European Demonstration Programme on Integrated Coastal Zone Management

Report of

Thematic Study D
Planning and Management Processes:
Sectoral and Territorial Cooperation

University of Newcastle
Department of Marine Sciences and Coastal Management

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Acknowledgements

The Demonstration Programme on Integrated Coastal Zone Management has practised the principles of ICZM in terms of promoting participation, coordination and cooperation, and the result has been a rich and sometimes unexpected blend of experience and personalities, mirroring that seen in the demonstration projects.

This study could not have been completed without the help of the many project leaders and participants who have shared with us their experience and ideas, and we are especially grateful for their interest, enthusiasm and patience. Thanks are also due to the National Experts, to LIFE and TERRA project officers in DGXI and DGXVI; and to the technical expert Arthur Martin, and the other thematic experts - we have enjoyed and learned from their company in this study. Finally, special thanks to Anne Burrill, Jacqueline Soulier-Oliviera and Patrick Salez whose energy and commitment have kept this team effort on track.

We look forward to seeing how the Programme develops, and wish the individual projects every success in their ongoing efforts to create a better and sustainable future for Europe’s extensive coastal fringe and for the communities who live there.

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# Table of Contents

Acknowledgements............................................................................................................... ii
Table of Contents..................................................................................................................... iii
Executive Summary.................................................................................................................... vi

1. Introduction ........................................................................................................................... 1
   1.1 Background .................................................................................................................. 1
   1.2 A European Demonstration Programme on Integrated Coastal Zone Management..... 1
   1.3 The Thematic Study on Cooperation ............................................................................. 2
   1.4 Outline of the Document .............................................................................................. 3

2. Definition and Assessment of Coordination ................................................................ 4
   2.1 Background .................................................................................................................. 4
   2.2 What do we mean by Integration and Coordination? ..................................................... 4
   2.3 The Dimensions of Integration and Coordination .......................................................... 5
   2.4 How can we Identify Successful Coordination ............................................................... 6
   2.5 Sources of Information for the Study ............................................................................ 7
   2.6 Introduction to Study Findings ...................................................................................... 8

3. Setting the Scene: Coordination Issues in the Demonstration Projects ............ 10
   3.1 A Sectoral Perspective ................................................................................................. 10
      3.1.1 Sectoral Conflicts ................................................................................................. 10
      3.1.2 Origins of Sectoral Pressures ................................................................................... 12
         Geographical Origins of Sectoral Pressure
         Institutional Origins of Sectoral Pressure
      3.1.3. Sectoral Trends and Developments ......................................................................... 14
   3.2 Territorial Planning ...................................................................................................... 16
      2.1 Territorial Planning Systems ..................................................................................... 16
      2.2 Shortcomings in Territorial Planning Systems .......................................................... 18
      2.3 Vertical Consistency in Planning ............................................................................. 19
   3.3 Land-Sea Boundaries ................................................................................................. 20
   3.4 Other Coordination Issues ......................................................................................... 22
      3.4.1 Fragmentation of Management Arrangements for the Coast .................................. 22
      3.4.2 Diversity of Public and Private interests ............................................................... 23
      3.4.3 Definition of Roles and Responsibilities ............................................................... 24
   3.5 Summary of Needs ...................................................................................................... 25

4. Coordination Initiatives in the Demonstration Projects ........................................ 26
   Section A. Starting Parameters ............................................................................................ 27
      4A.1. Lead Agency ........................................................................................................... 27
      4A.2. Selection of Project Boundaries ............................................................................ 27
   Section B. Towards Coordination and Cooperation .......................................................... 30
      4B.1 Coordination Structures .......................................................................................... 30
         4B.1.1 Working within the Statutory Planning System ................................................... 30
         4B.1.2 Sector or Issue Based Approaches ....................................................................... 31
         4B.1.3 Coalitions of Neighbouring Authorities ............................................................. 31
         4B.1.4 Partnerships....................................................................................................... 32
Figures and Tables

Figure 1.1 Economic sectors which may conflict as a result of environmental impacts ............... 10
Figure 1.2 Overview of developments within socio-economic sectors in European coastal zones ... 15

Table 1. Advantages and disadvantages of alternative institutional arrangements for coastal management at national level .......................................................... 56
Table 2. Summary of questionnaires received from project leaders ...........................................A-3
Table 3. Summary of project visits ...........................................................................................A-4
Table 4. Summary of national responses to questionnaire ..........................................................A-6
Executive Summary

Integrated coastal zone management (ICZM) is a planning and management process which aims to balance multiple human activities and demands on coastal space and resources with the protection of dynamic and vulnerable coastal systems and the maintenance of the functions and services which they provide. By providing a framework for the management of multi-sectoral activities and for the maintenance of options for future uses of resources, ICZM provides a means to enhance regional economic development and to improve the quality of life in coastal areas.

The Demonstration Programme on Integrated Coastal Zone Management (ICZM) has been initiated by the European Commission to determine which conditions are required to achieve effective coastal zone management, and to identify measures to remedy the continued deterioration of European coastal areas. Thematic Study D, Planning and Management Processes: Sectoral and Territorial Cooperation is at the heart of the demonstration programme, which has as its underlying hypotheses (COM511/95 EC 1995) that the continued degradation and mismanagement of many of Europe’s coastal areas can be traced to problems related to:

- insufficient coordination between different levels and sectors of administration;
- insufficient participation and consultation of all the relevant actors;
- insufficient or inappropriate information, both about the state of the coastal zones and also about the impact of human activities (economic and non-economic).

Thematic Study D was designed to:

- assess and document the degree to which implementation of sustainable management of coastal zones in the demonstration project areas is hindered by lack of consistency between sectoral and territorial policies, programmes and plans;
- analyse the factors which are blocking effective cooperation and coordination; and,
- suggest approaches to overcome these impediments on the basis of experience gained through the demonstration projects and elsewhere.

The principle sources of information for the study have been questionnaires sent to the project leaders and national experts, and project visits undertaken between April 1998 and January 1999.

COORDINATION NEEDS

The Demonstration Projects have confirmed that there are serious inconsistencies between sectoral and territorial policies, programmes and plans and that these are failing to provide for an integrated approach to coastal planning and management.

There are four dimensions to coordination for effective coastal management.

- horizontal integration of policies, management arrangements and development plans amongst different sectors, services and agencies at a given level of government;
- vertical integration of policies, management arrangements and development plans from national through to local levels of government;
- territorial integration taking into account the interrelationships and interdependencies between the terrestrial, estuarine, littoral and offshore components of the coastal zone;
- the consistent integration of sustainable development objectives policies, plans and management strategies through time.
Two points are worth highlighting:

- First, that **geographical integration encompassing a systems approach is a fundamental aspect of coastal management**. The achievement of geographical integration should ideally be the basis on which other coordination needs are determined. A systems approach encompasses both environmental and socio-economic sub-systems.

- Second, and particularly relevant to Thematic Study D, that **integration between sectoral and territorial planning is not always possible within a single administrative level**. Horizontal and vertical integration are therefore inseparable components of any local ICZM initiative.

**Cooperation and coordination in the demonstration projects are hindered by:**

- Fragmentation of institutional arrangements including gaps and overlaps in responsibilities within and between administrative levels;

- Lack of awareness of the socio-economic and environmental benefits of effective coastal management;

- Perceived conflicts between short-term socio-economic needs and longer-term sustainability issues;

- Lack of implementation and enforcement of key aspects of planning and environmental legislation;

- Competition amongst sectoral agencies or amongst neighbouring local authorities, sometimes worsened by political rivalry.

The degree of fragmentation in management arrangements suggests that in some cases there may be grounds for administrative reorganisation, or redefinition and reallocation of roles and responsibilities. However, such a reorganisation may not be acceptable or considered to be justified by coastal management needs. The projects have demonstrated that a common strategy or vision for the coast can often be achieved more simply, more rapidly and in a more flexible manner by coordination amongst the different actors in the coastal zone. In the longer term, the efficiency of coastal management will be improved if institutional arrangements are harmonised.

**THE DEMONSTRATION PROJECTS**

There is a great diversity in approaches to the development of cooperation and coordination by the projects, in part reflecting differences in culture and in the type of lead agency, boundaries. Some of the more characteristic approaches, from the simplest to the most complex, are: working within the statutory planning system; sector or issue-based approaches; coalitions of neighbouring authorities; and partnerships involving the public and private sector. As yet, it is difficult to assess whether some of these approaches are achieving or will achieve greater success than others. At this stage in the evolution of the demonstration projects, the outcome we have been looking for is the establishment of an adequate, viable and well supported coastal management process.

The questions of viability and broad support are closely linked in the demonstration projects which are, on the whole, **non-statutory** and **voluntary** in nature. Factors which contribute to the viability of an ICZM initiative are political will, backed by public support; capacity building; institutional and administrative support and financial support. A first step to achieving support is developing awareness amongst formal and informal stakeholders of the direct and indirect benefits of ICZM, and of why it is in their interest to participate in the initiative.

The projects have generated a wealth of experience in terms of **working with partners** in the public and private sector. Some of the projects have now reached a critical stage with respect to the adoption
and implementation of strategies by competent agencies and organisations. In some cases, coordination functions will themselves be taken on by the local authority. The value of an independent body such as a forum or syndicat in providing a mechanism or catalyst for coordination has been demonstrated in many of the projects, but it is here that future funding is least certain.

Some of the simpler approaches to coordination fall short in terms of providing an adequate vehicle for ICZM in terms of the limited scope of issues that can be addressed. The choice of approach needs to be matched to local capacity and many of the projects have taken the strategic decision to build on existing strengths, and to develop their capacity by addressing a limited range of issues or by working with a limited number of partners.

There are advantages as well as risks involved in a non-statutory approach. Non-statutory approaches have proven a good way to broaden participation as well as providing a more flexible and responsive management mechanism. In the longer term, several projects expressed concerns as to whether non-statutory policies, strategies, and plans can be enforced, and whether, in the event of conflict, they have any standing in respect to statutory plans or sectoral legislation. The key here is “ownership” of the project goals and strategies by the full range of stakeholders, and the projects have demonstrated that this can be achieved through an open and well-informed participatory process.

The following recommendations are particularly applicable to non-statutory ICZM initiatives of the type seen in the demonstration programme. The recommendations are based on an assessment of good practice derived from the demonstration projects and emphasise the importance of a strategic approach to the development of coordination mechanisms for ICZM.

### Recommendations to Local Initiatives

<table>
<thead>
<tr>
<th><strong>Plan Ahead to Build the Foundation for an Effective Coordination Mechanism</strong></th>
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<tbody>
<tr>
<td>• Employ a logical and systematic approach to development of ICZM, for example following the project cycle of description, analysis, planning and implementation, but don’t be too rigid.</td>
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<tr>
<td>• Anticipate information gathering, communications and awareness building and participation needs and allocate resources accordingly.</td>
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<td>• Anticipate training and other human resources development needs.</td>
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<td>• Allow sufficient time to complete key tasks associated with each step of the ICZM process.</td>
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<tr>
<th><strong>Consider the Broader Perspective in the Assessment of Coordination Needs</strong></th>
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<tr>
<td>• Employ a systems approach (environmental and socio-economic) to the selection of boundaries, and identify “horizontal” and “vertical” coordination needs accordingly.</td>
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<td>• Ensure that all relevant stakeholders are represented - use structures such as a steering committee and working groups to ensure that the participation process is manageable and affordable.</td>
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<td>• Consider future development trends and scenarios and identify long-term environmental or socio-economic driving forces.</td>
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<tr>
<th><strong>Adopt an Adaptive and Incremental Approach to Create a Resilient Coordination Structure</strong></th>
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<tr>
<td>• Adopt an incremental and flexible approach to ICZM in order to learn from experience, while at the same time achieving results within existing means and capacity.</td>
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<tr>
<td>• ICZM is an iterative process - build on success by using opportunities this presents to expand the scope of the initiative over time.</td>
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<tr>
<td>• Monitor and record lessons learned and adapt management strategies accordingly.</td>
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Allow sufficient flexibility to accommodate changes in national policy, including local government reorganisation, as well as to respond to new and changing demands on the coastal zones.

**Develop and Maintain a Broad Body of Support**
- Develop awareness of the need for and benefits of their collaboration amongst the general public, politicians, and management agencies and services.
- Seek political support to legitimise the initiative but be aware of the drawbacks - elections and local political agendas may be disruptive.
- Peer group pressure, media attention and a locally respected “champion” are valuable agents in encouraging participation, but ultimately success of an ICZM initiative will depend on a genuine commitment by all participants to its goals. Develop a sense of ownership.
- Where possible, generate early and visible results to demonstrate the benefits of coordination in addressing a locally significant issue.

**Look Ahead to Implementation**
- Aim to identify long-term financial support for long-term coordination needs from the earliest stages in development of the initiative;
- Network implementation tasks amongst agencies and other management bodies according to their competence, including the private sector;
- Wherever possible seek to use statutory planning instruments to ensure a long-term impact;
- Don’t build a house of cards - build a strategy on the basis of complementary but independent actions and programmes which can be implemented individually.

**CREATING AN ENABLING ENVIRONMENT**

The current distribution of sectoral and territorial planning powers between different levels of government means that achieving **consistency** in decision making requires good coordination between all administrative levels from the most local to national. Ideally, this should be guided by policy which is harmonised, if not integrated, at European level and within member states.

Emerging principles of participation and subsidiarity both support the idea that decision making should be taken as near to the local level as possible, but a broader framework needs to be in place to ensure:
- Adequate **perspective** providing a balance between national and European interest and local concern;
- An overall coastal policy to ensure **coherence** between different local initiatives;
- Provision of appropriate technical and financial **support** to local initiatives.

The region (or other administrative level associated with **strategic planning**) may hold the key to resolving the problem of territorial and sectoral integration in a manner which both reflects national and European policy and is adapted to local conditions. This is not necessarily the level at which detailed action planning and management should take place - detailed planning and implementation are essentially local tasks - but the region is potentially a critical enabling level in terms of resolving some of the coordination obstacles for more local ICZM initiatives.
Beyond this, it is clear that there is much that could be done at national level to enable, facilitate and promote more local initiatives at the very least through harmonisation of the policy framework for the coastal zone. The same can be said for the European level.

**Recommendations to National Level**

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<tr>
<th>Ensure the Policies Relating to the Coast are Compatible</th>
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<tr>
<td>• Ensure that sectoral and other policies and strategies at national level are compatible with one-another, and that where necessary they are adapted to coastal areas.</td>
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<tr>
<td>• Develop appropriate structures for ongoing coordination and harmonisation of policies relating to both the terrestrial and marine components of the coast zone.</td>
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<tr>
<td>• Disseminate clear policy guidance relating to national policies for the coast by which individual development proposals can be assessed.</td>
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<th>Provide a National Focal Point for Local Initiatives</th>
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<tr>
<td>• Ensure cohesion between different initiatives.</td>
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<tr>
<td>• Provide a mechanism for exchange of experience, and possibly for skill sharing.</td>
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<tr>
<td>• Provide for monitoring and evaluation of coastal initiatives.</td>
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<tr>
<th>Facilitate Integrated Approaches to Coastal Management</th>
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<td>• Examine applicability of the subsidiarity principle for reallocation of responsibilities.</td>
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<tr>
<td>• Respect the need for vertical consistency.</td>
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<tr>
<td>• Disseminate technical guidance relating to best practice for sectoral developments and for coastal zone management, including guidance on management of coastal systems and avoidance of natural hazards.</td>
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<tr>
<td>• Promote interdisciplinary training and research.</td>
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<td>• Consider long-term funding mechanisms for local ICZM coordination functions.</td>
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**Recommendations to EU Level**

<table>
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<tr>
<th>Ensure the Policies Relating to the Coast are Compatible at all Administrative Levels</th>
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<tr>
<td>• Ensure that sectoral and other policies and strategies at European and other levels are compatible with one-another, and that where necessary they are adapted to the special development needs arising from the dynamic nature of coastal areas.</td>
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<tr>
<td>• Consider appropriate structures for ongoing coordination and harmonisation of policies and programmes relating to both the terrestrial and marine components of the coast zone.</td>
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<tr>
<td>• Ensure appropriate use of Structural Funds through broadened impact assessments of projects to take account of coastal processes and require coordination with relevant territorial and sectoral planning agencies and policy departments.</td>
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<th>Facilitate Integrated Approaches to Coastal Management</th>
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<tr>
<td>• Encourage a trans-national perspective.</td>
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<tr>
<td>• Promote international environmental and sustainability standards using incentives.</td>
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<tr>
<td><strong>Promote interdisciplinary training and research.</strong></td>
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<td>Disseminate technical guidance relating to best practice for sectoral developments and for coastal zone management.</td>
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1. Introduction

1.1 Background

Many coastal areas of Europe have a long history of human settlement and have formed a focus for economic development, for trade, and for natural resources exploitation. Little attention has been given to quantifying the contribution of the terrestrial component of coastal regions to the European economy, but in Europe today marine activities account for between 3 and 5% of GDP, while shipping is used for 90% of Europe’s external trade (Mayer and d'Ozouville 1998). Coastal areas in Europe are subject to an increasing diversity of demands. As heavy industrial and fisheries sectors are in decline, coastal areas are being looked to for new opportunities to diversify local and national economies, from aquaculture and windfarms to tourism and leisure.

However, human activities on the coast have not been without impact and it was recently estimated that as much as 70% of the European coastline is highly threatened as a result of direct and indirect human impacts (Bryant, Rodenburg et al. 1996). Principle areas of concern are loss of natural habitats; loss in biodiversity and cultural diversity; decline in water quality; predicted sea level rise; competition for space; and, seasonal variations in pressure (EC 1995). A strategic approach to planning and management of coastal areas is thus required in order to maximise their long-term contribution to socio-economic diversification and sustainable regional development.

Integrated coastal zone management (ICZM) is a planning and management process which aims to balance multiple human activities and demands on coastal space and resources with the protection of dynamic and vulnerable coastal systems and the maintenance of the functions and services which they provide. Since its beginnings in the USA in the late 1960s, coastal management has become widely recognised as a management approach that can help resolve conflicts on the coast. In the past decade, ICZM has been promoted internationally as a tool for ensuring that coastal development takes place in an environmentally sustainable manner. By providing a framework for the management of multi-sectoral activities and for the maintenance of options for future uses of resources, ICZM provides a means to enhance economic development and to improve the quality of life in coastal areas (WCC 1993).

- The United Nations Conference on Environment and Development (UNCED) Agenda 21, Chapter 17 called for “new approaches to marine and coastal area management that are integrated in content and anticipatory in ambit” (United Nations 1992).
- The Council of the European Communities in the preamble to its 1992 Resolution on the future Community policy concerning the European coastal zone, noted that “the key to sustainable use and development of coastal zones lies in full integration of economic, physical planning and environmental policies” (CEC 1992).
- The OECD Council in 1992 recommended that “to help achieve the goals of ecologically sustainable development and integrated resource management, strategic planning and integrated management of coastal zones should be implemented by Member Countries” (OECD 1992).
- The Common Recommendations for Spatial Planning of the Coastal Zone in the Baltic Sea Region (VASAB 1996) draw attention to the “crucial role” spatial planning has to play in the coastal zone in the support of economic and social development in the 11 Baltic States.

1.2 A European Demonstration Programme on Integrated Coastal Zone Management

The Demonstration Programme on Integrated Coastal Zone Management (ICZM) has been established by the European Commission to determine which conditions are required to achieve effective coastal zone management, and to identify measures to remedy the continued deterioration of
European coastal areas. The programme is designed to promote a wide-ranging debate on the future of Europe’s coastal areas and is based on three main elements:

- A series of 35 demonstration projects representing a cross section of socio-economic and environmental settings. The individual projects have been funded by the LIFE, TERRA, and Phare financial instruments, and by the Norwegian Government;
- Six thematic analyses (see below) designed to draw together the results, experience and know-how gained through the demonstration projects.
- Scientific support and research undertaken by relevant European agencies and programmes.

The Six Thematic Studies

A. Legal and Regulatory Bodies: Appropriateness to ICZM
B. Participation in the ICZM Processes: Mechanisms and Procedures Needed
C. The Role and Use of Technology in Relation to ICZM
D. Planning and Management Processes: Sectoral and Territorial Cooperation
E. Influence of EU Policies on the Evolution of Coastal Zones
F. The Nature of the Information Required for ICZM

1.3 The Thematic Study on Cooperation

Thematic Study D, Planning and Management Processes: Sectoral and Territorial Cooperation is at the heart of the demonstration programme, which has as its underlying hypotheses (COM511/95 EC 1995) that the continued degradation and mismanagement of many of Europe’s coastal areas can be traced to problems related to:

- insufficient coordination between different levels and sectors of administration
- insufficient participation and consultation of all the relevant actors
- insufficient or inappropriate information, both about the state of the coastal zones and also about the impact of human activities (economic and non-economic).

Three key ideas underlie the demonstration programme:

- Improved cooperation between all concerned is the basis for sustainable development. It helps identify synergies or contradictions between actions resulting from the various policies and facilitates the acceptance of arbitration. In short, it develops a general sense of responsibility;
- Such cooperation can develop only from full, comprehensible information on the state of the environment, the origin of the changes affecting it, the implications of policies and measures at the various levels, and the options;
- Cooperation has to be organised and maintained. There is a need for procedures and working methods to ensure dialogue between those involved in the various sectors of activity and at the various levels of territorial authority, and an ongoing exchange of information, from the local level up to Community level and vice versa (EC 1995).

To test these hypotheses and ideas, Thematic Study D was designed to:

- assess and document the degree to which implementation of sustainable management of coastal zones in the demonstration project areas is hindered by lack of consistency between sectoral and territorial policies, programmes and plans;
- analyse the factors which are blocking effective cooperation and coordination; and,
- suggest approaches to overcome these impediments on the basis of experience gained through the demonstration projects and elsewhere.
1.4 Outline of the Document

The following report is presented in six chapters and four annexes. Following this introduction, the methodology chapter presents a brief introduction on cooperation and coordination needs and approaches derived from the international literature on ICZM, in particular from guidelines for ICZM. The study methods are summarised.

The third and fourth chapters of the report present the findings of the Thematic Study D derived from the demonstration projects. Chapter 3 looks at some of the issues being addressed by the demonstration projects, at the existing administrative arrangements for planning and management on the coast, and at the implications for management and coordination needs. It has its analogue in the issue analysis which was undertaken at the outset of each project. Chapter 4 examines the ways in which the projects have chosen to address coordination issues and highlights some practical and strategic issues for developing coordination structures at the project level, as well at the broader issues of subsidiarity and long-term viability of coastal management initiatives. The points raised in these sections will be of particular interest to those involved in the planning of an ICZM initiative.

Chapter 5 examines the national contexts for coastal management in Europe, focusing on national policy and coordination frameworks, and examines the pros and cons of some different coordination mechanisms.

The report concludes with conclusions and recommendations.

A note on the use of examples

We have used the materials and information provided by the demonstration projects in an illustrative rather than comprehensive manner. Readers are referred to the project descriptions on the demonstration project web pages (http://europa.eu.int/comm/dg11/iczm/home.htm) and further links to web pages of the individual projects for further information concerning individual initiatives.

- Examples from the demonstration programme are indicated using the following symbol: ✴
- We have tried to use examples which capture the cross-section of issues that have arisen or could arise in European coastal areas at large, and which illustrate the full range of problems that ICZM initiatives may have to address.
- The ICZM initiatives as well as the contexts in which they are working are continuing to evolve. Specific examples may be dated, but nevertheless, provide a reference to the type of conditions encountered in the development of ICZM.
- Some of the perspectives presented in the findings may represent the opinion of one or a group of individuals, and the consultants have not always been in a position to verify facts, nor to hear "the other side of the story".
- There may also be inaccuracies arising from our own understanding of individual examples and we apologise for any errors. Again, we should emphasise that the examples are purely illustrative.
2. Definition and Assessment of Coordination

“Getting the coordination mechanism working right is clearly the most difficult part of the creation of any ICZM-type program.” (Clark 1997)

2.1 Background

Cooperation and coordination problems are not unique to the management of European coastal zones. Amongst the obstacles to effective coastal management at local and national levels identified at the landmark World Coast Conference in 1993 (WCC 1993), the two of most concern in terms of achieving sectoral and territorial cooperation are:

- fragmented institutional arrangements,
- single-sector orientated bureaucracies.

Related to these, and a subject taken up by Thematic Study A, a further obstacle is:
- inadequate legislation and/or lack of enforcement.

There are now some 30 years of international experience in developing and implementing coastal management initiatives, and as a first step in this study, we undertook brief review of this experience in order to identify some parameters for defining good integration. In the following sections we will draw on some of the international literature to look at what is actually meant by integration in coastal management will discuss the question of how far integration should go. We will then look at how integration and coordination can be evaluated.

2.2 What do we mean by Integration and Coordination?

“Implementation of integrated policies may be achieved either by integrating the institutional structure (e.g. by creating clear rules as to which policies and agencies must be given precedence in any particular situation) or by coordinating the various agencies responsible for coastal management on the basis of the common policy.”

(Boelaert-Suominen and Cullinan 1994)

Integration is used to describe virtually any working relationship where interagency collaboration, or collaboration between the public and private sector is an operational feature. It is widely regarded as a desirable if not necessary element of coastal management. However, Cicin-Sain (1993) suggests that policy integration in coastal management should be regarded not so much as an absolute, but as a continuum, leading from a fragmented approach through varying degrees of communication, coordination, harmonisation, and finally integration:

1. Fragmented approach - a situation characterised by the presence of independent units with little communication between them;
2. Communication - there is a forum for periodic communication/meeting among the independent units;
3. Coordination - independent units take some action to synchronise their work;

\(^1\) Various terms are used in the literature to describe coastal management, including integrated coastal zone management, integrated coastal management, or integrated coastal area management. For the purposes of this study these terms are essentially equivalent and for consistency we have substituted ICZM where alternative terms are used in cited work.
4. **Harmonisation** - independent units take actions to synchronise their work, guided by a set of explicit policy goals and directions, generally set at a higher level;

5. **Integration** - there are more formal mechanisms to synchronise the work of various units which lose at least part of their independence as they must respond to explicit policy goals and directions (this often involves institutional reorganisation).

Kenchington and Crawford (1993) similarly distinguish between integration and coordination. An integrated system is complete or unified, though it will generally have subordinate components, while a coordinated system involves independent and generally equivalent components working towards a common purpose.

**International experience suggests that there are practical limits to integration.** Integration can be costly in that it usually involves redefinition of institutional roles and responsibilities which may be resisted by existing agencies which fear a loss of power and autonomy. ICZM is unlikely to be seen as an adequate justification for total reorganisation of government (Sorensen 1997). A majority of guidelines have stressed the value of working with existing management structures rather than attempting to introduce a new structure (Clark 1992; Scura, Chua et al. 1992; Clark 1997).

Based on six years experience in the ASEAN Region, Scura et al. (1992) suggest that in reality integration may only be feasible at the planning stage while coordination is a more realistic approach to implementation: “It has become clear that effective management must embody two essential mechanisms: integration and coordination; that is, the planning process must be multi-disciplinary and integrate all relevant issues. However, existing political and administrative realities make integrated implementation difficult, if not practically infeasible in some cases. Realistically, management actions will have to be implemented by various sectoral agencies. Therefore, coordination of these sectorally orientated agencies is essential to maintain the overall integrity of the plan.”

In conclusion, while a fully integrated system may be required to provide direction and establish precedence between agencies where coordination is not possible owing to sectoral differences (Kenchington and Crawford 1993), integration should not be regarded as the panacea for coastal management. In many cases, coastal management objectives can be effectively established and achieved through coordination and harmonisation of existing structures and mechanisms (sometimes referred to as “networking”).

### 2.3 The Dimensions of Integration and Coordination

Integration needs in coastal management arise from the diverse range of policies, programmes, activities and plans whose impacts are felt on the coast. There are several dimensions to integration in coastal management. The two most commonly cited elements are those relating to institutional integration, namely:

- **the horizontal integration** of policies, management arrangements and development plans amongst different sectors, services and agencies at a given level of government (national, provincial, district and more local) as well as amongst interest groups with common interests in coastal areas and resources; and,

- **the vertical integration** of policies, management arrangements and development plans from national through to local levels of government, including community based approaches to coastal management (Burbridge, Humphrey et al. 1997).
Two additional dimensions are:

- **Geographical or territorial integration**: taking into account the interrelationships and interdependencies (physical, chemical, biological, ecological) between the terrestrial, estuarine, littoral and offshore components of the coastal zone (GESAMP 1996).
- **Integration over time**: the consistent integration of sustainable development objectives policies, plans and management strategies through time (GESAMP 1996; Burbridge, Humphrey et al. 1997)

We will refer to these dimensions as the integration or coordination matrix.

### 2.4 How can we Identify Successful Coordination?

The outcomes of an ICZM initiative are notoriously difficult to demonstrate particularly as many of the successes of coastal management are invisible, representing problems that were avoided as a result of the coastal management process. In addition, it is often difficult to attribute the outcomes of environmental management since frequently there are several different management programmes in operation, and implementation tasks are divided amongst different agencies (networked). Improved coordination is just one of the factors which can be expected to contribute to coastal management outcomes.

An alternative to looking at socio-economic and environmental outcomes is to look at the ICZM process itself and to identify instrumental outcomes *“whose achievement is thought necessary to the achievement of environmental and socio-economic goals”* (Sorensen and McCreary 1990). Instrumental outcomes in which coordination plays a key role include:

- A common vision for the coast;
- Better informed decision making;
- Compatibility and consistency of decision making and of evolving policies, programmes and plans;
- Improved effectiveness of management measures (including regulatory measures and incentives) as a result of relevant actors agreeing with and supporting the underlying principles.

Coordination may also lead to:

- Clarified roles and responsibilities, including resolution of gaps and overlaps, and, to
- more efficient regulatory mechanisms as a result of streamlining of decision making and procedures.

However, international experience suggests that achievement of even these outcomes may take several years. Another important lesson from international experience is that many well-designed coastal management initiatives fail to be implemented. This suggests that at this stage in the evolution of the demonstration projects, the outcome we should be looking for is the establishment of an adequate, viable and well supported coastal management process.

One aspect worth examining in this respect is the question of government support both in ensuring the viability of a local initiative, and more broadly in promoting the replication of coastal management initiatives.

- Scura et al. (1992) have emphasised the importance of direct government involvement in a coastal management initiative to ensure that management strategies will be implemented through the existing legal framework.
- OECD (OECD 1993) has emphasised the need for a top-down or central government focus for coastal management in order to establish institutional (legal and administrative) and financial mechanisms as well as standards for coastal management.
The results of a major international conference on coastal management (IWICM 1996) suggest that effective coastal management can take place at sub-national levels in the absence of national policies for ICZM, though central government support and political commitments are clearly critical if local initiatives are to contribute to the evolution of a national programme.

Olsen et al. (Olsen, Tobey et al. 1997) have emphasised the importance of working at national AND local levels with strong linkages between levels (the “two-track” approach”).

2.5 Sources of Information for the Study

In order to address the issues of project design and of project context, Thematic Study D has been looking at sectoral and territorial cooperation in planning and management processes at two levels:

1. At the project level
   • to examine the degree of consistency in existing management arrangements which concern or influence the coastal zone;
   • to identify elements of good practice in developing cooperation and coordination in coastal planning and management.

2. At the national level
   • to determine how institutional arrangements and policy may facilitate, hinder or constrain coordination in coastal management.

The principal sources of information for Thematic Study D have been questionnaires sent to the project leaders and national experts, interviews at project locations, project outputs including newsletters and other publicity materials, and progress reports to the European Commission. Additional information was provided by Arthur Martin, Technical Expert to DGXI, and by the other Thematic Experts, and by a review of project files (LIFE and TERRA) containing updated information such as interim reports produced by the projects.

Questionnaire to Project Leaders

A joint questionnaire on the part of the six thematic studies was sent to all project leaders by the Commission in April 1998. The summary of questionnaire prepared by Theme D and table of responses are attached as Annex I. The questionnaire was designed to obtain information both on the project context and on the steps being taken by the project team to address coordination problems.

• In all, 22 questionnaire responses were received.
• A relatively low number of responses were received from the TERRA projects reflecting the later start by a number of these projects.

Questionnaire to National Experts

A second questionnaire (Thematic Studies A,C, and D) was sent to National Experts by DG XI in June 1998 following their Lisbon meeting. Themes A and D collaborated in the preparation of a joint set of questions owing to the complementarity of these themes at national level (Annex I).

• 9 responses to the questionnaire were received.
• A brief summary of national coordination arrangements for coastal management is presented in Annex III.

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2 Thematic Study A on Legal and Regulatory Mechanisms will look at how ICZM may be constrained by unsuitable legal frameworks.
**Project Visits**

Thirteen individual projects were visited in 10 countries between April 1998 and January 1999. Details of selection criteria for the projects are set out in Annex II. Five of the visits were made to projects from which we did not receive a questionnaire.

In addition, two visits coincided with project meetings providing an opportunity to learn more about some of the projects it was not possible to visit:
- The visit to Barcelona coincided with a meeting of four of the five Posidonia projects (TERRA 55);
- A further joint visit was undertaken to the Greek projects at a workshop organised by Harry Coccossis (National Expert and Cyclades Project Leader) which brought together all six projects.

**2.6 Introduction to Study Findings**

Chapters three and four present and discuss our findings from the demonstration projects, with Chapter 3 looking at the management status which was described at the outset of the projects, and Chapter 4 examining how the projects set out to work within this context. Cooperation and coordination efforts represent just one aspect, though a critical one, of the wider coastal management process, and we can relate our findings to the integrated management process set out below.

The demonstration projects were expected to follow a series of tasks in the establishment of an integrated management process, and these are set out in the cycle below (EC 1995). The steps form an iterative cycle and we will see that their order and significance (in terms of allocated resources) vary between the projects.


<table>
<thead>
<tr>
<th>Description:</th>
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<tbody>
<tr>
<td>State of the environment and of environmental management infrastructures</td>
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<tr>
<td>Development programmes and plans</td>
</tr>
</tbody>
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<table>
<thead>
<tr>
<th>Analysis:</th>
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<tbody>
<tr>
<td>Origin of current environmental problems</td>
</tr>
<tr>
<td>Effect of environmental measures in force and planned</td>
</tr>
<tr>
<td>Assessment of the environmental impact of plans and programmes</td>
</tr>
<tr>
<td>Evaluation of the effects of socioeconomic and natural developments (scenarios)</td>
</tr>
<tr>
<td>Analysis of consistency between the policies and measures in the various sectors and at the various levels</td>
</tr>
<tr>
<td>Evaluation of development and management options</td>
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<td>Information summary</td>
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<table>
<thead>
<tr>
<th>Planning:</th>
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</thead>
<tbody>
<tr>
<td>Evaluation of information and discussion of management options</td>
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<tr>
<td>Formulation or adaptation of plans / programmes / strategies / visions</td>
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<table>
<thead>
<tr>
<th>Implementation:</th>
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<tbody>
<tr>
<td>Monitoring of the application of plans / programmes / strategies / visions</td>
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<tr>
<td>Analysis of problems encountered</td>
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<tr>
<td>Feedback to earlier stages / iteration of the management process</td>
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</tbody>
</table>
Chapter 3 essentially addresses the first aim of Thematic Study D: “to assess and document the degree to which implementation of sustainable management of coastal zones in the demonstration project areas is hindered by lack of consistency between sectoral and territorial policies, programmes and plans”.

The issues discussed in Chapter 3 correspond to the management issues which will have been identified by the projects in their initial description and analysis phases, perhaps in the first instance as a preliminary scoping or stock-taking exercise. It sets the scene for the demonstration projects, highlighting some of the issues being addressed by the projects, and describing the administrative context within which they are operating.

In the Chapter 4 we look at how the projects have set about addressing the coordination issues identified and at the different approaches developed by the projects to improve cooperation and coordination. The projects have generated a wealth of experience in this respect, and these sections contain points of practical interest to those involved in the planning and design of an ICZM initiative.

- Section one looks at how the projects are located within their broader context, both in terms of the choice of lead agency and the selection of project boundaries.
- Section two looks at the coordination mechanisms being developed by the projects, and at the effectiveness of the different approaches in terms of providing for the coordination needs identified in Chapter 3. Some practical issues relating to different approaches are also discussed.
- Section three raises some more strategic coordination issues relating to the development of good relationships with partners, particularly where their cooperation is being sought on a voluntary basis.
- Section four discusses some issues relating to subsidiarity and raises the question, is there an optimum scale or administrative level for ICZM?
- Finally, section five looks at sustaining the process of ICZM, and at factors which can contribute to the viability of an ICZM initiative.
### Chapter 3. Setting the Scene: Coordination Issues in the Demonstration Projects

Coastal areas in Europe are subject to a broad and ever increasing diversity of demands to satisfy social and economic objectives relating to development and to improve quality of life. Activities and interests in or impacting upon the coastal zone include those related to economic sectors, such as tourism, fisheries or ports, and non-economic sectors such as nature conservation or education. The coastal zone is also host to a variety of service sectors such as transportation, national security and coastal defence. ICZM is concerned with achieving a strategic balance between the existing uses of the coastal zone, while at the same time maintaining options to realise future opportunities for economic development and improvements in the quality of life.

The following paragraphs look in more detail at the way in which sectoral activities and interests interact with one another and at ways in which they are managed. We will look at shortcomings in the existing management framework from the perspective of the demonstration projects, before looking in Chapter 4 at the way in which the projects are attempting to improve the situation.

Chapter 3 essentially addresses the first aim of Thematic Study D: “to assess and document the degree to which implementation of sustainable management of coastal zones in the demonstration project areas is hindered by lack of consistency between sectoral and territorial policies, programmes and plans”. It describes the conditions encountered at the outset of the projects, and which have been elaborated by the projects in their preliminary description and analysis phases.

#### 3.1 A Sectoral Perspective

##### 3.1.1. Sectoral Conflicts

Coastal areas are under strong pressures for development or expansion across a range of sectors which are not always compatible. Failure to resolve such conflicts has political as well as economic costs, and in the long term may reduce the potential to realise new economic opportunities. The classic perceived conflict is that of environment-development, though development objectives are not necessarily incompatible with environmental conservation, and in practice environmental impacts are often felt most keenly by other economic sectors.

Coastal activities differ in the type and degree of coastal impacts they cause, and in the extent to which they can tolerate impacts of other activities taking place in the same area (Figure 1.1). Resolution of such conflicts is often a straightforward planning issue resolved by measures such as zoning. Tourism is particularly vulnerable to evident environmental problems or nuisance (see below).

**Figure 1.1 Economic sectors which may conflict as a result of environmental impacts**

Based on (Rigg, Salman et al. 1997)
The demonstration projects verify that sectoral conflicts are widespread in European coastal areas. Sectoral conflicts provided a trigger for almost half of the projects which responded to the questionnaire. Concerns over environmental quality or decline in natural resources were mentioned by two thirds of the respondents, and several projects were founded on the principles of sustainable development. Sustainability concerns were a trigger for about one third of the projects.

- In Storstrom, there have been local concerns, particularly amongst landowners, that national conservation objectives expressed in the new 300m coastal protection zone may check or limit local economic opportunities, especially tourism. Agriculture-environment conflicts are a further concern.
- The Norway project is in part a response to the inability for environment-fisheries conflicts to be resolved at the municipal level.
- Environment-development is noted as a general conflict area by the Isle of Wight project. For example offshore dredging conflicts with seabed conservation and there is a lack of knowledge to enable environmental and fisheries impacts to be fully assessed.
- Strymonikos is an area of multiple conflicts - extraction industries (gold mining) - tourism; urban development - nature conservation; tourism - nature conservation; agriculture - nature conservation; and coastal fishery - pelagic fishery.
- Kent notes that intrasectoral conflicts can be as damaging and intractable as intersectoral.

### Focus on Tourism

Tourism is responsible for an estimated 5.5% of GDP in the EU and is continuing to show steady growth globally (Rigg, Salman et al. 1997). However, tourism is sensitive to other uses which cause damage to the environment such as pollution and visual or noise disturbance. The quality of bathing waters is a particularly resonant issue for coastal areas, while destruction or degradation of coastal habitats will result in losses to nature orientated tourism.

Tourism is most likely to come into conflict with more intensive uses (e.g. industry, energy) - a problem which can be addressed in planning - but there are also conflicts within the sector. Tourism is itself responsible for substantial environmental or cultural impacts ranging from high-rise coastal development to disturbance in protected areas or loss of “local character”. The “carrying capacity” principle can at least be applied to individual attractions if not to the destination as a whole.

- In Cyclades there are conflicts between tourism and the extraction industries and between tourism and the environment. Employment opportunities from tourism have led to a decline in the traditional labour-intensive agricultural techniques, in turn presenting problems relating to freshwater recharge and soil erosion.

Seasonal tourism presents a problem in several areas, particularly with respect to provision of transport and waste facilities. Infrastructure such as sewerage may be inadequate during the summer season when tourists may outnumber locals by several times.

- In Strymonikos, the summer population is almost ten times greater than the resident population.

Ever changing markets can lead to a downward spiral particularly in resort areas which are poorly maintained and become run down. Many coastal areas are now developing a long term promotion strategy to improve their image and targeting specific markets which are appropriate to the local culture and environment.

- North Sea tourism has declined in recent decades, and many coastal resort area such as Ostende in West Flanders are left with a legacy of under-used accommodation along the coastal strip.
- Traditional beach tourism such as that seen on the Abbruzzi coast (RICAMA project) is vulnerable to competition from new and less expensive destinations, and increasingly, to other types of tourist activities.

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3 Where figures or proportions of projects are given, this is based on the number of questionnaire responses. In all 22 responses were from the 35 projects, including a joint response for Devon and Cornwall.
Context Issue 1.
Conflict amongst sectoral activities on Europe’s coasts is widespread.

Management Issue 1.
Current management efforts are failing to prevent conflicts arising from sectoral activities in coastal areas.

Coordination Issue 1.
The problem of sectoral conflicts in a given coastal area points to the need for horizontal coordination amongst sectors with activities in the project area.

3.1.2 Origins of Sectoral Pressures

Pressures on the coast often result from activities occurring or decisions taken outside a given coastal area. Most of the projects noted “externalities” arising either as a result of environmental processes which link upstream and downstream areas, or as a result of socio-economic forces.

The geographic scope of such issues varies widely, but critically transcends administrative boundaries. The international characteristics of coastal dynamics were noted by the project leaders at their meeting in April 1998. Examples include tourism, agricultural production for export, and cross-border pollution flows. (These issues are further discussed in the section on project boundaries below).

Geographical Origins of Sectoral Pressure

Sectoral activities located outside a coastal area can directly affect the coastal environment as a result of natural processes which link the two areas, the most obvious of which is water flow. Runoff from inland areas, tidal effects and currents not only have direct physical impacts on coastal areas, but transport significant quantities of contaminants as well as natural sediments.

Contaminants resulting from upstream activities in the waterbasin will be transmitted downstream as a result of water flow which is largely channelled through the river system.

- A common problem noted by several projects is that of agricultural runoff contaminated by agrochemicals. Pollution from the waterbasin may originate in areas managed by other authorities, or even other countries. In Strymonikos, river borne pollution derived from upstream Bulgaria is affecting the quality of coastal waters.

Agriculture and land use changes can also have an impact on the sediment budget within the waterbasin, and consequently on downstream coastal areas.

- The RICAMA project is concerned with sediment control in the entire waterbasin owing to the coastal impacts of changes in the sediment regime which result from changes in land use throughout the water basin. The importance of this impact has been demonstrated by an analysis of historical land-use and coastal changes.

In a similar way, downstream impacts on the coast are felt from activities at sea, or in neighbouring land areas. Several projects expressed concern over litter or pollution derived from ships or neighbouring territories, and over the risk of oil spills.

A number of projects were concerned with coastal erosion which may be caused or exacerbated by changes in sediment transport or currents owing to upstream coastal changes. Failure to consider and work with natural dynamics in the past has had ongoing consequences which may limit other coastal uses in the area, as well as incur long-term coastal protection costs.

- Construction of the new fisheries port in Aveiro has reduced transportation of sand to downstream beaches. This, combined with historical building on unstable lands fronting the lagoon, has necessitated further expenditure on a sea wall to protect investments.
The estimated cost of maintaining beaches in **Barcelona** once existing shoreline projects are completed is USD 3 million annually.

Many of the environmental externalities mentioned by the projects can be effectively addressed if an appropriate geographical perspective is taken. An appropriate geographical perspective can also simplify coordination needs with respect to issues such as transport networks or the movement of goods and services, though the variation in geographical extent of such issues may be best tackled using flexible approach to the establishment of coastal management boundaries.

Viewing the coast as a series of linked natural and socio-economic systems or even awareness of the broader geographic scope of issues forms the foundation for coordination between adjacent authorities. The need for an inter-territorial perspective in coastal management is further discussed below. However some externalities such as sea-level rise predicted as a result of global warming will always remain outside the scope of a coastal management initiative, and the key issue here is good information.

**Context Issue 2.**
Activities occurring far from the coast may have an impact on the coast as a result of natural processes.

**Management Issue 2.**
Authorities with responsibility for managing such activities are not always the same as those responsible for dealing with the impact.

**Coordination Issue 2.**
The interconnected nature of natural and economic systems points to the need for cooperation between neighbouring and sometimes more distant areas. This may include international cooperation.

**Institutional Origins of Sectoral Pressure**

“With few exceptions these [sectoral activities] are governed by sectoral laws relating to the nature of activity being pursued rather than its location. This division is echoed in administrative arrangements at government level.”

(Ballinger, Smith et al. 1994).

While many sectoral activities and conflicts are played out in the coastal area, or their impacts felt there, the source of many of these activities is decisions made by sectoral agencies at more central (often ministerial) levels of administration.

Sectoral externalities of this kind include those resulting from a broad sectoral policy, for example relating to housing, or from a one-off decision regarding an infrastructure or industrial project which may be considered to be of national importance. Examples of sectoral externalities seen in the demonstration projects include:

- The gold mine in **Strymonikos**, a Canadian commercial investment authorised at national level, threatens to conflict with other sectors and activities in the project area.
- National housing policy is a source of pressure in **Kent**.
- In the **Isle of Wight**, Natura 2000 has the potential to conflict with other strategies and it was imposed rather than developed through participation and consensus building and there are concerns that socio-economic issues are not being considered in the designation of sites. The

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4 The issue of integration between sectoral policy at national level is raised in Chapter 5.
responsible agency, English Nature, is proving inflexible perhaps as a result of the limited range of criteria which can be used to designate sites.

Responsibilities for designation of protected areas often rest at national or regional level, and must be accommodated at the local level. Management may be delegated to local authorities, or remain the responsibility of a state agency.

Protected area designations have large spatial planning implications as extensive areas or particular biotopes may be set aside or subject to restricted uses. At the local level, protected areas may be regarded as an imposition, or undue restriction on economic options, but there may be limited possibilities for national or regional agencies to take such concerns into account.

- The criteria for designation of sites under the Birds Directive are strictly limited to ornithological criteria - a provision which has been reinforced in the European Court.

Payment of compensation is a straightforward way to appease some individual landowners.
- In some countries, privately owned land may be purchased for conservation purposes (e.g. by the Conservatoire de l’Espace Littoral et des Rivages Lacustres in France or the National Trust in England), or statutory compensation may be payable for restrictions in use (e.g. Finland).

Context Issue 3.
Activities and sectoral development taking place within the coastal zone often result from decisions taken elsewhere.

Management Issue 3.
Sectoral policies and decision making are often determined by more central levels of government without specific regard for a given local context.

Coordination Issue 3.
The central location of much sectoral decision making points to the need for ongoing vertical coordination between more central and more local levels of government.

3.1.3. Sectoral Trends and Developments

The issue of long-term consistency between decisions taken at different levels lies at the heart of subsidiarity and underpins the need for effective vertical coordination of sectoral activities. However, while we can identify sectoral planning as one origin of pressures on the coast, the situation is clearly not this simple, and growth and decline of sectoral activities also represents a response by the private sector to changing markets and opportunities. Although underlying sectoral trends can be foreseen on a broad scale (e.g. Figure 1.2) the effects at a particular location are sometimes harder to anticipate. The need to accommodate expanding and new activities, or counteract over-reliance on declining activities, has been an impetus for several of the projects.

- The principle issue in Bantry Bay is that of extensive and sometimes unregulated aquaculture which is coming into conflict with other users. The mussel lines are considered unsightly, block navigation channels, and have been placed in areas used directly by inshore fisheries or recognised as nursery grounds. Expanding aquaculture similarly motivated for development of the Norway project.
- Departure of the military from coastal areas can have significant direct and indirect impacts on the local economy and employment. This provided an important trigger for ICZM activities in Dorset and Brest. There are also planning implications as disused land becomes available. In West Flanders, this is providing opportunities for habitat restoration.
- Strymonikos is expecting to face a heavy influx of tourists from East European countries in the next five to ten years.
In contrast, in the German part of the Wadden Sea, tourist numbers have declined as a result of economic difficulties which have affected the country as a whole. This has illustrated the risks associated with over-reliance on a particular market.

Figure 1.2 Overview of developments within socio-economic sectors in European coastal zones (Rigg, Salman et al. 1997)

<table>
<thead>
<tr>
<th>Sector</th>
<th>Industry</th>
<th>Energy</th>
<th>Urbanisation</th>
<th>Tourism &amp; Recreation</th>
<th>Transport</th>
<th>Shipping &amp; Ports</th>
<th>Fisheries</th>
<th>Agriculture</th>
</tr>
</thead>
<tbody>
<tr>
<td>Region</td>
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<tr>
<td>Baltic Sea</td>
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<tr>
<td>North Sea</td>
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<td>↓</td>
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<tr>
<td>Atlantic Arc</td>
<td>0</td>
<td>↑</td>
<td>↑</td>
<td>↑</td>
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<td>0</td>
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<tr>
<td>Med Sea</td>
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</tbody>
</table>

minor, moderate, major growth

stable or mixed trends

minor, moderate decline

An increase in transport infrastructure is foreseen throughout Europe. Transport and in particular increased accessibility is an issue for several projects. Though not necessarily regarded as negative, increased accessibility may trigger the need for integrated coastal planning and management as coastal areas are subject to new demands and pressures.

Improved accessibility historically has driven significant changes in landuse which affect the coastal area of concern to the RICAMA project.

Major transport-infrastructure developments such as the Channel tunnel have economic, strategic and environmental implications (Kent, Côte d'Opale).

Improved transport links will reduce isolation and present new economic opportunities in Ipirus, but this may have negative environmental effects as the coastal zone is made accessible to development.

In contrast, isolation caused by modifications to transport infrastructure is an issue in Valencia which is effectively bypassed by the new road system.

Outside assistance may be required to reduce isolation of islands and archipelagos (Cyclades, Gulf of Finland). The Isle of Wight project notes the significance of transport costs in the local economy.

The Barcelona project is dealing with expansion of the port area as well as development of a new airport runway close to the coast. Options are limited in this intensively used area which is bounded by mountains.

Several of the projects noted demographic trends which some felt were outside their control - including depopulation of rural areas, increasing proportions of “second homes” owned by weekend and summer visitors, and aging populations in retirement areas. Some of these trends resulted from diminishing opportunities for local employment.
As well as growth and decline in traditional sectors, coastal and particularly offshore areas are subject to a range of new activities whose consequences are unfamiliar.

Management Issue 4.
Changing demand for coastal resources and space and the impacts of changing uses are not always predictable, and represent important uncertainties for planning and management.

Coordination Issue 4.
Coordination mechanisms need to be flexible enough to respond rapidly to changing management needs, and to be robust enough to accept and cope with uncertainty.

3.2 Territorial Planning

Its clear from the preceding paragraphs that coastal areas are influenced by diverse and often complex socio-economic and environmental forces, many of which can be described as externalities. The effects of such pressures need to be reconciled at the local level.

Major infrastructure projects such as airports and ports may alienate existing users as well as having impacts over an extensive area of influence. While such developments do not inevitably come into conflict with other users, there will be indirect planning implications of ALL sectoral developments for example through changing demands for employment, and consequently housing and infrastructure.

Decline or withdrawal of certain sectors (e.g. military, industry) from a given area similarly have important implications both for the local economy and for spatial planning. Land released in this manner presents new opportunities but may require rehabilitation to make it suitable for other uses.

3.2.1 Territorial Planning Systems

In most countries, the primary system for local planning is the statutory land-use or spatial planning system. While it is not the place of this document to review the different planning systems in Europe, we will look at some general issues for coordination and cooperation which have been highlighted by the demonstration projects.

The EU compendium of spatial planning systems and policies distinguishes four principle planning traditions in Europe (EC 1997).

1. Regional economic planning as seen in France, Portugal, and recently in Germany relating to the Eastern Länder.
   Characteristics: central government plays a central role in spatial planning towards the achievement of broad social and economic objectives.

2. Comprehensive integrated approach seen in Denmark, Nordic countries, the Netherlands, and in Germany where the Länder also play a role.
   Characteristics: spatial plans operate in a hierarchical framework, serving to coordinate public sector activity on a spatial rather than economic basis.

3. Land-use management seen in the UK, Ireland and Belgium.
   Characteristics: planning is concerned with controlling changes in land-use at strategic and local levels, and is largely undertaken by local authorities.

4. “Urbanism” is a tradition in several Mediterranean countries.
Characteristics: concerned with urban design, townscape and building control, often involving rigid zoning; effectiveness is limited as a result of poor political or public support.

While the degree of territorial integration of sectoral and economic planning clearly differs between countries, the different planning systems all offer the potential to support integrated coastal management.

- A good example of a more comprehensive spatial planning system is the Danish system which encompasses all economic activities on the landward side of the coastal zone. Although the complexity of regional planning is increasing, as are its costs, the Storstrøm project is a response to a perceived need for greater detail in coastal plans than is provided for in County plans.

The planning system is regarded as the principle mechanism for coastal management in a number of the countries involved in the demonstration programme (e.g. Denmark, Norway, Sweden, Finland). In other countries, the planning system is often considered adequate to deal with landward aspects of ICZM and is increasingly looked upon to serve this broader function.

- In Scotland National Planning and Policy Guideline on Coastal Planning (NPPG 13) notes the role that local planning authorities can play in developing coastal management in partnership with other interested and affected parties. Rural development policy in Scotland further encourages and lends legitimacy to such a role.
- The Common Recommendations for Spatial Planning of the Coastal Zone in the Baltic Sea Region draw attention to the “crucial role” spatial planning has to play in the coastal zone (see below).

### Common Recommendations for Spatial Planning of the Coastal Zone

*Common Recommendations for Spatial Planning of the Coastal Zone in the Baltic Sea Region* were adopted in Stockholm on 22 October 1996 by Ministers responsible for spatial planning and development (VASAB 1996).

The Recommendations draw attention to the “crucial role” spatial planning has to play in the coastal zone in the support of economic and social development in the 11 Baltic States represented. They suggest spatial planning can contribute to coordination and integration in a regional context of sectoral measures as well as national and local interests. The recommendations emphasise the need to balance economic potential and development with conservation of natural and environmental values.

Specific recommendations include:
- Establish a landward planning zone of at least three kilometres; plus a protected strip outside urban areas of at least 100-300m landwards and seawards of the mean-water line,
- Draft comprehensive plans at appropriate levels and in a participatory manner,
- Require planning or functional justifications for any coastal developments including infrastructure
- Avoid scattered developments and visual barriers,
- Carry out impact assessments for large projects.

### Context Issue 5.

*Sectoral activities and developments taking place within the coastal zone have important implications for territorial planning.*

### Management Issue 5.

*While the degree of territorial integration of sectoral and economic planning differs between countries, the linkages between sectoral and territorial planning are often inadequate for the purposes of ICZM.*

### Coordination Issue 5.

*Poor linkages between sectoral and territorial planning point to the need for better coordination between sectoral planning and territorial planning carried out by local authorities.*
3.2.2 Shortcomings in Territorial Planning Systems

There are a number of shortcomings in the different planning systems which mean that these fall short in terms of providing an adequate vehicle for ICZM. The points which follow are not necessarily applicable to all planning systems but have come to light in one or more of the demonstration projects.

**Limited scope**
- Most planning systems are applicable only to the terrestrial parts of the coastal zone (see land-sea boundary below).
- Many planning systems take a narrow perspective, focusing on development control (location of activities) rather than broader socio-economic issues, implications for infrastructure etc.
- In some countries, planning controls may have limited applicability outside urban areas.

**Lack of flexibility**
- Frequency of plan production or revision is limited by resource implications, and by the time required for procedural consultations in drawing up plans.
- Planning approvals and appeals are time consuming and costly.
- Provision of special planning zones and coastal setbacks are valuable coastal management tools but may need to be adapted to the coastal system in question. A more dynamic or eroding coastline requires a greater setback.
- Often, a planning authority is limited to reacting to proposed developments according to provisions made in existing territorial plans (e.g. zoning plans) and in most countries, discretionary powers are very limited in favour of certainty (EC 1997). The authority may restrict the location of developments, or through permitting and appeals procedures may modify or even prevent certain types of development.

**Implementation**
- Planning authorities rarely have the mandate to implement plans, and in practice intervention is often limited to permitting and appeals.
  - In Athens, sectoral authorities are able to enter directly into contractual arrangements with the private sector, as landowners. Planning authorities are excluded from this process.
- Applications are frequently considered on their individual merits, and decisions taken on a one by one basis without regard to cumulative impacts (termed the “tyranny of small decisions” (Odum 1982)).
  - Fragmented urban or land use planning is noted in Naples, Strymonikos, Ipirus and Cyclades.
  - Poor spatial consistency in decision making was noted by the Ria de Aveiro project.
  - The combined impact of many small coastal defense projects is evident in Pescara (RICAMA project) where overlapping offshore defenses parallel the still eroding beaches. Environmental impact assessments were not required for these offshore projects.
  - The Ipirus project noted that EIAs in Greece are not required to consider cumulative impacts, and that the system is failing to provide information needed by coastal planners on the carrying capacity of a given area.
- Provision for Environmental Impact Assessment may be limited to large projects.
  - The Athens project suggested that earlier scenario based EIA may be the best way to develop consensus regarding future developments. At present, developments are reviewed in a confrontational environment (win-or-lose) at a late stage and after considerable investment in their design.
One of the triggers for the Kent project was the cumulative impact of small decisions taken without impact assessment.

- There is inadequate recognition of the risks of development in coastal areas, or of the impacts that this may have on other areas (see hazards below).

### Hazards of the coastal environment

In England, while no special provisions are made for coastal land in the Town and Country Planning Acts, the special nature of the coastal zone, and risks associated with coastal erosion or storm induced flooding, are recognised in planning guidance notes issued by the government, in particular, PPG 20, Coastal Planning and PPG 14, Development of Unstable Land.

Despite such measures, in England, planning permission is still being granted by local authorities to build houses in hazard prone areas, even areas situated several meters below sea level. One extreme example is the siting of the Sizewell nuclear power station on an eroding coast. On a dynamic coastline, minor developments which are not subject to planning controls, and even the removal of vegetation, can have an impact on the security of neighbouring property (Lee 1993).

Remedial coastal defence actions to defend poorly located coastal developments are costly not only economically, but politically. There is a further risk that damage to coastal systems will foreclose other development options.

- Non-compliance with permitting requirements is widespread and enforcement or monitoring capacity may be insufficient. The tendency to ignore laws and regulations in some countries may be exacerbated by lenience on the part of the enforcement body or courts.
  - National amnesties for unauthorised works and buildings in Italy have reinforced the tendency to ignore planning regulations.
  - It may be difficult to establish who is responsible for some breaches of planning laws, such as illegal rights of way in Ireland.

- Planning capacity may be limited at the local level where detailed planning takes place.
  - Many municipalities in Finland employ consultants to assist with municipal planning, and in particular with the recent requirements for master planning for the coastal strip.

- There may be limited opportunities for consultation or participation in the planning process.

### 3.2.3 Vertical Consistency in Planning

“throughout Europe, there is a complex intermeshing of administrative tiers of government with some responsibility for spatial planning”

(EC 1997)

In most countries, the need for vertical consistency in land-use planning is addressed, at least in theory, by a hierarchical system. This is top-down in nature, and requires that plans made at each level take into account the planning provisions of authorities at more central level, and need to be approved by those authorities. Approaches for approval and appeals vary greatly between different countries but generally follow standardised procedures ensuring good vertical coordination.

- A good example is the Danish system, as seen in Storstrom, which is based on the principal of framework control. Municipal (and local) plans must not contradict regional plans, which must in turn implement the national planning directives issued by the Minister for Environment and Energy.
In other countries, the principle of consistency is present, but not necessarily observed.

◊ A regional plan drawn up by CCRN, a regionally decentralised agency of the Ministry of Planning has been agreed with municipalities (including those involved in the Val do Lima project) and indeed largely reflects individual municipal plans. However, although the plan will probably be ratified by the government, local experience suggests that the recommendations and priorities may not be respected.

◊ In Greece, the State is responsible for planning and local authorities are responsible for implementation. The evident need for feedback is not always observed.

A detailed discussion on the different types of planning instruments available within each Member State and on how these are interrelated is provided in The EU Compendium of Spatial Planning Systems And Policies (EC 1997). The Compendium suggests there are significant gaps in the planning hierarchies of a number of countries.

◊ In Ireland, national priorities of economic development and generating employment are implemented on a sectoral basis, while at the local (county) level, priorities concerning physical planning, infrastructure, and environmental protection are implemented on a spatial basis. In this respect, the Bantry Bay project notes “the lack of an effective regional tier of administration to translate the sectoral programmes into spatial planning objectives”.

◊ In Greece, national policies based on European Structural Funds are not properly coordinated with physical planning policies, which again are a national responsibility.

The situation described by the Bantry Bay project raises the issue of the role of strategic planning at a level between central and local levels, and the Compendium confirms that provision for such planning at a regional level is available, though not always fully implemented, in all the Member States. It is clear that more could be done at the level of strategic planning to create an enabling environment for integrated coastal management.

Context Issue 6.
There are gaps and inconsistencies in territorial planning carried out at different levels.

Management Issue 6.
There is insufficient feedback between different administrative levels with territorial and strategic planning responsibilities.

Coordination Issue 6.
There is a need for better vertical coordination between strategic and territorial planning authorities at different administrative levels.

In conclusion, while planning systems in Europe provide important tools or potential tools to support coastal management, they fall short of providing the degree of coordination between territorial and sectoral and development planning which is needed for effective coastal management. These shortcomings result not only from the complex division of roles and responsibilities between administrative levels, but also from failure to coordinate policy elaboration and implementation within administrative levels.

3.3 Land-Sea Boundaries

The linkages between the marine and terrestrial components of the coastal zone have already been mentioned briefly above. Coastal water quality is influenced by terrestrial runoff, and where this is contaminated sub-tidal habitats may deteriorate as a result of pollution, reduced light penetration or
sedimentation. The potential damage to fisheries is considerable, with some 90% of commercial species depending on coastal habitats for one or more stages of their life-cycle, often juvenile stages. Water quality is also important for water based leisure activities both in terms of meeting bathing safety standards and of aesthetic appeal.

Water based activities such as transportation, fisheries, minerals extraction, power generation and aquaculture and so on, not only have impacts on the sub-tidal habitats and species, but have implications for onshore based infrastructure and services, including emergency services. Pollution from marine activities, such as oil spills or debris from aquaculture activities, may also affect land users. The use of coastal waters is increasing as new technologies and industries open up new opportunities for food production, energy generation and leisure activities.

**Geographic integration** in coastal management implies taking account of interrelationships and interdependencies (physical, chemical, biological, ecological) between the terrestrial, estuarine, littoral and offshore components of the coastal zone. (GESAMP 1996).

Despite such links, **discontinuity in the management arrangements for land and sea** is a feature in many countries, including the UK, Denmark, and Ireland. The divide results from different legislative arrangements for management of land and sea areas, and is reinforced by tradition and ownership.

- In the **UK** and **Ireland**, activities in coastal areas are to a large extent controlled by planning legislation while offshore, they are controlled by sectoral legislation. The sectoral nature of development planning tends to assume exclusive use of marine areas and resources. In addition, most uses of the marine environment depend at least to some extent on land-based facilities and infrastructure, yet offshore uses are rarely coordinated with local authorities.
- At least three projects would like to see extension of local authority statutory planning powers seaward (**Irish Dunes, Kent, Côte d’Opale**).

The question of extension of planning powers offshore is an issue of national policy, and extended planning powers already feature in several countries.

- In **Norway** and **Finland** - planning powers of local (county or municipal) authorities may extend outwards to the edge of the archipelago.
- In **Sweden** municipal level planning powers extend to the limit of territorial waters: 12 nautical miles.

Elsewhere, more limited local powers may be exercised.

- In **France**, the commune mayor has limited powers to restrict water uses up to the 300m limit offshore.
- In the **UK, Kent** is using by-laws as the principal means to overcome the legal constraints to an integrated land-sea approach.

The strengths and potential weaknesses of the sectoral approach to regulation of activities **below mean low water mark** in the UK were discussed in a review undertaken by the Department of Environment and the Welsh Office in 1993 (DoE 1993). The focus on particular types of development rather than on the total issues for a defined area and the risks of ignoring cumulative impacts of different uses and developments were noted as particular drawbacks to the sectoral approach.

However, arguments raised against extending planning powers offshore (DoE 1993) include that of limited local capacity, costs and possible duplication of expertise if this is located in local authorities, uncertainty for commercial sectors, the need to redefine seaward local boundaries, and difficulties in applicability of planning regulations to temporary or shifting activities. In addition it was suggested that there would be a loss in continuity for certain sectors such as transport.
Context Issue 7.
There are strong linkages between the marine and terrestrial sides of the coastal zone.

Management Issue 7.
Discontinuity in management arrangements for land and sea are a feature in many European countries.

Coordination Issue 7.
The linkages between the marine and terrestrial side of the coastal zone points to the need for coordination between those agencies with responsibility for offshore activities and those with responsibility for terrestrial planning and management.

3.4 Other Coordination Issues

3.4.1 Fragmentation of Management Arrangements for the Coast

There are often many different sectoral, service and other plans and strategies affecting a given coastal area. As well as having difficulties in keeping track of programmes which affect their area, the multitude of plans and programmes can be demanding in terms of participation of key individuals and means that staff may be distracted from their primary tasks.

- Plans with a sectoral focus include those for shoreline management, for designated (protected) areas of different kinds, for transport, and for tourism.
- Intersectoral strategies include those for economic development, Local Agenda 21, biodiversity strategies, river basin management plans and estuarine management plans.

Incompatibility or conflict between plans and strategies was noted in just over half of the project questionnaire responses. Plans may overlap, and precedence between the various statutory and non-statutory plans stemming from different agencies and levels of government may be uncertain.

- Economic and physical planning strategies are inconsistent in Rade de Brest and Magnesia.
- Poor consistency in actions of various players is one of the problems being addressed in Côte d'Opale.
- There may be uncertainties regarding precedence of different plans, for example in La Gironde, if these are not amended in a coordinated manner.
- Kent notes that there are simply too many plans and strategies, and is looking at how these can be harmonised.
- Devon and Cornwall similarly noted the need for a strategic context to guide the plethora of estuarine and coastal plans and initiatives in the two counties, and in particular, to address the gaps in current coverage. Existing plans range from statutory local authority spatial plans, through advisory plans such as the Environment Agency's river catchment plans and strategic plans to co-ordinate coastal defence work, to voluntary initiatives such as estuary management plans, plans for the open coast and Voluntary Marine Conservation Areas. They range in scale from a single estuary to extensive stretches of open coast.
- The resolution of unclear goals in different strategies necessitates time-consuming discussions and clarifications in Norway.

A measure of this complexity is the effort that has been required by the projects to interpret the implications at the project level of sectoral legislation as well as strategies and plans drawn up by different levels of government, or by different agencies.

- In Belgium a wide range of plans stem from all four levels of administration - they are uncoordinated, overlap and sometimes contradict one another. A first step of the West Flanders project has been to create an inventory of such plans.
- Complexity of sectoral regulations affecting activities in the project area, is evident in the analyses carried out by La Gironde, Rade de Brest and Dorset.
The Isle of Wight project is specifically looking at the issue of coordination and integration of plans both through the plan development process and implementation, and lists nine types of strategies and plans which affect the project area.

Plans and strategies are being interpreted to local level in the Gulf of Finland.

Information relating to planning coverage, other land designations and regulatory boundaries has been mapped for the Côte d’Opale by the Observatoire de l’environnement littoral et marin.

### 3.4.2. Diversity of Public and Private Interests

The identification of sectoral and territorial issues and of management frameworks in the coastal zone has its analogue in the identification of those individuals or organisations who have a responsibility for or interest in the decisions and actions taken in the coastal area. This process is often referred to as a “stakeholder analysis” and, once again, the experience of the projects highlights the diversity of interests in the coastal area.

- Public interests include the various statutory bodies involved in management, as well as services and regulatory bodies such as emergency services and the coastguard whose role is to act in the overall public interest.
- Private interests range from commercial users and those who depend on coastal areas for their livelihoods to non-governmental organisations and members of the general public. Many of the projects have decided to involve private interests directly, or indirectly through political representatives.

For the sake of simplicity, we will refer to the full set of individuals representing public and private interests as stakeholders. The steering group for the Devon and Cornwall provides a good illustration of the cross section of interests and of the types of organisations which represent stakeholder interests.

<table>
<thead>
<tr>
<th>Stakeholders in the Devon and Cornwall Project</th>
<th>(membership of the project steering group)</th>
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<tbody>
<tr>
<td><strong>National Government</strong></td>
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<tr>
<td>• Ministry of Agriculture, Fisheries and Food</td>
<td>Coast protection and fisheries</td>
</tr>
<tr>
<td>• Environment Agency</td>
<td>Air and water protection, fisheries</td>
</tr>
<tr>
<td>• English Nature</td>
<td>Nature conservation</td>
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<tr>
<td><strong>Local Government</strong></td>
<td></td>
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<tr>
<td>• Devon and Cornwall County Councils</td>
<td>Strategic planning</td>
</tr>
<tr>
<td>• Devon and Cornwall Sea Fisheries</td>
<td>Fisheries</td>
</tr>
<tr>
<td>• Devon and Cornwall Coastal Groups</td>
<td>Local Authorities and agencies with responsibility for coastal defence</td>
</tr>
<tr>
<td>• Plymouth City Council and Torbay Council</td>
<td>Unitary Authorities</td>
</tr>
<tr>
<td>• Cornwall Archaeological Unit</td>
<td></td>
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<tr>
<td>• Conseil Général de Finistère</td>
<td>Observer</td>
</tr>
<tr>
<td><strong>Non Governmental Organisations</strong></td>
<td></td>
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<tr>
<td>• Devon and Cornwall Wildlife Trusts</td>
<td>Nature conservation</td>
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<tr>
<td><strong>Private Sector</strong></td>
<td></td>
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<tr>
<td>• South West PESCA Ltd</td>
<td>Delivery of Regional PESCA programme</td>
</tr>
<tr>
<td><strong>Marine and Coastal Research</strong></td>
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<tr>
<td>• Plymouth Marine Laboratories</td>
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<td>• University of Exeter</td>
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<td>• University of Plymouth</td>
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</tbody>
</table>
A preliminary analysis of coastal issues, and of the management functions which affect a given area should be sufficient to identify most of the relevant partners. However, some concerns in the project area are more apparent than others and projects should be aware of the need to identify less-obvious interests particularly in the private sector.

- Some activities in and affecting the coastal area may be seasonal, or occasional, but are nevertheless important in terms of local livelihoods and economy. Many workers in coastal areas have more than one source of income and there is a risk of overlooking second or informal occupations.
- Some stakeholders are not located in the coastal area (e.g. tourism and leisure interests).
- Many impacts are generated outside the coastal area by sectors which may have no direct concern with the coastal environment (e.g. upstream agriculture).

The problem of stakeholder identification and involvement is exacerbated by poor organisation of certain sectors - the tourism sector was identified by several projects in this respect. Even where individual stakeholders can be identified, it may be difficult to identify an appropriate representative in this competitive area.

- In Cyclades tourism operators are organised at the island but not inter-island level.
- Dorset encouraged the tourism sector to organise themselves in order to select representatives to the Dorset Coast Forum.

There may also be difficulties in ensuring appropriate representation in the public sector. We have seen above that typically sectoral interests and services are represented by one or more agencies of central government, and by their line agencies which are decentralised to varying degrees. There are two problems with representation here:

- The area over which a particular line agency has authority doesn’t always coincide with administrative boundaries of local authorities (such as counties or regions).
- In many countries, decision making in decentralised agencies is very much procedural, and in the hands of technical staff (e.g. licensing). A more strategic view, or even the authority to consider the wider context, is only available in central government which may not regard local decisions as priorities.

### 3.4.3 Definition of Roles and Responsibilities

“If the parameters of each government agency’s area of responsibility are not clearly defined conflicts are likely to arise both between different tiers of government claiming jurisdiction in respect to the same matter (‘vertical overlap’) and between different sectoral agencies operating in coastal areas (‘horizontal overlap”).”

(Boelaert-Suominen and Cullinan 1994) Development Law Service of FAO

Related to the complexity of plans and strategies and to the difficulties in identifying stakeholders, there may be problems of poor definition of and/or uncertainty regarding allocation of management roles and responsibilities.

- In Kent, conflict arises primarily from the statutory objectives of different (sectoral) authorities.
- Complex and overlapping or conflicting jurisdictions of management bodies constrain effective management in Strymonikos.
- In Bantry Bay overlapping jurisdiction over waters between the mainland and Whiddy Island has contributed to ineffective management of marine uses and resources.
- The Irish Dunes project gave an example of a local authority which tried to prevent an illegal and inappropriate marina development by court injunction, only to discover that the development fell under the jurisdiction of the national agency responsible for marine areas. This agency has been slow to respond since the problem came to light and the development has continued.
The Côte d’Opale project notes that the problems do not arise so much from overlapping competence, but rather from their being defined in such a way as to hinder collaboration.

### 3.5 Summary of Needs

1. The problem of sectoral conflicts in a given coastal area points to the need for horizontal coordination amongst sectors with activities in the project area.
2. The interconnected nature of natural and economic systems points to the need for cooperation between neighbouring and sometimes more distant areas. This may include international cooperation.
3. The central location of much sectoral decision making points to the need for ongoing vertical coordination between more central and more local levels of government.
4. Coordination mechanisms need to be flexible enough to respond rapidly to changing management needs, and to be robust enough to accept and cope with uncertainty.
5. Poor linkages between sectoral and territorial planning point to the need for better coordination between sectoral planning and territorial planning carried out by local authorities.
6. There is a need for better vertical coordination between strategic and territorial planning authorities at different administrative levels.
7. The linkages between the marine and terrestrial components of the coastal zone points to the need for coordination between those agencies with responsibility for offshore activities and those with responsibility for terrestrial planning and management.

The above paragraphs have illustrated the challenges to effective management of the coastal zone in Europe which arise from the diverse and ever-changing range of opportunities and activities in and affecting coastal areas. We have also seen, from the perspective of the demonstration projects, how existing systems of management for land and sea are often fragmented and are failing to provide coordination functions required for effective coastal management. This applies both to statutory sectoral and territorial planning systems, and to the wide range of non-statutory and advisory plans.

These findings have confirmed that there are serious inconsistencies between sectoral and territorial policies, programmes and plans and that these are failing to provide for an integrated approach to coastal management. The degree of fragmentation in management arrangements suggests that in some cases there may be grounds for administrative reorganisation, or redefinition and reallocation of roles and responsibilities. However, the implications of such a reorganisation go beyond what may be considered acceptable or justifiable for coastal management, and much can be achieved more simply and rapidly by coordination amongst the different actors in the coastal zone.

Several dimensions to the types of cooperation and coordination needed for coastal management have been identified. For effective coastal management, coordination is required:

- between agencies responsible for sectoral, territorial and strategic planning, both at the policy formulation stage and during implementation of policies within a given area;
- between the different levels of government which have jurisdiction over a given area;
- between neighbouring “upstream and downstream” areas:
  - between coastal and inland areas,
  - between different coastal areas including those separated by water.

A final dimension is that of consistency in decision-making through time - the temporal dimension. Ongoing discussion will be required to ensure that polices and strategies developed at any level in response to changing demands and opportunities at the coast remain compatible and appropriate to changing conditions.

These findings largely concur with the dimensions described in the coordination matrix set out in the introduction. However, demonstration projects have highlighted that integration between sectoral and
territorial planning is not always possible within a single administrative level, even where there is provision at that level for strategic planning.
Chapter 4. Coordination Initiatives in the Demonstration Projects

Chapter 3 has described the conditions encountered at the outset of the projects, and which have been elaborated by the projects in their preliminary description and analysis phase. In Chapter 4, we will look at how the projects are working towards improving coordination and cooperation within this complex environment for management of coastal areas.

There is a great diversity in approaches developed by the projects, reflecting differences in culture, in experience, in context, and in the starting parameters (lead agency, boundaries) which often result as much from the origin of the initiative as from deliberate design. The project leaders pointed out a number of parameters which vary between projects, and suggested various factors affecting the choice of project design (see below).

Diversity of ICZM Approaches

At their meeting in Brussels in April 1998, the project leaders noted that approaches to ICZM differ in the following aspects:

- geographical area affected by the project
- range and complexity of the issues addressed in the coastal zone.
- understanding of the coastal dynamic
- mix and status of private and public agencies and interests
- number and status of the agencies and interests represented in the core group*
- contractual/legal basis of the initiative, political support (way in which the project is legitimised)
- level and quality of leadership (the human factor)
- degree of authority enjoyed by the core group*
- extent to which the initiative employs the existing statutory system as 'framework'
- potential for sustainability of the process once launched
- level of public awareness, understanding of the concepts and objectives of integrated management
- attitudes to participation generally
- mechanisms of linkage between agencies, voluntary, informal and formal.

* core group - key partners - those actually involved in the work of the project

The project leaders suggested that some of the factors affecting the choice of approach to ICZM are:

- Definition of the 'public good'
- Motivation
- Understanding (core group and community) of the concepts underlying ICZM (awareness)
- Origin of the initiative - point of initiation from within the administration / sectoral systems
- Quality of leadership
- Resources available
- Timing of the initiative
- Discipline bias
- Levels of public awareness
- Historical, cultural and traditional context
- Legal, jurisdictional, administrative and planning structures and context
- Physical problems faced in an area; natural conditions
- Legitimisation of the project
- Level of information / data available

It is clear that the projects could be classified on the basis of a number of single variables, but it is difficult to group them into a more meaningful typology. Two starting parameters which have influenced the scope of the project are its origin and lead agency, and the selection of boundaries. These are examined in the next section.
Section A. Starting Parameters

The external coordination and cooperation links which need to be established by the projects will be determined by how they are located administratively and geographically within the broader setting for management of coastal areas. The choice of lead agency and project area, often made at the outset of the project, thus have important implications for the development of coordination strategies.

4A.1 Lead Agency

Each of the 35 projects represents an initiative by an individual or group of individuals which has been formalised by its promotion or adoption through some kind of organisation, in most cases, the “lead agency” for the demonstration project.

1. The lead agency for a large majority of projects is a territorial administration such as a county, regional or provincial council (20 projects). Seven of these are city authorities, while the majority of the remainder are classified as NUTS II or III.
2. Six of the projects are led by associations comprised mainly of local authorities.
3. Four projects are led by an environmental (sectoral) administration, in three cases at national (ministerial) level.
4. Universities and research institutes are the lead agency for four projects and represent an active project partner in several more.
5. One project is being led by an independent body.

The nature of the lead agency has certainly had an influence on defining the nature and scope of the projects, not least the geographical scope and boundaries of the project. Some of the pros and cons of different types of leadership will be illustrated later.

4A.2 Selection of Project Boundaries

The issue of defining boundaries for the coastal zone has been the subject of endless technical and policy debate, and failure to resolve this has often unnecessarily delayed or even stalled national coastal management initiatives. Definition of the coastal zone may be a requirement for the drafting of legislation, though in practice, flexible solutions can also be found.

At a more practical level, most of the demonstration projects have had to define the geographical scope of their activities, while at the same time recognising that influence on and by the initiative may extend beyond this area. An analysis of these influences, and of the management systems which affect them, will provide the basic information required by the project to identify coordination needs.

Boundaries can be theoretically defined in two horizontal dimensions, firstly, along the coastline and secondly, the seaward and landward breadth of the project area. There is no one rationale underlying the choice of boundaries selected by the different projects. The three main factors are administrative boundaries, natural system boundaries, and issue defined boundaries.

- In Devon and Cornwall, the choice of boundaries was straightforward since administrative boundaries coincided with the geographic scope of the key issues and with geophysical characteristics.
- The Côte d’Opale project covers five coastal arrondissements. This represents a coherent unit in terms of physical, geological and ecological characteristics, but most importantly, coincides with the zone of influence of the three major ports of Boulogne, Calais and Dunkerque. Many projects have selected boundaries on the basis of more than one factor, but the most commonly mentioned is administrative boundaries which represent the territorial boundaries of one or more

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5 Nomenclature of Territorial Units for Statistics (NUTS).
adjacent local authorities. Administrative boundaries are perhaps the simplest to work with for the very reason that there is an associated local authority. However, administrative boundaries suffer from the draw-back that they do not generally coincide with issue related boundaries or with natural system boundaries and as a result, many coastal management issues need to be dealt with as externalities. In many countries, the jurisdiction of the local authority does not extend over marine areas (see land-sea boundaries above).

In practice, where administrative boundaries are predominant, we see two patterns emerging which we have called the “top-down” and “bottom-up” patterns.

1. The “top-down” pattern is seen where a larger territorial authority such as a county or region has decided to address coastal management issues within its territory. The project or pilot area itself may be defined by further criteria such as more local administrative boundaries (e.g. involving some or all municipalities bordering the coast), or natural boundaries (a coastal watershed). A high proportion of projects are being led by a territorial administration such as a county council or regional council, but in practice, the project area itself usually represents only a portion of the territory over which larger administrations have authority.
   - Cork County Council selected Bantry Bay as a pilot area to test participatory approaches to coastal management. Bantry Bay itself forms a natural entity for a coastal management effort, and the project area is bounded inland by the watershed.
   - The Kavala project covers all the coastal areas within the Province. The inland breadth varies according to coastal characteristics.
   - Pilot areas have been selected in the Naples region on the basis of issues addressed, and may be adjusted accordingly as the project proceeds.

2. The “bottom-up” pattern is seen where two or more neighbouring authorities decide to collaborate for one of two reasons (these are not mutually exclusive):
   - The desire to cooperate over common issues, either because of the geographical extent of these issues means these cannot be effectively addressed by one authority alone, or because they feel they can benefit from one anothers experience in addressing common issues (see cooperation between neighbouring authorities below).
   - The appreciation that they have a shared responsibility for the management of a natural system.

   - The lead agency for the Algarve-Huelva project is the Associación de Municipios Hispano-Lusa (ANAS) represents 30 municipalities along 400 km of coast from the Algarve Province in Portugal and the Huelva Province in Spain.

Natural systems were considered by almost half of the projects in the selection of their boundaries. In some cases, natural systems have been used as the principle criterion to define project boundaries since these coincide with a single overriding issue which is contained by that system.

   - The Rade de Brest project is concerned with pollution derived from the entire waterbasin, and has selected the watershed as the project boundary. As a result, the project area falls into three separate départements. The secondary criterion was administrative boundaries, and the project boundary is the outer boundary of the communes whose territory includes any part of the water basin.
   - The RICAMA project has also used the waterbasin as a geographical focus.

The draft Water Framework Directive calls for the development of “river basin management plans” for coordinated management of a natural hydrological unit which may cross national boundaries and will almost certainly cross other administrative boundaries. The advantages of this approach have already been demonstrated in a number of transnational river basins, including the Rhine, Schelde and Maas.
Other natural system approaches include:

- **The Wadden Sea** project is based on a natural entity which since 1982 has been subject to a Trilateral Cooperation at Ministerial level between Germany, Denmark and the Netherlands. The *Interregional Wadden Sea Cooperation* (IRWC) brings together the different territorial authorities of the three countries bordering the cooperation area.

- **The Forth Estuary** project area is defined as the tidal waters of the Forth, but the project is concerned with all activities which may impact upon this area. In practice, this means working with the seven local authorities which border the Forth.

And suggestions:

- **The Isle of White** proposed that coastal defence strategies be developed on the basis of coastal cells - geomorphologic divisions based on physical processes. The boundaries of coastal cells are generally major headlands or estuaries. However, the coastal cells approach may conflict with other natural systems based approaches, for example, by dividing estuaries.

Usually, the projects have had to deal with a wide range of environmental and social issues and in practice issue boundaries vary greatly. For example, while pollution may be derived from the entire water basin, marina development is both a very local issue and reflects a sectoral demand derived at least in part from stakeholders based far from the area.

An alternative approach is not to limit the geographic extent of the project, but to vary this according to the issue at hand. Flexible boundaries may reduce the costs of unnecessary integration as well as improve focus (See costs and efficiency below).

- The working group approach of projects such as *Dorset* and *La Gironde* provides the information needed to support a flexible, issue based approach.

- Other projects such as *Kent* and the *Isle of Wight* are deliberately looking beyond administrative boundaries to the extent necessary in order to internalise management issues.

- The *Cyclades* initiative involves the municipalities of ten islands, which have been subdivided into five working groups on the basis of common issues.

- The *Ipirus* project has similarly convened six local forums on the basis of thematic issues, this time representing sub-regions of the elongated coastal strip.

Most of the projects have defined landward boundaries, but fewer have attempted to define seaward boundaries except in cases where the project is dealing with a semi-enclosed body of water such as an estuary or bay.

- The seaward limit of the *Forth Estuary* project is the Island of May at the North Sea entrance to the Firth.

- On more open coasts such as *Dorset* seaward boundaries may vary according to the issue at hand.
Section B. Towards Coordination and Cooperation

The following paragraphs examine the cooperation mechanisms established by the projects towards achieving their goals for coastal management and highlight specific mechanisms for coordination and cooperation between sectors, between neighbouring authorities, and between different levels of government.

For many projects, the first stage in achieving cooperation and coordination was to identify the wide range of individuals and groups involved in or interested in and affected by coastal management decisions. For others, this step had already been achieved through a preliminary analysis of issues at an earlier stage in the initiative, and in a few cases, projects were able to work with an existing organisation representing stakeholders’ interests.

In practice, most of the project chose to develop links with at least formal stakeholders prior to undertaking detailed analysis of issues, and certainly before entering into the critical third phase of “planning”. The following paragraphs describe some of the more characteristic coordination approaches developed by the projects, starting with the simplest. The following section looks at some specific aspects of coordination in the dimensions identified in Chapter 3.

4B.1. Coordination Structures

4B.1.1 Working within the Statutory Planning System

A small proportion of projects have been organised within the framework of the territorial planning system, and are essentially working within this system. In some cases this means planning authorities have taken on responsibilities which go beyond their statutory functions.

◊ The five TERRA 55 Posidonia projects (Naples, Barcelona, Palermo, Taranto and Athens) are concerned with urban planning issues associated with historic coastal cities. The problems being dealt with by these projects differ to those seen elsewhere in that they are largely working with previously developed areas and management options may be limited by space or by earlier development projects. An important feature emerging in these projects is the development of cooperation mechanisms between the public and private sectors in order to finance and implement planning projects.

◊ The Gulf of Finland project represents a response to a 1996 amendment to the Building Act which requires Municipalities to prepare Master plans prior to authorising any further developments in coastal areas. The seven municipalities involved in the project are taking a more proactive approach to public consultation than is legally required. The planning system is proving adequate to address the two major concerns in the area (conservation, summerhouses) - but will not be sufficient to deal alone with socio-economic issues arising from the relative isolation of the area and heavy seasonality in usage and the project team are also looking at strategic development issues.

→ The scope of those projects working within the planning system is limited, but their implementation or at least adoption is secured.

→ For other projects, the planning system has been just one of the elements which is being considered in the broader coordination picture. We have seen above that there is wide variation in the potential of different planning systems to facilitate integrated management of the coast, but planning instruments may represent an important mechanism for the adoption of relevant aspects of a coastal strategy.

◊ Some agencies are legally constrained in this respect, and readers are also referred to the report of Thematic Study A on Legal and Regulatory Mechanisms.
Agenda 21 planning, while not a part of the statutory planning system, has provided a recognised vehicle for many local authorities to promote coastal management principles such as participation.

- The Coastlink projects (Algarve-Huelva, Kent, Down, Storstrøm, Devon and Cornwall) have been piloting guidance produced for and by British local authorities for Local Agenda 21 planning in coastal districts to examine their suitability to different institutional contexts.
- In Newcastle in County Down, the local authority is designing a Local Agenda 21 Strategy with a local “Regeneration Group” which has its origins in a group established in 1993 in protest against a local-authority plan. Since then, the group has become more representative of the range of local interests, and has adopted working principles of sustainability and integration.

4B.1.2 Sector or Issue Based Approaches

Several projects have chosen to approach ICZM from an initial focus on a single issue or sector.

- The Wadden Sea project is testing the suitability of its model for cooperation and coordination as a mechanism to respond to changing tourism needs and demands. NetForum is a participatory network with special emphasis on securing cooperation and coordination between the many public and private organisations and institutions concerned with tourism and environment in the Wadden Sea. The tourism project provides a concrete as well as locally important and resonant theme to develop and test the cooperation process, which it is hoped will not only extend to other issues, but be transferable to other transboundary contexts.
- The initial focus of the RICAMA project is on management of the river-basin sediment budget which is seen as the key to stabilising the shoreline. This builds on the existing skills of the lead agency. At the same time the project is setting out to demonstrate a general need for a more integrated approach involving municipal authorities, and tackling a wider range of issues.

→ Limiting the thematic scope of the project allows concentration of effort and resources towards the generation of results in a fundamental or high-profile area and this may be a strategic approach where resources are thinly spread or where there is a need to gain broad support for the initiative.
→ The experience gained in promoting cooperation towards resolution of a single issue may be applicable towards resolution of more complex issues, while at the same time, the value of cooperation is demonstrated.

4B.1.3 Coalitions of Neighbouring Authorities

In addition to the six projects which were initiated by associations of local authorities, voluntary associations of local authorities are a feature in several other projects.

- The Vale do Lima project was an initiative of four neighbouring municipalities which in 1994 formed an association (Valima) designed to promote inter-municipal coordination and sustainable development.
- The Algarve-Heulva project is using “intranet” technologies to improve communications and understanding between the municipalities in Spain and Portugal (ANAS). It has signed several protocols and conventions with telecommunications organisations to promote these objectives.

While authorities already have some competence with respect to coastal planning and management, the effectiveness of such coalitions will depend on their establishing links with other stakeholders, particularly with respect to sectoral planning.

- The Cote d’Opale and Rade de Brest projects have already developed such broader constituencies, and are described in more detail below.

→ The decision to initiate collaboration amongst neighbouring authorities rather than having this imposed by higher authorities is indicative of a well-motivated project founded on a strong sense of local commitment - its viability is excellent.
Groupings of smaller administrative units are compatible with the definition of a coherent management area which may cut across larger regional or even national boundaries. However, the collaboration of more central authorities will be essential to ensure that more central decisions (sometimes in more than one country) are consistent through time with local strategies.

Some of the problems associated with “local” initiatives are discussed in the section on Subsidiarity below. The need for effective vertical coordination cannot be ignored.

4B.1.4 Partnerships

Several projects decided to bring together the different public and private interests in a broad-based consultative or participatory body or network. Typically, such a “partnership” is non-statutory, non-executive, and participation is voluntary (See non-statutory approaches below).

Public and private interests are represented on equal terms on the Coastal Forums of the Forth Estuary and Dorset, as well as elsewhere in the UK.

- Over 75 organisations are represented on a voluntary basis at the Dorset Coast Forum which was established in 1995 following broad consultation within the County on coastal issues. The membership is considered to be broadly representative of all the different public and private interests concerned with the Dorset coastal zone. The Forum has been supported by a Steering Group of representatives of 15 organisations including statutory agencies, local authorities, major economic and non-economic offshore interests, and the university. A cross-section of interests has been represented on the fifteen theme-based working groups.

- The Forth Estuary Forum, founded in 1993, brings together representatives of local authorities, government agencies and services, the private sector (business, industry, commerce), interest groups and academia. The activities of the Forum have been directed by a management group initially comprising the founder organisations of the Forum, and now elected by the Forum members. Members have also been involved in ten thematic working groups.

More formal approaches have been developed in France, where partners in two of the demonstration projects have expressed a written commitment to the initiative.

- In Côte d’Opale, a range of interests are represented on the Syndicat Mixte de la Côte d’Opale. The Committee of the Syndicat is made up of 110 members, 80 nominated by Collectivités Territoriales, 28 by chambers of commerce and industry, and 2 by agricultural bodies. The Statutes of the SMCO were approved by order of the Sous-Préfet de Calais in 1996, while the aims of the SMCO are expressed in a charter (Charte de Développement du Littoral Côte d’Opale) adopted by the Committee in April 1998.

- A similar semi-formal approach is adopted in the Contrat de Baie of the Rade de Brest project. The Comité de Baie was formally established by order of the Préfet du Finistère in 1995, and numbers over 160 members including state agencies and services, political representatives, and organisations representing commercial and other interests. All 137 communes whose territory drains fully or partly into the Rade de Brest are signatories to the Contrat de Baie which expresses the objectives of the initiative.

Other projects have chosen to include public and private interests in separate groups.

- In Bantry Bay the Stakeholders’ Roundtable is comprised principally of representatives of local organisations and interests and the Harbour Commissioners (a local regulatory body). Other regulatory bodies, academic and other interests based outside the project area (including the project partners) have been appointed to an Advisors Group. The six working groups established at the first Roundtable meeting in November 1998 to examine the main areas of concern for the management of the Bay will be able to draw on information compiled by the project partners which is now available on a community-based GIS. The goal of the project is to develop the “Bantry Bay Charter”.

- The Ria de Aveiro has proposed a management structure to oversee the next phases of the coastal management initiative. This will comprise a General Council of agency and local authority...
appointees responsible for setting policy and overseeing the management process, and a Liaison Group - a broader discussion forum which would also include representatives of local interests. The policy groups will be supported by an Executive Committee, Technical Group and Working Groups. The Ria de Aveiro project invested a substantial amount of time and effort into developing and refining the case for a more integrated approach to management.

→ The partnership approach is the most comprehensive seen in the demonstration programme, and can be used for coordination in all of the dimensions required for ICZM.
→ With respect to vertical coordination, it may be difficult to achieve appropriate and consistent representation of stakeholders (including those in central government) based outside the area, and vertical links have been largely established through individuals representing decentralised services or line agencies.
→ The Ria de Aveiro project illustrates the preliminary investment, including time and commitment required to establish such a broad based constituency for coastal management but other projects have demonstrated the value of such efforts. Several of the above examples describe initiatives which have been maturing over a number of years prior to the current project phase and during the project period they have been able to build on the support and experience of their partners to develop detailed analyses of issues, to identify objectives and supporting actions, and to develop a strategy for their implementation by the project partners.

4B.2 The Coordination Matrix

The conclusions of Chapter 3 noted that for effective coastal management, coordination is required:
• between the different levels of government which have jurisdiction over a given area;
• between agencies responsible for sectoral, territorial and strategic planning;
• between neighbouring “upstream and downstream” areas:
  • between coastal and inland areas,
  • between different coastal areas including those separated by water.

4B.2.1 Vertical Coordination

A majority of the projects are working with two or more levels of territorial administrations and although the vertical linkages have been predominately initiated by the more central administration, the establishment of communication between different levels of local authorities does not seem to be regarded as a problem. In nearly all cases where the lead agency is a territorial administration, the more local authorities have been involved though this has sometimes been limited to informing and building awareness, or to consultation, rather than full participation.

While several of the projects regretted the lack of a national context for management\(^7\), many have established informal links with one or more ministries. However, for other projects this has been more problematic - ministries appear to be remote, unresponsive, or disinterested. Some projects have benefited from a strong Ministry involvement from the outset.

◊ Three of the projects - in Latvia, Lithuania and Norway - have been coordinated by ministries though the work of the projects themselves is at more local scales.

Just a few projects are developing formal mechanisms to deal with the issue of vertical consistency in sectoral decision making.

◊ Consultation on coastal management has taken place between the federal (Belgian) and regional (Flemish) authorities and the Province of West Flanders since 1995. This consultation will soon be enhanced by a formal cooperation agreement. The Federal Government has limited competence on land-based activities but is responsible for marine activities (see below).

\(^7\) ICZM policy at national level is discussed in Chapter 5.
The Naples project is aiming to develop an “accord” between the Province and State.

4B.2.2 Coordination Amongst Sectoral, Strategic and Territorial Planning Agencies

This aspect of the coordination matrix is essentially concerned with inter-sectoral coordination, and with the integration of sectoral and territorial or spatial planning at the local level. However, as we have seen above, the demonstration projects have indicated that this type of integration is not always possible within a single administrative level, even where there is provision at that level for strategic planning.

In the non-statutory initiatives, development of this type of coordination is most apparent in those projects involving a broad range of public and private actors in “visioning” exercises to develop a consensus regarding the future of the coastal zone (e.g. Forth Estuary, Dorset). Elsewhere, linkages with relevant agencies have been established by the project secretariat as part of a more directed process perhaps initially involving consultation, or collaboration on specific issues (e.g. Magnesia, Gulf of Finland).

4B.2.3 Coordination Amongst Neighbouring Local Authorities

There are many good examples in the demonstration projects of cooperation amongst the authorities of areas located at or affecting the coast. Several of the projects were able to take advantage of an existing tradition of cooperation between local authorities, often taking place on a voluntary rather than statutory basis.

While the individual communes in France have a strong cultural significance, inter-communal bodies are common, have a legal basis, and represent an important structure for collaboration with respect to a range of single (Syndicat Intercommunal à Vocation Unique, SIVU) or more complex issues (Syndicat Intercommunal à Vocation Multiple, SIVOM) (La Gironde, Rade de Brest, Côte d’Opale).

The support of the Assembly of Municipalities was critical in getting the Ria de Aveiro project started.

In Finland, the Association of Local Authorities represents municipalities’ interests at national level and provides technical and networking support to the municipalities on initiatives such as Local Agenda 21. The regional authority is a non-elected tier of government essentially providing a focus for inter-municipality cooperation across the wide range of services for which they are responsible. (See also, human resources and capacity building for examples of inter-authority cooperation).

Coastal municipalities in the greater Barcelona area have collaborated in the development, financing and implementation of the Plan de Costas.

In Norway, neighbouring communes as well as sectors, local associations and residents have a statutory right to consult in local development plans.

The majority of projects suggested the relationship between neighbouring authorities is cooperative. In a few cases, it is neutral, or even competitive. Several projects mentioned that the coastal management initiative itself had led to improved relationships between neighbouring authorities which developed an understanding of their common interests and concerns.

The County Down project noted the tendency to insularity amongst local communities in Northern Ireland, while at the same time recognising the need for collaboration to bring about economic regeneration. A first step is information sharing between communities.

The Irish Dunes project noted the problem of rivalry between economically deprived communities.

Several projects have established new structures for cooperation between neighbouring authorities:

Cooperation between neighbouring island authorities is at the heart of the Cyclades project.
The Dorset Coast Forum brings together representatives from all the coastal districts in the County. Representatives from neighbouring coastal counties are also represented.

Dorset, Devon and Cornwall and the Isle of Wight have together formed the Western Approaches Group in order to help achieve coordination along the south coast of England. Another group specifically concerned with shoreline management is SCOPAC - the Standing Conference on Problems Associated with the Coastline (South coast of England).

The demonstration programme also provided an impetus for collaboration on an international basis, in particular in the Coastlink projects (TERRA 13) which share transnational concerns as a common element. International exchange and networking is a defining characteristic of all of the TERRA projects.

One of the triggers for the Ipirus project in Greece was the perceived need to collaborate with neighbouring Albania owing to the “geographical continuity of the coastal zone”.

Storstrom County in Denmark is collaborating with authorities in the adjoining area of Rostock (Germany), particularly with respect to regional planning and local Agenda 21 work in the coastal area and the development of compatible strategies for tourism.

On a larger scale, the Wadden Sea project is facilitating coordination of activities between the regional authorities bordering the sea, and involves three countries. Established in 1994, the Interregional Wadden Sea Cooperation (IRWC) complements the existing Trilateral Cooperation between the Governments of Denmark, Germany and the Netherlands.

In some cases, the projects have been able to build on existing trans-national cooperation.

There has been a long-standing collaboration between the Côte d’Opale in France and Kent County Council in England regarding the Channel Tunnel amongst other initiatives.

The Province of West Flanders in Belgium has also established links with coastal neighbours in France and the Netherlands.

The above examples illustrate that transnational cooperation can take place even where neighbouring countries have very different administrative systems. These differences mean that while countries may cooperate on development of coastal management objectives, the way in which these are carried out will vary between countries.

Owing to their very different administrative systems, Latvia and Lithuania developed different approaches to ICZM, despite initial intentions to combine the projects. In terms of policy, cross-border “protocols” for collaboration have been developed at the local (Pagast) level, but there remain some contentious issues at national level.

Several projects indicated that they may seek support through the INTERREG programme to strengthen transnational collaboration.

4B.2.4 Bridging the Land-Sea Divide

Division in administration arrangements for land and sea is an issue for most of the projects and ultimately, the divide represents just another specific challenge for coordination, specifically between land-based territorial planning and sectoral management. In practice, many of the projects are biased towards addressing problems on the landward side of the coastal zone while at the same time recognising that many of these arise through the opportunities and constraints presented by their coastal location.

Attempts to bridge the land-sea divide include:

In Belgium the need for land-sea coordination led to the establishment in 1994 of the Inter-cabinet Guidance Group for ICZM which comprises relevant Regional and Federal “cabinets” and administrations and a Task Force Group responsible for specific projects. NGOs may be invited to provide comments. The Group was recognised by a Flemish Government Communication in 1995, and a protocol is being developed to formalise the Federal-Region cooperation.
Dorset has seen the resolution of the land-sea boundary as fundamental to the development of ICZM and has made every effort to promote the understanding of the coastal zone amongst actors on both sides of the boundary. The Coast Forum includes representatives of offshore sectors and the Forum as a whole has made representations on issues such as ship-to-ship transfers of oil, and on coastal fisheries.

Storstrom County has established a dialogue with the Ministry of Environment and Natural Resources concerning the location of offshore windfarms. The County objected to proposed locations on the grounds of environmental and aesthetic sensitivity, and although County planning powers end at the high water mark, the Ministry has proved ready to consider local views. Counties have recently been granted increased responsibility for the administration of marine SPAs.

La Gironde is seeking to elaborate solutions for problems identified in the Schéma de Mise en Valeur de la Mer (SMVM) drafted in 1993 which has no associated action plan.

4B.3 Some Practical Issues

4B.3.1 Evolution of Management Structures

Coordination structures may alter as the project progresses through the project cycle. This can be illustrated by the changing information needs of projects. Issue definition requires focused information gathering and analysis, but identification of options requires a broader and more integrated perspective. Flexible solutions include:

- The Scientific Committee established for the Rade de Brest project was a temporary structure though members continue to inform the follow-up groups working on specific issues. The new Technical Group takes a wider perspective and is designed to assist the individual communes in understanding the broader project context.

- Dorset established theme related working groups to elaborate individual issues, but these groups gave way to a more integrated approach to look at management options. Similarly, a new role has been identified in the draft implementation strategy for the current Steering Group which it is proposed will form the core membership for an ad-hoc Policy Committee to provide occasional responses on behalf of the Forum regarding policy issues which arise outside the scope of the strategy.

One of the criteria for selecting projects for the demonstration programmes was that they should be building on an existing initiative, and this has meant that they have developed from different starting points in terms of levels of organisation, of experience, and of information and technical know how. While some projects spent a considerable amount of time and effort compiling and organising basic information in the description phase, others were able to move more rapidly into the analytical and even planning stages as a result of earlier efforts.

To some extent we can see some discrete stages or patterns in terms of evolving coordination arrangements in the voluntary management initiatives. At the start, the project must serve a catalytic function. To improve focus, this may be best facilitated by a smaller group of key players who will carry out a preliminary issue analysis and basic identification of needs. This group should maintain a neutral stance, and develop a compelling message in order to broaden the coastal management constituency.

- Several projects including Ria de Aveiro and RICAMA have taken this approach.

Determining when and how to involve the various stakeholders in the project is a strategic decision that needs to be taken by the project partners at an early stage in the project process. The involvement of other stakeholders will be required to refine an understanding of coastal issues, and most of the projects have chosen to open up broader participatory structures or, at the very least, consultative structures. Requirements in terms of secretariat support, communications and information dissemination amongst others may peak at this stage.
The Forth Estuary project and Dorset had already established a discussion framework at the outset of the demonstration programme and were ready to move onto detailed issue description and integrated analysis.

4B.3.2 Costs and Efficiency

Coordination can be demanding of time and resources both within the various statutory agencies involved, and in terms of organising the broad-based consultation and networking which underpins many of the projects. While many of the projects have aimed to maximise participation, both by statutory bodies and by interest groups or individual stakeholders or their representatives, they have also had to take a pragmatic approach to make more effective use of limited resources.

Many projects have resolved this problem by appointing a steering committee which is representative of some or all of the interested and affected parties.

- The Strymonikos project initially planned to have a broad consultative body (Coordination Scheme) with representatives all relevant groups, but decided such a group, with more than 120 members, would be inoperable. Instead the broader group meets on an annual basis while more regular meeting are held of the project Steering Committee whose membership is limited to those agencies with jurisdiction over the project area, including relevant ministries.

- The Comité of the Rade de Brest Project includes over 160 members, largely made up of representatives of the individual communes. The Bureau comprises a more limited membership, including state services, user groups, and representatives of various associations of communes (syndicats, communautés de communes).

- While initially the Forth Estuary project consulted its partners on every decision relating to the project, it has now developed accepted procedures to streamline decision making.

Another strategy employed by many projects has been to harness local expertise and focus interest into a series of working groups. Typically these are issue oriented, based on issues of concern to the full project area, or in some cases issues which arise in particular subdivision of the project area.

- The Ipiros and Cyclades projects subdivided both the project area and participants on the basis of common issues.

- The eight working groups of the Côte d'Opale project each comprise some 20-50 members, and together represent an important capacity of qualified personnel.

Coordination also depends on the catalytic role played by project staff in bringing together stakeholders. The networks and consultative bodies seen in the Demonstration projects are to a large extent facilitated by a Secretariat with one or more full time staff members. This has been supported by the LIFE and TERRA instruments (see sustaining the ICZM process below).

Less direct costs relating to coordination include those for the gathering and organisation of information to inform the strategic planning process as well as awareness building activities.

4B.3.3 Human Resources and Capacity Building

Human resources can be very limited at local levels, not just in terms of technical skills and experience but in terms of overall availability of staff. This may place practical limits on the nature of coordination structure, or on the scope of issues which can be addressed by more local initiatives.

- Local capacity is regarded as a particular constraint in Latvia.

- The Cyclades presents an extreme example, where the smaller island authorities can employ only part-time, if any, administrative assistance.

8 Readers are referred to reports of Thematic Studies B on Participation and F on Information.
Kavala noted that local authorities lack the technical tools and experience to prepare and monitor coordinated development plans.

In Norway, the typical population size of coastal municipalities (or communes) is 1,500 - 4,000. Planning traditions are often weak and planning skills are thus limited at the local level (Bennett 1996).

In Norway and Finland, it is a common procedure for municipalities to employ a consultant to assist with planning.

Horizontal and vertical communication have also proved an effective means to supplement local capacity.

- The Gulf of Finland project has facilitated exchange of ideas and information among the seven municipalities working in parallel to develop local coastal management plans, particularly those located close together. The project is also drawing on experience from neighbouring Baltic countries, and expects the lessons learned in this project to be widely applicable in the rest of Finland.
- Coastal municipalities in the Gulf of Finland are also benefiting from the advice of experts based in the Regional Environment Centres.

Capacity building in planning and management agencies is a feature in most of the projects. As well as developing appropriate skills, a new cadre of staff with a more holistic perspective should result.

- In Magnesia, a major emphasis of the project has been on capacity building within the Prefecture, and the project has worked with over 25 staff members identified by their directors.

Developing community capacity may also be important.

- Down is working with the local community to develop their capacities for decision making in local planning. The role of the community is expected to increase as the project develops.
Section C. Strategic Coordination Issues

4C.1 Statutory vs non-statutory approaches

"when the chips are down, statutory instruments rule"  Project leader, Kent

Most of the projects are using non-statutory coordination approaches towards development of an ICZM plan or strategy, and the resulting plan or strategy will similarly be non-statutory in nature, though there may be parts of it that can be integrated into the statutory management framework (see sustaining the ICZM process below).

There are advantages as well as risks involved in a non-statutory approach. Non-statutory approaches have proven a good way to broaden participation as well as providing a more flexible and responsive management mechanism.

- The non-statutory nature of the Syndicat Mixte de la Côte d’Opale has enabled it to be much more innovative and flexible in its activities than would be possible for a statutory body. Nevertheless, recognition of the Syndicat at all levels is considered very important, as is the legitimacy afforded to the Syndicat as a result of its statutes being approved by order of the Sous-Préfet de Calais in 1996 (see the role of politicians below).

An independent or semi-independent body can also provide a means to overcome any restrictions on the activities that can be undertaken by statutory agencies, for example in the area of innovative funding.

- The Forth Estuary project established the Forth Estuary Forum as a Company limited by guarantee under the Companies Act. The Company status provides the necessary legal basis for fundraising and generating income from a variety of sources.

The non-statutory participatory initiatives in the demonstration programme rely on voluntary participation though, as we have seen, in some cases this has been formalised by expressions of commitment such as the Contrat de Baie of the Rade de Brest project. A risk already noted with voluntary participation by formal as well as informal stakeholders is that of refusal to participate by a key stakeholder.

- Participants in the Bantry Bay project were concerned by the lack of commitment on the part of the Department of the Marine, and were reluctant to invest private time in the initiative without reassurance that their recommendations would be considered by this national regulatory body.

The costs of non-participation by a key stakeholder can only increase as the project progresses, as more time, resources and goodwill have been invested in the initiative. The projects are very conscious of this risk, and some ideas as to how to address this are developed in the sections on the role of politicians and sustaining the ICZM process below.

In the longer term, several projects expressed concerns as to whether non-statutory policies, strategies, and plans can be enforced, and whether, in the event of conflict, they have any standing with respect to statutory plans or sectoral legislation.

- The Storstrom County project involves extension of the regional planning procedures on a non-statutory basis and thus depends on local government will and on public participation. The project is in favour of statutory changes to the planning system such as making sustainability assessment a statutory part of the regional plan.

Apart from specific interventions, such as the development of an information centre or observatoire, the non-statutory initiatives are non-executive in nature. The implementation of non-statutory coastal strategies arising from such initiatives will thus depend on their acceptance and adoption by relevant partners (see sustaining the ICZM process, below).
4C.2 The Role of Politics and Politicians

While ICZM promotes participatory democracy in the broadest sense, it is not a substitute for (nor on equal terms with) democratically elected bodies and must work alongside these. The need for **political legitimacy** for any ICZM initiative was stressed by the project leaders at their meeting in April 1998.

- Legitimacy of the **Rade de Brest** and **Côte d'Opale** projects is assured by their approval by the Préfet, an agent of the state government based at regional level.
- The **Wadden Sea** tourism project was endorsed by the Interregional Wadden Sea Cooperation at its 1997 Conference in Husum. The project was further acknowledged at ministerial level in the framework of the Trilateral Cooperation (Stade, 1997). The project has emphasised the importance of integrating the tourism project into existing democratic structures.

**Political will** can be harnessed to good effect at all levels:

- The importance of local political will and support is stressed in **La Gironde** and in other projects where communal interests are represented by the mayor, an elected representative.
- The current phase of the **Ria de Aveiro** project concluded with local politicians signing up to a **Bill of Principles** concerning future development of the areas coast. This commitment has been widely publicised through local media.
- The **Bantry Bay** project noted that politicians will have an important role in the later stages of the project “in persuading the County Council to adopt and implement the recommended strategy and in applying the lessons learned to the emerging national CZM framework” (see also, sustaining the ICZM process below).

There are of course risks associated with reliance on elected representatives:

- The **Cyclades** project is working with elected representatives on each of the islands, with emphasis on capacity building amongst these decision makers. However, local elections substantially altered the composition of the decision-makers group in the Island Network as four of its ten members failed to be re-elected. As well as diverting attention and effort from the project, the elections delayed activities planned in this and other Greek projects.

Elsewhere projects have been faced with a paradox where political contests are contrary to the spirit of cooperation yet represent the essence of democracy. **Political rivalry** at all levels may hinder cooperation.

- Internal political struggles in Niedersachsen are noted as a specific hindrance to the **Wadden Sea** project, as the Federal State has not joined the Inter-regional Wadden Sea Cooperation.
- In **Greece**, cooperation at ministerial level is hindered as ministers compete to demonstrate their proficiency for senior positions.

Several of the projects observed that **local politics** may adversely affect ICZM initiatives as powerful individuals may block or hold-up activities which they feel contradict the interests they represent. An interplay of economic interests and powerful lobbies may result in a politician maintaining a position at odds with the broader consensus. For example, it was suggested by the project leaders at their meeting in April 1998 that local municipal interest in urbanisation in order to increase tax revenues may lead to promotion of non-sustainable management practices.

- In the **Gulf of Finland** and **Greece** local authorities are inclined to empathise with land-owners who want to build on their land. This is clearly a problem given the local authorities’ responsibilities for controlling development.
- Elected representatives supported the **Irish dunes** project and their attendance of public meetings facilitated community interaction. However, political agendas were also apparent.
- **Kent** noted that political sensitivity increases as the spatial scale decreases, and local votes are at stake as conflicting views are brought into focus. While multi-sectoral initiatives need to obtain local political support if they are to be successful, it is at the operational level that sectoral pressures on politicians are greatest.
The potential for political interference in ICZM is reduced where ICZM is established on a statutory basis with provision for supervision of more local activities.

In the US, although implementation of the Coastal Zone Management Act is an optional responsibility of individual States, Federal support depends on satisfactory evaluation by the Federal office responsible.

4C.3 Coping with Organisational Politics

A coastal management initiative represents a new and unfamiliar player in local management and its acceptability and consequent success will depend to a large degree on how it is presented to and perceived by key partners. The non-statutory nature of most of the projects means that they have had to rely to a large degree on the support of other management agencies, and this dependency will increase when it comes to implementation. Public and political support is critical in this respect, but good relationships with other management agencies can be nurtured from the earliest stages of project development.

- Existing management agencies may regard the new initiative as intruding on their authority and may respond to this as a threat. As a result they may openly or covertly resist cooperation and possibly even oppose the initiative.
- Other concerns include entrenched working patterns and fear of increased or reduced workloads, concern that the initiative draws attention to their own deficiencies, or fear of the possible outcomes of broad participation.
- Agencies may not be convinced of the value of the initiative or may have other priorities.

4C.3.1 Defining a Niche

The roles assigned to a statutory ICZM initiative can range from the simple coordination through to the establishment of an authoritative planning or even executive agency.

- In Latvia and Lithuania, temporary administrative structures were established to manage the coastal management initiatives through a period of rapidly changing national policy. Such structures have a clearly defined role and present less of a threat to other agencies.

The majority of the demonstration projects are based at sub-national level and are non-statutory in nature, though many were initiated by and continue to be closely linked with local authorities.

- Devon and Cornwall noted the importance of local authority facilitation in the British coastal management initiatives - as well as lending legitimacy to the project, the local authorities represent an important resource in terms of planning and development expertise, and offer a sense of continuity to management activities.
- Dorset has pointed to the key role of the County Council in providing a professional secretariat to the Dorset Coast Forum.

The coordination mechanisms of non-statutory initiatives depend entirely on the voluntary cooperation of other parties and it is important for those leading coastal management initiatives to clearly define the scope of their activities and to provide reassurance that their role is not to usurp the roles of existing authorities, or to seek to gain control over them, but simply to provide a facility for coordination.

- The Forth Estuary project has focused on cross-cutting issues such as environmental quality or research coordination which do not fit within the mandate of any one agency or organisation. The Forum has also avoided addressing issues such as transportation coordination which may be so contentious as to break up the Forum.
4C.3.2 Establishing Neutrality

Where there is a culture of competition or suspicion amongst different sectoral agencies or territorial authorities, an independent project leader may provide an acceptable alternative to letting any one agency appearing to take control.

- A local Development Agency was established by the Magnesia Prefecture partly as a response to difficulties experienced by local authorities in establishing the partnerships required for an integrated approach.

Three of the projects were initiated by third parties which are currently playing the roles of neutral facilitator and/or technical advisor.

- The Strymonikos project is implemented in partnership by the Fisheries Research Institute and the Greek Biotope Wetlands Centre, both semi-autonomous national scientific bodies. These institutes provide neutral advice and information to the Steering Committee which is made up of those authorities with jurisdiction over the coastal area.
- The University of the Aegean Department of Environmental Studies is facilitating the Cyclades project. The role of the University will diminish as local capacity for management develops.
- Similarly in Ria de Aveiro, the University Department of Environment and Planning is playing a similar facilitation and information role. A new support framework has been proposed for the next phase of the initiative and the University’s role will be reduced.

Independent bodies can play an important role in initiating the coordination process but the role of such institutions will change over time. Ultimately the fate of these initiatives, as with all voluntary initiatives, will depend on the cooperation of other partners with the authority and resources to intervene in the coastal zone.

Where the project is being led by a statutory body, project staff may be perceived as biased, as their employer may not always be able to avoid taking a position on certain issues. In such cases, employing the services of a neutral facilitator or chairperson may reassure participants that their views are being heard on equal terms.

- The Bantry Bay project has employed professional facilitators to assist in the development of a consensus amongst stakeholders concerning the future of the Bay.

4C.3.3. Status and Leadership

The neutral stance and commitment of a carefully selected chairperson has been an asset to a number of projects, not only in reassuring partners of the neutrality of the process but lending a sense of status and legitimacy.

- Projects such as Dorset and the Forth Estuary have benefited from the networking skills and support of well-informed, known and respected local figures who are willing to represent and chair the forums.
- Dorset considers that an independent chairman is vital to achieve consensus.

Many of the projects remarked upon the benefits gained from the individual drive of the project leader or a key supporter and there is always a risk of inertia upon the departure of such a personality. Ensuring continuity of the ICZM initiative is important in this respect.

Another approach mentioned above has been to establish the legitimacy of the project by seeking state approval, as seen in Côte d’Opale and Rade de Brest. In addition, several projects felt their status was raised as a result of their qualifying for European funding and being involved in the Demonstration Programme.
4C.4 Building and Sustaining Long-term Support

While a broad body of support is critical to the success of an ICZM initiative, the involvement of stakeholders raises expectations and failure to meet these may result in loss of confidence in and support for the initiative. Political will depends on an understanding of the benefits of a more coordinated approach, and above all on public support. Political and public support may wane as a result of participation fatigue or loss of motivation where there are no demonstrable advantages to taking part in or supporting and ICZM initiative.

- *Ipirus* noted a general lack of awareness of the benefits of sustainable development and of ICZM.
- The *Irish Dunes* project emphasised the importance of visible results in generating local support for the project initiatives. The participants demanded “action on the ground” and “concrete results” rather than “endless studies”.

Awareness building, ideally based on good local information has been a strong component in many of the demonstration projects. However, we have not seen many examples of projects taking an overt approach to demonstrate early benefits, or long term economic advantages if ICZM.

- An economic analysis of activities around the *Forth Estuary* has demonstrated the importance of coastal activities in the wider geographical area.
- The *Isle of Wight* has pointed out issues which are likely to have political importance: impacts of aggregate dredging, coastal instability, climate change impacts, oil pollution and safety at sea.

Another way to tackle this has been to involve stakeholders in activities which will lead to the generation of results in a relatively short time period. A tangible product can help generate interest and a sense of achievement.

- The *Magnesia* project team worked with departmental directors in the Prefecture to identify a number of small pilot projects of interest and which could generate visible products. Work teams were brought together to address these relatively simple problems which were designed primarily to motivate the staff and demonstrate a more proactive approach to planning and environmental management issues in the area.
- Establishment of an information centre in *Strymonikos* provided a focus for community involvement from the outset of the project. At the same time, this activity promoted an early emphasis on awareness-raising and information dissemination which provide a foundation for future activities.
- The *Ipirus* project has provided a focus for community interest in developing alternative tourism strategies in its footpath initiative designed to provide tourist access to inland natural, cultural and landscape heritage.

As projects gain momentum, their visibility will increase, and new partners may become interested.

- A number of new organisations have applied for membership of the *Dorset* Coast Forum since the draft coastal strategy was launched in December 1998.
Section D. Subsidiarity

4D.1 Is there an optimum level for ICZM?

The subsidiarity principle requires that decisions are taken as closely as possible to the citizen and that constant checks are made as to whether action at more central administrative levels are justified in the light of the possibilities available at more local levels. Larrue and Knoepfel (1998) point out that there are two ideas implicit in this principle: first, that different problems are resolved at different spatial-administrative levels; and second, that there exists a “good” system of distribution and attribution of competences.

The demonstration projects have been working at and led by agencies operating at a variety of administrative levels, and this is echoed in a broad cross-section of spatial scales. It is too early and may well not be possible to conclude whether working at one spatial scale has been more effective or efficient than at another. Neither can we conclude whether the choice of scale should be selected pragmatically on the basis of the national legislative and administrative framework, or on the basis of local environmental or socio-economic conditions.

Just as planning systems vary widely between the different member states, so do systems of local government. The level of emphasis placed on different administrative levels varies according to the distribution of power and of management roles and responsibilities between the different levels.

- While the regional level of government in Italy (NUTS II) has the powers to legislate, in Finland, the region is little more than a convenience for inter-municipal cooperation. There is no regional level in Ireland or Denmark.

Few of the projects have specifically remarked on the vertical distribution of management responsibilities except in terms of centralisation of sectoral planning. This has its corollary in the difficulties in obtaining appropriate representation at local level for sectoral agencies, particularly with respect to offshore management issues.

- The Bantry Bay project noted the lack of a regional tier of government which could translate sectoral policies into spatial planning objectives.
- Down in Northern Ireland, suggested that its mode of working may have been different had the government made a greater commitment towards transfer of planning and environmental management powers to local authorities. For the foreseeable future, the role of the local regeneration group will be limited to influencing planning and development decisions made by Down District Council.

There is an increasing commitment to the principles of subsidiarity evident in recent and ongoing changes in local government structures, as well as in planning, and this may be expected to facilitate more local ICZM initiatives by clarifying and simplifying administrative arrangements and bringing more decisions into the realm of local debate.

- The Isle of Wight noted that local government restructuring in the UK, and in particular, the creation of unitary authorities is “a distinct advantage in terms of administering planning and coastal zone management functions”.

Several projects set out to identify the level at which practical development of ICZM can occur. Based on the diverse experiences of the projects, the conclusion to date is that development of ICZM initiatives can take place at any level, but we have yet to see whether the choice of level has any implications in terms of the success and viability of the initiative. This study has confirmed that the potential for success is greatly improved where efforts have been made to ensure adequate cooperation and coordination between the different levels of authorities, and where project boundaries are appropriate to the issues to be addressed.
4D.2 Practical Points

The demonstration projects have brought to light several other factors relating to the issues of administrative level and spatial scale, in particular to the pros and cons of working at more local levels.

4D.2.1 Responsiveness to Local Needs

Local level planning is usually more responsive to local needs and concerns and provides for a greater level of detail than is practicable in more centralised planning.

- **Storstrom County** is elaborating coastal planning at local levels under the overall control of the regional plan. Although detailed, the regional plan is not considered adequate to address the complexity of coastal issues and sustainability assessments in a given local situation, nor to deal with the concerns of the community that conservation initiatives may curtail their economic activities.

Local initiatives may also benefit from increased participation and from local knowledge and commitment.

4D.2.2 Availability of Resources

We have seen above that human resources can be very limited at local levels. While many of the projects are demonstrating how local capacity can be increased, the duplication in different local authorities of some of the skills required for coastal management may not be justified by the relatively low frequency on which they are called.

- Limited local capacity and the desire to avoid unnecessary duplication of skills were important arguments raised in the UK against the extension of the local planning powers to offshore areas.
- In Finland, the Association of Local Authorities is an example of a mechanism which could be used for sharing of skills.

4D.2.3 Perspective

More local administrations are often described as being parochial in outlook, focusing on local interests and perhaps lacking the broader perspective required to accommodate national concerns. Local politics or commercial interests may also interfere with the decision making process, sometimes favouring short-term economic goals over longer-term sustainability concerns.  

- The Kavala project noted that local administrations are interested in projects which provide rapid results, particularly those improving the local economy. At higher levels, priority is given to longer term plans concerning economic development AND environmental protection.

As an example, there may be strong local opposition to some projects which are of strategic national importance, and this may create difficulties especially where there are limited options for their siting. In most countries, the State has the ultimate decision making power with respect to such developments.

- The West Flanders project identified a role for the Regional Government in providing a bridge between the National Government which has responsibility for offshore activities and the provincial government which has already made excellent progress in towards achieving horizontal coordination. While the entire coast falls within one province, the Province does not have the administrative competency to deal with issues of national importance.

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9 The opposite may also be true, as local residents have a strong commitment to maintaining their livelihoods.
In **Norway** efforts are being made at the County level to address problems which came to light during the recent local (municipal) level ICZM initiative - specifically conflicts between the Fishery Authority and the Coastal Conservation Plans drawn up at local level.

Drawing on international experience, the *Federal Consistency* provision of the US CZMA is of interest. The provision requires that all Federal (national) decisions regarding coastal developments must be consistent with State plans, and has proved an important incentive to States voluntarily drawing up coastal management strategies. However to meet with Federal approval, State programs must provide “for adequate consideration of the national interest … including the siting of facilities such as energy facilities which are of greater than local significance”, and the consistency provision is thus as much about establishing a Federal-State dialogue as about protecting State interests.

### 4D.2.4 Coherence

Related to the issue of perspective, there is a danger that if coastal planning decisions are entirely decentralised, there will be a fragmentation of policy and inconsistencies between the strategies drawn up by different areas. This may result in a lack of coherent strategy for the coast at larger scales.

Again, one way to overcome this is by the coordination of coastal policies through associations of local authorities.

*The Inter-regional Wadden Sea Cooperation* involving all of the “regions” bordering the Wadden Sea complements the *Trilateral Wadden Sea Cooperation* (intergovernmental). The rationale behind its formation was that planning initiatives should stem from the regional level and should be participatory in nature, but that they also need to be coordinated between regions in the trans-national context of the Wadden Sea.

*UNEP (UNEP 1995)* has pointed to the key role that regions can play in ensuring coherence between more local management initiatives, and in mediating areas of conflict between national and local governments regarding issues such as national security. UNEP suggests detailed development, planning and implementation should take place at the local level, but direction should be provided by a coordinated coastal management policy at the national level.

### 4D.3 Combining “Top-down” and “Bottom-up” Approaches

The issues of more central perspective and coherence vs more local specificity, commitment and interest are applicable across all levels of administration. The arguments are often stated in terms of the pros and cons of “top-down” and “bottom-up” approaches.

In a recent review of the implementation of the OECD Recommendation on ICZM (OECD 1997) it was noted that ICZM principles are being applied in a number of local initiatives but that these are typically operating outside any national or even sub-national ICZM framework. The review noted a clear need to establish a better equilibrium between “top-down” and “bottom up” approaches to the design of ICZM activities.

The observation made by the OECD is very true to most of the demonstration projects, and the question of a national framework for ICZM is further discussed in *Chapter 5*. Olsen (1993) has highlighted the value of learning from and building on the successes of local initiatives in the development of a national strategy for ICZM.
Section E. Sustaining the Cooperation Process

Coastal management requires a long-term perspective, and in order to sustain present initiatives, projects need to be looking beyond the span of their immediate financial and technical support from the EC LIFE, TERRA and Phare funding instruments. The acid test for individual projects is whether they will produce lasting results in the project area after the termination of the current phase of activity.

Awareness and recognition of the advantages of an integrated approach is only the first step towards sustaining an ICZM initiative. Factors which contribute to the viability of an ICZM initiative are political will, backed by public support; capacity building; institutional and administrative support and financial support. In the following paragraphs, we look at how the projects have tackled some of the different elements of sustainability.

- With emphasis on capacity building, awareness, and technical infrastructure, the Magnesia project has taken a strategic and incremental approach towards development of the “appropriate conditions” for long-term coastal management within the Prefecture.

Facilities to support long-term coastal management needs have been established by several projects.

- An information centre in Strymonikos will continue to operate under the auspices of the local authority upon termination of the project.
- Improved information management systems such as coastal geographical information systems have been established by many projects, including a community based GIS in Bantry Bay.
- The coastal observatory in Kent will provide a recognisable centre to champion coastal issues, as well as providing a focus for raising awareness about the coast, and providing information and advice to decision makers.

A viable ICZM process does just imply the production of tangible outputs such as improved information management systems, or other infrastructure, but a commitment to the ongoing process of coastal management and a mechanism or strategy to see that the process is carried through.

Many excellent ICZM plans and strategies have failed to be implemented and it is important that their future viability be considered during the development stage in order to maintain momentum. The following sections will highlight the issues of institutional support and funding, particularly in the light of the transition from development to implementation of an ICZM strategy.

4E.1 “Institutionalisation”

The implementation of ICZM does not necessarily imply continuation of the coordination structures used for the initiation or development of an ICZM strategy. In some cases, the best way to ensure the implementation of strategies or individual actions may be to hand them over to agencies with the competence and executive powers to carry them out.

One means to ensure the survival as well as its legitimacy of an initiative is to seek its adoption or endorsement by an established agency or body.

- The Local Development Corporation of Cyclades may provide a long term vehicle for the Cyclades project which was initiated by the University of the Aegean. Local development authorities are a stakeholder in a number of the other projects in Greece.
- Magnesia anticipates the full integration the administrative tasks associated with coastal management into the Prefecture.
- In Kavala, broad support for ICZM now exists amongst sectoral actors, local authorities, the Prefecture and Region. It is anticipated that IZCM will be adopted by other prefectures in the Region.
- The Wadden Sea project will present the findings of its tourism project to meetings of the IRWC (regional political representatives) and the next Trilateral conference (governmental) in 2001.
This is one year later than was originally anticipated and the project is looking at ways to sustain public interest in the interim period, for example using a mobile exhibition and newsletter. Alternatively, aspects of a plan or strategy can be integrated into the statutory management framework.

- The Isle of Wight project notes that in England, a planning guidance note on Coastal Planning issued by the government (PPG 20) suggests that non-statutory coastal plans should inform the statutory planning process. In this way, local plans serve to implement policies contained in a range of non-statutory plans including harbour plans, estuary management plans, shoreline management plans and coastal management plans.

- Cork County Council is committed to integrating the results of the Bantry Bay Charter into the next County Development plan. However, as yet, the Department of the Marine and Natural Resources has been unable to make a similar commitment regarding concordant licensing of marine activities. At the same time, there is ongoing discussion regarding the development of a national framework for ICZM which may open up new possibilities for existing initiatives.

- Several of the sites of concern to the Irish dunes project have been designated as Special Areas of Conservation (SACs) and will be subject to statutory management plans. This opportunity was not foreseen, and has stimulated coordination with the national Parks and Wildlife Service to avoid duplication or divergence of efforts.

Private sector organisations, and other non-statutory programmes may also have a role to play in implementation.

- The Isle of Wight tourism group is feeding its findings into the local Agenda 21 Strategy - an important link since the local economy is heavily dependent on tourism.

It is unlikely that all of the tasks associated with coastal management implementation will fall under the competence of a single agency. Networking - the division of implementation tasks amongst different public and private organisations according to their competence - is a strategy that works for statutory and non-statutory initiatives alike.

- The Forth Estuary project is developing an implementation action plan by asking or inviting different agencies and organisations to voluntarily undertake to implement relevant aspects of the strategy. This is a clearly a critical stage in the Forum’s development. The emphasis is on ownership, and it is hoped that the Forum has developed a sufficient level of consensus to move forward to the adoption of the strategy in May 1999. The project leader noted that attention to consultation and participation processes should ensure that there are no undue surprises to the partners during implementation.

- The Dorset Coastal Strategy is accompanied by Proposals for Policy and Action which clearly identify which public and private organisations need to commit themselves to the actions and suggest a lead agency for each. Several agencies signed up to relevant actions within weeks of the Strategy’s release.

Not all of the tasks and decisions associated with ICZM are procedural, and management plans and strategies will continue to evolve. Thus, even where ICZM tasks are adopted by one or more competent agencies, there will be an ongoing need for dialogue and coordination. This may be accomplished by the establishment of new, perhaps more formal coordination mechanisms, or by maintenance of existing (often voluntary) approaches.

Many of the networks, associations and forums seen in the demonstration projects pre-date the demonstration programme, and will continue to play a role in overseeing implementation and further development of ICZM strategies. However, without operational funds or a secretariat, there is a risk that support for such organisations will wane in the absence of visible achievements.

- The EC LIFE Project played a critical role in the establishment of the Secretariat which supports the Dorset Coast Forum. The project leader suggested the Forum may well have “run out of steam” had it not been given this boost to its activities.
4E.2 Funding

Whether they are adopted by a statutory agency or otherwise, coastal management programmes will be faced with day-to-day running expenses associated with staffing, basic infrastructure, maintenance of permanent or occasional participatory or consultative structures, and other operational costs. Several projects have emphasised the importance of a designated and full time officer to support the coastal management initiative through its development and implementation stages.

- The Isle of Wight project suggests the key to ICZM implementation is the appointment of a Project Officer - without this, many good plans fail to be translated into action.

A temporary commitment to funding has already been made by one or more of the agencies involved in the demonstration projects, typically amounting to around half of the total expenditure of the project. However, this funding may be insufficient and its continuation after the demonstration phase is not guaranteed.

Long term funding is a concern to several projects, in particular for the employment of permanent staff to facilitate the initiative.
- This is particularly the case in voluntary approaches such as the coastal forums of Dorset and the Forth Estuary.
- The Isle of Wight points out that in the UK, statutory agencies are frequently asked to support the implementation of non-statutory plans whose development they promoted. There is a concern that resources will simply be transferred from one scheme to another as increased demand for funding cannot be sustained.

For fund-raising purposes, it is useful to highlight the relatively modest costs of maintaining an ICZM process, and to emphasise its cost effectiveness in terms of the economic benefits of reducing inter-sectoral conflict and of improving the use of public and private funds.
- Devon and Cornwall note that the lack of a statutory basis for ICZM makes it difficult to justify allocation of resources. They suggest more attention should be paid to cost-benefit analysis to demonstrate the value of ICZM.

Some projects have already identified or are setting out to identify new sources of funding, while at the same time there is a wide interest and even expectation of ongoing European support. Several projects are developing proposals for activities which may be funded through other European programmes such as Interreg III.
- Funding and sponsorship for ongoing activities in the Forth Estuary project are being examined through the development of a business plan. A joint Firths’ proposal may be desirable in order to avoid competition between parallel initiatives in Scotland, but this in turn requires a more central coordinating body.

For other initiatives, limited core funding is already assured through local or national sources.
- The Syndicat Mixte de le Côte d’Opale receives core funds of almost 1.4 million French Francs from the Collectivités Territoriales, based on a per capita contribution for the 700,000 residents of the area it covers. However, the key to its survival will be the continued ability to attract funds for specific and visible projects supported by its members.
- In Dorset, a Forum partnership has generated sufficient funding to establish a new post of Marine Conservation Officer - an action recommended in the draft Strategy.
Chapter 5. The National Context for Coastal Management

“The functions, powers and responsibilities of government agencies are established by legislation, and accordingly if these need to be clarified or altered in order to achieve ICAM, legislative intervention is necessary. Indeed an essential role of ICAM jurisdiction is to clarify and delimit the jurisdictions of the various organs of state and other institutions involved in any ICAM regime. If the parameters of each government agency’s area of responsibility are not clearly defined conflicts are likely to arise both between different tiers of government claiming jurisdiction in respect to the same matter (“vertical overlap”) and between different sectoral agencies operating in coastal areas (“horizontal overlap”).”

(Boelaert-Suominen and Cullinan 1994) Development Law Service of FAO

In this study we have been mainly concerned with European national frameworks for coastal management from two perspectives:

- that they form the context or governance framework within which the demonstration projects are working and will thus heavily influence the nature, suitability, and success of local solutions;
- that this is a level which could be primarily affected by any EU interventions resulting from the Demonstration Programme.

The link between the demonstration projects and national policy has been largely “top-down” with few of the demonstration projects aiming to have a direct impact on the national context, though in several countries this is in a state of flux. Notable exceptions are:

- In Norway, the Planning and Building Act which is the principle instrument for coastal planning is being revised. The results of the demonstration project will be fed into this process.
- In Belgium, the demonstration project is expected to lead to a formal protocol to direct the existing Federal-Region collaboration, and establish requirements for consultation on relevant activities.

Many ICZM guidelines emphasise the need for appropriate frameworks for coastal management at the national level - in terms of a lead agency, coordination mechanisms, and legislation. In the following sections, we briefly review the situation in Europe10, and look at how national policy may direct or constrain more local management initiatives. We will then look at some theoretical frameworks for coastal management, emphasising coordination mechanisms.

Following a study of 18 coastal management initiatives in OECD countries, the OECD (1993) emphasised the need for policy integration as well as for a top-down or central government focus for coastal management in order to establish institutional (legal and administrative) and financial mechanisms as well as standards for coastal management.

“An institutional mechanism needs to be created that would operate in a coordinated integrative fashion. Such a mechanism is best developed through the creation of formal and informal linkages among relevant existing agencies (interdepartmental committees, task forces etc) or the establishment of a central coastal management agency with links to sectoral interests. The establishment of an integrative mechanism particularly relates to:

- National government agencies responsible for the various sectoral, environmental, resource management and economic policies;
- The relationship among national, regional, (state, provincial), local governments; industry; and the public. Regional government is perhaps better placed to deal with the management of specific coastal regions, with nationally determined minimum standards.”

(OECD 1993)

10 Details of ICM arrangements for individual countries are provided in Annex III.
5.1 Types of Institutional Arrangements for Coastal Management at National Level

A number of schemes can be used to characterise institutional arrangements (the legislative framework and corresponding administrative arrangements) for coastal management at national level, and to a lesser extent, at the project level. Although typologies fail to capture the contextual richness of individual coastal management initiatives, they do usefully illustrate the diverse range of possible solutions to coordination problems.

In general, legislation forms the framework for defining agency roles and responsibilities (sectoral and territorial) at national and sub-national levels and readers are referred to the report of Thematic Study A for further details on legal and regulatory mechanisms for ICZM.

Boelaert-Suominen and Cullinen (1994) use the following classification to look at approaches to coastal management as framed by national legislation:

- **The national integrated coastal management approach** - where legislation is enacted specifically to implement or promote existing ICZM policies
- **The national economic planning or resource management approach** - which has given rise to ICZM as part of a larger project extending beyond coastal areas
- **The extended land-use planning approach** - characterised by attempts to modify terrestrial planning techniques to achieve more integrated management of coastal areas; and,
- **The special region approach** - which is characterised by the implementation of integrated management of coastal resources within particular regions of the coastal area in order to achieve specific objectives which are more limited in scope than those typical of a full ICZM programme.

International experience suggests that there are a number of institutional options to facilitate the process of moving towards more integrated approaches to coastal management (Sorensen 1990). The following options were proposed by Boelaert-Suominen and Cullinen (1994).

- Creating a *new government agency* with jurisdiction over the coastal zone, and powers to enact, amend and complete an ICAM plan and to prepare legislation;
- Setting up an *interdepartmental commission* or a task force with authority to devise a coastal management plan, issue guidelines for the integration and coordination of existing policies and to develop appropriate laws;
- Appointing a *lead agency* from among the existing government departments with a mandate to prepare a coastal management plan, and with the power to direct the actions of other government agencies;
- Setting up a *non-executive advisory committee* with members from several agencies and/or interest groups to study coastal issues and advise the government on how best to address them; and
- Setting up a framework for *regular interdepartmental consultation* supported if necessary by the signature of a memorandum of understanding.

Similar suggestions for types of institutional arrangements to facilitate ICZM at national level are:

- Concentrate authority in a new centralised agency
- Expand the duties of an existing agency
- Create a permanent inter-ministerial council or network

(Sorensen, McCreary et al. 1984)

- National planning agency
- Formal establishment of an interagency or interministerial council
- Creation of a special coordinating committee or commission
- Formal designation (by the chief executive or the legislature) of one of the line agencies or ministries to act as a “lead agency” and to oversee an interagency coordination process

(Post and Lundin 1996)
5.2 National Frameworks for Coastal Management in Europe

We have seen above that the institutional framework for coastal management in European countries is typically comprised of two elements:

- A land use planning system administered by territorial authorities at one or more sub-national territorial levels. Plans at different levels are frequently coordinated through a hierarchical system whereby a planning authority has to take into account any plans drawn up by a more central authority.
- Sectoral laws which are usually reflected in sectoral administrations within the national government. Many tasks are assigned to line agencies, sectoral strategies, plans and decisions generally stem from central government, and only occasionally are there requirements for sectors to coordinate strategy planning at national or regional levels.

The issue of coordination within and between these two systems is particularly crucial in coastal areas where management functions are often sharply divided about the land-sea boundary. Several of the demonstration projects noted the lack of a coordinated national policy as a constraint, not just in terms of the uncertainty it presents to local initiatives, but because failure to coordinate decisions at national level exacerbates the lack of consistency between the sectorial and territorial policies, programmes and plans which are implemented at the local level.

Post and Lundin (1996) list several purposes served by an ICZM coordination mechanism:

- Promote and strengthen interagency and inter-sectoral collaboration
- Reduce interagency rivalry and conflicts
- Minimise duplication of functions of line agencies
- Provide a forum for conflict resolution among sectors
- Monitor and evaluate the progress of ICZM projects and programs
- Implement actions resulting from the evaluation exercise.

Despite evident problems arising from the fragmentation of management responsibilities, most of the European countries we looked at lack an overall coordination body for coastal management at national level (e.g. France, Denmark, Italy, Norway, Sweden), while coastal management is regarded principally as an component of the territorial planning system in several countries including Norway, Sweden, and Denmark.

Several countries have formally established national bodies for coastal management, but these are serving mainly in an advisory or consultative capacity.

- In England, departments with coastal responsibilities liaise through the Interdepartmental Group on Coastal Policy. An overview of policy for the coast is maintained by the unit responsible for servicing this Group (Coastal Policy Coordination Branch, Department of Environment, Trade and Regions).
- In Belgium there is an Inter-cabinet Guidance Group for ICZM which includes regional and federal “cabinets” and administrations; as well as NGOs by invitation.
- There is a recently established national coastal zone programme in Portugal.
- In Spain, the Dirección General de Costas (Directorate General for the Coasts) is located within the Ministry of Environment.
- In Greece, a Coastal Zone Management Consultative Committee advises the Directorate of Regional Planning but there is no mechanism to pursue coordination or arbitration between the many agencies involved in coastal policy.

At present, broader consultative bodies which bring together public and private interests at national level feature only in the UK.
• National Coastal Fora which bring together representatives of central and local government, industry and commerce, and other interests such as conservation and leisure/recreation have been established in England, Scotland and Wales.

• A broader coastal forum which includes representatives of interested and affected parties may be established for the Belgian coast.

We have also seen some examples of intersectoral coordination mechanisms at national level which may facilitate ICZM, if not specifically designed for this purpose.

• In Sweden, there are established procedures for intersectoral coordination where the actions of one sector affect another.
• In Italy, there is legal provision for waterbasin management plans. Plans for basins of national importance are prepared by designated Specific Basin Authorities which include representatives of relevant ministries and regional authorities under the overall authority of the Ministry of Public Works.

As well as addressing cooperation and coordination issues, a national coastal management office can also have an important role to play in the support of more local initiatives. The Greek projects and Firth of Forth project emphasised the importance of a “recipient” office at national level to provide a point of reference for more local initiatives. Possible roles include:

• to endorse the ICZM initiative;
• to endorse the participation of sectoral line agencies in local ICZM initiatives;
• to adopt and endorse the implementation of ICZM plans or strategies;
• to provide advice from a broader strategic perspective;
• to ensure cohesion between different ICZM initiatives;
• to provide technical guidance;
• to facilitate sharing of experience between different ICZM initiatives; and, not least,
• to promote replication of ICZM in other areas.

The relatively minor presence of coastal management bodies at national level cannot be explained by an absence of need, but instead would appear to reflect a relatively low priority afforded to coastal management in the past, perhaps owing to a lack of awareness of the potential benefits. The absence of practical coordination mechanisms may stem from, and certainly exacerbates, the general lack of integrated policies for coastal management in European countries.

5.3 National Policies Concerning Coastal Management

Despite the paucity of institutional arrangements for coastal management, the special nature of the coastal zone has been recognised by most European governments. We can distinguish two aspects of government policy - policy concerning a vision for the coast (e.g. contained urbanisation, sustainability objectives) and policy concerning the means by which coastal management is to be accomplished.

National coastal policy may be comprehensive or, more commonly, piecemeal, expressed indirectly in one or more components of planning and sectoral policy. Where policy is fragmented there is a risk that different aspects of coastal policy may be missing, incompatible, or even in direct conflict. Legal and regulatory conflicts are discussed in the report of Thematic Study A.

◊ The New Zealand Coastal Policy Statement contains seven principles for the sustainable development of the nation’s coastal environment. While focused mainly at national level, the Statement includes issues which must be addressed or considered by local and district authorities (Haward 1995).
The United States Coastal Zone Management Act of 1972 sets out the national goal: “to preserve, protect, develop and, where possible, to restore or enhance the resources of the Nation’s coastal zone”, and further elaborates how this is to be achieved through the establishment of a voluntary partnership between the federal government and individual states.

Vision for the Coast

- Overall Spanish policy for the coast is “to guarantee the public character of coastal public property and conserve its natural characteristics, reconciling the necessities of progress with the imperatives of protection” (Montoya 1991).
- The overall aim of the Danish Spatial Planning Act with respect to the coastal zone is “to protect the coast, while allowing necessary developments of cities, of infrastructure, and of tourism” (Ministry of Environment and Energy 1997).
- Control of coastal urbanisation is a policy objective in many countries including Portugal, France and Finland.

Approaches to Coastal Management

- UK National Policy for coastal zone planning has been summarised in Towards Best Practice (DoE 1996), which states, for example that “the content and scope of coastal management should be dictated locally.”
- In many countries, provisions for coastal management are made in the territorial planning system. These may include guidance notes, setbacks, special planning zones, a general presumption against coastal development, or requirement for a functional justification for developments in coastal areas.

Planning Provisions which can Support Coastal Management

There are a number of examples of planning provisions which have resolved (or pre-empted intentionally or incidentally) coordination problems encountered elsewhere. Good examples include:

- The extension of local authority planning jurisdictions offshore as seen in Norway, Finland and Sweden;
- No-development setbacks and protection zones both onshore (e.g. Spain, Finland, Denmark) and offshore (Latvia);
- Requirements for intersectoral consultation or coordination (e.g. Sweden) or inter-authority consultation in planning decisions (e.g. Norway);
- The Key Planning Decision (PKB) for the Netherlands Wadden Sea.

Many of the projects are working against a background of changing national policy either directly relating to coastal planning or management, or indirectly as a result of local government reorganisation, or revision of sectoral, environmental, conservation or planning legislation. A changing national context presents an added level of uncertainty to those projects which are seeking to develop institutional mechanisms to sustain coastal management initiatives, and reinforces the need for adaptable approaches to ICZM at more local levels.

Examples of evolving national frameworks include:

- The creation of “New Municipalities” in Greece required some of the projects to reschedule planned activities. In addition, spatial planning and environmental protection laws are currently under revision and a National Directive on coastal zone management is anticipated.
- A current objective of the Irish Government is “to establish a process that will lead, over a period of time, to an integrated system of management for the coastal zone of Ireland.”
- In France, revision of the legislation affecting management of the coast has been under discussion for several years.
- National spatial planning policy is under review in the Netherlands.
5.4 What Works Best?

International experience suggests that there is no single best approach, or blueprint, for institutional arrangements for coastal management at national level (Burbridge, Humphrey et al. 1997). One of the most studied cases of administrative arrangements for coastal management is the United States Coastal Zone Management Program (CZMP). Under the provisions of the 1972 Coastal Zone Management Act, US States were given considerable flexibility as to how to integrate coastal management functions (Archer 1988), and three specific approaches were authorised:

- Local government implementation, according to standards established by the State, subject to State administrative review and enforcement;
- Direct State water use planning and regulation; or
- State review of development plans and projects, and land and water use regulations prepared by any State agency or private developers, with the power to approve or disapprove.

The responses to this legislation were quite diverse: some states enacted their own comprehensive legislation, some opted for decentralised (local) planning, and some for networking, under the overall coordination of a lead agency (Archer 1988). Despite some 25 years experience in design and implementation of individual state programs, and several efforts to compare success, as yet there is no verdict as to which structure has been more effective (Born and Miller 1988; Knecht, Cicin-Sain et al. 1996).

Rather than identify a single best option in their analysis of policy options for coastal management in Ireland, Brady, Shipman and Martin (BSM 1997), suggest an evolution of institutional arrangements could take place with increasing maturity of the national coastal management programme. In the proposal for coordination mechanisms at national level, an interdepartmental committee is replaced by an interdepartmental unit, and eventually an independent unit with overall responsibility for coastal management. The final step, a designated agency or authority, is not recommended for Ireland owing to the major restructuring that would be required within central and local government.

Sorensen (1997) notes that it is common for nations (or sub-national units) to form an interagency or interministerial council at the outset of a coastal management programme.

The pros and cons of each of these arrangements summarised by BSM (BSM 1997) are set out in Table 1. There is a trend towards increased autonomy and scope with each option but this is paralleled by an increase in cost, and in complexity as the “unit” is further removed from other ministries, with issues of overall responsibility arising. Sorensen and McCready (1990) note that creation of a new centralised agency may be costly, and may be met with opposition by existing sectoral agencies which fear a loss of autonomy.

5.5 Conclusions

- A coordinated national policy for coastal management will improve the chances of success for more local ICZM initiatives;
- A coordinating unit at national level can facilitate coastal management at more local levels by ensuring that sectoral and territorial policies, programmes and plans drawn up by different agencies remain consistent over time;
- There is no single best administrative arrangement for coastal management, and coordination structures may be expected to evolve over time;
- A national focal point or agency for ICZM can provide support to local ICZM initiatives as well as ensure cohesion between different initiatives;
- Local ICZM initiatives must be sufficiently flexible to accommodate changes in national policy, including local government reorganisation.
<table>
<thead>
<tr>
<th>Option</th>
<th>Structure</th>
<th>Role</th>
<th>Advantages</th>
<th>Disadvantages</th>
</tr>
</thead>
<tbody>
<tr>
<td>Inter-departmental Committee</td>
<td>Committee representative of relevant departments</td>
<td>Achieve more integrated administration of the coastal zone through enhanced coordination</td>
<td>Simple structure; established formula; no significant administrative changes required; minimal resource implications</td>
<td>Nature of structure limits capacity to relatively simple measures such as guidelines and the introduction of additional consultative procedures; lacks independent resources; primary responsibility of representatives remains to parent departments; very limited public involvement</td>
</tr>
<tr>
<td>Inter-departmental Unit</td>
<td>Permanent working group, with some independent resources (from existing departments), directed by inter-departmental committee representative of Departments</td>
<td>Achieve more integrated administration of the coastal zone through enhanced coordination and co-operation in accordance with written “concordat”, setting out formal relationship to government departments, etc</td>
<td>Relatively simple structure; permanent, dedicated executive; could be staffed and resourced through re-deployment; could be extended to embrace other interests relevant to ICZM; would have own resources to promote ICZM</td>
<td>Major investments in coastal zone would continue to be responsibility of existing departments and agencies; limited public involvement; overall Ministerial responsibility could be an issue</td>
</tr>
<tr>
<td>Independent Unit</td>
<td>Permanent working unit, with independent resources (provided directly) directed by committee appointed by relevant Ministers</td>
<td>Achieve more integrated administration of the coastal zone through enhanced coordination and co-operation in accordance with written “concordat”, setting out formal relationship to other bodies and the public</td>
<td>Independent of government departments; potentially wide representation of coastal zone interests; high degree of freedom within “concordat”; permanent dedicated executive; would emphasise importance of ICZM; public involvement facilitated</td>
<td>Independence of unit could distance it from the day-to-day difficulties of coordination within government departments, etc.; major investments in coastal zone would continue to be responsibility of existing departments and agencies; overall Ministerial responsibility could be an issue</td>
</tr>
<tr>
<td>Agency or Authority</td>
<td>Major agency or authority directed by board appointed by relevant Ministers; significant independent resources. Board representative of wider coastal zone interests</td>
<td>Directly administer many aspects of the coastal zone and ensure close coordination and cooperation with other bodies in accordance with written “concordat”</td>
<td>Very high level of independence and freedom within “concordat”; should achieve very high level of integration of management; potentially wide representation of coastal zone interests; permanent, dedicated executive; would emphasise importance of ICZM; public involvement facilitated and formalised</td>
<td>Requires major restructuring of central and local government; requires clear definition of geographical jurisdiction; integration of management at boundaries of defined coastal zone remain; independence of unit could distance it from the day-to-day difficulties of coordination within government departments, etc.; overall Ministerial responsibility could be an issue</td>
</tr>
</tbody>
</table>
6. Conclusions and Recommendations

Thematic Study D, *Planning and Management Processes: Sectoral and Territorial Cooperation*, was designed to:

- assess and document the degree to which implementation of sustainable management of coastal zones in the demonstration project areas is hindered by lack of consistency between sectoral and territorial policies, programmes and plans;
- analyse the factors which are blocking effective cooperation and coordination; and,
- suggest approaches to overcome these impediments on the basis of experience gained through the demonstration projects and elsewhere.

We raised three further topics for clarification in the methodology chapter relating to the dimensions of integration and coordination; how far integration and coordination should go; and how to ensure the viability of an ICZM initiative, including the role of central government.

6.1 Conclusions

6.1.1 Coordination Needs

The demonstration projects have confirmed that there are serious inconsistencies between sectoral and territorial policies, programmes and plans and that these are failing to provide for an integrated approach to coastal management.

Our coordination matrix suggested that there are four dimensions to coordination for effective coastal management.

- **horizontal integration** of policies, management arrangements and development plans amongst different sectors, services and agencies at a given level of government;
- **vertical integration** of policies, management arrangements and development plans from national through to local levels of government;
- **territorial integration** taking into account the interrelationships and interdependencies between the terrestrial, estuarine, littoral and offshore components of the coastal zone;
- the consistent integration of sustainable development objectives policies, plans and management strategies through time.

The demonstration projects have confirmed the multi-dimensional nature of this matrix. Two points are worth highlighting:

- First, that geographical integration encompassing a systems approach is a fundamental aspect of coastal management and the achievement of geographical integration should ideally be the basis on which other coordination needs are determined. A systems approach encompasses both environmental and socio-economic sub-systems.

- Second, that integration between sectoral and territorial planning is not always possible within a single administrative level. Horizontal and vertical integration are therefore inseparable components of any local ICZM initiative.
Cooperation and coordination in the demonstration projects are hindered by:

- Fragmentation of institutional arrangements, including gaps and overlaps in responsibilities within and between administrative levels;
- Lack of awareness of the socio-economic and environmental benefits of effective coastal management;
- Perceived conflicts between short-term socio-economic needs and longer-term sustainability issues;
- Lack of implementation and enforcement of key aspects of planning and environmental legislation;
- Competition amongst sectoral agencies or amongst neighbouring local authorities, sometimes exacerbated by political rivalry.

The degree of fragmentation in management arrangements suggests that in some cases there may be grounds for administrative reorganisation, or redefinition and reallocation of roles and responsibilities. However, such a reorganisation may not be acceptable or considered to be justified by coastal management needs. A common strategy or vision for the coast can often be achieved more simply, more rapidly and in a more flexible manner by coordination amongst the different actors in the coastal zone. In the longer term, the efficiency of coastal management will be improved if institutional arrangements are harmonised.

6.1.2 Towards Coordination

We have seen above that there is a great diversity in approaches developed by the projects, in part reflecting differences in culture and in the starting parameters (lead agency, boundaries) which often result as much from the origin of the initiative as from deliberate design. As yet, it is difficult to assess whether some of these approaches are achieving or will achieve greater success than others. In the methodology chapter, we suggested that at this stage in the evolution of the demonstration projects, the outcome we should be looking for is the establishment of an adequate, viable and well-supported coastal management process.

Some of the pros and cons of the different approaches have been examined in Chapter 4, and it is clear that some of the models we have seen fall short in terms of providing an adequate vehicle for ICZM owing to the limited scope of issues that can be addressed. Related to this, the projects differ in terms of their capacity to manage a more inclusive approach to management of coastal areas. This is a result of differences in experience and availability of local skills and resources, and of differences in the complexity of the project context and in stakeholder interest and awareness. As a result, many of the projects have taken the strategic decision to build on existing strengths, and to develop their capacity by addressing a limited range of issues or by working with a limited number of partners.

Our results have thus reinforced two lessons that need to be understood by stakeholders, funders and evaluators alike:

- First, that the establishment of a coastal zone management process takes a considerable amount of time and commitment; and,
- Second, that it is sometimes better to build upon a modest but sound foundation than to risk failure or loss of confidence through being over-ambitious.

The questions of viability and broad support are closely linked in the demonstration projects which are, on the whole, non-statutory and voluntary in nature. The projects have generated an abundance of ideas in terms of how to generate and maintain support from stakeholders in the public and private sector, and these are elaborated in chapter 4.

Some of the projects have now reached a critical stage with respect to the adoption and implementation of strategies by competent agencies and organisations, and in some cases,
coordination functions will themselves be taken on by the local authority. The value of an independent body such as a forum or syndicat in providing a mechanism or catalyst for coordination has been demonstrated in many of the projects, but it is here that future funding is least certain.

6.1.3 Creating an Enabling Environment

The current distribution of sectoral and territorial planning powers between different levels of government means that achieving consistency in decision making requires good coordination between all administrative levels from the most local to national. Ideally, this should be guided by policy which is harmonised, if not integrated, at European level and within member states.

Emerging principles of participation and subsidiarity both support the idea that decision making should be taken as near to the local level as possible, but a broader framework needs to be in place to ensure:

- Adequate perspective providing a balance between national and European interest and local concern;
- An overall coastal policy to ensure coherence between different local initiatives;
- Provision of appropriate technical and financial support to local initiatives.

The region (or other administrative level associated with strategic planning) may hold the key to resolving the problem of territorial and sectoral integration in a manner which both reflects national and European policy and is adapted to local conditions. This is not necessarily the level at which detailed action planning and management should take place - detailed planning and implementation are essentially local tasks - but the region is potentially a critical enabling level in terms of resolving some of the coordination obstacles for more local ICZM initiatives.

The role of national governments has been discussed in chapter 5 and it is clear that there is much that could be done at this level to enable, facilitate and promote more local initiatives at the very least through harmonisation of the policy framework for the coastal zone. The same can be said for the European level.

6.2 Recommendations

The following recommendations relate to good practice at the project level, and to the creation of an enabling environment at national and European levels.

Recommendations to Local Initiatives

The following recommendations are particularly applicable to non-statutory ICZM initiatives of the type seen in the demonstration programme. The recommendations are based on an assessment of good practice derived from the demonstration projects.

Plan Ahead to Build the Foundation for an Effective Coordination Mechanism

- Employ a logical and systematic approach to development of ICZM, for example following the project cycle of description, analysis, planning and implementation, but don’t be too rigid.
- Anticipate information gathering, communications and awareness building and participation needs and allocate resources accordingly.
- Anticipate training and other human resources development needs.
• Allow sufficient time to complete key tasks associated with each step of the ICZM process.

**Consider the Broader Perspective in the Assessment of Coordination Needs**

• Employ a systems approach (environmental and socio-economic) to the selection of boundaries, and identify “horizontal” and “vertical” coordination needs accordingly.
• Ensure that all relevant stakeholders are represented - use structures such as a steering committee and working groups to ensure that the participation process is manageable and affordable.
• Consider future development trends and scenarios and identify long-term environmental or socio-economic driving forces.

**Adopt an Adaptive and Incremental Approach to Create a Resilient Coordination Structure**

• Adopt an incremental and flexible approach to ICZM in order to learn from experience, while at the same time achieving results within existing means and capacity.
• ICZM is an iterative process - build on success by using opportunities this presents to expand the scope of the initiative over time.
• Monitor and record lessons learned and adapt management strategies accordingly.
• Allow sufficient flexibility to accommodate changes in national policy, including local government reorganisation, as well as to respond to new and changing demands on the coastal zones.

**Develop and Maintain a Broad Body of Support**

• Develop awareness of the need for and benefits of their collaboration amongst the general public, politicians, and management agencies and services.
• Seek political support to legitimise the initiative but be aware of the drawbacks - elections and local political agendas may be disruptive.
• Peer group pressure, media attention and a locally respected “champion” are valuable agents in encouraging participation, but ultimately success of an ICZM initiative will depend on a genuine commitment by all participants to its goals. Develop a sense of ownership.
• Where possible, generate early and visible results to demonstrate the benefits of coordination in addressing a locally significant issue.

**Look Ahead to Implementation**

• Aim to identify long-term financial support for coordination needs from the earliest stages in development of the initiative.
• Network implementation tasks amongst agencies and other management bodies according to their competence, including the private sector.
• Wherever possible seek to use statutory planning instruments to ensure a long-term impact.
• Don’t build a house of cards - build a strategy on the basis of complementary but independent actions and programmes which can be implemented individually.

**Recommendations to National Level**

**Ensure the Policies Relating to the Coast are Compatible**

• Ensure that sectoral and other polices and strategies at national level are compatible with one-another, and that where necessary they are adapted to coastal areas.
- Develop appropriate structures for ongoing coordination and harmonisation of policies relating to both the terrestrial and marine components of the coast zone.
- Disseminate clear policy guidance relating to national policies for the coast by which individual development proposals can be assessed.

**Provide a National Focal Point for Local Initiatives**
- Ensure cohesion between different initiatives.
- Provide a mechanism for exchange of experience, and possibly for skill sharing.
- Provide for monitoring and evaluation of coastal initiatives.

**Facilitate Integrated Approaches to Coastal Management**
- Examine applicability of the subsidiarity principle for reallocation of responsibilities.
- Respect the need for vertical consistency.
- Disseminate technical guidance relating to best practice for sectoral developments and for coastal zone management, including guidance on management of coastal systems and avoidance of natural hazards.
- Promote interdisciplinary training and research.
- Consider long-term funding mechanisms for local ICZM coordination functions.

**Recommendations to EU Level**

**Ensure the Policies Relating to the Coast are Compatible at all Administrative Levels**
- Ensure that sectoral and other polices and strategies at European and other levels are compatible with one-another, and that where necessary they are adapted to the special development needs arising from the dynamic nature of coastal areas.
- Consider appropriate structures for ongoing coordination and harmonisation of policies and programmes relating to both the terrestrial and marine components of the coast zone.
- Ensure appropriate use of Structural Funds through broadened impact assessments of projects to take account of coastal processes and require coordination with relevant territorial and sectoral planning agencies and policy departments.

**Facilitate Integrated Approaches to Coastal Management**
- Encourage a trans-national perspective.
- Promote international environmental and sustainability standards using incentives.
- Promote interdisciplinary training and research.
- Disseminate technical guidance relating to best practice for sectoral developments and for coastal zone planning, including guidance on management of coastal systems and avoidance of natural hazards management.
7. References


Annex I. Questionnaires

Summary of Questionnaire to Project Leaders

General Background Questions

1. The Project Context
   i. What triggered the ICM initiative?
   ii. What are the projects goals and objectives? How have they changed?

2. Project Process
   Please provide a copy of your latest project work plan

3. Selection of Project Boundaries
   i. What are the spatial boundaries of the project? Is it local, provincial or regional?
   ii. On what basis were these selected?

4. Institutional Arrangements
   i. Who are the stakeholders in the project?
   ii. Who initiated the project?
   iii. Who is the Lead Agency or focal point for the project?
   iv. Describe the coordination mechanisms being established under the project

5. Planning Structure and Context
   Summarise the roles and responsibilities of the different bodies concerned in the planning and implementation of the ICZM initiative.

Questions Specific to Thematic Study D “Sectoral and Territorial Cooperation”

1. Integration between different levels of government
   
   This first set of questions addresses vertical integration between the different Government Agencies which have jurisdiction over part or all of the project area (e.g. local councils, district councils, regional councils).

   i. Which local, district, regional or other administrative units have jurisdiction over part or all of the project area?
   ii. What strategies (policies, programmes, plans, administrative arrangements) do these different levels of Government have relating to the management of coastal areas and coastal resources?
   iii. Are these strategies generally compatible with one-another or are there contradictions?
   iv. How do the different strategies affect or constrain management options in the project area?
   v. How are the relevant authorities involved or represented in the project planning and management?
   vi. Are there differences in perception of priorities and in time-frames at different levels of Government?

2. Sectoral Integration

   The following sections are concerned with integration between the different sectoral interests which have concerns over part or all of the project area. Sectors include economic sectors, such as tourism, fisheries or ports, and non-economic sectors such as nature conservation or education.

   i. Is the relationship between sectoral agencies within Government generally neutral, cooperative or competitive?
   ii. How are different sectoral interests being addressed in project planning and management?
   iii. What mechanisms are in place or will be established for conflict resolution?
iv. Are there any direct conflicts between the different sectors active or interested in the project area?
v. How are other interests being represented in project planning and management (e.g. NGO’s, business associations)

3. Externalities

In this section we are concerned with forces which affect the project area but which arise outside the project area, and which might affect the scope of cooperation required.

i. Are there any external or “upstream” environmental processes which influence the project area?
ii. Are there socio-economic forces from outside the project area which affect the project area?
iii. What steps, if any, have been taken to involve and to seek the cooperation of actors responsible for these externalities?

4. Hindrances

Are there any particular issues which are hindering cooperation within the planning and management process?

5. Sustainability of the initiative

i. What institutional changes have been put in place or that are planned which facilitate integrated coastal management?
ii. How will the coastal management initiative be financed upon completion of the present project?
iii. Has (or will) the project increase planning and management capacities in the relevant agencies?

Summary of Questionnaire to National Experts

The questionnaire to national experts was designed to obtain information on the statutory and non-statutory provisions that have been made for coastal management at the national level. The questionnaire addressed mechanisms for horizontal integration, between the different sectors and interest groups concerned with the coastal zone; for vertical integration, between the different levels of government which have a role in coastal planning and management; and for integration of management functions for the terrestrial and marine sections of the coastal zone.

The questionnaire which was prepared jointly with Thematic Study A, also sought to evaluate the effectiveness of national legal regimes for coastal management, by identifying ways in which current laws affect the integrated management of the coastal zone and analysing the strengths and weaknesses of those laws.

A brief summary of national coordination arrangements for coastal management is presented in Annex III.

TERRA Networks

<table>
<thead>
<tr>
<th>TERRA</th>
<th>Project Name</th>
<th>Lead partner</th>
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<tbody>
<tr>
<td>TERRA 13</td>
<td>Coastlink</td>
<td>Algarve-Huelva</td>
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<td>TERRA 55</td>
<td>Posidonia</td>
<td>Napoli</td>
</tr>
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<td>TERRA 85</td>
<td>Coastal Zone Management</td>
<td>Kavala</td>
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<td>TERRA 138</td>
<td>Concercoast</td>
<td>Val do Lima</td>
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Table 2. Summary of questionnaires received from project leaders

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<thead>
<tr>
<th>Region/Project</th>
<th>Type</th>
<th>Questionnaire</th>
<th>Respondent</th>
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<tr>
<td><strong>Baltic Sea Region</strong></td>
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<td>Baltic Sea Region</td>
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<tr>
<td>Gulf of Finland</td>
<td>LIFE</td>
<td>✓</td>
<td>Rolf Nystrøm</td>
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<td>Latvija</td>
<td>Phare</td>
<td>✓</td>
<td>Patrick McCarroll, Anita Bisofa</td>
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<tr>
<td>Lithuania</td>
<td>Phare</td>
<td></td>
<td></td>
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<tr>
<td>Storstrøm</td>
<td>TERRA 13</td>
<td>✓</td>
<td>Kitty Sommer, Lars Malmsborg</td>
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<tr>
<td><strong>North Sea Region</strong></td>
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<td>Wadden Sea</td>
<td>LIFE</td>
<td>✓</td>
<td>Marit Nielsen-Man</td>
</tr>
<tr>
<td>Forth Estuary</td>
<td>LIFE</td>
<td>✓</td>
<td>Mark Jennison, David Kay, Steven Atkins, Martin Cox</td>
</tr>
<tr>
<td>Norwegian Coast</td>
<td>National</td>
<td>✓</td>
<td>Tor Henning Jorgensen</td>
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<td><strong>NW Metropolitan Region</strong></td>
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<td>Kent</td>
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<td>Clive Gilbert</td>
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<td>Robin McInnes</td>
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<td>Dorset</td>
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<td>Malcolm Turnbull</td>
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<td><strong>Atlantic Area</strong></td>
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<td>J. Cooper</td>
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<td>Devon*</td>
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<td>Aidan Winder</td>
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<td>Cornwall*</td>
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<td>Rade de Brest</td>
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<td>Arcachon - La Gironde</td>
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<td>M. Rousseau, Mlle Guillet</td>
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<td>The Algarve</td>
<td>TERRA 85</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Algarve-Huelva ANAS</td>
<td>TERRA 13</td>
<td></td>
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<tr>
<td><strong>Med-Alps</strong></td>
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<tr>
<td>Costera-Canal (Valencia)</td>
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<tr>
<td>Ricama</td>
<td>LIFE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Napoli</td>
<td>TERRA 55</td>
<td>✓</td>
<td>Carmela Cotrone</td>
</tr>
<tr>
<td>Barcelona</td>
<td>TERRA 55</td>
<td>✓</td>
<td>Amador Ferrar</td>
</tr>
<tr>
<td><strong>C-E Mediterranean</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Palermo</td>
<td>TERRA 55</td>
<td></td>
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<tr>
<td>Taranto</td>
<td>TERRA 55</td>
<td></td>
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<tr>
<td>Athinai</td>
<td>TERRA 55</td>
<td></td>
<td></td>
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<tr>
<td>Ipiros</td>
<td>TERRA 13</td>
<td>✓</td>
<td>Yannis Hauliaras</td>
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<td>Cyclades</td>
<td>LIFE</td>
<td>✓</td>
<td>Harry Coccossis, Alexandra Mexa</td>
</tr>
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<td>Magnesia</td>
<td>LIFE</td>
<td>✓</td>
<td>Ifigenia Geskou, Sakis Karamoshos</td>
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<td>Strymonikos</td>
<td>LIFE</td>
<td>✓</td>
<td>E. Koukrakis, M. Argyropoulou, Th. Lazaridou, K. Skordos</td>
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<tr>
<td>Kavala</td>
<td>TERRA 85</td>
<td>✓</td>
<td>Gregory Papadopoulos</td>
</tr>
</tbody>
</table>

* Joint questionnaire response received from Devon and Cornwall
Annex II. Project Visits

A total of 13 individual projects were visited in 10 countries (Table 3). Although just eight project visits were originally planned, the consultants made every effort to increase this number in view of the increase in the number of demonstration projects from 20 to 35. This was facilitated by the convening of three Theme Studies meetings at project locations.

Five of the visits were made to projects from which we did not receive a questionnaire.

In addition, two visits coincided with project meetings:
- the visit to Barcelona coincided with a meeting of four the five Posidonia projects (TERRA 55);
- a further joint visit was undertaken to the Greek projects at a workshop organised by Harry Coccossis (National Expert and Cyclades Project Leader) which brought together all six projects.

<table>
<thead>
<tr>
<th>Region/Project</th>
<th>Country/Region</th>
<th>Date</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gulf of Finland</td>
<td>Finland</td>
<td>August 98</td>
<td>Included field visit with project partners</td>
</tr>
<tr>
<td>Storstrøm</td>
<td>Denmark, Germany</td>
<td>September 98</td>
<td></td>
</tr>
<tr>
<td>Wadden Sea</td>
<td>Denmark, Germany, Netherlands</td>
<td>September 98</td>
<td></td>
</tr>
<tr>
<td>Forth Estuary</td>
<td>UK</td>
<td>December 98</td>
<td>Forth Estuary Forum Meeting</td>
</tr>
<tr>
<td>West Flanders</td>
<td>Belgium</td>
<td>September 98</td>
<td></td>
</tr>
<tr>
<td>Côte d’Opale</td>
<td>France</td>
<td>January 99</td>
<td></td>
</tr>
<tr>
<td>Dorset</td>
<td>UK</td>
<td>April 98</td>
<td>Dorset Coast Forum Meeting</td>
</tr>
<tr>
<td>Bantry Bay</td>
<td>Ireland</td>
<td>November 98</td>
<td>First Stakeholders’ Roundtable Meeting</td>
</tr>
<tr>
<td>Ria de Aviero</td>
<td>Portugal</td>
<td>June 98, Jan 99</td>
<td>Field visit with project partners Final Seminar</td>
</tr>
<tr>
<td>Ricama</td>
<td>Italy</td>
<td>July 98</td>
<td></td>
</tr>
<tr>
<td>Napoli</td>
<td>Italy **</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>Barcelona</td>
<td>Spain **</td>
<td>September 98</td>
<td>Posidonia Project Meeting</td>
</tr>
<tr>
<td>Taranto</td>
<td>Italy **</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>Athinai</td>
<td>Greece * **</td>
<td>December 98</td>
<td></td>
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<tr>
<td>Ipiros</td>
<td>Greece *</td>
<td>-</td>
<td></td>
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<tr>
<td>Cyclades</td>
<td>Greece *</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>Magnesia</td>
<td>Greece *</td>
<td>December 98</td>
<td></td>
</tr>
</tbody>
</table>
Selection of Projects

While an initial pre-selection of projects was made, final selection was based on information received from the projects, primarily in the form of questionnaires, and on recommendations from the other Thematic experts and by Arthur Martin, the Technical assistant to DG XI. The main criterion for the selection of visits was a significant focus on cooperation and coordination issues as well as innovative or representative approaches to addressing this issue. The following factors were also considered:

- Indication of interest on the part of Project Leaders

Project leaders were asked to rate their interest in each of their Thematic Studies at their first meeting in Brussels (September 1997). Seven project leaders indicated a significant interest in this Theme D (A rating), in general coinciding with a significant focus on coordination issues in the project design. Six of these projects were visited on an individual basis, while discussions with the remaining Greek project took place at the December meeting.

- Representativeness

  - **Nature of project**
    Areas selected for the demonstration projects were intended to be representative of the relevant territorial levels for integrated management of coastal zones. Three levels were noted in COM(95)511:
    - “European span area involving cooperation between several countries
    - an area where several contiguous regions of two or more countries cooperate
    - some projects on a local scale, concerning for example an estuary, a bay or archipelago; i.e. geographical entity shared by several territorial communities”

  - **Geographical location - Cross section of regions and countries**
    With just eight visits originally planned, complete national coverage was not feasible, but regional coverage, on the basis of the 6 identified INTERREG regions, was considered important

  - **Funding instrument**
    We sought a balance between LIFE and TERRA projects, though this was offset by the interest in Theme D being expressed overwhelmingly by LIFE projects

- Opportunity
  The opportunity arose to visit additional projects, primarily owing to the convening of Theme Studies coordination meetings.

- Coverage
  The six Theme Studies made an effort to ensure that at least one visit was made to every project.

**Joint Theme Studies Visits**

Where possible we organised visits in conjunction with other thematic studies in order to minimise disruption to the projects, and to facilitate cohesion between the different studies. In particular, joint visits were arranged with Theme Study A, Legal and Regulatory Mechanisms (John Gibson), and Theme Study B, Participation (Graham King).

- Three of the visits - Ria de Aveiro, RICAMA, and Barcelona were made in conjunction with thematic studies meetings.
- The visit to the Gulf of Finland was made with DGXI, Themes A, B and C.
- The visit to West Flanders was made with Arthur Martin, Technical Assistant to DG XI.
The visits to Denmark (Storstrøm, Wadden) and Côte d’Opale were made with Theme A.
The visit to Bantry Bay was made with Theme B.
The visit to the Firth of Forth was made with DG XI and Theme C.

Annex III. National Contexts

The following pages contain brief summaries of the institutional arrangements at national level for coastal management in Europe. The information is based on questionnaires to national experts; on presentations made by the national experts in Lisbon in June 1998; on project visits; and on available literature.

Table 4. Summary of national responses to questionnaire

<table>
<thead>
<tr>
<th></th>
<th>Response to Questionnaire</th>
<th>Contribution Lisbon Meeting</th>
<th>Other Sources (and Selected References)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Belgium</td>
<td>J.-L. Herrier</td>
<td>✓</td>
<td>Ministry of the Flemish Community, Ostend</td>
</tr>
<tr>
<td></td>
<td>J. Haelters</td>
<td></td>
<td>(Anker, Nelleman et al. 1998); (Worm 1997) (Ministry of Environment and Energy 1997)</td>
</tr>
<tr>
<td>Denmark</td>
<td>Ditte Christensen</td>
<td></td>
<td>(Ministry of Environment, Ministry of Environment and Energy)</td>
</tr>
<tr>
<td>Finland</td>
<td>Helena Korhonen</td>
<td>✓</td>
<td>Association of Finnish Local and Regional Authorities, Helsinki (Granö, Roto, and Laurila 1999)</td>
</tr>
<tr>
<td>France</td>
<td>Jean Lafonte</td>
<td>✓</td>
<td>Guillot and Rousseau (1998)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Bonnot (1994)</td>
</tr>
<tr>
<td>Germany</td>
<td></td>
<td></td>
<td>Enemark (1996)</td>
</tr>
<tr>
<td>Greece</td>
<td>Harry Coccossis</td>
<td>✓</td>
<td>Meeting of the Greek Projects, Athens</td>
</tr>
<tr>
<td>Ireland</td>
<td></td>
<td></td>
<td>BSM (1997)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Marine Institute (1996)</td>
</tr>
<tr>
<td>Italy</td>
<td></td>
<td>✓</td>
<td>Capobianco and Furlanetto (1996)</td>
</tr>
<tr>
<td>Latvia</td>
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<td>Notes provided by Anita Bisofa</td>
</tr>
<tr>
<td>Lithuania</td>
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<tr>
<td>Norway</td>
<td>Judith Kortgård, Harold Noreik</td>
<td></td>
<td>Bennett (1996)</td>
</tr>
<tr>
<td>Portugal</td>
<td></td>
<td>✓</td>
<td>Ferreira Marques (1991)</td>
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<tr>
<td>Spain</td>
<td>Francisco Montoya</td>
<td></td>
<td>Barragan-Munoz n.d.</td>
</tr>
<tr>
<td></td>
<td>Carlos Peña</td>
<td></td>
<td>Montoya (1991)</td>
</tr>
<tr>
<td>Sweden</td>
<td>Kerstin Hugne</td>
<td>✓</td>
<td>Akerfors and Grip (1995)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Ballinger (1997)</td>
</tr>
<tr>
<td>General</td>
<td></td>
<td></td>
<td>Boelaert-Suominen and Cullinan (1994);</td>
</tr>
</tbody>
</table>
Belgium

Belgium is a federal State within which the Regions have strong powers and competence for all aspects of terrestrial planning, as well as for coastal defence, navigation issues, and intertidal uses such as bathing. The entire Belgian coastal area lies within West Flanders Province of the Flemish Region. There are ten coastal municipalities.

Marine areas, below lowest low water mark, remain a Federal competence and activities here are subject to authorisation by the State. As an example, the Region is responsible for dredging of waterways but requires Federal authorisation to dump the spoil.

There are two existing coordination bodies

1. The Inter-cabinet Guidance Group / Steering Group for ICZM
   An initiative of the Flemish Region, established in 1994, and formalised by a Flemish Government Communication in 1995. It comprises regional and federal “cabinets” and administrations; NGOs by invitation and a Task Force Group responsible for projects (TERRA, LIFE etc.)
   • The Federal focal point is the State Secretary of Environment (North Sea modelling, Conventions, etc); Fisheries (within Agriculture) are involved as required (monitoring is a role of Environment); and similarly Economic Affairs (pipelines, etc).

2. A Coastal Defence - Impact Assessment Group

There are also regular meetings at the provincial level bringing together the coastal municipalities (bürgermeisters). The meetings seek a common approach to locally managed issues such as control of jet skis, and water quality monitoring.

Current Developments

• A “protocol” is being developed to formalise the Federal-Region cooperation and requirements for consultation on relevant activities.
• New legislation concerning the marine environment is in preparation which will, for example, require an EIS for certain activities at sea.

Denmark

There is no overall coordinating body for coastal management at national level in Denmark. The principal instrument for coastal management is the Spatial Planning Act of 1994, a revision of the 1992 Act, which establishes a comprehensive planning system for the country’s coastal zone encompassing all economic activities on the landward side. The overall aim of the Act with respect to the coastal zone is to protect the coast, while allowing necessary developments of cities, of infrastructure, and of tourism (Ministry of Environment and Energy 1997). There has been some local opposition owing to a strong tradition of local self-management, and to concern over loss of opportunities for nature related tourism development (Worm 1997).

The 14 county and 275 municipal councils are obliged to implement the stipulations of the Act, and to take account of government guidelines in the drawing up of regional and municipal plans. Thus, though planning functions are decentralised, the relationship is hierarchical (or based on the principal of framework control). Municipal (and local) plans must not contradict regional plans, which must in
turn implement the national planning directives issued by the Minister for Environment and Energy. The Minister reports to the Folketing (or parliament) to which he submits a national planning report after each election.

- The Regional Plan is renewed every four years according to guidance from state level. For example, states may be asked to submit proposals to increase the area of forest, in turn requiring proposals from landowners for approval at regional level prior to submission to state
- The Regional Plan is approved at state level (following a two stage consultation process firstly on issues, secondly on a draft plan). It then forms the framework for local and municipal plans.
- The Regional Plan may address marine areas - typically for nature or leisure designations. The State is then bound by these in any plan it approves, but can overrule any provisions in the Regional Plan by decision orders.

Existing guidelines set out the nature of developments which will be allowed in each of three planning zones, representing rural areas, summer cottages areas and coastal cities. Outside urban areas, a special coastal planning zone extends approximately three kilometres inland, and is subject to particular development restrictions (1991 National Planning Directive). There is also a 300 m (extension from 100m, implementable 1999) protection zone in non built-up areas where development is banned, with few exceptions, and a 100 m maximum protection zone in summer cottage areas (1994 Coastal Protection Act).

Worm (1997) noted the importance of “the legally prescribed negotiations that occur horizontally between various sectors and vertically between national, county and municipal authorities.”

However, while the planning system is an important integrating tool, Anker et al. (1998) draw attention to the other legal and regulatory mechanisms applicable to the Danish coastal zone (Nature Protection Act, Environmental Protection Act, Coast Protection Act). Each is subject to its own organisational and institutional arrangements leading to a dispersal of authority amongst different sectors and levels of decision making.

A particular concern is the lack of competence in sea areas which exacerbates sectoral fragmentation, for example on issues such as fisheries and sea transportation. The Spatial Planning Act applies only to land-based development, while at state level, the Ministry of Environment and Energy is responsible for marine areas. The Ministry recently noted that, “An integrated coastal management should also comprise the interface between land and sea. In view of this, it has been decided to initiate an analysis on existing regulations in Denmark pertaining to coastal zone management and to explore best practices outside Denmark in order to consider how Danish coastal zone management may be developed towards a more integrated and comprehensive approach.” (Ministry of Environment and Energy 1997)

There are some other problems with the planning system - for example, although supposed to be proactive, the system tends to be reactive “when faced with powerful market forces” (Worm 1997). In addition, the system is demanding of resources and time, and depends on a high level of compliance. Many of the characteristics of the Danish spatial planning system, including similar protection and planning zones, feature in the Common Recommendations for Spatial Planning of the Coastal Zone in the Baltic Sea Region adopted in Stockholm on 22 October 1996 by Ministers responsible for spatial planning and development (VASAB 1996).

Denmark is one of three signatories to the Joint Declaration on the Protection of the Wadden Sea (9 December 1982) and subsequent agreements including the Wadden Sea Plan. The Declaration recognises that the Wadden Sea region is a unique natural entity and that its conservation is a shared responsibility of the three countries. The Danish Wadden Sea was declared a nature and wildlife reserve in 1982 by a Statutory Order, based on the Nature Conservation Act, which sets out overall conservation objectives for the area.
France

Several government agencies in France have a responsibility for coastal management functions, the location of which has been subject to some reorganisation in recent years. There is no overall coordinating body for coastal policy but legislative revision and reorganisation is the subject of ongoing discussion. Interdepartmental consultations do take place with respect to planning measures such as the SMVM and DTA (see below) which, although slow to advance, are regarded as important with respect to promoting a national vision for the coast.

**The Division of Responsibility for Coastal Matters in France**

| Ministère de l’Equipement | • Direction des transports maritimes, de ports et de littoral  
|                          | • Direction générale de l’urbanisme, de la habitat, et de la construction |
| Ministère de l’Aménagement du Territoire et de l’Environnement | • Direction de la nature et de paysages  
|                          | • Direction de l’eau |
| Ministère de l’Agriculture et de la Pêche | • Direction des pêches maritimes et des culture marines  
|                          | • Secrétariat général de la mer |

In addition, the *Conservatoire du Littoral et Des Rivages Lacustres* is a publicly funded state agency, created by law in 1975, which acquires and ensures management of coastal land in natural zones (*espaces naturels*) for the purpose of conservation. All such purchases are made in consultation with the relevant local authority which is often responsible for day to day management arrangements. Coastal management initiatives have been undertaken by the Conservatoire as well as at more local levels.

Regional government in France is organised through a hierarchy of 22 *Régions*, 95 *Départements* and 36,000 *Communes*. The head of the *Département*, the *Préfet*, is responsible to the State government. Planning functions which influence coastal areas are operated at different territorial levels. Perhaps the most important is the *Plan d’occupation des sols* which relates to urban areas.

Coastal towns are required by a 1979 Directive to draft a *Plan d’occupation des sols (POS)* which sets out options for land use and development including coastal areas. Responsibility for zoning is usually undertaken by the *conseil communal* which also issues permits for the uses indicated by the POS. The POS must take account of the Loi Littoral and of any regional planning directives (*Directive territoire d’aménagement*, DTA) issued by the State. There is some controversy over the seaward extent of the POS (Boelaert-Suominen and Cullinan 1994).

- The 1986 Seashore Act (*Loi No 86-2 relative à l’Aménagement, la Protection et la Mise en Valeur du Littoral*, or, *Loi Littoral*) is essentially a land use planning law designed to control urban expansion in coastal areas. Specific mechanisms include:
  - A general 100m prohibition zone (or setback) from the demarcated shoreline in urban areas, with specified exceptions relating to services and security, and economic activity requiring proximity to the water’s edge;
  - Requirement for a functional justification for development in areas close to the shore.
• The Schémas de Mise en Valeur de la Mer (SMVM) is a system of zoning plans introduced in 1983, designed to enhance and exploit the sea. The SMVM addresses the land sea interface, and activities affecting that area, and is drawn up at Département level through a consultative process under the control of the Préfet. The agreed plan is formally adopted at ministerial level. The scheme is voluntary and there are no provisions concerning who should initiate the process.
• Where an SMVM plan has been drawn up, this should take precedence over all other plans including the POS, though it should not duplicate the POS.
• To date, only one SMVM has been formally adopted in France, partly as a result of limited resources.

• The domaine public maritime (State ownership) was defined in 1963 (foreshore, seabed, continental shelf and superstructures)

Provision for regional and interregional littoral plans (inter-communal) (schémas régionaux et interrégionaux du littoral) was made in 1985. Other plans of relevance include water management plans at regional and local level (Schémas directeurs and Schémas d’aménagement et de gestion des eaux, SDAGE / SAGE), and a national plan for aquaculture. The Département, under the authority of the Préfet, has overall control over beach concessions and embankments, public footpaths and sensitive coastal areas.

Finland

Coastal management functions in Finland are very much based on the regulatory system, and in particular, on the Building Act - national planning legislation which operates at the municipal level under the overall supervision of the Ministry of Environment.
• Since 1997, municipalities have been obliged to prepare master plans prior to authorising any further development, through the system of building permits, in coastal areas.
• The areas covered by the master plans, and falling under the municipalities’ competence, extend to the edge of the archipelago.
• Neighbouring municipalities are included in the statutory consultation process
• Master plans must be approved by the regional environment centres.
• The coastal strip is narrowly defined - at present there are two zones - a 100m (up to 200m) setback, and a 300m planning zone.
• Building in the water may require a permit under the Building Act and under the Water Act through the Water Courts.

The decentralised nature of coastal planning has its roots in the Finnish local government system:
• The Finnish government system is largely decentralised, and the 452 municipalities have a wide general competence guaranteed by the constitution. Municipalities are responsible for social welfare, including education and healthcare; for environmental protection and for physical planning.
• The Association of Finnish Local and Regional Authorities supports the municipalities, providing services and advice, and developing projects on common issues. It has a consulting branch comprising several professional agencies.
• The 19 Regional Councils are joint authorities elected and funded by the municipalities - these Councils are of a utilitarian nature and there is no “self-government” as such at the regional level. Current policy is to further increase the strength of the municipalities.
• The regions are responsible for regional physical and development planning.

Current Developments

The Land Use and Building Act is under revision. A number of new features are of interest for coastal planning:
• The Act makes provision for national goals/planning directives. This gives national planning a
formal basis, and may reduce ad hoc decision making.
• A provision for joint municipal plans was designed with urban areas in mind, but may be of
interest for coastal planning.
• Approval by Regional Environment Centres will no longer be required. This is regarded as a risk,
but is in line with overall decentralisation policy.
• The courts system will be the principal systems of appeal, but Regional Environment Centres
maintain their role with respect to exceptions for shoreline areas.
• Landowners will be expected to contribute to the costs of master planning for coastal areas.

Germany

The principal planning act in Germany, the 1986 Federal Building Code, was amended by the
reunification treaty of 1990 and further supplemented in 1993. The German governmental system is
federal in nature, and responsibility for spatial planning is shared between the national government
and the Länder which are responsible for strategic planning and have a considerable degree of
autonomy. In the larger of the 13 Länder, there is also provision for strategic planning at a sub-
regional level.

The four western coastal Länder border on the Wadden Sea. Germany is one of three signatories to the
Joint Declaration on the Protection of the Wadden Sea (9 December 1982) and subsequent
agreements including the Wadden Sea Plan. The Declaration recognises that the Wadden Sea region
is a unique natural entity and that its conservation is a shared responsibility of the three countries.

In Germany, the principle instrument for protection of the Wadden Sea is the Federal Nature
Conservation Act which is operated at state level by means of national parks administrations. National
parks covering most of the Wadden Sea area have been designated by the federal states of Schleswig-
Holstein, Lower Saxony and Hamburg, while in Bremen the small Wadden area is subject to a
landscape plan. The parks are zoned, and in less sensitive areas certain uses and activities are allowed
on the condition that the overall protection objectives are not impaired.

Enemark (Enemark 1996) has pointed out that many coastal issues originate outside the area of the
parks, and that these cannot be expected to operate effectively in coastal areas unless they form part of
the broader planning system covering the entire catchment. Competence for activities affecting the
coast is divided between the federal government and state governments and this calls for coordination
of government policies at all levels. As an example, a federal order relating to shipping issued in 1992
did not fully comply with state requirements regarding the parks.

To the east, Schleswig-Holstein and Mecklenburg-Holstein border on the Baltic Seas, and Germany is
party to a number of Baltic initiatives including HELCOM and VASAB (Vision and Strategies
Around the Baltic, 2010) at federal and regional level.

Greece

At present, coastal management activities in Greece fall within the broad scope of planning. The
Ministry of Environment, Planning and Public Works has overall responsibility for integrated land-
use planning and is decisive on most issues. A Coastal Zone Management Consultative Committee
advises the Directorate of Regional Planning, located within the Directorate General of Environment
and Planning of the Ministry of Environment, Planning and Public Works, on matters relating to
coastal management. Regional Spatial Planning and Environmental Protection laws are currently
under revision.

Marine areas fall under State responsibility (Ministry of Finance), and there is an administrative
provision for “seawater projects”.

EU Demonstration Programme on ICZM A-11 Thematic Study D
Other authorities which directly or indirectly influence coastal policy are the Ministries of the National Economy, Defence, Interior, Finance, Health, Agriculture, Development (Tourism & Industry), and Merchant Marine. There is no national structure to facilitate coordination or arbitration, and coordination between Ministries occurs on an \textit{ad hoc} basis. As a result, there are inconsistencies between physical plans prepared by the Ministry of Environment, Planning and Public Works, and sectoral or regional development plans.

National policy for the coast currently takes the form of general guidelines and there are no efficient mechanisms for implementation. Guidelines addressing for example, tourism, urban expansion, agriculture, public access are open to interpretation and non-binding. The current institutional context is considered inadequate to deal with the complex problems of coastal areas.

Vertical coordination is also problematic at present. Many responsibilities are being redefined, local authorities have been reorganised and there is a new emphasis on the regional level, but at present there remain gaps and overlaps in responsibilities.

\textbf{Current Developments}

- A National Directive for sustainable development of Greek coasts is anticipated.

\textbf{Ireland}

The legislative framework for coastal management in Ireland comprises both national and international measures (EU Directives, International Conventions). These are typically designed with one of two purposes in mind, the administration of activities, and environmental protection. There is a strong land sea divide which is reflected in the administrative structure. Legislation is largely sectoral in nature, and much is out of date and in need of review (BSM 1997).

Below mean high water mark, the \textit{Minister of the Marine and Natural Resources} is responsible for development under the Foreshore Acts (1933, 1992) and Aquaculture Act. The Department is organised into two main groups, harbours and licensing (aquaculture and foreshore, recently integrated into the “coastal zone administration”). Development is, in practice, regulated through licensing and leasing provisions. Applications are considered on their individual merits and there is no development plan as such for the foreshore which is State property.

Above mean high water mark, Local Authorities are responsible for developments under the Local Government (Planning and Development) Acts (1963-1993). Developments are controlled through a system of applications considered in the context of the county development plan. Many of the county development plans recognise the coastal zone as a distinct resource and contain specific objectives and policies for its use. Some coastal developments may require permission under both of the above systems. However, there is no requirement for or mechanism to facilitate coordination of consents or of the attached conditions. Difficulties have arisen in the past where there is uncertainty as to which of the two systems should operate in a given area.

Other activities in the coastal zone are administered largely on a sectoral basis, providing for strong a vertical link from government departments through to implementation agencies, but for little horizontal coordination between departments and between agencies on the ground. Cooperation and consultation are largely voluntary and represent an important weakness in the management system.

\textit{Principal Statutory Bodies Directly Concerned with Administration of the Coastal Zone in Ireland (BSM 1997)}

Department of Marine and Natural Resources
A further weakness arising from the lack of an overall national strategy concerns the inconsistencies in the policies of different counties. Related to this, there is a need to identify remaining sites of strategic importance for major developments such as ports, which should be set aside for “nationally significant use” (BSM 1997).

**Current Developments**

The current objective of the Government is “to establish a process that will lead, over a period of time, to an integrated system of management for the coastal zone of Ireland.” (BSM 1997). The strategy is being developed in response to perceived weaknesses in the administrative system which lead to “an inadequate level of integration of planning and decision making”, particularly with respect to the spatial dimension (BSM 1997).

Towards this end, a broad consultation process concerning marine policy was initiated in 1995 by the Marine Institute on behalf of the Ministry for the Marine (Marine Institute 1996) and recommendations from the Institute are anticipated. Notable problems identified in the report include fragmentation and duplication of responsibilities; fragmentation and gaps in legislation; and poor coordination. A recent discussion document (BSM1997) sets out a draft policy for consideration and formal response by concerned parties. In developing their options, the authors note that a fundamental restructuring of legislation and administrative responsibility would be difficult and instead propose building on the existing systems.

**Italy**

Responsibilities for managing the landward and seaward sides of the coastal zone are divided in Italy. There is no overall coordinating body for coastal management at national level, and territorial management at regional level is fragmented owing to provisions for some 70 different sectoral plans. A 1985 requirement for regional planning to coordinate sectoral plans has met with limited success (Capobianco and Furlanetto 1996). Local government restructuring as a result of the Bassanini Acts is ongoing, and serves to reinforce the decentralised nature of management.

On the seaward side, the Maritime Authority is responsible for permitting any activities which take place in State Maritime Property, which is defined in the Navigation Code. Marine environmental protection is the responsibility of the Ministry of Environment, which is required to prepare a “General Plan” for coastal defence and to protect the marine environment and coastal zone from oil spills. This task has been assigned to the Central Inspectorate for Protection of the Marine Environment which has reached an agreement with the regions, and is subject to examination by the Committee on Economic Planning and other concerned sectoral bodies. Implementation of the plan is achieved through directions and guidelines to appropriate administrations and local authorities. An “Emergency Plan” has been drawn up with assistance from the Harbour Offices, Department of Civil Protection and Prefectures.
On the landward side, a potentially important mechanism for coastal management is the waterbasin management plan. Plans for basins of national importance should be prepared by designated Specific Basin Authorities which include representatives of relevant Ministries and regional authorities under the overall authority of the Ministry of Public Works. Elsewhere basin plans are the responsibility of specific bodies responsible to the regional authorities. Law No. 183/1989 is largely awaiting implementation (Capobianco and Furlanetto 1996).

A presidential decree of 1977 was designed to protect a 300m coastal strip, requiring permission for alterations to be obtained from the regional authority and state agencies responsible for the management of state-owned properties, but this has been relatively ineffective. This measure was reinforced in 1985 by a requirement (“Galasso Law”) that regions draw up territorial and landscape plans for such areas, but again, few have been developed to date.

ICZM is associated with protected areas and national parks where specific development plans have been elaborated with the participation of relevant sectoral interests such as tourism and fisheries. This is the only means for public participation in coastal management.

**Latvia**

The Latvian Government is currently preparing a Strategy for Investment at the Latvian Coast with the support of the EU Phare programme. The projects is designed to provide a framework for short, medium and long-term investment in the coastal zone and establish criteria for the selection and prioritisation of investment projects. Three support units will be established along the coast to assist local authorities in developing projects within the overall framework of the strategy.

The ICZM initiative has been developed against a background of local government reorganisation and underdeveloped planning. ICZM is providing a means to address a prevailing lack of coordination between sectoral administrations as well as within the planning system. Resource issues and lack of capacity will need to be addressed in order to implement many good provisions in the existing and proposed legislative framework.

**Netherlands**

National marine policy development is coordinated by the Ministry of Transport, Public Works and Water Management, which seeks to ensure a coherent and harmonised policy for the Dutch North Sea. Other Ministries with coastal concerns include Agriculture, Nature Conservation and Fisheries; Economic Affairs; Housing, Physical Planning and Environment; and Defence.

Provincial and municipal territorial boundaries extend to approximately one kilometre seaward from low water mark. Provincial and municipal authorities are responsible for translating national and regional policy plans into physical plans at regional and local level, though only the local plans have legal standing.

A good example of interagency cooperation, both horizontally and vertically, was the preparation in 1989 of the Voordelta Integrated Policy Plan. Interest groups such as fisheries and recreation also participated (van Alphen 1995).

In addition, the Netherlands is one of three signatories to the Joint Declaration on the Protection of the Wadden Sea (9 December 1982) and subsequent agreements including the Wadden Sea Plan. The Declaration recognises that the Wadden Sea region is a unique natural entity and that its conservation is a shared responsibility of the three countries.
The Netherlands Wadden Sea has been protected since 1980 on the basis of the “key planning decision” (PKB, amended 1993), or the Wadden Sea Memorandum. Drawn up under the Physical Planning Act, this document sets out overall objectives for conservation, management and use of the Wadden Sea. The objectives and conditions of the Wadden Sea Memorandum should be observed by all state, regional and local authorities, though the PKB does not have the status of law and in the past has been overruled by economic interests protected by laws of a higher status (Keokebakker and Peet 1987; van Dijk 1994).

Current Developments

- National spatial planning policy is under review

Norway

There is no formal coordinating body at national level for coastal management but coastal planning in general falls under the auspices of the Ministry of Environment which is the lead agency for the Demonstration Project. The Project also involves the Ministries of Fisheries, and Administration and was initiated by the latter.

The principle mechanism for coastal planning in Norway is the spatial planning system established by the 1985 Planning and Building Act. Municipal authorities (or communes) have a broad responsibility with respect to planning and the kommuneplan provides the principal instrument for “sectoral coordination, strategic development and spatial ordering” (Bennett 1996). The Act sets out statutory participation and consultation processes and gives sectoral authorities and neighbouring communes the right to veto a plan.

Although there is no legal definition of the coastal zone, communes are allowed to plan the use of sea areas within their boundaries in the “spatial section” of the comprehensive development plan, and this may then be incorporated into the overall kommuneplan. In 1992, sixty-four of 286 communes bordering salt-water had approved plans while a further 149 were developing plans. Many plans combine elements of a project nature, designed to accomplish a specific aim within a finite period, with longer term and more strategic objectives (Bennett 1996). However, a “setback” policy forbidding all developments within 100m of the shoreline has been in effect since the 1950s, but extensive building in this zone has continued in recent times (OECD 1997).

National Policy Guidelines, which derive their authority from the Planning and Building Act, were laid down by Royal Decree in 1993. The purpose of the Guidelines is to reinforce the need to balance development and resource planning objectives in the most densely settled Oslofjord region (OECD 1997).

- The Guidelines recognise that coastal areas represent cultural and environmental resources and values of national importance which should be managed for the benefit of current and future generations.
- The Guidelines establish national objectives that should be observed by all municipalities and national sector authorities in connection with their administration of development proposals under the Planning and Building Act.
- There has been some variation in the interpretation of the guidelines which are generally taken to represent a prohibition on new buildings. Policies of expansion of existing buildings and on exemptions vary.

Many communes, typically with a population of 1500 - 4000, have a poor tradition of planning and may employ a consultant on a short term basis for this purpose. Greater emphasis is now being placed on planning at the regional (or county) level, which has a similar seaward extension, and this is the principal focus of the Demonstration Programme which is active in three counties.
While the planning system is supposed to resolve sectoral issues both at the regional and municipal levels, it has proved insufficient to deal with sectoral conflicts (e.g. fisheries/conservation). This is a consequence both of direct conflicts in the laws concerning some coastal activities and because sectoral laws are afforded a higher priority than coordination on the grounds of greater efficiency. There are some efforts to coordinate sectoral law at regional and national levels (e.g. requirement to consult other sectors in sectoral permitting at regional level) but there remain significant sectoral conflicts and it is hoped that the regional approach to planning may lead to some solutions to issues which could not be resolved at a more local level (Jorgensen 1997). In addition, the relationship between sectoral and planning laws needs to be clarified, and the planning system should be more flexible, and adaptable to coastal situations (Kortgård and Noreik 1998).

**Portugal**

Management arrangements for the coast in Portugal are divided for the landward and seaward areas of the coastal zone. The area below highest high tide level has had a legal status as public property since 1892, with any use requiring authorisation from the relevant authority.

In all there are seven Ministries (20 agencies/bodies) with a role in coastal management. On the marine side, the Ministry of the Environment is the main actor with licensing responsibilities on all issues except ports which fall under the competence of the Ministry of Planning and Public Works.

Local authorities are responsible for land use management and planning. Coasts are granted special status under the National Ecological Reserves Legislation, while a special coastal planning strip (2km in width) is subject to more than usually stringent planning regulations (Ferreira Marques 1991). River basin plans have been drawn up in a number of areas, and are being developed elsewhere. Public consultation rather than participation is the norm in planning.

Coastal management policy is defined at the national level, and aims to confine the spread of coastal urbanisation - however there remain problems of illegal development. A coastal zone programme was introduced in February 1998, but changes to the existing legal framework are not anticipated in the short term. Integration of land and sea management is a possibility in protected areas, which in 1991 accounted for approximately one third of the Portuguese coast (Ferreira Marques 1991).

**Spain**

Overall Spanish policy for the coast is “to guarantee the public character of coastal public property and conserve its natural characteristics, reconciling the necessities of progress with the imperatives of protection” (Montoya 1991).

Superficially, institutional arrangements for coastal management are commendable, with the Dirección General de Costas (Directorate General for the Coasts) located within the Ministry of Environment, a “Coastal Plan” which is well financed by central government, and the Shores Act of 1988 (Ley de Costas) which defines and places strict restrictions on Coastal Public Property, as well as placing limitations on the rights of owners of adjacent property.

However there are significant coordination problems both horizontally between sectoral agencies and vertically between different levels of territorial authorities (Montoya and Peña 1998). This is exacerbated by unresolved issues in the 1978 Spanish Constitution relating to the powers and authority of central and regional governments and by several other recent but fragmented laws which affect the coast (Barragan-Munoz n.d.). Terrestrial activities in coastal areas are controlled within the land-use planning system, while marine activities are subject to control by sectoral agencies within central government. There is no coordination mechanism for coastal fisheries. There are direct legal conflicts, for example, between the land use and coastal laws, and the ports law.
Suggestions for improvements at national level include development of coordination mechanisms (horizontal and vertical); changes in land use and planning legislation where these affect coastal areas; and, definition of the roles and responsibilities of different agencies involved in coastal management (Montoya and Peña 1998).

The Spanish Shores Act of 1988:
- reasserts State ownership rights in the coastal zone (*dominio public maritimo-terrestre*), marking a reversion to ancient laws (Boelaert-Suominen and Cullinan 1994). Boundaries of this zone are demarcated by central government through statutory proceedings, involving an open hearing;
- creates a *protection easement zone* of a minimum 100m from the landward limit of the seashore where certain development activities are prohibited. The Act specifies uses which will normally be permitted, typically services to facilitate the use of public coastal property, and outdoor sports facilities (Montoya 1991).
- creates a rights of passage easement of 6-20m on either side of the shoreline
- defines a zone of influence, of a minimum 500m where central government may impose planning restrictions.

Title VI of the Act looks at administration issues (Montoya 1991):
- The State has overall responsibility for duties established under the Act
- The Regional Authorities have responsibility for duties relating to planning and zoning, urban planning, waste disposal and others granted in its Statutes.
- Local Governments have responsibility to report on fixing of boundaries, reservations, allocations and concessions in public property, maintaining beaches and public beaches etc.

Sweden

In Sweden the principal co-ordination mechanism for coastal management is the planning system, which extends under the provisions of the 1987 *Planning and Building Act* from national to municipal level. Statutory and participatory planning is conducted at the municipal level, sometimes using a consultant, and planning powers extend to the limit of territorial waters - 12 nautical miles. The planning system is viewed as a top-down system. A complementary bottom-up system - Local Agenda 21 - may be incorporated into municipal planning.

The County Administrative Boards provide a regional perspective, and play a horizontal coordination role in the planning system between municipalities. The counties offer a stronger human resources base in terms of specialised management skills and play an important role in information management. In addition, counties, through the County Administrative Board, have statutory decision making powers and implementation oversight responsibilities for some sectoral legislation affecting the coastal area (Ackerfors and Grip 1995).

Sector plans are drawn up at national level and there are some well established intersectoral coordination mechanisms where the actions of one sector affect another (Ackerfors and Grip 1995).

- The Natural Resources Management Act is an umbrella Act with both general and area-specific provisions. Siting of large industrial facilities is determined by Central government under this Act.
- The Environment Protection Act sets detailed conditions and controls smaller developments, where necessary in coordination with the Water Act to avoid duplication. Applications are considered at County level.
- Fisheries are regulated under the provisions of the Fisheries Act, which is in line with EU Policy (National Board of Fisheries, with surveillance by the Coast Guard.)
- A shore protection zone is established under the Nature Conservation Act, which also acts to ensure public access. Any development or activity preventing access this requires a permit, and permissions under this Act are granted at county level.
• A new Environmental Code entered into force in January 1999. This integrates provisions from 15 Acts, including the MRMA, and contains specific provisions for management of lands and water areas. Much of the coastal zone is identified as an area of special interest.

However, coordination is not always adequate. The Government has specifically noted the need for better coordination between infrastructure planning and environmental interests as well as between neighbouring municipalities. The National Board of Housing, Building and Planning has been commissioned to analyse the situation and make suggestions for improvements.

A recent initiative of interest is the “archipelago project” overseen by the Swedish Environmental Advisory Council (a committee of the Ministry of Environment). Seven County Administrative Boards, working in four archipelago regions, have been ordered by the government to prepare environmental and resource management programmes in collaboration with local authorities. The project commenced in September 1998, and is expected to be completed in August 2000.

A research programme has also been established to look at an interdisciplinary approach to coastal zone management. SUCOZOMA is funded by the Foundation for Strategic Environmental Research (Sweden)

**United Kingdom**

There are two levels of cooperation for coastal management in the UK, though neither of these constitutes a mandatory coordination mechanism for policy or management.

• Departments with coastal responsibilities liaise through the *Interdepartmental Group on Coastal Policy*. An overview of policy for the coast is maintained by the unit responsible for servicing this Group (Coastal Policy Coordination Branch, Department of Environment, Trade and Regions).

• National *Coastal Fora* which bring together representatives of central and local government, industry and commerce, and other interests such as conservation and leisure/recreation have been established in England, Scotland and Wales. There are also more sector specific fora, for example the Regional Coastal Defence Forum and Marine Pollution Advisory Group.

Management arrangements in the UK are divided for coastal areas above and below mean low water mark (MLWM). Above MLWM, local authorities have powers to control development and use of land under the Town and Country Planning Act, 1990. The planning system is designed to control development through an applications system, and decisions must be made in accordance with the planning authorities’ development plans. Ninety eight percent of permissions are granted by local authorities (DoE 1993). The special nature of the coastal zone is recognised in planning guidance notes issues by the government, in particular, PPG 20, *Coastal Planning* and PPG 14, *Development of Unstable Land*.

Below MLWM, statutory controls operate on a sectoral basis. Regulated activities include coastal defence, dredging of marine aggregates, ports and harbours, shipping, fisheries, oil and gas, disposal at sea, landscape and nature conservation, historic sites, and leisure, tourism and sport. In addition there are statutory controls affecting construction and development in the sea, water quality, and environmental impact assessment (DoE 1995). The Government View procedure requires that a favourable Government View is required to support applications to the Crown Estate.

UK National Policy for coastal zone planning has been summarised in *Towards Best Practice* (DoE 1996) and in the 1995 *Policy Guidelines for the Coast* (DoE 1995).

Key points are (DoE 1996):

- the sectoral responsibilities for managing the coast should be maintained
existing institutional structures and their statutory responsibilities should be respected
above mean low water mark, local authorities have powers to control development and use of land under the Town and Country Planning Act, 1990
the content and scope of coastal management should be dictated locally
management plans should be prepared only where justified by local issues or the need to bring together existing agencies’ activities
where necessary, coastal management plans will normally, but not invariably, best be led by local government; and
there should be no general presumption towards statutory management plans.

The most widespread model for coastal management in the UK, the coastal forum, exemplifies the recommended non-statutory approach.

Scotland

Land use planning in Scotland is controlled under the Provisions of the Town and Country Planning (Scotland) Act of 1972. In August 1997, NPPG 13: Coastal Planning was issued, updating and superseding the 1974 and 1981 planning guidance on the coast, and setting out a presumption against development on the coast

Within the Scottish Office, the Agriculture, Environment and Fisheries Department (SOAEFD) is responsible for advising on policy relating to agriculture, environmental issues and fisheries, and for the implementation of those policies in Scotland.

Wales

In Wales, responsibilities for a number of coastal zone activities rest within the planning, environment and fisheries divisions of the Welsh Office, under the overall responsibility of the Secretary of State for Wales. There has been some divergence recently from English policy, for example with the introduction of the PPG(Wales) and associated Technical Advice Notes. There are no demonstration projects in Wales, but the discussion which has taken place on policy development and institutional arrangements is of relevance to Theme D.

Two useful discussion documents have been developed by and for the Countryside Council for Wales: Seas, shores and coastal areas: Maritime Policy (Countryside Council for Wales 1996), and Coastal Management in Wales: Looking to the Future (Ballinger 1997).

Northern Ireland

In Northern Ireland, a consultative paper, Delivering Coastal Management in Northern Ireland, was issued by the Environment Service in 1995 (Environment Service 1995) (now known as the Environment and Heritage Service). The document proposed continuation of the existing sectoral approach below low water mark, with establishment of a Coastal Zone Forum, as well as development of local management plans and fora.

Land use planning, above low water mark, is controlled through the Planning (NI) order of 1991. Development plans for all coastal districts have been drawn up under the overall responsibility of the Department of the Environment, and the overall policy with respect to coastal areas is to minimise new developments.