THE DANUBE WATER PROGRAM
Smart policies, strong utilities, sustainable services

www.danube-water-program.org
“For the Austrian Government, the Danube Water Program is an excellent opportunity to foster exchanges with and give back to a region that is traditionally close to Austria, in a key focal area of the Austrian cooperation. Partnering with the World Bank and IAWD allows our funding to support sector stakeholders ranging from utility managers to local governments, regulators and policy makers in addressing the sector’s challenges. By renewing our commitment to the Program with a second phase, we allow flagship activities to grow further and evolve into sustainable initiatives under IAWD and the World Bank’s leadership.”

Günther Schönleitner
Director, International Financial Institutions, Ministry of Finance of Austria
THE DANUBE WATER PROGRAM

Governments and water professionals in the Danube region face a double challenge of meeting their citizens’ demand for universal, good quality, efficient, and financially sound or - in one word - sustainable water and wastewater services, while catching up to the environmental requirements of the European Union acquis communautaire. To address this double challenge, the World Bank and the International Association of Water Supply Companies in the Danube River Catchment Area (IAWD) have partnered to launch the Danube Water Program, with a 9.5M Euro, two-phased financing from the Government of Austria. The Program supports smart policies, strong utilities, and sustainable services in the Danube Region by partnering with regional, national, and local stakeholders, promoting an informed policy dialogue around the sector’s challenges and strengthening the technical and managerial capacity of the utilities and institutions.

The Danube Water Program was formally launched in May 2013 in partnership with line ministries, regulators, waterworks associations, and local government representatives of a dozen countries in Southeast Europe. Since the launch of the Program, knowledge exchanges among more than 360 sector professionals and policy makers in the region and beyond, four capacity building programs benefiting over 100 utilities, and local initiatives worth more than €700,000 through competitive grants have been supported. Together with many actors in the region, the World Bank and IAWD have developed DANUBIS.org, a platform for sharing information on water and wastewater services, cooperated with a variety of organizations such as the Open Regional Funds, the European Benchmarking Cooperation, and national utility associations, and leveraged over €2.5 million of funding from beneficiaries and other donors, including Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) and Swiss Cooperation.

The first phase, which ended in 2015, saw the successful completion of more than 40 individual knowledge sharing, capacity building and analytical work activities, demonstrating a strong demand for the Program supported activities. The second phase, scheduled to end in December 2018, focuses on establishing the basis for sustainable impact beyond the duration of the Program. A few key ‘legacy’ initiatives are being supported, including the establishment of the annual Danube Water Conference as the prime gathering of sector professionals in the region; the development of the DANUBIS.org website into a lively platform of information exchange and benchmarking for the whole region; and the consolidation of capacity building activities under D-LeaP, a sustainable learning partnership of national and regional waterworks associations.

For more information, check the Program website www.danube-water-program.org.
ABOUT THE PROGRAM

Why This Program?

Governments and water professionals in the Danube region face a double challenge of meeting their citizens’ demand for universal, good quality, efficient, and financially sound or - in one word - sustainable services, while catching up to the environmental requirements of the European Union acquis communautaire. Much work remains to be done to provide sustainable water and wastewater services for everyone in the Danube region, in particular among recent or future EU members. Over 20 million people in the region do not have in-house piped water or a flush toilet, with the poor, rural populations, and minorities overrepresented. Some service providers still struggle to provide continuous, potable water to their clients; low tariffs and inefficient utility practices create challenges for the proper operation and maintenance of the existing infrastructure. At the same time, to satisfy the acquis communautaire, the Water Framework Directive is being transposed into the legal and institutional frameworks of the countries of the region. Large investments for the upgrading or development of water and wastewater assets are being made, which create a further technical and financial burden on service providers. Governments in the region are therefore revisiting the way services are being delivered and financed, and embarking on significant reform efforts.

To address these challenges, new skills and knowledge are required to ensure high-quality, cost-efficient delivery of water and wastewater services, mobilize additional sources of funding for investments, and provide incentives for better performance. National governments and regulators need to define and implement policies on topics such as reforming utility management, targeting subsidies to low-income groups, restructuring tariffs, and improving regulation, while local governments and utility companies need to develop their managerial capacity to improve the coverage, quality, efficiency, and sustainability of the water and wastewater services they provide. The World Bank and IAWD seek to use the Program resources to facilitate these processes.

Box 1: The International Association of Water Supply Companies in the Danube River Catchment Area

IAWD is an association of water and wastewater utilities in the Danube river catchment area. It was established in 1993 by utilities from 10 countries with the objective of promoting joint national and international efforts to avoid and reduce risks to water supply, such as pollution and other types of harm to the condition of the Danube, its tributaries, and related groundwater resources. IAWD is headquartered in Vienna, Austria, and hosted by one of its founding members, Vienna Waterworks. IAWD is taking advantage of the Danube Water Program to strengthen its position and develop its leadership among partners in the region, as manifested for example through initiating D-LeaP together with national associations. This is part of a strategy to facilitate the sustainability of the initiatives beyond the Program.

Box 2: The World Bank in the Danube Region

The World Bank is a long-standing financial and technical partner of the water and wastewater services sector in the Danube region. It currently has more than 10 active projects and programs in 8 of the 11 countries targeted by the Program, totaling close to €1 billion of lending. It also engages in an active dialogue with national and international institutions on challenges such as European integration, utility benchmarking, institutional reforms, and regulation.
The Program is run jointly by the World Bank and IAWD (box 1 and 2). Representatives from both institutions manage the activities supported by the Program on a day-to-day basis, in close coordination with World Bank staff and IAWD partners in the region.

The program works with regional, national, and local stakeholders to:

- Foster a common understanding of the situation of the WSS sector throughout the region
- Promote an informed policy dialogue around the core challenges the sector is facing
- Strengthen the technical and managerial capacity of the sector’s utilities and institutions.

The Danube Water Program supports regional and national activities in the following countries: Albania, Bosnia and Herzegovina, Bulgaria, Croatia, Kosovo, FYR Macedonia, Moldova, Montenegro, Romania, Serbia, and Ukraine. Other countries in the region, such as Austria, Czech Republic, Hungary, Slovakia and Slovenia, are also participating, but do not benefit directly from Program funding (map 1).

**Financing**

The Program is financed through a multi-donor trust fund managed by the World Bank, with a contribution of €9.5 million provided by the government of Austria in two tranches. Activities supported...
by the Program have leveraged an additional €2.5 million, including €900,000 from the Open Regional Funds (ORF) for Southeast Europe (GIZ and Swiss Cooperation) and close to €600,000 from direct beneficiaries, and discussions to engage more funding sources are on-going.

**Partners**

All activities under the Program are carried out with regional, national, and local partners:

- **Policy makers and ministerial staff**—for example, to discuss sector reforms such as the aggregation of municipal utilities in Croatia
- **Regulators**—for example, to improve the collection of data on the performance of utilities in Kosovo
- **National waterworks associations**—for example, to train managers, chief engineers and specialists in the efficient operation of Water Supply and Sanitation (WSS) systems in Moldova
- **Utilities**—for example, to improve energy efficiency in utilities in Bulgaria, BiH, Serbia, and Ukraine
- **Local government associations and officials**—for example, to involve them in discussions on sector and utility governance, through organizations such as the Standing Conference of Towns and Municipalities in Serbia and the regional Association of Municipal Associations (NALAS)

Whenever possible, activities supported by the Program have been developed in partnership with other regional actors and donors such as the Swiss Cooperation, universities and research centers such as the Jarošlav Černí Institute in Belgrade, and professional associations such as the International Water Association. The annual Danube Water Conference, for instance, is jointly organized with the Open Regional Funds of GIZ and Swiss Cooperation. The benchmarking activities are being developed with strong technical support from the International Benchmarking Network (IB-Net) and European Benchmarking Cooperation (EBC). And professionals from the region and beyond are sharing their experience through events and conferences financed under the Program.

“...The combined effect of an aging workforce in the water sector, with relatively unattractive compensation packages versus the private sector, has made attracting and retaining capable personnel a serious challenge. This situation demands a more vigorous recruiting and motivation strategy that speaks to a career and not just a job. For this reason, capacity building of the people, who are in or entering the water sector, based on a professional career path, is crucial to filling today’s needs and to forming a foundation for a strong water supply and wastewater sector in the Danube Catchment countries. The philosophy of IAWD/DWP to work through the national water associations, to bring some of these capacity building programs to water utilities in our countries is a great way of ensuring a sustainable and long lasting after impact. *Stronger water associations make for stronger water utilities!*”

Elisabeta Poci
Deputy Executive Director, Water Supply and Sewerage Association of Albania (SHUKALB)
The World Bank and IAWD have designed the Program to achieve smart policies, strong utilities, and sustainable services (figure 1). To realize this goal, the Program supports activities in five areas of work: sector governance and structure (pillar I); regulation, tariffs, and subsidies (pillar II); benchmarking (pillar III); asset management and investment planning (pillar IV); and service efficiency improvement (pillar V). All pillars are considered to be related, and many activities cut through various pillars to connect stakeholders who should, but typically do not, work together.

The activities supported by the Program fall under four broad categories (tables 1 and 2): analytical and advisory work, which is the development of new research or consolidation of existing material in order to improve the overall understanding of the situation and challenges of the sector in the region, and its use to inform policies in the region; knowledge-sharing platform, where the focus is on exchanging and sharing experiences and lessons among countries, institutions and utility companies; capacity development activities targeting improved water and wastewater services at all levels, from utility companies and their management, to local government representatives, regulatory agencies and ministries; and a competitive grant window to finance local initiatives. The Work Plan, available on the Program website (www.danube-water-program.org), outlines each activity, including its main audience, objectives, and current status.
### TABLE 1: MAIN REGIONAL ACTIVITIES OF THE DANUBE WATER PROGRAM

<table>
<thead>
<tr>
<th>Focus</th>
<th>Activity</th>
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</table>
| Analytical and Advisory policy work | ▶ State of the Sector study  
▶ Review of aggregation experience of water and wastewater utilities  
▶ Services beyond the public utility service areas  
▶ Wastewater management in Danube region |
| Capacity Development | ▶ WSS association strengthening & support  
▶ IAWD Strengthening Support  
▶ Regional Training Partnership  
**Pillar I Sector governance and structure**  
▶ Regional support for WSS sector policies and governance  
▶ Regional EU accession cross-support in water sector  
**Pillar II: Regulation, tariffs and subsidies**  
▶ Regional support on WSS sector regulation  
**Pillar III: Benchmarking**  
▶ Regional PI System initiative (DANUBIS)  
▶ Benchmarking for utility improvement (EBC/Danube)  
**Pillar IV: Asset management and investment**  
▶ Regional asset management program for interested utilities  
▶ Regional TA program to improve utility accessing financing  
**Pillar V: Service efficiency improvement**  
▶ Regional energy efficiency capacity-building program  
▶ Regional commercial efficiency capacity-building program  
▶ Risk Management and Water Safety Planning  
▶ Non – Revenue – Water Reduction  
▶ Performance-Based Contracting |
| Knowledge sharing platform | ▶ Annual regional event  
▶ Participation in key regional events  
▶ DWP Outreach and Communication  
▶ Outreach to strategic partners  
▶ DANUBIS water platform development |

### TABLE 2: PHASE I COUNTRY ACTIVITIES OF THE DANUBE WATER PROGRAM: OVERVIEW

<table>
<thead>
<tr>
<th></th>
<th>Analytical and Advisory activities</th>
<th>Benchmarking activities</th>
<th>Competitive Grant activities</th>
</tr>
</thead>
</table>
| Sub-regional activities |        | ▶ Support to regional EBC/Danube hub for BiH, HR, Ma, Me and Se.  
▶ Support to regional EBC/Danube hub for Albania and Kosovo | ▶ BiH, Me and Se Strengthening Capacity of Water Utilities with Benchmarking |
| Albania          | ▶ Water Supply and Sanitation Sector Support | ▶ Western Balkans Training Center - Framework & Business Model  
▶ Training Course for Business Planning for Water Utility Associations |  |
**Activities and Results**

All the activities and related presentations and photos are documented on the DWP website and can be found at http://www.danube-water-program.org/ under Program Activities or Events.

**Analytical and Advisory Work**

The World Bank has undertaken a state of the sector review of water and wastewater services in the Danube region as well as other analytical work. The State of the Sector (SoS) report (box 3), published in 2015 and available at http://sos.danubis.org/, is the analytical flagship of the World Bank under the Program, and its objective was to create a comparative national and regional information and knowledge basis to focus subsequent policy actions in the water and sanitation (WSS) sector of the participating countries. The report presents a first time study of the water and sanitation sector on a regional level in the countries of the Danube watershed and therefore allows for a comparison between the countries.

The report shows that the EU accession process serves as a motivator to improve access, quality, and efficiency of water services, and that the status of the countries in terms of EU accession is positively related to the level of development of wastewater services. Clear challenges do, however, emerge as countries seek to provide sustainable services to their citizens while meeting the EU environmental acquis and further work needs to be done in response to these challenges. This includes developing models to provide sustainable services in areas beyond the reach of public utilities, addressing potential affordability challenges through well-targeted subsidies, and/or improving the financing and institutional framework for wastewater treatments in those countries with no or limited prior experience. Some of these areas, such as non-public supply in rural areas, are being addressed through new activities financed under the DWP. The State of the Sector report will be updated in 2018.
The State of the Sector review consists of a regional report and 16 country notes and analyzes the access to, organization, performance and financing of the water and sanitation services in Albania, Austria, Bosnia and Herzegovina, Bulgaria, Croatia, Czech Republic, Hungary, Kosovo, FYR Macedonia, Moldova, Montenegro, Romania, Serbia, Slovakia, Slovenia and Ukraine. The results of this activity were presented at the 2015 Danube Water Conference, where the report was officially launched.

The report finds that many countries in the Danube river basin face a double challenge of meeting the high standards of the European environmental acquis while extending sustainable water services to all citizens, leaving 22.5 million people with no access to piped water and 28 million without flush toilets. Despite improvements in the last 15 years, countries across the Danube region still show very different levels of progress in providing sustainable services for all their citizens. Many long-standing EU members have benefited from a generally stable policy environment and a steady stream of EU funding. Access, in particular, to wastewater services has increased, the performance of their utility companies has reached international standards, and the financing of their services is sound. In contrast, more recent EU members, candidate countries and non-EU countries of the Danube region continue to suffer from important public services gaps, especially among the most vulnerable, and from struggling service providers. This leaves millions of people without access, services underfunded, and water sector governance incomplete or unclear. Roughly one-third of water from these service providers never reaches its intended destination.

Despite these challenges, the region can still build on a few important opportunities. The water and wastewater sector is open to change, and if those governments, considering reforms in around a third of the countries, base their efforts on solid analyses, they can continue to build positive momentum for the sector. EU integration continues to present a tremendous policy and financing opportunity for many countries; the widespread adoption of formal regulatory frameworks and utility corporatization reforms can help promote greater accountability; and despite managerial shortcomings, the sector has a strong technical workforce.

The report has been distributed and well received among relevant institutions in and outside the region and presented at several events. Responding to the demand from counterparts in the region, the report and several country notes have also been translated into various local languages, available at http://sos.danubis.org/.

WHERE ARE THOSE WITHOUT PIPED WATER OR FLUSH TOILETS IN THE DANUBE REGION?

22.5 million
Without piped water

28 million
Without flush toilets

<table>
<thead>
<tr>
<th>Country</th>
<th>Number</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ukraine (rural)</td>
<td>9,229,544</td>
<td>41%</td>
</tr>
<tr>
<td>Moldova (rural)</td>
<td>1,489,560</td>
<td>7%</td>
</tr>
<tr>
<td>Romania (rural)</td>
<td>5,097,460</td>
<td>23%</td>
</tr>
<tr>
<td>Romania (urban)</td>
<td>1,476,541</td>
<td>5%</td>
</tr>
<tr>
<td>Moldova (rural)</td>
<td>1,831,909</td>
<td>7%</td>
</tr>
<tr>
<td>Ukraine (urban)</td>
<td>3,210,801</td>
<td>11%</td>
</tr>
<tr>
<td>Bulgaria (rural)</td>
<td>1,464,010</td>
<td>5%</td>
</tr>
<tr>
<td>Romania (urban)</td>
<td>1,767,641</td>
<td>5%</td>
</tr>
<tr>
<td>Moldova (rural)</td>
<td>1,831,909</td>
<td>7%</td>
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<tr>
<td>Ukraine (urban)</td>
<td>3,210,801</td>
<td>11%</td>
</tr>
<tr>
<td>Romania (rural)</td>
<td>9,401,696</td>
<td>33%</td>
</tr>
<tr>
<td>Bulgaria (rural)</td>
<td>1,464,010</td>
<td>16%</td>
</tr>
<tr>
<td>Romania (urban)</td>
<td>1,767,641</td>
<td>5%</td>
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<tr>
<td>Moldova (rural)</td>
<td>1,831,909</td>
<td>7%</td>
</tr>
<tr>
<td>Ukraine (urban)</td>
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<td>11%</td>
</tr>
<tr>
<td>Romania (rural)</td>
<td>6,403,447</td>
<td>23%</td>
</tr>
</tbody>
</table>

Source: Authors’ elaboration from SoS data collection.
The process of EU integration and the resulting requirement for harmonization of national legislations with the relevant EU water directives represents a driving factor of change in the water sector throughout the Danube region. Since almost all DWP countries that are not EU members yet have declared their objective toward EU membership, the need to build knowledge on requirements and consequences of EU integration for the water sector, is being addressed by using the knowledge that already exist among EU members from the region. Against this backdrop, the topic has been discussed at the annual Conference for several years, in-country support has been provided in Serbia and Montenegro and a cross-country support workshop has been organized in Croatia. There, a former head of the water department of the European Commission and member of the European Commission negotiation team for Chapter 27, presented the key EU water directives and shared his experience on the objectives and challenges of their transposition into national law, and the EC’s approach to negotiations with individual countries. Together with him, a team from Croatian Waters shared their expertise and answered questions from the participants, who all find themselves in various stages of the EU accession process. The workshop was complemented by a field visit to the new waste water treatment plant at Slavonski Brod, financed from EU funds, to offer participants an insight what EU integration means in practical terms.

In the past 10 years, countries in the Danube region have been part of a trend toward greater regulation of water and wastewater service provision. Of the 11 countries covered by the Danube Water Program, 7 have a regulatory authority that oversees the water sector: Albania, Bulgaria, Croatia, Kosovo, Moldova, Romania, and Ukraine. Of these regulatory agencies, only the Albanian Water Regulatory Authority was created before 2000. Others were established or assumed regulatory functions over water services in the past 10 years. IAWD and the World Bank have been engaging with water sector regulators to support these relatively young agencies in developing their regulatory capacities. A series of activities have been rolled out, aimed at equipping regulators with tools to improve their performance. Starting with a workshop in Florence in 2013, side events at each annual Conference are being convened and in 2015, a regulatory benchmarking training was organized in Pristina, to think about more advanced benchmarking techniques and how to effectively use utility performance data on a daily basis. Additionally, the further development of the DANUBIS platform to include a Data Collection and Management (DCM) system, replacing current, paper- or Excel-based systems, was decided and is in full swing.

Capacity building activities have focused on tariff setting methodologies, regulatory benchmarking, political economy of regulation, and the independence of regulatory authorities. Participating regulators have expressed interest in continuing to engage in regional exchanges and country-to-country learning, possibly under the auspices of the Energy Regulators Regional Association (ERRA) or the Network of European Water Service Regulators (WAREG) and outreach to new regulators is being pursued in Moldova, FYR Macedonia and Czech Republic.
Box 6: DANUBIS.org Water Platform

DANUBIS.org (Danube Utility Benchmarking and Information Sharing) is an online repository of resources for and about water and wastewater services and services in the Danube region. It was jointly developed by the World Bank and IAWD and officially launched at the Danube Water Conference in May 2014. The platform covers all countries within the Danube watershed and is a one-stop location for WSS resources, including a comprehensive utility performance database and relevant studies, news, events, and training opportunities.

DANUBIS.org includes a regional, public performance indicator system for water supply and sanitation utilities in the Danube region, in order to allow for country and utility performance data comparison. It is based on the methodology, data sources, and information technology (IT) solution of the International Benchmarking Network (IB-Net), but also provides customized information for stakeholders in the Danube region and includes a broad set of regional resources. It is guided by a steering group representing most of the countries in the watershed and builds on the data and information of national institutions (regulators, line ministries, and utility associations), making the information comparable across countries. Since its launch, DANUBIS.org has collected data on 600 utilities from 14 countries and has been visited by more than 7500 distinct users in close to 50 countries from the region and beyond. Improvements of the platform are continuous, taking into account comments by the Steering Committee which meets every six months, and by users and developers.

Building on the regional platform, institutions in several countries have also taken the initiative to develop a national portal, in local language, to highlight resources and information specifically related to their reality. The platform and national portals are accessible at www.danubis.org and a separate brochure about its main features is available as well. In order to support the creation of institutional benchmarking systems in countries that currently lack them, the Program is also supporting the launch of a Data Collection and Management platform to operate under DANUBIS for those countries interested (including Kosovo, Montenegro and Serbia).
In addition, regional and national advisory activities support specific policy dialogue and advice to WSS institutions about how to modernize the sector, often in parallel with existing World Bank engagements (box 4). For example, support is being provided to the recently formed regulators in Croatia, Ukraine, and elsewhere in efforts to strengthen their country’s regulatory mechanisms (box 5); the European accession process in Serbia and Montenegro is being informed by technical assistance and regional exchanges, among others. Utility sector consolidation is being considered in several countries, including Albania, Bulgaria, Croatia, and Ukraine, which are keen to continue learning from good (and less so) regional practices. Kosovo has received specific advice on innovative public-private partnership models to improve utility performance and support for a comprehensive sector reform in Albania is on-going.

**Box 7: Annual Danube Water Conference**

The Danube Water Conference (DWC) is the Danube Water Program’s flagship event, taking place in Vienna every May since 2013. Every year the focus is put on a different topic, ranging from “Smart Policies, Strong Utilities, Sustainable Services”, over “From Challenges to Opportunities”, and “The State of the Sector” to “Addressing the Double Challenge”. Over the years, the conference has evolved into a must-attend event for key water and sanitation sector and municipal government representatives from the Danube region, to discuss challenges and opportunities in the sector and ways to jointly achieve smart policies, strong utilities, and sustainable water services.

Each edition gathers around 150 key sector representatives from entities such as national utility associations, the regional network of associations of local authorities, water and wastewater utilities, line ministries, regulatory authorities, the donor community and other international associations to discuss progress made and challenges lying ahead in the water supply and sanitation sector of the Danube region. The two-day conference is designed around one or two main topics and offers a great number of plenary and smaller parallel sessions on more specific topics. The day before the Conference is used to bring together different groups of stakeholders in a smaller setting, including regulators, the DANUBIS Steering Group or IAWD members, to discuss specific issues. These meetings together with main event strengthen the cooperation between the stakeholders and facilitate knowledge exchange between the parties.

“Ivan Ivanov
President, Bulgarian Water Association

“Networking. Before the Danube Water Program we had a lot of members in the Bulgarian Water Association who wanted to have more contact with neighboring countries but it was not so easy [...]. Now we have good relationships with the other members because of the Program which helps us with this kind of events and facilitates communication. And this is what we need.”
Knowledge-Sharing Platform

With funding from the Danube Water Program, the World Bank and IAWD create opportunities for water sector professionals to access and exchange information within and among countries in the region and beyond. In their effort to provide a knowledge-sharing platform, a variety of mechanisms are being offered under the DWP, including major annual conferences, technical workshops, and study tours. The two institutions have also launched an online platform (DANUBIS.org) to provide easy access to sector and country resources and facilitate comparisons of the performance of utilities within and across countries. DANUBIS.org has become the largest and most complete repository of resources for and about water and wastewater services in the Danube region (box 6) and attracts a growing number of users.

Recognizing that online platforms do not replace personal exchanges, the World Bank and IAWD have and will continue to create spaces for high-ranking professionals and stakeholders in the sector to learn from and exchange information with each other, first and foremost through the annual Danube Water Conference (box 7). The Conference is designed to ensure continuous interaction between different types of actors involved in water services (national governments and line ministries, regulators, utility associations, utilities and municipal associations, and municipalities). The cross-sectoral and inter-country dialogue created by this annual conference has been instrumental in creating a sense of community and helping professionals in the sector to build relationships and to understand the needs and concerns of other sectors as they relate to decisions in the water sector.

Box 8:  
Asset Management

Effective asset management is an important step toward guaranteeing the sustainable operation of a utility. Recognizing that many utilities in the Danube region do not have organized and systematic information, IAWD has facilitated a program to create awareness of asset management procedures, principles, and methodologies and to ensure that these practices become a standard part of the operations of every utility.

IAWD hired Hydro-Comp Enterprises and Belgrade Waterworks to design and implement this program, selecting a group of 17 interested water supply and sanitation utilities from Bosnia and Herzegovina, FYR Macedonia, Montenegro and Serbia. The team developed a work plan, conducted an initial analysis of the 17 utilities, launched the asset management hub at Belgrade Waterworks and Sewerage, procured requisite hardware and set up a WebGIS and CRM application to allow utilities fast and easy access to their network data, as well as to facilitate reporting and communication between them.

Subsequently, the AM hub held four workshops between June 2014 and September 2015, bringing all participating utilities together for a sequence of activities. Hydro-Comp started by raising data for their utility assessment through a questionnaire, which touched upon issues such as network data availability, the existence of GIS or CAD systems, and operations in zoning, bulk metering and leakage control. Based on the status quo, the hub team classified the utilities into three groups for tailored further activities. For each utility, expected performance improvements resulting from activities to address technical and commercial issues were calculated. Based on these assessments, GIS Data Evaluation Reports were developed for eight utilities, while existing data allowed the elaboration of more detailed Network Data Validation Reports for four utilities. Additionally, three of the most advanced utilities carried out a Commercial Data Evaluation (CDE) with the assistance of the hub. Results of the project were disseminated through a periodic newsletter and at several regional conferences. The program is an integral part of D-LeaP and due to its success and nature, NALAS — with the support of GIZ — built up on the program results to develop reports relevant for local government units, or more specifically municipal decision makers.

![Final Asset Management Workshop in Belgrade, Serbia.](image-url)
High energy costs often contribute to unsustainable operating costs that directly affect the financial health of WSS utilities and the affordability of their services. Improving energy efficiency is key to reducing the operational costs of these utilities. Energy represents the largest controllable operational expenditure of most WSS utilities, and many energy efficiency measures have a payback period of less than five years.

In light of the above, the World Bank launched a capacity building program to improve the energy efficiency of WSS utilities in Serbia, Romania, and Ukraine. The World Bank, supported by the Econoler team, selected 36 utilities and supported them to deliver an energy audit report and seek suitable financing for the implementation of their energy efficiency project. Out of the 20 utilities that reached the final phase, 18 submitted an energy audit report and seven were able to secure the financing of their energy efficiency projects, representing a total of €2,362,920. The audits identified 22 M MWh/year in (largely electromechanical) savings, €2.5M/year cost savings, €6.2M in needed investments and payback periods of 2 – 5 years.

In addition to submitting a final report, a final revised version of all relevant training material and tools for future use was also compiled. To facilitate the replication and scaling-up of the initiative by national water utility associations, detailed lessons learned were collected. Training material was developed and translated into Albanian, Bosnian, Bulgarian and Romanian and additionally a brochure on the program was produced and distributed.

The Program on Commercial Efficiency and Business Planning in water supply and sanitation utilities in Southeast and Eastern Europe consisted of both capacity development workshops on business planning and of targeted technical assistance. For the design and implementation of this program, IAWD hired a consortium led by Valu Add Management Services based in Tirana, Albania. Valu Add contracted national experts for Moldova, as well as for Kosovo, FYR Macedonia and Montenegro.

In a series of three consecutive workshops held in both the Western Balkans and in Moldova in March and April 2015, the consortium introduced pairs of senior management staff of 21 utilities to the concept of business planning and guided them towards setting up such plans for their companies. Nineteen out of the 21 utilities successfully completed business plans.

In the last phase of the project, the consortium provided targeted technical assistance to the 15 utilities showing the strongest commitment and best expectations of success. Five of the selected utilities are located in Kosovo, one in FYR Macedonia, six in Moldova, and three in Montenegro. The technical assistance consisted in on-site visits by international experts and by the national experts, monthly video conferences, and two joint workshops for the Western Balkans and Moldova, respectively.

The experts provided technical assistance in fields such as developing procedures to reduce commercial losses, supporting the meter zoning process, and developing procedures for increasing billing collection rates. The project team has been in close contact with the relevant national water utility associations and with involved utilities through the local national experts, who in addition provided invaluable assistance in reducing language barriers.
In close coordination with the other benchmarking projects under the DWP, the objective of this on-going activity is to support utilities in collecting the information they need to make improvements to their operations. The program supported the development of a system of utility benchmarking involving a first group of around 40 utilities through four regional hubs. IAWD and the World Bank teamed up with the European Benchmarking Co-operation (EBC) and with national water supply and wastewater utility associations to establish sustainable benchmarking routines in Southeast, Eastern and Central Europe. Four associations volunteered to create regional hubs in accordance with the EBC operating structure, focusing on utilities in Kosovo and Albania, Ex-Yugoslav countries, Bulgaria and Ukraine.

In May 2014 and March 2015, the coordinators of each hub received training from EBC in The Hague, Netherlands. The recruitment and training of utilities was put into the hands of the hubs, which guide their utilities through EBC’s 7-step benchmarking methodology in their local languages.

The hubs for Bulgaria, Ex-Yugoslovia and Kosovo & Albania organized a first round of workshops for their utilities starting in summer 2014, where they processed performance data from 2013. Kosovo and Albania have since then conducted a second benchmarking cycle. In Ukraine, benchmarking efforts started with a delay, but are now in their first round.

During the first year of this activity, EBC played a leading role in this project’s development and implementation, but is gradually shifting the responsibility towards the four regional hubs.

The number of participating utilities increased from 36 in 2014 to 58 in 2015. The objective is to attract and include additional utilities over the next years. All participating utilities submit their performance data to the DANUBIS Water Platform and the platform of the IBNET International Benchmarking Network for Water and Sanitation Utilities. In addition to improving their own performance, they broaden the scope of these benchmarking fora and help others compare themselves with their peers.

Leading utilities are motivated to continue the process of collecting data on their performance and comparing this with other utilities in the region and in Western Europe. The program will continue to support this effort in order to achieve sustainability of the initiatives begun for those utilities who want to continue to participate in this effort. The EBC experience in the Danube region and elsewhere shows that voluntary benchmarking organized through regional hubs builds capacities, enables local ownership of the project, and promotes learning from best practices. Participating utilities show strong interest and commitment to the benchmarking effort in their companies.
Darius Bör
Financial Expert at Satu Mare (Romania)

“The interactions between the participants and opportunity for knowledge and experience sharing between colleagues in charge of energy efficiency in the water sector, were by far the main benefit of the project.”

MAP 2: CAPACITY BUILDING ACTIVITIES UNDER THE DANUBE WATER PROGRAM
Grant on Developing a Training Course for the Preparation of a Strategic Business Plan for Water Associations

SHUKALB, the Water Supply and Sewerage Association of Albania, was one of 14 selected entities to receive a competitive grant from IAWD. The overarching goal of this project was to strengthen the capacities of water and wastewater associations in the Danube region, to make their work more structured and effective, thus allowing for greater leverage and better performance.

This training course guided the associations through the preparation of draft business plans for their operations. To facilitate this, SHUKALB developed a full set of course material on business planning for water supply and wastewater associations, including a guide for trainers, a manual for trainees, a supporting PowerPoint presentation, and an Excel business plan model. In twelve modules, the course guided trainees towards their own business plan. The modules ranged from defining the value and roles of associations, to membership governance, setting strategic goals, and updating the 5-year business plan.

In February 2015, SHUKALB organized a training workshop with 38 participants from 11 associations of the Danube region, plus representatives of IAWD and EWA, the European Water Association. With assistance from the trainers, the participants went through all twelve of the course modules and drafted business plans for their associations. Participants of this workshop can now serve as trainers for their colleagues in their own water and wastewater associations.

As the water supply and wastewater sector in Southeast, Eastern and Central Europe is facing great changes and challenges, the associations can be a driving force in adapting to new circumstances and in improving services. They are the voice of the sector in policymaking processes, while also being of central importance in training and capacity development of the region’s utility workforce.

A network of strong associations will therefore be crucial for the successful and sustainable implementation of region-wide capacity development efforts, as stipulated by the associations and IAWD.
In addition to major conferences, exchanges among key stakeholders are being supported. For example, regular meetings chaired by IAWD have brought together water utility associations to exchange experience and develop common programs. An important topic of these meetings has been how to best create synergy in undertaking training and capacity building programs for their constituents. The associations have committed to continuing working together and sharing experiences related to business models that strengthen their ability to support their members.

**Capacity Development**

Since the launch of the first capacity building activities, 108 utilities have taken part in one or more of the on-the-job capacity building programs offered by IAWD and partners under DWP and ORF/GIZ financing, including Energy Efficiency (33), Asset Management (18), Commercial Efficiency (21) and Utility Benchmarking (57). Those programs yielded very concrete results, such as the identification of €10 million of energy efficiency investments yielding 35% energy savings, the preparation of business plans for 19 utility companies, and the establishment of 17 utility asset registers.

The focus of those initial programs was to test various approaches and demand from utilities, and a program fee was requested from all participants to evaluate willingness to pay, although the amount (€1,000 for large utilities and 500 for small ones) was not set at cost recovery level. In total, over €50,000 were collected from participating utility companies, which also covered parts of their own costs of travel and accommodation.

The first phase of the Program showed that there was an unmet demand for high-quality, on-the-job capacity building. A November 2015 Survey on Capacity Building Programs conducted by IAWD, found that only around 50% of respondents were satisfied with the capacity building options available in their country. The rest pointed out the benefits of international and interregional cooperation to enhance the quality of those options, in particular because of the opportunities to exchange experience and knowledge and establish a network of people working on similar problems.

Therefore, the main focus under the second phase is on the development of D-LeaP, the Danube Learning Partnership for sustainable water and sanitation services, as an integrated, sustainable and effective capacity building partnership of waterworks associations in the region. A detailed proposal for expanding and building upon the success of capacity building initiatives has been developed by IAWD in cooperation with national water utility associations. D-LeaP is designed to offer more extensive and regionally organized capacity building programs that are moving quickly towards economic sustainability for the programs, following the initial support of the Program in developing the curriculum.

**Competitive Grant Window**

The Program has supported one cycle of competitive grants in 2013 and a second one in early 2016. The grants are designed to support innovative and creative ideas from organizations throughout the region to address challenges they are facing. The window serves as a vehicle for local stakeholders to access financing for projects they consider priorities in their entities, and that match the topics of the Program. IAWD supports the best projects by covering the bulk of the expenses in a range of up to €50,000, while all recipients commit to co-fund the activities up to a certain level. All projects need to be connected to other activities associated with improving water supply and wastewater management.

The first round of projects were supported with a total of over €700,000 and concluded in October 2015. Out of 71 applications, IAWD selected the 14 most promising projects. The successful contenders hailed from 10 different countries in the region. Some examples of supported projects include: the training of utility managers and engineers through AMAC of Moldova; the development of a GIS network database in East Sarajevo, Bosnia and Herzegovina; the reduction of Non-Revenue Water in Kumanovo, FYR Macedonia; the development of a training course for business planning for water utility associations by SHUKALB of Albania, and a capacity-building program for utilities in Montenegro, Bosnia and Herzegovina and Serbia.

The second round of grants yielded 47 applications, showing continued interest from the region for bottom-up activities.
BUILDING SUSTAINABILITY

The first phase of the Program supported the development and launch of more than 40 individual policy advice, knowledge sharing and capacity building activities in different fields, such as regulatory frameworks, energy efficiency and asset management, facilitating knowledge-sharing through various events and platforms, and the creation of a regional analytical review to inform policy dialogue. Many of the activities have been developed together with existing institutions, sometimes on a policy of cost sharing, but they still rely on continued support. The focus of the Program’s second phase is therefore, on ensuring the institutional and financial sustainability of those activities beyond the duration of the Program itself.

This endeavor is strengthened by the support of partners and beneficiaries in the Danube region. The results of the latest annual Client Satisfaction Survey, which yielded close to 80 responses from more than 15 countries, showed high overall satisfaction with the current activities implemented under the DWP (90% being satisfied or very satisfied), in particular with regards to knowledge-sharing (almost 70% rated the annual conference as excellent or satisfactory) and...
analytical and advisory work (46% finding it very good). In addition, there is also strong interest by respondents in continuing their involvement in such activities.

Against this backdrop, the World Bank and IAWD are working on the following legacy initiatives:

**Inform and support the region’s sector modernization efforts with evidence-based policy advice**

The preparation of the first State of the Sector report revealed important gaps in the provision of services in rural areas and therefore the Bank team is preparing a regional review of the current mechanisms for service provision among those areas and populations not covered by public supply. Additional efforts are directed at analyzing the actual impact and good practices in the regionalization of utilities, a common policy response to the current sector challenges in the region and one that warrants closer investigation. Sustainable wastewater management remains a challenge for many countries of the region and will also be the subject of a specific analytical review.

Building on the recently completed first report and reviewing developments and progress made since 2015, a second edition of the State of the Sector will be launched in 2018. Besides those regional efforts, policy challenges at national level are being addressed where demand has been expressed, and in conjunction with the World Bank’s overall engagement in key countries, including Albania, Bosnia and Herzegovina, Croatia, Serbia and Moldova. In the coming years, the World Bank will seek to further deepen its policy engagement in support of sustainable services for all.

**Establish D-LeaP, the Danube Learning Partnership for sustainable water and wastewater services, as a joint initiative of IAWD and the national waterworks associations to build the managerial and technical capacity of utility companies and their staff.**

Based on the pilot experiences of the last years and through extensive consultation with key partners, IAWD and waterworks associations have set up D-LeaP the Danube Learning Partnership. D-LeaP’s offer in essence consists of a set of capacity building programs that are developed at regional level and delivered at national level by waterworks associations and local partners. D-LeaP and its partners deliver to participating utilities and professional staff three main types of capacity building programs as part of a virtuous cycle of Check – Plan – Do performance improvements. These are:

- Foundation Programs (including Utility Benchmarking and Management Development)
- Technical Programs (including Energy Efficiency, Nonrevenue Water Reduction, Commercial Efficiency, Asset Management and Water Safety Planning and Emergency Response)
- Implementation Programs (including Access to Financing, Performance Based Contracting, Bilateral Utility Programs and In-depth Technical Assistance)

The primary target audience of D-LeaP programs consists of the water and wastewater utility companies of the countries in the Danube region and their management and technical staff, with an estimated core target audience of around 1200 utility companies and 135,000 utility staff. D-LeaP will be established and governed by the Partners of the Partnership (IAWD and the Partner Water Utility Associations), therefore contributing to the strengthening of both IAWD and national water associations, and support the latter in the development of business plans to enhance the sustainable impact of the activities. To deliver its multiple programs in various countries, D-Leap relies on five types of actors with different roles and responsibilities, building on the experience of the past years. D-LeaP has been established on the premise that the costs of running capacity building activities must be fully covered from fees collected from the participants (or organizations supporting them) in the long term.

**Develop, under the auspices of IAWD and its national partners, a durable network of water services professionals throughout the region.**

The Danube Water Conference continues to take place annually in partnership with other financiers such as GIZ and the Swiss Cooperation. In order to make the conference a self-financed event, financial contributions to participants have started to be gradually reduced to ensure the sustainability beyond the duration of the DWP. IAWD and national waterworks associations are also using Program support to prepare and implement more ambitious institutional development plans. Those aim to establishing the associations as the cornerstone of national and regional networks of professionals involved in improving the sector’s situation.
Consolidate and maintain, at national level and through DANUBIS.org a permanent base of information and knowledge on the state of water and wastewater services in the Danube region.

The ongoing expansion of the DANUBIS.org water platform, as a knowledge repository for and about water utilities that features news, events and resources covering the water sector in the region, as well as the extensive utility performance database and country portals also aims at providing a lasting and useful tool for stakeholders in the region and beyond. National Utility Performance Assessment (Benchmarking) Systems in Bosnia and Herzegovina, Kosovo, FYR Macedonia, Montenegro and Serbia are also being supported to provide a stronger evidence based for utility managers and policy makers.

In addition, a utility performance data collection and management (DCM) platform has been developed under DANUBIS. The DCM platform is designed to improve the quality and ease of management of utility data in the participating countries. It enables utility companies to enter utility performance data in an amicable web interface, helps national institutions check the quality and consistency of the data provided and manage and safeguard the data in a secure manner. It additionally provides utility managers with a simple scorecard of their performance over time and against targets and ensures a linkage to the DANUBIS data platform and the national country systems, for reporting and further processing purpose.

“In the first phase, utilities in the region have shown strong enthusiasm and appetite for improving themselves through the capacity building activities offered by the Danube Water Program. IAWD is committed, in the second phase, to building upon this success a long-term sustainable basis for managing and delivering capacity development activities, together with the National Water Utility Associations. Efforts will be made to ensure the continuation and financial viability of the Danube Water Conference, maintaining DANUBIS, and continuing the strengthening of IAWD itself as a regional platform for water utilities. I am confident this can be done.”

Vladimir Taušanović
President, International Association of Water Supply Companies in the Danube River Catchment Area (IAWD)
“Southeast Europe is going through momentous changes on its journey towards greater EU integration. At the same time the World has just adopted ambitious Sustainable Development Goals of achieving universal access to safe and affordable water and sanitation services by 2030, while managing our water sustainably. This double challenge is a call for action: through our daily work, we see first-hand the need to pair universal access to services with sound water resource management; to connect investment financing with institutional and policy reforms and to help grow and connect capacities and experiences across the region’s utilities and governments. The Danube Water Program, with the support of the Austrian Government, allows us to work with IAWD and others to deliver **smart policies, strong utilities, and sustainable services** for all.”
For further information

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