

4th BONEX National Workshop and Inauguration of the Solar Hydroponic Glasshouse

Date: April 10, 2025

Venue: Faculty of Agricultural and Food Sciences (FAFS), American University of Beirut (AUB)

Organized by: AUB – BONEX Lebanon Team

Funded by: PRIMA Programme

Agenda

Time	Session	Speaker / Moderator
09:00 – 09:30	Registration and Welcome Coffee	—
09:30 – 09:45	Opening Remarks and Workshop Objectives	Provost Dawy
09:45 – 10:15	Overview of the BONEX Project: Achievements and Next Steps	Dean Olabi
10:15 – 10:45	Presentation of the Solar Hydroponic Glasshouse Concept and Technology Integration	Technical Team, Dr Walid El Kayal
10:45 – 11:00	Coffee Break	—
11:00 – 11:45	Demonstration Tour: Solar Hydroponic Glasshouse	AUB Research Team
11:45 – 12:30	Stakeholder Panel Discussion: Integrating Solar Hydroponics into Lebanon's Agricultural Systems	Representatives from Academia, Industry, and Public Sector
12:30 – 13:00	Q&A and Discussion	Open Floor
13:00 – 13:15	Closing Remarks	BONEX Lebanon Team
13:15 – 14:00	Networking Lunch	—

Attendance List

- Representatives from the PRIMA Programme
- Faculty and researchers from the Faculty of Agricultural and Food Sciences (AUB)
- Members of the BONEX AUB Team
- Representatives from the Ministry of Agriculture and Ministry of Energy and Water
- Stakeholders from local agricultural cooperatives and private agritech companies
- University students and research assistants involved in the BONEX project
- Representatives from development agencies and NGOs working on sustainable agriculture and resource management

Presentations (PowerPoint)

- BONEX Project Overview – Objectives, progress, and impact in the Mediterranean region.
- Solar Hydroponic Glasshouse Concept – System design, energy integration, and water optimization.
- WEFE Nexus Approach in the Lebanese Context – Application and policy linkages.
- Student Engagement and Experiential Learning at AUB – Integrating research, teaching, and innovation.
- Stakeholder Perspectives – Opportunities for scaling solar hydroponic systems across Lebanon.

(All presentations are available for download on the BONEX and FAFS websites.)

Short Summary for Website Publication

The Faculty of Agricultural and Food Sciences (FAFS) at the American University of Beirut (AUB) hosted the 4th BONEX National Workshop on April 10, 2025, in conjunction with the inauguration of the Solar Hydroponic Glasshouse. The event gathered stakeholders from academia, industry, government, and the agricultural sector to explore the potential of solar-powered hydroponics as a model for sustainable and climate-resilient food production. The workshop featured presentations on the achievements of the PRIMA-funded BONEX project, the integration of renewable energy and water-efficient technologies in agriculture, and the role of experiential learning in advancing innovative agricultural practices. Participants engaged in discussions on the application of the Water-Energy-Food-Ecosystem (WEFE) Nexus in Lebanon and visited the newly established solar hydroponic facility, which serves as a living laboratory for research, education, and demonstration. The event underscored AUB's leadership in promoting resource-efficient agricultural systems and its commitment to supporting national and regional transitions toward sustainability.