Part 1

INTERNATIONAL LEGAL PRINCIPLES OF COASTAL ZONE MANAGEMENT

The modern tool for the harmonization of the interests of industrial development and conservation of natural resources in coastal areas is the methodology of *Integrated* (in Russian the term "complex" is usually used) *Coastal Zone Management.* Today the concept of integrated management is recognized in scientific literature as the optimal for the development of laws on coastal management i.e. on management of the seaside marginal terrestrial areas of a state and seawaters under its jurisdiction that wash these marginal areas (Hildreth and Johnson, 1983, pp. 51-157).

During the last 25 years the methodology of Integrated Coastal Zone Management (ICZM) has been deeply developed abroad. The concept of such management is presented in – "Integrated Coastal and Ocean Management: Concepts and Practices" (Cicin-Sain and Knecht, 1997) in which the following definition is given: "Integrated coastal management can be defined as a constantly realized decision-making process with a view of sustainable use, development and protection of seaside terrestrial and coastal marine areas and their resources". Thus, ICZM represents an econo-legal regulatory mechanism (in market economy conditions) of numerous inconsistent interests of coastal natural resource users (mineral extraction on the shelf, fisheries, marine transport, industrial and agricultural development of the coastal zone, resorts, reserves, etc.).

In 1992, at the United Nations Conference on the environment and development in Rio de Janeiro, recommendations were given to coastal states to develop and implement ICZM programs in line with their local conditions. In last twenty years interest in ICZM has developed a global character. Now all over the world countries are implementing such programs or examining foundations for their realization. Over 50 countries now participate in approximately 150 ICZM programs (Ajbulatov, Mihajlichenko *et al*., 2000).

Chapter 1.1

Role of legal mechanisms in integrated coastal zone management

There are a number of generally accepted principles and characteristics of the implementation of ICZM. One of these is legal support, which provides application of conventional norms of international law in the regulative mechanism of coastal management. At the same time coastal states should be able to create a legislative basis for ICZM corresponding to their special conditions - to the natural characteristics of coastal areas, organizational and state structure, geopolitical situation, and also economic conditions, historical and cultural traditions (Ajbulatov, Mihajlichenko *et al*., 2000).

What is the role of law in realization of the concept of *integrated management?* The law defines the powers and duties of many state and private organizations and also naturalists involved in management and use of the coastal zone, it provides a legislative basis within which framework they function. Hence, the law has the potential to encourage the ICZM process, but at the same time can be the factor constraining this process. In spite of the fact that the principle of integrated management is a modern and developing concept, it is inevitably realized within the framework of quite a number of existing laws, the majority of which were accepted before the ICZM concept appeared, and were introduced for various other purposes. In this connection, it is very important to judge the suitability of these laws to the purposes and tasks of integrated coastal zone management. A legal, administrative and regulatory basis is necessary for taking decisions, and for their implementation. There should be mechanisms, which guarantee coordination in decision-making.

Legislation establishes certain general principles in coastal management, allowing a concrete policy to be determined within a precisely defined legal framework taking into account a variety of economic and ecological conditions. Given general legislative principles, regional and local authorities are free to show flexibility when forming policy, defining a strategy and choosing steps for their implementation in view of local needs and conditions. Thus, at a national level general structured legislation for coastal management should be established, following which decision-making can commence.

The law can determine the type of information on a coastal area that is required for realization of management, can define necessary subsequent actions with regard to public opinion (which should be considered when founding and implementing a policy) and it can promote harmonization of relations between various users of natural resources in coastal zones.

Coastal legislation at stages of development: problems, approaches

Traditionally the coast was considered as the legal border between territorial and maritime laws and seldom as an integrated area of legislative competence. The original laws on coasts defined the rights of ownership in coastal lands and legal principles of division between state and private property. They also provided a national, legal basis for free access to coastal waters for navigation and fishery. In this context there were limited legal concepts on the coastal zone within legislative systems of different states.

Plenty of administrative laws have been added to this historical basis. Such laws have usually been connected to industrial emissions on land or at sea, and prescribed certain functions to separate regulatory authorities responsible for them. Thus, there were separate codes of law in such areas as land use planning, prevention of floods, nature conservation, navigation, ports, pollution, fishing, minerals, tourism and local self-government. Usually these laws were adopted independently and were directed specifically to separate branches of industry without considering their relationship to other laws or as a whole.

Coastal laws apply at various levels of authority: national, regional or local. This creates not only significant complexity in coastal management, but also results in contradictions and conflicts between various levels of jurisdiction and between legislative acts of separate regions. International legislation also has a significant influence on the coastal laws of separate states. So, for example, for the European Community EU legislation significantly influences national coastal laws, especially in the field of fishery, water quality, nature conservation and environmental impact assessment. Implementation of international and all-European obligations by the EU member states unifies national laws and in some cases goes beyond traditional legislative concepts that have negatively affected a heritage of national jurisprudence.

Integrated management ensures that the natural factor is always taken into account in management of a company, a construction project and other economic structures of the coastal zone by “increased openness, knowledge and dialogue” between “industry, governments and the environment protection organizations” (Willy and Sons, 1996, p.328)”. The first time such an approach was taken was in the USA in 1972 when it adopted its Coastal Zone Management Act.

Analysis has shown that this legislation has 6 principle components:

1. A way of making commercial use of the shore and contiguous maritime regions under the sovereignty or jurisdiction of the USA, that takes into account the "dynamics of commercial use";
2. Integrity of government administration, preventing interdepartmental duplication in management and administration;
3. Policy of public discussion of decisions taken;
4. Search for the optimum balance between the conflicting interests of the resource users (for example, developers of offshore oil extraction and fishermen);
5. Organization of reliable reviews of the implementation of the law;
6. Openness of management, involvement of citizens, institutions, interested companies in management (Bergin, 1981, p 57-60)

Analysis of the legislation of various countries (Vylegzhanin and Zylanov, 2000, p 11). has shown that laws on coastal management, accepted in the European countries, differ in detail from the USA Act of 1972 and from each other. For example, in Sweden integrated management of land-based natural resources has a "stable legal form" (Bergin, 1981, p 47), while management of marine resources does not. "Of the fourteen ministries, ten, to a greater or lesser extent, have an interest in the management of marine resources resulting in serious problems of coordination." A key component of coastal management, according to Swedish legislation, is coordination of departmental activities in the field of marine resources management. In Great Britain coastal management is founded on the application of the Planning Act. In the Netherlands, after the flood in 1953, the Delta Plan, according to which some estuaries were separated from the sea by manmade dams, became the main factor in coastal policy.

It is obvious that the different types of legislation accepted in different countries are specific to their needs and use of coastal areas. Some legislative measures were adopted as a method of controlling urbanization in coastal territories, for example prohibition of construction, and land purchase. Others were developed in connection with critical situations arising in the coastal zone, in particular, related to exploitation of mineral resources or the growth of tourism. The purpose of other laws was conservation and protection of the coastal environment. However, in all the cases, to execute the laws it was necessary to improve

coordination among existing administrative bodies, or to establish a central coordinating body in order to provide coherent implementation of decisions by all interested institutions.

In spite of the fact that in a number of countries quite extensive legislation on coastal zone management already exists, laws in this sphere of management can not function without careful adaptation. Laws should not be applied in isolation from political realities, economic conditions or without taking into account historical features of the legal system on which they are based.

In countries with Romance systems of law (Spain, France, Italy, Portugal) the coastal zone always was and remains state property and is managed by the state. The right of citizens to visit the coastal zone is combined with a prohibition on construction within the limits of a shore, except within cities. Private ownership of coastal land is allowed only in separate states and includes significant charges.

In countries with traditions of German and Scandinavian law (Germany, Sweden, Denmark) coastal land, like any other, may be privately owned. At the same time, there is the right of unimpeded travel through these parcels of land and free-of-charge access to use some kinds of natural resources (Schukin, Andrushko, Galtsova *et al*., 1997).

Thus, legislation should fulfill the direct needs of a separate state, region or area. In this sense, the Coastal Management Act in the United States is an example of scientifically founded and structured legislation, which allows each State to precisely define problems as they arise and to define methods for their solution.

Institutional systems and authorities

In the majority of countries successfully implementing the ICZM methodology the key role in coastal management belongs to municipal authorities.

Realization of coastal zone management involves development and use of an *Integrated plan* for all the geographical components of the coastal zone: coasts, offshore waters and inland areas that have a significant effect on processes in the coastal zone (UNEP/ROE RSHU, 1998). In many European countries the key role in integrated planning is given to municipalities. So, for example in Sweden, since 1987, all municipalities have in principal had a plan of land and water use and a system of issuing permission that is integrated and

adapted to modern conditions. Having an integrated plan, municipalities can influence the decisions of other authorities on the use of resources (Baltic University Programme, 2000, book III, p 177).

The efficiency of policy and legislation in coastal management depends on the coordination and effectiveness of the administrative structure. So if only one group represents the administration, reflecting only one kind of interest, it is evident that the legislation will answer only one kind of interest. Inappropriately worded laws can be arrived at for a variety of reasons. Among them, ill-coordinated actions; insufficiently developed mechanisms for representing the conflicting interests of numerous coastal nature users; shortage of qualified and well trained staff; shortage of special equipment and technical means; inadequate knowledge on the part of the representatives of an administrative structure on the purpose and tasks of the legislation.

Correctly organized, management should include:

1. an administrative structure responsible for the determination and control of policy in the coastal zone;
2. a consistent concept of administration covering all the kinds of activities, which are in the charge of the administration;
3. adoption of a coastal zone definition, as an object for developing a program of management without damaging, if it is possible, existing political and geographical management of objects (economically advanced objects);
4. refusal to increase the number of institutes of administration, intermediate and intersectoral coordination and cooperation (PERGAMON PRESS, 1982, p.161-162).

Experience shows that the most valuable component is an administrative body capable of taking political decisions. This body should consist of representatives of various governmental organizations (resource, planning, transport, economic), representatives of major stakeholders and highly qualified staff for consultation on technical questions. However there is a danger that such a commission may be too big and bulky to work efficiently. To prevent “paralysis”, the chairman of the commission should play a principal role in finding a way out of the impasse. Open voting provides a reflection of all the intersectoral interests of the coastal zone users and need for weighed assessment of all these interests. Each group can then be vested with corresponding elective powers according to the

importance of the interests that the group represents. In this way the majority of decisions can provide harmonization of various interests in the coastal zone.

For the administrative power it is necessary, particularly at a technical level, to have authority, within a precisely defined framework, to convert general norms into regulations. Such a system of administration provides flexibility, facilitating execution of legislation, and allowing regional differences to be taken into account.

The participation of interested groups of nature users and the public in the planning and legislative process, as well as in concrete aspects of coastal administration, is essential. There should be legal guarantees to ensure that various groups of interests are represented. Such participation may be coordinated both with individuals and with collective representatives of various stakeholders.

The right to be represented allows various groups to protect their interests and needs when economic activities that might endanger the coastal zone (for example transportation of oil and poisonous chemical products, construction of ports, etc.) are planned.

The representation of the interests of various groups is provided through such mechanisms as public hearings at the political stage of decision-making or through the administrative system. In the latter case an administrative body is necessary for settlement of disputes (as discussed above).

Professional education and corresponding training are necessary for securing wide public participation in planning and decision-making. If a region has no experience of participation in public hearings and discussions, organization of professional and practical training of personnel is required.

Chapter 1.2
International coastal management legislation

International law can briefly be defined as a set of legal rules and a regulator of interstate relations allied to national law. A prototype of the modern word-combination and definition “international law” is the term developed in the Roman law “jus gentium” – “law of nations”.

It is obvious that a “law of nations” does not actually exist. Interstate law is focused primarily on the regulation of interstate relations and as such is created mainly by states as the sovereign political organizations.

On a modern political map of the world the coastal zone as an integral object of management is not marked out at all. Along the coasts of seas and oceans there are plenty of lines marking the political borders between states. In a natural or ecological sense these borders do not exist - ecosystems can’t be divided into separate parts. Therefore, to unify the rules regulating use of the coastal zone resources by the states located there, a corresponding unification of international law is required. Thus, it is obvious that in the regulative mechanism of coastal management, application of conventional norms of international law is necessary. International law on the use of the coastal zone and its integrated management should, on the one hand, take into account the corresponding national law of sovereign states, which have the coastal zones under their jurisdiction, and on the other hand, the national law of these states should follow the norms of international law.

Influence of international legislation on integrated coastal zone management

There is a broad set of international legal tools influencing coastal zone management. Most of them are connected with quite definite problems, such as pollution of the sea and nature conservation. Despite years of international legislation to reduce and regulate pollution of the sea by land sources, integrated land and sea management has not traditionally been attempted. Agenda 21 realized the necessity of an integrated management policy for the first time. Documentation from the North Sea Conference serves as confirmation of this.

International legislation has an obvious advantage in comparison, for example, with legislation of the European Union, as it can be applied to many states not included in the EU, and thus can cover whole natural ecosystems, such as regional seas. Various levels and kinds of international measures provide significant flexibility in international legislation. At the same time regional agreements are generally more ambitious than similar international ones. On the other hand, the European Community itself is a part of many international conventions and is able to deliver the consent of all the EU member states.

Many international legislative tools have an indirect relation to coastal zone management, as their principal subject impinges on the coastal zones. Examples are the Convention on

Biological Diversity, the Convention on Climate Change, the Bonn Convention On Wild Animals Migrating Types and the Bern Convention on Conservation of Wildlife and Natural Habitats.

However, analysis of the Convention on International Trade in Endangered Species of Wild Fauna and Flora (1973), the Convention on Biological Diversity (1992) and the United Nations Agreement on Stocks of Transboundary and Highly Migratory Species (1995) reveals that some questions are still unresolved.

Thus, in spite of some limitations, international legislation has undoubted potential as an additional means for ICZM jointly with national and European legislation.

One of the international legal tools for the protection and conservation of coastal zones is international environmental law.

Principle features of the development of international law

Decisions on such global problems as conservation of biological diversity, prevention of climate change, conservation of the ozone layer, regulation of population growth, prevention of desertification, acid rain and prevention of the resources crisis is beyond environmental protection activities at a national level and demands joint efforts within the framework of the international community.

Today, with urbanization, the extensive use of scientific and technological innovations to increase economic output, development of new territories, extensive use of natural resources and environmental contamination it is difficult to provide for efficient protection, and rational use, of natural resources at a national level without adopting measures coordinated with the international community.

International cooperation in environmental protection and rational use of resources has more than a century of history; it started at the end of the nineteenth century first bilaterally and then multilaterally. Active bilateral and multilateral cooperation started in the second half of the twentieth century (Steblov and Vajsman, 2000).

At the moment there are three sources of international environmental law:

- International contract law;
- International customary law;
- General legal norms recognized by the public.

International contract law

The use of natural resources and conservation of the environment are directly regulated by treaties, conventions and agreements. International contract law has a special meaning for the protection of such objects of international environmental law as: World Ocean, space, atmosphere and the seas and other water bodies located on the territory of adjacent states. International contract law applies to cases where decision-making and measures at the international level are required, for example, for protection of different kinds of wildlife (animals, plants, etc.).

International customary law

The principles of international customary law imply obligations of interstate protection of the environment, i.e. the obligation of one state to others not to allow harmful impact on the environment on the territory of their neighboring states. The generally accepted principles of international customary law are the:

- principle of good neighborhood;
- principle of territorial sovereignty;
- principle of territorial integrity;
- principle of mutual benefit.

General legal norms recognized by the public

General legal norms are based on generally accepted legal approaches to assess the rational use of resources, and their conservation, and to evaluate the dangers to the health and living conditions of the population. These generally accepted principles of international law act as “lawfulness criteria” for ecological regulation, as well as of other interstate relations. As well as generally accepted principles of international environmental law special principles of modern international environmental law have been elaborated.

International law acts concern states, governmental and non-governmental organizations, and in separate cases concern juridical and physical persons.

International responsibility for violation of environmental law

If a state has adopted international environmental law and then has failed to fulfill its obligations, by failing to prevent oil pollution of the World Ocean or by allowing transboundary contamination of the environment of a neighboring state, for instance, it should expect unfavorable consequences.

The cause and effect relationship between the illegal actions of a subject of international law and the ecological damage caused by the subject is a very important element of international environmental law violation. The significant role belongs to the guilt of a law-breaker. Although in modern international practice a non-guilt or objective responsibility is also applied.

According to modern international law violations are subdivided into crimes and torts. The concept of international crime is defined in Article 19 of the Draft of Articles on International Responsibility developed by the International Law Commission. It is an international legal act, resulting from the infringement by a state, of an international obligation vital to the interests of the international community to such an extent, that its violation is considered as a crime against the international community as the whole. According to international environmental legal norms international ecological crimes may be the result of heavy infringement of an international obligation, having basic meaning for environmental protection, such, as the obligation prohibiting pollution of the atmosphere or the seas. Any international legal act, which is not an international crime, is recognized as an international tort, or an ordinary law violation (Brinchuk, 1998, p 636).

Coastal management laws in the member states of the European Union

Although coasts are not mentioned in the European Union Treaty, the legal competency of the European Community covers ICZM widely. The concept is included in the Treaty in the sustainable development principle and the requirement for integration of environmental protection in other areas of European Union policy. The variety of legal systems of the EU member states and the possibilities for their modification testify that the European

Community should not give too many directives. Any interference should be in the legal competency of the EU. Activities in this area, together with other legal measures for affirmation of ICZM necessitate an exact assessment of the state of the environment as a whole. In this case, the most useful measures available to the Community are the ICZM Directives, the Model Law and the Code of Conduct in Coastal Zones.

National coastal management laws in European states have many common features, but it is important to note their differences too. As well as in other areas of law, historical features of the various legal systems puts obstacles in the way of integration of the European legislative system.

The greatest similarity is observed between the states, where the legislation is founded on similar legal systems: customary law, Roman law (Spain, France, Italy, Portugal), Scandinavian or German traditions (Germany, Sweden, Denmark).

State ownership of the coast and coastal basin is a characteristic feature of many countries, but the exact size and delimitation of these zones differs from country to country. The public right to access to coastal waters and lands, comes from customary law, Roman law or the Scandinavian "Everyman's Right".

In a number of the EU states the legislative measures aimed at protection of the coastal belt along the coastline are rather widespread. In particular, such legal mechanisms exist in the Baltic states where the HELCOM Recommendation 15/1, referring to coastal protection, is already a unifying influence, although here again significant differences exist, basically in the breadth of the protected coasts.

An analysis of the EU member states' national legislation has shown that irrespective of their advantages or disadvantages they establish basic principles for ICZM (Gibson, 1999). Both their completeness and variety are likely to be impediments to adopting unified legislation.

Positive experiences of coastal management legislation in practice in several member states of the European Union are discussed below.

Denmark

In Denmark, in 1994, a national government department responsible for the environment, conservation and planning policy, the Ministry of Environment and Energy was established. It is supported by specialist agencies, including the Danish Environmental Protection Agency. In Denmark counties undertake regional planning, and the municipalities carry out local planning.

Adopted in 1992 the Planning Act, which was revised in 1994, defines a coastal planning zone as extending 3 kilometers inland from the coast. The Act specifies regulations on land use within this zone, which differ in urban, summer cottage and rural areas, and must be catered for by county and municipal councils in their plans. This approach does not involve separate coastal planning; coastal zones are integrated into the ordinary planning process. The aim is to preserve undeveloped coasts, ensuring that coastal territories are kept free from further use. Key elements in the Planning Act are environmental impact assessment and public participation.

Also in 1992 Denmark adopted the Protection of Nature Act. The Act established a protected zone outside urban areas, extending 300 meters inland from the coast. With few exceptions, new developments are prohibited in this zone. A narrower protection zone of 100 meters had previously applied in summer cottage areas, but this was extended to 300 meters in 1999.

Denmark is a party to the Helsinki Convention on the Protection of Marine Environment of the Baltic Sea Region, and the coastal planning zone and protection zone are intended to implement the HELCOM Recommendation 15/1, concerning the protection of the coastal strip.

The Planning Act and Protection of Nature Act concentrate on land use only, and are not applicable to the sea, which is regulated by other legislation. These laws, which are administered by the national government, include the Marine Environment Protection Act, the Harbor Act, the Fishery Act and the Raw Minerals Act. The Coastal Protection Act is aimed at prevention of coastal erosion and is implemented by the Danish Coastal Authority under the supervision of the Ministry of Transport.

The legal framework in the Danish coastal zone is complicated, and this complexity presents a potential obstacle to integrated coastal zone management.

The Netherlands

In the Netherlands coastal management is an old tradition. The first attempts to create an organizational structure responsible for the state and strengthening of a coastal line were made twelve centuries ago. Throughout history the Netherlands has developed and strengthened its system of coastal management. It is based on legally constituted associations of landowners whose voting rights are proportional to the amount of land they own. In total there are eight hundred such associations. Each has administrative and technical personnel and defined powers in functional and geographical senses. The administrative and technical body forms part of the provincial administration, and there is also a general directorate at the national level, which acts under the supervision of the Ministry of Transport and Water. While this system provides expertise and balanced decision it is criticized for its technocratic approach and uncommunicativeness with the public and trade unions.

Another important tool for coastal management is town and regional planning, which also has old traditions in the Netherlands. Plans exist at four levels:

- Municipal plans of allocations - obligatory both for citizens, and for the government;
- Municipal or structural inter-municipal plans;
- Regional plans of provinces;
- National plans.

The basis of all the levels of planning is the principle of "double-track decision-making". This means that in the decision-making process the interests of land use management, on one hand, and the interests of the corresponding government ministries, on the other hand, are taken into account.

Great Britain

Attempts to create a national structure for coastal planning in Great Britain started in 1947, when the Town and Country Planning Act was adopted. In 1966 the Department of the Environment has issued a Circular Letter to County Councils asking them to define Coastal Protection Areas so as to strengthen control over their development. This initiative to keep as much of the coast untouched as possible was based on the following:

- Coastal landscape diversity;

- Undeveloped coast (75% of the coast remains undeveloped, with 800 miles of magnificent landscape rich in history and naturally conserved);
- Footpath access to the coast (access to the coast is typically recognized as de-facto on many privately owned stretches of the coast);
- State ownership of coasts (significant amounts of the coast are state property);
- Other kinds of property protection: National Trust, Nature Conservancy Council (now English Nature, Scottish Natural Heritage and the Countryside Council for Wales).

In 1972 the Department of the Environment issued another Circular Letter in which the authorities of the County of Kent were recognized as outstanding at the national level. Local authorities have the power to prepare and implement management plans according to the priorities outlined in the Circular Letter. A commission created to encourage management of coastal areas has offered special remedies for protection projects. The National Trust carried out campaign for "the next one hundred miles" with the help of "Enterprise Neptune". The campaign was a big success, and the Trust has now taken 400 miles of coast under its protection.

In Kent the coastline is 170 miles long and 37% of it is built up. In 1966 an initial plan of County policy on the protection of the one-mile coastal belt was adopted as a Convention before a complete public opinion poll was done. In 1967 the borders of Coastal Preservation Areas were determined. The width of theses areas varies from 300 yards up to 5 miles and includes land seen from the coast, i.e. the territory, which influences the development of coastal zones. A strict policy of limiting coastal access to permit holders only was introduced so as to leave complete ecosystems undisturbed. The result of such an approach, very strictly limiting the development of economic and other activities, was conservation of huge coastal territories in Kent.

Sweden

As a legal framework for coastal management was developed in Sweden, regulations for the use of land-based resources were also defined. Executive and legislative branches of power, local administrations and public and professional associations have made joint efforts to solve problems in the coastal zone related to: allocation of enterprises potentially harmful to the environment such as power stations; the increase of country cottage building; tourism and

recreation (including sports fishing); protection of the environment; conservation of historical and cultural monuments; and securing the interests of the local population.

In 1979 the government adopted a document, which then received the approval of parliament and constituted a long-term legal foundation for land resources management and for solving the problems in the coastal zone mentioned above.

At the same time a government group was created to coordinate integrated management of water and marine resources. The importance of this group is underlined by its membership of ten of the fourteen government ministries. The group is aware that the long-term maritime interests of Sweden include not only development of resources as such, but other possibilities offered by the sea: for transport, generation of electric power, etc.

The principle areas of interest to the group are:

- International regulation of national legislation;
- Marine ecology, in particular, the influence of toxic substances and other discharges on the ecosystem;
- Systems of observation for maritime areas;
- Fishing, development of aquaculture and also other kinds of economic activities in Swedish seas;
- Use of international waters by Sweden;
- Development of programs concerning the coastal zone.

Spain

In Spain the Ministry of the Environment (*Ministerio de Medio Ambiente*), which was created in 1996, has national responsibility for environmental policy.

In 1998 Spain enacted a national Shores Act (*Ley de Costas*), which was intended to reassert state ownership over "coastal public property" that had increasingly been privatized, and to protect it from the effects of inappropriate development on adjoining land. The Shores Act builds on the declaration in the Spanish Constitution that the coastal strip, beaches, territorial sea and the natural resources of the exclusive economic zone and continental shelf are state public property. This area is defined in more detail in the Shores Act to take in the shore of the sea and its inlets, including tidal shores, banks of tidal rivers and low-lying lands,

such as wetlands, lagoons and marshes, which are flooded by the sea, and also beaches and deposits of sand, gravel and pebbles (including escarps, berms and dunes), formed by naturally or artificially. In order to prevent private acquisition of this area, the Act stipulates that land added to the shore by accretion or as a result of works becomes state coastal public property, as well as land flooded by encroachment of the sea.

In accordance with the Constitution public ownership of coastal zones is inalienable, inprescriptible and nonseizable (Shores Act, Article 7). It is the responsibility of the national government to approve its boundaries under a statutory procedure in which municipal councils, adjoining landowners and other interested parties are entitled to be heard.

The Shores Act defines four landward zones adjacent to coastal public property and imposes restrictions on development and exercise of private property rights within them.

An “easement of protection” extends for a minimum of 100 meters from the inland limit of the shore, and can be enlarged to a maximum of 200 meters by the national government with the agreement of the autonomous community and municipal council. Within this zone there is a general prohibition on residential development, major roads schemes, destruction of sand deposits and maintaining of high voltage electricity cables, waste disposal and advertisements. However developments that cannot be located elsewhere or which provide necessary services may be authorized, as well as outdoor sports facilities. Exceptions may also be granted for reasons of public utility or economic importance.

There is an “easement of passage” over a strip of 6 meters from the landward limit of the shore. This strip is to be left permanently clear for pedestrians and search and rescue vehicles. It may be enlarged up to 20 meters in places with difficult or dangerous passage, but may exceptionally be blocked by public works or promenades.

An “easement of free public access to the sea” exists on land adjoining coastal public property, which must be reflected in land use zoning plans (Shores Act, Article 27). In urban and development zones outside protected areas, vehicular access roads should be a maximum of 500 meters apart, with pedestrian access at least every 200 meters. Works or facilities, which impede public access to the sea, are prohibited unless alternative compensatory measures are taken.

In addition, an “influence zone” with a minimum width of 500 meters from the landward limit of the shore must be included in land use plans, which should incorporate the following principles for the protection of coastal public property: sufficient land must be reserved for cars parks to guarantee parking outside the “easement of passage” area; building density must not exceed the average allowed for urban land; the same authorizations for waste disposal must be required as apply to coastal public property.

Portugal

Environmental policy in Portugal is implemented by the Ministry of Environment and Natural Resources (*Ministerio do Ambiente e Recursos Naturais*) which was created in 1990. Planning is mainly the responsibility of the municipalities. In Portugal there are several laws directly related to the coast.

In 1971 a Decree-Law *(Decreto-Lei)* clarified and revised the legal rules governing public aquatic property, including the seabed and coastal margin. The law established state ownership of the seabed up to the high water mark, together with an adjoining strip of coastal land extending for 50 meters inland from this line or beyond the beaches. The same principles apply to the bed and shore of navigable waters under the jurisdiction of marine or port authorities. Private ownership that can be proved to have existed in these areas before the 1860s is preserved, but the bed and coastal margin are subject to public rights of access, fishing, navigation and swimming, and private uses of public property may only be carried out under license or concession.

A Decree-Law was passed in 1990 to implement the objectives on organizing and administering the coastal area. The Decree-Law defines a coastal strip extending two kilometers inland from the line of the highest equinoctial tide and specifies policies for the occupation, use and development of that area, which should be applied by the authorities involved in licensing and planning. Municipal plans must contain rules for the coastal strip and be approved only if they conform to the policies in the Decree-Law. Where there are no planning instruments, it is the duty of the government to establish appropriate rules, and land subdivision and construction works should not be authorized unless they comply with the statutory coastal policies.

In 1993 another Decree-Law was passed for the preparation of specific "coastal strip classification plans" (*Planos de ordenamento da orla costeira, POOC*). These can apply to a "terrestrial zone of protection" extending to a maximum distance of 500 meters from the water's edge and a "marine zone of protection" up to a depth of 30 meters, but exclude areas under port jurisdiction. It is the responsibility of the national Water Institute to draft *POOCs*, with the assistance of a representative technical commission, and after a public inquiry, to submit them for approval to the Ministry of Environment and Natural Resources. These plans require the agreement of the government ministers responsible for national defense, planning and territorial administration, commerce and tourism, environment and natural resources and the sea. In the terrestrial zone of protection, *POOCs* should observe the same policies as are specified in the 1990 Decree-Law, but if there is no *POOC* or municipal plan in force the licensing of works must be approved by the respective regional directorate of the environment and natural resources *(DRARN).* In addition, the 1993 legislation contains criteria for the classification of bathing beaches and principles for their management that should be reflected in POOCs, and private uses of beaches need a concession or license from the *DRARN* or port captain.

Coastal zone laws outside the European Union

Comparison of coastal management laws of many states outside the EU (Gibson, 1999) has shown that a big variety of legal and not statutory instruments exist, which can be used for ICZM. At the same time, there are no identical approaches in their use and countries should choose which of them best fits their own legislative and administrative systems.

For example, the United States, with great experience of coastal zone management, shows how much flexibility is necessary while developing legislative acts and norms within the framework of a federal structure. Precise definition of the coastal zone at the federal level allows separate states to establish boundaries more precisely taking into account their geographical position. The USA Coastal Zone Management Act precisely formulates the national purpose of the ICZM policy. This policy does not force individual states to develop coastal management programs, but creates a stimulus for them in the form of profits obtainable through grants and "federal additional funding". The methods for implementing ICZM selected by individual states in the USA vary and include comprehensive ICZM legislation, structured acts and not statutory coordination schemes.

For comparison it is interesting to consider the approach developed and used by the Australian federal authorities, namely, adoption of not statutory ICZM policy at the national level, encouragement and support of states and territories participation in ICZM development with the help of financial investments and other initiatives. ICZM legislation is a regional mechanism, which is selected by some, but not all the Australian states.

In Canada, the Oceans Act is focused primarily on the marine environment, but at the same time, it is an example of federal legislation establishing wide opportunities for integrated management, coordinated by the national government.

From the point of view of wide implementation of ICZM methodology the experience of New Zealand, which took a decision on including legal provision of ICZM in the law on the environment, is interesting. The 1991 Resource Management Act seeks to provide an integrated framework for managing the sustainable development of land, water and air, and promotes community involvement in decision-making. It gives most of the managerial functions to regional or territorial authorities and provides for community involvement in decision-making. Regional councils share responsibility for land use with the territorial authorities, and for coastal marine areas with the Ministry for Conservation. According to the Act, this Ministry prepares the statements on national coastal policy, and also on regional coastal plans. The first New Zealand Coastal Policy Statement was published by the national government in 1994.

Such a fundamental change in legislation demanded significant political will, and would not have been possible without the consensus of all the parties and subjects. Probably, the most significant factor was that New Zealand is not a federal state. So its example is difficult to follow for both federal states and the European Union. New Zealand's experience shows that new integrated legislation is unlikely to be fully workable in its initial form and will doubtless need correction and amendment. The Resource Management Act reflects the major ICZM principle: the coastal zone represents a part of the whole environment and coastal zone laws must not be adopted separately, but coordinated with other environment laws.

Model Law on Sustainable Management of Coastal Zones and The European Code of Conduct

In 1995 the Council of Europe, which has 41 member states, drafted a Proposal for a Model Law on Sustainable Management of Coastal Zones together with a draft European Code of Conduct for Coastal Zones.

The purpose of model laws is to provide a standard text that states can use as a basis for national legislation. The Model Law and the Code of Conduct do not have the status of international conventions, since there is no obligation on any state to apply them, and they can be modified to suit national circumstances (UNEP/ROE RSHU, 1998).

These acts are based the following ideas:

- Undeveloped coasts are a non-renewable natural resource;
- Conservation of this resource is possible through implementation of a sustainable development concept;
- Development of the coastal zone is not restricted to recreational users, landowners and local authorities; economic interest in the coastal zone is much more widely spread than this;
- Precise, readily applicable legal norms establishing, in particular, a number of restrictions on coastal resource use are necessary for the harmonization of the aspirations of the various parties interested in the coastal zone.

The Model Law defines a legal structure for ICZM, including a definition of the coastal zone and the main principles of integrated management. The coastal zone is defined as the geographical area covering both the maritime part and the terrestrial part of the shore, including salt-water ponds and wetlands in contact with the sea (Article 1). Thus the coastal zone has precise boundaries.

According to the Model Law integrated coastal zone management is based on the following principles:

- Sustainable development;
- Prevention of harmful impact on the natural environment;
- Adoption of precautionary measures;
- Recovery of destroyed natural environment;
- “Polluter pays” and “user pays”;

- Use of the best available technologies and methods directed at conservation of the environment;
- Informing the population, and community involvement in decision-making;
- International cooperation.

Also, a number of principles particular to coastal zone development apply:

- Equal distribution and sustainable development of resources;
- Development of remote areas;
- Protection of ecologically fragile areas, threatened ecosystems, and also habitats and species;
- Compatibility of various kinds of coastal zone use;
- Priority in the development of the kinds of activities dependent on the coastal zone;
- Unrestricted access to the shore.

The Model Law provides for creation of a special body at the national level, responsible for development and implementation of integrated coastal zone management. This can be a ministry, interdepartmental committee or other body. At the regional level a special executive body may be in charge of integrated management implementation.

Separate chapters of the Model Law are dedicated to the creation of a database on the state of the coastal zone, financial instruments for management, land ownership, free access to the shore, development and planning, recreation, conservation of ecosystems, etc. (Gibson, 1999).

In the Code of Conduct attention is given to the social and economic sectors, marked in the Pan-European Strategy of biological and landscape diversity with the addition of a sector involved in coastal protection. These sectors are (UNEP/ROE RSHU, 1998):

- Agriculture
- Military defense
- Forest management
- Fisheries
- Energy
- Industry

- Urbanization
- Transport
- Tourism and recreation
- Water management
- Coastal protection

There are many recommendations that apply to all sectors. These are included in the Chapters entitled “Strategic Principles” and “Integrated Coastal Management”. Strategic principles include the guidelines concerning protection of a dynamic regime of coastal systems and should be applied in cases of development and construction or other kinds of activities in the coastal zone. So, for example, one of principle demands is to avoid construction or expansion of physical impediments in sensitive coastal ecosystems to conserve access between the land and the sea. Others principles make clear that new kinds of activities should be located outside the coastal zone.

General guidelines cover questions of integrated coastal zone management, environmental impact assessment, use of financial instruments and initiatives, and support for community involvement in decision-making.

Thus, the Code of Conduct is a major document promoting development and conservation of coastal zones.