



Summary of Interviews with Authors of Organizations with Scholarly Articles Selected for Publication in the Natural Resource Forum: A United Nations Sustainable Development Journal

On the occasion of the launch of the Special Issue on “Sustainable Water and Energy Solutions” published by the Natural Resources Forum, a UN Sustainable Development Journal, interviews were conducted at the SDG Pavilion with representatives of organizations whose scholarly articles were selected for publication. Representatives of Canal de Isabel II, ASAZGUA provided details about water-energy nexus issues addressed in their papers.

This is the first time this journal has dedicated a Special Issue to this critical subject. These organizations are members of the Global Sustainable Water and Energy Solutions Network, and their papers are among only ten selected worldwide for publication.

Interview with Mr. Luis Miguel Paiz, Executive President, ASAZGUA, Guatemala



Title: *Towards Sustainability? Contributions of the Guatemalan Sugar Agroindustry to the Sustainable Development Goals on Water and Energy*

Available to listen here: <https://www.youtube.com/watch?v=xOVAsnDS25o>

Mr. Paiz shared during the interview that ASAZGUA set out to understand the impact of the sugar industry and what efforts they could make to improve the livelihoods of local communities. Especially what indicators to look at that would demonstrate development and increased prosperity for citizens. He detailed that they created different technologies to optimize the use of water for example, such as investing in efficient irrigation systems, and an app that was created for local farmers to have better control over the amount of water used in their fields, resulting in Guatemala using less water than average compared to other countries that produce sugarcane. The farmers also receive technical assistance from ASAZGUA so they

can be more efficient in other ways. Lastly, he added that to have the greatest impact, they realized they must gain the support of the local municipalities and communities. Until they are integrated, there would not be real change. In conclusion, ASAZGUA is already producing almost 30% of requirements for energy in a sustainable way through biogas, and to increase that number and make even greater strides across the industry and the country, they must work directly with communities and the central government to achieve it together.

Interview with Mr. Fernando Arlandis, Deputy Manager Director, Canal de Isabel II, Comunidad de Madrid, Spain



Title: Promoting sustainable growth and self-production of energy through the water industry, as key elements for climate change action

Available to listen here: <https://www.youtube.com/watch?v=xOVAsnDS25o>

Mr. Arlandis shared that Canal de Isabel’s promotion of sustainable growth and self-generation of energy via the water industry in Madrid. Through the water cycle, they can find many opportunities. For example, opportunities to create energy in the form of biogas from wastewater treatment plants, hydroelectric power plants, and constructing new solar developments to power their operations. In many ways, the company is also focused on adaptation: such as adapting to the dry seasons, and working to prevent water losses. In fact, they have some of the lowest losses across all of Spain. The company has also made great strides to recycle and reuse water, especially to prevent the use of drinking water for things like irrigation or golf courses, or even industrial uses. In Madrid, almost 25% of the water consumed has been recycled. One of the major aims of the paper was to demonstrate how companies and utilities can do *more* with less: how to create more energy and how to transfer potential energy into real energy.

Interview with Sebastian Groh, CEO of ME SOLshare



Title: *Swarm electrification at scale: An innovative partnership model for sustainable energy development in Bangladesh*

Available to listen here: <https://www.youtube.com/watch?v=vIV2ATVKRkE>

Mr. Groh explained the inspiration behind “swarm electrification”, a key part of his company’s infrastructure: biomimicry and the ways of nature. It is inspired by the power of swarms or schools of fish, creating swarm intelligence. In the case of ME SOLshare, millions of individual solar home systems are connected together and create a smart network. Mr. Groh shared that the paper was written with the intent of explaining what their lessons learned were along the way; what worked well; what didn’t work so well; and how can they continue to scale up. It was co-authored by representatives from Grameen Shakti, the Postgraduate School for Micro Energy Systems at Oberlin, and Brock University Business School in Bangladesh. Impressively, ME SOLshare has now produced up to 130 grids, which are a combination of solar home systems. One of the biggest challenges that they have faced along the way is national policy. They need to ensure that they could offer a fee that was competitive with the national grid. One of the best incentives they found for improving their competitiveness was that through them, customers could sell their remaining electricity to their neighbors, and that way their money doesn’t leave the village, it directly benefits households. The second challenge was how to integrate their micro-grids into the national grids, and what is a fair price for selling back the electricity. Mr. Groh’s greatest lesson learned so far is that energy remains at the intersection of public and private, and practitioners must be able to satisfy both camps: they need a strong endorsement from the government along with support from the local communities and direct benefits to those communities.