

## 5 SUMMARY OF PREFERRED PLAN AND IMPLICATIONS

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## CONTENTS

	Page
5 SUMMARY OF PREFERRED PLAN AND IMPLICATIONS	1
5 SUMMARY OF PREFERRED PLAN AND IMPLICATIONS	1
5.1 Plan for Balanced Sustainability	1
5.2 Summary of the Preferred Plan by area	2
5.3 Predicted Implications of the Preferred Plan	8
5.3.1 Implications for Property and Land Use	8
5.3.2 Implications for Nature Conservation	9
5.3.3 Implications for Landscape	10
5.3.4 Implications for Historic Environment	11
5.4 Managing the Change	11
5.4.1 Recommendations	11
5.4.2 Funding	12

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## 5 SUMMARY OF PREFERRED PLAN AND IMPLICATIONS

### 5.1 Plan for Balanced Sustainability

As discussed in Section 3, the Shoreline Management Plan (SMP) is attempting to deliver a balanced plan for the management of defences which will still support the values for each area of coast in terms of its human need, the natural environment and the heritage value, without commitment to ever increasing expenditure on defence.

The objectives against which this is judged are set out in Appendix E and an assessment of how effective the plan has been in achieving this is provided in Appendix G, where the results of the scenario testing and objective matching appraisal are provided.

Considering the results of the objective matching exercise, it may be seen that over the short term, there is only a small difference between the preferred plan and that of no active intervention. This reflects the fact that on the whole, defences would be expected to remain in place for the majority of epoch one and that along those more naturalised sections of shoreline where intervention is very limited or non-existent, the coast is functioning relatively well.

The general pattern in the short term reflects that overall, much of man's intervention has been in place a considerable length of time and is, in places, very considerable in its extent. In many areas man has learnt to adapt to coastal change and development has been restricted to areas where defence exists. The on-going maintenance of the coast has maintained both the natural features and human interests.

There is greater pressure however building within the system and this is seen in the medium and long term. This is not just as a result of anticipated sea level rise; although this is a significant factor, but really reflects the long term commitment to managing the coast. Over the medium term under no active intervention for all themes there is a general reduction in terms of objectives met. This reflects both conflict between existing defences and the wish to maintain important recreational benefits as well as the influence, both natural and man made, on the nature conservation values. It also reflects that without maintenance, defences start to fail. The preferred plan looks to maintain defences where this is seen as being sustainable, but not at the expense of other aspects of the coast. In comparison with no active intervention, the preferred plan clearly introduces certain changes, whilst maintaining a relatively high success in balancing objectives.

This same pattern may be seen to apply in the third epoch. A very important aspect of this is that despite the increasing pressure for change, overall there is no major change in any of the themes in the preferred plan between the second and third epochs. This is despite the fact that some significantly different approaches to management are proposed. Under the no active intervention scenario, many of the objectives would not be met.

Overall the preferred plan is seen as achieving a balance between the many objectives; accepting that change is necessary and providing a plan that is realistically achievable given the increasing pressures on the coast.

## 5.2 Summary of the Preferred Plan by area

### Hurst Spit and Milford-on-Sea

The underlying intent of the plan for this area is to maintain the core values of Milford-on-Sea but in such a way as to provide continuity with the management of Hurst Spit and allowing some increased exposure of the designated geology, while maintaining control of the development of the shoreline. Management of the Spit would be controlled by holding the line at Hurst Castle and through maintaining the eastern end of the rock revetment and the groyne. Although the spit beyond the Castle would be allowed to develop naturally, the intent would be to recycle material from that section back on to the central section of the spit. As such this Hurst Spit section is defined as one policy unit.

At present there is increasing pressure on the main sea frontage to the town. The intent here would be to manage the frontage through control of erosion in front of the White House and through retaining a beach in front of the old sea wall. This would require drawing the natural alignment forward, potentially through the use of offshore structures. It is recognised that this approach may not meet funding requirements and that such an approach would, therefore, need to identify collaborative funding streams. As a default, should collaborative funding not be put in place, it may be necessary to consider realigning the defence line backwards to create the space to maintain a sustainable defence and area of beach.

The intent is to maintain defence through to Rook Cliff, but focussing defence at key locations. This creates an opportunity for a more sustainable defence and allows some further erosion of the cliff face. This would be in a controlled manner. To the west of Rook Cliff, through holding the line at the apex of the cliff and thereby protecting the closest point of the road, the intent would be to allow controlled erosion of the cliff line. The intent would be to maintain the coastal road at least over the next 50 years. Through monitoring erosion rates and sea level rise, decisions would be deferred as to the degree of further control that might be required and sustainable in managing this western frontage. At present it is considered that during the final epoch, there may be a need to realign the road and that over the final epoch there may be some loss of properties along this section of the frontage. The intent behind this is to allow development of a more substantial beach area, providing protection to the realigned road and properties further back from the cliff line.

### Barton-on-Sea to Mudeford Quay

The intent of the plan in this area is to develop a long term readjustment of defence approach. Protecting the eastern sea front development of Barton-on-Sea from erosion (Marine Drive East), while maintaining the important open space of the cliff and coastal slope is a key objective. Works would be undertaken to improve stability of the coastal slope but accepting further loss due to cliff crest recession, particularly over the steep crest cliff.

Gradual failure of the defences to the western end of the town (Marine Drive and Marine Drive West) would be accepted, allowing adaption to loss of property and progressive loss of the holiday park (Naish Cliff). The intent would be to maintain a degree of control through adaption of existing defences and drainage so as to reduce the rate of loss of assets and to provide some transition between Naish Cliff and the defended section to

the east. This might be supported by limited recharge to the frontage but the intent would not be to provide long term defence to Naish Cliff.

Developing a transitional approach to management between the eastern frontage of Barton-on-Sea and Barton Cliffs to the east is important, but the intention would be to not extend defence further east, but to allow natural erosion and recession of the coastline through to Hordle Cliff.

There would be a reduction in defence to the western end of Barton-on-Sea, resulting in significant increased risk to property. Defences would be maintained beneath Marine Drive East, but the information from monitoring indicates that there may be longer term losses even along this section. Management of Naish Cliff may include some beach recharge but there would be a change in long term policy in that this would aim to slow erosion but not to significantly alter the natural behaviour of the cliffs. The coast between Barton-on-Sea and Hordle Cliff would continue to erode as at present.

Maintaining defences to Highcliffe would aim to sustain both protection to properties and the amenity use of the coastal slope and foreshore. The active intent would be to maintain the width of the defence retaining beaches.

### **Christchurch Harbour**

The intent of the Plan is to maintain a general policy of Hold the Line to the important areas of development around the Harbour but also to ensure opportunity for natural adaption of the mosaic of habitats. In front of Mundeford town the intent would be to, support continued maintenance of the low sea wall but without raising the defence. The car park and boat park behind the Quay and the headland to the north would be subject to increased flooding. Consideration could be given in the area immediately behind the Quay, particularly in the area of open ground, to removal of the low wall allowing some limited scope for natural habitat development. The aim would be to avoid squeeze of habitat against the wall.

The intent elsewhere within the Mundeford area would be to continue to support local private defence, only actively considering more formal set back of defence of the main town if the long term need arises with sea level rise. Planning should recognise that the lower lying properties (particularly at the headland) would be at increased risk of flooding. This general approach would apply around the frontage, including the road in front of Stanpit.

The intent for Christchurch is to maintain and improve flood defence to maintain the integrity of the town. Subject to long term monitoring, should it be identified that the integrity of the SSSI is being damaged due to the inability of the estuary to adapt naturally, further consideration should be given to retreating the line behind Stanpit Marshes. At Wick, the aim of the plan is to restrict defence strictly to the area of development. Natural development of estuary habitat should be encouraged over the existing marsh and rising land. To the south side of the estuary, natural development of the estuary would be allowed.

Despite the actions recommended above, it is recognised that the balance of habitat may not be achieved with Christchurch Harbour. Subject to monitoring of estuary behaviour, the upstream area, north of Christchurch possibly offers compensation for management within the main area of the Harbour.

## **Mudford Spit to Southbourne**

The coastline from Mudford Spit through to Southbourne is an essential feature in minimising impact on adjacent areas of the coast. It is considered important for sustainable flood and erosion management and development of interests of broader coastal management over the whole zone. The intent of the shoreline management plan is, therefore, to sustain the overall influence of this section of the coast, ensuring that over the period of the SMP2, no breach occurs at either the Solent Beach isthmus (Double Dykes) nor Mudford Spit. Specifically, the aim is to maintain the position of the Long Groyne at Hengistbury Head, with the potential for this structure to be extended and reshaped to allow better management of adjacent sections of the coast. To the east of the headland, the aim is to maintain the integrity of the spit, sustain amenity value of the area, maintain the position of the Run but also facilitate continued exposure of the cliff face.

The initial intent is to restore the alignment of the coast between the Mudford Run and Southbourne. The spit would be allowed to roll back in response to increased pressure due to sea level rise, matching erosion of the cliff. This will require development of a management plan allowing continued use of the area, supported by defence and recharge. The intention would be to maintain the position of the Spit head, maintaining the navigation channel. To the west of the headland, the intent would be to maintain the integrity of the isthmus along the Double Dykes frontage and maintain defence to the principle assets at Southbourne. At the same time, the aim is to maintain as far as possible the continuity of shoreline processes between the main section of Poole Bay and those of Solent Beach. To achieve this, consideration needs to be given to potential realignment along the line of the emerging Southbourne headland while examining options for extending the influence of the Long Groyne at Hengistbury Head. Between these two locations the aim would be to establish a more sustainable position for maintaining a robust semi-natural defence to the isthmus. This would not preclude increasing the beach width in front of Double Dykes, but neither would the defence position of the frontage be determined by defence of this feature's existing extent. The overall aim in this area is to maintain the open space, amenity and nature conservation value of the area by minimising reliance on hard defence to control the frontage.

## **Poole Bay**

The intent for this open coast frontage would be for Hold the Line over the three epochs, subject to availability of flood and coast protection funding. The intent for management is to maintain protection by recharge and sediment movement control, thereby sustaining the essential recreational and amenity benefits, along with defence of important infrastructure and properties along the crest of the cliff. The SMP, however, recognises the possible difficulties in terms of maintaining funding and the potential increased effort required to maintain the existing practice of regular recharge and maintenance of the groynes, particularly in the longer term, beyond the end of epoch two. As such, a potential policy within possibly the third epoch could be to advance the line. This approach would intend to constrain sediment drift so as to retain areas of beach between more advanced, control points along the coast. This possible policy would need to be taken forward in partnership within a strong integrated framework for development of the whole frontage. The timing of such an approach would of course be intrinsically linked to the actual rate of sea level rise (and any increasing storminess which is experienced) and the measured response of the beach profiles to these

changes. Furthermore, this framework would need to define acceptable influence or mitigation with respect to maintaining underlying coastal processes and management of the adjacent areas of coast.

### **Flag Head Chine to Handfast Point (open coast)**

This section of the coast has to be considered holistically as the open coast barrier system to Poole Harbour, although management of different areas within this section varies considerably to reflect the local values. The underlying intent of the plan is, therefore, to maintain a competent coastal barrier, with the entrance to the Harbour maintained in its present position. In terms of on-going management, this intent is met by the need to maintain the defence of the Sandbanks peninsula and maintain control of the Harbour entrance at the head of this peninsula and on the southern side at South Haven Point. Over the northern half of the area, the more local intent is to maintain Sandbanks through control of the drift locally to the shore and to provide recharge as necessary. The aim is to develop the approach being taken at present, such that the frontage continues to provide both protection and amenity value. The pressure on the frontage will increase with sea level rise but the outlined approach is considered sustainable.

Maintaining a certain amount of sediment supply to the wider area, particularly through the ebb system of Hook Sands through to Studland, is an important aspect of the preferred plan. There is a constraint on management, therefore, that works undertaken to maintain Sandbanks should not detrimentally impact on this entrance system. There may be a need in the final epoch, as pressure grows on the coast, to further develop the present approach (at Sandbanks) of using coastal defence structures for amenity purposes, an example of this is the manner in which the rock groynes have been used to provide additional effective promenade space and the variation of the shape of the rock structures to enhance natural dune and vegetation growth. This would need to be taken forward within a broader framework of management so that the overall system is not disrupted. The aim for this northern section would also be to maintain defence around Sandbanks Village through private and public collaboration, to maintain the integrity of the village. The Management Area extends within the Harbour to include the inner face of the peninsula and to maintain protection to the main shore road.

On the southern side of the Harbour entrance, the dominant feature is the natural value of the Studland Peninsula, reflected in the conservation designations. The long term aim is to restore the natural functioning of the coast within the area. It is accepted that this function is modified by the control of the entrance channel, particularly in relation to the training bank. These artificial constraints are not seen as being in conflict with the aim to deliver a more naturally functioning coastline.

The aim or intent of the plan is, therefore, to adapt use of the frontage so that there is no requirement for hard management of the coast. During the first epoch, the policy will be to gradually remove all infrastructure such as beach huts, car and dinghy parks, cafes etc so that by the second epoch, there will be a naturally evolving sustainable coastline that will require no further structural interventions. Under the non-interventional approach the historic Fort Henry at Redend Point would be likely to be lost to erosion during the second epoch.

This will require co-operation between various interest groups and development of a shoreline use plan. Maintaining the training bank does influence the frontage providing a degree of control to the northern end. This is seen as an important structure in

providing a transition between the harder control of the Harbour entrance and the natural management of the main Studland area to the south.

### **Poole Harbour – northern shore**

This area includes the core residential, commercial and heritage centre of Poole. The principal aim over the whole area is to maintain the important regional and national economic viability of the area. As such the policy throughout the area is to continue to defend the built and recreational assets. There are, however, important broader issues for the whole of Poole Harbour due to the potential squeeze of habitat and the inability for the Harbour to respond to sea level rise without loss of important nature conservation interest.

Therefore, while the need to defend the existing shoreline is well established, there needs to be an underlying aim to consider any local opportunity, to allow adjustment of the specific line of these defences. Specific areas that would need further consideration would be within Parkstone Bay and around the shoreline of Whitley Lake where accumulation of sediment may provide habitat opportunities (although currently a very popular recreational area). However, there may be smaller scale opportunity in the manner in which private defences are managed at discrete locations over the whole area.

Within Holes Bay, the main defence is along the southern and eastern side of the bay. There is little anticipated risk to the area of the Upton Country Park and this area has, therefore been included within the overall policy unit. Locally the aim would be not to intervene in this specific area. This is consistent with the overall intent to maintain existing defences but to encourage an approach towards looking for nature conservation gain.

### **Poole Harbour – upper estuary**

The area from Ham Common around to the Arne Peninsula provides the greatest opportunity for adjustment of defences, allowing improvement and adaptation of the vital nature conservation interest of Poole Harbour, in line with sea level rise. This forms a primary intent for the area. The intent, however, is also to continue to manage key areas of the built environment, specifically areas of Turlin Moor, the railway line and the centres of Wareham and Stoborough.

Along the Ham Common frontage the aim of the plan is to increasingly manage defences to allow a more natural response of the coast in keeping with the designated value of the area. This needs to be developed in conjunction with the owners of the Holiday Park.

In the Wareham area, despite constraints imposed by agreements for continued defence, the intent would be to allow increased inundation of land currently defended, with the aim to restore a more naturally functioning system. This approach is being examined in more detail through the Environment Agency's emerging strategy, subject to the Harbour flows.

There would still be the intent to defend core areas of Wareham and Stoborough and to support adaption of amenity resources between the two rivers.

The aim would be to maintain defence to the railways but this should be undertaken in a manner to minimise impact on the natural development of intertidal habitat in the area. There is recognised to be a potential issue of contamination in this area around Holton Heath and this needs to be examined further.

### **Poole Harbour – southern shore & Islands**

While this area is the most natural of the main frontages within the Poole Harbour system, due to the relatively steeply rising hinterland, there are concerns that the full variety and area of significant habitat will not be maintained with sea level rise. The overall intent within the area is to allow natural processes to dominate and to allow maximum adjustment of the coastal fringe.

It is recognised that there are important oil field installations in the area and that there are local jetties and, in some areas, local sections of defence. The long term intent would be that where such features impact on coastal processes or on the natural development of the shoreline, these man-made features would be removed or their impact reduced. This would, however, not necessarily preclude maintenance of such structures supporting essential use of the area in the short to medium term.

### **Poole Harbour – Brownsea Island**

The overall intent for management of Brownsea Island is to reduce the influence and impact of defences. Over much of the island, local defences are deteriorating and the intent would be not to undertake further defensive intervention. This non-interventional approach however anticipates that the landowner would remove defences as they fail over time. This is in line with the landowner's intent to allow natural process to continue wherever possible.

The general intent is continued through to the areas of the Lagoon and the Quay, while recognising that these areas do pose issues to such an approach. The Lagoon defence currently maintains the integrity of the designated habitat within the Lagoon. Despite this, the overriding sustainable approach would be to allow retreat from this defence line, restoring the frontage to a more natural condition. The intent, therefore, both here and at the Quay, is to maintain current defences until (through deterioration and sea level rise), management of the defences or use of the area behind is untenable.

### **Swanage**

The intent of the plan for Swanage is to maintain the viability and important heritage and community aspects of the area. This includes reducing flooding and providing protection to the town centre, maintaining access along and use of the coastal road, promenade and beach and sustaining important local use of the headland to Peveril Point. This includes all essential infrastructure. However, this has to recognise the important landscape setting of the town and seafront and the important geological value of the coast. To this end, the intent of the plan is to limit further extension of defences, particularly further north along the shore and to recommend approaches which may minimise landscape impact. Within this intent therefore, the recommendation is that the northern section of the existing defence line is managed more as a transitional area, between a firmer policy to Hold the Line of defence to the south, and the No Active Intervention policy within Management Area SWA.M

## Durlston Bay

For Durlston Bay, the overriding intent of the plan is to maintain the geological value through allowing natural coastal evolution. It is recognised that there will be property at risk in the medium to long term along the frontage and the plan includes the opportunity to undertake minor intervention works with respect to drainage management in slowing the recession of the cliff line. This would only be recommended under the overall plan if it could be demonstrated that it did not impact significantly on the opportunity to maintain the natural coastal change. The intent of the plan would not be to remove existing defences or slope stabilisation measures but to allow such works to deteriorate over time.

Measures need to be considered as how best to assist individuals with property at risk through discussion and through the planning process. To inform this, it is essential that monitoring of the frontage is continued and improved. The long term aim is to be in a position during the final epoch to adopt more fully a policy of No Active Intervention.

### 5.3 Predicted Implications of the Preferred Plan

#### 5.3.1 Implications for Property and Land Use

Overall the main centres of development are maintained. Christchurch, Bournemouth, Poole and Swanage are recognised as key settlements providing housing, employment, cultural and heritage value and economic stability to the overall SMP area. There are recommendations within the detail of the plan for management of development within these settlements that would allow some adaption in the future. The timing of such adaptive approaches will remain closely linked to the actual rate of sea level rise and changes in the overall hydrodynamic regime and the measured response of the shoreline to these changes.

The area of most significant property loss would be Barton-on-Sea, specifically around the western end of the town adjacent to Marine Drive West. The losses would also affect the Naish Holiday Village. This loss would be likely to occur during epochs 2 and 3. The town is only partly defended at present and defence of the undefended frontage would require major capital construction works. In addition, active land sliding within the slumping clay cliffs produces a complex and generally unstable frontage, not primarily related to erosive coastal processes.

There are other localised areas where property may be lost. At Milford-on-Sea, required realignment of defences may cause some controlled loss of property during epoch 3. At Southbourne, there may be some localised loss of property during the third epoch under the managed realignment of the shoreline position. At Durlston, residential properties will be at risk from erosion during epochs 2 and 3 under the preferred no active intervention policy, however, this might not preclude local small scale intervention, by individuals, to mitigate drainage problems through the cliffs, if this could be shown not to impact on the coastal processes or other values associated with each area.

Individually, historic interests at Hurst Castle, Highcliffe Castle and Durlston Castle, plus the Quay structures at Brownsea Island, are all at risk within the anticipated erosion zones, however at Hurst and Highcliffe the plan provides for defence to be incorporated into overall management of the respective areas to mitigate this risk. At Durlston, the risk is lower and local measures to mitigate the risk would be acceptable. At Brownsea, the plan intends to realign at the Quay over the medium to longer term, in line with the management approach of the National Trust.

While the intent is to protect the centres of Christchurch, Poole and Swanage from tidal flooding, there must be an acceptance of an increased risk of flooding in these areas, particularly beyond epoch 1 and the possible loss of discrete, individual properties in the medium to long term. This needs to be taken into consideration in discussion of detailed implementation of the plan.

Key aspects of the transport system would be maintained; in particular key roads between the settlements, including the A35 linking Poole and Bournemouth and the rail link which crosses part of Poole Harbour.

Agriculture, although not a key industry in the area, remains important locally. Along the open coast it is not considered sustainable to defend all areas of agriculture land. Locally there would be some small losses of agricultural land east of Barton-on-Sea, to the north of Swanage and in the Durlston Bay area. These losses might be expected to total in the region of 80 hectares by the end of epoch 3. Under the plan there would, therefore, be some small-scale but continued loss of agricultural interests.

Aside from property and infrastructure, the coast is extremely important for other interests including ports and harbours, fishing, recreation, tourism and water use. The plan aims to sustain these important aspects. The port and harbour of Poole plays a central role in the economic well-being of the whole area, as do the beaches and general seafront areas of Bournemouth, Boscombe, Poole and Swanage. Christchurch Harbour is very significant in terms of its support to both commercial fishing and recreational sailing and boating.

The plan sets policy and advises on approaches to management which will sustain beaches both for recreational use and for activities such as fishing. It recognises that there will be increasing pressure for erosion of beaches and landscape aspects of the plan. For example, the transitional management of the coast east of Southbourne and north of Swanage will be critical in managing these values. The plan also advises where, with respect to the linear coastal development and protection along the Boscombe, Bournemouth and Poole frontages, there may be a need for long term adaptation of the approach to defence and hence the need for width for future defence.

### 5.3.2 Implications for Nature Conservation

The coastline has a very rich natural environment, much of which is recognised for its international or national value to nature conservation for its ecology and/or geology or geomorphology.

Geologically, much of the coastline is of national and international importance and cover the majority of cliff frontage along Poole and Christchurch Bays (and Harbours), Studland Bay, Swanage Bay and Durlston Bay. Maritime cliffs and slopes are also the subject of Local and National BAPs, and again many of the cliff sections are also covered by these specific nature conservation designations. The policy to allow continued erosion of the chalk cliffs through long term No Active Intervention between Durlston Cliff Flats to Durlston Head complies with BAP targets, as does the recommended long term erosion of Studland Cliffs and Purbeck Ridge (East).

The plan ensures that the environmental and landscape quality of the cliffs is improved during the course of the SMP. These policies will all invariably involve some loss of cliff top habitats though erosion, but this is reflective of a dynamic coastal environment. In

addition, it is recognised that long term loss of natural processes essential for maintaining favourable condition of geological interest features may occur through proactive long term shoreline management of defences for example, between Chewton Bunny to Mudeford Sandbank (Hold the Line).

Ecologically, large areas of intertidal mudflats, sandflats, reedbeds, saltmarsh and coastal lagoons of high conservation interest occur in Poole and Christchurch Harbours, which provide important feeding grounds for large populations of internationally important bird species such as waders, gulls and waterfowl. The River Avon is an ecologically important chalk stream that drains into Christchurch Harbour, while the Avon Valley shows a greater range of habitats and a more diverse flora and fauna than any other chalk stream valley in Britain.

Policies to continue defending within high nature conservation areas including Hurst Spit, will maintain the overall integrity of the geomorphological feature, and maintain the shelter the spit provides to the intertidal and hinterland habitats to the north, and hence prevent significant disturbance and damage to these habitats in the event of an uncontrolled breach of the Spit. In addition, the measures of Managed Realignment and Hold The Line at Hengistbury Head combines protection of the SAC and SPA site unit on Hengistbury Head alongside maintaining control of the coastal processes, protecting the social activities within the Bay, and protecting the Historic Environment interests. For both these management zones and sites, the preferred policies are acting to prevent significantly greater impacts on the designated site interests.

However, Hold the Line in such locations as Poole Harbour would involve significant loss of important or threatened habitats and species associated with SPAs, SACs, and Ramsar Sites within the Harbour (e.g. saltmarsh, mudflats, waders). This would occur in through lack of available adaptation area for intertidal and terrestrial habitats during sea level rise in response to coastal squeeze associated with current defences (e.g. Wareham Tidal Banks), infrastructure or local topography. This will potentially require mitigation through the creation of equivalent habitat elsewhere (i.e. compensatory habitat).

### 5.3.3 Implications for Landscape

Many sections of the coastline are recognised and protected for their landscape quality through designations under Dorset Heaths (Joint Character Area 135), New Forest (Joint Character Area 131), South Purbeck (Joint Character Area 136) and Dorset Area of Outstanding Beauty (AONB). The AONB includes the Purbeck Heritage Coast, which has been recognised by the award of the Council of Europe's Diploma for the Conservation of Protected Landscapes. The AONB also contains many SSSIs, as well as several Sites of Nature Conservation Interest (SNCI) and National Nature Reserves (NNR).

The recommended long term plan of the SMP is to sustain the coastal urban areas of Bournemouth, Christchurch and Poole and smaller towns and fishing villages around the coastline (e.g. Swanage, Milford-on-Sea and Barton-on-Sea), through proactive management of existing defences recognising new defences will be needed in the long term. However, opportunities for forming a less managed / free functioning dynamic coastline in limited zones of management have been taken into consideration to create a more natural coastal landscape, reducing the extent of man-made defence structures an allowing natural processes to prevail. This is deemed to provide a more sustainable and aesthetically appealing coastal landscape than a policy of defending the whole coastline

through Hold the Line for example, which would involve construction of new, more substantial defences.

In general, the plan will maintain the landscape quality of the frontages designated as AONB or Heritage Coast. However, it is recognised that long term loss of landscape features on defended sections of coastline for example geological interests of the Heritage Coast, extent of beaches, reserves and changes in flora and fauna of the AONB will detract from the quality of the coastal landscape at those locations. Where sections of coastline have a No Active Intervention policy, the SMP should be used to identify where and when negotiations may be required to allow for set back of landscape features which may become further eroded such as the South West Coastal Path.

#### 5.3.4 Implications for Historic Environment

Archaeological remains are a finite and non-renewable resource, highly fragile and vulnerable to damage and destruction and the coastline. The surrounding areas of Poole Bay and the Harbour, and the Isle of Purbeck Bays (Durlston, Swanage, and Studland) contain a broad range of historic sites and Scheduled Ancient Monuments (SAMs).

A large number of these historic sites and SAMs are associated with firing ranges, towers, castles (e.g. Durlston Castle) and barrows, most of which are located immediately adjacent to the shoreline and offshore wrecks. Those assets behind sections of coast where defences will be maintained will be defended in the long term, but there are also many unscheduled sites of importance that are protected, along with areas of archaeological potential.

Many listed buildings and Conservation Areas within the urban areas will also be protected under the recommended plan. However, the policies which promote long term erosion or deposition (No Active Intervention) or Managed Realignment will invariably impact upon the recorded and unknown historic environment, as the coverage of the coastal heritage resource is so extensive. These losses under the recommended long term plan for this SMP must be recognised, and consideration should be given to an appropriate programme of survey, recording and investigation to record these important sites, and those potential features not yet identified.

## 5.4 Managing the Change

### 5.4.1 Recommendations

The Plan sets out a development of policy over the three epochs from the present forward over 100 years. There are still essential decisions to be made in taking these changes in policy forward.

What has become very evident in developing the plan is the need for better involvement and co-ordination between different departments within authorities and between different authorities and organisations over the coastal zone. This coast cannot be managed by default or through uncoordinated actions.

In several areas recommendations have been made for the development of spatial planning of the coastal zone. Without this, the coastal engineering has to be purely based on risk to existing assets. Even taking the far more forward looking approach engendered by SMPs and strategies, the emphasis for defence or engineering management will tend to be responsive to threat rather than opportunity. This will tend

to result in decisions being made at a time when options are already constrained. Considering the management of the coast over a 100 year period is essential in this respect.

This is a coastline where, because of the underlying generally soft geology, change is inevitable. This need for change will be exacerbated by sea level rise. The impetus for management has, therefore, to come from a broad coastal management perspective. The aim is in actual management of many of the broader issues; to deliver benefits, rather than purely from the shoreline management perspective of delivering the benefits associated with damage and risk avoidance.

In specific areas where there is a short term policy for hold the line with a longer term policy of retreat or no active intervention, this must be taken as an opportunity to allow adaptation, not a policy of delay. The longer term erosion threats associated with areas such as Milford-on-Sea and Barton-on-Sea, the potential risks associated with flooding within Poole Harbour and the management of Brownsea Island are cases in point, where it is the long term intent for the areas which need to drive present management.

It is recommended that the policies be adopted by all organisations represented on the CSG and that these policies, together with an understanding of their intent, are incorporated as guidance for the development of statutory planning within each area.

The following section (Section 6) of this document provides an overall summary of policies for the shoreline. This summary should be considered with reference to the detailed development of the plan provided in Section 4.

#### 5.4.2 Funding

Each management area contains a number of policy units. For each MA an outline economic assessment has been provided based initially on the high level assessment of damages. Where supporting strategy studies have been undertaken and, where appropriate, further economic data has been incorporated within each policy statement.

Overall, given the level of detail available to the SMP, the policies are shown or are believed to be cost effective in terms of economics; taking into account the additional information from strategies and plans not specifically evaluated in the SMP. However, it is equally recognised that in many areas direct funding under coast protection or flood defence may not be available due to the need for prioritisation of this funding at a national level.

The development of policies set out in Section 4 highlights the consequences of alternative approaches. In this the SMP aims to identify the individual beneficiaries of the policy. In many cases this is driven by the specific objectives as identified in planning documents or in maintaining the other interests of an area. In line with the Government's strategy "Making Space for Water" co-funding of projects for the coast should be considered. This intent to examine the potential for additional and collaborative funding has to be seen as an essential component of delivering the agreed plan.