonomies; most organizations are split in factions for and against the government	Central Government
Instituto Nacional del Indígena (INDI)		SENASA
Instituto Nacional de Asuntos Indígenas (INAI)		Municipal WSS agency (in this case SAMEEP)

Annex 3. Stakeholder Mapping Examples

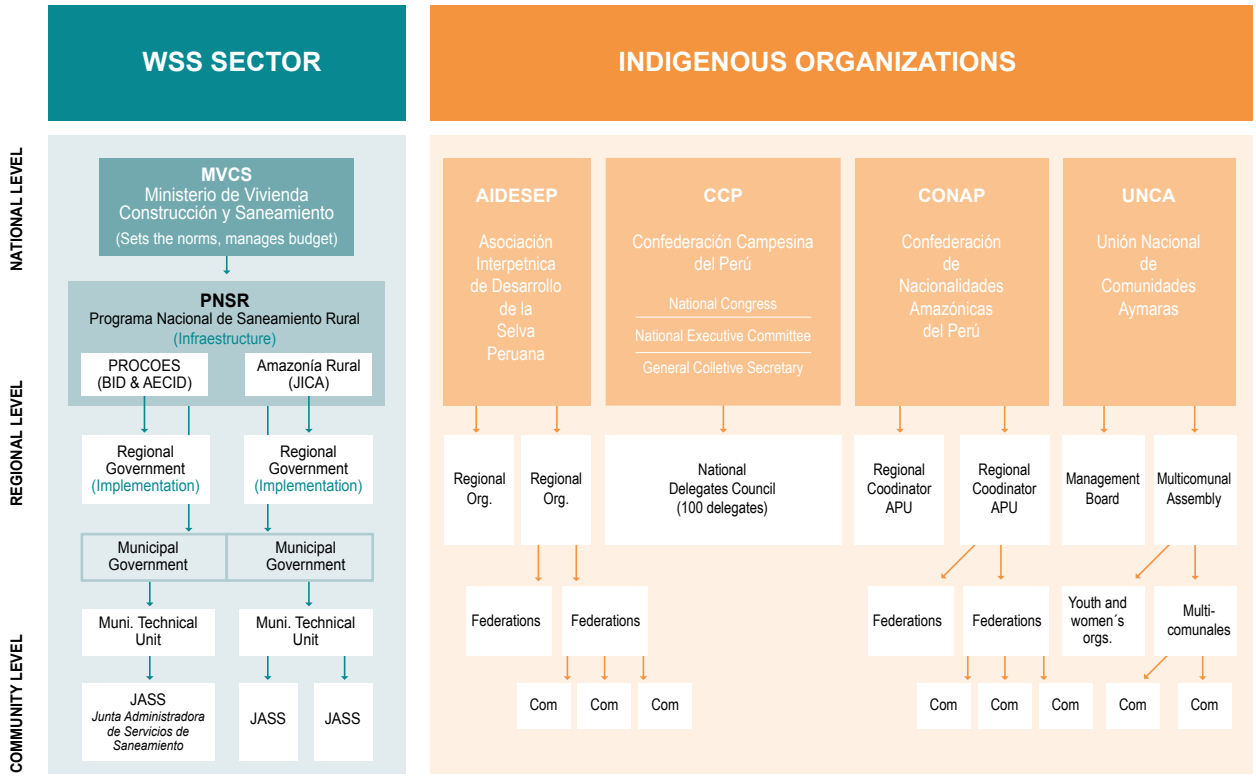
The two diagrams below depict the institutions involved both in indigenous peoples' representation and in the WSS sector as it pertains to WSS service provision in indigenous areas. The institutions are lined up along 'level of engagement': national, regional and community, to facilitate envisioning which should interact and which should be channels to reach other (lower, more localized) levels. It is important to note that these diagrams do not depict all institutions involved in the WSS sector, but rather those involved in working with indigenous areas. Recommendations for further participation of other institutions are highlighted in each case.

Example 1: Peru

WSS sector: In Peru, the *Ministerio de Vivienda, Construcción y Saneamiento* is in charge of the WSS sector. Within this Ministry, *the Programa Nacional de Saneamiento Rural* (PNSR) oversees services roll-out in rural areas, where the majority of the country's indigenous population resides. Though neither PNSR nor MVCS have a specific sector strategy geared towards reaching indigenous peoples, they both have expressed a strong interest in working in indigenous areas as those remain among the most vulnerable and unreached in Peru. Through the regional and municipal governments, programs under the PNSR administer funds (and interventions) with support and follow-up from the Municipal Technical Unit, which usually also oversees aspects of health and education. At the community level, in the rural sector, WSS services are usually managed by WSS committees called JASS *(Juntas de Administradora de Servicios de Saneamiento)*.

Indigenous organizations: Indigenous representation happens by *nacionalidad* (indigenous group affiliation) at the national level. Each major group is represented by an organization, itself at the head of a chain of 'levels of engagement.' For example, CONAP represents part of the Amazon indigenous population, centralizing inputs through their regional representatives, the Apu, who themselves coordinate information flow from the Federations. At the community-level, concerns and demands for WSS (and other) interventions are raised to the Federations. As depicted in the graphic below, each indigenous group has a slightly different structure, which may in turn influence the way consultations should be carried out.

Intersection and engagement: Engagement should take place first between national organizations, with PNSR and/or MVCS following the protocols for each organization pertaining to the specific area they want to intervene in. Since in the WSS sector Municipal Technical Units can play an important role in follow-up and, potentially, the provision of technical assistance to the JASS once an intervention is being implemented and thereafter, coordination should also occur between these units and relevant indigenous representatives at the regional, federal and community levels. Finally, it is important to align the structure of the JASS to indigenous communities' traditional authority structures. Future lines of engagement that can be drawn from this diagram (and the absence in the processes depicted of key sector actors) are as follows: 1) involve the sector regulator, currently only responsible for the regulation of WSS utilities, in defining certain rules and indicators to promote the performance of JASS, especially in indigenous contexts; 2) more actively coordinate with the health and education sectors, who reportedly have a stronger presence in extremely isolated areas of Peru, where the most vulnerable indigenous populations are concentrated; 3) engage with WSS utilities to provide technical assistance to municipal units and/or JASS in their local areas and to develop approaches tailored to indigenous populations in their service areas.



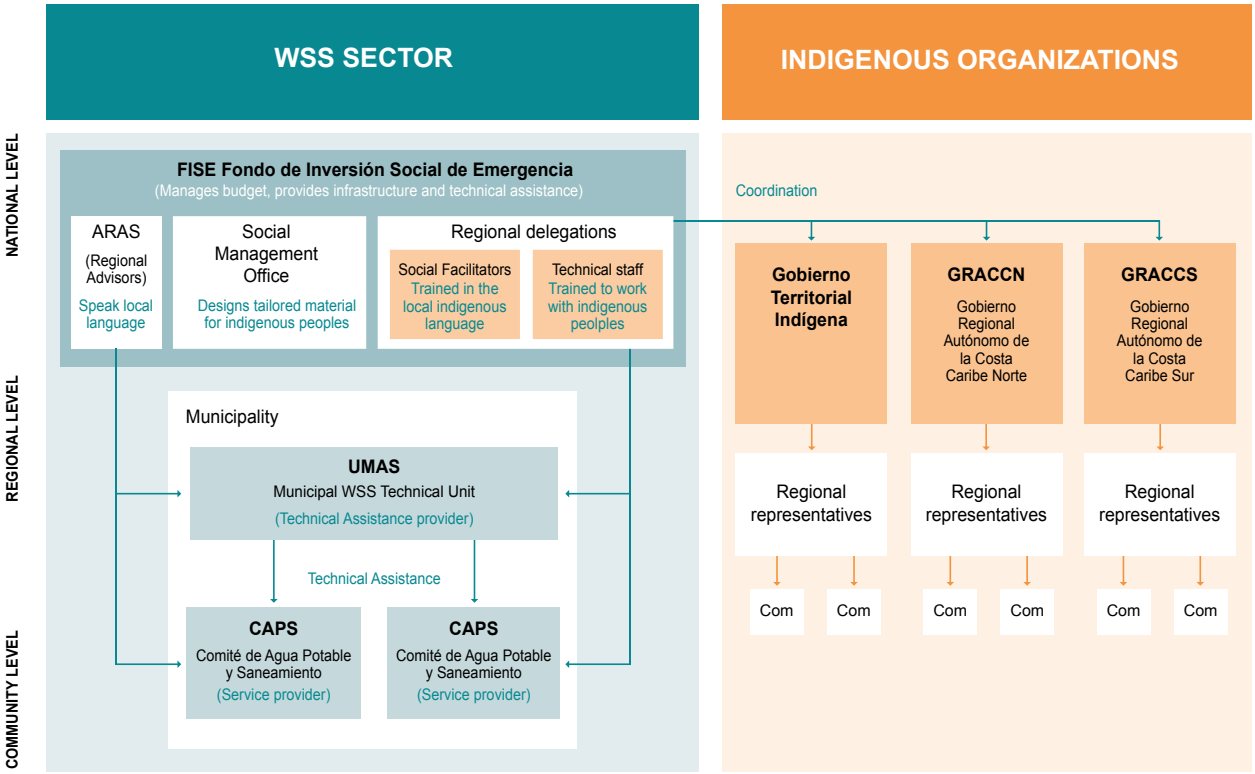
Example 2: Nicaragua

WSS Sector: In the case of Nicaragua, the majority of indigenous population resides in rural areas, which are under the responsibility of the Fondo de Inversión Social de Emergencia, FISE. FISE counts with a Social Management Office that produces materials and engagement methodologies tailored to indigenous areas. The regional advisors (ARAS) bring sectorial support both at the municipal and the community level. FISE has regional delegations staffed with their own social facilitators and technical staff, which are trained to work with indigenous peoples where relevant. WSS interventions are identified and prioritized between FISE and the Municipality, and implemented at the community level. Systems are then managed by water committees or CAPS (*Comités de Agua Potable y Saneamiento*) with technical assistance provided by the municipal technical units, the ARAS, and FISE's municipal representatives, the *Asesores Municipales*.

Indigenous organizations: Indigenous peoples are represented at the level of regional governments (one for the Southern Caribbean region and one for the Northern Caribbean region) and territorial governments (Alto Wangki y Bocay) that centralize information and demands from the communities through regional representatives. Territorial Indigenous Governments (GTIs) should be consulted and approached differently than the regional governments.

Intersection and engagement: FISE has experience engaging with the regional and territorial governments from the implementation of past WSS interventions, however this process should be dynamic and iterative. Prioritization of investments in the sector are now done through municipal plans according to technical poverty and WSS services related criteria, however any project in an indigenous area has to be validated by the respective governments. FISE is now working to train GTI technical staff in technical assistance provision related to WSS services at the

same level as municipal staff, which is a step forward in involving those governments in the sustainability of WSS interventions and empowering them to take on this role, but also in ensuring that technical assistance providers have the required knowledge and know-how to work with indigenous peoples. FISE is also hiring technical and social staff who speak the local indigenous languages and, as much as possible, are from the area where they will be working and engaging. Additionally, CAPS structure should be adapted to respect and incorporate the traditional community authority structures. Future lines of engagement that can be drawn from this diagram (and the absence in the processes depicted of key sector actors) are as follows: 1) solidify the role of the GTI staff in WSS sector sustainability; 2) engage ENACAL, the country's WSS utility, and other actors on devising a sector-wide strategy and appropriate support mechanisms to indigenous communities and neighborhoods.



Annex 4. Diagnosis Example – Water for People Formato 001

MONITOREO Y EVALUACIÓN
VISITAS DOMICILIARIAS

FORM. 001

Municipio/Distrito: **Comunidad/OTB:**

Jefe de Familia: **GPS:** GPS:..... K, ... - .....
Elevación: .....

Fecha de Visitas: D: ..... M1: ..... M2: ..... Ev1: .....

PRÁCTICA DE HÁBITOS FAMILIARES RELACIONADOS CON AGUA Y SANEAMIENTO		EVALUACIÓN			
	**LAVADO DE MANOS E HIGIENE PERSONAL**	**D**	**M1**	**M2**	**Ev1**
	1. ¿Tiene limpia sus manos?				
	2. ¿Existe un lugar específico destinado al lavado de manos con insumos adecuados? (agua limpia, jabón, jaboncillo, cenizas, toalla, etc.)				
	3. ¿Las personas están aseadas? (peinado - lavado de cara)				
	**HIGIENE DE LA VIVIENDA**	**D**	**M1**	**M2**	**Ev1**
	1. ¿El dormitorio se encuentra barrido y ordenado?				
	2. ¿La cocina está limpia y ordenada?				
	3. ¿El patio está limpio?				
	4. ¿La vivienda se encuentra libre de cacas? (mínimo 3m. alrededor)				
	**DISPOSICIÓN DE BASURA**	**D**	**M1**	**M2**	**Ev1**
	1. ¿Cómo elimina la basura? (a) Entierra (b) Quema (c) Rio (d) Patio (e) Campo abierto (f) Reutiliza (g) Otro……				
	CONSUMO Y ALMACENAMIENTO DEL AGUA	**D**	**M1**	**M2**	**Ev1**
	1. El agua que consume es: a) Proyecto de WFP b) Otro Proyecto c) Punto de Agua No Mejorado				
	2. ¿Cómo desinfecta el agua para beber? a) Hierve b) Cloro c) SODIS d) Filtrado e) Otro tipo de Desinfección f) No desinfecta				
	3. El agua tiene esencialmente un uso: a) Doméstico b) Riego c) Proceso Industrial				
	4. ¿Recipientes de agua limpios, tapados y libres de contaminación?				
	PILETA DOMICILIARIA	**D**	**M1**	**M2**	**Ev1**
	1. ¿Pileta funcionando?				
	2. ¿Pileta en buen estado? (libre de filtraciones)				
	3. Evitan charcos de agua				
	4. ¿El medidor se encuentra funcionando?				
	5. ¿El medidor permite realizar una lectura adecuada?				
	6. El pedestal de la pileta tiene salida a: a) Pozo de absorción b) Huerta- jardín o terreno de cultivo c) Patio – terreno libre				

PRÁCTICA DE HÁBITOS FAMILIARES RELACIONADOS CON AGUA Y SANEAMIENTO		EVALUACIÓN			
	SERVICIO DE SANEAMIENTO: BAÑO ECOLÓGICO	**D**	**M1**	**M2**	**Ev1**
	1.- ¿Usa el baño?				
	2.- ¿El baño se encuentra limpio?				
	3.- ¿El baño está libre de malos olores?				
	4.- ¿El inodoro se encuentra tapado?				
	5.- ¿Usa material secante?				
	6.- ¿El papel usado es depositado en la cámara?				
	7.- ¿Heces removidas?				
	8.- ¿Pipi ducto y/o urinario funcionando?				
	9.- La orina se deposita en : (a) Bidón para reutilización (b) Pozo de absorción (c) Aire libre				
	10.- Las paredes de las cámaras se encuentran sin rajaduras.				
	11.- ¿La tapa de la cámara está sellada herméticamente?				
	12.- El acceso al baño es adecuado.				
	SERVICIO DE SANEAMIENTO: BAÑO CON ARRASTRE DE AGUA	**D**	**M1**	**M2**	**Ev1**
	1. ¿Usa el baño?				
	2. ¿El baño se encuentra limpio?				
	3. ¿Existe agua disponible dentro de un radio de 3 m. para el uso del baño?				
	4. ¿Tiene recipiente para depositar el papel usado?				
	5. ¿El sifón se encuentra en buen funcionamiento?				
	6. ¿La cámara o pozo séptico cuenta con ventilación adecuada?				
	7. ¿Existe una cámara de inspección antes del pozo séptico?				
	USO DE LA DUCHA	**D**	**M1**	**M2**	**Ev1**
	1. ¿Usa la ducha?				
	2. ¿La ducha se encuentra en buen estado y funciona adecuadamente?				
	3. ¿Existe pendiente suficiente hacia la rejilla de piso para la salida del agua?				
	4. El agua utilizada es dispuesta en: a) Huerta- jardín o terreno de cultivo b) Reutiliza c) Pozo de absorción d) Ninguno.				

Observaciones D:

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Observaciones M1:

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Observaciones M2:

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Observaciones Ev1:

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Annex 5. Payment Mechanisms for Water Services

	Type of Contribution
Monetary Contributions	**Fixed Tariff:** Every household pays a fixed rate per month. The tariff can vary depending on costs, for example, in the Peruvian Andes where water systems are low cost and rely on gravity tariffs are 0.50 soles, but in the Amazon where due to the geography and distance water supply systems are more expensive the tariff can go up to 10 or 12 soles. In Nicaragua, small fees (10 cordobas) are symbolic to promote ownership and responsible use of water.
	Consumption-based Tariff: Each household pays based for its own consumption which is measured by a meter. In Bolivia, this system is preferred because it prevents people from wasting water or using potable water for animals and irrigation.
	Maintenance and Repair Fund: The community does not pay for water on a regular basis, but when the system requires maintenance and repair each person contributes to the fund. Similarly, if the community is unable to contribute to the construction of the system, it can compensate by taking charge of its maintenance and repair. This system is successful in the Paraguayan Chaco that is a very poor and dry area.
	*** Paying for the Service:** In Indigenous cosmovision, water is seen as a gift from nature which is why some beneficiaries are hesitant to pay for it. Establishing a tariff for the service of bringing potable water to the community rather than for water itself is a way to ensure system ownership and sustainability while respecting indigenous cosmovision. The service can be paid for through Fixed Tariffs, Consumption-based Tariffs or Maintenance and Repair Funds.
	Incorporating Payment of Water Tariffs in Conditional Cash Transfer Programs: In addition to vaccinating children, sending them to school and other requirements, paying water tariffs could be incorporated as a pre-requisite to receiving conditional cash transfers. The government of Peru is considering incorporating this into their conditional cash transfer program, JUNTOS, in order to incentivize people to pay.

Continue

	Type of Contribution
Non-Monetary Contributions	**Land Donation:** Families that own land where the water source is located or in surrounding areas can contribute by donating the land closest to the water source to the community. This practices has allowed Peruvian highlanders to ensure protect water sources from pollution and over-use.
	Faena/Minga: A tradition where the community works together and volunteers its labor for the construction, maintenance and repair of the service. This is common in Quechua and Aymara communities in Peru, Ecuador and Bolivia.
	Labor: Households that cannot afford to pay tariffs can volunteer their labor for construction, maintenance and repair of the system. Similarly, in communities or neighborhoods where the government or other institutions have agreed to cover all costs, the community can contribute through labor which will promote ownership and sustainability of the system.
	Commitment to attend workshops, trainings and Water Committee meetings: Households can contribute their time by committing themselves to attend every training, workshop and Water Committee meeting to ensure that they understand the benefits of the system and how to give maintenance and repair, thus encouraging ownership and sustainability.
	Trading Natural Resources for Water Systems: Amazon communities in Peru trade their natural resources such as wood in exchange for the construction, maintenance and repair of water systems.
	Materials: Communities or neighborhoods and even individual households can contribute locally available materials for the construction, maintenance and repair of the system.
	Environmental Services: The community can contribute by providing environmental services, primarily caring for and protecting the water source. This can be achieved by reforesting surrounding areas and closing the water source off to prevent contamination from animals or people. This approach has been very successful in the Pacific region of Nicaragua

Annex 6. Nicaragua Financing Policy

Source of financing / Type of expanditure		Community / CAPS (resources from tariffs, community contribution, etc.)	Municipality	National Government (including donors* funding)
Technical and social activities (pre-investment)	Basic studies, enginnering design, social assistance to communities	Not financed	Participates and supports specific activities depending on their capacity	Yes, in general
Investment	New WSS systemn and/or rehabilitation of old systems (more tahn 10 yr. old)	Low-level of counterpart funding	10% of counterpart funding	Very high-level of funding (new systems are Government priority)
	WSS service expasioin or change of system	Medium-level of counterpart funding	10% of counterpart funding	Medium-level of funding
	Change of level of service (change of system) e.g. isolated well to well with pump and network	High-level of counterpart funding	Finances the balance uncovered by the community	Partially funding if investment exceeds the municipality's payment capacity
	Major rehabilitation due to poor O&M (WSS systems with less than 10 yr. old)	High-level of counterpart funding	Finances the balance uncovered by the community	Partially funding if investment exceeds the municipality's payment capacity
	Minor rehabilitation (<50% of works)	Very high-level of counterpart funding	On exceptional cases (vulnerable and low-income communities), finances balance uncovered by community	Not eligible
Operational Costs	O&M	Full counterpart funding	Not eligible	Not eligible

(Note: specific figures of counter-part funds percentages will be defined in the MEPAS; However they will range approximately as follows: low-level of counterpart: 0% to 10%; medium-level 10% to 30%; high-level: 20% to 80%; very-high level: up to 100%).

Annex 7. Different Management Models Witnessed

Location	Management Model
Colombia (La Guajira)	**Structure:** The existing water committees have been formed by outside institutions (such as NGOs) and therefore each is structured differently. **Leadership:** In order to get community recognition, water committees must be led by traditional authorities. **Tariffs:** Tariffs were witnessed in most of the committees visited. A common amount was a monthly fee of P/3,000 per household. **Functions:** Water, Sanitation and Hygiene Committee (ASH) is in charge of ensuring that the system is functional and the community is educated on hygiene, including on how to use latrines and other WSS systems.
Paraguay (El Gran Chaco)	**Structure:** Though most systems are household or community-level rainwater harvesting, the majority of communities do not have Water Committees. There is no assigned responsibility for system operation and maintenance, though sometimes they expect the Municipality to perform repairs. However, SENASA is in the process of implementing a strategy for the formation and strengthening of WSS committees in the communities where they build systems to promote sustainability. **Leadership:** Many of the communities visited had appointed a Spanish-speaking community member to lead exchanges with the Municipality and outsiders. As part of their strategy, SENASA would help the community appoint a board and train them. **Tariffs:** The few communities that do have Water Committees do not charge tariffs since in El Chaco, indigenous peoples do not have the practice of paying for water. **Functions:** Maintenance is done by outside actors (usually the Municipality). SENASA has signed agreements with the different Municipalities of the Chaco region in order to strengthen collaboration. SENASA is also in the process of building and staffing decentralized offices to attend to these communities and help the Municipalities.
Argentina (El Impenetrable Chaco)	**Structure:** The majority of communities do not have Water Committees, however the visited communities fell under the responsibility of WSS utilities. **Leadership:** The water utility of the Chaco Province (SAMEEP) has appointed representatives to interact with the community and has contracted the NGO *Fundación Gran Chaco* to facilitate exchanges. **Tariffs:** Communities receive highly discounted service from the water utility. **Functions:** The water utility will be responsible for the operation and maintenance of the system. Though there are Community Associations responsible for all sectors such as education and health, none specifically work on water.

Continue

Location	Management Model
Nicaragua	**Structure:** The Nicaragua rural WSS sector is characterized by decentralized community management through Water Committees called CAPS (Comité de Agua Potable y Saneamiento). They receive technical assistance from municipal WSS units. There is a law (Law 722) that dictates the specifics of CAPS formation and legalization. If they are legalized, they receive economic incentives such as preferential electricity tariffs. **Leadership:** Members change every 2 years through community elections. **Tariffs:** When the national rural WSS entity, FISE, supports the creation of CAPS, it is a requirement for the CAPS to set a user fee that covers operation and maintenance costs. It is common for households to pay a monthly fee of about 20 cordobas, though this may be higher in communities with piped systems due to mandatory household meters. The service is cut when households fail to pay. **Functions:** The CAPS is in charge of maintenance, hiring people for small repairs and requesting money from government authorities for larger repairs. They are also in charge of training and of supervising hygiene behaviors in the community, usually with local municipal government support. The CAPS are trained by the municipal WSS units to administer the water system and carry out O&M tasks such as purifying water by the government. CAPS must submit monthly financial reports for review to the Communal Board and Communal Assembly.
Peru	**Structure:** In Peru, rural WSS services are managed through JASS (*Junta Administradora de Servicios de Saneamiento*). They are organized in networks, with a central JASS coordinating community-level JASS. In some projects implemented in the Selva, the Ministry of Housing, Construction and Sanitation has hired a private company to support communities in the operation of WSS schemes when those are complicated due to poor water quality (reverse osmosis systems, for example). **Leadership:** The committee is elected to be in charge of all water and sanitation issues. **Tariffs:** Some JASS charge a set service fee of 1 sol while others use meters. Some communities have provisions for non-payment, such as cutting the service after 3 months of not paying. Household must cover installation costs if they want water in their homes. 20% of the collected money is kept by the local JASS and 80% is sent to the central regional JASS. **Functions:** The JASS are in charge of operation and maintenance and may receive support from outside entity (central JASS or municipality). Municipal authorities train JASS members during project construction. JASS are supposed to present reports every 3 months.
Panama (rural)	**Structure:** In Panama, rural WSS services are managed through community-level WSS committees called JAAR (*Junta Administradora de Acueductos Rurales*). Piped systems are mandated by law. **Leadership:** Most JAAR leaders are elected. **Tariffs:** The JAAR charges tariffs and is in charge of paying the water service bill to the Ministry of Health. Some communities pay fixed rates while others that have meters evenly split the cost. The service is cut for those who don't pay. People who cannot afford to pay can pay through labor when maintenance and repair is needed. **Functions:** The JAAR charges tariffs and is responsible for carrying out maintenance and repair of the system at the community level JAAR has a set of rules that determines how to adopt new projects following traditional leadership structures.

Continue

Location	Management Model
Panama (urban)	**Structure:** In the case of peri-urban areas, service was provided by IDAAN, the water utility. **Leadership:** IDAAN has a trained team with social specialists tasked with coordination with the community and trainings on WSS-related topics. **Tariffs:** Indigenous beneficiaries pay IDAAN's social tariffs. IDAAN representatives indicated that due to their traditional organization and valuation of the service, Indigenous peoples were more likely to pay tariffs on time. **Functions:** IDAAN provides piped water into users' homes and operates and maintains the system.
Bolivia	**Structure:** Water Committees (CAPyS – *Comité de Agya Potable y Saneamiento*) are established in the early stages of the project and use statues and regulations that guide their activities. **Leadership:** Committee members are usually elected. In some instances, the Committee trains the entire community on water and sanitation topics so that everyone is capable of serving in the Water Committee, facilitating rotation. The entire community must attend monthly Water Committee meetings and are charged a fee if they fail to do so. **Tariffs:** A tariff is charged and if people don't pay the service is cut. In some communities, tariffs are collected by a group of several Water Committee members to avoid accusations of misuse of funds. **Functions:** The CAPyS is in charge of integral management water and sanitation services, including maintenance and repair, with a strong hygiene component. The Committee manages different funds earmarked for protection, expansion, etc. of the WSS systems. In some cases, these are invested in sanitation solutions that avoid contamination of nearby groundwater and/or surface water.

Annex 8. SIASAR as a Tool to Measure Sustainability[78]

The Rural Water and Sanitation Information System (SIASAR) was developed in response to several countries' demands for systematic and reliable information on the quality, coverage and sustainability of WSS services in rural areas. SIASAR's conceptual model covers a broad range of information in order to provide countries with the necessary information to plan infrastructure investments and local institutional strengthening measures. In addition to the physical condition of water systems and coverage levels in rural communities, SIASAR monitors the capacity of rural water service providers and measures both the quality of the water and sanitation services and the effectiveness of available technical assistance.

SIASAR is currently rolled-out in six LAC countries: Honduras, Nicaragua, Panamá, Dominican Republic, Mexico (State of Oaxaca) and Peru. The next countries lined up to join the initiative are Costa Rica and Brazil (State of Ceará). There are currently over 16,000 rural communities with public data registered in the system.

All SIASAR data is publicly available on a highly practical and interactive web platform. The data collection system is adapted for Android cell phones and tablets, facilitating easy data capture and storage.

SIASAR collects data according to four modules: system, community, service provider (for example, a water committee) and technical assistance provider (usually a municipal unit). Each module has a questionnaire to rank performance. The results are aggregated into an overall sustainability rating that takes into account O&M practices, financial solvency and community hygiene practices, among other indicators. The questionnaires provide the detail necessary for informed policy making and investments.

Because SIASAR collects information on a community's ethnicity, the data gathered in the system's wide databases can be disaggregated for Indigenous areas. As part of this report, the Team analyzed data on Nicaragua's database, the first country to achieve full SIASAR coverage (all rural communities entered and validated).

Figure 1
Improved Sanitation Coverage in Nicaragua,
Own elaboration based on SIASAR data

The system can be accessed at www.siasar.org

78 Adapted from the Briefing Note "The SIASAR Initiative: An Information System for More Sustainable Rural Water and Sanitation Services." World Bank, 2014.

Annex 9. Stakeholders Interviewed

Coordination and organizations outside of field visits

- Foro Indigena Abya Yala
- Rocio Florez, Executive Director, Gocta Natura Reserve
- Nancy Sutallo, Executive Director, Rainforest Flow

World Bank Projects visited

Project	Area	Intervention
La Guajira Water and Sanitation Infrastructure and Service Management Project (P096965)	La Guajira, Colombia	Construction of reservoirs in selected indigenous communities and social and community organization activities, including the constitution of water committees. (part of the rural pilot component).
Panama Water Supply and Sanitation in Low-Income Communities Project (P082419)	Panama (rural)	Construction of community water supply systems and household sanitation solutions, with creation of water committees and hygiene promotion practices.
Metropolitan Water and Sanitation Improvement Project (P119694)	Panama (urban) – the team specifically visited the Colón area.	Connection of unserved communities and neighborhoods in the Panama Metropolitan area to WSS services.
Rural Water Supply and Sanitation Project (P106283)	Nicaragua (rural)	Construction of community-level water systems and household sanitation solutions with water committee creation, capacity building and sector strengthening activities.
Norte Grande Water Infrastructure (P120211) and Second Norte Grande Water Infrastructure(P125151)	Chaco, Argentina	Provision of essential infrastructure (water and roads) to Indigenous communities in the Argentinian Chaco. Construction of a pipeline to serve isolated Indigenous communities.
Water and Sanitation Sector Modernization (P095235)	Chaco, Paraguay	Construction of water and sanitation systems for Indigenous communities in the Chaco region, primarily rainwater harvesting solutions. (part of the rural component)

Other interventions visited

Location	Agency	Comment
Nicaragua	KfW Development Bank	The funds were transferred to the Indigenous Territorial Government for implementation.
Bolivia - Altiplano	EMAGUA	Implemented Government funds to build community-level WSS systems. The team principally visited dry toilets schemes and wells or piped connections with household taps. EMAGUA relies on SENASBA for technical assistance to communities, including the establishment of water committees and any related training.
Bolivia – Altiplano	Adra	Adra is an NGO supporting communities in the construction, operation and maintenance of their own urine-diverting dry toilets, including the production of fertilizer from processed urine and composted feces. Elevated tanks are built with household piped connections. Community members are trained for operation and maintenance.
Bolivia - Cochabamba	Water for People	Water for People helps communities in the construction of their water and toilet systems and trains community members in operation and maintenance, including the establishment of water committees. The creation of municipal WSS units is a requirement for funds to be invested in a given municipality.

Interviews carried out during Country Visits

PARAGUAY. Those participating from SENASA in Asunción and in field visits were: Juan Pereira, Coordinator for Component 3 of WB Project; Sara Pérez, Social Coordinator, IBRD Component 3; Angela Espinda, Coordinator Department Indigenous Affairs –DPPP. In meetings in Asunción: Ruth Rios, UCP-IDB Coordinator Indigenous Area; Nilce Benites, Social Specialist, SENASA-IBRD; Ma. Estela Cardozo, Social Specialist; Amador Ruvalo, Coordinator SENASA-IDB; Graciela Parini, Communications and Press.

Among other participants in meetings were: Jorge Aníbal Servín, President of the Instituto Paraguayo del Indígena (INDI) adscribed to the Presidency of the Republic; Lina Franco, Director INDI; Bernardo Enciso, Legal Advisor, INDI. Cynthia Rodríguez, Secretaría Técnica de Planificación del Desarrollo Económico Social (STP) coordinating the Program "Sembrando Oportunidades" which includes Indigenous communities. Bruno Morán, Director of Indigenous Affairs, SEN; Mónica Urbieta, Coordinator Unit of Habitats at Risk, Secretaría de Emergencia Nacional (SEN). Alvaro Carron, Public Works Coordinator, Secretariat of Public Works DAPSAN/MOPC. Ramón Zavala, Indentente, District Tnte. Irala Fernández, Dept Presidente Hayes; Rudolf Hildebrand, Coordinator Water and Sanitation, District of Filadelfia, Dept. Boquerón; Marcial Ramírez, Intendente District Loma Plata, Dept. Boquerón.

ARGENTINA. Those participating from Servicios de Agua y Mantenimiento Empresa Provincial del Estado (SAMEEP) were: Alejandro Salamon, Coordinador Ambiental y Social Proyecto Norte Grande; Claudia Hernández, Especialista Pueblos Indígenas Proyecto Norte Grande (Antropologist); Ricardo Requena, Chief of External Investments; Elana Mar, Integrante División Ambiental y Social; Emmanuel Fernández, SAMEEP, Chaco. José Braña (Social Specialist, Contractor) joined in the field.

Among other participants were: Ariel Araujo (Mocovi Traditional Authority), Executive Secretary of the Indigenous Parliament of El Chaco and SICOSUD (Trade Integration Zone between States and Provinces); Jesús Nocitiquí, Centro Mocoví Jalek, Parlamento de los Pueblos Indígenas del Chaco Americano; Juan Carlos Gómez, CPI Q'om; Saul Rodriguez, Comité de Prevención de la Tortura; Edigio García, Co-Presidente por Argentina, Parlamento Indígena Zicosur; Sergio Yépez, CPI del Pueblo Q'om; Eleazar García, Parlamento Indígena Zicosur; Pedro Suarez, Fundacion Nala Yalec; Ariel Peña, Coordinador General Fundación Mamaluz.

COLOMBIA. Those participating from the Plan Departamental de Agua (PDA) were: Elsa Iguarán, and from the firm Ecoadministrar: 10 staff including Financial Administrators, Social Specialists, Sociologist, Zootechnician, Civil and Industrial Engineers.

Among other participants were: from the Secretariat of Indigenous Affairs under Gobernación - Rosa Valdeblanquez (Secretary of Indigenous Affairs), Alexander Castillo (advisor), Yorvis Jaramillo (External Advisor); from Fundación Cerrejón - Raúl Roys (Director) and 2 staff; from the Asociación Wayúu Araurayu - María del Tránsito Iguarán (Coordinadora Emisora Ecos de la Makuira); Francisca Iguarán (Coordinadora SEIP). The mission also visited the Wayúu community of Kasiche with the NGO AGUAYUDA.

NICARAGUA. Those participating from FISE were: Neftalí Toruño Ibarra, Director of DODL-FISE and Joxan Leoro, AMU-FISE (central FISE); for the first meeting: Alejandra Martínez (Planning), John Matamoros (Executive President), Guillermo Zelaya (Institutional Development); Amanda Flores (Operations), Pedro García (Procurement) and Ronald Palacios (Financial Management). William Rodríguez, RACCN-FISE Delegate, joined the field visits.

Among other participants were: Ramón Canales, Director Coordinador of the Caribbean Coast Secretariat; Carlos Alemán, Regional Governor Coordinador; Waldo Muller, Territorial Governor of Tasbapri; Héctor Rodríguez, Technical Coordinator GRACCN and Isabel Henríquez, Community Ethnic Issues GRACCN.

PANAMA. Those participating from DISAPAS were: Marisín Reyes, Luz Sánchez (social staff); Alexis Vergara, Iván Hernández, Ricardo Raimores (technical staff); Ricardo Chong, Regional Director Colón and from IDAAN: Ricardo Ponce (Director IDAAN-Colon), Sandra Góndola (Social Specialist IDAAN-Colon) and Dora Paredes (Head of Social Team at IDAAN).

Among other participants were: Irene Gallego, Vice-Minister for Indigenous Issues; Doris Bill (ECMIA); representatives from the Mesa Nacional Indígena de Panamá; Inaki DE FRANCISCO (Foro Indigena Abya Yala); Dr. Elda Velarde (Director for Indigenous Issues, MINSA); Arnoldo Bonilla, General Secretary of the Congreso Guna Yala; Atencio López, President IDKY; Yolany Ríos, IDKY; Javier Grau Benaiges, IADB; Alexis Aguilar (Changuinola).

PERU. Those participating from MVCS were: Francisco Dumler, Viceministro de VMCS; Victor Sevilla, Executive Director MVCS-PNSR; María del Pilar Acha, MVCS-DGPRCS; Alejandro Pintado (Especialista Gestión Municipal PNSR-UCAS); Flor López (Especialista Social en Monitoreo de proyectos (PNSR-UCAS); Maria Figueroa (Esp. Social Senior (PNSR-UCAS); Alvaro Romero (Social Specialist, nurse, PNSR); Isabel Zuluaga (Coordinator PNSR Bagua Grande).

Among other participants were: Patricia Balbuena, Viceministra de Interculturalidad; Ana Quijona,

Coordinadora General MIDIS-FED; Percy Minayo, Viceministro de Salud; Diana Prudencio, Directora General MIDIS-DGPE; Rosa Meza, Vice-Ministerio de Construcción y Sostenibilidad; Tarcila Zúñiga, President of Indigenous Women of Latin America (CHIRAPAQ); Porfirio Vargas, Representative of UNCA; Ketty López, Vice-president of ONAMIAP; and Alex Abramonte, Specialist of CONAP; Diana Prudencio, Directora General MIDIS-DGPE; Domingo Arzubialde, Coordinador General FONIE-MIDIS; Sylvia Huari, Especialista Agua y Saneamiento, FONIE-MIDIS; Guillermo Leon, Consultor en Agua y Saneamiento, MIDIS; Celeste Cambria, Coordinadora, MIDIS; Alvaro Galvez, Director de Políticas Indígenas of MINCU; Lorena Prieto, Directora de Pueblos en Aislamiento y contacto inicial; Juan Reategui, Especialista DIN;

BOLIVIA. Those participating from the Vice-Ministry for Potable Water and Sanitation were: Enrique Torrico Vargas (Norms and Regulations).

Among other participants were: Gonzalo Vargas, Viceministerio de Justicia Indígena Originario Campesino; Pablo Callisaya, Dirección General de Gestión Integral de Residuos Sólidos; Gregorio Choque, representative of CONAMAQ; Water Program Implementation Units of PASAR (UE), UE (CAF) and UE-BID; representatives from Water for People; representatives from Adra; EMAGUA; FPS; SENASBA.

Annex 10. Toolkit Methodology

Selection of the Communities

The World Bank Team ("the Team") created broad profiles of the characteristics of the Indigenous population in eleven LAC countries[79] and conducted an initial set of interviews with relevant stakeholders to determine the fieldwork locations. For the field visits, the Team selected the seven countries and their respective communities based on the presence of an ongoing or recently closed intervention in each country's Indigenous territories, whether the intervention included noteworthy implementation arrangements or methodologies, and recommendations from stakeholders, including Indigenous contacts through the Foro Indigena Abya Yala and other Indigenous partners. The Team also aimed to include a range of unique socio-cultural and geographical contexts to ensure the widespread applicability of the Toolkit.

On-the-Ground Research Approach

The Team conducted field visits to 37 Indigenous communities in the selected countries in which Indigenous communities and their respective WSS governance structures presented their WSS systems and shared their experiences, O&M practices and, when applicable, governance tools essential to their success and sustainability. The Team focused the majority of its research efforts on field visits to ensure that the Toolkit included lessons learned and good practices based on actual interventions. The findings and recommendations from the fieldwork, however, also build on a desk review and several interviews with WSS and Indigenous peoples experts as well as Indigenous stakeholders outside of the countries chosen for the field visits.

Application of the Lessons Learned and Toolkit Limitations

This Toolkit was developed to assist WSS practitioners tasked with the development and implementation of WSS projects in Indigenous territories. The richness of the on-the-ground investigation and the resulting lessons derived at both the policy and operational level can, however, benefit a broader audience. The Toolkit's ultimate objective is to promote improved collaboration between Indigenous organizations and WSS institutions in order to ensure that Indigenous communities have access to good quality, sustainable WSS services.

The Team originally envisioned analyzing WSS operations in Indigenous and Afro-descendants communities, but initial fieldwork revealed that for the most part, the realities faced by these two groups were too disparate to encompass in a single Toolkit. The Team encountered several Afro-descendant groups with similar characteristics to Indigenous peoples and decided to include those groups in the study. These Afro-descendant communities had the following characteristics: (a) the community looked up to traditional authorities (regional or local) for approval; (b) traditional, customary organizations existed and were respected; (c) the community often spoke an autochthonous language or had strong traditional cultural traits; and (d) the community faced historical legacies of discrimination and exclusion based on race/ethnicity.

The majority of the key findings from the field visits were consistent despite the communities' diverse geographical and cultural contexts. The Team determined which key findings, lessons and good practices to include in this Toolkit based on their value for future WSS interventions[80] with Indigenous peoples.

79 The countries considered for this initial round were: Argentina, Bolivia, Brazil, Colombia, Ecuador, Honduras, Mexico, Nicaragua, Panama, Paraguay and Peru. From this list, seven countries were selected for field visits: Panama, Nicaragua, Paraguay, Argentina, Peru, Colombia and Bolivia.

80 The Toolkit applies to both water and sanitation services. Where specificities apply to either water or sanitation, they are flagged in the document.

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