

Transport characteristics of FR Yugoslavia

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The Federal Republic of Yugoslavia (population about 10.5 million) comprises two federal entities, the Republic of Serbia, and the Republic of Montenegro.

FR Yugoslavia takes up the central part of the Balkan region, and provides for the passage of traffic through corridors linking Europe with the Near East, Asia and northeastern Africa.

Yugoslavia has favorable economic and geographical conditions for cargo transportation in inland waterway traffic. Two basic corridors could be separate: Danube-East and Danube-West. In the Danube-East corridor, the cargo flows can move in directions: river-sea (Danube-Black sea), sea-river (Black sea-Danube) and further, Danube-Mediterranean sea and vice versa.

Furthermore Yugoslavia is also a coastal country, and there is access to the southern part of the Adriatic Sea with 300km of sea-shore, making it relevant to transport in the Adriatic and Mediterranean areas. The main sea port is Port of Bar.

Much transportation infrastructure, including international E-roads, railroads, navigable routes, river ports and sea harbors, and international airports and telecommunication systems, are already established and represent an integral part of European routes.

Unfortunately, the war events on the territory of former Yugoslavia and five year UN sanctions towards FR of Yugoslavia brought to the isolation of Yugoslavia as well as isolation of transport system which further caused now is technical, technological, organization, ownership and managing obsolescence. The consequence is: the lack of investments for maintenance, modernization and development of capacities, which results in inability to adjust to the new conditions in time.

The paper presents the transport characteristics and transport plans in different transport fields in FR Yugoslavia.

Road transport

The road network of Yugoslavia totals nearly 50,000 km: main road (6477 km), regional roads (12,590 km) and local roads 29,894 km, with the density representing 0.48 km for every km² of land

About 95% of main roads have modern pavements (asphalt, concrete), while for regional roads the figure is about 80% and local roads about 50%.

Main roads represent the basic road network and comprise about 30 road routes, encompassing European E-roads (Figure 1). E-roads passing through Yugoslavia at various points are:

- E-75: Hungary (Budapest), Belgrade, Macedonia (Skoplje), Greece (Athens)
- E-70: Croatia (Zagreb), Belgrade, Romania (Bucharest)
- E-80: Croatia (Dubrovnik) to Bulgaria (Sofia)
- E-65: Croatia (Dubrovnik) to Macedonia (Skoplje)
- E-660: Hungary, Danube River, Croatia
- E-761: Bosnia and Herzegovina (Višegrad) to Bulgaria
- E-762: Bosnia and Herzegovina (Srbinje) to Albania
- E-763: Belgrade to link with E-65/80 (Ribarevina)
- E-771: Romania-Kladovo-Zaječar-Niš-Priština
- E-851: Priština-Prizren-Albania-Ulcinj-Bar-Petrovac

The E 75 and E 70 are the part of European corridor X. Corridor X across Yugoslavia covering traditional transport routes of south-east Europe, with the main corridor being via Salzburg, Ljubljana, Zagreb, Belgrade, Niš, Skoplje, Veles and Thessaloniki. Two links are Budapest, Novi Sad to Belgrade, and Niš, Sofia, Istanbul.

It is in the interest of Yugoslavia to add some of its traditional

corridors to the Pan-European Transport Network, primarily the corridor Belgrade-South Adriatic (Bar) with interconnections with Italy (Bari) and Albania (Tirana).

Toll payments on motorways and semi-motorways have been in operation for over 20 years, and currently these are being used to develop and operate motorways, all of which have dual carriageways, with two traffic lanes each and a total width of between 27.40m and 28m (including stopping lanes and central reserve).

At present motorways under operation in Yugoslavia include those on the routes E-70 and E-75 from the border with Croatia-Sremska Mitrovica-Ruma-Belgrade-Niš-Leskovac (380km long) and the semi-motorway on route E-75, Subotica-Feketić-Novi Sad-Belgrade (165km).

According to developmental plans the prospective motorway network should amount to about 2000km covering the basic corridors of E-roads, and implementation schedule and priorities will depend on the traffic demand, based on transport-economic criteria which will be appraised by adequate feasibility studies and available financial resources.

Railway transport

Today length of Yugoslav Railways (JŽ) network is 4059 km (figure 1). All lines have the normal gauge (1435 mm). Length of main railway lines is 1936 km. All main lines have been designed and constructed for the speed of 100-120 km/h, equipped with SS and interlocking devices, automatic phones, and on the most part of lines with centralized dispatching monitoring of trains. Length of electrified railway lines is 1373 km or 33,8 %. Electrification has been carried out applying mono-phase system of 25 kV 50 Hz. Yugoslav