

Good Practice Example No. 10 - Hungary

### ***Kalocsa Irrigation Community, South Ltd.: Strengthening climate-resilient agriculture through collective water management***

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|------------------------|---------------------------------------|
| <b>Industry:</b>       | Agriculture, water management         |
| <b>Location:</b>       | Bács-Kiskun County, Hungary           |
| <b>Established in:</b> | 2021                                  |
| <b>Legal form:</b>     | Limited Liability Company (Ltd.)      |
| <b>Business model:</b> | B2B (business to business)            |
| <b>Core activity:</b>  | Irrigation infrastructure development |

The Kalocsa Irrigation Community, South Ltd. (Kalocsa Térségi Öntözési Közösség Dél Kft.) represents one of Hungary’s emerging good practices in climate adaptation, agricultural cooperation, and sustainable water management. Established by local producers in the Kalocsa region, the irrigation community was created in response to increasing climate-related challenges affecting agricultural production, particularly prolonged drought periods and growing water scarcity. By bringing farmers together within a shared organizational framework, the initiative enables members to access modern irrigation infrastructure, improve resource efficiency, and strengthen the competitiveness of horticultural production in one of Hungary’s most important vegetable-growing regions.

#### **Building shared irrigation infrastructure for regional development**

A key challenge for many farmers is the high cost of irrigation investments, which often exceed the financial capacity of individual producers. The Kalocsa Irrigation Community addresses this challenge through collective action, allowing multiple farms to benefit from shared infrastructure and coordinated water management. Supported by the Rural Development Programme and co-financed by the European Agricultural Fund for Rural Development, the community has implemented several irrigation development projects aimed at expanding the utilization of existing irrigation networks. These investments improve access to reliable water resources while reducing the individual financial burden placed on farmers. Through this cooperative approach, irrigation becomes more accessible and economically viable for small and medium-sized agricultural enterprises.

#### **Modern technologies for efficient water use**

The most recent development project focused on the acquisition of modern irrigation equipment, including advanced irrigation reels and irrigation consoles designed to

increase water-use efficiency. The system utilizes water supplied through the Sárközi Main Canal, which draws on the resources of the Danube and provides sufficient capacity to meet increasing agricultural demand. The newly installed technologies enable more precise irrigation management while reducing water and energy consumption. These improvements contribute to the adoption of environmentally responsible farming practices and demonstrate how technological modernization can support both productivity and sustainability objectives.

### **Supporting horticultural production and food security**

The Kalocsa region is renowned for its agricultural traditions, particularly the cultivation of paprika and other vegetable crops. Reliable irrigation plays a critical role in maintaining the productivity of these water-demanding crops under increasingly unpredictable climatic conditions.

The development enables farmers to provide stable water supply for crops such as Kalocsa paprika, sweet corn, cabbage varieties, dill, and other vegetables. According to project estimates, the improved irrigation capacity can contribute to yield increases of approximately 30–40% on irrigated land. By reducing production risks and improving harvest stability, the initiative strengthens local food production systems and supports the long-term viability of horticultural enterprises in the region.

### **Cooperation as a tool for climate adaptation**

Beyond the physical infrastructure, the irrigation community demonstrates the importance of collaboration in addressing climate-related challenges. The organization brings together dozens of producers who share common objectives related to water management, resource efficiency, and agricultural sustainability. Through coordinated planning, collective investments, and shared access to technology, members are better equipped to respond to changing environmental conditions than they would be individually. The model highlights how producer cooperation can create economies of scale while improving resilience and competitiveness across an entire agricultural region.

### **Securing the future of sustainable farming**

The Kalocsa Irrigation Community, South Ltd.'s project illustrates how targeted investments in water management can contribute to the future sustainability of agriculture. By combining modern irrigation technologies, cooperative governance, and public development support, the initiative creates benefits that extend beyond individual farms to the wider rural economy. For students and future agricultural professionals, this example demonstrates that climate adaptation requires not only technological solutions but also strong partnerships and collective action. The project shows how water

management, innovation, and farmer cooperation can work together to strengthen agricultural resilience, improve productivity, and preserve valuable regional farming traditions for future generations.

Source: <https://www.kalocsaiontozesikozossege.hu/>