

T.C.  
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AVRUPA BİRLİĐİ SİYASETİ VE ULUSLARARASI İLİŐKİLERİ  
ANABİLİM DALI

**EUROPEANIZATION OF THE ENVIRONMENTAL POLICY IN THE  
MEDITERRANEAN REGION:  
CASE STUDY OF CYPRUS  
YÜKSEK LİSANS TEZİ**

ASLI KÖPRÜLÜ

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İstanbul - 2006

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## ÖZET

Bu tezin amacı bir Akdeniz adası olan Kıbrıs'ın çevre politikasını ve adadaki çevre politikasının Avrupa Birliğine geçiş sürecinde, diğer bir deyişle Avrupalılaşıma süreci bağlamında, yaşadığı değişiklikleri araştırmaktır. Bu çalışma Avrupalılaşıma kavramını açıklamakta ve çevre politikasının bu süreç içinde önemli bir rol oynadığına değinmektedir. Avrupa Birliği çevre politikasının 1970lerden itibaren başlayan zaman içinde kendini geliştirdiği ve bu gelişim sürecinde Avrupa Birliğini oluşturan devletlerin büyük bir etkisi olduğu vurgulanmıştır. Bunun sonucunda Birliğe sonradan katılan üye ülkelerin, özellikle Güney Avrupa ülkelerinin, yaşadığı sorunlar anlatılmıştır. Bir Akdeniz (Güney Avrupa) ülkesi olan Kıbrıs bu çerçevede altında incelenmeden önce Akdeniz bölgesinde yaşanan çevre sorunları ve bu sorunları gidermek için uluslararası örgütlerin yaptığı çabalara yer verilmiştir. Kıbrıs adasının, özellikle Kuzey Kıbrıs'ın, çevre sorunları incelendikten sonra, Kıbrıs'ta bulunan iki ayrı yönetim Kuzey ve Güney olarak ele alınmış ve çevre politikaları incelenmiştir. Kuzey Kıbrıs yönetimi Avrupa Birliği'ne üye olmadığı için Avrupalılaşıma sürecine dâhil olamamıştır. Bu sebepten dolayı Avrupalılaşıma süreci altında sadece Güney Kıbrıs'ın çevre yönetimi ele alınmıştır. Bu çalışma Güney Kıbrıs yönetiminin Güney Avrupa ülkelerinin karşılaştığı sorunlarla neden karşılaşmayacağını ülkede var olan sorunları da konuya dâhil ederek anlatmaktadır.

## **ABSTRACT**

This thesis is an attempt to examine the environmental policy and the changes happening in the environmental policy of Cyprus as a Mediterranean island within the process of Europeanization. This study is explaining the concept of Europeanization and the importance of the environmental policy in the process of Europeanization. The European Union environmental policy has started to get developed since 1970s and in this study the role of the founding member states has been emphasized within the process of the evolution of the E.U. environmental policy. The problems faced by the Southern member states have been explained as a result of being late comers into the Union. Before investigating Cyprus as a Mediterranean (Southern) member, the environmental problems existing in the Mediterranean region and the efforts of the International Organizations within this context are explained. The environmental policies and the environmental administration of both North and South are dealt separately after the investigation of the environmental problems happening in Cyprus, especially in the Northern part of the island. Since the administration of the Northern Cyprus is not an E.U member, it is not included in the process of Europeanization. The administration of the Southern Cyprus has been taken to investigate under the process of Europeanization. Consequently, this study is mainly explaining the factors, why Southern Cyprus will not face the same problems that the Southern member states have faced in the process of Europeanization, including the current administrative problems within the South Cyprus.



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## **INTRODUCTION**

### **Aim and Argument**

During recent years, the issue of 'environment' has become the most critical and crucial subject in most countries. The term environment refers to the variety of values forming the common existence of the human beings. Air, water and soil that are composing the habitats; the flora and fauna sharing the habitat with the human beings; the heritages of civilizations that have been created by the human beings are the main environmental values.

Environmental issues might be ignored by the human beings if there was no sign of the disasters that are going to destroy the environment. According to sociologists, the general attitude of the humankind is to ignore the problems that do not directly influence our lives. According to economists, there are more important economic problems to be solved before the preservation of the natural heritages. For instance, it seems that development of tourism industry is considered more important than the protection of orchids and sand dunes by the politicians who ascribe utmost priority to economic growth. If we look at environmental issues from an eco-centric view, we human beings are the part of the environment from birth and thus we should care for the whole world without forgetting the fact that 'there is only one world' and try to preserve it for the next generations.

My main motive to write this thesis was living in a small island where its environment is divided and its environmental problems have been ignored for a long period of time. Is it possible to divide a single small geography into two different environments and apply separate environmental administrations to each of them? It should not be possible but unfortunately this is the reality in Cyprus. In fact environment could be the only reason to unite the island beyond the other political reasons. This is the main argument in this study that; a small and single geography can

not be divided into two as different environmental lands. Both Greek and Turkish communities should take collective action to protect their common environment. Here the establishment of an independent and bi-communal environmental institution is the most suitable solution to prevent common environmental disasters and take collective action, which can also start the unification process of the island. The Cypriot communities will perceive that they can work together for their own common heritages and for their own common future.

In Cyprus, environmental problems have been ignored for many years, even though there are number of problems that are directly influencing the lives of the inhabitants. Cyprus is an island that attracts the attention of the main actors of the world politics because of the Cyprus issue that has been continuing mainly since 1960s. Nicosia is now the only divided capital in the world whose southern part falls within the territories of the European Union. So the issue is now a matter of the E.U, after the accession of the Republic of Cyprus into the E.U in May 2004.

Natural environment is the most crucial factor for all the living organisms without any doubt. In addition to this, for an island whose economic sustainability rests on sustainability of its natural resources, environment should be perceived as a 'gift' which has to be protected for all generations to come on the island. The only way to save the natural beauty and to sustain the life supporting for the inhabitants in Cyprus is to 'preserve' the environment.

The E.U environmental policy has been the main impetus for Cyprus to protect its environment. European Union environmental policy has been adopted by various segments of the public in the Republic of Cyprus. Although the Northern part of the island stands outside of this process of 'Europeanization', the environment department of the Northern side is trying to amalgamate these norms as well.

Europeanization is a process of domestic adaptation of the European Union policy standards (legislation, organization, structure, administration) into the member states' policies. In this study, environmental policy is taken as a policy area to examine the adaptation process of the Republic of Cyprus into the E.U. environmental norms, institutions and policies.

Most of the Southern member states have shown a slow adaptation process into the E.U. environmental norms because of being late comers and ‘policy-takers’. Most of them have experienced infringements and ‘misfits’. Based upon the facts derived from Southern member states, another argument of this study is; although Cyprus is a Southern member and a late-comer, the possibility of experiencing the same problems as rigidly as other Southern member states is low with the island’s own characteristics and structure.

The most concrete outcome of this thesis is the differences between North and South Cyprus on the basis of environmental policy. As the Northern part is not an E.U. member and because the TRNC (Turkish Republic of Northern Cyprus) is not recognized, environmental policy of the Southern Cyprus is more developed and provides high living standards to the Greek Community. The activities of the UNDP (United Nations Development Program) have been useful to overcome this gap between the North and South as it is explained in the thesis in detail.

### **Specific Research Area**

This study focuses on the Europeanization of the environmental policy in Cyprus. The environmental policy structure has been examined to evaluate whether the Europeanization process is successful or not, to identify the main structural weaknesses and strengths in the way towards the adaptation of Cyprus to the E.U. Cyprus is taken as a case to study the Europeanization of the environmental policy with the motive of its being a new member and a Southern member state. The ‘Southern-ness’ of the island provides a ground to make predictions and generalizations about the future of the environmental policy in Cyprus, as a new member.

The first chapter of the thesis is on the European Union environmental policy and the concept of Europeanization. The evolution of the European Union environmental policy has been examined from its emergence in the 1970s (the first

years of the policy) until now. In order to further its analysis, the chapter addresses the main principles of EU environmental policy. It is important to understand the E.U. environmental policy for analyzing the process of domestic adaptation of a country into the E.U. The second part of the first chapter is about the concept of Europeanization. Europeanization is a research area that has been studied in recent years after the appearance of the domestic responses of the member states resulting from the process of the adaptation into the Union. Environmental policy is a policy field on which the Europeanization research has mostly focused from the outset.

In the second chapter, the ‘Mediterranean-ness’ of the island was emphasized to look at the issue from a more global perspective. First, the environmental problems of the Mediterranean region were studied and then the international responses (E.U. and the U.N.) towards these problems common for the Mediterranean countries were addressed with in detail. In the second part of the chapter, the ecology of Cyprus was studied in general and the environmental problems of the island were explained in particular to be able to analyze the state of environment in Cyprus more properly. Cyprus is taken as a whole in this chapter without scrutinizing its division as North and South, because it is believed that a particular geography cannot be divided into two while studying its nature and environmental problems. Therefore the study endorses a holistic approach in its attempt to understand the environmental issues on the island by placing it in a wider region.

The main argument and the main motive of the thesis are represented in the third chapter. Firstly, the environmental policy structure in Cyprus is examined, especially the South Cyprus, the side of the island that has entered into the Union. Its strengths and weaknesses are explained. The second part of the chapter focuses the Europeanization of the environmental policy in Cyprus. The Europeanization period of Cyprus has been explained very briefly to have a general overview on the accession of Cyprus and the harmonization of the environmental legislation has been explained in detail to see the success of the island in adapting the environmental law. In the last part the strengths and weaknesses of the environmental structure of the Republic of Cyprus have been examined to make predictions and suggestions about the future Europeanization of the environmental policy.

The last chapter draws the conclusion which tries to shed light on the North-South dichotomy and the position of Cyprus under this framework. The chapter intends to draw insights from preceding chapters to reach a general conclusion.

## **Methodology**

The thesis is a descriptive study which relies on a case study of a particular country. Literature survey is used as the main method to analyze the topic. Interview has been used as a complementary method to examine the subject of the thesis because of the lack of written documents in English about the environmental policy and Europeanization in Cyprus.

It was difficult to find relevant information about the environmental policy in Cyprus because of the lack of necessary works (books and articles) on the subject. This thesis has been written with the help of sensitive environmentalists, bureaucrats and academicians, with their views, perspectives, predictions, recommendations, projects and reports, both in the North and South Cyprus.

While I was writing this thesis, my alternatives and possibilities to sources were limited. Therefore I hope this study will be a useful scientific instrument for all the new comers in this specific research area, who wish to study the environmental policy, Cyprus and the concept of 'Europeanization'.

## **1. EUROPEANIZATION AND THE E.U. ENVIRONMENTAL POLICY**

### **1.1. The E.U. Environmental Policy**

The concept of environmental policy refers to the preferences and targets of a certain country on the environment. Although objectives and preferences of environmental policies in each country differ to a great extent, there are some basic values and principles informing the environmental policies in every country. Living in a healthy environment; the protection and the development of environmental resources belonging to the societies; ensuring the social justice principles during the process of sharing the burden of implementing the environmental policies are the main targets that unite the countries under a single framework (Keleş and Hamamcı, 2005: p. 327).

Until the end of 1960s, none of the European countries had any distinct environmental policy. The student demonstrations in Germany and France in 1968, the United Nations Conference on Human Environment which was held in Stockholm in 1972, the 'Limits to Growth' report prepared by the Club of Rome have all warned the European public opinion on the subject of 'ecologic problems of the economic development' and led to questioning the hierarchy of values exalted by the public opinion.

In 1972, the heads of the states and the governments of the European Community met together in Paris summit. This summit was the starting point for the formation of a single European environmental policy to protect the environment. When we generalize with the Union standards, in a short period of time the Community has succeeded to endorse large number of concrete measures to protect the environment by the help of the public opinion and political will (Moussis, 2004: p. 338).

### **1.1.1. Evolution of the E.U. Environmental Policy**

Damage to the natural environment has been growing steadily worse in recent years. The quality of life has declined and the protection of the environment became a challenge for the Europeans. The environmental actions within the EU have been started in 1970s but there were difficulties to prevent the deterioration of the environment. Environmental policy within the EC has not had any strong impetus until 1980s. The years between 1980 and 1990 have brought remarkable changes into the history of environmental policy within the EU.

As the main aim of the establishment of the EEC was based on economic interests of the founding six members, during the first phase of this establishment, environmental policy area was not given its required impetus. European integration was driven primarily by a desire to promote economic cooperation and development during the period between 1957 and 1972. Priority was given to the development of a common market, common external tariffs and common policies on such issues as transport, agriculture and investment (Mc. Cormick, 2001: p.43).

In fact, it was obvious that those activities in concern were going to deteriorate the environmental resources. For example, transportation, which is essential for freight and travel, is the source of many environmental problems, like climate change. As the core objective of the establishment of the three European Communities (ECSC, Euratom, EEC) was economic integration, protecting the environment would diminish the member states' competitiveness with costly environmental measures. It is obvious that, material issues were more important than the qualitative issues during 1960s. So, it is true here to say that, free competition and the free movements of goods, services, people and capital were the prior goals during the first years of European integration.



#### **1.1.1.1. The Need for an Environmental Policy for the E.U.**

European countries share common environmental resources which can not be protected through the territories of the states. The North Sea for the Northern people and the Mediterranean Sea for the Southern people are common environmental heritages. In addition, rivers, seas and lakes, the wild life is common natural value for the Europeans. If one country tries to protect animals such as the migratory birds and the other one is not interested in doing so, the former country tries in vain. It was so difficult to cope with the common environmental problems merely by each individual member state. As a result, there was a need for a common policy to solve the common environmental problems.

Nonetheless, there are many factors that have made the formation of a single environmental policy within the EU inevitable. The most striking factor is the economic intentions of the E.U. Free competition and four freedoms of movement have made the formulation of a common environmental policy compulsory. Each member state was pursuing a different environmental policy, with different environmental structures with different environmental measures. This would have caused the products to be sold at different prices with different environmental structures (Candan, 2003: p.5).

In addition, before the formation of a single environmental policy, there were different environmental quality standards in each member state, such as necessary investments in some countries to protect the air or water. These standards could increase the production costs and thus could increase the prices. In other words, each country had different environmental measures to protect their environment against the pollution caused by the industrial sector. If one country implements these measures more strictly than the others, this would prevent the competitiveness of that country among the others. In that sense, a single environmental policy to be applied in all member states was seen necessary (Moussis, 2004: p.338).

Another factor that has led to the formation of an environmental policy within the E.U was the concern with the quality of living standards. The main aim of the European integration is to provide better living conditions to the people living in the

European territories. The quality of the life had to be improved by providing high environmental quality and sustainable natural living conditions and by developing these conditions (Candan, 2003: p.5).

A factor that is more global is about the discourse of; ‘Pollution knows no borders’. We cannot limit the source of pollution within a single city, country, region or a continent that causes certain environmental pollution, which really has an impact on the environmental resources throughout the world or throughout a certain region.

Moreover, global environmental problems such as climate change, deforestation and depletion of the ozone layer gained importance by the European publics and governments (Peterson and Bomberg, 1999: p. 174). They have realized that they cannot ignore these environmental problems which will effect the future generations of Europe regionally and the world globally. This fact has been realized more and more by the European governments, with the international conferences held during 1970s. Especially the United Nations Conference on the Human Environment held in Stockholm in 1972 brought a political focus for the new interest in environment. This conference has led to the recognition of the fact that global environmental problems need to be tackled not just locally but regionally or even internationally.

In addition to the Stockholm Conference, the United Nations Conference on the Environment and Development, the so-called Rio summit, was held in 1992. This had also brought the European Union to contribute to the solutions of global environmental problems. So, because of these and other international developments, the formulation of a strict environmental policy became compulsory in the minds of Europeans (Peterson, Bomberg: 1999 p. 175).

Consequently, the need for global solutions to global problems expanded the E.U.’s environmental policy beyond European borders. There are lots of other reasons that had led the European member states to form a single environmental policy. Beyond the global reasons, there had been lots of hazardous disasters within the Union. There was an economic boom after the Second World War, which brought with it environmental costs because of increased energy consumption, pollution and urban development into natural landscapes (Peterson, Bomberg, 1999: p. 173). Chernobyl

accident and Sandoz chemical spill into the Rhine in 1986 are important examples of industrial and nuclear accidents that happened within the Union, which had brought a question mark in the minds of the European public. There is a recent accident that happened in 1999, the wreck of the oil tanker Erika off the shores of Brittany, polluting 400 kilometres of beach and killing more than 60 000 sea birds. The last accidents underpin the formation of a single environmental policy in the minds of the people too, because people see how the environment is vulnerable (EC, 2002: p. 5).

### **1.1.1.2. Environmental Action Programs (EAPs)**

There are some programs that the EU environmental policy has been based on. There are Environmental Action Programs (EAP) that have been launched since 1973, for a defined specific period of time to maintain the targets and the actions of the EU on the environmental issues. They are multi-annual programs and a set of objectives stating key principles, identifying the priorities and describing the measures to be taken in different policy sectors related to the environment, but they are only guides to action and do not carry the same force of law as treaty articles or legislation. Action Programs are political declarations which reflect the conceptualization of the E.U. environmental policy.

On 19-20 October 1972 at Paris Summit, a declaration has called upon all the E.U. institutions to develop an action program on the environment by the end of July 1973. The first Environmental Action Program (EAP) was formed after a meeting of the ministers responsible for the environment in Bonn on 31 December 1972. Documents from the member states and opinions from the Commission, the European Parliament, the Economic and Social Committee, employers' and employees' organizations have helped to form the basis of the first EAP. The first EAP (1973-77) emphasized the importance of the living conditions, in other words, the quality of life issues in the member states, behind the mission of economic growth. Rather than simply addressing the environmental problems of the member states, the first EAP has highlighted the

living standards of the peoples of the E.U to obtain more legitimacy from the publics for being more considerable.

The second EAP, which was the continuation of the first one, covered the period between 1977 and 1982. The third EAP has covered the period between 1983 and 1987 and the fourth EAP has been prepared for the period between 1987 and 1992. All of them provided important indications of policy orientation and suggested more specific measures to be pursued. They all broadened the scope of political activity in environmental policy, thus developed the European thinking on environmental matters (Weale, Pridham, Cini, Konstadakopoulos and Flynn, 2003: p.58).

The first four EAPs have all emphasized the protection of the environment not for the prevention of the environmental deterioration but for the sake of the people living. This perception has changed with the fifth EAP. The 5<sup>th</sup> EAP, launched in 1993, can be regarded as the most important one emphasizing the application of the principle of sustainable development. The fifth EAP, titled as “Towards Sustainability”, has looked over the long lasting and far-reaching characteristics of the environmental damages, reflected in the Program with the stress on the sustainable development issue. The Program has focused on the prevention of the causes of the environmental pollution rather than the controlling of the pollution. This was a shift from the ‘prevention’ of the pollution to the ‘precaution’ for the causes of the pollution.

The 5th Program also established the principles of a European strategy of voluntary action for the period between 1992 and 2000, and marked the beginning of a “Horizontal” Community approach which would take account of all the causes of pollution (industry, energy, tourism, transport, agriculture). These are the five target sectors listed in the fifth EAP to be taken as a framework in establishing long term priorities, policy objectives and performance targets. So, the fifth EAP has changed the style of the environmental policy by dealing with the cooperation of key actors more than previous EAPs. The program was also distinguished from preceding programs in that it attached less importance to legislative measures in achieving environmental policy goals emphasizing the need to increase the efficiency of implementation measures (Weale, Pridham, Cini, Konstadakopoulos and Flynn, 2003: p.62).

The current 6<sup>th</sup> EAP, titled as “Our Future, Our Choice”, covers the period between 2000 and 2010. The program highlights four priority areas for the period. These are climate change, nature and bio-diversity, environment and health, and the management of natural resources and waste. Under the sub-title of climate change, it was emphasized to combat with the climate change through reducing green house gasses in accordance with the targets of the Kyoto Protocol. The Community should reduce 8% of its emission from 2008 to 2012 (to the level of 1990) and should reduce 20-40% of its emission until the end of 2020, in accordance with the targets set by the Kyoto Protocol. The community can reach these levels through achieving structural changes in certain sectors especially in the transportation and energy, through advanced research and technological developments.

In the 6<sup>th</sup> EAP, the protection and renewal of the structure and the functioning of the natural systems and the prevention of the loss of bio-diversity were emphasized under the sub-title of nature and bio-diversity. According to the EAP, the network of ‘NATURA 2000’ should be complemented to protect the species and their habitats which are under threat.

In the 6th Environmental Action Plan of the EU, the need for an integrated environmental policy was emphasized. The integration of environmental concerns into other policies is important to achieve the objectives of the EU environmental policy. Environmental policy is *sui generis* in these terms because no other policy area is required to be integrated with the other policy areas. The Commission confirmed the “across the board” approach to environmental policy in 1998, which integrates the environmental policy into other E.U. Policies. The Community institutions are now obliged to take account of environmental considerations in all other policies.

Not only specific environmental problems were emphasized, but also each EAP has indicated the way how to cope with them within the Union. In all of the EAPs, specific principles were emphasized to be applied in Europe to cope with these environmental problems properly, in a more systematic way.

### **1.1.2. The Principles of the E.U. Environmental Policy**

There are many principles from which the E.U. environmental policy takes its base during the process of decision making and while taking measures to protect the environment. The first principle was put forward in 1973 with the 1<sup>st</sup> EAP. As new EAPs and treaties were initiated and these treaties were amended, new principles were also put forward. The principles are the cornerstones of the EAPs and the treaties.

One of the main principles is the ‘polluter pays principle’ outlined in the 1<sup>st</sup> EAP thus being the oldest one. The principle requires the pollutants to pay the costs of pollution through combating, avoiding or reducing before the damage, danger or risk occurs. ‘The cost of preventing and eliminating nuisances must in principle be born by the polluter’ (Mc. Cormick, 2001: p. 77). As a result, the polluter takes the responsibility of bringing the environment back to the inhabitants after taking its advantage.

The ‘sustainable development’ principle is another principle which is crucial not only for the E.U. but also for the whole world. The principle has been promoted by WCED (World Commission on Environment and Development) in the report of ‘Our Common Future’<sup>1</sup> Conference in 1987. The principle was defined as ‘the development that meets the needs of the present without compromising the ability of future generations to meet their own needs’ (UNEP, 1987).

Apart from the Brundtland Report, the Rio Conference held in 1992 has raised the interest of the E.U. to the issue of sustainable development (UN Conference on Environment and Development). After the Gothenburg European Council which was held in 15-16 June 2001, it was stated in the presidency conclusion that sustainable

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<sup>1</sup> The Commission under the head of Gro Harlem Brundtland (Prime Minister of Norway during 1980s) has given the mission to prepare a report in 1983 to evaluate the critical environmental and development problems, and to find out solutions without compromising the needs of the future generations through applying sustainable development. (The General Committee of the UN has approved the establishment of the Commission and gave the mission to this Commission to prepare a report.)

development was an essential objective under the treaties and it requires global solutions.

Today, sustainable development is a fundamental principle in the member states, integrated into other policy areas not only for providing a healthy environment but also for prevention of unemployment and sustaining a well functioning economy.

The ‘Subsidiarity principle’ is an important one which emphasizes the need for decentralization and mainly argues that, possible action should be taken by the authority as close to the people it affects as possible. It is a principle that is more contentious one which has caused some discussions about the European integration since 1990s. It was stated as; ‘In areas which do not fall within the member states’ exclusive competence, the Community shall take action, in accordance with the principle of subsidiarity, only if and in so far as the objectives of the proposed action can be sufficiently achieved by the member states and can therefore, by reason of the scale or effects of the proposed action, be better achieved by the Community’ (Mc. Cormick, 2001: p.83). Consequently, the action should be taken by the E.U. when the member states cannot act alone, to coordinate the efforts of the member states. For example, air pollution, radiation or climate change need a higher level of coordination than acting individually.

The ‘international principle’ is an E.U. principle that does not carry any debatable or ambiguous objective. It states the need to cooperate with the third countries and international organizations. The EU has signed the Aarhus Convention<sup>2</sup> on Access to Information. Apart from the Aarhus Convention, other international treaties were also signed; Vienna Convention and Montreal Protocol for ozone, Biological Diversity, UNFCCC, Kyoto Protocol for Green House Gases.

The ‘precautionary principle’ is another principle that is vital for the E.U. environmental policy which is gaining more importance during recent years. Fullest possible scientific and risk evaluation should be made and all the related parties have to be informed about the results. Most of the measures for the protection of the ozone layer

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<sup>2</sup> The main targets of the Convention were public access to environmental information and providing participation in decision making. All the member states have signed the Convention and adopted implementing legislation. Correct implementation of the Aarhus Convention has become an essential part of the EU Environmental Policy.

and combating against climate change were inspired by the precautionary principle. Here the transparency of the decision is important to make it acceptable by the society.

Apart from these principles stated above, there are other principles which guide E.U environmental policy: ‘the safeguard principle’<sup>3</sup>, ‘the proportionality principle’<sup>4</sup>, ‘the proximity principle’<sup>5</sup> and ‘a high level of protection’<sup>6</sup>. These principles are all vital in the process of decision making and taking measures to protect the environment within the framework of the E.U. environmental policy.

Most of those principles are reiterated or firstly introduced in the Single European Act under a new title and some of them have strengthened or amended in the Maastricht Treaty, Treaty of Amsterdam or Nice. Now it is suitable to look at these treaties to understand the evolution of the EU Environmental law.

### **1.1.3. Evolution of the EU Environmental Law**

In the treaty of Rome in 1957, nothing was mentioned about the environment. Until the adoption of the Single European Act in 1987, environmental legislation passed under the Treaty’s internal market provisions or under the general catch-all provisions

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<sup>3</sup> The ‘safeguard principle’ supposes that; any product’s sale, that is produced and sold in the Union, can be banned or restricted to protect the environment or the human health, if it is thought to be dangerous or harmful. (Mc. Cormick, 2001, p.85)

<sup>4</sup> In accordance with this principle, the obligations of the E.U. must be reasonably related to the objectives sought and the E.U. must leave the member states with as much as freedom of movement as possible. (Mc. Cormick, 2001, p.84) Using directives rather than regulations in the process of decision making is an important example of this principle.

<sup>5</sup> The ‘proximity principle’ is stated as; ‘environmental damage should as a priority be rectified at source rather than further down the line’. (Mc. Cormick, 2001, p.78) An important example can be setting the emission standards to protect the air quality.

<sup>6</sup> ‘A high level of protection’ is a principle of the EU environmental policy, which is about the power of the Commission that should take high level of protection as a base in internal market proposals, which are related to health, safety, environmental protection and consumer protection. Its enforcement is almost impossible.



of Article 308, in which, such kind of a legal base is totally related to the objective of economic harmonization (Peterson, Bomberg, 1999: p.175).

The SEA added a special title on the environment to the previous treaties, so some of those principles mentioned above, gained their legal force. After the adoption of the SEA, it was possible to talk about a single EU environmental policy. The SEA set out three objectives (Article 130r);

- to preserve, protect and improve the quality of the environment;
- to contribute towards protecting human health;
- to ensure a prudent and rational utilization of natural resources.

(Mc. Cormick, 2001: p.303)

Also the principle of subsidiarity was expressed in the SEA, as the first time, the principle was reasserted in the Maastricht Treaty, too. This principle was very important on the basis of attaining environmental policy objectives that can take powerful justification for the EU to develop policies, as it was mentioned before (Peterson, Bomberg, 1999: p. 176).

With the Maastricht Treaty (Treaty on European Union, 1992), environmental policy gained its ‘policy’ status and its license to promote “measures at the international level to deal with regional or world wide environmental problems” (Peterson, Bomberg, 1999: p.176). The Maastricht treaty has also formally established the principle of sustainable development in the EU law.

The treaty of Amsterdam made the concept of sustainable development one of the important objectives of the EU. Under the treaty of Amsterdam the goal of promoting sustainable development was emphasized in a different way; ‘to promote economic and social progress for their peoples, taking into account the principle of sustainable development and within the context of the accomplishment of the internal market and of reinforced cohesion and environmental protection, and to implement policies ensuring that advances in economic integration are accompanied by parallel progress in other fields’ (Mc. Cormick, 2001, p. 308).

In the Treaty of Rome in 1957, nothing was stated about the environment. In the present text of the European Union Treaties, the basic provisions establishing the environmental policy are included. The basic provisions are Article 2, Article 3 (1), Article 6 and Article 174 (1) and (2). Some 200 pieces of legislation have been adopted by the EU to limit pollution the legal basis for EU environmental policy is Articles 174 to 176 of the Single European Act ([http://www.europarl.eu.int/factsheets/4\\_9\\_1\\_en.htm](http://www.europarl.eu.int/factsheets/4_9_1_en.htm)).

Article 2 states: “The Community shall have as its tasks (...) to promote throughout the Community a harmonious, balanced and sustainable development of economic activities (...), a high level of protection and improvement of the quantity of the environment.”

Article 3 (1) states: “For the purpose set out in Article 2, the activities of the Community shall include, as provided for in this treaty and in accordance with the time table set out therein: (...) (1) a policy in the sphere of environment (...).”

Article 6 states: “Environmental protection requirements must be integrated into the definition and implementation of the Community policies and activities referred to in Article 3, in particular with a view to promoting sustainable development.”

Article 174 (1) states: “Community policy on the environment shall contribute to pursuit of the following objectives:

- Preserving, protecting and improving the quality of the environment,
- Protecting human health,
- Prudent and rational utilization of natural resources,
- Promoting measures at international level to deal with regional or worldwide environmental problems.”

Another concern of the EU on the environment is the principle of ‘sustainable development’. With the Article 6 and Article 37 of the existing Charter on Fundamental Rights, the principle is incorporated into the EU Treaties. The Treaty of Amsterdam adopted the principle of sustainable development as one of the E.U. aims and makes a high degree of environmental protection one of its absolute priorities. Also, in the EU

Constitution that has not been ratified yet, sustainability is mentioned in Article 3 (3) of Part 1: “The Union shall work for the sustainable development of Europe, based on balanced economic growth, a social market economy, highly competitive and aiming at full employment and social progress, and with a high level of protection and improvement of the quality of the environment...”

The existing E.U. Charter of Fundamental Rights includes an Article 37 which says that: “A high level of environmental protection and the improvement of the quality of environment must be integrated into the policies of the Union and ensured in accordance with the principle of sustainable development.”

By the 1993, the scale and the pace of development had slowed down, harmonization had weakened, and enthusiasm for the European environmental projects became muted (Peterson, Bomberg, 1999: p. 177). So, we can say that the environmental policy field is more susceptible to changes in political and economic climate, than other sectors (Peterson, Bomberg, 1999: p. 177).

Apart from the primary rules<sup>7</sup> of the environmental law, there are secondary rules<sup>8</sup>. Directives are the main instruments of the secondary rule in the field of environment. Directives are binding on member states in terms of their goals and objectives but the member states are free to decide how best to achieve those goals. The implementation of these laws requires changes in national laws of the member states. The governments of the member states must tell the Commission what they plan to do to achieve the goals of a directive (Mc. Cormick, 2001: p. 72). In addition, member states prefer directives rather than regulations and decisions because the national governments are free to decide how best to achieve the goals. On the other hand, the bureaucrats do not prefer directives because they need transposition of a certain directive into national law. In that sense, the freedom in achieving the goals makes the process of transposition of the environmental law a more complex process.

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<sup>7</sup> The foundation of the EU legal order consists of the founding treaties (Paris 1951 and the two treaties of Rome of 1957) together with the changes made to them by the Merger Treaty of 1965, the Single European Act of 1986, the Treaty on European Union of 1992, the Treaty of Amsterdam of 1997 and the Treaty of Nice. (Mc. Cormick, 2001: p.71)

<sup>8</sup> Regulations, Directives and Decisions are secondary rules, using the general principles outlined in the treaties.

#### 1.1.4. EU Institutions and the Environment

As the environmental policy is in the first pillar<sup>9</sup> of the E.U., supranational actors are playing crucial role in the law making, implementing and in the jurisdiction of the environmental matters. These actors, which are the European Commission and Directorate General on Environment (DG ENV), European Parliament, European Council, Council of Ministers, the European Court of Justice (ECJ) and an independent agency, the European Environment Agency (EEA), are the main institutions of the E.U.

European Commission has a separate *Environment Directorate General (DG ENV)*. When environmental policy became more important in 1970s it was necessary to create the DG ENV. The mission of the DG ENV is to initiate new environmental legislation and to ensure that the member states are complying with the measures agreed in Brussels.

In addition to the general environmental policy objectives, DG ENV is responsible for various environmental issues and their separate strategies. For the *waste management*, the Community policy involves three complementary strategies; eliminating waste, encouraging recycling and reducing pollution. For the noise pollution, the strategy of the Community is to adopt maximum permissible levels for noise from certain types of machines and to reduce noise emissions at source, to stimulate exchanges of information, and to improve the consistency of programs to combat noise.

For the *water pollution* the strategy of the Community is based on the introduction of water quality standards for the drinking water, bathing water, water for fish farms and shellfish culture. It is also based on the emission limits for treatment of

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<sup>9</sup> The E.U. is composed of three pillars. The first pillar is the European Community, the second pillar is Common Foreign and Security Policy and the third pillar is Justice and Home Affairs. First pillar is supranational and the main actors are the European Institutions. The second and the third pillars are more inter-governmental, in which the main actors are the member states.

urban waste water, and measures to combat pollution from nitrates. Adoption of the framework directive for a policy on water seeks to promote sustainable use of water resources and to ensure the coherence of policy in this area.

The strategy of the Community on the *air pollution* issues are based on the legislation which aims to stop pollution caused by industrial activities and road vehicles through reducing emissions, fuel consumption and promoting clean vehicles. The aims of the strategy also include the reducing of the concentration of ozone in ambient air, fixing national ceilings for other atmospheric pollutants and limiting polluting emissions caused by large combustion plants.

On the *nature conservation*, the aim is to conserve the wildlife (birds, seals, whales) and natural habitats (woodlands and watercourses). The promotion of the biodiversity in the areas of natural resources, agriculture and fisheries is another fundamental step of the strategy for the nature conservation in the Community.

In addition, the *European Commission* is the Guardian of the Treaties. The European Commission performs a crucial role in the environmental governance. The main functions of the Commission are to set the agenda, to build the consensus and to initiate the legislation. Its functions are both administrative and political.

Another institution of the E.U. that has a crucial performance over the environmental governance is the *European Parliament* which is the defender of the environmental interests because the legislative power is in the hands of the European Parliament. The environmental groups that want to create impact on the European institutions perceive the environmentalists in the Parliament as a tool to make lobbying. Consequently the people outside the parliament can find a way to convey their voice in the preparation of the environmental legislation.

The *Council of Ministers* and the *European Council* have legislative power over the environmental matters too. The *European Court of Justice (ECJ)* is also one of the most important institutions of the European environmental governance. The Court affects the priorities of the environmental policy through controlling which policy is made and confirming the legality of the legislation.

The Commission has the power to take the member states to the European Court of Justice in Luxembourg to perform the function of prosecution. When there is an infringement, the Commission can propose the E.C.J. to impose penalty payments or fines to the member states. The Commission monitors the implementation of the member states whether they are respecting to the provisions of the Treaties, as a result of the complaints. Environment is a sector of the E.U. Law where large number of infringement cases is brought to the ECJ (European Court of Justice).

In addition to the DG ENV, a separate *European Environment Agency (EEA)* was created to gather information and to report the situation of the environmental issues into the EU member states. The agency has the function of disseminating and regularizing the production of environmental statistics and information. These statistics and information create regulatory effects through indicating implementation gaps and deficits. Thus they create pressure for action in the member states (Weale, Pridham, Cini, Konstadakopulos, Flynn, 2003: p.104). The EEA has no say on the European Union environment policy or legislation.

## **1.2. Europeanization**

Europeanization is not a new concept. The E.U. has been developing its institutions and policies for more than 40 years. Thus Europeanization cannot be explained as something static but should be seen as a dynamic process. It is a process rather than an end-state (Radaelli, 2004: p. 5). The concept of Europeanization is defined in various ways. In this study Europeanization is taken as a conceptual tool to examine the domestic impact of being an EU member and effects of this membership on environmental governance.

The European Union is widening through expanding its territories by various enlargement waves. The last enlargement took place in May 2004, with the accession of Central and Eastern European countries, Malta and Cyprus into the Union. A territorial

expansion is happening and this expansion is expressed by the term Europeanization, which is used to define the enlargement of the E.U. by extending its territories broader.

Apart from referring to the enlargement of the E.U., another understanding of the concept is the export of the contemporary governance and political organizations of Europe to the countries outside of Europe, which are not 'Europeans' (Olsen, 2002: p. 3). Most of the countries outside Europe are in an effort to become 'Europeanized'. This is especially true for their governance systems and their policy styles. The outsiders (non-Europeans) try to import the contemporary standards of the Europeans into their own systems. Democracy, rule of law, human rights are the fields where the diffusion of European values to the other countries has taken place and most of the outsiders have succeeded in doing so. Here the main concern is the export of ideas and the ways of doing things outside of the European borders.

The term Europeanization is also used to express the deepening of Europe which is to strengthen Europe from deep inside. Here the concept of Europeanization indicates the perception of creating a single and a politically powerful Europe. In one sense, this perspective implies the idea of 'United States of Europe'. Olsen defines this dimension of Europeanization as 'a political project aiming at a unified and politically stronger Europe' (Olsen, 2002: p. 3).

Nonetheless, Europeanization is not a theory but a set of theories. As Radaelli argues, the concept is seen as the 'orchestration of existing concepts and theories, with major theoretical import from comparative politics and theoretical policy analysis' (Radaelli, 2004: p.5). So we can say that Europeanization is an approach that gives us cumulative research in political sciences. On the other hand, Europeanization is a research area that does not give any precise explanation, but an approach to be explained. In Radaelli's words, 'Europeanization is an *explanandum* rather than *explanans*', which means that the concept is not a set of definitional aspects but a set of definition building aspects (Radaelli, 2004: p.6).

Europeanization is mainly the process of the adaptation of the member states to the E.U. policies. In other words, the approach deals with the domestic impact of the E.U. policies upon the member states. It can be claimed that, Europeanization is an

open-ended process of domestic change of the member states on the basis of Brussels based structure. On the other hand, this process is not uniform with various adaptation responses from different member states. Member states are trying to transpose, adapt and implement these Brussels based policies into their national policies. However the main concern is not only the adjustment of the national policies to the E.U. requirements but also to the set of E.U. rules forming these national policies.

Within this framework, as Ladrech argues, the term Europeanization refers to an “incremental process re-orienting the direction and shape of politics to the degree that EC political and economic dynamics become part of the organizational logic of national politics and policy-making” (Featherstone and Radaelli, 2003: p.30).

An illustrative definition of the concept of Europeanization has been put forward by Radaelli. In order to understand the concept more properly he has stated three features of the concept. Taking these features as a framework he defined Europeanization as:

“Europeanization consists of processes of a) construction, b) diffusion and c) institutionalization of formal and informal rules, procedures, policy paradigms, styles, ‘ways of doing things’ and shared beliefs and norms which are first defined and consolidated in the E.U. policy process and then incorporated in the logic of domestic (national and sub-national) discourse, political structures and public policies” (Radaelli, 2004: p.3).

According to the definition above there are three features of Europeanization. The first feature is the different stages of the policy process; construction, institutionalization and diffusion. The second feature is about the less tangible aspects, such as beliefs and norms in the process of Europeanization. The last one is about the impact of European policy within the member states that includes two steps; adoption at the E.U. level and then incorporation at the domestic level (Bulmer and Radaelli, 2004: p.3-4).

During the formation of the E.U. policies, some member states, which are the founding member states and the first-comers into the Union, have shaped the policies. They can be classified into two groups as ‘first-comers’ and ‘late-comers’. Some member states which are late-comers in the Union have taken these policies as a given. Another classification can also be made and the member states can be divided into two



as ‘policy-shapers’ and ‘policy-takers’. For example; Greece, Spain and Portugal can fall under the classifications of late-comers and policy-takers. Netherlands, Germany and Sweden fall under the classification of policy-makers and first-comers (Lieberink and Jordan, 2002: p.12).

In that sense, Europeanization can be regarded as starting with the process of ‘uploading’. In the policy-shaping stage of Europeanization, negotiations play a crucial role in uploading the domestic level decisions to the E.U. level policies. These decisions are in the form of either legally binding (regulation or directive) or a political declaration in the form of a soft law<sup>10</sup>, are the outcomes of these negotiation processes. Here it might be true to say that, the first stage of Europeanization, the process of uploading, derives from negotiations where the member states’ intentions are important. One state might have some priorities according to the issue in concern and be more influential than the others.

In the initial stage of Europeanization, the E.U. policies are under construction, as Radaelli also argued in his definition of Europeanization above. The member states’ ideas and priorities get converged in order to form a unique policy at the end of the negotiations. Here the impact of Europeanization can be observed in its greatest intensity (Bulmer and Radaelli, 2004: p.5). During these negotiations mutual learning and reciprocity is very important for the success of the policy in the future, such as using Open Method of Coordination (OMC)<sup>11</sup>. The lack of supranational powers and the crucial role of the member states in this stage bring about the horizontal model of Europeanization.

There is another stage of Europeanization which is the process of ‘downloading’. Member states implement, in other words download, the policy which has been agreed on the negotiations table. In order to download the E.U. policy to the

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<sup>10</sup> Soft law relates to rules of conduct that are not legally enforceable but none the less have a legal scope in that they guide the conduct of institutions, the member states and other policy participants (Bulmer and Radaelli, 2004: p.7).

<sup>11</sup> OMC is a method of learning for the convergence of ideas and policy transfer between member states. It is a means of spreading best practice and achieving convergence towards the E.U. goals.

national level, there should be a policy existing at the domestic level to be able to comply with the policy at the E.U. level.

This is positive integration<sup>12</sup> that renders the existence of a policy model compulsory. In addition to these, the member states have to ensure that the market correction facilities have been achieved. Otherwise, the Commission might bring the governments to the European Court of Justice, if they have not implemented the policy in accordance with the policy legislation. It is obvious that the market-correcting<sup>13</sup> rules are embedded in the process of downloading. The crucial role that the supranational institutions are playing in this stage puts forward the vertical model of Europeanization.

### **1.2.1. Europeanization as Domestic Change**

“Domestic adaptation with national colors...”  
(Liefferink and Jordan, 2002: p.3)

Europeanization refers to the domestic change in the public policies of the member states as an outcome of being a member of the E.U. Within this framework, there are difficulties to describe the term Europeanization precisely. It has different impacts in different countries and it does not have any static explanation, as the domestic changes taking place in the member states are in a dynamic process.

To start with, Europeanization is not simply a ‘convergence’. On the other hand, it is not a ‘divergence’. The term Europeanization has a contested meaning. It is related

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<sup>12</sup> Positive integration requires the introduction of an active, supranational policy. There is a need for national policy to comply with E.U. policy templates. The Commission has to ensure that legislation is properly implemented and it can refer laggard governments to the European Court of Justice, if necessary. When the EU legislation alters the domestic rules of the game, this is called ‘negative integration’. In the positive integration ‘goodness of fit’ and ‘misfit’ are very crucial in the adaptation processes of domestic and European arrangements. But in the negative integration such a problem does not exist (Bulmer and Radaelli, 2004).

<sup>13</sup> The E.U. governs hierarchically in two different ways. It can produce policies of positive integration that ‘correct’ the results of the market or it can engage in negative integration by striking down the barriers to the market (Radaelli, 2004: p. 12).

with European integration but does not carry exactly the same meaning. Europeanization includes the theories of integration, like liberal inter-governmentalism or supra-nationalism, in that it is related with the domestic impact of the process of European integration. Europeanization should not be confused with harmonization too because “Europeanization leaves the issue of diversity open” (Radaelli, 2003: p. 33).

European integration affects the domestic politics, policies and administrative structures. The EU may be able to change the parts of those national policies, but cannot take away the different fabrics altogether and replace them by one single ‘European Model’, as Liefferink and Jordan (2002) point out. Cowles further defines the concept as “institutional development and the accumulation of policy competences at the European level” (Liefferink and Jordan, 2002: p.1).

As Börzel argues, European integration theories are not sufficient to understand Europeanization because their main purpose is to explain the outcomes and the dynamics of Europeanization. They bypass the domestic effects of Europeanization (Börzel, 2000: p.143). Therefore, European integration should be seen as one of the factors of Europeanization. Other factors can be electoral shifts, domestic socio-economic change, cultural shifts, the globalization of culture and economy.

There are two definitions of the term “Europeanization” that can be used within this framework. The first definition is provided by Ioakimidis who states that, there are two kinds of Europeanization: intended and responsive. The intended one is taking place consciously to transform the policy systems by making them modern through being European and can be observed most commonly in the Southern member states, like Greece. The responsive one is taking place spontaneously as a result of pressures and penetrative impact of Europeanization. Ioakimidis’ explanation of Europeanization also summarizes the term as; “Europeanization is a process of internalization of environmental inputs by the political and societal systems of EU member states and it entails a steady redefinition of functions, relationships, boundaries, values and cultural traits, regulatory patterns that shape the internal dynamics of the political system” (Ioakimidis, 2001: p. 73).

The second definition belongs to Börzel, who describes Europeanization as a two way process. According to Börzel, there are ‘bottom-up’ and ‘top-down’ dimensions of Europeanization. The bottom-up dimension emphasizes the evolution of European institutions as a set of new norms, rules and practices, whereas the latter refers to the impact of these new institutions on political structures and processes of the member states (Börzel, 2002: p. 193).

The Southern member states are experiencing a ‘top-down’ dimension on the basis of the EU environmental policy, since all the issues in the environmental directives were uploaded by the first comers, like Germany. It can be claimed that, most priorities of the environmental policy are based on the environmental structures of the first comers, rather than the late comers. This shows us the reasons of ‘misfit’<sup>14</sup> and ‘infringement’<sup>15</sup> experienced by Southern member states. Before entering into the Union, most of them, like Greece, even did not have any environmental policy to try to upload them to the EU level.

When the ‘adaptational pressures’<sup>16</sup> are high in a member state, the risk of the ‘misfit’ is higher. Adaptational pressures are on the shoulders of domestic systems of governance in the member states, which are domestic institutions, institutional infrastructure of the government and the policy making structures in particular. Misfit arises between the supranational and domestic levels of governance (Paraskevopoulos, 2003: p.3). When the adaptational pressures are low in a member state, the possibility of the ‘goodness of fit’<sup>17</sup> is higher. Here the existing domestic policy structure plays a

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<sup>14</sup> The misfit argument appears when the domestic policies of the member states do not match/suit with the E.U. policies. The argument is directly proportional with the condition of adaptational pressure. Misfit is necessary but not a sufficient condition for Europeanization (Lieberink and Jordan, 2002: p. 5).

<sup>15</sup> When a certain rule or rules of a set of legislative requirements belonging to an E.U. policy is/are not obeyed/ adjusted by a member state, case of infringement appears. European Court of Justice (ECJ) takes necessary action against the member states’ infringement cases, when necessary.

<sup>16</sup> When there is high obligation on a member state in the process of adoption of the requirements of a certain E.U. policy, there is high adaptational pressure on the member state or vice versa.

<sup>17</sup> The goodness of fit argument, advanced by Risse, Cowles and Caporaso, assumes a clear, vertical, chain of command, in which E.U. policy descends from Brussels into the member states. It is valid under the presence of E.U. policy templates and models. It best applies to positive integration (Bulmer & Radaelli, 2004, p. 8).

crucial role. This has been witnessed in the transition of CEECs obviously (Cowles, Caporaso, Risse, 2001: p.2).

A contrary argument can be developed against the statement above, about the adaptational pressure. In spite of high adaptational pressure on the member states, some of them might see the adaptation to the policy rules that they have to comply with, as an opportunity to change their national policy to a more contemporary form of governance. Because of being so enthusiastic to adapt the policy, the member state can implement the E.U. policy without too many problems. Some member states may consider the policy adaptation period as a reform process and they can legitimize this process for public opinion through the E.U. policy. If a member state is under low adaptational pressure and is opposing an E.U. policy, the process of Europeanization of that policy will not be very successful (Bulmer & Radaelli, 2004: p.9).

Uploading states maximize their benefits and minimize their costs by uploading their national policies to the EU level. But here the problem of misfit may arise due to the member states downloading the EU policy. Those low regulating member states have faced strict standards imposed by high regulating member states. High regulating countries with a high level of socio-economic regulation, attempt to shape EU policies according to their strict domestic standards. As Liefferink and Jordan say, “in these states environmental policy objectives have traditionally been implemented through the setting of strong, source-based controls and the adoption of the best available technology” (Liefferink and Jordan, 2002: p.7). These states are mainly Sweden, Germany and Austria.

Low regulating countries are industrial late-comers and they oppose EU legislation because they lack the regulatory structures to implement them and it is too expensive to build up regulatory structures. It needs new administrative units and technologies to apply and enforce EU policies (Börzel, 2002: p.204).

It should not be forgotten that the national contexts differ throughout Europe. Historical developments have led to very different preferences for modes of policy-making and policies. Member states cope with European developments in the light of the different contexts, thus different adaptational pressures are experienced.

Here, it is worth to look at the member states' responses towards the process of Europeanization within the framework of their policy preferences and action capacities. Börzel categorized the member states into three groups as; pace-setters (pioneers, first-comers, leaders), foot-draggers (late-comers, laggards) and fence-sitters according to their capacities and will to up-load, implement and enforce the E.U. environmental policy.

It is argued that pace-setters are Finland, Netherlands, Denmark, Sweden, Germany and Austria. They are pushing policies to the EU level that shape the other member states' policy preferences and minimize their own implementation costs. Countries like Spain, Greece, Portugal, Ireland and the UK are mostly referred to as foot-draggers. They are blocking or delaying costly policies in order to prevent the implementation of the policies or to gain at least some compensation for their implementation costs. Fence-setters are Belgium, Luxembourg, Italy and France. They are neither shaping the policies nor trying to block them, but building tactical coalitions with both pace-setters and foot-draggers. These responses are all the reflections of the member states' capacities and preferences over the process of Europeanization (Börzel, 2003: p. 9).

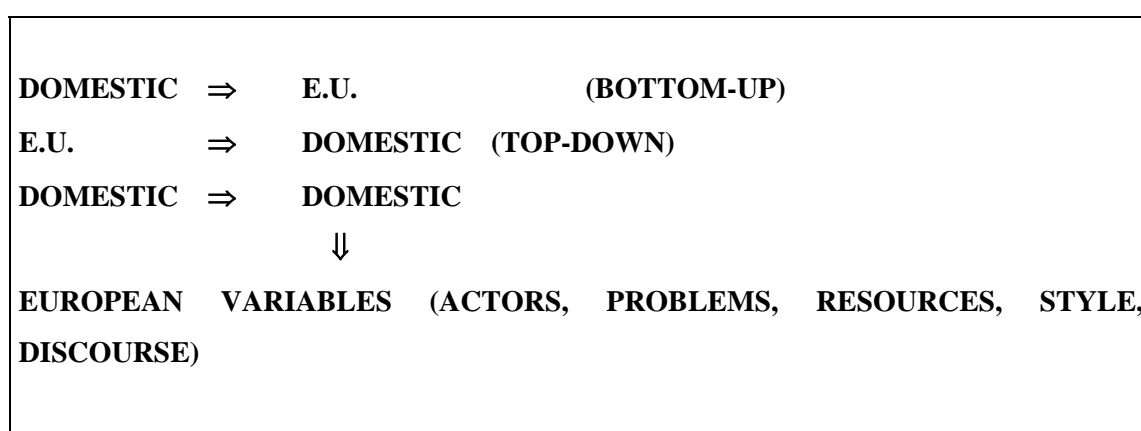
### **1.2.2. Europeanization of the National Environmental Policies**

According to Featherstone and Kazamias, Europeanization has three dimensions. The first one is 'the increase and expansion of institutionalization at the E.U. level'. The second dimension is 'the adjustment evident in the institutional setting at the level of member states, consequent on E.U. obligations'. The third dimension is 'the adjustment evident in states that are not E.U. members, but which are closely linked to it'. The focus of this study will be on the second dimension; 'the adjustment evident in the institutional setting at the level of member states, consequent on E.U. obligations'. (Featherstone and Kazamias, 2000: p. 6)

As indicated above, environmental policy is under the first pillar of the E.U. framework, so supranational bodies play the main role in decision making, execution

and judiciary. As our focus is on the second dimension of Europeanization, which was stated above, positive integration should be taken as a framework. Positive integration causes institutional change at home and the member states have to ensure that the market correction facilities have been achieved. Environmental policy, health and safety at work, consumer protection and some aspects of social policy fall under positive integration.

**Figure-1: Bottom-up and top-down Europeanization processes**



**Source: (Radaelli, 2004, Figure 2).**

The figure above shows the positive integration, top-down and bottom-up Europeanization. The mode of governance is hierarchical and the mechanism of Europeanization is vertical in the environmental policy sector. So, the member states practice uploading and downloading, or we can say ‘bottom-up’ and ‘top-down’ dimensions of Europeanization in the adaptation of the E.U. environmental policy.

It is shown in Figure 1 that; during the process of top-down and bottom up Europeanization different domains get Europeanized. These are: 1) the political structures (institutions, public administration, intergovernmental relations, legal structure); 2) structures of representation and cleavages (political parties, pressure groups, societal-cleavage structures), which are the domestic structures in the member states that get Europeanized. Public policy (actors, policy problems, style, instruments, resources); cognitive and normative structures (discourse, norms and values, political legitimacy, identities, state traditions, policy paradigms, frames, narratives) are the other

domains of Europeanization. These domains get ‘Europeanized’ with different levels at each member state (Radaelli, 2003: p. 35).

There are different policies in the E.U., as the environmental policy is one of them. For analyzing the concept of Europeanization, which is very contentious, environmental policy of the E.U. seems to be one of the most suitable policies to take as a case. Environmental policy of the EU is one of the most well developed areas of competence. The EU environmental policy has broken the walls around it and succeeded to form its own comprehensive policy area. Since the establishment of the EC, the main objective of the EU was to form an internal market. Regulations of the environmental policy, for instance, access to environmental information, the protection of the natural habitats and systems of environmental impact assessment were new to the European member states at that time. Environmental policy of the EU has thirty years past history, which has Europeanized the national environmental policies deeply and irreversibly (Liefverink and Jordan, 2002: p.5).

Member states have been developing their own environmental policies during the period when EU has started to develop its own policy. Thus, the policies of the member states and the EU are co-evolved. This makes the effects of the EU environmental policies on the member states national policies measurable. Many empirical works have already been conducted on the implementation of the EU environmental policy in national contexts.

During the process of Europeanization of the environmental policy, the change in the policy content<sup>18</sup> is higher than the change in the policy structure and style<sup>19</sup> (Liefverink and Jordan, 2002: p. 11). Each country has its own formal background composed of their approaches and procedures and it is hard to change these basic components than changing the legislation. “Basic building blocks of the state remain remarkably untouched” (Liefverink and Jordan, 2002: p. 11).

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<sup>18</sup> The Policy content is the subjects that are dealt during the policy making and implementing. These are the components that are variable and can easily change according to the agenda.

<sup>19</sup> Policy structure and the policy style can not change easily because of the formal background inherited from the past administrations of a certain country. Here the state based features are affecting the style and the structure of policy formation. The former regimes of the countries affect the structure and the style of a certain policy deeply. Fragmentation is the most seen outcome of the unchanged policy structure.



One of the most important reasons of this conservation of the national structures and styles is the directives. Directives are the main instruments of the E.U. environmental policy. “Directives specify the ends to be achieved but not the means of doing so” (Lieverinkk and Jordan, 2002: p.11). In other words, directives leave the ground to the member states how to achieve a particular pre-determined objective. As a result the legal system gets Europeanized but the system of how to carry out them stays almost the same at each European Union member state.

### **1.2.3. Europeanization: From Southern Europe to the Central and Eastern Europe**

Cyprus is a new country within the E.U. as a Southern member. Southern member states have experienced almost the same problems and processes of adaptation and their experiences are crucial for us to understand the situation in Cyprus. In addition to its Southern character, Cyprus has accessed into the Union with the Central and Eastern European Countries (CEECs) and with Malta in 2004. So it is also noteworthy to refer the experiences of the CEECs to be able to analyze the Europeanization process of Cyprus.

Southern Europe is not a homogeneous area, particularly Greece, Italy, Spain and Portugal, having similarities and differences in terms of social, political and economic structures. Each country has faced different problems in the past and still experiencing regarding the domestic structures they have. These countries have also experienced some kind of economic crisis during 1980s.

Southern member states also differ in their size, population and territory, as well as the length of period in the EU membership. They differ in their institutional arrangements with stronger and weaker executives, political parties and party systems, civil society organizations, level of decentralization and regionalization, modern and efficient bureaucracy.

Background of these countries on the basis of their regimes is the main aspect of the differentiation in their harmonization and implementation of the environmental *acquis*. European environmental rules exist and must be implemented in order to be able to benefit from them with or without the infringements and ‘misfits’ being experienced.

For example, Italy has been experiencing a long period of crisis of parties and the other three entered into the EU when they had entered into the way of democratic consolidation. It was the first years of transition from the authoritarian to the democratic regime when Spain and Portugal became EU members. They have considered Europe as a great opportunity for the progress of their economic and administrative structures, in other words, for ‘modernization’. Especially Portugal and Greece were pushed towards the EU because of the problems they have faced (Koutalakis, 2003: p. 4).

The Southern enlargement took place first with Greece in 1981 and then with Portugal and Spain in 1986. Their fundamental aim was to accelerate the democratic consolidation process and the economic progress too. Another motive that has forced them to enter into the Union was to regain their international reputation after the authoritarian regimes they have faced in the mid 1970s. Southern members were in an effort to overcome their isolation from the rest of the European world.

Greece, Portugal and Spain were slow in adjusting their domestic institutional framework to the requirements of the EU membership. There are infringement cases opened by the Commission against Southern member states in the areas of environment, agriculture and internal market (Koutalakis, 2002: p. 3).

The main motive for The Central and Eastern European Countries (CEECs) in the accession into the EU has been almost similar with the Southern member states. The three Southern members were economically in a similar position with the CEECs when they have first entered into the Union during 1980s. The most striking difference between the accession of the CEECs and Southern member states is the obligation of the CEECs to verify the implementation of the *acquis* before the accession. In previous accessions, the *acquis* was just a condition for accession. Now it is an obligation for the accession countries to transpose, implement and enforce various E.U. policy areas, in other words the *acquis*, before their full membership into the Union.

It is a challenge for the CEEC accession countries to implement the EU legislation and to comply with the laws; in particular the laws concerning the environment. Beyond the domestic institutional and administrative structures exposed to these countries, the implementation of the environmental *acquis* requires high costs. Effective implementation was emphasized as a result of the deficiencies in the institutional and administrative capacities of the countries. The same problem of the weak institutional and administrative capacities of the CEECs reminds the effects of Southern enlargement on the EU environmental policy (Koutalakis, 2003: p. 3).

Socio-political and administrative structures play crucial role in the adjustment to the requirements of European policies. Weak 'civic culture', fragmentation and ineffective coordination, lack of technical expertise, weak implementation capacities and ineffective monitoring and enforcement policy instruments; fragmented, reactive and party dominated legislative process are the main deficiencies inherent in the Southern member states that are foreseen (Koutalakis, 2003: p. 2).

The CEECs have some legacies that date back to the Communist period; for instance the weak civic culture, centralized administrative structure, lack of financial resources and technical expertise. These factors create the problem of compliance to the EU, in particular, to the EU environmental policy.

The weak macro-economic situation and weak domestic industrial base in productivity and competitiveness were challenging the protection of the environment. (Koutalakis, 2003: p. 4). During 1980s, the environmental policies in Southern member states were newly emerging and they lacked the experience of pro-active environmental policies, prior experience and sufficient resources. The lack of well-established structures of inter-ministerial cooperation hinders the long term integrated environmental planning in these countries. In addition, there are problems of vertical coordination and division of responsibilities between central, regional and local governments in the policy process.

Greece, Spain and Portugal have experienced various problems. In Greece, problems emerged from the weak coordination between sectoral ministries, in other words the problem of fragmentation (Koutalakis, 2003: p. 12). Cooperation between

different sectoral ministries was never institutionalized and there had been a hierarchical structure within these ministries. The limited capacities of sub-national actors in monitoring and enforcement of environmental legislation caused the implementation problems. In Spain, there is an ambiguous division of responsibilities in policy formulation and implementation between central and regional governments (Koutalakis, 2003: p. 12).

The poor compatibility between the specific environmental concerns of these countries with the EU policies is the main reason of the compliance problems in these countries. Patron-client relationships and the outcomes of the authoritarian regimes weaken the structure of the civil society in these member states, thus there is a weak social mobilization in Southern Europe than in Northern Europe (Koutalakis, 2002: p. 3). Despite the increasing number of environmental organizations and grassroots mobilization in the South, their impact on policy outcomes is suspicious.

It is obvious that the E.U governance is the most complex system in the world. In order to avoid the 'mismatch' between the national and the European governance systems, behind the proper adoption and implementation of the E.U *acquis* by the national governments, first of all the peoples of the member states should change their mentalities and their attitudes. Thus not only the governments, but the public is also responsible for any 'misfit' or infringement faced by the governments. All the institutions are composed of the peoples of the member states and they are the skeletons of the existing systems at each state. As a result, environmental policy of the E.U requires the awareness of the communities to provide the best adoption and implementation of the environmental *acquis* and the policy system.

In order to understand the Europeanization of the environmental policy in Cyprus under the pattern of being a Mediterranean member state, a similar Southern member state which has experienced the process through Europeanization, should be analyzed. The traditional structure of the Republic of Cyprus, in other words the Southern part of the island, is carrying the footprints of the Greek heritages. So it is worthy to look at the evolution of the environmental policy in Greece to evaluate the evolution of the environmental policy in Cyprus coherently.

Greek political system is highly centralized, with large number of small authorities, and a legislative framework, which creates great power at the center (Albert, 2003: p. 212). The role of the sub-national authorities was low in the development and the implementation of Greek environmental policy. Economic concerns always remained as the major policy concern in Greece. A new environmental policy was launched in early 1980s. Among the most important improvements about the environmental policy were the creation of the Ministry of Physical Planning, Housing and the Environment in 1980, the establishment of YPEHODE<sup>20</sup> in 1985, putting into force of the Framework Law in order to speed up EU adaptation process in 1986. Since 1990 Greece improved its formal implementation more than before.

During the process of harmonizing with the EU directives, there was lack of coherence, which was an important problem for Greece. There was a lack of strategic plans, because of the unwillingness of the people dealing with environmental problems to participate in those plans. This may be because of lack of knowledge or may be because of the things changing so easily, making such efforts meaningless.

Greece also has a fragmented structure of administration in environmental matters. This makes the ministry of environment less dominant. For example the Ministry of Merchant Marines covers the protection of marine environment, the Ministry of Health tests seawater quality and classifies beaches, the Ministry of Agriculture is responsible for protecting forests and monitoring rivers, the Ministry of Transport monitors car emissions (Albert, 2003: p. 209). Because of different branches, the ministry of environment has a limited power. Also, when a person applies for an environmental problem to the ministry of environment both the person and the problem have to wait the circulation of the petition from one branch to another, to be able to reach to a solution. This creates delay, unsuccessful implementation, waste of time and lack of clear division of labor.

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<sup>20</sup> In 1985, the physical planning and environment sectors were combined with the powerful Ministry of Public Works, which later became known as YPEHODE. Now YPEHODE is responsible for; coordinating various public and private agencies for environmental monitoring, protecting the atmosphere and controlling industrial emissions, imposing quality controls for recreational waters, overseeing the national parks (Albert, 2003: p. 209).

Also the EU programs had not enhanced the political or bureaucratic standing of YPEHODE (Albert, 2003: p. 211). The reasons for the ill-functioning environmental management are also the lack of strong infrastructural support and expertise. In spite of the establishment of the PERPA agency, incorporated into the ministry, there has been no other independent environmental agency. Only with the Framework Law of 1986, EFOP was established for bureaucratic power (Albert, 2003: p. 212). Greek sub-national administration is underdeveloped, because of the low level of coordination of the center-periphery structural type of Greece.

The turning point concerning the EU influence over the Greek environmental policy was the Single European Act that incorporated within the founding treaty of the community, and thus *de jure* in the Greek legislation (Botetzagias: 2001, p. 6). In addition, the environmental commission directives had to be incorporated environment in the Greek legislation

During the first half of the 1980s, the first years of membership, Greece was extremely slow in adopting the EC directives on the environment (Botetzagias: 2001: p. 6). Since the SEA came into force, legislative pressure on Greece has increased. So many infringement procedures were initiated against Greece, in the form of Letter of Formal Notice, Reasoned Opinion, Referral to the Court of Justice. Greece is also poor in the directive ratification process (Botetzagias, 2001: p. 9). Because of partial compliance, non-notification and poor application reasons, the transposition of community directives into national law can fail. It is surprising that, Greece has one of the best records for conformity of its national legislation with the requirements of Community Directives due to the incorporation of the text of directives usually word for word into national law (Botetzagias, 2001: p. 10).

The impact of the beneficial EC legislation on the Greek environmental protection during the 1980s was moderate. The most important directives were not ratified and those that were not ratified and those that did were largely poorly implemented. The impact of the EC membership on Greece was not entirely positive, when we consider environment, according to Botetzagias (2001).

There were also the Integrated Mediterranean Programs (IPMs), to compensate Greece, Italy and France, as a community fund. Prespa National Park is the most important adverse impact of this fund to Greece. The cohesion funds were introduced in 1992, and aimed to strengthen the economic and social cohesion of the EU member states, to make them able to comply with the Maastricht requirements (Botetzagias, 2001: p. 15). It has a distinctive environment category. Cohesion Fund had also provided financial assistance for the adoption of environmental directives from the EU to the Greek national law.

While the EU has been by far the most significant factor behind Greek environmental policy in the 1990s and more, its impact on policy principles has been largely superficial and policy style minimal (Botetzagias, 2001: p. 24).

So, the Europeanization of the Greek environmental policy can be understood as a top-down imposition of constraints from Brussels down to Athens. The EU is the prime force behind the environmental innovation and modernization in Greece, especially at the societal level (Botetzagias, 2001: p. 26). The similarities between the Europeanization of the Greek environmental policy and the Cypriot environmental policy will be evaluated in the forthcoming chapters.

## **2. CYPRUS AS A MEDITERRANEAN ISLAND**

Cyprus is a Mediterranean island. Besides its own environmental problems, Cyprus is facing the problems of Mediterranean region too. In this chapter, particularly the state of environment on the island and generally the geographic structure and the environmental problems of the Mediterranean region are examined. The chapter also aims to provide an overview of international policy responses to the problems facing the Mediterranean region. To meet this aim the chapter examines the measures taken at the UN level and policies developed by the EU. Since state of the environment on the island is largely affected by the environmental conditions of the Mediterranean Sea, it is important to look at the international policy measures to be able to evaluate their impact on the environmental quality on the island. Before the examination of the responses of the UN and the EU towards the environmental matters, fundamental environmental problems which are peculiar to the Mediterranean countries are dealt with.

It is obvious that the political instability in Cyprus has some negative effects on the solution of the environmental problems. Moreover, environmental problems are not considered as policy priority by the policy-makers on each side. Political parties do not pay sufficient attention to the environmental issues. They tend to use environment as an instrument for their election campaigns to get the vote from people who are sensitive to the environment. But once they come to power, environmental issues are generally from their policy agenda.

### **2.1. Environmental Problems of the Mediterranean Region**

Mediterranean region was the center of civilization of the ancient time. The exhaustion of the natural resources, land use activities and the deterioration of the environment have started thousands of years ago. Mediterranean region is covered by different countries with various kinds of ecological features such as climate, flora and



fauna, state structure, environmental problems and thus environmental policy. These factors increase the variety of the problems in the region, harden its solution and require collective action.

### **2.1.1. Geographic and Ecological Conditions of the Mediterranean Region**

The word 'Mediterranean' derives from two Latin words; 'medius' and 'terra' (Medius-terra) that means 'surrounded by land'. Mediterranean Sea is the largest semi-enclosed European sea that covers 0.7% of the seas and oceans in the world. It is so difficult to draw the lines of the Mediterranean basin. According to the UN, it can be drawn by taking into consideration four criteria: olive tree cultivation, climatological, hydro-graphical and socio-cultural criteria. Three continents and two oceans draw the walls of the island.

Mediterranean region starts from Gibraltar, of the West Mediterranean, continues to the coasts of Israel, Lebanon and Syria, of the East Mediterranean. There are five islands in the region: Cyprus, Crete, Sicily, Sardinia and Corsica. There are also rivers<sup>21</sup> flowing into the Mediterranean Sea.

Mediterranean region is very complex and ecologically sensitive with eighteen countries having coasts in the region. It is complex because of its ecological and geographical position and it is sensitive because of the problems arising from this position. Mediterranean region is unique with its geography, climate, population and culture. It's a 'complex of seas' in which it shows its uniqueness in this respect with its geographic structure (Sav, 2001: p.63). The facts that are mentioned above are the

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<sup>21</sup> Po River, Danube River, Rhone River, Jordan River, Nile River, Nile Delta, Tiber River, Tagus River and Ebro River. Four of them have large deltas; Ebro, Nile, Po and Rhone. Mediterranean Sea is in the middle of three continents which are Europe, Asia and Africa. The Ligurian, Tyrrhenian, Adriatic and Aegean seas are the smaller regional seas within the Mediterranean basin (Koçer, 1998, p. 28).

reasons of all the problems faced by the Mediterranean people. For example; its climate is unique in which it causes aridness, soil erosion, high evaporation, lots of epidemic diseases. Its population is high in capacity threatening the carrying capacity of the region.

### **2.1.2. Flora and Fauna**

There are various kinds of marine fauna within the basin, which is higher in number than the Atlantic Ocean. Unfortunately, the number of the species and their variety are declining because of the rapid sea pollution, wrong haunting and less shallow places within the sea for rapid reproduction of the marine fauna (Algan, 1995: p.40).

The Mediterranean region has a tropical weather. The region has extremely arid climate, which brings drought because of the destruction of water flows and groundwater natural water that affects the agricultural products and flora. This makes the soil less eligible to raise trees and forests (Sav, 2001: p. 65). Warm and dry climate causes soil erosion, fires and also air pollution. The Mediterranean region is characterized by hot summers and wet winters. In the summer time, there is dry period of varying severity and in the winter time there is violent irregular rainfall (Koçer, 1998: p. 27). Epidemic diseases also emerge with the hot weather.

The Mediterranean region has hosted many different civilizations since ancient times. These civilizations lasted thousands of years and this can explain the anthropocentric causes of environmental degradation in the region. For heating, construction and ship building most of the forests were destroyed. Now forests cover only 5% of the region. Then during 1960s, after World War two, Mediterranean region became more industrialized and urbanized, so the types of environmental problems have changed dramatically. In parallel with the high rate of urbanization, the need for jobs, housing, education, health and transport services increased. This threatens the carrying capacity of the region and loads high burden on natural resources. It is also the same for

the industrialization which carries the risk of deteriorating the environment and threatening the human health.

There are various kinds of species in the region. Numerous endemic species exist in the region; for example the variety of flora is approximately over 25.000. These plants carry medicinal and culinary properties. There are lots of 'typical' crops and plant species in the region, such as cypress, eucalyptus, fig tree, orange tree, tomato, aubergine (UN, 1992: p.6).

These species are under threat for many reasons. The most threatened species are the monk seals (*Monachus Monachus*). It is supposed that there are only 300– 500 monk seals all around the world. Monk seals prefer to live within the peaceful and desolate caves and hollows where the human beings cannot reach easily. It is a kind of mammal that has always been hunted for its skin and fat. Most of the monk seals are living in Algeria, Tunisia, Greece and Turkey. According to the MAP Action Plan, the seal's reproduction sites must be integrated with the Specially Protected Areas, in order to prevent possible damage by the tourists, fishermen and the local population (UN, 1992: p. 29).

The loggerhead turtle (*Caretta caretta*) and the green turtle (*Chelonia mydas*) nest in the Mediterranean, both species are recognized as threatened globally (Koçer, 1998: p. 32). Loggerhead turtles and green turtles nest mostly in the coasts of Turkey, Greece and Cyprus. About 30% of all green turtles nest on the coastline of North Cyprus, especially in Lara Beach. About 2000 female loggerhead turtles nest in the Mediterranean annually. These turtles are under risk because their habitats are threatened. They are mostly threatened by the effluents on the beaches. Their number has declined about 50% in the last fifteen years. (UN, 1992: p. 30)

There are nine species of whales and dolphins in the basin. Great dolphin (*Tursiops truncatus*) is seriously under threat. Migratory birds are also under threat because they can not find humid areas in the region.

### **2.1.3. Main sources of the Mediterranean environmental problems**

There are lots of reasons that deteriorate the environment in the Mediterranean region. They might be demographic, social, cultural and economic factors. It should be stressed here that, most of the problems experienced by the Mediterranean ecology are caused by anthropogenic sources.

The first, may be the major, source of environmental destruction in the region is the tourism industry. The Mediterranean has been the region in which the 35% of the world tourism activity takes place. Because the weather is too hot and there are large coasts in the Mediterranean region, people from all around the world prefer to come to the Mediterranean beaches and this has lots of negative impacts over the environment, despite its economic importance for the population living in the region. Agriculture is traditionally important for the Mediterranean economic prosperity but tourism has been the most important revenue for the countries. It is estimated that the population at the coastal zone will be doubled from 100 million to 200 million (Pridham, 1996: p. 45). Especially during the summer time, this number gets tripled with the tourists coming to the coasts. There are some negative outcomes of the tourism sector on demographic structure of the region. This is mainly because of the seasonal population growth (Pridham, 1996: p. 45).

The normal coastal population is 100 million but this increases to 200 million every summer. This increase in the number of the population living in the coastal zone pollutes the sea water. Main pollutants are the domestic wastes and sewage discharged into the water. The sewage discharged is mostly untreated or ill treated and that causes pollution. These pollutants are because of the lack of infrastructure.

As the number of the people increase, the carrying capacity of the coastal areas decreases accordingly. The water resources are scarce enough for the native people living there. The number of the animal and plant species is also under threat. High rate of need for housing, food, water and energy impairs the carrying capacity and the

existing infrastructure of the region. As a result, the ecological constraints in the region, makes the already existing resources insufficient for the people coming from abroad.

Another negative outcome of the seasonal population growth is the changing geographic settlement models in the region (Sav, 2001: p.66). Valuable natural structure and the landscape of the region destroyed because of the tourism sector. This seasonal mobility also results in rapid and unplanned urbanization in the coastal zones. As a result, immigration of native people from mountains, agricultural and fertile lands, to the coastal areas increases. This is one reason of rapid urbanization that is the consequence of pulling force of the more developed places from the less developed ones. So it is true to say that human activities have changed the natural balance in the region (Koçer, 1998: p. 35). When the negative outcomes of the tourism sector are correlated with the demographic structure, it is true to say that tourism is both an economic and a demographic factor effecting the environment of the Mediterranean.

Another factor influencing the environment of the Mediterranean is *transportation*. It is related with the economic factors because of being one of the active trade ways in the world. Mediterranean is a very short way for traders. Furthermore, the transport sector is important in the Mediterranean region with its petrol and gas sources. So, the burdens carried through the sea have shifted from traditional products to petrol and gas. As a negative outcome of this transportation process the petrol mixes with the sea water because of the tanker traffic. Suez and Gibraltar straits are used most commonly by the tankers carrying oil. Most of them are too old and their ballasting facilities are poor. They discharge their untreated or ill treated sewage and their residues into the water.

*Industry* is another factor deteriorating the environment in the Mediterranean region. Industrial pollution became a serious problem over the last thirty years within the region, mainly because of rapid and unplanned industrial development (Demiray, 1992: p.76). These are especially the Northern Mediterranean countries industrialized early in comparison with the Southern Mediterranean countries. These countries are mainly Spain, France and Italy. They discharge the heavy metals and other inorganic chemical wastes of such industries like chemicals, iron, steel, petrochemicals and refineries into the sea water (Pridham, 1996: p.46).

So, the most industrialized countries suffer from industrial pollution. In addition to the industrial pollution, the Southern countries also suffer from organic matter, detergents and nutrients of untreated municipal wastes. All of these countries, both the Southern and the Northern, face the problem of agricultural run off (pesticides, nutrients) and oil on the beaches (Haas, 1990: p.68).

## **2.2. International Responses to the Mediterranean Environmental Problems:**

The Mediterranean countries have realized that they have to get into cooperation with each other to be able to tackle with the environmental problems which are common to all of them. The UN and the EU are the main actors in the formulation of this cooperation. The Mediterranean Action Program under the authority of the UN and its components, the Barcelona Process under the authority of the EU have been studied in the next part of this chapter in order to see the cooperation among the Mediterranean countries and the outcome of this cooperation on the environment of Cyprus.

### **2.2.1. The UN Response to the Mediterranean Environmental Problems**

During 1950s and 1960s, the environmental cooperation in the Mediterranean region has been mainly on the marine pollution. It was recognized during the years of 70s that such kind of a perspective is a restrictive one because it was dealing only with the effects of the pollution rather than its reasons or sources (Pridham, 1996: p. 49). So, this approach has radically changed during the 1980s, with the growing attention of the development policies of the countries towards the common heritage of the region and the principle of sustainable development (Algan and Mengi, 2003: p. 96).

The idea of an integrated pollution control also became popular with the rise of the preventive policy making rather than curative one. By taking this idea as a basis, the 1<sup>st</sup> Mediterranean Intergovernmental Conference was held in 1975. In that conference, seventeen Mediterranean states and the EEC countries agreed to launch the Mediterranean Action Plan, under the auspices of the UNEP (United Nations Environment Program) (Pridham, 1996: p 50).

There is a long history of the UN on the issues related to the Mediterranean environmental problems. From 1975 until now, there have been many initiatives of the UN to provide a collective response to the environmental matters by all the Mediterranean countries.

The Mediterranean Action Plan (MAP) was initiated by the UNEP in 1975 as a response to the environmental threats which are emphasized in the Stockholm Conference. Sixteen of 18 Mediterranean coastal countries had come together in Barcelona, with the invitation of the UNEP, and adopted the Mediterranean Action Plan in 1975. A year later, three instruments were adopted: the Barcelona Convention, the Protocol for the Prevention of Pollution of the Mediterranean Sea by Dumping from Ships and Aircraft, and the Protocol concerning cooperation in Combating Pollution of the Mediterranean Sea by Oil and Other Harmful substances in case of emergency (UN, 1992: p. 12). EEC has also participated to the Barcelona Conference in 1976.

The Barcelona Convention is the ‘umbrella treaty’<sup>22</sup> (Scovazzi, 1999: p. 82) of the Mediterranean Action Plan with its protocols on different specific environmental aspects. The Barcelona Convention entered into force on 12 February 1978. In 1995, the Barcelona Convention was changed radically, with the motivation of the latest developments in the international arena; such as the Conference held in Rio de Janeiro under UNEP (United Nations Environmental Program) in 1992. Its existing protocols have improved and the new protocols were added to the Convention (Scovazzi, 1999: p. 82).

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<sup>22</sup> Barcelona Convention is the umbrella treaty of the Mediterranean Action Plan because it provides a concrete basis with its protocols and all the actions taken by the Plan rest on the Barcelona Convention.

The structure of the present Barcelona system has become rather complex. It includes the following instruments (Scovazzi, 1999: p. 82).

- Convention for the Protection of the Marine Environment and the Coastal Region of the Mediterranean, 1995.
- Protocol for the Prevention and Elimination of Pollution of the Mediterranean Sea by Dumping from Ships and Aircraft or Incineration at Sea, 1995.
- The Protocol concerning Cooperation in Combating Pollution of the Mediterranean Sea by Oil and Other Harmful Substances in Cases of Emergency.
- Protocol for the Protection of the Mediterranean Sea against Pollution from Land-based Sources and Activities, 1996.
- The Protection of the Mediterranean Sea against Pollution from Land-based Sources and Activities.
- The Protocol Concerning Pollution Resulting from Exploration and Exploitation of the Continental Shelf, the Seabed and its Subsoil.
- The Protocol on the Prevention of Pollution of the Mediterranean Sea by Trans-boundary Movements of Hazardous Wastes and Their Disposal.

The Mediterranean Action Plan has a legal framework and it is flexible to future changes and amendments (UN, 1992: p. 12). The Plan was composed of legal texts, so there was a need to put into practice all the principles and objectives included in the Plan. The most comprehensive part of the plan is MED POL that was launched by the ‘scientific evaluation’ component of the MAP. MED POL has the mission of monitoring and searching to provide the necessary information on the state of environment. According to the UN, ‘it is the largest effort of collection and analysis of data on pollution ever carried out at regional level.’ (UN, 1992: p. 13).

In order to be able to collect more data that are reliable and correct, the establishment of the MED POL was a necessity to help the laboratories in the Mediterranean countries. Now, each country has its ‘national marine pollution monitoring program’. There should be well equipped laboratories and developed manpower in order to provide the well functioning of this program, which creates disparities among the countries’ successes. There are pollution control measures



adopted by the Mediterranean countries which are the most tangible results of the MED POL (UN, 1992: p.22).<sup>23</sup>

There is also an Integrated Development Planning and Management Resources component of the action Plan. There are two programs of this component; the Blue Plan and the Priority Actions Program. The Blue plan was decided on in an intergovernmental meeting which was held in Sophia Antipolis in France, in 1977. The Blue plan mainly deals with how the sustainable development can be applied in the Mediterranean region. The Blue plan was completed as an “academic exercise” (Pridham, 1996: p. 50) which was not giving practical solutions to the problems in the Mediterranean, or not stating the urgent actions that should be taken but giving a general knowledge.

In order to put into practice the knowledge stated in the Blue Plan, there was a need for an ‘Action Program’. The Priority Actions Program (PAP) was launched in 1980, to provide practical solutions to the priority problems of the region, through technical cooperation and exchange of know-how, in Split, Dalmatia.

The MAP has four main components; The Prevention and Control Pollution, Special Protection Areas & Biological Diversity, Sustainable Management of the Coastal Areas and Complementing the Environment and Development. It is more comprehensible in the following scheme.

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<sup>23</sup> These measures are as follows: Interim Environmental Quality Criteria for Bathing Waters (1985) Interim Environmental Quality Criteria for Mercury (1985), Measures to Prevent Mercury Pollution (1987), Environmental Quality Criteria for Shellfish Waters (1987), Measures for Control of Pollution by Used Lubricating Oils (1989), Measures for Control of Pollution by Cadmium and Cadmium Compounds (1989), Organotin Compounds (1989), Organohalogen Compounds (1989), Organophosphorus Compounds (1991), Persistent Synthetic Compounds (1991), Radioactive Substances (1991), Pathogenic Microorganisms (1991)

Figure-2: Main Components of the MAP

1. The Prevention and Control of the Pollution	2. Special Protection Areas & Biological Diversity	3. Sustainable Management of the Coastal Areas	4. Complementing the Environment and Development
(MEDUNIT/MED POL, CP/RAC, REMPEC, ERS/RAC)	(SPA/RAC20)	(PAP/RAC, ERS/RAC)	(BP/RAC, ERS/RAC)

(Mengi, 2003, p 111)

The MAP has a unique institutional and administrative structure with its intergovernmental meetings which are held biannually. All countries prepare their biannual reports including their objectives and they submit the environmental issues that they want to tackle with. Another thing that has uniqueness in the structure of the MAP is the heterogeneity of the Mediterranean region ecologically, economically, culturally, politically and socially; which makes the coastal countries to pursue different objectives during the meetings. There is also a MAP Coordination Unit, established in 1981, to meet the secretariat services held by the UNEP.

There is a Regional Foundation Fund that was established in 1979, to finance the regional activities under the framework of the MAP. The Fund is committed by the member countries with a fee and the amount is decided by the UN budget system. There are donations too. This money is not used for the national activities held by each country.

The UN has begun to provide technical assistance to Cyprus since early 1960s which was done by the United Nations Expanded Program of Technical Assistance. The office of the UNDP has opened in 1966 with the aim of providing economic development in the sectors of agriculture, industry, fisheries and infrastructure in the whole island. After 1974 the activities of the office were limited only to the Southern part of the island. In the late 1970s the first inter-communal initiative was launched with a project aimed at controlling animal disease in the whole island. Then the Nicosia Master Plan was established by the UNDP with the help of the leaders of the both sides. In 1997 the UNDP office in Cyprus was formally closed (<http://www.undp-act.org>).

The Bi-communal Development Program (BDP) was launched in 1998. The main role of the BDP is to help the Greek Cypriots and the Turkish Cypriots to design and implement projects of common concerns. The BDP was funded by the United States Agency for International Development (USAID) with additional funding from the UNDP and the management support of the United Nations Office for Project Supports (UNOPS). The BDP has invested almost 67 US \$ into projects for bi-communal cooperation. It is also working over three hundred different Cypriot organizations and supporting two hundred and twenty projects (<http://www.undp-act.org>).

‘The UNDP worked with Cypriots to protect their shared environment and to restore buildings of important cultural significance for both communities. The result was co-operation between Cyprus’ two communities through the innovative use of traditional development tools. Greek Cypriots and Turkish Cypriots jointly empowered and strengthened the role of civil society across the island, created the space for meaningful dialogue and nurtured the environment for mutual understanding’ (<http://www.undp-act.org>).

### **2.2.2. The E.U. 's Response to the Mediterranean Environmental Problems-EUROMED**

With the accession of Greece, Spain and Portugal in 1980s, environmental problems of the Mediterranean region has become part of the EU environmental policy requiring to be tackled at the EU level and the EU has begun to focus on the Mediterranean environment region specifically (Pridham, 1996: p. 52).

The Euro-Mediterranean partnership is the most important institutional dimension both for the European Union and Mediterranean. The Euro-Mediterranean Partnership, which was launched at the 1995 Barcelona Conference, established an ambitious policy in the Mediterranean region with long-term objectives, the so-called Barcelona Process (EC, 2000: p.7). There are three main fields of activity within the Barcelona process: The political and security partnership, the economic and financial partnership, partnership in social, cultural and human affairs. Its partners are EU member states and 12 Mediterranean partners (Cyprus and Malta became member states in 2004). Barcelona process turned the Mediterranean policy into a coherent and global approach by striking a balance between different policy fields (EC, 2000: p. 8).

Environmental issues are under the second chapter called 'economic and financial partnership'. A Euro-Mediterranean free trade area is planned to be established until 2010 according to the process, consequently the environmental concerns are emphasized. One of the six priority fields of the Euro-Mediterranean meetings between 1995 and 2000 has been the 'environment'. This reflects the importance given to the environmental outcomes, caused by economic development.

Short and medium term priority action program (SMAP) has also been agreed. The main targets of the SMAP are to take precautions for the protection of the environment, to protect the bio-diversity, to support sustainable socio-economic development, to integrate the environmental policy with the other policy areas, to be in accordance with the other multilevel programs, to combat against desertification and deforestation, to contribute to the formation of the free trade area, to provide the mutual support of the environment and the trade. SMAP has also decided on some priority

action areas; integrated water management, waste management, hot spots, integrated coastal management and combating against desertification (Mengi and Algan, 2003: p. 136).

According to the decisions taken at the Barcelona Conference of 1995, the actions should be taken in these following fields: Integrated management of water, soil and coastal regions, waste management, prevention of air and marine pollution and to struggle against pollution in Mediterranean, management for the protection of natural heritage, natural beauty, transition of the experience from the community on *acquis* and environmental management, integration policy, regular dialogue for the monitoring of the action program, to consolidate regional and sub-regional coordination and to strengthen the coordination with the Mediterranean Action Plan (MAP), encouraging the investments taken by the various sources and the implementation of the related international contracts, preparation and implementation of the legal arrangements, when necessary (Mengi and Algan, 2003: p. 131, 132).

The most important financial tool of the Barcelona process is the MEDA (Mediterranean Economic Development Area) program. MEDA program is divided into two according to the periods it covers; the MEDA 1 which covers the period between 1995 and 1999, the MEDA 2 which covers the period between 2000 and 2006. MEDA has provided funds to three main areas of activity; political and security; economic and financial; social, cultural and humane. MEDA is an important tool for the EU to support the socio-economic reform process of their Mediterranean partners (Arakon, 2002: p. 5).

The mission of the program is to encourage economic progress and the development of competition, to strengthen the political and social reforms, and also to lessen the problems faced by these countries during this harmonization process. The funds can be transferred to three kinds of projects under bilateral and regional programs; the support for transfer transition to the free market economy, socio-economic development, democratization and strengthening of the NGOs. During the period between 1995 and 1999, the MEDA program has supplied 890 million Euros for funding, over the total budget of 3,475 million Euros of its own budget (Arakon, 2002: p.6).

One of the financial instruments for the environment is LIFE, which was launched in 1992. Now, it takes the 6<sup>th</sup> Environmental Action Program (from 2001 – 2010, Environment 2010: our future, our choice) as a basis, to finance the priority areas stated in it. LIFE finances the environmental initiatives in the EU member states and some third countries in the Mediterranean and the Baltic Seas and in Central and East European Countries (CEEC) (EC, 2004: p. 1).

LIFE has provided 400 million Euros in the first phase, between 1992 and 1995; allocated 450 million Euros in the second phase, between 1996 and 1999; and the current phase of LIFE has provided 640 million Euros, between 2000 and 2004.

Any project that corresponds to the priorities established at Community level and contributes to the objectives (implementation, development and enhancement of the Community environmental policy and legislation, integration of the environment into other EU policies); any project that is submitted by technically and financially sound participants; and any project that is feasible in terms of technical content, timetable and budget and offers good value for money can be financed by the LIFE program (EC, 2001: p. 7).

There are three thematic components of the LIFE: LIFE-Nature, LIFE-Environment, LIFE-Third countries. The objective of the LIFE-Nature is to provide the proper implementation of the legislation on the nature protection, such as the Birds Directive, Habitats Directive and “Natura 2000” (conservation of the most remarkable fauna and flora species and habitats).

There are contributions of the LIFE towards the important projects in many countries. For instance in Greece, the monk seals are protected by the financing of the LIFE; in Spain, the grasslands, wetlands, dunes, lagoons and coastal areas are protected, also the threatened species like brown bear, European black vulture, European mink, bats are protected by the LIFE Program as well (EC, 2004: p.1). LIFE-Environment tries to contribute to the development of innovative techniques and methods, by financing the demonstration projects. In addition, LIFE-Third countries aim to contribute to the Baltic, Mediterranean and CEE countries, to develop environmental policies and action programs, also to establish well functioning environmental sectors

(EC, 2004: p.4). In particular, Cyprus did not benefit from the EU pre-enlargement instruments for Central and Eastern Europe such as PHARE<sup>24</sup>, ISPA<sup>25</sup> and SAPARD<sup>26</sup>. Southern Cyprus has benefited from the “Third Country LIFE” program and from MEDA which are more modest than the others.

### 2.3. The State of the Environment in Cyprus

‘Although Cyprus and her people have been torn as under,  
they keep being united by the birds flying in the same sky.’

George Sfikas, 1992

Cyprus is the third largest island in the Mediterranean, after Sardinia and Sicily, and is located just outside the Gulf of Iskenderun, 40 miles south of Turkey and 65 miles west of Syria (Meikle, 1977: p.1). It has an area of 9.250 km<sup>2</sup> with the maximum length of 226 kms and its greatest width of 96 kms (Sfikas, 1992: p. 8). The island has numerous bays and headlands with its extremely irregular outline (Meikle, 1977: p.1). Cyprus is the only island at the crossroads of three continents Europe, Asia and Africa

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<sup>24</sup> The aim of the PHARE program is to provide economic aid to candidate CEEC. PHARE was aimed at only two countries: Hungary and Poland. The PHARE program is currently the EC’s main instrument of financial and technical cooperation with the candidate CEEC. It was set up in 1989 to support the process of reform and economic and political transition in Poland and Hungary. After Essen European Council (1994) PHARE became the financial instrument of the pre-accession strategy for the CEEC: Bulgaria, Czech Republic, Estonia, Latvia, Lithuania, Hungary, Poland, Romania, Slovakia and Slovenia.

<sup>25</sup> This is one of the instruments for structural policies for pre-accession, to provide financial assistance with a view to contributing to the preparation for accession to the EU of the applicant countries. Community assistance under the ISPA is granted for the period 2000-06. ISPA is limited to the programs for the environment and transport. In the field of environment, financial assistance is granted to environmental projects which enable the beneficiary countries to comply with the requirements of community environmental law and with the accession partnership.

<sup>26</sup> The aim of this program is to establish a Community framework for supporting sustainable agricultural and rural development in the CEEC, during the pre-accession period. In other words, its aim is to solve problems affecting the long-term adjustment of the agricultural sector and rural areas. Also the program helps the implementation of the Community *acquis* in the common agricultural policy and related policies.

in the Mediterranean region. Its climate is typically Mediterranean with its temperate weather, hot and dry summers and cool winters.

The mineral resources of Cyprus are copper, pyrites, asbestos, gypsum, timber, salt, marble, clay earth pigment. The island faces various environmental problems. The major environmental problems are; water resource problems (no natural reservoir catchments, seasonal disparity in rainfall, sea water intrusion to island's largest aquifer, increased salination in the north); water pollution from sewage and industrial wastes; coastal degradation; loss of wildlife habitats from urbanization are the most serious problems to name a few.

### **2.3.1. Ecology of Cyprus**

The first traces of human inhabitation on Cyprus originate from the 6<sup>th</sup> millennium B.C., at the time when the peoples of the countries bordering the East Mediterranean were successful in crossing the sea and establishing themselves on the various lands in that region (Sfikas, 1992: p.5). There were Eteo-cypriots (human inhabitants coming from Asia Minor and Middle East at that time) who had discovered the island's rich deposits of copper and started to do trade on copper (Sfikas, 1992: p.5). That is why the island had taken its name as 'Cyprus' from the word 'copper'.

Cyprus is very rich in terms of flora and fauna. Its environment is also sufficient for the human settlement. Cultural tourism, mass tourism and eco-tourism have some negative impacts on the environment. So, the activities for the protection of these areas should be taken into consideration more to save these flora and fauna.

There are approximately 1500 species of flowering plants and 75 endemic plants in Cyprus, with its diversified and rich flora, as a result of its climate and habitat. Cyprus is rich in marine species too. More than 250 different species of fish are known to live in the sea areas around Cyprus. *Carretta carretta* (loggerhead turtle), *Chelonia Mydas mydas* (green turtle) and *Holocentrum rubrum* (red soldier fish) are the well known marine species.



Millions of migratory birds from the cold north spend their winter months in Cyprus. Cyprus, situated to the North of the delta of river Nile, is in the middle of this great migration artery. The mild climate of Cyprus and the island's privilege of having two wetlands of unique and exceptional importance, namely Akrotiri and Larnaca salt lakes, all contribute to a proportionately high feathered population when compared to the size of the island.

The Cyprus Moufflon (wild sheep) or 'Agrino' is the most interesting of all animal species on the island. The Cyprus Moufflon that is the only endemic mammal of the island inhabits only in Cyprus. It is a forest living species, constituting small numbers in the less accessible parts of the Paphos forest, mainly in Stavros tis Psokas area. Though plentiful in the past all over the mountain and hilly areas of Cyprus, the number of moufflon has decreased in recent years and the species is now confined to the southern mountain range. Recently there are protection measures, so the number of moufflons has an increase.

### **2.3.2. Environmental Problems of Cyprus**

The environmental problems appear as the outcome of various human activities deteriorating the environmental values. To be able to put forward the features, reasons and the dimensions of the environmental problems, each environmental value should be examined one by one.

Mainly the environmental problems of the Northern part of the island has been dealt more in detail to emphasize the indivisibility of the island in this manner, through stressing on the environmental problems in this part. Both the North and South have problems almost the same environmental problems especially problems arising from tourism. In addition the environment can not be divided into two. It is impossible to divide the air into two as North and South. The same water flows from the Trodos Mountains into the streams existing in the Northern Cyprus. Therefore it was important

to study the common environmental problems as much as possible. It was also important to show that an environmental problem of the North is also a problem of the South too.

### **2.3.2.1. Air pollution**

The air is composed of the gases that form the atmosphere, which are %78.09 nitrogen, 20.95% oxygen, 0.93% argon, 0.03% carbon-dioxide and the others (Kocataş, 1994: p.425). Since the living organisms start to get deteriorated by the air very obviously through the air pollution, the air pollution can be defined as the rise in the pollutants that deteriorate the human beings and the other living organisms. In other terms, when the pollutants; in the forms of solid, liquid and gas, damage the human health and other living existences, air pollution appears (Beyaz, 2004: p.3).

The pollutants are salt, gas, smoke, smell and water steam in the atmosphere. These pollutants can be classified as the primary and the secondary pollutants. Primary pollutants are the ones that come directly from their sources and rise into the atmosphere. Secondary pollutants emerge from the chemical reactions taking place in the atmosphere.

One of the main sources of the air pollution is the urbanization within the whole world. Especially the burning techniques of the heating systems and the fuel quality are the main sources of the air pollution. Industrialization is also a source for air pollution. Failure in the land selection and the raising of the gases into the air, that are not technically measured enough, are the main reasons of the air pollution on the basis of transportation. Means of transportation, the vehicles, are causing air to get polluted too, especially the road ways create more harm than the railways. Also the airports and the airplanes cause harms.

The measurements of the air pollution have started in Cyprus, in 1996 with a mobile laboratory, donated by the UNDP to the department of Open Air Quality of the Environmental Protection Office, belonging to the Ministry of Economics and Tourism.

This mobile laboratory has been left for a long period of time. A bi-communal project within the framework of UNOPS and UNDP has financed the mobile laboratory for its repair and for the re-operation of the laboratory in 2001. While the laboratory was getting repaired, three engineers, belonging to the Environmental Protection Office, have been trained about how to sustain the measurement of this laboratory (Beyaz, 2004: p.6).

The quality of the air, although generally good by European and other standards, has to be safeguarded both from industry and the public, the spiralling number of motor vehicles and presence of localized hot spots of industrial pollution (MANRE, 1998: p.2).

### **2.3.2.2. Water Pollution**

Although Cyprus is an island there exists the problems of water scarcity and pollution. Its sea water is the main merit of the island that attracts people to come to Cyprus from different parts of the world.

The water pollution can be defined as; the change in the quality of water because of the human impact on the water, which limits totally or partially the usage of the water and demolishes the balances in the environment (Kocataş, 1994: p.435). In broader terms, water pollution refers to the deterioration of the ecological structure. In other words, it is the destruction of the quality of water through mixing biological or physical materials into the water (Keleş and Hamamcı, 2005: p. 116).

It is so difficult to classify the factors of the water pollution. The pollutants that cause water pollution can emerge through domestic wastes, industries, agricultural activities, transportation and nuclear power plants. These pollutants are organic materials, nutritious salts, micro-organisms, inorganic materials, untreated solid wastes, detergents, pesticides, heavy metals, radioactivity, oil-petrol and their derivatives and the churn of heat (Kocataş, 1994: p.435).

The outcomes of the water pollution are observable on both the living and non-living environment, like the air pollution. When the water wastes flow into the lakes, rivers, bays and small bays, the physical and chemical structure of the water changes. The water gets deoxygenized by the organic materials or by the hot water.

In Cyprus, as water resources are scarce, the demands for water are causing concern, as well as pressures on its quality, in some areas, from effluent and agrochemicals. In the coastal plain aquifers nitrate concentrations in some parts have increased due to agricultural and urban development. The principal groundwater quality problem is salinity due to over-pumping (MANRE, 1998: p. 2).

The main natural resource which has an important role in the development of Cyprus is water because the main sectors of development in Cyprus, which are agriculture, industry and tourism, are all heavily based on the water sources. The shortage of water, both for drinking and irrigation purposes, has always been one of Cyprus' biggest problems. For this reason, traditionally large fertile plains have been given over to cereal cultivation. The island's water resources are enriched through rainfall and snowfall which do not occur uniformly in all areas. While annual rainfall in Cyprus is low, evaporation is great and this is continually limiting the island's water resources (Paraskeviades, 1997: p.49).

The water resources can be classified as surface water and subterranean water. In Cyprus the main sources of surface water rivers, lakes and springs are fed and enriched by rainfall. In the whole Cyprus there are more than 300 springs and few of these are large or steady because most of them are seasonal, appearing with the winter rains and drying up during the dry summer months. The most important springs are the ones on the Troodos and Beşparmak mountain ranges that feed the rivers. The best known springs are at Kythrea, Lapithos, Karavas, Hartzi, Mesa Potamos and Farmakas.

There are no large rivers in Cyprus that flow all the year round. Most are torrents that flow during the rainy season and dry up a few days later. Because of the low rainfall and limited snowfall, and the small size of the island, rivers are small, narrow and shallow. Their water is limited and their level low. These rivers flow as torrents in

the winter and, after heavy rainfall, occasionally flood and carry away large quantities of pebbles and sediment from mountains to the plains (Paraskevaides, 1997: p.52).

In recent years the Republic of Cyprus' government has given great importance to the construction of dams on rivers in order to store water for irrigation purposes during the summer months and also enrichment of underground water sources. Huge sums have been invested in the construction of dams and as a result irrigated areas of land have increased by tens of thousands of hectares. The government was also led to adopting this policy because of increased water requirements, mainly for industrial, domestic and tourism purposes, as a result of the tremendous development observed in these sectors of the economy in recent years.

The first large dam built in Cyprus was that of Kouklia in Famagusta district in 1900. This earth dam had a capacity of 4.545.000 cubic metres of water. Subsequently, other smaller dams were built. In 1980, the total capacity of the dams of Cyprus was 65 million cubic metres, while by 1985 it has risen to 151 cubic metres. The largest dam in Cyprus stands on the Kouris river in the Limassol district. It was completed in 1988 and has a capacity of 115 million cubic metres and was constructed as part of the large southern conveyor water project. Water from this dam irrigates large areas of the coastal plain of Limassol and also provides a solution to the area's water shortage. It is taken to the 'Kokkinohoria' area of Famagusta district via a 150 km pipeline. A considerable number of the water development projects were undertaken after the Republic of Cyprus came into being in 1960.

The largest lakes in Cyprus are the salt lakes of Larnaca and Limassol. These two lakes are superb wetland habitats for many birds and plants, but mainly for migratory birds (Paraskeviades, 1997: 54). Another lake is Paralimni, a shallow basin which collects rainwater and that of small streams in the winter. For most of the year, the lake is without water.

The ground water sources are of great importance and value to the economy of Cyprus. In the dry summer months when there is no rainfall and the flow of the rivers stops, large agricultural areas are irrigated by pumped subterranean water. Moreover, the water supply to the towns and villages relies to a large extent on underground water.

The main water-bearing strata of the island are to be found in the Morphou district, the 'Kokkinohoria' region, the area of Akrotiri-Kourris, on the Central Mesaoria Plain and in the coastal plains (Paraskevaides, 1997: p.55).

According to the MANRE (Ministry of Agriculture, Natural Resources and the Environment), marine environment is of very good quality, but being of special importance to Cyprus, it requires the utmost care. The country is vulnerable to marine pollution accidents, owing to its position relative to oil transport routes and the increasing handling of oil in coastal installations. There are no industrial effluents discharged into sea apart from a number of wineries, the affected area restricted between Limassol's two harbours. Pollutants from non-point resources (agriculture, urban areas) occasionally cause problems of a temporary nature. Pollutants (nutrients, loading of organic matter), from aquaculture are also currently under investigation (MANRE, 1998: p.2).

### **2.3.2.3. Soil Pollution**

When the harmful waste materials that are left on the soil consciously or unconsciously deteriorate the soil, soil pollution appears. But this definition limits the causes of soil pollution because the only substances and the processes that demolish the quality of the soil are not only these wastes (Kocataş, 1994: p.449). Every kind of technical and ecological phenomenon and pressures are also considered as the pollutants that might lessen the fertility level of the soil and demolish the features of the soil. The sources of the soil degradation can be classified as follows ; erosion, industrial wastes, agricultural chemicals, failure in the irrigation of agricultural lands, failure of fertilisation, domestic wastes and lack of city planning.

In agricultural sector, soil erosion, use of weed killers and agrochemicals and the losses of prime agricultural land to the other uses, are some of the most important concerns, though the quality of the soils is good (MANRE, 1998: p.3).

In Cyprus, The annual per capita production of solid waste, estimated at 470 kg. / year for residential areas and 670 kg. / year for tourist areas (including commercial uses, hotels and restaurants), is quite high and has given rise to the emergence to a variety of associated problems (MANRE, 1998: p. 2).

A high rate of urbanization, which rose from 44% in 1974 to 68% in 1992, has mostly concentrated along the coast, the main Southern coastal cities having grown by an average of 2.7% annually. This increase, combined with the fact that 93% of tourist bed capacity is located along the coast, has led to heavy pressures on the coastal areas, exacerbated by infrastructure development and agricultural and industrial development. Conflicting and competitive demands for coastal space and pressure on scarce land resources in the areas adjoining the coast are manifested by the shrinking of agricultural land in favour of residential land, fragmented settlements and isolated buildings in the countryside, unconsolidated growth and rising land values (MANRE, 1998: p.1).

#### **2.3.2.4. Noise Pollution**

Urbanization, industrialization and technological developments are the main reasons of the noise pollution. If the noise is causing negative effects on the psychology and the physiology of the people there is a noise pollution.

In Cyprus, noise and congestion from intensive development pose growing environmental problems in built-up areas, the principal cause being traffic by various modes and noise from installations and machinery (MANRE, 1998: p.2).

#### **2.3.2.5. Stone and Dunes Quarries**

Mining and stone quarries business dates back to before B.C and constitute the basis of the construction sector in Cyprus. Stone quarries business is an inevitable working area which provides the needed materials to land roads, air and sea ports,

subdividing of building lands, etc. These facilities deteriorate the environment; affect the communal life and the tourism sector negatively in Cyprus (Taşocakları Komisyonu, 1999: p.2).

The materials used in the construction sector are supplied through the stone quarries, in which the methods used are deteriorating the environment. The policies and the legislation are insufficient to protect the environment against these destructions too. The sector that is mostly affected by the quarry is tourism because it creates visual dirtiness (Taşocakları Komisyonu, 1999: p.2).

The rock crusher foundation, that was established to transform limestone into 'agrega', are destructing the nature, deteriorating the environment and changing the geography of the mountains. In addition to the environmental destruction, the produced sand and pebble are dirty and less qualified too.

Stone quarries supervisory commission was formed to plan the stone quarries business in accordance with the community's needs. The commission has organized observation tours and investigated the subject in detail. The commission also prepared a report on 26.4.1999, intended to put the policies forward that should be adopted (Taşocakları Komisyonu, 1999: p.2)

Stone Quarries Commission Report was prepared in 1999, by sixteen representatives, from different institutions in the Northern part of Cyprus. These institutions are Health and Environment Ministry, Eastern Mediterranean University, Department of Geology and Mine, Department of Environmental Protection, Department of Tourism and Planning, Department of Forest, State Planning Organization, Department of Monuments. The report includes essentially the problems caused by the stone quarries and some proposals for its solution.

During 1970s, the fundamental size of the sands and pebbles were met by the sand-pebble quarries located on the coastal line of Güzelyurt (Morphou) region and by the stone quarries located on the Güngör-Değirmenlik region of Beşparmak Mountains. The quarries located on Güzelyurt region were closed because of the salination of the underground water resources and the insufficient quality of the 'agrega' supplied from the coastal line of Güzelyurt. Since 31.12.1990, all the need for 'agrega' has been



supplied through the sand-pebble quarries located on the Beşparmak Mountains (Taşocakları Komisyonu, 1999: p.3).

Nothing was planned and there was a lack of information during the transportation of the quarries to the Beşparmak Mountains which caused many environmental problems (Taşocakları Komisyonu, 1999: p.4).

### **2.3.2.6. Endangered Species and Loss of Biodiversity**

A great variety of wildlife habitats has been the main reason for the high endemism characterizing species in Cyprus and is subjected to pressures by urban, tourism development and public works (MANRE, 1998: p.2).

The ‘Marine Turtle Protection and Research Project’, initiated in 1992, in North Cyprus, continued in the year 2004 as well, with the cooperation of the Marine Turtle Research group from Wales Swansea University, the North Cyprus Turtle Protection Society, and the Department of Environmental Protection. The work has been conducted on all the beaches of the North Cyprus, as in previous years. This work has started on May 2004 and continued until September 2004.

### **2.3.2.7. Tourism**

There is a consensus within the Cypriot Community that is tourism should be the priority sector for the economic growth. Tourism is a sector that is based on the marketing of the local values of the country. These values are its nature, culture and the life style of the country that reflects its culture with its living environment. The basis of the sustainable tourism rests on the continuous and balanced usage of these resources.

Tourism which rests on the consumption of the resources is very limited because of the carrying capacity problem.

Tourism sector is heavily based on the coasts in Cyprus, so the quality of the sea water and the beaches can be the most important indicators. Noise; air pollution caused by traffic; forest fires; inefficiency of infrastructure; scattered, irregular and dense construction of the coastal areas, fruitful agricultural soil and susceptible areas are some of the factors that form the potential for tourism and the factors that effect the balance of the ecosystem too.

### **2.3.2.8. Electric Power Plant and its outcomes in Cyprus**

Tekneçik electric power plant is the most important energy source of the Northern Cyprus. The power plant meets the electricity need of the North Cyprus each year. During the establishment process; its possible negative impacts on the environment was discussed but these discussions did not continue to take any precautionary activity.

Within the observations held in the Tekneçik electric power plant; the burned spots on the leaves of the sensitive cultivated plants are typical SO<sub>2</sub> symptom. In addition, the turtles in Alagadi protection area are affected negatively from the Tekneçik. The hot sea water might cause migration of these turtles.

Because of the thermal power plant, the following environmental values might get destructed and polluted; natural flora, agricultural products, human health, pets and wild animals, settlements, historical places, soil, water-flows and landscape.

Except from the sulphur emission, the other pollutant parameters meet the limits of value. Because of the feature of the fuel used (S<sub>02</sub>), it is impossible to provide the limit of value. So, the Sulphur-dioxide should get reduced with the method of refinery or liquid fuel should be used which has less proportion of sulphur in order to provide the limits of values defined in the regulation.

SO<sub>2</sub> affects the flora with the wind, flowing directly towards the Southern region. The SO<sub>2</sub> gas and its concentration cause the massive death of the herbal and woody vegetation through a shock impact. In addition, SO<sub>2</sub> harms the chlorophyll structure of the pine trees; and also SO<sub>2</sub> destroys the respiratory systems of the trees. So, the trees can't produce nutriment. The SO<sub>2</sub> and NO that diffuse into the soil and combine with the underground water; harm the roots of the plants and destroy the nutrition and water transmission systems. As a result of this phenomena, forests die with massive shocks.

The degree of the sea water is getting increased between 4 and 6 centigrade; because of the cooling water flown into the sea because the sea water is used to cool the heat of the power plant. Parallel to the increase in the degree of water heat, O<sub>2</sub> reduces and algas increase. As a result of reduced oxygen; the fish migrate and they might die totally.

#### **2.3.2.9. Mining and its outcomes: CMC Case**

Cyprus has a very old past (BC 3000) on copper production and the name of the island originated from copper (Cuprum, Cyprium, Kypros, Kıbrıs). Metallic copper extraction is the first metallurgical process over the world which has been done in Cyprus according to the ancient mining objects (Necdet, 1997: p. 240).

The Cyprus Mining Corporation, which is an American company, has continued its mining activities from 1916 to 1975. A collapse happened in 1925 in one of the mines and six people died because of the lack of measures to ensure the environmental safety. In 1970s, the CMC was convinced to pay compensation to both farmers and fishermen to cover the losses caused by its mining operations. The CMC left Cyprus in 1974, leaving behind nuclear and chemical wastes. These wastes continue to cause a threat to the health and well-being of the inhabitants of communities around (Keleş, 2001: p.53).

Gemikonağı CMC wastes are firstly an international problem. This subject should be discussed in accordance with international laws. According to the law, the companies are responsible from the environmental pollution that they have created. The pollution created in Cyprus endangers the East and Middle Mediterranean countries such as Turkey, Israel, Egypt, Lebanon, Greece and Italy. Accumulation of heavy metals like arsenic and barium constitutes an important problem in East Mediterranean. The eco-balance of the East Mediterranean is very important. Agriculture in this area is in danger.

The basic environmental problems faced in the region can be summarized as follows; the situation of abandoned mine sites (Karadağ and Gemikonağı Region) and their environmental impacts; Gemikonağı dam-lake and its pollution; agricultural pollution; the situation of the abandoned C.M.C copper enrichment facilities and their environmental impacts (Atımtay, 2001: p.1).

Investigations have shown that, pollution in this area is much more severe than it is estimated. Another important subject here is long term effect of the heavy metals. Here environmental disaster is not only affecting the people living in the Lefke or Karadağ Region, but also the countries of the Eastern Mediterranean. Research results show that there is heavy metal pollution such as arsenic, barium, and cadmium in the East Mediterranean region (Atımtay, 2001: p.8).

Lefke is placed at the Northern foothill of the Troodos Mountains. Mining operations stopped in the beginning 1970s due to extraction of ore body mostly extracted. An ore body has been determined under Lefke town but has not yet been operated until now.

Cyprus Mines Corporation (C.M.C) has extracted 900 thousands tons of ore in this area in at the past. When the ore content of the ore body went down, mining cast shifted to more economical parts which are occurring in the southern Cyprus. At the end of 1974, C.M.C stopped its mining cast in this area and everything is abandoned until now. Contamination sources can be divided into four items (Feridun, 1999: p.111-124):

a) Remnants of the Gold extraction process by cyanide which are heaped in the entrance of Gemikonağı village. They are approximately 30,000 tons of mass and being evaluated in respect for the rare elements.

b) Residues of the ore extraction buildings, dumps and etc. After the copper extraction process, waste solutions rich with sulphure and other minerals were accumulating in the ponds. The contents of the residues that are known exactly are rich by iron, copper sulphate and other metallic salts.

c) Dumps are having 25-30% Sulphure with pyrite which located southern part of the area. The ore residues which contain 25-30% Sulphure of 1.5 million tons of amount accumulated in 4 ponds. When these residues reacted with oxygen and water then changing easily to iron salts, sulphuric acid and SO<sub>2</sub> easily. Iron salts and sulphuric acid are good solvents for the copper ores for extracting the copper metal.

d) In Lefke-Karadağ area; 2 million tons of low grade ore bearing 0.4% Cu and 8% S were heaped while the mining operations were going on and now stayed very near cathment zone of the Gemikonağı dam. Iron rich fragments are the residues of the crushing process which disseminated on the river beds. Both of them are sources of contamination.

Sulphide rich environments such as ore process, open pits, stock piles are easily reacted and converted to acidic environment and heavy mineral accumulation. Pyrite, chalcopyrite minerals are main contaminants in the environment. Acid drainage and heavy minerals accumulation are harmful for human health. Metallic concentration going up in the water causes toxic results.

Gemikonağı dam is located 2 km. west of Lefke which was built on Maden stream. The aim of this dam is to obstruct the floods and deriving over water of the stream to Güzelyurt groundwater basin.

Cyprus is located in semi arid climate belt so that groundwater is very limited and important for irrigational and domestic supply. Güzelyurt groundwater basin is the biggest aquifer in Cyprus. Over pumping of citrus growing caused very large deficits in water balance so that sea water intrusion and decreasing water levels began from 1960s in this area.

Three step projects have been applied to prevent this problem. At the first stage two regulators were built on Çamlıköy and Lefke streams at the beginning of 1980s. Gemikonağı dam which is the third leg of the project was completed in 1993. At the end of December 1993, no rainfall observed in this area and no problem occurred about heavy mineral contamination and acid drainage. When the rainfall began in January 1994, till March big amount of water accumulated in the dam. While the dam was accumulating the colour of the water has changed to azurite colour. This magnificent blue reminded people that it may have originated from the low grade copper heaps which are on the right catchment side of the dam (Necdet, 1997: p.245).

Maden stream is a very important water resource in this area and giving very good yields from the boreholes. The boreholes were sunk for the town supply on this river in the past. Elimination of the effects of acidic environment and heavy minerals contamination for the pumping wells two boreholes were sunk 500 m south of these effected wells in 1997. These boreholes are 1.5 km. away from the dam. These new wells have been pumping since 1998 February, and the results are positive.

Consequently, the most striking environmental problems of Cyprus are the C.M.C mining remains and the stone quarries. These problems are in the agenda of the most active departments and NGOs about the environment in Cyprus, especially in the Northern part.

### **3. EUROPEANIZATION OF THE ENVIRONMENTAL POLICY IN CYPRUS**

In this chapter the environmental policy, in particular the environmental administration and the harmonization of the environmental legislation during the accession of Cyprus into the EU have been examined. In order to understand the Europeanization of the environmental policy in Cyprus the environmental policy style, administrative structure and the process of legislative adaptation into the EU *acquis* should have to be examined.

The Northern part of the island has been kept out of the process of Europeanization because only the Southern part of the island has accessed into the EU. Although only the Southern part is in the process of Europeanization, the Northern part is also trying to adopt the same environmental principles without any commitment to the EU. As a result, the administrative structure and the institutional background of the both sides have been stated below but only the Greek Cypriot government has been discussed during the part related to the process of Europeanization of the environmental policy.

#### **3.1. Institutionalization of Environmental Policy in Cyprus**

Environmental policy in Cyprus has evolved after the establishment of the MANRE (Ministry of Agriculture, Natural Resources and Environment). The department of Environment Service under the MANRE has always been the focal point of the environmental policy in Cyprus for about 30 years. There are other departments which have been influential in the evolution of the environmental policy in Cyprus. During and after the accession process of Cyprus into the EU, environmental policy has begun to adapt and implement the EU environmental norms in a top-down manner, which can be seen as the other turning point of the environmental policy in Cyprus for its evolution.

In order to understand the environmental policy and the evolution of the environmental policy in Cyprus the relevant institutions that are playing a crucial role in the environmental field should be examined. The institutions that are playing the main role in the process of shaping and implementation of the environmental policy are defined and the functions that they have undertaken are investigated below. The administrative structures of the North and South Cyprus are examined separately.

These institutions that are going to be defined are; Council of Ministers, Ministry of Agriculture, Natural Resources and Environment (MANRE), Council for the Environment, Environment Committee, Planning Bureau, Ministry of Labor and Social Insurance (MLSI), Ministry of Commerce, Industry and Tourism, Ministry of Communications and Works, Ministry of Health, Ministry of Interior and Local Authorities.

### **3.1.1. Environmental Administration in the Southern Cyprus**

*Council of Ministers:* The Council of Ministers has the overall responsibility for the formulation of environmental policy, being the highest executive and policy-making body.

*Ministry of Agriculture, Natural Resources and Environment (MANRE):* Environmental policy is applied by the Council of Ministers through the Minister of Agriculture, Natural Resources and Environment, who is the Minister responsible for the control and co-ordination of the policies for the protection and preservation of the environment (excluding town and country planning issues, for which responsibility rests with the Minister of the Interior) (MANRE, 1998: p. 3).

The Environment Service of the MANRE, placed at the Permanent Secretary office, is mandated to advise on environmental policy and secure its implementation, coordinate the process for the adoption of the EU 's environmental policy and legislation, coordinate programs for the protection of the environment, head the technical committee on environmental impact assessments, oversees the enforcement of



the larger part of the Law on the Control of Water Pollution, promote environmental awareness and training, as well as to gather and disseminate information on the environment.

Through its various Departments<sup>27</sup>, (i.e. Water Development, Agriculture, Geological Survey, Mines and Quarries, Fisheries, Forestry, Agricultural Research, Veterinary Services, Meteorology, as well as the Natural Resources Information and Remote Sensing Center), the MANRE has a wide range of executive functions<sup>28</sup> on environment specific or related issues (MANRE, 1998: p. 3).

Inspectors from some of these agencies (i.e. Departments of Water Development, Agriculture, Geological Survey and Fisheries) have been appointed under the provisions of the Water Pollution Control law. In cooperation with relevant inspectors from the Environment Service and under the supervision of the Director of the Service, who is a Chief Inspector, they enforce those parts of the law for which the Ministry of Agriculture, Natural Resources and Environment is the competent authority.

It is the National Focal Point for the intergovernmental Organizations CSD, MCSD, MAP and UNEP, and for the following international Conventions: CITES for the International Trade of Endangered Species of Wild Flora and Fauna, the Bern Convention for the Protection of European Wildlife and Natural Habitats, the Barcelona Convention for the Protection of the Mediterranean Sea, the Basel Convention for the Transboundary Movement of Hazardous Waste, the Vienna Convention and the Montreal Protocol on Substances that Deplete the Ozone Layer, the Convention on

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<sup>27</sup> MANRE is composed of different departments. There are Water Development Department (WDD), the Geological Survey Department (GSD), the Department of Fishery and Marine Resources (DFMR), Department of Agriculture, Environment Service, Department of Forests, Department of Veterinary Service and Department of Mines and Quarries. Each of them has different responsibilities about the environment.

<sup>28</sup> The protection of the quality of surface and underground waters and the sea, management of water resources, aquaculture, climatology, genetic stock, protected areas, soil conservation, fertilizers and pesticides, reuse of treated effluent, hazardous waste management, mines and quarries, geomorphology, control/monitoring/ combating marine pollution, marine ecology and aquatic species and habitats, management of forests and public parks, herbaria and gene banks, water use, organic farming, monitoring water quality, protection of flora and fauna, genetic resources, agricultural and animal husbandry waste, industrial and domestic waste treatment, rehabilitation of sites, health and welfare of animals, etc.

Biological Diversity, the Convention against Desertification, the Climatic Change Convention, the Ramsar Convention for the Protection of Wetlands, the Convention on Environmental Impact Assessment in a Trans-boundary Context, as well as the Aarhus Convention for Access to Information by the Public (MANRE, 1998: p. 4).

*Council for the Environment:* This Council is chaired by the Minister of Agriculture, Natural Resources and Environment, and consists of members representing governmental and quasi-governmental agencies, NGOs, the business and technical sectors and local government. The Council advises the Minister and, through him, the Council of Ministers, on issues relating to the environment, such as serious environmental problems or proposals for environmental legislation. It also makes recommendations on environmental policy and its mandate has been expanded to also act as a forum on sustainable development (MANRE, 1998: p. 4).

*Environment Committee:* The Committee is chaired by the Permanent Secretary of the MANRE, and its members are representatives from the Ministries of Interior, Labor and Social Insurance, Commerce, Industry and Tourism, Communications and Works, Health, and Education and Culture, the Planning Bureau, the Cyprus Tourism Organization and the Department of Town Planning and Housing. The Committee reviews environmental programs, further refines the objectives of environmental policy approved by the Council of Ministers and acts as a broader environmental policy coordinator among Ministries (MANRE, 1998: p. 5).

A number of authorities from other Ministries also have executive responsibilities over various sectoral environmental issues, a brief summary of which follows.

*Planning Bureau:* Planning Bureau of the Ministry of Finance has a specific role in the accession process of Cyprus. It is responsible for ensuring the targets of the accession process too. The Bureau has access to harmonization budget for technical assistance (experts, studies, training) and infrastructure investments. It is the economic and administrative arm of the Government and its main responsibility is the achievement of economic and social development. The Bureau is in charge of the preparation of five-year Development Plans for the national, regional, sectoral and

balanced development of the island's economy and the Annual Development Budget and supervises their implementation and coordination. It has the broader responsibility for the internal co-ordination of Cyprus - EU negotiations. The Bureau advises the Ministry of Finance on future needs for staff and resources within the departments and agencies of the government (MANRE, 1998: p. 5).

*Ministry of Labor and Social Insurance (MLSI):* The MLSI has the primary responsibility for industry, 'inside the factory gate'. It is composed of issues of environment, safety, health and dangerous substances (i.e. asbestos). The MLSI, through the Factory Inspectorate of the Labor Department, is the competent authority for the administration and enforcement of the Atmospheric Pollution Control law, the Safety and Health at Work Law and the Asbestos (Safety and Health of Persons at Work) Law. It also administers part of the Water Pollution Control Law and chairs the Technical Committees for the Protection of the Environment established under the above laws. The Ministry of Labor and Social Insurance is a member of the 1979 Geneva Convention on Long-range Trans-boundary Air Pollution and its EMEP Protocol and, jointly with the Department of Agriculture, Focal Point for the Intergovernmental Forum on Chemical Safety (MANRE, 1998: p. 5).

*Ministry of Commerce, Industry and Tourism:* The Ministry is the sponsoring department for industry and is responsible for energy. This Ministry deals with industrial estates, energy conservation and exploitation of new and renewable sources of energy, industrial pollution prevention techniques and the management of a grants scheme which assists manufacturing industries in installing waste treatment systems.

The Ministry's Cyprus Standards and Quality Control Organization deals with standards and quality assurance, the Technology Foundation promotes the enhancement of research and technology improvements in the Cyprus industry, whereas the Cyprus Tourism Organization promotes agro-tourism and is the coordinator of the BLUE FLAGS scheme in Cyprus (MANRE, 1998: p. 5).

*Ministry of Communications and Works:* Its Public Works Department is responsible for coastal defense, the Civil Aviation Department implements the International Civil Aviation Organization's standards, including noise from aircraft, and

the Merchant Shipping Department enforces relevant laws, regulations and international conventions ratified by Cyprus. The Road Transport Department is responsible for motor vehicles inspection, the Department of Electromechanical Services has been assigned the responsibility to act as the Type Approval Authority for vehicles, and the Cyprus Ports Authority handles oily waters and refuses from ships in port areas (MANRE, 1998: p.6).

*Ministry of Health:* Through its Department of Medical and Public Health Services, the Ministry inspects landfills, drainage systems, and animal husbandry premises for public health issues, and it is responsible for the control of drinking water and the microbiological monitoring of recreational waters. The State General Laboratory, in cooperation with other Departments, carries out research and analytical work on various aspects of pollution and has specialized laboratories in environmental chemistry, microbiology and virology, eco-toxicology and risk assessment (MANRE, 1998: p. 6).

*Ministry of Interior:* The Minister of Interior is responsible for the implementation of the Town and Country Planning Law, and the Town Planning Board has responsibility to oversee the operation of this law. The Department of Town Planning and Housing is responsible for town and country planning issues, including the planning, regulation and control of development, preparation of planning studies and countryside and town policies and plans, and the settlement and housing of refugees. Powers for development control have also been assigned to the larger municipalities. The Game Fund is in charge of the enforcement of the Game and Wild Birds Law, which regulates hunting and game improvement (MANRE, 1998: p. 6).

MoI is responsible for policy and legislation and acts as the planning authority outside the four main conurbations of Nicosia, Larnaca, Limasol and Paphos. It is responsible for imposing environmental conditions through the planning permit and participates in the EIA Technical committee.

*Local Authorities:* Local authorities include municipalities and communities. They only have a limited role in environmental issues, except the Metropolitan Sewage Boards in key urban areas. There are 24 municipalities and 352 communities in Cyprus.

Under the Municipalities Law, they are responsible for a number of environmental services; water supply, sewerage and wastewater treatment, rainwater drainage, street cleaning, refuse collection and disposal. Neither the Municipalities nor the Communities have the financial resources or the staff to discharge their environmental responsibilities effectively. The local authorities face with the shortage of environmental resources. The infrastructure investments are generally held by the central government (for instance, MANRE) rather than the local governments, despite their wide-ranging roles and responsibilities.

Currently, the central orientation of the environmental management system is to safeguard inter-ministerial coordination and cooperation, policy integration and strengthen existing structures.

**Water:** The Water Development Department of MANRE is responsible for most aspects of the implementation of water policy and the management of water resources. The Department is responsible for the mapping of the water resources (hydrological and hydro-geological data). The department plans, designs, constructs and operates the water supply infrastructure, sewerage and waste water treatment, including the domestic water supply and irrigation systems). It also monitors the water resources (quality and quantity). Other departments<sup>29</sup> of MANRE have responsibilities on the water issues too.

Municipalities are responsible for water supply, sewerage and waste water treatment and rain water drainage. Municipal Sewage Boards are separate entities linked

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<sup>29</sup> The Geological Survey Department of MANRE is responsible for mineral and groundwater exploration and hydro-geological data. The impact of pollution on groundwater, land-filling and geotechnical investigations, programs on the monitoring of nitrates and PCB decontamination are all main environmental roles of the GSD. The Department of Fisheries and Marine Resources of MANRE is responsible for controlling and combating marine pollution and for monitoring water quality dams. The Public Health Service of the MoH has also a responsibility for the monitoring of drinking water quality and other environment related aspects of public health including the monitoring of sea water and swimming pools.

to the municipalities through which the major municipalities discharge their responsibilities for waste water collection, treatment and disposal.

*Permitting:* Environment Service of the MANRE and Water Development Department are responsible for the general and urban waste water. The Department of Agriculture of the MANRE is responsible for the agricultural pollution. Public Health Service of the MoH is responsible for the drinking water, bathing water and ground waters. Department of Fisheries and Marine Resources of MANRE is responsible for the Fisheries waters.

*Monitoring:* Public Health Service and State General Laboratory of the MoH are responsible for the water quality and drinking water. Environment Service and Water Development Department of the MANRE are responsible from the urban waste water. Water Development Department, Environment Service and Department of Agriculture of the MANRE are responsible from the agricultural pollution. Department of Fisheries and Marine Resources of the MANRE are responsible from the fisheries waters.

*Inspection and Enforcement:* Water Development Department and Environment Service play stronger role in the inspection and enforcement than the other departments.

**Waste management:** Environment Service of the MANRE is the competent authority for the most aspects of waste management. Town Planning and Housing Department of the MoI is responsible for structural planning aspects. The department shares the responsibility of EIA with the Environment Service. The Department of Labor Inspectorate of MLSI is responsible for many aspects of operation. MCIT is responsible for industrial operations such as battery recycling and packaging waste. Public Health Service and State General Laboratory of the MoH play a limited role. The responsibilities of individual organizations cover permitting, monitoring and inspection/enforcement. Municipalities have some responsibilities, as well.

**Air:** Department of Labor Inspection of the MSLI is responsible from the permitting, monitoring and inspection/ enforcement on air issues. State General Laboratory of the MoH plays role in the monitoring too. The MCIT is responsible for refinery operations and fuels.

**Industrial Pollution Control:** Department of Labor Inspectorate of the MSLI has primary responsibility for many environmental issues related to industrial pollution control across permitting. The Ministry of Commerce, Industry and Tourism (MCIT) is responsible for industrial development and energy issues, including industrial pollution prevention. The Cyprus Electricity Authority (CEA), the state-owned power-generation utility, has some responsibilities related to demand-side management and CO<sub>2</sub> reduction targets from its plants.

**Nature protection:** The Department of Forests (DoF) of the MANRE is responsible for the management and exploitation of state forests (19% of the area of Cyprus) and can declare nature reserves and national forest parks within those forests. The DoF also assesses the impacts of atmospheric pollution on the forests. The MoI's Game Fund is responsible for the enforcement of the Game and Wild Birds Law and for the regulation of hunting. Environment Service of the MANRE has a role in relation to international conventions such as CITES.

### **3.1.2. Environmental Administration in the Northern Cyprus**

Although the Northern part of the island is not under the process of Europeanization because of staying out of the EU, related institutions carry the function of protecting the environment and try to adapt the EU environmental norms to reach the contemporary environmental standards, as in the Southern part. The institutions which are playing the main role in the environmental matters may show a framework to have a general perspective about the situation of the environmental governance in Cyprus. The institutional framework for environmental policy formulation and implementation is characterized by the following elements in the Northern part of the island. The institutions that are going to be defined are; Council of Ministers, Department of Environmental Protection, State Planning Organization, Department of Monuments and Museums and Local Authorities.

*Council of Ministers:* At the highest level of the environmental administration of the Northern Cyprus, there is Council of Ministers. Council of Ministers has the highest responsibility with the power of determination and administration of the environmental policies (DPÖ, 2005: p. 11).

*Department of Environmental Protection:* The department of environmental protection was established in 1989 and started its activities with the enforcement of the environmental law 9/1990. It is responsible for determine the basic policies about the environmental issues and to provide the coordination and cooperation among the institutions related with the environment.

The department of environmental protection is an institution that receives its competence from the environmental law 21/97 in which it provides the implementation of the determined environmental policies. The department is mandated with a wide range of responsibilities; air pollution, waste management, protection of the natural life, industrial pollution and risk assessment, noise, protection of the water areas, coordination, preparation and implementation of the programs towards the protection of the environment, Environmental Impact Assessment (EIA), increasing the environmental consciousness and education, collection and evaluation of the information about the environmental issues, implementation of the international agreements and conventions which are about the environment (DPÖ, 2005: p. 11).

The department has given the competence to prepare the annual environmental reports to determine the precautions against the environmental problems and to determine environmental policies. This competence is fulfilled by the Committee of Environmental Inquiry, composed of various institutions, foundations and NGOs. The Committee submits the annual reports to the Assembly and submits their proposals to the assembly for combating against environmental problems.

*State Planning Organization:* State Planning Organization is an institution responsible for the determination of high level policies directly related with the environment and the country. The institution has the competence of preparing plans and annual programs related with the country, regions and sectors; to provide the development in the country. State Planning Organization formulates economic, social



and environmental policies through five year development plans. The institution also evaluates the public and private sector investment projects to guide the investments of the country (DPÖ, 2005: p. 12).

Social and Economic Council was arranged by the SPO law, Article 6. It is an institution by which NGOs, local governments and private sector are consulted in the period of the preparation of the five year development programs.

*Department of Town Planning:* The department takes its power from the public improvements law called 55/1989 of planning. With the department of town planning law called 47/1988, the department has many responsibilities. Preparation of the priority areas and environmental plans, with the plans based on the country, regions and cities, in accordance with the development plan; providing the stable urbanization; establishment and the development of the settlement centers, assurance of healthy residences for the public; protection and development of the natural environment; providing the principles of the settlement centers' regular plans, public improvement and environmental plans; helping the implementation and the planning of the precautions of the environmental regulation and environmental health; guiding the land development in accordance with the public improvement plans (DPÖ, 2005: p. 12).

*Department of Monuments and Museums:* The Department of Monuments and Museums is responsible from all the immovable and movable monuments and museums. It takes its competence from the old works of art and museums law called 60/1994. The objectives of the department are stated in the law called 23/1989, the DMM law. The aims of the department are to evaluate, protect and sustain the monuments and museums which are the common cultural heritage of the human being humanity, in accordance with the law in enforcement. High committee of Monuments was established with the representatives of the Union of municipalities and Turkish Cypriot Union of Architecture and Engineer Chambers. The Committee is responsible from the implementation or from the assurance of the implementation of the services related with immovable works of art and natural existences (DPÖ, 2005: p. 12).

Department of Forest, Department of Meteorology, Department of Geology and Mine, Department of Water, Department of Agriculture, Department of Stock-breeding,

Department of Veterinary, Department of Tourism, Department of Civil Aviation, Department of Primary Health Care, Department of Ports, Department of Labor, Department of Industry, Department of Trade, Pharmacy and Poison Committee are all related with the environment within the framework of their own competences granted to them by the laws of Northern Cyprus (DPÖ, 2005: p.13).

These departments deal with environmental issues such as; the protection of the ground and underground water resources and the sea water; management of the water resources; climate, water products, protection of the soil; permission and the supervision of the organizations related with health; permission and the supervision of the organized industrial regions; supervision of the international aviation standards including the noise; supervision of the waste areas, sheep-folds, waste water systems and the waters of the beaches; analyzing the pollutions; supervision of the industries and working places.

## **3.2. Environmental Policy in Cyprus**

Here the environmental policy structures of both the South and the North Cyprus have been examined to evaluate the strengths and the weaknesses of the South Cyprus which is an EU member and to see the current situation in the North Cyprus. The aim of this chapter is not to compare the two different environmental policy structures but mainly to prepare a background to understand the Europeanization of the environmental policy in South Cyprus and to see the structure in the part that is outside the EU.

### **3.2.1. Environmental Policy in the Southern Cyprus**

Southern Cyprus (Republic of Cyprus) has an environmental policy-making structure which is complex in nature. It shows similarities with the other Southern member states and the other CEECs both in its strengths and weaknesses. Although it

shares similarities with other southern and new member countries, Cyprus has an environmental policy which has a 'sui generis' structure, that makes it different from the others new members. The 'sui generis' structure of the environmental policy in Cyprus is examined below.

The number of the ministries is limited by the Constitution in Cyprus and the number of ministries, departments and agencies is around thirty. Fragmentation of the responsibilities, weaknesses in implementation, enforcement, understaffing are the striking points in the environmental policy structure of Southern Cyprus.

The lack of a separate Environment Ministry is the one of the functional problems of the environmental policy in Cyprus. Despite the high number of agencies, ministries and departments dealing with the environment, the coordination between them is so weak. The responsibilities of the staff in related ministries, agencies and departments are not clearly defined and this leads to duplication of efforts and uncertainty. Thus, the complex administrative structure and responsibilities create problems.

The government of South Cyprus has decided to apply for a Consultant to study the existing environmental structure of the Republic of Cyprus, to be able to see the weaknesses of the environmental structure during the process of adaptation to the EU. The Consultant would recommend all appropriate and required changes, alterations or modifications for a successful participation of Cyprus into the EU, in particular implementation of the Environmental acquis. An agreement was concluded on 18 November 2003 and Dr. Jean-François Verstryngne, who is the Honorary Director General of the European Commission, became the Consultant of Cyprus on behalf of the EU, to make recommendations about the environmental structure of the Republic of Cyprus. The administrative weaknesses and strengths in the environmental field of Cyprus that were determined by Dr. Verstryngne are stated in Figure-3 below.

**Figure-3: Strengths and Weaknesses of the Environmental Policy in Southern Cyprus**

Weaknesses	Strengths
<p>Small/overloaded bureaucracy.  Recruitment problems/timescales.  Complex administrative structures.  Poorly defined responsibilities in some sectors.  Limited resources in some agencies.  Inadequate fines/charges.  Few economic effective instruments.  Cumbersome/inconsistent procedures.  Historical focus on “water issues”.  Strongly medium-based approach.  Poor information flows/communication.  Limited public “ownership”.  Limited access to outside (grant) finance.  Limited role of local authorities.  Increased impact of tourism.</p>	<p>Small size of the country and its population.  Limited amount of (heavy) industry.  High level of market characterization.  Relative strength of economy.  Well-established market economy.  Legal system and approach.  Public sector employment/status.  High employee motivation.  Technical capabilities.  Well-organized and active NGO- movement  Highly participatory and transparent decision-making system.  Effective informal structures/contacts.  Good international contacts/collaboration.  Centralized investment/planning processes.  Pro-active approach to compliance.  Public awareness of and support for environmental issues.  High profile of accession planning.  Flexibility of approach to implementation.  Subsidy program for environmental investment.  Commitment to extend role of local authorities.  Wide network of stakeholders.</p>

Source: MANRE, 2004.

To analyze environmental policy in Cyprus it would be appropriate to start from the strengths indicated in the figure. First of all, the low population makes the adoption of the laws related with the environment much easier. From a sociological point of view, for the acceptance by the community, people feel themselves under obligation to obey the rules, not to get ashamed. In Cyprus, there are 700,000 people living, within which, everybody knows each other, particularly in the villages. This advantage can be explained by the basic need of the humans to get accepted by the whole, they obey the rules. That is why in Cyprus, the extension of a law throughout the country is much easier than in a country having a large size of land and a high population.

In environmental terms, the low population lessens the possibility of the environmental problems. Less people means less waste, less usage of water, less traffic, less noise, less construction; but on the other hand, the size of the country is small and this does not justify the lack of the above mentioned problems. The natural resources are scarce, especially the water resources. Solid wastes are discharged into the sea without proper treatment and the number of cars is high compared to the population size, which causes a crowded traffic. Tourism is the main economic sector on the island which increases the number of population and the construction sector too.

The limited amount of heavy industry lessens the possibility of environmental degradation too. The possible negative outcomes of the heavy industries do not exist which might have required additional prevention measures by the related institutions.

Other strength of the environmental structure in Cyprus is the qualified personnel. Unless the number of the staff is limited they have high level technical competence. In addition to their high level competence, they have strong dedication towards the issues about the environment.

The two-layered government structure of the Southern part of the island makes the solution of the problems easier with its municipalities, decentralized structure. The central government and the local governments have different competences, in particular in environmental issues. (Although the decentralized structure is suitable to solve the problems easier, the effectiveness of the local governments is limited to deal with the environmental problems successfully.)

All these features of the environmental policy structure of Cyprus strengthen the functioning of the executive system, harmonization of new environmental legislation (in particular, the transposition of the European Union *acquis* for the environment) and the protection of the environment with new instruments (market-based instruments, rather than command and control system).

As it was mentioned above, the structure of the environmental policy in Cyprus has some weaknesses too. The major problem can be the absence of a separate Environment Ministry or Directorate General for the Environment. The existence of

such ministry would establish a single framework for the environmental matters to be dealt within a stable and coordinative system of governance.

Fragmentation of responsibilities also creates difficulties in the environmental policy structure of Cyprus. Fragmentation is the duplication of the efforts and ‘gap’ in the implementation within the institutions and the experts among ministries or departments dealing with a certain policy area. Fragmentation is the outcome of the traditional environmental matters and their enforcement in Cyprus, as it is the same for the above mentioned problem of the absence of a separate environment ministry.<sup>30</sup>

In addition to all, there is high level of technical competence and the same organizations are responsible for permitting, monitoring and inspection/ enforcement, so the weaknesses occur because of the complex and overlapping responsibilities. Thus, the institutional structures create a number of significant problems.

The weakness in implementation and enforcement is another problem in the environmental policy process. Although all the environmental law is adopted by the government, the success in the implementation and enforcement process has remained very low. As a result of this, the major problems arise in the functioning of the system.

Despite the high qualifications of the staff in the departments, agencies and ministries related with the environment, there is a shortage of staff. For instance, the Environment Service was a small service with 2-3 people when it was first established. Gradually, the Environment Service increased to 4-5 people. Now, there are 35 people.

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<sup>30</sup> According to the Dr. Costas Papastavros, (The head of the Unit of Environmental Studies in Inter-college in Cyprus, head of the Environmental Research and Information Centre (ECOGNOSIA) in Cyprus and an officer in the Environment Service of MANRE, July 2005); “...during the recent years, we are trying to get ministries, departments and services as much as possible from the environmental activities. For instance; the fisheries department has also the responsibility for the protection of the marine environment (Marine pollution control). Now the consultant saying that fisheries department should not protect the marine pollution. It should be under the responsibility of the Environment Service. Atmospheric pollution is under the ministry of labor and social insurances. Why? 30-40 years ago, the people in the Department of Labors and Inspectorate we are responsible for the control and the supervision of the shelf and safety regarding the pollution control of the industries, I mean working atmosphere. Gradually this department took the responsibility for the atmospheric pollution control of the island.”

According to the studies done by the Consultant, 150 people are needed to cover all the various elements, regarding the drafting of all policies (Papastavros, 2005).<sup>31</sup>

Lack of a civil society involvement is also one of the major problems in the environmental policy structure of Cyprus. Despite the high number of NGOs dealing with the environment, the awareness of the society is quite low to participate. The low participation in the society may not be the main reason of the lack of a civil society involvement. The government also has the mission to inform the society and to increase the participation of the public through effective working.

Cyprus has ratified the Aarhus Convention but still there is a need to increase the access to information, public awareness and transparency. There are various NGOs in the Republic of Cyprus dealing with the environmental matters.<sup>32</sup>

There is also an insufficient capacity for project preparation in Cyprus which causes a weak structure of policy, which renders the institutions unable to receive international funds, in particular from the European Union. Although there is a budgetary problem in the ministries, departments and agencies for environmental protection, there is a lack of capacity to prepare related projects to receive funds from the international organizations. As a result, they lose the quite important additional funding available from Brussels upon accession.

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<sup>31</sup> For example; estimates have been made of the additional staff in the government service that will be needed to secure full implementation of the acquis. The Department of Labor Inspectorate needs 7 additional staff, the Water Development Department of MANRE needs 6 additional staff, the Environment Service of the MANRE immediately needs 6 additional staff and 20 additional staff to meet all future needs.

<sup>32</sup> The names of the environmental NGOs are; Association for the Environmental Protection of Pafos, Association for the Protection and Nursing of the Bird-fauna, Association for the Protection of the Cypriot Environment, Association for the Protection of Wildlife, Federation of the Environmental and Ecological Movements of Cyprus, Forest-loving Association of Cyprus, Friends of Akamas, Friends of the Earth, Green Committee for the Cleanliness of Pafos, Greenpeace (Mediterranean), Larnaka and Ammochostos Association for the Protection of Animals and Birds, Mountaineer Nature-loving Federation of Lemesos and the Lemesos Committee for the Natural Environment, Nature-loving Cultural Federation of Pafos, The Cultural Environmental Federation of Chloraka, The Ecological Movement of Cyprus, The Ecological Movement of Pafos, The Environmental Movement of Cyprus, The European Environmental Movement, The Excursions Association "Outdoor Life" of Ammochostos and the Committee of Ammochostos' Natural Environment, The Green Movement "Green Echo", The Herpetological Association of Cyprus, The Larnaka Committee of Environmental Protection and Development, The Ornithological Association of Cyprus and The Pan-Cypriot Environmental Movement "HARMONIZATION". (UNDP, 2005)

There is also a difficulty to integrate environmental concerns in other policies which is stated in the Cardiff process of the European Union. In addition to all, the difficulties to organize decision-making for long term inter-ministerial sustainable development issues create weaknesses in the operation and effectiveness of the environmental policy on the island.

All of these weaknesses should be solved one by one. Lack of solution in one of them would undermine the effective functioning of the environmental policy in Cyprus. There is a need for a comprehensive reform for their solution as a whole, because most of them interact with each other.

The environmental law of the South Cyprus will be examined in the next chapter (4.3. Europeanization of the Environmental Policy in Cyprus) in detail. The harmonization of the environmental law of the Republic of Cyprus to the EU environmental *acquis* will be explained in that chapter. As the Northern part of Cyprus is not included in the EU, only the environmental legislation of the South Cyprus will be focused on in that chapter. As a result, the environmental law of the Northern part will be explained in the next part under the sub-title of Environmental Policy in the Northern Cyprus together with the environmental policy structure.

### **3.2.2. Environmental Policy in the Northern Cyprus**

The environmental law has been approved by the assembly of the TRNC<sup>33</sup> (Turkish Republic of Northern Cyprus) in 15<sup>th</sup> April 1997. The environmental Law of

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<sup>33</sup> TRNC (Turkish Republic of Northern Cyprus) was established on 15th November 1983. After the peace movement of Turkey to Cyprus in 1974 the island was divided into as North and South. The island is divided with the decision of the UN (green line). The Northern part is not recognized internationally and the Southern part is officially recognized by the whole world. TRNC is only recognized by Turkey. Southern part, in other words the Republic of Cyprus, is following the 1960 Constitution (Turkish and Greek Cypriots were under a single administration) in which the Turkish Cypriots are still under the administration of this Republic officially but not legitimate in the Turkish Cypriot Community.



21/1997, refers to the protection of the common values of the human beings the environment; providing the best way to use and protect the natural resources; prevention of water, soil, air and noise pollution which has negative effects on the human health; protection of the plants and animals, and the natural and historical heritages; improvement of the health, living and cultural standards of the current and future generations; preparation of regulations and measures to achieve these aims; regulating the economic and social development targets under the framework of sustainable development and polluter pays principles (DPÖ, 2005: p. 20).

The basic environmental protection areas and the principles of the environmental law in the Northern Cyprus are; sustainable development, the protection and the usage plan, the aim of the protection and the usage plan, protection of the land and water areas and the prevention of the land pollution, protection of the water lands, protection of the natural life, special protection areas, the protection of the settlement areas for the environmental aesthetics.

In the TRNC sustainable development principle is taken as a basis in the measures related to the economic development, in the development plans, in the investment programs, in all development policies and for the protection of the natural resources. Although the principle is taken as a basis in most of the plans, programs and policies, there is a dispute about the well-functioning of the sustainable development in Northern Cyprus.

Environmental Impact Assessment (EIA) has also been enforced since 1997 and launched to be implemented since 1998 by the Department of Environmental Protection. There are some problems in the implementation of the EIA. The staff of the Committee of EIA is composed of the staff working in the Department of Environmental Protection. The Committee should be composed of experts that are working only for the assessments to evaluate the result objectively.

There is no law in the Northern Cyprus about access to information, eco-labeling, natural habitat and about the preparation of the reports for the implementation of the directives related to the environment. The only international agreement that the government of the TRNC has ratified is the law of 60/1999, the International

Convention of Prevention of the Sea Pollution from the Ships. In addition, TRNC is not a member of the European Environmental Agency (EEA) and can not receive any fund from the LIFE program.

Although most of the laws related to the environment, for instance air quality, waste management, protection of the nature, Genetically Modified Organisms (GMOs), noise pollution, nuclear security and prevention of radiation and water quality, need to get improved before harmonizing them with the E.U. environmental *acquis*, the environmental law of the Northern Cyprus is under work to get harmonized with the EU environmental *acquis* by the Department of Environmental Protection. The laws that are implemented in TRNC are insufficient to be able to compare them with the E.U. environmental law. (DPÖ, 2005: p: 29)

Some problems existing in the Southern Cyprus also exist in the Northern Cyprus too. The most important one is the fragmentation problem. Because of the problem of fragmentation, the works done by the institutions can not be implemented. A crucial example of this problem is about the establishment of national parks. Both the Department of Environmental Protection and the Department of Forest have the authority to set up national parks. Before harmonizing the environmental law with the E.U. laws, fragmentation problem should be solved by defining the limits of authority within each department related to the environmental issues.

In addition, number of the staff of the most of the departments related with the environment need to get increased. Furthermore, the laws that are implemented in the TRNC were prepared in accordance with the English law. As a result, the laws of TRNC need a reform period before harmonizing to the E.U *acquis*.

In the North Cyprus there are 900 NGOs of which 3% are related with the environment. On the other hand the number of the environmental NGOs<sup>34</sup> that are

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<sup>34</sup> The names of the environmental NGOs are; Association Against Noise Pollution, Cancer Research Foundation, Chamber of Agricultural Engineers, Chamber of Environmental Engineers, Chamber of Forest Engineers, Chamber of Mining, Metallurgical and Geological Engineers, Cultural and Scientific Research Society, Cyprus Turkish Biologists, Nature Research and Protection Association, Environment and Energy Association, Environmental Protection Association, Environmental Society of Lefke, Environmental Research and Education Center, Friends of Karpas, Green Action Group, The Society for the Protection of Turtles in Northern Cyprus, Chamber of City Planners, Kyrenia Animal

working actively is low. These NGOs that are low in quantity are successful in bringing the environmental matters to the agenda. Unplanned urbanization, pollution, usage of the coasts, birds, turtles, erosion, donkeys, protection of the forest areas, noise pollution, mining, usage of the pesticides are the top environmental matters that are taken on the agenda of the Northern Cyprus by the help of these NGOs. The awareness of the Turkish Cypriot Community on the environmental matters is rising and lots of people in the society are a member of an NGO. This makes people to participate into the process of shaping of the environmental policy in Northern Cyprus.

### **3.3. Europeanization of the Environmental Policy in the Southern Cyprus**

The Europeanization of the environmental policy should be analyzed after evaluating the Europeanization process of the country itself. After this evaluation the harmonization of the environmental law to the EU acquis and the effects of the current situation of the environmental policy in Cyprus should be explained. In this part it can be seen that all of these evaluations and the explanations are done to understand the Europeanization of the environmental policy.

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Rescue, Mediterranean Wind Association, Mountaining Sports Association, Society for International Development, Society for the Protection of Animals, Society for the Protection of Birds and Nature, Society for the Authentic Cyprus Turkish Products, Foundation for the Rehabilitation of Quarries, Turkish Cypriot Reforestation, Protection of the Nature and Fight Against Erosion Association. (UNDP, 2005)

### **3.3.1. Europeanization of Cyprus**

Since May 2004, Cyprus is a new member state in the EU, representing the Union's expansion to the South-east. With the accession of the Central and Eastern European countries, Cyprus and Malta have also joined the Union. The way of Cyprus to enter into the Union took some rough steps because of the Cyprus issue, especially after the division of the island in 1974.

The EU-Cyprus relations can be divided into three phases. The first period is between 1972 and 1984, with the coming into force of the Association Agreement. Association Agreement was established between Cyprus and the Community in 1973, after the accession of Britain into the EU at the same year. The second period is between 1985 and 1992. During this period, the Customs Union protocol was signed and then Cyprus government applied to the EU for full membership on 4<sup>th</sup> of July 1990. In the third period, it was agreed by the Council of Ministers that the accession negotiations could have begun between Cyprus and the EU, 6 months after the conclusion of 1996 Intergovernmental Conference. Soon a pre-accession strategy was established to prepare Cyprus for full membership. In December 1997, the European Council confirmed the enlargement negotiations. As a result, in 1998 it was agreed in the Conference held in London that the negotiations would begin with Cyprus on 3<sup>rd</sup> of April.

The objective of the EU was to solve the Cyprus issue before the accession of the island into the EU, in accordance with the spirit of the Union. The main objective was to unify the island. Some alternative agreements prepared by the UN were submitted to both sides, North and South, but although the high possibility of the Annan Plan submitted in 2002, it could not be successful.

The application of Cyprus to the full membership for the EU was political in one sense. The political situation on the island depended on a solution between the two Communities, Greek Cypriots and Turkish Cypriots. A solution would unite Cyprus and provide a fair way to both sides during the accession into the EU thus the EU would

open its gates to the Turkish Cypriots too. The EU membership might have been seen as an instrument to unite the island but the result is unsuccessful.

The entry of Cyprus into the Union would mean the weakening of Turkey's potential block of Cyprus entry and the strengthening of the status of Cyprus as the only internationally recognized authority on the island (Featherstone and Kazamias, 2001: p. 145). In brief terms, the main objective of the entry of the Republic of Cyprus into the EU is broadly based on security issues.

As Ioakimidis has argued; there are 'intended' and 'responsive' Europeanization within the Union. As it is understood, the entry of Cyprus into the EU is an intended one. As the other Southern member states, Spain, Portugal and Greece, the aim of Cyprus was to accelerate the process of Modernization, both in political and economic terms and to sustain the process of democratic consolidation. Cyprus was also 'intended' to enter into the Union for economic modernization too.

The intended outcome of the adoption of the *aquis* in the policy areas was the convergence of the state administration in Cyprus to the West European norms. The adoption of the *acquis* enlarges the activities of the state. For instance, in the environmental policy field, at the beginning, the environmental legislation of the EU and the domestic conditions of Cyprus were irrelevant. Later, new standards were downloaded. In 1998, the environmental *acquis* was still waiting to be transposed.

The process of Europeanization in Cyprus can be regarded as a top-down process of adaptation from Brussels. Cyprus has experienced a powerful pressure for adjustment in domestic state-economy relations and for the operation of the state administration (Featherstone and Kazamias, 2001: p.160). The major reforms of the EU were all imposed; for instance the financial market liberalization and banking reforms. Restructuring of the institutional power and resources were also empowered by the EU to Cyprus.

As a result, entering into the EU was a vital foreign policy lever for Cyprus. Being a member of the EU was the solution of the Cyprus 'problem' and the modernization of the administrative structure. As we can see in the environmental

policy structure of the island, there is high level of restructuring of the administrative system in the policies, as it is strictly required by the EU to be a full member.

### **3.3.2. Harmonization of the Environmental Legislation in Cyprus**

As a result of the process for harmonization with the European Union, Cyprus environmental policy has been revised starting from its foundations. More than 300 Directives and Regulations and a number of action plans compose the Chapter for the Environment. This legislative framework ensures the improvement of the environment and of the quality of life. The Environment Service has undertaken the difficult task of harmonization with most of the European *acquis* for the environment.

To be able to evaluate the harmonization of the Cyprus environmental laws to the EU laws and to examine the phases passed over during the accession process, the Progress Reports are the main instruments to be used. In the following part the 2003 Progress Report was taken as a basis in order to evaluate the phases passed from that time until now in the environmental law. The Report has stated progresses in some sectors and delays in some of them but the current situation in these sectors is also dealt with in detail.

The success and the delay of Cyprus on the harmonization of the environmental legislation are stated in the Regular Progress Reports prepared by the Commission. There are Progress Reports for Cyprus between 1998 and 2003. Since Cyprus was going to be a member in 2004 there is only a monitoring report prepared for Cyprus in 2004.

*Horizontal legislation* was in place and was in line with the *acquis*, except for the *acquis* on strategic environmental impact assessment, which was needed to be transposed and implemented by July 2004 in line with the Directive. While the relevant administrative capacities are in place and function adequately, the Environment Service, under the Ministry of Agriculture, Natural Resources and Environment (MANRE), needs to be formally designated as the component authority for strategic environmental impact assessment (EC, 2003: p.97).

The Law for the assessment of the environmental impacts from certain projects (No.57 (I)/2001) is in place and in full implementation since 2001. The Committee that was established has very frequent meetings for the assessment of the environmental impacts from projects.

Cyprus signed and ratified the Aarhus Convention on access to environmental information, public participation in decision-making and access to justice for environmental matters. Accession to environmental information increases the awareness of the people about the environmental matters and this awareness directly raises the public participation in decision-making process of the state of Cyprus.

*In the air quality*, the quality of petrol and diesel and the sulphur content of liquid fuels are not in line with the *acquis*, according to the Regular Progress Report on Cyprus in 2003 (EC, 2003: p. 98)

New Regulations were prepared regarding the processes of collection, transport and final disposal of materials that contain asbestos. Cyprus does not produce, but is a consumer of substances that destroy the ozone layer in small quantities. Cyprus ratified the Montreal Protocol in 1992 and its London amendments in 1994. In April 2001, the Montreal Protocol amendments that were approved in Copenhagen, Vienna and Montreal were included in a Ratifying Law (No. 9(III)/2001). The relative bill on the approval of modifications of the Protocol that were adopted in Beijing has been prepared.

Cyprus ratified the Kyoto Protocol on Climate Change that establishes a process on the basis of which action must be intensified against the human causes that contribute to climate change. Within this framework, commitments have been undertaken by developed countries for the reduction of the emissions of greenhouse gases. The EU and all its member states are contracting parties to the Protocol, with commitments for an 8% reduction of emissions during the period 2008-2012. There are special quotas allocated to each member state. It is expected that Cyprus will be called upon to commit in important reductions of its greenhouse gases emissions. The Council of Ministers has recently approved the framework of a Strategic Plan for the reduction of the rate of increase of greenhouse gases emissions (MANRE, 2004).

It was written in the 2003 Regular Progress Report that, in the *waste management* sector, administrative capacity requires further strength. The national waste management plan had not been adopted at that time (EC, 2003: p.98).

In December 2002, a comprehensive Law on the Management of Solid and Hazardous Waste was adopted (No.215 (I)/2002). The new Law includes the obligation for preventing and reducing the generation of waste. The requirement for authorization for the management of waste is also included. Based on the Law, a number of special Regulations were prepared and approved (MANRE, 2004).

The Strategy for the management of waste was finalized and forwarded to the Council of Ministers for approval. The Strategy aims at the development and enforcement of a flexible, economically viable and effective policy in the sector of solid and hazardous waste, through an integrated and rational approach, adapted to the needs and particularities of Cyprus. This includes the following:

- The type, quantity and origin of waste that should be managed
- The objectives for reduction, re-use and recycling of waste
- The methods of management to be applied with special reference to the collection, transport, treatment and disposal of waste
- All the special provisions that concern particular types of waste
- The number of installations of treatment and disposal that will be required to cover the needs of waste management
- Persons or legal entities that are permitted to manage waste
- The estimated cost for utilizing and disposing waste
- The necessary measures for the encouragement of a rational scheme for the collection, sorting and treatment of waste.

The disposal of used oils and PCBs/PCTs, is regulated by the Law on the Control of Pollution of Waters and Soil (No.106 (I)/2002). In addition, special Regulations on the management of used oils have been published (Regulations for Used Oils (Order 637/2002)) and Regulations on PCBs and PCTs (Order 636/2002)). The “polluter pays” and “the producer responsibility” principles were adopted in the system for the



collection, storage, transport and treatment of waste. The producer/importer has full responsibility for the rational management and handling of used oils.

The disposal of hazardous waste from industrial units is covered by the Law on the Control of Pollution of Waters and Soil. The Law on the Solid and Hazardous Waste regulates their overall management. In addition, feasibility studies and assessments of environmental impacts were completed on the establishment of an organized system for the management and disposal of hazardous waste, including a central incinerator for clinical and hazardous waste.

A study on the adoption of a system for the management of batteries and accumulators was completed. This issue is controlled by the Regulations on batteries and accumulators (Order 82/2003) for the adoption and enforcement of measures aiming at the sustainable management of toxic and hazardous waste, the prohibition of their uncontrolled disposal, the reduction of their production and their widest possible recovery. All these measures aim at safeguarding the environment, but also public health.

A Regulation of Good Agricultural Practices was published (Act 407/2002) as well as a related Regulation on the use of sludge in agriculture (Act 517/2002), based on the Law on the Control of Pollution of Waters and Soil.

A Law regarding packaging and packaging waste is being implemented (No.32 (I)/2002). The objective is the prevention or reduction of the impacts from packaging and packaging waste regarding their quantities and composition. The basic measures of achieving this objective deal with the prevention of the generation of packaging waste, the reduction of the levels of heavy metals in packaging and the reduction of the final disposal of packaging waste by re-use, recovery or recycling. Important elements are also the introduction of the responsibility of the producer for his packaging waste.

A program is promoted for the encouragement of recycling. The sum of public aid will be 2,72 million Euros, out of which, 1,8 million will be utilized through tenders and 0,92 million in recycling companies under the form of a "de minimis" subsidy. The program, of 2-year duration, was designed to increase the rates of recycling, but also to provide opportunities of collaboration between parties (local authorities, producers of

waste, recyclers, public, government authorities) in order to prepare sufficiently for the full implementation of the Law.

Serious environmental problems are associated with the management of waste from piggeries and other animal waste. The permits for waste disposal for piggeries are regulated through the provisions of the Law on the Control of Pollution of Waters and Soil.

Recently, a number of such units have installed separators of solid waste that led to a significant improvement of the situation.

In the area of *water quality*, some amendments to the sewage and drainage law and the recent framework *acquis* on water were need to be adopted by accession, according to the 2003 Regular Report on Cyprus (EC, 2003: p.99).

A new Law on the Control of Pollution of Waters was adopted (No.13 (I)/2004). The objective of the Law is the protection of the surface and ground waters and the soil from human and industrial activities, and also the regulation of waste disposal.

Nitrate pollution from agricultural sources is a serious problem in Cyprus, even though the areas used for agriculture are relatively small. Vulnerable areas have been determined and action plans were prepared (MANRE, 2004).

A Code of Good Agricultural Practices was prepared and is applied. The measures promoted by the Department of Agriculture include the control of the use of fertilizers; the use of improved irrigation systems; the preparation of irrigation program; the relocation of animal husbandry units; the collection of sludge; the treatment of waste; the suitable selection of areas for the application of waste; the training of farmers; etc.

No industrial waste is disposed into the sea, with the exception of a small number of industries between the two harbors of the city of Limassol. The process for the regulation of the discharge of these industrial wastes was completed according to the laws on the Control of Pollution of Waters and on Sewage Systems.

In the field of *nature protection*, fragmentation of responsibilities may have led to problems in the effective implementation, according to the 2003 Regular Progress Report on Cyprus (EC, 2003: p.99).

A Law on the protection and management of nature and wildlife was approved (No.153 (I)/2003), which regulates the protection of biological diversity, mainly via the identification of special areas of protection and protected species of fauna and flora, the adoption of management plans, the assessment of environmental impacts from projects and program in areas of special interest and the control of the release into the environment of alien species. In the relative Annexes of the Law, 52 types of natural habitats, 17 species of wild fauna and 17 species of plants that are found in Cyprus are identified. Provisions are also made for the prohibition of the import of skins of baby seals.

In the framework of the EU Network "Nature 2000", a scientific list of areas, including important types of habitats and species of fauna and flora, was prepared. Almost all the types of habitats of Cyprus and most of the endemic ones will be included within boundaries of areas of the Network. The national ecological database of Cyprus, "BIOCYPRUS", was also finalized, which includes the standardized forms of the characteristics of all areas that fill the criteria to be proposed for inclusion in the Network "Nature 2000".

In the field of *industrial pollution and risk management*, *acquis* on large combustion plants and national emission ceilings were necessary to be transposed by accession, according to the 2003 Regular Progress Report on Cyprus (EC, 2003: p.100).

The basic administrative structures for the effective control of industrial pollution and risk assessment have been put in place. A new Law and Regulations regarding the Control of Pollution of Waters were also approved, completing the harmonization with the relative legislation of the European Union.

A new Law regarding the regulation of waste from particularly pollutant activities was adopted (No.56 (I)/2003) (Integrated Pollution Prevention and Control). Its main objective is to decrease or even eliminate pollution at source, helping industrial and animal husbandry installations establish the appropriate infrastructure for

environmentally sustainable development. Apart from air and water pollution control issues, aspects of noise, energy, soil rehabilitation, accident prevention, and best available techniques are also covered.

A “Life” Program financed by the EU was completed on the establishment of a mechanism for the full implementation of EMAS (Eco-label, environmental management and audit). The results, through a special pilot program for various enterprises, have shown that there is intense interest in the private sector for the adoption of environmental management systems.

In the area of *chemicals and genetically modified organisms (GMOs)*, the law on biocides has to be adopted for the Regular Progress Report on Cyprus in 2003 (EC, 2003: p.100).

In the field of *noise*, the *acquis* on ambient noise was needed to be transposed by July 2004 in line with the directive, in accordance with the 2003 Regular Progress Report on Cyprus (EC, 2003: p.100).

Currently, noise issues are regulated through the general provisions of the law on the protection from nuisances and the legislation for land use planning.

A “Life” Program was approved by the EU and is in full implementation for the design and implementation of a noise policy according to the provisions of the relative Directive. This includes the methodology for the assessment of noise exposure levels, the evaluation of the impacts from noise and the development of noise maps. The completion of the program will help in the evaluation of the exposure of the population to noise and the adoption of measures to manage the relative impacts.

Regulations were approved regarding the levels of noise emission from certain outdoor equipment (Act 535/2003) (Noise from equipment for use outdoor). The Law on the labeling concerning the noise emitted by household appliances was approved during 2002 (No 192(I)/2002) (Noise from household appliances).

As a result the Report states that Cyprus has met the commitments and requirements arising from the accession negotiations and is implementing the *acquis* in the areas of horizontal legislation, air quality, waste management, water quality,

industrial pollution and risk management, chemicals, noise and nuclear safety and radiation protection.

In addition to all according to the Report Cyprus was partially meeting the commitments and requirements in the areas of GMOs and nature protection. In the area of nature protection, fragmentation of responsibilities leads to problems of nature protection legislation.

Cyprus has transposed a great number of additional legislations and has in particular adopted laws on G.M.O.'s, biocides, electronic waste (W.E.E.E), EMAS, ECOLABEL, environmental noise, liquid asbestos waste, nature protection emission trading, air quality, harmonization law for the Water Framework Directive, national emission ceiling, large combustion plants and ratification of the CARTAGENA Protocol.

Consequently it is true to say that there are still problems within the process of implementation of the legislative arrangements because of the administrative capacity and the institutional structure which were also stated in the parts of environmental administration and environmental policy in this study. The Progress Report had focused on these problems and proposed a reform for the administrative and institutional mechanisms. In addition the Report had suggested a reform within the implementation of the horizontal legislation too.

### **3.3.3. Europeanization of the Environmental Policy in Cyprus:**

#### **Problems and Prospects**

Cyprus is a new member and it is so difficult to predict what will happen in the process of Europeanization on the environmental policy of the island. Cyprus has entered into the Union with the Central and Eastern European Countries but this can't change the fact that Cyprus is a Mediterranean country and might face the same problems that the other Southern Members have also faced. As it was stated in the chapter on the concept of Europeanization, Cyprus has similarities with Southern

countries especially with Greece. Thus the similarities between these Southern member states and Cyprus may facilitate the estimations about the process of Europeanization on the island.

In this part the investigations stated above (environmental law, administration and legislative harmonization) is taken as a basis to evaluate the Europeanization of the environmental policy in Cyprus. Within this evaluation the problems related to the institutional and legislative, policy making and implementation processes are emphasized. In addition the measures to overcome these problems are discussed too.

This study has determined the problems related to the improvement of the environmental policy and related to the process of Europeanization. These problems and their outcomes are investigated in the part below.

### **3.3.3.1. Institutional Structure: Absence of a Separate (Environment) Ministry**

As it is known from the latest parts, there is a Ministry of MANRE that includes the Agriculture, Natural Resources and the Environment under one single umbrella. Since the Environment Service is under this Ministry sometimes other issues related to the agriculture and natural resources might be in a more important place than the environment. A separate institution would be established about the environmental matters to perform a more effective action against problems. The possible institutions that might be established and the origin of this problem are examined below.

The lack of a separate environmental institution affects the formation of an integrated environmental policy and the coordination among policies. The weaknesses in the formation of an integrated environmental policy and the problem of fragmentation are examined in the forthcoming sub-titles.

The Constitution of Cyprus limits the number of Ministries that can not be exceeded. This factor prevents the formulation of a separate Environment Ministry to gather all the relevant environmental issues under a single framework. Responsibilities

for the environmental issues are dispersed into several Ministries and the result is a problem in representation of Environmental Policy.

The existence of a separate Environment Ministry would provide the environmental issues to be represented by a single voice in the Council of Ministers. When the responsibility of the environmental issues is under several ministries, the possibility of the negotiation and the expression of the conflict of interests in the Council of Ministers reduce. Cyprus should have a strong separate entity dealing with the environmental policy in an integrated way, as it was also suggested by Mr. Verstrynge, the consultant representing the E.U. Commission for environmental matters.

In order to prevent this difficult position within the environmental structure of the government, the Constitution might be changed but rather than changing the Constitution a more suitable way should be found to make the environmental issues be carried in a more coherent way. Creation of a separate Directorate General for Environment within the MANRE might be pursued as a possible remedy. There would be a second permanent Secretary who is responsible for it.

Instead of a separate Directorate General of Environment dependent on the Prime Ministry, an independent Environment Agency would also be established inside or outside the government but the establishment of a separate independent Environment Agency would prevent the possibility of representation within the Council of Ministers, which could be possible with the DG of Environment. The Directorate General of Environment would also strengthen the legitimacy of the environmental policy among the other policies of the government. The integration of the environmental policy into the other policies of the government would also become easier.

As Dr. Verstrynge has suggested, the establishment of a separate DG of Environment would also improve the participation of Cyprus in the European Union Affairs. Cyprus would get much closer to the European Commission and to the Member States through the DG of Environment. (Verstrynge, 2004: p. 18)

On the other hand, if any Agency is established outside the government, the Agency would compete with the remaining services inside the government, which

would double the fragmentation problem within the system. In addition, any agency within the government can not take all the environmental issues both inside and outside the government, that's why the establishment of the Directorate General of Environment seems to be the most suitable way to solve this problem of absence of a separate Environment Ministry.

One of the aims of the E.U Environment Policy is to protect the natural resources; water, forests, fauna and flora, land and soil, beaches, mine and quarries, air are all included in the natural resources that should be protected. "... prudent and rational utilization of natural resources" is one of the objective of the E.U Environmental Policy, so the natural resources policy can not be separated from the objectives of the environmental policy in Cyprus, as it is the same in the E.U.

One of the aims of the E.U Environmental Policy is also to protect the human health. So, the water, air, chemicals, GMOs, waste, ionizing radiation and noise should all fall under the Environmental Policy of Cyprus as it is the same in the E.U. Consequently, to be in accordance with the objectives of the E.U Environmental Policy, the name of the DG that will be established in Cyprus would be named as 'the Directorate General for the Environment and Natural Resources' (DG ENR).

### **3.3.3.2. Coordination among the Departments: Fragmentation**

Apart from all the above, the fragmentation problem is one of the major problems Cyprus is facing with. Fragmentation is a traditional problem in most of the member states that entered into the E.U, especially in the Southern Member States, like Greece. The fragmentation problem in Greece has been stated in the earliest chapter and the chapter gives the clues of fragmentation during the process of Europeanization. It creates delay, unsuccessful implementation, waste of time and lack of clear division of labor. Fragmentation is the outcome of the historic reasons. Fragmentation of responsibilities for traditional environmental issues should be avoided as much as possible, as Mr. Verstrynge has suggested.



In order to prevent the existing fragmentation, some transfers and mergers within the departments should be made through eliminating the conflict of interests. Establishment of a separate ministry or directorate general would help to overcome the problem of fragmentation. For instance, the responsibility for marine and coastal waters, pollution of sea and marine ecology would be transferred from the Department of Fisheries and Marine Research to the new DG ENR. Also, the responsibility for air policy would be transferred from the Labor Inspection Department to the new DG ENR. There are lots of others that should be transferred and merged in the new DG ENR.

### **3.3.3.3. Integrated Environmental Policy**

Environmental policy should be integrated with other policies which have important effects on the environment. Environmental policy should incorporate the issues such as, agriculture, fisheries, Tourism, Transport, Energy, Land Use and Planning, Industry and Commerce, Trade and more which have crucial responsibility about the environment. There should be a balancing and coordination of interests between environmental policy and other policies rather than merging the responsibilities or including the other policies in the new DG ENR in Cyprus.

An integrated environmental policy can be established in Cyprus through different ways (Verstryngge, 2004: p. 45). Incorporating environmental protection as a principle in the constitution would be one of the ways that can strengthen the legal basis for an integrated environmental policy. It can also be incorporated as an objective in the specific legislation of each of the concerned other policies. It can be promoted through specific environmental legislation as is the case in the Strategic Environmental Impact Assessment legislation. It can be promoted through the request from the highest to require the other ministries than environment to develop specific working programs for the integration of environmental concerns in their own policy, as was done at the E.U level in the Cardiff Summit of Heads of State and Government (Cardiff Process). It can also be promoted at the administrative level by requiring the other ministries or services

involved to create a specific unit or team with responsibility for such integration, as was done by several DG's inside the European Commission. The first and the third suggestions have become applicable in Cyprus legislation because they have already been incorporated in the E.U legislation too.

#### **3.3.3.4. Implementation and Enforcement Gap**

Implementation and enforcement of the environmental acquis are big problems not only for the Southern member states but for all of the members of the E.U. In the chapter (Chapter 2) about the implementation problems of Greece, the reasons of the implementation and enforcement gap were examined in more detail, which are almost the same reasons for Cyprus too. During the process of harmonizing with the EU directives, there was lack of coherence, which was an important problem for Greece. There was lack of strategic plans, because of the unwillingness of the people dealing with environmental problems to participate in those plans. Because of partial compliance, non-notification and poor application reasons, the transposition of community directives into national law failed in Greece.

Enforcement of environmental law in Cyprus is rather weak as several studies of reports have emphasized. Therefore, implementation and enforcement is a serious problem in Cyprus. During the enlargement negotiations of the E.U with Cyprus, a large amount of new environmental legislation based on the E.U legislation has been transposed by Cyprus. There is a legal obligation of Cyprus to implement the E.U environmental rules. There are limited numbers of specific sectors that have specific transition periods agreed and granted on Cyprus during the enlargement negotiations.

One of the major problems in terms of environmental policy is the gap in implementing the policies and measures which is strongly associated with institutional structure. Institutional set-up for implementation and enforcement of environmental

legislation in Cyprus has to be strengthened (Verstrynge, 2004: p. 50). A comprehensive system should be created and operated to guarantee the environmental rules being respected in Cyprus.

A study has been carried by the National Observatory of Athens and proposed to establish a new agency within the MANRE or an independent authority which will assume responsibility for environmental permitting and inspection of all facilities and activities in Cyprus. Establishment of an independent agency within MANRE is also suggested, which will be responsible for data collection, implementation, compliance and enforcement. As environmental data collection and management is of prime importance for ensuring effective monitoring and implementation of environmental policy, establishment of such a body would be instrumental.

### **3.3.3.5. Sustainable Development**

Several long term sustainable development issues are very visible in Cyprus, like the energy independency on oil, the rapid development of tourism or the growing traffic congestion on the island. On the other hand, general awareness for sustainable development in Cyprus is low. There is a lack of comprehensive system to deal with the sustainability issues.

Most of the E.U Member States have developed their own Sustainable Development Plans or Strategies. Cyprus has also developed its own strategic development plan for 2004-2006 (Verstrynge, 2004: p. 57).

In Cyprus, a special separate Unit would be created in the Planning Bureau to deal with inter-ministerial questions related to long term sustainable development issues to integrate the environmental policy with the economic and social policies. The Unit should prepare reports on specific sustainable development issues; integrate economic, social and environmental concerns. Traffic, Tourism and Energy should be prepared as prior policies.

### **3.3.3.6. Civil Society**

It can be said that civil society in Cyprus shares similar characteristics with that of Greece. There is lack of knowledge and the public is not conscious enough about the environmental matters and there is a traditional weak civil society structure in Cyprus like in Greece. There is a patron-client relationship in Greece, which is a traditional structure, and which had created a hierarchical model of governance (top-down) (Boudrides, 2002: p. 4). The party based structure also creates a hegemonic structure of the parties and political institutions that influences the effectiveness of the civil society negatively. Nevertheless, during 1990s the Greek environmental activism got more institutionalized. During 1990s, political ecology groups started to get more radical and the number of NGOs had increased in Greece (Boudourides, 2002: p. 9).

Legislation regarding public participation in Cyprus is in line with the Aarhus Convention but does not fully comply with the provisions of the Aarhus Convention. A correct implementation of the Aarhus Convention has become an integral part of the E.U Environment Policy. According to Mr. Verstrynge (Verstrynge, 2004: p. 49), for the access to justice pillar of Aarhus, the respect of the relevant provisions has to be included in the reform of the implementation and enforcement regime in Cyprus. A special financial support program for reinforcing NGOs would be created, like it exists in several other member states and should be managed by the new DG ENR.

## **4. Conclusion**

A generalization has been developed in recent years about the differences between the member states of the EU based on their behaviors, attitudes, strategies and positions by which they combat with the environmental pollution. It is obvious that, Northern countries have already completed their economic modernization and industrialization processes. It is also argued that they have shifted their interests from materialist to post-materialist issues. On the other hand, the Southern countries of the EU are still in the process of economic development and industrialization to increase their productivity for domestic economic growth. The intention of economic growth is one of the reasons of the Southern member states' delay to combat with the environmental issues. This is a matter of discussion to support a reasonable argument. In this chapter, the factors that might bring such an argument will be discussed.

### **4.1. North-South Dichotomy**

As it was stated in this study, Southern member states are late-comers; which are Greece, Spain and Portugal in 1980s. The EU was formed and developed mainly by the Northern member states, so they are the makers and shapers of the club. The debate of North-South dichotomy mainly starts from this point of view. The Southern member states have experienced high adaptational pressure from the EU because of being late-comers thus being under pressure to meet the requirements in the environmental policy area.

Italy is a founding member of the EU, a first-comer but is labeled as a laggard country, which is an extraordinary situation. As the late-comers are still in the process of completing their economic modernization process, they perceive their membership in the EU as a chance to get more developed and modernized. As a result they consider paying large sums of money for the protection of the environment as an unnecessary expenditure upon their economy. So they feel themselves under pressure that they have

to take these measures for the EU environmental protection and perceive these relatively costly measures as a blow on their individual purposes.

Economy is not the only aspect for them to get developed, but political aspects are also intended by them to get modernized, like it is in the Northern countries. Democracy, human rights and the rule of law are the fundamental aspects of the process of political modernization for such countries coming from authoritative and military regimes, with some examples of coup d'état.

It is clear that the main aim of the Southern countries within the Union is far away from intention of protecting the environment. This is not something that should be blamed because each country is evolving its own transition period at different levels, at different times and in different ways as a result of its historical past. When these countries will complete their transition periods, they will be more eligible and willing to get more 'environmentalist'.

Under the chapter of Mediterranean environmental problems, the unique environmental problems of the region have been mentioned, such as the effects of mass tourism, over-population on the coastal areas and recent industrialization; and the international measures of the UN and the EU have been dealt with in detail. It is clear in that chapter that the Mediterranean countries have to take a collective action towards these problems in order to be able to prevent them properly. The Southern countries are aware that they can't cope with these problems on their own without cooperative solidarity.

Southern member states are in this collective action because of being Mediterranean and thus having common environmental problems. The environmental problems of the Mediterranean and the Northern Europe are different because of having different natural heritages and climate. On the other hand, Mediterranean Sea itself is a matter of pollution. During the process of shaping the EU environmental policy, Northern members' environmental problems and measures were taken as the basis. For instance Northern countries suffer from acid rain unlike the Southern countries. It is true to say here that the most concrete reason of the North-South divide is these different environmental problems.

As a result, it can be argued that there are many reasons to support the North-South dichotomy. But making generalizations on the countries according to the regions that they belong can be seen as 'over-simplification'. In that sense, is it suitable to put Cyprus in this stereotype and say that 'Cyprus is a Mediterranean country and going to experience almost the same processes like the other Southern members'?

However it is not so easy to make this generalization on Cyprus because Republic of Cyprus has entered into the Union after completing its adaptation process to the EU in all policy areas. Other Southern members, Greece, Portugal and Spain completed their adaptation after entering into the Union. So Cyprus was under a pressure like the others but the accession into the Union was some kind of a motivation for Cyprus to be able to finish the adaptation process successfully.

On the other hand, although Cyprus possesses almost the same structural features with the Southern members (such as fragmentation, localism) the consciousness on environmental matters have grown rapidly in all levels of governance and in the public opinion in Cyprus. The main reason of this fact is that Cyprus is a small island<sup>35</sup> and this feature renders Cyprus different not only from the Southern members but also from all of the member states, except Malta. Its small size is an advantage for Cyprus especially in environmental sector of governance. It is easier to make the matters public and increase the awareness in a small country.

In addition it does not mean that the new accession will cause Mediterranean member states to face the same difficulties that the Southern member states faced years

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<sup>35</sup> Dr. Costas Papastavros has also indicated the importance of being a small island, by supporting his idea with an example from daily life. After the launch of the implementation of recycling in Cyprus, everybody has started to check their neighbors whether they are adjusting to the requirements on recycling or not. This makes embarrassment in the people living in a society if one doesn't follow the requirements and the others are following. Living in a small island encourages the people to obey the rules in order to feel themselves approved by the society. The role of the country's size in influencing the attitudes of the people towards the environment and measures is exemplified by the changing patterns of waste recycling with the introduction of recycling program in Cyprus. After the launch of recycling measures, everybody has started to check their neighbors whether they are adjusting to the requirements on recycling or not. This makes embarrassment in the people living in a society if one doesn't follow the requirements while the others are following. Living in a small island encourages the people to obey the rules in order to feel themselves approved by the society (Personal interview with an officer in MANRE, 2005).

ago. For the new accession Mediterranean member states, it will be much easier to cope with the problems that they might face while transposing, implementing and enforcing the environmental legislation obliged by the EU. The mistakes of the Southern member states that they have experienced in the past provide a basis for the new member states to learn how to prevent the same mistakes from happening. So the new-comer Southern member states are luckier than the other Southern members who have confronted many adaptation problems, thus labeled as laggards. They did not have any sample before them to set as an example. Consequently, this is a great advantage for Cyprus too. Europeanization can be seen as a learning process by which both member states and the EU institutions are drawing lessons to apply to new situations or problems.

Besides the Mediterranean environmental problems are common to all Southern member states, for instance soil erosion, water scarcity or forest fires. But, on the other hand, since the Northern and Southern European countries are surrounded by different geographies, they are facing different environmental problems. So Italy, Greece, Spain and Portugal have helped the EU to establish a strong basis for the new comer Southern states to be able to combat with the environmental problems that are peculiar to the Mediterranean environment. Here it is true to claim that Cyprus is a new accession Mediterranean country and that is why the island is not going to face the same difficulties as the others had faced in the past.

In recent years environmental policy is not compulsory to perform for the Southern member states as it was in the past. The only thing that they should do is to work harder in order to recruit more staff, to extend and build infrastructures, including Cyprus too.

#### **4.2. Restoring the North – South Dichotomy in Cyprus**

The dichotomy that is seen in Cyprus has a different dimension than the dichotomy stated in the previous part of this chapter. Cyprus is an island that is divided into two as North and South. The Northern part is outside the EU and the Southern part is a member of the EU. The dichotomy starts from this point of standing outside and



being a member. Although the UN peace resolutions have developed to unite the island including the Annan Plan in 2004 the result was not successful.

The striking differences between the North and South Cyprus' environmental policies are obvious in this study. The level of the environmental law of the North Cyprus is under the contemporary standards which makes it impossible to compare the environmental law of the EU with the law of the Northern part. On the other hand, the Southern Cyprus environmental policy is developing through being an EU member without any conscious intention of the country itself especially for the environment.

As a result of this process, after few years the quality of life in both sides will be very different from each other, the quality of the Southern Cyprus will be higher than the North. On the other hand, the vital environmental problems in the Northern Cyprus which have been ignored by the Southern government for a long period of time will influence the both sides equally, not only the North. Here the role of the E.U. is important in order to prevent this highly possible huge disparity between the quality of life of North and South Cyprus in the future.

The aim of this thesis is not to analyze the unification process of the island but to look at the Cyprus issue from a different, an environmentalist point of view. Is it possible to divide a single geography into two and apply different standards and precautions to each of them in order to prevent the environmental pollution in this geography? Can we prevent a river flowing from the Troodos Mountains into the stream of Northern Nicosia? Can we measure the air pollution occurring only in the Southern Nicosia? As the answers to this questions are 'NO' the environment could be the only reason to unite the island!

The environmental standards of the Southern part of the island have developed during the process of harmonization to the EU *acquis*. The Republic of Cyprus is in the process of Europeanization and only having problems in the implementation process. Their environmental administration is under control and passed through many phases of reforms. They are receiving funds from the EU and taking the necessary measures to prevent environmental pollution on their side. Republic of Cyprus has benefited from the "Third Country LIFE" and from MEDA programs.

On the other hand the Northern Cyprus, in other words, the Turkish Republic of Northern Cyprus, is trying to reach the contemporary environmental standards within itself with its own administrative capacity and economic conditions. In addition, the environmental disasters are not under control and the international actors are not active to prevent these disasters. Of course the main reason of this is Cyprus being unrecognized.

The Turkish Cypriot Community is struggling to prevent the environmental disasters in the city of Lefke caused by the CMC mine company without any help from the Greek Community which is a problem of both sides. This is a problem of not only the Cypriots but also all the Mediterranean people.

Unification of the island is not the only way to protect the environment and should not be the only way because the environmental problems are increasing every second. It would not be true to wait for a solution. As a result, after a few years one side will have less developed living conditions and the other side will have developed living conditions.

In order to take the environment under control, a common independent environmental institution belonging to the Turkish and Greek Cypriot Communities would be established to protect the environment of Cyprus as a whole. As the environment can not be divided and can not be administered separately a single environmental institution could be the best solution.

As the TRNC is not recognized by the Republic of Cyprus, the possibility of cooperation between the MANRE of the South Cyprus and the Department of Environmental Protection of the North Cyprus is low. So, the establishment of an independent institution to protect the common environment and to prevent the common environmental problems is the most effective solution to overcome this problem caused by the division of the island.

As a result, the protection of the natural environment and the restoration activities of the historical places became the major tools for both the Greek and Turkish Communities to get into cooperation and to create a ground for a mutual dialogue. Thus the dichotomy between the North and South disappears in that sense. In addition, the

environmental NGOs which are small and lack the means or support in Cyprus now have the chance to achieve a greater impact through bi-communal cooperation. Consequently,

“the buffer zone can never be a barrier to air pollution, water depletion, disease or any other organizations across the island” (UNDP, 2005).

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