

Newgale Adaptation Strategy Plan

Strategy Report

Pembrokeshire County Council

7 March 2017

Notice

This document and its contents have been prepared and are intended solely for Pembrokeshire County Council's information and use in relation to the Newgale Adaptation Plan Strategy Report.

Atkins Ltd. assumes no responsibility to any other party in respect of or arising out of or in connection with this document and/or its contents.

This document has 31 pages including the cover.

Document history

Job number: 5147092			Document ref: DG04			
Revision	Purpose description	Originated	Checked	Reviewed	Authorised	Date
Rev 0.95	Draft for consultation	GG (RHDHV)	WR	RM	DF	7/3/17

Table of contents

Chapter	Pages
1. Foreword	4
2. The need for change	6
3. Objectives	8
4. Option choices	12
5. The Adaptation Strategy Plan	13
6. Governance and Development	18
Appendices	20
Appendix A. Action Plan	21
A.1. Action Plan – Flow Diagram	22
A.2. Action Plan	23
Appendix B. Adaptation Management Map	28
B.1. Existing Features Map	29
B.2. Adaptation Management Map	30

1. Foreword

The only way to predict the future is to have power to change the future (Eric Hoffer – American Philosopher 1964)

Change

Transformation and change are essential aspects of nature, especially at the coast. As change occurs in nature, we have choices as to how we respond. With the challenges we now face, with climate change and sea level rise, the need to face these challenges becomes more crucial. We need to be thinking further in to the future so that we are not forever having to radically alter the way in which we interact with our landscape.

Change can be disruptive and almost inevitably, in starting the process of change, there will be disruption. This impacts on communities and on individuals. However, with planning, our ability to adapt in the future becomes incremental.

We need to face up to the difficult issues of the present. We need to take the opportunity this then creates to plan for a more sustainable future.

“Central to this approach is the principle that adaptation cannot be solved through a single action, but is rather a process to be managed over time.”

What is changing in Newgale?

Newgale is a scenic coastal village with a population of 51, situated to the back of a long sandy beach in Pembrokeshire, Wales. Located at the edge of a small valley, it has always looked out to St Brides Bay, the sea, the beach and natural surroundings being the essence of Newgale’s life and identity. Locals and visitors enjoy the coastal beauty throughout the year; walking, running, surfing or just enjoying the natural setting.

This close relationship means that as the sea and the beach change, so the village has had to adapt. This has become more critical in recent years as it becomes evident that maintaining the A487, the road running along the frontage behind the shingle bank, becomes more difficult and as, in the future, the risk to properties within the valley increases.

Unlocked opportunities for Newgale

Rather than merely reacting to such change, Pembrokeshire County Council is working with the community and other stakeholders to take a more planned approach, using the need to reposition the road as a catalyst for positive planning constructive change. This Adaptation Strategy Plan has to be a joint effort unlocking opportunities and setting out an action plan.

For this strategy to be sustained over time the community needs to play a lead role in making things happen – adaptation needs to be driven by ideas emerging at a local level. The Plan aims to encourage and empower individuals and groups to lead the adaptation process and take decisions on what should be done and when, providing a structure and framework. Central to this approach is the principle that adaptation cannot be solved through a single action, but is rather a process to be managed over time by the community, for the community. The timeframe for adaptation will span current and future generations.



The purpose of this document.

This document is one of three prepared in developing the Adaptation Strategy Plan.



The Adaptation Strategy Plan

The study has been managed by Pembrokeshire County Council and is supported by The Pembrokeshire Coast National Park Authority and Welsh Assembly Government, with involvement from:

- Local Action Groups
- Local businesses
- The National Trust
- Natural Resources Wales

Structure of the Adaptation Strategy Plan

Three different documents shape Newgale's Adaptation Strategy Plan:

- I. Strategy Report
- II. Action Plan
- III. Adaptation Management Map

This Strategy Report presents the case for adaptation, setting out underlying principles and evidence, describing the process and examining options. From this the Strategy Report a managed route of actions are identified for a way forward, for the community to establish as responses to the changing landscape.

The Action Plan describes how the actions could be implemented over time and clarifies the roles and responsibilities of organisations and individuals to empower the community to manage the change in their village.

The Adaptation Management Map links the spatial dimension of Adaptation Strategy Plan with the actions to be managed over time in response to a changing landscape.

Coastal adaptation

Coastal adaptation is a new concept in Wales and in the UK. Sea level rise begins to put some coastal communities at high risk, Newgale not being the first – and certainly will not be the last – place where adaptation measures need to be taken. In this Plan adaptation is looked at from the more ambitious angle of the opportunities that gradual change may expose.

Communities of all sizes will acknowledge that climate change, sea level rise, biodiversity loss and resource shortages are going to have major impacts on most people, and the level of engagement to involve people in solving these challenges will be two or three times higher than it is now.
(Andy Middleton, TYF 2013, South Wales Business Review)

2. The need for change

Natural processes

Located within Pembrokeshire Coast National Park, Newgale's attractiveness is all about interaction with nature. The environment is constantly being shaped by natural processes such as rainfall, wind and waves. As a result of climate change these are becoming more extreme – more intense rainfall, strong winds and severe sea storms becoming more frequent. For many coastal communities, however, the biggest impact comes with sea level rise. In Newgale the joint action of sea level rise and more extreme storms is changing the coastline.

The village's frontage gains vital protection from the shingle bank backing the beach. Maintaining this natural defence and holding the current line against natural forces will become increasingly difficult. The frontage is exposed to continuous erosion and the process is exacerbated during big storms. A number of studies have been undertaken to assess the existing trends in coastal processes and the analysis shows that the shingle ridge is naturally trying to move backwards at a rate of 0.25m to 0.5m/yr on average. By attempting to fix the position of the ridge, with sea level rise, will result in damage to the ridge and the pressure to retreat will increase. Fixing the line of ridge would eventually result in the loss of the beach.

The Brandy Brook watercourse winds through the valley and currently discharges into the beach after flowing below the A487. The lower valley is a wide plain with areas being wet most of the time. Some other areas, including the camping and caravan park are frequently flooded after heavy rain. Hydraulic models anticipate that larger areas of the valley will get wet more frequently; either with fresh water flowing down the brook or saline water due to increased wave overtopping. The landscape will change.

Human response

In reaction to this changing environment which challenges the status quo, people need to take decisions. The actions taken generally depend on the magnitude of change – subtle variations are easy to accommodate day by day while extreme events may need large scale interventions. In some cases, the accumulation of small changes over a long period of time leads to a turning point when it is obvious that a big decision is required.

Such a threshold has been reached as the resilience and stability of the shingle ridge showed signs of being compromised. For the last 20 years it has been accepted that the ridge would be overtopped on occasion and pebbles would be lost from the crest blocking the road. The response has been that every time this occurred, shingle was removed from the road and hinterland and the crest and width of the ridge was rebuilt, as near as possible to the original profile. This strategy addressed the immediate problem but at the cost of a more and more deteriorated integrity of the ridge.

At some point in time the accumulated damage to the bank together with sea level rise means that the feature is no longer able to protect the road against even less severe storms.

Pembrokeshire County Council and the National Parks' joint approach to change

Pembrokeshire County Council perceived the need to act on the road as a catalyst and initiated, in 2015, an Adaptation Plan that set up a number of adaptation objectives and actions. It also recognised Pembrokeshire Coast National Park, the planning authority, as a key partner for adaptation in Newgale. All relevant information and documents have been made public and a number of open information sessions have taken place along the process to raise the awareness of the local community and take their comments on board. Whilst the County Council can take action by providing a new road, it is not within their remit to re-plan and reshape the village of Newgale. A response to coastal adaptation issues has to come from land owners. The community will have to work with land owners, through the emerging changes to the landscape. To assist the community with this process, this Strategy Plan has been commissioned by the County Council working with the National Park Authority and the community to map the actions moving forward.

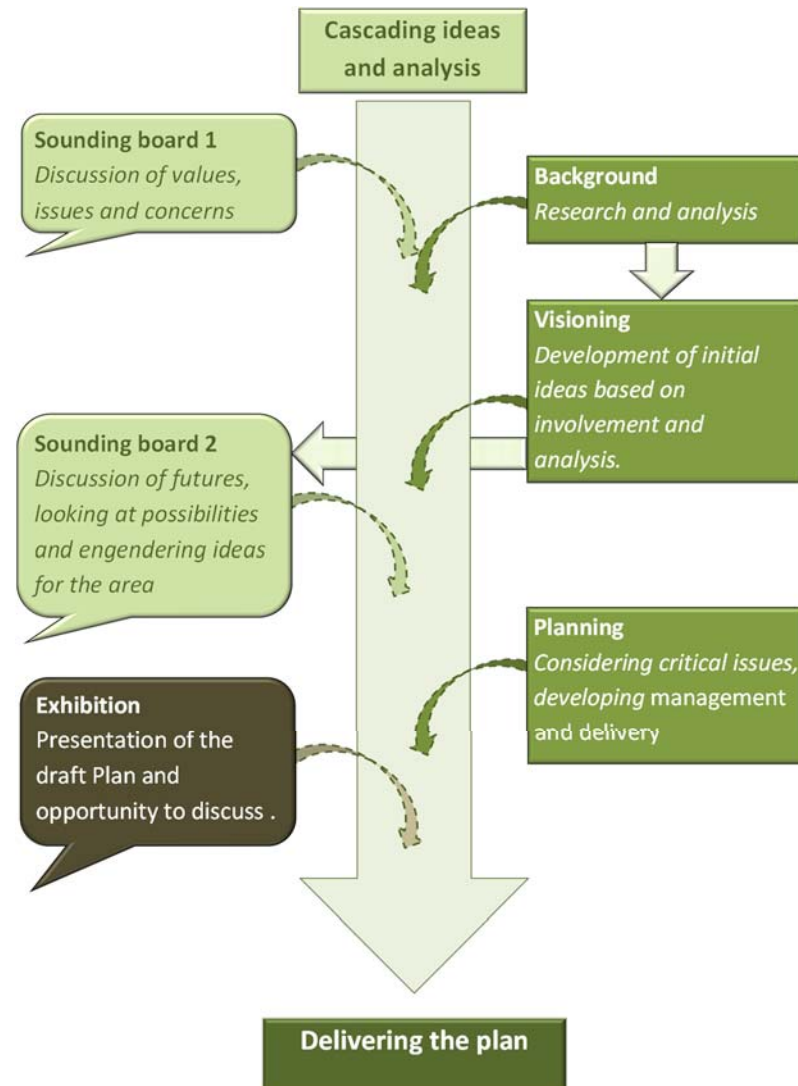
The primary goal is to look to the long term as well as assessing present needs, ensuring sustainability of the village. But also, and taking an innovative approach, to turn problems into opportunities accepting change and moving forward working with this change. The Adaptation Strategy Plan plays an important role in guiding the community through uncertainty, towards an agreed and planned vision for the future.

Developing an Adaptation Strategy Plan for Newgale

Taking early action to adapt to coastal change can open a range of new opportunities for the village. The Adaptation Strategy Plan aims to identify these opportunities and connect them with the needs and desires of the local community in terms of spatial, social, economic and environmental aspects. Local stakeholders have been invited along the process to participate and contribute to the shaping of the Plan in two open sessions or sounding boards.

Sounding Board 1 identified the values and attributes that are most important to the community, and which they wish to preserve through adaptation, as well as current issues and future concerns. The results of this session were the foundational objectives structuring the Plan.

Sounding Board 2 focused on the discussion of spatial extents of intervention and further identified what would be acceptable and what could never happen, based on local knowledge. All this information fed into the development of the present Plan, articulated in three documents: Strategy Report, Action Plan and Adaptation Management Map.



3. Objectives

A local picture of Newgale

The Plan has been developed with and for the local community through active discussion and involvement throughout the process. This Plan will, however, need to evolve and be updated as the Community take forward the management of change. The Plan has to be a continuing process.

The starting point for adaptation is to understand the key elements and factors make Newgale the place it is, how they relate to each other and how they could be affected by change.

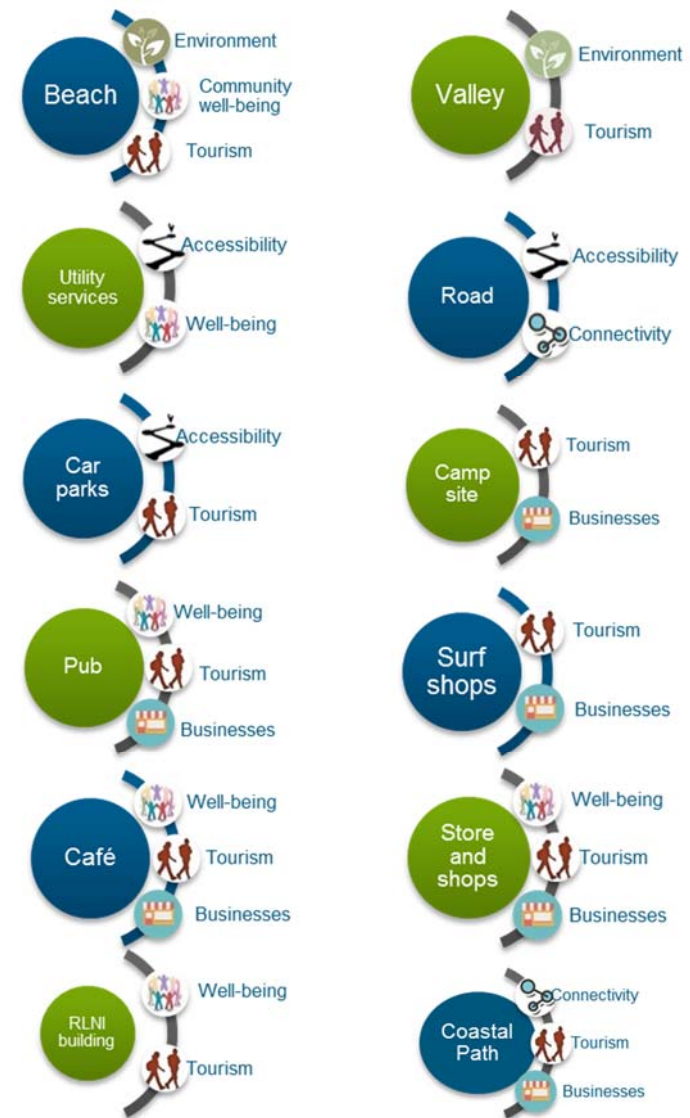
A SWOT (Strengths, Weaknesses, Opportunities and Threats) analysis was carried out in early stages and additional local knowledge from neighbours and other local stakeholders was collated during two open sessions (Sounding Boards 1 and 2).

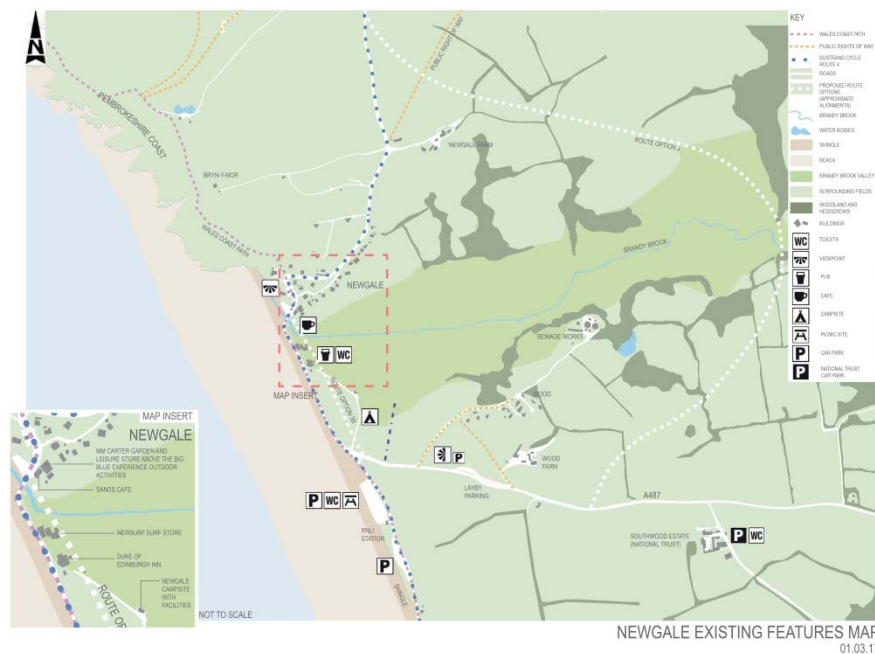
The feedback from these meetings helped to identify some recurrent topics in terms of values, concerns and potential opportunities. Some of the key values highlighted were:-

- The importance of 'The View' as you arrive on the A487
- That any interventions continue to be low key, with landscape quality taking precedence; and
- Access to the beach and the coastline is maintained.

These highlighted attributes mirror the Pembrokeshire Coast National Park purposes - conserving the natural environment, promoting opportunities for enjoyment of the area, and in pursuit of the Purposes, considering the economic and social well-being of the local community. This is a positive framework within which developing ideas for the future can come forward.

Alongside this, key features of the area were identified. These features contribute in different ways to the functioning and activity of the village and the area of the Newgale valley and sea front – often relating to multiple areas of village activity.





These features contribute in different ways to the functioning and activity of the village and the area of the Newgale valley and sea front.

	Connection to and from the rest of Pembrokeshire	Physical and functional links north-south	Accessibility to the beach	Maintaining and enhancing the environment	Community Well-being					
					Sustaining business opportunities					
					Supporting tourism					
	External connectivity	Internal connectivity	Accessibility	Landscape	Social	Goods supply	Recreation	Catering	Accommodation	Attractive
Beach	-					-				
Valley	-				-	-			-	-
Road				-	-	-	-		-	-
Bus service				-	-	-			-	-
Car parks				-	-	-			-	
Pub	-			-			-		-	
Cafe	-			-			-		-	
Campsite	-			-	-		-			
Surf shops	-			-	-	-				
Coastal path										
Stores/shops	-			-	-					
RNLI station										

A vision for the future

Based on this analysis, a number of fundamental themes emerged during the conversations with the community, but all within an emerging vision for the future:-

The residents of Newgale want to continue to live within an outward looking, active community that sustains business, engages with tourism and embraces the changing natural landscape. They seek to maintain its connection to the beach and ensure that connectivity between the north and south parts of the village is not compromised as a result of coastal change.

Community vitality has been continuously highlighted as a priority for the village. The local community values being part of a vibrant destination for visitors that bring dynamism to the area and contribute to sustain facilities and recreational activities. The concern of not becoming a quiet “dead-end” was recurrently raised during community involvement sessions. This primary ambition has been translated into a number of specific objectives in the Strategy:

Adaptation Objectives

- Ensuring connectivity with the rest of Pembrokeshire
- Maintaining physical and functional links between northern and southern edges of Newgale
- Maintaining connection to the beach
- Maintaining and enhancing the natural environment
- Sustaining community well-being and empowering locals to take a lead role in adapting to change.
- Sustaining of business opportunities
- Supporting tourism



Ensuring connectivity with the rest of Pembrokeshire

People in Newgale like to see visitors coming to enjoy the village. Its location along the A487 Haverfordwest to St. David's road provides a regular flow of vehicles passing by and stopping to enjoy the view. Access to and from the rest of Pembrokeshire is also possible by public transport; a bus service passes through Newgale several times a day. The road provides quick accessibility to emergency and more conventional services, as well as commuters working or living in Newgale. The Wales Coast Path (Pembrokeshire Coast Path) and National Cycle network route also contribute to this accessibility. The Strategy recognises the risk brought by coastal change in terms of accessibility and proposes a number of adaptation actions.



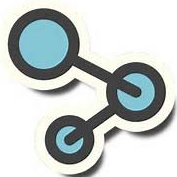
Maintaining and enhancing the natural landscape

A firm ambition to preserve the environment and natural beauty of Newgale has been highlighted by the local community over the consultation processes. Adaptation, and particularly the relocation of the road, could bring further opportunities for the enjoyment of natural features and is one of the objectives of the Strategy.



Sustaining community well-being and empowering locals to take a lead role in adapting to change.

Community well-being is the combination of liveability and engagement. A liveable community is one that offers the necessary infrastructure and services to address people's daily needs, while an engaged community fosters interaction, social bonds and participation in decision making. The Adaptation Strategy Plan aims to set up a framework within which residents can drive the development of Newgale as change takes place, enabling the local community to take ownership and responsibility for the actions taken.



Maintaining physical and functional links between northern and southern edges of Newgale.

Most of the village is located behind the northern edge of the beach, where car parking facilities are very limited. A large car parking area to the south represents a second pole of activity during the high season, when it fills with visitor cars, with the camp site, the Duke of Edinburgh and a shop taking the space in between the two edges. The local community raised the concern of losing this connectivity and interaction between both poles as the A487 is relocated and the shingle ridge rolls back. The Plan takes this issue on board and proposes potential options to maintain this important connection.



Sustaining business opportunities

Local businesses offer essential services and functions to residents, neighbours and visitors that need to be looked after. The Strategy identifies those cases where these may be at risk and explores opportunities to sustain their provision in the future.



Maintaining connection to the beach

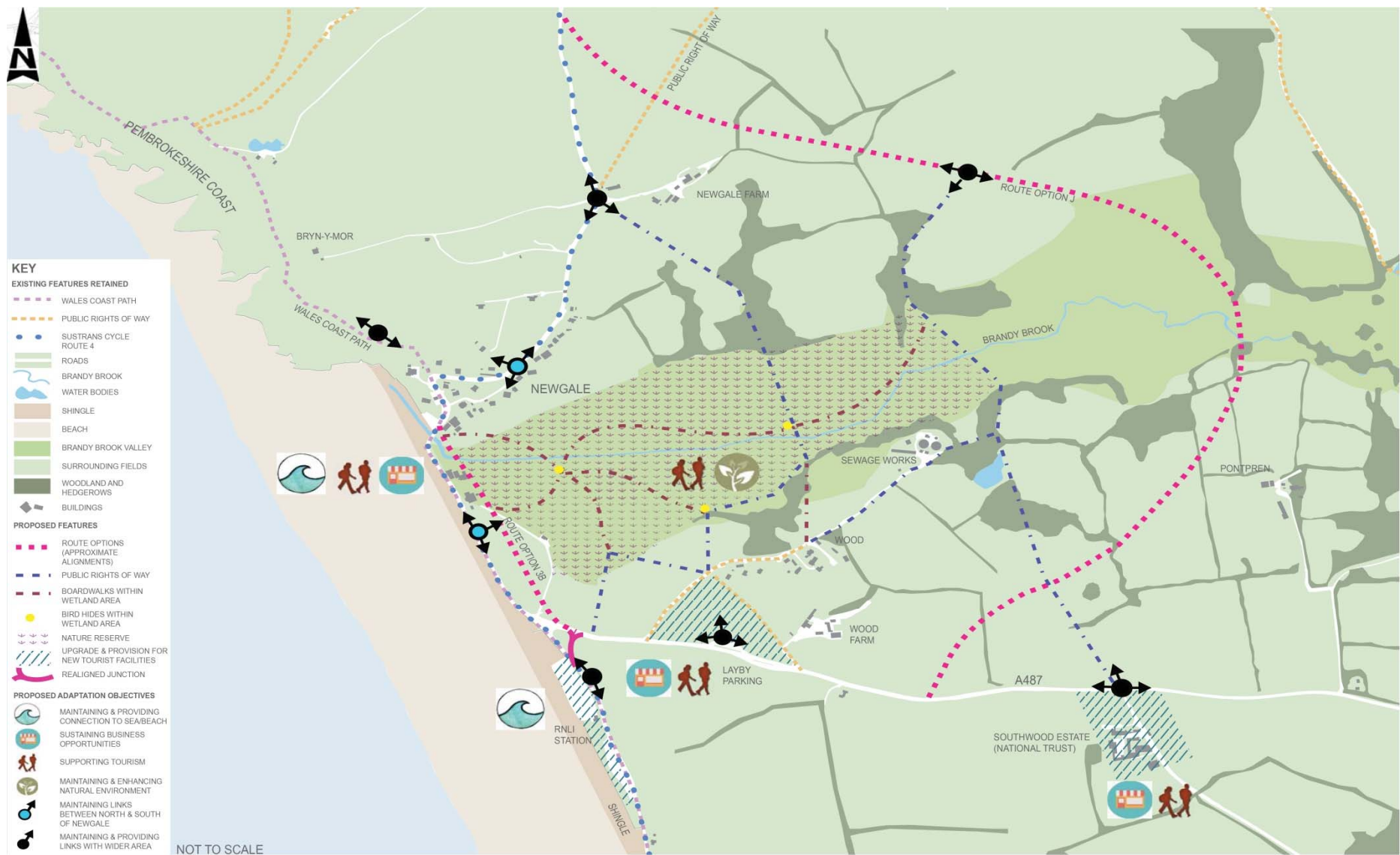
Newgale beach attracts thousands of visitors and locals every year and forms an essential part of the village's identity. A second fundamental objective is to safeguard the physical and scenic enjoyment of the beach, by looking at things like accessibility to the beach over time and the maintenance of recreational assets and facilities.

Supporting tourism

Tourists bring diversity, activity and income to the area. Residents of Newgale are conscious that a dynamic village helps to attract young people, business opportunities and services. It is important that tourism features and attributes are recognised and play a role in the decision making process for adaptation in the long term.



These objectives form the basis for the Plan, creating a different landscape for change and allowing the development actions required in taking this forward.



NEWGALE ADAPTATION MANAGEMENT MAP
01.03.17

4. Option choices

Change will happen, whether we plan for that change or not! The shingle bank across the valley has been trying to move landward and management of this critical feature, while maintaining the use of the road for the present, is becoming more difficult.

Options to hold the line of the shingle ridge have been considered but would impose significant and substantial change with higher, hard and artificial defences. Such a response to change, as well as radically altering the nature of the area, reducing access to the beach and eventually affecting the beach itself, would, in imposing these changes, affect the use of the area and the setting of the village. This option has been rejected because of these impacts.

The immediate response to the decision to allow the shoreline to respond naturally has been to look at options for relocation of the road. Two options are being considered in more detail. The first is to construct a viaduct across the valley, set back from the existing line of the road. The second is to take the route of the road further inland. The decision on which route is finally adopted is being developed through a separate consultation process (WelTAG).

The decision to move the road (irrespective of the route finally chosen) and the decision to allow the coast to respond naturally leaves us with the need to plan how the implications of these changes are managed.

The existing road will remain for the present and it will continue to be cleared and maintained as it has been up until now. It may take between five to ten years before a new road is in place. After that, the intention is to reduce maintenance of the existing road and eventually the road will be lost under the shingle bank. Quite probably this would actually occur as a result of a storm, when it would be decided that the road would not be repaired or cleared.

There are important businesses behind the road. With the decision to allow the coast to function naturally, these will be affected. Over the next twenty years maintaining the pub, The Duke of Edinburgh, and the Surf shop and school, will not be possible. Both properties and businesses will be more regular flooded and, eventually, they will be within the area of shingle as the bank moves landward. In a very severe storm, as at present and as has happened in the past, these properties may be damaged. Clearly the loss of the road will also impact on these businesses.

The campsite, which is already flooded during heavy rainfall, will also be affected by the decision to allow the shoreline to function more naturally. There will be increased rates of wave overtopping. Gradually, some areas of the campsite, those closest to the road will be covered by shingle.

The small, private car park within the village will also be under greater threat of flooding, as will the lower car park to the south.

The vision for the area, as set out earlier, requires significant investment and commitment from the community supported by various agencies and organisations, including Pembrokeshire Council and Pembrokeshire Coast National Park.

In planning for change, the Adaptation Strategy Plan cannot address the issues of individual loss. It does, however, have to look at the broader community issues and impacts. It has to consider what changes may affect the use of the area and how basic services may need to be sustained. It has to look at opportunities for improving the use and services to facilitate how change is allowed and managed.

The Adaptation Strategy Plan cannot impose change but needs to set a framework within which positive changes may be made and future decisions can be made.

5. The Adaptation Strategy Plan

The coast in Newgale is changing and it is possible to anticipate the general consequences of this change in 20-30 years' time. It is not possible to predict, however, at which specific moment in time a large storm will hit the frontage. Since this Adaptation Strategy Plan aims to facilitate the process of adaptation over a long period of time it needs to follow a flexible approach. This framework is set out as a pathway, identifying where and when decisions and actions now need to be taken.

Timescales and Adaption Planning

The concept of 'adaptation pathway' refers to a decision strategy based on a sequence of manageable steps over time, each of which is triggered by a change in environmental or social conditions.¹ These triggers are tipping points, i.e. points in time when decisions will have to have been made.

In detail, therefore, each decision point becomes critical to progressing the Plan. Decisions may be dependent on external factors such as landownership, planning decisions and of course funding. As such, discussions need to be held in advance, developing the evidence that supports the decision and any action or implementation on the ground. Clearly, from this, the Plan may need to evolve.

The essential feature of the Plan, however, is to progress towards the overall vision for use and function within the area. In detail, there may be changes in what may be achieved. Certain decisions relate to critical functions such as maintaining access and services to sustain the village. Other outcomes provide opportunities, such as development of alternative tourist facilities to the south of the valley. Each contributes to the overall delivery of the vision but in different ways and are dependent on different external factors.

Trigger Points

Three triggers have been established for the purpose of this Adaptation Strategy:

Opening of the new road: this event will mark a tipping point in that the maintenance of the 'old' road is no longer a priority and it is likely that there will be a change in the management strategy of the shingle ridge.

Following from the opening of the new road, decisions will need to be made as to under what conditions further clearance of the existing route is undertaken. To a degree this will depend on actions have already been put in place in relation to specific features and functions within the area. It should also be noted that the construction of the new road will create opportunities for use of in fill material and associated engineering works.

Failure of the shingle ridge: the failure of the ridge will result in the 'old' road and potentially areas behind the road being covered with shingle and more exposed to flooding from the sea. This ultimately triggers the change of use within the valley, where current uses become unsustainable triggering the need for possible development elsewhere and where alternative arrangements are in place to ensure connectivity between the north and south of the valley is maintained.

Operation and future management: this point marks the point in time when the new configuration of the area is in place.

In effect this defines three stages of implementation. The **Immediate** need to develop and agree aspects of the Plan, the **Transitional** period during which aspects of the Plan need to be in place and the **medium to long term** management.



¹ A local coastal adaptation pathway, J.Barnett et al. – *Nature Climate Change*, 2014
DOI: 10.1038/NCLIMATE2383

Adaptation Narrative

The Village

At the point at which the new road is opened, decisions will need to be made with respect to the existing road – to what degree the existing road is maintained and at what point, or following what scale of event, will shingle no longer be cleared from the road. In any event, at some point in time, vehicle access along the existing road will be lost.

To a degree the impact on the village will depend on the route of the new road.



Considering in-land routes for the new road, the road down through the village will become a dead end. Even under Route 3B, there would be the need to take the road at a higher level through the lower part of the village. Both routes potentially have an impact on provision of services, such as the bus service, refuse collection or delivery vehicles.

Access to the lower car park will be more difficult and as the coast sets back over time this car park will be more prone to infilling with shingle. Coupled with the longer term loss of the car park areas associated with the Pub and surf school (the valley parking), space in this lower part of the village will become increasingly constrained.

There is the potential to raise the small private car park. This option needs to be developed further in conjunction with identifying other potential areas of opportunity. Critical to this will be discussions with service operators, landowners and PCNPA, establishing the need, requirements and the viability. It is anticipated that suitable fill material would be available during construction works for the road realignment. To take advantage of this, discussions and decisions would be required immediately (typically over the next 2 to 3 years).

Alongside this, there may be opportunities to improve beach access, potentially making use of the existing bridge, which under the Plan becomes redundant. In the short term, during the transitional phase of the Plan, access to the Pub and surfing school will become limited and access from the bridge through the

northern end of the valley parking area may become an option. Clearly, this would be more critically dependent on the selected route of the new road and management to clear shingle from such an access would need to be agreed with PCC.

How such an overall approach might be developed, to the lower part of the village, needs to be discussed within the community, led by the community, in association with landowners, businesses and planning and operating authorities. The opportunities in creating space within and use of this lower part of the village potentially:

- Addresses the need to maintain wider connectivity.
- Maintains and improves local access to the beach.
- Provides a possible way-point on the Coastal Path, linked to businesses within the village.
- Supports existing businesses within the valley over the short term.
- Support connectivity between the north and south of the valley.
- Supports possible increased use of the valley, as part of a circular pathway.

More generally, developable space is an issue within the village. As we move through the transitional period of the Plan, the use of the pub will be lost as a focus for social gatherings. It seems unlikely that like for like replacement would be achievable within the village. However, the wider scale need for change may be the catalyst for considering establishing some alternative village centre, within the existing community.

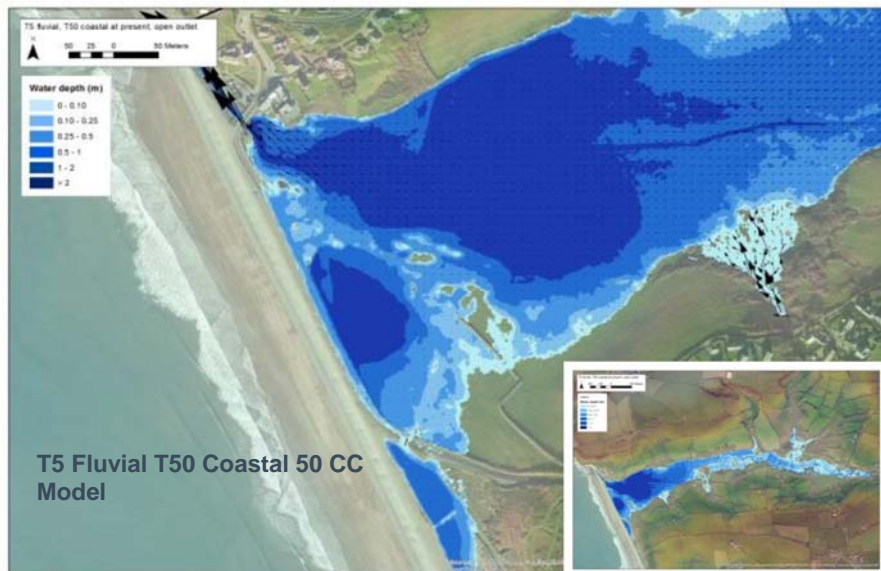
Such considerations might be tempered, however, by suggested development elsewhere within the area, subject to emerging planning policy within the Local Plan.



The Valley

It is within the valley that the most significant change occurs.

The road is lost to vehicle use over the next ten to twenty years. Change in the position of the shingle bank threatens the use of the two businesses and use of their car parks. The campsite would in part be subject to increased deposition of shingle and a larger area would be subject to more frequent flooding due to increased wave overtopping and potentially due to retention of water within the valley.



Associated with these changes, with increased overtopping and pooling of water within the valley, there would be opportunities to enhance the natural value of the area.

Over time, these opportunities include creation of wet woodland and saline lagoons, both habitats being important for the area and nationally. Linked to the Coast Path, improved access to the shore and the need to maintain access between the north and south of the valley, there is a real

opportunity to improve management and open the valley out as an important additional attraction to the area. Critical to creating such an asset is the need to agreed long term management of the area.

In the Immediate period, the impending loss of access along the existing road poses the main challenge. This will over the next 10 to twenty years reduce access to the businesses. Vehicle access would still be possible through the campsite and this would need to be developed between local landowners. Access, as discussed in relation to the lower part of the village, could be maintained at the northern end. This again needs to be developed between local landowners, in discussion with PCC and PCNPA. Such discussions need to be held during the “Immediate” period of the Plan such that the issue of access is agreed before ultimate closure of the road.

As the risk of storm damage become more acute, the individual businesses need to consider possible resilience measures but with the understanding that properties in this area will become unusable. This poses broader issues relating to the function these businesses provide and this is discussed more fully in considering the Plan over the southern part of the valley.

There are other services within the lower part of the valley, including a sewage pumping station, public toilets and electricity supply. Service operators need to be informed of the risk and need to plan for change, within the context of the overall Plan. The camp site service block will be at less risk but these facilities may need to be relocated in the longer term.

As plans are developed between landowners and such bodies as The National Trust and NRW for improving the ecological value of the valley, the Adaptation Strategy Plan has identified the opportunity for creating walkways and viewing areas across the valley, linking to the existing footpath network. This needs to be developed further, potentially linking this development of other tourism, with the emphasis on developing funding and long term management plans.

The Plan highlights the opportunity to;

- Maintain interconnectivity across the Valley
- Improve access to the shore
- Enhance the natural environment.

Southern Valley - Coastal

This area provides the main visitor **car parking facility**, together with linking access through to the Welsh Road running to the south. The junction between the existing coastal road and the Welsh Road is regularly flooded, with the wider car park area suffering flooding due to wave overtopping during more extreme coastal storms. The Plan identifies the need and intent to allow the natural movement of the southern section of the shingle bank and, whilst in the longer term, increasing areas of the car park will be at risk, this will be progressive.

The area in general, however, forms a key component of the Adaptation Strategy Plan – maintaining links to the south, maintaining car parking areas and considering how this area is improved to maintain access to the beach. The area is seen as forming a functional hub associated with use of the beach and supporting water sport activities.



As part of developing the potential new road links there would be the need to realign the link to the Welsh Road - most probably moving this important link

further up-hill. This would be developed as part of the WeITAG process. However, this needs to be considered in relation to the Adaptation Plan.

The intent within the Plan is to take advantage of these changes in the alignment of the road, use the space created between the new road position and the shingle bank to raise the level of the lower car park. The seaward edge of this area would be set far enough back so as not to interfere with the natural development of the shingle bank. This would secure a significant area of car parking into the future. The detail of this would need to be developed in discussion with PCNPA, PCC, NT and local landowners, but within the overall management of the Plan. As part of this, it is envisaged that some provision could be made for facilities for water sports. While creating the area can be identified by the Plan– creating the opportunity, the responsibility for such use would need to be developed separately.

To take advantage of works on the new road and the potential supply of material, plans for raising the car park needs to be advanced over the next 2 to 3 years. The potential opportunity to link this area to ideas to open access to the valley needs to be recognised but would not constrain development of car parking.

Associated with this and with adaptation within the valley, the Plan identifies the potential to extend the **campsite** further up-hill. This encroachment on the hillside needs to be considered in relation to the emerging Local Plan. This might be considered as direct replacement of a core facility but clearly is dependent on agreement with local landowners and businesses. The Plan aims to facilitate discussions.

The Plan envisages this as a core activity area in:

- Maintaining car parking capacity.
- Enhancing access to and use of the shoreline.
- Maintaining access to the south.
- Providing the opportunity for low level development of facilities supporting businesses and tourism.

Southern Valley - Inland

The approach road provides one of the most important viewpoints of the coast and valley. At present, there are limited opportunities to capitalise on this. Critically, however, this area, while potentially affected by the choice of the new road route, lies outside of the core area of coastal change. As such, the area has to be viewed differently from other areas covered by the Plan.

Crucially, the use of the area under the Plan depends on close involvement with landowners, particularly in involving major landowners such as The National Trust. The influence of possible change also links further in land, involving potentially people and communities such as Roch.

The opportunities lie in increasing the activity around the view point and in providing space for relocation of critical functions, supporting and addressing the issues created by changes more directly affecting the community of Newgale and the area of the valley.



These opportunities need to be developed alongside more immediate actions required in other areas, providing confidence, in principle as to how impacts may be addressed and how this contributes to the overall delivery of the Plan.

However, final decisions and implementation of ideas may be developed over a longer time period.

In principle, therefore, the aim of the Plan is to encourage and facilitate some development around the crest of the coastal road as shown earlier on Page 11. The intent would be to provide additional parking space, potentially allowing development of local business opportunities and support tourism linked to the use and enjoyment of the area, the beach and the valley. Such ideas as a visitor centre, here or elsewhere within the area, or other facilities would need to be considered in detail but would aim to replace facilities at risk within the valley and complementing potential ideas of opening access to the valley or incorporating the idea of improved community facilities.

These ideas would need to be discussed with relevant authorities and with land owners and clearly, depending on the level of investment required, funding would be a significant issue. Such ideas need to be fully integrated with future management plans being developed by The National Trust, landowners and tenants creating an encompassing attitude to future sustainable use of the area.

Discussion and agreement in how this area might be developed aims to:

- Investigate with the National Park Authority whether there is potential for future development within the area.
- Provide improved local social function adding to the well-being of the communities.
- Opening opportunities for business
- Supporting tourism
- Supporting and complementing management of the natural environment
- And enhancing the use of the Coastal Path and National Cycle Route.

In addition to capitalising on the spectacular landscape seen from this area and improving enjoyment and understanding of the area as a whole.

6. Governance and Development

The Adaptation Strategy Plan aims to develop a strong framework in addressing the issues and challenges posed by coastal change. The need to relocate and realign the main coastal road both imposes change on the area as well as providing the catalyst for thinking about these broader issues that supports the continued vitality of the community and activities around the use of the Newgale beach and valley.

Development of the Plan is, therefore, closely linked to the programme for work associated with the new road, as well as being driven by changes already being seen to occur at the coast.

The Plan sets out a series of actions needed to develop upon the idea put forward as part of the overall strategy. The actions range from initial discussion in principle, discussion and agreements between landowners and individuals and individual organisations, to development of outline plans for specific geographic areas. From this, actions would need to be taken forward in developing in detail of how areas might be developed, how this might be funded and how specific actions might be implemented.

In each area, different bodies would need to lead and develop ideas, with a strong emphasis on the Plan being led by the communities. At the highest level of governance, it is recommended that Plan is taken forward as a multi-agency project. While being led by the communities such a project would need to be facilitated by Pembrokeshire County Council, providing support to the community and encouraging support from Welsh Assembly Government and involvement from other organisations such as PCNPA. This process would also need to work with utility service providers. Each organisation would need to sign up to such involvement.



Typically, the project approach may need to extend over the initial 5 to 10 years, providing continuity and monitoring progress and evolution of the Plan. **Central to this approach is the principle that adaptation cannot be solved through a single action, but is rather a process to be managed over time.**

Within this overall structure individual issues and ideas would need to be determined at a more local level. Typically:

- With respect to development associated with the lower part of the village, the initiative resides very clearly with the community, supported by planners and economic regeneration. This needs clear lines of communication with development of options for the new road.
- Over the central valley area, the emphasis shifts more to individual decisions involving landowners and businesses. Alongside this is the need to develop the Plan intent to improved access to the inner valley area, involving the broader steering group and NRW through their habitat creation programme. This needs to be considered in relation to improving access over the longer term across the whole area with the potential links to the Plan approach within other areas.
- The coastal area to the south of the Valley links to the development and the need to realign access to the Welsh Road. As such development of the main underlying infrastructure may most sensibly reside with PCC.
- The inland area to the south of the valley requires initial discussion of ideas and constraints with PCNPA and the potential need to provide a baseline structure to the area involving PCC and service providers. However, the aim within this area needs clear input from Landowners, tenants and The National Trust as well as both the community of Roch and Newgale.
- These governance structures need to be confirmed as part of the Adaption Strategy Plan, recognising the long term commitment required in taking the Plan forward.

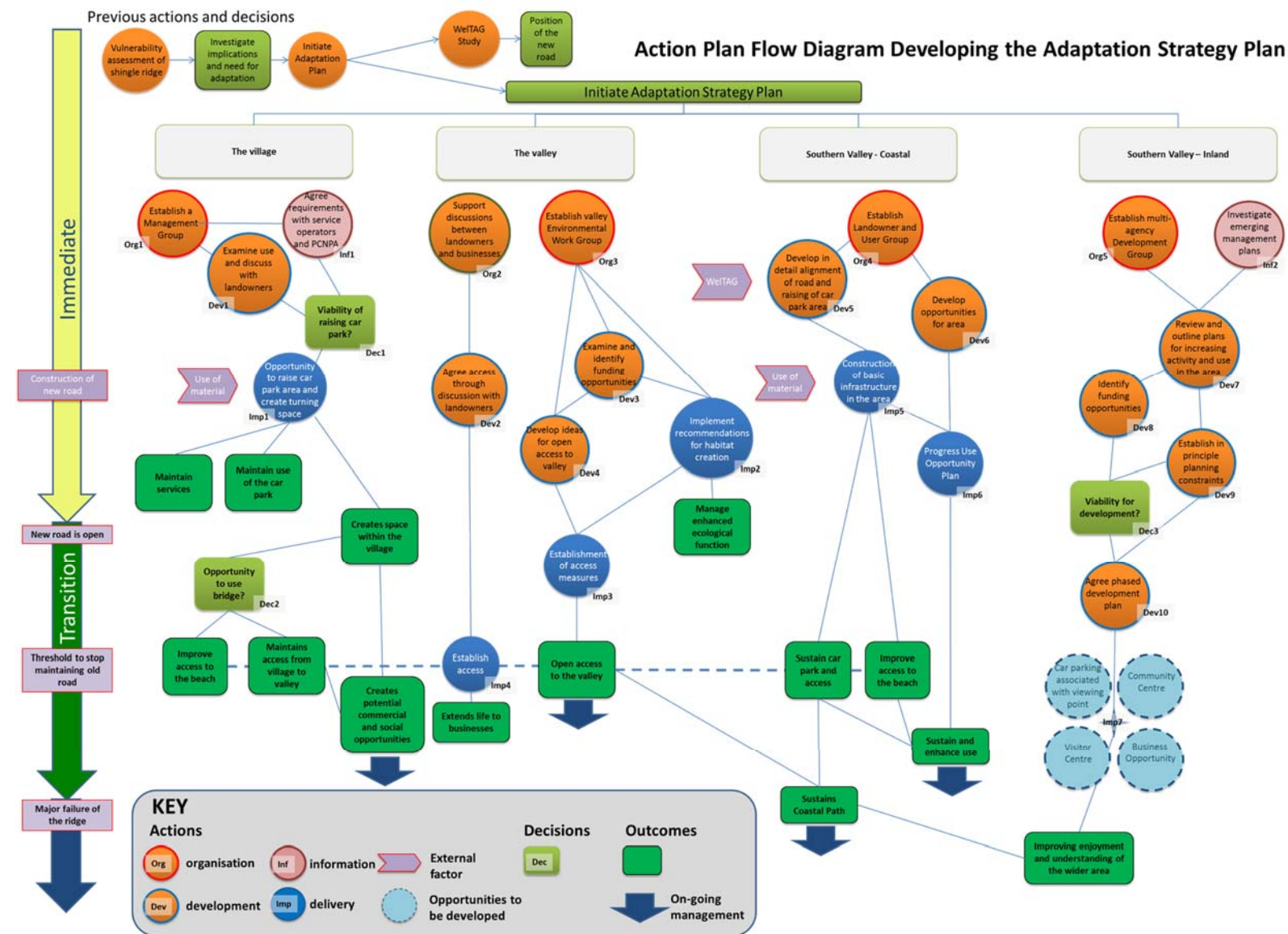


Appendices

The background of the slide features an abstract geometric design. It consists of several overlapping, semi-transparent shapes in various shades of teal and light blue. These shapes, which include triangles and polygons, are arranged in a way that creates a sense of depth and movement, particularly concentrated in the lower right quadrant of the slide.

Appendix A. Action Plan

A.1. Action Plan – Flow Diagram



A.2. Action Plan

Key to action owner organisations

PMG = Project management group

LMG = Local management group

EWG = Environmental work group

LUG = Landowner and user group

M-ADG = Multi-agency development group

PCC = Pembrokeshire County Council

Decision/action item	Description	Input	Outputs & outcomes	Timing / Trigger	Action owner
GENERAL PROJECT DEVELOPMENT					
Establish project management group (PMG)	A PMG is set up to provide overview and direction, monitoring and liaison. To support local management and working groups.	▪ Adaptation Strategy Plan	▪ Overall project delivery	▪ Immediate	PCC
Regional and National policy	PMG to develop and promote policy to support adaptation	▪ Adaptation Strategy Plan	▪ Regional and national policy	▪ Immediate	PMG
Input to Local Plan	PMG to support PCNPA	▪ Adaptation Strategy Plan		▪ Immediate	PMG
Engagement with service providers	PMG to engage multi-agency input	▪ Adaptation Strategy Plan	▪ Awareness and involvement	▪ Immediate	PMG

VILLAGE						
Org1	Establish a Local Management Group (LMG)	PMG sets up of a LMG for the village area to resolve issues related to access, services and development of lower part of village.		<ul style="list-style-type: none"> Establishment of a management group 	<ul style="list-style-type: none"> Immediate 	PMG
Inf1	Agree requirements with service operators and PCNPA	LMG to engage with service operators and PCNPA to establish requirements for provision of services.	<ul style="list-style-type: none"> Org1 	<ul style="list-style-type: none"> Decision on bus and other services 	<ul style="list-style-type: none"> Immediate 	LMG
Dev1	Examine use and discuss with landowners		<ul style="list-style-type: none"> Org1 		<ul style="list-style-type: none"> Immediate 	LMG
Dec1	Viability of raising car park	Make a decision on the viability of raising the car park in the village.	<ul style="list-style-type: none"> Dev1 Inf1 	<ul style="list-style-type: none"> Decision on viability of raising car park 	<ul style="list-style-type: none"> Immediate 	LMG
Imp1	Opportunity to raise car park area and create turning space	If deemed viable, the car park area can be raised and turning space for buses and other service operators can be maintained	<ul style="list-style-type: none"> Dec1 Use of material 	<ul style="list-style-type: none"> Maintain use of the car park Maintain services Creates space within the village Creates potential opportunity 	<ul style="list-style-type: none"> Construction of new road 	LMG
Dec2	Opportunity to use bridge?	LMG to decide whether after the new road has opened, the bridge can still be used to improve access to the beach and maintain access from village to valley	<ul style="list-style-type: none"> Imp1 	<ul style="list-style-type: none"> Access to the beach Maintains access from village to valley Creates potential opportunity 	<ul style="list-style-type: none"> New road is open Threshold to stop maintenance of the existing road 	LMG

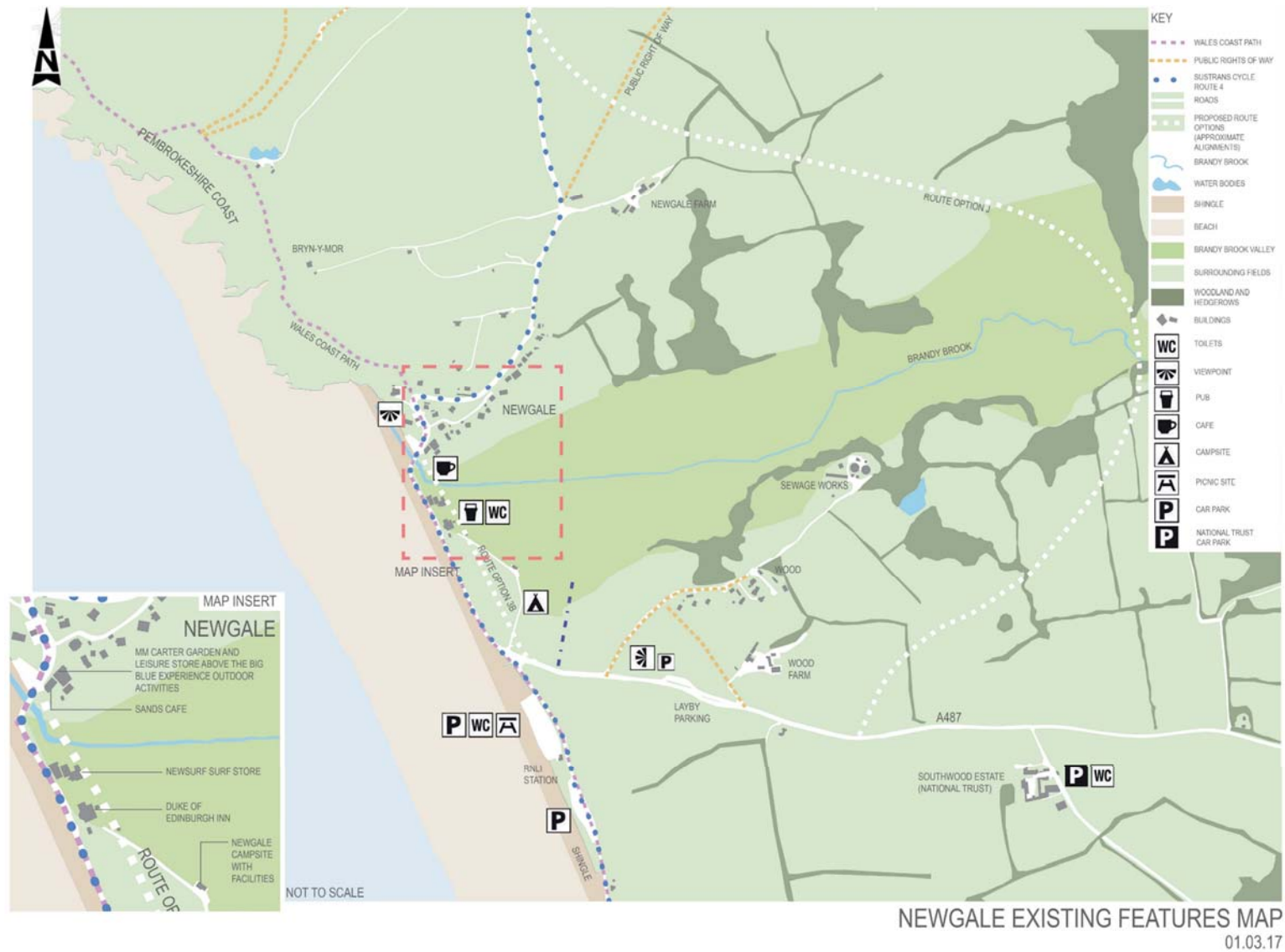
VALLEY						
Org2	Support discussions between landowners and businesses	Supporting the dialogue and discussions between the landowners and businesses. This dialogue needs to be initiated by businesses involved.		<ul style="list-style-type: none"> Ongoing discussion between landowners and businesses 	<ul style="list-style-type: none"> Immediate 	PMG
Dev2	Agree access through discussion with landowners	The discussions should lead to an agreement between landowners and businesses on access to the respective establishments and business	<ul style="list-style-type: none"> Org1 	<ul style="list-style-type: none"> Agreement on access 	<ul style="list-style-type: none"> Immediate 	Businesses
Imp4	Establish access	Implementation of the agreements between landowners and businesses to establish access to their respective establishments	<ul style="list-style-type: none"> Dev2 	<ul style="list-style-type: none"> Extends life to businesses 	<ul style="list-style-type: none"> New road is open Threshold to stop maintenance of the existing road 	Businesses
Org3	Establish valley Environmental Work Group (EWG)	PMG to establish EWG to further progress recommendations for habitat creation and establishment of access measures		<ul style="list-style-type: none"> Establishment of a work group 	<ul style="list-style-type: none"> Immediate 	PMG
Dev3	Examine and identify funding opportunities	Identification of funding opportunities to create habitats and establish access measures.	<ul style="list-style-type: none"> Org3 	<ul style="list-style-type: none"> Funding opportunities 	<ul style="list-style-type: none"> Immediate 	EWG
Imp2	Implement recommendations for habitat creation	Implementation of the fundable recommendations for habitat creation	<ul style="list-style-type: none"> Dev3 	<ul style="list-style-type: none"> Manage enhanced ecological function 	<ul style="list-style-type: none"> Immediate 	EWG
Dev4	Develop ideas for open access to the valley	Consider and develop ideas for creation of boardwalks and footpath network within the valley. Consider what facilities may be needed to support this, potentially to higher ground to the south of the valley (Southern Valley – Inland). Identify how this may need to integrate with development and opportunities within the village.	<ul style="list-style-type: none"> Org3 Dev3 	<ul style="list-style-type: none"> Fundable ideas for open access to the valley 	<ul style="list-style-type: none"> Immediate, Transition 	EWG

Imp3	Establishment of access measures	Implementation of fundable ideas for open access to the habitat created in the value.	<ul style="list-style-type: none"> Dev4 Imp2 	<ul style="list-style-type: none"> Access measures to the valley Open access to the valley 	<ul style="list-style-type: none"> New road is open Transition 	EWG
Southern Valley - Coastal						
Org4	Establish Landowner and User Group (LUG)	PMG to establish LUG for the coastal area of the southern part of the valley, using this group to input to road realignment and subsequent development of the area.	<ul style="list-style-type: none"> WelTAG 	<ul style="list-style-type: none"> Functional Group to develop basic infrastructure and opportunities for the area 	<ul style="list-style-type: none"> Immediate 	PMG
Dev5	Develop in detail alignment of road and raising of car park area	PCC to develop the alignment of the road and raising of the car park area in the Southern Valley, supported by LUG	<ul style="list-style-type: none"> WelTAG Org4 	<ul style="list-style-type: none"> Plan for alignment of road and car park area 	<ul style="list-style-type: none"> Immediate 	LUG
Dev6	Develop opportunities for area	Development of opportunities for the area by the established Landowner and User Group	<ul style="list-style-type: none"> Org4 	<ul style="list-style-type: none"> Use Opportunity Plan 	<ul style="list-style-type: none"> Immediate 	LUG
Imp5	Construction of basic infrastructure in the area	Construction of basic infrastructure in the area to sustain car park and access and improve access to the beach as part of road realignment.	<ul style="list-style-type: none"> Dev5 Use of material 	<ul style="list-style-type: none"> Sustain car park and access Improve access to the beach Sustains Coastal Path 	<ul style="list-style-type: none"> Immediate 	LUG
Imp6	Progress Opportunity Plan	Building upon the construction of basic infrastructure, the LUG leads the progression of developed opportunities.	<ul style="list-style-type: none"> Dev4 Imp5 	<ul style="list-style-type: none"> Sustain and enhance use Improving enjoyment and understanding of the wider area 	<ul style="list-style-type: none"> Construction of new road 	LUG

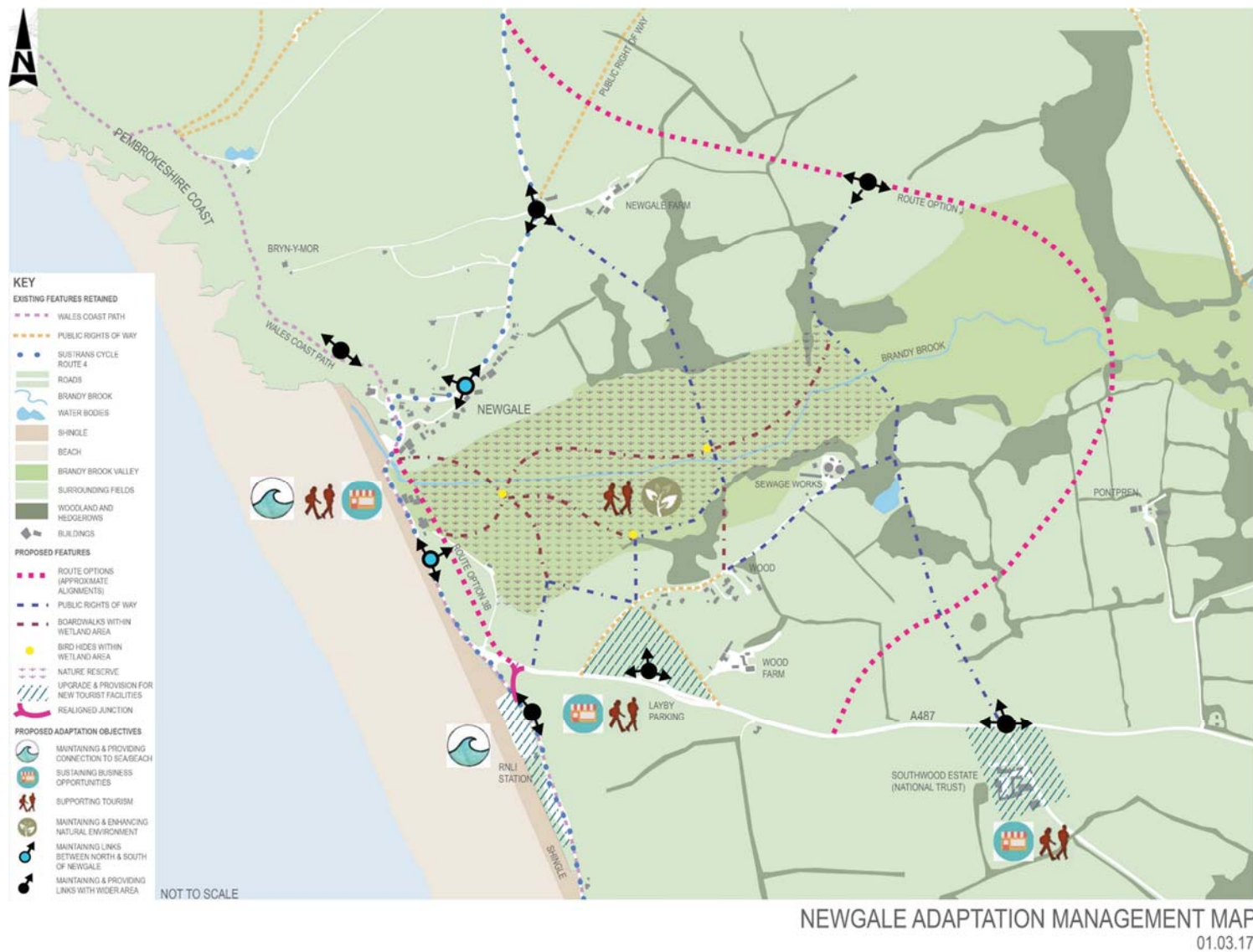
Southern Valley - Inland						
Org5	Establish Multi-Agency Development Group (M-ADG)	PMG to establish a M-ADG for the inland area of the Southern Valley		▪	▪ Immediate	PMG
Inf2	Investigate emerging management plans	Engage with National Trust and other landowners to review their plans and to consider synergies.	▪ Org5	▪ Promote integrated planning	▪ Immediate	M-ADG
Dev7	Review and outline plans for increasing activity and use in the area	Develop outline plans for the area based on needs set out in the Adaptation Strategy Plan and emerging synergies and ideas emerging from other aspects of the project.	▪ Inf2 ▪ Dev3 ▪ Dev 4 ▪ Dev6	▪ Outline plans for increasing activity and use in the area ▪ Providing support to other areas and aspects of the project	▪ Immediate	M-ADG
Dev8	Identify funding opportunities	M-ADG to Identify funding opportunities for outline plans for increasing activity and use in the area	▪ Dev7	▪	▪ Immediate	M-ADG
Dev9	Establish in principle planning constraints	M-ADG to liaise with PCNPA in considering planning constraints	▪ Dev7	▪	▪ Following construction of the new road	M-ADG
Dec3	Viability for development	Based on the in principle planning constraints, the outline plans and the funding opportunities, a decision can be made on the viable areas of development in the area	▪ Dev8 ▪ Dev9	▪ Decision on the extent to which the area can be developed	▪ Following construction of the new road	M-ADG
Dev10	Agree development plan	Agreement on a fundable phased development plan, following the decision on viability for development	▪ Subject to Dec3	▪ Support and relocation of activities affected by change.	▪ New road is open	M-ADG
Imp7	Implementation of development plan	Progressive development of the area	▪ Dev10	▪ Sustain values of the broader area. ▪ Supporting other aspects of the Plan ▪ Improving enjoyment and understanding of the whole area	▪ Transition ▪ Linked to progressive loss of other functions and features	M-ADG

Appendix B. Adaptation Management Map

B.1. Existing Features Map



B.2. Adaptation Management Map



Atkins
West Glamorgan House
12 Orchard Street
Swansea
SA1 5AD

© Atkins Ltd except where stated otherwise.

The Atkins logo, 'Carbon Critical Design' and the strapline
'Plan Design Enable' are trademarks of Atkins Ltd.