

UfM Water Policy Framework for Actions

Framework Programmes for Water-Energy-Food-Ecosystems Nexus & Water-Employment-Migration:

Note on Synergetic Actions

Prepared for the UfM Consultation Meeting on
the UfM Water Agenda and Financial Strategy in view of SDG6 and the Green Deal: Policy Actions,
Economic Responses, and Ways Forward in the post-COVID 19 context

Online Workshop, 9-10 June 2020

1. Background

1.1 The UfM Water Agenda

The UfM Water Framework for Actions 2030 (UfM Water Agenda) is a major Euro-Mediterranean process for sustainable water management and climate resilience objectives. Responding to the calls of the UfM Ministerial Conference on Water (April 2017, Malta), the process advanced since then under the co-presidency of Jordan and the European Commission. It established a joint vision for water security in the region towards 2030 and beyond while providing new impetus to regional and country action. UfM Member States are the main beneficiaries of the UfM Water Agenda and they are engaged and contribute to the process.

This includes actions within the four themes of the UfM Water Agenda: Water-Energy-Food-Ecosystems (WEFE) Nexus, Water-Employment-Migration (WEM), Climate Change Adaptation (CCA) and Water Supply & Sanitation (WASH), with Governance & Financing forming a cross-cutting issue in the Agenda along with cross cutting address of Gender and Youth issues. The mandated UfM Water Expert Group (WEG), supported by Thematic Task Forces, advanced priority action lines towards tangibles and provided guidance for their shaping and materialization by technical partners. All produced outputs were endorsed by the UfM Senior Officials Meeting (SOM), providing momentum for their implementation.

1.2 Elaborating Thematic Regional Framework Programmes: a modular and open-ended approach

Regional Framework Programmes (FPs) for the UfM Water Agenda themes provide for operationalizing their contents, in which also cross-cutting elements like gender and youth, are among focus fields of action. The FPs should assist clarity through an action-oriented approach that will practically demonstrate the aimed benefits to countries, their populations and, collectively, the UfM region. Contents of WEFE Nexus and WEM FPs were the first two to advance.

The agreed approach for developing the UfM WEM FPs is through an open-ended process in which partners (government, stakeholders, donors, etc) engage and commit their action lines and activities that become voluntary building blocks in a modular and coordinated 'action puzzle'. For these, promotion of synergies with related key regional and sub-regional political and technical processes as well as with regional institutions and stakeholders working on the subjects addressed, are essential.

While the big picture should be drawn and provide the frame for development of these wider FP ‘action puzzle’, a smaller number of tangible activities need to be designed, secure resources and materialize with priority, demonstrating early and attractive results while showcasing the added value of the agenda.

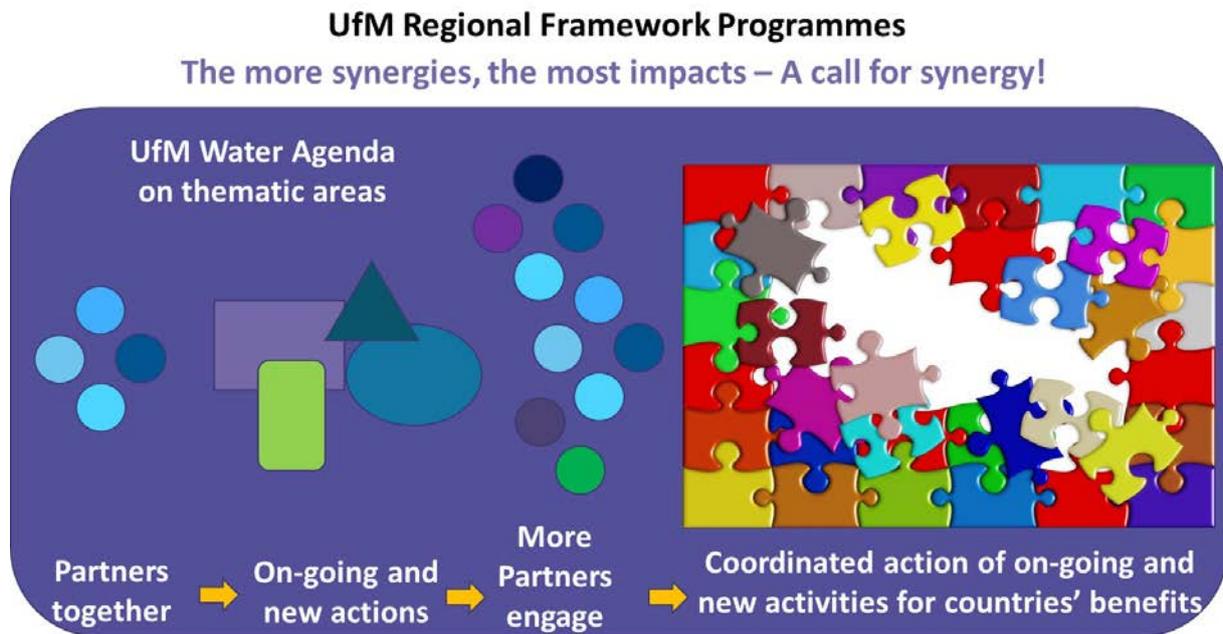


Fig. 1 Developing the UfM Framework Programmes: a modular and open-ended approach

UfM is able to provide the institutional clout and convening power for building, establishing and managing and monitoring such thematic FPs, by:

- Mobilizing country political will through regionally-aligned approaches
- Facilitating partnerships, including with out of the water-box partners
- Catalyzing international financing, aligning with national financing, and promoting private sector engagement
- Possibly, enabling a project-preparation facility that could link partners, capacities and resources for servicing defined regional and country needs

2. Context of UfM WEF Nexus and WEM FPs

2.1 UfM WEF Nexus agenda

UfM Member States are well-aware of water, energy, food and ecosystems challenges. Although cross-sectoral integration is a constant effort, related challenges have so far been addressed mostly within silos. This is due to fragmentation of responsibilities, inadequate coordination, regulatory overlapping, etc. A WEF Nexus approach to sectoral management, through enhanced technical assessment, policy dialogue, governance improvements, investment mobilization, replicable applications, collaboration and coordination, is necessary to ensure that co-benefits and trade-offs are not only considered but also that appropriate safeguards are put in place to prevent and/or mitigate their detrimental effects especially regarding on the availability of water resources, taking into account how these approaches can fit in with countries' national priorities.

Because of this multiplicity of conceptual expansions, the WEF Nexus represents a promising vehicle for promoting considerations on cross-cutting issues like gender mainstreaming, stakeholder

engagement, rights safeguarding, transboundary cooperation, etc., while it has a pivotal role in promoting green jobs creation. Still, understanding of WEF Nexus interdependencies by countries and stakeholders should be enhanced and deepen, importantly by demonstration of tangible and measurable solutions, while financing partners, including the private sector, should be given reason to further engage.

The WEF Nexus thematic of the UfM Water Agenda aims to introduce and/or promote the WEF Nexus approach, and to catalyse action for its mainstreaming, financing and implementation in UfM Member States, at the national and local (basin) levels as well as in the UfM region.

The WEF Nexus FP includes two main lines:

- *WEFE Nexus through small/medium scale interventions*, focusing on facilitating national &

local Nexus action planning and investment prioritization for sustainability targets through structured stakeholder engagement; implementing local (urban, rural, coastal) pilot Nexus interventions and upscaling the m for water security and climate resilience, through youth engagement; promoting employability and entrepreneurship objectives for youth and women in Nexus-related fields; facilitating public, donor and private investments; and, promoting knowledge sharing, including interlinking related regional & national projects.

- *WEFE Nexus through larger scale interventions*, focusing on facilitating a new generation of Nexus Wastewater Treatment Plants (water reuse, bio-energy production, fertilizers production, etc.), possibly with private investment mobilization, through: understanding opportunities for private investment in advanced WWT and resources recovery in interested Mediterranean countries; assisting development of a pipeline for public and/or private investments for related infrastructure projects; facilitating related pre-feasibility studies for selected infrastructure projects; building capacity of staff in public agencies and utilities (e.g. on Nexus technology, financial and PPP aspects); engaging stakeholders for effectively advancing the above outputs; promoting knowledge sharing, including interlinking related regional & national projects.

UfM works on WEF Nexus are under the overall guidance of the UfM Co-Chairs (EC and Jordan) and are supported by the UfM Secretariat. Lebanon leads the UfM Task Force on WEF Nexus. GWP-Med leads technical assistance of the UfM TF Nexus.

2.2 UfM Water-Employment-Migration agenda

Several UfM countries are facing substantial unemployment challenges, in cases reaching 30%, primarily among youth and women, while more than 1/4 of the youth is willing to migrate elsewhere. Water security is an enabler of jobs, and jobs is an enabler for people to stay in their homeland. Within the UfM Water Agenda, WEM is approached in a triple context: in response to challenges in countries of migrants' origin, where water security is among key objectives; in

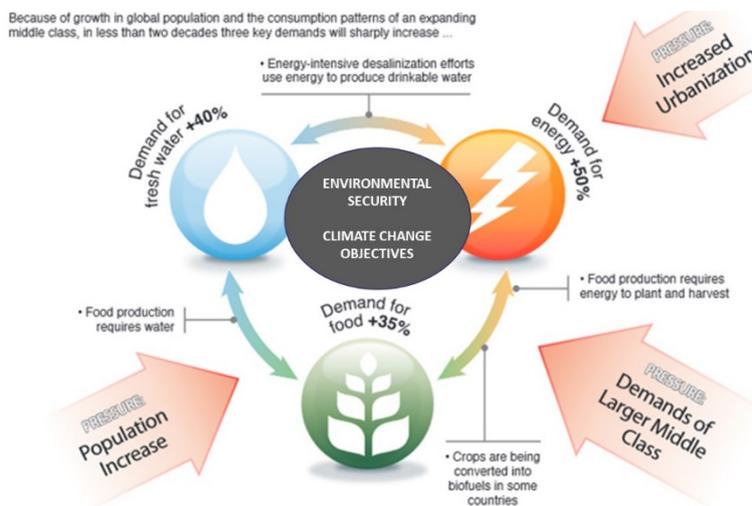


Fig. 2 WEF Nexus: understanding interdependencies

response to challenges in countries hosting migrants (and refugees), that are often water stressed, where access to safe water & sanitation to an increased population (including in refugee camps) is among key objectives; in response to challenges in end-destination countries, where skills are critical for migrants' (and refugees') integration. It is considered that while migration can be a loss for origin countries, it can also be an opportunity for new labour force in the transit and destination countries, offering opportunities for workers and businesses.

On the other hand, technology and innovation in the water sector and within WEF Nexus context, are advancing, adding value to countries' efforts towards sustainable water management. If transferred and mainstreamed, supported by political will, planning tools, and investment, technology and innovation can create opportunities for new skills, new job fields and new markets.

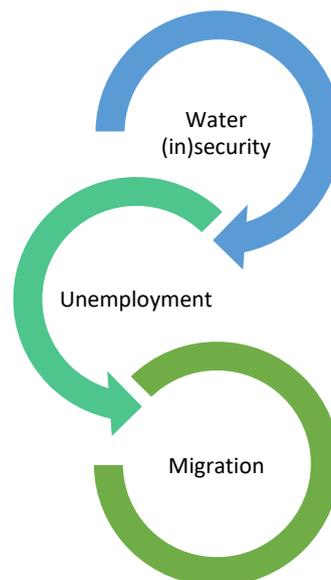


Fig. 3 WEM: understanding interlinkages

The WEM thematic of the UfM Water Agenda aims at mainstreaming related approaches and actions to increase water-related employability and entrepreneurship in countries of migration origin, transit and hosting, while promoting sustainable water management and gender equality and youth objectives.

The WEM FP focus on facilitating national & local WEM action planning and investment prioritization for sustainability targets, through structured stakeholder engagement; implementing local (urban, rural, coastal) pilot practical water efficiency interventions, including through promoting innovation, and upscale them for water security and climate resilience, through Youth engagement; promoting employability and entrepreneurship for Youth and Women, including for migration mitigation objectives; facilitating public, donor and private investments, including through Corporate Social Responsibility; promoting knowledge sharing, including interlinking related regional & national projects.

UfM works on WEM are under the overall guidance of the UfM Co-Chairs (EC and Jordan) and are supported by the UfM Secretariat. Italy and Turkey lead the UfM Task Force on WEM. GWP-Med leads technical assistance of the UfM TF Nexus.

2.3 Elaborating synergetic action of WEF Nexus and WEM FPs

Contents of the WEF Nexus and WEM FPs were elaborated through an engagement process that in 2019 involved meetings of: the related UfM Task Forces, WEG, WEM Lab and SOM. More specifically:

- the 3rd Meeting of the UfM Water Task Force on WEM (15-16 April 2019, Rome) and the 3rd Meeting of the UfM Water Task Force on WEF Nexus (17 April 2019, Rome), organised back-to-back and hosted by the Italian Ministry of Foreign Affairs, were presented with, gave positive consideration on and provided guidance for further developing an outline of the UfM WEM and

WEFE Nexus Framework Programmes, respectively, suggesting them as input to the 10th UfM Water Expert Group (WEG) Meeting. WEM contents presented at the Rome meeting have been informed by a number of inputs, including the WEM Lab 1 (30 October 2018, Barcelona), organised by GWP-Med and EPE in the UfM Water Agenda framework.

- the 10th UfM Water Expert Group (WEG) Meeting (13-14 June 2019, Brussels, hosted by the European Commission), among other decisions, considered positively the suggested outline of the UfM WEM Framework Programmes, guided that the UfM WEM and WEFE Nexus Framework Programmes should operationally synergize, and requested the latter to be presented in more detail at the next WEG Meeting (originally scheduled for March 2020, Athens).

- the WEM Lab II (19-20 November 2019, Istanbul), organised by GWP-Med and UfM, and hosted by the Turkish Water Institute (SUEN) deepened contents and tested ideas towards the WEM FP in synergy with the WEFE Nexus one. Furthermore, the 4th Meeting of the UfM TF WEM (20 November 2019, Istanbul, hosted by SUEN) considered positively WEM Lab II suggestions.

- the UfM Senior Officials Meeting (SOM) was updated on related progress and outputs at its meeting of December 2019.

Following guidance at WEG 10 Meeting, the UfM WEFE Nexus & WEM FPs should be:

- Responsive: to national priorities, regional agendas, international commitments
- Synergetic and out of the water-box: reach out & partner / cooperate, based on capacities and feasibility; engage non-water partners; mobilize the range of financing
- Integrating: build on, align to, cooperate with and utilize lessons learned from the plethora of related programs/projects and funding lines
- Tangible & gradual: from pilots > replication > upscaling > mainstreaming > market: a 10+ years implementation horizon
- Engaging and focused: youth, including female
- Aligned: operationally linking particular action lines of the UfM WEM and the WEFE Nexus FPs as well as those, as pertinent, of CCA and WASH FPs.

Based on these, while the 'bigger picture' provides for the long-term development of UfM FPs, the WEG 10 Meeting agreed to advance on a set of selected action lines that make a combo of interlinked activities, towards achieving early tangibles that will substantiate contents of the WEFE Nexus and WEM agenda and demonstrate its added value. Such interlinkages could be schematically presented as follows:

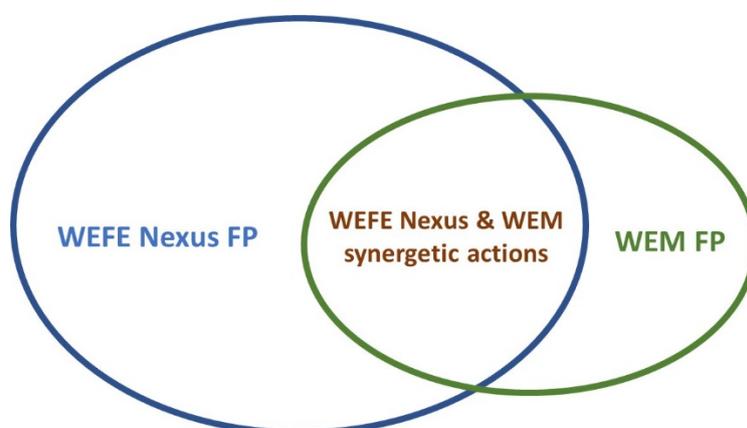


Fig. 4 WEFE Nexus & WEM synergetic actions

Out of these, and considering the need to focus on delivering feasible and tangible results tailored to available fundraising options, priorities for synergetic actions of the WEFE Nexus and WEM FPs could include the following objectives:

1. Implement at scale practical and pilot local (urban, rural, coastal) water efficiency and WEFE Nexus interventions, including through promoting innovation, and upscaling them for water security and climate resilience, through Youth engagement
2. Promote employability and entrepreneurship related to WEFE Nexus fields for Youth and Women, including for migration mitigation objectives
3. Promote knowledge sharing, including interlinking related regional & national projects

2.4 Responding to COVID-19 impacts

The unprecedented COVID-19 crisis emerged globally and in the region in the first semester 2020 proving, as clear as ever, the inextricable link of health with access to safe water and hygiene, with the WASH agenda being among the centrepiece for responses. On the 'day after' the COVID-19 health crisis and lockdown that is expected to cause severe job losses in the region, and while relief and development investments would mobilise, governments, businesses and development partners need to maintain the focus on meeting the SDGs and not jeopardise the progress made over the last decades. Post COVID-19 investments should increase and facilitate efforts towards SDGs, for instance by making sector-specific financial support measures conditional to SDGs contributions. This is very relevant for the UfM countries and, within the SDGs agenda, for actions related to Water, Climate Change, Energy, Agriculture, Environment, etc.

Furthermore, the pandemic highlighted Gender inequalities in all their forms. Women and girls are particularly exposed, with some countries reporting that domestic violence has doubled since the crisis began. At the same time, many women's jobs and businesses, already precarious at the outset of the crisis, are disproportionately at risk. Furthermore, lessons learned by water authorities that have been in the front line during the lockdown been responsible for provision of clean water and sanitation, have important experiences to share, both within the region but also beyond, including in view of a possible new wave of the virus in the coming winter.

UfM can play an enabling role in these mobilising its convening political power as well as its facilitation capacities, including related to prioritization of investments as well as by promoting cross-cutting and diversity objectives. Implementing water efficiency options, as well as intensifying efforts to improve the good chemical, quantitative and ecological health of all waters, can increase water availability for all uses and contribute to enhancing environmental health, promoting development options and strengthening the resilience of societies. Improved water governance and sustainable financing instruments to create an enabling environment, contribute to the same direction and should not be undermined in post COVID-19 recovery plans. Within the UfM Water Agenda, the WEFE Nexus and the WEM agendas, including their integration points, can contribute to further promote sustainability solutions through such upcoming recovery investments, including a focus on Gender and Youth.

3. Content of WEFE Nexus and WEM FPs synergetic action

Water, food, energy and ecosystems are essential for human health and livelihoods, poverty reduction and sustainable development, including by addressing climate change impacts. These sectors are interlinked through a nexus of natural, institutional, economic and social frameworks. The WEFE Nexus approach provides an integrated framework towards a coherent implementation and achievement of the related SDGs, in particular Goals 6, 11, 12 and 13. Interdependencies among Nexus sectors may result in synergies, however they may also lead to conflict and unfavourable

socio-economic consequences. Thus, trade-offs are often a reality and should be considered while striving to secure balance among Nexus sectors' needs.

Around the Mediterranean, increasing water stress, including due to climate change impacts, affects all productive sectors, while a rise of energy costs for water production is observed in several UfM countries. Growing needs for natural resources due to demographic change, increase of living standards, shift of production patterns, domestic (rural to urban) and inter-national migration flows and other socio-economic factors, further exacerbate the demand and highlight the need for integrated action. Historically, the water, energy, food and ecosystem sectors have been managed separately with limited synergies across them. Over past years, natural resources efficiency, particularly related to agricultural production and food systems, often aiming at national food security objectives, has been sought at policy and operation level in UfM countries. While understanding of the WEFE interdependencies increase, some steps are taken towards cross-sectorial cooperation in policy development and technical agendas, mostly at piloting stage. UfM countries have repeatedly articulated their standing request for such action-lines with tangible outcomes that provide for local solutions that can be replicated and upscaled.

WEFE Nexus technical solutions include a variety of practical interventions that benefit at least two of the four WEFE sectors. Part of these refer to a range of small to medium scale local applications, that can be applied in rural and urban contexts, to improve natural resources management, increase resources' use efficiency, raise crop productivity 'per drop' and 'per kWh', mobilise alternative sources to increase the local water budget, etc. At larger scale, multi-purpose infrastructure like multi-purpose dams and wastewater treatment plants of different scales combined with resource recovery and bi-products production, desalination using renewable energy sources, etc. can offer multiple socio-economic benefits in more than two sectors.

Increasing unemployment in some UfM countries, especially among youth and women, that is expected to further aggravate in the COVID-19 era, advocates for timely creating income generation opportunities while demonstrating solutions with positive impacts to sustainability objectives. It is estimated that, throughout the next decade, 50 million jobs shall be created in the MENA alone to absorb the growing labour supply, including as a contribution to tackling some of the root causes of international migration. If WEFE Nexus technical solutions are transferred, applied and mainstreamed in UfM countries, with the support of political will, planning tools and investment, they can create opportunities for new skills, new job fields and new markets. Such jobs may include various positions -from technical to managerial- in sustainable agriculture, integrated urban water management, industry, tourism, etc. Circular economy, sustainable production and consumption and blue economy provide background for the development of such 'green/blue jobs'.

Thus, investing on promoting employment and entrepreneurship opportunities operationally linked with WEFE Nexus mainstreaming, may create a new market, provide for income generation and foster increase of the local water budget through sustainable options. Youth and women should be in the focus of such investments, provided with assistance for enforcing their employability skills and creating/assisting business plans. This is timely while the COVID-19 impacts on the real economy are forecasted harsh and major investment plans to assist economic recovery have been announced by governments and international partners. The opportunity for a 'green recovery' vs an old-type of investment for tackling COVID-19 impacts and the wider job creating challenges, shall not be missed.

Implementing these, a *synergetic action of the WEFE Nexus & WEM FPs would aim* to increase local natural resources efficiency in UfM countries and to promote employability and entrepreneurship for Youth & Women in WEFE Nexus/ Non-Conventional Water Resources (NCWR) fields, also for migration prevention, while replicating good practices.

Responding to objectives outlined in part 2.3, key related outcomes could include:

a. Local stakeholders in UfM countries of focus tangibly benefit from multi-sectorial efficiency approaches through implementation of WEFE Nexus/NCWR pilot technical solutions, and prioritize further such interventions through fit-for-purpose technical and financing options towards local benefits

Examples of activities and outputs could include implementation of local pilots of the following types, through synergies with related partners/stakeholders:

Small/Medium scale:

- Green/Blue urban small/medium scale interventions (key role of local authorities)
- Renewables/solar for wastewater treatment and reuse (key role of tourism sector, including SMEs)
- Renewables/solar power for irrigation (key role of irrigators communities)
- Irrigation systems optimizing water use (key role of irrigators communities)
- Nature-based infrastructure, like related to wastewater management / floods and extreme events management (key role of regional and local authorities)
- Optimisation of irrigation management for sustainable farming, through Internet of Things (IoT) solutions, powered by renewable energy sources (key role of irrigators communities);
- Optimisation of water distribution network efficiency, powered by renewable sources (key role for national and regional authorities);
- Development of decision making support tools for energy efficiency in water distribution networks, like Supervisory Control and Data Acquisition (SCADA) system (key role for national and regional authorities).

Larger scale:

- Renewables/solar for desalination (key role of regional and local authorities)
- Multipurpose dams for hydropower, irrigation, flood mitigation, etc. (key role of national and regional authorities)
- Energy/flow co-optimization in cascades of dams in transboundary basins (key role of national and regional authorities)

b Youth, with emphasis on women, in UfM countries assisted towards employment and entrepreneurship opportunities in WEFE Nexus/NCWR fields

Examples of activities could include:

- Capacity building on WEFE Nexus & Employability, linked with implementation of WEFE Nexus/NCWR applications, for youth (below 35 years) with emphasis on women
- Business Mentoring Courses on Entrepreneurship in WEFE Nexus fields, for youth (below 35 years) with emphasis on women
- Capacity building on Gender considerations in WEFE Nexus & Employability fields
- Regional Experience-Sharing Workshops, among participants of the Courses and beyond

c. Stakeholders' understanding on integrated WEFE Nexus, WEM, gender and youth options increased in UfM countries through knowledge sharing and media engagement.

Examples of activities could include:

- WEM Assessment for Mediterranean within an Africa/Asia- Mediterranean/MENA -Europe context that will take into account the situation, challenges, solutions and partnership in

countries of migration origin/hosting/destination. Through an intersection of technical work and stakeholders' consultation, the Assessment could address: water resources under climate change impacts including displacement; socio-economic development challenges (e.g. related to demographics, Gross Domestic Product, Consumer Price Index, unemployment, poverty, social development, gender gap, access to education, etc.); migration and integration trends (e.g. fluxes, migration paths, reasons to migrate, policies, action plans, etc.); labour market needs and potential (e.g. labour market information, job matching services, etc); business market opportunities related to water (e.g. regulatory framework, financing tools, etc.).

- Market analysis assessment for WEFE Nexus applications in the Mediterranean to assist understanding the actual potential for development of a market around applied water efficiency technologies of WEFE Nexus and Non-Conventional Water Resources (NCWR) types, assessing feasibility of their penetration in sectors like urban, rural, tourism, industry, etc.
- Knowledge material on WEFE Nexus Technical Solutions to assist practitioners, planners, and engineers to understand commonly available technologies and their suitable selection according to the desired end uses and local conditions.
- Knowledge material on Promoting Jobs related to WEFE Nexus to assist university and technical school students, young professionals and practitioners to understand needed employability skills as well as entrepreneurship options linked to WEFE Nexus interventions and in service of a possible related market development.
- Coordinated media engagement to increase awareness of the wider public and targeted stakeholders, including youth and women, on the related interventions towards a much-needed new 'water culture' focusing on the efficient use of natural resources.

Based on beneficiaries' expressed interest and demands, partnerships are key for implementing these. Potential partners have been identified over developing the WEFE Nexus and WEM FPs, like UNEP/MAP, GIZ, JRC, ILO, UNESCO WWAP, WB CMI, UNIDO, CEWAS, MedCities, INWRDAM, etc. Operational synergies with these and additional partners would be further explored.

Funding possibilities have been explored with bilateral development partners, while operational linkages with upcoming and pursued programs and projects supported by multilateral and bilateral development partners has been sought. More specifically, strategic partnership with the Swedish International Development Cooperation Agency (Sida) has been actively pursued and it is anticipated that synergistic actions for WEFE Nexus and WEM FPs will be launched soon as a 'proof of concept'.