Isle of Grain to South Foreland Shoreline Management Plan (SMP) Review

Appendix F – Initial Policy Appraisal and Scenario Development

Contents Amendment Record

This report has been issued and amended as follows:

Issue	Revision	Description	Date	Approved by
1	0	Consultation Draft	01.05.07	S McFarland
	1	Amendments following public consultation	11.03.08	N Pontee
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Appendix F: Initial Policy Appraisal and Scenario Development

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Contents by Policy Unit

Note the geographic breakdown of the appraisals presented in this Appendix is not necessarily the same as the final Policy Units (PU). In this appendix the breakdown has been based upon coastal process and morphological changes along the shoreline. For ease of reference, the following table identifies the page number on which appraisals relevant to each PU start.

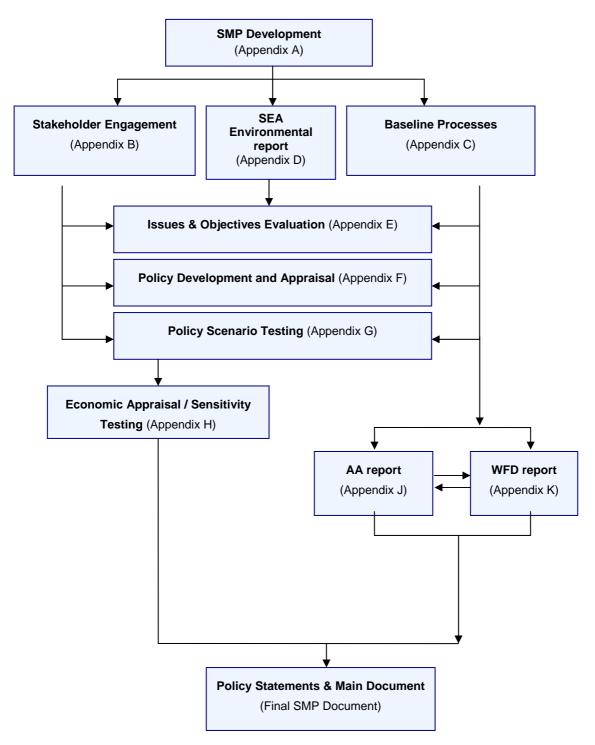
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The Supporting Appendices

This appendix and the accompanying documents provide all of the information required to support the Shoreline Management Plan. This is to ensure that there is clarity in the decision-making process and that the rationale behind the policies being promoted is both transparent and auditable. The appendices are:

	f · · · · · · · · · · · · · · · · · · ·
A: SMP Development	This reports the history of development of the SMP, describing more fully the plan and policy decision-making process.
B: Stakeholder Engagement	All communications from the stakeholder process are provided here, together with information arising from the consultation process.
C: Baseline Process Understanding	Includes baseline process report, defence assessment, NAI and WPM assessments and summarises data used in assessments.
D: SEA Environmental Report (Theme Review)	This report identifies and evaluates the environmental features (natural environment, landscape character, historic environment, land use, infrastructure and material assets, and population and human health).
E: Issues & Objective Evaluation	Provides information on the issues and objectives identified as part of the Plan development, including appraisal of their importance.
F: Initial Policy Appraisal & Scenario Development	Presents the consideration of generic policy options for each frontage, identifying possible acceptable policies, and their combination into 'scenarios' for testing.
G: Scenario Testing	Presents the policy assessment and appraisal of objective achievement towards definition of the Preferred Plan (as presented in the Shoreline Management Plan document).
H: Economic Appraisal and Sensitivity Testing	Presents the economic analysis undertaken in support of the Preferred Plan.
I: Metadatabase and Bibliographic database	All supporting information used to develop the SMP is referenced for future examination and retrieval.
J: Appropriate Assessment	Presents an assessment of the effect the plan will have on European sites.
K: Retrospective WFD Assessment	Presents a retrospective Water Framework Directive Assessment.

Within each appendix cross-referencing highlights the documents where related appraisals are presented. The broad relationships between the appendices are as below.



F1 Introduction

This Appendix outlines the key steps undertaken in the development and definition of policies. Policy scenarios have then been taken forward and appraised and the results of this appraisal are presented in <u>Appendix G</u>.

The recommended approach (Defra Guidance) for development of a sustainable final plan is through the assessment of policy scenarios, rather than considering locations in isolation. The aim of this stage has therefore been to identify the appropriate combinations of policies to be appraised for the whole SMP frontage. This has involved the following activities:

- Identification of 'key policy drivers';
- Identification of potential policy options through the broad-level appraisal of the four generic Defra policy descriptors; and,
- Development of policy scenarios for assessment.

It should be noted that the first two tasks have looked at individual locations in relative isolation, but wider-scale impacts of policies have been assessed during the policy scenario appraisal stage which has looked at the likely shoreline response and evolution both locally and along the SMP coast as a whole.¹

¹ Refer to appendix G

F2 Identification of 'Key Policy Drivers'

F2.1 DEFINITION

A 'key policy driver' can be defined as a feature that has sufficient importance in terms of the benefits it provides that it potentially has an overriding influence upon policy selection at the wider SMP scale. This may be through either promoting a policy, or discarding a policy, for a particular location or locations.

There are no specific criteria which define a key policy driver, rather it is dependent upon the specific nature of coastline and associated objectives and is slightly intuitive.

Examples of a key driver may include:

- a power station which must be maintained, due to its national significance (possibly only for a certain period of time if the facility is to be closed/decommissioned); or,
- an internationally important habitat which relies on constant sediment feed, driving policy for the up-drift shoreline.

F2.2 METHODOLOGY

The Issues and Objectives Table (see <u>Appendix E</u>) was used to initially identify key policy drivers for the coast. Proposed key policy drivers were presented to the Client Steering Group (CSG) at a workshop in August 2006. The key policy drivers proposed, by the consultant, were:

- Graveney Marshes (internationally designated environmental RAMSAR site);
- Whitstable Town (identified as an important residential, commercial and economic asset);
- Herne Bay (identified as an important residential, commercial and economic asset);
- Reculver Towers (recognised as an internationally important heritage feature);
- Margate (identified as an important residential, commercial and economic asset);
- Ramsgate (identified as an important residential, commercial and economic asset);
- Pfizer (recognised as being socio-economically important);
- Sandwich (identified as an important residential, commercial and economic asset); and,
- Deal / Walmer and Kingsdown (identified as an important residential, commercial and economic asset).

F2.3 KEY POLICY DRIVERS

At the workshop the CSG decided that there was insufficient justification to not investigate other policy options over the 100 year SMP time frame. As such no key policy drivers were agreed upon.

Key policy drivers were discounted for the following reasons:

- Graveney Marshes: discounted because the CSG wanted to test the benefits of maintaining current environmental interests against alternative environmental interests;
- Whitstable Town: discounted because the CSG wanted to test advance the line;
- Herne Bay: discounted because the CSG wanted to test advance the line;

- Reculver Towers: discounted because the CSG acknowledge that it might become unsustainable in the future to continue fixing the plan form position at Reculver Towers;
- Margate: discounted because the CSG wanted a number of options to be tested;
- Ramsgate: discounted because the CSG wanted a number of options to be tested;
- Pfizer: discounted by the CSG because there is uncertainty related to its future;
- Sandwich: discounted because the CSG wanted a number of options to be tested; and,
- Deal / Walmer and Kingsdown; discounted because the CSG wanted a number of options to be tested.

F3 Identification of Potential Policy Options

F3.1 METHODOLOGY

Having agreed there were no key policy drivers, the CSG split into two groups; the 'open coast' (Whitstable Town to South Foreland) and the 'estuaries group' (Medway and Swale estuaries and the open coast on north Grain and north Sheppey), to identify potential policy options (Filter 2's), for appraisal.

The potential policy option process is essentially a '<u>screening procedure'</u> for those areas where no key policy drivers have been agreed. There are four generic Defra policy options to choose from and they are:

- Hold the line maintain the existing defence line;
- Advance the line build new defences seaward of the existing defence line;
- **Managed realignment** allow the shoreline to change with management to control or limit movement; and,
- **No active intervention** a decision not to invest in providing or maintaining defences.

To assign potential policy options the Isle of Grain to South Foreland shoreline was sub-divided into a number of frontages, each of which can be considered discrete from adjacent frontages. For each of these frontages the CSG discussed and agreed policy options they would like the consultant to test. The CSG were asked to:

- Provide a practical vision for the coastline over the short (0-20 years), medium (20-20 years) and long term (50-100 years;
- Consider the relative importance of <u>their</u> issues against those of <u>others; and</u>,
- Where there might be a conflict of interest, consider possible areas for <u>compromise</u> or <u>acceptable change</u>, especially where the relative importance of a particular issue might alter over time.

F4 Policy Appraisal Tables

Generic criteria were devised at the CSG workshop to facilitate the selection of policies at specific frontages. The criteria were as follows:

- Advance the line should be tested for ports and harbours;
- For frontages north and east of the relict Wantsum Channel, the options tested should be the same, as both are part of the same flood cell;
- Managed realignment should be considered where there is potential for retreat; and,
- Where there are settlements options other that hold the line should be tested after Year 20

The following tables (4a01 to 4b26) summarise for each policy unit the policies selected, by the CSG at the workshop. The justification for appraising the policies is also included in the tables.

Note:

Some changes to the unit boundaries were suggested by the CSG and the tables reflect these changes.

At some locations (e.g. Allhallows-on-Sea to Grain), a change in policy to managed realignment or no active intervention, in the long-term, may potentially offer technical and/or environmental benefits. However, its implementation would involve the loss of important environmental or anthropogenic assets (land, properties, infrastructure etc). In these locations and under these circumstances, consideration of the long-term policy is the overall objective.

ALLHALLOWS-ON-SEA TO GRAIN (NORTH)

Summary description: Sparsely populated areas of the coast, consisting predominantly of low lying agricultural and marsh land, fronted by extensive intertidal mudflats, all of which is of environmental interest.

Position of 'the line': Existing defences (flood embankments).

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	To be appraised, for long-term technical, environmental and anthropogenic benefits.		
No Active Intervention	To be appraised, for potential long-term techni	cal and environmental benefits.	

SHEERNESS TO MINSTER (Chalet Park) Summary description: Dense urban area and dock, the latter being located in the Medway Estuary. The backing hinterland is low-lying agricultural and marsh land. Position of 'the line': Existing defences. Policy Years 0 - 20 (2025) Years 20 - 50 (2055) Years 50 - 100 (2105) To be appraised. Will protect the economic assets of the frontage and backing flood risk area. Hold the Line Advance the Line To be appraised. Will enhance the economic assets and improve infrastructure links. Managed Realignment Limited benefits given that the development extends to the beach edge, the backing hinterland is low-lying and sediment feed into the frontage is relatively weak. Limited potential process benefits and uncontrolled loss of significant area of urban development to flooding and erosion. No Active Intervention

MINSTER TOWN (Ch	MINSTER TOWN (Chalet Park to Royal Oak Point)				
Summary description: The town of Minster is located on raised land, known as Minster slopes. Minster Marshes and a shingle beach front the cliffs. On top of the cliffs lies agricultural land, with some tourist and residential developments.					
Position of 'the line': E	Position of 'the line': Existing linear defences and / or the cliff top edge.				
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)				
Hold the Line	To be appraised (in the west) to continue protecting the anthropogenic assets at Minster.				
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.				
Managed Realignment	To be appraised for potential long-term technical and environmental benefits, in the west) and to limit asset loss (in the east).				
No Active Intervention	To be appraised (in the east) for process bene	fits, and limited assets at risk.			

MINSTER (Royal Oak Point) TO WARDEN POINT				
Summary description: Minster slopes stretches along the entirety of this frontage. Minster Marshes and a shingle beach front the cliffs. On top of the cliffs lies agricultural land, with some tourist and residential developments.				
Position of 'the line': E	Position of 'the line': Existing linear defences and / or the cliff top edge.			
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)			
Hold the Line	To be appraised (in the west) to continue protecting the anthropogenic assets at Minster.			
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.			
Managed Realignment	To be appraised for potential long-term technical and environmental benefits, in the west) and to limit asset loss (in the east).			
No Active Intervention	To be appraised (in the east) for process bene	fits, and limited assets at risk.		

WARDEN POINT TO LEYSDOWN ON SEA					
Summary description:	Summary description: Developed cliffed and low-lying sections, which are large of tourist value.				
Position of 'the line': C	Position of 'the line': Cliff top edge on cliffed section and existing linear defences on low section.				
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)				
Hold the Line	To be appraised. Will protect the economic as	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.			
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.				
Managed Realignment	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.				
No Active Intervention	To be appraised for long-term technical and er	nvironmental benefits.			

LEYSDOWN-ON-SEA TO SHELLNESS

Summary description: A relatively undeveloped section of the coast, which is of agriculture value in the north and nature conservation value in the south. Intertidal mudflats and extensive saltings of the Swale Estuary front this section.

Position of 'the line': Cliff top edge on cliffed section and existing linear defences on low section.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	To be appraised. Will protect some of the economic assets from flooding and coastal erosion. Change managed in a controlled manner.		
No Active Intervention	To be appraised for potential long-term technical and environmental benefits.		

Summary description: Agricultural marshland fronts wide inter-tidal mudflats that support a large shellfish population. The mudflats are of conservation interest.				
Position of 'the line': E	xisting linear defences.			
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)			
Hold the Line	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.			
Advance the Line	To be appraised. Increased flood protection to the backing hinterland, will maintain the hinterland environmental interests of the present day.			
Managed Realignment	To be appraised. Will protect some of the economic assets from flooding. Change managed in a controlled manner.			
No Active Intervention	To be appraised for potential long-term technical and environmental benefits			

SEASALTER (Blue Anchor) TO WHITSTABLE GOLF COURSE (NE corner)

Summary description: Urban development with small pockets of recreational and tourist development dominates this frontage. Intertidal mudflats diminish towards the east.

Position of 'the line': Existing linear defences.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	To be appraised. The rate of erosion and potential flood inundation will be managed.		
No Active Intervention	To be appraised for potential long-term technic	al and environmental benefits.	

WHITSTABLE TOWN (Golf Course, northeast corner) to WHITSTABLE HARBOUR (eastern extent)

Summary description: Dense urban development and small pockets of recreational and tourist development dominates this frontage. Intertidal mudflats diminish towards Whitstable Harbour.

Position of 'the line': Existing linear defences.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.		
Advance the Line	To be appraised. Will enhance the economic assets and could improve infrastructure links. Will also increase flood protection of the backing hinterland.		
Managed Realignment	No benefits given that development extends to the cliff/beach edge over majority of the frontage.		
No Active Intervention	To be appraised for long-term technical (coastal processes /naturally functioning shoreline) and environmental benefits. Will eliminate unsustainable coastal management practices in the long term.		

Summary description: Dense urban and harbour development with pockets of tourism, commercial, industrial, agricultural and recreational land uses. The foreshore comprises a mixed shingle and sand beach that fronts London Clay slopes.

Position of 'the line': Cliff top edge on cliffed section and existing linear defences on low section.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	To be appraised. The rate of erosion and potential flood inundation will be managed.		
No Active Intervention	To be appraised for long-term technical (coastal processes /naturally functioning shoreline) and environmental benefits. Will eliminate unsustainable coastal management practices in the long term.		

SWALECLIFFE TO HERNE BAY BREAKWATER

Summary description: Areas of nature conservation and urban settlement, some of which is of tourist value, dominate this section of the coast. The hinterland is fronted by inter-tidal mudflats, which are of nature conservation value.

Position of 'the line': Existing linear defences.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)	
Hold the Line	To be appraised. Will protect the economic as	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.		
Advance the Line	To be appraised. Could enhance economic assets and improve infrastructure links. Will improve flood protection of the backing hinterland and could encourage development / expansion of the town.			
Managed Realignment	To be appraised. The rate of erosion and potential flood inundation will be managed.			
No Active Intervention	To be appraised for long-term technical (coastal processes /naturally functioning shoreline) and environmental benefits. Will eliminate unsustainable coastal management practices in the long term.			

HERNE BAY BREAKWATER TO RECULVER

Summary description: Dense urban development in the west with freely eroding cliffs in the east that form part of the nature conservation area. A narrow sandy beach occupies the fore

Position of 'the line': Existing linear defences on low section and cliff top edge on cliffed section.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised (for the west). Will protect the	economic assets of the frontage.	
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	To be appraised. The rate of erosion and will be managed.		
No Active Intervention	To be appraised (for the east). Long-term technical (coastal processes /naturally functioning shoreline) and environmental benefits. Will		
	eliminate unsustainable coastal management practices in the long term.		

RECULVER TO MINNIS BAY (Wantsum Channel North)					
Summary description:	Summary description: Agricultural land dominates the coastline, fronted by inter-tidal mudflats and backed by vast Wantsum Channel flood risk area				
Position of 'the line': E	Position of 'the line': Existing defence line.				
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)				
Hold the Line	To be appraised. Will protect the economic and heritage assets at the coast and in the backing flood risk area. Similar coastal processes to the present day.				
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.				
Managed Realignment	To be appraised. The extent of flood inundation will be controlled. Some existing economic and environmental assets will be maintained, opportunities for the environment. Would seek to protect Reculver Towers under this scenario.				
No Active Intervention	To be appraised for potential long-term technical and environmental benefits – could see the reactivation of the Wantsum Channel.				

MINNIS BAY TO WESTGATE-ON-SEA				
Summary description: Steep chalk cliffs, rocky outcrops, sandy bays and the cliff top town of Birchington dominate this section of the coast. The whole of this frontage has been designated as Heritage Coast.				
Position of 'the line': Existing toe defences.				
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)			
Hold the Line	To be appraised. Will protect the economic assets of the frontage.			
Advance the Line	No benefits. Potential environmental impacts v	No benefits. Potential environmental impacts would result from seaward movement / improving the defences.		
Managed Realignment	Technically and economically impractical to construct new defences that allow realignment. The construction of new defences could have a more detrimental impact on the landscape / environment than holding the present line.			
No Active Intervention	To be appraised. Will improve landscape and environmental value of frontage. Some cliff top assets will be at risk.			

MARGATE (WESTGATE-ON-SEA TO FULHAM ROCK)					
Summary description:	Summary description: Dense urban development with harbour. Steep chalk cliffs with rocky outcrops and sandy bays.				
Position of 'the line': C	Position of 'the line': Cliff top edge on cliffed section and existing linear defences on low section.				
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)				
Hold the Line	To be appraised. Will protect the economic assets of the frontage and backing flood risk area.				
Advance the Line	To be appraised. Could enhance economic assets and improve infrastructure links. Will improve flood protection of the backing hinterland. Benefits for the maritime development and the town.				
Managed Realignment	No benefits, given that development extends to the cliff/beach edge over majority of the frontage.				
No Active Intervention	No benefits given the residual life of the existing defences.To be appraised, favourable process and landscape benefits. Will result in a naturally functioning system and fresh geological exposures.				

CLIFTONVILLE (FUL	CLIFTONVILLE (FULHAM ROCK TO NORTH FORELAND)			
Summary description: Steep chalk cliffs and rocky outcrops characterise much of the coastline, whilst residential, agricultural and recreational areas occupy the cliff top. The whole of this unit is designated as Heritage Coast.				
Position of 'the line': C	Position of 'the line': Cliff top edge.			
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)			
Hold the Line	To be appraised. Will protect the economic ass	To be appraised. Will protect the economic assets of the frontage.		
Advance the Line	No benefits. Potential environmental impacts w	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	No benefits given that development extends to the cliff edge over majority of the frontage			
No Active Intervention	To be appraised for environmental / landscape benefits and if the other options become unsustainable (technically). Will maintain landscape and environmental value of frontage.			

NORTH FORELAND TO RAMSGATE HARBOUR

Summary description: Steep chalk cliffs and rocky outcrops characterise much of the coastline, whilst residential, agricultural and recreational areas occupy the cliff top. The whole of this unit is designated as a Heritage Coast.

Position of 'the line': Cliff top edge.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage, will impact on the environmental assets.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	No benefits given that development extends to the cliff/beach edge over majority of the frontage and the cliffs naturally erode at a low		
	rate.		
No Active Intervention	To be appraised for environmental / landscape benefits and if the other options become unsustainable (technically).		

RAMSGATE (Inc. Little Cliffs End)

Summary description: Dense urban area and a harbour dominate this section of the coast. Steep chalk cliffs and rocky outcrops characterise much of the coastline.

Position of 'the line': Existing defences and / or cliff top edge.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	No benefits given that development extends to the cliff/beach edge over majority of the frontage		
No Active Intervention	No benefits given the residual life of the existing defences.		
WEST CLIFF (western harbour arm to Cliffs End)			
Summary description: Dense urban area and a harbour dominate this section of the coast. Steep chalk cliffs and rocky outcrops characterise much of the			

coastline.					
Position of 'the line': Existing defences and / or cliff top edge.					
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)				
Hold the Line	To be appraised. Will protect the economic assets of the frontage.				
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.				
Managed Realignment	No benefits given that development extends to the cliff/beach edge over majority of the frontage. New defences at a realigned position would be technically, economically and potentially environmentally impractical.				
No Active Intervention	To be appraised. Favourable process, landscape, environmental and technical benefits.				

PEGWELL BAY TO SANDWICH BAY ESTATE				
Summary description: Unprotected cliffs give way to wide inter-tidal mudflats, at Cliffs End, which are of nature conservation interest. The backing hinterland forms part of the vast Wantsum Channel flood risk area, embankments presently precludes flood inundation. The Pfizer chemical plant is located inland.				
Position of 'the line': C	Position of 'the line': Cliff top edge on cliffed section and existing defences on the low-lying sections.			
Policy	Years 0 – 20 (2025) Years 20 – 50 (2055) Years 50 – 100 (2105)			
Hold the Line	To be appraised. Will protect the economic assets of the frontage.			
Advance the Line	No benefits. Potential environmental impacts w	vould result from seaward movement of defen	ces.	
Managed Realignment	To be appraised for potential long-term technical and environmental benefits. The rate of erosion and potential flood inundation will be managed.			
No Active Intervention	To be appraised for potential long-term technical and environmental benefits.			

SANDWICH BAY ESTATE TO DEAL MUSEUM

Summary description: Largely undeveloped area, with the exception of Sandwich Bay Estate(a residential development), that forms part of the Wantsum Channel flood zone. Wide intertidal mudflats, of nature conservation interest, decrease towards Sandown Castle (remains of). Sandwich Flats accommodate several well-known golf courses.

Position of 'the line': Seaward edge of the White Cliffs Country Trail.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	To be appraised for potential long-term technical and environmental benefits.		
No Active Intervention	To be appraised for potential long-term technical and environmental benefits.		

DEAL MUSEUM TO OLDSTAIRS BAY

Summary description: Dense urban development, Deal and Walmer, fronted by an amenity beach. Steep chalk cliffs commence at the village of Kingsdown, whilst at the base of the cliffs at Oldstairs Bay is a disused MOD range.

Position of 'the line': Seaward edge of the road.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the economic assets of the frontage.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	No benefits given that development extends to the beach edge throughout the frontage.	To be appraised for potential long-term technical and environmental benefits. The rate of erosion (and potential flood inundation) will be managed	
No Active Intervention	To be appraised for potential long-term technical and environmental benefits.		

OLDSTAIRS BAY TO ST. MARGARET'S BAY

Summary description: Classified as a Heritage coast due to the steep chalk cliffs and associated geological exposures. On top of the cliffs lie recreational, agricultural, undeveloped areas and some private houses.

Position of 'the line': Existing cliff top

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	No benefits. Potential environmental impacts,		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	No benefits given the residual life of the existing defences.		
No Active Intervention	To be appraised. Nature conservation interests will continue to be satisfied and the coast will function naturally.		

ST. MARGARET'S BAY

Summary description: This section of coast contains the clifftop village of St Margaret's. There is an amenity beach in place which is managed. This section of the coast is also designated for its landscape and geological qualities.

Position of 'the line': Existing defence line.

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	To be appraised. Will protect the cliff top economic assets.		
Advance the Line	No benefits. Potential environmental impacts would result from seaward movement of defences.		
Managed Realignment	No immediate benefits given the residual life of the existing defences.	To be appraised for potential long-term technical and environmental benefits. The rate of erosion will be managed.	
No Active Intervention	To be appraised for potential long-term technical and environmental benefits.		

SOUTH FORELAND

Summary description: Steep chalk cliffs and rocky outcrops characterise much of the coastline. The cliffs form part of the Heritage Coast designation and as such the cliff top is largely undeveloped.

Position of 'the line': Cliff top position

Policy	Years 0 – 20 (2025)	Years 20 – 50 (2055)	Years 50 – 100 (2105)
Hold the Line	No benefits. Potential environmental impacts.		
Advance the Line	No benefits. Potential environmental impacts would result in the construction of defences.		
Managed Realignment	No benefits.		
No Active Intervention	To be appraised. This will achieve a naturally functioning coastline.		

F5 Policy Scenarios for Assessment: Methodology

F5.1 INTRODUCTION

Due to the sediment linkages and interdependencies along this coast it is appropriate to assess the coast as a whole, rather than a number of discrete sections of coast. Tables 4a01 to 4b26 (Section F4) highlight the options agreed by the CSG to be reviewed, from which the proposed preferred policies were ascertained.

F5.2 POLICY SCENARIOS TO APPRAISE AT FILTER 2

The potential policy option selection process will involve consideration of the objectives met, technical feasibility, and likely economic justification:

- The possible benefits and opportunities arising from each policy option in relation to the objectives for a frontage are identified in the Issues and Objectives Table, for each policy, in each of the three epochs (Appendix G);
- Technical feasibility is investigated in the shoreline interaction and response statements (Appendix G); and,
- To determine the latter, a broad assessment was made of assets potentially at risk using the baseline scenario 'No Active Intervention' (NAI). To facilitate this, the assessment used the NAI mapping produced as part of the baseline scenario assessment.