Consequences of the Kakhovka crisis for the agricultural sector:

Destroying OR Renovation?

International conference

27/07/2023
Kahovka tragedy

On the night of June 6, 2023, Russian forces detonated the Kahovka Hydroelectric Power Station (GES), causing a massive man-made catastrophe with devastating consequences for the southern regions of Ukraine.

These regions have historically been the primary producers of vegetables and fruits, with their cultivation heavily reliant on irrigation systems. Additionally, the water bodies in the region are home to diverse aquatic and other water-based resources, many of which have been affected by the Russian-led terrorist actions.

One of the potential outcomes is that the fields in southern Ukraine may be at risk of transforming into desert-like conditions.
Shipping on the Dnipro river will become impossible for the nearest years due to the destruction and flooding of roads, bridges, piers, and protective dams in the lower reaches of the Dnipro.

Ports in Nikopol, Kamianske, and Enerhodar have been suspended for an extended period.

Railway tracks connecting Zaporizhzhia and Dnipro with Crimea, Kryvyi Rih, and the Donbas have been washed away and destroyed.
Changes in the climate regime of the region are the result of alterations in evaporation rates, temperature balance of the lands near the Dnipro River, the emergence of large areas of the former reservoir bed devoid of vegetation.

The newly formed deserts will quickly heat up under the sun, giving rise to droughts, rapid changes in pressure, dust storms, and other weather catastrophes. The absence of irrigation and high climate risks will force some farmers to abandon land cultivation, leading to the risk of desertification in certain areas.
Drainage of reclaimed lands in the lower reaches of the Dnieper River

Degradation due to tidal wave erosion

Sedimentation wind erosion

Destroing as a result of flooding, a portion of the tree vegetation that had restrained the erosion of the shores and the spread of ravines and gullies will perish.
According to "Ukrgidroenergo," to build a new power plant, it will require an investment of $800 million to $1 billion. In addition to the station, there will be a need to construct a bridge and a railway crossing. Based on preliminary estimates, the construction duration may reach up to 5 years.

The Ingulets Irrigation System in Kherson and Mykolaiv regions, which diverts water from the Dnipro River downstream of the Kakhovka Reservoir, may be affected by flooding, which can impact water quality.
Irrigation System of the South of Ukraine

Before tragedy

01 Irrigation of 584,000 ha

02 4 million tons of grain and oilseeds

03 1.5 billion USD

04 2.9 million cubic meters of water for irrigating agricultural fields.

05 A separate water intake from the reservoir for a total irrigated area of 218,300 hectares.
Reform of melioration

Due to the wear and tear of reclamation facilities and the absence of irrigation equipment, only a maximum of 42,000 hectares are irrigated annually in the region, which constitutes 20% of the potential area.

It is necessary to reconstruct the reclamation systems on an area of 120,000 hectares and perform major repairs on an area of almost 60,000 hectares. From the regional budget, 10 million UAH will be allocated, which will cover 12 projects.

**Decision**

1. Restoration (reconstruction, modernization, and construction) of reclamation systems in the Odessa region.
2. Implementing measures to reduce the cost of electricity for water supply in irrigation.

The state provides funding for the restoration of the irrigation system up to 200 mln.

18,3 mln grn from USAID

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On these lands, there may be outbreaks of pests and diseases that will spread to surrounding fields. Also, there will be a spread of fish species in their natural conditions that are not typical for the region, as a result of flooding or destruction of industrial ponds.
2023 AUCTIONS
An experimental project regarding the conduct of auctions for the sale of rights to enter into contracts for the special use of aquatic resources in fishery waters or their parts through electronic trading.

40 business entities became winners of the auction and concluded contracts for the right to the special use of aquatic resources in fishery waters or their parts within the Odesa region.

9,5 Mln UAH
As of May 2023, an amount of 4,867,779 Ukrainian Hryvnias has already been received to the budget under the revenue code classification 13070200, solely from the sales of realized lots.
Grants

For sector support

- **INDIVIDUALS**
  - Up to 150,000 UAH for amounts below 150,000 UAH. From 150,000 to 250,000 UAH, not less than 50,000 UAH.
  - Applicable to legal entities, individual entrepreneurs (ФОП), and individuals.
  - Up to 70% of the value, but not exceeding 8 million UAH for the first 1000 applications. Subsequent ones - 50%, but not exceeding 5 million UAH.

- **PROJECT INITIATION**
  - Up to 150,000 UAH for amounts below 150,000 UAH. From 150,000 to 250,000 UAH, not less than 50,000 UAH.
  - Applicable to legal entities and individual entrepreneurs.
"A person can be easily destroyed, but cannot be defeated if he does not give up." - Ernest M. Hemingway