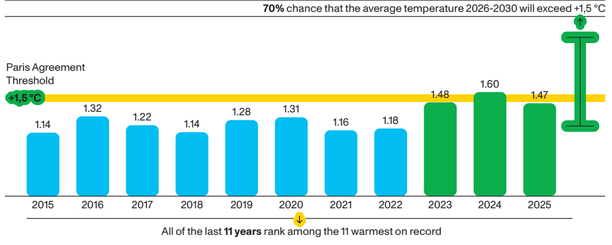
The Mission of the Value of Water Community

To be the multi-stakeholder think tank for the development of scenarios, strategies and policies in support of the extended water supply chain and its development to aid Italy in becoming a European and world benchmark

1 The “Planet Water” and the challenge of climate change

Figure 1
Trends in global temperature anomalies (°C var. vs. pre-industrial period), 2015-2025.

→ TEHA Group elaboration on Copernicus data, 2026.



→ **With a temperature anomaly of +1.47 °C, 2025 is the 3rd warmest year ever**
→ Climate change **intensifies the "too much water, too little water" paradox:** rising temperatures are negatively correlated with renewable water availability and positively correlated with the intensification of extreme weather events
– After the drought of 2022, renewable water availability increased in 2024 (+14.3% vs. historical average) due to abundant rainfall in the North but **drought persists in the rest of Italy**
– Italy in 2025 registered 1,100 episodes of intense rainfall and 139 urban floods, a sharp increase compared to the 2000-2005 average (45 rainfalls and 3 floods per year)

Figure 2
Climate-related economic losses* in EU27 Countries (Euros per capita), 2022-2024. (*) The indicator measures economic losses due to meteorological (storms), hydrological (floods, mass movements) and climatological (heat waves, cold waves, droughts, frost) events.

→ TEHA Group elaboration on Eurostat data, 2026.

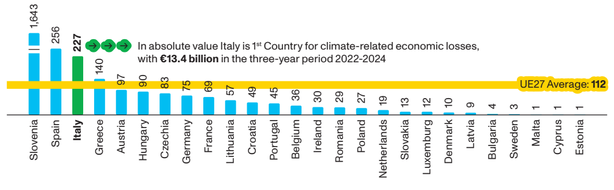
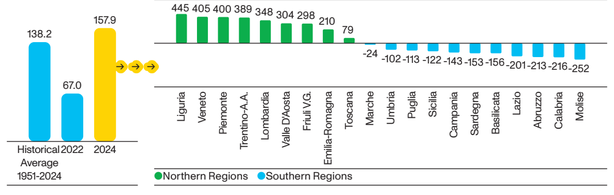


Figure 3
Total annual renewable water resource availability in Italy (billions of m³ and var.%), average 1951-2024, 2022 and 2024

Figure 4
Change in total annual renewable water resource availability compared to the historical average for Italian Region (mm), average 1951-2024 vs. 2024

→ TEHA Group elaboration on ISPRA, IPCC data and Report of the National Extraordinary Commissioner for the adoption of urgent interventions related to the drought phenomenon, 2025



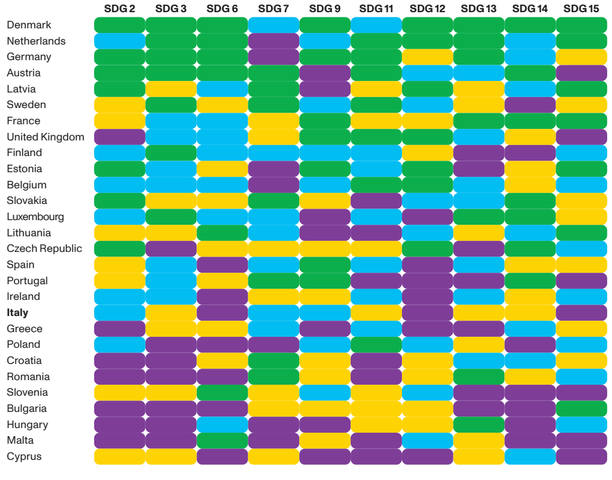
2 Water management in Italy and the value of the extended supply chain: evidence from the Value of Water Observatory

→ For a **summary overview of the sustainable management of water resources in Italy in comparison with the European context**, the Value of Water Community has:
– Identified 39 Key Performance Indicators (KPIs) related to the 10 Sustainable Development Goals (SDGs) impacted directly or indirectly by water
– Constructed the "Value of Water towards the Sustainable Development 2026" Scoreboard

Figure 5
Scoreboard «VASS '26»: Italy vs. EU27 Countries + UK.

→ TEHA Group elaboration on various sources, 2026.

N.B. The 10 SDGs: SDG2 – No poverty; SDG3 – No world hunger; SDG6 – Clean water and sanitation; SDG7 – Renewable energy; SDG9 – Innovation and infrastructures; SDG11 – Sustainable cities and communities; SDG12 – Responsible consumption; SDG13 – Climate action; SDG14 – Aquatic flora and fauna; SDG15 – Terrestrial flora and fauna.



Italy's ranking within the European context:
0 SDG from 1st quartile
3 SDG from 2nd quartile
4 SDG from 3rd quartile
3 SDG from 4th quartile

→ The database reconstructed by the Value of Water Community contains nearly **2 million** active companies in 26 two-digit ATECO codes and 74 three-digit sub-codes

Figure 6
Value Added generated by the extended water supply chain in Italy (billions of Euros), 2024

→ TEHA Group elaboration on Istat, AIDA data and sector interdependencies tables, 2026

N.B. The total value of the water section as a production input has been discounted from the values already included in the analysis of the direct, indirect and induced extended water cycle, in order to avoid double counting.

20% of the Italian GDP depends on water resources
€384 billion of Value Added in Italy in 2024

€352.5 billion (≈ 2023)
€0.3 billion (-11.5% vs. 2023)
€19.9 billion (+2.0% vs. 2023)
€11.2 billion (+3.5% vs. 2023)

Data Center
(€1.4 billion)
Energy sector
(10,000 companies; €25.6 billion)
Water-intensive manufacturing companies
(330,000 companies; €281.2 billion)
Agricultural sector
(1.1 million businesses; €43.9 billion)

x1.8
Economic multiplier

for every Euro of Value Added generated by the integrated water service, an **additional €1.8** in the entire economy

●Water as a production input: agriculture, water-intensive industries, energy companies and data centers
●Municipal management
●Extended water cycle (indirect and induced)
●Extended water cycle (direct impact)

Main partner

Partner

Junior partner

Strategic Report 2026

Value of Water

7th Edition

Conceptual map

TEHA

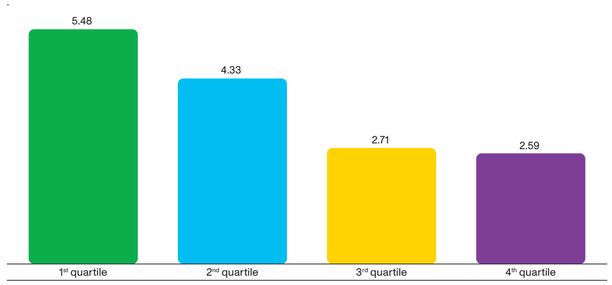
COMMUNITY PRENDIAMOCI CURA DELL'ACQUA

3 How to finance the sustainable transition of water in Italy

The role of the tariff in Italy

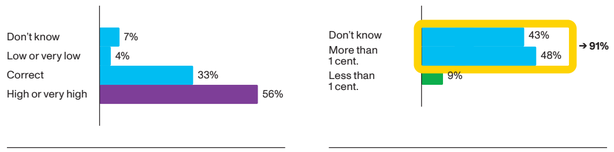
Figure 7
Average tariff level of the Integrated Water Service of the EU27+UK countries by quartile of positioning in the «VASS '26» Scoreboard (Euro/m³), 2024.

→ TEHA Group elaboration on various sources and GWI, 2026.



→ Countries having the highest Integrated Water Service tariffs show a higher performance in the «VASS '26» Scoreboard
→ **The tariff in Italy is among the lowest in the EU27** (18th), with an average level of 2.5 Euro/m³ (+26% vs. 2019), 30% lower than the EU average (3.6€/m³).
→ Although more than half of citizens (56%) consider the cost of water service to be "high" or "very high", 91% are unable to quantify it correctly

Figure 8
Survey of the Value of Water Community to Italian Citizens (values %), September 2025

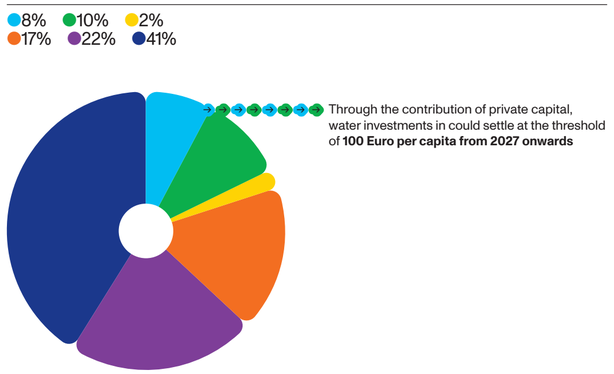


Future sources of funding

→ At European level, the objectives of the **new Water Resilience Strategy** require significant investment (€78 billion per year) but 23% of the necessary funds are still uncovered
→ According to the water service managers represented by the Value of Water Community, **the tariff will remain the primary source of investment for water service managers (41%)**, while private capital could account for 18% of investments in the post-PNRR period:
– **+10% through Public-Private Partnership**, also in light of the adoption of the New Public Contracts Code (2023)
– **+8% through the use of private capital** considering the high eligibility to the EU Taxonomy of Italian managers (90%) and the recent development of Blue/Water Bonds

Figure 9
Answers to the question «What are the main sources of financing that you plan to adopt for investments in the post-PNRR period?» (values %), 2027

→ Survey of the partners of the Value of Water Community, September 2025



→ Through the contribution of private capital, water investments in could settle at the threshold of **100 Euro per capita from 2027 onwards**

4 Starting from education and skills for a new sustainable and digital water supply chain

→ Italy has a water resource exploitation model not much oriented towards efficiency and waste reduction:
- With a water footprint of 130 billion m^3 consumed, Italy is the **most water-intensive Country in the EU27**
- Italy has the highest **per capita consumption of bottled mineral water** in the EU27 (249 liters per capita)
- Each Italian consumes 62 m^3 of drinking water per capita per year (3rd place in the EU)

→ **The pilot project in Italian schools** of the Value of Water Community (6,000 students involved in 2025) acted as a vector of awareness on the importance of water resources, bringing students and their families closer to sustainable consumption habits

Figure 10
Correct answers to questions on knowledge of the water sector before and after the Water Kit administration (% of total), 2025.

→ Survey of schools by the Value of Water Community, January 2026

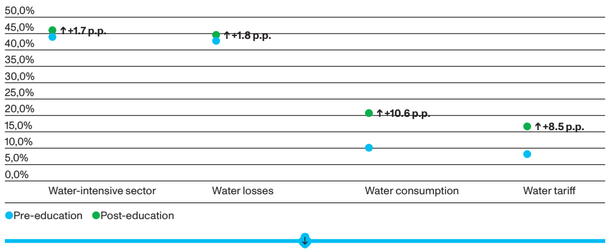
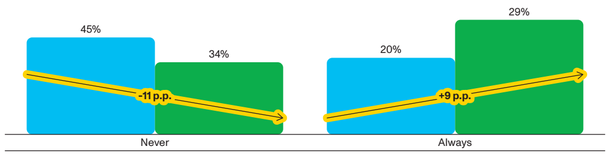


Figure 11
«Does your family regularly drink tap water?» (% of total), 2026



- The Integrated Water Service managers unanimously consider **smart technologies the first investment priority**
- Alongside digitalisation, the issue of skills emerges: 76% include **staff training among the top three priorities** for the sector
- However, **the professional figures considered most important coincide with those most difficult to find**

Figure 12
Top 5 answers to the question: "What are your main investment areas for the next 2-3 years?" (% values, multiple choice possible – max 3 answers), September 2025

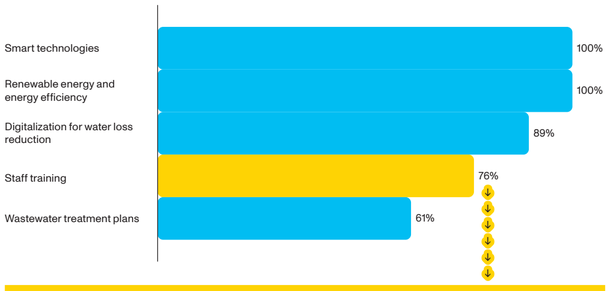
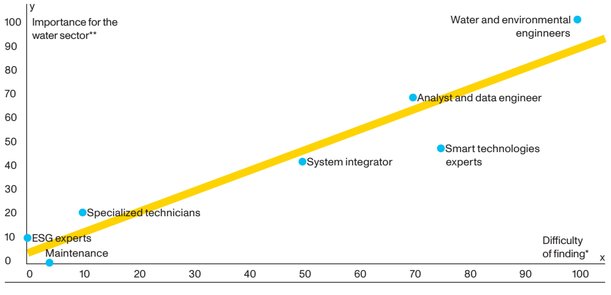


Figure 13
Correlation: difficulty in finding* – x-axis – importance for the water sector** – y-axis – of professional figures in the water sector (index value, min=0 and max=100), 2025 (*) «How key do you consider the following professional figures to be for the development of the water sector?» (**) «How difficult is it to find the following professional figures with adequate skills?»

→ Survey of the Partners of the Community Value of Water, September 2025



5 What to do to strengthen the development of the extended water supply chain: the agenda for Italy

1 Challenging vision for a more sustainable water supply chain and Country

Affirm Italy as a **sustainable Country**, starting from the **efficient, local and circular management of water resources**, capable of attracting investments and technological innovations along the extended supply chain, with an authoritative influence at European level and which intends sustainable water management a **competitive and development asset**

2 Creating enabling conditions for sector concentration

- Promote **industrial water management** through the consolidation of the sector and the simultaneous reduction of private management, especially in the South of the Country
- Complete the process of **districting the Italian water network** on a large scale
- Strengthen and fully deploy the effectiveness of the **Public Debate and citizen involvement in the acceptance of large strategic investments in water management**, through adequate powers for the National Commission and a better definition of time limits

3 Relaunching investments also through the leveraging of public and private funding

- Ensure **compliance with the PNRR timelines** by developing a strategy for the efficient and rapid use of funds dedicated to the extended water supply chain
- Enable growth in the volume of investments in the water sector in order to maintain an investment rate of **100 Euro per capita by industrial managers**
- Continue to propose **efficiency standards in the implementation of investments** through public funds, following the lessons of the PNRR and a new performance-based approach
- Address the **investment gap** to be addressed once the PNRR funding expires, using **Sustainable Finance tools** (e.g., Blue/Water Bonds) or allowing the entry of **private capital** (e.g., Public-Private Partnerships, Water Credits, Volumetric Water Benefits)
- Support the candidacy of the extended water supply chain as **the first italian "benefit supply chain"**

4 Tariff adjustment as a financial aid to raise awareness of correct water use

- Enable a tariff update that **takes into account the maintenance and operating costs of new infrastructure**, starting with the quaternary purification system
- Recognize, through dedicated financial instruments consistent with the current framework of competences, the operational and maintenance activities carried out to protect the hydraulic resilience of the territories
- Promote collaboration between water managers, the extended water supply chain and reference municipalities for the development of **a City Resilience Plan for extreme events**, looking at Nature-Based Solutions in the urban context
- Recognize, both through an adjustment of the tariff level for the Integrated Water Service and through targeted funding, the **costs of communication and awareness** regarding the correct use of water

5 Infrastructure upgrade with a view to increasing water storage and circularity (Circular Water)

- Allow the **full operation of the existing reservoirs and build new storage infrastructures and wastewater regulation systems**
- Accelerate the implementation of **purification infrastructures in areas without the service**, by hypothesizing a purification chain that is certified
- Enabling a **new future for wastewater sludge** through a new way of "thinking" about the purifier, using it as a biorefinery and guarantee against micropollutants
- Create a **national or European economic supply chain downstream of purification** that allows for the reduction of the costs of collecting a "waste" and generates further value starting from a "resource"
- Identify tools to promote **water reuse in both industrial and agricultural sectors**
- **Diversify water supply sources** (e.g. desalination)

6 Digitalization of the extended supply chain (Smart & Digital Water)

- Promote the adoption of **Smart Water technologies in the supply chain** to digitize network infrastructures and incentivize the installation of **individual "smart" meters** in condominiums
- **Digitalization of the agricultural sector and water networks** with adequate funding through the extension of **Agriculture 4.0** and **Regenerative Agriculture models**
- Leveraging the digital transition to implement **tracking and early warning systems** aimed at reducing water-related health risks
- Adopting **Sustainable Urban Drainage Systems** to Protect Cities from Flooding

7 Improving water efficiency and promoting a "water-positive" paradigm

- Develop a common and updatable database over time to monitor the status and changes in the **water footprint of companies** within the Italian context
- Promote a "Water Positive" approach enabled by the water-using industries, starting with the emerging data center sector, so that private individuals can invest in the resilience of the water basin and the relevant ecosystem in a paradigm of **"industry at the service of the territory"**
- Introduce **reward systems, Water Credits or Benefits**, depending on the sector of use (agricultural or industrial), to incentivise water saving and the reduction of withdrawals by water users

8 Improving data collection and management along the extended water supply chain

- Complete the preparation of **water balance sheets by district and sub-district**, which will allow to identify critical issues in the water supply and assign a priority level to the related territorial solutions
- Regulate the **census of emerging contaminants**, for which there are currently no legal obligations requiring analytical monitoring standards
- Create a **National Observatory for the definition of unitary measures for monitoring, collecting and disseminating data in the water sector**, with the support of the Value of Water Community, aiming at a single database for the different uses of the resource in the integrated supply chain

9 Communication, education and training on the correct management of water resources

- Nationalize the **pilot project in Italian schools** launched by the Value of Water Community
- Launch a training and skills development program aimed at creating the **"new water professionals" of tomorrow**, also by activating **education programs on the state of water management** in Italy and the value of water in a context of climate crisis
- Promote institutional dialogue for **a structured awareness-raising** and information campaign, including through journalism, on the importance of water as a scarce and strategic resource.

10 Strengthening public-private collaboration and integrated coordination between various stakeholders

- Promote the centralization of the responsibilities of the various Ministries currently involved in water resource management into a single **Ministry of Water**
- Making the **National Steering Committee for the Water Crisis permanent**
- Continue on the path of **international positioning of the Italian water supply chain**, promoting initiatives such as the EuroMed Water Forum (which will be in Italy for the first time in 2026) and participation in the World Water Forum 2027, with the ambition of bringing it to Italy in 2030