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**MEDITERRANEAN STRATEGY FOR SUSTAINABLE DEVELOPMENT**

***Environment Sustainability for Shared Prosperity***

**Draft report**

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## **MEDITERRANEAN STRATEGY FOR SUSTAINABLE DEVELOPMENT:** ***Environment Sustainability for Shared Prosperity***

### ***INTRODUCTION***

#### **Why a Mediterranean Strategy?**

Strategies and action plans have already been adopted at the international level and national measures are being taken along the lines required for sustainable development. The World Summit on Sustainable Development called for regional and national strategies in recognition that sustainable development cannot be achieved in isolation and that international prescriptions have to be adapted to local circumstances and the conditions of the eco-region.

Despite the progress made, there is a latent but growing awareness throughout the Mediterranean that current development trends are unsustainable.

Mediterranean people are becoming increasingly aware that it is just not possible to keep using resources, building up coastal areas and developing industries, especially tourism, without an adequate integrated planning framework and necessary policy reforms.

Yet there are cases where action is being taken, sometimes at a very high level, to achieve sustainable development. The EU and certain Mediterranean countries are making progress in the formulation and implementation of their own sustainable development strategies, and certain project activities have succeeded in improving the integrated management of resources, particularly in coastal areas.

The Mediterranean is an eco-region with a unique heritage and very specific features. These include a fragile but rich environment and a great difference in development levels and governance systems between its southern and northern shores. The purpose of the Mediterranean Strategy is therefore to adapt international commitments to regional conditions and to initiate a dynamic partnership between countries at very different levels of development. By making a public and high profile commitment to sustainable development and to report on the progress achieved, countries which have achieved a higher level of development than others, as well as donors and the other partners concerned, will help to create and sustain a common process in which much greater attention is paid to achieving harmonious growth throughout the region while preserving the ability of future generations to meet their needs.

The very future of the Mediterranean depends on ensuring that development patterns are sustainable throughout the region. Through its legal system for the protection of the environment, known as the Barcelona system, and its Regional Commission for Sustainable Development, the Mediterranean is already a pioneer in environmental matters and sustainable development approaches. The Mediterranean Strategy for Sustainable Development offers another chance for the region to make history through genuine partnership and co-development for a common vision of a Region characterized by peace, stability and shared prosperity

#### **Background and Rationale for a Mediterranean Strategy**

At the 12th Conference of the Contracting Parties to the Barcelona Convention (Monaco, November 2001), the 21 Mediterranean coastal States and the European Community decided to prepare a "Mediterranean Strategy for Sustainable Development" (MSSD). They requested the Mediterranean Commission on Sustainable Development (MCSD) of the Mediterranean Action Plan (MAP) to develop a draft of the Strategy. The 2nd Euro-Mediterranean Ministerial Conference on the Environment (Athens, July 2002) endorsed this initiative, which was announced at the World Summit on Sustainable Development (WSSD, Johannesburg,

September 2002), with the acknowledgement that the MCSD was the appropriate context for its formulation.

Sustainable development is a global objective that aims to respond to current needs without compromising the abilities of future generations to meet their own needs. The Millennium Development Goals, approved by 189 countries in September 2000, and the Johannesburg Plan of Implementation, adopted in 2002 by the WSSD, emphasize the urgent need for greater commitment to reduce inequalities and assist in the development of poor countries. They also emphasize the need to change unsustainable patterns of production and consumption, protect and manage natural resources in a sustainable manner for economic and social development, safeguard health and integrate the objective of sustainable development more effectively into the process of globalization. The World Summit also called for the development of regional partnerships.

The Mediterranean Strategy calls for action to pursue sustainable development goals with a view to strengthening peace, stability and prosperity, taking into account the weaknesses of the region and the threats that it faces, as well as its strengths and opportunities. It also takes into consideration the need to reduce the broad gap between developed and developing countries in the region. The challenge for all Mediterranean countries is to use the Strategy as an opportunity to make coordinated and joint progress in the field of human and economic development, environmental protection and cultural advancement.

The MSSD is based on the *Vision and Framework Orientations*, which have already been endorsed by the MCSD and the Contracting Parties. Moreover, a set of Strategic thematic notes related to each of the priority fields of action were prepared in a broad-based participatory process and constitute a reference point for additional action.

During the process of the formulation of the Mediterranean Strategy, valuable inputs were provided by the assessment and prospective documents prepared by various MAP components as well as by other Mediterranean cooperation networks. The Strategy is intended to adapt to the regional context and provide a regional stimulus for the implementation of the relevant Millennium Development Goals (MDGs) and the Johannesburg Plan of Implementation, based on recent developments in regional cooperation, with particular reference to the Mediterranean Action Plan and the Euro-Mediterranean Partnership, the Arab Initiative for Sustainable Development and the EU Sustainable Development Strategy. The EU Strategy directly concerns Mediterranean EU Member States and countries likely to become EU members. It also indirectly affects the EU's Mediterranean neighbours in setting the requirement that all Community policies must place sustainable development as their priority.

The Mediterranean Strategy is a *framework strategy*. As such, it consists of both strategic orientations and proposed actions. It is designed to strengthen the commitment and solidarity between countries on both the southern and northern shores of the Mediterranean through sustainable development and calls upon countries to transpose these orientations and actions into national sustainable development strategies. It is also aiming at strengthening and rationalizing regional cooperation between concerned partners for promoting and jointly implementing the Strategy's objectives. In so doing, it is designed to play a catalytic role in leading decision-makers and all civil society actors to implement national, sectoral and local strategies for sustainable development. It therefore aims to reinforce partnerships between countries, communities, enterprises and civil society, based on broad cooperation and solidarity. It invites countries to make the commitment to implement pilot actions and enter into joint partnership initiatives. It is based on the assumption that the achievement of sustainable development is the long-term commitment of all governments and peoples of Mediterranean countries and the EU and that it constitutes the expression of their determination.

## **1. TOWARDS SUSTAINABLE DEVELOPMENT IN THE MEDITERRANEAN: THE NEED AND THE WAY FORWARD**

The environment in the Mediterranean forms the basis for the development of the region, and it is crucial to put an end to the environmental degradation that is already giving rise to very high economic and social costs. The region also needs to redirect its development to meet the economic and social needs, which are considerable in the South and East, without increasing the process of environmental degradation.

The Strategy therefore focuses on environmental concerns. However the economic, social and cultural aspects of sustainable development also have to be given due importance, as environmental concerns are inextricably linked to the economic, social and cultural dimensions.

As a basis for building up a dynamic regional process of sustainable development, the Strategy outlines the main needs and challenges in the region, before going on to identify four major objectives and sets of actions to be carried out in seven basic priority fields of action. A set of indicators, annexed to this report, will be used for following the implementation of the MSSD.

### **1.1. Sustainable development, a vital necessity to meet developmental challenges in the Mediterranean**

In general terms, the environmental challenge is the most critical. With a degraded environment, the Mediterranean is in grave danger of losing the main assets which make it so unique, especially in agriculture and tourism, which are the main pillars of the economy at the regional level. Continued poor management of scarce natural resources, with particular reference to water, agricultural land, energy and coastal zones, will compromise economic development, the quality of life and social stability. Population dynamics and unemployment together with the entrepreneurial sluggishness and social concerns will add to these pressures. Moreover, without improved regional cooperation and governance mechanisms, the globalization process might worsen the negative trends.

#### ***The environmental challenge***

In recent decades, environmental degradation has accelerated. Much of this degradation is irreversible.

- Valuable agriculture land is being lost to urbanization and salinization. More than 80% of arid and dry areas are affected by desertification and the consequences will be exacerbated by the impact of climatic change.
- Scarce, over-used water resources are threatened with depletion or degradation.
- Urban standards of living and health are being degraded by traffic congestion, noise, poor air quality and the rapid growth of waste generation.
- Coastal areas and the sea are affected by pollution and coastlines are being built up and/or eroded, while fish resources are being depleted.
- The unique landscapes and biodiversity of the region, ranging from densely populated coasts to marginalized inland areas, are being disrupted by over-exploitation in many cases and abandonment in others.
- The unique Mediterranean culture is not sufficiently promoted as a basic economic and social asset, and its diversity is threatened by globalization.
- The global environment is threatened by climate change, which has major potential impacts for the Mediterranean eco-region.

Although it is difficult and risky to assign specific values, the costs of environmental degradation are clearly very significant. In addition, the region is increasingly vulnerable to flooding, landslides, earthquakes, tsunamis, droughts, fires and ecological imbalances, which have a direct and immediate impact on the livelihood and welfare of a large proportion of the population.

The potential increase in environmental pressures on coastal regions over the coming 20 years is considerable, particularly in the areas of tourism with 137 million more visitors, transport which is projected to more than double in volume), urban sprawl (to house 33 million more people and energy infrastructures. The continued spread of unsustainable production and consumption patterns is likely to increase the costs of environmental degradation dramatically.

The people of the Mediterranean are now much more aware of the threats to their environment and their unique natural and cultural heritage. Important policy initiatives which have been adopted in almost all countries show that solutions can be found which are adapted to the specific characteristics of the Mediterranean's problems, regions and cultures. Nevertheless, such efforts are too few in number to reverse current unsustainable development trends. Unless significant changes are made, the Mediterranean, the world's leading tourist region, could enter a period of crisis and a spiral of decline based on the loss of its major assets and resulting in a generalized deterioration in living conditions.

### ***The demographic, economic and social challenges***

There is a stark contrast in the demographic situation in countries to the North and South of the Mediterranean. Northern Mediterranean countries are faced with the problem of an ageing population. In southern and eastern countries, population growth is still a major issue, with an increase of 90 million people expected by 2025. However, a spectacular fall in fertility rates over the past ten years is now resulting in a demographic transition in these countries.

Although it is traditionally a region of trade and transit, the Mediterranean has only occasionally succeeded in being competitive on international markets. Despite the success of some dynamic growth poles and clusters, all too often its enterprises, which are mostly small and medium-sized, lack dynamism and competitiveness. They have not generally stood out in terms of innovation, as they were based for too long on a 'rent economy', fostered by a mining-like exploitation of the region's geographical location and natural resources.

The economic challenge in the North is now largely related to the ageing of the population and unemployment. In the southern and eastern Mediterranean countries, the active population is increasing rapidly. As a result, the region is facing a dramatic problem of unemployment, particularly among youth. The North is not able to absorb the considerable pressure for emigration from southern and eastern Mediterranean countries, which are faced by the need to create over 30 million new jobs by 2025. Unlike in comparable regions in other parts of the world, these countries have not yet managed to 'take off' economically and average GDP per capita in purchasing power parity of several for them is still one-fifth of the level in Mediterranean EU countries.

Social issues are also a major concern in southern and eastern Mediterranean countries. Despite progress, they are still backward in terms of literacy and gender equality. Poverty, especially in rural areas, is still a dominant problem in many countries, although there is relatively little extreme poverty. The situation is aggravated by the un-equitable distribution of wealth. The populations of many southern and eastern Mediterranean countries also suffer from insufficient access to safe drinking water and sanitation.

Even though the adequacy of the integration of environment and development is one of the main policy concerns in European countries, the major issue for other countries in the region is still economic growth and development with appropriate social policies.

### ***The challenges of globalization, regional cooperation and governance***

The challenge of globalization requires widespread regional cooperation, political stability, efficient governance and social protection. Yet the situation of Mediterranean countries in fulfilling these conditions is very asymmetrical.

Integration into the EU has considerably improved the political and economic situation of Mediterranean EU Member States (Spain, Portugal, Greece, and now Slovenia, Malta and Cyprus). Further enlargement of the UE, with the possible membership of other East Adriatic countries and Turkey, would reinforce this trend and lead to greater convergence in terms of political, economic and environmental policy. Mediterranean EU countries are facing the challenges of globalization with the strong backing of the European Union.

The southern and eastern Mediterranean countries, which are of course faced with the same challenges of globalization, do not benefit from such dynamic regional cooperation. Established in 1995, the Euro-Mediterranean Partnership still needs a collective vision of sustainable development, as well as appropriate resources and commitment. The problem is compounded by inadequate levels of North-South and South-South cooperation and by the continuing conflicts, especially in the Near East, even though some longer-term political solutions appear to be emerging. In view of the slowness of democracy to spread, governance is weak and much needed political and structural reforms, particularly to improve respect for human rights and gender mainstreaming, are not being adopted sufficiently rapidly.

This trend of a cumulative political, social, economic and environmental divide between the two shores of the Mediterranean will, if the relevant reforms are not implemented on an urgent basis, result in growing instability and will accentuate existing levels of social and economic asymmetry. The alternative is to maximize complementarities and opportunities between the North and the South, in the context of joint and differentiated processes of sustainable development, to optimize the positive effects of globalization.

The long-term choice is therefore between unequal development in the North and the South or joint development built around a strong sense of common destiny in the region. From this perspective, the best chance for Mediterranean EU and non-EU countries to meet the challenges of globalization and compete successfully in the emerging multi-polar world is by joining forces and giving strength to an enlarged regional space, encompassing both Europe and the Mediterranean, and by ensuring that the Mediterranean is an area of stability, shared prosperity, democracy and tolerance.

## **1.2 A Mediterranean Strategy based on principles and a long-term vision**

### ***The underlying principles***

The underlying principle of the Mediterranean Strategy is that sustainability has to be based on the interdependence of its three pillars: economic growth, social equity and environmental protection. The environment, culture and development in the region are indissolubly interlinked and it is therefore not only vitally important but also increasingly urgent to make progress in accelerating towards sustainable development. To do this, it is necessary to create jobs on a large scale and to focus on alleviating poverty, although this also depends on policies which are partly beyond the scope of the Strategy. At the social level, it is vital to improve standards of living based on the principles of access to essential services and financial resources, the achievement of gender equality and equity between generations. Implementation of the Strategy also requires the promotion of improved governance, together with justice and full recognition of human rights. Approaches based on local development, civil society, the involvement of the private sector and NGOs, consultation of the multiple stakeholders, partnerships and corporate accountability have to be strongly supported.

In matters of international cooperation, the Strategy is based on the principles of solidarity and shared but differentiated responsibility between developed and developing countries. The strategic value of cultural diversity is reaffirmed and the need emphasized to avoid the

paradigm of a single developmental model. A future of un-equitable, unbalanced, standardized and wasteful development in the Mediterranean and its subregions has to be rejected and the collective determination promoted to overcome the risks and poor perspectives of the development trend scenario.

### ***A long-term perspective for the Mediterranean***

The Strategy is based on a long-term vision of a "sustainable" Mediterranean, which means a Mediterranean that is politically stable, prosperous and peaceful. This vision is based on a proactive choice of a "win-win" scenario in which the co-development of the North and the South is promoted, while exploiting the positive synergies of efficient environmental, developmental, economic and social management. Joint efforts are required to make progress in the sustainable management of resources and coastal zones, and to enhance natural and cultural diversity in the region. A dynamic of complementarities and exchanges between Europe and its Mediterranean neighbours will have to be developed based around a strong concept of a "shared destiny" and of common and differentiated responsibilities.

Once the strategy has been collectively endorsed, the region should move towards a model of a highly integrated eco-region within an enlarged Euro-Mediterranean area of prosperity and stability. Strong regional unity should emerge in the Mediterranean, where development will be based on recognition of the strategic value of the environment and diversity, with the community of countries being involved in the processes of governance for sustainable development, economic growth and the improvement of living standards.

In this scenario, the new Mediterranean will be able to participate successfully in globalization by enhancing its specificities, complementarities and synergies with neighbouring countries in the European Union and the League of Arab States. Domestic and inter-country economic and social divisions will be gradually reduced and the Millennium Development Goals achieved. Essential collective public goods will be protected, and in certain cases restored, while the management of natural resources will be greatly improved and they will be valued more highly. There will be much greater awareness among the people of the region of the enormous potential of the diversity and quality of their heritage for increased and diversified forms of tourism, developed in synergy with agriculture and other economic activities. Cities will become real vectors of regional development, while jobs will be created in new promising sectors, including research and development, access to basic needs, clean technologies and industries, water and energy saving technologies, high quality agriculture and food products, the enhancement of biodiversity and public transport. The EU and its southern neighbours will have understood their mutual interests and recognized the benefits to be drawn, in a world of global competition, from their complementarities and exchanges.

The EU and the developed countries on the northern shore will have an important role to play in building this new Mediterranean. They will have to engage in vigorous aid policies to promote co-development in the North and the South. The EU and its Mediterranean partners will also have to work together to develop democratic processes, strengthen institutional capacities, improve governance and consolidate the peace process in regions of conflict. The implementation of the Strategy through a Euro-Mediterranean Partnership focussing on sustainable development will help Mediterranean countries achieve these aspirations much sooner.

### **1.3 Four major objectives**

To achieve progress towards a sustainable Mediterranean, the following four objectives are established with the aim of promoting progress towards sustainability in the economic, social and environmental areas and in the field of governance.

***Objective 1: Contribute to economic development by enhancing Mediterranean assets***

Implementation of the Strategy is intended to enhance economic development so as to respond to the demand for employment and to social needs, reduce the income gap and asymmetry between developing and developed countries and promote growth, while reducing pressure on natural resources. This should lead to a more sustainable equilibrium between the satisfaction of the population's needs, the requirements of economic development and environmental protection.

To meet the goal of employment and income generation, regional and national initiatives will be supported which are aimed at reinforcing international and private investment, as well as public development aid in Mediterranean countries, with special emphasis on southern and eastern countries. To this end, emphasis is placed on enhancing the opportunities deriving from the future Euro-Mediterranean common market and relationships with other Middle Eastern countries, while also encouraging bilateral investment partnerships between northern and southern countries.

To attain these goals, the Strategy calls for cumulative flows of added value to be drawn from the region's unique cultural and natural assets, while also exploring new avenues for the promotion of innovation, skills and culture. New activities should therefore be promoted in services, clean production, new technologies which reduce the consumption of natural resources, including the promotion of SMEs-SMIs as a vehicle for economic development and employment generation. Stronger local interactions are needed between the private sector and training and research, together with the creation of dynamic local clusters of enterprises. A more balanced distribution of new activities in developing countries also has to be sought to provide local job opportunities, thereby helping to limit the brain drain. Balanced regional development, avoiding the excessive concentration of activities in coastal areas, will also have to be encouraged.

***Objective 2: Reduce social disparities by implementing the Millennium Development Goals***

The development of human resources and the fostering of the capacities of all the various actors is of crucial importance. The protection of the environment, economic development and sustainable progress cannot be achieved while such a large proportion of the population is illiterate and lacks access to essential services. It is necessary to strengthen measures to foster gender equality, promote the role of women in society, support the upgrading of rural areas, which are too frequently ignored, and plan sustainable urban development. The promotion of Mediterranean cultural diversity, values and traditional knowledge is also vital.

To contribute to these objectives, the Strategy endorses the Millennium Development Goals (MDGs) with a view to improving living standards and gender equality.

***Objective 3: Change unsustainable production and consumption patterns and ensure the sustainable management of natural resources***

Development cannot be "sustainable" unless the irreversible changes that are affecting basic common goods are brought to an end and assistance is provided for the restoration of these common goods. The protection of the sea, the coast, the climate and air quality, water resources, soil and biodiversity, the accumulated knowledge of nature, the cultural and landscape heritage therefore has to be given priority, together with the reduction of exposure to natural hazards, such as floods, fires, droughts, earthquakes and tsunamis. The continuing degradation of soils, landscapes and coastal areas must also be halted and the objectives of the Earth Summit fulfilled by protecting and enhancing marine, coastal and continental biodiversity.

It is vital to break the links that make economic development dependent on a corresponding, or even more intensive exploitation of natural resources, and therefore to "decouple"

economic growth from increased environmental pressure. To this end, change must first be promoted in consumption and production patterns through the use of clean technologies, suitable infrastructure, more efficient public transport and renewable sources of energy. The management of water, energy, soil and coastal area resources must also be improved, and the growth in waste generation and pollutant emissions reduced. Such a "decoupling" will benefit both enterprises and the environment, thereby offering a win-win scenario

***Objective 4: Improve governance at the local, national and regional levels***

Broadly based sustainable development is only achievable with appropriate governance, which requires the exercise of power to be carried out in an environment of openness, participation, accountability, effectiveness and coherence. The Mediterranean Strategy therefore endorses the Johannesburg Plan of Implementation, which calls for sound environmental, social and economic policies, democratic institutions responsive to the needs of the people, the rule of law, anti-corruption measures, gender equality and an enabling environment for investment as the basis for sustainable development. Indeed, without more efficient governance and the active participation of the various actors, none of the other objectives of the Strategy will be attained. To that end, regional and national efforts for better governance, participatory local development, the involvement of civil society and NGOs and partnerships with the private sector will have to be supported.

Emphasis also has to be placed on the importance for environmental management of integrated territorial planning under a system of shared responsibility. This requires the development of networking and dialogue between actors, the dissemination of knowledge and training in efficient management practices. Regional and subregional cooperation will also have to be promoted between Mediterranean countries, particularly through the development of more efficient and rational channels of participation and working procedures.

Finally, an important component of the Strategy is the development of synergies in the process of implementing global Conventions, including the UN Framework Convention on Climatic Change and the Kyoto Protocol, the Convention on Biological Diversity, the Convention to Combat Desertification and the UN Convention on the Law of the Sea, in relation with the Barcelona Convention and other relevant regional instruments.

**1.4 Seven priority fields of action and synergy**

In order to contribute to the achievement of these four major objectives, seven interdependent priority areas of action and synergy are identified below in which it is essential to make real progress. They are:

- better management of water resources and demand;
- better management of energy demand and the mitigation of the effects of climate change;
- sustainable mobility through appropriate transport management;
- sustainable tourism as a leading economic sector;
- high quality agriculture and sustainable rural development;
- sustainable urban development; and
- sustainable management of the sea, coastal areas and marine resources.

These priority areas of action have been chosen for several reasons:

- They are those most threatened by unsustainable trends. Among them, special attention should be paid to issues relating to the sea and coastal areas, which constitute the common goods of Mediterranean peoples.
- They are also crucially important areas at the economic and social levels, offering a strong potential for improvement. However, it is acknowledged that considerable efforts also have to be made in other sectors, particularly industry, to meet the challenges facing the region.
- These seven priority areas are ripe for action and demonstrate all the shortcomings in governance and integration that need to be corrected if the region is to be able to engage in a process of sustainable development.

The matrix in Appendix 1 sums up the logical framework of the Strategy and indicates the inter-relationships between the four objectives and the seven priority areas of action.

## **2. ACHIEVING PROGRESS IN THE SEVEN PRIORITY FIELDS OF ACTION**

The objectives, orientations and actions proposed for the seven priority fields of action are merely *indicative*<sup>1</sup>, as they are intended to be applicable throughout the region. Although identified separately, the proposed actions are highly interdependent and are more likely to be successful when carried out in convergence and close association with related actions in other areas.

The proposed actions are intended to be implemented by all the parties concerned and attention should be paid to selecting the most cost-effective solutions, including impact assessment studies where appropriate, and market tools. The implementation of these actions clearly has a cost. The necessary funds could come from direct savings in infrastructure and the use of natural resources, in reduced levels of pollution and environmental degradation (which have been estimated to account for between 3 and 5 % of GDP), from policy reforms and, of course, from international cooperation.

Countries or groups of countries are faced with significantly different situations and challenges and may need to adopt specific approaches and objectives. Although consistency is desirable in regional and subregional approaches, as outlined in the common Strategy, specific national goals will clearly have to be defined or adjusted in line with each national strategic and planning framework. 'Pilot actions', with limited cost and potentially high visibility, should be proposed during implementation as a means of accelerating change and of demonstrating political commitment to sustainable development. In addition to the actions proposed below, the implementation of the relevant and already adopted MCSD recommendations and actions should be strengthened.

### **2.1 Improving integrated water resource and water demand management**

Water is a scarce, fragile and very unequally distributed resource and climate change is expected to lead to more irregular and lower volumes of rainfall. The shortage of water, due to irregular rainfall and aridity, is a major constraint for agriculture. Irrigation is the largest consumer of water. The number of persons in the region with fewer than 1 000 cubic metres of water a year is currently 108 million and may reach 165 million by 2025.

National strategies have favoured supply-side policies through the construction of dams and boreholes. However, many dams in southern and eastern Mediterranean countries will lose most of their storage capacity because they are becoming silted up and few countries will still be able to exploit them in the long term. Aquifers, many of which consist of non-renewable fossil water, are being over-exploited or irreversibly degraded by saline intrusion. Hydrological systems are deteriorating as a result of the degradation and over-exploitation of catchment areas and the disappearance of wetlands. The management of cross-border water resources is a potential source of conflicts.

Many or most Mediterranean countries are faced with several water-related issues: how to manage their scarce water resources sustainably; how to secure access to safe drinking water for population groups who do not yet have it; and how to accustom individual consumers to practices which save water. The first challenge requires water demand management policies to reduce loss and misuse, the development of more added value through greater efficiency in irrigation and in the use of water in industry and urban areas; and the meeting of economic and social needs at reduced cost. It also requires the integrated management of catchment areas and wetland ecosystems and an increase in water supply, particularly through the development of non-conventional sources of water. The second challenge requires the achievement of the MDGs concerning access to safe drinking water and sanitation. The third

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<sup>1</sup> For the objectives of the Strategy, the base year is 2000, except if other years are mentioned. For the Millennium Development Goals the base year is 1990.

necessitates the strengthening of partnerships with local water users and water management bodies and awareness-raising campaigns on how to save water.

### **Objectives**

- Stabilize water demand through the reduction of water losses and the wasteful use of water (a reduction in demand in the North and a controlled increase in the South and East) and a significant increase in the water efficiency of agriculture and the added value per cubic metre of water used.
- Promote the integrated management of hydrographic catchment areas and wetlands ecosystems.
- Achieve the Millennium Development Goals concerning access to safe drinking water and sanitation and the reduction of water pollution.
- Promote participation, partnership and active association in the sustainable management of water.

### **Orientations and actions**

#### *Water demand management*

1. Determine precise global and sectoral efficiency goals in national strategies. Reorient water policies to integrate water demand management in agriculture and other sectoral policies and encourage demand-side approaches with the aim of improving water use efficiency, reducing unnecessary losses, implementing water saving techniques in irrigation and involving industry, tourism and cities in controlling waste water.
2. Establish appropriate fiscal and pricing systems and encourage investment in demand-side management and the development of financial mechanisms for the internalization of profits from water-saving measures; to that end, a regional framework will be prepared.

#### *Integrated water resource management*

3. Encourage the establishment, particularly in developing countries, of appropriate bodies/organizations for integrated surface and groundwater resource management.
4. Preserve and increase water resources through soil and water conservation measures, agricultural and forestry practices, small-scale irrigation, run off and spate irrigation, the recycling of drainage water and the mobilization of non-conventional sources of water.
5. Strengthen regulations, where appropriate, reduce the over-exploitation of groundwater and non-renewable water sources and promote the artificial replenishment of groundwater, where necessary.
6. Protect aquatic ecosystems and restore their regulating role.

#### *Access to water and sanitation*

7. Support investment to halve by 2015 the share of the population without access to safe drinking water and sanitation compared to 1990.
8. Promote the Mediterranean component of the European Union Water Initiative as a means of strengthening dialogue between countries of the two shores and cooperation with donors to support investments.
9. Strengthen regulations, where appropriate, and promote investment in waste water treatment plants to prevent and reduce pollution from urban and industrial sources.

#### *Water management governance*

10. Promote schemes for the integrated participatory management of water resources, including partnerships with local authorities, the private sector and NGOs.
11. Take action to educate the people on the need to save water.

## **2.2. Managing energy demand and mitigating the effects of climate change**

The energy consumption of Mediterranean countries, which are highly dependent on fossil fuels, has more than doubled over the past 30 years. Many Mediterranean countries have established pricing and tax structures that are not conducive to energy saving. Moreover, there is insufficient encouragement for renewable sources of energy. Should this trend continue, the Mediterranean's contribution to total global greenhouse gas emissions could rise from 7 to 9%. In addition, the region's energy dependence could greatly increase.

This situation is all the more undesirable in that the Mediterranean is among the most vulnerable regions to climate change, has a significant potential for renewable energy from natural sources (sun, wind, etc.) and could derive substantial savings from the rational use of energy. Policies which follow these orientations would encourage technological progress, create employment opportunities and increase productivity. The decisive implementation of the Kyoto Protocol would also provide short-term opportunities, in particular through mechanisms to strengthen regional cooperation and to fund sustainable development projects in Mediterranean developing countries which have ratified the Protocol.

### ***Objectives***

- Reduce the intensity of energy consumption and promote energy efficiency.
- Enhance the potential of renewable energy.
- Control, stabilize or reduce, as appropriate, emissions of greenhouse gasses.
- Mainstream measures for adaptation to climate change in national development plans.
- Increase access to electricity in rural areas, where necessary.

### ***Orientations and actions***

#### *Promote energy-saving policies and renewable energies*

1. Establish overall and sectoral objectives for the promotion of rational energy use and the development of renewable energies in national strategies for sustainable development. Desirable targets for reducing the intensity of energy consumption by 2015 could be in the range of 1.6% per year. Desirable targets for renewable energy by 2015 would be to meet 7% of the demand for energy, excluding CWR.
2. Encourage economic actors and domestic consumers to adopt sustainable energy-saving habits and approaches through pricing, subsidies, tax incentives and public awareness-raising campaigns, supported by NGOs. Encourage economic mechanisms and regulations designed to promote renewable energies.

#### *Support the implementation of the Kyoto Protocol*

3. Invite Mediterranean countries to cooperate in the implementation of the flexibility mechanisms of the Kyoto Protocol and in the preparation of the post-Kyoto phase and to favour carbon funds investment in the region.

#### *Adapt to climate change*

4. Mainstream the concept of adaptation to climate change in national policies. Develop plans to anticipate risks and adapt the most exposed Mediterranean areas, especially islands, to climate change.

#### *Access to electricity*

5. Support investment to improve access to electricity. A desirable target by 2015 (compared with 1990) would be to halve the proportion of the population in developing countries who do not have access to electricity.

### **2.3. Ensuring sustainable mobility through the appropriate management of transport**

Passenger and freight transport needs are growing faster than the rate of economic and demographic growth. In view of these trends, transport systems are not sustainable in the long term. The use of long-haul maritime transport and coastal shipping is expanding dramatically, resulting in major pollution and accident risks. Linkages between the two shores of the Mediterranean are generally insufficiently rational and competitive. Land transport is dominated by road traffic, which accounts for 88% of passenger traffic and 82% of freight. As it accounts for one-third of total energy consumption, transport in northern countries is a major contributor to greenhouse gas emissions and to pollution. Traffic congestion costs are steadily increasing. Trends in relation to transport in the southern countries give rise to the same concerns. They are often aggravated by systems of public investment, subsidies and taxation which favour mobility based on the use of private motor vehicles and roads, rather than collective forms of transport.

Although they raise difficult issues which have cultural and social dimensions, transport trends could be managed sustainably if appropriate regional and national policies were applied which anticipated expected developments. Some countries, and a growing number of local authorities, have shown the way by adopting policies which promote the more sustainable management of transport. Compulsory standards for motor vehicles are being applied in the European Union which are encouraging technological improvements. Promising results are also being attained by successful experiments in the combination of sea, rail and road transport.

#### **Objectives**

- Support regional and national initiatives to promote more competitive and sustainable transport systems and to improve Euro-Mediterranean transport linkages and networks.
- Encourage more integrated transport systems which ensure a better complementarity of road, rail and sea transport, including a significant shift from road to sea and rail.
- Improve the integration of transport policies into economic planning so as to achieve continued progress in "decoupling" the growth of motor transport from GDP growth.

#### ***Orientations and actions***

##### *Improve Euro-Mediterranean transport systems*

1. Develop before 2010 a sustainable Euro-Mediterranean transport framework, taking into account the objectives of the EU Sustainable Development Strategy and other relevant regional initiatives, such as the Euro-Mediterranean Transport Forum, the work undertaken by the League of Arab States on transport and the preliminary concepts for interlinkages prepared by the Union of Arab Maghreb.
2. Explore the possibility of extending to non-EU Mediterranean countries the benefits of the Marco Polo Programme for the development of road-sea modal transfers.

##### *Improve the integration of road, rail and sea transport*

3. Support investment and incentive policies to stabilize or reduce the share of road transport and promote alternative transport systems, in particular "sea motorways" and railways. A desirable objective by 2015 would be to scale down the road share to 75% of total traffic concerning number of passengers and volume of freight.
4. Reduce urban traffic congestion and pollution by promoting low pollution collective transportation systems at the local urban level.

##### *Decoupling transport growth and GDP growth*

5. Use economic instruments to internalize the real costs of transport into prices by 2025.

## 2.4 Promote sustainable tourism

The Mediterranean is the world's leading tourist region. Tourism is a major industry in terms of employment and income in the region and consists mainly of a seasonal seaside resort model.

The intense competition between tourist destinations is exacerbated by the business practices of major tour operators and the lack of local capacity to control unsustainable trends in the development of tourism. This has led to a certain standardization in the supply of tourist facilities, insufficiently controlled development and a loss of quality in several established or rapidly developing destinations. This situation has been encouraged by public policies which emphasize tourist numbers and the development of the related infrastructure, rather than added value, the enhancement of Mediterranean diversity and cultural and social development. While tourism is important for the economy in many countries, the benefits are unevenly distributed and the adverse environmental impacts in such areas as transport, noise, waste generation, the consumption of space, and the degradation of landscapes, coasts and ecosystems are not accounted for in national economic statistics relating to tourism.

Some 637 million tourists (international and domestic) are expected in the region by 2025, which means an additional 270 million in comparison with 2000. About half of them will stay in coastal regions. By anticipating these flows, there is a real opportunity to influence international and domestic tourism and to encourage a development towards more cultural and accountable tourism, which would favour inland areas and cities, environmental concerns and coastal protection and cultural and historical sites.

### **Objectives**

- Reduce the adverse territorial and environmental impacts of tourism, especially in existing coastal tourist areas.
- Promote sustainable tourism, which in turn reinforces social cohesion and cultural and economic development, enhance Mediterranean diversity and specificities and strengthen synergies with other economic sectors, especially agriculture.
- Increase the added value of tourism for local communities and actors in developing countries.
- Improve governance for sustainable tourism.

### ***Orientations and actions***

#### *Reduce the adverse territorial and environmental effects of tourism*

1. Identify good practices and produce an in-depth assessment of the progress made by 2008.
2. Promote a more balanced distribution of tourists between destinations and throughout the year, taking into account, in particular, the carrying capacity limitations of specific destinations, islands or countries.

#### *Promote the supply of sustainable tourist facilities and increase the added value of tourism for local communities*

3. Draw up by 2010, a 10-year promotional framework programme for the Mediterranean together with the Ministries concerned, the private sector, ecotourism professionals and promoters highlighting the assets of the Mediterranean heritage with a view to developing a "Mediterranean tourism quality label". Promote pilot action at the regional level with the support of national and sub-national programmes.
4. Develop "tourism pay-back" formulae so that tourists contribute to the preservation of the natural environment, cultural heritage and the sustainable development of their destinations.

5. Explore the possibility of implementing taxation systems based on transport, especially sea and air transport to islands, as a means of contributing to the sustainable development of these regions.
6. Adapt tourism more effectively to the constraints and opportunities offered by protected natural areas, especially with a view to preserving biodiversity and the natural and cultural heritage in regional parks, biosphere reserves and protected coastal areas.
7. Encourage countries to promote rehabilitation programmes in destinations where hotel facilities and tourism infrastructure are becoming obsolete, and where historical sites are poorly maintained.  
*Improve governance for sustainable tourism*
8. Improve coordination between countries and major operators to improve the harmonization of regulations and develop synergies at the regional level.
9. Strengthen the capacities of local authorities to manage the development of tourism and promote sustainable tourism.

## **2.5. Promoting high quality agriculture and sustainable rural development**

Agriculture in the northern Mediterranean countries tends to be concentrated in plains and foothills and is partly based on irrigation. However, water is not generally used efficiently. It is too frequently over-exploited and is often polluted and affected by salinization. Good quality farmland is increasingly being lost to urban development. These trends are also affecting modern agriculture in southern Mediterranean countries. Inland areas in developed countries, and particularly mountain areas, were abandoned extensively over the past century, with the environmental consequences including increased vulnerability to flooding and fires and a loss of biodiversity. These areas have experienced a decrease in traditional activities and have a low level of public services, but have benefited from the growth of tourism, residential economy and local agri-food products. However, their landscapes are often at risk of degradation, which is likely to be irreversible.

Agriculture in the southern and eastern countries still plays an important social and economic role, although productivity is generally low and little importance is accorded to the efficient and sustainable management of water and soil resources. While they are still numerous, despite emigration, rural inhabitants are mostly poor and have a low educational level. Rural women, who perform most of the farm work, are still socially marginalized, and have limited access to economic and financial tools. Considerable stress is being placed on natural resources, with dramatic results in terms of deforestation, erosion, the silting up of dams, reduced control of run-off water, desertification and an irreversible loss of biodiversity. For those concerned, emigration is seen as the main solution to a situation of persistent poverty.

The considerable disparities that already exist in agricultural productivity levels between developed and developing countries and between modern agriculture and subsistence farming are still widening. In addition, Mediterranean agricultural and rural models, which are at the origins of Mediterranean identity, are under increasing threat from the predominance of imported consumption patterns. This trend is illustrated in particular by the decline of the Mediterranean dietary model, even though it is proven that it offers a high nutritional value in return for relatively low energy inputs.

The prospective scenario for the expected impacts of trade liberalization, climate change and the lack of efficient rural policies offers a gloomy picture in some southern and eastern Mediterranean countries, with the prospect of aggravated regional imbalances, deeper ecological degradation and persistent or accrued social instability. There is a clear need for alternative sustainable agriculture and rural development strategies at the national and regional levels if progress is to be made in reducing rural poverty, revitalizing inland areas, developing internal and foreign market outlets and safeguarding environmental public goods. Increased international and domestic demand for high quality traditional Mediterranean food

and agricultural products offers a major opportunity to make Mediterranean agriculture more competitive at the global level. The region would also draw a considerable comparative advantage if ways could be found to increase the added value gained from its landscapes, culture, crafts, traditions and, in more general terms, by placing greater emphasis on the multifunctionality of agriculture.

### **Objectives**

- Consolidate the penetration of Mediterranean agricultural products onto global markets by controlling the process of liberalization at the Euro-Mediterranean level and by enhancing the comparative advantages of Mediterranean quality, including quality labels, organic agriculture and traditional products.
- Promote the technical and commercial adaptation of Mediterranean agriculture with a view to increasing its added value and exploiting in a sustainable manner the factors of production that are under the greatest threat, namely water and soil.
- Ensure the future of rural communities and reduce poverty by providing rural infrastructure and basic services, diversifying the rural economy and improving local governance.
- Reduce the irreversible loss of agricultural land, biodiversity and the degradation of the landscape and improve its adaptation to climate change.

### **Orientations and actions**

#### *Controlled liberalization and the promotion of high quality Mediterranean products*

1. Promote of the risks of accelerated liberalization and emphasize the need for a gradual and asymmetrical approach to liberalization, in particular to protect vulnerable rural populations in developing countries from the adverse effects of an over-rapid opening up of trade.
2. Coordinate regional and national initiatives for the integration of sustainable rural development issues into future Euro-Mediterranean neighbourhood agreements and programmes.
3. Develop a regional policy to enhance recognition of the quality of traditional Mediterranean agricultural products, such as wine, olive oil, vegetables, fruit, flowers, durum wheat and animal products. Create a conducive regional environment to help countries develop policies and efficient procedures for the labelling and quality certification of Mediterranean food products and to promote the Mediterranean diet.

#### *Promote productive and rational agriculture*

1. Implement agricultural policies in developing countries aimed at rationalizing agricultural structures, including land, education and training, access to credit and market and professional organizations.
2. Promote and/or reinforce the establishment of networks between Mediterranean countries to disseminate and apply sound and innovative agricultural practices, in particular the reduced consumption of water and fertilizers, and to promote organic agriculture, the use of alternative sources of energy and the restoration of soil fertility.
3. Promote regional consultations with Mediterranean countries with a view to adapting to their specific needs the existing legal framework that ensures the sovereignty of countries in matters of gene pools, biodiversity and the right to control the use of GMOs in conformity with the Cartagena Protocol.

#### *Rural development and local governance*

1. Encourage national efforts to promote sustainable rural development schemes and programmes based on local development with the aim of attenuating regional and social imbalances, according special attention to services, road infrastructure, water supply, sanitation, electricity and education, and ensuring economic diversification, especially through rural tourism, cleaner production, the agro industry and services.

2. Promote regional policies and encourage national programmes to enhance the multifunctionality of agriculture and, in particular its potential to contribute to the conservation of landscapes, traditional knowledge and skills and cultural heritage, through tourism and other economic activities.
3. Strengthen the negotiation and governance capacities of local communities and local actors, especially by encouraging local rural development initiatives and encouraging programmes to enhance the involvement of women in the decision-making process.

*Sustainable management of rural areas and of the Mediterranean natural environment*

1. Support the implementation of the international Conventions on desertification and biodiversity
2. Reduce the impacts of desertification and the irreversible loss of agricultural land and biodiversity. A desirable target would be to decrease by at least one-third by 2015 the current rates of the loss of high quality agricultural land through erosion, salinization, desertification, urban and other forms of development and abandonment. A desirable goal for biodiversity is to put an end by 2010 to the loss of continental biodiversity in the EU Member States and to reduce it substantially in other Mediterranean countries.
3. Promote, especially in poorer areas of developing countries, the establishment of sustainable rural development programmes, biosphere reserves, regional natural parks and contractually based local land use schemes to encourage local communities to manage farmlands, hilly areas and woodlands sustainably.
4. Expand protected areas, with the allocation of sufficient resources to obtain the commitment of local communities to these processes. A desirable target by 2010 would be for around 10% of all the Mediterranean land ecosystems to be under the status of a protected area.
5. Promote political decisions to protect agricultural areas from being built up, particularly through legally binding national and local land use planning schemes.
6. Promote adaptation to climate change by increasing scientific monitoring through appropriate observatories, the enhancement of research on dry farming techniques and the planning of alternative uses for agricultural areas that are under the greatest threat.

## **2.6. Promoting sustainable urban development**

In the northern Mediterranean countries, the size of the urban population is expected to stabilize. However, in most cases, the principles of sustainable development are not taken into account in urban development, as illustrated by the over-extension of urban areas, the excessively high level of energy consumption and wasted space, the high and growing production of domestic waste, the increasing cost and inconvenience of traffic congestion and the dangerous loss of social cohesion in urban areas.

In southern and eastern Mediterranean countries, urban issues are no less critical. In 20 years, there are expected to be nearly 82 million more urban inhabitants in these countries, at least one-third of whom will be located in coastal urban areas. If uncontrolled, such growth rates can only aggravate current problems, which are already alarming, as illustrated by the low levels of social cohesion, the spread of poverty, the expansion of informal settlements, which sometimes account for over 60% of new built-up areas, the rising levels of air pollution, the inadequate supply of clean water, ineffective waste management and the accumulated effects of these factors on the health of the population. Moreover, the problems are likely to get worse with current changes in consumption patterns.

Examples of successful urban renovation on both shores of the Mediterranean show the impact that Mediterranean cities, when properly managed, can have on sustainable development. The efforts that are currently being made are, however, far from sufficient. Fewer than 600 urban areas are reported to have made a commitment to Agenda 21 type processes. The reasons include, in particular, the limited technical and financial capacities of cities in developing countries, especially small and medium-sized cities, and the insufficient levels of decentralized cooperation between northern and southern cities, which is preventing effective networking to assist in the promotion of sustainable urban development.

## **Objectives**

- Promote a sustainable urban economy and approaches to development planning which anticipate the forecast growth in the urban population in the coming decades.
- Integrate into economic and spatial planning the exceptional cultural, historical and landscape assets of Mediterranean cities.
- Improve the quality of urban life by reducing negative environmental factors (air pollution and waste generation), as well as social disparities and inequalities in access to services, particularly in southern and eastern Mediterranean cities.
- Improve urban governance while strengthening solidarity between Mediterranean cities.

### ***Orientations and actions***

#### *Anticipate and plan for expected urban growth*

1. Develop alternative urban models with a view to integrating informal settlements into cities and cope with the expected rates of urban growth through the development of alternative new settlement areas and smaller satellite towns adequately linked by transport. Promote the development of local Agenda 21 processes, strategies, planning and urban renewal programmes based on the involvement of the inhabitants, associations and enterprises in joint projects for urban renewal and in public/private partnerships.
2. Promote urban spatial planning which articulates transport planning policies with the expansion of cities, the creation of green areas and parks and the protection of peri-urban agricultural areas, natural areas and historical urban centres.

#### *Enhance the value of the heritage of Mediterranean cities*

3. Promote the identity of Mediterranean cities internationally through a labelling policy designed to draw added value from their cultural, historical and landscape heritage.

#### *Improve the quality of life and reduce inequalities*

4. Set precise objectives in national sustainable development strategies to raise the profile of urban environmental issues in the following fields:
  - air quality monitoring systems. A suitable objective would be for such systems to cover all major Mediterranean urban areas by 2015 and to promote a Mediterranean network for the exchange of epidemiological information and studies on issues relating to urban areas.
  - the reduction of urban air pollutants such as CO<sub>2</sub>, particulate matter and lead, through appropriate vehicle standards, urban traffic policy, the strengthening of public transport networks, the diversion of heavy traffic and the use of clean fuels. A suitable objective would be to achieve a 30% share of clean fuels, such as LPG, NGV bio-fuels, electric and hybrid vehicles, as well as the extensive use of unleaded fuels, by 2015.
  - the management of domestic waste, including the reduction of waste generation and the recycling and rational disposal of packaging. Suitable objectives by 2015 would be to decouple the increase in waste generation and GDP growth so as to reduce the current rise in waste generation by around 50%, double recycling rates and transform at least half of current waste dumps into sanitary landfills.
  - the adoption of housing policies which reduce the proportion of low quality and slum housing and the number of houses exposed to an excessive level of noise and promote energy saving housing.
  - the treatment of municipal waste waters, in conformity with the provisions of the LBS Protocol to treat them all by 2025.
  - promotion of urban transport policies which give priority to collective transport.

*Improve urban governance*

5. Strengthen opportunities for political action at the urban level through decentralization, the reinforcement of the capacities of local authorities, an increase in the relative share of local taxes in total fiscal revenues, the enhancement of partnerships between cities and central governments in the fields of housing, sanitation and transport and the development of training programmes on sustainable urban management.
6. Develop decentralized cooperation between Mediterranean cities and local authorities, gradually extending URBAN-type programmes to SEMC areas. Initiate a regional cooperation and natural risk management mechanism to which the Mediterranean cities would contribute.

## **2.7. Promoting sustainable management of the sea and coastal zones and taking urgent action to put an end to the degradation of coastal zones**

Although representing only 0.7% of the earth's ocean surface, the Mediterranean Sea carries 30% of the world's maritime traffic. Pollution from ships is mainly of an "operational" nature, including illicit oil discharges and ballast water. However, the risk of accidents remains high, despite prevention policies.

As coveted development areas, coastal zones constitute a necessary or priority focus for numerous activities and a fragile space of major ecological, social and cultural value. The accumulation of stress factors is considerable. Holiday home urbanization, illegal construction and the building up of coastal areas, land-based pollution (which accounts for up to 80% of total marine pollution), waste generation, the extraction of sand and water, the poor management of catchment areas, certain leisure activities, fishing and aquaculture practices and invasion by exogenous species are all resulting in a spiral of degradation. This situation is leading to the deterioration of landscapes, cultural heritage sites and living standards, salt-water invasion and coastal erosion, the destruction of sand dunes, wetlands and sea-bed meadows, and the often irreversible loss of underwater and coastal biodiversity. The human and economic costs, which include the loss of local jobs, are increasing, for example as a result of the over-exploitation of fish resources.

It is necessary to forestall these trends. Without policy changes, vast inter-connected urban areas will develop in coastal regions and nearly 50% of the 46,000 km of Mediterranean coastline may be built up by 2025, compared with about 40% in 2000. There may well be a considerable rise in the costs of environmental degradation and vulnerability to hazards, such as flooding, tsunamis and maritime pollution. There is also the risk of a growing disparity of responses between current and future EU Member States and other countries. New EU Member States are subject to stringent environmental management standards, such as the Water Framework Directive, the Erika Packages 1 and 2 and the Birds and Habitat Directives, and in return benefit from substantial assistance programmes and Community funds. Other countries have no such support, and are faced with much higher rates of urban, industrial and tourist growth in their coastal areas, which constitute a vital asset for their development.

The variety of situations calls for differentiated strategies. In some degraded areas, the emphasis should be on restoring lost assets, while in other areas it would be more advisable to anticipate degradation so as to safeguard and promote development based around the protection of the environmental, cultural and social heritage.

Much progress has been made in regional cooperation, with the extension of the Barcelona Convention to the protection of coastal areas, the evolution of MAP and the gradual implementation of measures to prevent and reduce pollution and protect biodiversity and the cultural heritage. However, the relative percentage of protected coastal areas is still very inadequate and the implementation of the Protocols and action plans adopted under the Barcelona Convention is moving at a slow pace. Laws, agencies, land surveys, economic tools, master plans and jurisdictions are still not adequate to ensure the integration of environment and development. In numerous countries, the protection of coasts, integrated

costal zone management and the mobilization of international funding and local and professional actors to combat pollution must be improved.

### ***Objectives, orientations and actions***

#### ***Strengthening regional cooperation***

Rationalize regional cooperation and promote implementation of regional programmes of actions with adequate means

1. Ensure the implementation of the Barcelona Convention, its Protocols and action plans and the related recommendations adopted by the Contracting Parties.
2. Support actively the elaboration and implementation of the EU Marine Strategy.
3. Strengthen subregional approaches.
4. Strengthen regional solidarity, synergies between the various regional cooperation frameworks and financial mechanisms to help developing countries attain the objectives set out in this Strategy. Support capacity building for integrated coastal management, raise public awareness and consider the establishment of a fund to enable private sources and local communities to finance the conservation and sustainable management of the Mediterranean coast. Ensure the constant monitoring of the actions and measures implemented.

#### ***The integrated management and development of coastal zones***

Promote the balanced and integrated management and development of coastal zones. Guarantee unhindered access to the coast for everyone. Preserve, enhance or restore the coastal heritage. Avoid linear and continuous urbanization. Reduce the vulnerability of sensitive areas to natural risks.

1. Adopt by 2007 a Protocol for the Integrated Management of Mediterranean Coastal Zones and implement related regional strategy.
2. Take account of the fragility of the environment in planning and development. Prevent continuous and linear urbanization of coastal areas by avoiding the construction of new roads parallel to and alongside the coast. Enhance the heritage of coastal areas, including traditional productive activities which form part of its identity, maintain agricultural and wooded green belts and establish ecological corridors.
3. Carry out environmental impact studies or strategic environmental assessments, as appropriate, for all new infrastructure, plans, programmes or policies affecting the sea or coastal zones, which factor in sustainability, and strengthen systems and capacities for their implementation.
4. Insofar as possible, adopt laws, mechanisms and tools for integrated coastal zone management by 2012 in countries which do not yet have them.
5. Promote integrated management approaches and projects for coastal zones and catchment areas, with the involvement of local authorities, enterprises and NGOs, so as to achieve greater efficiency, coordinate a limited number of practical issues and mobilize donors.
6. Assess the vulnerability of coastal zones to natural and technological risks, prohibit construction in high-risk areas and integrate risk prevention into urban development plans. Adopt contingency plans for all vulnerable coastal spaces by 2010, including the implementation of prevention exercises to mobilize the populations concerned.
7. Implement specific plans for the sustainable management and development of islands.

### ***Preventing and reducing pollution from ships***

Prevent and combat marine pollution from ships by achieving the goals set out in the Regional Strategy for Prevention of and Response to Marine Pollution from Ships. Eliminate operational pollution from ships by 2025.

1. Fully implement the Regional Strategy for Prevention of and Response to Marine Pollution from Ships. Increase EU aid and support for its implementation.
2. Request EU and Black Sea coastal States to engage in coordinated action for the prevention and reduction of pollution from ships, taking into account the similarities between the situations in the Mediterranean Sea and the Black Sea and the need for common action.
3. Identify, in conjunction with the appropriate MAP Regional Activity Centres, those areas which should be designated as Particularly Sensitive Sea Areas (PSSAs), and obtain the necessary approval and support from IMO.

### ***Preventing and reducing land-based pollution***

Prevent and reduce land-based pollution by achieving the goals set out in the Strategic Action Programme to address Land-based Sources of Pollution, adopted in 1997.

1. Implement without delay the National Action Plans for combating pollution from land-based sources in order to meet the objectives set out in the Strategic Action Plan adopted in 1997 for the implementation of the LBS Protocol. Reduce pollutants from industrial sources, such as the reduction of BOD by 50% by 2010 and the reduction of the generation of hazardous waste by 20% by 2010. Equip all coastal cities with over 10,000 inhabitants with systems for the environmental management of solid waste by 2015. Halve by 2015 the number of coastal urban inhabitants with no access to sanitation.
2. Identify bilateral and international funding for the establishment of a system to provide support for the implementation of the National Action Plans and help equip coastal cities in developing countries to address land-based sources of pollution, giving preference to cost-effective technologies. Invite the EU to strengthen its support for the related public investments through partnerships with Mediterranean countries.
3. Continue and increase capacity-building programmes for developing countries, cities and enterprises for the management and treatment of waste and effluent by mobilizing international environment funds and maximizing synergies with MAP, METAP and the various networks of local and professional actors. Promote environmentally sound production processes, products and services through the development of voluntary initiatives and reduce waste generation by adopting the "3R" approach (reducing, reusing and recycling).

### ***Protecting marine and coastal biodiversity and marine resources***

By 2010, put an end to the loss of marine and coastal biodiversity in EU Member States and reduce it substantially in other Mediterranean countries in accordance with the commitments made at the international and European levels.

Bring Mediterranean fisheries under a comprehensive ecosystem-based management system and restore depleted Mediterranean fish stocks by 2015 at the latest, in line with the commitments made at the WSSD. Regulate the development of aquaculture so as to minimize its environmental impacts and conflicts with other uses of coastal areas.

1. Actively implement the working programme on protected areas adopted by the Convention on Biodiversity in accordance with the established schedule and goals.
2. Promote and complete the network of protected maritime and coastal areas so that it constitutes a comprehensive, effectively managed and ecologically inclusive national and regional system. The desired goal is to increase by 50% the area covered by protected marine areas by 2012 and bring at least 10% of coastal and marine areas, including the high seas and deep sea habitats, under some form of protection, in accordance with IUCN protected areas categories, by 2010.

3. Accelerate the implementation of the Strategic Action Programme for the conservation of Biological Diversity in the Mediterranean Region (SAP-BIO) adopted in 2003 and prepare for it to be updated so that it can be used as a tool for the implementation of the recommendations adopted by the 7th Meeting of the Parties to the Convention on Biological Diversity. Adopt, where necessary, National Action Plans for marine and coastal biodiversity.
4. Promote the creation of new generations of protected areas (public/private/local community partnerships, partnerships with coastal landowners, with the mobilization of local NGOs), and invite managers of protected areas to participate more actively in the promotion of sustainable development.
5. Establish at least 30 Specially Protected Areas of Mediterranean Importance (SPAMI) by 2012, of which at least one-third should be located in the eastern Mediterranean.
6. Ensure the coordination and synergy of activities carried out by international organizations and networks (such as MAP, IUCN, MedWET, the Berne Convention, ACCOBAMS, the Natura 2000 network and the EU Marine Strategy) to strengthen and extend the sustainable management of marine and coastal biodiversity.
7. Strengthen institutional capacities to consolidate the management of existing protected marine areas and prepare detailed management plans.
8. Encourage fishery and aquaculture practices that are in line with the protection of biodiversity and the sustainable management of marine resources. Strengthen the commitments and implementation devices under the Code of Conduct for Responsible Fisheries (FAO, 1995), the General Fisheries Commission for the Mediterranean, the International Commission for the Conservation of Atlantic Tunas and the Declaration by the Ministerial Conference for the Sustainable Development of Mediterranean Fisheries (Venice, November, 2003). Strengthen cooperation with MAP at the regional level, as well as between local fishing communities and the managers of protected areas at the local level.

### **3. MOBILIZING ACTORS, IMPLEMENTING THE STRATEGY AND MONITORING PROGRESS**

To be implemented effectively, the Strategy has to be supported by innovative and strong commitments to Mediterranean cooperation, effective national and local governance and efficient operational synergies at the regional, national and local levels. Regional orientations and policies should facilitate decision-making at the national and local levels by creating the required enabling environment. To do this, they have to assist in the integration of economic, social and environmental issues into policy and action, involve the partners concerned by the Strategy in an effective manner, include government institutions, civil society, private sector, regional organizations and financial institutions and develop the knowledge base needed for decision-making at all levels.

Such commitments imply profound changes and reforms. The Strategy's success therefore depends on the capacity of governments, local authorities, enterprises and other actors in civil society to promote convergence in their policies, decisions and actions. This requires the mobilization of human resources and the development of an appropriate institutional framework. It also requires the monitoring of its implementation, in which progress will necessarily be gradual and differentiated, starting with clearly identified short-term action to pave the way for longer-term action

#### **3.1. Mediterranean cooperation for sustainable development**

##### ***A regional space of solidarity and commitment***

As a result of the EU's enlargement process and its Community Assistance for Reconstruction, Development and Stabilization (CARDS programme), commitment and solidarity are already being strengthened in countries on the northern shore of the Mediterranean. In terms of sustainable development, it is necessary to improve the integration of the principles and goals of the European and Mediterranean sustainable development strategies in the process of enlargement.

The Euro-Mediterranean Partnership, initiated in 1995, constitutes a major political framework for the implementation of the Mediterranean Strategy. It is expected that the next steps in the EU's Mediterranean neighbourhood policy will integrate Mediterranean social and ecological issues more fully into the decision-making process so as to build a genuine policy of sustainable co-development.

A strengthened Euro-Mediterranean Partnership will provide Mediterranean countries with greater opportunities to achieve their aspirations. Sustainable development should be a guiding principle in the Euro-Mediterranean project and the neighbourhood policy. This renewal will have to be combined with strengthened synergies with other regional cooperation frameworks, and particularly with the Mediterranean Action Plan (MAP). The Euro-Mediterranean Partnership will gain much from this positive reorientation, which is of vital importance for the region's future. Policy renewal needs to guarantee the progressive enlargement of solidarity to southern and eastern Mediterranean countries, taking their specificities into account. Solidarities based on South-South cooperation will also have to be strengthened. In this respect, the League of Arab States and the Union of Arab Maghreb will have a dynamic and catalytic role to play in further promoting sustainable development in their member countries.

Other international institutions active in the region, such as FAO, World Bank, UNDP, the World Tourism Organization and other regional United Nations organizations, as well as facilities and programmes such as ICAMAS, CEDARE and METAP, will also have an important role to play in the implementation of the Strategy. Subregional approaches, such as the Adriatic and Ionian Initiative, the RAMOGE agreement and the Black Sea Environment

Cooperation Programme, should be strengthened and their convergence and complementarity with UNEP/MAP promoted so that they become active partners in implementing the MSSD .

***Orientations and actions***

1. Strengthen reciprocal commitments for Mediterranean and Euro-Mediterranean cooperation, domestic reform and European support for the upgrading of North-South and South-South cooperation.
2. Promote the integration of sustainable development principles and the goals of the MSSD into the EU's enlargement policy and the CARDS programme, on the one hand, and the Euro-Mediterranean Partnership and the neighbourhood policy, on the other. In this process, take fully into account assessments of the cost of environmental degradation, the problems identified by trend scenarios, the benefits of "win-win" scenarios and the proposals to be made in the Sustainable Impact Assessment of the Euro-Mediterranean Free Trade Zone.
3. Strengthen reciprocal agreements in areas of common interest, and particularly the environment, research and development and decentralised cooperation approaches, as well as in the seven priority areas of action.
4. Promote the revision of existing instruments, such as the EU/MEDA and FEMIP, to facilitate the implementation of the Mediterranean Strategy in all the components of the Euro-Mediterranean Partnership. Explore the possibility of expanding the benefits of Interreg, Urban, Leader and Marco Polo type programmes to the South and East of the Mediterranean. Expand the scope of Arab Funds to contribute to the implementation of the MSSD.
5. Develop innovative mechanisms to deal with the issue of debt, for example by converting it into research and development activities, programmes and twinning arrangements that mobilize local and professional actors around the Mediterranean and into pro-environmental programmes.
6. Study the possibility of developing a Mediterranean-wide agreement on investment that includes sustainability rules.
7. Invite the developed Mediterranean countries to increase initiatives and projects of a regional, subregional or bilateral nature that contribute to the implementation of the Strategy ("type-2 partnership initiatives").
8. Strengthen synergies with UNEP/MAP and other existing regional cooperation frameworks and networks and initiate a specific programme for sustainable development to contribute to the funding of the follow-up to the MSSD and of pilot projects.

***The Mediterranean Strategy as a model for the regional follow-up of progress and the promotion of sustainable development***

Sustainable development goals will be attained more effectively if they are monitored properly, based on close follow-up of progress in the implementation of the MSSD and the exchange of experience. Regular assessments should demonstrate the eco-region commitment for being exemplary in this field. This also means comparing Mediterranean achievements with global goals and contributing to international assessments, reviews and debates.

The Mediterranean Commission on Sustainable Development, created in 1995 as part of UNEP/MAP, has proved to be an adequate framework for such exchanges and collective follow-up. Mobilization will be increased through strengthened commitment from its members and regional partners, MAP support centres and programmes, working with improved transparency and stronger partnerships.

***Orientations and actions***

1. Increase the involvement of non-environmental actors in MCSD activities and the promotion of the Strategy. Strengthen the mobilization of elected representatives, the media and sectoral leaders to spread knowledge and ownership of the Strategy's objectives. Invite countries to develop extensive information programmes about the Strategy and links between actors in the assessment of its implementation.

2. Establish a two-year monitoring cycle to assess progress in the implementation of the Strategy and carry out an in-depth assessment every five years, the first of which in 2010 will constitute a special assessment for the Third World Summit on Sustainable Development.
3. Strengthen the Mediterranean network for monitoring the state of the environment and the promotion of sustainable development, including MAP components, the EEA and other regional cooperation frameworks. Measure progress regularly on the basis of the indicators adopted (see Annex 2) and the available information and analyses.
4. Strengthen the exchange of experience and organize workshops or forums on the seven priority areas of action within the framework of the MCSD.

### **3.2. Mobilize human and financial resources and organize national implementation**

#### ***Strengthening human resources and involving actors: Research, training, education, awareness-raising, capacity building and participation***

There are still significant levels of illiteracy in Mediterranean developing countries, particularly in rural areas and among women. The imbalance between the skills acquired in schools and universities and the employment market has negative effects, resulting in under-employment, particularly among young graduates. The 'brain-drain' is a crucial issue. Research and development expenditures, including in northern Mediterranean countries, are on average much lower than those in countries in other regions with similar income levels.

Continuing deficits in such areas as the dissemination of knowledge, education and access to information, do not favour the participation of people in decision-making processes, despite political and institutional progress in these fields. Active networks of NGOs help in compensating for deficits in these areas by disseminating knowledge and experience between countries, especially in environmental education. Some countries also are making substantial efforts in the field of education. However, education in sustainable development is generally lacking including at higher levels. The enhancement of human resources and fundamental civil rights, and the need to adapt to the rapidly developing knowledge economy, are among the most urgent requirements for sustainable development.

#### ***Orientations and actions***

1. Ensure primary education for all, promote gender mainstreaming and integrate women into development more effectively in accordance with the Millennium Development Goals.
2. Reorient the supply of initial and continuous training to provide young people and SMEs with the skills necessary for them to prosper in the new context created by globalization and free trade.
3. Introduce sustainable development into educational curricula, from primary school right up to universities and graduate schools and contribute to the implementation of the Thessalonica UNESCO Conference Declaration (1997) and the United Nations resolution on the Decade for Education in Sustainable Development.
4. In synergy with the private sector, increase resources for research and development with the aim of at least reaching in 2015 the average level of resources devoted to research and development in countries with equivalent income levels
5. Emphasize as priorities in research policies the rational use of natural resources, the development of environment-friendly technologies and the role in development of Mediterranean know-how and diversity. Promote networking between universities and research and training centres at the regional level to improve the overall effectiveness and contribution of research.
6. Develop cooperation at the regional level, especially between MAP and the Euro-Mediterranean Partnership, support regional networks of NGOs and countries in their efforts to disseminate information and promote public participation

7. Intensify North-South exchanges for the development of information and communication technologies and the creation of new opportunities based on services and research and development activities in the "knowledge economy".

### ***Financing sustainable development***

The implementation of the Strategy requires significant government spending on infrastructure projects to address the challenges of reducing environmental problems, improving access to basic services, promoting research and development, establishing sustainable transport systems, introducing incentives to change consumption and production patterns, strengthening capacities and providing support for sustainable agriculture and rural development.

Developing Mediterranean countries are facing the burden of their foreign debt, the weakness of their public financial resources, a fall in income for customs duties and the lack of a suitable environment to attract foreign direct investment. The scope for funding sustainable development activities is also limited by relatively high levels of expenditure on the protection of sovereignty, including defence, and security, and by traditional supply-side policies, which often have high costs and environmental impacts.

The incentive and tax mechanisms do not mobilize and make the various actors sufficiently accountable for triggering a sustainable development process. Local taxation is particularly low in southern and eastern Mediterranean countries, where the financial sector is still over-dependent on a banking system that has a near monopoly of savings. In many countries, the collateral required by commercial banks and the high costs of credit impede access by SMEs to investment in productive activities. Financial markets and the possibilities of alternative financing, such as micro credit, venture capital and subsidies, are poorly developed. The share of official development aid allocated to the orientations laid out in the Strategy is limited. Financial institutions still do not have the necessary capacity to fund the human resources and programmes that are necessary for multiple small-scale actions.

Although domestic reforms to rationalize public expenditure and revise taxes and banking systems are necessary and are already partly under way, they are still insufficient. The developing countries, as a result, cannot support their needs on their own.

### ***Orientations and actions***

1. Invite the European donor countries members of OECD DAC to effectively implement the Millennium Development Goals related to the level of official development aid reaching 0.7% of GNP by 2015.
2. Encourage donors to give greater weight to sustainability in their strategies and methods. Substantially increase the relative percentage of aid provided for actions that contribute to the implementation of this Strategy. Promote financing for decentralized development programmes, including those involving MEDA funding.
3. Rationalize and re-orient domestic government spending to achieve greater consistency with the objectives of the Strategy. Undertake systematic cost-benefit analyses covering the environmental and social dimensions. Carry out environmental impact studies before undertaking any major public investment programme.
4. Promote the implementation of systems, such as micro-credit, venture capital and incentive schemes, to support and fund productive activities and innovation by SMEs.
5. Evaluate the positive and negative externalities of policies and actions in terms of the environment and sustainability. Use economic instruments, such as subsidies/taxes and pricing mechanisms, to make the various actors accountable for sustainable development processes.
6. Develop public financial mechanisms to support the least favoured regions, rural areas, cities and neighbourhoods, with a view to strengthening social and territorial cohesion.
7. Continue and accelerate tax reforms and reforms of financial and banking systems, taking into account needs related to sustainable development.

### ***National implementation***

Engaging in the process of sustainable development requires involvement and endorsement at the highest levels. Such involvement and endorsement is crucial as sustainable development involves defining and adopting fundamental principles in laws and institutions, making decisions and setting long-term objectives, committing effectively concerned actors, identifying conflicts of interest, sometimes questioning the established “rent” economy, ensuring arbitration and consistency and moving policies forward.

To enable progress to be made in this regard, the Johannesburg Summit proposed the development of national sustainable development strategies. Mediterranean countries made the decision to develop national strategies in 2001. The Mediterranean Strategy is intended to serve as a ‘framework’ and an inspiration for national strategies that are currently being formulated and it can help in updating them. Clearly, each country must set its own specific objectives, depending on its national specificities and challenges, schedules and resources, while giving due consideration to MSSD objectives and other regional and international commitments.

The implementation of the Strategy depends on the action undertaken at the national level. It is therefore important for national development policies to integrate fully the requirements of sustainable development, and particularly for national strategies to feed down into sectoral sustainable development strategies covering such sectors as transport, energy and tourism. The promotion of local development policies justifies greater devolution of competence to local authorities and actors in the framework of contracts guaranteeing the inclusion of sustainability.

These national strategies will be considerably more effective if they are based on integrated prospective analyses of the environment and development. Administrative services responsible for planning, the environment and regional development have an important role to play in highlighting the major issues and risks and in contributing to the development of shared visions of possible and desirable avenues for the achievement of sustainable development.

### ***Orientations and actions***

1. Develop or update national sustainable development strategies giving due consideration to the MSSD vision, orientations and objectives.
2. At the national level, develop or update sectoral strategies corresponding in particular to the seven priority fields of action.
3. Adopt measures, where necessary, to consolidate civil rights, participatory mechanisms and basic principles of the representativity, transparency and accountability of governance.
4. Undertake internal reforms to promote sustainable development and the successful implementation of the national and regional sustainable development strategies.
5. Create an appropriate institutional framework for sustainable development, including national commissions, policies and programmes, assessment systems, mechanisms for undertaking sustainable development trend and prospective studies.
6. Establish partnerships and instruments for the commitment of all stakeholders to the processes of sustainable development, including local development processes and integrated regional management projects, the establishment of pools of experts to help local actors, the adoption of incentives, pricing, duties and taxes, certificates, charters and standards, and the promotion of awareness-raising campaigns, information and communication.
7. Promote the endorsement of the Mediterranean Strategy at the highest possible level.

### Annex 1: Synergies between objectives and priority fields of action

FOUR MAIN OBJECTIVES	SEVEN ESSENTIAL ISSUES							IMPLEMENTATION
	Water	Energy and climate change	Transport	Tourism	Agriculture and rural development	Urban development	Sea and coastal zones	
<p><b>Economic development.</b></p> <p>Enhance Mediterranean assets</p>	Increase agricultural added value of cubic meter of water. (2)	Enhance the potential of Med. renewable energies: (7% of demand by 2015). (7) Reduce energy dependency	Develop more competitive and sustainable Euro-Mediterranean transport systems  Reduce growing congestion costs	Promote Sustainable tourism. Enhance value of Mediterranean assets and diversify tourism (12) Increase added value of tourist economy for local communities in developing countries. (13)	Enhance Mediterranean diversity and quality: typical products, organic agriculture, diet, landscapes,... (17)  Productive and rational agriculture.  Diversify rural economy. (14)	Promote sustainable urban economy  Create added value from the cultural, historical and landscape heritage.	Develop activities (tourism, aquaculture,...) integrating natural fragilities.  Protect and promote the unique value of coasts, sea resources, landscapes	<p>SOLIDARITY, COMMITMENT AND FINANCING</p> <p>Strengthen reciprocal commitment and financial support for MSSD goals/Med developing countries.</p> <ul style="list-style-type: none"> <li>Official Development Aid: (26)</li> <li>UE net public financial flows (27)</li> </ul> <p>Type 2 initiatives Synergies EMP/ MAP</p>
<p><b>Reduce social disparities</b></p>	Halve the population (2015/1990) without access to safe drinking water(4) and sanitation (5).	Halve the population without access to electricity (2015/1990)	Reduce the growth of transport costs in household budgets	Develop tourism to help promoting social cohesion and cultural values	Reduce rural poverty and social gaps with urban population. Millennium Development Goals (MDG)  Enhance social and territorial cohesion	Reduce social inequalities. Integrate informal settlements. Reduce the share of slum housing. (19)	Preserve the social and cultural added value of traditional coastal activities (fishing, salt production, agriculture,...).	<p>Systems to fund productive and innovative activities by SMEs(28)</p> <p>Strengthen capacities of local authorities (29)</p> <p>Reinforce territorial cohesion Financial tools (30)</p>
<p><b>Change unsustainable production and consumption patterns.</b></p> <p><b>Ensure the Sustainable management of natural resources.</b></p>	Stabilize water demand (reduce losses and wasteful use )-. (1)  Protect water resources (quantity and quality). (3)  Prevent natural risks	Rational use of energy (energy efficiency). (6)  Control, reduce or stabilize GHG emissions.  Reduce vulnerability of sensitive areas to climate change.	Stabilize or reduce road traffic share. (10) Transfer traffic from road to rail and sea.  Low polluting collective urban transport systems. (11) Decoupling economic growth and motorised traffic increase.	Reduce tourist pressures in environmental hot spots.  Better temporal and spatial management of tourist flows	Reduce desertification, and loss of arable land. (15)  Protect biodiversity and landscape.  prepare agriculture for climate change.	Promote Mediterranean model of mixed and compact towns.  Reduce air pollution.(21). Increase share of clean fuels.  Reduce growth of municipal waste generation, (20) increase recycling and share of sanitary landfills	Avoid linear coastal urbanization. (22)  Reduce land-based pollution. (24)  Prevent pollution from ships. Eliminate operational pollution.(23)  Stop/reduce marine and coastal biodiversity losses.  Reduce vulnerability to risks.	<p>HUMAN CAPITAL AND PARTICIPATION</p> <ul style="list-style-type: none"> <li>Ensure primary education for all (31)</li> <li>Gender equality. Eliminate gender disparities in education (32)</li> <li>Education in sustainable development</li> <li>Increase public/private spending on research and development (33)</li> <li>Access to information. Participatory approach.</li> </ul>
<p><b>Improve governance</b></p>	Water demand policies: global and sectoral targets (agriculture, urban water, industries).  Integrated water resource management. Promote local participation and partnerships	RUE/RE policies. Economic tools. Awareness campaigns.  Cooperation/Implementation Kyoto Protocol flexibility mechanisms. (8)	Economic tools. Investment.  Euro-Med sustainable transport network.	Regional cooperation, ecotourism framework programme, labelling.  Local governance.  Economic tools. Tourism pay-back formulae.  Carrying capacities	Euro-Mediterranean approach.  Sustainable rural development policies, programmes, regional parks, biosphere reserves.(16)  Strengthen local communities governance, promote women.	Articulate spatial and transport planning.  Strengthen capacities of local authorities.  Promote Local Agenda 21, urban renewal programmes (18) public-private partnerships.  Decentralized cooperation networks.	Enforce and improve regional and sub regional cooperation: (Convention, Strategies, SAP).  Set up Protocol, laws and local governance for coastal management.  Plans for islands. Risk plans. Protected areas network (10% by 2010.(25)  Increase international and European support.	<p>NATIONAL STRATEGIES</p> <p>National and sectoral sustainable development strategies. Institutional frameworks for sustainable development.</p>

(1) Indicators (see Annex 2)

## Annex 2: Indicators for the MSSD follow up

### I- Global follow up of progress towards sustainable development in the Mediterranean

The global follow up of progress towards sustainable development in the Mediterranean will be made in the form of an introduction note showing the main changes in terms of: Mediterranean socio-economic disparities between the two shores, economic weight of the Mediterranean region in the World, poverty and unemployment, contribution of the region to the global pollution (climatic change), environment degradation costs and capacity of the development to consider the future generations needs. To that end, the major macro indicators available will be used taking into account the usual interpretation cautions.

### II- The 33 priority indicators for the MSSD follow up

#### Improving integrated water resources and demands management

Stabilise water demand (decrease in the North and controlled increase in the South and East). Reduce losses and misuses by setting up efficiency objectives for each sector of use.  
Significantly increase the economic agriculture added-value per cubic metre of water used

Preserve water resources

Achieve the Millennium Development Goals (MDG) for access to safe drinking water and sanitation

n° 1	<b>Water efficiency index (total and per sector with reference to ...)</b>
n° 2	<b>Water intensity Irrigated agriculture production added value compared with water demand for irrigation</b>
n° 3	<b>Exploitation index of renewable water resources</b>
n° 4	<b>Share of the population with access to safe drinking water (total, urban, rural) with reference to MDG</b>
n° 5	<b>Share of the population with access to sanitation (total, urban, rural) with reference to MDG</b>

#### Managing energy demand and mitigating the effects of climate change

Use the energy in a rational way through the setting up of global objectives and for each sector  
Develop renewable energies to meet 7% (excluding biomass) of the energy demand by 2015

Use the Kyoto Protocol flexibility mechanisms for the sustainable development of the developing Mediterranean countries

n° 6	<b>Energy intensity, total and per sector, with reference to efficiency objectives</b>
n° 7	<b>Share of renewable energies (REs) in the energy balance sheet</b>
n° 8	<b>Number of projects and amount financed in the framework of the Kyoto Protocol flexibility mechanisms by the annex 1 countries to the benefit of other Mediterranean countries</b>

#### Ensuring sustainable mobility through appropriate transport management

Succeed the decoupling the motorised transport increase from GDP growth

Stabilise or reduce whenever possible, the relative share of road transport of the overall volume of traffic by organising a shift to sea and rail

Reduce urban vehicle congestion and pollution noise by promoting low pollutant collective transport supply

n° 9	<b>Motorised transport intensity against the GDP</b>
n° 10	<b>The share of road transport in terms of freight transport</b>
n° 11	<b>The collective surface transport share (urban and interurban)</b>

#### Promote sustainable tourism

Diversify tourism through the development of offers that enhance the Mediterranean diversity (eco-tourism, cultural, urban and rural tourism)

Increase added value of tourism for local communities and actors in developing countries

n° 12	<b>Share of non-seaside beds compared to the total number of holiday beds</b>
n° 13	<b>International tourism receipts with an assessment of effective benefits for the destination countries and the local populations</b>

#### Promoting high 'quality' agriculture and sustainable rural development

Diversifying the rural economy through the development of non-agricultural activities

Equip the rural areas and reduce the gaps with the urban areas

Combat the desertification and the loss of productive land Between now and 2015, reduce by at least one third the present rates of quality agricultural land losses due to erosion, salinization, desertification, urban and other development and abandonment.

n° 14	<b>Agricultural population to rural population ratio, with identification of socio-economic indicators (employment, enterprises, ...)</b>
	<b>Synthesis from various Millennium Development Goals Indicators</b>
n° 15	<b>Loss of arable land by desertification, erosion, salinisation, artificialisation and agriculture abandonment</b>

Promote sustainable rural development programmes especially in the marginal rural areas

n° 16 Sustainable rural development programs for the unprivileged rural areas reconciling both human development stakes and environmental protection including biosphere reserves and natural parks (relative share of the concerned department budget)

Increase the agriculture added value through the development, the recognition and the marketing of quality Mediterranean products

n° 17 Share of the agriculture quality products (identification, labelling and geographical origin, homeland products, labels, organic farming)

### Promoting sustainable urban development

Promote a sustainable urban economy. Anticipate and plan for expected urban growth.

n° 18 Number of cities over 10,000 inhabitants with Agenda-21s or urban renewal programmes

Reduce social disparities

n° 19 Share of the urban population with access to a decent dwelling

Improve urban environment :

Reduction of waste generation. Uncouple the increase of in waste generation and GDP growth.

n° 20 Household waste generation per capita

Reduction of air pollutants

n° 21 Air quality in major Mediterranean urban areas, assessed via a composite index (indicator) to be defined (e.g. ATMO index)

### Promoting sustainable management of the sea and the costal areas and take urgent action to put an end to the degradation of coastal zones

Promote a balanced development and an integrated management of the littoral. Push back urbanisation to prevent the artificialisation of the coasts Avoid linear and continuous urbanisation

n° 22 Artificialised coastline / Total coastline ( 0-1 km and 1-10 km strip)

Eliminate operational pollution from ships by 2025

n° 23 Operational pollution from ships

Reduce pollution from land base sources

n° 24 Share of coastal urban inhabitants with no access to sanitation

Put an end or reduce substantially the marine and coastal biodiversity loss by 2010. Increase by 50% the area covered by protected marine and coastal areas by 2012 and bring at least 10% of the marine and coastal surface are under some form of protection

n° 25 Superficy of protected coastal and marine areas

### Strengthen solidarity, commitment and financing for a sustainable development at regional, national and local levels

Before 2015, raise the level of official development aid from the European OECD countries to 0.7% of their GNP (Millennium Development Goal) and reinforce this support contribution to the implementation of the Strategy

n° 26 Official development aid (ODA) allocated as % of OECD DAC countries donors GNP; share of the ODA allocated to the Mediterranean countries and relative share contributing to the strategy objectives

Strengthen reciprocal commitments, solidarity and Mediterranean and Euro-Mediterranean co-operation for a sustainable development

n° 27 EU net public financial flows to EU Mediterranean members, candidates, CARDS and MEDA countries (in absolute value and per capita) and relative share contributing to the objectives of the strategy

Promote the implementation of systems to enable the funding of SMEs for productive and innovative activities (micro-credit, venture capital, incentives, etc).

n° 28 Share of bank credit allocated to the private sector – Existence of alternative financing systems to bank credit

Strengthen local authorities prerogatives and capacities

n° 29 Share of local government tax revenue as % of total tax revenues (government receipts. Share of the government budget allocated to the local authorities

Reinforce the territorial and social cohesion. Develop public financial mechanisms to support the least favoured regions

n° 30 Public financial mechanisms to support the least favoured regions

### Strengthen human capital and actors involvement: research, training, education, awareness-raising and participation

Ensure primary education for all (MDG)

n° 31 Literacy rate of young people between 15 and 25 years old

Eliminate the disparities between girls and boys in education (MDG)

n° 32 The girl/boy ratio enrolment in primary education and high school

In synergy with the private sector, increase expenses on research and development between now and 2015 so as to get closer to at least the average level in countries with equivalent incomes, stressing the rational use of natural resources, developing environment-friendly technologies and the enhancement of the Mediterranean economic and social know-how and diversity.

n° 33 Public and private expenses for research and development in % of GDP

### III- Additional\* indicators for the MSSD follow up

Reduce exposure to floods and droughts hazards	<b>Regulation indexes (average flow of regulated resources compared to total flow)</b>
Protect water resources	<b>Water unsustainable exploitation index</b>
Reduce water pollutions	<b>Purification rate of collected waste water</b>
By 2015, halve the proportion of the population (compared with 1990) with no access to electricity by favouring the use of renewable energies	<b>Electrification rate (urban/rural) in measuring the share of renewable energies in the new services to isolated rural areas</b>
Have Euro-Mediterranean transport links available so as to ensure greater competitiveness that integrates sustainability stakes	<b>Indicator to be defined</b>
Reduce tourism's negative environmental impacts, especially coastal areas tourism	<b>Tourism density along the littoral</b>
Reduce rural poverty	<b>Part of rural population under national poverty level</b>
Revive the Mediterranean model of mixed and compact cities that generate low environmental pressures and offers a good quality of life	<b>Artificialized land use per capita</b>
Significantly reduce continental biodiversity loss	<b>Biodiversity indicator to be defined</b>
Halt or significantly reduce marine and coastal biodiversity by 2010 and preserve halieutic resources	<b>Share of the surface area of posidonia in the infra-littoral zone</b>
Decrease pollution from land-based sources via the reduction by 20% of hazardous wastes production by 2010	<b>Hazardous waste production</b>
Improve coastal water quality	<b>Composite indicator to be defined</b>
Invite the developed Mediterranean countries to increase initiatives and projects of a regional, sub-regional or bilateral interest that contribute to implementing the Strategy ("type-2 initiatives").	<b>Type 2 initiatives</b>
Reinforce the EU foreign direct investment (FDI) in the Mediterranean	<b>Share of the EU FDI going to the Mediterranean countries in the total extra-EU FDI</b>
	<b>Balance of the net financial flows in the Mediterranean developing countries (of which workers remittances, ODA, FDI)</b>
Improve access to information and promote participatory approach	<b>Countries who have ratified the Aarhus Convention</b>
Enhance cultural diversity	<b>Indicator to be defined</b>
Implement National Strategy for Sustainable Development	<b>National or sectoral strategies adopted or reviewed</b>

\*10 - 15 Additional indicators will be proposed for a more accurate follow up of the achieved progress in the priority fields

### Annex 3: Acronyms and abbreviations

ACCOBAMS	Agreement on the Conservation of Cetaceans of the Black Sea, Mediterranean Sea and Contiguous Atlantic Area
BOD	Biochemical dissolved-oxygen demands
CARDS	Community Assistance for Reconstructions Development and Stabilisation (EU Assistance Programme for the western Balkans)
CEDARE	Centre for Environment and Development for the Arab Region and Europe
CO	Carbon Monoxide
CWR	Combustible Renewables and Waste
EEA	European Environment Agency
EMP	Euro-Mediterranean Partnership
EU	European Union
FAO	Food and Agriculture Organisation of the United Nations
FDI	Foreign Direct Investment
FEMIP	Facility for Euro-Mediterranean Investment and Partnership
GDP	Gross Domestic Product
GHG	Greenhouse gas
GMO	Genetically Modified Organism
GNP	Gross National Products
ICAMAS	International Centre for Advanced Mediterranean Agronomic Studies
IMO	International Maritime Organisation
IUCN	World Conservation Union
LBS	Land-Based Sources
LPG	Liquefied petroleum gas
MAP	Mediterranean Action Plan
MCSD	Mediterranean Commission for Sustainable Development
MDG	Millennium Development Goals
MEDA	Principal financial instrument of the European Union for the implementation of the Euro-Mediterranean Partnership
MedWET	Mediterranean Wetlands Initiative
METAP	Mediterranean Environment Technical Assistance Programme
MSSD	Mediterranean strategy on sustainable development
NGO	Non-Governmental Organization
NGV	Natural Gas for Vehicles
NO <sub>x</sub>	Nitrogen Oxide
OECD-DAC	Organisation for Economic Co-operation and Development-Development Assistance Committee
PSSA	Particularly Sensitive Sea Areas
RAC	Regional Activity Centre
RAMOGE	Agreement adopted by the Governments of France, Monaco and Italy to ensure that the coastal areas of the Provence-Alpes-Côte d'Azur Region, the Principality of Monaco and the Ligurian Region should constitute a pilot zone for preventing and combating pollution of the marine environment
REs	Renewable energies
RUE	Rational Use of Energy
SAP	Strategic Action programme
SAP-BIO	Strategic Action Programme for Conserving Marine and Coastal Biological Diversity in the Mediterranean
SEMC	South and East Mediterranean Countries
SME	Small and Medium enterprise
SMI	Small and Medium industry
SPAMI	Specially Protected Areas of Mediterranean Importance
UN	United Nations
UNDP	United Nations Development Programme
UNESCO	United Nations Educational, Scientific and Cultural Organization
VOC	Volatile Organic Compound
WSSD	World Summit on Sustainable Development