

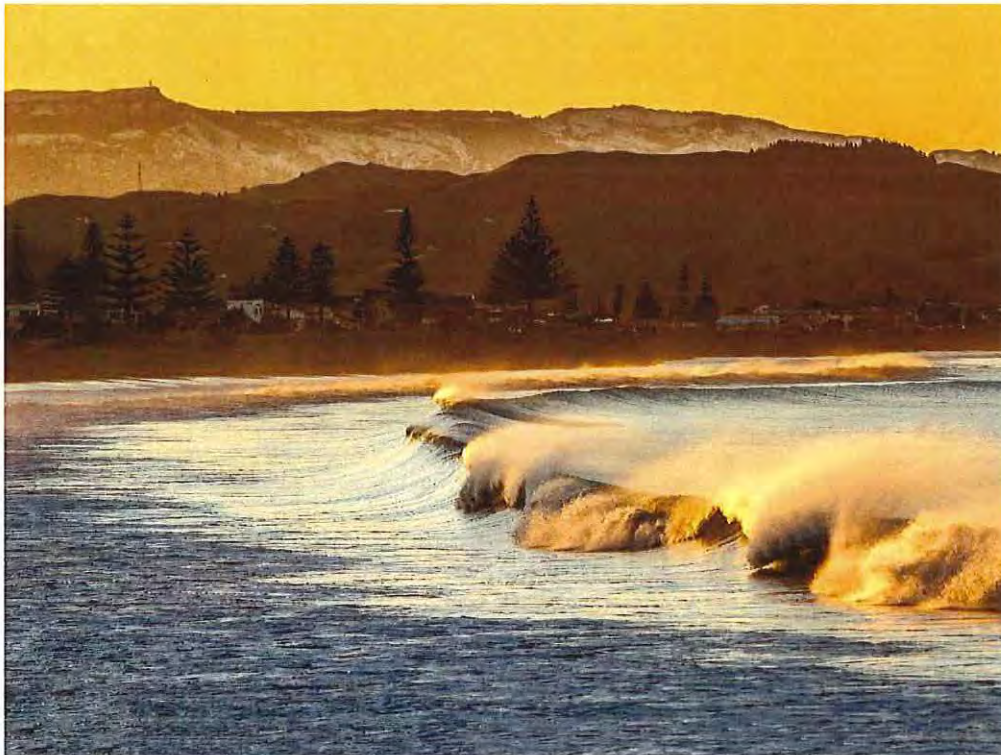


Ministry for the
Environment
Manatū Mō Te Taiao



Case study: challenges with implementing the *Clifton to Tangoio Coastal Hazards Strategy 2120*

**Ministry for the Environment – Hawke's Bay Regional
Council partnership project**



Acknowledgements

This case study was prepared as part of a partnership project between the Ministry for the Environment and the Hawke's Bay Regional Council.

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Executive summary

1. This case study, completed by the Ministry for the Environment in partnership with Hawke's Bay Regional Council, investigates the challenges the three partner councils – Napier City Council, Hastings District Council, and Hawke's Bay Regional Council – are experiencing implementing the *Clifton to Tangoio Coastal Hazards Strategy 2120* (the Strategy).
2. The councils have spent years involved in a collaborative process involving a detailed hazard and risk assessment, designing a decision-making framework, and supporting community panels to produce a set of recommendations for action. The Strategy is now in the implementation phase, and the councils are experiencing challenges with this phase. Interviews and discussions with council officials have highlighted three key challenges:

Key challenge 1: core responsibilities for adaptation are ambiguous

3. Regional council and territorial authority responsibilities in relation to natural hazards and climate adaptation are derived from a range of statutes including the RMA (and the NZCPS beneath it), the LGA and the CDEMA. The Hawke's Bay councils describe a situation where, in the absence of clearly delineated responsibilities, councils cannot decide between them who has primary responsibility for addressing natural hazards and climate adaptation. In the Hawke's Bay, this is playing out in discussions on which council/s should rate for the 'public good' component of adaptive action, and there is no clear resolution to this issue on the horizon.

Key challenge 2: tools and mechanisms to manage current and future hazards are limited or inefficient

4. The councils are concerned that the current legislative framework is not fit for purpose in terms of implementing a best practice Dynamic Adaptive Pathways Planning approach. In particular, the system is not set up to respond dynamically to changing information. Changes to, or better integration of, the RMA and the LGA may be necessary to address this.

Key challenge 3: there is a lack of agreed approach and principles for sharing costs of works

5. The total cost of the works to implement the coastal hazard strategy is likely to be very large, with high-level estimates from Tonkin and Taylor in 2016 putting the figure at \$130-285 million over the Strategy's 100-year planning horizon. In addition to the issue of which council should rate for the 'public benefit' part of the costs, councils are facing difficulties drawing the line between what is paid for by general rates and what should be paid for by targeted rates for properties identified as 'beneficiaries' of works. Councils are concerned that a lack of central guidance on these questions means that whatever they decide to do will set a precedent for the rest of the country without having been informed by principles that would have national applicability.

Recommendations

6. This report recommends that central government consider the following avenues as part of a systems approach to addressing these challenges. Further work is needed to develop these recommendations into specific policy proposals and final decision-making on any such policies sits with Government Ministers. We anticipate that this work will be picked up by the RM Review Panel and the Community Resilience work programme.
 1. The issues and options raised in this report could be considered in the comprehensive review of the resource management system due to be reported to the Minister for the Environment in May 2020.
 2. Community Resilience Group agencies could provide advice to Community Resilience Ministers on how the roles and responsibilities of territorial authorities (district and city councils), regional councils and central government in relation to natural hazards and climate change adaptation could be clarified and made more directive.

3. Central government could consider providing further direction on an integrated approach to adaptation issues including how costs for action should be allocated, how managed retreat should be undertaken, and how councils could be supported to implement appropriate restrictive zoning behind defensive measures. This could be pursued through primary or secondary legislation, including potentially new natural hazard risk management and climate change adaptation-specific legislation which sits outside existing LGA and RMA processes.
4. Policy work could be undertaken to develop a system that enables better integration of Dynamic Adaptive Pathways Planning approaches by, for example by providing better linkages between LGA and RMA processes.
5. Central government could consider developing a protocol for use by councils and other decision-makers to apply around the country on how to approach the question of costs allocation for adaptation action.
6. Central government could consider the case for contributing to funding adaptation action by developing principles for 'who pays' between central and local government and other actors including the private sector.

1. Introduction

1. Hawke's Bay Regional Council, Hastings District Council and Napier City Council have been leaders in coastal adaptation planning in New Zealand. They have worked with a wide range of technical experts in developing the *Clifton to Tangoio Coastal Hazards Strategy 2120* and have used a collaborative approach that draws on community views to set out short, medium, and long-term adaptation pathways for addressing coastal hazards affecting the most populated stretch of their coastline.
2. Due to the progress they have made, they have also started to push up against some roadblocks that other councils have not yet encountered. For the councils, having invested substantial time, effort, and money into following best practice guidance as it has developed, there is frustration at the idea that this work now risks stalling at the implementation phase.
3. This case study was commissioned by Community Resilience Ministers¹ to feed into the development of the Community Resilience work programme. It aims to give central government a detailed picture of local government's natural hazards and climate change adaptation activity and 'get under the hood' of the challenges that councils are facing on the ground. The case study is also intended to present the Hawke's Bay experience to the Resource Management Review Panel² to inform their consideration of how the broader RM system could be reformed.
4. The case study was developed collaboratively by MfE and Hawke's Bay Regional Council from October to December 2019. MfE collected data on the Coastal Hazards Strategy and existing and future implementation challenges from Hastings District Council, Napier City Council and Hawke's Bay Regional Council members of the Coastal Hazards Technical Advisory Group via interviews in late October. An initial long-list of options to address the challenges was tested and prioritised in a collaborative workshop in Napier in early December 2019.

1.1 Structure of this case study

5. This case study sets out:
 - The Hawke's Bay context, including the key hazards and the legislative and planning context
 - The history and current status of the Coastal Hazards Strategy
 - Key areas of success in the development of the Strategy
 - Three key challenges councils are facing in implementing the Strategy
 - Options that could be investigated to address these challenges
 - Key findings and recommendations.
6. Recommendations in this case study represent areas of broad agreement between MfE and the three councils as to areas for further investigation, drawing on the specific experience in Hawke's Bay, but they do not represent fully worked up policy positions. Further work needs to be done to develop these recommendations into specific policy proposals, and final decision-making on

¹ Community Resilience Ministers are: the Minister of Local Government, the Minister of Finance, the Minister for Climate Change, the Minister for Civil Defence, the Minister for Land Information New Zealand, the Minister for Commerce and Consumer Affairs, the Minister for the Community and Voluntary Sector and the Minister Responsible for the Earthquake Commission.

² This Panel was established by the Minister for the Environment in June 2019 to undertake a comprehensive review of the Resource Management Act and other significant legislation within the resource management system. It is due to deliver its findings to the Minister for the Environment in May 2020.

any such policies sits with Government Ministers. We anticipate that this work will be picked up by the RM Review Panel and the Community Resilience work programme.

1.2 Context for climate change adaptation in Hawke's Bay

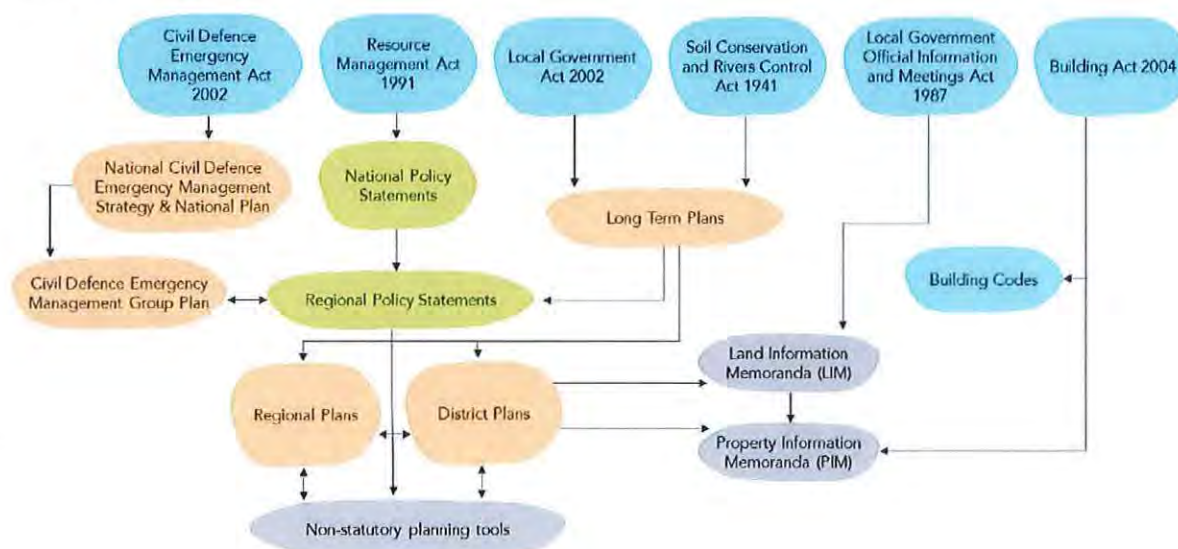
1.2.1 The natural hazard context of Hawke's Bay

"If our ancestors landed in Hawke's Bay again today, knowing what we now know, they might decide to settle elsewhere" – council official

7. Hawke's Bay is a region of many risks. The Hikurangi subduction zone off the coast stretches down to Kaikoura and poses a significant earthquake and tsunami risk to the entire east coast of New Zealand. Much of Napier has been built on land that was uplifted during the 1931 earthquake or has been reclaimed since that time. Nearly 8,000 homes are less than 150 centimetres above the spring high tide mark, and a considerable area of the city, including the airport, is less than 50 centimetres above the spring high tide mark.³ Coastal erosion is a significant hazard, as is coastal inundation.
8. The Heretaunga Plains, a 300 square kilometre alluvial plain which contains Napier, Hastings and Havelock, is subject to flooding risks which are managed by means of major flood protection works, including pump stations and protective structures such as stopbanks.
9. The water table around Napier is often close to the surface and as such the city is vulnerable to any rise in groundwater, which compounds risks posed by the highly liquefiable soils found under much of Napier's low-lying suburbs. The high water table and flat topography pose significant difficulties in moving stormwater from the city to the sea to prevent localised surface flooding of properties and businesses.

1.2.2 The current legislative framework to manage coastal natural hazards and climate change-related risks

Figure 1: Legislative framework for natural hazards, taken from the Productivity Commission's report on Local Government Funding and Financing 2019.



³ Parliamentary Commissioner for the Environment. 2015. Preparing New Zealand for rising seas: Certainty and Uncertainty.

10. Local authorities' actions to prepare communities for and manage the risks of natural hazards and climate change are carried out under a variety of acts. In addition to those outlined below, local government has key responsibilities as lifelines utility owners and operators, and in implementing the National Emergency Management Strategy under the Civil Defence Emergency Management Act. The Building Act also places responsibilities on councils for permits and consents and requires certain natural hazards to be taken into account when determining whether to grant a building consent.

The Local Government Act sets out the core purpose of local government

11. The Local Government Act 2002 (LGA) sets out the core purpose of local government as:⁴
- to enable democratic local decision-making and action by, and on behalf of, communities
 - to promote the social, economic, environmental, and cultural well-being of communities in the present and for the future.
12. The LGA sets out processes for provision of infrastructure and other local government spending. Long Term Plans looking out to 10 years of service provision must be updated every 3 years with the detailed financial planning for years 1-3. Councils must also produce 30-year infrastructure strategies which set out the approach to managing new and existing assets over that period and must identify and manage risks relating to natural hazards and make appropriate financial provision for those risks. The LGA does not explicitly mention climate change.

The Resource Management Act sets the land use planning framework

13. The Resource Management Act (RMA) is New Zealand's primary environmental management statute. The purpose of the RMA is to promote the sustainable management of natural and physical resources. It requires consideration of the effects of activities on the environment now and in the future when making resource allocation and land use decisions.
14. The RMA gives local government and other decision-makers under the Act an explicit mandate to have particular regard to the effects of climate change,⁵ makes the management of significant risks from natural hazards a matter of national importance,⁶ and describes the split (and overlap) of functions as between regional councils and territorial authorities in sections 30 and 31.⁷
15. Under section 30 of the RMA, regional councils have the function of controlling land use to avoid or mitigate natural hazards. This includes setting objectives, policies and methods for controlling the use of land for avoiding or mitigating natural hazards (through regional policy statements and plans). Under section 31 territorial authorities control the effects of land use to avoid or mitigate natural hazards. District and city councils set the activity status and standards for land uses and subdivision, through zones or overlays, rules and performance standards in district plans.

The New Zealand Coastal Policy Statement gives specific objectives and policies in relation to the coastal environment

16. The New Zealand Coastal Policy Statement 2010 (NZCPS) requires local authorities to identify areas in the coastal environment that are potentially affected by coastal hazards and assess these risks looking out to at least 100 years in the future, having regard to the effects of climate change.⁸

⁴ Local Government Act 2002, section 10.

⁵ Section 7(i).

⁶ Section 6(h).

⁷ More detail on the available planning tools is set out in the Ministry for Environment's *Coastal Hazards and Climate Change: Guidance for local government*.

⁸ New Zealand Coastal Policy Statement 2010, Policy 24.

1.3 Coastal hazard strategy: History and current status

1.3.1 The Strategy development process

17. The three councils in the area have a long history of managing natural hazard risks along the coastline. There have been hazard lines in the Napier and Hastings District Plans since the mid-1980s. Risks to areas like Te Awanga and Haumoana have been known for decades, and over the years communities have proposed and implemented (sometimes relatively 'informally') measures to protect vulnerable properties. Councils have also maintained existing protective measures over the years, such as ongoing renourishment⁹ of the beach at Westshore, just north of Napier City, and a number of coastal groynes in the Clive and Haumoana area.
18. The development of the Clifton to Tangoio Coastal Hazards Strategy 2120 (the Strategy) began in late 2014 in an effort by the three councils to develop a common understanding of the risks along the entire stretch of coastline and to respond to community concern about the effects of coastal hazards in a more coordinated and forward-looking way.
19. The strategy development began with the establishment of a Joint Committee of elected members from the three councils, and representatives from Maungaharuru-Tangitu Trust, Mana Ahuriri Trust and Heretaunga Tamatea Settlement Trust (formerly He Toa Takitini). The Joint Committee was formally established under the Local Government Act. Supporting the Joint Committee was a Technical Advisory Group (TAG) formed from senior staff from each council and led by an independently appointed project manager.
20. The Strategy was developed in four stages. The first stage of the process 'Defining the problem' involved a technical assessment by Tonkin & Taylor. The Coastal Hazard Assessment considered coastal hazards across 16 coastal 'units', over a 100-year period as required by the NZCPS.
21. Stage two of the process developed a decision making framework, designed with the community and guided by expert input. From this, two assessment panels were formed which represented the interests of communities, tangata whenua, and the relevant agencies. The North and South Assessment Panels were designed intentionally across local authority boundaries.
22. In stage three, the assessment panels developed recommended responses to the coastal hazards risks. In 2017 these responses were developed with the assistance of researchers from the "Living at the Edge" research project¹⁰. The "Edge" researchers introduced Dynamic Adaptive Pathways Planning (DAPP), a framework that presents adaptation solutions as one option in a

Box 1: Dynamic Adaptive Pathways Planning

Dynamic Adaptive Pathways Planning (DAPP) is a framework for decision making under deep uncertainty which underpins the Ministry for Environment's *Coastal hazards and climate change: guidance for local government*, published in December 2017.

Dynamic Adaptive Pathways Planning involves a map of multiple adaptation pathways, designed to avoid adaptation and infrastructure lock-in. They are often visualised as a 'metro map', with stations that allow the pathway to be progressed or changed. In the DAPP case, the station is a 'trigger'; some threshold, for example 0.5m inundation on a spring high-tide, that tells decision makers that the current adaptation solution is insufficient. When the trigger is met, decision makers must decide whether to move to the next stage of the current pathway, ie, increase the height of the existing sea wall, or move to a new pathway entirely, ie, managed retreat. A complete DAPP process would result in a plan that is robust to many possible future scenarios.

⁹ Replenishment of sediment and gravel.

¹⁰ As part of the *Resilience to Nature's Challenges* National Science Challenge.

series of future pathways. This aligned the Strategy's decision making process with the Ministry for the Environment's Coastal Hazards Guidance for Local Government, which a number of the "Edge" researchers, including Dr Judy Lawrence and Dr Rob Bell, helped to create.

23. The assessment panels worked through a structured decision-making process over a series of eleven workshops. They were informed by the technical assessments, a cultural values assessment, and a social impact assessment and valuation. Options for responses to risks were assessed using decision making tools including Multi-criteria Decision Analysis and Real Options Analysis. On 20 February 2018 the Joint Committee received and endorsed the recommendations of the two community panels for the Northern and Southern Assessment Cells. These recommendations were ultimately adopted by each of the Partner Councils for the purposes of commencing the next phase of the Strategy.

Table 1: Summary of recommended actions developed by the Panels for each priority area

Area	Short Term (0-20yrs)	→	Medium Term (20-50yrs)	→	Long Term (50-100yrs)
Clifton (L)	Sea wall	→	Sea wall	→	Managed retreat
Te Awanga (K2)	Renourishment + Control structures	→	Renourishment + Control structures	→	Renourishment + Control structures
Haumoana (K1)	Renourishment + Control structures	→	Renourishment + Control structures	→	Managed retreat
Clive (J)	Status quo	→	Renourishment + Control structures	→	Retreat the line / Managed retreat
Ahuriri (E1)	Status quo	→	Sea wall	→	Sea wall
Pandora (E2)	Inundation protection	→	Inundation protection	→	Inundation protection
Westshore (D)	Renourishment	→	Renourishment + Control structures	→	Renourishment + Control structures
Bayview (C)	Status quo / Renourishment	→	Renourishment + Control structures	→	Renourishment + Control structures
Whirinaki (B)	Status quo / Renourishment	→	Renourishment + Control structures	→	Sea wall

1.3.2 Current status of the Strategy

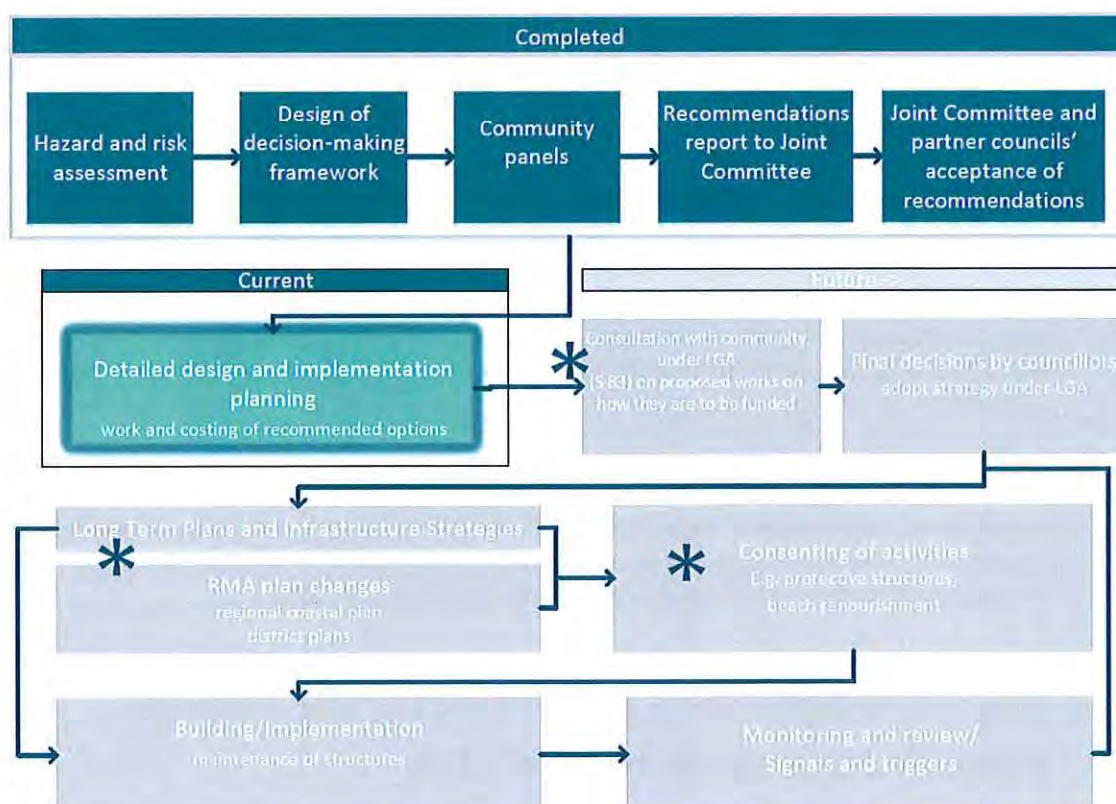
24. The Strategy is now officially in Phase 4: its 'implementation' phase. This involves five workstreams, which are advancing at different rates:

- **Design.** The design workstream is converting the high-level recommendations from the Assessment Panels (Table 1 above) into concept designs and more detailed costings. Details, costs and versions of each option, together with a primary alternative to the recommended option (eg, do nothing or early managed retreat) are being developed for use in a later consultation to occur under the Local Government Act.
- **Governance.** The governance workstream is intended to look at the roles and responsibilities of the different councils going forward. This work is closely intertwined with the funding workstream, and has progressed more slowly due to the challenges faced by that workstream.
- **Triggers.** Dynamic Adaptive Pathways Planning uses signals, triggers and thresholds to determine when an adaptation solution is insufficient, and a pathway change is needed.

The triggers workstream is investigating how this works in practice. Questions include how to design effective signals and triggers with communities, whether a trigger begins a new consenting process, or activates the implementation of a pre-consented pathway, and how to formalize triggers in council planning documents. This workstream is currently waiting for the latest research from a Deep South National Science Challenge project which is expected to provide insights on the development of triggers in practice.

- **Regulatory.** This workstream is reviewing the current local regulatory framework to better understand how the Strategy could be implemented, including consenting risks under current RMA provisions (which were not considered in the options and pathways evaluation process), whether the existing local policy and regulatory framework is fit for purpose, and how to avoid incentivising further development in the temporarily protected areas.
- **Funding.** The funding workstream seeks to confirm how strategy implementation will be funded, including questions such as council responsibility, affordability, and where costs will fall between private and public beneficiaries. The idea of a contributory fund – whereby all councils contribute and pool money for future implementation costs – has been agreed by the Joint Committee. However, there are disagreements at the political level as to which council/s should rate for the contributions to the fund, described in further detail below under Key challenge 1.

Figure 2: Completed, current and future steps for the Coastal Hazards Strategy. Potential barriers described in this case study are indicated with asterisks.



2. Key successes in developing the Coastal Hazards Strategy in Hawke's Bay

2.1 Council collaboration in developing the Strategy has been strong.

25. Council officials describe a “long and fraught” history in the debate about how to tackle existing coastal erosion problems at places like Haumoana and Te Awanga, where over the course of many years communities have proposed and sometimes implemented their own ‘protective structures’ for stretches of the coastline. Before the development of the joint strategy started, multiple parties including the respective councils and the ports had been independently commissioning their own reports from experts which identified various hazards in different ways. In developing the strategy, councils jointly funded the costs of relevant experts to provide a shared set of data and reports, contributing to a shared understanding of risks for the entire coastline.
26. Despite some concerns about turnover of key people involved in the development of the strategy, council officials have maintained collaborative and constructive working relationships and have made good progress on key workstreams in the implementation phase. Most notably the ‘Design’ workstream which has taken the high-level outputs from the community panels and is in the process of fully working up what they would look like, with associated costs. Governance of the project is also a key area of success – the Joint Committee established under the Local Government Act to oversee the project is widely regarded as a successful model.

2.2 The Strategy development has helped change the conversation about climate change adaptation

27. Although the councils are now facing challenges in making the difficult decisions about how to implement the Strategy, it is clear that the Strategy development process has started to change the conversation around climate change and coastal hazards in Hawke's Bay. Conversations around managed retreat which have been too difficult for communities to engage with in the past, are gradually being discussed because of the long-term focus of the strategy. Officials say the different time horizons of the DAPP approach (short-, medium- and long-term) enabled communities to “let their guard down a bit” about the possibility of eventual retreat while still being able to plan for the short to medium term.
28. Council officials who have been involved from the start describe a “totally different operating environment” now compared to when they started work on the strategy. Being frontrunners in this process, the councils’ strategy has caught a lot of media attention and has contributed to an evolving national discourse around climate change impacts and adaptation.

3. Key challenges with implementing the Coastal Hazards Strategy in Hawke's Bay

29. The councils have started to push up against some roadblocks. The total cost of the works to implement the coastal hazard strategy is likely to be very large, with high-level estimates from Tonkin and Taylor in 2016 putting the figure at between \$130-285 million¹¹ over the Strategy's 100-year planning horizon, and there are challenges with deciding whether this is affordable to

¹¹ Minutes of a meeting of the Clifton to Tangoio Coastal Hazards Strategy Joint Committee. 31 May 2019. Available from <https://hbcoast.co.nz/assets/Document-Library/Minutes/CLI-31052019-MIN.pdf>

communities, and how it should be funded. Having progressed quite far with their Strategy, the councils feel that they are not able to benefit from the experience of other councils and are somewhat out on a limb as to the approaches they are taking. This section outlines three key challenges that officials have described. Although described separately, they are interrelated.

3.1 Key challenge 1

3.1.1 Challenge: core responsibilities for adaptation are ambiguous

30. As outlined in the previous section, regional council and territorial authority responsibilities in relation to natural hazards and climate adaptation are derived from a range of statutes including the RMA (and the NZCPS beneath it), the LGA and the CDEMA. In some instances, there are overlaps between the functions, for example in sections 30 and 31 of the RMA where regional councils have the function of controlling land use to avoid or mitigate natural hazards and territorial authorities control the effects of land use to avoid or mitigate natural hazards. This overlap in responsibilities was intended to “force regional and local councils to sort out a sensible allocation of functions for themselves”.¹² While some form of functional overlap is likely desirable to prevent a siloed approach, recent research indicates that this has not worked as intended.¹³
31. The development of the Strategy represents a new step in terms of anticipatory adaptive planning for the whole coast, as opposed to reacting to existing risk situations with traditional tools and processes. Councils are finding themselves in ‘uncharted waters’ in relation to how far they should go with this planning, and the specific actions they are expected to take to fulfil their natural hazard and adaptation planning responsibilities. They are finding existing national level direction and guidance insufficient. Councils are seeking more direction on questions that are unanswered by current legislation, including:
- Who is expected to take the lead on coastal natural hazards and adaptation where roles are joint or overlapping?
 - Who should fund adaptation action and on the basis of what principles?
 - Whose role is it to collect revenue or funds for any public or private good?
 - Who is responsible for the ongoing ownership, maintenance and management of any protective structures?

3.1.2 This ambiguity about respective roles is playing out in relation to the establishment of a contributory fund

32. In May 2019, the Joint Committee agreed in principle to establish a fund to offset some of the future costs of the works agreed through the strategy once a clear plan was in place.¹⁴ The fund was intended to offset debt rather than covering the full cost of works, and would cover the ‘public good’ component of protective works. Targeted rates would be used to collect the rest from direct beneficiaries (ie, property owners whose houses are directly protected) once more detail was worked out about the specific interventions (the outputs of the Design workstream). The Joint Committee even agreed in principle as to a preferred amount to be rated, which was to be initially \$15 per rating unit (so \$30 annually per ratepayer, consisting of \$15 extra in rates

¹² Grace, France-Hudson, and Kilvington. 2019. Reducing risk through the management of existing uses: tensions under the RMA. GNS Science report; 2019/55. p 54, citing and building on Ericksen et al (2003).

¹³ Ibid.

¹⁴ Hawke’s Bay Regional Council. 31 May 2019. Coastal hazards contributory fund to be established. Available from: <https://www.hbrc.govt.nz/our-council/news/article/703/coastal-hazards-contributory-fund-to-be-established>

to the relevant territorial authority and \$15 to the Regional Council). 'Finer detail' on the plan was to be developed before going out to consultation.¹⁵

33. This finer detail has not yet been set out and the fund has not yet been established. Council officials describe essentially being stalled in setting up the fund due to different views between councillors on which of them should collect from their ratepayers. On the one hand, there appears to be a degree of consensus that in principle the Regional Council should rate, as this is a 'cleaner' option than both the territorial authority and the Regional Council rating the same ratepayers separately for the same service. However, a \$15 rates increase on a territorial authority's rates is a much smaller percentage increase than the same amount on a RC's rates, given RCs rate a smaller amount to begin with. Most councillors stand on a platform of no or limited rates increases, so for regional councillors to be responsible for a decision to increase rates by almost 10% just for one coastal contributory fund appears to be a significant political hurdle.

Who should have the lead role has implications for 'who pays' for the public good element

34. Council officials are of the clear view that the debate around 'who rates', and who will therefore have the assets "on their books" (and will therefore have to track their value and depreciation, and plan for management and maintenance of them into the future), comes back to a fundamental disagreement as to who has or should have the lead role in coastal adaptation. The Regional Council's Regional Resource Management Plan sets out the respective responsibilities of the regional council and the territorial authorities in accordance with section 62(1)(b)(h) of the RMA. This allocates responsibility to both the Regional Council and territorial authorities for developing methods controlling the use of land for the purpose of the avoidance or mitigation of coastal hazards.
35. Table 2 sets out the various arguments that have been made for why primary responsibility for rating and owning/managing adaptation assets should sit with each respective level of local government.

Table 2: Regional council vs territorial authority – arguments for primary responsibility for adaptation

Regional council	Territorial authority
<ul style="list-style-type: none"> There is a parallel between adaptation and the current Regional Council role to provide and maintain flood protection works A regional approach is desirable due to overlaps in jurisdiction and the overall coordinating role for the regional council implementing the Regional Policy Statement (RPS) in setting direction through the combined RPS and Regional Plans RCs have jurisdiction below the Mean High Water Springs and are the RMA consent authority for any structures which will be in the coastal marine area 	<ul style="list-style-type: none"> City and district councils are more closely linked to communities and what they want Territorial authority assets (drinking water, wastewater and stormwater infrastructure, roads, reserves etc) will benefit from protection by coastal protection works Much of the coastal erosion is happening inland of the mean high water springs, which is territorial authority jurisdiction under the RMA Territorial authorities are building consent authorities under the Building Act. This role is applicable within their respective city/district and also extends to building consents for structures below mean high water springs (as distinct from RMA resource consents).

¹⁵ Minutes of a meeting of the Clifton to Tangoio Coastal hazards Strategy Joint Committee. 31 May 2019. Available from: <https://hbcoast.co.nz/assets/Document-Library/Minutes/CLI-31052019-MIN.pdf>

3.1.3 Options to address this challenge

36. Specific solutions to this issue that were raised and workshopped with interviewees include¹⁶:

- **Allocate clearer and more directive responsibilities for natural hazards and adaptation action as between the different levels of local government, via:**
 - the National Adaptation Plan (to be completed by mid-2022 under the Climate Change Response Act¹⁷)
 - Amendment to the Local Government Act
 - Amendment to sections 30 and 31 of the RMA
 - A National Policy Statement under the RMA on adaptation and natural hazards
 - New legislation for adaptation – eg, an Adaptation Act
- **Provide a stronger mandate for regional council/territorial authority collaboration, through a new legislative requirement to develop:**
 - a joint spatial plan/strategy for the region, covering adaptation
 - a transition strategy (covering adaptation and mitigation)
 - a regional risk assessment and/or adaptation plan (mirroring the Zero Carbon Act national-level requirements)
- **Central government coordinates the development of a coastline strategy for the whole of New Zealand (based on the UK Shoreline Management Plan model)**

3.1.4 There is a preference for more directive roles under the LGA, and both national direction under the RMA and new adaptation legislation are worth investigating.

37. Overall, council officials had a preference for clear and specific directives as to 'who does what' on coastal adaptation, which go beyond the level of specificity in current legislative provisions. They say that this would have helped cut through the politics of rating and the optics of rates increases. One official remarked: "if accountability was clear, we could just move on. If Hawke's Bay was a unitary authority we would not have a problem", although it was acknowledged that even a unitary authority would encounter a number of the other issues that the three councils are facing.
38. All councils referred to flood control as an area where responsibilities are clear and councils do not debate who pays for, or owns and maintains assets. The Regional Council has a clear lead role in this work.
39. There may be disadvantages to having just one level of local government appointed as a functional lead or primary responsible party in relation to coastal adaptation. There are good reasons why the responsibility should be joint, including that there are often a much wider and diverse group of stakeholders in relation to coastal hazards than in relation to flood protection schemes. Communities' expectations on how coastal hazards should be mitigated cross over with their expectations for access to public space and other amenities in the coastal environment. The appropriate lead agency in the context of the Hawke's Bay would not necessarily be the

¹⁶ The long-list of options is included at Appendix A. Note that in the course of the workshop not all options were given equal air-time. This section focuses on the key points of discussion and agreed areas of focus, rather than covering each of the workshopped options in detail.

¹⁷ As amended by the Climate Change Response (Zero Carbon) Amendment Act.

appropriate lead agency nationwide. For these reasons, some officials expressed concern at the idea of territorial authorities having their role reduced or eliminated by the allocation of a lead role solely to the Regional Council.

40. Officials also expressed that the issue of roles and responsibilities is broader than just RMA functions and is clearly linked to funding, ownership and maintenance of protection measures. So while national direction under the RMA that set out clear roles as between Regional Councils and Territorial Authorities may be of use, it would not be as helpful as direction under the Local Government Act.
41. While council officials expressed that direction under the LGA may be more helpful than RMA national direction in their particular circumstances, they also supported exploring new adaptation legislation being developed in the future that would rationalise the ecosystem of acts that are relevant to adaptation and assign a 'lead act' for climate change adaptation. This would include examining the respective roles of the Building Act, the Public Works Act, the Local Government Official Information and Meetings Act, the Civil Defence and Emergency Management Act and others. As the Climate Change Adaptation Technical Working Group (CCATWG) has previously pointed out, aspects of these pieces of legislation, including the time horizons they look out to, are not well aligned.¹⁸

Box 2: Hawke's Bay Regional Council's role in flood protection

The regional council manages two major flood control schemes on the Heretaunga Plains and Ruataniwha Plains. Ratepayers in these areas pay targeted rates through a land classification process to fund the maintenance work, and a portion of the Scheme costs are met from general funding sources, part of which is from rates levied on all rateable land within the Hawke's Bay region.

These schemes have been around in various forms since the 19th century, and benefited from significant central government co-funding in the mid-20th century on the basis of national-level benefits via protection of agricultural land and other assets.

3.1.5 There were mixed views on a strengthened mandate without more detail on specific roles

42. Options to introduce a stronger mandate for joint action were also discussed, on the basis that having a more directive mandate, even if responsibility was expressly joint, may give further weight to this work and force a compromise solution.
43. Council officials had mixed views on whether these options would help them overcome their issues. On the one hand, some officials felt that they were already doing this work and a central government direction would not help them progress at this point, though it might be of help to get other councils started. On the other hand, there was concern that if there was a change in political priorities, this work could be relegated in importance. It is worth noting that the Productivity Commission's report on Local Government Funding and Financing has highlighted the issue of further directive responsibilities from central government being handed down to local government without associated funding mechanisms.
44. Central government development of a nationwide coastal strategy was supported in principle as a good way to bring consistency of approach and high-level objectives around the country. Officials were of the view that this has been successful in the United Kingdom and goes beyond what the NZCPS and coastal hazards guidance do in New Zealand, with more active involvement by the central government to consolidate expertise, provide funding, and oversee a more

¹⁸ Action 7 of Recommendations from the Climate Change Adaptation Technical Working Group.

consistent national approach. There was also a view that, due to the need to make the most efficient use of limited resources, councils need to look at the sum of risks in their area as well as each individual risk, so it is potentially unhelpful to separate out coastal erosion and inundation from other risks.

45. The idea of having a national adaptation plan with a spatial element was also supported. However, while this option may help clarify roles as between central and local government, it would not in itself help resolve the roles and responsibilities issues at the local level, as it would be insufficiently detailed.

3.1.6 Next steps

- Further work could be done to evaluate whether allocating one level of local government (eg, the Regional Council) primary responsibility for natural hazards and climate change adaptation is a workable solution, and to test with councils in other regions what an appropriate allocation of more detailed responsibilities would be, and whether this could be done under the Local Government Act. This would need to be considered alongside other proposed changes to institutional roles and responsibilities currently being considered by the RM Review Panel.
- The Community Resilience work on roles and responsibilities could look at options under the RMA and LGA, alongside other options, and provide advice to Ministers.
- In the longer term, it is worth considering new climate change adaptation and natural hazard-specific legislation or other cross-cutting policy mechanism which has sufficient weight to influence both LGA and RMA processes, and provides an integrated approach to adaptation issues including:
 - a. How costs for adaptive action, including the building of new and maintenance of existing protective structures, should be allocated
 - b. Providing clearer direction on the process for approaching managed retreat, including rationalising/better aligning the relevant pieces of legislation that have a bearing on managed retreat e.g. the RMA, LGA, Public Works Act, the Building Act etc
 - c. Alignment of the aims of the NZCPS (prioritising natural coastal features) and community-led adaptation process objectives (which may result in interim hard structures)

3.2 Key challenge 2

3.2.1 Challenge: tools and mechanisms to manage current and future hazards are limited or inefficient

46. Council officials have expressed frustrations with the various tools and mechanisms available to them to implement the coastal strategy once it is finalised and adopted. The core concern is that there is a lack of clarity as to how the Dynamic Adaptive Pathways Planning approach is able to be implemented through the RMA and LGA. The framework for planning, consenting, funding, and implementation does not adequately consider changing risk profiles which require fast, responsive planning.¹⁹In particular, some interventions may require long lead-in times so that they are ready to be implemented when triggers are reached.

¹⁹ Lawrence, J., Bell, R., Blackett, P., Stephens, S., Allan, S. 2018. National guidance for adapting to coastal hazards and sea-level rise: Anticipating change, when and how to change pathway.

3.2.2 In particular, the system is not set up to respond dynamically to changing information

47. The frustrations imposed by RMA planning and consenting processes are not unique to adaptation. Slow and inflexible planning and consenting processes have been raised as a problem in a range of contexts, including as being a barrier to development.²⁰ The extra dimension that climate change adds is a context of increasing information as to the scale and impact of the problem, and also a fundamental uncertainty as to future trends, which are dependent on the global mitigation response. This is why the MfE guidance encourages councils to use a range of scenarios in their adaptation planning, and the reason a dynamic adaptive pathways approach is now the best practice approach to decision-making under deep uncertainty.
48. While work on this issue is ongoing through the Regulatory and Triggers workstreams, council officials' current view is that RMA processes are unlikely to be fit for purpose. Planning and consenting pathways can be slow and inflexible, particularly if there are court appeals, and RMA and LGA plans are not sufficiently integrated.
49. We note that there is active, ongoing research on the topic of implementing adaptive pathways in practice under the National Science Challenge.²¹ This includes questions on how absolute triggers should be (eg, should they trigger previously agreed plan-making provisions to 'drop in' to a plan, or should they just trigger the commencement of a planning or consenting process). This research, when available, will give further valuable perspective on what changes to the regulatory system will be necessary to implement this approach.

3.2.3 There are a range of examples as to how this is playing out in practice

50. Council officials give the following specific issues and examples:
 - A single public objector has the ability to significantly delay planned works to manage risks. This has happened in relation to the consenting of a rock wall at Clifton which was widely supported by the community, except for a single submitter. Delays to implementing agreed coastal protective measures have real impacts in terms of ongoing erosion impacts and may affect the viability of subsequent pathways steps.
 - Council officials highlighted that if they get an agreed approach to implementing the Coastal Hazards Strategy, there will still be considerable lag time before the agreed Strategy can be implemented through RMA plans. Officials highlighted that in their experience plan changes can take 7-10 years, by which time the data and information they have collected to inform their Strategy is likely to be out of date.
 - There is a lack of integration between LGA and RMA planning processes - the Hawke's Bay councils are currently in the process of trying to get an agreed strategy, including planning for funding of works, out to community consultation. Once this is agreed to by councillors, it will be consulted on and adopted under the LGA. Officials are concerned that even once the strategy is officially adopted, it will have limited status and ability to influence council activity in other areas, e.g. RMA planning. Furthermore, if any agreed actions from that LGA planning process need to be incorporated into RMA planning documents (e.g. RPS, regional plans and/or district plans), then those RMA plan change processes prescribe further public consultation and opportunity for public input, as would any further subsequent notified resource consents processes – potentially replicating multiple times the community engagement conversations for the outcome and/or method already agreed in the LGA process.
 - The Long Term Plan process is not 'strategic enough' to signal funding for coastal hazards as it effectively only looks out to the next three years in any detail, with less detail for years 4-10. This

²⁰ New Zealand Productivity Commission. 2017. Better urban planning: Final report, p 206.

²¹ Dr Judy Lawrence, Dr Rob Bell and others are carrying out this research under the Deep South NSC.

is problematic when councils are attempting to put in place long term (e.g. 100 year +) plans and where responses like managed retreat are likely to be incredibly expensive at any scale and require very long lead times to implement effectively. There is an argument that any 'hard' or 'engineering' responses should fall under 'critical infrastructure' and as such require a 30-year look-ahead period in LTPs (as for roads and 3 waters).

- The Regional Council had previously attempted to restrict subdivision in a river catchment which was clearly located in a hazardous location subject to flash flooding, but was overruled by the Environment Court.²² Councils are concerned that they will be taken to court if they try to strengthen provisions to prevent development occurring in areas that would be protected by any new works. They are also worried about their liability if these areas are impacted by natural hazards in future.
 - The NZCPS preference for avoiding built structures in the coastal marine area conflicts with communities' desire to protect their assets in the short-medium term. While councils do not believe the NZCPS has significantly impacted their consenting processes thus far, they are concerned about how it may impact in the future if they decide to do a 'whole of coast' consenting process.
51. Note that most of the issues outlined above are not unique to climate change adaptation, but are wider systemic problems in the resource management system.

3.2.4 Options to improve tools and mechanisms

52. Options raised by and discussed with officials to address these issues include²³:

- Have Dynamic Adaptive Pathways Planning expressly recognised in the RMA, and allow approaches to be better implemented through the RMA, for example through:
 - Streamlining of decision-making, for example through reduced participation and appeals rights at a consenting stage after a collaborative process to develop a coastal strategy
 - Integration of LGA and RMA processes for adaptation planning, e.g. so that Long Term Plans lay out pathways and associated infrastructure and financial strategies to accommodate those pathways
 - Support for the implementation of more restrictive planning rules in areas where the long-term pathway indicated is managed retreat, to mitigate the risk of pressure to develop behind protective structures once they are built
- National direction (an NPS, NES or Planning Standard) that
 - provides a standard methodological approach to assessing risk, including 'significant risk', and consideration of the totality of risks posed by natural hazards and climate change
 - sets out standard sea level rise scenarios for councils to plan for (eg, 'x metres over x years'), and/or specifies activity classifications to apply to activity within specified elevation above sea level
- Amend the Local Government Act to give greater weight to plans adopted under it

²² https://www.nzherald.co.nz/hawkes-bay-today/news/article.cfm?c_id=1503462&objectid=10931123

²³ The long-list of options is included at Appendix A. Note that in the course of the workshop not all options were given equal air-time. This section focuses on the key points of discussion and agreed areas of focus, rather than covering each of the workshopped options in detail.

- Next review of NZCPS to look into whether there could be ‘transitional provisions’ that could be supportive of community aspirations for hard engineering approaches to adaptation as a transitional pathway

Planning processes need to be more flexible and adaptive, and community engagement needs to be appropriate

53. Council officials had a range of views on these options and whether they would address the key issues they will face in implementing the agreed strategy. A key theme is that climate change adaptation will require councils to engage with communities extensively over the long-term, beyond the scope of existing council engagement processes. If this up-front and ongoing consultation is robust and representative, there is a strong argument for streamlining subsequent parts of the plan making and consenting process to avoid engagement fatigue and enable plan making to respond in an agile way to signals and triggers which have been previously agreed by communities.
54. Officials have expressed that in principle it may be possible to introduce pathways approaches into their planning and consenting, but the process for how to do this is not clear, and it is likely to be costly and time-consuming under current provisions. As an interim solution, councils are keen to explore with MfE whether the Streamlined Planning Process introduced under the Resource Legislation Amendment Act could be used to implement the Strategy.

There also needs to be better integration across the relevant legislation

55. One solution proposed is to consider fully integrating LGA and RMA planning processes. This could involve setting out adaptive pathways in District Plans and using Long Term Plan processes as the prompt for a 3-yearly review. If triggers were reached, then associated plan provisions could come into force automatically (or via an expedited planning process). Councils could also be required to complete options and trigger analysis for years 6-10, i.e. beyond the current electoral cycle, so there is always visibility for communities about what is coming and at least two electoral cycles before those decisions are implemented.
56. This option would likely require enhanced LGA consultation requirements to match the rigour of the RMA Schedule 1 consultation process and would likely require changes to both acts to embed the process. Advantages of such an approach would include streamlining community consultation by pulling the land use, infrastructure, and services discussion into a single conversation over each three year block, rather than the current approach of multiple consultations on multiple issues.

Councils are keen for specific direction on where to avoid building, to alleviate liability concerns

57. Council officials were also interested in the idea of having more direction from central government on where building should not be taking place, for example central government effectively ‘picking a number’ for metres of SLR to avoid. The intention would be to reduce the risk of councils being taken to court by developers for overly restrictive planning provisions. Challenges with this idea include that the impacts of sea-level rise on a specific coastal location also depend on local geology, as well as natural features and local human-induced changes to the landscape. Vulnerability of local communities and assets also needs to be considered, as this will not be uniform around the country. MfE’s coastal hazards guidance also advocates considering a range of scenarios rather than one fixed number.

3.2.5 Next steps

58. As more councils start to follow the path that the Hawke’s Bay councils are navigating, there is some urgency to set out a workable process to implementing the best practice DAPP approach. In the short term:
 - MfE could engage further with technical specialists in the Hawke’s Bay councils to discuss the key barriers they see to implementing the Strategy through existing RMA procedures.

- The Resource Management Review Panel could consider how planning processes could be streamlined to allow for agile responses to changing risks, and how LGA and RMA processes could be better integrated for natural hazards and adaptation planning.
- Policy work could be undertaken to design what a DAPP-enabling system would look like in practice, including further close work between central government policymakers and researchers who are examining these issues through the National Science Challenge.

3.3 Key challenge 3

3.3.1 Challenge: there is a lack of agreed approach and principles for sharing costs of works

59. The total cost of the works to implement the coastal hazard strategy is likely to be very large, with high-level estimates from Tonkin and Taylor in 2016 putting the figure at \$130-285 million²⁴ over the Strategy's 100-year planning horizon.²⁵ In addition, there will be ongoing costs of maintaining any structures built.
60. In addition to the issue outlined in key challenge 1 above as to who should be rating for the 'public benefit' part of the costs (as between the Regional and District/City Councils) there is the question of where the line drawn is between what is paid for by general rates via the contributory fund, and what should be paid for by targeted rates for those properties identified as 'beneficiaries' of works.
61. According to officials, one of the founding principles in the strategy was that those who most directly benefited from the protective measures should pay for that protection. However, in practice the councils have faced challenges in applying a public/private split assessment which reflects an appropriate contribution from those who directly benefit from works, particularly when attempting to consider the issue of affordability (as required by s101(3) of the Local Government Act).
62. Officials describe a decision-loop, where if costs apportioned on a beneficiary basis to private landowners are considered unaffordable, those costs typically must then be shifted to a general rate. The general rate in turn may itself then become unaffordable when considered in the context of other rates increases, fixed incomes, and principles of fairness. This affordability loop can paralyse project funding decisions, and will become more complex when considering funding retreat options where the direct beneficiaries are likely to be more difficult to identify and costs will be significant.

3.3.2 The LGA sets out ratings considerations for councils

63. Councils make ratings decisions under the Local Government Act and the Local Government (Rating) Act 2002. Rates are councils' major revenue source, making up 47 per cent of total revenue in 2018.²⁶ Rates can be general (every ratepayer pays) or targeted (those who directly benefit from a service pay more). Section 101(3) of the Local Government Act sets out what councils must consider in determining their funding needs, including ratings decisions, and requires consideration of:

²⁴ Minutes of a meeting of the Clifton to Tangoio Coastal Hazards Strategy Joint Committee. 31 May 2019. Available from <https://hbcoast.co.nz/assets/Document-Library/Minutes/CLI-31052019-MIN.pdf>

²⁵ Minutes of a meeting of the Clifton to Tangoio Coastal Hazards Strategy Joint Committee. 31 May 2019. Available from <https://hbcoast.co.nz/assets/Document-Library/Minutes/CLI-31052019-MIN.pdf>

²⁶ New Zealand Productivity Commission. (2019). Local government funding and financing: Final report. Available from www.productivity.govt.nz

- The community outcomes to which the activity contributes
- the distribution of benefits between the community as a whole, any identifiable part of the community, and individuals
- the period in or over which those benefits are expected to occur
- the extent to which the actions or inactions of particular individuals or a group contribute to the need to undertake the activity
- the costs and benefits, including consequences for transparency and accountability, of funding the activity distinctly from other activities the activity

3.3.3 In practice, councils are struggling to take a consistent approach to applying the benefit principle

64. In practice, officials say that the benefit principle is routinely watered down by application of the 'ability to pay' or 'affordability' principle. This appears to be used as a veto in cases where beneficiaries simply will not want to pay the 'true cost' of measures that protect their property. In part this may be due to the fact that they have never been asked to fully contribute to this in the past, so councillors face political pushback when residents are first confronted with these costs.²⁷

Box 3: Whakarire Avenue (Westshore Napier)

This was a \$2.4m revetment (barricade) project designed to largely defend 12 properties north of Napier but it would also provide an opportunity for formalising public access along the coast. Officials carried out a public/private benefit assessment which came out at 97/3 private/public, but the property owners objected and councillors determined through following the S 101 (3) assessment that it was a 3/97 private public split. The issue is still live and will need to be reconsidered as part of the next annual plan process.

65. Officials described previous attempts to take a rigorous approach to applying a public/private split to works, e.g. at Whakarire Avenue (see Box 3), being impacted by political considerations and the risk of homeowners taking legal action against the council if their rates 'suddenly' increase as the split is amended to reflect beneficiaries paying more.

66. As part of the strategy development, council officials commissioned a set of 'base case' scenarios for how a public/private split should be calculated for particular interventions. These were intended to be used as a starting point and departures from this baseline formula can be made if there are good reasons to do so (for example, if a particular beach is a regionally significant holiday destination or recreational facility there may be a stronger argument for a higher public contribution to reflect this).

²⁷ See also the Local Government Business Forum submission on the LGA 2002: "[T]oo often councils make... important decisions [about the allocation of rates] based on political or populist factors rather than an objective analysis of ability to pay and beneficiary pays". Quoted in the draft Productivity Commission report on Local Government Funding and Financing at p 192.

Table 3: Base case scenarios for different interventions

Option	Private	Public
Status Quo	0%	100%
Renourishment	50%	50%
Renourishment + control structures	60%	40%
Sea wall	80%	20%
Inundation Protection	80%	20%
Retreat the line	90%	10%

67. The Hawke's Bay councils are among a small number of councils in New Zealand who have started anticipatory adaptation planning for their coastlines, and are finding that other councils are not yet at the stage of planning where they can have substantive conversations about how to develop a consistent funding approach to a whole of coast protection Strategy. There is no 'right' answer to the question of public/private splits or ability to pay, but councils are finding themselves in need of support in their attempts to approach the allocation of costs in a consistent, principled way, and they are worried about setting precedents for other councils.

3.3.4 Options to address the issue

68. Options raised by and discussed with workshop participants to address this issue include²⁸:
- Central government **guidance on how public/private benefits** should be allocated
 - Amending the Local Government Act section 101(3) to **strengthen the 'benefit' consideration** for rating decisions
 - Introduce the **ability for councils to rate more broadly**, including e.g. utilities, ports, central government, for any of their assets protected by coastal works.

There is a preference for central government support for a 'base case' approach

69. Council officials considered that a more specific and standardised approach, supported by central government, would give councillors much stronger support to follow a more rigorous approach to allocating private benefits for the purposes of rating decisions. The principles and information outlined in Treasury's guidance on public sector charges may be a useful starting point.²⁹
70. Overall, participants considered that it would be of most help to develop a protocol for use by councils and other decision-makers to apply around the country on how to approach the question of costs allocation for adaptation action. This could include how to apply a public/private split to questions of who pays for protective works, managed retreat, or other adaptation action. Hawke's Bay councils' 'base case' has been developed (Table 3 above), which should be used as a starting point to test broader applicability of the principles around the country. This mirrors broader questions around who should pay as between the national and local levels of government, and a principled approach should be taken to answering both questions.

²⁸ The long-list of options is included at Appendix A. Note that in the course of the workshop not all options were given equal air-time. This section focuses on the key points of discussion and agreed areas of focus, rather than covering each of the workshopped options in detail.

²⁹ <https://treasury.govt.nz/publications/guide/guidelines-setting-charges-public-sector-2017-html>

Strengthening the benefit principle under the LGA may not directly address the challenge, but there does need to be a conversation about the principles for central government contributions to adaptation action.

71. There are differences in view among council officials on whether strengthening the benefit principle by amending the LGA would address the problem they are facing. Ratings decisions are inherently complex and reflect local choices and preferences around services. There is a danger in being too prescriptive as to exactly how they should be made. Officials saw value in having some flexibility and expressed that there were big differences in the ability to pay of different coastal communities, and that some communities would genuinely not be able to afford a stricter application of the principle.
72. There are different views as to whether allowing councils to rate more broadly would help. Some officials considered that rating a large number of organisations for a single structure may be overly complicated and would result in costs being passed back to consumers anyway, for example, if electricity transmission infrastructure were to be rated for the benefit provided by protective works, these costs would likely be passed on to customers.
73. However, there was strong support for some kind of contribution from central government where central government assets are protected by structures funded and maintained by local government. This was seen as 'free riding' behavior, though councils acknowledged that the quid-pro-quo for central government contribution may be more central government involvement in decision-making. Another argument for a broader public contribution was that climate change impacts are caused by all of society but felt unequally, particularly in the case of sea level rise.

3.3.5 Next steps

74. In principle, a protocol or guidance note on public/private split base case for coastal adaptation could be developed in a reasonably short time. Issues that would need to be further explored would include:
 - to what extent the base cases developed in the Hawke's Bay would be applicable around the rest of the country.
 - How such a protocol would interact with or complement the Treasury's work through the Community Resilience Group which is developing principles and approaches to funding and financing at a national level.

4. Key findings and recommendations

4.1 Key findings

1. The development of the *Clifton to Tangoio Coastal Hazards Strategy 2120* has been an exemplar for council collaboration and has helped start to change the conversation about climate change adaptation locally and nationally
2. The costs of implementing the Strategy are likely to be very large, with indicative figures in the hundreds of millions of dollars over the next 100 years. This raises issues as to the overall affordability of implementing the Strategy, and brings to the fore questions around a fair division of costs as between the general public and specific beneficiaries, as well as between generations.
3. Legislative roles and responsibilities in relation to natural hazards and coastal adaptation include some ambiguities and overlaps, as well as a disjointed approach to management of responses between natural hazards risk management and climate change adaptation. This is stalling councils' ability to make decisions on how to implement their Strategy, particularly with regard to who should collect rates to help fund the Strategy. No resolution to this problem is currently in sight.
4. Councils want clear and specific directives as to 'who does what' on coastal adaptation, which go beyond the level of specificity in current legislative provisions. The questions to be clarified include:
 - Which level of local government is expected to take the lead on coastal natural hazards and adaptation where roles are joint or overlapping?
 - Who should fund adaptation action and on the basis of what principles?
 - Whose role is it to collect revenue or funds for any public or private good?
 - Who is responsible for the ongoing maintenance and management of any protective structures?
 - Who is responsible for implementing any managed retreat options, and how might this be achieved and funded?
5. Councils are looking ahead to implementation of their Strategy through the LGA and RMA, and consider that the tools and mechanisms available to them under those acts are not sufficiently agile, or well-integrated.
6. In particular, it is not clear to what extent Dynamic Adaptive Pathways Planning is able to be effectively implemented through existing LGA and RMA processes.
7. Councils are concerned, based on past Environment Court decisions, that they will not be able to implement appropriately restrictive zoning to avoid further building behind defensive measures.
8. Councils are struggling to make decisions on how to consistently apply the benefit and affordability principles in making decisions on targeted rates and are facing push-back from communities who either do not want to pay the full cost of implementing the protective measures from which they will benefit, or consider that an increase in their general rates for coastal protective works or managed retreat represents an unfair 'subsidy' for those living on the coast.
9. The conversation around 'who pays' and how to apply the benefit principle locally needs to be integrated with a national-level conversation on a fair and equitable division of the costs of adaptation action between central and local government.

The Hawke's Bay councils are yet to agree on the apportionment of roles and responsibilities as between the Regional Council and the Territorial Authorities. This could in principle be resolved with regard to 'who should rate' at some point in 2020 if councillors reach agreement and take the next step towards public consultation under the LGA. However, as other councils seek to follow their lead, they are likely to face the same or similar issues. Part of the Hawke's Bay councils' concern is that whatever they decide to do will set a precedent for the rest of the country without having been informed by principles that would have national applicability.

Councils arguably have a much stronger mandate for action in relation to coastal hazards through the New Zealand Coastal Policy Statement, so if issues as to respective responsibilities are playing out in this area, they are likely to spill over to adaptation issues beyond the coastal environment, including in relation to issues inland such as conservation of groundwater resources and rural resilience issues.

MfE and the Hawke's Bay Regional Council therefore make the following recommendations to the RM Reform Panel and Community Resilience Ministers.

4.2 Recommendations

Note that these recommendations do not represent government policy and further work needs to be done to explore them. Decision-making on any policy positions sit with Government Ministers.

A systems approach needs to be taken to address the issues raised in this paper, and the following recommendations are interdependent – central government should consider the following avenues:

1. The issues and options raised in this report could be considered in the comprehensive review of the resource management system due to be reported to the Minister for the Environment in May 2020.
2. Agencies involved in the roles and responsibilities work being carried out as part of the Community Resilience group could provide advice to Community Resilience Ministers on how the roles and responsibilities of district and city councils, regional councils and central government in relation to natural hazards and climate change adaptation could be clarified and made more directive by way of:
 - a. new provisions in the Local Government Act
 - b. national direction under the RMA on natural hazards and climate adaptation
 - c. other options to be developed and analysed
3. Central government could consider the case for providing further direction on an integrated approach to adaptation issues including:
 - a. How costs for adaptive action, including the establishing of new and the maintenance of existing protective measures and managed retreat, should be allocated
 - b. Providing clearer direction on the process for approaching managed retreat, including rationalising/better aligning the relevant pieces of legislation that have a bearing on managed retreat eg, the RMA, LGA, Public Works Act, the Building Act etc and establishing a national model (which allows for local variation) for funding and implementing a managed retreat response
 - c. Supporting councils to implement appropriately restrictive zoning to avoid further building behind defensive measures, and clarify liabilities including in relation to unexpected failure of works
 - d. Alignment of the aims of the NZCPS (which seems to prioritise natural coastal features, especially given recent Environment Court decisions) and community-led adaptation process objectives (which may result in interim hard structures as a transition to a longer-term resilient path)

This could be pursued through primary or secondary legislation, including potentially new natural hazard risk management and climate change adaptation-specific legislation which sits outside existing LGA and RMA processes.

4. Policy work could be undertaken to develop a system that enables better integration of Dynamic Adaptive Pathways Planning approaches by, for example:
 - a. explicitly acknowledging/encouraging and providing for a dynamic pathways approach under the RMA as the preferred approach to dealing with deep uncertainty surrounding risks posed by natural hazards and climate change
 - b. consider how robust up-front community engagement on adaptation could be offset with more streamlined plan-making and consenting processes which implement an entire planning pathway at once while allowing for flexibility to remain adaptive (ie, agile).
 - c. consider linking LGA and RMA planning processes more closely, for example by using District Plans for adaptive pathways, and providing a mandate for LTP processes to incorporate a review of signals and triggers every 3 years, while signalling likely planning and investment pathways 6-10 years out
 - d. consider whether changes to the RMA could be made to facilitate dynamic adaptive pathways planning approaches and associated consenting frameworks that are agile and provide for longer-term solutions.
5. Central government could consider developing a protocol for use by councils and other decision-makers to apply around the country on how to approach the question of costs allocation for adaptation action. This could include how to apply a public/private split to questions of who pays for protective works or adaptive action and for managed retreat. Hawke's Bay councils 'base case' has been developed, which could be used as a starting point to test broader applicability of the principles around the country.
6. Central government could consider the case for contributing to funding adaptation action by developing principles for 'who pays' between central and local government and other actors including the private sector. This could be based on, for example:
 - a. Central government assets protected by council-funded mitigation works – e.g. roads and schools
 - b. Consideration of equity of outcomes around the country – e.g. where councils with small rating bases would have trouble funding adaptation or ratepayers would genuinely not be able to afford increased contributions.

Appendix A – long list of options workshopped with council officials on 4 December 2019

Theme	Option
Core responsibilities for adaptation appear ambiguous	Stronger mandate for regional council/territorial authority collaboration, through a requirement to develop: <ul style="list-style-type: none"> • a spatial plan/strategy • a transition strategy (covering adaptation and mitigation) • a regional risk assessment and adaptation plan
	Central government coordinates the development of a coastline strategy for the whole of New Zealand (based on the UK model)
	Amend sections 30 and 31 of the RMA to clarify RC and TA roles in re natural hazards and adaptation
	Guidance from central govt to councils on how to approach managed retreat
	Requirement on local govt to do a (local or regional) risk assessment and adaptation plan
	National Policy Statement that allocates primary responsibilities for adaptation
	New Adaptation Act which sets out roles and responsibilities of central government, regional councils and territorial authorities
	Set out guidance/expectations on roles and responsibilities through the National Adaptation Plan
	Set out roles and responsibilities through the Local Government Act

Tools and mechanisms to manage existing risks are limited or inefficient	Enable Dynamic Adaptive Pathways Planning approaches to be implemented through the RMA
	Longer lapse periods for consents to enable pathways to be planned out in advance
	Reduce participation and appeals rights at a consenting stage where there's been an extensive collaborative process to come up with a coastal strategy.
	Introduce Town and Country Planning Act idea of submitters in notified consents processes needing to have 'standing'/ an interest greater than the general public in order to participate
	Improvements to streamline planning processes under the RMA, and consideration of whether Streamlined Planning Process or similar process could be used where a collaborative process has previously been carried out
	Review of New Zealand Coastal Policy Statement – introduce 'transitional' provisions to allow for structures in the coastal environment if there is a long-term plan for retreat.
	Amend the Local Government Act to give greater weight to plans adopted under it
Lack of agreed approach and principles for dividing costs of works	National direction (NPS or NES) that 'picks a number' for sea level rise to avoid completely (e.g 'no development within 2m')
	National direction (NPS or NES) that sets out a standard approach to risk assessment
	Contestable or contributory fund for climate adaptation <i>E.g. if a council/region sets up a fund to implement a strategy following MfE's Coastal Hazards Guidance, CG will chip in/ match money invested</i>
	Guidance on how public/private benefits should be allocated and how affordability should be assessed/managed

	Independent technical advisory group to make decisions on public/private split allocations “like the Waitangi Tribunal’ at a regional scale– non-binding recommendations to councils”
	Strengthening the ‘benefit’ considerations for rating under section 101(3) of the Local Government Act
	Introduce the ability for councils to rate more broadly, including e.g. utilities, ports, central gov, for any of their assets protected by coastal works
Other/capability and capacity/	Govt support/funding of research to implement a Dynamic Adaptive Pathways Planning approach, e.g. how absolute are triggers, what does managed retreat look like in practice for councils, etc
	Govt implementation support – closer ties between central government and local government ‘flying squad’/panels of experts who could be ‘helicoptered in’ to provide expertise and assist with work
	Climate representative at Regional Council to feed back to central government policy development