Inland Waterway Transport in Romania at the Crossroad:

WWF calls for the right balance between navigation and river ecosystem needs in the ISPA project on the Danube in Romania, between Calarasi and Braila

- Project “Improvement of navigation conditions on the Danube in Romania”
- Part “Improvement of navigation conditions between Calarasi (km 375) and Braila (km 175), and accompanying measures”
- This project can only be regarded as environmentally friendly if causing harm to riverine ecosystems is avoided.

Inland navigation is assumed to be an environmentally friendly mode of transport because it can emit less CO₂ than road transport. But the goal of more sustainable transport will not be achieved if the valuable functions/services with which ecosystems provide us are ignored, such as the storage and retention of water for domestic, agricultural and industrial use, flood control, groundwater recharge, nutrient reduction, and others.

All economic, social and environmental costs and benefits must be considered before undertaking major infrastructure developments. So far, these aspects are not sufficiently reflected in the presented ISPA project.
1. The planned activities will affect 200 km of the **most important areas for reproduction of migratory sturgeons** and **feeding places of sterlets and other fish species** represented in the Lower Danube.

- The planned project affects one of the few sectors on the Romanian Danube that includes stony and gravel bottoms, which are necessary for the reproduction of Beluga and Russian sturgeon, as well as numerous islands in the sterlet’s feeding area.
- Plans exist to construct a bottom sill nearly 5 m high and a guiding wall on the Danube arm where about 90% of the Beluga and Russian sturgeons migrate. Such high sill will cut off sturgeon migration on this route.
- Therefore, the most well-known international and national experts (including the internationally recognized Danube Delta Institute in Tulcea and the Romanian CITES National Administration Authority) refuse to support this project. According to their written comments on the Environmental Impact Assessment (EIA), the project “will have a major impact on the survival of sturgeons in the Lower Danube and on the sustainable development of traditional sturgeon fisheries in our country. By affecting the Danube areas of sturgeon natural reproduction and sterlets feeding the consequences for biodiversity conservation of migratory sturgeon fish fauna that are endemic for the Black Sea basin will be extremely serious”.
- Leading national and international sturgeon experts requested a detailed study to investigate the impacts of the project on sturgeon and other fish species before project implementation begins. However, this has not yet been conducted. In contrast, a consultant report of a local fishery institute in Galati was sent to the Romanian Academy of Sciences, who endorsed that this is sufficient evidence that the project is going to have no impact on sturgeon and other fish species, despite not having the detailed modelling or monitoring data.
- This project also contradicts the "Action Plan for the conservation of sturgeons in the Danube River Basin" under the Bern Convention (Nature and Environment, No 144, May 2006) to save the international heritage of Danube sturgeons as they are the last source for population recovery in the entire Black Sea.

2. The project will also lead to **contradicting use of EU funds (ISPA vs. LIFE)**.

- The planned ISPA-funded navigation activities will have an impact on the natural dynamics of some of the most important remaining Danube islands in the lower Danube, which are a subject of an ongoing EU-LIFE project that aims to protect the unique ecosystem of the Romanian Danube islands.
The Romanian Ministry of Environment and Sustainable Development supported the LIFE project as a competent authority and committed that it will designate eight Danube islands within the LIFE project area as Special Protection Areas, under the Birds Directive and as proposed Sites of Community Interest, under the Habitats Directive.

One-fourth of the islands that are subjects of the LIFE project will be directly impacted by the ISPA project as a result of bottom sill construction and bank protection on Turcescu and Fermecatu islands. Dredging, modifications of flow dynamics, and significantly increased traffic, together with the wave damage, will influence all other islands indirectly.

The external LIFE monitoring team is informed about the situation. However, so far no official reaction on the contradictory use of funds has been observed. WWF is considering submitting an official complaint to the European Union with regard to the conflicting funds, as well as nomination of the Natura 2000 sites.

Before spending EU tax payers’ money, a compressive analysis of all relevant environmental and socio-economic aspects needs to demonstrate that funding sources will be used wisely. All environmental services of natural river systems need to be taken into account including, e.g. drinking water supply, fisheries, recreation and tourism, the value of a landscape’s natural heritage, etc.

3. The ISPA project will include new infrastructure developments that lead to a significant deterioration of the current ecological status. This is in contradiction to the EU Water Framework Directive (WFD).

- The WFD requires preventing further deterioration of aquatic ecosystems (Art.1). Exemptions for new modifications are allowed only if a series of strict tests and conditions set out in Art. 4.7 are applied.

- So far, a detailed analysis of the planned modifications against these conditions is missing. In particular, an economic analysis is missing that would justify a significant deterioration of the ecological status compared to the current situation that requires taking a detour route of only 2.8% of the total length of corridor no. 7 for 150 days per year.

4. The planned hydraulic interventions are in contradiction with the concept of sustainable flood protection and wetland restoration.

- The TEN-T project between Vienna and Bratislava is an example of improving navigation conditions while simultaneously restoring wetlands and contributing to sustainable flood management.

- The Romanian ISPA project, on the contrary, will cut off side arms and secondary branches. This will decrease the conveyance capacity of the system needed to drain flood waters. Caused by former hydraulic interventions in the Danube system, the conveyance capacity of the lower Danube is already at the limit, as was demonstrated during the flood events in 2005 and 2006. Due to decreased water flow, reduced current and lower water level, riparian vegetation will invade
further into the side channels, trapping sediments and resulting in the gradual siltation of these side arms. This will further reduce the conveyance capacity in relation to the remaining overall capacity. More water will therefore flow through the main channel, increasing the flood peak there.

- It seems that state-of-the-art modeling and design was not applied, at least it is not visible in the current project proposal.

5. **Climate change will likely lead to higher frequency of extreme weather events**, which in turn will affect the water discharge regimes of river systems. It is expected that both low water periods and flood events will become more frequent and more intense (prolongation and frequency of low water periods on the one hand and higher and more frequent flood peaks on the other hand). Furthermore, a decrease of annual river discharge by 25%, and even more by 2070, is expected in the South-Eastern Europe. Despite these predictions, the Romanian ISPA project does not take likely climate change effects into consideration.

6. There are **no legally binding depth requirements in the TEN-T guidelines**.

- Article 11, which deals with characteristics of inland waterway network and inland ports, specifies the width and length of boats for which access has to be ensured, but not their (or the channel) depth.

- Only the so called “Van Miert report” (based on High Level Group meetings chaired by Karel Van Miert) provides recommendations that the Danube’s upgrading should guarantee a draught of at least 2.5 meters during all seasons, from the North Sea to the Black Sea. The reason for selection of such a benchmark was not given.

- So far, however, neither the Romanian Ministry of Transport nor the Romanian Ministry of Environment and Sustainable Development take into account revisions of the “the development goals relating to water ways” in order to “eliminate the inherent conflict” between navigation goals and nature conservation/water protection legislation. According to a joint statement of the Hungarian Ministry of Environment and Ministry of Transportation from April 2007, this “may be necessary.” The Hungarian statement also requests a “need for strategic environmental impact assessment before taking a decision on development concepts and on certain interventions.” This is also missing in the current Romanian ISPA project.

7. The project will be **disadvantageous for the Danube operators**.

- Ensuring access for ships with a larger draught will in fact favor the Rhine operators who tend to have larger ships and lower price levels per ton. Interoperability between waterway systems is favourable for the bigger firms whose ships are licensed and equipped to operate in both systems. In the Danube fleet there are 59 units (Europe-type) equipped for Rhine
operation, while on the Rhine there are 1,619 units which can be used on the Danube.

- The bigger ships of the Rhine fleet can be competitive on parts the Danube, if allowed by the nautical circumstances. Ships suited to the lower water depth levels/nautical conditions of the Danube cannot compete with Rhine routes as the price level of the Rhine market prevents them from entering that market.
- Waterway capacity development (removal of “bottlenecks”) pushes actors towards investments that give less and less consideration to the environmental constraints rooted in the dynamics of the river.
- The increase in interoperability between the Rhine and the Danube will favour operators from the Rhine, while the environmental cost will emerge along the Danube.

What does WWF request in order to improve Inland Waterway Transport in the Romanian Danube?

WWF supports Inland Waterway Transport (IWT) as long as plans and projects:

- meet all legal requirements (international, European, and national legislation)
- respect socio-economic needs, especially the needs of local and regional communities
- are environmentally sustainable, taking into account global, regional AND local effects (e.g. help reduce climate-relevant transport emissions through techniques that do not negatively impact river ecology)

What needs to be done to improve the Romanian ISPA project?

To become a more sustainable project, the Romanian ISPA project should consider the following:

1. The project needs to be embodied into a European IWT Infrastructure Development Plan (e.g. to be developed as part of the implementation plan of the NAIADES Action Programme), which in turn has to be subject to a Strategic Environmental Assessment (SEA) to evaluate the cumulative ecological impact of all projects and measures planned under TEN-T and NAIADES. Until basin-wide impacts of the proposed measures in different parts of the river are evaluated, no new separate projects should begin.
2. Before the project starts, a detailed study on the present situation, as well as changes in flow patterns and bottom fauna induced by the project, needs to be performed. **The effects on sturgeon migration, feeding, and reproduction need to be investigated by an internationally recognized institute before any intervention starts.** Because maintaining healthy sturgeon populations is an issue of international importance, these studies need to be conducted under the control of the CITES National Administration Authority and in cooperation with an international expert team. A survey of a non-internationally recognised Romanian consultancy is not sufficient to ensure an independent judgement.

3. **No new depth requirements should be introduced in addition to those already in effect under existing conventions,** unless they are based on a sound and basin-wide environmental assessment, and it has been clearly proven that they do not have negative impacts on the entire river ecosystem.

4. **No EU tax payers’ money should be used to finance contradicting projects.**

5. The ecological protection of the last remaining island system along the lower Danube must be one of the priorities for inland navigation if it is to be called sustainable. This at least requires a **rigorous provision of all exemptions as requested in the Art. 4.7 of the WFD.** In particular, the large ecological damage of this project has to be discussed in light of the economic costs of taking a detour route of only 2.8% of the entire planned corridor no. 7 for 150 days per year.

6. Effects of the project on flood risks should be rigorously assessed, and **the project must be integrated into the overall flood risk management plans.**

7. The Romanian national navigation plan does not include measures to support fleet modernisation. **Using fleet technologies that allow adjusting the draft of the vessels,** and in general allow navigating on lower or varying depth conditions, would not only help avoid negative effects of irreversible changes to the river morphology as well as their costs, but would also help adapt to the effects of climate change. It would be helpful if the Romanian government were **lobbying the EU to secure funding sources for stimulating fleet modernisation.** This could make a significant contribution to the sustainable development of the lower Danube region.