



A SHARED VISION OF WATER IN
IBERO-AMERICA:
20 YEARS OF THE CONFERENCE OF
IBERO-AMERICAN WATER DIRECTORS



A shared vision of water in Ibero-America: 20 years of the Conference of Ibero-American Water Directors.

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 **FCAS** Fondo de Cooperación para Agua y Saneamiento



Gathered at the X Ibero-American Summit, held in Panama in November 2000, the Heads of State and Government agreed to hold the First Forum of Ministers of the Environment, which took place in La Toja (Pontevedra, Spain) in September 2001.

This Forum agreed to establish the Conference of Ibero-American Water Directors (CODIA) as a technical instrument to support the Forum on water issues.

Today, after two decades of activity and since its consolidation as the main platform for technical-political dialogue on water issues in Ibero-America, CODIA celebrates its progress and looks to the future, aware of the achievements made and the challenges that remain ahead.



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“If there is magic on this planet, it is contained in a drop of water”

Loran Eisely
Anthropologist

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Prologue



Andrés Allamand,
Ibero-American General Secretariat

A wide range of studies - including those of the United Nations Intergovernmental Panel on Climate Change - agree on the high vulnerability of Ibero-America to climate change. With each passing year, the effects of this reality are becoming increasingly evident on both sides of the Atlantic. In Latin America, Andean glaciers have lost 30% of their reserves over the last 50 years while historic droughts are affecting glaciers from the Southern Cone to Central America. Meanwhile, the Iberian Peninsula faces unprecedentedly low water reserves and desertification threatens an increasing portion of its territory.

Fortunately, the pioneering vision emanating from the First Ibero-American Forum of Ministers of Environment, held in 2001 in Spain, allows us to face these challenges with an established and long-standing Ibero-American institutional framework. At the meeting, the ministers recognised the importance of integrated water resources management for sustainable development and the potential of networking and Ibero-American cooperation to address the water problem. Because of this reflection, the creation of the Conference of Ibero-American Water Directors (CODIA) was mandated.

Since then, the Conference has established itself as a platform for knowledge generation, reflection and exchange between Ibero-American institutions with competence in water management. In addition, this has been done by embodying the principles that characterise the actions of the Ibero-American Community: in a horizontal environment of trust, consensus and cooperation.

Over the last twenty years, CODIA has contributed to the training of thousands of professionals in water use and sanitation. Moreover, the Conference has supported different countries in their legislative restructuring processes, contributed to the planned management of groundwater, collaborated in the design of strategies to face prolonged drought scenarios and played a fundamental role in monitoring the region's progress in achieving Sustainable Development Goal 6, guaranteeing the availability of water and its sustainable management and sanitation for all.

The twentieth anniversary of the Conference is a cause for celebration and pride in its achievements over the past two decades, but it is also an opportunity to reflect on the role it should play in the future of our region.

The future will be marked by adverse climatic events, which will intensify the need to coordinate responses, exchange experiences, share knowledge and closely monitor water resources management. In other words, a future in which the work of this institution will become increasingly necessary.

Aware of this situation and of the importance that the adequate management of water resources will have for the development of the region, at the XI Ibero-American Conference of Ministers of the Environment, the countries of the Ibero-American Community identified the issues associated with the water cycle as strategic and instructed the strengthening of CODIA.

It is in this context that we are heading to two very important multilateral events on this matter: the XVIII Ibero-American Summit of Heads of State and Government in the Dominican Republic and the United Nations Water Conference. In the run-up to the Summit, the Ibero-American Community has started drafting an Ibero-American Environmental Charter, in which the issue of water is set to take centre stage. On the other hand, the UN Conference is an opportunity to highlight and

share CODIA's achievements with the rest of the international community, as well as to present the region's own visions and concerns, which have been coordinated and systematised thanks to the work of this organisation.

Time is ticking. Ibero-America is determined to recover from the biggest multidimensional crisis of our recent history by building fairer, more inclusive and sustainable societies. However, we know that we cannot talk about development and sustainable societies without talking about water. This is why we at SEGIB are committed to the work carried out by CODIA and will continue to support it in its mission, with a view to publicising its achievements, promoting its agreements and positioning its priorities at the highest level.



Message from The Presidency



Ing. Olmedo Caba Romano

Executive Director of the INDRHI

Dominican Republic

Pro Tempore Chairperson of CODIA

The Presidency enthusiastically celebrates CODIA's 20th anniversary, a commemoration that is full of achievements that have enriched water management in Ibero-America. The spirit of collaboration based on a common idea of what we are and what we offer as a region provides the certainty that sharing experiences and knowledge, making alliances and building an institutional framework contributes to promoting the development of our territories and population.

In looking at what has been achieved, we must recognise that the progress we have made has consolidated our identity as a unique network of this nature, with water managers from a large region, united in pursuit of capacity building. The sustainability of the actions promoted from this conference and their level of articulation with regional organisations and actors are in essence one of our main achievements. We can now present products that are the result of long days of hard work and commitment.

We are aware of the challenges we face in sustainable water resources management in the Ibero-American region and of the com-

mitment, we have made to water and the achievement of SDG6. I am confident that together we will achieve all that we set out to achieve.

We are confident that we work for the most important thing our region has, its people. We provide and manage water for all, we provide a future in which our people can meet their water needs and make productive use of water while being aware that water is a finite and vulnerable resource, but also a human right.

A common idea of who we are

WATER MANAGEMENT. A SHARED CONCERN FOR THE LAST 20 YEARS

The Conference of Ibero-American Water Directors (CODIA) was created in response to the mandate of the first Ibero-American Forum of Ministers of the Environment, held in Spain in 2001, which agreed on the creation of an organisation in which the main players responsible for water management in the Ibero-American region would participate. This provided the Forum of Ministers with an instrument of technical support in the search for solutions to the challenges of water management through regional cooperation.

With this decision, the Ibero-American community was ahead of its time when water had not yet acquired the relevance in many countries that it now has worldwide. The Ibero-American Forum of Ministers of Environment acknowledged that water management is essential for sustainable development of countries, and recognised that the Ibero-American space and spirit, characterised by horizontal cooperation based on capacity building and experience exchanging among equals, is favourable for carrying out regional cooperation processes, given that despite the heterogeneity of countries, they all share common features that facilitate the transfer of experiences and technologies.

Thus, it became increasingly clear that water issues required a more cooperative approach, mainly due to two essential arguments: the consideration of water as an environmental asset -which implies that challenges derived

from its management must be considered on a regional scale-, and its treatment as a social asset, that is, its consideration as an element to which all people have the right to access in sufficient quantity and adequate quality in order to meet their needs, in addition to its sustainable use for the functioning of ecosystems and economic activities.

Therefore, it was agreed to initiate a path for the implementation of joint action programmes that would systematically generate responses and solutions to the problems related to the availability of water resources and the protection of the quality of its associated ecosystems.

Under these premises, CODIA was conceived as a structure capable of coordinating relevant actions in the field of water and of seeking the transfer of knowledge and experience in accordance with the social needs identified by each of the member countries. All of this was discussed and agreed upon in a forum at which member countries could not only present and share experiences, but also receive the necessary training to enable them to address their water-related challenges.



I CODIA, Colombia, 2001

IBERO-AMERICAN COOPERATION

Ibero-American General Secretariat (SEGIB)

Since the first Ibero-American Summit of Heads of State and Government, held in Guadalajara, Mexico, in 1991, the Ibero-American scenario was conceived as a meeting place to seek solutions to the challenges faced by the countries and to turn the set of historical and cultural affinities that unite us into a tool for unity and development based on dialogue, cooperation and solidarity.

Thus, 30 years after that expression of political will, there is no other example of inter-governmental network cooperation in the world like the one organised and sustained by the Ibero-American Conference. A multi-level, multi-actor and multi-dimensional system which breaks the traditional “donor-recipient” paradigm, and which manages to influence the improvement of public policies, the generation of knowledge, the positioning of issues on the political agenda and the generation of alliances.

The countries that make up the Ibero-American space are Andorra, Argentina, Bolivia,

Brazil, Chile, Colombia, Costa Rica, Cuba, Ecuador, El Salvador, Spain, Guatemala, Honduras, Mexico, Nicaragua, Panama, Paraguay, Peru, Portugal, Dominican Republic, Uruguay and Venezuela.





El Atazar Dam and reservoir. Community of Madrid, Spain.

A REGIONAL PLATFORM FOR COOPERATION AND POLITICAL DIALOGUE

CODIA is therefore a structure capable of coordinating actions in the field of water that may be considered relevant within its territorial scale of action, and seeks to tune and connect the capacities for the creation, absorption and transfer of knowledge in accordance with the social, economic and environmental needs identified by each of the member countries, which are specified in the form of demands and opportunities, through mechanisms for the social management of knowledge, which are participatory and plural and based on criteria of viability and social relevance.

As a network registered in the Ibero-American Network Registry of the Ibero-American General Secretariat (SEGIB) since 2018¹, its main purpose is to promote good water governance as a means to advance in the sustainable management of this essential resource, being the main regional platform for political dialogue

and technical collaboration in the field of water resources management in the 22 countries that make up Ibero-America.

The Spanish Agency for International Development Cooperation (AECID), through the INTERCOONECTA Programme (formerly PIFTE - Ibero-American Specialised Technical Training Programme), has contributed significantly to the promotion and development of CODIA, promoting the strengthening and development of institutional capacities, public policy dialogue between counterparts and the creation of alliances in Ibero-America, through its network of Training Centres and contributing to the implementation of its work programme.

CODIA's first meeting was held in 2001 at the Spanish Cooperation Training Centre in Cartagena de Indias (Colombia). Since then, the Conference has met every year and has forged a close cooperation network that has adapted to the environmental and political context, taking water issues in Ibero-America from a technical level to the highest levels of decision-making and institutional cooperation.

At its meetings, CODIA encourages dialogue at various levels, between the General Directors

¹ Agreements XIX CODIA

of Water of the Ibero-American countries; between all of these directors and the institutions involved in the sector, whether development agencies, multilateral organisations or academic institutions and, in general, actors in the water resources sector that can contribute to progress and cooperation in Ibero-America.

CODIA'S VISION OF WATER IN IBERO-AMERICA

Water, being one of the environmental values of ecosystems, is a limited commodity and an essential element for human life and economic processes. The appropriate use of water resources is fundamental to sustainable development, and it is essential to find an appropriate territorial reference framework for proper management. The main mission that the countries have entrusted to CODIA is therefore to promote cooperation in the field of water resources in order to favour sustainable development and the social well-being of Ibero-American citizens, respecting the sovereignty of the peoples over their resources, strengthening the principles of equity and solidarity. With this, CODIA aspires to be recognised by society, organised communities, indigenous peoples, organisations and institutions as the Ibero-American reference in the field of water.

PRINCIPLES THAT UNITE US

The complexity of water systems requires proper water planning that takes into account the demand for water both for human settlements, food production and other economic sectors, as well as for the needs derived from the proper functioning of ecosystems. Resources management should be approached from the development of river basin plans considering a vision of integrated water resources management as a basic and necessary tool in water management.

One of the biggest problems our societies face is that of providing populations, both urban and rural, and indigenous peoples, with drinking water in sufficient quantity and quality, as well as adequate systems for the collection and treatment of wastewater, an objective that has

significant repercussions on ecosystems, health and human life.

However, river basins are increasingly vulnerable to extreme hydrological events. In particular, floods and droughts have become more frequent and their economic and social impacts have become increasingly severe. This situation may be aggravated in the immediate future as a consequence of climate change, so droughts and floods must be considered not as a crisis, but as one of the possible management scenarios and, consequently, the actions to be carried out in such circumstances must be planned.

Water is a natural resource that is essential for life and has an economic value. However, their sustainable use cannot rely on purely economic instruments alone, but must also take into account other mechanisms of use allocation, planning and public control through appropriate organisations. Participation of all stakeholders and raising public awareness on rational, efficient and equitable water use is essential for the sustainable development of water resources.



CODIA's principles are articulated based on the above, which must always be present as an underlying idea in any action that is carried out, which are as follows:

- 

Social equity, including the human right to water and sanitation, as well as to the development of economic activities.
- 

Cooperation among member countries and with other countries and organisations.
- 

Promoting **Hydrological Planning**.
- 

Promoting water as an instrument for peace among nations.
- 

Democratic and participatory water governance.
- 

Defending the concept of water security.
- 

Conserving the physical environment, with a focus on combating desertification.
- 

Promoting **Integrated Water Resources Management**.
- 

Combating extreme events: droughts and floods.
- 

Water management in **transboundary basins**, with criteria of sustainability in the use of the resource.
- 

Commitment to the Sustainable Development Goals.
- 

Increasing the availability of environmentally compatible water resources.
- 

Defending the **river basin as a planning and management unit**.
- 

Promoting access to safe drinking water and sanitation as an **essential human right**.
- 

Strong institutions as the key to the sustainability of the system.



XIV CODIA, Spain and Portugal, 2013

VALUES TO BELIEVE IN

Following these principles, any action carried out by CODIA must also be based on a series of values that must be present in all lines of action. These are essential values for the proper development of the water policy of the member countries, such as:

- Solidarity. The integration of water resources into other sectoral policies is a priority.
- The participatory approach. The aim is to seek social consensus through public participation and therefore the means must be provided for this participation to be as broad as possible and to cover the greatest possible number of aspects related to water management.
- Promoting gender equality. Advocating the participation of men and women in water resources management and strengthening the role of women in water management.
- Promoting inter-regional and institutional cooperation that facilitates cooperation among CODIA countries as a way to ensure equitable and sustainable water resources management.
- Protecting water resources to ensure human and ecosystem health by intensifying wastewater treatment, orderly land use management and combating desertification.
- Sustainable resources management to ensure supply in quantity and quality to all sectors while ensuring the protection of ecosystems, including the promotion of non-conventional resources, in particular reuse and desalination.
- Institutional strengthening, given that the achievement of water objectives is determined by the improvement of the capacity of public administrations to regulate and manage environmental policies.

- Education to instil in all people respect for water as a limited, vulnerable and valuable resource for which there is no substitute.

OBJECTIVES TO PROGRESS

Governments have the responsibility to develop water resources management policies and ensure access to water and sanitation. The development of these policies requires the implementation of legal, institutional, cooperative and participatory frameworks for the resolution of problems related to the availability of water resources, the protection of their quality

and that of associated ecosystems. Their effective implementation must take into account local realities. Current institutional cooperation processes in the field of water are characterised by an emphasis on available data and ease of access to it, in order to provide effective multidisciplinary analysis. It is also necessary to translate public policies into actions that take into account the constraints arising from their implementation, such as budgetary or human resources restrictions. Therefore, the level of Water Directors, whose role lies between politics and technical management in public administration, provides the added value of confronting major political principles.





PARTNERS AND ALLIES THAT SUPPORT US

In addition to the support of the Ibero-American General Secretariat (SEGIB), the Spanish Agency for International Development Cooperation (AECID) and the Intergovernmental Hydrological Programme (IHP) of UNESCO, CODIA works in collaboration with strategic partners and allies in the field of water at regional and international level, such as the Organisation of American States (OAS), the Secretariat of the Water Convention of the United Nations Economic Commission for Europe (UNECE), the Economic Commission for Latin America and the Caribbean (ECLAC), the United Nations Environment Programme (UNEP), the Organisation for Economic Co-operation and Development (OECD), the Centre for Public Works Studies and Experimentation (CEDEX), the International and Ibero-American

Foundation for Public Administration and Policy (FIIAPP), as well as the Development Bank of Latin America (CAF) and the Inter-American Development Bank (IDB), among others.

CODIA also maintains a close alliance with other regional networks under the auspices of SEGIB, such as the Conference of Directors of the Ibero-American Meteorological Services (CIMHET) and the Ibero-American Network of Climate Change Offices (RIOCC), with which it works on all issues related to water and climate change. The Spanish Ministry for the Ecological Transition and the Demographic Challenge hosts the Secretariats of these networks, as well as the Permanent Technical Secretariat of CODIA itself, located in its Directorate General for Water.

BUILDING ALLIANCES AND NETWORKS TO SUPPORT SDG 6





IV InterCODIA. Costa Rica, 2019



WORKING FROM YEAR TO YEAR: HOW WE WORK

The 22 members that make up the Ibero-American space of CODIA hold their meetings once a year. The CODIA meeting is held in the country that volunteers to host it. This country coincides with the country that holds the pro-Tempore Secretariat and hosts the Ibero-American Summit of Heads of State and Government² in the years in which this event takes place.

From 2015 onwards, due to the increase in the number of issues to be addressed and the momentum that the water agenda is gaining in the region, it was decided to organise intermediate preparatory meetings, called InterCODIA, in which the issues to be addressed at the annual meeting of the Conference are presented and worked on. In total, 5 InterCODIA meetings and 23 CODIA meetings have been held to date, which gives an idea of the large amount of input and knowledge products generated on water issues.

² This decision was made when CODIA joined the SEGIB's Ibero-American Network Registry in 2018.

- 
- I CODIA (Colombia, 10th – 12th July 2001)
 - II CODIA (Chile, 27th – 28th June 2002)
 - III CODIA (Mexico, 24th and 25th September 2003)
 - IV CODIA (Dominican Republic, 29th January – 1st February 2004)
 - V CODIA (Colombia, 2005)
 - VI CODIA (Costa Rica, 23rd and 24th February 2006)
 - VII CODIA (Guatemala, 18th – 20th April 2007)
 - VIII CODIA (Peru, 11th and 12th December 2007)
 - IX CODIA (Spain, 19th and 20th June 2008)
 - X CODIA (Spain, 30th June and 1st July 2009)
 - XI CODIA (Mexico, 3rd – 5th August 2010)
 - XII CODIA (Argentina, October - November 2001)
 - XIII CODIA (Brazil, 20th – 23rd November 2012)
 - XIV CODIA (Spain-Portugal, 1st – 4th October 2013)
 - XV CODIA (Panama, 18th – 21st November 2014)
 - XVI CODIA (Bolivia, 30th November – 4th December 2015)
 - I Inter CODIA (Mexico, 2016)
 - XVII CODIA (Mexico, 5th – 7th October 2016)
 - II Inter CODIA (Colombia, 27th – 29th June 2017)
 - XVIII CODIA (Uruguay, 3rd – 6th October 2017)
 - III Inter CODIA (Brazil, 18th and 19th March 2018)
 - XIX CODIA (Guatemala, 5th – 8th November 2018)
 - IV Inter CODIA (Costa Rica, 31st March and 1st April 2019)
 - XX CODIA (Dominican Republic, 4th - 7th November 2019)
 - XXI CODIA (Andorra, 25th June 2020)
 - XXII CODIA (Virtual, 3rd - 5th November 2021)
 - V Inter CODIA (Colombia, 27th - 29th July 2022)

XIII CODIA (Dominican Republic, 26th - 28th October 2022)

CODIA's structure is set out in its Rules of Procedure and is defined around two bodies: the Permanent Technical Secretariat and the Technical Support Panel.

- Permanent Technical Secretariat: exercised by Spain, it is based in MITECO's Directorate General for Water and is responsible, among other things, for developing and promoting channels of communication between member countries, representing CODIA in international forums, preparing work and proposals for presentation to CODIA and organising and coordinating, in coordination with member countries, the Ibero-American Water Training Programme.
- Technical Support Panel: made up of technicians appointed by the Water Directors, it is responsible for collaborating with the Permanent Technical Secretariat in the technical tasks to be dealt with at each meeting.

CODIA's activity is structured around an operational plan, which currently consists

of three documents that must be reviewed at each meeting, and renewed by agreement among all its members once their term has expired:

- Work programme: includes an exhaustive list of all the lines of work to be addressed, including a specific section for the Ibero-American Training Programme.
- Agreements: agreements are reached at each CODIA meeting, which remain in force until the next CODIA meeting is held.
- Economic report: document accounting for the income and expenditure incurred by CODIA's activities.

These documents are valid for as long as the countries agree to them.



I CODIA, Colombia, 2001



Taller de calidad de las aguas. II InterCODIA, Colombia, 2017

FROM INTENT TO ACTION: WHAT WE DO

CAPACITY BUILDING AND KNOWLEDGE PRODUCTS

Cooperation between stakeholders is essential in order to achieve water security and ensure access to water and sanitation. As a shared and cross-cutting resource, water requires strong international cooperation, which needs to be fostered and strengthened. In line with this consensus, CODIA seeks to strengthen national public policies through the promotion of a regional dialogue that can put the main lines of action in the field of water on the political agenda, with capacity building being one of the main tools for the construction of this regional dialogue.

CODIA's Ibero-American Training Programme (ITP) is a major player in the development of water capacities in Ibero-America, thanks mainly to the collaboration of entities such as the Cooperation Fund for Water and Sanitation (FCAS) of the Spanish Agency for International Development Cooperation (AECID), UNESCO's Intergovernmental Hydrological Programme

(IHP), the Latin American Network of Centres of Excellence in Water Management (RALCEA), the Inter-American Development Bank (IDB), the Latin American Development Bank (CAF), the training platform of the National Water Agency (ANA) of Brazil, and the Regional Centre for Water Management in Latin America and the Caribbean (CeReGAS), among others.

This programme began in 2008, when it was definitively approved at the XVIII Ibero-American Summit of Heads of State and Government held in San Salvador (El Salvador) in 2008. The INTERCOONECTA programme contributed the values and effectiveness of public peer-to-peer training, which was already being developed, and favours the management and organisation of various activities of the ITP, both in the Training Centres and in its virtual classroom. AECID's INTERCOONECTA programme (previously called PIFTE) contributed significantly to the gestation of the ITP, organising several training activities in which CODIA was supported in its early stages.



The ITP is structured around the 3 thematic axes under which its activities are currently structured:

- (1) water security and extreme events,
- (2) integrated water resources planning and management and
- (3) supply and sanitation





Segarra- Garrigues Canal (Lleida, Spain)

CODIA Products aim to manage the knowledge generated in the many activities undertaken by CODIA, and are intended to reinforce and disseminate this knowledge. These may be booklets produced from training courses and workshops, reports generated from Technical Dialogues or High-Level Seminars, or publications written on a specific topic by experts in the field.

The result of all this activity is an important archive of knowledge products that is openly available to the general public through the CODIA website (<https://codia.info/>), and which is constantly being updated, renewed and adapted to new problems or approaches in the field of water, trying to ensure the quality of the content and innovation in the topics.

WORK IN SUPPORT OF SDG 6 AND THE 2030 AGENDA

Since September 2015, when the 193 member countries of the UN adopted the 2030 Agenda, which establishes the Sustainable Development Goals (SDGs), and given the consideration of water as a backbone and pillar of the fulfilment of this agenda, CODIA has undertaken to promote and encourage the necessary discussions and actions around the various targets of SDG 6, which aims to Ensure availability and sustainable management of water and sanitation for all by 2030, in order to advance its implementation in the region. By virtue of the foregoing, the aim is to align its work programme with the main topics of debate on the international water agenda and, in particular, with the drive to ensure that public policies on water in the Ibero-American space contribute to achieving the goals of the 2030 Agenda, especially SDG6. In addition, CODIA addresses the relationship with the main goals related to energy (SDG7), food (SDG2) and ecosystems (SDG15). All this without losing sight of the impact of climate change on water resources, both through variations in their availability in space and time, and through the exacerbation of extreme events (SDG13).

Specifically, the monitoring of SDG6 is an essential line of work for CODIA, articulated through the Programme for the strengthening of public policies by monitoring and analysing SDG6 indicators. The development of this programme is materialised in the elaboration of in-depth studies on the situation of the SDG 6 indicators in the region, for which the custodian bodies, international experts in the field and the countries' own inputs in events such as Technical Dialogues or High-Level Seminars are used, all of which finally lead to publications on each SDG 6 goal.

In the publication "Ensuring water availability, sustainable water management and sanitation for all. Implementation of public policies in Latin America and the Caribbean (UNESCO - CODIA, 2019)"³, a major literature and information gathering and systematisation exercise was carried out in each member state, presenting the state of the debate on the implementation of SDG6 in the region, the level of awareness in government, ma-

³ <https://unesdoc.unesco.org/ark:/48223/pf0000370289>

nagement bodies and the community as a whole of the main challenges of achieving the 17 SDGs and in particular SDG6. One of its main conclusions was the proposal to create

an observatory to monitor the SDGs, of which CODIA has picked up the gauntlet for the monitoring of SDG 6.

2030 Agenda and SDG 6

In September 2015, more than 150 heads of state and government at the United Nations (UN) Sustainable Development Summit adopted the 2030 Agenda, which includes a group of 17 social, economic and environmental goals for the next 15 years that will be universally applicable as of 1st January 2016. These are known as the Sustainable Development Goals (SDGs), which aim to achieve a sustainable world by 2030.

Among these goals, SDG 6 aims to ensure the availability and sustainable management of water and sanitation for all.

SDG 6 is structured into a series of targets to be achieved by 2030:

- 6.1. Access to drinking water.
- 6.2. Access to sanitation and hygiene.
- 6.3. Improve water quality, reduce contamination.
- 6.4. Efficient use of water resources.
- 6.5. Integrated water resources management, including transboundary management.
- 6.6. Protection of water-related ecosystems.
 - 6.a. Expand international cooperation.
 - 6.b. Participation of local communities.



XIV CODIA. Spain and Portugal, 2013

WORK IN SANITATION AND DEPURATION

Sanitation and water treatment is one of the main thematic areas that CODIA has addressed since its foundation through courses, seminars on water quality and sectoral programmes on this topic in the region. Specifically, it is worth highlighting the holding of the Technical Dialogues on “The integration of sectoral planning on wastewater treatment for the achievement of SDG6”⁴ (XIX CODIA; Guatemala, 2018), where experiences on wastewater treatment were exchanged and the adoption of a Sanitation and Depuration Roadmap was proposed to drive concrete actions in the region, based on the general consensus of the countries regarding the need to develop wastewater treatment in a planned manner and aimed at achieving the creation of a sustainable service.

This consensus on the importance of wastewater treatment planning implies that infrastructure programming should be geared towards achieving pre-established objectives and, in particular, the requirements of water planning considering innovation and reuse as part of a circular economy. To this end, the development of these infrastructures must be accompanied by an adaptation of the institutional and regulatory framework, as well as the strengthening of operators’ capacities and their economic sustainability. The training of professionals at all levels and the stimulation of user demand are also fundamental aspects.

As a result of these reflections, CODIA defined a roadmap including approaches on the integration of sectoral planning on wastewater treatment to achieve SDG6, which is composed of 5 lines of action:

⁴Rapporteur Technical Dialogues IV InterCODIA





Quilotoa Lagoon, Ecuador

A look at our achievements

POLITICAL LEADERSHIP AND CODIA'S ROLE

Over the last 20 years, CODIA has experienced many ups and downs: successive changes in political leadership, new multidisciplinary approaches, the emergence of mobilising projects such as the 2030 Agenda, or the global emergency situation caused by the COVID-19 pandemic are just some of the situations to which it has had to adapt. This capacity for reinvention and evolution has strengthened CODIA as a regional water actor with a broad perspective and knowledge of the regional and international water reality, which is one of the fundamental bases of its current leadership position.

To achieve this position, CODIA has combined a clear institutional orientation with an unequivocal vocation to external projection. These two pillars have been based on two different but coordinated lines of action: on the one hand, the presence of CODIA in Ibero-American water policies has been strengthened through its role as a technical support body for the Ibero-American Conference of Ministers of the Environment; on the other hand, CODIA has become a forum of influence in international debates on water issues, an instrument that not only raises awareness of the singularities of Ibero-American countries, but also ensures that these singularities are taken into account when advancing in a coordinated manner in water resources management. All of this is intended to ensure that the Ibero-American vision, as far as water management is concerned, beco-

mes a point of reference to be taken into account in the international water agenda.

Reflecting this new international dimension, CODIA conveyed to the United Nations both its position in favour of the recognition of the human right to water and sanitation, which is enshrined in its own founding principles, and its support for the creation of a specific SDG on water and Sanitation. Furthermore, it is raising awareness of a vision of water management around the world based on the principles of social equity, democratic and participatory governance and is promoting integrated water resources management, considering the basin unit as the backbone of water resources management. In short, a vision committed to the Sustainable Development Goals, to the recognition of the human right to water and sanitation, as well as to the defence of water security and transboundary collaboration as a means for the peaceful resolution of conflicts associated with shared water management.

THE INCLUSION OF WATER IN IBERO-AMERICAN SUMMITS

Within the region, CODIA, as a network attached to the Ibero-American Network Registry of SEGIB, has worked to position water in the guidelines of the highest Ibero-American political level.

- XXV IBERO-AMERICAN SUMMIT, CARTAGENA DE INDIAS, COLOMBIA (2016)

In the Special Communication on Drinking Water and Sanitation approved at the XXV Ibero-American Summit of Heads of State



Workshop 3 NETWORKS, XIX CODIA, Guatemala, 2018

and Government⁵, under the theme of Youth, Entrepreneurship and Education, CODIA was recognised as a forum for the exchange of experiences for the strengthening of the capacities of the bodies responsible for the administration of water resources in the region and was entrusted with examining and proposing concrete measures to promote integrated water resources management based on national experiences.

- XXVI IBERO-AMERICAN SUMMIT, LA ANTIGUA, GUATEMALA (2018)

In the Special Communication on Drinking Water and Sanitation adopted at the Ibero-American Summit of Heads of State and Government, under the slogan *Inclusive, equitable, quality, lifelong education for all: ensuring sustainable prosperity in Ibero-America*⁶, CODIA was instructed to continue exchanging experiences between the countries in order to strengthen dialogue, consultation and cooperation on water resources. And it was decided to entrust the CODIA with the preparation of proposals to promote dialogue, consultation and cooperation on water resources.

⁵ Special Communication on Water and Sanitation (SEGIB).

⁶ Special Communication on the Rights to Safe Drinking Water and Sanitation. XXVI Ibero-American Summit of Heads of State and Government – SEGIB.

THE HUMAN RIGHT TO WATER AND SANITATION

On 28th July 2010, through Resolution 64/292, the United Nations General Assembly explicitly recognised the human right to water and sanitation, reaffirming that clean drinking water and adequate sanitation are essential for the realisation of all human rights.



- XXVII IBERO-AMERICAN SUMMIT, ANDORRA (2020)

Andorra's Action Programme, approved during the XXVII Ibero-American Summit of Heads of State and Government, under the slogan *Innovation for Sustainable Development - 2030 Goal. Ibero-America facing the challenge of coronavirus*⁷, raises the importance, with a view to the X Ibero-American Conference of Ministers of the Environment, of promoting the exchange of environmental information, cooperation and coordination of the Ibero-American networks RIOCC, CODIA, CIMHET so that their initiatives contribute to the Ibero-American Environmental Agenda (...). In addition, Ibero-American lines of action were to be defined to respond to the challenges of climate change and biodiversity loss with the support of the RIOCC, CODIA and CIMHET networks, and the Ibero-American Observatory for Sustainable Development of La Rábida.

The Summit also adopted two special statements:

- *Special Communication on Water for Life*⁸, which positions CODIA as the main technical instrument of the Ibero-American Conference on water (...) to advance towards a better integrated and sustainable management of water resources in the region, as well as to strengthen the broad dialogue and cooperation to guarantee water for life.

- *Special Communication on climate change and the environment*⁹, highlighting the role of CODIA, along with other networks, in (...) contributing to the search for joint solutions to environmental challenges and to the promotion of sustainable, inclusive and innovative models of economic and social development, in the face of the current multidimensional crisis caused by the COVID-19 pandemic.

- IBERO-AMERICAN ENVIRONMENTAL WEEK (2021)

The Ibero-American Environmental Week was the result of the renewed commitment of Ibero-American Heads of State and Government to addressing environmental crises and involved the organisation of nearly 30 virtual sessions, in which more than 150 representatives of governments, cities, companies, foundations, networks and other institutions committed to the environment in the region. CODIA, along with AECID, were responsible for organising the water resources axis¹⁰. In addition, a high-level meeting of the three networks - CIMHET, CODIA and RIOCC - was held to highlight the main milestones to date, the priorities and challenges for the future, as well as the commitment

⁷ Action Program XXVII Ibero-American Summit of Heads of State and Government (SEGIB).

⁸ Special Communication on Water and Life, XXVII Ibero-American Summit of Heads of State and Government.

⁹ Special Communication on Climate Change and the Environment, XXVII Ibero-American Summit of Heads of State and Government.

¹⁰ Conclusions Ibero-American Environmental Week, September 2021.





Landscape of a lake in the mountains Portillo Mendoza

of the work of the three networks in the construction of the Ibero-American environmental agenda, which concluded with the signing of a Declaration¹¹.

- IBERO-AMERICAN CONFERENCE OF MINISTERS OF THE ENVIRONMENT (2022)

This Conference concluded with a Declaration¹² in which it was agreed to strengthen the exchange of environmental information, cooperation and coordination of Ibero-American networks (...), so that their initiatives contribute to the Ibero-American Environmental Agenda (...). In addition, a Charter of Commitment was proposed to focus on the agenda items of the countries taking part in this Ibero-American Conference, including environmental education, energy transition, circular economy, ocean conservation and carbon neutrality, among others.

THE THREE IBERO-AMERICAN NETWORKS

The Ibero-American Community has managed to take advantage of its potential for collective work and inter-institutional collaboration and currently has three consolidated environmental cooperation networks, with almost 20 years of experience, which are international benchmarks in the fields of water,

meteorology and climate change: the Conference of Directors of Ibero-American Meteorological and Hydrological Services (CIMHET), the Conference of Ibero-American Water Directors (CODIA) and the Ibero-American Network of Climate Change Offices (RIOCC).

The joint action of these three networks is inspired by their declaration on 23rd September 2021, according to which the networks endorse the conclusions and scientific evidence provided by IPCC Panel I in its Report on the Physical Basis of Climate Change, which warns of unprecedented and irreversible changes in the global climate system and clearly confirms the human influence on global warming. A fundamental part of this declaration is the commitment to cooperate in the elaboration of the Ibero-American Environmental Agenda, adopted at the X Ibero-American Conference of Ministers of the Environment, by generating inputs on water and climate change, reiterating the importance of continuing to strengthen regional cooperation, the exchange of experiences and support actions in the areas of meteorology, climate change and water.

This commitment is reflected in the actions taken by the networks, which have strengthened the presence of water on the climate change adaptation agenda. This work has also served as an institutional platform to leverage EU development cooperation funds to improve climate change adaptation strategies in the field of water resources management in Ibero-America. Specifically, the work carried out is articulated in a series

¹¹ Declaration of the Meeting of three Networks, Ibero-American Environmental Week, September 2021.

¹² Declaration of the XI Ibero-American Conference of Ministers of the Environment (SEGIB).



High-Level Seminar “Water and post-COVID recovery”, V InterCODIA. Colombia 2022

of lines of action agreed at the sessions of the Inter-sectoral Workshop for the prevention and management of extreme hydro meteorological phenomena and measures for adaptation to climate change held during the XIX CODIA, which are broadly as follows¹³:

- I. Generation of regional climate scenarios for Central America and the Caribbean.
- II. Design and implementation of a Virtual Regional Centre for prediction and monitoring of extreme hydro-meteorological events for Central America and the Caribbean.
- III. Generation of a regional framework for the development of tools to assess the impacts of climate change on water resources according to regional climate scenarios and projections.
- IV. Development of a regional capacity building plan for integrating adaptation into risk management.

In order to ground these issues, two training sessions (2021 and 2022) were held on the “Impact of Climate Change on Water Resources”, which aimed to illustrate the process to

be carried out to assess the impact of climate change on water resources, using modelling tools.

CODIA AS A PLATFORM FOR REGIONAL ACHIEVEMENTS

Since its inception, CODIA has facilitated understanding among countries and between countries and institutions, sharing approaches and experiences and creating synergies that contribute to long-term sustainability of water and sanitation services, progress in sound water resources management and improved water governance.

One of CODIA’s mandated objectives is to strengthen the elements of political dialogue and regional integration in the promotion of good water governance through the organisation of annual dialogues on different aspects of the water cycle.

¹³ Conclusions of the Intersectoral Workshop for the prevention and management of extreme hydro meteorological events and climate change adaptation measures.

The partnership with UNESCO's Intergovernmental Hydrological Programme has led to the creation of a mechanism for contributing to a Trust Fund for the development of the CODIA work programme, which facilitates the organisation of training activities and regional dialogue, as well as the implementation of the project "Enhanced capacity building and governance for the sustainable management of freshwater (Latin America and the Caribbean)".

EXCHANGE OF EXPERIENCES. "PEER TO PEER" PROJECTS

One of the most effective means to strengthen the capacities of managers is to promote the exchange of experiences in water governance and integrated water resources management. Triangular cooperation with Spain and the CAF led to the "peer to peer" project, through which dam safety experts from the Bolivian and Spanish administrations were able to visit these countries and intensify the exchange of knowledge and collaboration between their administrations. This same experien-

ce was replicated between Argentina and Spain, also in the field of dam safety.

TECHNOLOGY TRANSFER

In 2019, the Regional Experimental Centre for Sanitation Technologies (CERTS), the first centre for research, technological development, training and dissemination of sustainable sanitation technologies, with a focus on systems suitable for small populations, was inaugurated in Uruguay. This centre is based on the Experimental Centre for New Water Technologies (CENTA) in Seville, Spain.

Daniel Greif, National Water Director of Uruguay, explained that *"it is not only important to generate knowledge from the academic sector, but also to be able to show the technologies, so that they can be visited and it becomes part of our culture to know what a sanitation system is, how it is operated, its advantages and risks, and that is what we are working on now."*

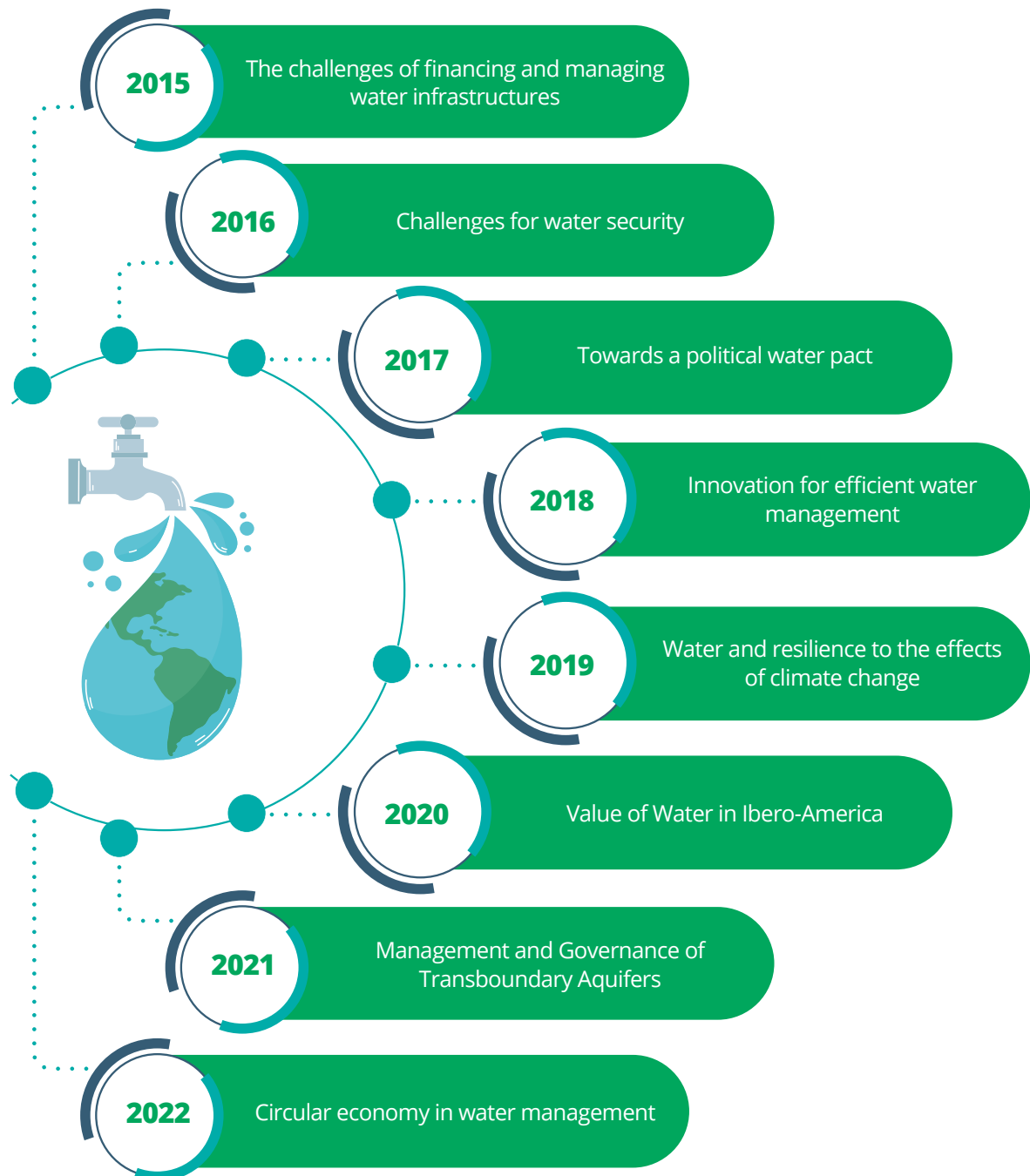


Water treatment plant (WTP). Bacía do Rio Grande (Brazil)

LATIN AMERICA – SPAIN WATER DIALOGUES

In 2015, a Memorandum of Understanding was signed between the Development Bank of Latin America (CAF) and Spain to promote development in the field of water resources management. Within this framework of

understanding, the so-called Latin America-Spain Water Dialogues have been held ever since: a space for thematic discussion organised annually with the aim of promoting the exchange of knowledge and experiences at the highest level between Latin America and Spain.



TECHNICAL SUPPORT TO COUNTRIES

The CODIA environment provides an added value by strengthening ties between member countries, thus relationships and twinning arrangements have been initiated in which the Cooperation Fund for Water and Sanitation (FCAS)-AECID has provided technical support to countries in Latin America and the Caribbean in order to improve their governance for the implementation of Integrated Water Resources Management (IWRM). An example is the case of cooperation with the General Directorate of Water Resources of the Republic of Honduras for the development of specific regulations in joint work with the country, with specialised multidisciplinary teams, specifically:

- The Special Regulation on Basin Organisations, which aims to establish the general provisions, principles and regulations applicable to the constitution, conformation and operation of the Basin Organisations established in the General Water Law.
- The Regulation of the General Water Law (RLGA) develops the principles, scope and objectives of the General Water Law of 2009 for the protection, conservation, valorisation and use of water resources.

These relations have also served to broaden knowledge of the experiences of the countries, their institutions and their management models, which has led to twinning arrangements through the Water Fund between, for example, the Ministry of the Environment and Natural Resources of El Salvador and the Hydrographic Confederation of Júcar in Spain or the National Institute of Hydraulic Resources of Cuba and the Hydrographic Confederations of Tajo and Ebro in Spain, which have exchanged experiences in relation to the information systems for water management in both countries.

TRANSBOUNDARY COOPERATION

As a forum for regional cooperation, CODIA has promoted progress in strengthening transboundary cooperation, both through various training activities on transboundary aquifer management and workshops on various aspects of transboundary cooperation, which have benefited from the experience

of organisations such as ACTO, the Tri-national Trifinio Plan Commission and the Guaraní Aquifer System. This dialogue has brought CODIA closer to the UNECE Water Convention, particularly following the analysis of indicator 6.5.2 on the proportion of the area of transboundary basins subject to operational arrangements for water cooperation under the “Programme for strengthening public policies through monitoring and analysis of SDG 6 indicators” carried out in collaboration with UNESCO and UNECE.

CAPACITY BUILDING

One of the most relevant tasks entrusted to CODIA is to act as a knowledge and training platform to provide Ibero-American water managers with tools to develop effective water governance systems.

CODIA'S IBERO-AMERICAN TRAINING PROGRAMME

CODIA's Ibero-American Training Programme (ITP) in the field of water, in operation since 2008, is one of the Conference's most visible lines of work. The ITP was designed to offer training and education in integrated water management to the whole of Ibero-America, both on a political and technical level. From the outset it was designed as a flexible programme that could be adapted to the particularities of each territorial, economic and political context.

Although CODIA had always combined face-to-face and virtual training, the latter modality was imposed by the needs arising from the health emergency caused by COVID-19. Online training multiplied from one day to the next, and planned face-to-face courses had to be adapted to virtual formats. This difficult and accelerated process was also a source of learning that opened up training possibilities to more participants, multiplied the number of ITP courses, and enhanced the use of IT tools that will continue to be a great asset for capacity building. Even so, once the pandemic allows for a return to face-to-face training, the enormous value of strengthening links

between participants in training activities has also been noted, so that in the future the focus will be on promoting face-to-face formats while at the same time combining them with virtual training, as appropriate.

Water-related ITP is currently recognised as one of the largest capacity development initiatives in the region, and perhaps this is why it is supported by a number of multi-lateral organisations and institutions, such as the Spanish Agency for International Development Cooperation (AECID), UNESCO's Intergovernmental Hydrological Programme (IHP), the Latin American Network of Centres of Excellence in Water Management (RALCEA) or the Regional Centre for Groundwater Management in Latin America and the Caribbean (CeReGAS). Together, we have managed to put together a training programme that responds to the needs detected by the Ibero-American Water Directors,

which allows us to provide more specific training, offering courses that are adapted to the reality and particularities of each territorial, economic, political and social context, with the main working method being the exchange of successful experiences already implemented, developed and contrasted by some countries, which serve as a model and reference to solve similar problems in other territories. Finally, we have also sought to align the contents of the ITP with the 2030 Agenda and SDG 6, whose goals can be reflected in the topics addressed and in the structure of the courses offered.

Since its launch in 2008 to date, more than 100 courses have been held, attended by more than 3,000 professionals from the region. As a sample of the work carried out, the courses held under the ITP from 2021 to 2022 are shown below:

SUBJECT	TRAINING PROPOSAL	NEEDS DETECTED
	Droughts in Latin America and the Caribbean: causes, impacts, monitoring and vulnerability estimation	To increase and standardise knowledge on the causes and patterns of droughts, as well as to disseminate the different tools available for monitoring, vulnerability, frequency and intensity estimation in Latin America and the Caribbean, estimation of drought frequency and intensity in Latin America and the Caribbean.
Water Security and Extreme Events	Adaptation strategies for droughts and other climatic events	To publicise and evaluate strategies for adaptability to climate change, in particular associated with droughts, torrential events, floods and heat waves.
	Flood management	To promote flood management using specific tools for extreme hydrology and considering operational and social aspects.
	Ancestral Hydro technologies as a response to climate, health and food emergencies	To highlight the value of rescuing the intangible cultural heritage linked to ancestral water management, in order to adapt it to the current context of climate and health emergencies.
Water supply and sanitation	Virtual Workshop on Sectoral Planning	These presentations are intended to raise awareness of certain topics and subsequent debate. To generate a basis for dialogue in order to subsequently generate consensus documents and guidelines.

SUBJECT	TRAINING PROPOSAL	NEEDS DETECTED
Water supply and sanitation	Virtual workshop on discharge and wastewater regulations	The aim is to exchange knowledge on the different discharge regulations existing in Ibero-American countries, seeking to investigate common problems and possible good practices.
	Social uptake of water and sanitation technologies, 2022	To contribute to the training of human resources with the capacity to reflect on the challenges for the exercise of the human rights to water and sanitation by Latin American populations and with the capacity to redirect the focus of programmes aimed at expanding the coverage of services, so that the new infrastructure is really aimed at guaranteeing access to water and sanitation, contributing to reducing the inequality gap and achieving the Sustainable Development Goals (SDGs).
Planning and IWRM	High-Level Seminar "Progress and Challenges in Transboundary Water Management Cooperation in the framework of the SDGs and indicator 6.5.2"	Achievements, challenges and shortcomings in transboundary HR management cooperation and progress on SDG6 indicator 6.5.2.
	Natural Water Management Solutions	Sanitation and depuration roadmap. To provide tools for water resources management with a focus on Eco hydrology and an emphasis on urban waters.
	Integrated Basin Management	To offer an approach to basin management that refers to the current importance of this concept in achieving sustainable development. The different organisational models, their roles and functions will be developed. It will also provide guidelines for the elaboration of a basin management plan and develop modelling tools for decision making.
	Water Governance in Latin America and the Caribbean	To provide participants with updated knowledge on the concept, dimensions, and strategies for water governance to address the opportunities and challenges of sustainable development in Latin America and the Caribbean. This should contribute to informed decision-making and the empowerment of actors responsible for providing solutions to water crises with a true understanding of the root causes.
	Eco hydrology in Water Management	To improve decision-making in the application of nature-based solutions and Eco hydrology to promote their use.
	Linking science and decision-making for sustainable sediment management	To improve decision-making on the social and environmental impacts of river erosion and sediment transport and provide tools for effective and sustainable sediment management.

SUBJECT	TRAINING PROPOSAL	NEEDS DETECTED
Planning and IWRM	Integrated Groundwater Management I	To promote an approach to an integrative conceptual framework and provide basic concepts and management tools for the protection of the quality and quantity of aquifers.
	Governance of Transboundary Aquifers	To promote an approach to an integrative conceptual framework and provide basic concepts and management tools for the protection of the quality and quantity of aquifers.
	Harmonisation of the legal framework for water resources management	To contribute to the improvement of policy and instructional frameworks in the region.
	CODIA Technical Dialogues: approach 6.5.2	It will address the benefit of water cooperation from the perspective of the different SDG6 custodian agencies and its relationship with other SDGs.
	Artificial intelligence and digital transformation for water security	Related to the introduction of water managers and decision-makers to the impact of technologies of the fourth industrial revolution on water resource management, presenting the challenges and opportunities they bring with them. These technologies enable real-time collection of reliable data, streamline data processing, detect patterns of behaviour and turn them into valuable, sharable information for better decision making.
Other training proposals	Governance of Transboundary Aquifers II	To support capacity building in groundwater governance with special emphasis on transboundary aquifers.
	Museology and water cultures	To provide basic concepts of conservation, research, pedagogy, dissemination and museography techniques incorporating digital tools oriented to water museums. To strengthen the network of water museums in LAC.
	Challenges and Trends in Public Communication on Water and Climate Change	To share methodologies for the development of a communication plan and press management, generation of news related to water management, communication in times of crisis, identification of sources of information, management of social networks, approach with cultural diversity and diversity of audiences, scientific and political communication.

THE ITP IN NUMBERS



14 years
of continuous
operation



More than
100 courses
given



3 subjects



3.000 students
from 22 countries



HIGH-LEVEL SEMINAR

One of CODIA's particularities lies in its ability to unite and mobilise technicians and decision-makers on water resources management at the highest level. This constitutes a unique opportunity to organise High-Level Seminars, where General Water Directors can exchange information and experiences in well-structured discussions among themselves and with other renowned experts, thanks to the alliances with CODIA's strategic partners.

Within the framework of the XVI CODIA held at the end of 2015 in Bolivia, the first "High-Level Seminar" was held, which made the idea embodied in the Sixth Agreement of the XV CODIA in Panama in 2014 a reality, in which it was decided to implement effective actions for the exchange of experiences and technology transfer between Member States within the framework of water resources management. These Seminars are organised in coordination between the PTS CODIA, IHP-UNESCO and the Conference's host country.

Since then, numerous seminars have been held, generally linked to the CODIA meetings, which have united experts, technicians and General Water Directors to discuss in depth the most relevant issues at any given time.

TECHNICAL DIALOGUES

Technical Dialogues are a training and debate tool that allows the General Water Directors of the region to create a space to discuss topics of interest. They have been held since the XVI CODIA, held in Bolivia in 2015, and the topics addressed include the main concerns of the water sector at any given time, with a predominantly technical and participatory approach to reach common conclusions. Some of the most important Technical Dialogues include:

- XVI CODIA:
 - Current situation and prospects for irrigation in Latin America.
 - Planned drought management.



XVII CODIA, Mexico 2016

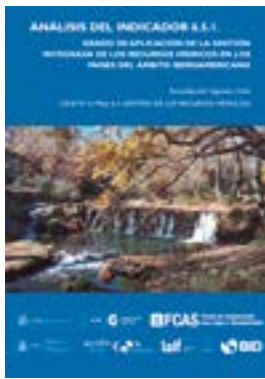


XI CODIA, Mexico 2010

- XVIII CODIA: Planning for the implementation and monitoring of SDG 6 and measures for adaptation to climate change.
- XIX CODIA: Integrating sectoral planning for wastewater treatment to achieve SDG 6.
- XX CODIA: Analysis of indicator 6.5.1 within the CODIA area.
- XXI CODIA:
 - Water-related ecosystems for the achievement of SDG Target 6.
 - Integrating sectoral wastewater treatment planning for the SDG 6 logo.
- XXII CODIA: Progress and challenges in transboundary water management cooperation in the SDG 6 acceleration framework as applied to target 6.5 and its indicator 6.5.2.

OUR PRODUCTS. PUBLICATIONS

Products under the CODIA seal include national and international projects and initiatives that are considered benchmarks for the region. These products may be publications, booklets of course or workshop experiences, High-Level Seminar reports or any other product of the knowledge generated or promoted in CODIA activities. These products are intended to reinforce the knowledge generated by making quality technical material on the status of water resources in the region freely available to the public. All these products can be freely downloaded from the CODIA website, in its “Products” section. Some of the most significant products include:



Analysis of indicator 6.5.1. Degree of application of Integrated Water Resources Management in the countries of Ibero-America. Second Cycle Update (2022).

This publication provides an executive summary of the first report on the status of indicator 6.5.1 in the CODIA countries, drawn up in 2019, which establishes the starting point for the analysis of IWRM implementation in the region, and presents a comparative advance with the results of the second assessment exercise of the indicator.



Analysis of Latin American regulations on population discharges (2022).

This study analyses the main characteristics of a series of discharge regulations in the region, with the aim of trying to identify and systematise the advantages and disadvantages of each typology. The main objective is to identify any aspects that may hinder its practical application and to present different approaches that may contribute to achieve a better adaptation to the real needs of each territory.



Transboundary water cooperation in Latin America and the Caribbean (2022).

This publication aims to promote knowledge and institutional capacities for cooperation and joint actions of States sharing water resources, with a focus on sustainable development. It provides readers with useful information for decision-making in water resources management.



Methodologies for wastewater treatment cost estimation in sectoral planning (2022).

This monograph is divided into two parts. The first part, which covers chapters 3 and 4, deals with the basic aspects of WWTP cost estimation in investment plans. The first chapter describes more general considerations on cost estimation and the second chapter describes the particularities of cost estimation specifically for WWTPs in planning processes.



Ensuring water availability, sustainable water management and sanitation for all: implementing public policies in Latin America and the Caribbean (2019).

This paper presents the debate on the implementation of SDG 6 in the region, its degree of awareness in the spheres of government, management bodies and the community in general, while systematising different publications and reflections on the main challenges involved in making the 17 SDGs possible and, in particular, SDG 6. To this end, the authors and reviewers, from various countries in the region, analysed the available documentation on the subject and a survey was conducted among water authorities, UNESCO Chairs and centres in Latin America and the Caribbean. Preliminary conclusions were discussed at the CODIA, leading to a more current and comprehensive review of the issues addressed.

In addition to the publications, the so-called “Experience Booklets” are particularly noteworthy, including:



No. 3. Workshop for the Exchange of Experiences Between Basin Councils of Peru, Colombia and Mexico. 2015



No. 4. Implementation and Operation of Groundwater Quality Networks (Water Network--CODIA). 2015



No. 5: Planned Drought Management (I). Cuba and Spain. 2016



No. 6: Planned Drought Management (II). Mexico and Costa Rica. 2016



No. 7: Methodologies for the Determination of Environmental Flows in Latin America (I). 2018



No. 8: Methodologies for the Determination of Environmental Flows in Latin America (II). 2018

Among the reports and conclusions of the Technical Dialogues and High-Level Seminars, the following are noted:

- High-Level Seminar on “Economic Instruments for Water Management” which took place as a preparatory activity for the XVIII CODIA held in Montevideo (Uruguay) in 2017.
- Technical Dialogues “Planned Drought Management” held at the XVI CODIA in Santa Cruz de la Sierra (Bolivia) in 2016.

DIA develops in-depth studies on the degree of progress of each SDG 6 target in the CODIA countries, which include, in addition to a quantitative assessment of the indicators, a qualitative study of the problems encountered and recommendations for improvement. These studies are also updated with each assessment cycle and submitted for comment and discussion at CODIA meetings, where experts from the trustee agencies are often invited to resolve doubts and support country comments.

To date, the following studies have been conducted:

THE PUBLIC POLICY STRENGTHENING PROGRAMME THROUGH THE MONITORING OF SDG 6

The Public Policy Strengthening Programme through the monitoring of SDG 6 seeks to support countries in the achievement of this Goal and, consequently, in the improvement of public policies related to it. To this end, CO-



EDAR San Pantaleón (Santander, Spain)

REPORT	RELATED EVENT	INDICATOR	TARGET	COMMENTS
Analysis of indicator 6.5.1. Degree of application of Integrated Water Resources Management in Ibero-American countries. Second Cycle Update ¹⁴ .	Technical Dialogues “Indicator 6.5.1 - IWRM as a framework for achieving SDG6”, XX CODIA (Dominican Republic, 2019). Published as a CODIA product under the same title.	6.5.1: Degree of implementation of Integrated Water Resources Management”. Custodian body: UNEP.		Final report drawn up by an expert and published.
Analysis of the proportion of the transboundary basin area with operational arrangements for water cooperation in the countries within the CODIA area ¹⁵ .	High-Level Seminar on “Progress and Challenges in Transboundary Water Management Cooperation in the Framework of the SDGs and Indicator 6.5.2” (XXI CODIA, Andorra, 2021). Technical Dialogues on “Progress and Challenges in Transboundary Water Cooperation in the Framework of SDG 6 Acceleration Applied to SDG Target 6.5 and Its Indicator 6.5.2” (XXI CODIA, Andorra, 2021).	6.5.2: Proportion of transboundary basin areas subject to operational arrangements for cooperation. Custodian body: UNECE.	6.5: Implementation of Integrated Water Resources Management at all levels.	Final report drawn up by an expert and in the process of being published.
SDG target 6.4. Water efficiency in CODIA countries. Initial Review ¹⁶ .	Initial review submitted (V InterCODIA, Colombia, 2022).	6.4.1: Change in water use efficiency over time. Custodian body: FAO. 6.4.2. Water stress level: Freshwater withdrawal as a proportion of available freshwater resources. Custodian body: FAO.	6.4: Guarantee withdrawals and supplies.	Preliminary non-exhaustive report.
SDG target 6.3. Water quality in CODIA countries. Initial Review ¹⁷ .	Initial review (V InterCODIA, Colombia, 2022).	6.3.1: Proportion of domestic and industrial wastewater flow safely treated. Custodian agency: WHO and UN-Habitat. 6.3.2. Proportion of water bodies with good ambient water quality. Custodian agency: UNEP.	Target 6.3: Halve the proportion of untreated wastewater discharged into our water bodies.	Preliminary non-exhaustive report.

¹⁴ Analysis of indicator 6.5.1. Degree of application of Integrated Water Resources Management in Ibero-American countries. Second Cycle Update (2022)..

¹⁵ Transboundary water cooperation in Latin America and the Caribbean (2022).

¹⁶ SDG target 6.4. Water efficiency in CODIA countries. Initial review (2022).

¹⁷ SDG target 6.3. Water quality in CODIA countries. Initial review (2022).

OUR SANITATION AND DEPURATION ROADMAP

CODIA's Sanitation and Depuration Roadmap is a line of work on the basis of which various Technical Dialogues and Workshops have been held, which in turn have given rise to new proposals for action. Thus, we can count the following activities carried out in collaboration with AECID and CEDEX within the framework of this roadmap:

- I Technical Dialogues on integrating sectoral planning on wastewater treatment for the achievement of SDG6¹⁸, held at the XIX CODIA (Guatemala, 2018). The results of the discussions were presented during the sessions held at the V LATINOSAN (Costa Rica, 2019).
- II Technical Dialogues on integrating sectoral planning on wastewater treatment for the achievement of SDG, held at the XXI CODIA (Andorra, 2020), the conclusions of which were included in the agreements of that Conference¹⁹.
- Virtual workshop on regional regulation of discharges and wastewater

treatment, held from 21-23 June 2021, the conclusions of which were presented at the XXII CODIA (virtual, November 2021)²⁰.

- Conference on Planning in sanitation and wastewater treatment, held in the framework of the XXII CODIA (virtual, November 2021)²¹.

Among the inputs generated by this activity, it is worth highlighting the agreement to set up a working platform on discharge and wastewater regulations. This initiative responds to the proposal for the creation of debate platforms where managers and experts can share approaches and hold discussions that help to reach common and coherent proposals. The details of this project will be described later, within the new initiatives described in section 3.3 below.

¹⁸ Technical Dialogues. IV InterCODIA Meeting (Costa Rica, 2019).

¹⁹ In the Agreements of the XXI CODIA (Andorra, 25-6-2020), the adoption of the conclusions of the Technical Dialogues II "Progress and Challenges in Transboundary Water Cooperation in the Framework of SDG 6 Acceleration Applied to SDG Target 6.5 and Its Indicator 6.5.2" was formalized, and a review of the situation in the Ibero-American space was included in Annex II of this agreement document. https://codia.info/images/documentos/codia_XXI/Acuerdos_XXI_CODIA.pdf

²⁰ Conclusions XXII CODIA (November 2021).

²¹ Concept note XXII CODIA (November 2021).



Valmayor Dam (Community of Madrid, Spain)

20 YEARS OF AGREEMENTS BETWEEN MEMBER COUNTRIES

These 20 years of continuous evolution have enabled CODIA, which was initially associated with development cooperation, to become a space for collaboration and exchange of experiences between water managers in order to promote “good water governance”. These meetings have promoted policies that support integrated water resources management as a means to advance sustainable water management, in compliance with both the 2030 Agenda and SDG 6. In these 23 CODIA meetings and 5 InterCODIA meetings, many agreements have been reached, for example:



Panoramic view of the Guatapé Lake landscape from Piedra del Penol outcrop in Medellín. (Colombia)

I CODIA (Colombia, 2001): the Latin American Water Information System (SIAGUA) was presented and promoted. This system was intended to become an instrument for the exchange of knowledge and experiences on water resources management between Ibero-American countries.

II CODIA (Chile, 2003): the “Action Plan for the Sustainable Use of Water Resources” was developed and approved in July of the same year.

III CODIA (Mexico, 2003): the European Union’s Water for Life Initiative (EUWI), which aimed at adopting strategies to combat poverty through the sustainable use of water resources, also included Latin America as a target region, as well as Africa, Eastern European countries, Caucasus and Central Asia and the Mediterranean.

20 YEARS OF AGREEMENTS

IV CODIA (Dominican Republic, 2004): progress was being made in the process that should lead to the signing of the Association Agreement with the European Union at the 3rd EU-Latin America and the Caribbean Summit for the implementation of national Integrated Water Resources Management programmes.

V CODIA (Colombia 2015): The strengthening of river basin organisations was advocated as a primary and essential element for the integrated water resources management. Furthermore, it was committed to water planning as a key element to ensure the distribution of water in an equitable way that allows the basic needs of the population, the functioning of ecosystems and the different forms of use in the economy to be adequately met.

VI CODIA, (Costa Rica, 2006): the final version of the document “Implementation of a Joint Water Strategy Between the European Union and Latin America” was defined, which was subsequently ratified by all the Ibero-American Ministers responsible for water, the rotating presidency of the EU and a representative of the European Commission, within the framework of the IV World Water Forum held in Mexico.

VII CODIA (Guatemala, 2007): the need to develop a training programme that would respond to regional needs in terms of training and exchange of experiences for integrated planning and management of basins and water resources was addressed, as well as the creation of the Technical Support Panel (TSP) for the Conference.

VIII CODIA (Peru, 2008): the “Ibero-American Water Training Programme” was approved in fulfilment of the mandate of the VII Forum of Ministers.

IX CODIA (Spain, 2009): the transformation of the Ibero-American Water Initiative into the Ibero-American Water Programme was agreed.

X CODIA (Spain, 2010): progress was made in the structure of the Ibero-American Water Programme, with the establishment of the management bodies necessary for its development.

XI CODIA (Mexico, 2010): it was agreed to support the Regional Paper on Adaptation to Climate Change in the Water Sector, presented by the National Water Commission (CONAGUA) and other regional bodies.

XII CODIA (Argentina, 2011): a specific collaboration agreement was signed between the Ministry of the Environment and Rural and Marine Affairs, as Permanent Technical Secretariat of CODIA, and the Distance Learning Centre for Economic and Technological Development Foundation (CEDDET), which allows the implementation of the distance learning modality (e-learning) of the Training Programme, with the aim of reaching as many people and institutions as possible.

XIII CODIA (Brazil, 2012): it was agreed to study different ways of financing that would enable CODIA to be financially stable, mainly to guarantee training programmes, as well as the preparation of a multi-annual strategic plan and internal regulations.

XIV CODIA (Spain, Portugal, Brazil, 2013): it was agreed to give greater political relevance to the agreements reached at these meetings. To this end, it was decided that CODIA's activities should be submitted to the Ministers of each country so that they can be considered and guided by the Forum of Ministers or by the Ibero-American Summit.

XV CODIA (Panama, 2014): the documents relating to the agency's Strategic Plan and rules of procedure were consolidated and the training programme was strengthened.

XVI CODIA (Bolivia, 2015): the Conference's commitment to the 2030 Agenda and the Sustainable Development Goals was expressed.



XIII CODIA, Brazil, 2012

XVII CODIA (Mexico, 2016): it was agreed to continue to promote training programmes by launching new initiatives to encourage the interchange of professionals (peer to peer programmes) among public water administrations in the region.

XVIII CODIA (Uruguay, 2017): it was agreed, among other matters, to reiterate CODIA's commitment as a platform for technical collaboration and political dialogue in the field of water resources management in the region. In addition, a new governance system for the Training Programme was adopted, creating a Coordination Panel formed by Costa Rica, Panama, Peru and Uruguay together with UNESCO-IHP, AECID and CODIA's Permanent Technical Secretariat.

XIX CODIA (Guatemala, 2018): the Conference was registered in the register of Ibero-American Networks of the Ibero-American General Secretariat (SEGIB).

XX CODIA (Dominican Republic, 2019): it was agreed to send the SEGIB the documents to complete the formalisation of CODIA in the Register of Ibero-American Networks.

XXI CODIA (Andorra, 2020, virtual): it was agreed to promote actions aimed at taking the efforts made by countries on water resources management to a high political level in the OAS forum, in particular under the scenario of the COVID-19 pandemic.

XXII CODIA (Dominican Republic, 2021, virtual): among other issues, the importance for CODIA to elaborate on the debate on shared management of water resources was concluded, emphasising that important work must be done in the area of water resources management to ensure the supply of drinking water for food production and for the sustainability and development of resources in general.

Our commitment to the future and to the international sphere.

The 2030 Agenda

CODIA's 20th anniversary is an opportunity not only to look back at the progress made, but also to review the international and regional water situation for the coming decades, in order to align its action with the new challenges and to respond to the needs of its member countries in the future. In this chapter, we will review international water policies, mainly structured around the 2030 Agenda, and then review the regional situation and outline some of the projects being prepared by CODIA to address the issues of greatest interest in the future.

WATER IN THE 2030 AGENDA

The international sustainable development agenda and, within this, the water sectoral agenda, underwent a substantive change of direction as a result of the adoption by the United Nations of the 2030 Agenda. This Agenda led to the incorporation of the social and environmental variable to ensure an equitable and environmentally sustainable development model and had a decisive impact on international action related to water resources management. This change also includes the recognition by the international community of what has been dubbed "the water crisis", the consequences of which, due to the cross-cutting and systemic nature of water resources management, affect not only the capacity of countries to make progress in the achievement of SDG 6 on water and sani-

tation, but also all the Goals of the 2030 Agenda, directly or indirectly related to SDG 6. The interrelationship between the different SDGs makes progress on many of them dependent on effective progress on SDG 6.

Moreover, the challenge of scarcity, exacerbated by pressures associated with urban growth, increased demand for water for food production and energy generation, and increasing deterioration of natural resources, coupled with the negative impacts of climate change, is putting the water crisis on the international security agenda as a result of potential conflicts associated with competition over access to water resources within countries and between countries sharing river basins or aquifers.

As a consequence of the cross-cutting and interconnected nature that characterises water policies, the 2030 Agenda promotes a change of focus in water governance, promoting an integrating vision that overcomes the limited nature of the traditional focus on water and sanitation services in the urban sphere to move towards what has come to be known as integrated water resources management, an approach that seeks to incorporate into the formulation of public water policy the plurality of (sometimes contradictory) interests present in other areas of public action that either depend directly on access to the resource for their development or, in their practical application, cause impacts and pressures on the good environmental status of water.

The findings of the 2018 synthesis report on SDG 6 presented in New York reaffirm



Cataratas Foz de Iguazú

that the main challenge across the water sector is currently to facilitate and accelerate progress towards the achievement of SDG 6. This is indeed the main conclusion of the assessment of progress made on the SDG 6 targets to date. In order to facilitate and speed up this process, these reports highlight the need to work on three specific areas of action: political leadership, financing and good water governance, with the understanding that good water governance, which, as has been repeatedly stressed, relies on the implementation of integrated water resources management systems, cannot be achieved without adequate political support and cannot be put into practice without sufficient financing.

THE SDG6 ACCELERATION FRAMEWORK AND THE CAPACITY DEVELOPMENT INITIATIVE (CDI)

Since 2016, at the High-Level Political Forum on Sustainable Development, UN Member States have been reporting on progress towards the goals of the 2030 Agenda, including SDG 6. However, overall action to achieve the Sustainable De-

velopment Goals is not yet progressing at the necessary speed or scale, which is why the UN system and its partners launched the SDG 6 Global Acceleration Framework (GAF) on 9th July 2020, which proposes scaling up action in 5 components²²:

1. Financing: improving the targeting and use of existing financial resources, as well as the mobilisation of additional resources.
2. Data and information: the availability of validated and standardised data will enable better information exchange and facilitate informed decision-making.
3. Capacity building: inclusive human and institutional capacity building will lead to improved service levels, increased job creation in the water sector and the retention of a skilled workforce
4. Innovation: the incorporation of new technologies and innovative practices lead to better water and sanitation management.

²² Global Acceleration Framework, UN-WATER.

5. Cross-sectoral and cross-border cooperation, with clear roles, stakeholder participation and inclusive institutions, will make SDG 6 everyone's business.

Within these five components, UN-Water has relied on the leadership of UNESCO and the United Nations Department of Economic and Social Affairs (UN DESA) for the joint coordination of the capacity building component²³. The SDG 6 Capacity Development Initiative (CDI) is a strong commitment to facilitate the adoption and deployment of capacity development activities at the national level and accelerate the implementation of SDG 6, with CODIA serving as a model for its initial formulation, among other international initiatives.

ROAD TO THE UNITED NATIONS WATER CONFERENCE 2023

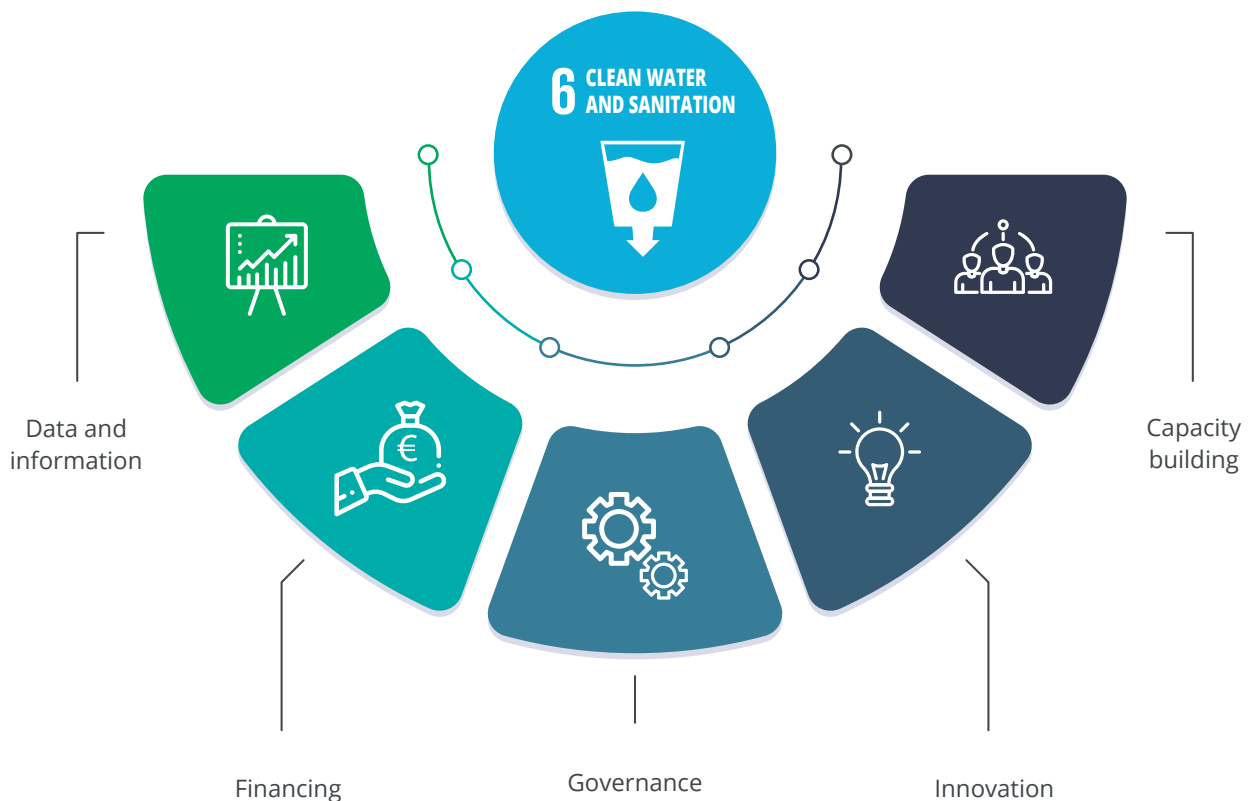
2023 will mark the first water conference at the United Nations since the 1977 Mar de Plata Conference, and will focus precisely on progress towards SDG 6 within the framework of the mid-term review of the International De-

cade for Action, "Water for Sustainable Development 2018-2028".

Driving a just and sustainable water transition in the region is urgent and will not be possible without establishing meeting places, within and outside the water community, to join in partnerships and cooperation to accelerate progress in its implementation.

The working space promoted by ECLAC is particularly relevant in this line of work as it promotes the regional group of experts on water resources in Latin America and the Caribbean, made up of more than twenty representatives of the most prestigious institutions in the field of water resources in the region, whose objective is to join efforts to implement initiatives that accelerate the fulfilment of SDG 6 in LAC. This initiative aims to contribute decisively to the acceleration of the achievement of SDG6 in Latin America and the Caribbean and its addition to the forthcoming Water Dialogues, as well as to the public consultation on water resources priorities in the region.

²³ SDG6 Capacity Building Initiative, UN-WATER.



Towards a sustainable and inclusive water transition in Latin America and the Caribbean: ECLAC's vision for accelerating the achievement of SDG 6 in the region

Latin America and the Caribbean (LAC) has a per capita water endowment four times higher than the world average. However, climate instability, prevailing inequality in access to the resource and the impact of growing negative externalities impose socio-economic and environmental challenges on water management. In recent decades, water stress levels in LAC have exceeded 80% in the most populated and economically active areas, the frequency of floods and droughts has doubled, and there is greater instability of water supply. Furthermore, 2.5 out of 10 people do not have safely managed drinking water and 7 out of 10 do not have safely managed sanitation.

In light of this situation, ECLAC strongly encourages the countries in the region to progress towards a transition in water management in order to: i) Ensure the human right to safe drinking water and sanitation through the taxation of investment in the sector, leaving no one behind; ii) Promote regulatory and policy changes to foster equitable and affordable access and thus eradicate water poverty; iii) Reverse the growing negative externalities associated with pollution, overexploitation and socio-environmental conflicts, and iv) Shift from linear to circular management to reduce pressure on water resources, with a decoupling trend between abstraction and GDP. This requires strengthening water authorities, setting priorities for use, charges and penalties for environmental impacts, and adopting innovative policies to close access gaps, address climate change and other emergencies. Investment in

bridging water and sanitation coverage gaps can be a catalyst for the regional economy, as investing 1.3% of annual GDP by 2030 could generate up to 3.4 million direct jobs per year. Long-term sources of financing will be required to leverage public investment to bridge infrastructure gaps, particularly in rural and many urban areas in lower-income countries, where the returns on such investment are also public and represent positive social externalities (i.e. reducing mortality and morbidity in vulnerable sectors, fighting poverty and gender inequality, reducing pollution, etc.). As for the role of the private sector, conditions for private sector investment can be improved. This could be promoted in urban, relatively high-income areas with wide coverage, self-financing tariffs, robust regulatory institutions and favourable public opinion. These providers can then undertake investments in water treatment and reuse, following circular economy principles that allow them to expand their business. At the same time, the establishment and continuity of early warning and water monitoring mechanisms should be ensured to boost and protect investment in water infrastructure, favouring nature-based solutions.



Cenote Ik-Kil, Yucatán peninsula, Mexico

CONTEXT AND FUTURE OF WATER IN IBERO-AMERICA

Ibero-America has a series of geographical, physical and environmental factors that provide it with a great wealth of water resources: it is estimated that 33% of the planet's water resources are found in Latin America and the Caribbean. However, the effective distribution of these resources is unequal and leads to situations of scarcity or poor water quality, which has negative repercussions on the social, environmental and economic well-being of the most disadvantaged areas. It is estimated that by 2050, as a result of climate change and the impact it will have on water management, at least one in four people are likely to live in a country with chronic or recurrent freshwater shortages²⁴.

Furthermore, the Fifth Assessment Report of the Intergovernmental Panel on Climate Change (IPCC)²⁵ states that most Ibero-American countries are highly vulnerable to climate change and are already being impacted by it, which has serious consequences on the water cycle. Water scarcity and conflicts are expected to increase, especially in agricultural communities, public health and energy production. Extreme events are also expected to intensify,

including increased temperatures and frequency of droughts with subsequent agricultural and food security implications.

While there have been improvements in the region, a significant proportion of the population in Latin America and the Caribbean still lacks adequate access to water supply and sanitation services. According to the Pan American Health Organisation (PAHO), in 2020 only 65% of the population had access to safely managed water services, lower than the 71% reported globally. In relation to safely managed sanitation services, the situation was even more critical, reporting only 22% access compared to 39% globally. In addition to these shortages in coverage, the quality and continuity of service is affected, while insufficient monitoring hinders the availability of reliable data to indicate actual quality. Data on sanitation services often only refer to sewage discharged through the sewage system without considering its treatment, which has important consequences and an impact that is reflected in the number of contaminated sources and high rates of waterborne diseases in the population²⁶.

²⁴ Decade for Water Action, UN DESA.

²⁵ IPCC Climate Change Synthesis Report, 2014.

²⁶ Water quality in the Americas, 2019.

On the other hand, the region's water wealth and the challenges that its management faces in guaranteeing the human right to water and sanitation is confronted with complex problems in transboundary basins. In the case of LAC, of the 33 countries that make up the region, 22 share transboundary waters, be they lakes, rivers or aquifers. 60% of South America's territory corresponds to transboundary basins, of which three - the Amazon, La Plata and Orinoco - account for 68% of the continent's total available freshwater. However, there is low coverage of transboundary operational arrangements in most countries: 10 countries have 10% or less of transboundary water basins covered by operational agreements and only four countries (Argentina, Brazil, Ecuador and Paraguay) reach a value above 90%, according to data compiled in the assessment reports of SDG indicator 6.5.2²⁷, which comprehensively monitors the area of transboundary basins subject to operational arrangements.

In short, the challenges facing the region are related to the population's access to drinking water and sanitation, the con-

servation of the quality of water bodies, sustainable productive development and the control of risks related to droughts and floods, which in turn is strongly conditioned by the necessary adaptation to climate change. In this regard, the Inter-sectoral Workshop for the prevention and management of extreme hydro meteorological events and climate change adaptation measures in Andean and Southern Cone countries, co-organised by the three networks CIMHET, RIOCC and CODIA in December 2018²⁸, identified a series of lines of action based on the needs identified, including the Generation of regionalised climate change scenarios, the Creation of Virtual Regional Centres for Warnings of Adverse Hydro meteorological Phenomena and the Development of a monitoring and indicator system for adaptation to climate change, among others.

²⁷ Progress in transboundary water cooperation, 2021.

²⁸ Intersectoral workshop for the prevention and management of extreme hydro-meteorological events and climate change adaptation measures in Andean and Southern Cone countries, 2018.



Tavera Dam, Santiago de los Caballeros Province. Dominican Republic

A RENEWED COMMITMENT FOR THE NEXT 20 YEARS

The Conference of Ibero-American Water Directors (CODIA), as the main forum for technical dialogue for the management of water resources in Ibero-America, is also a consolidated space for action on the guidelines that have been shown to be essential for the future of water in the region, while favouring bilateral, triangular and regional cooperation among its members. Its uninterrupted work over these two decades has also allowed it to adapt and contribute to the evolution of the international water agenda while forging stable alliances with strategic partners for the greatest impact of its action.

FORTHCOMING DEVELOPMENTS IN CODIA'S WORK PROGRAMME

This XXIII CODIA has been a turning point in the trajectory of the Conference, not only because of the celebration of an important event such as its 20th Anniversary, but also because after some particularly difficult years due to the COVID-19 pandemic, which forced us to extend the Work Programme, the Ibero-American Training Programme and the corresponding budget, and to transform all face-to-face activity into virtual, we now intend to approve a new Work Plan -this time, biannual: 2022-2024-, which will enable the coordination of all CODIA's activity in this new post-pandemic stage. This new Plan will maintain the current lines of work and will incorporate the proposals arising from the V InterCODIA (Cartagena de Indias, 2022).



Cayambe Coca ecological reserve waterfall in Napo, Ecuador

Some of the most relevant ongoing actions envisaged in the next biennium 2022- 2024 are listed below:

Public policy strengthening programme through SDG 6 indicators (in collaboration with the custodian bodies):

- Development of SDG 6 target 6.4 indicator reports on efficient use of water resources, with support from the IDB.
- Development of indicator reports for SDG6 target 6.3 on water quality, with support from the CAF.
- Development of indicator reports for SDG 6 target 6.6, yet to be articulated and which may eventually be supported by SEGIB.



New Ibero-American Water Training Programme, which includes proposals formulated by the countries during the V InterCODIA (Colombia, 2022), and will be supported by AECID, IHP-UNESCO, RALCEA, CeReGAS and academic institutions to be determined. This programme also contributes to the Ibero-American Capacity Development Initiative (CDI).

New publications: analysis of impacts, challenges and opportunities on water and COVID-19 in Ibero-America and the Caribbean and Ecological and environmental flows (with the support of IHP-UNESCO), and monitoring reports of the indicators.



Generation of inputs on water, climate and climate change for the Ibero-American Environmental Agenda, as a member of the Three Networks (CIMHET, RIOCC and CODIA).

Advance **common guidelines in view of the 2023 United Nations** (UN) Conference and subsequent outcomes, in particular by participating in the regional group of experts on water resources in the region and in the Water Dialogues in Latin America and the Caribbean and promoting actions derived from the commitments resulting from the Conference.



As well as the lines of work already underway, such as the Sanitation and Depuration Roadmap and the Public Policy Strengthening Project through the monitoring of SDG 6 indicators, two initiatives are being prepared that are expected to have a very positive impact on the areas in question: the Technical Guide for Hydrological Planning and the Platform for Discharge and Wastewater Regulations.

TECHNICAL GUIDE TO HYDROLOGICAL PLANNING WITHIN THE FRAMEWORK OF INTEGRATED WATER RESOURCES MANAGEMENT

Integrated Water Resources Management (IWRM) is based on the recognition of freshwater as a finite and vulnerable resource, essential to sustain life, development and the environment, to be managed through a participatory approach involving users, planners and decision-makers at all levels, and to be recognised as an economic good, recognising that there is competition for its various uses, and its integration into the

economic and social development plans and programmes of governments should be promoted.

Given the importance of this concept and its relevance to Sustainable Development, IWRM is incorporated into the 2030 Agenda (SDG6 target 6.5) not separately, but as part of the set of SDG6 targets. The cross-cutting nature of IWRM therefore integrates aspects such as the existence of institutional and regulatory arrangements, access to affordable drinking water and sanitation, improvement of water quality and reduction of pollutant emissions, increasing the efficient use of water resources and protection of water-related ecosystems, among others.

In line with the above, and at the initiative of the Cooperation Fund for Water and Sanitation of the Spanish Agency for International Development Cooperation (AECID), the preparation of a Technical Guide for the drafting of Basin Plans with a vision of Integrated Water Resources Management for Ibero-America was proposed (III InterCODIA, Brazil 2018), with the aim of providing essentially practical criteria and recommendations



III InterCODIA, Brazil, 2018



Discharge of waste water

on the objectives and results that can be expected from hydrological planning, its relationship with other planning elements, what the content of a basin plan might entail and the basic tasks necessary to implement it, including references to the key institutional aspects. This complex work, led by AECID's Water Fund, aims to organise and systematise in a single publication a series of practical criteria, methodologies and recommendations for the development of hydrological planning from an IWRM perspective in the CODIA member countries, proposing the minimum contents of a hydrological plan and the basic tasks for its preparation, implementation and monitoring, including tools for the definition and prioritisation of investments in water resources management. The countries and institutions of the region have collaborated in the development of this Guide, both in the development of content and in the contribution of practical cases that illustrate the different aspects dealt with in the Guide, contributing the lessons learned from the countries in the Ibero-American sphere. Thus, the content of the Guide will essentially be practical, with a focus on the Ibero-American space, and will therefore count on the participation of the countries and institutions of the region so that, once finalised, it will be a true reference publication and an impulse for the implementation of IWRM in the region.

WHAT IS IWRM?

In Latin America and the Caribbean, Integrated Water Resources Management is defined as “a dynamic process, with intersectoral social and institutional participation, for the management of water and its interactions with the environment, to guarantee its sustainability, minimise negative impacts and obtain the maximum environmental, socio-cultural and economic benefits. Integrated management is based on a holistic view of water systems (surface, groundwater and others), both in terms of quantity and quality, considering their role in ecosystems and human uses (through their ethical, socio-cultural, environmental, economic, technological and other dimensions), promoting equity (including gender) and adaptation to global change” (IHP-UNESCO, 2018).





XVII CODIA, Mexico, 2016

Recommendations for the development of sanitation and wastewater treatment plans.

With the support of the Cooperation Fund for Water and Sanitation (FCAS) and CEDEX, CODIA is promoting the preparation of a document containing a series of recommendations for the implementation of sectoral plans for sanitation and wastewater treatment. These recommendations are based on the experience of the FCAS programmes in the region, as well as on the contributions and suggestions of various technicians with experience in the field, since the document was open from the beginning to the sector to receive their comments and thus obtain a product that is as consensual as possible.

The importance of the document lies in the conviction that a proper planning framework is essential for an orderly approach to the development of the sanitation and wastewater treatment sector, ensuring that resources are used in the best possible way and identifying priorities with transparent criteria. In addition, the existence of adequate planning is a greater guarantee for international institutions and development banks, ensuring that the projects for which financing is requested at any given time are the appropriate ones, as they have been previously analysed and prioritised within the global context of the country.

Sector strategies in countries, particularly in a sector as behind as wastewater treatment, require much more than just identifying a series of needed works, prioritising them, getting the funds and starting to build, as many other elements are necessary to be able to provide an adequate service.

Therefore, the establishment of an adequate planning framework is essential in order to address development, identifying priorities with transparent criteria. In this regard, a virtual workshop was held in November 2021 within the framework of the XXII CODIA, which addressed the importance of sectoral planning as a tool for the development of sanitation and wastewater treatment and presented several case studies from countries in the region, such as Costa Rica, Bolivia, El Salvador and Argentina. In addition, the base document for the proposal of sectoral planning recommendations, on which the Cooperation Fund for Water and Sanitation (FCAS) with the support of CEDEX had been working, was presented so that it could be brought to discussion and consensus.

SECTORAL REGULATION DEBATE PLATFORM FOR SANITATION AND WASTEWATER TREATMENT

As part of the actions carried out within the framework of CODIA's Sanitation and Depuration Roadmap, a virtual workshop on discharge and wastewater regulations was held in June 2021. This workshop, organised by AECID in collaboration with CODIA, allowed for an exchange of experiences on discharge regulations in the countries in the region, concluding that the current regulations generally present significant implementation problems, as a result of both the lack of legislative instruments and sufficient resources to ensure effective control and compliance with the regulations, and the configuration of the regulations themselves, which often contain insurmountable technical problems.

In addition, the workshop also highlighted the convenience of initiating international dialogue in order to make effective progress in the protection of water resources, given that existing regulations currently provide very different levels of protection on both sides of the border in shared bodies of water, both inland and offshore. Therefore, the opening of international platforms and forums for debate are essential in order to share approaches and hold discussions that help to reach common and coherent positions. Thus the proposal for the creation of a forum was born, hosted by CODIA, to advance regional understanding of water quality and discharge limitations, with the main objective of sharing individual experiences and exchanging information.

The main purpose of this platform for dialogue on sectoral regulations is to create a stable working space in which the countries in the region and professionals from different public and private institutions and individual experts who wish to join can share experiences and approaches to sectoral regulations and their review processes, as well as explore coordination mechanisms for the implementation of quality objectives and discharge standards with similar approaches and objectives. Moreover, the platform would be open to the exchange of experiences on the development of all kinds of sectoral regulations, such as standards related to wastewater manage-

ment and reuse, disposal of sludge from treatment plants, industrial discharges to sewers, establishment of discharge charges, among other.

This platform is currently under development and will be launched in the near future. It is expected that this platform, which will take the form of a restricted-access forum (only for accredited users) hosted on the CODIA website, will be a vehicle for various debates and working groups between specialised technicians from the countries and experts in different fields to promote the exchange of experiences on discharge regulations and, by extension, on all regulations that have an impact on the development of the sanitation and wastewater treatment sector. This is intended to improve future coordination of discharge regulations between countries sharing the same resource, thus improving the quality of water bodies for future generations.

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Acronyms

AECID: Spanish Agency of International Cooperation for Development

ANA-Brazil: National Water Agency of Brazil

IDB: Inter-American Development Bank

WB: World Bank

CAF: Latin American Development Bank

CDI: Capacity Development Initiative

CeReGAS: Regional Centre for Groundwater Management in Latin America and the Caribbean.

ECLAC: Economic Commission for Latin America and the Caribbean

CIMHET: Conference of Directors of Ibero-American Meteorological and Hydrological Services

FCAS: Cooperation Fund for Water and Sanitation

FIIAPP: International and Ibero-American Foundation for Public Administration and Policy

IRWM: Integrated Water Resources Management

GWP: Global Water Partnership

IPCC: International Panel on Climate Change

LAC: Latin America and the Caribbean

MITECO: Ministry for Ecological Transition and the Demographic Challenge

OAS: Organisation of American States.

OECD: Organisation for Economic Co-operation and Development

PAHO: Pan-American Health Organisation

ACTO: Amazon Cooperation Treaty Organisation

IHP-UNESCO: Intergovernmental Hydrological Programme - United Nations Educational, Scientific and Cultural Organisation

UNEP: United Nations Environment Programme

RALCEA: Latin American Network of Knowledge Centres on Water Resources Management

RIOCC: Ibero-American Network of Climate Change Offices

SWA: Sanitation and Water For All

SEGIB: Ibero-American General Secretariat

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There will be no future but the one we build.

Permanent Technical Secretary of CODIA
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