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CONNECTA

# Technical Assistance for the Deployment of Smart and Sustainable Mobility in the Western Balkans

CONNECTA-TRA-CRM-REG-MOB-07

WORKSHOP no. 3

**Smart and green mobility**

22/11/2022, Tirana

***Rail & road interface, current dynamics of the region***

Author: CONNECTA

- TEN-T Rail Current Status
- TEN-T Road Current Status
- Rail Terminals – Interface with Road
- What needs to be done



# TEN-T Rail Network in WB6

## Current Status



### Core Network:

- Very good: 13.38%
- Good: 16.73%
- Average: 26.11%
- Poor: 9.46%
- **Very poor: 34.32%**

### Comprehensive Network:

- Very good: 15.74%
- Good: 12.30%
- Average: 26.94%
- Poor: 6.35%
- **Very poor: 38.66%**



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# TEN-T Rail Network in WB6

	ALB	BIH	KOS	MKD	MNE	SRB
	0%					
Core	<b>0%</b>	<b>100%</b> 432 km	<b>0%</b>	<b>79,7%</b> 216 km	<b>100%</b> 202 km	<b>76,8%</b> 1075km
Comprehensive	0%	76,8%	0%	39,6%	86,4%	63,4%

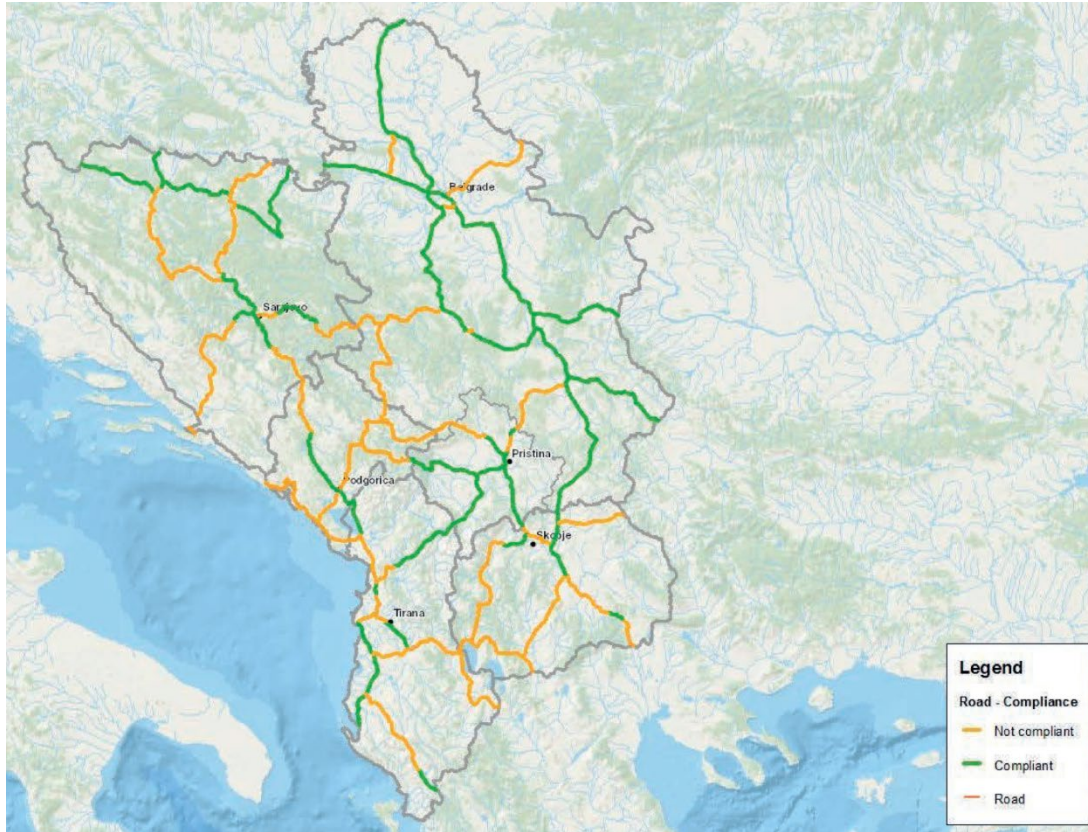
- The rail **electrification compliance** of the operational network is already on 1,807 km (**73%**) on the Core and 2,002 km (**54%**) of the Comprehensive Network.
- However, there are still issues related to the **usage of diesel locomotives on electrified sections** due to **lack of the electric locomotives Railway Undertakings**.
- Despite the high percentage of electrification of the train lines, they are **not fully compliant with European directives**.
- The **electrification of the rail core network is a priority** in the strategic planning of the WB6 Regional Participants and is **expected to be completed at a significant level by 2030** (*“Development of indicate TEN-T extensions of the Comprehensive and Core Network in Western Balkans“*).



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# TEN-T Road Network in WB6

## Current Status



The total length of the TEN-T road network in the Western Balkans is 5,287.41 km, of which 3,540.55 km are on the Core Network.

Based on the findings of the TCT Secretariat's Annual Report on Development of the indicative TEN-T extension of Core and Comprehensive Network to the Western Balkans, **45% of Core Network and 52% of Comprehensive network are compliant with TEN-T standards related to infrastructure profile and conditions.**

Moreover, the above network **lacks compliance with the provisions of EU Directives on road tunnels, tolling interoperability and ITS.**



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# TEN-T Road Network in WB6

## TEN-T Core additional Provisions

Additional conditions should also be imposed for the Core network, such as:

- Stricter application of road profile requirements (except for some clearly defined situations, roads should be either motorways or expressways)
- Development of rest areas on motorways approximately every 100 km
- Availability of alternative fuels (charging points at least every 60 km).

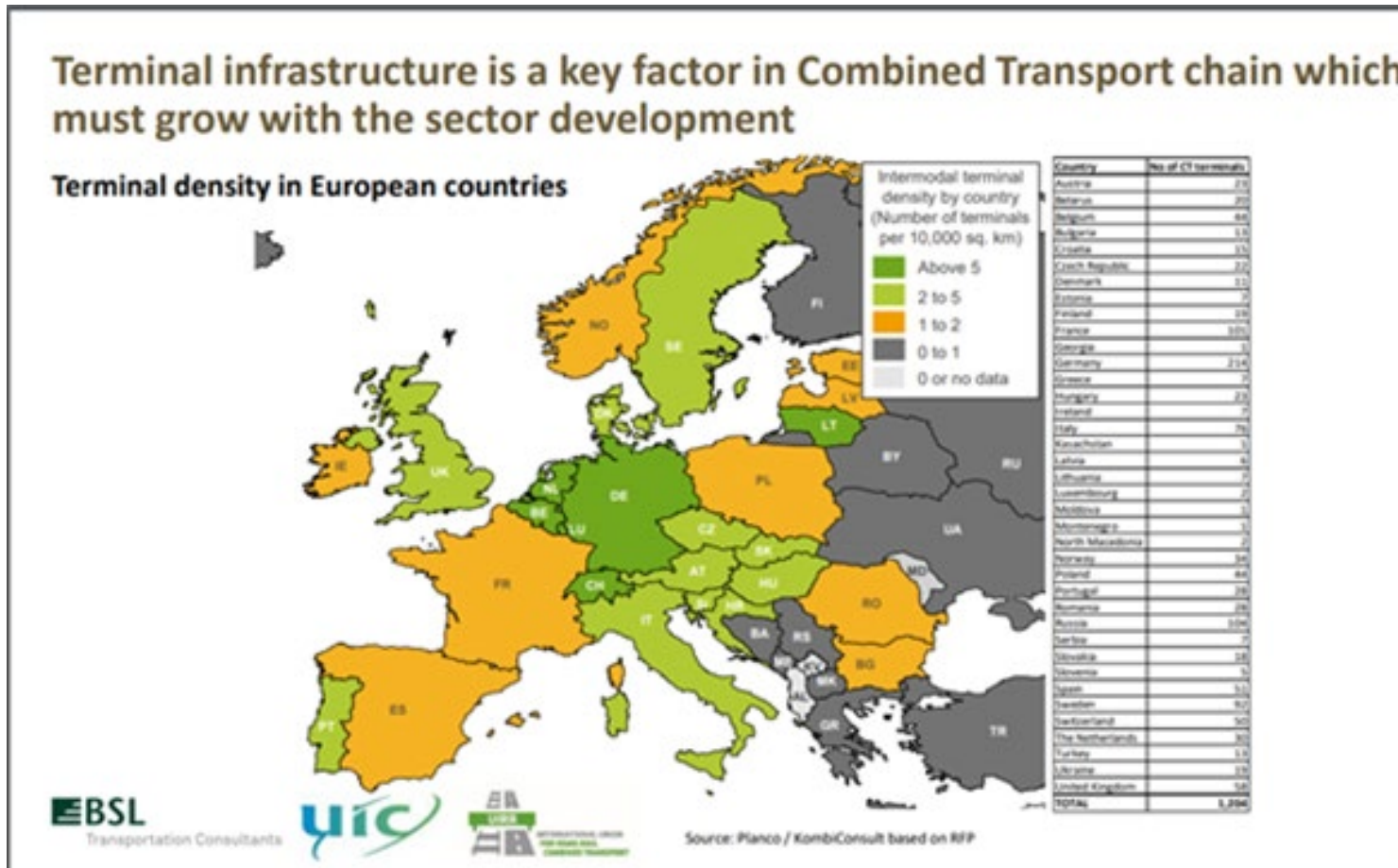
Transportation networks nowadays have a binary nature. They exist both in physical and digital level. Thus, their interconnection with other modes and services should be ensured, both in physical and digital level. Therefore, apart from physical interconnection between rail and road, their systems and ITS implementation should be interoperable, exchanging data and services.



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# Rail Terminal infrastructure density

Very low intermodal terminal density in WB6 with 0 to 1 intermodal terminal per 10,000 sq. km.



Source: UIC, 2020.



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# Eliminating bottlenecks - Fields of action in the rail freight sector

## Fields of Action



Railway Undertakings (incl. CT operators)

- Restructuring and modernisation
- Quality, flexibility and ease of use
- Automation, telematics and more user-friendly interfaces
- Contingency management
- Standardisation of assets



Infrastructure Managers

- High quality infrastructure
- Network accessibility
- Easy and innovative train operations



Policy Makers/ Authorities

- Internalisation of external costs
- Reducing Track Access Charges
- Reduction of costs
- Stimulating and maintaining best last-mile infrastructure
- Supporting innovation
- Operational and technical interoperability

Source: UIC



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# Bottlenecks in modal interconnections

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- Multimodal infrastructure should be further developed to remove all missing links.
- Ensuring road/rail connectivity with all ports/airports/terminals in the region and developing modern inland terminals and transshipment serving the market needs are key preconditions for developing this sector.
- Additionally, removing bottlenecks for intermodal transport on specific sections should be addressed.
- In WB, only 19 % of the Rail Core and 12 % of the Rail Comprehensive network is compliant with the TEN-T operating speed compliance indicator (100km/h), directly influencing quality and efficiency of rail freight transport.



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# Rail – road terminals

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- Intereuropa RTC,
- Alipasin most, Bosnia & Herzegovina,
- Container terminal Tovarna / Skopje / North Macedonia,
- Container terminal Donje Dobrevo (Miradi) / Kosovo\*,
- Logistics Centre Beograd ZIT / Serbia).

\*This designation is without prejudice to positions on status and is in line with UNSCR 1244/1999 and the ICJ Opinion on the Kosovo declaration of independence.



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## Contact information

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# Questions and Discussion

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**Any comments/suggestions?**



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**CONNECTA**

# Thank you!

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