Extant Legal and Jurisdictional Constraints on Irish Coastal Management

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The success of any coastal zone management policy is dependent on, among other things, effective legislation and its enforcement. This article examines some possible legal constraints on the implementation of an integrated coastal zone management policy in Ireland. An introduction to the existing legal framework is provided, and the inconsistencies and ambiguities related, in particular, to jurisdiction and area of responsibility are highlighted. In particular the effect of land ownership and property rights on coastal zone management are examined with reference to two popular resort beaches in County Donegal, Ireland. While a revision of the relevant legislation is desirable, it is probably unrealistic; however, powers are available to the various institutions involved in coastal management that are currently unused. These are reviewed and their potential to improve coastal zone management is discussed.

Keywords  integrated coastal zone management, land ownership, legislation, planning, property rights, statutory powers

Introduction

Integrated coastal zone management is defined by the European Commission (1996) as “a continuous process with the general aim of implementing sustainable development in coastal zones and maintaining their diversity. To this end it aims, by more effective management, to establish and maintain (sustainable) levels of use, development and activity in coastal zones and eventually to improve the state of the coastal environment.” Gubbay (1990) identified any coastal zone management program as requiring a national perspective, a long-term view, an integrated approach; communication, collaboration and coordination, public involvement, a flexible approach, and a specific agency to take the lead.
Ireland’s coastline spans some 6,500 km (5,800 km in the Republic of Ireland) bordering on the North Atlantic Ocean, the Irish Sea, and the Celtic Sea (National Coastal Erosion Committee, 1992). To date, coastal development here has largely proceeded in an ad hoc manner. In fact, the coastal zone was only included as a specific policy area for the first time in 1993 in the National Development Plan for Ireland 1994–99 (Government Publications Office, 1993). Subsequently, in 1997, the Department of the Marine and Natural Resources, the Department of the Environment and Local Government, and the Department for Arts, Heritage, Gaeltacht (native Irish-speaking areas) and the Islands commissioned a draft coastal zone management policy for Ireland (Brady Shipman Martin, 1997). In this report the coast is taken to be “a strip of land and sea territory of varying width depending on the nature of the environment and management needs.” This is the same definition used by the European Commission (1995). Whatever the definition or limits, the coastal zone cannot be neatly slotted into existing administrative or planning units. In other words, the coastal zone defies definition. It is inherently a dynamic system, an area of infinitely variable function and condition. It is this dynamism that causes problems in legislation for the coastal zone. Administrative boundaries in the coastal zone are rarely related to natural boundaries. Likewise, sectoral activities often transcend administrative boundaries. As a result of this, there is no simple formula that can be used to define the limits of the coastal zone. Therefore, an integrated and flexible approach is required when managing it.

The Irish Situation

Responsibility for the Irish coastal zone can best be described as “mosaic” (Kelly, 1995), with three main government departments being involved. The Department of the Marine and Natural Resources has the responsibility for marine-based activities and seaward planning and has very little responsibility for activities that occur above the high water mark. The Department of the Environment and Local Government is responsible for landward planning and recreational activities. This department guides local authorities who are, in effect, the implementation authorities for landward planning. Local authorities generally assume the role of coastal zone managers also, although rarely in a formal manner. The Department for Arts, Heritage, Gaeltacht and the Islands is responsible for nature conservation. It also has the authority to designate and implement conservation areas such as National Heritage Areas (NHAs) under national legislation and Special Areas of Conservation (SACs) and Specially Protected Areas (SPAs) under European legislation. Responsibility for aspects of the coastal zone are further complicated by the way in which government departments are divided into more specialized subdepartments. The Department of the Marine, for example, is divided into separate sections for aquaculture, coastal protection, and environment. While there are no formal legal mechanisms for vertical or horizontal integration of these departments and subdepartments, in the majority of cases they do try to work together when dealing with large-scale developments.

Tied to this administrative structure is the number of legislative enactments, at both the national and the European level, that have a bearing on the coastal zone and consequently its management. According to Thomson (1994), the legislative framework in Ireland is characterized by overcomplexity, ambiguities, and irregularities. O’Keefe (1990) identified 23 legislative acts at both the national and the European level that had relevance to the coastal zone at that time. The principal relevant legislation consists of the Foreshore Acts 1933–1992, the Local Government (Planning & Development) Acts 1963–1994, and the Harbours Acts 1946–1996. These are briefly outlined below in terms of their applicability to coastal zone management.
**Foreshore Acts 1933–1992**

While the coastal zone is not defined in Irish law, the Foreshore Act 1933 defines the foreshore as “the bed and shore, below the line of high-water of ordinary or medium tides, of the sea and of every tidal river and tidal estuary and of every channel, creek and bay of the sea or of any such river or estuary.” The word seashore is defined as “the foreshore and every beach, bank and cliff contiguous thereto and includes all sand and rocks contiguous to the foreshore.” Unlike the common law foreshore, which ends at the line of low water of ordinary or medium tides, the foreshore as defined by this act has no seaward limit, and the legal view is that the foreshore as so defined extends out to the 12 nautical mile (1 nautical mile is equal to 1,852 meters) limit of the Irish territorial sea (Crosbie, 1995).

As a general rule in Ireland, the foreshore belongs to the state and its control is vested in the Department of the Marine and Natural Resources, which has the power to grant foreshore licences and leases. These, however, can only be granted when deemed to be in the “public interest” (Foreshore Act, Section 2(1)). This lease may refer to the foreshore itself or to any buildings or structures thereon. It may also include any minerals to a maximum depth of 30 feet from the surface of the foreshore together with a right to exploit those minerals. The minister has discretion to give public notice of applications for leases, to invite objections and representations with respect thereto, and/or to hold a public inquiry in regard to the making of a lease. Section 3 of the same act, as amended, empowers the minister, if it is in the public interest, to grant a license of state foreshore which authorizes the licensee to “place or erect any articles, things, structures or works on such foreshore, to remove any beach material from, or disturb any beach material in, such foreshore, to set and take any minerals in such foreshore to a maximum depth of 30 feet or to use or occupy such foreshore for any purpose.” As is the case with leases, the minister again has discretion to hold a public local inquiry before deciding to grant a license under Section 3. Licenses may be used to restrict or prohibit any removal or disturbance of beach material or any kind or kinds of beach material. Under the guidelines produced by the Department of the Marine for Foreshore licenses and leases, it is stated that “any permission given under the Foreshore Acts would be without prejudice to the powers of the local planning authority. The applicant should, therefore, consult with that authority regarding the proposal” (Department of the Marine, 1997). There is no statutory basis, however, to this.

Section 8 of the act empowers the minister to make regulations in respect of the public use of state foreshore. Here it is stated as follows:

> If and whenever the Minister is of the opinion that the entry of the public on or use by the public of any particular area of foreshore belonging to the [. . .] State ought in the public interest to be prohibited, restricted, regulated or controlled, either permanently or temporarily, the Minister may by order make regulations prohibiting, restricting, regulating or controlling in such manner, to such extent, and for such period, limited or unlimited, as the Minister shall think proper the entry of the public on or use by the public of such an area of foreshore. (Foreshore Act 1933, Section 8(1))

This could be a useful coastal management tool. Controls exercisable over privately owned foreshore are less extensive (Scannell, 1995). Where this is the case, the minister has no control unless there is an interference with navigation or fishing. It is believed that some 1,000 Irish sites are outside the control of this act (Crosbie, 1995), and in theory these sites could be developed indiscriminately except in cases where other acts are directly applicable.

The second code governing development of the foreshore is that contained in the Local Government Planning and Development Acts 1963–1994 and the regulations made thereunder. Section 19(1) of the 1963 act requires every local authority to “make a plan indicating the development objectives for their own area.” These plans are known as development plans. Section 19(2) provides that a development plan must consist of a written statement and a plan, which is essentially a map, indicating the development objectives for the area in question. There is no exhaustive definition of the term “development objectives” but the term includes objectives for physical, economic, spatial, and social development (Scannell, 1995). This plan must be reviewed at least once every five years. Once the draft development plan and its amended version have been put on public display to allow objections and representations, it is the function of the elected representatives of the Council to adopt the plan by resolution. Once this has been done, the plan becomes a legally binding document, therefore binding the local authority to the implementation of its objectives.

Development plans operate as a framework within which planning applications are made and planning permissions granted or refused. Planning permission is required for all “development” of land except those areas stipulated in the acts. According to the 1963 act, “land includes any structure and any land covered by water (whether inland or coastal).” Delimitation of seaward boundaries of local authorities is not standardized throughout the state (Reid, 1986). In general it may be said that land above the line of ordinary high water mark is within the administrative area of the appropriate County Council, while the foreshore itself is within the administrative area of the Department of the Marine. According to Crosbie (1995), this has come about as an accident of history in that Charles I, and after him, Charles II, surveyed the kingdom (as it was then), inquiring about the ownership of dilapidated and inundated lands, and succeeded in removing the foreshores from the lords of the manors. The foreshore is, thus, effectively excluded from the Planning and Development Acts, because, under Section 2 of the 1963 act, each County Council is appointed the planning authority for its own county and, as the foreshore generally lies outside the administrative area of the County Council, it lies beyond its planning control. Thus, while the Planning and Development Acts apply to coastal land covered by water, the acts appoint no authority for this land. The result is that the Planning and Development Acts do not operate on the foreshore and the Foreshore Acts effectively control planning there.

As a result of the above, access to the foreshore in Ireland is enjoyed freely if not as a right (Crosbie, 1995). In theory, therefore, the state, as owner, would have the authority to prohibit access. Obviously this would cause major public outcry. With respect to owners of private foreshore, they have tried to exercise their right to prohibit access. This has, again, been criticized, as the general public believe they have a legal right of access to the foreshore. The operation in the foreshore of the Planning Acts has resulted in the foreshore being excluded from the counties when the Ordnance Survey maps were drawn up. This is important to coastal zone management because in the Supreme Court judgment of 9 February 1979 in the case of Browne v. Donegal County Council, it was stated that the boundary of the “existing judicial county” was defined by the Ordnance Survey maps prepared pursuant to the Boundary Survey (Ireland) Acts 1854–1859 (Reid, 1986). In law, therefore, the definitive boundary between the County Council and the Department of the Marine is the county boundary as marked on the current Ordnance Survey map. Since many Ordnance Survey maps are several decades, and in some cases almost a century, old, this poses potential constraints for coastal zone management.
Harbours Acts 1946–1996

The situation is further complicated by the existence of harbor authorities created by the Harbours Act 1946. In this act the word “harbour” means the harbor of a harbor authority (Harbours Act 1946, 2(1)). The geographical extent of harbors vary, each harbor authority having its jurisdiction defined in an order specific to that harbor. A harbor authority is made up of various members, for example, local authority members, stipulated in the Harbours Act (Harbours Act 1946, Part II, 7(1)(a)–(g)). The jurisdiction of a harbor authority can, and does, overlap with both planning authorities and the Department of the Marine and Natural Resources. Harbor authorities have the power to make bylaws in relation to “docks, quays, works and roadways” (Harbours Act 1946, 2nd Schedule, Part III, No. 19). They have no authority in considering a proposed development within a harbor, for example, a new marina or an extension to an existing structure. Many of Ireland’s largest estuaries are under their statutory jurisdiction, for example, Waterford and Cork. Most of these harbors are in public ownership (Crosbie, 1995). Under the Harbours Act 1946 each county council has considerable input into the management of any commercial harbor touching on the county. Proposed legislation to implement the recommendations made by a Review Group on Commercial Harbours and Pilotage Policy and Legislation (1992) will provide for commercial harbors to be managed by port companies rather than harbor authorities. In other words, ownership will change from public to private. It is unclear what effect this change will have. Perhaps the company will hold the harbor in some kind of public trust. It is important to note here that for a private body wishing to carry out a development on the foreshore, there are no statutory guidelines as to how these overlapping jurisdictions relate to each other.

European and International Legislation

Ireland has the smallest area devoted to nature protection of any European country, and landscape protection policy is also poorly developed (Hickie, 1996). The Wildlife Act 1976 is the only countrywide nature conservation law. The National Heritage Area (NHA) designation is the basis of the system for the protection of Irish natural habitats. All other designations, both national and European, overlap with these, but they will have no legal standing until the Wildlife Act is amended. There are 1,246 NHAs proposed but only 10% of these have legal backing because they are within Nature Reserves or National Parks (Hickie, 1996). An in-depth analysis of all European legislation relevant to the coastal zone is beyond the scope of this article, however, the main directives are the Birds Directive and the Habitats Directive. The Birds Directive (79/409/EEC) arose from the need to protect wild bird species as well as their habitats. This is to be achieved in Ireland through the designation of SPAs. From 1985 to 1991, 20 SPAs were designated; all were coastal areas and uninhabited islands, 80% of which were on state-owned land and foreshore (Hickie, 1996). These are enforced through the Conservation of Wild Birds Regulations (S.I. No. 291, 1985), which prohibit littering and pollution but not damaging changes in land use such as land drainage. While local authorities are sent details of SPA designations in their area, there is no formal interaction with the Planning and Development Acts. In the case of the Department of the Marine, informal consultations take place with the staff of Dúchas (the National Parks and Wildlife Service) about new applications for shellfish farms in SPAs (Dúchas, personal communication, 1999).

Under the Habitats Directive (92/43/EEC) designations of SACs are required for the protection of natural habitats, flora, and fauna. Natural habitats include estuaries, mudflats, and sandflats not covered by water at low tide and shallow inlets and bays. Details of
proposed SACs and NHAs are sent to local authorities, who have been asked to forward all planning applications to Dúchas for comment and recommendation. There is no formal arrangement for this, and again there is a problem of integration with other legislative acts and administrative agencies here. Section 26(1) of the Planning and Development Act 1963 allows a planning authority to take account of “other matters” that may regulate development. In theory, NHAs, and all other designations, should be included here. This directive was adopted in May 1992 and member states had two years to incorporate it into national law. In Ireland, this process has not yet been entirely completed, however the Natural Habitats Regulations 1997 allowed the Minister for Arts, Heritage, Gaeltacht and the Islands to propose provisional SACs. There are approximately 400 proposed SACs (Grist, 1997), all of which are currently NHAs, which have no legal backing, again, due to the fact that the Wildlife Act 1976 has not been amended.

The Convention on Wetlands (the Ramsar Convention) came into force in Ireland on 15 March 1985. Ireland presently has 45 sites designated as Wetlands of International Importance, with a surface area of 66,994 hectares. Many of these sites are coastal, and responsibility for them also lies with Dúchas. Many of these sites are also NHAs and/or SACs and/or SPAs. North Bull Bull Island, Co. Dublin, for example, is a Ramsar site but it is also an SPA under the Birds Directive, a national nature reserve (NNR), and one of only four places in Ireland to be protected by a Special Amenity Area Order under the Local Government (Planning & Development) Act 1963 (Sections 42 & 43). These orders state the objective of the planning authority in relation to the preservation or enhancement of the character or special feature of the area including objectives for the prevention or limitation of development in the area (Scannell, 1995). Essentially, they are like a site-specific development plan and must be reviewed at least once every five years.

**Blue Flag Beaches**

One form of local coastal zone management presently operating is the Blue Flag Beach Scheme, which is a voluntary, nonstatutory, quality assurance scheme aimed primarily at recreational beaches. This Europe-wide scheme is administered by the Foundation for Environmental Education in Europe (FEEE), at a European level, and by An Taisce (the National Trust for Ireland) in Ireland. Under this scheme, blue flags are awarded to beaches that meet specific criteria related to water quality, visitor facilities, beach management (including litter control), environmental information, and display facilities. With respect to water quality, this is assessed in accordance with the European Directive on Bathing Water Quality. At a site-specific level this scheme is carried out by the local authority of the area. This beach management is performed without a foreshore license even though it is below the high water mark. Such management may, at particular sites, require the erection of structures, such as bollards, for vehicular control. This is a development below the high water mark and, as such, it should include the involvement of the Department of the Marine and a foreshore license.

The regulations for blue flag beaches are either guideline (G) or imperative (I). These are predominantly nonstatutory except in relation to water quality. One such imperative regulation is that “the local community must have a land-use plan for its coastal zone. This plan and the current activities of the community in the coastal zone must be in compliance with planning regulations and coastal zone protection regulations. If the community is very small it may be part of a larger regional plan” (Rule 14(12)), which in most cases would be the county development plan. Also under the imperative regulations is the rule that “on the beach there will be no driving unless specifically authorised; no beach bike or car races; no dumping or no unauthorised camping” (Rule 17(15)).
Beaches on which cars are allowed must have designated areas on the beach for parking as well as car-free zones, and the water’s edge must always be kept entirely free of cars. Rule 18(16) stipulates that there must be safe access to the beach. There is no definition of the word “safe” or method suggested as to how a beach can be safe when cars are allowed on it. While the majority of blue flag regulations have no legal standing on their own, they could be incorporated, as suggested in the regulations, into local county development plans, which in turn would give them legal standing. There remains a problem of enforcement, which would have to be addressed because the local authority is assuming a role that it is not legally entitled to do.

Methodology

Most research focusing on coastal planning and development in Ireland is at the national or European level. Far fewer studies have been conducted at a local level. This research was undertaken as part of a project in the European Union’s (LIFE) Demonstration Programme on Integrated Coastal Zone Management. The University of Ulster, Coleraine, is currently developing management plans for seven Co. Donegal beaches under this program in association with Donegal County Council (DCC). The project was designed to demonstrate the practice of integrated coastal zone management through the sustainable use of beach and dune systems. It is intended that the management plans produced be incorporated into the Donegal Development Plan and hence become legally binding. To investigate the possible effects of disparate legislation enforced by a multitude of agencies on ICZM, two study areas, Downings and Rossnowlagh, were chosen from the original seven sites. While both these areas portray different natural characteristics, the effects of legislation are similar.

First, property ownership information was collected from land registry data. Registration of property in Ireland is compulsory under the Local Registration of Title (Ireland) Act 1891. While there have been revisions of this act, it remains that a lot of pertinent information, while actually out of date, is still legally binding. Each ownership of a property is registered on a folio. There are in excess of 1.2 million live folios in all (Hogan, 1998). Each folio is divided into three parts. The first part describes the property and where it is located. The second part describes the owner and the nature of his/her interest in the property; that is, whether he/she is a full owner, a tenant, or a limited owner. Part 3 of the folio describes the burdens that affect that property. Burdens could include a mortgage on the property, a right of way, a right to fish, or a lease. It is the latter information, which is crucial in coastal management, that is usually out of date. Each folio also contains a map showing the boundaries of the property. Under the Land Registration Rules 1972 these boundaries must be taken from the current, largest scale Ordnance Survey map.

The current largest scale Ordnance Survey maps are at 1:2,500 scale and date from 1833 to 1907. This creates particular problems where the property boundary is the high water mark as, naturally, it may have changed in the past 100 years. Up until 1995 the Land Registry’s method of map publication was by means of photocopying from originals (Kirwan, 1998). Not only did this produce poor quality maps but, due to the fact that paper is heated during the photocopying process, the maps produced were distorted. Unofficial enquiries have found that maps produced in such a way result in on-the-ground errors of between 1 and 2 meters at 1:1,000 scale and between 5 and 10 meters at the 1:2,500 scale (Byrne, 1998). This makes a significant difference in the case of Rossnowlagh and Downings, where there has been actual coastal erosion and accretion, respectively. When questioned about the accuracy of such maps for court purposes, the Assistant Director of the Ordnance Survey in Ireland replied that their use was “not
Building GIS-based mapping systems is not always straightforward. 'In practice, ... (Byrne, 1994), yet this is what is legally required to satisfy Land Registry mapping requirements. With respect to the survey accuracy of boundary information, the government does not have a monitoring function and does not dictate any requirements relating to the qualifications of the individual or organization that submits maps for property registration purposes (Long, 1980). Where a map is submitted for such purposes there is no check carried out to ensure that the new boundaries shown on the map physically exist on the ground. There are no official technical requirements governing the accuracy of maps for the transfer of land in Ireland (Long, 1980). Provided these newly submitted boundaries do not conflict with boundaries already mapped, which may in turn be correctly or incorrectly mapped, they will be recorded on the Land Registry map. Under this system, the legally mapped position of a right of way, for example, may be incorrect, which could have an important effect on the management of that particular piece of coast.

To illustrate all these effects, the land registry data, along with actual field data, were used to create a geographical information system (GIS) for each study area. High and low water marks, main roads, access points for both vehicles and pedestrians, study area boundaries, and property boundaries, along with natural and manmade features, were mapped using ARC/INFO. This information was then imported into ArcView and maps were produced. These maps identified clearly where there are potential legal conflict areas.

Results

Rossnowlagh

The Rossnowlagh study area consists of Belalt Strand, a 2-km stretch of coast, situated in southwest Co. Donegal. Figure 1 shows the general location and the study areas. Figure 2 shows the Rossnowlagh study area, including the 90 properties within it and the mean high and low water marks legally positioned on the 1907 6" Ordnance Survey map. This beach is managed as a blue flag beach. Under the regulations of this scheme vehicles must be excluded from at least part of the recreational beach. It is evident from Figure 2, however, that such a measure is made very difficult due to the fact that three main roads intersect at the beach, hence it becomes a main thoroughfare during busy periods. Surveys found that 38% of people disliked the presence of cars on the beach (University of Ulster Coleraine unpublished report, 1999). This is a definite management problem, in that it increases the risk of accidents, antisocial behavior, noise, inconvenience to other beach users, traffic congestion during the summer, compaction of the beach sand, and possibly traffic offences. The Road Traffic Acts 1933–1994 are enforceable in any “public place.” The expression public place means “any street, road, or other place to which the public have access with vehicles whether as of right or by permission and whether subject to or free of charge” (Road Traffic Act 1933, Part I, Section 3). As previously stated, the public have both pedestrian and vehicular access to the foreshore, which may not be legally allowed but is enjoyed freely if not as a right. If the beach is managed as a blue flag beach, under the regulations of that scheme, part of the beach must be car-free. This is purely a safety mechanism; that is, if cars must be allowed on the beach, at least part of it must be free from vehicles. In essence, the fact that the Road Traffic Acts are enforceable on a beach should help solve this problem; however, this has not been the case, probably due to the lack of Garda Síochána (Irish Police Force) resources for such problems in the area and the seasonality of beach use.

Pedestrian access to the beach is another potential management problem. As one of
the most popular beaches in Co. Donegal, there is a demand for access to Belalt Strand. Currently DCC operates a car park from which access to the beach is obtained, by foot, through the dunes. This research has found that, while DCC owns the car park, it does not own the strip of dunes running between their car park and the beach where access is gained. There is no public or private right of way across this land. Two private rights of way were found to exist to the north of this entry point, shown in Figure 2 also. The potential exists to make these into public rights of way (Local Government [Planning & Development] Act 1963, Part V, 48(1)). Continuous pedestrian trampling causes gaps to form in the dune system and consequent damage to dune vegetation. The unarmored sections of the beach contain no foredunes or fixed dunes, which indicates that there is no current dune development or recovery. To encourage this, any new pedestrian access
Figure 2. Belalt Strand, Rossnowlagh.
points should be raised above ground level using boardwalks or steps. A Section 38 agreement (created under the Local Government [Planning & Development] Act 1963) applies just north of here, which allows for phased development of the area. As this area will be developed anyway, there is the potential for a legal access route to be incorporated.

This area of coastline is progressively eroding and the position of property boundaries thus changes. Registration of land takes no account of such affects even though the legal position of a right of way will have changed as a result of erosion. The position of the high water mark in 1907 is shown in Figure 3 along with its position in 1998. Repositioning of the high water mark was enabled by analysis of aerial photographs and later by global positioning system (GPS) surveying. The shoreline showed its maximum retreat between 1951 and 1977, with relatively little change since then. Property owners responded to the problem with rock armoring. The Office of Public Works completed the first rock armoring, at public expense, in front of a hotel in 1972. Other property owners followed suit at various stages. Legally, planning permission is required for such development along with a foreshore license from the Department of the Marine. This, however, has never been sought. Currently approximately 755 m, 52% of the sand dune shore, is rock armored (unpublished UUC report, 1999). This is directly affected by property ownership. Owners who have the necessary financial means carry out armoring, as they believe it will be in their future financial interest. For example, if an owner decides to sell his land to a developer, the developer will pay more for the land if he/she thinks it is “protected.” Where there is an absentee landlord or where there is no active management of the area, coastal processes will follow their natural pattern. This is evident in Figure 3, where erosion is seen to have ceased in armored sections, while it has continued where there has not been armoring. To ensure that this situation does not continue, coastal management in the area must be undertaken in an integrated manner with all property owners being included in the decision-making process.

**Downings**

Tra Beg, Downings is situated on the eastern shore of Sheephaven Bay, a major inlet, on the north coast of Co. Donegal shown in Figure 1. It is bounded by rock headlands that provide a sheltered environment for water-based activities on an otherwise high energy coast. Figure 4 shows the study area boundary along with the 40 properties within it, the mean high and low water marks from the 1905 6” Ordnance Survey map, and the main access points. The general picture at Downings is one of expansion of the natural dune system during the early part of this century. The replacement of dunes by tourism and recreation facilities since the 1960s has put an end to natural dune-forming processes. There is only one access point (shown in Figure 4) for vehicles onto this beach, and this is not a public right of way. There is a car park to the landward side of this entry point, which is managed by DCC, but the land itself does not belong to the council. The only legal point of pedestrian access (shown in Figure 4) is via a set of steps from the northern part of the beach toward the pier. These are only passable at low tide. Additional pedestrian access is gained through the Gaelic Football Club’s pitch, but this is not a legal right of way.

Like Rossnowlagh, Downings was once a blue flag beach, but this status was lost in previous years because of car parking on the beach, jet skis, and dumping of builder’s rubble. Water quality and dog fouling pose additional problems. With respect to builder’s rubble, which has been used at Downings as informal armoring, this is legally considered “litter” and it is an offense to dispose of it in any “public place” under the 1963 Local Government (Planning & Development) Act, Part V, Section 52(1)(b). Actions
Figure 3. Shoreline changes at Rossnowlagh.

Legend:
- Rock Armour
- Right of Way (P)
- 1907 HWM
- 1998 HWM
- Beach
- Donegal Co. Council
- Area Properties
- 1907 OS Base Map
Figure 4. Tra Beg, Downings.
against such offenses can be taken either by the local Gardai or the relevant Local Authority. Dog fouling is an offense under the 1997 Litter Act, which states that “where faeces has been deposited by a dog in any place [to which this subsection applies] the person in charge of the dog shall immediately remove the faeces and shall ensure that it is properly disposed of in a suitable sanitary manner.” This applies to places such as public roads, school grounds, sports grounds, playing fields, or recreational or leisure areas and beaches (Litter Act 1997, Part IV, Sections 22(1) & (2) (a)(c)(d)).

The geographic position of Downings lends itself to many water-based activities, creating an additional set of management problems. One of these is the use of jet-skis, powerboats, and commercial fishing boats in an area also used by the public for swimming. The Merchant Shipping (Jet Skis and Fast Power Boats) Regulations 1992 enable a local authority to control any area of foreshore adjoining its functional area. While this has not been formally undertaken, the beach at Downings has been divided into zones for particular activities to help overcome these problems. A proposed car-free zone required under blue flag regulations is adjacent to the swimming area, while jet-skis are restricted to the pier side of the beach. Zoning may provide a solution to these problems, but as it is not a legally binding method there are still potential litigation problems should an accident occur.

Figure 5 shows how the high water mark has changed since its legally defined position in 1905 to where it was in 1998. Aerial photographs and GPS surveying allowed its position to be established for 1936, 1954, 1977, 1995, and 1998. From these it is clear that a large amount of accretion of the natural dune system has occurred. This land formed through accretion has been claimed by the adjoining landowners, who later converted it into caravan parks and recreation areas. Such facilities have since been “protected” by embankments, which, depending on their position in relation to the 1905 high water mark, require either planning permission from the relevant local authority and/or a foreshore license from the Department of the Marine and Natural Resources. As can be seen, this high water mark has changed, which casts doubts over the legal position of structures built on land formed by accretion. The legal position of such land is still unknown and will be the subject of future research. Under the Land Act 1965 the Irish Land Commission has the power to create rights of way in land formed by accretion (Land Act 1965, Section 20(1)). Although the Land Commission was dissolved in 1992, its powers are still exercisable by the Minister for Agriculture (Irish Land Commission (Dissolution) Act 1992, Section 4). It is essential for successful coastal management that the legal position of accreted land be established, as ownership of land has a major influence on management. It is also important from a litigation point of view.

Discussion

It is evident that the current legislative system in Ireland poses constraints on the implementation of any coastal zone management policy. While only a few relevant acts have been cited here it is important to note that virtually all laws that affect land and/or sea anywhere in Ireland potentially apply to the coastal zone. For this reason consolidation of relevant legislation into one coastal zone management act would be difficult, as most of these laws do not only relate to the coast but deal with a multitude of other issues. This does not take away from the fact that the majority of the legislation is in need of review and updating. It is inevitable that the management of a complex environment such as the coast will involve an amount of legislation, but such legislation should be mutually consistent and should facilitate rather than impede the administrative process. This, however, is absent from the Irish situation today.

A major legal constraint is the way in which legal acts cannot take into account the
Figure 5. Shoreline changes at Downings.
effect of changes in the high water mark and the effect this has on property rights and boundaries. As is evident in both study areas, legal rights of way can change naturally, yet the law does not provide for this. As a coastline is eroding, the actual legal right of way may disappear. There is the potential for this to happen in Rosnowlagh if erosion continues. If this were to happen, there would then be no legal access point to the beach—something that is required for continued use of this site. Conversely, in Downings the legal right of way is now located in a place where it can only be accessed at low tide. Land formed through the process of accretion has a major bearing in this site also. As previously stated, the legal position of such land is not yet known but in Downings the adjoining landowners have assumed it belongs to them. The resulting situation is that this land has been developed below the legal high water mark, possibly illegally, even though planning application has been obtained from the local authority who, again legally, has no jurisdiction below the high water mark. Law revision and more research are the only ways these problems can be solved.

There are many reasons an owner may decide to protect his/her property. However, it remains unknown what legal rights a property owner has in this respect. If, for example, a property owner were to lose 10 meters of his/her land by erosion, would he/she have the right to claim this land back by filling it in with other material that may or may not be suitable for that particular coastal environment? Similarly, would he/she have the right to protect the property from future erosion by erecting structures or using fill to create embankments? The latter question is currently a problem in Rosnowlagh. It could be argued that because the property is in private ownership that owner has the legal right to protect his legally owned property. The Irish Constitution and its legislative acts do, in general, protect private property rights. Before there can be successful management of the coastal zone, these legal “grey” areas have to be known, understood, and solved.

There are several existing legal mechanisms, which could be utilized to facilitate integrated coastal zone management until such times as the relevant legislation is updated. These include joint action by local authorities with private property owners. Property owners in the coastal zone have an important contribution to make, as can be seen in both the study areas, and the present lack of integrated legislation and administration makes their participation crucial to the success of an integrated coastal zone management plan. There is also a need for formal cooperation between existing government departments, semistate bodies, and local authorities. This is particularly necessary in the case of the Department of the Marine and Natural Resources and local authorities. One possible solution to this land/sea divide problem is provided by the Local Government (Re-organisation) Act 1985. Under this the Minister of the Environment has the authority to extend local authority jurisdiction up to three miles beyond the high water mark. This high water mark would remain the legal early 19th-century high water mark and hence still could not take shoreline changes into account.

With respect to specific problematic activities taking place on the beach, these could be controlled and/or prohibited by bylaws. The Local Government Act 1994 allows for the creation of these by any local authority. As a general principle bylaws should not be made unless there is a specific problem to be addressed that is not capable of being satisfactorily addressed under the existing law (Local Government Act 1994 Part VII, Section 37(2)(b)). Nevertheless Section 37(7) stipulates that the “local authority has the power to make a bylaw in respect of the foreshore and of coastal waters adjoining that functional area.” Contravention of a bylaw constitutes an offence and a fine of anything up to £1000 (IR£). Of the 16 coastal counties in the Republic of Ireland, 7 of them have enacted beach bylaws to control specific activities, for example, jet-skiing, litter, and driving cars. Donegal does not have bylaws, because of the “potential legal

Under the Local Government (Planning and Development) Act 1963, a local authority has the compulsory power to create public rights of way (Part V, Section 48(1)). Section 38 of the same act allows a local authority to “enter into an agreement with any person interested in land in their area for the purpose of restricting or regulating the development or use of the land, either permanently or during such period as may be specified by the agreement.” Essentially this is a local scale development plan allowing for the selection of particular areas covered by the agreement to be used for particular developments, for example, industry or caravan parks. Section 42 of the same act allows for the creation of a Special Area Amenity Order by way of an area’s natural beauty or its scenic or other amenities. In theory, these should help achieve a desirable balance between development and conservation, but because they can only be created by the Minister for the Environment, they are seldom used. In fact only one Special Area Amenity Order exists in the whole of the Republic of Ireland.

Conclusions

It is widely accepted that, due to the increasing range of pressures exerted on it, the coastal zone needs to be managed. However, from a short analysis of the main codes of legislation, it is clear that the development of an integrated policy for management of the coastal zone is very difficult due to fundamental discrepancies in these laws. Aligned to this is the fact that there are so many bodies involved in current aspects of coastal management. This work identifies the problems with the prevalent legislation. Undoubtedly, European Union legislation will have an affect on future developments even though as yet there is no specific European coastal zone management policy (Noe, 1995). The Birds Directive and the Habitats Directive have direct implications on the coastal zone but their relevance to Ireland has not yet been studied.

It is evident that a wide range of activities presently taking place on the coast of Ireland need to be controlled and/or prohibited in order to achieve sustainable development. Some aspects of the law are in need of review but with respect to powers for the control of activities current legislation appears to be adequate. The problem lies in the fact that the legislation enabling these powers is often unknown, misunderstood, or unused. Law revision would ensure that current management practices have legal standing. It would also clarify the obscurities in relation to the functional area of local authorities and where other acts can legally be enforced, for example, the Road Traffic Acts. The lack of knowledge and integration is highlighted in this article by consideration of coastal problems in two sites. The vacuum created by these problems means that a haphazard program of management is all that can be achieved at present.

References

Local Registration of Title (Ireland) Act. 1891. Government of Ireland, Dublin.