The Impact Of European Union's Port Policies On Maritime Transport

Nil Güler and Osman Kamil Sağ

Istanbul Technical University Maritime Faculty, 81716 Tuzla Istanbul TURKEY
gulern@itu.edu.tr, oksag@itu.edu.tr

ABSTRACT

The transportation policies of European Union have been objected at removing obstacles at the frontiers between member states as a way of contributing to the free movement of persons and goods. For many years, European Community (later the European Union) did not have a maritime transport policy. Starting from the year 1986, some common policies are formed. These policies can be classified in four axes:

- freedom to provide services competition, unfair pricing practices and free access to ocean trade,
- taking measures to improve the safety of international shipping and prevent marine pollution,
- conditions of transport of goods and passengers and navigation rules by inland waterway,
- requirements concerning seaports and maritime infrastructure, quality of services in seaports, market access to port services, and regulations related with port reception facilities for ship generated waste and cargo residuals.

As for a comprehensive maritime transport policy, the lack of a port policy created problems for the interpretation of the maritime policy since ports are natural focal points in the sea freight and shipping world. In 1997, the European Commission's Green Paper opened a debate on how to improve the position of ports in the European transport network and confirmed that the efficient functioning of ports as part of the intermodal chain is an essential prerequisite to stimulate the development of maritime transport. The union action for the seaports is described as an establishment of clear rules to increase the efficiency of ports and port services as well as the intermodal connections between ports and inland transport networks.
On the other hand, there are some projects being carried out by European Union for the maritime transportation in Europe. Some of them are related with Pan-European Transport Corridors and the other is for renovating the ancient Silk Way, which is, called Traceca.

- The Corridor VII, the Danube, passes through 11 countries and the synergy effects of using its route together with upgraded transport via Black Sea ports can be significant.
- Corridor VIII, is an important link between the Black Sea and the Adriatic. Its development will be an important factor for economic development of the involved countries.

The whole discussions given above, confirmed that the efficient functioning of ports as a part of the door-to-door intermodal chain is an essential prerequisite to stimulate the development of maritime transport, in particular as a sustainable alternative to land transport.

The European Union's key port policies can be summarized in 4 headings.

- quality services in sea ports: improvement and modernization of port's infrastructure and their inclusion in the trans-European transport network,
- pan-European maritime transport corridors,
- market access to port services: to increase the free and fair competition among ports,
- advance of research and development for ports.

Ports play an increasing role for transfer of goods and passengers to the environmentally less damaged, less costly and less congested maritime transport. They have an essential contribution to the efficient use of maritime transport infrastructure. By having the above- mentioned policies and measures the whole system is expected to be reinforced.

1. The history of European Union maritime transport policies

From the day Treaty of Rome in 1958 has been signed, the transportation policies of European Union have been objected at removing obstacles at frontiers between member states as a way of contributing to the free movement of persons and goods.

Until1970, European Union could not get enough development about transport. For many years, European Community (European Union) did not have a maritime transport policy. Starting from the year 1986, some common policies are formed (Hart et all, 1993). These policies can be classified in four axes (EU Commission, 2004):

- freedom to provide services competition, unfair pricing practices and free access to ocean trade,
- taking measures to improve the safety of international shipping and prevent marine pollution from ships,
- conditions of transport of goods and passengers and navigating rules by inland waterway,
- requirements concerning seaports and maritime infrastructure, quality of services in seaports, market access to port services, and regulations related with port reception facilities for ship generated waste and cargo residuals.

Nowadays, of globalization, the European Union is still very dependent on maritime transport:

- over 90% of its external trade and some 43% of its internal trade goes by sea; more than 1 billion tones of freight a year are loaded and unloaded in EU ports.
- maritime companies belong to European Union nationals control one third of the world fleet, and some 40% of EU trade is carried on vessels controlled by EU interests.
- the maritime transport sector - including shipbuilding, ports, fishing and related industries and services - employ around 2.5 million people in the European Union.

The EU maritime policy should have two objectives (Kiriazidis and Tzannidakis, 1995):

- to complete the internal market in shipping,
- to enable the shipping to be competitive in the world economy.

Since 1992, the Commission has published a number of important policy papers, which have tried to call attention to the need for further legal moves. The same year, it put forward freedom of maritime transport services for passengers and freight within Member State (maritime cabotage), granting that this freedom was carried out in a phased way. Maritime cabotage to the islands was liberalised in 1999 with the exception of Greece (Paixao and Marlow, 2001).

In March 1996, the Commission presented a Communication, entitled "Towards a new maritime strategy", which made a global analysis of the problems faced by the Community maritime sector in the context of EC policy. It suggested a range of actions aimed at maintaining open markets; improving

the competitiveness of EC shipping and addressing flaws in state aid policy. A second Communication, in March 1996, called “Shaping Europe’s maritime future”, highlighted the importance of shore-based industries for employment and economic development in the EU, notably with regard to shipbuilding and repair but also relating to ports and marine resources.

Two other papers, in July 1995 and June 1999, looked exclusively at short sea shipping, and outlined a strategy for helping coastal shipping to compete effectively with long-distance road transport. In the first, the Commission focused on action to counter problems such as inadequate infrastructure, cumbersome administrative procedures, and poor integration with other transport modes, and long transit times. In the second paper, the Commission noted that, between 1990 and 1997, short sea shipping had grown by roughly 23% in terms of tone kilometers. Efforts to create round tables and promote debate within industry, for example through the Maritime Industries Forum, had proved relatively successful since the strategy was introduced.

2. White paper: common transport policy

For a long time, the European Community was unable to implement the common transport policy provided for by the Treaty of Rome. The Commission’s first White Paper on the future development of the common transport policy was published in December 1992. The guiding principle of the document was the opening-up of the transport market. The first real advance in common transport policy brought a significant drop in consumer prices combined with a higher quality of services. Personal mobility increased from 17 km. a day in 1970 to 35 km. a day in 1998. White Paper pointed out unequal growth in the different modes of transport. Road makes up 44% of the goods transport market, compared with 41% for short sea shipping, 8% for rail and 4 % for inland waterways.

The White Paper proposes some 60 specific measures to be taken at Community level under the transport policy. It includes an action programme extending until 2010.The measures presented in the White Paper are aimed at a sustainable transport system that will ideally be in place in 30 years’ time (EU Commission, 2004).

2.1 Short sea shipping and inland waterway transportation in White Paper

Transport by sea and inland waterway is promoted in the White Paper. Short- sea shipping and inland waterway transport, which are underused, are presented as two modes, which could provide a means for coping with the congestion of certain road infrastructure. (EU Commission, 1995)

Short-sea shipping carries 41% of goods traffic within the Community. Sea motorways are suggested to revive short-sea shipping within the framework of the master plan for the trans-European network. This will require better connections between ports and the rail and inland waterway networks together with improvements in the quality of port services. Since Community has a very huge potential, 35000 km. coastline and hundreds of sea and river ports, a trans-European shipping network can be established by giving priority to national ports, which have good connections to inland network.

Inland waterway transport is also encouraged as a complement to sea transport since there is a very dense network of rivers and canals within the European Union. Technical requirements for inland waterway vessels, boatmaster’s certificates and social conditions for crews will be readapted. Very recently Rhine -Main -Danube link is established. Six member states can use this network where 9% of goods are carried by this way. By the accession of new countries, the Danube Basin will reach up to Black Sea. Some of the countries, which are not connected up to the northwest European network, have their own systems such as the Rhone, or the Po, which are becoming

important at regional level. Since 50 tons/km can be carried by 1 liter of fuel, this figure is 97 tons/km for rail and 127 tons/km for inland waterways; this system is very energy-efficient and quiet. Apart from this it is very safe mode especially for carrying dangerous goods.

2.2 Maritime safety

Although maritime transport and travel has a relatively low death and injury rate when compared to road travel, the consequences of a bad accident are very real, sometimes far-reaching and very costly (Table 1).

Table: 1 Transport accident costs and the value of safety (ETSC, 2001)

Mode	Total socio-economic costs per fatality (million)
Road	3.6
Rail	2.1
Air	2.7
Water	9.8

In March and December 2000, the commission came forward with a specific package of safety measures known as Erika I and Erika II. Some of these are (Lyons, 2000):

- strict checks on vessels using EU ports;
- penal and financial sanctions on those who contribute to major oil pollution;
- the accelerated phase-out of single-hulled oil tankers, replacing them with double-hulled vessels;
- a ban, in the mean time, on carrying heavy fuel oil in single-hulled tankers;
- the establishment of an European Maritime Safety Agency;
- the establishment of an EU monitoring, control and information system;
- the creation of a fund for compensation for pollution damage.

3. European Union port policies and Green Paper

Maritime transport is a system sector, which is made up of shipping, sea and ports. Quality vessels need high quality ports. With the growing volume of freight and growing demands for speed and tight schedules it becomes necessary for the road, rail and water transport systems to be linked both physically and operationally. Within the EU over 600 ports exist (Pallis, 1997). The port sector handles more than 90% of the Union's trade with third countries and approximately 30% of intra-EU traffic, as well as over 200 million passengers every year. More than 1 billion tones of freight a year are loaded and unloaded in EU ports.

The dominance of the North Sea Ports is already well established. They handle 50% of EU port trade. Mediterranean handles 27%, the Atlantic 15% and the Baltic 9%. The chances of the Mediterranean challenging the northern dominance are not great (Whitehead, 2002).

The sector shows great diversity between regions in terms of structure, operation, organization and legal framework.

Maritime companies belong to European Union nationals control one third of the world fleet, and some 40% of EU trade is carried on vessels controlled by EU interests.

The maritime transport sector - including shipbuilding, ports, fishing and related industries and services - employ around 2.5 million people in the European Union.

3.1 Green Paper: Policy on ports and maritime infrastructure

The Commissions first attempt to make a clear policy on ports and maritime infrastructure was by Green Paper in 1997. The principles and policies proposed by the Green Paper was aimed at to increase port efficiency, improve port and maritime infrastructure by integrating ports into the

multimodal trans European network and to ensure free and fair competition in the port sector. These suggestions are summarized in the following paragraphs:

- quality services in sea ports: improvement and modernisation of port's infrastructure and their inclusion in the trans-European transport network,
- pan-European maritime transport corridors,
- market access to port services: to increase the free and fair competition among ports,
- advance of research and development for ports.

3.1.1 Quality services in seaports: improvement and modernization of port's infrastructure and their inclusion in the trans-European transport network

The Commission considers the full integration of ports into the trans-European transport network (TEN-T) desirable for the establishment of the multimodal network taking into account, in particular, the need to ensure links to the peripheral areas and to encourage short sea shipping. The Green Paper notes that ports have so far not been at the center of the common transport policy. However, they have a role to play in the TEN-T as follows:

- increasing the efficiency of the European transport system;
- encouraging growth of EU trade with third countries,
- overcoming congestion of the main land-corridors;
- enhancing maritime links with island and peripheral regions
- strengthening the multimodal aspect of the TEN-T.

To connect the TEN-T with networks of Central and Eastern Europe and the Mediterranean, the Commission proposes that standards be promoted in these ports comparable to those found in Community ports.

Despite the increasing turnover in European ports, intra-European maritime traffic has not yet increased its market share that of the road transport sector. The promotion and integration of short sea shipping into environmentally friendly multimodal transport networks has become an objective of the Union's transport policy. Priority will therefore be given to short sea shipping projects in the TEN-T. Furthermore, the commission recognizes that the pricing policy for other modes of transport is an important factor for the development of short sea shipping.

In order to optimize the role of ports in the door-to door transport chain proper infrastructure links to the TEN-T are vital. However, equally important are other measures such as standardization of loading units, integration of telematics etc. The Commission will support actions to improve the port's position as intermodal transfer points including financing of research and demonstration projects in the area of management systems, and measures to foster innovation and support the development of a competitive intermodal transport system (EU Parliament, 2000).

3.1.2 Port safety, security and environmental considerations

Although primarily focused on ships, nevertheless services offered at ports also has a direct impact on ports, as it requires port authorities to co-operate in the implementation or enforcement of the legislation and to ensure a high level of port services such as pilotage, mooring and towage that are intrinsically linked to the safety of ships.

Commission recognized that ports are located close to populated areas where habitats and living species are put in danger and makes suggestions for improving the integration of environmental considerations in the planning of port development. A Code of Conduct provides a quality of framework programmed action with respect to the protection of the environment within port areas (Goulielmos, 2000). It is stated by Directive 2000/59/EC of the European Parliament that the policy on prevention of

pollution by ships are the same as 73/78 Marpol Convention**.** However, in contrast to the Convention, which regulates discharges by ships at sea, the Directive focuses on ship operations in Community ports and addresses in detail the legal, financial and practical responsibilities of the different operators involved in delivery of waste and residues in ports stating that Member States must ensure that port collection facilities are provided which meet the needs of the ships using them without causing abnormal delays. These facilities must be tailored to the size of the port and to the categories of ship calling there. A waste reception and handling plan must be drawn up in each port. These plans must be checked and assessed by the Member States and approved by them at least every three years.

For security issues Commission presented a directive based on three elements (Trestour, 2003):
This directive makes compulsory provisions from part B of the ISPS Code. An inspection procedure is also proposed. As a second element the directive extends the principles of the ISPS code to the entire port area. An assessment of the efficiency of the port security organization and its communication links with all parties involved will be part of the Port Security Assessment. A port security committee will assist the port security officer in implementation of plans. As a third step the commission is planning to propose a Directive on Intermodal Transport Security to tackle the security risks faced by the freight and their transporters on the route between supplier and consumer. As an addition to the above measures the Commission (EU Commission, 2003) declared a communication paper stating that additional action should be rapidly taken in order to support the work of ILO with regard to the identification of seafarers for the purposes of immigration control and anti-terrorist action.

3.1.3 Market access to port services: to increase the free and fair competition among ports

Ports provide a range of services and facilities: pilotage, towage, mooring, cargo handling, storage, etc. They also offer ancillary services, such as fire fighting, bunkering, water supply and waste-reception facilities. Depending on the port, these services are provided either as a comprehensive package or separately, either on request or automatically.

As to cargo-related services, cargo handling has been one of the activities most profoundly affected by technological development and inter-port competition. The market trend is towards capital concentration, specialization and vertical integration. The provision of these services is gradually being transferred from the public to the private sector in order to increase efficiency and reduce public expenditure on port labor costs.

According to the Green Paper, these port services are to be seen as an integral part of the maritime transport system. Treaty rules, notably in the field of competition, should therefore be applied more systematically. This is consistent with the European Union's policy to encourage modernization and efficiency of the sector, taking into account structural developments in worldwide competition.

In conclusion, a regulatory framework should be developed at Community level aiming at a more systematic liberalization of the port services market in the main ports with international traffic. The aim of this framework would be to establish a level playing field between and within Community ports while ensuring compliance with port and maritime safety standards.

3.1.4 Pan-European maritime transport corridors

The Corridor concept is part of the Trans-European transport infrastructure development, created in the past 10 years. The 10 Pan-European Transport Corridors endorsed by the transport ministers on Crete in 1994 and in Helsinki in 1997 form the system backbone. Among these 10 corridors those, which are related with ports and maritime, are as follows:

- Corridor VII, the Danube, passes through 11 countries and the synergy effects of using its route together with upgraded transport via Black Sea ports can be significant.
- Corridor VIII is an important link between the Black Sea and the Adriatic. Its development will be an important factor for economic development of the involved countries.
- Corridor IX, the longest of the Pan European Transport Corridors from Finland (Helsinki) to Bulgaria and Greece, with a branch to Odessa, is a historic and important European Corridor, traditionally serving high freight flows, in a north-south direction, serving both the Mediterranean and the Black Sea basins.

In parallel to the TEN-T process, the concept of the Pan-European Transport Corridors and Pan-European Transport Areas (PETRAs - Four European transport zones covering sea basins of the Mediterranean, Black. Adriatic / Ionic seas and the area of the Barents sea ," the European part of Arctica) as evolved at the Crete and Helsinki Pan-European Transport Conferences, are already well established. The ten multimodal transport Corridors and the four PETRAs, that have been defined, provide an important focus for investment by the international financial institutions, and significant progress has been achieved in their development. These transport Corridors and Areas of transnational character, play a very important role in the European transport and economic integration. There is not only the infrastructure linkage between regions, but also the interoperable operational - institutional framework along these arteries that help to bring together the various economies and societies.

Today, when the combined transport techniques have progressed so much, inland waterways can be used in the most efficient way. Their low external cost of transport, including the environmental benefits, can provide the critical factor to make an inland waterway route attractive. In this respect, Corridor VII, the Danube, can be seen as a very important transport route, efficiently incorporated in the logistics chains of many alternative origins/ destinations, from the Black Sea to the heart of Europe and the Atlantic, and vice-versa. Although there seem to be many problems still existing, the free and efficient navigation of the Danube currently is rather more a political issue than a technical one. The efforts therefore should focus on a political decision to re-establish all the necessary conditions for free and efficient navigation on the Danube, after which technical solutions can be implemented (Schwetz, 2001).

3.1.5 Traceca Project (Transport Corridor Europe-Caucasus-Asia)

The Traceca Programme is a series of EU funded technical assistance and investment projects aiming towards the development of the transport corridor from the Europe across the Black Sea through the Caucasus and the Caspian Sea to Central Asia.. At the Pan-European Transport Conference in Helsinki (1997) it is decided to integrate TRACECA with the Pan European Transport Area (PETRA) of Black Sea Basin.. In order to support the agreements, investment projects costing ECU 15 million have been incorporated within the TRACECA programme. The main links related with maritime transportation is as follows:

Black Sea ports to Baku as the central corridor through the Caucasus,
A ro-ro link from Poti in Georgia to Ilyichevsk for Corridor IX,
A ferry from Ilyichevsk to Varna in Romania linked to Corridor IV,
A ferry from Poti in Georgia to Varna in Bulgaria linked to Corridor VIII.

4. Research and development programs

In the context of R&D programmes, the Commission supports maritime and port projects, including cargo tracking and tracing and electronic chart display and information

systems. EU policies are targeted at research and development on transshipment equipment, standardized loading units and freight integrator, which is expected to emerge as a new profession specializing in the integrated transport of full loads. These freight investigators need to be able to combine the specific strengths of each mode at European and world level to offer clients the best service in terms of efficiency, price and environmental impact in the broadest sense.

There exists a great variety of EU funding programs which could be exploited for port projects.

Most funding is not paid by the European Commission directly but through the national and regional authorities of the Member States (European Sea Ports Organization, ESPO, 2002). These are summarized in the following paragraph:

a) Grants in the field of transport: Commission promotes the objectives of common transport policy. Projects may cover maritime safety, environmental protection,etc.

b) Marco-Polo: This program supports commercial actions in all segments of the freight market Within this program three types of projects are available:

- Modal shift actions: start up aid for new non-road freight transport services.
- Catalyst actions: The objective is to tackle existing structural market barriers, which hinder the further development of non-road freight services (e.g. motorways of the sea)
- Common learning actions: Support for stimulating co-operation and sharing know-how.

c) TENs: Since seaports, inland ports and intermodal terminals are included in the TEN they can benefit from this type of funding. Ports included in the TEN should be within one of the following categories:

- International seaports with an annual transshipment volume of no less than 1,5 million tones or 200000 passengers (A ports),
- Seaports with an annual traffic transshipment volume of no less than 0.5 million tones or between 100000 and 199000 passengers and are equipped with installation for short sea shipping (B ports),
- Regional seaports not fulfilling the criteria of A and B situated on islands or in peripheral regions (C ports).

The funding may cover development of short sea shipping and sea-river shipping in A ports, access infrastructure for A, B, C ports, and infrastructure for water surfaces, port surfaces, transport links, dredging, ITS and navigation systems.

d) Regional development programs: The aim is to improve the economic situation of the least favored areas.

- Helps the regions whose development is lower than the 75% of community average. (GDP per capita less than 75%),
- Supports fisheries - dependent areas for facing structural difficulties.

e) Environmental projects:
Life III: This is a financial instrument for 3 major areas of actions: Environment, nature, and third countries. The specific priorities are preparatory actions to support community legislation and policies, conservation of natural habitants of wild fauna and flora, technical assistance in the establishment of environment administrative structures, nature conservation actions etc.

f) Leonardo Da Vinci: This program supports innovative trans-national initiatives promoting vocational training

g) 6th. Framework Program: Integrated projects and Networks of Excellence are promoted under 7 thematic areas. Among these information society technologies and sustainable development exist as well.
h) ERAMAR European Research Area Application in the Maritime Domain:
) PACT: Short sea projects in the framework of trans-European networks are supported through the new PACT programme.

The European Maritime Industry has developed an R&D Master Plan for the technology areas of the Maritime Transport Chain and the Maritime Resources. The Master Plan was used by the industry to initiate various Thematic Networks, which have served as launching platforms for over 130 project proposals within the first, and second call of FP5. These projects have served current & short term technological needs in some areas of the maritime spectrum leaving other areas “uncovered”.

5. Conclusion

Seaports are vital to the European Union both in terms of trade and transport. The principles and policies proposed by the Green Paper is aimed at increasing port efficiency and to improve port and maritime infrastructure by integrating ports into the multimodal trans European network which should meet the Community’s responsibilities under the Treaty to ensure free and fair competition in the port sector.

The Commission considers the full integration of ports into the TEN-T for the establishment of the multimodal network taking into account, in particular, the need to ensure links to the peripheral areas and to encourage short sea shipping. A proposal to adapt the present guidelines for the development of TEN-T accordingly is being presented in parallel to this Green Paper.

The Corridor approach should, therefore, be pursued as a central element of the strategy for the development of transport infrastructure in Wider Europe and beyond. However, as the existing Corridor layout may become obsolete after the EU enlargement, it may have to be adapted to the new situation. This would mean that some existing Corridors, or parts thereof, would disappear and others would need to be extended or newly created.

While the future new Corridors will focus primarily on links between the EU and its neighboring countries, the Euro-Asian transport links should be taken into account, because of the foreseeable increase of trade with Asia, particularly with China.

There is one further aspect of integration-must provide fitting between national policy and policies at other levels like employment, training, planning, regeneration, nature conservation and safety. For the implementation of directive, the Commission gives no indication on determination of individual countries’ consistency with the policies and requirements of EU apart from the persuasion (Farrell, 2001).

The Commission is particularly interested in: market access to port services like pilotage, towage, mooring, cargo handling, storage, etc. They also offer ancillary services, such as fire-fighting, bunkering, water supply and waste-reception facilities. Depending on the port, these services are provided either as a comprehensive package or separately, either on request or automatically.

As to cargo-related services, cargo-handling has been one of the activities most profoundly affected by technological development and inter-port competition. The provision of these services is gradually being transferred from the public to the private sector in order to increase efficiency and reduce public expenditure on port labor costs. Nevertheless this directive is rejected with 209 votes in favor and 229 votes against in 2004. This showed that European Parliament is not in favor of liberalization of all economic activities linked with transport. Fearing that

manpower with low costs would be hired in third world and developing countries, European Transport Workers Federation had previously delivered a petition rejecting that directive signed by more than 16000 port workers from European ports to European Parliament (Mettle, 2004).

Research and development will help to improve the efficiency of ports and make maritime transport a more attractive option. The development of new transportation corridors and port infrastructure will increase the sustainable transportation in EU and the peripheral countries.

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