

# Ohio-Israel Agricultural & CleanTech Initiative of the Negev Foundation

## Report (07/01/24-06/30/25)

The Ohio-Israel Agricultural & CleanTech Initiative (OIACI) of The Negev Foundation focuses on promoting and enhancing trade opportunities, business attraction, technology transfer, and cooperation between Ohio and Israel in the agriculture, food and CleanTech industries. The Initiative's goal is to enable Ohio to Israel export and Israel to Ohio business and technology attraction in these sectors to enhance business opportunities in Ohio through collaboration with Israel. The Initiative pursues these objectives by working directly with Israeli and Ohio companies, participating in tradeshows, presenting seminars, facilitating demonstration of company products, assisting in technology transfer, planning for and having missions and delegations between the two regions, and promoting and coordinating collaborative R&D between Ohio and Israel. Presented below are activities that took place during the 2024/2025 funding cycle.

### Executive Summary

Over the past year, the Ohio-Israel Ag & Cleantech Initiative (OIACI) has significantly expanded its role as a thought leader, connector, and solution driver across Ohio's water, agriculture, and food sectors. As global pressures converge on Ohio's infrastructure—from climate disruption and aging wastewater systems to shifting food markets and industrial water scarcity—OIACI has positioned Israeli innovation as a timely and credible source of solutions.

OIACI's growing reputation was reflected in high-level speaking invitations, including the Ohio County Sanitary Engineers Association conference and One Water Ohio, where Aryeh was awarded the Northeast Ohio AWWA Young Professional of the Year. We also took on active roles within the WaterReuse Ohio Chapter, where we now sit on both the Outreach and Non-Potable Reuse committees, helping to shape future water policy in the state. These platforms have allowed us to elevate reuse, decentralized treatment, and Israeli solutions from technical ideas to statewide infrastructure conversations.

Our engagement with stakeholders continued to expand through flagship initiatives. The upcoming Israel Pavilion at the Farm Science Review brings five top-tier Israeli ag-tech companies to Ohio, creating direct exposure for rural communities and ag-sector leaders. Simultaneously, a deepening partnership with the Ohio Farm Bureau is yielding joint media projects—including podcast episodes and magazine features—designed to tell the story of Israeli innovation through the lens of relevance to Ohio farmers.

In food technology, we strengthened our relationships with processors, exporters, and industry groups. We co-hosted a well-attended kosher certification webinar with the Center for Innovative Food Technology (CIFT), explored export opportunities for Ohio products into Israel, and helped raise the visibility of new Israeli food tech companies entering the market.

Throughout the year, OIACI actively scouted, vetted, and promoted a new generation of Israeli technology companies spanning wastewater treatment, biosensors, ag-biotech, digital agriculture, and cold-chain logistics. These companies are now in discussions with state agencies, academic partners, and utilities across Ohio. In each case, OIACI has served as the bridge—introducing the technology, advising on fit, and facilitating first conversations around pilots and partnerships.

Looking forward, the foundation laid this year will serve as a springboard for pilot implementation, workforce training programs, and policy-shaping contributions. More than just a connector, OIACI is becoming a trusted advisor—embedded in Ohio’s decision-making processes and helping the state unlock next-generation infrastructure and agricultural resilience with world-class Israeli solutions.

### **Strategic Leadership and Expansion**

The Initiative welcomed Aryeh Canter as the new Director, marking a new chapter in its leadership. Aryeh’s extensive expertise in water and wastewater engineering, coupled with his global perspective, positions him as an ideal leader to drive the Initiative forward. Before joining, Aryeh relocated from Jerusalem to Cleveland, bringing with him years of experience in the Israeli hi-tech ecosystem.

Aryeh joins the initiative after more than three years working in Israel's high-tech sector, where he specialized in sales and account management for a smart wastewater company. This experience gave him a deep and intimate understanding of the Israeli wastewater technology ecosystem, including the key drivers for companies and the most effective strategies for conducting business in the Israeli market.

Prior to this, Aryeh worked as a consulting engineer in California, focusing on municipal wastewater projects for small to medium-sized cities. His work in California provided valuable insights into municipal project structures and practical ways to navigate the public sector to ensure project success.

Aryeh's diverse experience positions him uniquely to bridge the gap between Israeli companies and Ohio stakeholders, ensuring the successful implementation of projects and fostering collaboration for impactful outcomes.

Aryeh holds a Master’s degree in Environmental Engineering from NYU Tandon School of Engineering and a BA from McGill University in Sustainability, Science, and Society.

### **Advisory Board Activation**

The Advisory Board convened in spring 2025 for its annual meeting, held under a newly structured format designed to deepen engagement and strategic alignment. The updated structure included the introduction of targeted subcommittees, each focused on a key domain where Israeli innovation can support Ohio’s challenges.

The meeting was attended by more than 20 participants representing a mix of legacy stakeholders and new members brought into the fold through recent outreach. It opened with welcome remarks from Tracy Intihar, Assistant Director at the Ohio Department of Agriculture, and was followed by a policy-focused keynote from Tiffani Kavalec, Policy Director at the Ohio EPA, who spoke about how water reuse can meet growing industrial demand in Ohio. Aryeh Canter then presented the Initiative's strategic vision for 2025 and highlighted current pilot project opportunities.

Breakout sessions were held for three subcommittees: Agriculture Technology, chaired by John Buck; Food Technology, chaired by Matt Inger of CIFT; and Research Partnerships, led by Dr. Brian Gwin from Ohio State University. These facilitated discussions generated several actionable recommendations, including prioritizing pilot projects in agrivoltaics, rural wastewater upgrades, and algae mitigation. Members also proposed formalizing breakout note-taking processes and assigning designated facilitators in advance to improve documentation of outcomes.

The event concluded with remarks from Sam Hoenig, President of The Negev Foundation, who emphasized the long-term vision and institutional value of the Ohio-Israel partnership. Attendees praised the meeting's half-day format, collaborative energy, and practical focus. The Advisory Board meeting reaffirmed the growing strength of the OIACI network and provided valuable guidance that is now being used to refine project plans and subcommittee activity for the coming year.

### **Public Speaking and Conference Presence**

Aryeh was invited to speak at the annual Ohio County Sanitary Engineers Association conference, where he presented on Israeli water and wastewater innovation. The talk drew over 40 attendees and prompted detailed questions about decentralized treatment, algae prevention, and nutrient removal.

In August 2025, OIACI will exhibit at the One Water Ohio conference and Aryeh will present a session highlighting the Israeli approach to water reuse. For this work, Aryeh received the Northeast Ohio AWWA Young Professional of the Year Award.

### **Food Sector Engagement and Export Promotion**

OIACI worked closely with partners at the U.S. Embassy in Tel Aviv and Ohio food producers to explore export opportunities. One potential deal involving peanut butter exports fell through due to pricing disadvantages against Argentina. However, promising discussions are underway regarding Kroger white-label goods and Ohio-grown canned tomato products for Israeli retail.

In July, OIACI co-hosted a well-attended kosher certification webinar with the Center for Innovative Food Technology (CIFT). The event offered guidance on kosher market entry, especially for small and mid-sized Ohio producers. Numerous follow-ups are being pursued.

Aryeh also attended the CIFT Annual Conference, connecting with dozens of food processors and manufacturers to introduce the initiative and assess where Israeli technology could fill pressing gaps.

## Farm Science Review – Israel Pavilion

A central focus of 2025 has been organizing the Israel Pavilion at the Farm Science Review (FSR). In partnership with Agri-IL, the Israel Export Institute, Volcani Center, and GrowingIL, we conducted a competitive recruitment process that yielded over a dozen applicants. Ultimately, five Israeli ag-tech companies were selected to exhibit. These companies represent cutting-edge innovations in crop productivity, water-efficient growing, climate resilience, and supply chain digitization.

We worked directly with the event organizers to ensure appropriate booth space and logistical support and are coordinating speaking engagements for Israeli participants to share their technology on stage.

## Ohio Farm Bureau Collaboration

This year marked a deepening relationship with the Ohio Farm Bureau. In a strategic meeting, OIACI and the Farm Bureau identified shared priorities and avenues for collaborative storytelling and outreach.

Projects include:

### **Farm Bureau Podcast – Featuring Israeli Farmer Stories**

We are collaborating with the Farm Bureau to produce an episode of their widely followed podcast that will highlight the stories of Israeli farmers affected by the war following the October 7th attacks. Many of these farmers—particularly those along the Gaza and Lebanon borders—suffered devastating losses to their communities, land, and livelihoods. The episode will explore how these farmers are now playing a central role in Israel's recovery, with the nation depending on them to help rebuild both its food system and its sense of national resilience. By sharing these stories with Ohio farmers, the podcast aims to foster empathy, solidarity, and a deeper understanding of the challenges Israeli agriculture faces—not only from nature, but from conflict. This human-centered approach underscores the importance of agricultural self-sufficiency and community strength in the face of adversity.

### **Groundwork BioAg Feature in *Our Ohio* Magazine**

An upcoming article in *Our Ohio*—the Farm Bureau's flagship magazine distributed to tens of thousands of members—will profile Groundwork BioAg, an Israeli company that produces mycorrhizal root inoculants. These biological products enhance nutrient uptake and root system resilience, particularly under drought stress. The article will explore how this technology has already been adopted by farmers in the Ohio and illustrate its potential value for Ohio's corn and soybean growers, especially with potential drought situations in the future.

### **2026 Feature on Israeli Precision Agriculture**

Looking ahead, we are planning a second feature in *Our Ohio* magazine for 2026 that will focus on Israeli precision agriculture tools. This article may cover a range of technologies—including

sensor platforms, AI-based decision support systems, and autonomous irrigation controls—that can help Ohio farmers optimize inputs and reduce operational costs. The goal is to provide a broader perspective on how Israeli startups and research institutions are developing tools that align with the technological adoption curve of Ohio producers. By previewing what’s next in the innovation pipeline, this feature will position OIACI as a forward-looking resource for farmers and ag professionals across the state.

These efforts demonstrate how Israel’s experience in farming under extreme conditions can provide practical insights for Ohio growers.

## **Pilot Projects and Institutional Partnerships**

### ***EPC and ODNR Pilot Exploration***

EPC, an Israeli company specializing in decentralized wastewater treatment, was reintroduced to the Ohio Department of Natural Resources (ODNR) this year for a potential deployment at a state park. ODNR expressed strong interest following EPC’s successful pilot in West Virginia parks. Data from that pilot is currently under review by ODNR staff. With the passage of the state budget, conversations are expected to resume for possible site identification and pilot implementation.

### ***Water Reuse and Workforce Training Framework***

OIACI developed a framework to integrate workforce training with Israeli tech pilot deployments. Partnerships with 360Water and Argonaut will provide hands-on learning for students and recent graduates. Each pilot site will be documented through academic research and technical reports, creating a public knowledge base for replication and policy advancement.

## **WaterReuse Ohio Chapter Involvement**

This year, OIACI deepened its role in Ohio’s water reuse movement through active engagement with the WaterReuse Ohio Chapter. Aryeh Canter was appointed to serve on two statewide committees: Outreach and Non-Potable Reuse. In these roles, he is contributing to strategic discussions around public education, stakeholder engagement, and the role of reuse in supporting data centers, manufacturing, and agriculture. These committees provide a platform to ensure Israeli technologies are considered as the state develops guidance and policy around advanced reuse. Through this involvement, OIACI is helping shape the narrative around water reuse in Ohio, not only as a conservation strategy but also as a driver of economic development and infrastructure resilience. Our participation also allows us to stay ahead of emerging opportunities, identify pilot project partners, and ensure that the technologies we bring to Ohio align with the state’s evolving priorities.

## Industrial Water Solutions Conference and Water Reuse Leadership

A key milestone this year was our participation in the Industrial Water Solutions Conference in Columbus. With over 360 attendees, the event brought together engineers, municipal utilities, industrial water users, regulators, and technology providers to focus on a central and increasingly urgent theme: water reuse. Across Ohio, the landscape is shifting. While historically viewed as a water-rich state, Ohio is now facing mounting pressures due to rapid industrial growth, expanding data center developments, and climate variability that is straining summertime water availability. Municipalities have reported needing to turn away new industrial users because of capacity limitations. In this context, water reuse is no longer a fringe concept but an essential strategy for long-term sustainability and economic growth. The conference served as a powerful platform to position Israeli technologies as part of the solution, particularly in areas such as decentralized treatment, smart reuse systems, and advanced brine management. OIACI's presence helped elevate the visibility of reuse as a practical, near-term opportunity for Ohio, and reinforced the Initiative's role in connecting global innovation to local infrastructure challenges.

One important discussion was a strategic conversation with Black & Veatch during the Industrial Water Solutions Conference in Columbus, focused on the City of Columbus's evolving approach to water reuse. As the City explores advanced treatment options to support its growing industrial base, a major barrier has emerged: brine management. Unlike coastal regions that can discharge brine into the ocean, Ohio is landlocked and lacks easy, cost-effective disposal options. This presents a significant challenge for implementing non-potable reuse systems, especially for data centers and other high-water-demand industries that produce concentrated waste streams. Without a viable solution for brine, many reuse projects stall before they begin. Our discussion centered on how Israeli crystallization technologies—proven in similarly constrained geographies—might help fill this gap. By introducing these ideas into early-stage planning with Black & Veatch, OIACI helped position Israeli innovation as a key contributor to Ohio's next generation of water infrastructure.

Conversations also took place with:

- Del-Co Water, interested in AI-powered water data tools.
- SUNDT Construction, a reuse-focused design-build firm offering to help shape workforce programs.
- Eric McPeck (Delaware County Sewer District), interested in biosolids innovation.
- Ohio EPA staff, reaffirming OIACI's credibility within the regulatory community.

This event helped catalyze several project conversations and reinforced OIACI's leadership in the water reuse space. Our membership in the WaterReuse Ohio chapter continues to grow. Aryeh now sits on both the Outreach and Non-Potable Reuse committees, helping shape future water policy and public education in the state.

## Israeli Companies Under Engagement

This year, OIACI identified and began working with a new generation of Israeli companies entering the Ohio market for the first time. These companies represent the next wave of innovation in agriculture, food, and water sectors, and each offers a compelling solution to challenges faced by Ohio communities and industries:

- **CoEnergy:** CoEnergy offers a waste-to-energy system that transforms agricultural waste into usable energy and biochar through thermal gasification. This solution can serve rural Ohio farms and food processors, reducing organic waste while providing on-site heat and power—a significant benefit to regions not connected to larger waste infrastructure.
- **Linok:** Linok provides an AI- and IoT-based real-time monitoring platform designed initially for dairy operations, with a focus on detecting mastitis and assessing milk quality directly at the tank or milking station. Their compact, plug-and-play sensor system offers farmers laboratory-level insights instantly—boosting milk quality, reducing veterinary costs, and lowering antibiotic. In Ohio, where dairy farms face increasing pressure to improve efficiency, animal welfare, and profitability, Linok can help producers proactively manage herd health, optimize milk yield, and comply with quality standards.
- **VBact:** VBact's biosensor technology delivers real-time data on bacterial presence in water. Their compact, automated platform could assist Ohio poultry operations, livestock farms, and decentralized wastewater systems with early contamination alerts—reducing risk to both public health and livestock.
- **Evigence:** Evigence produces freshness indicators that track time-temperature exposure across the cold chain, providing visual cues when spoilage occurs. Their solution could help Ohio grocers, distributors, and processors reduce waste, enhance consumer confidence, and improve food safety compliance.
- **Equinom:** Equinom develops non-GMO, high-protein crop varieties—particularly soybeans and wheat—tailored for plant-based food production. Their seeds can help Ohio growers access premium markets and support value-added processing sectors, such as protein ingredients and specialty flours.
- **ClimateEyes:** ClimateEyes combines predictive weather modeling with satellite imagery to help farmers plan planting, irrigation, and harvest schedules. With Ohio's increasing climate unpredictability, this tool can give growers data-driven insights to optimize yields and reduce loss.
- **Fluence:** Fluence offers membrane aerated biofilm reactor (MABR) systems for high-efficiency, low-energy wastewater treatment. Their technology is especially well suited for Ohio communities with aging lagoon systems that need cost-effective nutrient removal to meet regulatory standards.
- **Sledge Technology:** Sledge has developed a miniaturized electrochemical biochip that detects harmful algal bloom toxins in real time. This early warning system can support

Ohio municipalities and lakefront communities in managing algal threats more proactively, especially in the Lake Erie watershed.

Several of these companies have been introduced to the Cleveland Water Alliance and are featured in its pilot program portfolio. In addition, we have actively worked to integrate these innovations into a growing number of strategic conversations across the state. This includes identifying potential sites for pilot deployment with public utilities, agricultural cooperatives, and engineering firms; securing introductions with regulators and university researchers at institutions such as Ohio State University and Heidelberg University; and building visibility for these technologies through our participation in conferences such as One Water Ohio, the Industrial Water Solutions Conference, and the CIFT Food Industry Summit. Many of the companies have also been featured in our outreach to key partners such as the Ohio Department of Natural Resources, Farm Bureau, and Ohio EPA. By embedding these companies into real-world dialogues and project development efforts, we are creating meaningful onramps for Israeli innovation to directly address Ohio's challenges in food production, water resilience, environmental monitoring, and rural infrastructure.