

**Agenda for Exmouth Beach Management Plan
Steering Group
Wednesday, 14th December, 2022, 4.15 pm**

Venue: online via zoom

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6 December 2022

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1 Welcome and introductions (Pages 2 - 6)

Welcome from the Chair, and agree the notes of the previous meeting held on 1st March 2022.

2 Reminder of aims and terms of reference

3 Overview of the Exe Estuary Management Partnership

Presentation from Stephanie Harper-Chung, Exe Estuary Officer.

4 Progress of Scope for Exmouth Beach Management Plan (Pages 7 - 18)

5 Timetable

[Decision making and equalities](#)

EAST DEVON DISTRICT COUNCIL**Minutes of the meeting of Exmouth Beach Management Plan Steering Group held online via zoom on 1 March 2022****Attendance list at end of document**

The meeting started at 2.00 pm and ended at 4.04 pm

11 Welcome and introductions

The Chair welcomed attendees to the meeting, and introductions were made.

12 Reminder of aims and terms of reference of the Group

The agreed aims and terms of reference for the Group were provided within the agenda papers for reference.

13 Update on RNLI

The Group received an update on works to repair and complete the RNLI slipway. Photographs illustrated the work undertaken through use of a cofferdam to help protect the workforce and the site from the tidal levels. The aim was for the workforce to be off the site by 11 March 2022.

Whilst there had been some delay in the work being undertaken, the RNLI had kept the Council's Engineer updated. There had been some small expense on behalf of the District Council in remedial works for health and safety, the work had been entirely funded from donations to the RNLI – a fact highlighted by Steering Group members, who hoped that this in turn would help to drive further donations to the Institute.

The work had been completed whilst being aware of the pending work on the Beach Management Plan.

14 Update on Exe Estuary Partnership

The Chair of the Exe Estuary Partnership, Cllr Channon, outlined the work of the partnership. She requested that a short presentation on this Partnership was brought to the next meeting of the Steering Group.

The Partnership would be publishing a new document on latest findings and plans in April; however the Group were updated on the latest impact of Dawlish Warren on the Beach Management Plan. Some groynes on the Dawlish side nearest to, which had fallen into disrepair, were no longer doing their role in retaining sand and therefore may be removed.

Concern was raised by some Members in regard to how the Environment Agency viewed the project. They felt that the EA should consider the estuary as a whole, rather than look to funding the separate plans for Dawlish and Exmouth.

The EA representative re-iterated the issue with the groynes under discussion, not providing the same ability to hold sand and being a risk to public safety; therefore there was pressure from Natural England to remove them. As the site remained dynamic,

consultation was underway to seek views on these groyne elements. The EA welcomed any local knowledge input and would respond to any letter from the authority on its concerns.

15 **Update on BMP progress**

The Engineer reported to the Group the appointment of consultants from Bournemouth, Christchurch and Poole Council (BCP) to carry out the BMP study. There was no new modelling required, therefore a smaller study would be completed, which meant more money to allocate to the delivery of the scheme.

The scope would come to the Group for comment at a future meeting, where the Group would be asked to consider:

- The most likely scheme within available funds;
- The best case scheme, which could be activated should more funding be available, whilst being complimentary to the most likely scheme.

Past experience from the Sidmouth BMP had delivered more funding to their scheme, following Government criteria changes – if the same happened during the drafting of the BMP for Exmouth, it was prudent to have an alternative option.

The scope needed focus on the areas that could be controlled by the authority, whilst being mindful of the work of the Exe Estuary Partnership and the separate plan at Dawlish Warren.

16 **Call for evidence**

(a) **Changers in Navigation Channel**

The Engineer shared with the Group information provided by Andrew Hinton, of the National Coastwatch Institution. Visual representation of the area showed the movement of elements of the coastline, in an image of the area in March 2021.

In relation to the navigational channel, the buoys had been moved several miles to deeper water in recent years. Historically, the channel seemed to have shifted back to and away from the coastline.

Contributions on the channel included:

- A further survey was due in April 2022;
- The changes were more extreme in recent years, causing the continued relocation of buoys which involves considerable cost, and impacts on there the port limits are;
- Use of the channel was advised against 2.5 hours before low water, because of the depth being insufficient;
- Continued changes and variations that vessels have to take to use the channel.

(b) **Changes in Pole Sands**

Images presented to the Group showed the changes to Pole Sands, illustrated by red loss and blue gain areas, between 1998 and 2020 (LIDAR data). The general trend was of moving inland. The images also showed significant increase between 2018 and 2020 of sand at Orcombe Point.

(c) Changes in Dawlish Warren

The Group were shown images of the Dawlish Warren area to demonstrate the changes over past years; from 1999 through to 2014, with an increase in size of stable sands edging closer to Exmouth. There were some losses by 2020, but overall the shift has been outwards across the estuary.

Discussion on Dawlish Warren included:

- Recent article in Devon Live covering the changes to the area.

(d) Changes in the beach Western Section

The western section was currently at healthy levels. This area contained tanks owned by Devon County Council, which in past years have been visible, but are currently covered.

There was no additional evidence provided on this section of the beach.

(e) Changes in beach Central Section

The central section of the beach originally had sand dunes in the 1950s, when Queens Drive and the Maer were built. As the dunes started to reduce and disappear, steps were taken in the 1970s to re-instate the dunes, which involved extensive maintenance both to sustain the dunes, and keep the road clear of sand.

Current levels are very low, and currently too low for the sand to dry out and stabilise. Whilst there was some nostalgia over reinstating the dunes, in practical terms this would require a substantive and costly recharge.

Discussion on this section included:

- Relocate some of the sands at Orcombe point to this location;
- Public support for reinstatement of dunes at this section of the beach;
- Users of the beach eroded the dunes due to their leisure activities;
- Any substantial recharge could be swiftly removed by storms, so to recharge extensively at this point would not be cost effective;
- The wall at this point was last checked in 2015; a note was made to check if a more recent survey on the condition of the wall had been undertaken;
- Any recharge or recycling of beach material to this section was likely to be moved by storms to the navigational channel;
- Work was needed to improve that section of the beach, whilst being affordable.

(f) Changes in the beach Eastern Section

The Group were informed of the increase in beach height at this point of the beach, which resulted in sand on the road. This small quantity of sand was removed and relocated (if not contaminated by road users) to Orcombe point, as that had ease of access to the beach.

Sand could be relocated to other parts of the beach if access was improved at other sections. This would be factored into the review of the BMP.

The existing groynes at this section of the beach are extensively covered by sand, so any required maintenance to those sections requires considerable shifting of sand before any assessment or work can be undertaken on them.

Easterly storms make little impact on this section of the beach, because of Orcombe Point acting as a headland.

In relation to the eastern section of the beach, the following points were made:

- The groynes in that area were rebuilt in the 1960s; these were now overly successful and too much sand was retained in that area;
- The navigational channel had previously followed alongside the beach until Orcombe Point; now that channel turns in front of the lifeboat station and has far less energy in it;
- Enquiries should be made for other photographi evidence of historic changes from the Exmouth Museum and the reference library in Exmouth for all sections of the beach

17 Date of next meeting

The next meeting would include a report on the expected paper from the Exe Estuary Partnership, and a presentation on the work of that partnership to inform the Group. The finalised scope should also be ready for the Group to consider.

Although no scheduled date was set, the next meeting was expected to be scheduled for May 2022.

Attendance List

Steering Group Members:

Councillor Paul Millar

Councillor Olly Davey

Councillor Eileen Wragg

Councillor Christine Channon, Devon County Council

Councillor Tim Dumper, Exmouth Town Council

Councillor Pauline Stott, Exmouth Town Council

Chetna Jones, Exmouth Town Council Deputy Clerk

Harriet Googe, Environment Agency

Max Underhill, RNLI

Ivor Jones, National Coastwatch Institution

John Morgan, Exmouth Watersports Ltd

Also in attendance:

Councillor Paul Arnott
Councillor Nick Hookway
Councillor Maddy Chapman
Councillor Peter Faithfull
Grahame Forshaw, Exeter Port Authority

Officers in attendance:

Tom Buxton-Smith, Engineering Projects Manager
John Golding, Strategic Lead Housing, Health and Environment
Debbie Meakin, Democratic Services Officer

Apologies:

Andrew Hinton NCI
Matt Hosey BCP
Alan Frampton BCP
Cllr Geoff Jung EDDC

Chair

Date:

Exmouth Beach Management Plan (BMP) Update 2022

Project Scope

22nd September 2022

1. Introduction

This document defines the scope of works required to deliver a review and update of the Exmouth Beach Management Plan (BMP), first produced in 2015.

1.1. An overview of the current Exmouth BMP

The current Exmouth BMP was adopted by East Devon District Council (EDDC) at a cabinet meeting on 17th November 2015. The full BMP including appendices can be viewed online at: <https://eastdevon.gov.uk/beaches-harbours-and-coastal-information/coastal-protection/beach-management-plans/exmouth-beach-management-plan/read-the-exmouth-beach-management-plan/#> (accessed: 8th April 2022), and covers the open coast frontage of Exmouth, located on the north side of the mouth of the Exe Estuary. The current BMP frontage extends from Orcombe Point in the east to Exmouth Pier in the west, and is sub-divided into three management units (see Figure 1); as part of the BMP update, the BMP is to be extended to cover the area between the western end of MU1 and Exmouth Marina (see blue box in Figure 1). Within the area covered by this BMP is East Devon District Council (EDDC) has permissive powers to undertake coast protection works under the Coast Protection Act 1949, and have historically done so, along with private landowners and the Environment Agency who also have responsibilities for managing coastal defences along parts of this frontage. In addition, Plymouth Coastal Observatory (PCO) undertakes coastal monitoring of the area as part of the South West Regional Coastal Monitoring Programme (SWRCMP).

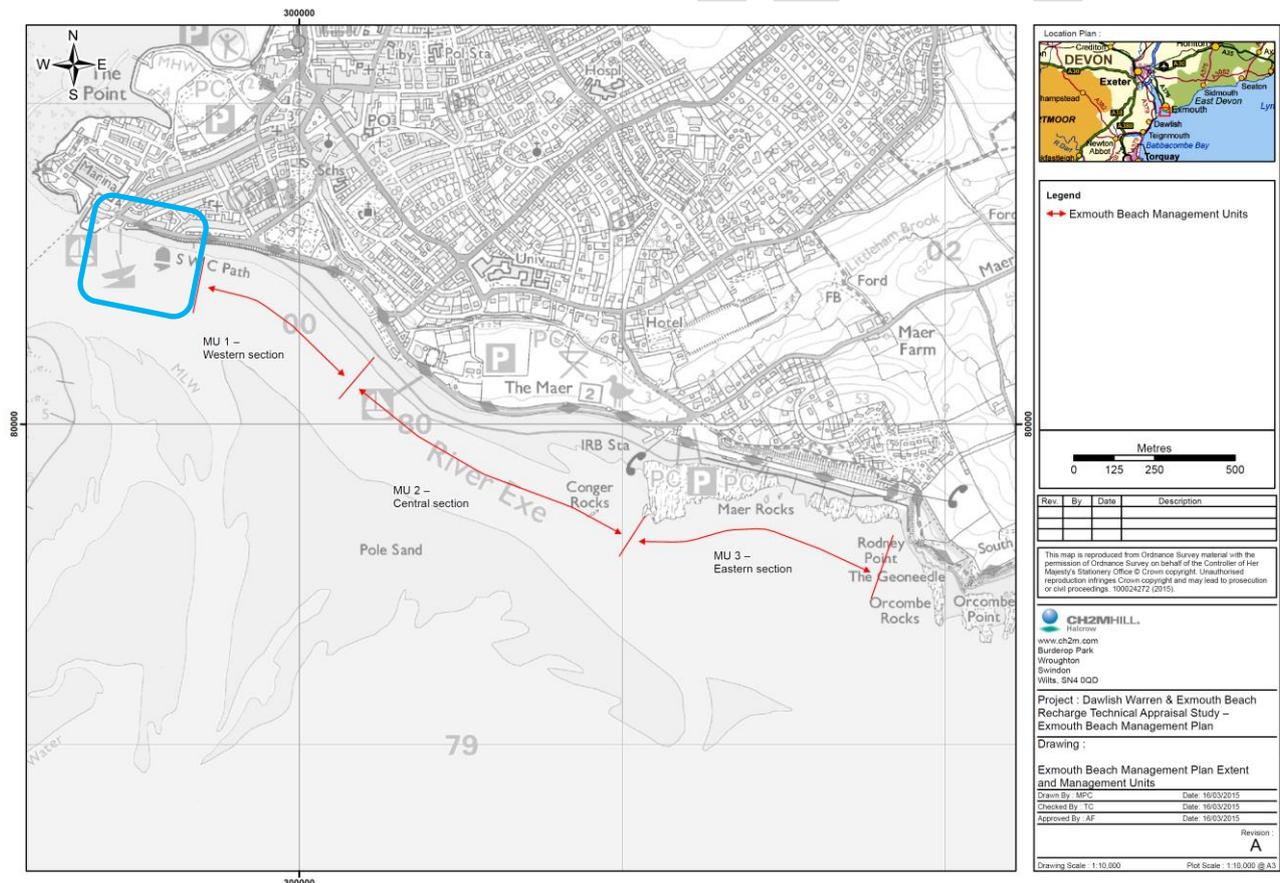


Figure 1 Exmouth BMP extent and management units defined in 2015, plus blue box showing extended BMP area to be reflected in the BMP update.

The aim of the BMP, which was developed utilising best practice contained in the CIRIA Beach Management Manual (CIRIA, 2010), is to inform, guide and assist the responsible authorities and organisations in managing the beach and associated hard coastal defences, and to ensure that the risk of coastal flooding and erosion to properties and other assets along the Exmouth BMP frontage (see Figure 2) continues to be

managed sustainably, whilst recognising and managing the environmental and amenity implications of doing so.

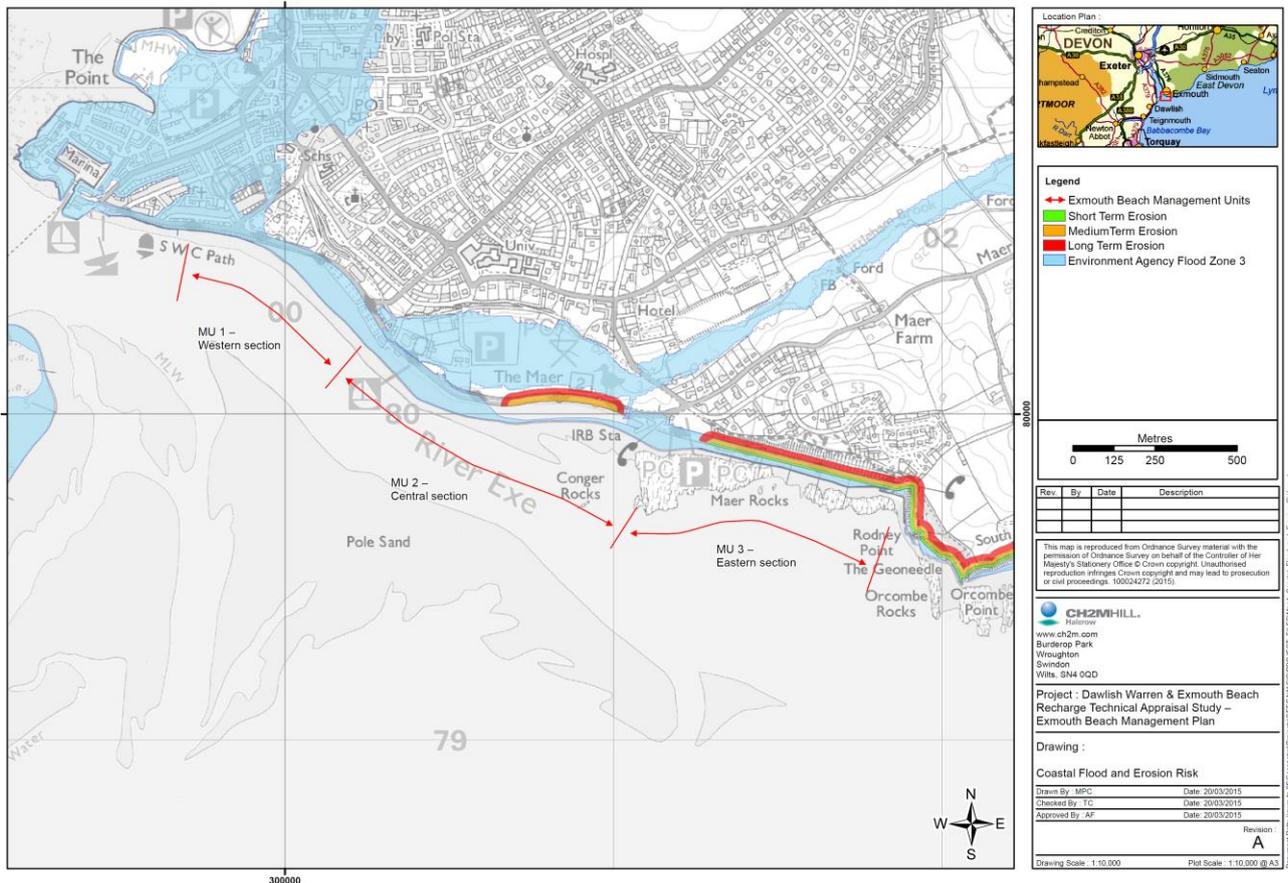


Figure 2 Areas at risk of flooding and erosion along the Exmouth BMP frontage (as defined in the Exmouth BMP, 2015).

The key objective of the Exmouth BMP is to manage the risk of coastal flooding and erosion to property and other assets along the Exmouth frontage in the immediate future by ensuring that an adequate beach is maintained in support of the hard defence/control structures, alongside adequate maintenance of the hard defence structures themselves to ensure they remain in good to fair condition.

To meet this objective, the BMP sets out the plan for monitoring and intervention to maintain the beach and associated hard coastal defences to ensure they continue to provide adequate coastal flood and erosion risk management to Exmouth in the immediate future, whilst also identifying measures to develop and implement more sustainable longer-term solutions to the management of these issues. This monitoring and intervention plan was developed in the context of providing a technically, economically, environmentally and socially sustainable management approach for the next 5 years (the BMP review period) in line with the long-term strategic coastal risk management approach adopted in 2013 as part of the Exe Estuary Flood and Coastal Erosion Risk Management Strategy (EEFCERMS), which in turn aligns to the Shoreline Management Plan policies for this frontage that are set for a 100 year planning horizon, and which aim to 'Hold the Line' of existing defence along the Exmouth BMP frontage in the short, medium and long-term.

In developing the BMP in 2015, a key finding of the assessments made as part of the Dawlish Warren and Exmouth Beach Recharge Technical Appraisal Study and the EEFCERMS, was to identify that the preferred strategic option for Exmouth Beach is to involve annual recycling of approximately 6,000m³ of sediment along the BMP frontage to commence within the next 10 years (by 2025) to increase the volume of the beach and its width along the Maer part of the frontage (BMP Management Unit 2). This would reduce the risk of low beach levels leading to undermining of the seawall and maintain the amenity value of the beach. Such recycling and recharge works would also need to be supported by ongoing maintenance of both the seawall along the BMP frontage, and of the timber groynes within BMP Management Unit 3 (Queen's Drive), with groynes eventually being replaced. However, these assessments identified that the economic viability of delivering this preferred option is dependent on EDDC attracting a significant amount of Partnership Funding as central Government Flood Defence Grant in Aid is likely to only be available for about 15% of the total cost of this option calculated as part of the EEFCERMS. A further uncertainty with the preferred option identified in the 2015 BMP is the availability of the amount of sediment to be recycled annually. Should this

quantity prove to be difficult to achieve, then alternative options will need to be considered to ensure the risk of coastal flooding and erosion along the Exmouth frontage is managed sustainably and in line with long-term strategic policy to hold the line. These alternative options would need to include consideration of construction of rock revetment and import of beach recharge from external source (possibly supported by construction of additional timber groynes). The future viability of such alternative options would in part also be determined by the amount of Partnership Funding EDDC is able to raise in the intervening years, thus further emphasising the importance of establishing funding partnerships in the immediate future. **Review and reconsideration of the funding and management options forms a key part of the Exmouth BMP update (see Section 2 below).**

Accepting these uncertainties, the monitoring and maintenance regime defined in the current Exmouth BMP is intended to guide works that are required in the immediate future to maintain existing coastal defence assets in line with the adopted preferred strategy. Monitoring is targeted at both guiding when and where these maintenance works are needed and capturing information that will be invaluable in providing evidence to advance present levels of understanding as part of future studies and BMP reviews.

This monitoring regime was also designed to ensure evidence for assessing the impacts of the Dawlish Warren Beach Management Scheme (subsequently constructed by the Environment Agency in 2017; see Section 1.2 below), which could potentially increase wave exposure along the Exmouth frontage can be captured.

1.2. Developments since adoption of the Exmouth BMP in 2015

Since adoption of the Exmouth BMP in 2015, there have been a number of developments that now need to be considered and reflected in the review and update of the BMP, as follows:

- a) There is now many more years of coastal monitoring data available from the SWRCMP. This data needs to be reviewed and analysed to further the understanding of beach volume changes along the BMP frontage, and seek to address the uncertainty highlighted in the 2015 BMP around the availability of the amount of sediment to be recycled annually. It should be noted that recent monitoring data has shown a trend of accretion at the easternmost end of BMP Management Unit 3 and within BMP Management Unit 1, but erosion along the central part of the BMP frontage (see Figure 3 below). Review of this more recent monitoring data will also allow updated assessment on the recovery of the frontage following the winter 2013/14 storms, as only limited post-storm data was available at the time of developing the 2015 BMP.
- b) Guidance datasets have been updated, including the Environment Agency's Coastal Flood Boundary data, State of the Nation data, and UK Climate Change projections (UKCP18). The implications of these new datasets on BMP trigger levels and management approaches needs to be considered.
- c) The State of the Nation data provides for multi-variate extremes analysis to inform wave overtopping analysis, and a test of the implications of this approach for calculated wave overtopping discharge rates using Exmouth as a case study site has been undertaken by the Environment Agency, summarised in the paper by Gouldby *et al* "Multivariate extreme value modelling of sea conditions around the coast of England" (Maritime Engineering, Volume 170 Issue MA1) – available online at: <https://www.icevirtuallibrary.com/doi/epdf/10.1680/jmaen.2016.16> (accessed: 26th May 2022). The information from this case study at Exmouth, along with wave overtopping analysis provided in the Environment Agency's *Exe Estuary Mapping and Modelling Study* (Mott Macdonald, November 2012), should be reviewed alongside wave overtopping analysis contained in the 2015 Exmouth BMP as part of reviewing the beach management trigger levels for Exmouth.
- d) A trial pit survey was undertaken in June 2016 to capture surveyed levels across a number of representative coastal defence cross-section along the BMP frontage, in order to address the BMP action plan #MON_001. The data from this needs to be assessed alongside review of trigger levels defined for managing the risk of undermining of the seawalls along the BMP frontage.
- e) The Exmouth Tidal Defence Scheme was constructed between 2019 and 2021 (see details online at: <https://www.gov.uk/government/publications/exmouth-tidal-defence-scheme/exmouth-tidal-defence-scheme#design-and-consultation> (accessed: 8th April 2022)). This £12m scheme included works along the western part of the BMP frontage, including the Esplanade from Mamhead slipway in the west to between the clock tower and Premier Inn to the east. Works includes improvements to the existing seawall, and new set-back defences along the landward side of the Esplanade. This will mean that areas of the Esplanade and highway will still be inundated during storms, however flood water will be stopped from flowing down nearby roads by the new defences. This scheme needs to be reflected in the BMP.

In addition, the local community have expressed concern that recent beach loss in the area to the east of Exmouth Marina may pose a residual risk of damage from wave overtopping to people, property and vehicles in this area. The BMP update should assess beach change in this area and implications for flood and/or coastal erosion risk; and the BMP MU1 boundary is to be extended westwards to the marina as shown in Figure 1.

- f) The Dawlish Warren Beach Management Scheme constructed in 2017 (see: <https://www.gov.uk/government/publications/dawlish-warren-beach-management-scheme/dawlish-warren-beach-management-scheme> (accessed: 8th April 2022), included the dredging of sediment from Pole Sands and placing it on the shoreline of Dawlish Warren on the opposite side of the mouth of the Exe Estuary from the Exmouth BMP frontage. The impacts of this dredging offshore of Exmouth was identified as having the potential to increase wave exposure along the Exmouth frontage and so also affect beach behaviour. Since 2017, there has been annual monitoring by the Environment Agency to keep the impacts of the scheme under regular review. The most recent assessment is provided in the 2021 Annual Monitoring Report and, of particular relevance to the Exmouth BMP frontage, includes analysis of changes observed since the scheme in regard to:
- Hydrodynamics (waves, tides and joint probability analysis).
 - Exmouth beach topographic monitoring, including use of the SWRCMP data between 2017-2021 (see above; Figure 3).
 - Pole Sands evolution utilising a range of LiDAR, aerial photo and bathymetry survey data collected at a number of dates between 2017 and 2021 and shows signs of movement of the ebb-tidal delta system and Exmouth Approaches Navigation Channel; which has also been reported to EDDC at the 1st March 2022 Exmouth BMP Steering Group meeting (see: <https://democracy.eastdevon.gov.uk/ieListDocuments.aspx?CId=316&MId=1854&Ver=4> (accessed: 8th April 2022).
- g) Phase 1 of the SMP-Refresh project led by the Environment Agency was completed in 2020, and produced a Health Check Report for the South Devon & Dorset SMP2. This has identified that along the BMP frontage, the SMP Management Group should progress with a formal SMP Change Process to set the policy for SMP Policy Unit 6a04 (The Maer) to be “Hold the Line”, reflecting the findings of the EEFCERMS which assessed that this is the preferred approach for this area, which the adopted SMP policy in 2011 had set as either Managed Realignment or Hold the Line subject to further studies (which the EEFCERMS subsequently undertook).
- h) The South West Partnership for Environment and Economic Prosperity (SWEEP) programme included research on assessing coastal change risks to inform development of Coastal Change Management Areas (CCMAs). One of the pilot sites used was in the EDDC area, and following the pilot, the methodology has since been applied to the entire EDDC coast to inform the development of the Local Plan update; this includes the Exmouth BMP area and data can be provided by EDDC for the BMP update. The implications of this recent analysis for the BMP assessment of coastal erosion risk and economic case for funding needs to be considered. In doing so, it will be necessary to also be aware of any changes to coastal erosion risk assessment arising from the ongoing National Coastal Erosion Risk Map Update work being led by the Environment Agency.
- i) During the period 2019-2021, beach levels dropped dramatically within the central section of Exmouth Beach, exposing Victorian beach huts and foundations of WW2 landing structures, as well as making the RNLI station unusable by the offshore lifeboat. This caused significant concern and led to calls from the public to “do something”. During 2022, a significant amount of beach volume has returned in this section. The BMP update needs to investigate the beach variability and consider the options for managing similar situations when they arise in the future.



Figure 3 Beach cross-sectional area changes along the Exmouth BMP frontage between 2007 and spring 2021 (SWRCMP Annual Survey Report Portland Bill to Exmouth 2021 (PCO, November 2021)).

2. Project Aim and Objectives

The aim of the project is to produce an updated Exmouth BMP covering the same BMP extent as shown in Figure 1, with consideration of the wider sediment system within which the BMP area is situated and in line with good practice as set out in the CIRIA Beach Management Manual second edition (CIRIA, 2010). This will ensure that the Exmouth BMP continues to be a key document guiding the management of coastal flood and erosion risk along the Exmouth frontage by ensuring that an adequate beach is maintained in support of the hard defence/control structures, alongside adequate maintenance of the hard defence structures themselves to ensure they remain in good to fair condition.

In achieving this aim, the following specific objectives are to be delivered:

- 1) Drawing upon information from recent studies and schemes in the area, coastal monitoring data and other appropriate evidence (including items outlined in Section 1.2), provide an up-to-date analysis of the coastal processes influencing coastal evolution along the project frontage. This should include:
 - Assessment of the impact of changes in the Exmouth Approaches Navigation Channel upon beach volumes, and how this varies over time;
 - Assessment of beach change immediately east of Exmouth Marina by extending the area of focus for BMP MU1 to this area (refer to Section 1.2 above (item (e)));
 - Update of the current conceptual model of sediment transport processes in the wider area; and
 - Assessment of future coastal evolution under both “do nothing” and “with present management” scenarios and implications for both coastal flood and erosion risk, as well as available beach area for amenity purposes.
- 2) Provide an up-to-date assessment of all of the coastal defence assets along the BMP frontage. This will require liaison with EDDC to align to EDDC’s asset management system, and is to include a description of each asset, assessment of current condition to T98 standards (including any public health and safety issues), assessment of residual life, and assessment of performance against wave overtopping and undermining risk both at present and allowing for latest sea level rise projections.

This should include assessment of any risk posed by low beach levels immediately east of Exmouth Marina by extending the area of focus for BMP MU1 to this area (see Section 1.2 above (item (e)). Depending on the findings, consider if it would be appropriate to extend the existing BMP boundary westwards to cover this area and if so, consider beach management options and management trigger levels and associated actions required for this area.
- 3) Review and (if appropriate) update trigger levels and associated actions as currently defined in the 2015 Exmouth BMP. To include consideration of additional wave overtopping analyses and defence toe level survey data described in Section 1.2 above (items (c) and (d)).
- 4) Assess the current coastal flood and erosion economic damages using the latest flood and erosion risk mapping data available and considering the full range of potential impacts as allowed for in the latest FCERM Appraisal Guidance and Partnership Funding Calculator requirements, to inform revised assessment of the economic case as summarised in Section 1.1. Alongside this, an assessment of wider economic damages on the local economy (i.e. a Gross Value Added (GVA) assessment) is required to demonstrate the broader case for investment beyond what can be considered under FCERM Appraisal Guidance.
- 5) Review and update information in the BMP to ensure it reflects all up-to-date plans, policies, schemes, environmental designations etc. are presented This should include engaging with the SMP Management Group to confirm latest position of addressing the 2020 SMP-Refresh Health Check Report recommendation with regards Policy Unit 6a45 (The Maer), as discussed in Section 1.2.
- 6) Drawing on updated evidence provided by completing Objectives (1) to (5), produce a clear and concise summary of the do nothing scenario for the Exmouth BMP frontage that can be used to communicate the risks to stakeholders.
- 7) Critically review and update the options appraisal included in Appendix D of the 2015 Exmouth BMP action plan in light of the updated assessments provided by completing Objectives (1) to (6). This should not only reconsider the options presented in the 2015 assessment, but also consider the following:
 - The implications of constructing a new groyne in close proximity to the RNLI slipway.

- The viability of restoring and retaining sand dunes in the vicinity of The Maer within BMP Management Unit 2, either now or at a point in the future.
- How best to reduce sand loss along the beach, and increase sand levels if possible both for a coast protection and amenity benefit.
- How best to maintain beach levels in front of the seawall.

The new options appraisal should be conducted in line with FCERM-Appraisal Guidance and assess the technical, economic and environmental appropriateness of each option at a strategic level of detail. The outcome of this options appraisal should identify:

- a) The most likely viable option that can be delivered with the funds available based on the revised economic assessment.
 - b) The best-case option which could be implemented to enhance the most likely viable option, if additional funding were to be identified/secured and the level of contributions needed to enable this to occur.
- 8) Following Objective 6, for the preferred option(s) identified:
- Produce a Habitats Regulations Assessment (HRA) and Water Framework Directive (WFD) Assessment. *NB: as it is uncertain at this time if more than a Stage 1 HRA is required, only this should be priced for in tender responses; if Stage 2 and/or Stage 3 is required, it will be dealt with via a variation to be agreed at the time.*
 - Produce a strategic level carbon calculation to estimate the potential carbon footprint of implementing the preferred option over the appraisal period.
 - Provide a forward programme of studies, investigations and consents needed to implement the preferred management approach identified.
- 9) Undertake consultation with key stakeholders at key points in the project to ensure the support of these organisations with the recommended management approach defined in the BMP.
- 10) Gain approval for the updated Exmouth BMP from EDDC cabinet and the Environment Agency.

3. Stakeholder Engagement

As stated in Objective 8, engagement with key stakeholders is required at key points in the project. This should (a) seek information/data to inform the project; and (b) seek views on the management approaches being considered in the options appraisal to aide selection of a preferred option.

To this end, the Consultant will produce a Stakeholder Engagement Plan in discussion and agreement with EDDC to guide how, when and with whom, the engagement required will take place.

It is envisioned at this time that only key stakeholders will be engaged in targeted communications and meetings, and that the wider community will be represented in this by the members of the Exmouth BMP Steering Group. For the purpose of this tender at this time, please assume the following:

- Engagement Round 1 is expected to involve:
 - The seeking of information will be by email/telephone contact with key stakeholders as required by the Consultant, facilitated where necessary by EDDC to make introductions.
 - A public drop-in event (to be organised by EDDC) to inform/raise awareness of the project with the wider-public, and gather any additional local knowledge. For this event, the Consultant should produce and print 6no. A1 boards and a comment/feedback form (with input from EDDC), that include conveying:
 - What the BMP is and how the update will be undertaken.
 - What the update is considering by way of review of options for future beach management (and what it is not).
- Engagement Round 2 is to seek views on the options appraised to aide selection of the preferred management approach(es) defined in the BMP. This is expected to involve:
 - A half-day meeting with invited key stakeholders where the Consultant will present the options appraisal and leading options to facilitate discussion. For this meeting, the

Consultant should produce a powerpoint presentation to explain the updated BMP analysis and options appraisal work.

- A public drop-in event to commence a 3-month consultation period to seek views on the leading options from the wider-public and statutory consultees. For this event, the Consultant should produce and print 6no. A1 boards and a comment/feedback form (with input from EDDC).
- After each round of engagement, the Consultant will produce an engagement feedback report setting out comments received and how each has been addressed.

The key stakeholders to be engaged with are:

- EDDC elected members
- EDDC officers*, including those in Leisure and Tourism and Planning
- Environment Agency Devon P&SO team*
- Devon County Council* (Highways and Lead Local Flood Authority)
- Natural England
- Historic England
- Devon Historic Environment Service (in relation to historic environment interests)
- Plymouth Coastal Observatory
- RNLI Exmouth lifeboat station*
- Other Exmouth BMP Steering Group Members not explicitly listed above (indicated by *).

If other groups are required to be engaged in the development of the BMP, that will be done so via members of the BMP Steering Group.

4. Required Outputs

The outputs to be produced are:

- An updated Exmouth BMP following the same broad structure of the current BMP, that sets out the management regime (including monitoring, maintenance and action plan) required to implement the preferred management approach along the BMP frontage over the next 5 years (the BMP review period) set in the context of the long-term strategic approach determined by the revised options appraisal process.
- A forward programme of studies, investigations and consents needed to implement the preferred management approach identified.
- All supporting evidence as appendices to the BMP, including baseline reports, option appraisal / development reports, Habitats Regulations Assessment (HRA), Water Framework Directive (WFD) Assessment, and carbon assessment.

The outputs of the project are to be provided in electronic format only. This is to include all reports and supporting evidence/appendices, as well any modelling files (if any) generated for the project with notes describing the files provided. A copy of all outputs is to be provided to both EDDC and the Environment Agency.

5. Data Available

Table 1 identifies data that is available to inform this project. Please note that this table is not an exhaustive list and that EDDC will provide data listed that is theirs to provide; the Consultant is expected to make best endeavours to obtain the other data listed and any that is not listed but is appropriate/relevant to this project.

Any critical data required but not available is to be identified to EDDC at the earliest possible stage so options for addressing gaps can be considered and implemented in a timely manner that minimises programme impacts.

Table 1 Available data and data sources (not exhaustive) to inform the Exmouth BMP update.

Data	Source
Coastal monitoring programme data including: annual reports, beach profile surveys, LiDAR, aerial photography, wave records (Dawlish Warren), and bathymetry survey data.	SWRCMP / Plymouth Coastal Observatory www.coastalmonitoring.org
Bathymetry surveys of the Exmouth Approaches Navigation Channel	Exeter City Council
Exmouth tide gauge data	Environment Agency
South Devon & Dorset Shoreline Management Plan (SMP2) (Halcrow, 2011) (<i>SMP2 policy plus supporting appendices</i>)	https://southwest.coastalmonitoring.org/resources-2/sdadcag-smp2/
SMP Refresh Health Check Report for SMP16	Environment Agency / SMP16 lead (Graeme Smith, Teignbridge District Council) – to request via EDDC
Exmouth BMP (2015)	https://eastdevon.gov.uk/beaches-harbours-and-coastal-information/coastal-protection/beach-management-plans/exmouth-beach-management-plan/read-the-exmouth-beach-management-plan/#
Exmouth 2016 trial pits (survey drawings)	EDDC
Exe Estuary Mapping and Modelling Study (Final Report and associated files); Mott Macdonald, November 2012	Environment Agency (to provide under licence – contact Martin Davies and Kris Inch)
Gouldby, B., <i>et al</i> (2017). Multivariate extreme value modelling of sea conditions around the coast of England. Proceedings of the Institution of Civil Engineers, Maritime Engineering 170, March 2017, Issue MA1, Pages 3–20.	https://www.icevirtuallibrary.com/doi/epdf/10.1680/jmaen.2016.16
Exmouth – Summary of Data/Studies (March 2022)	EDDC
Exmouth Tidal Defence Scheme information	Environment Agency
Dawlish Warren Beach Management Scheme information	Environment Agency
Dawlish Warren Beach Management Scheme Annual Monitoring Reports (various; most recent is 2021).	Environment Agency
Minutes and recording of the Exmouth Beach Management Plan Steering Group held on 1 st March 2022.	https://democracy.eastdevon.gov.uk/ieListDocuments.aspx?CId=316&MId=1854&Ver=4
EDDC Local Plan 2013-2031 (Adopted in 2016)	https://eastdevon.gov.uk/planning/planning-policy/local-plan-2013-2031/
EDDC emerging Local Plan update information <i>NB: this includes the CCMA data produced for EDDC following the SWEEP project by University of Plymouth. Depending on when this data is published, provision of this data for the BMP update will need to be discussed with EDDC planners at the time of request to clearly understand any constraints that may be placed on use of this data.</i>	EDDC Planners

Data	Source
Environmental information (including: Designated features, historic features, non-designated archaeology, water quality)	Natural England, Historic England, Devon Historic Environment Records Centre, Environment Agency, Devon Wildlife Trust
SCOPAC Sediment Transport Study (New Forest District Council, 2017)	https://www.scopac.org.uk/sts/
Latest Climate Change Guidance and Data for Coastal Risk Management Authorities	Environment Agency; UK Climate Projections
Latest Coastal Flood Boundary and State of Nation Data	Environment Agency

6. Programme

The project is expected to commence in April 2023 and is to be completed by end of September 2024 at the latest.

A realistic programme to achieve delivery in this time frame is to be provided by the Consultant, which is to include:

- Three weeks for Client review of draft outputs at key stages in the project.
- Four weeks after engagement round 1 for final comments to be provided.
- Twelve weeks (3 months) in total for statutory consultation on the appraisal of short-listed options in engagement round 2. As part of this, allow for twelve weeks for engagement with statutory consultees in the HRA and WFD assessments.

7. Project Governance

The project will be overseen by a Project Board consisting of the following members:

- Andrew Hancock (Project Executive, Streetscene Service Lead)
- Tom Wood (Senior User, EDDC – Operations Manager)
- Harriet Googe (Senior User, Environment Agency –Coastal Officer, FCRM Devon)
- Cllr Paul Millar (Steering Group Chair, EDDC Councillor, Exmouth Halsdon ward)

The Project Board will also be attended by the Client Project Team, which is comprised of:

- Tom Buxton-Smith EDDC – Engineering Projects Manager
- Louis Hoyle EDDC– Projects Engineer
- Pete Blyth EDDC – Beach Safety Officer
- Beth Sharp EDDC – Stakeholder Communications lead)

The Client Project Team will be the day-to-day point of contact for the Consultant project manager.

The Consultant Project Manager and Project Director (Senior Supplier) are also expected to attend Project Board meetings.

Figure 4 summarises how lines of communication will operate with the Consultant in relation to the project governance arrangements.

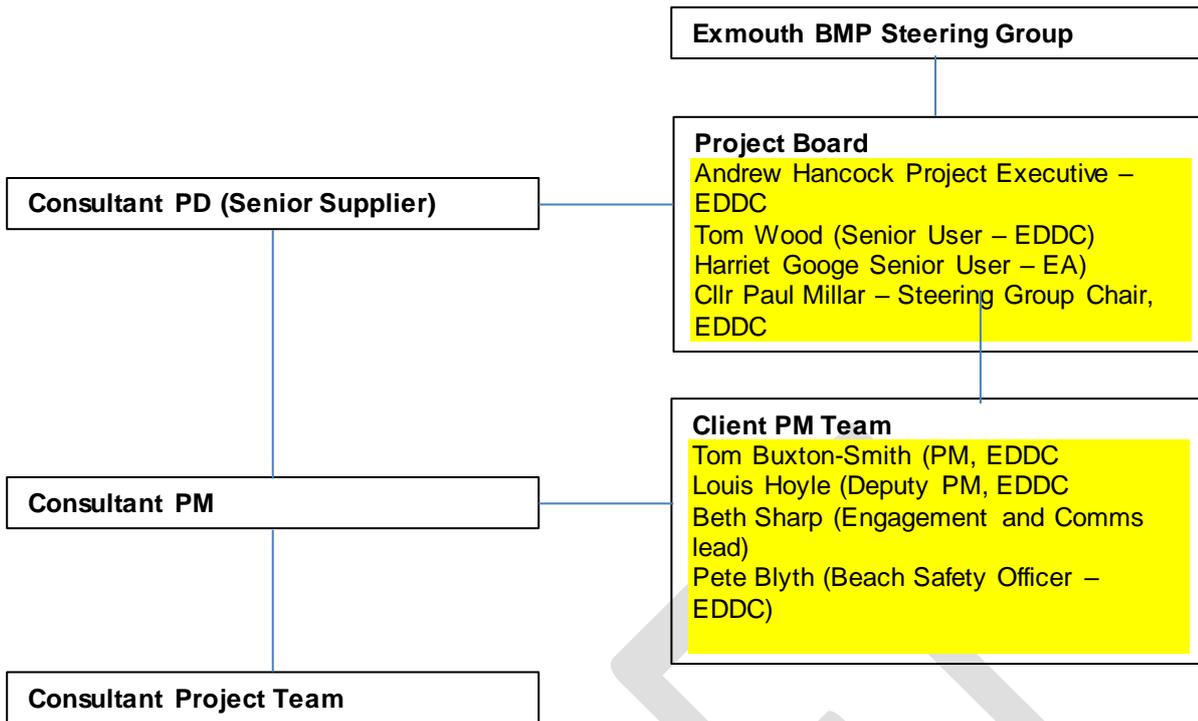


Figure 4 Organogram showing project governance arrangements

8. Consultant's Project Team

Details of the Consultant's proposed project team for this study should be submitted with the tender and should include all key personnel and sub-consultants together with their identified responsibilities within the project and relevant experience and qualifications.

Key personnel to be identified by the Consultant are:

- Project Director (Senior Supplier)
- Project Manager
- Lead Coastal Engineer
- Lead Coastal Scientist
- Environmental Lead
- Economics Lead.

9. Project Management Requirements of Consultant

The Consultant is required to deliver the following by way of project management for this project:

- Attend a project inception virtual meeting with the Client Project Team and Project Board to be held using MS Teams.
- Attend a project introduction virtual meeting with the BMP Steering Group to be held using zoom (EDDC to organise).
- At the start of the project, attend a site visit with the Client Project Team.
- Provide monthly progress reports to the Client Project Manager, detailing progress in period, planned activity in next period, financial status, updated programme and updated risk register.
- Attend monthly virtual progress meetings with the Client Project Team, to be held using MS Teams.

- Attend 3no. Project Board meetings over the course of the project ((i) inception (see point above); (ii) once completed Objectives (1) to (6); and (iii) once to present draft options appraisal/leading preferred option(s) (assume virtual meetings held using MS Teams).
- Attend 1no. virtual meeting of the Exmouth BMP Steering Group to present and take questions on the draft BMP (date and time to be confirmed, but expect to be during the 12 week consultation period).
- Attend and present the final BMP to a meeting of EDDC's cabinet (date and time to be confirmed).

DRAFT