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COMPATIBILITY OF CROATIAN AND EUROPEAN PORT POLICIES – PREREQUISITES AND MEASURES FOR SUCCESSFUL DEVELOPMENT OF CROATIAN PORT SYSTEM

KOMPATIBILNOST HRVATSKE I EUROPSKE LUČKE POLITIKE – PRETPOSTAVKE I MJERE USPJEŠNOG RAZVITKA HRVATSKOG LUČKOG SUSTAVA

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Summary

This paper contains a systematical analysis of reasons for lagging of Croatian port system and emphasises the necessary prerequisites and measures which should become the guidelines of the new port policy in approaching the European port system requirements and tendencies.

Particular attention has been paid to basic phases of transformation and to the proposal for an overall concept of port system development, whereby a close determination of the place and role of particular ports in the development of Croatian port system is achieved by means of its final results.

Key words: port, port system, port policy, Croatian port system, European port policy.

Sažetak

U radu su sustavno analizirani uzroci zaostajanja hrvatskog lučkog sustava, te istaknute nužne pretpostavke i mjere koje trebaju biti smjernice nove lučke politike u približavanju zahtjevima i tendencijama razvoja europskog lučkog sustava.

U ovoj se raspravi posebna pozornost posvetila temeljnim fazama transformacije i prijedlogu cjelovite koncepcije razvitka lučkog sustava, koja svojim krajnjim rezultatima pobliže određuje mjesto i ulogu pojedinih luka u razvitku hrvatskog lučkog sustava.

Ključne riječi: luka, lučki sustav, lučka politika, hrvatski lučki sustav, europska lučka politika.

1. Introduction

Uvod

Sea ports represent the key subsystem within the maritime and transportation system, the accelerator of traffic flows and of the development of numerous economic activities of a country. Sea ports are a distinguishable part of a national economy (incomes, employment, value of premises and equipment), promotor of the development of certain activities (trade, production, final processing, service trade in transportation) and a condition for the development of others (industry, energy supply etc.).

Ports make an integral part of the transportation system of a country and also a point of confluence of the traffic from all transport routes and means. They do not belong to any particular branch of transportation, but are rather a factor within the transportation system upon which the proper and effective functioning of other participants in the transportation depends. Ports are public institutions, yet they are at the same time economic subjects operating in accordance with basic economic principles, with the purpose of rendering appropriate services and extending economic activities. Modern ports are characterized by several essential features which are revealed as a general tendency in the development of almost all the world ports, i.e.: concentration of traffic on a smaller number of larger ports, concentration of different economic functions within the same port, aspiration for higher added values (by enrichment and additional processing of goods), modern transportation connections with

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hinterland and higher level of autonomy in port management.

Appropriate statutory measures and development programmes can enable the state to either promote or weaken the port system development which is at the same time consequential to a faster or slower integration of the country in the world transportation and economic flows. The way and size of investments in the development of port system and the pertaining ports are indicative of their treatment within particular states as well as of the level of orientation of the society as a whole upon the logistical, transportation and port policy of a maritime country.¹ The back-effect obtained from a modern port and a harmonized port system of a maritime country is reflected in the stimulation of economic development of the hinterland and in the development of transportation and economic activities of the whole country. The geographical and traffic related situation of Croatian sea ports being of a relative significance, changeable and directly dependent on how much Croatia is able to do in the construction of traffic infrastructure and upgrading of transportation technique, technology and organization, possibilities for the development of Croatian sea ports should be based on experiences of outstanding world ports and also on the existing problems and specific features of Croatian port system, as well as on conditions related to competitive North Adriatic ports.

Inadequate modern land transport lines in the North Adriatic transportation route affect the unbalanced situation which reflects not only upon the performance of the land traffic between the West and East Europe (with branch lines southbound and northbound), but also between the Central and Central-Eastern Europe and overseas countries, directing it towards North European ports rather than towards geographically closer ports in the North Adriatic. The standstill in the development of traffic infrastructure on the North-South route towards the Central Europe causes negative tendencies in respect of the progressive linking of the West and East within the extension of the European Union. In this way the gap between regions situated north and south from the Alps, since the need for market integration in these regions has not been accompanied with appropriate well balanced development of transport lines which would offer approximately the same possibilities for a direct and efficient flow of goods. The existing discrepancies within the traffic infrastructure development is particularly revealed in North Adriatic ports, as also resulting from the analysis made recently by the Institute for European Union and East Europe Studies and Documents in Trieste. The analysis of a two-year period (1997-1998) resulted in the conclusion that out of the total transportation by sea concerning the Czech Republic, Slovakia, Hungary and Austria, the portion of cargoes directed to North

European ports amounts to 83% - 84% for Czech Rep., to a figure between 64% and 70% for Slovakia, to 30% - 31% for Hungary and to 55% - 61% for Austria.² This trend has continued despite the fact that the North European ports are more distant than the North Adriatic ports and twice as distant as final destinations in Central European countries, thus having an essentially discouraging effect upon the development of port infrastructure, limiting goods flows which naturally gravitate towards North Adriatic ports, make the development and stabilization of shipping routes in the Adriatic more difficult, and the establishment of an adequate and efficient transportation logistics unfeasible.

2. Assessment of present position of Croatian port system

Ocjena postojećeg stanja hrvatskog lučkog sustava

Croatian sea ports have an important role and a great potential significance based on their favourable geographical situation. The long and richly indented sea coast (1777,5 km of coast on land, i.e. 47,6% of total sea coast) in addition to 4058 km of Croatian islands coast has given life to numerous large and small ports out of which considerable traffic significance can be attributed to 7 ports engaged in international transportation by sea (Pula, Rijeka, Zadar, Šibenik, Split, Ploče and Dubrovnik). Different macroregional geographical situation of three groups of Croatian ports (the North, Central and South Adriatic ports) is reflected in their essentially different turnover position and function in relation with their hinterlands. The total turnover capacity of these ports amounts to 23 mill tons of dry cargoes, which added to the Rijeka port oil terminal capacity of approx. 16 mill tons yearly make an aggregate capacity of approx. 39 mill tons of dry and liquid cargoes. The major portion of this turnover facilities refers to the ports of Rijeka and Ploče. The basic problem here is seen in the fact that the major portion of their facilities has been technologically behind time, with utilization rate of 30% to 50%. Indicators concerning passenger turnover are almost identical, the total passenger turnover in Croatian ports being by 40% lower than the one of twelve years ago. It is an undisputable fact that a significant drop in port turnover was recorded in the past decade, due to various objective and subjective factors among which the following should be emphasized in the first place:

- Croatian sea ports, with the port of Rijeka in the first place, missed the important cycle of investments in modern facilities and technologies

² Favaretto, T., Jakomin, L.: "Problemi e squilibri dell'area Nord Adriatica nel quadro dell'integrazione europea", PROCEEDINGS, International Conference ISDEE-IEE-NAPAN, Trieste, October 2000

¹ Dundović, Č.: Lučki sustavi, Strategija razvitka pomorstva, "Hrvatska u 21 stoljeću", Rijeka, 2001.

during the 1980's. At the same time investments in upgrading and construction of additional facilities were going on in the neighbouring competitive ports of Koper and Trieste (investments in the port of Koper between 1980 and 1989 were three times as high as those in the port of Rijeka); Unlike the port of Rijeka, where there were no significant investments in the period from the late 70's till 1990, new container and RO-RO terminals were built in ports of Trieste and Koper and they were adjusted with new requirements of the shipping trade market. At the same time Croatian ports were making great 'efforts' in competing with each other, although their features in terms of space, gravitation and economy offered a sound basis for the division of work on the basis of space-gravitation and also for specialization rather than for all the 'odds and ends', mutual 'imitating' inefficient investments, high costs and uncompetitive port service tariffs.

- Inadequate and obsolete railway and road transport lines have caused the traffic to be diverted to neighbouring or even considerably distant European ports;

Traffic infrastructure of an adequate quality level and greater attractiveness for traffic flows assume the features of traffic flow regulators. The key role is played here by the state, influencing with its traffic policy measures and construction of an appropriate infrastructure the forming of strong transportation corridors on certain routes. The absence of a consistent economic and traffic policy in the past, orientation to inland transport, neglecting of litoral regions, minoration of the role of ports and the maritime transport, and many objective and subjective factors represent the reasons for the significant lagging of Croatian port system.

- Warlike operations in Croatia contributed to diverting of traffic flows to other ports; (due to the increased risk and introduction of additional insurance). The 1990 turnover of Croatian ports amounted to 13.345 mill tons of dry cargoes, out of which the share of the port of Rijeka was 5.8 mill, Ploče 4.59, Šibenik 1.17, Split 1.02, Zadar 0.63, Metković 0.308, Dubrovnik 0.214, Pula 0.015 mill tons.³ Total turnover of Croatian sea ports with liquid cargoes included amounted to approx 30 mill tons. Today the turnover has been reduced by 2,5 times in comparison with the prewar one. One of the crucial reasons for the change has been also the reduced hinterland of Croatian sea ports.

- Undeveloped port front (insufficient regular shipping routes) and moderate domestic turnover with significantly reduced cargo in transit (Table 5) have caused further lagging of Croatian sea ports. Due to comparatively small quantities of goods and the structure of our international trade, national transportation cannot represent the basis for a faster

recovery of Croatian sea ports. Certain improvements can be searched in the first place in greater port competitiveness and increased transit turnover. The transit turnover of the neighbouring Central European countries was almost half as low in the past decade (Hungary) or almost insignificant (Austria, Czech Rep. and Slovakia). The reason should be searched in greater competitiveness of North European ports, in the opening of the Rhine-Main-Danube canal and in partial diverting of transit cargoes to the neighbouring North Adriatic ports of Trieste and Koper. Considering the comparatively low turnover and almost stabilized quantities of cargoes on the North Adriatic transport route (with a total of approx. 65 mill tons of cargo gravitating towards it, out of which abt 20 mill tons of dry cargoes), a larger growth of transit cargoes (particularly in transit to Hungary) can only be achieved through higher competitiveness of Croatian sea ports, which requires upgrading of ports and a modern approach to the needs and requirements set forth by port service users.

- Absence of a consistent maritime and port policy is the reason for the unorganized and inappropriate development of Croatian port system. National maritime policies in the world usually stimulate the development of one or two sea ports from the standpoint of national, international, economic, maritime-transportation and industrial development. The undefined litoralization process is the reason why Croatian sea ports used to illude themselves in the past that each of them could have the priority and be a world port. Owing to this reason the development of their port capacities was not adjusted with turnover requirements and they often exceed the requirements. At the same time ports were slowly adapting to new transportation technologies and shipping market requirements, their human resources having been unable in most cases to cope with challenges of the world ports modern operation from the point of view of technical-technological, organizational, transshipment, marketing, information, economic, environmental and development and strategical requirements.

- Inappropriate transportation financing and transportation tariff policy, particularly in promoting the development of modern transportation technologies (containerization and the like), have caused lagging in the implementation of modern transportation technologies. Unlike the port of Koper, for instance, which recognized the significance of the need for coordination and adjustment of tariffs on the respective transportation route back in 1974, and established a unique coordinating body for tariff policies of the port and railway, Croatian sea ports and other participants have still not reached an appropriate common policy which would determine the quality and price of transportation services on the entire transportation route involved.

- Obsolescence and inadequate level of specialization of port infrastructural and

³ Croatian Transportation Development Strategy, The RC Ministry of Shipping, Transportation and Communications, Zagreb, 1999, pg. 11

suprastructural facilities, inadequate tariff and transit cargo policy, poor organization and inadequate work quality, low productivity rate, redundant office personnel and at the same time lack of modern management and successful marketing, are the key reasons of the lagging and inadequately competitive Croatian port system.

• A positive step forward is seen in the fact that today, in accordance with the Republic of Croatia development strategy, the maritime liner transportation of cargo between Croatian and Mediterranean ports has been stimulated. The primary importance is given to the so-called feeder service which enables the service from Rijeka and Ploče through the ports of Gioia Tauro and Malta to be rendered to the most important world ports by means of mega owners' container services. Other routes have been based on RO-RO and conventional cargoes between the Adriatic and North African ports, with a tendency towards gradual shifting to the more upgraded container and RO-RO technology. Effects of the introduction of the weekly shipping service can be seen in the increased container turnover at Ploče and Rijeka in 2000, compared to 1999. As the result of the increased turnover on the existing subsidized feeder service, introduction of another shipping service has been planned in near future.

2.1. Current problems concerning transformation of Croatian port system

Postojeći problemi transformacije hrvatskog lučkog sustava

Changes in management practises and privatization of port activities along with the implementation of modern transportation and informatic technologies have contributed to the key changes in European ports. The transformation of the centrally planned economy into the market economy has consequentially caused the transformation to take place not only in West European ports but also to become the basic prerequisite for the development of ports in former socialist countries. Since the early 80's of the past century many European countries have introduced radical changes in their respective port systems, which were developed in three directions:

- statutory-legal changes
- funding source changes
- transportation related changes

The statutory-legal aspect of changes involved changes in statutory responsibilities and relations between institutions participating in the decision making procedure and management: ministry of transportation, maritime administration, port administrations, port companies, companies operating within the port, etc. Their mutual relations have been regulated through the determination of

conditions for two interdependent flows – the decision flow and cash flow.

The second, and probably the greatest change in respect of the former system has been the new approach to funding sources. It is the basic aim of these changes to establish a uniform port financing system. According to this model, the state usually participates in the construction of sea canals, port entrances and large infrastructural investments (eg. construction of break-waters), yet the construction of the port infrastructure within the port area is actually to be borne by port authorities. Construction costs for basic port infrastructure facilities are regularly financed from vessels' port dues collections and concession fees for operation within the port area. The maintenance of the existing suprastructure, and the machinery, equipment and means necessary for undisturbed port operations is financed by port companies which have been granted their respective concessions.

Changes in transportation represent the third aspect of changes required, referring to changes in cargo quantity and structure, but also to the new approach to the traffic service market. Transportation is the basic function of any port, yet the port role and significance and economic benefits do not come from that function only. The final target is not the port industrial or trade function, but rather the commercialization of all activities. The necessary prerequisites are a market approach to the needs and requirements of port service users, a higher degree of goods added value, and the possibility for the port to become a distributive centre for particular sorts or groups of commodities.

In Croatian sea ports these changes have just seen the outset, and there has been a number of serious failures and errors made at the very start.

2.2. Statutory guidelines for port system development

Zakonske odrednice razvitka lučkog sustava

With the creation of autonomous and independent Republic of Croatia, and with total social changes in the area, port system has been put in a new legal frame.

In the field of shipping, the Maritime Code (PZ) was adopted in 1994 and the Sea Ports Act (ZML) in 1995. Both these laws have respected the tradition of these regions in respect of the status of the port plot of ground as the maritime property, that is to say as a common property of interest for the Republic of Croatia upon which no one can acquire ownership or any other real rights whatsoever.

The Sea Ports Act is an extension of provisions of the Maritime Code, where a significant novelty is the introduction of publicly open ports categorization in three levels according to their size and significance for the Republic of Croatia (Art. 5 paragraph 1 ZML).

Grouping of ports open for public traffic is of particular significance for an overall arrangement of the port system in the Republic of Croatia, owing to the fact that particular grouping also determines the founder of the respective port administration and the funding source for the construction of the respective port capital infrastructure and suprastructure objects.

By introducing port categorization on the ground of actual traffic and other parameters, the Republic of Croatia has determined itself in respect of main traffic routes.

Beside ports open for public traffic, the law also provides for special purpose ports, thus basing the port categorization on the purpose they serve. Any port can be open to the international traffic, or to the national traffic only.

It is provided for the management, construction and maintenance of ports open to public traffic to be performed through the port authority, whereas the management of special purpose ports is to be entrusted to the respective concession holder.

In accordance with the general commitment, separation of port management, maintenance and construction from economic utilization of ports, mechanisms for implementation of this model has been worked out in detail by the ZML which also represents the example for separation of roles between the state and private and legal persons both in terms of ownership and management.

Pursuant to the Decree on criteria for grouping of ports open for public traffic (Official Gazette no. 31/96), ports open for public traffic are grouped according to their size and significance as following:

- ports of special (international) economic interest for the Republic of Croatia;
- ports of significance for the county;
- ports of local significance.

The founder of the port authority in ports categorized as ports of special (international) economic interest for the Republic of Croatia is to be the Government of the Republic of Croatia, whereas in ports of significance for the county and local community the founder of the port authority is to be the respective county council, one single port authority to be principally established for all ports open to public traffic.

There have been five port authorities established in the Republic of Croatia for ports open to public traffic being of a special (international) economic interest: Rijeka and Ploče primarily as cargo ports, and Split, Zadar and Dubrovnik as passenger ports, plus 19 port authorities for ports of county and local interest.

The decision on the founding of a port authority also determines the boundaries of the respective port area or the maritime property falling within the province of the respective port authority, as well as the port activities and infrastructure and suprastructure objects within the area.

The adoption of the Sea Ports Act and the relevant by-laws had created the legal and

theoretical basis for the development of the national port system and also of individual port systems within the overall port system. However, implementation of statutory provisions is very complex in practice and is also accompanied with a series of problems and failures of legal, transportation and financial significance.

1. Statutory-legal

- transformation of ownership over socially-owned companies burdened with financial problems and operation with losses due to turnover drops;

- difficulties encountered in founding of county port authorities and in determining local ports position within the system;

- granting of first preferred concessions and inviting of tenders for concessions only thereafter;

- exaggerated influence of the maritime property institute in the Maritime Code, also extended to the Sea Port Act.

2. Transportation

- vagueness in determining the port system place and role: sea port problems are frequently dealt with separately as independent economic and transportation subjects, it being forgotten that the port system is a part of the national economy and of the total transportation system with particularly high multiplying effects;

- position and scope of business operation of particular ports has not been clearly determined within the port system yet;

The implementation of the new statutory regulations has first started at the port of Rijeka as the largest national port. It is upon this particular example that a series of problems have arisen for which the integral and consistent implementation of the Sea Ports Act becomes questionable. The introduction of a new management organization has taken place at the moment when ports have been experiencing crises which are reflected in the turnover drops and poor financial results.

At this moment the problem concerning the granting of a first preferred concession, with far-reaching consequences, seems to be particularly outstanding. It involves conflicts of interests of port administrations on one hand, and of newly founded companies originating or expected to originate from transformed companies, which had formerly carried out the complete port activity on the entire port area. Consequences can be felt in the following:⁴

- Port authority aims at keeping of as many installed facilities as possible free, in order to have them placed on the market by inviting tenders for concession and to have the concession granted to the best national or foreign bidder. This would entail

⁴ Ten-year development plan for the Republic of Croatia port system 2000-2010, Ministry of Shipping, Transportation and Communications, Zagreb, 2001

the collection of real concession fees and a promising commercial activity within the port area.

- Transformed companies, most frequently with redundant employees and outstanding debts, maintain that a successful development can only be achieved in case of as large a working premises and facilities in their possession as possible and a monopolistic concession for vessels' mooring and unmooring, and cargo loading, discharge and transshipment in their hands.

Through this sort of conflict of interests, desires, possibilities and needs between a port authority and the transformed public enterprises, with regard to the current statutory regulations in Croatia, one of

the most complex problems yet to be solved has been created.

2.3. Analysis of Croatian major sea ports turnover

Analiza prometa glavnih hrvatskih morskih luka

In the past decade the Croatian ports turnover recorded a significant negative trend, as the result of well known objective and subjective unfavourable circumstances which marked the operation of the national port system.

Table 1. Croatian ports turnover total
Tablica 1. Ukupan promet hrvatskih luka

(in 000 t)

Year	1989	1995	1999	2000
Cargo turnover	30 871	13 268	14 706	15 554
Passenger turnover	14 845	9 493	13 125	14 940

Source: Statistical annual SGH, 1990, pgs. 256-258 – for 1989

The RC Bureau of Statistics annual reports – other years

Izvor: Statistički godišnjak SGH, 1990., str. 256-258 – za 1989. godinu

Godišnji izvještaji Državnog zavoda za statistiku RH – ostale godine

Table 2. Cargo turnover at ports of special interest for the Republic of Croatia
Tablica 2. Promet tereta u lukama od osobitog značenja za Republiku Hrvatsku

(in 000 t)

PORTS	1989	1995	1999	2000
Rijeka*	17 155	11 482	9 794	9 564
Split**	2 897	1 425	1 522	1 865
Ploče	4 495	529	934	804
Dubrovnik	360	82	12	15

* port of Omišalj included – explanation in Table 3.

** Split industrial basin included

Source: data provided by port authorities and ports

Izvor: podaci lučkih uprava i luka

Table 3. Port of Rijeka public transshipment turnover
Tablica 3. Javni prekrcaj luke Rijeka

(in 000 t)

	1989	1995	1999	2000
Port of Rijeka	6 450	3 705	2 546	2 564

Source: data provided by port authorities and ports

Izvor: podaci lučkih uprava i luka

In the total structure of Croatian sea ports cargo turnover, the share of the port of Rijeka is particularly important, amounting to more than 50% of total Croatian ports cargo turnover. Should the oil and oil products transshipment performed at the

Omišalj terminal be excluded from the total cargo turnover achieved at the port of Rijeka, one could notice a marked drop in the turnover of general and bulk cargoes which make the port of Rijeka total public transshipment turnover (Table 3).

A detailed inspection of data concerning the cargo turnover at the port of Rijeka and the neighbouring North Adriatic competitive ports of Koper and Trieste indicates a marked drop in the port of Rijeka turnover compared to ports in the neighbouring countries (Table 4). Almost the complete transit cargo turnover of Central European countries being directed over the North Adriatic transport route, the significance of the port of Rijeka is thus particularly emphasized within the national port system. In the total turnover of the three neighbouring North Adriatic ports, the major portion is absorbed by the port of Trieste (above 70%), then follow the ports of Rijeka and Koper. The

insignificant positive difference in the port of Rijeka total cargo turnover compared to the port of Koper is mostly owed to the liquid cargoes turnover at the Omišalj terminal. However, if only the turnover of highly valuable general and bulk cargoes is taken into account, and particularly the container turnover, the marked drop in the turnover of Croatian major port becomes clearly evident (Tables 4 and 5).

The structure of the total passenger turnover in Croatian major passenger ports (Table 6) has also recorded a drop, which is in the first place the result of the warlike operations and stagnation in the tourist trade.

Table 4. Total cargo turnover at ports of Rijeka, Trieste and Koper

Tablica 4. Ukupni promet tereta u lukama Rijeka, Trst i Koper

(in 000 tons)

Year	Total	%	Rijeka	%	Trieste	%	Koper	%
1990	56.887	100	20.131	35,4	31.272	55,0	5.484	9,6
1993	42.490	100	4.348	10,2	33.020	77,7	5.122	12,1
1996	57.210	100	9.208	16,1	41.460	72,5	6.542	11,4
1997	64.280	100	10.599	16,5	46.411	72,2	7.270	11,3
2000	66.691	100	9.564	14,3	47.827	71,8	9.300	14,0

Source: Statistics provided by ports of Rijeka, Trieste and Koper

Izvor: Statistički podaci luka Rijeka, Trst i Koper

Table 5. Total container turnover at ports of Rijeka, Trieste and Koper

Tablica 5. Ukupni promet kontejnera u lukama Rijeka, Trst i Koper

(in 000 TEU)

Year	Total	%	Rijeka	%	Trieste	%	Koper	%
1990	285.1	100	47,9	16,8	142,4	50,0	94,8	33,3
1993	260.8	100	49,9	19,1	150,5	57,8	60,4	23,2
1996	270.7	100	29,2	10,8	176,9	65,3	64,6	23,9
1997	287.1	100	15,9	5,5	204,3	71,2	66,9	23,3
1999	271.2	100	8,0	3,0	185,0	68,2	78,2	28,9
2000	300.8	100	11,461	2,7	206,1	68,6	86,7	28,9

Source: Statistics provided by ports of Rijeka, Trieste and Koper

Izvor: Statistički podaci luka Rijeka, Trst i Koper

Table 6. Total passenger turnover at ports of special interest for the Republic of Croatia

Tablica 6. Ukupan putnički promet luka od osobitog značenja za Republiku Hrvatsku

(in 000 passengers)

PORTS	1989	1995	1999	2000
Rijeka	144	142	87	134
Zadar	1 820	999	1 149	1 190
Split	1 967	1 410	1 608	1 975
Dubrovnik	569	122	213	354

Source: data provided by port administrations and ports

Izvor: podaci lučkih uprava i luka

3. Defining of Croatian port policy targets

Definiranje ciljeva hrvatske lučke politike

The targets of port system development are the key elements of the port policy, yet at the same time of the transportation and economic policies as well, which together with other elements of the port policy closely determine its contents. From the standpoint of economic development, the port system development targets are not autonomous in respect of other basic goals of economic and social development of the country. Therefore, economic and transportation development targets of a country represent hierarchically higher targets, being at the same time determinants for the determination of port policy targets. Realization of port policy targets requires the fulfilment of certain requirements. One of these requirements provides for the port policy to be based on certain principles. By port policy principles basic rules are determined for the port system operation and behaviour of port policy carriers. The development of Croatian port system requiring harmonization with solutions applicable in European Union ports, it is necessary to adopt the European port policy basic principles as well.

According to solutions proposed by the European Parliament Transport Committee, the following are the European port policy main principles:

- autonomous position of port administrations
- free market competition between sea ports,
- payment of all costs by port users,
- discrimination exclusion (port capacities availability and upgrading),
- port integration through EU common transportation policy,
- port system development in accordance with requirements of a reasonable development and environmental protection.

EU ports are significantly characterized by a high level autonomy. Almost in every part of the world deregulation and liberalization processes are present, affecting the functioning of ports as well. Practice has shown that a higher level autonomy contributes to their higher competitiveness and operation efficiency, where basic principles should be a free and fair competition between ports and companies operating within the port, availability of port capacities to all users, and a harmonized development concerning requirements for professional training of port employees and for a reasonable progress also acceptable in environmental terms.

Basic strategic targets of Croatian port system development rely in their contents on Croatian economic and transportation development targets because they cannot be possibly examined

separately from the existing and possible economic and transportation development orientations. In this connection, port system development basic strategic targets can be presented as following:

A. Short-term activities (up to 5 years)

a) Establishment of a consistent port policy based on statutory solutions with realistically grounded and clearly defined targets, measures and port system financing models.

b) In accordance with the current categorization of sea ports and the necessary concentration of the turnover on a lesser number of ports (due to large financial investments in ports infrastructure), development of Croatian major cargo (Rijeka and Ploče) and passenger ports to be stimulated within the port system.

c) Transformation and privatization processes to be completed and the concession granting procedure to be carried out in ports. In order to attract foreign capital, it is necessary to provide for an extended duration of concession agreements.

d) In accordance with previously determined priority investments, technologically obsolete facilities need to be upgraded, and port terminals to be enabled for a more competitive approach to the shipping service market by way of attracting foreign capital.

e) Port management procedure to be upgraded through the establishment of a modern management and through the marketing performance on the shipping trade market.

f) Office personnel to be reduced in proportion with the operative staff in ports

g) Further development of feeder service to be stimulated between Croatian and other ports in the Adriatic and Mediterranean.

h) A coordinated approach of all participants in the realization of a transport service on respective transport routes to be established with a view to have the service quality upgraded and a competitive price achieved on the transport service market.

i) Port operation process to be upgraded and port productivity increased

j) Modern transport technology to be developed and investments to be made in certain profitable activities with an emphasis on the necessary informatic uniting of all participants on transport routes.

k) Possibilities provided, investments to be made in the maintenance and development of island and coast ferry ports aimed at a higher quality connection of islands and coastal regions.

l) Procedures to be accelerated for a mansided activation of free port zones within sea ports.

m) Priority investments in the traffic infrastructure to be made and traffic connections between ports and their hinterlands to be improved.

B. Long-term activities (up to 10 years)

a) Adequate traffic infrastructure to be constructed, which will provide modern connections between Croatian major sea ports and most important transit centres.

b) Development of modern technologies, modern port management and marketing approach to the shipping trade market.

c) Investments to be stimulated in the development of specialized terminals for the transportation of passengers and cargoes.

d) Conditions to be provided in accordance with the development of free port zones, for the development of particular profitable port activities.

e) Development of island, ferry and coast ports as well as of coasts for accommodation of modern cruisers to be stimulated.

4. Proposed measures for achievement of port policy targets
Prijedlog mjera za ostvarenje ciljeva lučke politike

The prerequisite for the achievement of projected targets in the development of Croatian port system is the defining of the appropriate port policy with clearly determined and elaborated targets, measures, modes and terms for realization of tasks determined for the coming period.

The achievement of port policy targets being dependent on the state of national economy, on actual situation and speed in solving traffic system problems, as well as on the actual position of shipping activities (particularly of maritime shipping), port policy measures should be necessarily brought in harmony with development tendencies in the Republic of Croatia economic and transportation system and also with European ports development tendencies. Considering the complexity of the problem and considerable interaction effect, the creation of port policy and supervision of implementation of measures proposed needs to be entrusted to an Expert Committee for ports with the Ministry of Shipping, Transportation and Communication, which should add to its membership a representative of the Ministry of Commerce, and representatives of other public and scientific institutions (Art. 43 of the Sea Ports Act – Official Gazette no. 108/95). The Committee should be in charge of coordinated implementation of the port policy.

It is an undisputable fact that not all the ports so far categorized as major ports are of equal importance for economic development of the country, although in terms of a short-term policy the development of certain ports should be still supported by the State, whereas in terms of a long-term policy port development will be exclusively left over to market operations. State control is quite understanding and it should be directed to general strategic propositions only, since it has been proven that a state cannot be a good entrepreneur and therefore its role can only be of an assisting character in the construction of port infrastructure.

In present conditions Croatian Parliament should adopt a ten-year development plan and programme in respect of Croatian port system, where particular attention should be directed to determination of the following port policy measures:

- place and role of public transport within the Republic of Croatia transportation and economic system.
- economic interest of the Republic of Croatia in the development of public transportation ports and targets desired to be achieved within the development.
- possibilities and modes of investing in the development of public transportation ports, with particular emphasis on incentive measures for attracting foreign investors.
- possibilities and ways for problem solving concerning technological obsolescence of equipment, losses and debts of public transportation ports.
- draw-up of a Croatian port system simulation model.

5. Projected Croatian port system development
Projekcija razvoja hrvatskog lučkog sustava

In Croatian economy, the coming decade represents the period requiring economic policy measures which will secure the economic stability and simultaneously the economic growth, faster employment, and increased production and exports. It means at the same time that the whole economy efficiency will be secured as well as the restructuring of inefficient activities, which are considered basis prerequisites for the revival of national economy.

Economic growth has been planned to grow in the coming period to the level exceeding the 5% annual rate. The estimated growth rate exceeds the projected growth for other countries of the world (average level being 2,5% yearly) because of the extremely low economic activity level which serves as the starting point for the projection.

5.1. Projection of Croatian maritime transport development
Projekcija razvoja pomorskog prometa Hrvatske

Maritime transport as a constituent part of the integral transport system classified in accordance

with economic development scenario as one of the propulsive sectors of Croatian economy, should achieve an average yearly growth rate of 4% to 7% in the coming period.

The former rate is in accordance with the estimated GNP growth rate, whereas the latter is in accordance with turnover growth at ports. The result of such a projected movement is presented in Table 7.

Table 7. Projection of shipping turnover growth 2000-2010
Tablica 7. Projekcija rasta pomorskog prometa 2000.-2010. godine

Description	Grow. rates	2001*	2002	2003	2004	2005	2006	2007	2008	2009	2010
Cargo in 000 t	4	15.442	16.060	16.702	17.370	18.065	18.788	19.540	20.321	21.134	21.980
	7	16.345	17.489	18.713	20.023	21.425	22.925	24.530	26.247	28.084	30.050
Passeng. in 000	4	3.835	3.988	4.148	4.314	4.486	4.666	4.852	5.046	5.248	5.458
	7	4.059	4.343	4.647	4.973	5.321	5.693	6.092	6.518	6.974	7.463

Source: Port authorities

Izvor: lučke uprave

Considering the significance of maritime transport, particular attention should be directed in the coming period to the stimulation of development of maritime industry (feeder service and short distance liner shipping, further development of tramp and tanker services, and development of passenger shipping) and sea ports. The development of maritime and land transports being conditioned by each other and linked by interaction connections, the development of one branch can positively reflect upon the other and vice versa. For instance, investments in land transport lines facilitate the extension of Croatian ports hinterland and increase port competitiveness in diverting goods and passenger flows.

The so-far and future investments in the road network have been directed to the construction of road transport routes fitting into European transport corridors.

- Ljubljana-Zagreb-Belgrade
- Trieste-Rijeka
- Budapest-Varaždin-Zagreb-Rijeka-Trieste
- Vienna-Šentilj-Maribor-Zagreb-Zadar-Split
- Budapest-Okučani-Banja Luka-Split
- Budapest-Osijek-Sarajevo-Ploče.

Investments in the upgrading of railway network have been aimed at linking of ports with pan-European corridors and they must enable the reduction of exploiting costs, increase the railway lines efficiency and the speed of transportation. Renewal, upgrading and extension of transshipment facilities in cargo ports, as well as the upgrading and construction of passenger terminals, along with improvement of work organization, represent the basis for future development of sea ports.

With a view to making the mentioned projections for Croatian sea ports development become reality, it is necessary to provide technical-technological, legal and economic prerequisites which would enable the strengthening and enlargement of port gravitation areas (immediate port hinterland, national and transit markets, as well as for the introduction and development of modern transportation technologies.

5.2. Projected turnover and development of Croatian port system
Prognoze prometa i razvitka lučkog sustava Hrvatske

In accordance with ten-year development plans drawn up by individual port administrations, the expected turnover growth is recording the following planned figures for 2005 and 2010 (Table 8 and 9):

Table 8. Projection of cargo turnover at ports of special interest for the RC
Tablica 8. Prognoza prometa tereta u lukama od osobitog interesa za RH

(in 000 t)

PORTS	2000	2005	2010
Rijeka – total turnover	9.564	21.500	27.400
Rijeka – public transshipment	2.564	7.500	9.800
Split – total turnover	1.865	3.570	5.000
Split – public transshipment	65	90	150
Ploče	804	4.900	5.100
Dubrovnik	15	1	1

Source: data provided by port authorities and ports

Izvor: podaci lučkih uprava i luka

Table 9. Projection of passenger turnover at ports of special interest for the RC
Tablica 9. Prognoza prometa putnika luka od osobitog interesa za RH

(in 000 passengers)

PORTS	2000	2005	2010
Rijeka	134	271	440
Zadar	1.190	1.983	2.899
Split	1.975	2.500	3.100
Dubrovnik	354	780	1.250

Source: data provided by port authorities and ports

Izvor: podaci lučkih uprava i luka

Since in the total goods turnover structure the transit turnover has a particularly significant share, it is of essential importance to mention that in the period up to 2010 it is going to depend in the first place on the following factors:

- economic state of closer countries and particularly on requirements those economies are going to make in respect of imports and exports of goods through the Adriatic;
- political situation in the neighbouring countries;
- competitiveness of Croatian ports in respect of those transits to be partly carried out through them;
- construction level of planned land, railway and road corridors and on implementation of modern transportation technologies.

In accordance with research studies carried out, priority investments in Croatian sea ports in the period to come would comprise the following investments required:

PORT OF RIJEKA

- enlargement, additional equipping and upgrading of the container and ro-ro terminal facilities
- reconstruction and enlargement of the grain silo capacity
- repositioning of the bulk cargo transshipment from the Rijeka port basin to the Bakar bulk cargo terminal
- construction of a new, modern multipurpose terminal for general cargoes in the Rijeka port basin west part;
- construction of a modern passenger terminal.

PORT OF PLOČE

- sanation and enlargement of existing terminals;
- construction of a LPG terminal, the respective concession being already granted;
- construction of a ro-ro and container terminal;
- construction of a bulk cargo terminal.

PORT OF SPLIT

- owing to the constantly increasing passenger traffic at the port of Split, inadequate port capacities and confluent roads running through the town centre, the first phase needs to include the construction of summer quays at the existing break-water;
- the second phase needs to include gradual shifting of the cargo-ferry traffic to the Northern port.

PORT OF ZADAR

- inadequate space within the port, makes it necessary for the ferry traffic to be shifted from the passenger port to the cargo port of Gaženica, in accordance with the design already prepared.

PORT OF DUBROVNIK

- the port of Dubrovnik requires a modern passenger terminal to be erected within the port area in place of one-time cargo warehouses, for accommodation of passenger ships plying on regular routes and cruises.

6. Conclusion

Zaključak

The role and significance of the port system and the pertaining ports on the modern logistical and transport market have changed radically, and certain advantages as well as defects have been evaluated in a different way. This has resulted in the strengthening of certain transport routes, and ports as the initial and final points, to the detriment of others. Basic logistical principles ruling on the world transport market today, which pose certain requirements before modern ports, have diminished the significance of geographical distance in choosing a transport route.

Modern technical and technological solutions at ports, good and fast traffic connection with the hinterland, business organization, development of port front, tariffs and tariff policy have become basic prerequisites for attractiveness of a certain transport route, making it possible for two physically different distances to become equal in economical terms. The exceptionally favourable geographical and traffic related situation of major North Adriatic ports, and particularly of the port of Rijeka, which had been of crucial importance for the development of this port

and also for the selection of the North Adriatic transport route to be the destination for cargoes coming from Central European countries, has lost the significance. For this reason, Croatian sea ports must now and in future in the absence of larger quantities of cargo orientate towards maximal economic benefits, where goods are not supposed to merely pass through the port, but rather to be added as much value as possible while there. The indispensable prerequisite for such a necessary turn is the draw-up of an integral and realistically grounded port policy which will be compatible with the port policy of EU countries, where additional incentives can be searched for through the privatization of port activities and a many-sided valorization of free port zones.

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