



2nd Targeted Workshop for Asia and the Pacific

*Transforming Good Practices
from Demonstration
Projects into Scaled-Up
Investments and Financing*

Integrated Nutrients Pollution Control Project Romania

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IW: LEARN Regional Workshop
Manila, The Philippines
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ROMANIA – GENERAL INFORMATION

Area: 238,392 km²

**Population: 19.04 mil.
inh.**

Capital: Bucharest

No. of Counties: 42

Large Cities: 7

Communes: 2,630

**Agricultural
Land: 14.9 mil. ha**

Forests: 6.4 mil. ha

**International Waters
(Danube River): 1.075 km**

**National Waters: 9,301
km**

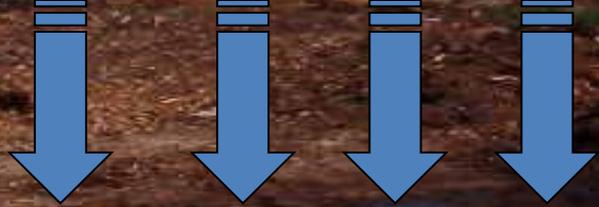


Strategic context and rationale (2000-2007)

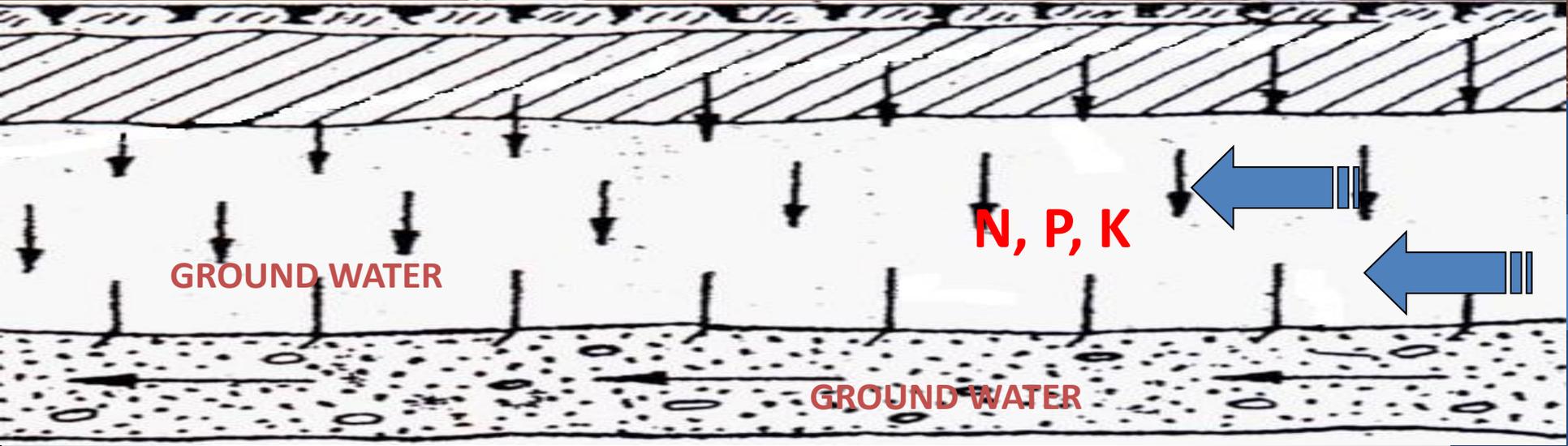
- Very intensive agriculture, without considering any measures for environmental protection;
- Abolition of the state owned farms and co-operatives and restitution of land to former farmers resulted in more than 3 million new individual farmers, with an average farm of 2.5ha and 2-3 LU;
- In rural areas the families main income came from agriculture;
- The farmers are not living in the middle of their farmland, that is scattered in several smaller plots, but the livestock is kept near the house, without an organized system to collect the manure;
- Farmers not aware about the linkage existing between the inappropriate agricultural practices and the pollution of their drinking water.
- The combination of underdeveloped sanitation, poor livestock management, and a large number of small farms results in a significant nitrate and microbial contamination of shallow groundwater ultimately flowing into the Danube River.

RESULT: diffuse pollution with nitrates and nitrites produced by the inappropriate farming practices





N, P, K



GROUND WATER

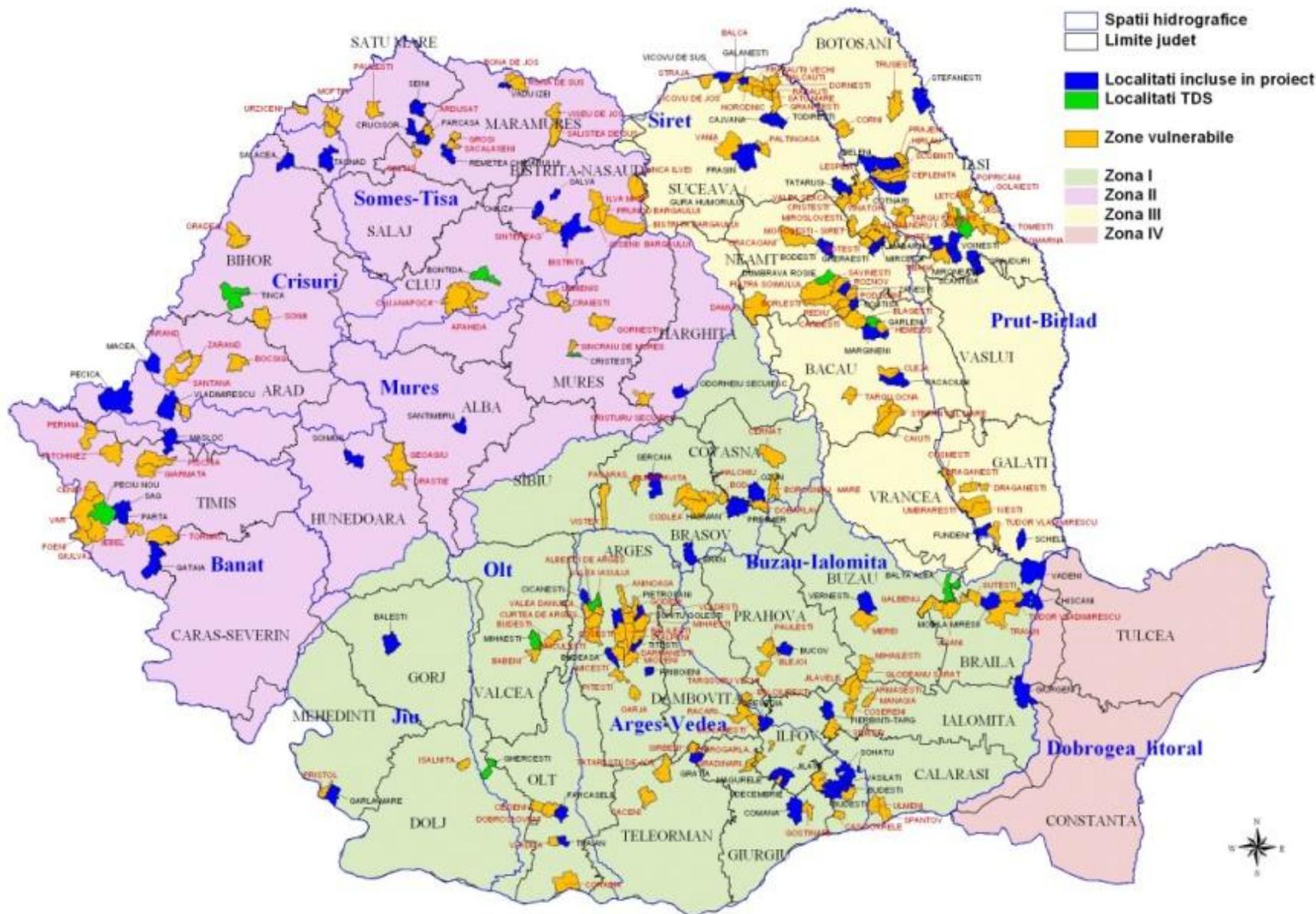
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GROUND WATER

Strategic context and rationale⁽²⁰⁰⁸⁻²⁰¹⁴⁾

- Romania's accession to the European Union on January 1, 2007 represents a tremendous achievement; it also poses an immense challenge for Environmental compliance;
- Significant efforts are required in the water sector where annual investment needs are in the range of Euro 2 billion/year;
- Over the past decades, the Black Sea has suffered severe environmental damage due to eutrophication, resulting from increased nutrient runoff from agriculture, Romania being one of the important contributors;
- Agreements with the EU for improved water management include addressing nitrate pollution from agricultural sources;
- EU subsidies for agriculture subject to environmental compliance;
- NO EU funding for Nitrate Directive and no grace period for compliance.





Project description

Development Objectives

The main objectives of the Project are to support the Government of Romania to meet the EU Nitrates Directive requirements by:

- reducing nutrients discharge to water bodies;
- promoting behavioral change at the commune level;
- strengthening institutional and regulation capacity.

Both Projects interventions have been designed to reduce over the long term, the discharge of nutrients (nitrogen and phosphorous) into water bodies leading to the Danube and the Black Sea through integrated land and water management.



Project description

Holistic Approach of Nutrients' Pollution from Agricultural Sources

➤ Animal waste - aerobic digestion → compost

- anaerobic digestion → biogas

➤ Human waste - sewerage treatment plants

➤ Agricultural fertilizers - vegetative barriers

- good agricultural practices for water protection



Main features of the Project design to promote national and regional scale-up

- Project demonstrations were scattered in Nutrient Vulnerable Zones, in 86 communities, in order to catch the attention of people in rural areas and provide information on mitigation measures to reduce nutrient discharge and protect the water and soil resources;
- The local communities involved in the *preparation, implementation and co-financing* of Project interventions, to ensure ownership and make the project successful;
- The project activities designed to be site-specific and address local issues and needs, in order to achieve environmental, social and financial sustainability;
- In spite of livestock waste from small and household farms is the most important source of nutrients discharge, the nutrient discharge cannot be addressed through agricultural measures alone. An integrated program to improve rural water and sanitation must be tackled.



Main features of the Project design to promote national and regional scale-up

- Organize effective *awareness campaigns* at local and River Basin levels, based on the good practices adopted by farmers and rural population, as result of Project demonstrations;
- Permanent communication regarding implementation progress and benefits of the project, with the participation of the main actors in EU Nitrate Directive implementation;
- *Training and demonstration* activities designed to address specialists from all institutions involved, in order to assure the dissemination of the project results and the replicability of the interventions.
- *A monitoring and evaluation mechanism* set up to measure project impact and feed lessons learned into present and a future scale-up project design;
- *Public involvement* at all stages: design, implementation and replication.



Problems and challenges in involving public to the Projects' decision making

- Sometimes low desire to be involved, even reluctance in some cases;
- Lack of trust regarding the public power to influence the decisions;
- Orientation towards revenue-generation investments and low priority for environmental investments. ;
- Change of opinion between different moments: decision making and its implementation;
- Agree the solution as being in line with the problems, but never participate to its implementation and rarely apply the remedial measures agreed.

➔ **Large information and communication efforts;**

➔ **Continuous contact with the stakeholders, doubled by media and public awareness campaign**



Actions to attract the interest of decision makers, investors and local representatives

Four levels of action:

- I. Involve the authorities, beneficiaries and other stakeholders in the process of creating the infrastructure for achieving visible results on water quality;
- II. Collaborate and support local authorities to implement efficient systems for nutrient management;
- III. Inform and dialogue in order to induce changes in the current behaviors;
- IV. Monitor the soil and waters quality and the effect of the remedial measures.



Main drivers behind replication and scaling up

- Proved efficiency of the promoted actions;
- Priority given to the promoted actions at national and regional level;
- Legislative constraints and regional cooperation;
- Pressure of the future beneficiaries;
- Identification and availability of financial sources;
- Political will.

What is next?

Project re-scale-up, by including the nutrient management and reduction investments as eligible for EU funding, in the next Strategic Operational Program for Environment 2015-2020, for Romania.



Keys for further success:

- Take into consideration the regional particularities ⇒ **customize** the interventions ;
- Don't forget the **legislative implications**, different from one type of financing to another, from one type of investment to another;
- Use the gained experience of the **implementation teams**;
- **Beneficiaries ownership** is crucial ⇒ identify the main drivers to increase it;
- In case of environmental investments, the long term **financial sustainability** is crucial;
- Better design ⇒ smoother implementation.

