



Development of Danube waterborne transport in the EUSDR framework

Herfried LEITNER, Chairman
Robert RAFAEL, General Secretary

2nd EUSDR EMBEDDING WEEK

Who are we?



Pro Danube International (Non-profit business association)

Registration: ZVR203524390
Founded: 22.09.2011
Seat of Association: Grünbergstraße 15, Stiege 1, 5th floor, 1120 Vienna

„We believe that the potential of the Danube waterway, as a competitive logistics system, is by far bigger as we use it today. To unlock this potential is our vision. This strives for passenger as well as for cargo transportation.“

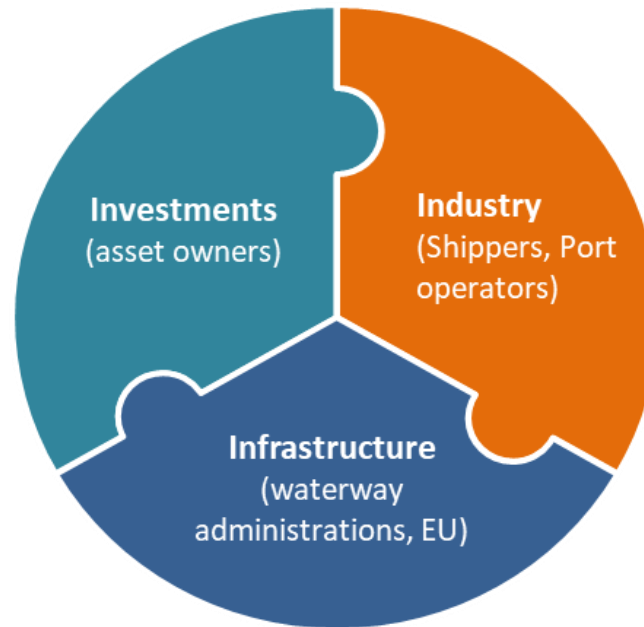
We are: Driving force in the development of the Danube waterway as a competitive and sustainable logistics system
Network of about 200 private businesses
Representing the interests of our members towards EU, public authorities and administrations

Great together – instead of – small alone

Focus areas of each actor

- ① **Technological** jump – greening, energy efficiency & competitiveness
- ② Agri products drive profitability – need **multi-modality solution or constant cargo supply**
- ③ Job attractiveness
- ④ (LWS solutions)

- ① Provide framework for **Port Services on Demand**
- ② **Weather independency**



- ① Stable minimum **fairway** conditions
- ② **Secured depth of entrance to Ports and Port basin**
- ③ **Equal treatment** of modes of transport



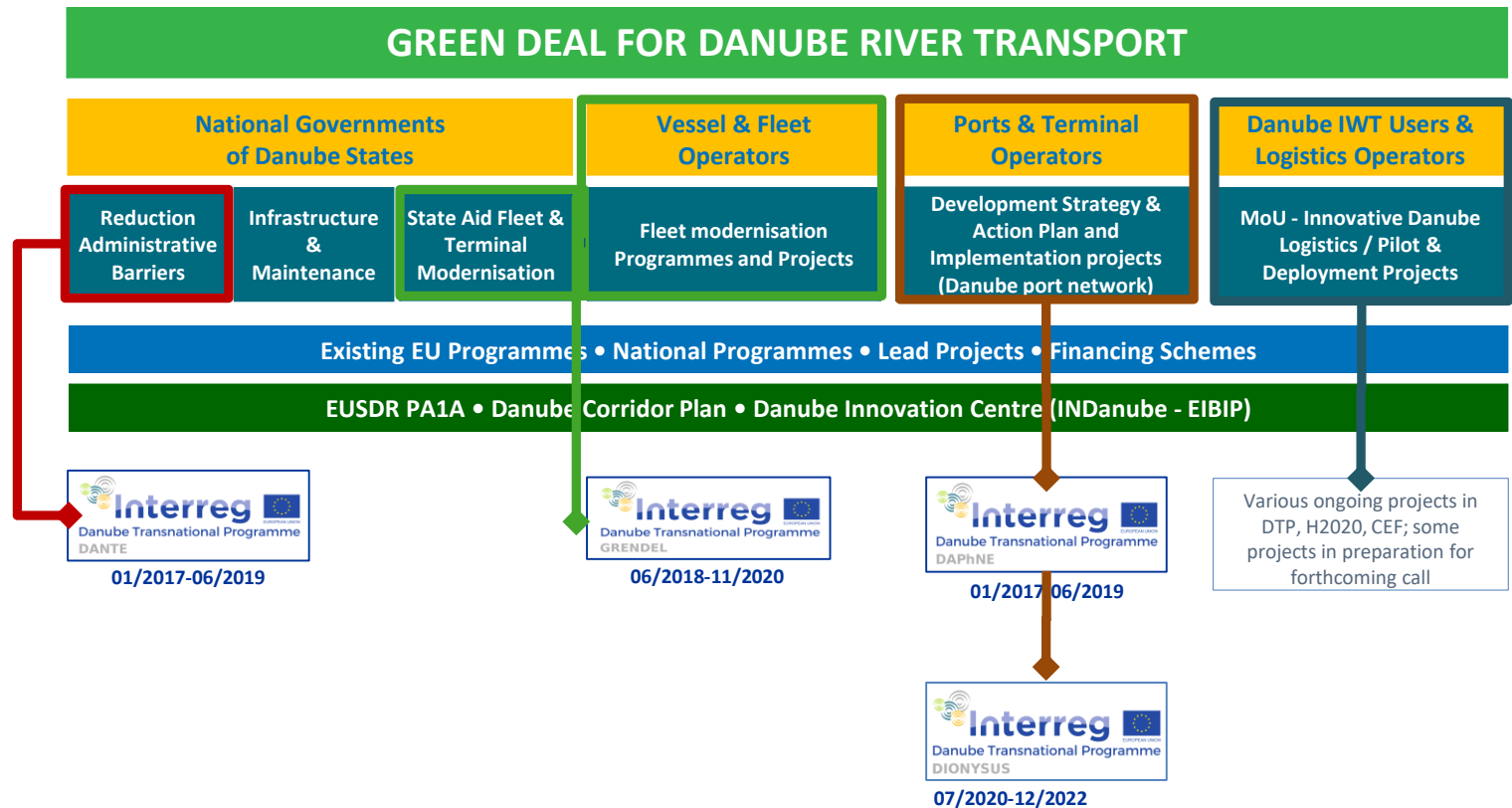
IWT related biggest hurdles?



- Profitability is too low to allow new investments into technology and innovative solutions
- This is a result of supply and demand, whereas supply is not an issue
- Demand is driven by agri products and therefore depending on good crop years
- Bad crop means fierce competition and no margins
- Must reduce dependency by enlarging into Multimodal services
- Will provide at least mid-term commitments of customers
- Navigability of the Danube
- Borcea de-routing
- Image of low cost carrier

GREEN DEAL: Policy initiative based on cooperation & commitment

In 2017, PDI successfully started the implementation of the Green Deal by means of **DANTE**, **DAPhNE** transnational projects and has taken serious actions towards the modernization of the Danube fleet in the framework of the **GRENDL** approach.



Great together – instead of – small alone



Green Deal & Fit for 55



„As one of the most CO2-efficient transport modes available, inland waterways have the potential to play a central role in decarbonising our transport systems. Yet today, our canals and rivers carry just 6% of EU freight.“

Adina Vălean

Action plan: **NAIADES III**
 Target: **IWT – share increase till 2030 by 25%**
IWT – share increase till 2050 by 50%

ANNEX: ACTION PLAN

SHIFTING MORE FREIGHT TRANSPORT TO INLAND WATERWAYS		
1. Continued support for innovative infrastructure and deployment through Horizon Europe and CEF		From 2021
2. Revision of the TEN-T Regulation - Inland waterway transport requirements and role of coordinators		2021
3. Deployment of cross-disciplinary digital information and operation systems for water- and waterway management through CEF		From 2022
4. Transport crisis contingency plan(s)		2022
5. Review of the regulatory framework for intermodal transport, including the Combined Transport Directive		2022
6. Issue guidelines for operators and platforms on informing users about the carbon footprint of their deliveries and on offering sustainable delivery choices		2023
7. Review the inland waterway transport market access legislation		2022
8. Evaluation of the Directive (EU) 2016/1629 on technical requirements for inland vessels		2022
TOWARDS ZERO-EMISSION INLAND WATERWAY TRANSPORT		
9. Specific actions arising from the Mission on Healthy Oceans, Seas, Coastal and Inland Waters and from the Zero-Emission Waterborne Transport Partnership/Green Hydrogen partnership		From 2021
10. Support through CEF for the deployment of zero-emission inland vessels		From 2021
11. Facilitate through the H2020 Platina III project the elaboration of an EU energy index methodology for assessing carbon intensity levels of inland waterways vessels		2022
12. Evaluate the procedure for allowing derogations in the context of Directive (EU) 2016/1629 for encouraging the navigation of zero-emission vessels on EU waterways		2023
13. Analysis to assess the need for measures for promoting low carbon/zero-emission vessels.		2025
14. Revision of the railways State aid guidelines - possible inclusion of IWT and possible block exemption of aid for the coordination of transport		From 2021 to 2023
15. Revision of the State aid guidelines for environmental protection and energy, as well as the State aid Framework for research, development and innovation		2021
16. Technical Guidance document on climate proofing on infrastructure in the period 2021-2027		2021
17. Study to support the greening of inland ports		2021
18. Revision of the Alternative Fuels Infrastructure Directive and a roll-out plan with funding opportunities and requirements		2021
19. Request the European Standardisation Organisation for harmonised standards for alternative fuels infrastructure for inland waterways and ports		2021
20. Continuous support for innovative and alternative fuels infrastructure and deployment through Horizon Europe and CEF		From 2021
21. An assessment of the needs of waste reception infrastructure and and degassing facilities		2024
22. Revision of the Delegated Regulation (EU) 2017/1926 on multimodal travel information services with inclusion of inland waterway transport		2022
SMART INLAND WATERWAY TRANSPORT		
23. Revision of the Directive 2005/44/EC on Harmonised River Information Services		2022
24. Technical assistance for a permanent operational structure for a single point of access for the provision of RIS-based Corridor Information Services		2024
25. An integrated and operationalised vision for the digital transformation of the current traffic and transport related business models and processes in the sector		2023
26. CEF technical assistance project to strengthen public-private cooperation in inland waterway transport and facilitate implementation of the digitalisation vision		2023
27. Facilitate the Development, demonstration and the deployment of holistic Smart Shipping Concepts for the digital integration of inland waterway transport in the synchronised supply chain, including RIS, through Horizon Europe and CEF		From 2022
TOWARDS MORE ATTRACTIVE AND SUSTAINABLE JOBS IN INLAND WATERWAY TRANSPORT		
28. Regular information on the labour market structure through the inland waterway transport market observatory		From 2022
29. Evaluation of social legislation in the context of the market access fitness check		2023
30. Propose measures on digital tools for recording and exchanging information on inland crew and vessels		2021
31. Propose measures on EU crewing requirements for inland navigation		2024
32. Request development of standards for skills for alternative fuels' operations and for environment-friendly and efficient vessel operation (eco navigation)		2022
FINANCING		
33. Facilitate the efforts of stakeholders and Member States to create a fund complementing EU and national financial instruments		2024
GOVERNANCE		
34. Support the CESNI through the CEF technical assistance for the development of technical standards for inland waterway transport		2022
35. Support the CNR and the Danube Commission for ensuring, where appropriate, the coordination between EU policies and the policies of the respective international organisations		From 2022

NRMM – EU regulation 2016/1628 (non-road mobile machinery directive)



Comparison between different stages in IWT - engines development

	particulate pollutants				
	CO (carbon monoxide)	HC (hydro carbons)	No _x (oxides of nitrogen)	PM (particulate matter)	PN (particle number)
	[g/kWh]	[g/kWh]	[g/kWh]	[g/kWh]	[/kWh]
CCNR 1	5,00	1,30	10,30	0,54	n/a
CCNR 2	3,50	1,00	9,20	0,20	n/a
EU NRMM Stage IIIA	5,00	7,20	7,20	0,20	n/a
EU NRMM Stage V	3,50	0,19	1,80	0,02	1*10 ¹²

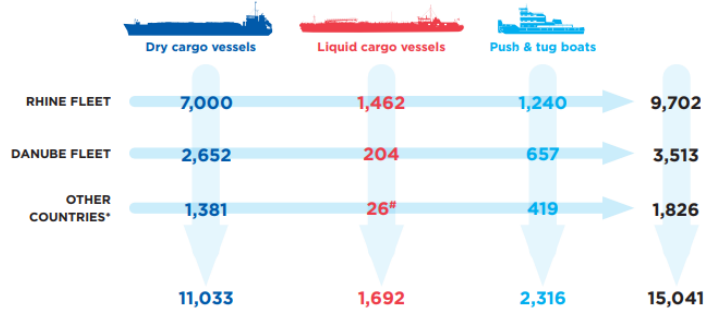
Source: own research

Stage V additionally:
Proof of durability during 10.000 working hours of no significant
emission exhaust reduction !!!

European IWT - fleet

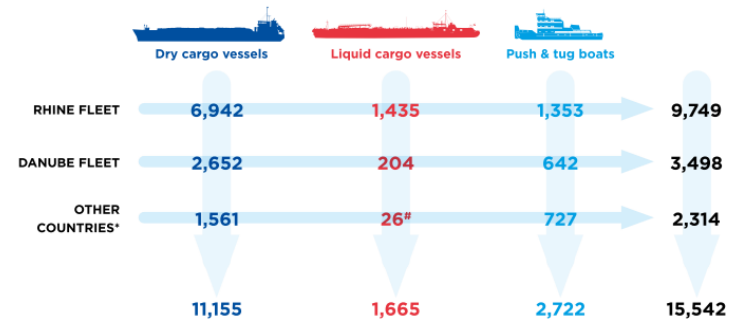


SIZE OF FLEETS PER MACRO-REGION (NUMBER OF INLAND VESSELS) IN EUROPE



Source: CCNR – annual report 2019

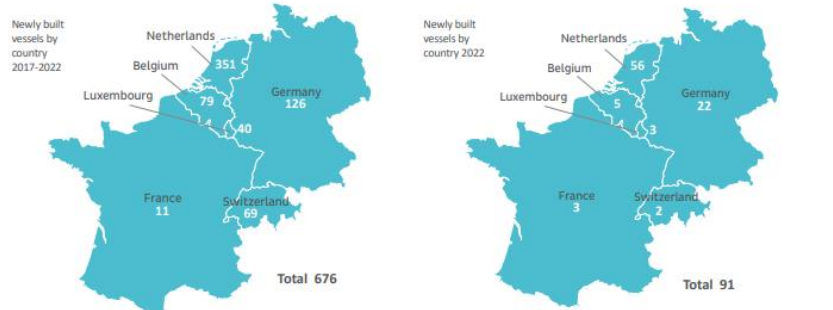
TABLE 1: SIZE OF FLEETS (NUMBER OF INLAND VESSELS) PER MACRO-REGION AND VESSEL TYPE IN EUROPE



Sources: 1) Rhine countries: VNF (France), CBS/Rijkswaterstaat (Netherlands), ITB (Belgium), Waterway Administration of Germany, National fleet register of Luxembourg, Swiss Waterway Administration. 2) Danube countries: Danube Commission. 3) Other countries: Eurostat [iwk_eq_loadcao], [iwk_eq_age], Czech Ministry of transport, Statistics Poland, Statistics Lithuania.
 * Other countries = Poland, Czech Republic, Italy, United Kingdom, Finland, Lithuania.
 # comprises 9 tanker vessels in Poland, 1 in the Czech Republic and 16 in Lithuania, but an unknown number in the other countries.

Source: CCNR – annual report 2020

Statistics 2022



Source: IVR 2023

Fleet modernisation – Pro Danube's conclusion



- Reasonable business cases have to be developed
- Proper blending of own financial sources, funding & financing is to be ensured
- There is no EU funding programme which could significantly contribute to achieve the greening objectives in the fleet segment
 - this is not necessarily a problem, but the market needs to be trained to be prepared for innovation and investment
 - EUSDR can support the stakeholders' teamwork and get-together, however that is not sufficient any more
- **Strong and stable political decisions have to be taken on the supported sustainable alternative fuels**
- **Serious discussions have to take place with the IWT sector to decide on the future short-/mid-/long-term strategies**
- **We welcome all initiatives and happy to contribute!**

Thank you for your attention!

Pro Danube – the voice for better infrastructure and innovation in Danube transport



SAVE THE DATE

23 & 24 NOVEMBER

VIENNA

DANUBE PORTS DAYS
2023



<https://www.linkedin.com/company/pro-danube>