# RESTORING NATURE

## Reform of the conservation management system

Deidre Koolen-Bourke, Raewyn Peart, Billy van Uitregt and Claire Dowsett

# RESTORING NATURE

## Reform of the conservation management system

**Deidre Koolen-Bourke, Raewyn Peart, Billy van Uitregt and Claire Dowsett**

First published August 2024

Published by:
Environmental Defence Society Incorporated
P O Box 91736 Victoria St West
Auckland 1142

Phone (09) 302 2972

manager@eds.org.nz

www.eds.org.nz

www.environmentguide.org.nz

ISBN 978-0-9951186-7-6



Front cover image: Green gecko at Lewis Pass, Rob Suisted/Nature's Pic

Back cover image: Toetoe, Bernard Spragg

Other images: Raewyn Peart unless otherwise credited

Design and artwork: Neale Wills, Wilsy Design and Production Ltd.

Printed by: Crucial Colour

Copies can be downloaded from www.eds.org.nz

## Table of contents


| | | |
|---|---|---|
| **1** | **Introduction** | 1 |
| 1.1 | Background to the report | 2 |
| 1.2 | Scope and methodology | 4 |
| 1.3 | Structure of the report | 4 |
| **PART 1** | **What the conservation system needs to achieve** | 7 |
| **2** | **Purpose of conservation management** | 9 |
| 2.1 | Overview of conservation legislation purposes | 9 |
| 2.2 | Core concepts in conservation legislation | 13 |
| | 2.2.1 Conservation | 13 |
| | 2.2.2 Nature conservation | 14 |
| | 2.2.3 Natural state | 14 |
| | 2.2.4 Freedom of entry | 16 |
| | 2.2.5 The "public interest" in conservation | 16 |
| 2.3 | More recent shifts in approach | 17 |
| | 2.3.1 Conservation economy (~2010) | 17 |
| | 2.3.2 Well-being and ecosystem services (~2016) | 18 |
| | 2.3.3 Connection and Treaty partnership (~2019) | 18 |
| | 2.3.4 Restoring Papatūānuku (~2020) | 19 |
| | 2.3.5 Valued introduced species (2023) | 23 |
| | 2.3.6 Conservation journey so far | 23 |
| 2.4 | Where to next? | 25 |
| **PART 2** | **Providing for Māori within the system** | 31 |
| **3** | **Challenges for Māori within the current system** | 33 |
| 3.1 | Framing based on Pākehā values | 34 |
| 3.2 | Crown ownership of wildlife and conservation land | 35 |
| 3.3 | Lack of clarity on Māori rights within the system | 35 |
| 3.4 | Failure to give effect to the full range of Treaty principles | 36 |
| 3.5 | Poor provision for partnership | 38 |
| **4** | **Centering tino rangatiratanga and mana motuhake in a reformed system** | 41 |
| 4.1 | Waitangi Tribunal claim (Wai 262) | 41 |
| | 4.1.1 Ko Aotearoa Tēnei report | 41 |
| | 4.1.2 Government response and Te Tumu mō te Pae Tawhiti | 43 |
| | 4.1.3 Biological Heritage National Science Challenge recommendations | 45 |
| | 4.1.4 Options Development Group recommendations | 46 |
| | 4.1.5 Treaty settlement provisions and promises | 47 |
| | 4.1.6 Co-ordinated implementation across systems | 48 |
| 4.2 | Operationalising Māori concepts in a reformed system | 48 |
| | 4.2.1 Kaitiakitanga | 48 |
| | 4.2.2 Mauri | 49 |
| | 4.2.3 Mana | 49 |
| | 4.2.4 Whakapapa | 50 |
| | 4.2.5 Rangatiratanga and mana motuhake | 50 |
| | 4.2.6 Kotahitanga | 50 |
| 4.3 | Contemporary approaches which draw synergies with te ao Māori | 51 |
| | 4.3.1 Ecosystem-based management | 51 |
| | 4.3.2 Rights of nature and legal personality for natural features | 51 |
| | 4.3.3 Environmental justice | 53 |
| 4.4 | Recommendations for reform | 54 |
| **PART 3** | **Some key challenges** | 57 |
| **5** | **Climate change and conservation** | 59 |
| 5.1 | The climate challenge | 59 |
| 5.2 | International commitments | 61 |
| | 5.2.1 United Nations Framework Convention on Climate Change | 61 |
| | 5.2.2 Convention on Biological Diversity | 63 |
| 5.3 | Conservation system responses to climate change | 64 |
| | 5.3.1 Policies and plans | 65 |
| | 5.3.2 Concessions | 66 |
| | 5.3.3 Climate Change Adaptation Action Plan | 67 |
| | 5.3.4 Conservation climate goals | 69 |
| 5.4 | A climate-responsive conservation system | 71 |
| 5.5 | Recommendations for reform | 72 |
| **6** | **Introduced species management** | 75 |
| 6.1 | The nature of the challenge | 75 |
| 6.2 | Lack of coherent management framework for invasive species | 76 |

6.2.1 Shifting legislative frames 76
6.2.2 Underdeveloped management framework 78
6.2.3 Patchy and unaligned regulatory framework 81
6.3 Poor interface with the biosecurity regime 84
6.3.1 Primary production focused biosecurity regime 85
6.3.2 Poor alignment between conservation and regional council biosecurity 86
6.4 Applying a risk assessment framework 88
6.4.1 Environmental Impact Classification for Alien Taxa 88
6.4.2 European Union Invasive Alien Species Regulation 89
6.4.3 Application to Aotearoa New Zealand 90
6.5 Recommendations for reform 92

**7 Tourism and conservation** 95
7.1 The nature of the challenge 96
7.2 Conservation system response to tourism 97
7.2.1 Statutory documents 97
7.2.2 DOC non-statutory documents 100
7.2.3 MBIE-related documents 101
7.3 Recommendations for reform 104

**PART 4 Core areas of reform** 107

**8 Conservation institutions** 109
8.1 Department of Conservation's structure 109
8.1.1 Structural evolution 110
8.1.2 Lack of boundary alignment 110
8.1.3 Lack of presence at place 111
8.1.4 Recommendations for reform 111
8.2 New Zealand Conservation Authority 112
8.2.1 History of the NZCA 112
8.2.2 Unclear purpose and functions 115
8.2.3 Dependence on DOC 119
8.2.4 Lack of funding 119
8.2.5 Recommendations for reform 120
8.3 Conservation Boards 120
8.3.1 History of Conservation Boards 120
8.3.2 Unclear purpose and functions 121
8.3.3 Dependence on DOC 123
8.3.4 Lack of funding 124
8.3.5 Recommendations for reform 125
8.4 Providing for Māori 126
8.4.1 National institutions 126
8.4.2 Place-based institutions 127
8.4.3 Other DOC institutional reforms 128
8.4.4 Recommendations for reform 129
8.5 Fish and Game 130
8.5.1 History of Fish and Game 130
8.5.2 Functions 130
8.5.3 Governance 132
8.5.4 Recommendations for reform 133
8.6 Game Animal Council 134
8.6.1 Structure and functions 134
8.6.2 Recommendations for reform 135
8.7 Bespoke conservation institutions 136
8.7.1 Range of bespoke institutions 136
8.7.2 Recommendations for reform 137
8.8 Specialist scientific advisory bodies 137
8.8.1 Recommendations for reform 138

**9 Wildlife protection** 141
9.1 Starting points 141
9.2 Reform options 141
9.2.1 Crafting new purposes 145
9.2.2 Threat management 145
9.2.3 Recovery planning for threatened species 145
9.2.4 Species management, permitting and utilisation 146
9.3 Recommendations for reform 147

**10 Conservation management planning** 149
10.1 Issues with the conservation management planning system 150
10.1.1 Significant delays 150
10.1.2 Outdated and inconsistent planning documents 151
10.1.3 Unclear institutional roles and relationships 151
10.1.4 Data and information systems poorly configured to support planning 153
10.2 Māori within the conservation management planning system 153

10.3 Public participation in the conservation system 153
10.3.1 Role of conservation groups 153
10.3.2 Role of citizen science 155
10.4 Protected area designation 155
10.5 A new conservation management planning system 157
10.5.1 New national documents 158
10.5.2 New plans 158
10.5.3 New planning procedures 159
10.5.4 New consenting system 160
10.6 Recommendations for reform 163

**11 Funding conservation** 165
11.1 The funding gap 165
11.2 Current sources of funding 167
11.3 Recognising the value of the conservation estate to tourism 168
11.4 Potential new sources of biodiversity funding 169
11.4.1 International Visitor Conservation and Tourism Levy 169
11.4.2 Concession charges 169
11.4.3 Realigning income and revenue 169
11.4.4 Carbon credits 170
11.4.5 Payment for biodiversity performance 170
11.4.6 Environmental footprint tax 170
11.5 Recommendations for reform 171

**12 Closing comments** 173
**Summary of recommendations** 174
**Appendix: Methodology** 184
**References** 185

## Table of figures

**1.1** Conservation Law Reform Roadmap 3
**2.1** Subject, purpose and rationale of selected conservation legislation 12
**2.2** Word clouds generated from the text of the National Parks Act 1980 and Marine Reserves Act 1971 15
**2.3** The ecosystem services model of well-being 18
**2.4** Word cloud generated from the text of Te Mana o Te Taiao 19
**2.5** Papatūānuku thrives framework 21
**2.6** The conservation journey from the 1920s to the 2020s and beyond 24
**4.1** Te Tumu mō te Pae Tawhiti programme of works 44
**4.2** Biological Heritage National Science Challenge recommendations for conservation reform in response to the Wai 262 report 45
**4.3** Options Development Group recommendations for conservation reform 46
**4.4** Te Mana o te Wai framework under the National Policy Statement for Freshwater Management 2020 49
**6.1** Pest management system under the Biosecurity Act 1993 84
**6.2** ICUN Environmental Impact Classification for Alien Taxa 89
**6.3** IUCN Environmental Impact Classification for Alien Taxa categories and criteria 89
**7.1** International visitor arrivals to New Zealand 1922-2023 96
**8.1** Powers and functions of the NZCA and its historical counterparts 114
**8.2** Membership of the NZCA contrasted with that of the former National Parks and Reserves Authority and Nature Conservation Council 116
**8.3** Reported NZCA performance of core functions and powers between 2017 and 2022 118
**8.4** NZCA annual funding 119
**8.5** Historical budgets for selected Conservation Boards 124
**9.1** Summary of key issues with the Wildlife Act and reform options 144
**10.1** Status of National Park Management Plans 150
**10.2** Proposed conservation area designation reclassification 156
**10.3** Summary of a proposed strengthened conservation management planning system 162
**11.1** Changes in DOC and Vote Conservation Budgets 2014/15 – 2023/2024 166
**11.2** Conservation Board budgets 2020-2022 166
**11.3** Overview of the financial ecosystem for the conservation estate 167
**11.4** Total biodiversity spending by regional and unitary councils 168
**11.5** Additional funds generated for conservation by earmarking profits from the estate 169
Key elements of a new conservation system 179

## List of Acronyms

| | |
|---|---|
| **Adaptation Plan** | Climate Change Adaptation Action Plan |
| **CMS** | Conservation Management Strategy |
| **CMP** | Conservation Management Plans |
| **Director-General** | Director-General of Conservation |
| **DOC** | Department of Conservation |
| **EICAT** | Environmental Impact Classification for Alien Taxa |
| **EDS** | Environmental Defence Society |
| **ETS** | Emissions trading scheme |
| **IUCN** | International Union for Conservation of Nature |
| **IVL** | International Visitor Conservation and Tourism Levy |
| **Fish and Game** | New Zealand Fish and Game Council |
| **General Policies** | Conservation General Policy and the General Policy for National Parks |
| **IPCC** | Intergovernmental Panel on Climate Change |
| **MBIE** | Ministry of Business, Innovation and Employment |
| **MPI** | Ministry for Primary Industries |
| **NPD** | National Policy Direction for Pest Management Plans and Programmes |
| **NPMP** | National Park Management Plan |
| **NZCA** | New Zealand Conservation Authority |
| **NZTCS** | New Zealand Threat Classification System |
| **RMA** | Resource Management Act 1991 |
| **Te Mana o Te Taiao** | Te Mana o Te Taiao – Aotearoa New Zealand Biodiversity Strategy 2020 |
| **Te Tiriti** | Treaty of Waitangi/Te Tiriti o Waitangi |
| **UNFCCC** | United Nations Framework Convention on Climate Change |
| **Wai 262** | Waitangi Tribunal, 2011, Ko Aotearoa Tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity |


## Acknowledgements

We would like to give special thanks to Peter Raeburn for his assistance and advice in formulating options for reform of the conservation management planning system, Mike Harding for his detailed review and advice in relation to protected area designations, and Cerasela Stancu and her team at Envirostrat for their economic advice and assistance. Co-authors Dr Billy van Uitregt (Ngā Rauru, Te Ātihaunui-a-Pāpārangi, Tūhoe) and PhD student Claire Dowsett (Ngāti Raukawa) assisted with Māori aspects of the review.

In addition, EDS would like to thank all those who made the time to provide input into this work and the reports that underpin it. In particular, we would like to acknowledge the DOC statutory managers and staff in the planning and permissions, and data and GIS management, teams as well as the Conservation Board, NZCA, Fish and Game and Game Animal Council members who spoke with us. We would also like to thank Fish and Game, Neil Silverwood, Bernard Spragg and Rob Suisted for providing images for this report.

# 1 Introduction

*Tiritiri Matangi is a scientific reserve managed by DOC in partnership with Supporters of Tiritiri Matangi*

In 2020 a renewed vision – Te Mauri Hikahika o te Taiao (the life force of nature is vibrant and vigorous) – was set for Aotearoa New Zealand's conservation system.[1] It centres on the mauri (life force) of nature being restored along with peoples' connections to it. But nature can only thrive when biodiversity thrives and the country's biodiversity is in deep trouble.[2] Around 4,000 indigenous species are at risk of extinction including 94 percent of reptiles,[3] 91 percent of marine birds and 76 percent of freshwater fish.[4] These figures are concerning enough but likely represent only the tip of the iceberg. Many species have yet to be assessed, and of those that have been, around 5,000 lack sufficient information to identify whether they are in trouble or not.[5]

The multiple reasons for biodiversity decline are well known. The 'big five' are invasive introduced species, land use change, pollution, direct exploitation (eg fish harvest) and climate change.[6] As highlighted in *Te Mana o Te Taiao – Aotearoa New Zealand Biodiversity Strategy 2020* (Te Mana o Te Taiao), these pressures are further exacerbated by "not having the right systems in place, in terms of policy, legislation and leadership, people not having enough knowledge and resources to act, and a disconnect between people and nature."[7]

That the conservation system is not working as it should, and needs "transformational change", is now broadly acknowledged.[8] Much species legislation, such as the Wildlife Act 1953 and Native Plants Protection Act 1934, dates back to a bygone era. When the more recent Conservation Act 1987 was formulated, the global biodiversity and climate change crises were not yet in frame, tourism was a relatively small industry, and the Māori renaissance was still in its early days.

> "All our legislation is between 30 and 50 years old. It doesn't work in a modern day environment … It's clunky. The Wildlife Act doesn't talk to the Conservation Act, which doesn't talk to the Reserves Act. The Wildlife Act? Ridiculous… it needs modernising to protect species in a modern-day world."[9]
> *Lou Sanson, Former Director-General of DOC*

When the Department of Conservation (DOC) was established, in 1987, it was tasked with administering more than a third of Aotearoa New Zealand's land area (some 8 million hectares), more than 15,000 heritage sites,[10] and some 4.5 million hectares of marine space.[11] Funding was modest from the outset and was immediately cut by a third.[12] Lack of funding has hobbled the conservation system ever since.[13]

Many reviews have called for reform. In 2011, as part of its *Ko Aotearoa Tēnei* report (Wai 262), the Waitangi Tribunal recommended fundamental "legislative, policy and structural reform" of the conservation system, including a review of the Wildlife Act.[14]

When investigating stewardship land, in 2013, the then Parliamentary Commissioner for the Environment Dr Jan Wright found that "our

conservation legislation is not up to the task of dealing with this complex problem".[15] In a separate report the same year, on longfin eels, she noted a lack of clarity around jurisdictional roles for freshwater fisheries under both conservation and fisheries legislation.[16]

Also that year, a review of Conservation Boards highlighted the need for legislative amendment, noting the high level of dissatisfaction with iwi representation in the system.[17] A 2016 State Services Commission review of DOC described the National Parks Act 1980 and Wildlife Act as "essentially constructs of the 1960s". It called for them to be "brought up to date and [to] incorporate a much stronger Māori and Treaty partner dimension" and for "legislative changes that can further enhance the department's efficiency".[18]

Seven years later, the Tourism Taskforce emphasised the need to "modernise the Conservation Act" on the basis that "multiple aspects of existing legislation… currently hinder a balanced and integrated approach" including to pricing control and concession management.[19] In 2021, the current Parliamentary Commissioner for the Environment Rt Hon Simon Upton noted that a regulatory void exists in relation to indigenous plants.[20]

In 2022, the Options Development Group tasked with reviewing the General Policies, recommended "fundamental reform" of conservation legislation noting:

> The fact that Te Tiriti settlements have been increasingly used to effect substantive change to the legal frameworks and relationships which operate in the conservation arena also reflects a telling need for substantive reform.[21]

DOC's recent internal review of the conservation management planning system also underscored that "the purpose of the system and what it should deliver need clarification… [and] the boundaries of the system need better definition".[22]

***Urupukapuka Island is a recreation reserve managed by DOC***

Although many of the reviews of the conservation system have called for systemic change, the response (when there has been one) has typically comprised minor adjustments, incremental shifts and ad hoc amendments. This has not resolved core problems: the planning system remains stuck; Conservation Boards still lack role clarity; tangata whenua remain dissatisfied; stakeholder conflict continues; and DOC still faces considerable legal risks. Of more central concern is the continuing decline of indigenous biodiversity,[23] highlighting the failure of the system to achieve one of the most important outcomes needed from it.

As the Options Development Group[24] recently reiterated, "tinkering" and making changes in an "isolated silo will not fix the broader systemic issues". What is required is "transformative and institutional change".[25]

## 1.1 Background to the report

It was within the above context that the Environmental Defence Society (EDS) launched its Conservation Law Reform Project in May 2020. Phase 1 focused on better defining problems within the system through investigating how the conservation system was currently operating, identifying core issues hindering its performance, and evaluating how fit for purpose the current legal, policy and institutional frameworks were. The findings were published, in July 2021, in *Conserving Nature: Conservation Reform Issues Paper*. This concluded that "there is a compelling and nationally significant need for New Zealand to rethink how it manages the conservation estate, threatened species and biodiversity".[26]

After the release of *Conserving Nature*, and in response to the large number of reports recommending reform of the conservation system (as outlined above), the government published a 'Conservation Law Reform Roadmap' in December 2021 (see Figure 1.1). This sets out a number of actions to progress the reform agenda.

> "The huge opportunity we've got with law reform is to have a discussion with New Zealanders about what conservation needs to look like for our next 35 years and then, given that, what we need to have in the legislation to enable us to do that."[27]
> *Penny Nelson, Director-General of DOC*

Phase 2 of EDS's project has focused on supporting this reform process through developing tangible and specific recommendations for change. It includes three main components: first, a review of the conservation management planning system (published in April 2023),[28] secondly, a review of the Wildlife Act (published in July 2023),[29] and thirdly, this final synthesis report.

The review of the conservation management planning system was prompted by the New Zealand Conservation Authority (NZCA) which highlighted the need to address systemic delays in the system. In order to complement internal work undertaken by DOC, to identify measures to improve the planning framework, the NZCA requested an external and independent review.[30] EDS was contracted to conduct that review.

EDS's review of the Wildlife Act was in response to an overhaul of that Act being identified, in the Conservation Law Reform Roadmap, as one of the first "major steps towards laying the foundation for fundamental reform".[31]

The insights and findings garnered from these two in-depth reviews have been incorporated into this synthesis report. It seeks to answer the fundamental question: how do we 'fix' the broken conservation system?

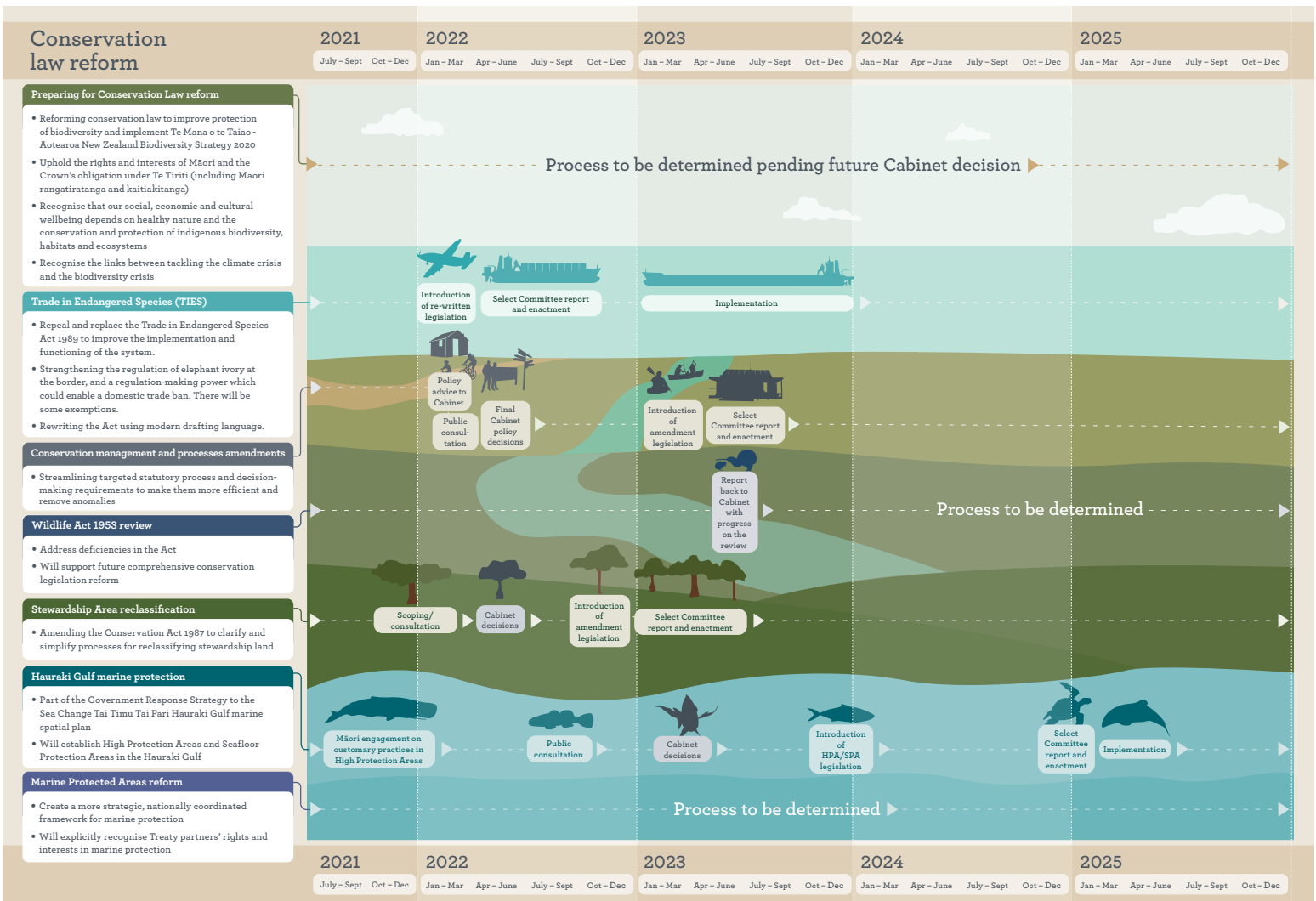



**Figure 1.1: Conservation Law Reform Roadmap** *(Source: Department of Conservation)*[32]

## 1.2 Scope and methodology

The conservation system is large and complex. DOC administers 25 statutes and contributes to, or has a role under, many more including the Resource Management Act 1991 (RMA), Fisheries Act 1993, Fisheries Act 1996, Biosecurity Act 1993 and Crown Pastoral Land Act 1998. No single report is able to canvas the entire system with all its numerous tendrils.

To make the task more manageable, we narrowed the scope of our work to focus largely on the terrestrial space, leaving further consideration of marine conservation to EDS's Oceans Reform Project.[33] With so many pieces of legislation in play, we also focused on the most central or core statutes. In addition, we only undertook a preliminary investigation into protected area designation, with this area of the conservation system meriting more in-depth analysis. We have also not fully explored issues around recreation on conservation land.

Within this narrowed scope, the project took a broad, future focused and first principles approach,[34] primarily considering the key questions below.

**Key research questions**

1. What values, priorities and purposes should underpin the conservation system?
2. What options would best implement and support those criteria?
3. What would the key statutes and statutory instruments of a reformed system look like? How could those statutes be linked and aligned?
4. What changes, if any, should be made to the current institutional arrangements to enhance the performance of the conservation system?
5. How could the system be made more agile and responsive to future emerging pressures?

The methodology underpinning the analysis in this report included international and national literature reviews, a detailed look at the wording of conservation legislation and associated Hansard debates, a review of numerous conservation-related documents, and interviews with more than 100 people working at the coal face of the system. EDS also engaged expert assistance in ecology, economics, planning and Māori aspects of the review.

A draft copy of the report was circulated to interviewees for comment prior to finalisation. Although numerous DOC staff were interviewed for the project, DOC was not in a position to formally review or respond to the draft report ahead of its release. As an independent report, the opinions expressed are those of EDS and do not reflect the views of the Department. A more detailed description of the methodology is contained in the Appendix.

## 1.3 Structure of the report

This Report is structured around five parts:

- Part 1 contains a standalone chapter that focuses on the big question – what does the conservation system need to achieve? In order to provide answers, it undertakes a stocktake of current regulatory settings, and then considers more recent non-statutory policy and strategy documents to identify recent shifts in approach. It concludes by providing a framing to guide the development of a new purpose for the conservation system.
- Part 2 considers provision for Māori within the conservation system. Chapter 3 identifies key challenges for Māori, with potential solutions set out in Chapter 4, which also considers recommendations made by the Waitangi Tribunal and others. Chapter 4 also delves more deeply into Māori concepts and considers how the conservation system might better reflect the country's collective values.
- Part 3 focuses on three specific challenges for the conservation system: climate change, introduced species and tourism. Chapters 5, 6 and 7 each provide an overview of the issue and then set out specific recommendations for reform.
- Part 4 considers four core areas of reform more deeply in chapters 8, 9, 10 and 11: institutions, wildlife protection, conservation management planning and funding.

*Ōkārito wetlands are part of the Westland Tai Poutini National Park*

**Endnotes**

1 Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020*, Department of Conservation, Wellington, 10

2 Ibid

3 Ministry for the Environment and Stats NZ, 2022, *New Zealand's environmental reporting series: Environment Aotearoa 2022*, 36

4 Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020*, Department of Conservation, Wellington, 18

5 Ibid

6 Ibid at 19

7 Ibid at 13

8 Ibid at 43

9 Vance A, 2021, 'Outgoing conservation boss Lou Sanson on New Zealand's move away from exploiting nature: The balance has shifted', *Stuff News* (9 September 2021)

10 Department of Conservation, 2023, *Briefing to the incoming Minister of Conservation*, Department of Conservation, Wellington, 6

11 Ibid

12 Marshall, 1986, *New Zealand Parliamentary Debates*, Conservation Bill (Introduction, 11 December 23 1986), 476, 6140

13 See Chapter 8 which deals with funding in more detail

14 Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity*, Volume 1, Waitangi Tribunal, Wellington, 373

15 Parliamentary Commissioner for the Environment, 2013, *Investigating the future of conservation: The case of stewardship land*, Parliamentary Commissioner for the Environment, Wellington, 6 and 50

16 Parliamentary Commissioner for the Environment, 2013, *On a pathway to extinction? An investigation into the status and management of the longfin eel*, Parliamentary Commissioner for the Environment, Wellington, 38

17 Department of Conservation, 2013, *Conservation Boards review: Final report of the Conservation Boards Review Panel*, Department of Conservation, Wellington, 3

18 State Services Commission, Treasury and Department of the Prime Minister and Cabinet, 2016, *Performance improvement framework follow-up report of the Department of Conservation*, New Zealand Government, Wellington, 23

19 Tourism Futures Taskforce, 2020, *Tourism futures taskforce interim report: We are Aotearoa*, Tourism Futures Taskforce, Wellington, 42

20 Parliamentary Commissioner for the Environment, 2021, *Space invaders: A review of how New Zealand manages weeds that threaten native ecosystems*, Parliamentary Commissioner for the Environment, Wellington, 10

21 Options Development Group, 2022, *Partial reviews of the Conservation General Policy and General Policy for National Parks regarding Te Tiriti o Waitangi/the Treaty of Waitangi*, Report of the Options Development Group, Department of Conservation, Wellington, 62

22 Department of Conservation (private correspondence)

23 See discussion in Department of Conservation, 2020, *Biodiversity in Aotearoa: An overview of state, trends and pressures*, Department of Conservation, Wellington, 5-6, 118

24 An independent body, established in September 2020, to assist DOC in the partial reviews of the Conservation General Policy and General Policy for National Parks

25 Options Development Group, 2022, *Partial reviews of the Conservation General Policy and General Policy for National Parks regarding Te Tiriti o Waitangi/the Treaty of Waitangi*, Report of the Options Development Group, Department of Conservation, Wellington, 5 and 8

26 Koolen-Bourke D and R Peart, 2021, *Conserving nature: Conservation law reform issues paper*, Environmental Defence Society, Auckland, 114

27 'DOC's new head outlines her challenges and priorities', *RNZ Nine to Noon* (2 February 2022)

28 Koolen-Bourke D, R Peart, B Wilde and T Turner, 2023, *Independent review of the conservation management planning system*, Environmental Defence Society, Auckland

29 Koolen-Bourke D, R Peart and S Schlaepfer, 2023, *Reform of the Wildlife Act 1953: An opportunity for transformative change of Aotearoa New Zealand's biodiversity Law*, Environmental Defence Society, Auckland

30 NZCA meeting minutes 10 and 11 December 2020

31 Allan K, 2020 'Launch of the Conservation Law Reform Roadmap', New Zealand Government, (Press release, 10 December 2021), https://www.beehive.govt.nz/speech/launch-conservation-law-reform-roadmap

32 https://www.doc.govt.nz/globalassets/documents/about-doc/role/legislation/conservation-law-reform-roadmap.pdf

33 See the report from Phase 1 of EDS's oceans reform project at Severinsen G, R Peart, B Rollinson, T Turner and P Parson, 2022, *The breaking wave: Oceans reform in Aotearoa New Zealand*, Environmental Defence Society, Auckland

34 Similar to that employed in EDS's Resource Management Law Reform Project, see https://eds.org.nz/our-work/policy/projects/resource-management-reform/

# PART 1
## What the conservation system needs to achieve

There is danger in opening up a system to fundamental reform before first putting in place a clear vision. Without such a goalpost, a reform process could become a negotiation between interest groups, rather than being founded on clear principles and the longer-term public interest. Before examining more deeply the parts of the conservation system that need reform, it is therefore important to first step back and consider the bigger picture: *What does the system as a whole need to achieve?* This is the focus of the next chapter.

*A family walking the Mount Arthur Track, Kahurangi National Park*

In Part One of this report, we step back and ask a series of key questions. What is conservation? What purposes and values should underpin the system? What balance should be struck between different interests, including those of future generations? And most importantly, what do we want the system to achieve (ie what is the vision for conservation in Aotearoa New Zealand)?


*Tourists playing in the snow at Aoraki Mount Cook National Park*

# 2 Purpose of conservation management

*Shorebirds at Pūkorokoro Miranda*

In order to re-imagine Aotearoa New Zealand's conservation system, it is useful to first understand where we are today, and a little of how we got here: what purposes and principles underpin the current conservation system, what frames are employed and how are different interests weighed? We then need to consider where we want to go: what values do we now hold, what are our current aspirations, and what new challenges need to be addressed? Only once we have clarity on those matters can we proceed to identify core changes to the conservation system that will enable us to achieve our collective desired future.

Ka mua, ka muri, we must look back in order to move forward.

## 2.1 Overview of conservation legislation purposes

In this section we consider the core values and purposes underpinning conservation legislation. It is not feasible to consider all relevant statutes, as there are simply too many, so the focus here is on those that are most central to the conservation system.

We start with the Conservation Act. This Act is core, not only because it provides important definitions (such as for "conservation"), but also because it establishes key conservation institutions and sets out their purposes and functions. They include DOC, the NZCA, Conservation Boards, and the New Zealand Fish and Game Council (Fish and Game) and its associated regional councils.

Sitting alongside the Conservation Act are a number of other important statutes. Some are more spatially focused like the National Parks Act, the Reserves Act 1977 and the Marine Reserves Act 1971. Others are more species focused, such as the Wildlife Act, the Wild Animal Control Act 1977, the Marine Mammals Protection Act 1978, the Trade in Endangered Species Act 1989 and most recently the Game Animal Council Act 2013. While such a distinction is not clear cut (for example, the Conservation Act and Wildlife Act also make some provision for area protection), it is conceptually useful in order to assess the broad approach to habitat and area protection versus species protection and management.

We have summarised the broad subject matter, purposes and rationale of the 'core' conservation statutes in Figure 2.1. The task of identifying the purposes of much current legislation was not as straightforward as might be expected. A clear purpose statement was often not provided, leaving us to discern 'clues' to the purpose from preambles and long titles, and in the case of the Conservation Act, from its definition of "conservation" buried within the interpretation section of the Act.[1]

| Statute | Subject matter | Purpose | Rationale |
|---|---|---|---|
| **Core legislation** | | | |
| Conservation Act 1987 | "Natural and historic resources" | Management for conservation purposes, which are: "preservation and protection" (including maintenance, restoration and enhancement or expansion)[2]<br><br>Secondary purpose: "foster" use for recreation that is "not inconsistent" with conservation[3]<br><br>Tertiary purpose: "allow" use for tourism that is "not inconsistent" with conservation[4]<br><br>Purpose of Fish and Game: to represent the interests of anglers and hunters and provide for the "management, enhancement, and maintenance of sports fish and game"[5]<br><br>Functions of the NZCA: bringing about a better understanding of "nature conservation", investigating "nature conservation" and "conservation matters" of "national importance" and supporting the conservation management planning system[6]<br><br>Conservation Boards: unstated[7] | Maintain "intrinsic values"[8]<br><br>For "appreciation and recreational enjoyment by the public"[9]<br><br>To safeguard "options" and "promote the benefits" for future generations[10]<br><br>Importance and value of "fisheries" (both indigenous and sports fish) and "game"<br><br>In relation to the NZCA: heightened regard for indigenous flora and fauna, natural ecosystems and landscape[11] |
| **Species focused legislation** | | | |
| Wildlife Act 1953 | "Wildlife" (animals in a wild state)<br><br>"Animal" includes birds, reptiles, amphibian, any marine species or invertebrates declared to be animals, and some mammals[12] | Protection of "wildlife"[13]<br><br>Managing killing, hunting or control of wildlife<br><br>Regulation of "game birds"[14] | Unstated |
| Wild Animal Control Act 1977 | "Wild animals" (pigs, deer, chamois, goats and Himalayan tahr) [15] | "Controlling" wild animals generally<br><br>"Eradicating" wild animals locally where necessary and practicable, as dictated by proper land use"[16]<br><br>Ensuring concerted action against damage and coordinating hunting[17]<br><br>Regulating hunting and wild animal recovery[18] | Control wild animals and protect against their "damaging effects" on "vegetation, soils, waters and wildlife"[19] |

| Statute | Subject matter | Purpose | Rationale |
|---|---|---|---|
| Marine Mammals Protection Act 1978 | Marine Mammals | "Protection, conservation and management"[20] | Unstated |
| Trade in Endangered Species Act 1989 | Endangered, threatened and exploited species | "Management, conservation and protection"[21] | Enhance the survival of the species<br><br>Fulfil international obligations (Convention on International Trade in Endangered Species) |
| Game Animal Council Act 2013 | Game animals and their management | Institutional support for management of game and "herds of special interest", including:[22]<br><br>Advocacy and support for the hunting sector[23]<br><br>Advice and information to the Minister and hunting sector<br><br>Conducting research[24]<br><br>Promoting standards and codes of conduct[25]<br><br>Achieving hunting "benefits" from animals of "special interest to hunters"[26] | Increase research base and input from those with knowledge and experience of game animals[27]<br><br>Improve "hunting opportunities"[28] and "benefits" to hunters |
| **Spatially focused legislation** | | | |
| National Parks Act 1980 | Areas of distinctive scenery, ecological systems or natural features that are so "beautiful, unique, or scientifically important" that their preservation is in the national interest[29] | "Preserving in perpetuity" and "as far as possible" in its "natural state"[30]<br><br>"Preservation" of "natural and historic features and the protection and well-being of their native plants and animals"[31]<br><br>Secondary purpose: Ensure public use, enjoyment and entry "consistent with" preservation and protection[32] | For their "intrinsic worth"[33]<br><br>"National interest" in protecting "scenery" of "distinctive quality", "ecological systems", and "natural features" that are "beautiful, unique or scientifically important"[34]<br><br>For the "benefit, use, and enjoyment" of the public[35] |

| Statute | Subject matter | Purpose | Rationale |
|---|---|---|---|
| Reserves Act 1977 | Areas possessing value for their recreational use (or potential use), wildlife, indigenous flora or fauna, environmental and landscape amenity or interest, and their natural, scenic, historic, biological, geological, scientific, archeological, educational or community value[36] | "Preservation and management for the benefit and enjoyment of the public"[37]<br><br>"Ensuring the survival of all indigenous species of flora and fauna" and "representative samples" of natural ecosystems and landscapes<br><br>"Preservation" of the "natural character of the coastal environment and of the margins of lakes and rivers", access to these areas and their protection against "unnecessary subdivision and development"[38] | Recreational use and benefits<br><br>Survival of species and ecosystems that give Aotearoa New Zealand "its own recognisable character" [39] |
| Marine Reserves Act 1971 | Areas containing underwater scenery, natural features, marine life of such "distinctive quality or so typical or unique, that their preservation is in the national interest"[40] | "Preserving in natural state"[41]<br><br>Secondary purpose: public freedom of access and entry "subject" to restrictions to preserve and protect | "For the scientific study of marine life" and in the "national interest" [42]<br><br>For its "value" as "natural habitat of marine life" [43]<br><br>To enable the public to "enjoy in full measure the opportunity to study, observe, and record marine life in its natural habitat"[44] |

**Figure 2.1: Subject, purpose and rationale of selected conservation legislation**

There is further complexity in ascertaining what the purpose settings are because most conservation legislation contains multiple, and often internally conflicting, objectives.[45] This is sometimes due to the legislation (such as the Wildlife Act) being largely a consolidation exercise, bringing together a range of originally separate threads, rather than undertaking substantive reform. In other situations, the legislation is attempting to do a wide range of different things, and is serving a diversity of interests. Crafting a clear purposes provision, to reconcile multiple interests and objectives, is a complex and politically challenging task. One solution is to simply leave the legislation silent. The Conservation Act is arguably an example of this approach.

Some legislation, most notably the Wildlife Act, lacks *any* explanation of the reasoning or values underpinning its provisions and tools. For example, it provides for the scheduling of varying levels of protection and management for different species, but lacks any criteria or guidance as to how those categorisations should be applied.

Such lack of statutory detail has both benefits and disadvantages. On the positive side, decision-makers can vary their approach in response to changing circumstances, making the system more adaptable. However, on the negative side, it reduces transparency, clarity and accountability since discretion is broadened and checks and balances reduced.

An opaque purpose can also increase conflict as decision-making is more 'up for debate' and legal contestation. This is evidenced in the high level of stakeholder conflict, and frequent legal challenges, currently experienced within the conservation system.[46]

Most current conservation statutes lack clear purpose provisions and contain multiple, and often internally conflicting, objectives. This makes the system difficult to understand and administer. It also increases conflict as multiple tensions remain unresolved.

## 2.2 Core concepts in conservation legislation

In this section we explore some of the core concepts contained in conservation legislation. This helps throw further light on what the legislation was designed to achieve.

### *2.2.1 Conservation*

Because of its centrality within the conservation system, the most important statute to examine when identifying core concepts, is the Conservation Act. The first thing to note is the Act has no clear purpose provision. This means its purposes need to be implied from various sections, including the definitions in section 2, and the functions of DOC in section 6.

The central underpinning term in the Conservation Act is "conservation", which comprises the title, but more importantly drives the work of DOC. For example, the Department is charged with managing "for conservation purposes" all land and other natural and historic resources held under the Act.[47] It is also tasked with advocating for "the conservation" of natural and historic resources,[48] amongst other things. "Conservation" is defined under section 2 as:

> the preservation and protection of natural and historic resources for the purpose of maintaining their intrinsic values, providing for their appreciation and recreational enjoyment by the public, and safeguarding the options of future generations.

From the outset it is evident this definition contains contrasting value frames. First and most prominently, nature is expressed as having utilitarian value, it is comprised of "resources". Commentators such as McNeill have highlighted the strong influence that neoliberal ideology had on the framing of the Conservation Act. The Act was drafted in the 1980s, when political ideology took a far more "utilitarian turn by explicitly framing nature as a resource, a storehouse of assets and functions for use at will for human benefit".[49]

Secondly, the "natural resources" to be preserved and protected, are defined very widely, and encompass:

> (a) plants and animals of all kinds; and
>
> (b) the air, water, and soil in or on which any plant or animal lives or may live; and
>
> (c) landscape and landform; and
>
> (d) geological features; and
>
> (e) systems of interacting living organisms, and their environment;—
>
> and includes any interest in a natural resource.[50]

The reference to "plants and animals of all kinds" is much broader than just indigenous flora and fauna. Introduced species such as trout, salmon and deer are equally captured, as is any "interest" in them. When this wide definition is applied to DOC's conservation advocacy functions, for example, it implies that DOC is tasked with advocating for the preservation and protection of introduced species (and the interests of hunters associated with them) irrespective of any conflicts with indigenous species.

Specifying introduced species as natural resources, to be protected and preserved for "conservation purposes", creates an inbuilt conflict that appears in provisions throughout the Act. For example, DOC has the function to "preserve so far as is practicable all indigenous freshwater fisheries", while also being tasked with protecting "recreational freshwater fisheries"[51] which includes salmonid stocks which can compete with indigenous species.[52]

The definition of conservation also includes the concept of "recreational enjoyment", which is left undefined, so very open in scope. The High Court has noted that recreation encompasses a full range of activities, from passive enjoyment of scenery to tramping, hunting and fishing, and including motorised recreation.[53] However, the definition makes no mention of other uses (such as customary take or tourism).

While the definition of conservation contains a future equity frame, it is utilitarian, framed as safeguarding the "options" of future generations. This can be contrasted with the eco-centric frame that requires the "intrinsic value" of nature to be "maintained". There is no mention of te ao Māori values and relationships associated with the natural world.

Overall, the definition of conservation contains a confusing combination of potentially conflicting objectives reflecting utilitarian, resource and eco-centric framings. It provides no clear hierarchy or purpose statement to help reconcile them.

1. The Conservation Act lacks a clear purpose statement with its objectives needing to be derived from various sections.
2. The definition of "conservation" does not differentiate between indigenous and introduced species defining both as a "natural resource" to be protected and preserved.
3. While recreational enjoyment is incorporated into the definition of "conservation" its scope remains undefined and is likely broad.
4. There is no recognition of other uses (such as tourism) or values, including Māori values.
5. "Conservation" combines both utilitarian and eco-centric goals, and blends conservation and resource management frames.
6. The result is a confusing combination of potentially conflicting objectives without any clear hierarchy or purpose to help reconcile them.

### *2.2.2 Nature conservation*

The definition of "conservation", under the Conservation Act, can be contrasted with that of "nature conservation". The latter approximates far more closely the commonly understood conception of conservation, being defined in section 2 as:

> the preservation and protection of the natural resources of New Zealand, having regard to their intrinsic values and having special regard to indigenous flora and fauna, natural ecosystems, and landscape.

Notable is the reference to "indigenous flora and fauna" and "natural ecosystems" which are to be given "special regard". This is quite different to the broader definition of "conservation" which makes no distinction between indigenous and introduced species.

"Nature conservation" is used much more sparingly in the Act. It appears primarily in the functions of the NZCA, which include investigating any "nature conservation" matter of national importance.[54] It is also mentioned in the context of Conservation Boards where the "interests of nature conservation" are amongst the matters the Minister must have regard to in selecting members.[55] Notably, the term is not used at all in relation to DOC and its functions.

The NZCA and Conservation Boards have a much stronger mandate to advocate for and protect Aotearoa New Zealand's indigenous flora and fauna, than DOC, which lacks such a statutory direction and mandate.

### *2.2.3 Natural state*

Another important term used in conservation legislation is "natural state". A number of area designations include this as a management requirement; that areas are to be protected and preserved as far as possible in their "natural state". This is specified in relation to national parks under the National Parks Act[56] and nature reserves under the Reserves Act.[57] It is also used in relation to areas being preserved for scientific study and sanctuary areas under section 22 of the Conservation Act and marine reserves under section 3 of the Marine Reserves Act.

The General Policy for National Parks defines "natural state" as being "unmodified by human activity or introduced fauna or flora".[58] It is therefore associated with the preservation of indigenous species and removal of introduced ones.[59] In the National Parks Act, this framing occurs alongside a general prohibition on taking, cutting or destroying indigenous plants (or any parts of them), or hunting, trapping, killing or disturbing any indigenous animals without authorisation.[60] Under the Marine Reserves Act an equivalent general prohibition on fishing is provided for.[61]

There is a strong cultural dimension to the concept of "natural state" stemming from the early preservationist movement in Aotearoa New Zealand. This arose largely in response to the wide-scale felling of indigenous forest during early European settlement. As forest areas rapidly diminished the new settlers developed a growing appreciation for the beauty of what remained.[62] European scientists also began documenting the botanical distinctiveness and uniqueness of the country's flora and fauna. This new awareness of the value of indigenous forest prompted moves to provide for its statutory protection.[63] As Star noted:

> A sense of heritage grew out of the awareness of what had been lost. For many, this loss had a dual aspect, for not only had the bush been removed in the course of close settlement but also settlers, through increasing urbanisation, became physically removed from remaining bush … By the end of the twentieth century, emphasis on preservation had become pronounced in New Zealand – perhaps more so than in any other country.[64]

Directions to preserve areas in their "natural state" are controversial since they are premised on a construction of nature which largely excludes humans. Protected areas become an 'other'; landscapes largely devoid of people who, if they are present at all, are there as 'visitors'.[65] Such an approach does not align well with the cultural values of iwi, hapū and whānau who seek to continue customary practices and maintain relationships and connections with place. Labelled a 'fortress' model of conservation, the approach has been highly criticised for the way it dispossesses indigenous peoples and severs traditional connections and relationships to the land.[66] As explained by the Te Urewera Board:

> The National Parks Act was sympathetic to the voice of Te Urewera but also created a further dislocation between Te Urewera, its identity, and Tūhoe. By ignoring the presence and personality of Te Urewera, treating her as lands for the enjoyment of others, these mechanisms served to disorder the Te Urewera connection distorting the relationship between people, nature and identity .... Te Kawa is about the management of people for the benefit of the land – it is not about land management.[67]

This framing is evident in the terminology used in more protective conservation legislation. Word clouds generated from the text of the National Parks Act and Marine Reserves Act (see Figure 2.2) reveal an emphasis on restriction, amidst a strong 'command and control' approach.[68]

The goal of preserving areas in their natural state is also misaligned with the objectives of development or extractive based interests such as mining, forestry, grazing, tourism or infrastructure development. As a result, argument frequently occurs over the extent to which such activities should be able to occur in national parks, and the impacts which should be tolerated. Such matters are especially complex in places where much of the land is 'locked up' in conservation (eg 84 percent of the West Coast region is conservation land) and economic opportunities for local communities are limited.

The concept of "natural state" envisages preserving areas untouched by human activity. It stems from early preservation efforts in response to rapid deforestation following European settlement. It aims to protect remaining wild areas and indigenous flora and fauna. However, it fails to recognise the cultural values of indigenous communities which seek to maintain customary practices, relationships and connections with the land. Nor does it take into account socio-economic and broader equity considerations.

### *2.2.4 Freedom of entry*

A further pillar of the conservation system is the principle of free public access to conservation land. This is enshrined throughout area-based statutory provisions including in the Reserves Act and National Parks Act. For example, the National Parks Act states:

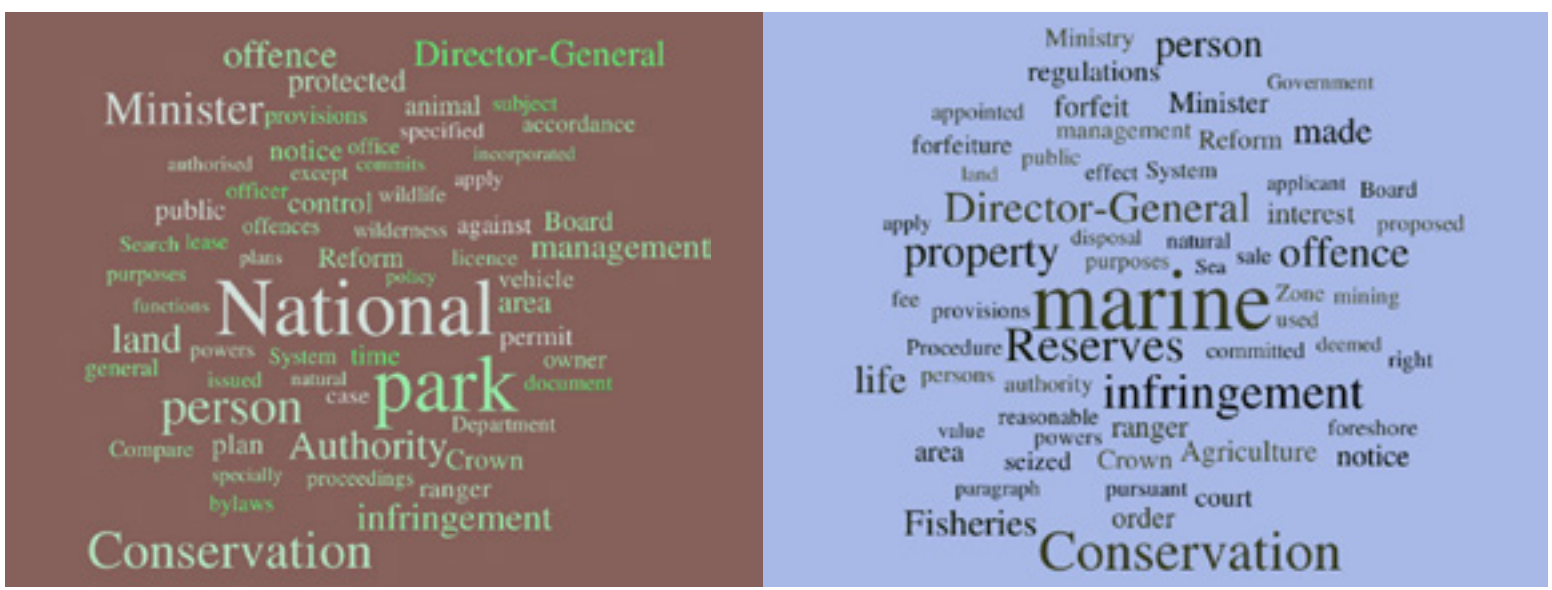



**Figure 2.2: Word clouds generated from the text of the National Parks Act 1980 (left) and Marine Reserves Act 1971 (right)**

> The public shall have freedom of entry and access to parks, so that they may receive in full measure the inspiration, enjoyment, recreation and other benefits that may be derived from mountains, forests, sounds, seacoasts, lakes, rivers, and other natural features.[69]

Similarly the Marine Reserves Act states:

> The public shall have freedom of access and entry to reserves, so that they may enjoy in full measure the opportunity to study, observe, and record marine life in its natural habitat.[70]

In both cases, freedom of access can be proscribed by restrictions, but only where "necessary" for the "preservation" of indigenous species/marine life or general welfare of the parks.[71] Interestingly, the purposes of such free access are quite passive in the case of national parks ("inspiration", "enjoyment" and "recreation") and scientific in the case of marine reserves ("study", "observe" and "record"). There is no mention of more proactive purposes, such as helping to care for the areas (ie assisting with pest control or restoration efforts) and/or undertaking customary practices, which is of particular importance to Māori.

The requirement to provide freedom of entry to national parks has often been cited as the reason DOC struggles to manage visitor numbers and raise funds to cover the costs of park management. Currently, the Department is only able to charge for the use of facilities (and can cap the numbers using them) rather than directly controlling entry itself.[72]

### *2.2.5 The "public interest" in conservation*

A central aspect of the conservation system is the articulation of the public interest. The 'public interest' or 'national interest' are analogous in many ways to the 'public good' (as opposed to the 'private good'). They require consideration of what is in the best interests of society as a whole rather than in the interests of individuals.

The public or national interest is directly referenced in several pieces of conservation legislation. The Marine Reserves Act, for example, refers to preserving areas as marine reserves where this is in the "national interest"[73] and similar wording is used for national parks in the National Parks Act.[74] Of all the conservation statutes, it is the Reserves Act that references the "public interest" most heavily (some 36 times).[75] It explicitly recognises that a public interest exists in relation to:

- Protecting areas for their *intrinsic worth* (ie their value through simply existing)[76]
- Protecting indigenous flora and fauna for their *rarity and uniqueness*[77]
- Protecting indigenous flora and fauna for their *scientific interest and importance*[78]
- Protecting areas for their *scenic interest, beauty and natural landscapes and features* (ie their largely aesthetic value to people)[79]
- Developing areas and introducing flora (indigenous or exotic) to increase *scenic interest or beauty* (ie improving positive aesthetic features)[80]
- Protecting areas for their *recreational and physical welfare* value[81]
- Protecting *historic, archaeological, cultural and educational* sites and maintaining them so they "illustrate with integrity the history of New Zealand" (ie enabling the public to appreciate the country's history from visiting physical sites)[82]
- Protecting areas of *national or international significance.*[83]

This highlights that protecting natural areas for their intrinsic value is a well-recognised public good within the conservation system: there is a benefit to people in their simple existence regardless of practical utility to humans. The focus on ensuring that unique and rare indigenous species are protected speaks to a broader responsibility towards nature – a recognition that many of our indigenous species and ecosystems are rare or unique in a global context and we need to prevent irreparable loss.

A further important rationale for protection is to support research and science. "Scientific reserves" under the Reserves Act are specifically for:

> the purpose of protecting and preserving in perpetuity for scientific study, research, education and the benefit of the country, ecological associations, plant or animal communities, types of soil, geomorphological phenomena, and like matters of special interest.[84]

Similarly, the Marine Reserves Act states that protection under that regime is to enable the "scientific study of marine life"[85] and ensure these areas are made "available for the purposes of scientific research".[86] Some area based protections operate expressly for this purpose, carving out specific places to operate as control areas for study. This can help improve knowledge and understanding of what ecosystems in a natural state look like, so there is at least a baseline for comparison with modified areas. It can also inform restoration efforts (ie through indicating what used to be there).

The 'public interest' also includes the ability of people to recreationally use natural areas, to learn from them and enjoy their aesthetics. This is further emphasised by the general right of entry and access noted above.

In undertaking any reform process, it will be essential to clearly identify what the public interest in conservation is. 'Public value mapping' is a tool that can be used to identify the public interest in a matter in order to ensure its proper consideration in policy-making (see spotlight).[87]

**Spotlight on public values mapping**

Because values are complex, and societal values are constantly evolving, identification and assessment of the public interest can be difficult. Without formalised criteria and guidance the scope for personal biases, preferences and interpretations to enter the frame is high. Many commentators have called for better mechanisms to enable systematic consideration of values in policy and decision-making processes. Public value mapping is one tool that attempts to address this need.[88]

Such mapping involves identifying the core public values relevant to the decision-making process: what the "normative consensus" is.[89] It does not require that identified values have universal agreement, only that they are widely recognised. Nor are the identified values necessarily prescriptive of policy action, since values frequently overlap or conflict, and may have relative importance.[90] The mapping exercise helps to provide additional transparency and ensure that such tensions are highlighted and directly addressed (rather than avoided).

A useful example of a public values mapping exercise was that undertaken for climate science in the United States. This considered a range of public values including: high quality science and information; transparency; communication; coordination; collaboration; and stakeholder participation and support. The effectiveness of current settings to deliver these values was assessed, to identify core areas of policy failure, and inform recommendations on how they might be remedied.[91]

Current legislation identifies a wide range of matters related to conservation that are in the public interest. They include protecting areas for their intrinsic value, uniqueness and rarity, scientific and educational purposes, and enjoyment of the public. Conservation law reform will need to canvas how relevant these public interest matters are today and what additional values might require recognition.

## 2.3 More recent shifts in approach

Because conservation statutes reflect the approach to conservation at the time they were enacted we also sought to track more recent shifts in approach. This was primarily through examining a range of conservation policies and strategies developed since 2010. Our focus was on discerning the 'vision', as applied to conservation at the time, as well as any gaps or disconnections between existing laws and current approaches. The themes that emerged from our analysis are summarised in the sections below.

### *2.3.1 Conservation economy (~2010)*

The concept of a 'conservation economy' features in DOC's Statements of Intent from around 2010 to 2016. At that time, new land acquisitions and collaborative initiatives were seen as contributing to that economy and the tourism industry in particular.[92] A new commercial business unit was established in 2010 to:

> improve the Department's ability to deliver positive commercial outcomes; build productive business partnerships that deliver conservation gains; increase net revenue flows; and increase prosperity of New Zealand through wise use of conservation assets.[93]

Conservation Management Strategies (CMSs) developed during this period focused on "prosperity" and framed conservation as an "investment". Nature is seen as the country's "natural capital" and something that "delivers a broad range of benefits":

> Conservation is an investment in New Zealand's future prosperity—with 'prosperity' defined in the broadest

> environmental, heritage, cultural, social and economic terms. The aim is to shift perceptions of conservation as a cost, to conservation as an investment. The Department wants to inspire and involve others to work together to achieve more conservation than it could achieve alone.[94]
>
> Conservation protects New Zealand's natural capital. Conserving and protecting our natural resources and heritage are an essential investment in New Zealand's long-term well-being and prosperity.[95]

By 2016, the relationship between tourism, recreation and protection was characterised as synergistic, not just compatible but *complementary*. The strategic response in the 2016 Statement of Intent was to "grow conservation", work with the "natural resources sector", "support the growth of tourism and generate economic benefit" and "gain efficiencies".[96] The Department's role was described as follows:

> DOC sits at the heart of New Zealand's recreation and tourism industry, with 35 percent of international visitors coming primarily to experience our natural landscapes. New Zealand has a strong, well recognised and trusted brand with travellers. Conservation plays a critical role in supporting this – the market advantage on which our tourism industry relies.[97]

Such sentiments regarding tourism (that it is to be actively supported) can be contrasted with the legislative direction that tourism is only to be "allowed" and even then, only where consistent with conservation[98] and (in the case of national parks) the preservation of indigenous species.[99] This indicates a legislation-policy conflict.

An economic lens also shaped how DOC viewed collaboration and engagement with the Department adopting a strong customer service orientated approach. DOC described its role as one of delivering "tourism and recreational opportunities" and responding to "customer demand",[100] with conservation framed as a "product and service".[101] The preference for less regulation and more collaborative partnering and stakeholder-driven processes indicates a convergence between state and private interests.

### *2.3.2 Well-being and ecosystem services (~2016)*

By 2016, DOC's Statement of Intent more heavily incorporated the concept of "well-being", which had emerged as a strong narrative of Government (and so governmental agencies) at that time. It explained that healthy nature is necessary for healthy people and a healthy economy and is therefore a key underpinning of New Zealanders' "well-being".[102] Protection of nature was increasingly justified on the basis that it provided for human well-being through the provision of a range of "ecosystem services" (see Figure 2.3).

**Ngāti Paoa's waka taua *Te Kotuiti Tuarua***

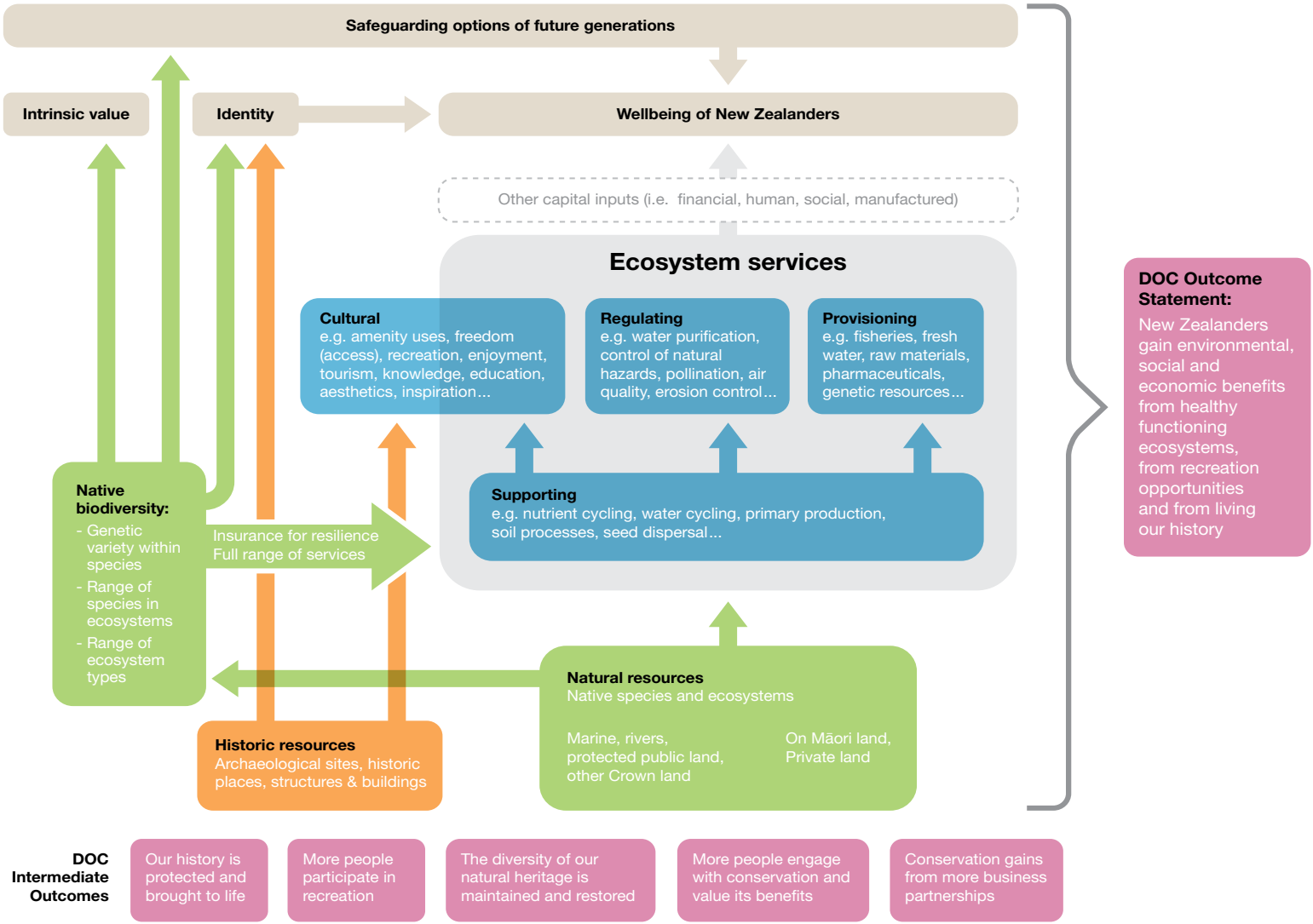



**Figure 2.3: The ecosystem services model of well-being** *(Source: Department of Conservation)*[103]

### *2.3.3 Connection and Treaty partnership (~2019)*

More recently, the economic approach to conservation has softened further, with greater emphasis on people "connecting with" nature and heritage and not simply "contributing to" DOC's work. By 2019, the Department had adopted a "conservation outcomes model", including a much stronger reference to Te Tiriti expressed as "a living Treaty partnership based on shared values for the benefit of Aotearoa New Zealand".[104] The strategic roles of DOC were articulated as being to:

> Provide conservation services and leadership to protect New Zealand's natural and historic heritage; contribute to New Zealand's economic, social and cultural success; and enhance well-being of New Zealanders and international visitors by encouraging people to connect and contribute to New Zealand's nature and heritage.[105]

It is notable that the above quote references "natural and historic *heritage*" rather than "natural and historic *resources*" thereby moving away from the more utilitarian wording employed by the legislation. This further highlights a disjunct between the legislation and the more recent policy framework.

### *2.3.4 Restoring Papatūānuku (~2020)*

Te Mana o Te Taiao, which was released in 2020, set a refreshed vision for the conservation system. The vision (that "the life force of nature is vibrant and vigorous" – Te Mauri Hikahika o te Taiao) is explained as encompassing "the return of health of the natural world in a way that we can measure", "the return of a health and vibrancy that we can feel, touch, smell and hear" and "an emotional reconnection with nature".[106] Also included as central to the vision is "the recognition that people are part of nature."

Notable here is the emphasis on restoration through the reference to "the return of health." It is also interesting that a human experiential approach has been adopted. This is not dissimilar to that articulated more than forty years ago in the National Parks Act where the public was to receive "inspiration" in "full measure". However, the subtle difference in Te Mana o Te Taiao is that people are treated as an integral part of the conservation mission.

A word cloud generated from the text of Te Mana o Te Taiao (see Figure 2.4) highlights how economic and resource-based values have receded and biodiversity (a word not mentioned in conservation legislation at all)[107] is now at the heart of the approach. Notable, also, is how te ao Māori concepts have shifted into frame. There are now numerous references to te Taiao and concepts such as "mana" and "mauri" alongside greater emphasis on "knowledge", "place", "mātauranga", and the role of iwi, hapū, whānau and Te Tiriti.

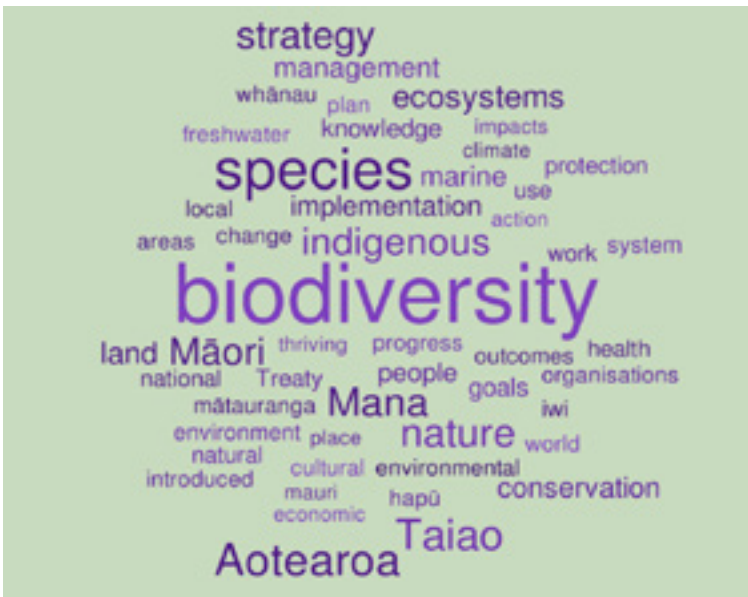



**Figure 2.4: Word cloud generated from the text of Te Mana o Te Taiao**

Te Mana o Te Taiao also recognises the importance of ecological integrity. Outcome 1 is that "the health, integrity and connectivity of ecosystems has been maintained and/or restored, including in human dominated areas".[108] This is in line with goals set under the Convention on Biological Diversity, and the 15th Conference of the Parties targets for 2030, including that "the integrity, connectivity and resilience of all ecosystems are maintained, enhanced or restored".[109] Such an approach has already been recognised in the Te Urewera Act 2014 which expressly aims to preserve the "integrity" of natural and cultural values and the "integrity" of "indigenous ecological systems and biodiversity".[110]

**Spotlight on ecological integrity v ecological health**

There is emerging debate over when a requirement to protect "ecological integrity" should be applied or when "ecological health" is more appropriate. We tease out the meaning and implications of the two terms below.

*Ecological integrity* is defined under section 4 of the Environmental Reporting Act 2015 as "the full potential of indigenous biotic and abiotic features and natural processes, functioning in sustainable communities, habitats and landscapes". This is also the definition employed in Te Mana o Te Taiao. Domain and synthesis reports prepared under the Environmental Reporting Act must describe the impacts that the state of the environment, and changes to it, have on ecological integrity.[111] The Natural and Built Environment Act 2023 (now repealed) also referenced the "ecological integrity, mana and mauri" of indigenous biodiversity (alongside air, water, soils, the coastal environment, wetlands, lakes and rivers), providing as a system outcome that it is to be protected, or if degraded, restored.[112] Because "ecological integrity" usually focuses on protecting *indigenous* biodiversity it can be a useful goal for a conservation system.

In contrast, *ecological health* does not require indigenous biodiversity to be thriving, simply that there is a healthy functional ecosystem. Much of Aotearoa New Zealand is now a highly modified landscape, with many introduced species well established, and accepted as part of the environment. In some situations the presence of an introduced species is a useful indicator of ecosystem health. For example, the health of introduced salmonoid species has long been one measure of freshwater quality.[113] In more modified environments, or in relation to very specific environmental measures, ecological health and well-being can be a more appropriate standard than ecological integrity.

Overall, this means that where the focus of a regulatory system is on restoring or protecting indigenous biodiversity the term "ecological integrity" is usually more appropriate. In the context of highly modified environments, where restoration is not a goal (eg there is acceptance of an altered state), an ecological health and well-being lens is usually more suitable.

One area where there is debate over which term to apply is in relation to valued introduced species. The Game Animal Council opposed the use of the term "ecological integrity" in its submission on the Natural and Built Environment Bill, arguing for replacement with the term "ecological health".[114] This was on the basis that most (if not all) of the country's ecosystems are modified and the term takes insufficient account of social values. In addition, the Council submitted that the presence of game animals provides "ecosystem services".[115]

The Council's broad concern was that "ecological integrity" has the restoration of indigenous ecosystems, and so by implication the elimination of introduced species, as the ultimate goal. At present, while Te Mana o Te Taiao references "ecosystem integrity", Te Ara Ki Mua (the framework for adaptive management of wild animals including goats, pigs, thar, deer and chamois) avoids the term in preference to focusing on "healthier ecosystems".[116] The interface of these two different frames, and their operation within the conservation system, has yet to be fully reconciled.

The vision set out in DOC's 2022 Statement of Intent, that "Papatūānuku thrives" (see Figure 2.5), reflects the approach in Te Mana o Te Taiao. A new set of strategic outcomes were crafted to help deliver the vision, including that:

- Ecosystems and species across Aotearoa are thriving from mountains to sea
- Public conservation lands and waters are maintained and improved for future generations
- Connection with nature and cultural heritage enriches people's lives.[117]

The description of DOC's role was similarly adjusted to not only "protect the land, species, ecosystems, and cultural heritage for conservation purposes", but to "be a voice for conservation", amongst other things.[118]

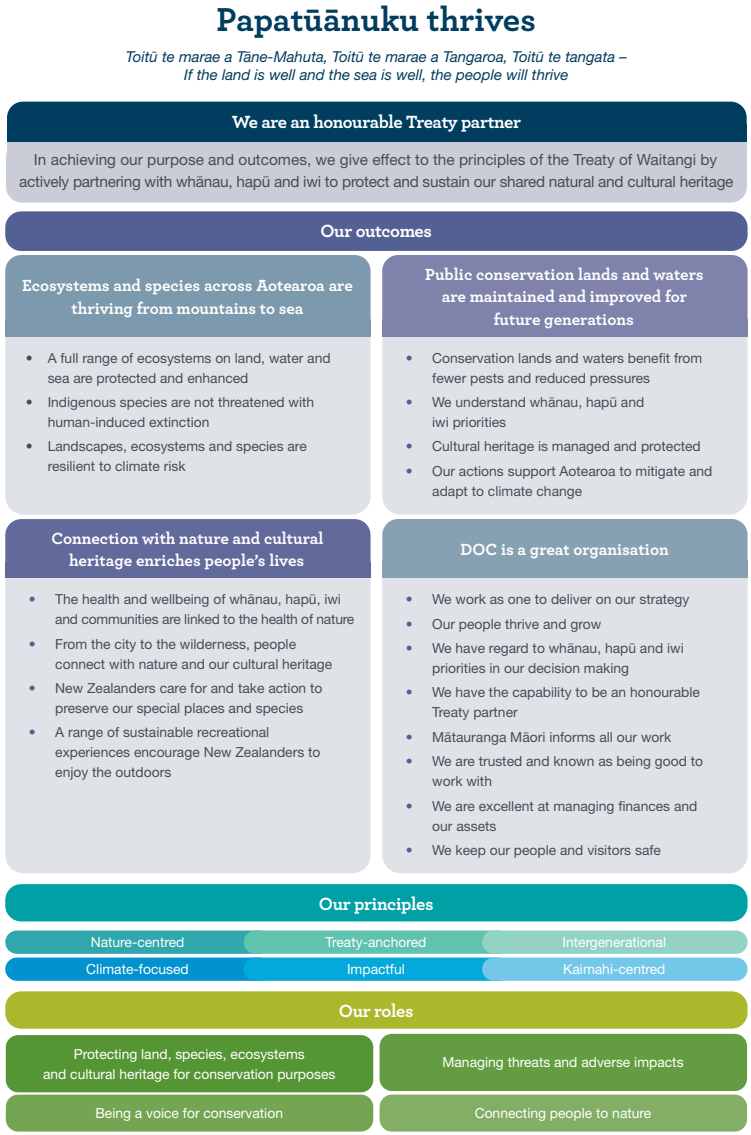



**Figure 2.5: Papatūānuku thrives framework** *(Source: Department of Conservation)*[119]

There is much of note in this more recent approach. Nature is to be improved and restored, so it is "thriving", rather than just the remnants preserved or protected. There is a much stronger emphasis on "connection" with nature rather than its utilitarian value. In addition, there is a shift to greater personalisation of nature, with the role of DOC being not just about service delivery and advocacy, but also providing a "voice for" nature.

The vision of 'Papatuanuku thriving' sets out a new set of purposes and priorities. It provides an updated articulation of the public good in conservation centered around concepts such as:

- Restoring, enhancing and building resilience
- Connection and relationship to nature and an integration (rather than separation) of humans and nature
- A biodiversity-centric approach with a focus on the ecological integrity, health and well-being of indigenous species and ecosystems
- A biocultural approach that incorporates te ao Māori concepts and provides for cultural practices alongside recognition of Te Tiriti
- Climate adaptation and management for change rather than stability
- Regenerative tourism and a shift away from growth-orientated tourism

There are several drivers behind the new imperative to restore rather than just protect. Notably, climate impacts (something not contemplated within existing conservation legislation) mean that 'holding the line' will not be sufficient to protect indigenous biodiversity. Te Mana o Te Taiao highlights the importance of species populations being "healthy, genetically diverse and having increased resilience to future threats including climate change".[120]

In addition, if the conservation system is to properly recognise and protect Māori interests and aspirations, including the exercise of the role of mana whenua as kaitiaki, Papatūānuku and her children must be well enough to enable this – "resilient biodiversity enables cultural practices and mahinga kai, contributing to the regeneration of mātauranga Māori."[121]

Reflecting Te Mana o Te Taiao, the term "biodiversity" is used extensively throughout the 2022 Statement of Intent, which has recast nature as something that provides a sense of place in an uncertain world:

> Biodiversity and nature are part of Aotearoa New Zealand's identity: the sounds and scents, the trees and birds. They give a sense of home and a safe place in a world of uncertainties … So, if the unique biodiversity in Aotearoa New Zealand is lost, we can lose ourselves.[122]

Reference to natural and historic "resources" is now absent except where the legislation is directly quoted. A new lens has been applied to recreation and tourism. Where "growth" had previously been emphasised, there is now reference to the need for "regenerative tourism" and sustainability, including "sustainable recreational experiences".[123]

The replacement of references to "natural resources", with a simple reference to "nature", is also notable. As earlier noted, the term "nature" is not employed within the Conservation Act in relation to DOC's functions, but only in connection with *indigenous* flora and fauna (such as in the terms "nature conservation" and "nature reserves").

The new vision is also an attempt to craft a more biocultural approach to conservation. Te Tiriti is an overarching consideration and the well-being of

***Te Whare Rūnanga, Waitangi***

iwi, hapū, whānau and communities (and their links to nature) is a featured concern. There is an aspiration for mātauranga Māori to inform "all work". However, the approach remains a step away from true partnership which, despite these broad shifts in discourse, still only contemplates DOC having "regard" to iwi, hapū and whānau priorities.

The adjustments in DOC's most recent Statement of Intent, and in Te Mana o Te Taiao (which was the product of a significant public submissions process), demonstrate how te ao Māori is resonating more broadly. There is increased acknowledgment of the value that te ao Māori brings, the importance of ensuring the conservation system is culturally inclusive (rather than abrasive), the need to deliver for all, and the imperative to start crafting an uniquely Aotearoa New Zealand approach.

**Spotlight on a biocultural approach**

Biocultural approaches draw on pluralistic relationships between diverse peoples and their environments, recognising that these are intertwined and inseparable. They focus not only on conservation actions to sustain ecological systems, but on the sociocultural elements interdependent on them (the broader "social-ecological" system).[124]

A biocultural conservation system is strongly linked to place, being responsive to local contexts, ways of knowing and resource needs. Such a system recognises diverse worldviews, values and knowledge systems. Biocultural approaches use participatory methods that build on local cultural perspectives and create resilience indicators based on local definitions of success.[125] They enable local aspirations and facilitate co-creation of knowledge across local and western knowledge systems.[126]

Because biocultural approaches enable significant local adaptation they are able to respond to the different priorities and diversity of individual whānau, hapū and iwi. Aotearoa New Zealand already has many bicultural models within the conservation system, with DOC entering into a wide array of conservation protocols, accords, relationship agreements and memoranda of understanding. These enable Māori to exercise *some* of their kaitiaki responsibilities at place.[127] In particular, the re-classification of Te Urewera National Park as its own legal person, represented by a co-governance board, creates a potentially novel opportunity to apply biocultural approaches to conservation management.[128]

### *2.3.5 Valued introduced species (2023)*

The most recent shift in approach, with implications for the future direction of the conservation system, was the establishment of a Minister for Hunting and Fishing in November 2023. The appointment followed election promises to improve access to public land for hunting and fishing, amend the law to distinguish valued introduced species (including game animals and sportfish) from "pests", designate "herds of special interest", and strengthen the role of the Game Animal Council.[129] The Minister's responsibilities include matters relating to recreational and commercial hunting of deer, tahr and feral pigs on public conservation

***Fish and Game licence holder with a harvested mallard duck*** (Fish and Game)

land, freshwater sports fishing, game bird hunting, sports fish and game management, herds of special interest, trophy hunting and wild animal recovery operations.[130]

An objective of the new Ministerial portfolio is to reconcile conflicting references in legislation to species such as deer, tahr, wild pigs, trout and salmon, which are either managed as a recreational resource or pest to be eradicated. The Minister is also tasked with responding to concerns of the hunting and fishing community and providing greater support to Fish and Game and the Game Animal Council.

While the impacts of valued introduced species on indigenous biodiversity are recognised, these are mainly viewed as being caused by overpopulation or poor management. The increased inclusion of the hunting and fishing community within the conservation system is intended to create greater synergies between hunting effort and conservation objectives.[131]

All this indicates a growing recognition of the importance of the values associated with subsistence hunting, 'mahinga kai' and Māori food gathering, community access to wild places, and the health and well-being benefits of recreational hunting. The revenue generated from hunting and fishing is also a consideration. At the same time there is acknowledgement of the impacts associated with introduced species and the need for more effective management and control.[132]

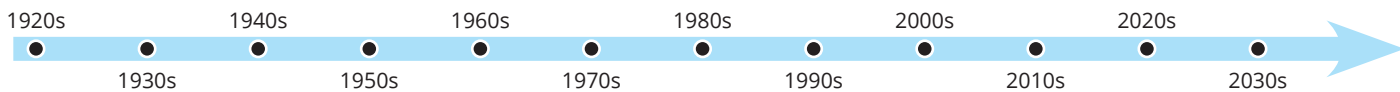
### *2.3.6 Conservation journey so far*

Figure 2.6 charts the conservation journey in Aotearoa New Zealand so far; beginning with species introductions by acclimatisation societies from the late 1800s to early 1900's to establish game resources; then national park legislation and pest control that came in response; followed by the economic efficiency focused reforms of the 1980s; and more recently the vision of Papatūānuku thriving. Ironically, if we were to draw the timeline back still further, prior to the arrival of Europeans, Papatūānuku would re-emerge within our frame. To mana whenua, of course, she was never out of view.

As can be seen from Figure 2.6, the context and prevailing values and pressures (both at a national and international level) have shifted significantly over the past several decades. This is one reason why the new Public Service Act 2020 identifies, as a core responsibility of chief executives of departments and departmental agencies, "maintaining the currency of any legislation administered" by them as a part of their role as a "good steward of the public interest".[133]

***Kea monitoring, Nelson Lakes National Park*** (Neil Silverwood)

| | | | | | | |
|---|---|---|---|---|---|---|
| **Political context** | Species introductions to build fur industry and hunting resource. Recognition of need for better game management to protect the resource | Concern at increasing land clearance and impacts of introduced species (especially deer) on forests | 'Think-big' public works (dams) and logging of native forests decrease public trust in government | Neo-liberal reforms to enhance economic efficiency, growth and regional development. 'Clean and green' brand built to promote tourism. | Conservation as an investment, contributing to the well-being of New Zealanders | Where to next?<br>Climate change and biodiversity crises<br>Growing tourism-visitor impacts<br>Promotion of valued introduced species<br>Management for change, agility and resilience?<br>Recloaking Papatūānuku,<br>Reconnection and biocultural approach? |
| **Framing and approach** | Game management<br>Humans as creating value from land | Unreconciled game v pest management framing of introduced species<br>A 'preservation' conservation approach premised on humans being separate from, and harmful to, nature | | Broad concept of 'conservation' that fosters recreation and allows tourism<br>Unreconciled resource management and use versus nature conservation and intrinsic value framing. | Ecosystem services<br>Future generations and future use<br>Minister for Hunting and Fishing | |




| | | |
|---|---|---|
| **Species legislation** | Animal Protection & Game Act 1921 (repealed)<br>Native Plants Protection Act 1934<br>Trade in Endangered Species Act 1989<br>Wildlife Act 1953<br>Marine Mammal Protection Act 1978<br>Noxious Animals Act 1956 *(repealed)*<br>Wild Animal Control Act 1977<br>Game Animal Council Act 2013 | Protected Species Act?<br>Marine Protected Areas Act?<br>Conservation Act (reformed)?<br>Oceans Act? |
| **Protected Area legislation** | National Parks Act 1952 (repealed) National Parks Act 1980<br>Marine Reserves Act 1971<br>Reserves Act 1977 | |
| **System integration legislation** | Conservation Act 1987 | |
| **Institutional settings for delivery** | Department of Works and Development, Wildlife Service, Forest Service<br>National Parks and Reserves Authority<br>National Parks and Reserves Boards<br>Acclimatisation societies<br>Nature Conservation Council (1962 – 1975)<br>Department of Conservation (1987 - )<br>New Zealand Conservation Authority (1990 - )<br>Conservation Boards (1990 - )<br>Fish and Game and regional councils (1990 - )<br>Game Animal Council (2013 - ) | What do institutions for the next 50 years look like? |

**Figure 2.6: The conservation journey from the 1920s to the 2020s and beyond**

Over the past decade or so there have been marked shifts in approach within the conservation system. The focus on natural 'resources' and building the 'conservation economy', has shifted towards preserving ecosystem services that contribute to human well-being, and then to a stronger biocultural approach where people are seen as part of nature and connection and restoration are important aims.

Most recently, access to conservation land for recreation, the 'right to hunt',[134] sustainable harvesting and mahinga kai have emerged more prominently. Such changed values and needs highlight the extent to which conservation legislation is out of step with contemporary approaches to conservation.

The vision of 'Papatuanuku thriving' provides a potential starting point for the development of a clearer purpose for the conservation system.

## 2.4 Where to next?

The shifts in framing traced in the previous section highlight how malleable the approach to conservation has been, even over the course of the last decade or so. In part, this is because conservation legislation fails to set a clear direction, leaving the conservation system highly susceptible to changes in political ideology. While flexibility can be desirable, it is difficult to make progress if the boat is constantly being turned in different directions.

That we continue to make little headway towards protecting imperilled indigenous species indicates the need for a more considered and evidence-based, rather than ideologically-driven, response. This will require some hard conversations about collective values, aspirations and priorities.

Some potential changes to existing definitions and purposes of the conservation system are already clear. For a start, the definition of conservation could be reformulated to:

- Shift away from preservation towards 'protection, restoration and enhancement'
- Move the frame away from natural and historic 'resources' to natural and historic 'heritage'
- Prioritise the protection of indigeneity and define 'natural heritage' more narrowly to reflect this focus
- Focus first and foremost on the ecological integrity and well-being (the mauri and the mana) of nature or te Taiao
- Retain a reference to future generations, but explicitly refer to safeguarding their rights and interests in a thriving healthy natural world, rather than simply safeguarding their future resource options
- Recognise the importance of fostering connection with nature and the contribution this makes to health and well-being
- Recognise the special relationship of tangata whenua with their lands and taonga, and the need to foster connections with customary practices and traditions.

The purpose of conservation could be more narrowly focused on the protection, restoration and enhancement of natural and cultural heritage. This would be to safeguard the ecological integrity of indigenous ecosystems and biodiversity. This would need to be achieved whilst providing for the special relationship of tangata whenua with their lands and traditions, fostering opportunities for human-nature connection, and ensuring the needs and aspirations of future generations are safeguarded.

In relation to protected areas, some key pivot points are also clear, such as the need to safeguard 'ecological integrity' rather than natural state. This should be to ensure the protection of ecological processes and functioning, in order to retain the indigenous components of these ecosystems, regardless of the presence or dominance of naturalised species.

Movement away from a focus on 'natural state' would also help shift the conception of nature, as something apart from people, to a more neutral and objective approach. Natural state could be retained as an objective in some places, but on a more carefully proscribed basis. This could be for scientific purposes or as a control, for example, to help improve understanding of how indigenous ecosystems function in the absence of human activities.

There also needs to be greater recognition of collective *responsibilities* to nature and the ethic of kaitiakitanga, rather than too narrowly focusing on rights to access and use. A shift towards regenerative tourism and

ensuring net benefit to nature, is also important, as is better levering the synergies between recreational hunting, wild animal control and restoration priorities.

A clear purposes hierarchy also needs to be developed that articulates the overarching importance of protecting the indigenous biodiversity that survives on public conservation land.[135] For example it could provide for:

- The *first priority* being to te Taiao, recognising the overarching importance of the ecological integrity and well-being of te Taiao and Aotearoa New Zealand's precious indigenous biodiversity.

- The *second priority* being providing for connections to and relationships with te Taiao, recognising the importance of such connections to the health and well-being of people. This could also include fostering recreational use (including non-commercial hunting and fishing) and the traditional relationship of mana whenua, and their customary practices and traditions, with te Taiao.

- The *third priority* being providing for the economic well-being of local communities.

**Key messages on purpose of conservation management**

1. Most conservation statutes lack clear and unified purpose provisions and contain multiple, often internally conflicting, objectives. This undermines clarity, increases legal risk and exacerbates conflict within the conservation system.

2. In particular, the Conservation Act lacks a single defined purpose, with its objectives needing to be derived from different sections.

3. The definition of "conservation" (which underpins the system) combines utilitarian and eco-centric goals, and blends conservation and resource management frames. It does not differentiate between indigenous and introduced species. While recreational use is incorporated, it is not well defined, and there is limited recognition of other values including those held by Māori.

4. DOC lacks a strong 'nature conservation' focused mandate to guide its management, administrative and advocacy functions.

5. Protected area statues are infused with the concept of protecting 'natural state'. Such a preservationist lens, which excludes people, clashes with the cultural values of indigenous communities who seek to retain connections with place. Nor does it accommodate socio-economic and broader equity considerations.

6. Freedom of entry provisions, in particular for national parks, make it difficult to manage visitor numbers and generate funding for park maintenance.

7. Current legislation identifies the public interest in conservation as including protection for intrinsic value, uniqueness and rarity, scientific and educational purposes, and enjoyment of the public. This articulation of the public interest needs to be updated and public values mapping can assist with this.

8. There has been a marked shift in conservation values since the 2000s, away from an economic and resource-based framing, towards a focus on restoration, resilience and a biocultural approach that views people as part of (rather than separate from) nature.

9. Conservation law needs to be modernised to align it with contemporary values and challenges. This includes addressing the dual climate change and biodiversity crises and building synergies between te ao Māori and mainstream conservation perspectives.

10. In particular, the definition of conservation needs to be reformulated, and a clear purposes hierarchy provided that helps DOC navigate situations where one or more conservation purposes or values are in conflict.

***Tramper on the Tin Range, Rakiura National Park*** (Neil Silverwood)

## Endnotes

1 Section 2, Conservation Act 1987

2 Drawn from the definitions of "conservation", "preservation" and "protection" under section 2 of the Conservation Act 1987

3 Drawn from the functions of DOC in section 6(e) of the Conservation Act 1987

4 Ibid

5 Section 26B, Conservation Act 1987

6 Section 6B, Conservation Act 1987

7 Although these entities are provided with a range of functions, they are not provided with a specific purpose. Their work and approach is therefore reliant on broader legislative direction and context

8 Drawn from the definition of "conservation" under section 2 of the Conservation Act 1987

9 Ibid

10 Drawn from the definition of "conservation" under section 2 and the functions of DOC under section 6(c) of the Conservation Act 1987

11 This heightened value of "indigenous" is inferred from the direction to pay it "special regard" in the definition of "nature conservation" which is a particular focus of the NZCA

12 See definitions under section 2 of the Wildlife Act 1953. The definition of "animal" excludes domestic animals, rabbits, hares and marine mammals. The term "wildlife" excludes "wild animals" (eg deer, pigs, goat, chamois and tahr) which are managed under the Wild Animal Control Act 1977

13 Section 3, Wildlife Act 1953

14 Under Part 2, Wildlife Act 1953

15 See schedule 6, Wildlife Act 1953

16 Section 4(1), Wild Animal Control Act 1977

17 Sections 4(2)(a)-(b), Wild Animal Control Act 1977

18 Section 4(2)(c), Wild Animal Control Act 1977

19 Section 4(2)(a), Wild Animal Control Act 1977

20 Long title to the Marine Mammals Protection Act 1978

21 Section 2, Trade in Endangered Species Act 1989

22 Set out as functions of the Game Animal Council under section 7 of the Game Animal Council Act 2013

23 This includes "raising awareness of the views of the hunting sector". See sections s7(1)f) and 7(1)(g) of the Game Animal Council Act 2013

24 Section 7(1)(h), Game Animal Council Act 2013

25 See sections 7(1)(e) "voluntary codes of practice", 7(1)(j) "voluntary certification schemes" and 7(1)(k) "promote minimum standards and codes of conduct" in the Game Animal Council Act 2013. The Council also promotes safety initiatives, including firearms safety (see section 7(1)(c))

26 Sections 16(1) and 19(3), Game Animal Council Act 2013

27 Implied from section 7 (Functions of Council) and section 8 (Council Membership) of the Game Animal Council Act 2013

28 See section 7(1)(g), Game Animal Council Act 2013

29 Section 4(1), Conservation Act 1987

30 Section 4, National Parks Act 1980

31 Section 43, Conservation Act 1987, which sets out the priorities for park administration

32 Ibid

33 Section 4, National Parks Act 1980

34 Section 4(1), Conservation Act 1987

35 This is set out under section 4(1) of the National Parks Act 1980, and elaborated under section 43, with national parks to be administered "in such a manner as to secure the public the fullest proper use and enjoyment of the parks" so long as this is consistent with their preservation

36 Including any other "special features" of value under section 3 of the Reserves Act 1977

37 Section 3(1)(a), Reserves Act 1977

38 Section 3(1)(c), Reserves Act 1977

39 Section 3(1)(b), Reserves Act 1977

40 Section 3, Marine Reserves Act 1971

41 Ibid

42 Section 3(1), Marine Reserves Act 1971

43 Section 3(2)(c), Marine Reserves Act 1971

44 Section 3(2)(d), Marine Reserves Act 1971

45 An exception is the Trade in Endangered Species Act 1989 which contains a specific "objects" section (section 2)

46 See Koolen-Bourke D and R Peart, 2021, *Conserving nature: Conservation reform issues paper*, Environmental Defence Society, Auckland and Koolen-Bourke D, R Peart, B Wilde and T Turner, 2023, *Independent review of the conservation management planning system*, Environmental Defence Society, Auckland

47 Section 6(a), Conservation Act 1987

48 Section 6(b), Conservation Act 1987

49 McNeill J, 2016, 'Different meanings of "nature" for New Zealand's conservation institutions', *Policy Quarterly,* 12(1), 6

50 The definition of "natural resources" can be found in section 2 of the Conservation Act 1987

51 Section 6(ab), Conservation Act 1987

52 The definition of "freshwater fish" can be found in section 2 of the Conservation Act 1987

53 *Royal Forest and Bird Protection Society of New Zealand Inc v New Zealand Conservation Authority* [2021] NZHC 1194 at [122]

54 Section 6B(1)(d), Conservation Act 1987

55 Section 6P(2)(b), Conservation Act 1987

56 Section 4, National Parks Act 1980

57 Section 20, Reserves Act 1977

58 New Zealand Conservation Authority, 2005, *General Policy for National Parks* (revised edition 2019), Department of Conservation, Wellington, 66

59 For example, see sections 4 and 5 of the National Parks Act 1980

60 Section 5, National Parks Act 1980

61 Section 3(3), Marine Reserves Act 1971

62 Star P, 2002, 'Native forest and the rise of preservation in New Zealand (1903-1913)', *Environment and History*, 8(3), 282

63 Ibid at 284

64 Ibid at 284 and 286

65 See discussion in McNeill J, 2016, 'Different meanings of 'nature' for New Zealand's Conservation institutions', *Policy Quarterly,* 12(1), 3

66 The term "fortress conservation" was coined by Brockington. See Brockington D, 2002, *Fortress conservation: The preservation of the Mkomazi Game Reserve, Tanzania*, James Currey, Oxford

67 Te Urewera Board, 2017, *Te kawa o te Urewera,* 24

68 For a more in depth discussion of the command and control approach see Holling C and G Meffe, 1996, 'Command and control and the pathology of natural resource management', *Conservation Biology,* 10(2), 328

69 Section 4(2)(e), National Parks Act 1980

70 Section 3(2)(d), Marine Reserves Act 1971

71 Section 4(2)(e), National Parks Act 1980 and section 3(2)(d), Marine Reserves Act 1971

72 See, for example, Bracewell-Worrall A, 2017, 'Visitors will keep coming if national park fees introduced – industry', *Newshub* (21 February 2017)

73 Section 3(1), Marine Reserves Act 1971

74 Section 4(1), National Parks Act 1980

75 The only statutes that mention it more are two anti-dumping laws: the Dumping and Countervailing Duties Act 1988 and the Trade (Anti-dumping and Countervailing Duties) Act 1988

76 Section 19(1)(a), Reserves Act 1977 (scenic reserves)

77 Section 20(1), Reserves Act 1977 (nature reserves)

78 Ibid

79 Section 19(1)(a), Reserves Act 1977 (scenic reserves)

80 Section 19(1)(b), Reserves Act 1977 (scenic reserves)

81 Section 17(1), Reserves Act 1977 (recreation reserves)

82 Section 18(2)(a), Reserves Act 1977 (historic reserves)

83 Section 13(1), Reserves Act 1977 (New Zealand reserve)

84 Section 21, Reserves Act 1977

85 Section 3(1), Marine Reserves Act 1971

86 Section 12, Marine Reserves Act 1971

87 For example the Ombudsman Office employs a public interest test to inform what information should be released. A number of principles have been articulated to guide determinations such as transparency, participation, accountability, justice, health and safety and environmental protection. See Office of the Ombudsman, 2019, *Public interest: A guide to the public interest test in section 9(1) of the OIA and section 7(1) of the LOGIMA,* Office of the Ombudsman, Wellington

88 Welch J, H Rimes and B Bozeman, 2015, 'Public value mapping' in Bryson J, B Crosby and L Bloomberg (eds), *Public value and public administration*, Georgetown University Press, Washington DC, 131

89 Ibid at 133

90 Meyer R, 2011, 'The public values failures of climate science in the US', *Minerva*, 49, 47-70, 49

91 Ibid

92 Department of Conservation, 2009, 'Kia Wharite – A collaborative biodiversity initiative' (Press release, 16 January 2009)

93 2009/2010 Financial Review questions (DocDM 67068)

94 See Department of Conservation, 2014, *Conservation management strategy: Auckland 2014 – 2024,* Volume 1, 13 and Department of Conservation, 2014, *Conservation management strategy: Waikato 2014 – 2024,* Volume 1, 14

95 See Department of Conservation, 2016, *Conservation management strategy: Southland Murihiku 2016,* Volume 1, 18 and Department of Conservation, 2016, *Conservation management strategy: Otago 2016,* (revised edition 2022), Volume 1, 17

96 Department of Conservation, 2016, *Department of Conservation statement of intent 2016-2020,* Department of Conservation, Wellington, 13 and 18

97 Ibid

98 Section 6(e), Conservation Act 1987

99 Section 4(2)(e), National Parks Act 1980

100 See, for example, Department of Conservation, 2011, *Destination management framework - a new approach to managing destinations,* Department of Conservation, Wellington

101 See commentary in States Services Commission, 2016, *Performance improvement framework: Follow-up review of the Department of Conservation,* State Services Commission, Wellington, 16

102 Department of Conservation, 2016, *Department of Conservation statement of intent 2016-2020*, Department of Conservation, Wellington, 7

103 Department of Conservation, 2014, *Department of Conservation statement of intent 2014-2017*, Department of Conservation, Wellington, 12

104 Department of Conservation, 2019, *Conservation management strategy: Wellington 2019,* Volume 1, 12

105 Ibid

106 Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020,* Department of Conservation, Wellington, 10

107 Though notably it is employed in the Te Urewera Act 2014

108 Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020,* Department of Conservation, Wellington, 70

109 https://www.cbd.int/article/cop15-cbd-press-release-final-19dec2022

110 Section 4, Te Urewera Act 2014

111 Sections 8(1)(c)(i) and s11(1)(c), Environmental Reporting Act 2015

112 Section 6(2)(iii), Natural and Built Environment Act 2023

113 Schallenberg M, D Kelly, J Clapcott, R Death, C MacNeil, R Young, B Sorrell and M Scarsbrook, 2011, 'Approaches to assessing ecological integrity of New Zealand freshwaters', *Science for Conservation 307*

114 Game Animal Council, 2023, Submission on Natural and Built Environment Bill (12 February 2023)

115 Ibid

116 Te Ara Ki Mua, https://www.doc.govt.nz/globalassets/documents/conservation/biodiversity/te-ara-ki-mua-framework.pdf

117 Department of Conservation, 2022, *Department of Conservation statement of intent 2022–2026,* Department of Conservation, Wellington, 3

118 Ibid at 5

119 Ibid

120 Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020,* Department of Conservation, Wellington, 43

121 Ibid at 43

122 Department of Conservation, 2022, *Department of Conservation statement of intent 2022-2026,* Department of Conservation, Wellington, 3

123 Ibid at 6 and 11

124 Gavin M, J McCarter, A Mead, F Berkes, J Stepp, D Peterson and R Tang, 2015, 'Defining biocultural approaches to conservation', *Trends in Ecology & Evolution*, 30(3), 140-145

125 Caillon S, G Cullman, B Verschuuren and E Sterling, 2017, 'Moving beyond the human–nature dichotomy through biocultural approaches: Including ecological well-being in resilience indicators', *Ecology and Society*, *22*(4), 27

126 See discussion in Lyver P, A Akins, H Phipps, V Kahui, D Towns and H Moller, 2015, 'Key biocultural values to guide restoration action and planning in New Zealand', *Restoration Ecology*, 24(3), 314 and Gavin M, J McCarter, F Berkes, A Mead, E Sterling, R Tang and N Turner, 2018, 'Effective biodiversity conservation requires dynamic, pluralistic, partnership-based approaches', *Sustainability*, *10*(6), 1846

127 See discussion by Ruru J, 2004, 'Indigenous peoples ownership and management of mountains: The Aotearoa/New Zealand experience', *Indigenous LJ*, *3*, 111

128 See Lyver P, J Ruru, N Scott, J Tylianakis, J Arnold, S Malinen, C Bataille, M Herse, C Jones, A Gormley, D Peltzer, Y Taura, P Timoti, C Stone, M Wilcox and H Moller, 2019, 'Building biocultural approaches into Aotearoa – New Zealand's conservation future', *Journal of the Royal Society of New Zealand*, *49*(3), 394-411 and Winter C, 2021, 'A seat at the table: Te Awa Tupua, Te Urewera, Taranaki Maunga and political representation', *Borderlands Journal*, *20*(1), 116-139

129 See New Zealand National Party, 2023, *Recreation, culture and food: National's plan for hunting and fishing.* The functions of the Game Animal Council include liaising with hunters, raising awareness of the views of the hunting sector, advising the Minister for Conservation, and the management of 'herds of special interest' where these are established and the power to do so has been delegated by the Minister under section 20 of the Game Animal Council Act 2013.

130 https://www.dpmc.govt.nz/cabinet/portfolios/hunting-and-fishing

131 New Zealand National Party, 2023, *Recreation, culture and food: National's plan for hunting and fishing,* 1

132 The new Minister for Hunting and Fishing has emphasised the need for better management of species like deer to ensure a "thriving natural environment". Solutions are seen to lie with better aligning hunting with conservation objectives so that they "work in harmony". See McClay T, 2024, 'Hunter-led conservation project helps boost the health of Kaimanawa Forest Park' (Press release, 26 January 2024)

133 Section 52(1)(d), Public Service Act 2020

134 The Government's 100 Day Plan for example refers to "the right of New Zealanders to hunt and fish", https://www.national.org.nz/huntingfishing

135 Such an approach has already been adopted under the RMA, in relation to Te Mana o te Wai in the National Policy Statement on Freshwater Management 2020, which identifies the health of freshwater ecosystems as the overarching concern. The employment of such an approach in that context has proven somewhat controversial primarily because of the implications it raises for private landowners when applied over private land.

# PART 2
## Providing for Māori within the system

In Part One we traversed the opportunity to adopt a stronger biocultural approach to conservation that reflects te ao Māori as well as te ao Pākēhā values and aspirations. This reflects widespread acknowledgment of the lack of provision for Māori in the conservation system. This Part explores (in Chapter 3) key challenges and biases that exist for Māori under current settings and then (in Chapter 4) identifies opportunities to address them.

*People gathering in front of the wharenui,, Ōrākei Marae*

*Papakāinga, Wharengaere Bay, Northland*

# 3 Challenges for Māori within the current system

*Motutapu Island, Hauraki Gulf. The grant of concessions there and on Rangitoto Island by DOC led to the Supreme Court decision in the Ngai Tai ki Tāmaki case*

> "The Crown is obliged by the Treaty of Waitangi to protect kaitiaki interests in taonga within the environment, and to carry out its functions in a manner that to the greatest extent practicable is consistent with the tino rangatiratanga of iwi and hapū. Though we acknowledge the considerable effort that DOC has put into building relationships with tangata whenua, current conservation legislation and wildlife legislation, and DOC policy and structures, fall short of what is required for Treaty compliance."[1]
> *Waitangi Tribunal*

The Treaty of Waitangi Te Tiriti o Waitangi (Te Tiriti) is the foundational agreement on which Aotearoa New Zealand's nationhood is based and it forms a core part of the country's constitutional framework. However, what Te Tiriti means in practice today is frequently unclear. In part, this is because there is both an English and a Māori language version, and they do not say the same thing. The English text, for example, guarantees Māori undisturbed possession of their lands, forests and fisheries thereby focusing on securing property and ownership rights. In contrast, the Māori text guarantees 'rangatiratanga' (authority) that Māori hold over their lands and taonga (treasures), which is much more.[2] Because Te Tiriti was signed in 1840 it can also be challenging to determine its application to modern and ever-changing contexts.

When the Treaty of Waitangi Act 1975 established the Waitangi Tribunal, reference was made to the "practical application of the principles" of Te Tiriti.[3] Rather than concentrating on the precise wording of the two texts, and their differences, the Tribunal was directed to adopt a broader approach which focused on determining what Te Tiriti required in practical terms and how the Crown should undertake its duties and obligations to tangata whenua.

Since that time, a number of statutes have included Tiriti provisions, the three earliest examples (after the Treaty of Waitangi Act itself) being the State-Owned Enterprises Act 1986, the Environment Act 1986 and the Conservation Act. Although much legislation only directs that the principles of the Treaty be taken into account,[4] section 4 of the Conservation Act requires that the "Act shall be so interpreted and administered as to give effect to the principles of the Treaty of Waitangi".

Not only is "give effect to" a strong direction, but the reference to the Act being "interpreted and administered" so as to give effect to the principles of the Treaty infuses every provision in the Act, and the institutions operating under it. This includes the core definitions and purposes of the conservation system, its key institutions (including DOC, the NZCA, Conservation Boards and Fish and Game), and the framework for conservation management planning and concessions.[5] It also applies to the way the Department interprets and administers a myriad of other legislation.[6]

Despite the strong wording of section 4, and its broad reach, there appears to have been little consideration of its implications when the Conservation Act was drafted. A review of the *Hansard* debates, when the bill was considered by Parliament, revealed scant discussion of the clause. In addition, the Act provides no further provisions or mechanisms to support giving effect to Tiriti principles, being almost silent as to how tangata whenua are to be involved in the conservation system. It therefore seems likely that the full implications of section 4 were not appreciated when the Act was passed in 1987. It is certainly clear that the legislation was not crafted with Māori rights and interests front-of-mind.[7]

The result is a system that is unaligned with a Māori world view, fails to adequately accommodate Māori rights and aspirations, and is abrasive for iwi and hapū to engage with. These features make it inherently difficult for DOC to meet its section 4 obligations. EDS investigated these issues in some depth in its two recent reports on the conservation management planning system[8] and Wildlife Act.[9] Below, we summarise the key issues identified in those reports, before turning to potential solutions in Chapter 4.

## 3.1 Framing based on Pākehā values

A broad theme that echoes strongly throughout the literature, and in the sentiments of interviewees we spoke to, was that existing legislation and policy settings fail to incorporate the values and aspirations of Māori. As discussed in Chapter 2, the legislation applies a frame that treats nature as something apart from people, to be visited and appreciated. In addition, in line with the colonial importance placed on game hunting and sports fishing, nature (or at least introduced species which were considered much more suitable for such activities) was something to be used for recreational hunting and fishing.

These are not frames which resonate with te ao Māori. They fail to recognise human connectivity with nature, the need for reciprocity, and kaitiakitanga. The contrast between the approach taken in conservation legislation, and that in Treaty Settlement legislation or more recent statutes (such as the Te Urewera Act – see spotlight below), is stark. While the latter often recognise the national and intrinsic value of indigenous ecosystems (as shared values), this is infused with recognition of the mauri and mana of places and organisms. The need to strengthen and maintain connection, tikanga and traditional associations and practices, is also highlighted.

As a number of commentators have noted, the current legislative purposes and settings provide little space for tangata whenua to practice their own environmental ethic.[10] For a start, the Conservation Act does not explicitly recognise cultural values or resources. It does refer to "historic resources" and through a convoluted pathway (via reference to "historic places" in the Heritage New Zealand Pouhere Taonga Act 2014) defines them to include "historical and cultural heritage" including archaeological sites.[11] However, the focus is on protecting historic heritage rather than providing for present or future cultural practices.

The Conservation Act (along with the National Parks Act, Wildlife Act, Reserves Act and Marine Reserves Act) also fails to recognise customary use by tangata whenua except in relation to some fisheries.[12] Nor is there recognition of the need to protect taonga and provide for the continuing connection of tangata whenua to them. As our review of the Wildlife Act underscored,[13] there are no legislative levers (apart from section 4 itself) to ensure that the protection of taonga species is prioritised, or managed, maintained and enhanced in the interests of tangata whenua.[14]

> "Where Māori world views, and tikanga relating to the environment, reinforce the management priorities of DOC, they are taken up and incorporated into existing policies. Where Māori perspectives diverge from those of DOC, or are not understood and recognised by DOC policy-makers, the policy documents ignore them."[15]
> *Waitangi Tribunal*

This failure to provide for customary use is particularly stark when compared to the multiple other (potentially damaging) uses that are permitted on conservation land. As Ruru notes:

> The current conservation regime is comfortable with a progressive concession regime which permits major commercial use of, and activities within, the conservation estate. Some of this activity requires significant infrastructure and physical impacts, such as ski lifts, tourism facilities, telecommunication structures, golf courses, grazing and many other non-conservation focused activities.[16]

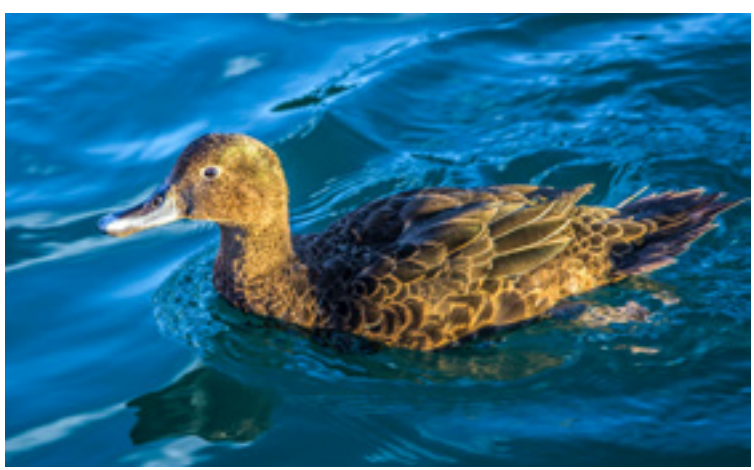
Existing conservation legislation and policy settings do not align with the values and aspirations of Māori. Statutory frameworks treat nature as separate from people and lack explicit recognition of cultural values. For example, they emphasise historic heritage rather than cultural practices, provide for recreational hunting and fishing and not customary use, and have often permitted activities at the cost of protecting taonga species.

## 3.2 Crown ownership of wildlife and conservation land

The Crown currently holds legal ownership of the conservation estate, which DOC administers on its behalf, subject to directions of the Minister of Conservation.[17] Under the Wildlife Act the Crown similarly asserts ownership of all wildlife.[18] Collectively this means that, regardless of Te Tiriti principles of self-management (rangatiratanga) and partnership, mana whenua must apply for permission to use native plants or wildlife (including parts of them, such as feathers), or undertake customary practices on conservation land. The result is that many critical aspects of the relationship of iwi and hapū with te Taiao are externally regulated by the Crown.

The granting of legal personality to natural features such as Te Urewera, the Whanganui River and shortly Mount Taranaki (as described below), has shifted the traditional approach to ownership, enabling natural entities to be deemed legal persons in their own right. Geddis and Ruru describe this outcome as a "form of principled compromise" that permits redress for Tiriti breaches, circumvents direct determinations as to ownership and enables new stewardship arrangements to be instituted.[19]

Māori contest Crown assertions of ownership over wildlife and find engagement with the conservation system inherently abrasive. This includes mana whenua having to apply to DOC in order to access customary materials and undertake customary practices, undercutting the principle of rangatiratanga. Innovative mechanisms, such as legal personality for natural entities, provides one means to 'work around' such issues but fundamental challenges remain.



***The Crown asserts ownership of wildlife, including the pāteke shown here, under the Wildlife Act***

## 3.3 Lack of clarity on Māori rights within the system

Despite some innovative models now emerging within the conservation system, there remains a considerable lack of clarity on what implementing section 4 of the Conservation Act means in practice. Even when section 4 matters have been taken to the courts, judges have struggled to articulate what "giving effect" to the principles of the Treaty requires.

In the *Ngai Tahu Māori Trust Board v Director-General of Conservation* decision,[20] where the application of section 4 was considered in relation to the issue of whale watching permits under the Marine Mammals Protection Act, the court made two key statements. The first was that statutory provisions for giving effect to the principles of Te Tiriti, in matters of interpretation and administration, should not be narrowly construed. The second was that DOC was bound to interpret the Marine Mammals Protection Act so as to give effect to the principles of Te Tiriti "at least to the extent that the provisions of the Act … were not clearly inconsistent with those principles".

Neither statement provides legal certainty or resolves the primary question as to what is required when section 4 does directly clash with another statutory provision. In the more recent *Ngāi Tai Ki Tāmaki Tribal Trust v Minister of Conservation* decision (Ngai Tai case),[21] the Supreme Court stated that what is required (in applying section 4) is "a process under which the meeting of other statutory or non-statutory objectives is achieved, to the extent that this can be done consistently with section 4, in a way that best gives effect to the relevant Treaty principles". In the context of the Reserves Act this required that section 4 be "reconciled with the values of public access and enjoyment in the Reserves Act".[22] This approach is very similar to that employed under the New Zealand Bill of Rights Act; when rights come into conflict, an attempt must be made to read the provisions consistently.[23]

The Court in the Ngai Tai case directed that section 4 should not be seen as being "trumped by other considerations" and was not to be treated as merely part of a balancing exercise. However, the Court also stated that how the section was to be applied depended "on which Treaty principles are relevant and what other statutory and non-statutory objectives are affected".[24] The Court then went on to determine that it did "not see it as necessary to resolve the differing views on how s 4 should be applied" since clear errors of law existed that meant such analysis was unnecessary.

Other courts have been reluctant to step into this area, as highlighted in *Norman v Tūpuna Maunga O Tāmaki Makaurau Authority,*[25] a case that

involved the removal of exotic trees from Mount Albert. While counsel for the Maunga Authority urged the court to apply section 4 to the interpretation of the Reserves Act, citing the Ngāi Tai case, the court declined to do so on the basis that the Ngā Mana Whenua o Tāmaki Makaurau Collective Redress Act 2014 already reflected Treaty principles such as redress, active protection and partnership.

Although the court left it open for section 4 to have greater relevance in future cases, it preferred to rely on the clearer direction of the settlement legislation, on the basis that it essentially provided the same outcome as applying section 4. This highlights how individual Treaty settlement legislation is 'trumping' the more opaque Treaty reference in the Conservation Act.

All those we spoke to regarding Te Tiriti matters wanted greater statutory clarity within the conservation system. For some, this was a matter of ensuring tangata whenua can access what they are entitled to without having to resort to the courts (which significantly disadvantages less well-resourced parties). For DOC decision-makers, such as permissions staff, such clarity would help reduce conflict and make clear what is required of them. For Conservation Boards and other conservation entities, role clarity would help ensure they met their obligations to iwi and hapū, and properly prioritised or weighted tribal inputs.

To be clear, the call for greater clarity is not a call for a bounded conception of Te Tiriti obligations. The objective is not to be definitive or comprehensive, but to provide a stronger and clearer structure within which appropriate place-based approaches can be crafted with iwi and hapū.

There is a considerable lack of clarity around what section 4 of the Conservation Act requires in practice, creating uncertainty for Māori and DOC alike, and increasing legal risk. Existing case law has resolved little, with requirements for compliance remaining highly dependent on the specific combination of legislative provisions and facts in each case. DOC decision-makers frequently look to Treaty settlement legislation for guidance since this provides a far clearer framework. However, compliance with that legislation does not absolve decision-makers from their broader section 4 obligations.

### 3.4 Failure to give effect to the full range of Treaty principles

Along with a lack of clarity regarding the broader implementation of section 4, there has been some uncertainty as to which principles of Te Tiriti are to be applied. The principles, as recognised by the government, the courts and the Waitangi Tribunal, have evolved over time and new principles are still emerging (see spotlight).

*Umupuia Marae which is principally associated with Ngāi Tai ki Tāmaki*

### Spotlight on Principles of Te Tiriti

When the Conservation Act was promulgated in 1987 Te Tiriti jurisprudence was still in its infancy. The first court case to directly consider what consistency with "the principles" of Te Tiriti required only came to the High Court in April that same year.[26] It resulted in the *New Zealand Māori Council v Attorney-General* decision[27] that prompted government to adopt the following set of 'Principles for Crown Action' in 1989:[28]

- The Principle of Government (the government's right to govern and make laws)
- The Principle of Self-Management (the right of iwi to organise and control their resources)
- The Principle of Equality (all New Zealander's are equal before the law)
- The Principle of Reasonable Cooperation (between government and iwi on matters of common concern); and
- The Principle of Redress (effective resolution of Māori grievances).

Since that time, a number of additional principles have been identified by the Waitangi Tribunal and the courts, including:[29]

- The Principle of Partnership
- The Principle of Active Protection
- The Principle of Reciprocity, sometimes referred to as "the essential bargain"
- The Principle of Mutual Benefit (the needs of both cultures are provided for).

All these principles are interconnected and underpinned by a number of established duties, including the duty to act reasonably, honourably and in good faith, and the duty to make informed decisions which is linked to the duty to consult.[30] More recently, a further 'Principle of Development' reflecting international law (the United Nations Declaration on the Rights of Indigenous Peoples to which Aotearoa New Zealand is a signatory), has been endorsed by the Waitangi Tribunal but not yet the courts.[31] This encompasses a general right for Māori to develop as a people and not be locked into a historical context.

The Conservation General Policy and the General Policy for National Parks (General Policies) provide a mechanism to 'fill in the detail' on how Te Tiriti principles are to be applied in practice within the conservation system. The legislation does not set out any specific purposes for these policies but they are ostensibly to assist with the implementation of the Conservation Act.[32] They are a powerful mechanism, in that they are binding on CMSs and conservation plans (including National Park Management Plans (NPMPs)), as well as the grant of concessions.

General Policies can (in theory) be updated to ensure they are "adapted to changing circumstances or increased knowledge".[33] In practice, they have only been updated twice: both times in response to challenge by iwi for non-compliance with Te Tiriti. The lack of regular update, except where there is legal prompting, itself highlights how unresponsive the conservation policy system is (a matter further discussed in Chapter 10).

Both of the current General Policies were promulgated in 2005, and their Te Tiriti sections adopt the *Principles for Crown Action on the Treaty of Waitangi,* as articulated by the government in 1989. This means only five principles (government, self-management, equality, reasonable cooperation and redress) are recognised. They omit what have become the most central and well-recognised Treaty principles; those of active protection and partnership.

The focus on the governance principle (the Crown's right to govern) has led to an approach where most directions in the General Policies are drafted in discretionary terms, leaving the Minister of Conservation wide discretion to make the final call. The wide array of "may" and "should" provisions in relation to tangata whenua[34] fall far short of the section 4 mandatory direction to "give effect" to Treaty Principles.

The Waitangi Tribunal noted, in its Wai 262 report, that this failure to reflect the full range of principles constitutes a breach of Te Tiriti.[35] Because the General Policies must comply with their empowering provisions, the policies are also ostensibly in breach of section 4 of the Conservation Act. Further, because these documents set the approach for CMSs and NPMPs, the selective and narrow recognition of Treaty principles in the General Policies has a ripple effect throughout the broader conservation system.

EDS explored this issue in its review of the conservation management planning system.[36] In short, many NPMPs do not even attempt to implement any specific Treaty Principles, but simply refer to the General Policy for National Parks.[37] Some only reference the Principles in their appendix.[38]

Similarly, eleven (of 17) Conservation Management Plans (CMPs) make no reference to Treaty principles, pointing to a systemic problem of drafters not linking Treaty principles to management at place. In relation to CMSs, what Treaty principles are identified and how they are applied is highly variable, and this has changed over time as DOC's internal approach has shifted. Somewhat surprisingly, the Tongariro-Taupō CMS (which dates to the 1990s conservancy era) has the strongest references to Treaty principles, listing nine and setting objectives for each. This appears to be an early example of a joint initiative with tangata whenua and demonstrates how different the framing can be when a more collaborative and partnership-based approach is adopted.

EDS's review of the conservation management planning system also found that, despite their absence in the General Policies, the most highly referenced Treaty Principles in conservation planning documents were those of partnership and active protection. Similarly, more modern planning documents also refer to "kāwanatanga" (rather than the "right to govern") and "rangatiratanga" (rather than the "right to self-management"). This demonstrates DOC's attempts to move on from the dated guidance provided by the General Policies.

Where Treaty Settlement legislation exists, more recent CMSs and plans have started to rely solely on these for direction. For example, both the Auckland and Northland CMSs (which date to 2014) and the most recent NPMP (for Paparoa National Park) do not refer to the principles of the Treaty at all. They contain significant detail on what is required, based on the arrangements set out in Treaty settlements, but this does not comprise compliance with section 4 which is a much broader requirement. The two should not be conflated.

Law professor Jacinta Ruru argues that, to presume that compliance with Treaty settlement legislation constitutes compliance with section 4, is an error of law.[39] The Options Development Group has also expressed its concern about this trend.[40] For unsettled iwi, who are wholly reliant on section 4, it is especially important that a clearer and more consistent approach is adopted.

The General Policies do not comply with section 4 of the Conservation Act as they fail to incorporate core Treaty Principles such as partnership and active protection. Because core conservation management planning documents and concession decisions must comply with the General Policies, this defect seriously undermines the provision for tangata whenua within the broader conservation system. It also contributes to an implementation gap.

## 3.5 Poor provision for partnership

As noted above, the General Policies fail to recognise the Tiriti principle of partnership. Although the Conservation General Policy directs that "relationships [with tangata whenua] *will* be sought and maintained",[41] it only states that "*partnerships* to enhance conservation and to recognise mana *should be encouraged* and *may be* sought and maintained…" There is also a proviso that such partnerships "*will* be appropriate to local circumstances".[42] This means that partnership with tangata whenua can be limited if DOC decides to adopt that approach. Similarly, the provisions on customary use state that "the views of tangata whenua *should*" [not must] be sought and be "*had regard* to",[43] meaning they can be outweighed by other considerations.

These policy settings place a significant onus on Māori to initiate any arrangements that are more than purely consultative in nature. For example, Policy 2(c) of the Conservation General Policy allows more specific protocols and agreements to be negotiated and implemented "by mutual consent" and Policy 2(j) requires the Department to participate in and implement relevant Treaty claims. In practice, the Department has entered into more than 40 conservation agreements and protocols with Māori, but many only exist because they have been negotiated through Treaty settlements.[44]

Because such arrangements have been developed in an ad hoc way, through settlement negotiations on a case-by-case basis, access to them is highly variable. Different deals are brokered depending on the date of the settlement and the level of resourcing and leverage available to the parties involved. As a result, some iwi and hapū have far more authority and representation within the conservation system than others. Unsettled iwi and hapū are especially disadvantaged and under-represented.

A second issue is that these provisions for whānau, hapū and iwi are add-ons to the system. They are exceptions to the usual way of doing things rather than being integral to how the system operates. Such inequities are something that a reformed conservation system will need to address.

Another area where partnership is lacking is in the interface between planning documents prepared by iwi and hapū and DOC-led conservation planning. There is no direction for DOC to 'take into account' or pay 'particular regard to' such relevant Māori-led planning documents, such as provided for under other statutory regimes like the RMA.[45]

DOC uses the term partnership extensively in relation to many parties, including corporate interests (ie 'corporate partnerships'). Partnership with tangata whenua is very different in kind to these other arrangements. Not only is it a requirement under section 4, it has constitutional significance. This means that 'partnership with tangata whenua' is a term that should be much more carefully employed and distinguished from relationships DOC develops with other parties.

Key messages on challenges for Māori within the current system

1. Existing conservation legislation and policies do not align with Māori values and aspirations, treating nature as separate from people, and lacking explicit recognition of cultural values.

2. Māori contest Crown assertions of ownership over wildlife and find engagement with the conservation system inherently abrasive. In particular, the requirement to seek permission from DOC to access customary materials undermines the rangatiratanga of mana whenua. Innovative mechanisms, such as legal personality for natural entities, provide a 'work around' but fundamental challenges remain.

3. There is a lack of clarity regarding the practical requirements of section 4 of the Conservation Act, creating uncertainty for Māori and DOC, and increasing legal risk.

4. Current policies fail to incorporate core Treaty principles such as 'partnership' and 'active protection' which impacts the provision for tangata whenua throughout the conservation system.

5. Partnership-based arrangements with tangata whenua are add-ons, and not provided as of right, leading to variations and inequities between different iwi and hapū.

6. There is no direction for DOC to 'take into account' or pay 'particular regard to' relevant Māori-led planning documents such as provided for under other statutory regimes like the RMA.

*Raupatu (confiscation of Māori land) pouwhenua, located in Te Papa-Kura-o-Taranaki Egmont National Park, carved by Albert Tāmati*

**Endnotes**

1 Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity,* Volume 1, Waitangi Tribunal, Wellington, 368

2 https://www.waitangitribunal.govt.nz/treaty-of-waitangi/meaning-of-the-treaty/

3 See the long title and preamble to the Treaty of Waitangi Act 1975

4 For example, the Environment Act 1986

5 With the exception that NPMPs are developed under the National Parks Act 1980

6 The list of legislation administered by DOC, as set out in schedule 1 of the Conservation Act 1987, is large

7 For a summary of issues see Ruru J, P O'B Lyver, N Scott and D Edmunds, 2017, 'Reversing the decline in New Zealand's biodiversity: Empowering Māori within reformed conservation law', *Policy Quarterly,* 13(2), 65

8 Koolen-Bourke D, R Peart, B Wilde and T Turner, 2021, *Independent review of the conservation management planning system*, Environmental Defence Society, Auckland

9 Koolen-Bourke D, R Peart and S Schlaepfer, 2023, *Reform of the Wildlife Act 1953: An opportunity for transformational change of Aotearoa New Zealand's biodiversity law*, Environmental Defence Society, Auckland; see specifically Appendix B – *The Wildlife Act and Te Tiriti o Waitangi*

10 See discussion in Ruru J, P O'B Lyver, N Scott and D Edmunds, 2017, 'Reversing the decline in New Zealand's biodiversity: Empowering Māori within reformed conservation law', *Policy Quarterly,* 13(2), 65

11 Section 6, Heritage New Zealand Pouhere Taonga Act 2014

12 Sections 26ZH and s48B, Conservation Act 1987

13 D Koolen-Bourke, R Peart and S Schlaepfer, 2023, *Reform of the Wildlife Act 1953: An opportunity for transformational change of Aotearoa New Zealand's biodiversity law*, Environmental Defence Society, Auckland

14 This is the wording employed in relation to sports fish and game birds managed in the recreational interests of anglers and hunters under section 26Q(1) of the Conservation Act

15 Waitangi Tribunal, 2013, *Te Kāhui Maunga: The National Park District inquiry report* (Wai 1130), Waitangi Tribunal, Wellington, Volume 3, [12.5.2], 894

16 Ruru J, P O'B Lyver, N Scott and D Edmunds, 2017, 'Reversing the decline in New Zealand's biodiversity: Empowering Māori within reformed conservation law', *Policy Quarterly,* 13(2), 65

17 Section 6, Conservation Act 1987

18 Section 57, Wildlife Act 1953

19 Geddis A and J Ruru, 2019, 'Places as persons: Creating a new framework for Māori-Crown relations', in Varuhas J (ed), *The frontiers of public law*, Hart Publishing

20 [1995] 3 NZLR 553 (CA)

21 [2018] NZSC 122

22 *Ngāi Tai Ki Tāmaki Tribal Trust v Minister of Conservation* [2018] NZSC 122 at [54]

23 Section 6, New Zealand Bill of Rights Act 1990

24 *Ngāi Tai Ki Tāmaki Tribal Trust v Minister of Conservation* [2018] NZSC 122 at [55]

25 [2020] NZHC 3425

26 This case considered the Crown's exercise of statutory powers and whether transferral of assets to state owned enterprises was inconsistent with the principles of the Treaty under section 9 of the State Owned Enterprises Act 1986, see *New Zealand Māori Council v Attorney-General* [1987] 1 NZLR 664

27 *New Zealand Māori Council v Attorney-General* [1987] 1 NZLR 664

28 New Zealand Government, 1989, *Principles for Crown action on the Treaty of Waitangi*, New Zealand Government, Wellington

29 https://waitangitribunal.govt.nz/assets/Documents/Publications/WT-Principles-of-the-Treaty-of-Waitangi-as-expressed-by-the-Courts-and-the-Waitangi-Tribunal.pdf

30 These have evolved through case law over time. For fuller discussion of their development and recognition see: Waitangi Tribunal, (undated), *The principles of the Treaty of Waitangi as expressed by the courts and the Waitangi Tribunal*, Waitangi Tribunal, Wellington, 77

31 See Waitangi Tribunal, 1988, *Report of the Waitangi Tribunal on the Muriwhenua fishing claim (Wai 22),* Waitangi Tribunal, Wellington, 238; and Waitangi Tribunal, 1990, *Report of the Waitangi Tribunal on claims concerning the allocation of radio frequencies (Wai 26 and 150),* Waitangi Tribunal, Wellington, 40

32 For example, section 17B(1) of the Conservation Act 1987 states that "The Minister may approve statements of general policy for the implementation of this Act…"

33 See section 44, National Parks Act 1980 and section 17B, Conservation Act 1987

34 See Policy 2 'Treaty of Waitangi responsibilities', Conservation General Policy

35 Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity*, Waitangi Tribunal, Wellington, 130

36 Koolen-Bourke D, R Peart, B Wilde and T Turner, 2021, *Independent review of the conservation management planning system*, Environmental Defence Society, Auckland

37 Six NPMP wholly or partially dispense with any reference to the Principles of the Treaty, they are: Abel Tasman NPMP at 43; Draft Aoraki NPMP at 17; Arthur's Pass NPMP at 46; Fiordland NPMP at 33; Mount Aspiring NPMP at 24; and Rakiura NPMP at 140

38 See as examples: Kahurangi NPMP at Appendix 4 and Westland Tai Poutini NPMP at Appendix 1

39 Ruru J, 2004, 'Managing our treasured home: The conservation estate and the principles of the Treaty of Waitangi', *New Zealand Journal of Environmental Law,* 8, 243

40 Options Development Group, 2022, *Partial reviews of the Conservation General Policy and General Policy for National Parks regarding Te Tiriti o Waitangi/the Treaty of Waitangi,* Department of Conservation, Wellington, 30

41 Policy 2(a), Conservation General Policy

42 Policy 2(b), Conservation General Policy

43 Policy 2(g), Conservation General Policy

44 For more detailed discussion see Koolen-Bourke D, R Peart and S Schlaepfer, 2023, *Reform of the Wildlife Act 1953: An opportunity for transformational change of Aotearoa New Zealand's biodiversity law*, Environmental Defence Society, Auckland, Appendix B

45 See sections 66(2A)(a) and 74(2A), Resource Management Act 1991. The Spatial Planning Act 2023 (now repealed) strengthened the direction to "particular regard", see section 23(2)(c)

# 4 Centering tino rangatiratanga and mana motuhake in a reformed system

*Ōnuku Marae, Akaroa Harbour, home of Ngāi Tārewa and Ngāti Īrakehu*

In this chapter we trace the narrative of the Waitangi Tribunal's flora and fauna claim: *Ko Aotearoa Tēnei* (the 'Wai 262' claim) and the progress it has prompted. We also briefly discuss some relevant concepts in te ao Māori, along with conceptual and practical advancements in conservation and environmental management, that help shed light on what a reformed conservation system could look like in practice.

## 4.1 Waitangi Tribunal claim (Wai 262)

Wai 262 was a pivotal claim to the Waitangi Tribunal that has prompted focus and progress towards providing for Māori rangatiratanga in Aotearoa New Zealand's conservation and environmental management systems.[1] The claim, which was lodged in 1991, was led by Saana Murray (Ngāti Kuri), Dell Wihongi (Te Rarawa), John Hippolyte (Ngāti Koata), Tama Poata (Whānau a Rua, Ngāti Porou), Kataraina Rimene (Ngāti Kahungunu) and Te Witi McMath (Ngāti Wai), with co-claimants from around the motu. The claim related to:

> The Protection, Control, Conservation, Management, Treatment, Propogation, Sale, Dispersal, Utilisation, and Restriction on the use of and transmission of the knowledge of New Zealand Indigenous Flora and Fauna and the genetic resources contained therein.[2]

The vision and aspiration of the claim was broad – to restore "te tino rangatiratanga o te Iwi Māori in respect of flora and fauna and all of our taonga".[3] It was a response to the many and diverse ways that the claimants, collectively and individually, had experienced acts by the Crown that undermined their tino rangatiratanga.[4] These restricted iwi Māori use and access to lands and species of flora and fauna. This in turn prevented Māori from being able to maintain cultural practices and connections to te Taiao, which were necessary to maintain Māori traditions and mātauranga. A poignant example was the sale of a large collection of ancient kūmara varieties to a research institution in Japan which removed the genetic and economic potential of those varieties from Māori control.[5] The broad framing of 'taonga' meant that even the rights and ownership of te reo Māori and other Māori cultural expressions were part of the claim.[6]

### *4.1.1 Ko Aotearoa Tēnei report*

The Waitangi Tribunal's response to the claim was slow, but comprehensive, with its report *Ko Aotearoa Tēnei* being published in 2011, 20 years after the claim was lodged. In the report, the Tribunal maps out the wide-ranging implications of the claim across seven chapters that overlap and have clear links with each other:

1. Taonga works and intellectual property
2. Genetic and biological resources of taonga species
3. Relationship with the environment
4. Taonga and the conservation estate
5. Te reo Māori
6. When the Crown controls mātauranga Māori
7. Rongoā Māori.

Before, during and since the report was published, aspects of its recommendations have been variously progressed through different mechanisms. While the scope of this chapter has overlaps with each of the chapters in the Tribunal's report, we focus here on Chapter 3: Relationship with the environment and Chapter 4: Taonga and the conservation estate.

The analysis, findings and recommendations in Chapter 3 are all directed towards the resource management system and its reform, but can also provide guidance for the reform of the conservation system.

**Spotlight on a Treaty-compliant environmental management system**

The Waitangi Tribunal has recognised that a Treaty-compliant environmental management system should deliver:[7]

- *Control* by Māori of environmental management in respect of taonga, where it is found that the kaitiaki interest should be accorded priority
- *Partnership* models for environmental management in respect of taonga, where it is found that kaitiaki should have a say in decision-making (but also noting that other voices should also be heard)
- *Effective influence and appropriate priority* to the kaitiaki interests in all areas of environmental management when the decisions are made by others.

The Wai 262 report asserts that Treaty complaint outcomes should be delivered by means of "a process that balances the kaitiaki interest alongside other legitimate interests".[8] The recommendations then focus on improving existing processes within the RMA, including:

- Enhancing the development and recognition of iwi management plans
- Removing barriers to the use of mechanisms for the sharing and transfer of powers, and mandatory reporting on the use (or lack thereof) of such mechanisms
- A commitment to capacity building of Māori to participate effectively
- Strengthening the use of National Policy Statements to drive greater Māori participation in resource (including indigenous biodiversity and introduced species of value) management.

More recently, the Natural and Built Environment Act and Spatial Planning Act (now both repealed) showed increasing recognition of, and alignment with, the Tribunal's recommendations. The extent to which further reforms of the resource management system will reflect such shifts, will become clearer over time, as the Government rolls out its reform agenda.

Chapter four of the Wai 262 report deals directly with the conservation system. The chapter highlights the complex ways in which Māori engage with that system, through relationships with DOC; involvement in conservation strategic planning; customary use; commercial activity within the conservation estate; and interactions with national parks legislation. The Tribunal recognises that "most of the surviving examples of the natural environment in which mātauranga Māori evolved are under DOC control". The Waitangi Tribunal also highlights the paramount role that DOC must play in delivering on the government's Tiriti responsibility to provide for the "exercise of kaitiakitanga in relation to the environment".[9]

The Tribunal notes that, despite the Conservation Act containing one of the strongest legislative requirements to give effect to the principles of the Treaty, the principles are still not reflected in DOC's day-to-day operations. It emphasises that "partnership and shared decision-making between the department and kaitiaki must be the default approach to conservation management".[10]

The Tribunal makes a comprehensive suite of recommendations that range from high level to specific. To foster more and stronger partnerships between DOC and iwi, the Tribunal recommends that the 'will' obligations in the General Policies should include 'partnership' and DOC achieving its conservation mission in a manner that is consistent with tino rangatiratanga of hapū and iwi wherever practicable.[11] To formalise the partnership, the Tribunal recommends the statutory establishment of a national Kura Taiao Council and conservancy-based Kura Taiao Boards. However, it does not prescribe how they should interact with the existing NZCA structure and its associated Conservation Boards.

Perhaps reflecting the complexity and limited theorisation around mātauranga Māori, the Tribunal makes only a high level recommendation to review legislation in order to reconcile mātauranga Māori with existing approaches within the conservation system.[12] More generally, the Tribunal makes the clear and comprehensive recommendation that the General Policies be amended to reflect the full range of Treaty principles articulated by the courts, but in a way that recognises that the principles can and must evolve to meet new circumstances. Similar amendments are recommended for Crown-Māori Relationship instruments and guidelines.

These recommendations appear to target the lack of 'effect' given to Te Tiriti principles in the existing system.

Chapter four of the Wai 262 report also makes explicit recommendations on access and use of the conservation estate and its taonga. With regard to customary use, the Tribunal recommends that provision be made for co-management and joint decision-making by both pātaka komiti (a panel made up of representatives from local iwi, representing kaitiaki) and DOC. This is to apply the partnership principle to the shared management of protected species. The Tribunal highlights the need to amend the General Policies to facilitate customary use, and the Wildlife Act to provide that no-one owns protected wildlife.

The recommendations extend not just to protected wildlife, but also to taonga works derived from them, with the Tribunal stating that tangata whenua should have lawful ownership of these instead of the Crown. Finally, the Tribunal highlights the need for tangata whenua commercial ventures within the conservation estate to be more supported in DOC policies and practices, to give tangata whenua a "reasonable degree of preference" when decisions are made.[13]

The Waitangi Tribunal considers that Treaty compliance requires environmental management systems to provide Māori with a mix of control, partnership and influence over taonga, while maintaining a balance with other legitimate interests. Enhancing the development and recognition of iwi management plans, removing barriers to power-sharing mechanisms, building Māori capacity for effective participation, and increasing Māori involvement in management, are all important aspects to this.

The Tribunal has emphasised that the natural environment, where mātauranga Māori evolved, is now under DOC control and therefore the Department has a paramount role in providing for Māori exercise of kaitiakitanga. This means that partnership should become the default setting. The Tribunal recommended:

- Updating General Policies to mandate partnership (with "will" not "should" direction)
- The establishment of a national Kura Taiao Council and conservancy-based Kura Taiao Boards
- Co-management and joint decision-making by local iwi representatives and DOC
- Amendments to General Policies to facilitate customary use
- Amendments to the Wildlife Act to provide that no one owns wildlife
- Recognition of Māori lawful ownership of taonga works derived from protected wildlife
- Greater support for Māori commercial ventures within the conservation estate
- A "reasonable degree of preference" to be provided tangata whenua in conservation decision-making.

### *4.1.2 Government response and Te Tumu mō te Pae Tawhiti*

The government did not provide a formal response to the Tribunal's Wai 262 report, until 2019, eight years after its release. Then Minister for Māori Development, Nanaia Mahuta, announced she was taking the lead on developing "a whole-of-government strategy to address the issues raised in the Wai 262 claim". She established a Ministerial oversight group to support three kete (baskets) of issues – taonga works, taonga species and the international sphere.[14] Cabinet agreed noting that, despite some progress on Wai 262 matters, efforts had not been coordinated and several upcoming workstreams would require government to take a position on some specific Wai 262 issues in the near future.

In January 2022, a more focused all-of-government response to Wai 262 emerged through the Te Tumu mō te Pae Tawhiti programme.[15] This envisages a broad scope of reform (see Figure 4.1) and demonstrates the breadth of response required to deal with the implications of Wai 262. The programme, proposed by Minister Mahuta through successive cabinet papers from 2019 to 2022, includes:[16]

- Exploring biodiversity incentives to support Te Mana o Te Taiao
- A review of the Wildlife Act
- A partial review of the General Policies

The programme seeks to align this work with Te Mana o Te Taiao, as well as the National Policy Statement for Freshwater Management and its Te Mana o Te Wai framework under the RMA.[17]

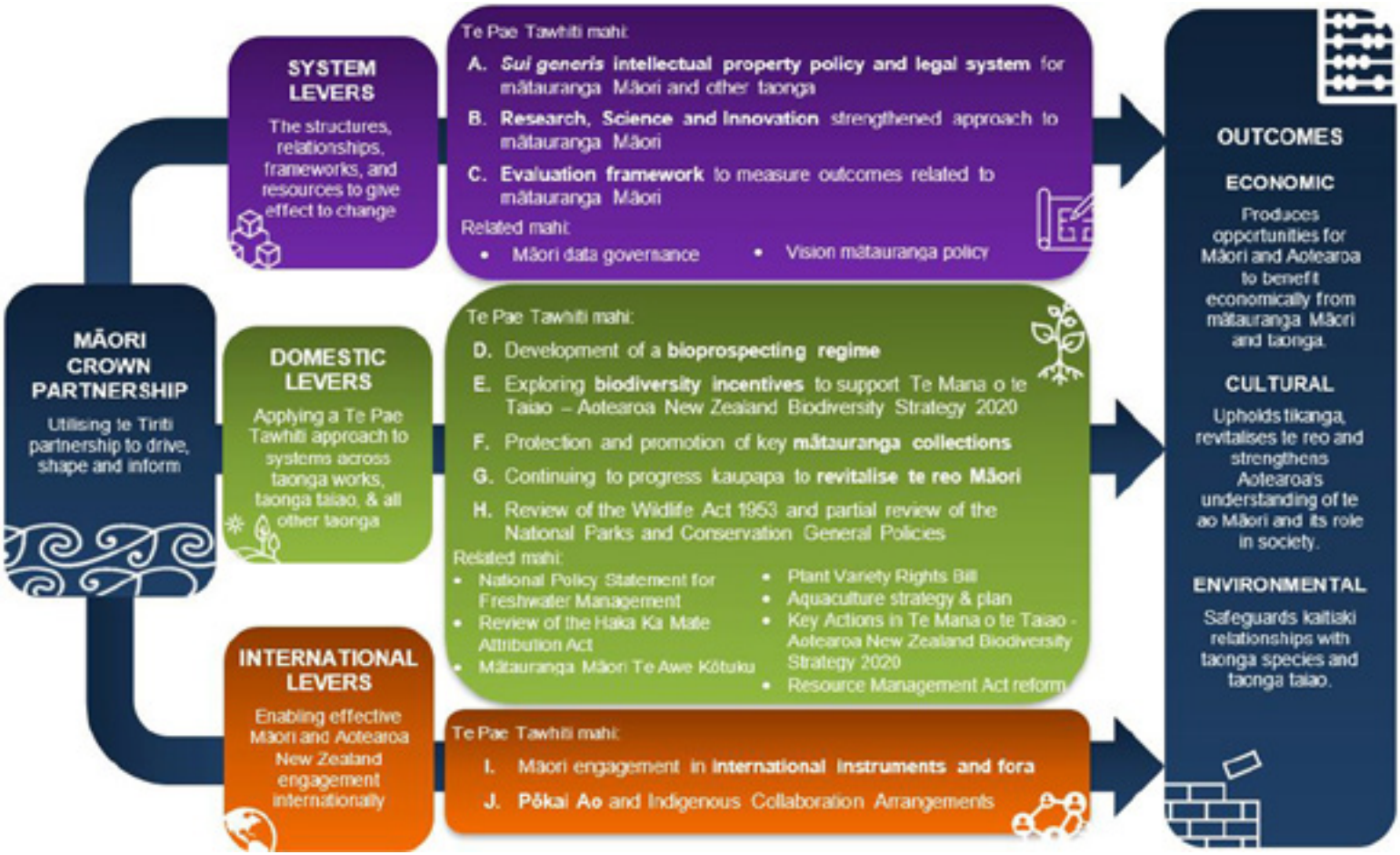



**Figure 4.1: Te Tumu mō te Pae Tawhiti programme of works** *(Source: Cabinet Committee)*[18]

*Ruawa (gunwales) of Ngātokimatawhaorua waka, Waitangi*

### 4.1.3 *Biological Heritage National Science Challenge recommendations*

Outside of the government response, the Adaptive Governance and Policy Team of the Biological Heritage National Science Challenge has engaged with the Wai 262 report.[19] In all, the team put forward 30 detailed recommendations relevant to natural resource governance and policy and its implementation (see Figure 4.2), but few have seen any progress. One recommendation is that iwi, hapū and other kaitiaki utilise 'indigenous resource management plans' to formally express their aspirations for kaitiakitanga in a way that can help direct action.

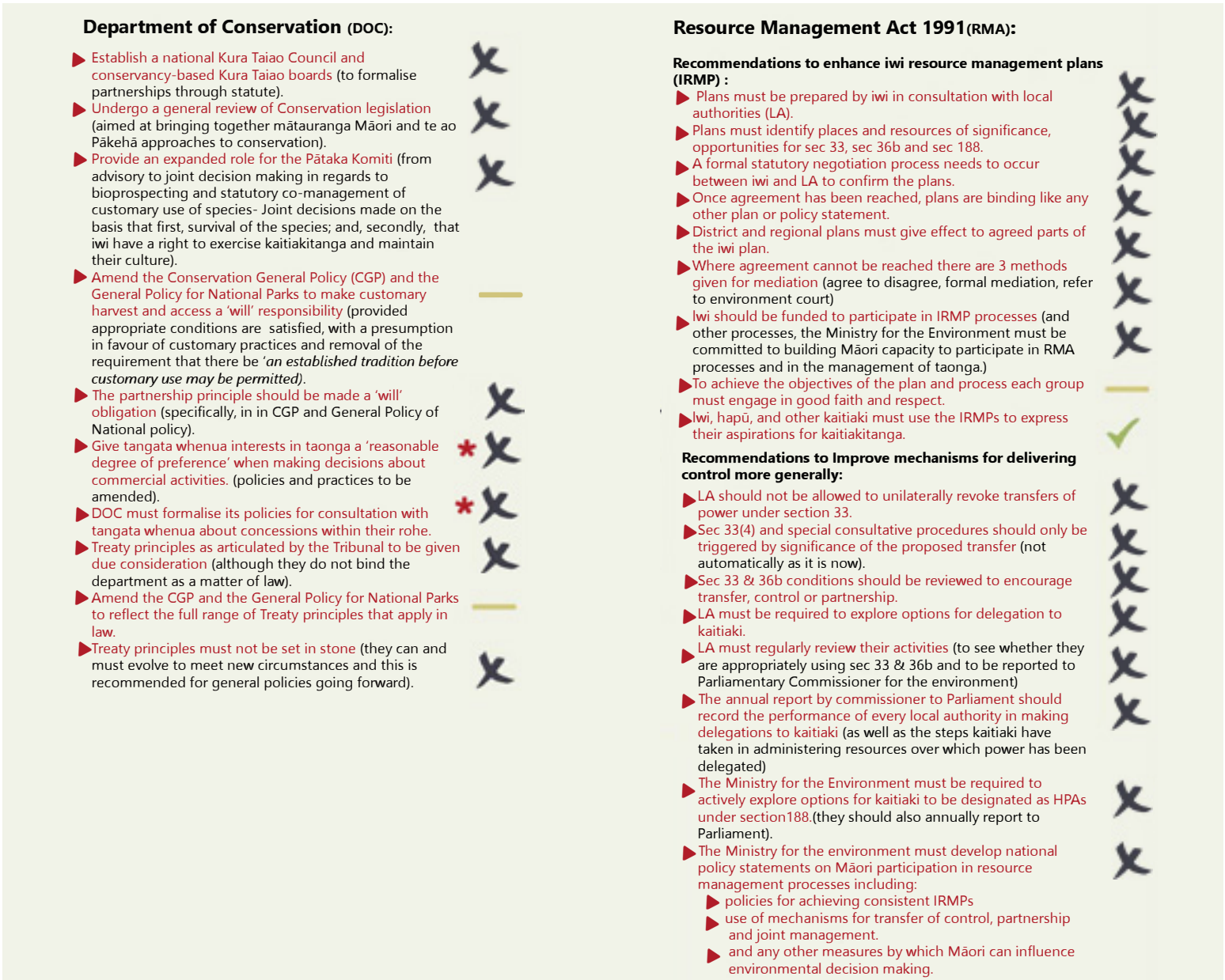



**Figure 4.2: Biological Heritage National Science Challenge recommendations for conservation reform in response to the Wai 262 report**
*(Source: New Zealand's Biological Heritage, Ngā Koiora Tuku Iho)*[20] (green tick means implemented, yellow line means partially implemented and black cross means not implemented)

### *4.1.4 Options Development Group recommendations*

The Options Development Group is a collective of Māori conservation management experts brought together to provide draft text for a revised Chapter 2 of the General Policies. To do this work, the Group led a broad engagement process including with Māori hapū and iwi and Conservation Boards. It articulated another set of recommendations for reform of the conservation system (shown in Figure 4.3).

The draft revised text of the General Policies, prepared by the Options Development Group, gives much stronger directives for partnership with hapū and iwi. It also includes other more prescriptive measures, including making it more difficult to 'balance out' Māori interests in favour of others.[21]

An important inclusion is explicit wording that creates a requirement for iwi and hapū planning documents to be appropriately recognised in statutory planning documents, in DOC business and planning cycles, and when the NZCA and Conservation Boards make decisions.

The Option Development Group's recommendations also indicate further avenues for change without providing too much prescription. These include the "reframing of the purpose of conservation to ensure it is fit for purpose for Aotearoa" and to "centre kawa, tikanga and mātauranga within the conservation system".[22] While the recommendations provide a clearer direction for how the system might give effect to mātauranga, further work is required to determine how to achieve this in practice.

| Theme | Recommendation | Sub-recommendation |
|---|---|---|
| *Fundamental reform* | **1.** Undertake a fundamental reform of the conservation system as a whole. | **A.** Review and replace the Conservation Act 1987 and all associated schedule 1 Acts (and associated policies, strategies and delivery) to honour Te Tiriti and provide for the meaningful exercise of rangatiratanga and kaitiakitanga by tangata whenua to ensure that Papatūānuku thrives.<br>**B.** Adopt a Te Tiriti partnership approach when undertaking fundamental reform of the conservation system. |
| *Purpose of conservation* | **2.** Reframe the purpose of conservation to ensure it is fit-for-purpose for Aotearoa. | **A.** Embed a new understanding of conservation that is specific to Aotearoa New Zealand and reflects both tangata whenua and tangata tiriti perspectives and supports thriving indigenous biodiversity. |
| *Tikanga* | **3.** Centre kawa, tikanga and mātauranga within the conservation system. | **A.** Ensure the conservation system and decision making within it give weight to mātauranga and uphold kawa and tikanga.<br>**B.** Ensure that the terms and key principles under conservation legislation, policies and strategies reflect kawa, tikanga and mātauranga.<br>**C.** Ensure the relationship between tangata whenua and conservation lands, waters, wāhi tapu, resources, species and other taonga (including kawa, tikanga and mātauranga relating to that relationship) is determined by tangata whenua, and that relationship is enabled and empowered by the conservation system. |
| *Lands, waters, resources, species and other taonga* | **4.** Recast the legal status of conservation land and waters, resources, indigenous species and other taonga. | **A.** Reform the ownership model of public conservation lands and waters to reflect the enduring relationships tangata whenua have with these places and the resources and taonga within them.<br>**B.** Undertake a review of all classifications applied to public conservation lands and waters to recognise tangata whenua relationships.<br>**C.** Revoke Crown ownership of indigenous species.<br>**D.** Resolve tangata whenua rights and interests in the freshwater and marine domains.<br>**E.** Ensure tangata whenua access to and use of all land, waters, species and resources managed within the conservation system, including within the context of permissions and concessions. |
| *Te Tiriti partnership* | **5.** Reform conservation governance and management to reflect Te Tiriti partnership at all levels. | **A.** Review and reform conservation governance entities including the New Zealand Conservation Authority, conservation boards and other statutory bodies to reflect Te Tiriti partnership.<br>**B.** Adopt appropriate models for mana-to-mana relationships, planning and decision making at the appropriate geographic scale.<br>**C.** Honour and implement existing Te Tiriti settlement commitments and arrangements, noting these do not limit the full expression of Te Tiriti partnership.<br>**D.** Make immediate changes to ensure that tangata whenua are engaged in decision making which affects their interests, including in the context of permissions and concessions. |
| *Tino rangatiratanga* | **6.** Enable the devolution of powers including decision making to meaningfully recognise the role and exercise of tino rangatiratanga. | **A.** Provide for the delegation, transfer and devolution of functions and powers within the conservation system to tangata whenua. |
| *Resourcing* | **7.** Build capability and capacity within Te Papa Atawhai and with tangata whenua. | **A.** Provide resourcing for both Te Papa Atawhai and tangata whenua to build capability and capacity to give effect to the principles of Te Tiriti, including but not limited to:<br>i. partnering in fundamental reform;<br>ii. exercising autonomy and participating in decision making;<br>iii. developing policy, strategy and planning documents;<br>iv. delivering conservation at place; and<br>v. reconnecting and strengthening the relationship of tangata whenua with conservation lands and waters, resources, and species. |

**Figure 4.3: Options Development Group recommendations for conservation reform** *(Source: Options Development Group)*[23]

The advice and recommendations of the Biological Heritage National Science Challenge and Options Development Group, mirror those of the Waitangi Tribunal, adding further support for system reform. All these recomendations, taken together, provide a comphensive framework against which practical conservation reform options could be assessed.

Government has set out a programme of reform to address the implications of the Wai 262 report. The Te Tumu mō te Pae Tawhiti programme prioritises work to progress the partial review of General Policies and a review of the Wildlife Act, and commits to exploring biodiversity incentives to support Te Mana o te Taiao.

### *4.1.5 Treaty settlement provisions and promises*

Individual iwi Treaty settlement processes have yielded a host of progressive arrangements that will also need to be accommodated within any reformed conservation system. Particular focus could be given to the bespoke partnership and governance arrangements established variously across the motu. As more and strengthened partnership arrangements are a fundamental element of the reform recommendations canvassed above, using the strengths and weaknesses of the models that have been in operation will, at the very least, limit replicating the errors of the past. The bespoke arrangements for giving effect to kawa, tikanga and mātauranga across the motu will also be instructive for how to incorporate such directives at a higher level.[24]

*Taranaki Maunga which is the subject of a Treaty settlement and will be vested as a legal person Te Kāhui Tupua*

**Spotlight on provisions in Treaty settlements**

Most Treaty settlement legislation makes adjustments to existing institutions, planning provisions and processes within the conservation system. Examples include:

- Protocols with DOC over the management of certain areas
- Protocols for access to certain protected species of plants and animals[25]
- Iwi representation on Conservation Boards[26]
- Iwi appointments as statutory advisers to the Minister of Conservation[27]
- Statutory recognition of iwi values pertaining to particular sites, with the ability of the Director-General of Conservation (Director-General) to make bylaws and regulations to enforce those values[28]
- Tōpuni, or the provision for an 'overlay classification', that acknowledges iwi associations and values with the area
- Notification requirements over relevant consent and concession applications
- Establishment of new CMPs setting management requirements for specific areas
- Delegation of management powers for reserves under the Reserves Act
- More prescriptive direction on the matters on which DOC has an obligation to consult.

The establishment of a reserve or alteration of a designation to a reserve, under the Reserves Act, is one avenue often taken by iwi and hapū in Treaty settlements. The Reserves Act can offer greater flexibility since, under section 26, a clear pathway for vesting administration to other entities is provided for. The Act also provides a number of different reserve types (eg recreation, historic, scenic, nature etc) so there is a greater choice of frame. But there are no reserve classifications designed with mana whenua front of mind.

In canvassing the types of provisions set within Treaty settlements, it is evident that many of these would be valuable additions to the conservation system, and would improve the options available to tangata whenua and DOC.

Treaty settlements provide informative and innovative models that can help guide the development of conservation reform options.

#### *4.1.6 Co-ordinated implementation across systems*

There is inherent overlap between the Waitangi Tribunal recommendations on the RMA and on the conservation system (in Chapters 3 and 4 of Wai 262 respectively). This indicates they should be applied collectively across both systems. The RMA already directs regional councils and territorial authorities to "take into account" the planning documents prepared by iwi,[29] but (as noted in Chapter 3), there is no equivalent provision within the conservation system. The Options Development Group has underscored the importance of recognising not only iwi but also hapū planning documents. This could be incorporated into the General Policies, and the direction given a more binding form, such as "give effect" to.

Stronger directives in the General Policies could also help mirror, within the conservation system, the progress and momentum gained through the National Policy Statement for Freshwater Management and its shift to recognise Te Mana o Te Wai in the resource management system.

Alignment between the resource management and conservation systems is important to help ensure hapū and iwi can enact their tino rangatiratanga and mana motuhake *across both systems*. A degree of alignment will also help ensure efficiency and reduce duplication of effort for hapū and iwi.

### 4.2 Operationalising Māori concepts in a reformed system

The calls for fundamental reform, particularly from the Options Development Group, suggest that a philosophical shift within the conservation management system is required. This was framed specifically as the need to give "weight to mātauranga Māori and to uphold kawa and tikanga".[30] In this section we explore a range of Māori concepts which might be operationalised within a reformed conservation system. It is not possible here, to do justice to the breadth and depth of meanings of these concepts, but we provide a starter to provoke thought. More dedicated research into how these can best be embedded in the principles, practices and systems of conservation management is needed.

#### *4.2.1 Kaitiakitanga*

The word and concept of kaitiakitanga is prominent in the conservation discourse and has for over 30 years been a key inclusion in the RMA. It has even become the rationale for Aotearoa New Zealand's presence and activities in Antarctica.[31] The concept is often described in English as guardianship or stewardship but much is lost in that translation.[32]

In te ao Māori, the word is applied in many ways when referring to care and protection, with the root word "tiaki" being a verb variously meaning to guard, protect, or care for. The addition of "kai-" at the beginning transforms the word to refer to the agent enacting the verb (ie, the guardian, protector, or carer). The addition of "-tanga" shifts focus, from the agent enacting the verb, to the principles and practices of exercising that agency.

For some, using the word to refer to humans is at odds with traditional understandings of kaitiaki as non-human relations who have agency as guardians and protectors. This highlights the complexity of bringing such a word and concept into contemporary environmental discourse. While these notions of kaitiaki prevail in contemporary Māori lives, so too do Māori understandings of themselves as kaitiaki of the natural world.[33]

In 1991, kaitiakitanga and its understanding of human responsibilities for care and protection of nature, was embedded in the RMA. This was lauded as a significant step in facilitating active expressions of Māori tino rangatiratanga and mana motuhake.[34] However, the reality after 30 years of operation, has been the continued marginalisation of iwi Māori from environmental management and decision-making. This has been accompanied by severe degradation of the health of the environment and, in particular, freshwater systems.[35]

But on the positive side, a rich literature and understanding of kaitiakitanga and what it means in relation to human stewardship of the natural world, now exists. This will undoubtedly facilitate a more fulsome expression of kaitiakitanga in the conservation management system going forward.[36] Key literature, such as that of Mere Roberts and colleagues in 1995,[37] and Merata Kawharu in 2000, both provided early and constructive critiques of how kaitiakitanga was incorporated into the RMA.

The work of Kawharu assisted in reframing the concept, from one of simple protection, to a true resource use ethic particular to the Māori worldview and cosmogeny.[38] Importantly, it also highlighted that kaitiakitanga cannot be understood without regard to other key concepts

including mauri, mana, rangatiratanga and whakapapa, amongst others. Some of these have also been operationalised in Aotearoa New Zealand's environmental and conservation management systems. Such existing models can provide lessons on how such concepts could be incorporated into a reformed conservation system in a more coordinated manner.

### *4.2.2 Mauri*

Mauri is also a central concept in Māori ontology, often described in English as life-force or life-essence.[39] This translation is immediately challenged by both living and non-living (according to biological definitions) individuals having mauri. It is therefore challenging to effectively represent mauri in a conservation system based on biological understandings of humans and nature.

To say the mauri of a person, animal or place is strong, is to mean that it is healthy and has a sense of vitality and well-being.[40] All things in the natural world are connected and interact in a way that contributes to a balance of the mauri of the individual, the relationship that the individual maintains with other individuals, and the interconnected and interdependent system of relationships they belong to.

Key Māori scholars suggest that mauri can be enhanced or diminished, and is even extinguishable, emphasising the importance of maintaining its balance.[41] For some, this can be achieved through acts that 'feed' the mauri of, say, an awa or river. These may be physical acts, such as planting or felling a tree, or spiritual acts such as the use of karakia (prayer).

The concept of mauri has been operationalised in the environmental management system, particularly through advancements in freshwater management. The National Policy Statement for Freshwater Management, in its incorporation of Te Mana o te Wai, recognises that the life supporting capacity of the country's waterways is linked to their mauri (see Figure 4.4). The declining ecological health of river systems, as evident in the reduced numbers of taonga species and mahinga kai, speaks specifically to the diminishment of their mauri.

Novel freshwater monitoring frameworks have been developed to bring tikanga and kawa into freshwater management.[42] Some explicitly aim to measure the mauri of freshwater systems through a combination of physiometric data and assessment of ecological and social elements of the health of the waterways. Māori are continuing to develop and refine mauri monitoring tools thereby improving their sophistication and ability to measure the true mauri of freshwater systems.

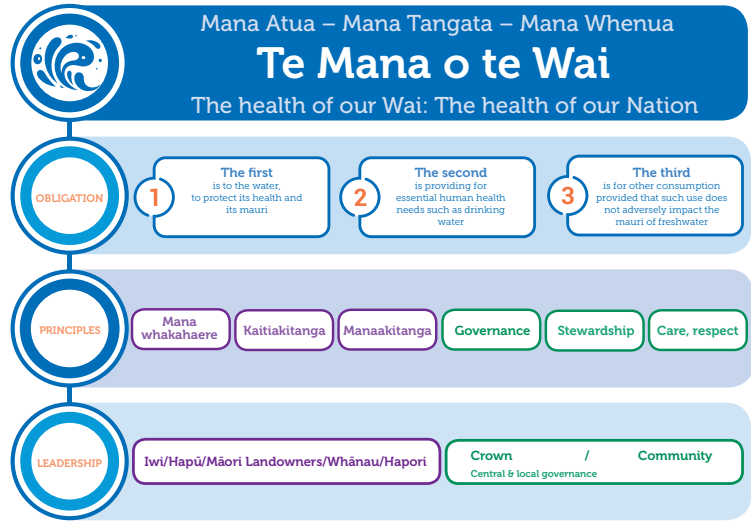



**Figure 4.4: Te Mana o te Wai framework under the National Policy Statement for Freshwater Management 2020** *(Source: Kāhui Wai Māori)*[43]

### *4.2.3 Mana*

Mana is another central concept in te ao Māori. It has a functional role within other Māori concepts, particularly those that guide how Māori relate to each other, the environment and the spiritual or non-physical realm.[44] The word is often likened to the concept of prestige, authority or power. This is reflected in the way the concept shapes the hierarchical system of traditional Māori society. Mana can suggest the rank that a person or place has within a grouping. The associated relationships form the basis for how hapū and iwi organise themselves in relation to the landscape and each other.

Although recognised in human interactions, mana is said to be from the atua (gods), meaning that those who hold mana are afforded respect but also accept the inherent associated responsibilities. With regard to kaitiakitanga, mana is an essential element for understanding who has the authority and mana to enact the practice in the correct way. Those who hold mana as kaitiaki are then accountable to the hapū and iwi, but also to the atua.

As a foundational concept, mana has been incorporated into environmental and conservation management in Aotearoa New Zealand in many ways.[45] One important mechanism is through the concept of mana whenua (often represented as tangata whenua) where the mana of the whānau, hapū and iwi to speak within a certain geographical area is recognised. In practice, this necessitates local and place-based interpretation and enactment of the principles and practices of kaitiakitanga.

Although settlement processes have established iwi representative structures, mana needs to be recognised at the whānau and hapū level. Future conservation management structures need to recognise the level at which mana is held. This is not to say that every hapū requires organisational structures similar to those developing at the iwi level, but those structures need to explicitly recognise their mana. These requirements are reflected in the draft text provided by the Options Development Group that explicitly refers to "iwi *and hapū*".[46]

Along with mauri, mana as it applies to the natural world, is currently recognised in Te Mana o te Wai (see Figure 4.4).[47] This concept has resulted in an explicit shift to prioritise the health of waterways over human health and economic activities. It replicates the hierarchical and relational structures that place humans within, as part of and subordinate to, te Taiao (the natural world).

There have been some concerns over the use of the word mana, in the environmental management system, particularly within the agricultural sector and some councils.[48] This led to avoidance of the term in recent RMA reforms.[49] Recognising the mana of te Taiao over humans, in order to give effect to kawa and tikanga, creates tensions with those who wish to prioritise resource use. This may be a challenging area for a reformed conservation system to address.

***Waiho River, Westland. The Māori term 'mana' has been operationalised in freshwater policy through the concept 'Te Mana o te Wai'***

### *4.2.4 Whakapapa*

A superficial understanding of whakapapa is that it means a person's genealogical heritage. But the concept is a much more fundamental organising principle that goes beyond just biological connections.[50] It encompasses the idea of interconnectedness and interdependence, as well as the belief that everyone and everything has a place and a purpose within the world.

Whakapapa can be thought of as a kind of family tree that connects individuals to their ancestors, their tribe and the land they come from. This extends all the way back to the origins of the universe, including the atua and their progenitors Ranginui (sky father) and Papatūānuku (earth mother). The concept of whakapapa is deeply intertwined with Māori spirituality and worldview, and is a crucial part of identity and sense of belonging. In relation to kaitiakitanga, whakapapa is critical to understanding who holds the mana to be kaitiaki and enact kaitiakitanga.

### *4.2.5 Rangatiratanga and mana motuhake*

Rangatiratanga and mana motuhake are similar and related concepts that are likened to sovereignty, self-determination and autonomy in decision-making and leadership. Rangatiratanga is guaranteed in Article 2 of the Māori text of Te Tiriti, with the term used to convey the unqualified exercise of Māori chieftainship over Māori lands, villages and all their treasures. There is a wealth of literature to support an in-depth theoretical framing for the design of reform models that reflect Māori tino rangatiratanga. As a concept, mana motuhake has received less discussion in the literature,[51] but it is alive in iwi and hapū articulations of identity and authority in their policy documents and narratives.[52]

### *4.2.6 Kotahitanga*

A final concept of note is that of kotahitanga. This has not been operationalised in legislation or governance to the same extent as some of the other concepts discussed above. However, it may provide a useful approach to meeting the challenges of reforming the conservation system. Often thought of as unity, kotahitanga is for Māori an essential part of their social and political structures.[53] It involves working together to achieve common goals and aspirations, or finding common ground

despite individual differences, and upholding customs and traditions that strengthen Māori identity.

Historically, kotahitanga has been critical in resistance to colonial rule. Māori communities worked together to resist the efforts of settler governments to confiscate land and suppress Māori culture. The concept was seen in action, in the purpose and establishment of the kingitanga movement, and in the more contemporary establishment of the Iwi Chairs Forum.[54]

There are a range of te ao Māori concepts that could assist to drive philosophical shifts in the conservation system and better align it with Māori values:

*Kaitiakitanga* has been recognised in the resource management system since 1991 to embed the responsibility of care and protection of nature. It resonates especially closely with potential provision for customary harvest and could inform existing approaches to managing hunting and fishing.

*Mauri* gives a sense of connectivity and balance. In association with indigenous species, it could help ensure their right to exist at place is more strongly recognised. It could also promote a more holistic approach to the assessment of health and well-being of the natural world.

*Mana* is connected to respect and authority and is inextricably linked to place. It strengthens the mandate for the conservation management system and institutional arrangements to be tied to place, where the mana whenua reside. Recognition of 'Te Mana o te Taiao' could provide a mechanism to acknowledge the mana of the natural world, first and foremost, and establish a clear hierarchy of priorities for a reformed conservation system.

*Kotahitanga* may be vital in ensuring that the local and place-based conservation initiatives of whānau, hapū and iwi are balanced with conservation needs across the entire motu. The concept may also support the negotiation of power-sharing arrangements between iwi and hapū on one hand, and the Crown on the other along with conservation groups.

Recommendations from the Waitangi Tribunal that call for greater self-determination and decision-making authority for tangata whenua also support greater recognition of rangatiratanga within the conservation system.

## 4.3 Contemporary approaches which draw synergies with te ao Māori

Contemporary developments in environmental management, around the world, provide conceptual and practical examples that can usefully inform a redesign of Aotearoa New Zealand's conservation system. Below we canvas some of the leading approaches that show synergies with the values and approaches of te ao Māori.

### *4.3.1 Ecosystem-based management*

Ecosystem-based management is a holistic approach to managing natural resources that takes into account the complex relationships between living organisms and their environment, including the impact of humans.[55] Rather than focusing on individual species or resources, such management considers the health and well-being of entire ecosystems. The approach recognises that human activities can have far-reaching effects on natural systems, and seeks to balance the needs of economic development with long-term protection of ecological integrity. Some key principles of ecosystem-based management include collaboration between stakeholders, the use of evidence to inform decision-making, and adaptive management that allows strategies to be adjusted as the natural and human systems change over time.

Such principles have some alignment with the core concepts associated with kaitiakitanga, such as mahinga kai and rāhui. Mahinga kai can sometimes have limited focus on the species that are used as food. But the practice encompasses a broader process including the intimate understanding of te Taiao that comes with having to acquire and prepare the kai (food). The feedback loop of understanding, that comes with the practice of mahinga kai, can then inform the adaptive practice of rāhui (restricting access or use) to ensure the sustainability of the food source. While some of these principles may already be in play in Aotearoa New Zealand's conservation system, formalising them within structures and processes that put hapū and iwi decision-making at the centre, will be key.

### *4.3.2 Rights of nature and legal personality for natural features*

Around the world, the 'rights for nature' discourse is embedding within environmental management systems a different relational ethic (and sometimes an Indigenous one), that recognises the legal (and moral) standing of natural entities. The approaches range from blanket (and diffuse) recognition of the rights of mother nature, to bespoke legislative arrangements that establish governance structures recognising legal personality and giving voice to specific landscape

features.[56] The concept continues to evolve as the legal realities of previous models are tried and tested.

Aotearoa New Zealand has progressed thinking in this arena through the Te Urewera Act, Te Awa Tupua Act 2017, and in the forthcoming Taranaki Maunga legislative arrangements. The new models evolving under Tiriti settlements provide an interesting direction in which the conservation system, more broadly, could potentially move in.

"Legal personality of this land, river and mountain mark a significant positive transformation for Aotearoa New Zealand's environmental and constitutional laws. These laws provide a connective example of how western colonial law can positively forge a bridge to Indigenous laws. These resolutions are ground-breaking political solutions to constructively accept at a national level Māori Indigenous laws for knowing, caring for, and using lands and waters. They recognise our human rights as Māori in a very Māori way."[57]
*Professor Jacinta Ruru*

***Specific landscape features, such as Ngāuruhoe Maunga shown here, can be given legal standing***

**Spotlight on Te Urewera**

The purposes of the Te Urewera Act include to preserve Te Urewera's "natural *and* cultural values" and in particular to preserve its "indigenous ecological systems and biodiversity" as well as strengthening and maintaining "the connection between Tūhoe and Te Urewera".[58] Under the new regime, the Te Urewera Board has been established to "act on behalf of, and in the name of, Te Urewera".[59] The Board is comprised of six Tūhoe and three Ministerially appointed members.

Prior to the Te Urewera Act coming into effect, Tūhoe needed to obtain prior written consent from the Minister of Conservation to undertake activities within the national park, or to use or harvest any indigenous plant or animal.[60] Under the new regime, the Te Urewera Board is responsible for preparing management plans (rather than the Conservation Board), and for their approval (rather than the NZCA). Like existing NPMPs, the management plan for Te Urewera must identify values at place and set objectives and policies for managing them.[61] An operational plan is also required.

These planning documents identify the criteria for decision-making in relation to concessions.[62] The Board (rather than the Minister) is responsible for authorising activity permits and concessions under the Conservation Act. The Board and Director-General jointly set the process for wildlife authorisations under the Wildlife Act, with the Board having authority to permit possession "for cultural purposes" any "dead protected wildlife" found and lawfully taken in Te Urewera.[63]

While freedom of public entry and access remains a stipulation, the Board may make bylaws to exclude the public from specific areas, prescribe conditions of access[64] and institute rāhui.[65] Enabling iwi to shape priorities and the management approach has shifted the lens applied to conservation management. Provision for recreational use and tourism is now less prominent, with greater emphasis placed on ensuring tangata whenua are upskilled and that capacity and leadership skills are grown.[66]

The model has had its challenges. Comments in the media highlight the differing ideologies and cultures of DOC and Tūhoe which have resulted in 'collision points' in the relationship.[67] There is ongoing tension in reconciling co-governance with Tūhoe's mana motuhake (self-determination) goals.[68] The new model's success will depend, not only on greater understanding and trust being built up between the parties, but also on adequate resources being provided. To date, the shift to greater management by iwi has been accompanied by greatly reduced Crown funding to support protection, a matter that has been highly contentious.[69]

While such arrangements currently apply to specific places or features there are opportunities to provide for similar but broader recognition at the national level. This has been achieved, for example, in the requirement for freshwater nationwide to be managed "in a way that gives effect to Te Mana o te Wai".[70] This provides explicit recognition of the moral standing of natural features (in this case freshwater), but without a bespoke arrangement to give voice to it that is typical of legal personality arrangements.

*Aoraki Mount Cook National Park is part of the conservation estate where surviving taonga places for iwi and hapū can be found*

### *4.3.3 Environmental justice*

Environmental justice is a further important conceptual frame that has emerged in the United States, during the 1980s, in response to the disproportionate environmental burdens facing marginalised communities.[71] Through its deployment in environmental movements around the world, the concept is evolving, often in response to the specific environmental concerns and efforts of indigenous peoples still recovering from colonialism.[72]

This is particularly relevant in Aotearoa New Zealand, where the lack of provision for tangata whenua within the conservation system, has had an ongoing and significant impact. As emphasised by the Waitangi Tribunal, the conservation estate is where most of the surviving taonga places can be found:

> Unlike the rest of New Zealand, which has been so heavily modified by farming, urbanisation, and other land use changes, many parts of the DOC estate remain similar, at least, to that in which te ao Māori was created. And although it is owned by the Treaty partner, every inch of it is tribal territory. Landscapes and landforms evoke the old stories, and they in turn evoke whakapapa. For this reason, individual iwi and hapū relationships with conservation land remain tangible in ways not usually possible in more modified environments.[73]

This highlights the need for a reformed conservation management system to recognise and address such past injustices which have seen iwi, hapū and whānau excluded from the economic and cultural potential of conservation lands.

Ecosystem based management has synergies with the holistic approach practiced by iwi, hapū and whānau. The 'rights for nature' discourse similarly embeds a strong relational ethic that recognises the legal and moral standing of natural entities.

Environmental justice seeks to address the disproportionate environmental burdens suffered by marginalised communities and indicates a need, in Aotearoa New Zealand, to prioritise restoration of mana whenua cultural practices and rangatiratanga along with restoration of te Taiao.

## 4.4 Recommendations for reform

**Recommendations on providing for Māori in the conservation system**

1. *Increase Treaty compliance:* The conservation system needs to provide Māori with greater control, partnership and influence over their taonga, while balancing other legitimate interests.
2. *Enhance iwi management plans:* Iwi could develop conservation-specific management plans which inform conservation management planning.
3. *Provide for power sharing:* There is a need to review existing Treaty settlement agreements, to identify the most commonly brokered governance arrangements, and provide for them as of right within the conservation system. This would also enhance equity between iwi.
4. *Update General Policies:* The General Policies need to be updated as a priority so they comply with section 4 of the Conservation Act and mandate partnership rather than merely encouraging it.
5. *Establish Kura Taiao Council and Boards:* Consideration should be given to establishing a national Kura Taiao Council and conservancy-based Kura Taiao Boards to formalise partnerships.
6. *Facilitate customary use:* General Policies should be reviewed to better facilitate customary use within carefully prescribed parameters.
7. *Recognise Māori ownership:* Lawful ownership by tangata whenua of taonga works derived from protected wildlife should be recognised.
8. *Provide preference for tangata whenua:* There is a strong argument that a reasonable degree of preference should be provided to tangata whenua in conservation decision-making.
9. *Align with the resource management system:* Ensure alignment between reforms in the resource management and conservation systems to help ensure efficiency and reduce duplication of effort for hapū and iwi.
10. *Incorporate te ao Māori concepts:* Te ao Māori concepts such as kaitiakitanga (guardianship), mauri (connectivity and balance), and mana (respect and authority) should be incorporated into the conservation system to better align with Māori values.
11. *Recognise Te Mana o te Taiao:* Te Mana o te Taiao could be explicitly recognised in the conservation system (either in statute or the General Policies) to acknowledge the authority of the natural world as the priority of the conservation system.
12. *Support self-determination*: Greater self-determination and decision-making authority for tangata whenua, and recognition of rangatiratanga (chieftainship), should be provided for within the conservation system.
13. *Apply kotahitanga*: The concept of kotahitanga (unity) could be implemented to balance local and place-based conservation initiatives with broader conservation needs.
14. *Apply ecosystem-based management:* Ecosystem-based management can help craft a holistic, integrated approach with synergies across te ao Māori and te ao Pākēhā, and mātauranga and science.
15. *Explore rights for nature*: The rights for nature discourse could provide a third path by recognizing the legal and moral standing of natural entities.
16. *Seek equity and environmental justice:* Prioritise the restoration of mana whenua cultural practices and rangatiratanga, alongside the restoration of the environment, especially in consenting and allocation decision-making.

**Endnotes**

1 Wai 262 Kia Whakapūmau, 2023, at https://www.wai262.nz

2 Waitangi Tribunal, 1991, Claim WAI262, at https://irp.cdn-website.com/855a29e4/files/uploaded/26102021094502.pdf

3 Wai 262 Kia Whakapūmau, 2023, at https://www.wai262.nz

4 Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity*, Waitangi Tribunal, Wellington

5 This matter is traversed in Volume 1 of the Waitangi Tribunal's report, Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity*, Waitangi Tribunal, Wellington, 203

6 Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity*, Waitangi Tribunal, Wellington

7 Ibid at 118-119

8 Ibid at 118

9 Ibid at 146

10 Ibid at 147

11 Ibid

12 For brief engagement with discourse on operationalising mātauranga Māori, see Ataria J, M Mark-Shadbolt, A Mead, K Prime, J Doherty, J Waiwai, T Ashby, S Lambert and G Garner, 2012, 'Whakamanahia te mātauranga o te Māori: Empowering Māori knowledge to support Aotearoa's aquatic biological heritage', *New Zealand Journal of Marine and Freshwater Research,* 52(4)**,** 467-486; Maxwell K, K Ratana, K Davies, C Taiapa and S Awatere, 'Navigating towards marine co-management with Indigenous communities', *Marine Policy,* 111**,** 103722

13 Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity*, Waitangi Tribunal, Wellington, 373

14 Cabinet Māori Crown Relations – Te Arawhiti Committee, 2019, *Developing a whole-of-government strategy for WAI 262*, CAB-19MIN-0138.01

15 Ibid

16 Cabinet Business Committee, 2022, *Te Tumu mō te Pae Tawhiti*, CBC-22-MIN-0004, 2

17 Ibid

18 Cabinet Committee, 2021, *Te Tumu mō te Pae Tawhiti* (proposal from Office of the Associate Minister for Māori Development, Nanaia Mahuta). A copy of the cabinet paper is available at https://www.tpk.govt.nz/en/mo-te-puni-kokiri/corporate-documents/cabinet-papers/all-cabinet-papers/te-tumu-mo-te-pae-tawhiti2

19 New Zealand's Biological Heritage, Ngā Koiora Tuku Iho, https://bioheritage.nz/wp-content/uploads/2019/04/Copy-of-Wai-262-Briefing-on-natural-resource-governance-and-policy-recommendations-1.pdf

20 https://bioheritage.nz/wp-content/uploads/2019/04/Copy-of-Wai-262-Briefing-on-natural-resource-governance-and-policy-recommendations-1.pdf

21 Options Development Group, 2022, *Partial reviews of the Conservation General Policy and the General Policy for National Parks regarding Te Tiriti o Waitangi / the Treaty of Waitangi,* Department of Conservation, Wellington

22 Ibid at 103

23 Ibid

24 Ibid

25 See, for example, sections 281 to 286 of the Ngāi Tahu Claims Settlement Act 1998 (for protocols generally)

26 See, for example, section 273 of the Ngāi Tahu Claims Settlement Act 1998 (amending s 6P (Membership of Conservation Boards) of the Conservation Act 1987)

27 See, for example, section 232 of the Ngāi Tahu Claims Settlement Act 1998

28 See, for example, section 241 of the Ngāi Tahu Claims Settlement Act 1998

29 See sections 66(2A)(a) and 74(2A), Resource Management Act 1991

30 Options Development Group, 2022, *Partial reviews of the Conservation General Policy and the General Policy for National Parks regarding Te Tiriti o Waitangi /the Treaty of Waitangi,* Department of Conservation, Wellington, 103

31 Antarctica New Zealand, 2022, *Statement of intent 2022 - 2026*, Antarctica New Zealand, Christchurch

32 For an introduction to this discourse, see Kawharu M, 2000, 'Kaitiakitanga: A Māori anthropological perspective of the Māori socio-environmental ethic of resource management', *The Journal of the Polynesian Society,* 109(4), 349-370; and also Roberts M, W Norman, N Minhinnick, D Wihongi and C Kirkwood, 1995, 'Kaitiakitanga: Māori perspectives on conservation', *Pacific Conservation Biology,* 2(1), 7-10

33 For example, see how urban Māori are reclaiming the word and concept, in Walker E, 2016, *Reclaiming kaitiakitanga: An intergenerational perspective of kaitiakitanga within Te Parawhau* (A thesis submitted to University of Waikato in fulfilment of the requirements for the degree of Master of Māori and Pacific Development)

34 Roberts M, W Norman, N Minhinnick, D Wihongi and C Kirkwood, 1995, 'Kaitiakitanga: Māori perspectives on conservation', *Pacific Conservation Biology,* 2(1), 7-10

35 Resource Management Review Panel, 2020, *New directions for resource management in New Zealand,* Ministry for the Environment, Wellington, 15

36 For examples, see Walker E, P Wehi, N Nelson, J Beggs and H Whaanga, 2019, 'Kaitiakitanga, place and the urban restoration agenda', *New Zealand Journal of Ecology,* 43, 1–8

37 Roberts M, W Norman, N Minhinnick, D Wihongi and C Kirkwood, 1995, 'Kaitiakitanga: Māori perspectives on conservation', *Pacific Conservation Biology,* 2(1), 7-10

38 Kawharu M, 2000, 'Kaitiakitanga: A Maori anthropological perspective of the Māori socio-environmental ethic of resource management', *Journal of the Polynesian Society*, 109(4), 349

39 For a comprehensive engagement with the concept, see Marsden M and T Royal (eds), 2003, *The woven universe: Selected Writings of Rev. Māori Marsden*, Estate of Rev. Māori Marsden, Otaki and Mead S, 2003, *Tikanga Māori: Living by Māori values,* Huia Publishers, Wellington

40 Mead S, 2003, *Tikanga Māori: Living by Māori values,* Hui Publishers, Wellington

41 Ibid

42 Examples include the Māori Compass Dashboard (Mauri Compass <www.mauricompass.com>), Kepa Morgan's Mauri Model (and the mauri meter and mauriOdometer see Morgan T, 2011, 'Waiora and cultural identity: Water quality assessment using the Mauri Model', *AlterNative: An International Journal of Indigenous Peoples*, 3(1), 42-67 and Cultural Health Index (see Tipa G and L Teirney, 2006, *A cultural health index for streams and waterways: A tool for nationwide use,* Ministry for the Environment, Wellington)

43 Kāhui Wai Māori, 2019, *Te mana o te wai: The health of our wai, the health of our nation,* Te Kāhui Wai Māori report to Hon Minister David Parker

44 Mead S, 2003, *Tikanga Māori: Living by Māori values,* Huia Publishers, Wellington

45 For a detailed discussion of how the concept of mana may be effectively brought into Aotearoa New Zealand's legislative framework, and an example of the type of research required to effectively bring Māori concepts into a reformed conservation agenda, see Pirini A and A High, 2022, 'Dignity and mana in Aotearoa New Zealand legislation', *Policy Quarterly,* 18(1), 52-58

46 See Options Development Group, 2022, *Partial reviews of the Conservation General Policy and the General Policy for National Parks regarding Te Tiriti o Waitangi /the Treaty of Waitangi,* Department of Conservation, Wellington and the Natural and Built Environment Act 2023 (now repealed)

47 For discussion see Kāhui Wai Māori, 2019, *Te mana o te wai: The health of our wai, the health of our nation*, Kahui Wai Māori Report to Hon Minister David Parker

48 See for example Federated Farmers, 2019, *Submission on Action for Healthy Waterways documents: Discussion document, draft NPS, proposed NES and draft stock exclusion regulation*, (31 October 2019), 28-29. This matter is also discussed in previous EDS reports, see Koolen-Bourke D and R Peart, 2022, *Science for policy: The role of science in the National Policy Statement for Freshwater Management,* Environmental Defence Society, Auckland, 147-149

49 The purposes provision of the Natural and Built Environment Bill initially referred to 'Te Mana o Te Taiao', a phrase recommended by the Resource Management Review Panel (see Resource Management Review Panel, 2020, *New directions for resource management in New Zealand: Summary and key recommendations*, Ministry for the Environment, Wellington, 7). However, that phrase was removed in favour of 'te oranga o te taiao' (see s 3(1), Natural and Built Environment Act 2023 (now repealed))

50 For a brief introduction to discourse on the concept of whakapapa, see Te Rito J, 2007, 'Whakapapa: A framework for understanding identity', *MAI Review*, 2, Article 2; and Ngata A and W Ngata, 2019, 'The terminology of whakapapa', *Journal of the Polynesian Society*, 128(1), 19–41

51 But see discussion of Mutu M, 2021, 'Maori concepts and practices of sovereignty', in Hokowhitu B, A Moreton-Robinson, L Tuhiwai-Smith, C Andersen and S Larkin (eds), *Routledge Handbook of Critical Indigenous Studies*, Taylor & Francis Group

52 For example see Williams T, 2010, *Te mana motuhake o Tūhoe* (A thesis submitted to Victoria University in fulfilment of the requirements for the degree of Master of Laws)

53 See definition of 'kotahitanga' in Bateman, 2005, *Bateman New Zealand encyclopaedia*, (6th ed), David Bateman, Auckland, 365

54 The history is traversed in the commentary on "Kotahitanga" in Lenihan R, 2016, *Oxford Dictionary Plus History*, Oxford University Press, Oxford

55 For a high level introduction to the concept and its application see O'Higgins T, L Manuel and T DeWitt, 2020, *Ecosystem-based management, ecosystem services and aquatic biodiversity: Theory, tools and applications*, SpringerOpen, London

56 For a recent and high level introduction to the discourse see Winter C, 2021, 'A seat at the table: Te Awa Tupua, Te Urewera, Taranaki Maunga and political representation', *Borderlands,* 20(1), 116-139

57 Ruru J, 2021, 'Seeing indigenous humanness', *Human Rights Defender,* 30(1), 43

58 Section 4, Te Urewera Act 2014

59 Section 17, Te Urewera Act 2014

60 Section 5, National Parks Act 1980

61 See sections 44 and 46, Te Urewera Act 2014

62 Section 46(1)(h), Te Urewera Act 2014

63 Section 60, Te Urewera Act 2014

64 Section 70, Te Urewera Act 2014

65 Section 18(2)(b), Te Urewera Act 2014

66 https://www.stuff.co.nz/national/300456239/lake-waikaremoana-and-its-great-walk-have-been-closed-for-months-as-thoe-say-the-relationship-with-the-crown-has-failed?rm=a

67 'Co-governance: Tūhoe on what is and isn't working in Te Urewera', *1News*, (10 April 2022), https://www.1news.co.nz/2022/04/09/co-governance-tuhoe-on-what-is-and-isnt-working-in-te-urewera/

68 Ibid

69 https://www.rnz.co.nz/national/programmes/checkpoint/audio/2018829060/doc-looking-at-need-for-more-te-urewera-funding

70 Policy 1, National Policy Statement for Freshwater Management 2020

71 For insight into how the environmental justice framing has developed and evolved over the last twenty years see Kuehn R, 2000, 'A taxonomy of environmental justice', *Environmental Law Reporter,* 30**,** 10681-10703 and Grear A, 2020, *Environmental justice,* Edward Elgar Publishing, Cheltenham

72 For an introduction to how environmental justice framing is developing in discourse around Māori freshwater management see Parsons M, K Fisher and R Crease, 2021, *Blue spaces in the Anthropocene: Freshwater management in Aotearoa New Zealand*, Palgrave, London

73 Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity*, Waitangi Tribunal, Wellington, 127

# PART 3
## Some key challenges

In this Part of the report we explore three key challenges that conservation law reform will need to tackle; climate change, introduced species management and tourism. These comprise only a small subset of the multitude of issues that conservation reform will need to address, but many of these have already been traversed in the more detailed work EDS has undertaken as part of a review of the Wildlife Act and conservation management planning system. The core findings of that work are summarised separately in Part Four.

*Tongariro Crossing where DOC has experienced challenges in managing visitor numbers*

*Electric fish monitoring undertaken by Otago Fish and Game staff* (Fish and Game)

# 5 Climate change and conservation

*Eroded dunes at Tāhunanui Beach, Nelson. Coastal dunelands are one of the most heavily modified ecosystems in the country and will be seriously impacted by climate change*

"The effects of Cyclone Gabrielle have been devastating … eels were found in ditches hundreds of metres from any river, godwits were interrupted during their most crucial feeding time, and penguins are still swimming in circles through murky estuaries. … We had whio turn up in urban Hastings, and they would have been struggling finding places they could feed or that they could shelter … The silt, which had been washed down from the hills in huge quantities, was still lingering, making it hard for animals and fish to see food."

"Cyclone Gabriellle hit at one of the worst times. It was the moulting period for little blue penguins, who had little protection without their usual waterproof feathers. It was also the time when migratory wading birds, like godwits which travel vast distances to and from their Arctic breeding grounds, needed to be feeding to increase their body weight to survive the long journey back north."

"There was no food anywhere … one of the impacts of that is just going to be a few more of those waders that didn't make it back. Some of them would have tried and not made it, but there will be a lot that probably didn't even get to a weight where they could try."[1]
*Denise Fastier, DOC Senior Ranger*

This chapter delves into the multifaceted challenge that climate change creates for conservation efforts. It explores how our nation's international commitments, such as the United Nations Framework Convention on Climate Change (UNFCCC), the Kyoto Protocol, the Paris Agreement, and the Convention on Biological Diversity, intersect with our domestic conservation agenda. It reflects on current responses, including DOC's Adaptation Action Plan and climate goals set under Te Mana o Te Taiao. Drawing these threads together, the chapter identifies key elements necessary for a climate responsive conservation system and sets out some preliminary recommendations for reform.

## 5.1 The climate challenge

The latest report of the Intergovernmental Panel on Climate Change (IPCC) highlights that climate change has already caused substantial damage and increasing, irreversible biodiversity losses. The report documents that half the species assessed globally have already shifted their range, either poleward or to higher elevations, and hundreds of local losses have been driven by heat extremes and mass mortality events.[2] The IPCC also found that, in many cases, biological responses are simply "not sufficient to cope with recent climate change (very high confidence)".[3] The Panel's prediction is that the long-term impacts of climate change will be "multiple times higher than currently observed".[4]

Even if climate change can be limited to 1.5°C, which looks increasingly unlikely, a further 70-90 percent decline in coral reefs is projected, and up to 14 percent of terrestrial species will face a "very high risk of extinction".[5]

With warming between 1.5-2°C, the number of endemic marine species facing a very high risk of extinction doubles.[6] Aotearoa New Zealand's seas are expected to warm by 2.5°C by 2100.[7] If warming gets to 3°C, the extinction risk to endemic species in biodiversity hotspots is projected to increase at least tenfold, while at 4°C there will be biome shifts across more than a third of the world's land area: placing huge strains on biological processes and systems.[8]

**Spotlight on climate change impacts on indigenous species**

Climate change impacts are already making their presence felt across the country in a myriad of ways:

- Warm winter weather is contributing to declines in long-tail bat populations[9]
- Changes in ocean productivity and rising ocean temperatures are causing decline in a range of seabird species including albatrosses, penguins and red-billed gulls[10]
- There have been changes in tuatara sex ratios, with higher temperatures causing more males to be born[11]
- The timing of egg laying is changing for some bird species[12]
- There is increased spread of invasive plant species[13] including weeds like paspalum[14]
- Warmer weather is increasing the frequency of mast seed events throwing beech forests out of synch and fueling spikes in rat populations[15]
- Reduced snow cover means that invasive mammals are starting to move and establish above the tree line, for example, rabbits on Mount Ruapehu[16]
- Invasive species have expanded following storm and flooding events[17]
- Increases in ocean acidity (7.1 percent between 2008 and 2017) mean many marine species are experiencing lower growth and survival rates, and impacts on shell growth and strength[18]
- An assessment of 10 freshwater taonga species found 9 out of 10 are vulnerable to changing temperature, including whitebait (inanga), shortfin eel (tuna), freshwater mussels and freshwater crayfish (koura).[19]

A recent study showed that conditions that led to the tragic 'Black Summer' fires in Australia in 2019-2020, are already periodically occurring in parts of central Otago, and are likely to become much more frequent.[20] This increases the risk of fires such as those evidenced on conservation land in recent years, including the 1,900 hectares of conservation land at Lake Ōhau in October 2020, 1,100 hectares of conservation park at Dunedin's Deep Stream in November 2019, and 3,100 hectares at Pukaki Downs, Twizel in August 2020 which saw loss of 80 percent of a scientific reserve and part of a wetland conservation area impacted.[21]

The pace of climate change is such that many of Aotearoa New Zealand's indigenous species will struggle to adapt. Adaptation on the scale and at the rate required would be difficult even in the best of times: yet many species are already on the brink of extinction with only small remnant populations remaining. Native landscapes are patchy and disconnected and there are significant, often physical, barriers that constrain ease of movement.[22] In some cases, there may simply be no place for a population to naturally move to, meaning that human intervention will be required to help it relocate and survive. Aotearoa New Zealand's indigenous species are at especially heightened risk, since in an island environment movement and adaptation is already highly constrained, and the many invasive alien species that are present will also be on the move.

Increased climate change impacts coming down the pipeline will not only impact indigenous biodiversity, but also tourism and recreation infrastructure, and historic and cultural heritage sites. In 2019, a national risk assessment report prepared for DOC[23] identified 331 DOC assets and 420 archeological sites on public conservation land that are within a potential inundation zone. A further 119 "recreation functional locations" and 62 "destinations" contain at least one potentially vulnerable asset, and 260 ecosystem management units and 99 species management units are in the coastal inundation zone.[24] The report highlights that DOC's response to such matters requires a more integrated approach and significantly more resource and capacity.

DOC is the lead agency in Aotearoa New Zealand for managing the response to climate change impacts on biodiversity, as well as on historical and heritage sites. What all this means for conservation reform, is that it will be crucial to ensure that climate change considerations are kept front of mind, when reformulating conservation legislation, drafting new policy settings and redesigning the management planning system.

## 5.2 International commitments

It is not only in the national interest that the conservation system addresses these issues, it is also in our collective global interest. This is highlighted by the number of international conventions, agreements and protocols to which Aotearoa New Zealand is a signatory. They set goals and targets in relation to climate change and the country's policy and legislative settings will need to be configured to deliver on such commitments.

### *5.2.1 United Nations Framework Convention on Climate Change*

The UNFCCC came into force on 2 March 1994 and is designed to assist nations to collectively coordinate their response to climate change and its impacts. It sets out the broad consensus that human activities are causing global warming, and international concern about the adverse effects this will have on "natural ecosystems and humankind",[25] and "future generations".[26] It also acknowledges the key "role and importance, in terrestrial and marine ecosystems, of sinks and reservoirs of greenhouse gases".[27]

The core objective of the UNFCCC is to limit human induced climate change, with a goal that any changes "allow ecosystems to adapt naturally to climate change".[28] Article 4 commits all nations to "promote sustainable management, and promote and cooperate in the conservation and enhancement, as appropriate, of sinks and reservoirs of all greenhouse gases not controlled by the Montreal Protocol, including biomass, forests and oceans as well as other terrestrial, coastal and marine ecosystems."

The UNFCCC uses a standard of "best available scientific information and assessment".[29] It emphasises that lack of full scientific certainty should not be used as a reason for postponing action. Rather, a precautionary approach should be adopted that takes measures to "anticipate, prevent or minimise the causes of climate change and mitigate its adverse effects".[30] It also notes that, in addition to scientific and technical information, policies and measures need to consider relevant legal, socio-

*The Piha Stream was impacted by the Auckland Anniversary Weekend floods in 2023 which were exacerbated by climate change*

economic and other research, in order to understand the economic and social consequences of response strategies.[31] Article 4 commits Parties to adopting open data sharing and information exchange and cooperative scientific and technological exchange.[32]

**The Kyoto Protocol**

Designed to operationalise the UNFCCC, the Kyoto Protocol was adopted in December 1997, but only came into force in 2005. It commits industrialised countries to limit and reduce emissions to agreed individualised targets. Aotearoa New Zealand has ratified the Protocol. Under Article 2 each Party is required to implement policies and measures, including measures to protect and enhance "sinks and reservoirs of greenhouse gases" and the "promotion of sustainable forest management practices, afforestation and reforestation."[33]

**The Paris Agreement**

The object of the Paris Agreement is to keep global average temperatures below 2°C and to pursue efforts to limit the increase to 1.5°C. Aotearoa New Zealand ratified the Paris Agreement in 2016 and the country's national contribution sets a target of reducing greenhouse gas emissions to 30 percent below 2005 levels by 2030.[34]

The preamble of the Paris Agreement notes the "importance of ensuring the integrity of ecosystems, including oceans, and the protection of biodiversity," as well as "climate justice" in taking action to address climate change. The focus is on conserving and enhancing carbon sinks.[35] Under Article 4, Parties agree to undertake "rapid reductions" of emissions "in accordance with *best available science*".

Article 7 commits Parties to undertake climate "adaptation" to strengthen resilience and reduce vulnerability; to contribute to the global challenge to protect people, livelihoods and ecosystems; and to take "a country driven, gender-responsive, participatory and fully transparent approach, taking consideration of vulnerable groups, communities and ecosystems". This is also to be based on "best available science and, as appropriate, traditional knowledge, knowledge of indigenous peoples and local knowledge systems, with a view to integrating adaptation into relevant socioeconomic and environmental policies and actions, where appropriate".

Article 7.9 states that each Party shall engage in "adaptation planning processes and the implementation of actions". The Agreement also recognises the importance of sharing information, good practices, experiences and lessons learned including science, planning, policies and implementation work.[36]

**Spotlight on best available science and evidence informed decision-making**

In order to address climate change impacts, it will be important that the conservation system is strongly driven by, and responsive to, science and other knowledge inputs. The term 'evidence informed' means that decisions draw on a variety of forms of knowledge and information, including evidence from local knowledge and mātauranga Māori. However, such an approach needs to be robustly underpinned by the 'best available science'. Together these two concepts highlight the importance of drawing on a wide range of varied inputs while at the same time being clear about scientific bottom lines. The use of the term 'best available science' in conservation policy would reflect terminology in international conventions and the developing discourse and jurisprudence.

***Multiple lines of evidence***

One way to integrate multiple inputs is to adopt a 'multiple lines of evidence' approach which is especially important for biodiversity protection and management.[37] This is because data is frequently incomplete and multiple types and sources of information need to be synthesised to inform decision-making. Information can range from empirical data (quantitative assessments of species populations, monitoring data and public studies) to more experience-based information held by area managers, experts, and community and indigenous groups. Some repositories of information, such as databases, already comprise a synthesis of evidence from multiple sources. For these reasons, the Parliamentary Commissioner for the Environment recently recommended that resource management reform adopt a multiple lines of evidence or weight of evidence approach, rather than simply referring to 'best information'.[38]

***Weight of evidence approach***

Any framework needs to address the fact that not all knowledge and information inputs are the same. Differences will exist in accuracy, comprehensiveness and relevance. This can be addressed by applying a 'weight of evidence' approach. Weight of evidence assessments are widely utilised, with the USA Environmental Protection Agency employing them (since 1987) for health risk assessments and in ecological risk assessment frameworks.[39] The approach recognises that, while the preference is to have clear empirical evidence to base decisions on, data can often be lacking. This means there is a need to draw on other forms of evidence which can provide valuable information to significantly increase certainty. But the approach also recognises some inputs are more conclusive, or provide higher certainty, than others.

***Bridging entities***

In practice, decision-makers take a wide array of information into account, often in a relatively unclear and untransparent manner. In the health sector (where an evidence based approach is vitally important), there are typically well established intermediaries: institutions or arrangements that integrate and prepare evidence for decision-makers and make it more accessible.[40] In the environmental management space, a range of studies have highlighted the need to develop more effective intermediaries to assist with knowledge translation and bridging the gap between scientists and decision-makers.[41] A reformed conservation system is likely to require bridging entities, not only in relation to synthesising and reviewing evidence and translating science, but also for mātauranga Māori inputs.

The purpose of these expert advisory entities is not simply synthesising and summarising information, but also engaging with officials to set research priorities and deliver the evidence base needed to support policy, planning and management needs.[42] Such entities may also be configured to support joint iterative knowledge production processes, working alongside and supporting the work of mixed member entities similar to Conservation Boards.[43] A further benefit is that they operate as 'boundary' organisations making visible the scientific and evidentiary basis underpinning responses, and so any values-based policy trade-offs, thereby improving system transparency and accountability.[44]

Institutional innovation is discussed further in Chapter 8. However, for our purposes here, it is important to emphasise that a robust, evidenced based approach will be needed to ensure that the conservation system is able to respond to climate change.

***Kea at Arthurs Pass*** (Neil Silverwood)

Any climate change response by the conservation system needs to:

- Adopt a science-driven approach
- Utilise diverse sources of information, including empirical data and indigenous knowledge, adopting a multiple lines of evidence approach
- Apply a weight of evidence approach recognising that information is not equally reliable or important
- Establish bridging entities to support the translation and integration of evidence for policy-makers and planners
- Ensure decision-making is transparent so there is clarity around the scientific basis for decisions and the basis of any policy trade-offs made due to political or value-based concerns

### *5.2.2 Convention on Biological Diversity*

Aotearoa New Zealand's international climate change commitments are interwoven with a number of other regimes including the Convention on Biological Diversity. A number of protocols have been set under the Convention[45] as well more specific targets. The Aichi biodiversity targets provided a strategic plan for nations to meet between 2011 and 2020. They included:

> *Target 10:* by 2015 the multiple anthropogenic pressures on coral reefs and other vulnerable ecosystems impacted by climate change or ocean acidification are minimised, so as to maintain their integrity and functioning.
>
> *Target 15*: by 2020 ecosystem resilience and the contribution of biodiversity to carbon stocks has been enhanced, through conservation and restoration, including restoration of at least 15 percent of degraded ecosystems, thereby contributing to climate change mitigation and adaptation and combating desertification.

Once the Aichi timeline ran its course, nations reconvened. Subsequent negotiations (to which Aotearoa New Zealand was a party) culminated, in December 2022, in the adoption of a new set of targets for 2030 and 2050 at the fifteenth Conference of the Parties. The updated targets are set out in the Kunming-Montreal Global Biodiversity Framework which reflects

the interconnection between climate change and biodiversity loss. Global targets set for 2030 include:

> *Target 8:* is for nations to minimise the impact of climate change and ocean acidification on biodiversity and increase resilience through mitigation, adaptation and disaster risk reduction actions, while minimising negative and fostering positive impacts of climate action on biodiversity.
>
> *Target 11:* is focused on ecosystem functions and services, and the restoration, maintenance and enhancement of "nature's contributions" including to a stable climate and protection from natural hazards.

Both these targets also reference the importance of using "nature-based solutions" and "ecosystem-based approaches" when meeting the objectives. This new set of targets is articulated in very broad terms, in contrast to the previous Aichi Targets, and are still very much a work in progress.

International commitments help identify core climate change related considerations that need to be incorporated into any modernised conservation system. These include:

- Adopting policies and measures to reduce greenhouse gas emissions
- Protecting and enhancing sinks and reservoirs of greenhouse gases, including supporting afforestation and reforestation
- Adopting climate adaptation measures based on best available science and traditional knowledge
- Enhancing resilience through mitigation, adaptation and disaster risk reduction actions
- Promoting climate action that minimises negative impacts on biodiversity
- Restoring and maintaining ecosystem functions and services, including those contributing to a stable climate and protection from natural hazards
- Adopting nature-based solutions and ecosystem-based approaches

Aotearoa New Zealand's *Sixth National Report on the Convention on Biological Diversity*, which covered the period between 2014 and 2018, reported on the nation's delivery of the Aichi biodiversity targets. It noted that, in relation to ecosystems vulnerable to climate change, "much more research is required" to understand the pressures. It also noted that although land-use decisions (like authorising plantation forestry) increase stresses, and pest and weed control is known to decrease stress, "little has been done to directly minimise climate change-related impacts".[46] The report highlighted that, although DOC is engaged with a range of specific projects,[47] *integrating* climate change considerations into conservation management practices and planning systems has lagged.

In relation to Target 15, a number of forest restoration schemes have been implemented, including the One Billion Trees Programme and the Afforestation Grant Scheme. The emissions trading scheme (ETS), which puts a price on emissions and encourages forest planting to earn 'emission units', was also reported as a measure contributing to Target 15.[48] However, all these programmes apply to both exotic and indigenous forests, and the country report did not provide detail on the extent to which they had contributed to *native* afforestation and restoration. This highlights that restoration work is not well documented and reported on at present, partly because much of this work is project specific and ad hoc. Restoration work undertaken by conservation groups and private landowners, and its contribution to biodiversity outcomes, remains largely unknown.

Knowledge about climate change and its impacts on conservation is lacking and more research is required to inform decision-making. Climate change targets for improving carbon sinks are not sufficiently connected to the conservation system, and to native forests and ecosystems, in order to drive (and fund) restoration work. In addition, climate change targets are not yet properly integrated into the conservation management planning system and decision-making frameworks, in order to drive system responses (such as weed and pest control) or direct concessions decisions.

## 5.3 Conservation system responses to climate change

We now turn to a closer consideration of the climate change related provisions and goals set within the conservation system. Starting with the statutory framework, it is important to note that core conservation legislation, such as the Conservation Act, National Parks Act, Wildlife Act, Reserves Act, Marine Reserves Act and Marine Mammals Protection Act,

all predate any domestic response to the climate change crisis. They also predate the UNFCCC (and its associated protocols) and the Aichi Targets under the Convention on Biological Diversity.

Conservation statutes do not reference either climate change or biodiversity. Neither do they deal with issues such as natural hazards, connectivity, resilience or adaptation. This means that any goals set in these areas need to be pursued in the context of a regulatory vacuum.

### *5.3.1 Policies and plans*

The General Policies make no mention of climate change, largely due to the age of these documents, which date to 2005. Although they were updated in 2007 and again in 2019, the updates were very narrowly confined to customary harvest and Treaty compliance matters.[49] What the lack of direct reference to climate change means in practice, is that the General Policies provide no direction for decision-makers or Conservation Boards on how to incorporate (or even whether they should incorporate) climate change considerations into their work.

An examination of conservation management planning documents also revealed that most CMSs, including those for Auckland, Waikato and Northland (all developed in 2014), Canterbury and Otago (which date to 2016), and the West Coast (2010) set no policies or objectives in relation to climate change. This is despite the documents discussing its increasing importance and expected impacts at length within their commentaries.

The Otago CMS (2016) discusses the threat climate change poses to the region (to pest and fire management and coastal sites in particular) and the need to improve resilience, but sets only one policy in this area. That is Policy 3.25.2 which requires a precautionary approach to be adopted when approving new ski fields, including considering the likely longevity of the field in the face of climate change.[50] This is an area where the rationale for incorporating assessment of climate change is clear.

The most recent CMS is the one for Wellington which dates to 2019. This document does set a policy direction in relation to climate change. Policy 4.1.7 seeks to:

> Improve resilience of public conservation lands and waters to climate-change related impacts through adaptive planning and actions based on best scientific information.[51]

This is a valiant attempt to set out some core concepts underpinning a climate change response. It represents the most progressive climate change provision in a conservation management planning document at present. Indeed, it is the kind of high level policy direction that might be more expected within a legislative purposes provision or the General Policies themselves. But when you venture further into the CMS, it becomes clear that this innovative policy has not been widely operationalised throughout the rest of the document. It factors climate change into 'softer' decisions, such as those on education and the provision of recreational opportunities, but not into the 'harder' decisions such as the grant of concessions (eg for aircraft landings, grazing, mining and vehicles) and wild animal control.

Turning to NPMPs, most are now more than a decade old and simply do not reference climate change at all. The most recent plan, for Paparoa, dates to 2017 and while it acknowledges climate change impacts, it also fails to set any tangible direction despite including a raft of very specific policies and objectives across other areas.

- The absence of climate change direction in the General Policies creates uncertainty as to how climate change impacts and greenhouse gas emissions targets should inform conservation management planning decisions, the approval of concessions, the pest management system or the general work of DOC.
- DOC and Conservation Boards are struggling to understand how and when climate change considerations should be incorporated into planning documents, including directions in relation to activities and concessions on conservation land.
- In order to inform broader conservation law reform, it would be useful to assess how effective the climate change provisions in the Wellington CMS have been, how easy they have been to interpret and implement, what (if any) barriers there are to implementation and any additional system supports that might be needed.
- Conservation management strategies and plans (including the Wellington CMS) fail to operationalise climate change considerations and incorporate them into more detailed provisions.

### *5.3.2 Concessions*

The concessions system is where the 'rubber hits the road', where decisions are made on undertaking commercial activities within public conservation areas. The current concessions regime is focused broadly on "having regard" to the "effects" of activities and the need to "avoid, remedy or mitigate any adverse effects".[52] Concession application forms further specify what effects are to be considered. For example, in relation to grazing (which is currently authorised by 490 concessions),[53] the assessment focuses on potential effects on "special features or values".[54] For long term aircraft operations (177 current concessions), the assessment focuses on potential effects on flora and fauna, biosecurity, other users (eg noise), cultural and historic values, rubbish and waste, and fires.[55] There is no mention of climate change mitigation or adaptation, and in particular the emission of greenhouse gases.

This omission is not surprising as concession decisions are currently made in the absence of any statutory or policy direction on climate change. The DOC permissions advisors we spoke to indicated this creates difficulties when making challenging decisions, and it also leaves unclear whether climate change considerations can be taken into account at all. There is also the issue of availability of data and information to inform such determinations, particularly when applicants are not being asked to provide relevant information on their climate change impacts.

There are notably stronger climate change provisions within the resource management system. Under the RMA, "the management of significant risks from natural hazards" is a matter of national importance which must be provided for by councils and "the effects of climate change" is something councils must pay particular regard to.[56] Although the Natural and Built Environment Act 2023 is now repealed, its consideration and treatment of climate change considerations highlight some of the ways that climate change provisions within the conservation system might be strengthened further (see spotlight).

*The Whakapapa skifield operates under a concession from DOC with snow levels having been impacted by climate change. The future of the skifield is uncertain*

**Spotlight on climate change under the former Natural and Built Environment Act**

The Natural and Built Environment Act made stronger provision for climate change considerations to be factored into consenting decisions. Principal amongst the changes from the RMA was that the National Planning Framework (similar to the General Policies in the conservation system) "must" provide for specific "system outcomes" including reduction of greenhouse gas emissions, removal of greenhouse gases from the atmosphere, reduction of risks arising from natural hazards and the effects of climate change, and other measures to achieve an environment that is more resilient to those risks.[57]

Although the Act allowed existing uses of land to continue where they predated a new plan rule – decision-makers were permitted to craft an exception to that rule (within plans) for matters that related to the natural environment, contaminated land, natural hazards *or climate change*.[58] This approach provided a mechanism to ensure changes could be made more quickly in these areas than would otherwise be possible.

The regime also enabled existing consent conditions to be reviewed. For consents issued by regional authorities, conditions could be reviewed where it was considered "necessary to adapt to the effects of climate change or to reduce risks from natural hazards".[59] Conditions on consents issued by a territorial authority could also be reviewed, but there was a higher benchmark that required there be "exceptional circumstances" where:[60]

- It is necessary to adapt to the effects of climate change or reduce risks from natural hazards;
- It is necessary to ensure compliance with limits and achieve targets; or
- There is new information that identifies significant harm or damage to human health, property or the natural environment.

Crucially, the Act enabled consents to be cancelled following review if they could not comply with plan rules to reduce natural hazards, climate risk or adaptation to climate change, or with National Planning Framework rules that dealt with such matters.[61]

The Act also made a direct connection with national risk assessments and adaptation plans requiring the National Planning Framework to be not inconsistent with relevant provisions in them.[62] The Resource Management Amendment Act 2020 already requires regional councils to have regard to those documents when preparing or changing policy statements or plans, so these changes would have strengthened that requirement further.[63] Similar linkages could be considered for policy and planning documents in the conservation system.

It is important that greenhouse gas emissions, climate change resilience and risk reduction are high-level objectives within the conservation system. At present the system, including its concessions regime, does not explicitly consider climate change impacts at all. This is a significant gap undermining responsiveness in this critical area.

The former Natural and Built Environment Act provides useful indications of some mechanisms that could be employed to create a more integrated and responsive approach. These include requirements for plans to be consistent with risk assessments and DOC's Climate Change Adaptation Action Plan (Adaptation Plan) (see discussion below), and the ability to review, adjust or cancel permissions where necessary to enable climate change adaptation and hazard reduction, and ensure consistency with rules set within the planning framework.

### *5.3.3 Climate Change Adaptation Action Plan*

In June 2020, DOC produced its first Adaptation Plan, which was developed with the support of NIWA and a cross functional Technical Advisory Group.[64] The Plan has a 5 year time frame and sets out specific actions to help guide the Department's internal strategic planning and operations, including monitoring and research. The Adaptation Plan identifies 139 actions for implementation between 2020 and 2025.

Not surprisingly, the areas where progress has been easiest to achieve include technical or relatively non-controversial internal matters where DOC (including DOC science teams) can 'kick on with it' without stakeholder engagement. These include vulnerability assessments of specific sites or species and upgrades to the Department's electric vehicle fleet and internal emissions profile.[65] In addition, "climate impact" was added to the New Zealand Threat Classification System (NZTCS) in 2021[66] to indicate where a species is (or is predicted to be) adversely affected by long-term climate trends and/or extreme climate events.[67]

Progress on implementing other parts of the Adaptation Plan has been slower and more complex.

One of the action points is the development of a Climate Change Regulatory Strategy to identify where and how climate change should be acknowledged in the legislation, General Policies and statutory planning documents (an area where there is currently a large gap as noted above).[68] However, since 2021, reports by the NZCA[69] and DOC dropped all mention of the Strategy and it remains unclear where this work landed.

DOC appears to be struggling to operationalise climate change considerations, including mitigation and adaptation actions, into the conservation management planning and concessions system (see spotlight on emissions and aircraft concessions).

**Spotlight on emissions and aircraft concessions**

There have been increasing calls for greenhouse gas emissions and climate change to be considered in relation to aircraft overflights and landings in conservation areas. A particular point of contention has been landings on glaciers where there is a nexus of concerns around aircraft emissions, global warming and glacial retreat.[70]

When the draft Aoraki Mount Cook NPMP was put out for public consultation, in September 2018, it received significant criticism in this regard.[71] The draft plan explained that aircraft are expected to become the main mechanism for recreational access due to continuing glacial recession.[72] This commentary came alongside a more permissive regime for aircraft activity that would have allowed up to 200 flights per day.[73]

A large number of public submissions urged DOC to revise the settings and move towards encouraging 'low emission, low impact travel' in line with the country's emissions targets and climate change commitments. Somewhat oddly, provision for increased aircraft landings appeared to be primarily justified on the basis of climate change impacts on accessibility, without consideration of the increased greenhouse gas emissions that would be generated.[74]

A 2020 study of the implications of changing alpine environments on tourism, which used Aoraki Mount Cook as the case study, also noted the irony that "one of the key adaptive strategies to maintaining mountain access" in the context of "rapid glacial recession" has been "an increase in the use of aircraft".[75] The authors warned that much more careful management was required.

Conservation Boards have also attempted to raise climate change as a concern in relation to concessions for aircraft landings. In 2020, the West Coast Conservation Board opposed (although not unanimously) a concession for regular helicopter landings in a back country zone including at the Whataroa glacier site. The Board argued that the assessment of effects had been insufficient and it sought "consideration of emissions in any concession application involving aircraft and vehicles". This was on the basis that expansion of helicopter flights for high-end tourism "does not contribute to New Zealand's low emissions pathway to achieve the zero-carbon target. The inextricable relationship between climate change and biodiversity loss is well documented".[76]

Controversy over what degree of helicopter landings should be permitted under the West Coast CMS eventually led to a legal challenge in the High Court.[77] This was triggered when additional provision for helicopter landings was provided for under the Paparoa NPMP in contravention of the CMS (which is a higher order planning document). The judge found that the NPMP unlawfully derogated from the CMS and invalid parts of the Plan were struck out. Although climate change was a significant driver of the concern about increases in aircraft landings, it was not raised or discussed in the case. This was likely due to its absence in the General Policies or relevant conservation planning documents as described above.

The Otago Conservation Board has been advocating for DOC to nationally require concessionaries to measure and report carbon emissions and to update the General Policies and CMS to ensure that emissions are more effectively considered.[78] In May 2021, the Otago and Southland Conservation Boards jointly wrote to the NZCA proposing that "carbon reduction and climate change mitigation plans be introduced into both new and existing concession considerations." The NZCA subsequently advised the Minister and Director-General to ensure climate change considerations are incorporated into decision-making in this area "as soon as possible".[79] However, the concession application forms for aircraft still do not mention emissions or climate change considerations, reflecting that clear direction has yet to land in this area.

As climate impacts increase, indigenous ecosystems and species will come under increasing pressure, including from storm events, weather fluctuations and changes to introduced species ranges. The Adaptation Plan specifies a number of actions in relation to such threats, particularly those posed by invasive pests and weeds in a climate change context. They include identifying species, ecosystems and places most at risk from

climate change;[80] invasive animal pests which have potential to increase in distribution and abundance and supress indigenous species;[81] and how pest management tools and techniques could be improved.[82] The Adaptation Plan also refers to undertaking a gap analysis of monitoring programmes and research to confirm what areas need sustained long-term monitoring (including invasive pest monitoring).[83]

Collectively these actions highlight that a climate change lens increases the focus on threat assessment and risk management. Many sites, species and habitats will likely require increased monitoring, management and protection from threats and the conservation system will need to be more responsive to pressures. Pest management will also be of increasing importance because introduced species populations might change their range, their populations might increase and pressures might spike.

For this reason, the lack of focus on introduced browsers within the Adaptation Plan and other non-statutory documents is a somewhat surprising omission. A climate change focused lens has only been very weakly applied in this arena to date (see spotlight on Te Ara Ki Mua). This is despite studies showing that:

- Even "low densities of introduced herbivores may restrict ecosystem recovery", since most of our indigenous plant species have slow regrowth following browsing damage.[84]

- Kāmahi-podocarp forests are losing approximately 3.4 million tonnes of carbon dioxide annually,[85] with the most likely cause being introduced herbivores such as deer, goats, chamois and possums.[86] These forests have the most common forest associations in Aotearoa New Zealand, making up 10 percent of indigenous forest cover (c 800,000 ha).

The potential carbon sequestration gains that could be made with more sustained control of introduced herbivores could be significant. One recent study estimated carbon sequestration could increase by between 8.4 and 17.5 million tonnes per year, a figure that would not only reverse current losses, but offset 60 percent (or more) of emissions from road transport.[87]

However, quantifying the gains in this area remains complex, because the impacts of introduced browsers vary from species to species (making it difficult to determine the contribution of each species to the loss/potential gain), between forest types, according to how modified or degraded the habitat in question is, and depending on what other drivers of carbon loss are at play.[88] Estimates also vary between assessments that take a short, medium or long term timeframe. This means that an evidenced-based wild animal control framework will be important for maximising carbon sequestration gains in this area through enabling the priority areas and target species that deliver the most benefits to be identified.

**Spotlight on Te Ara Ki Mua**

Te Ara Ki Mua is the framework for adaptive management of "wild animals" which includes wild goats, deer, wild pigs, tahr and chamois. As a group these species constitute most of Aotearoa New Zealand's large introduced browsing species and the core game animal resource.

The purpose of Te Ara Ki Mua is framed in terms of "balancing the competing values" around these species. It acknowledges the importance of endemic biodiversity and ecosystem resilience to climate change impacts, while at the same time emphasising the need to protect and maintain wild animals as a recreational and economic hunting resource. It favours removal of introduced browsers only in "high priority biodiversity areas and threatened ecosystems".

Carbon emissions are not mentioned in the framework, nor the important role indigenous ecosystems play as carbon sinks, and the ecosystem services this provides. Noting these gaps, Forest and Bird has labelled the framework as "out of touch and inconsistent with wider government and community aims around climate change and biodiversity".[89]

Introduced species have been identified as one of the most significant threats to indigenous biodiversity[90] and the resilience of indigenous species and ecosystems to climate change impacts.[91] These risk profiles are only likely to increase in the future. Management of introduced species will need to be re-examined through a risk or threat assessment based lens to prevent it becoming a weak point in the conservation system's climate change and biodiversity protection response.

### *5.3.4 Conservation climate goals*

So what are the goals that have been set in relation to climate change? Although conservation legislation is silent on this matter, Te Mana o te Taiao sets out a number of goals of particular relevance to climate change. For a start, it identifies climate change as one of the core five pressures

on biodiversity and sets a broad outcome (Outcome 2) which requires that species populations "have increased resilience to future threats including climate change". Outcome 5 further recognises that prosperity is intrinsically linked with thriving biodiversity through its role in "mitigating climate change". One of the 2050 objectives set is that "biodiversity provides nature-based solutions to climate change and is resilient to its effects". Resilience to climate change impacts, and the need for mitigation and adaptation measures, are both recognised as key.

***The nationally vulnerable spotted shag is being impacted by climate change along with predation*** (Bernard Spragg)

**Spotlight on Te Mana o Te Taiao and time-bound climate goals**

Te Mana o Te Taiao sets a number time-bounded goals specifically in relation to climate change including:

- Legislation has been reviewed to ensure it is effective, comprehensive, recognises effects and ensures biodiversity protection including climate resilience (Goal 1.3 by 2025)
- Potential impacts from climate change have been integrated into ecosystem and species management plans and strategies and a research strategy to increase knowledge and understanding of climate change effects is in place (Goal 13.3.1 by 2025)
- Restoration of indigenous ecosystems is increasingly used to improve resilience to the effects of climate change including coastal protection and rising sea levels (Goal 13.2.2 by 2030)
- Risks to biodiversity from climate change, including cascading effects (eg increases in introduced species, water abstraction, fire risk and sedimentation) have been identified and assessed and indigenous ecosystems, habitats and species are being managed for resilience (Goal 13.3.2 by 2030)
- Restoration of indigenous ecosystems is mitigating climate change effects and natural hazards (Goal 13.2.3 by 2050)
- Adaptive management is addressing climate change impacts on biodiversity, including cascading effects, and is building resilience to future risks (Goal 13.3.3 by 2050)

Te Mana o te Taiao also provides an updated definition of "protection" which is:

> looking after biodiversity in the long term. This involves managing all threats to secure species from extinction and ensuring that their populations are buffered from the impacts of the loss of genetic diversity and longer-term environmental events such as climate change.[92]

What this all highlights is that a climate change response is at the core of the conservation system but legislative and statutory polices and plans largely fail to reflect this.

Conservation law reform should be centered around implementation of international and domestic climate change commitments and delivery of the vision set under Te Mana o te Taiao. This requires prioritisation of matters such as biodiversity and habitat protection, resilience, restoration, adaptation, mitigation, hazard and risk management, threat management and emissions reduction. These all need to be central within a reformed legislative framework.

## 5.4 A climate-responsive conservation system

The dual biodiversity and climate change crises highlight the need for much more responsive, agile and integrated systems to be in place. It is no longer feasible, for example, to consider issues in isolation. The control and management of browsing animals is not simply about protecting threatened habitats and native plants. It is also about carbon capture, the performance of carbon sinks, and reduction of fire, flood and erosion risks. The number of aircraft landings to be permitted, is not just about considering impacts of noise or increased visitor numbers, but also about recognising the connection between glacial retreat and emissions targets.

It is clear that conservation law reform needs to take a far more direct and proactive response to climate change. DOC needs to be more empowered to take a lead and stand its ground in the climate change space. As the steward and protector of the country's imperiled indigenous species and habitats, the conservation system needs to provide a robust shield and strengthened advocacy for indigenous biodiversity.

Climate change has a number of implications for conservation management. First, the number of species that are conservation dependent is likely to increase. This will require additional resourcing and capacity and greater support and involvement of iwi and community groups. Conservation will need to be more strongly prioritised than is presently the case.

Secondly, ecosystems that are already under high pressure due to land-use change and vegetation clearance, pollution, pests and browsers, and weed infestations are much less resilient to climate change. To withstand the challenges ahead, native ecosystems need to be healthier and more resilient, the load on them needs to be lifted. This will require more pest management and involvement of the hunting community, more weed control, tightening of restrictions on development, and more from concessionaries.

Thirdly, indigenous species will require more space and more options. They will need spaces to move into when an area or habitat is no longer viable or is impacted by climate change. This may be through storm and drought events, spikes in pest populations or shifting coastlines and temperature ranges. They will need more pathways and more escape routes. Patches of residual forest cover can be like islands for forest dwelling creatures. Some species (especially invertebrates) will need physical habitat connectivity to enable them to move to a different area if they need to.

A recent paper reviewing 473 studies identified five emerging principles for setting nature conservation goals in the context of a changing climate: optimization of ecosystem functions and processes; maintenance of evolutionary potential; minimisation of species loss; maintenance of evolutionary character of biota; and maintenance of wild, natural systems with minimal human intervention ('wildness').[93]

International literature on ecosystems and climate change consistently highlights the importance of managing at scale, focusing on habitat protection and ecosystem integrity, and managing for change rather than stability.[94] Adaptive management and more interventionist approaches will be necessary to achieve this.

The conservation system needs to more actively seek out opportunities to create connections and buffer zones, including through private land, requiring greater integration with the resource management system. When viewed through a future-focused climate change lens, much land currently considered to be of lower conservation value (either because it is in poor condition or in decline) may need to be reassessed for potential to help indigenous species in the future. Habitat protection will need to become an elevated priority.

Overall, biodiversity protection within a climate change context will require a paradigm shift. The focus will need to move from 'maintaining' or 'holding the line' towards enhancement and restoration. It will mean transitioning from a relatively permissive concessions regime towards one that focuses on enabling uses that bring net gains for conservation.

As many commentators have emphasised, "a paradigm shift enabling greater attention to climate-targeted approaches is likely to be needed as climate change accelerates."[95] However, there is also an important synergy in this area, since a systemic focus on increasing and restoring *ecosystem resilience* will help to address both climate change and biodiversity loss.[96]

## 5.5 Recommendations for reform

**Recommendations on addressing climate change within the conservation system**

1. *Focus on enhancement and restoration:* The goals of the conservation system need to shift from maintenance or 'holding the line', towards protection and enhancement of greenhouse gas sinks, afforestation and restoration of ecosystems, and prioritising indigenous biodiversity.
2. *Make minimisation of species loss a priority*: Indigenous biodiversity needs support to increase resilience to climate change pressures. This will require more active threatened species management, increased pest and weed control, tighter development restrictions, an expansion of habitat to enable species to adapt, and the creation of greater connectivity and buffer zones, including onto and across private land.
3. *Adopt a science-driven approach:* The conservation system will need to utilise diverse information sources (including empirical data and indigenous knowledge) and employ a multiple lines of evidence approach to empower decision-making in the context of uncertainty, based on best available information. Equity issues and the socio-cultural impacts of policies, plans and actions will need to be factored into decision-making.
4. *Reform legislation and policy*: Conservation laws need to be aligned with international and domestic climate change commitments and prioritise indigenous biodiversity and resilience. The conservation management planning system needs clear direction as to how a climate change response is to be operationalised.
5. *Strengthen climate adaptation planning:* DOC's Adaptation Plan should be made a formal part of the conservation management planning system, being explicitly linked to CMSs (or Regional Conservation Plans in our proposed new planning systems - see Chapter 10). In this way its provisions could be binding on the consents system thereby influencing consenting decisions.
6. *Reset the concessions system:* The 'first come, first served' concessions regime needs to be replaced with a selective system based on responsibilities and net gains for conservation. DOC needs stronger powers to review or cancel consents when they do not comply with new rules aimed to support emissions reduction, reduction of natural hazards or climate adaptation.
7. *Increase resourcing:* Additional resources and capacity, and involving iwi and community groups in conservation efforts, will be necessary to support the above work.

***Coastal dune vegetation restoration at Tāhunanui Beach, Nelson***

## Endnotes

1 'What effects did Cyclone Gabrielle have on native species?', *Radio New Zealand* (10 May 2023)

2 Intergovernmental Panel on Climate Change, 2023, *Synthesis report of the IPCC Sixth assessment report (AR6),* Cambridge University Press, Cambridge and New York, 15

3 Ibid

4 Ibid at 36

5 Ibid

6 Intergovernmental Panel on Climate Change, 2022, *Impacts, adaptation and vulnerability,* Contribution of Working Group II to the Sixth Assessment Report of the Intergovernmental Panel on Climate Change, Cambridge University Press, Cambridge and New York

7 Christie J, P Pearce, P Phifer, S Parsons and A Tait, 2020, *Department of Conservation climate change adaptation plan,* Department of Conservation, 49

8 Intergovernmental Panel on Climate Change, 2023, *Synthesis report of the IPCC Sixth assessment report (AR6),* Cambridge University Press, Cambridge and New York

9 McGlone M and S Walker, 2010, 'Potential effects of climate change on New Zealand's terrestrial biodiversity and policy recommendations for mitigation, adaptation and research', *Science for Conservation,* 312, 50

10 Ibid

11 Ibid

12 Ibid

13 Newnham R, 2021, 'Monitoring airborne pollen in New Zealand', *Journal of the Royal Society of New Zealand,* 52, 192-211

14 McGlone M and S Walker, 2010, 'Potential effects of climate change on New Zealand's terrestrial biodiversity and policy recommendations for mitigation, adaptation and research', *Science for Conservation,* 312, 50

15 Morton J, 2020, 'How climate change is throwing beech forests "out of synch"', *New Zealand Herald* (12 February 2020)

16 McGlone M and S Walker, 2010, 'Potential effects of climate change on New Zealand's terrestrial biodiversity and policy recommendations for mitigation, adaptation and research', *Science for Conservation,* 312, 50

17 Climate change is increasing the impacts of fish invasions into floodplains, for example, reducing resilience of native species. See Pingram M, K Collier, A Williams, B David, J Garrett-Walker, K Gorski, D Ozkundakci and E Ryan, 2021, 'Surviving invasion: Regaining native fish resilience following fish invasions in a modified floodplain environment', *Water Resources Research*, 57(9)

18 Ministry for the Environment and Stats NZ, 2022, *Environment Aotearoa 2022,* Ministry for the Environment and Stats NZ, Wellington, 50

19 Ibid

20 Langer L, S Wegner, G Pearce, N Melia, N Luff and D Palmer, 2021, *Adapting and mitigating wildfire risk due to climate change: Extending knowledge and best practice*, Scion report for Ministry of Primary Industries, Scion, Rotorua

21 Ibid at 2

22 For example, instream man-made barriers such as culverts, weirds, flood gates and hydro-electric dams are already a significant factor in the decline of eel populations, see https://niwa.co.nz/te-kūwaha/tuna-information-resource/pressures-on-new-zealand-populations/tuna-barriers-to-migration

23 Tait A, 2019, 'Risk-exposure assessment of Department of Conservation coastal locations to flooding from the sea: A national risk assessment of DOC assets, archaeological sites, recreational functional locations, and ecosystem and species management units vulnerable to coastal inundation and sea-level rise', *Science for Conservation,* 332

24 Ibid

25 United Nations Framework Convention on Climate Change, 2

26 Article 3, United Nations Framework Convention on Climate Change, 9

27 United Nations Framework Convention on Climate Change, 2

28 Article 2, United Nations Framework Convention on Climate Change

29 Article 4(2)(d), United Nations Framework Convention on Climate Change. Article 4(2)(c) alternatively references "best available scientific knowledge"

30 Article 3.3, United Nations Framework Convention on Climate Change, 9

31 Articles 4.1(g)-(h), United Nations Framework Convention on Climate Change

32 See commentary on page 4 of the Convention, as well as Articles 4.1(g)-(h) , United Nations Framework Convention on Climate Change

33 Article 2.1(iii), Kyoto Protocol, https://unfccc.int/resource/docs/convkp/kpeng.html

34 https://environment.govt.nz/what-government-is-doing/international-action/about-the-paris-agreement/

35 See preamble of the Paris Agreement and Articles 5.1-5.2

36 Article 7.5, Paris Agreement

37 Cook C, R Carter, R Fuller and M Hockings, 2012, 'Managers consider multiple lines of evidence important for biodiversity management decisions', *Journal of Environmental Management,* 30, 1

38 Parliamentary Commissioner for the Environment, 2023, *Submission on the Natural and Built Environment Bill and Spatial Planning Bill* (17 February 2023), 19

39 See discussion in Linkov I, D Loney, S Cormier, F Satterstrom and T Bridges, 2009, 'Weight-of evidence evaluation in environmental assessment: Review of qualitative and quantitative approaches', *Science of the Toral Environment,* 407, 5199

40 Kadykal A, R Buston, P Morrison, C Anderson, H Bickerton, C Francis, A Smith and L Fahrig, 2020, 'Bridging research and practice in conservation', *Conservation Biology,* 35(6), 1725

41 See discussion in Kadykal A, R Buston, P Morrison, C Anderson, H Bickerton, C Francis, A Smith and L Fahrig, 2020, 'Bridging research and practice in conservation', *Conservation Biology,* 35(6), 1725 and also Bertuol-Garcia D, C Morsello, C El-Hani and R Pardini, 2018, 'A conceptual framework for understanding the perspectives and causes of the science-practice gap in ecology and conservation', *Biological Reviews,* 93, 1032

42 For more details discussion see Kadykal A, R Buston, P Morrison, C Anderson, H Bickerton, C Francis, A Smith and L Fahrig, 2020, 'Bridging research and practice in conservation', *Conservation Biology,* 35(6), 1732

43 Bertuol-Garcia D, C Morsello, C El-Hani and R Pardini, 2018, 'A conceptual framework for understanding the perspectives and causes of the science-practice gap in ecology and conservation', *Biological Reviews,* 93, 1032

44 See Wehrens B and R Bal, 2011, 'The coordination of research, policy and practice: A case study of collaboration in the field of public health', *Science and Public Policy*, 38(10), 755-766; and Wehrens R, 2014, 'Beyond two communities–from research utilization and knowledge translation to co-production?', *Public Health*, 128(6), 545–551

45 For example, the Nagoya Protocol which is focused on access to genetic resources and fair and equitable sharing of benefits arising from their utilization. Also the Cartagena Protocol which deals with Biosafety matters.

46 Department of Conservation, 2019, *New Zealand's sixth national report to the United Nations Convention on Biological Diversity: Reporting period 2014-2018,* Department of Conservation, Wellington, 116

47 Mostly in the area of ocean acidification. See the New Zealand-Pacific Partnership on Ocean Acidification, the International Alliance to Combat Ocean Acidification and the Commonwealth Blue Charter Action Group on Ocean Acidification.

48 Department of Conservation, 2019, *New Zealand's sixth national report to the United Nations Convention on Biological Diversity: Reporting period 2014-2018,* Department of Conservation, Wellington, 121

49 https://www.doc.govt.nz/about-us/our-policies-and-plans/conservation-general-policy/

50 Department of Conservation, 2016, *Conservation management strategy: Otago 2016*, (revised edition 2022), Volume 1, 159

51 Department of Conservation, 2019, *Conservation management strategy: Wellington 2019,* Volume 1, 52

52 Section 17U(1), Conservation Act 1987

53 A full listing of current concessions is available for download at https://www.doc.govt.nz/get-involved/apply-for-permits/active-concessions/

54 See https://www.doc.govt.nz/globalassets/documents/about-doc/concessions-and-permits/concessions/concession-application-2a-grazing.pdf

55 A copy of the application form for aircraft concessions are available from DOC's website alongside information on what matters are considered, see https://www.doc.govt.nz/get-involved/apply-for-permits/business-or-activity/aircraft-activities/

56 See sections 6(h) and 7(i), Resource Management Act 1991

57 Sections 6(3)-(4), Natural and Built Environment Act 2023 (repealed)

58 See section 30, Natural and Built Environment Act 2023 (repealed)

59 Section 337(4), Natural and Built Environment Act 2023 (repealed)

60 Section 337(3), Natural and Built Environments Act 2023 (repealed)

61 Section 341(7), Natural and Built Environment Act 2023 (repealed)

62 Schedule 5, section 24(3)(b), Natural and Built Environment Act 2023 (repealed)

63 See sections 61(2) and 66(2), Resource Management Act 1991

64 Christie J, P Pearce, P Phifer, S Parsons and A Tait, 2020, *Department of Conservation climate change adaptation action plan 2020/21 – 2024/25,* Department of Conservation

65 Department of Conservation, 2022, *Annual report for the year ended 30 June 2022,* Department of Conservation, Wellington, 68

66 Rolfe J, T Makan and A Tait, 2021, *Supplement to the New Zealand Threat Classification System manual 2008: New qualifiers and amendments to qualifier definitions,* Department of Conservation, Wellington

67 Ibid at 4

68 New Zealand Conservation Authority meeting minutes (17 April 2020)

69 Both their annual reports and regular meeting minutes

70 MacDonald N, 2020, 'Glacier tourism is on thin ice', *Stuff Media* (30 September 2020)

71 Department of Conservation, 2018, *Draft Aoraki/Mount Cook national park management plan*

72 Ibid at 45

73 See Davies L, 2019, 'More scenic flights proposed for Mount Cook – but some are concerned about noise', *1News* (2 February 2019) and also Federated Mountain Clubs, 2019, Submission on draft Aoraki-Mount Cook National Park Management Plan (1 February 2019)

74 A summary of the submissions is available. See Department of Conservation (9 July 2020) Aoraki Mount Cook National Park Draft Management Plan: Response to submissions by section, at https://www.doc.govt.nz/contentassets/7604d89909144a0b9e0bc556dc8d84f9/submissions-by-section-draft-aoraki-mt-cook-npmp.pdf

75 Purdie H, J Hughes Hutton, E Stewart and S Espiner, 2020, 'Implications of a changing alpine environment for geotourism: A case study from Aoraki Mount Cook, New Zealand', *Journal of Outdoor Recreation and Tourism* 29, 100235

76 Letter from West Coast Conservation Board to DOC Operations Management (Hokitika), 6 September 2020

77 *Royal Forest and Bird Protection Society v New Zealand Conservation Authority* [2021] NZHC 1194

78 Otago Conservation Board, 2021, *Annual Report 1 July 2021 – 30 June 2022,* Otago Conservation Board, Dunedin, 44

79 New Zealand Conservation Authority advice to the Minister and Director-General regarding the need to consider climate change in both new and existing concessions considerations (19 July 2021), https://www.doc.govt.nz/about-us/statutory-and-advisory-bodies/nz-conservation-authority/advice-to-the-minister-and-or-director-general/advice-on-climate-change-and-concessions/

80 See Actions TB1b-d, Department of Conservation Climate Change Adaptation Action Plan 2020/21 – 2024/25

81 Action TB1F, Department of Conservation Climate Change Adaptation Action Plan 2020/21 – 2024/25

82 Action TB1j, Department of Conservation Climate Change Adaptation Action Plan 2020/21 – 2024/25

83 Action ER2a, Department of Conservation Climate Change Adaptation Action Plan 2020/21 – 2024/25

84 Tanentzap A, L Burrows, W Lee, F Nugent, J maxwell and D Coomes, 2009, 'Landscape-level vegetation recovery from herbivory: Progress after four decades of invasive red deer control', *Journal of Applied Ecology,* 46, 1064-1072

85 Paul T, M Kimberley and P Beets, 2019, *Carbon stocks and change in New Zealand's natural forests: Estimates from the first two complete inventory cycles 2002-2007 and 2007-2014,* Scion report for the Ministry for the Environment, Scion, Rotorua

86 See discussion in Hackwell K and M Robinson, 2021, *Protecting our natural ecosystems carbon sinks,* Forest and Bird, Wellington

87 Ibid

88 See Peltzer D and G Nugent, 2023, *Review of the likely magnitude and manageability of deer impacts on carbon stores in indigenous forests,* report for the Game Animal Council, Landcare Research, Lincoln

89 Forest and Bird, 2022, 'DOC plan for feral deer, pigs misses the mark on climate' (Press release, 28 June 2022)

90 A good summary of current trends and contribution of different threats to biodiversity decline is provided in Department of Conservation, 2020, *Biodiversity in Aotearoa: An overview of state, trends and pressures,* Department of Conservation, Wellington, 17

91 See Department of Conservation, 2020, *Te Mana o Te Taiao - Aotearoa New Zealand Biodiversity Strategy 2020,* Department of Conservation, Wellington, 19

92 Ibid at 63

93 Prober S, V Doerr, L Broadhurst, K Williams and F Dickson, 2019, 'Shifting the conservation paradigm: A synthesis of options for renovating nature under climate change', *Ecological Monographs* 89(1), e01333

94 Ibid

95 Ibid

96 Pörtner H, R Scholes, J Agard, E Archer, A Arneth, X Bai, D Barnes, M Burrows, L Chan, W Cheung, S Diamond, C Donatti, C Duarte, N Eisenhauer, W Foden, M Gasalla, C Handa, T Hickler, O Hoegh-Guldberg, K Ichii, U Jacob, G Insarov, W Kiessling, P Leadley, R Leemans, L Levin, M Lim, S Maharaj, S Managi, P Marquet, P McElwee, G Midgley, T Oberdorff, D Obura, E Osman, R Pandit, U Pascual, A Pires, A Popp, V Reyes García, M Sankaran, J Settele, Y Shin, D Sintayehu, P Smith, N Steiner, B Strassburg, R Sukumar, C Trisos, A Val, J Wu, E Aldrian, C Parmesan, R Pichs-Madruga, D Roberts, A Rogers, S Díaz, M Fischer, S Hashimoto, S Lavorel, N Wu, H Ngo, 2021, *IPBES-IPCC co-sponsored workshop report on biodiversity and climate change*, IPBES and IPCC

# 6 Introduced species management

*Lake Ōkāreka with introduced black swans and Canada geese, and the indigenous paradise shelduck (pair at front of image)*

> "The threat from introduced plants and animals is one of the greatest pressures our native species and ecosystem are facing. Aotearoa has the second-highest recorded number of invasive species in the world."[1]
> *Ministry for the Environment*

The effective management of introduced species is another critical challenge for Aotearoa New Zealand's conservation efforts. This chapter delves into the complex landscape of managing introduced species within the current conservation system and explores possibilities for a more successful approach through reform.

## 6.1 The nature of the challenge

By virtue of evolving on an isolated island nation, much of the indigenous flora and fauna of Aotearoa New Zealand is unique and distinctive from that elsewhere in the world. But a corollary of this isolation, and in particular the absence of mammalian predators and browsers, is that the country's landscapes, native ecosystems and species are not well adapted to withstand or compete in their presence.

Indigenous biodiversity decline is caused by multiple stressors, from land use change and habitat fragmentation, to pollution, over-utilisation and incidental take. However, in a context where remaining habitat may be sparse and disconnected, ecosystem functioning compromised and populations already in a highly fragile state, the presence of introduced species can be the final nail in the coffin. Over half of Aotearoa New Zealand's bird extinctions are attributable to predation by introduced mammals.[2]

As discussed in the previous chapter on climate change, the situation is expected to become more dire with climate change pressures, as the ranges of indigenous and introduced species shift and population dynamics alter in response to new environmental conditions. The recovery of indigenous biodiversity evident in off-shore islands and fenced eco-sanctuaries demonstrates how essential removal of introduced species is to ensuring Papatūānuku can thrive.

***Red deer are the most widespread deer species in country with wild populations established throughout most forested and tussock country*** (Bernard Spragg)

**Spotlight on the impacts of introduced species on indigenous flora and fauna**

- Introduced land mammals (eg stoats, possum and rats) are responsible for an estimated 26.6 million egg and chick losses by native bird species annually.[3]
- Over 95 percent of DOC conservation land has at least one ungulate species.[4]
- Browsing pressure from introduced ungulates, such as deer and goats, creates additional space for invasive weeds to spread.[5] Invasive weeds often out-compete native species but comprehensive information about invasive weed distribution and the rate of spread is lacking.[6]
- Almost half of Aotearoa New Zealand's flora now consists of alien plants[7] and a new plant species establishes in the wild every 39 days.[8] Introduced plants have been identified as the main hazard to one third of all nationally threatened plant species.[9]
- Terrestrial invertebrates (eg wētā, cricket and grasshopper)[10] and gastropods (snails)[11] are heavily predated on by introduced species and are impacted by changes to vegetation.
- At least eight species of introduced bees are now naturalised and compete with native species.[12] Their rapid increase on conservation land is affecting the feeding success and ecology of native bees, insects and birds. Their food preferences also contribute to the spread of exotic plant pests and diseases.[13] When the status of Hymenoptera (bees, wasps and ants) was last assessed: 118 of 154 species were 'data deficient' and only three species 'not threatened'.[14]
- Introduced micro-organisms like myrtle rust and kauri dieback disease are now having significant impacts on indigenous species. The spread of kauri dieback, additionally facilitated by pigs, has shifted kauri into the Threatened (Nationally Vulnerable) category.[15]
- Introduced freshwater fish species now account for more than 80 percent of the fish species observed in our rivers, impacting on important taonga species, such as kōura.[16]
- In the marine space, over 200 non-indigenous marine species are now established.[17]

Conversely, it is also important to acknowledge that many introduced species (eg *Pinus radiata*) are central to the primary production sector, making a national elimination approach unfeasible. Further, many people value some of the introduced species that exist on public conservation land for the hunting and fishing resource they provide. Around 150,000 game bird hunting and fishing licences are issued by Fish and Game each year, and the Game Animal Council estimates 50-60,000 people engage in hunting large game animals such as deer, tahr or pigs.[18] A survey of hunters undertaken by the Game Animal Council in 2022 found that over half of respondents "primarily" hunt for the purpose of obtaining food for their whānau or community.[19] Hunting for the purposes of recreation or well-being was also of high importance to many (37%).[20]

In the sections below, we identify some of the issues that the current conservation management system faces in managing introduced species, before identifying how these might be better addressed in a reformed system.

## 6.2 Lack of coherent management framework for invasive species

Despite the scale of the pressures that introduced species place on native flora and fauna (as outlined in the spotlight above) the threat management frameworks within the conservation system remain largely undeveloped. We explore some of the reasons for this below.

### *6.2.1 Shifting legislative frames*

Introduced species are variously managed under the Wildlife Act, Wild Animal Control Act, Game Animal Council Act and Biosecurity Act (examined later) which variously apply to different species.

#### *Wildlife Act*

Three key aspects of the Wildlife Act are relevant to the management of introduced species in the conservation system. First, the Act provides automatic protection for all "wildlife" regardless of indigeneity.[21] This blanket protection can be removed by a listing in Schedule 5, which now includes many common introduced species such as rats, stoats, starlings, pigeons, cats and dogs. A listing on Schedule 5 does not trigger any particular management action, it simply removes the protection otherwise in place. But crucially it enables agencies (such as regional councils) to undertake animal control without need for a permit under the Act. It also enables the Biosecurity Act's pest management functions to operate.

The protective starting point of the Wildlife Act means that when a newly arrived introduced species escapes into the wild, it is protected by default, and cannot be controlled until the protection is removed (through scheduling) or a permit is issued under the Act. This was considered somewhat "bizarre" by the biosecurity staff we spoke to at DOC and the Ministry for Primary Industries (MPI) and creates an unnecessary hurdle delaying any control response.

Secondly, much of the Act is focused on game management rather than control or protection. Game species are listed in Schedule 1 and the Act references "game" 387 times across 57 different sections. Most of the game bird resource comprises introduced species such as quail, pheasant, partridge and a range of duck species. However some indigenous species, like pūkeko, paradise shelduck and controversially the critically endangered grey duck, are also listed on the schedule.

Thirdly, many introduced browsers (including deer, tahr, chamois, pigs and goats) have been placed on Schedule 6 of the Wildlife Act and are therefore managed under the Wild Animal Control Act. The approach under that Act is to "control wild animals generally" and to eradicate them "locally where necessary and practicable, as dictated by proper land use".[22] A listing is therefore a decision that these species will not be nationally treated as a pest but can be controlled locally where necessary.

***Wild Animal Control Act***

The Wild Animal Control Act is a somewhat curious beast with a complex history. Its precursor was the Noxious Animals Act 1956 which was triggered out of concern about the increasing impacts of introduced species, especially deer, on conservation land and native forests. Its stated purpose was to provide for the "control and eradication of harmful species of wild animals". Section 3 of that Act provided a general right to hunt or kill "noxious animals" except where that would interfere with research being undertaken "for the purpose of planning their extermination."[23]

When the Wildlife Act was introduced, in 1953, it linked to this earlier statute. Schedule 6 was therefore originally intended as a mechanism for designating "noxious animals" for extermination. At that time, species like possum and wallaby were listed on Schedule 6 alongside deer, goats, pigs and tahr.

By the late 1970s, deer farming had grown as a sector and applying the term "noxious animals" to the farm animals was increasingly controversial. There was concern about "the effect it may have on the export of wild or farmed venison or goat meat" and the implications it raised for the future growth of the sector.[24] In 1977, the Noxious Animals Act was repealed and replaced by the Wild Animal Control Act. This shifted the framing from "noxious animals" to "wild animals" indicative of a changed approach.

The new legislation enabled the establishment of recreational hunting areas, which were to be managed by sportsmen and hunters under a licensing system, changes welcomed by the Deerstalkers Association and Big Game Hunters Association.[25] The Wild Animal Control Act also enabled the establishment of a National Recreational Hunting Advisory Committee which could include "representatives of organisations whose object is to foster hunting or shooting in recreational hunting areas."[26] This provided a statutory advocate for the recreational hunting sector and was a precursor of the Game Animal Council that exists today.

The most recent legislative adjustment to the management of "wild animals" (deer, goat, pig, chamois and tahr) came in 2013 with the enactment of the Game Animal Council Act. That Act was a requirement under the confidence and supply agreement between the National and United Future parties, and aimed to place "hunter's interests at the forefront" and "give hunters a greater say in the management of our big game resource".[27] The Act elevated the status of four species; pigs, deer, tahr and chamois (but not goats) to a newly created "game animals" designation. It also provided for the identification of "herds of special interest".[28]

The reference to "herds of special interest" marked the start of a more formalised discourse around "valued introduced species" a term not present in legislation but which has been used in Te Mana o te Taiao (see spotlight on terminology below). The portfolio of the new Minister for Hunting and Fishing is highly focused on these game species, as well as sports fish and game-birds.[29] This indicates an increasing convergence in framing to align the management of game animals with that of sports fish and game birds. These changes, and the management of valued introduced species more broadly, remain contentious.[30]

Overall this means that some introduced species, that in 1956 were treated as "noxious animals" to be eradicated, are now categorised as highly valued "game animals". The *Hansard* debates during the passage of the Wild Animal Control Act highlight this clash of values, with introduced species alternatively framed as a resource, to which people have a right to hunt, or an invasive pest to be eradicated. They are of course both.

What is largely absent in the *Hansard* discussion, or the legislation itself, is guidance on the priority to be accorded introduced versus indigenous species where those interests clash. Nor is there direction on how the

different values might be reconciled. There is also scant reference to the need for evidence informed decision-making and an understanding of what the risks, threats and costs associated with different management approaches might be.

The Wildlife Act automatically protects all wildlife, including introduced species, which can delay the implementation of control measures. The Act has a heavy focus on game bird management. It does not differentiate between indigenous and introduced species or endangered and non-endangered species. It also does not indicate priorities when interests clash.

The term used for deer, pigs, chamois and tahr has changed over time from "noxious animals", to "harmful" and "wild animals", and more recently to "game animals". Neither the Wildlife Act or Wild Animal Control Act, which are both dated, provide a clear and principled approach to managing this group of species. The elevation of their status to valued "game animals" applies an additional 'resource' lens that can conflict with a conservation focused one.

**Spotlight on terminology for introduced species impacting on indigenous biodiversity**

Conservation legislation currently lacks any specific term to refer to introduced species that pose a high risk to, or have high impacts on, biodiversity. When control and management is discussed the phrase generally employed is "harmful species".[31] Otherwise the direction is just to "exterminate" exotic flora and fauna as far as possible.[32] In contrast, the General Policies refer to "pests", a term more aligned with the Biosecurity Act, which variously refers to "pests" (which are species named in a pest management plan) or "unwanted organisms". Unwanted organisms are defined under section 2 of the Biosecurity Act as an organism capable or potentially capable of causing unwanted harm to natural or physical resources or human health.

"Invasive alien species" is the term employed in most international agreements, as well as European Union regulations.[33] The term is applied to any organism (including plants, animals and pathogens) that is non-native to an ecosystem and which may cause economic or environmental harm or adversely affect human health. It is broadly used to reference species that impact adversely on biodiversity (including through contributing to the decline or extinction of native species) through competition, predation, transmission of pathogens, or the disruption of local ecosystems and ecosystem functions.[34] While the term is not utilised in any of Aotearoa New Zealand's current conservation legislation, the term "invasive species" is referenced in Te Mana o te Taiao.

Te Mana o te Taiao applies the term "invasive species" to a wide range of introduced species including pests (such as rats, possum and mustelids), some "wild animals" (such as pigs, goats and deer), and to invasive weeds, invertebrates (such as wasps) and micro-organisms (such as myrtle rust and kauri dieback disease). The strategy also refers to "valued introduced species" which are defined as those species "which provide recreational, economic, environmental or cultural benefits to society",[35] or have importance as mahinga kai to Māori.[36] Sports-fish (eg trout and salmon) and game animals (specifically, pigs, deer, tahr and chamois) are all identified as valued introduced species.

In summary, none of the legislation or documents (including the General Policies and Te Mana o te Taiao) that apply to introduced species that have impacts on indigenous biodiversity, are aligned in their terminology. This makes it difficult for them to effectively 'talk' to each other and is confusing, and unnecessarily complex. The country's frameworks also do not link well with the terminology utilised in international instruments, and the growing body of jurisprudence associated with them.

Conservation legislation lacks a specific term to describe introduced species that have a significant negative impact on indigenous biodiversity. The variable use of terminology across legislation and policy documents makes it challenging to achieve an integrated approach. Terminology could be aligned around "pest", to match the Biosecurity Act, or "invasive alien species" as used in international agreements. The recent introduction of the term "valued introduced species" has increased the challenge of reconciling policy when an introduced species is both valued and invasive.

### *6.2.2 Underdeveloped management framework*

The animal control and management provisions, under the Wildlife and Wild Animal Control Acts, are sparse. The approach has been to provide broad Ministerial powers. There are no statutory criteria, clear processes or guidance under either regime to direct decision-making. This means that when negative impacts of introduced species on native flora and

fauna are identified (for example within species status reports or through DOC's monitoring system) there are no triggers for action, only a broad Ministerial discretion to respond.

Under section 41 of the Wildlife Act, the Minister *may* coordinate policies and activities for "the eradication of harmful species of wildlife",[37] or "prepare and issue plans" for the "control of wildlife and the eradication of harmful species of wildlife".[38] Under section 72, the Governor General also has the power to make regulations as "necessary or expedient for the protection or control of wildlife". However, the Act is silent on the process or considerations that need to be taken into account when these powers are used. Very similar provisions exist under the Wild Animal Control Act, where the Minister may (under section 5) prepare and issue wild animal control plans, as well as coordinate the policies and activities of local authorities and land-owners to control or eradicate these species.[39]

Absent clear statutory criteria, DOC has attempted to set out more detailed guidance within the General Policies. Conservation General Policy 4.2 states that CMSs should identify and prioritise threats posed by "pests" to indigenous species, habitats and ecosystems. In theory, this enables a regionally focused approach to be crafted. In addition, because sports fish and game management plans cannot derogate from CMSs, the strategies provide potentially powerful direction in this area.

However, as the EDS review of the conservation management planning system highlighted,[40] CMSs are often out of date and unresponsive to new information, so are difficult instruments to work with when an adaptive management approach is required. The review also found that the strategies are not adequately connected to DOC operations and funding mechanisms so do not drive action on the ground. There is potential for these documents to contribute more in this area, but they will not do so in their current form.

The Conservation General Policy also provides that biosecurity and pest management programmes should prioritise:

- Preventing pests becoming established, including illegal or inadvertent introductions
- Eradicating newly naturalised pests where practicable
- Eradicating, containing or reducing the range of pests that are established, but not widespread, where practicable
- Controlling widespread pests where required to protect indigenous species, habitats and ecosystems "where eradication or containment of them is not practicable."[41]

The policy states that "pest management programmes" should maximise outcomes for the benefit of indigenous species, habitats and ecosystems. It clarifies that they may:

> include control of indigenous species, sports fish and game birds where necessary to protect or restore threatened populations of indigenous species, or habitats and ecosystems with unique or distinctive values.[42]

In relation to recreational hunting, the policy provides that "recreational hunting of wild animals and animal pests should be encouraged where this does not diminish the effectiveness of operations to control them and is consistent with planned outcomes at places."[43]

It is evident that the Conservation General Policy does most of the heavy lifting in terms of setting purposes and priorities for managing introduced species within the conservation system. However, all of the directions are discretionary, being phrased as 'may' and 'should' rather than 'will'. Similarly, despite the clear statutory direction set for national parks, under the National Parks Act, that requires introduced plants and animals in these areas to be exterminated "as far as possible",[44] this discretionary language is also employed in the General Policy for National Parks.

The policy direction set under the General Policies is expressed in very broad terms and does not constitute a robust threat management system. It is also unclear how the policies connect to the legislation, since the terminology is not aligned (see above spotlight).

Current legislation grants broad Ministerial powers but lacks triggers, criteria or processes for planning or action. The Conservation General Policy has attempted to fill the gap but the direction is high level and discretionary. The direction set by the General Policy for National Parks sets a lower standard that that required under the National Parks Act. There is a broad lack of clarity as to what approach is to be adopted to manage the harmful impacts of introduced species.

DOC has attempted to provide greater guidance in more recent, non-statutory (so non-binding) policy documents, such as Te Mana o te Taiao, which further addresses the management of introduced species. In

relation to valued introduced species, it states there is a need to "recognise and prioritise the special responsibility we have towards indigenous species, while still recognizing the recreational, economic and cultural benefits and human sustenance of valued introduced species."[45] To this end, the strategy states that their impacts on indigenous biodiversity need to be identified, such impacts need to be actively managed, and valued introduced species need to be removed from high priority biodiversity areas and threatened ecosystems.[46]

The framework under Te Ara Ki Mua, the adaptive management framework for wild animals discussed above,[47] aims to implement this approach in practice. It recognises that for indigenous biodiversity to thrive, the ecological impacts of introduced species must be managed. This is important, as in the absence of natural predators, populations of introduced species can increase quickly and "compromise the resilience, structure, and diversity of forests, shrublands and native grasslands" as well as the health and quantity of other species. The framework underscores the importance of:

- An adaptive management approach
- Site-based planning
- High level engagement and partnership with iwi, hapū and stakeholders
- A diverse toolkit enabling management, containment and control approaches
- Targeted, collaborative and collective management
- Evidence to underpin management, including mātauranga Māori and science

To be successful, such an adaptive management approach for valued introduced species will require significantly more resourcing than is currently deployed in this area, as it depends on robust monitoring and effective management response. At present, Te Ara Ki Mua operates as an informal workaround, that is not well aligned with the General Policies and lacks the necessary statutory supports. It lacks clear criteria to guide decision-making, mechanisms to ensure transparency and accountability around its operation in practice, and support for effective implementation.

It also necessitates the development of a more carefully proscribed spatial planning framework. Spatial planning is an essential tool because it enables threatened ecosystems, critical habitat and sites of high biodiversity (as well as the hunting resource) to be identified and mapped. This enables management zones (whether for eradication, containment or control) to be set. Spatial planning can also support a more inclusive and collaborative approach (see spotlight on kauri dieback disease).

**Spotlight on the national pest management plan for control of kauri dieback disease**

In 2022, a national pest management plan was put in place under the Biosecurity Act, to respond to a pathogenic threat (kauri dieback disease) affecting kauri. Wild pigs had been identified as an associated threat, as their foraging and rooting behaviours spread dirt around the forest, and could facilitate dispersal of the disease. Although kauri are an important taonga, and a keystone species of indigenous ecosystems, wild pigs are also an important hunting resource and culturally valued taonga species.

A cultural impact assessment was undertaken to improve understanding of the potential impacts on mana whenua. This included the impacts of losing kauri, but also those associated with increased wild pig control and forest closure which restricted access to traditional food sources. The assessment concluded that taking no action to protect kauri would constitute a breach of Treaty principles.[48]

The complexity of addressing these competing needs was navigated through a highly proscribed spatial planning approach. Areas critical for kauri survival were identified and mapped. That enabled the implications of an eradication approach, for what was labeled 'kauri land' (including on recreational and subsistence hunting), to be better understood.

A management plan was subsequently developed which drew on both science and mātauranga. It was also recognised that management of a pathogen affecting a taonga species needed to be undertaken in partnership and a bespoke governance entity was established to enable that.[49] Mana whenua were authorised to undertake enforcement action with implementation funding provided to support their role.

The experience of managing kauri dieback demonstrates how spatial planning can help balance complex values and competing priorities to achieve a unified objective. This was possible because the Biosecurity Act provides a comprehensive management framework which includes funding mechanisms that can bind the Crown (to meet costs).

A key question is, in the absence of resourcing for a comprehensive adaptive management approach (which has not been available to date), what should the default position be? Should valued introduced species be permitted to persist unless they are shown to have an adverse impact on indigenous species? That would place the evidentiary burden on DOC to establish high risk of harm in order to trigger action. The danger with this approach is that, absent a robust monitoring regime, the system will not be responsive enough to protect indigenous biodiversity. Indeed this has been the case historically.

Alternatively, should valued introduced species be permitted to persist, only where the risks to indigenous species are demonstrated to be small? This would shift the evidentiary burden onto those who value the introduced species. The later scenario would enable valued introduced species with a low risk profile to remain, but the regulatory default for high-risk species would be elimination and progressive containment. Legislative clarity is required on such questions.

Te Mana o te Taiao prescribes an approach that prioritises indigenous species but also recognises the value accorded some introduced species. It directs active management according to impacts, and prioritises elimination of valued introduced species, but only in high priority biodiversity areas and threatened ecosystems. Te Ara Ki Mua adopts a similar position, setting an adaptive management approach for wild animals.

Adaptive management is a high-risk model unless significant scientific and monitoring resource exists to support it and ensure its effectiveness. This does not currently exist and it is unclear whether that will change in the future.

### *6.2.3 Patchy and unaligned regulatory framework*

The regulatory framework for managing introduced species is contradictory and overlapping with significant gaps. This is especially evident in the case of plants. There is currently scant legislative provision for the protection of indigenous plants or the control of invasive ones. Indigenous plants are not covered by the Wildlife Act's protections, but by the Native Plants Protection Act, which dates to 1934. Interviewees said that Act was largely ignored in practice. It was slated for 'urgent review' back in the 1980s (when scheduling plants under the Wildlife Act was also discussed),[50] but that review has never eventuated.

Invasive plants were once managed under the Noxious Plants Act 1978. However, when that law was repealed, relevant provisions were placed under the Biosecurity Act rather than into the conservation system. This has helped facilitate better border security, but has been less effective for the management of established weeds, because the Biosecurity Act is focused on addressing threats to primary production rather than indigenous ecosystems (as discussed further below).[51] In his recent report, *Space Invaders: A review of how New Zealand Manages Weeds that Threaten Native Ecosystems*, the Parliamentary Commissioner for the Environment has been highly critical of the current settings and lack of policy direction for invasive plants:[52]

> While New Zealand has successfully eradicated several non-native plant species from its territory, the small number of successes reflects the short-term, local and often uncoordinated efforts to manage non-native plants rather than national programmes backed by legislation and financed over several decades.[53]

There is currently scant legislative provision for the protection of indigenous plants or the control of invasive ones.

Introduced fish are just as complex. Indigenous freshwater fish do not qualify for automatic protection under the Wildlife Act highlighting another significant gap. At the same time, introduced sports fish (like trout) have a statutory advocate, in the form of Fish and Game, to manage and maintain them as a resource. Under section 26Q of the Conservation Act, Fish and Game regional councils have a function to enhance the sports fish resource (see spotlight on Kai Iwi Lakes). This is not to say Fish and Game should not have this role, but it highlights the lacuna of similar protection and active management for indigenous freshwater species. This skews the statutory balance in favour of introduced ones.

There is a lack of statutory levers to prioritise protection of indigenous freshwater fish, particularly when threatened by introduced sportfish species, which have a statutory advocate and enhancement mandate.

## Spotlight on Kai Iwi Lakes

The Kai Iwi Lakes are situated in Northland's Kaipara District and form part of a recreational reserve. Trout were first released into the lakes in 1968, and since trout do not naturally breed in the climatic conditions of the Far North, maintenance of the trout fishery requires Fish and Game to restock the lakes with rainbow trout fingerlings annually.[54] The introduction of trout created an inherent tension for the local community. They are variously viewed as a bane, due to their impact on indigenous fish species and traditional mahinga kai for local iwi, or as a boon due to their provision of a new food source and supporting a fishing-based tourism economy:

> Do we want a fishing-based tourism economy in Northland or do we want to save our native fish and aquatic environment of Kai Iwi Lake Reserve? [55]

The lakes are administered by the Taharoa Domain Governance Committee under a management plan. This means the Northland Fish and Game Council requires permission from the Committee for its annual trout fingerling releases. Concern over the health of native fish species in the lakes, particularly the dune lakes galaxias (a sub species of *Galaxias gracilis*) which are found only in the Kai Iwi Lakes, led to a change in approach in 2015 when the reserve management plan was reviewed. At that stage the Committee made a decision to stop the release of trout.

### *Ecological complexity*

The decision was not straight-forward primarily because another introduced species (*Gambusia*) also resides in the lakes. *Gambusia* is a known invasive pest species, and it may have been the prime cause of the dune lake galaxias's decline, or at least a contributor along with trout. Adding to the complexity of the situation, along with being a known predator of *Galaxia*, trout also predate on *Gambusia*. This gave rise to concern that lowering trout numbers might lead to an explosion in the *Gambusia* population. Although *Gambusia* are small, they are highly aggressive, eating the fins and eyes of native fish as well as their eggs. They can also out-compete indigenous species for food. Stopping the annual release of trout therefore came with associated risks.

A dedicated DOC-led working group was established to help navigate these complexities and improve monitoring and understanding of the ecology of the lakes.[56] A DOC freshwater science advisor explained that trout and native fish can sometimes co-exist but native species "are unlikely to thrive" alongside trout. In addition, "poor water quality and habitat … impact native fish more than exotic fish".[57] This means that for native fish species to hold the line, and co-exist with trout, the environmental conditions of the water and habitat must be high and any additional pressures (like *Gambusia*) removed.

Initial research indicated that trout were not significantly predating on *Gambusia* so a decision was made to decline the annual release of trout from 2018 onwards. The decision was controversial. Some felt there needed to be greater certainty around the benefits before making a decision that would impact recreational fishing and trout fishing tourism.[58] This raised an important question: in which direction should the onus of proof and placement of risk lie?

### *Cultural complexity*

Local iwi have a longstanding relationship with the lakes and regard them as a taonga and important food source. In 1992, the Waitangi Tribunal's *Te Roroa Report* recognised the importance of the lakes as an essential source of mahinga kai for tangata whenua. Much of the land in the surrounding area was gifted to the Crown by Paramount Chief Te Awha, in 1876, on condition that 250 acres adjoining the lakes was granted back as native reserve to protect "in perpetuity the wāhi tapu, papakainga and mahinga kai for tangata whenua."[59] The agreement was never honoured.

It was as a result of the Tribunal's recommendations, that co-governance arrangements through representation on the Taharoa Domain Governance Committee, were established. This saw a renewed focus on restoration and protection of the indigenous species in the lakes. Removal of introduced species was seen as necessary "to honour the intent of the original sale".[60] The co-management regime sets clear cultural objectives including management of the lakes holistically as "one ecological and cultural system" and restoration of "natural, indigenous biota, ecological systems" as well as "traditional kai":

> Trout are added on purpose by humans for one single purpose, a purpose that is not supported and does not take into account the cultural values and mana of hapū and iwi. Te Roroa does not support a recreational trout fishery in Te Taitokerau, especially within our taonga lakes.[61]

> Te Roroa and Te Kuihi are actively involved in activities to protect the outstanding indigenous landscape of Taharoa including monitoring of the lake beds to ensure they remain free of unwanted aquatic weeds, regional response to invasive fish incursions, removal of wilding pine trees and other noxious plant species ... pest control, including possum, stoat and rat removal from the reserve management area. [62]

Cultural impact assessments are now being undertaken to better understand the values of native kai and inform environmental outcomes. However, iwi have been very clear throughout the process that "mana whenua don't want any more trout releases".[63] For them, protection of indigenous species and removal of introduced ones is not just about 'restoration', but is also a decolonisation and restitution process.

***Stakeholder complexity***

From its inception, the decision to stop approving the release of trout was highly controversial and contested. In response to the decision, the Northland Fish and Game Council presented the Kaipara District Council with a draft statement of claim, setting out grounds for potential judicial review of the reserve management planning process.[64] Part of the complaint was that there had been inadequate "economic evaluation" of the impact of the decision.[65]

The threat of legal action triggered an additional round of meetings and engagement. Although all parties agreed on both the need to protect the survival of indigenous species, *and* the need for a science informed approach and monitoring programme, they disagreed on the appropriate management response. Before proceeding with removal of the trout, the Northland Fish and Game Council wanted more certainty as to the associated effects and potential risks.[66]

The Taharoa Domain Governance Committee eventually agreed to delay its decision pending "more research" and in return Northland Fish and Game deferred taking legal action.[67] Permissions to release trout were subsequently granted from 2017 through to 2019. This highlights a common feature of scientific uncertainty, that it often opens up room for additional debate. Uncertainty can be used as a lever to increase, or even reverse, the evidentiary burden and it can lead to additional delays and inaction.

A collaborative working group, with representation from Northland Regional Council, iwi, DOC and the Northland Fish and Game Council, was established to initiate a programme of research to inform plan implementation and management. However, following delays and lack of progress, the Committee eventually disestablished the working group and declined permission to release trout in 2020.[68] It instead requested more support and advice from DOC's Threatened Species Recovery Group and DOC established a specialist 'Dune Lakes Galaxias Science Group' to assist.

The Science Group had a narrower membership (absent Fish and Game) and a more science-led focus. It was comprised of a NIWA freshwater ecologist, a regional council water scientist, a regional council environmental monitoring officer, an iwi member (who was also a science manager) and DOC freshwater advisors.[69] The role of the Science Group was explicitly confined to science advice and it was not to "undertake management actions". It can be seen as an attempt by the Committee to draw a clearer line between science advice, on one hand, and policy development and management functions on the other.[70]

Recreational fishers, who were upset at the loss of the trout resource, subsequently threatened to release an invasive species (koi carp) into the area.[71] By February 2021, it became clear that koi carp had in fact been illegally released into the lakes.[72] In 2021, the Northland Fish and Game Council again applied for permission to release trout. Its application noted that koi carp were "a far greater threat [than trout] to all fauna and flora within the lakes" and had the potential to cause extinction of the dune lake galaxid.[73] It underscored that rainbow trout had previously helped stave off illegal release of rudd (through predation) so could now be of value to help control koi carp.[74] The Game Council did not support the illegal release of koi carp but the release strengthened the case for releasing trout.

There is significant complexity associated with the management of introduced species. This includes the complex science required to understand options and risk, and the difficulty of navigating the diversity of cultural, social and economic values associated with introduced species.

## 6.3 Poor interface with the biosecurity regime

The interface between the conservation system and the Biosecurity Act is highly complex. More than simply a border control regime, Part 5 of the Biosecurity Act deals with "pest management". Its purpose is "to provide for the eradication or effective management of harmful organisms". The Act does this by providing for the development of:

> effective and efficient instruments and measures that prevent, reduce or eliminate the adverse effects of harmful organisms on economic well-being, the environment, human health, enjoyment of the natural environment, and the relationship between Māori, their culture, and their traditions and their ancestral lands, waters, sites, wāhi tapu, and taonga.[75]

The scope and applicability of the Biosecurity Act is deliberately broad, to enable the regime to be activated in response to the full gambit of potential threats, including threats to the primary sector, human health and the environment. Accordingly, the criteria for developing a national pest management plan are comprehensive and simply require that an organism be capable of causing an adverse effect on one or more specified matters including:[76]

- The viability of threatened species or organisms
- The survival and distribution of indigenous plants or animals
- The sustainability of natural and developed ecosystems, ecological processes and biological diversity
- The relationship between Māori, their culture, and their traditions and their ancestral lands, waters, sites, wāhi tapu, and taonga.

Aotearoa New Zealand was one of the first countries in the world to employ the term "biosecurity". In recognising the need to protect "valued biological systems", the Biosecurity Act has been highlighted as taking a "more environmental perspective" than similar overseas legislation.[77] A useful feature of the Act is that it provides for both national direction and management, and place based regional pest management strategies, to be established (see Figure 6.1).[78]

MPI administers the Biosecurity Act, but any person may submit a proposal for the establishment of a national pest management plan to the Minister.[79] National plans aim at eradication, while regional ones may be for either the management or eradication of pests. National Direction for Pest Management sets out the framework for the development of national and regional pest management plans, helping to ensure these are aligned.

The pest management system, under the Biosecurity Act, is far more developed than the regime for the management of introduced species under the conservation system.

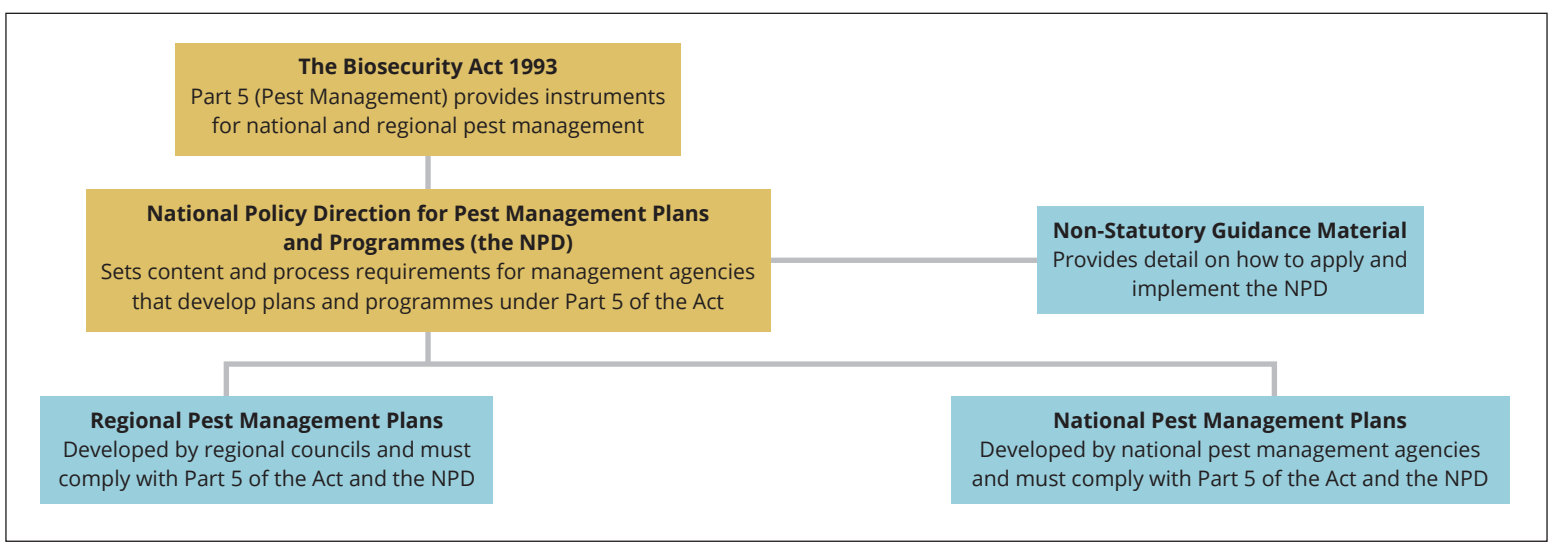



**Figure 6.1: Pest management system under the Biosecurity Act 1993** *(Source: Ministry for Primary Industries)*[80]

**Spotlight on pest management planning under the Biosecurity Act**

When a national pest management plan is proposed, under the Biosecurity Act, a cost-benefit analysis is undertaken to ensure that "the benefits of the plan would outweigh the costs, after taking account of the likely consequences of inaction or other courses of action".[81] A formal part of the planning process is the development of a proposal for the allocation of costs, which specifies the sources of funding to support implementation. Plans may also provide compensation for losses suffered by individuals where "a person's income derived from feral or wild organisms is adversely affected by the implementation of the plan".[82]

An important aspect is that the Act binds the Crown, so requires government departments to comply with any obligations set and to "meet the costs" imposed on them.[83] National pest management plans therefore provide a strong directive regime with a clear funding mechanism to support implementation.

The advantage of pest management plans is that their rules may require people, including private owners and occupiers, to take specified actions to prevent spread of the pest and to keep records of any actions. Such rules may also prohibit or regulate specified activities and practices.[84] They can apply nationally or to specified areas and contravention of them is an offence.

The ability to impose rules nationally, including over private land, is a powerful mechanism within the Biosecurity Act to help ensure a consistent and integrated approach to pest management.

While the Biosecurity Act has valuable features, including mechanisms to trigger a management response, secure funding and impose rules nationally, a number of aspects make it difficult to use for biodiversity protection and conservation purposes.

### *6.3.1 Primary production focused biosecurity regime*

The interface between the Wildlife Act and Wild Animal Control Act on the one hand, and the Biosecurity Act on the other, is complex. Because the Wildlife Act applies to birds, mammals and reptiles, introduced species within these categories are primarily managed under the conservation system. Conversely, introduced micro-organisms, invertebrates and plant species, which are not within the scope of the Wildlife Act, fall under the Biosecurity Act and the administration of MPI. This means that which agency is responsible for taking the lead role (either DOC or MPI) for dealing with an invasive species, is primarily dependent on what the species is and not the type of threat it poses.

The first issue in utilising the Biosecurity Act to achieve conservation goals is that MPI is the default lead agency. Although the Minister for Primary Industries may assign responsibility to other agencies, including DOC,[85] this has not occurred very often in practice. If DOC is to readily access the tools and resources available under the Biosecurity Act, the Department's jurisdiction and role within that system needs to be far more clearly defined.

Secondly, the cost-benefit analysis required under the Biosecurity Act, as part of pest management planning, is difficult to apply in relation to biodiversity and ecosystem protection. It is far easier to cost pest-related economic impacts on the primary production sector, rather than on biodiversity, and therefore to make a strong financial case for the need to take action. Interviewees at MPI indicated that some matters, such as the prevention of extinction, are inherently difficult to quantify. For example, in relation to kauri dieback disease, how do you value kauri trees? Their value to indigenous ecosystems and mana whenua are incalculable.

A third issue is mobilising sufficient funding and resources. A core consideration in the approval of a national pest management plan is whether adequate funding will be available.[86] The Biosecurity Act mechanisms are designed to enable costs to be jointly borne by a mixture of central and local governments and sector groups. For example, under section 100L, "levy orders" may be imposed on persons that will benefit from the implementation of the pest management plan. This enables the costs of control to be allocated to, and spread between, affected industry groups. There is seldom any sector to levy when the biosecurity risk is to indigenous biodiversity. This means that the matter must be of such significance that the Government is willing to commit the bulk of the funding.

There are a number of issues with applying the Biosecurity Act to the conservation system, including the default lead agency being MPI, the requirement to undertake cost-benefit analysis and arrangements around funding. Although this does not prevent Biosecurity Act tools being deployed for conservation purposes, the framework has not been designed to facilitate this. Conservation likely requires a more bespoke regime.

In *Conserving Nature,* EDS provided a spotlight on the management of an invasive white butterfly *(Pieris brassicae)* that posed a risk to a number

of indigenous brassica species.[87] The eradication response under the Biosecurity Act was initiated by MPI, but was subsequently terminated when the expected benefit to cost ratio was calculated, and the benefit was viewed as too small. Conversely, DOC's risk assessment and cost benefit analysis of the same organism, but through a biodiversity protection lens, provided a clear mandate for action.[88] Once the lead role was transferred to DOC (an agency with the necessary expertise and understanding of the technical issues), the invasive butterfly was eradicated, making Aotearoa New Zealand the first country to achieve this.

In addition, a 2019 review of the kauri dieback programme (which was led by MPI in collaboration with a number of partners including DOC), found that the management and governance arrangements had contributed to the failure to mitigate or stop the spread of the disease.[89] Lack of consensus and clarity on leadership meant that development of a national pest management plan floundered for years, delaying an effective response and resulting in an ad hoc and inconsistent approach.

The Biosecurity Act is currently under review and this provides an opportunity to amend the legislation to provide a more effective biosecurity regime for conservation.[90]

A number of tools under the Biosecurity Act, including national pest management plans, have the potential to greatly assist DOC in combating invasive species spread in order to protect indigenous biodiversity. However, current settings are not well-aligned for this purpose, and need to be better configured to support conservation outcomes.

### *6.3.2 Poor alignment between conservation and regional council biosecurity*

The Biosecurity Act is the primary mechanism for coordinating the pest management planning and control functions of regional councils. However, there is jurisdictional complexity when councils seek to declare a "wild animal" under the Wild Animal Control Act, or a species protected or partially protected under the Wildlife Act, as a "pest" under the Biosecurity Act.

The purpose of the Wild Animal Control Act is to control wild animals generally, and eradicate them locally "where necessary and practicable, as dictated by proper land use."[91] This proviso can operate as a barrier to councils that want to take a more sweeping eradication approach. When possum and wallaby were under the Wild Animal Control Act, councils complained about the huge amount of red tape and bureaucracy that existed around their culling.[92] Both were subsequently removed from that statute, and placed on Schedule 5 of the Wildlife Act, in order to remove protection and clarify for regional councils that they were able to formulate pest management plans for these species.

Interviewees told us that the complexity of navigating the Wild Animal Control Act has resulted in some councils adopting a hands-off approach to wild animals such as deer. We reviewed a number of regional pest management plans to see how councils engaged in this area. This revealed that councils frequently frame control of these species as a matter more appropriately dealt with by DOC. For example, Southland's Regional Pest Management Plan states that although feral deer can cause harm to native ecosystems, they are not treated as a pest "because the Department of Conservation manages the distribution and density of feral deer under the Wild Animal Control Act".[93] The council's role was viewed as one of providing assistance and advice to private land owners where deer were having negative impacts. Environment Canterbury similarly frames its role in this arena as one of "advocacy and education" rather than management.[94]

Absent statutory backing or direction as to their role, most councils avoid management of wild animals that are highly valued as a hunting resource and which fall under the Wild Animal Control Act, as this is viewed as a costly and contentious arena to step into. This means that even where councils have identified wild animals as posing a medium to high threat to biodiversity values, the Wild Animal Control Act deters them from taking action, especially when the costs of control are high and effective control difficult.[95]

Similar problems can arise in relation to game birds under the Wildlife Act. Longstanding council dissatisfaction over their ability to manage Canada geese eventually led to the species being moved from Schedule 1 (wildlife declared to be game) to Schedule 5 (wildlife not protected). The regulatory impact statement associated with the Wildlife Order for this change explained that there was uncertainty around the ability of regional councils to control game birds (on Schedule 1) as they were also under the ambit of Fish and Game which had the statutory mandate to manage the species to "maintain and enhance" the game bird resource.[96]

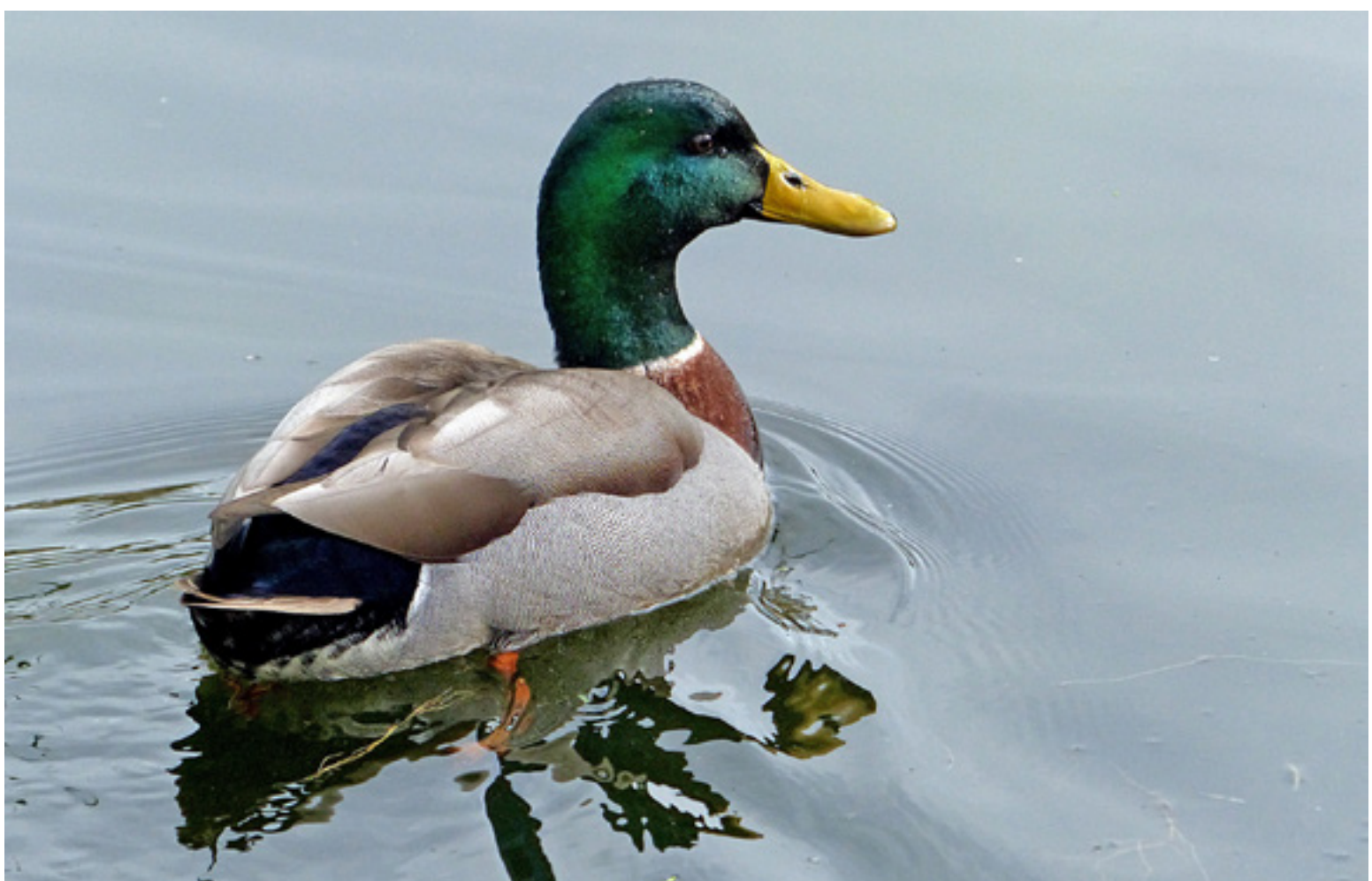
For game species, councils can also apply for a permit under section 54 of the Wildlife Act (which DOC in consultation with Fish and Game can issue), although this is generally seen as administratively costly. The

regulatory impact statement called for more active review of species status "in response to changes in abundance and distribution of species and changes in land use" and reconsideration of their protection status "where policy objectives are no longer being achieved."[97] This is essentially a call for a more adaptive management framework.

Councils can also take action within the ambit of a national pest management plan, but such a plan can only be developed after a species has been declared an "unwanted organism" under the Biosecurity Act by MPI. Both possum and wallaby were declared "unwanted organisms" in 2012, to allow a more coordinated national response under the Biosecurity Act. This means that MPI also has accountability for the National Wallaby Management Programme and the annual investment required to control that species.[98]

It can be difficult for councils to control introduced species declared to be "wild animals" under the Wild Animal Control Act or which are protected as "game birds" under the Wildlife Act. Permission is necessary from DOC in relation to wild animals, and from Fish and Game for game birds, under statutory regimes which give prominence to recreational hunting interests. This disincentivises councils from taking responsibility for controlling the impacts of such species.

Better alignment between regional council biosecurity functions and the conservation system is needed, particularly at the interface between councils and Wild Animal Control Act and Wildlife Act provisions.

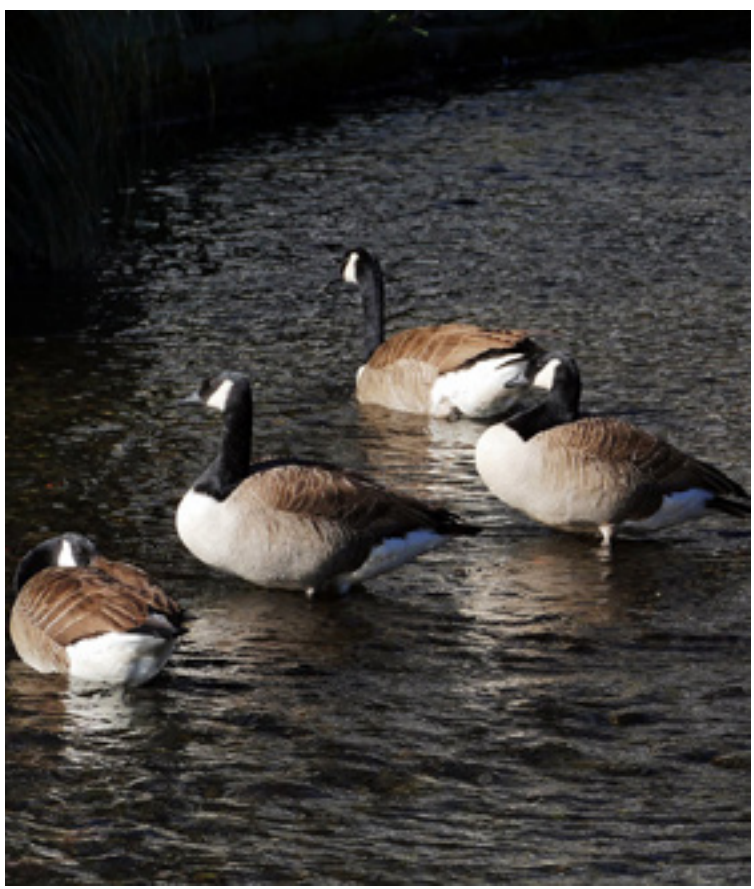


***Mallard ducks (a drake shown here) are the most common duck in Aotearoa New Zealand, being introduced during the 1930s and 40s*** (Bernard Spragg)

## 6.4 Applying a risk assessment framework

The type of impacts generated by any particular introduced species, and their magnitude, varies considerably between species. Each has its own distinct risk profile and can also be context dependent. For example, contrast the impacts of introduced predators such as mustelids and feral cats with introduced garden birds. Some introduced species may even provide important ecosystem services. For example, studies have shown that in some areas Canada geese may help maintain low-growing vegetation in a fashion similar to the now extinct moa and native waterfowl.[99] There is also some evidence to indicate that, absent native vectors, species such as blackbirds are playing an important seed dispersal role.

It is important to understand the risk profile of different introduced species (including how that varies according to place) in order to craft an appropriate management response. However, risk is not currently assessed in any standardised manner. Internationally, a number of models have been developed that operate in a way broadly comparable to the NZTCS, but which are focused on the *impacts* of species. Some of these are briefly highlighted below.



***Canada Geese cause damage to pasture and crops but can also help to maintain low-growing vegetation*** (Bernard Spragg)

### *6.4.1 Environmental Impact Classification for Alien Taxa*

The International Union for Conservation of Nature (IUCN) Environmental Impact Classification for Alien Taxa (EICAT) framework provides a global standard to assess the negative impacts of alien species on indigenous biodiversity. Its authors emphasise that EICAT should not replace more detailed risk assessments, and should not on its own be used to prioritise management actions, but it can usefully inform those processes.[100] Under EICAT, impacts are classified according to severity from minimal to massive concern (see Figures 6.2 and 6.3). As can be seen from Figure 6.2 the framework provides a regime much like that used to classify threatened species.

There are 12 impact mechanisms that operate as criteria to guide evaluation under EICAT and describe the type of adverse impact the species has:

1. Competition: competes with indigenous taxa for resources (eg food, water, space)
2. Predation
3. Hybridisation
4. Disease transmission
5. Parasitism
6. Poisoning/toxicity (eg it is toxic or allergenic (or allelopathic to plants))
7. Direct physical disturbance or bio-fouling
8. Grazing, herbivory or browsing
9. Chemical impacts (eg pH, nutrient and/or water cycling impacts)
10. Physical impact on ecosystem (eg disturbance or light regimes)
11. Structural impact on ecosystem
12. Indirect impacts through interactions with other species (eg through seed dispersal, pollination, apparent competition).

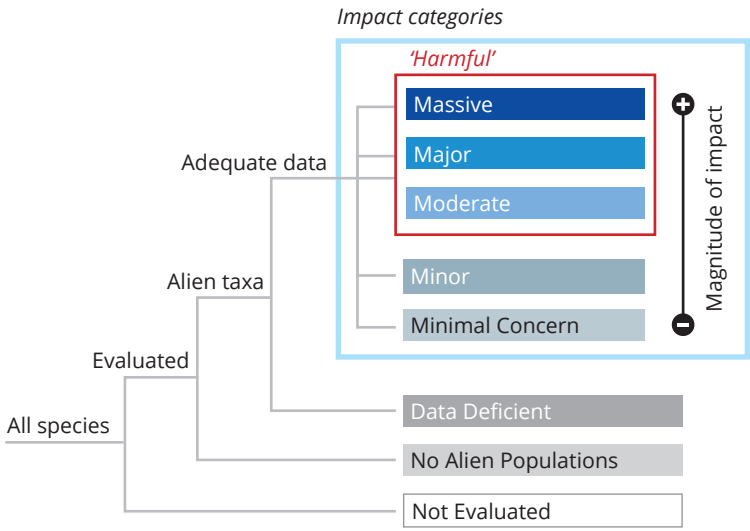



**Figure 6.2: ICUN Environmental Impact Classification for Alien Taxa** *(Source: IUCN)*[101]

***Red billed gull and chicks. The gulls are at risk-declining and a major threat is predation from introduced predators*** (Bernard Spragg)

| EICAT Category | Descriptor |
|---|---|
| Minimal concern | Impacts are characterised as negligible with "no reduction in performance of individuals in the native biota". |
| Minor concern | Causes reductions in the performance of individuals in the native biota, but no declines in native population sizes are evident, and there are no apparent impacts that would cause it to be classified in a higher impact category. |
| Moderate concern | Causes decline in population size of at least one taxon, but has not been observed to lead to local extinction of a native taxon. |
| Major concern | Causes community changes through the local or sub-population extinction of at least one taxon that would be naturally reversible if the alien taxon was removed. Impacts do not lead to irreversible local population, sub-population or global taxon extinction. |
| Massive concern | Causes naturally irreversible community changes to local, sub-population or global extinction of at least one taxon. |

**Figure 6.3: IUCN Environmental Impact Classification for Alien Taxa categories and criteria** *(Source: IUCN)*[102]

Assessments need to be connected to place (eg at the national, regional or local scale) to account for geographical variability. The regime is designed to work in conjunction with more detailed threat assessments that set out spatial and temporal scales for the impacts. Commentators have argued that the regime needs to include better recognition of the positive effects that species can have on biodiversity, for example, providing seed dispersal or an alternate food source. This has been incorporated into the EICAT+ framework.[103]

### *6.4.2 European Union Invasive Alien Species Regulation*[104]

Another approach to managing threats associated with introduced species is provided for under the European Union's Invasive Alien Species Regulation. The regulation lists species of concern and these are subject to a range of restrictions (on keeping, importing, selling, breeding, growing and releasing

into the environment) and management measures. Risk assessments are undertaken as part of the listing process. They consider:[105]

- Probability of introduction, entry, establishment and/or spread
- Magnitude of impact on biodiversity, ecosystems and ecosystem services, as well as social, human health and economic impact
- Natural and anthropogenic (eg intentional release, escape) spread mechanisms which are identified, described and differentiated.

Risk of introduction, entry and establishment is rated according to whether this is very unlikely, unlikely, moderately likely, likely or very likely. In relation to spread of established species, there is a scale set according to whether the spread is likely to be very slow through to very rapid. Impacts are categorised as minimal, minor, moderate, major or massive. Commentary detailing the recommended response to each of the assessments is attached. Bringing all the assessment matters together, species are given a response rating of low, moderate or high. Species assessed as of high concern are labelled "invasive alien species of concern".

Application of the criteria is heavily based on using available scientific evidence and it focuses on assessing risk and severity of impacts. A dedicated 'Scientific Forum on Invasive Alien Species' provides advice on scientific questions regarding implementation of the regulation. The regulation recognises that a species may be of more narrow "regional concern",[106] where the European Commission's role is one of facilitating and coordinating a response. 'Horizon planning' is also undertaken to identify potential and upcoming concerns, focusing on what species are likely to arrive, establish, spread or have an impact on biodiversity or related ecosystem services over the next decade.[107]

Under Article 19, Member States are required to put effective management measures in place within 18 months of a listing. Article 20 further requires appropriate restoration measures to be undertaken to assist recovery of areas degraded, damaged or destroyed by the invasive alien species. An exemption is only permitted where a cost-benefit analysis demonstrates, on the basis of available data and with reasonable certainty, that the costs will be "high *and* disproportionate to the benefits of restoration."

The impacts of different introduced species vary greatly with some providing positive ecosystem functions. Both the EICAT framework and European Union Invasive Alien Species Regulation establish a regime for assessing and classifying the risk of introduced species according to set criteria. This provides transparency and fosters an evidence-informed approach.

Listing under the EU framework triggers management planning as the regulatory default with an exemptions process. It is supported by a Scientific Forum on Invasive Alien Species highlighting the value of specialist scientific advisory support. The EICAT framework is analogous to the NZTCS in structure but with a focus on assessing species impacts.

### *6.4.3 Application to Aotearoa New Zealand*

In much the same way as species assessment status reports are issued under the NZTCS, a similar scheme could be developed in relation to introduced species, that instead reported on the status of impacts. Such reports could provide a science-based assessment as to the scale and seriousness of the threat created by each introduced species, its scope and scale (including spatial range), and likely threat trajectory into the future. This would provide valuable information, currently often missing, to inform management planning.

Just as qualifiers are used in relation to the NZTCS, similar qualifiers could be employed to add further detail to introduced species threat assessments. For example, they could indicate whether the species is range restricted, dependent on restocking (eg trout), or is predicted to change its impact with climate change. Population trend indicators would also be valuable.

It would be important to link such impact assessments to management responses. For example, they could inform scheduling decisions under the Wildlife Act, clustering species of similar threat status so they are treated similarly. Impact assessments would also need to be responsive to species status assessments under the NZTCS. All this information would need to be linked to the conservation management planning system. It is during the management planning process that values would be considered, including use value, but there would be an agreed starting point as to how serious a threat an introduced species posed.

Commentators are generally in agreement on the need to deploy a "stringent risk assessment" and a "black and white listing" process but with more nuance brought to bear when developing management options in response.[108] Kelsch et al suggest greater assessment, not just of species risk and impact, but of instrumental use and desirability.[109] 'Desirability' may arise through a range of factors including commercial and/or use value and species charisma.[110] In Aotearoa New Zealand, such factors arise in debates over removal of highly valued species like tahr and deer, culling of beloved animals like wild horses and cats, and control of taonga species like kiore. These all remain pinch points in the conservation system that require more detailed and strategic consideration, better tools and increased social science inputs to navigate.

There will be situations where a decision is made to maintain a population of introduced species, despite the threat it poses to indigenous biodiversity, and where strong values attached to a species drive more innovative management responses. Animal welfare considerations, for example, have led to strategies like mustering, rehoming and use of contraception to manage the Kaimanawa wild horse herd.[111] As noted earlier, spatial planning can also be a valuable tool to help deliver more highly bespoke responses at the local level. It can capture and respond to the diversity of values that exist at place and support a more integrated and collaborative approach. This is something that both tangata whenua and the hunting and fishing community have long sought.

Social science inputs to decision-making have often been 'underdone' in relation to the management of introduced species, particularly for the relational, instrumental and intrinsic values associated with them. Yet understanding such values is important in order to develop socially and culturally palatable responses.[112] Whether the impactful species is a wild horse, kiore or possum *does matter* in practical terms. It impacts on media portrayals, public perceptions of management, research attention and active public involvement and management – all of which impact effectiveness.[113] It also has implications for science communication as well as educational and advocacy work.

It is important that values associated with introduced species are identified and acknowledged and decision-making considers and incorporates them into a management response in meaningful and transparent ways. Spatial planning is a valuable tool to help navigate competing values at place.

***An international visitor is delighted after catching a brown trout, highlighting the strong economic and social values attached to some introduced species*** (Fish and Game)

## 6.5 Recommendations for reform

**Recommendations on managing introduced species within the conservation system**

*Review the Wildlife Act*: The issues traversed in this chapter reinforce the need to front-load a review of the Wildlife Act within conservation reform, so that it differentiates between introduced, indigenous and endangered species, clearly prioritising the later. As the conservation system's primary sorting system, the Wildlife Act is also the ideal place to institute detailed criteria to guide the scheduling process.

*Align terminology*: The terms and definitions used in relation to introduced species need to be reviewed and aligned. In relation to high impact species, consideration should be given to using either "pest" to match the Biosecurity Act or "invasive alien species" to provide consistency.

*Strengthen connections with the biosecurity system*: A more robust pathway for protecting biodiversity under the biosecurity system is needed, possibly granting DOC clearer roles and decision-making powers under the Biosecurity Act. There is also a need to remove barriers under the Wildlife Act and Wild Animal Control Act regimes that impede biosecurity, and to better enable regional councils to undertaken pest management functions in relation to wild animals, game birds and other valued introduced species.

*Introduce a threat management system*: Introduced species need to be categorised, based on the severity of their impact, and this information clearly linked to management planning regimes. Assessment reports need to include information on threat severity, spatial range and population trends. Aotearoa New Zealand should consider adopting a risk assessment regime like that of the IUCN's EICAT framework. This could drive classification and scheduling and operate as a trigger for developing a management response. The threat assessment and management system could also be linked to the species status reports under the NZTCS (eg to activate a response when a significant threat to a threatened species is identified).

*Adopt an evidence informed approach*: Any threat management system needs to be provided with appropriate science, monitoring and research support. Impact and risk assessment reports for introduced species need to be developed on the advice of an independent science entity to ensure a high degree of transparency.

*Take values into account*: While clear prioritisation should be accorded to at risk and threatened species over introduced species, where their interests clash, significant grey areas will always remain. There needs to be criteria and processes to help navigate clashes in values and for the system to have flexibility to respond in nuanced ways. The ability to implement innovative or bespoke management responses is also required. Spatial planning can assist with this. The role of social science in decision-making on introduced species needs strengthening to help transparently incorporate values into management responses.

*Incorporate climate change considerations*: A climate change lens needs to be incorporated into the management of introduced species to address their current and likely future impact on the climate resilience of indigenous biodiversity and ecosystems.

*Better protect indigenous plants*: The gap in protection for indigenous plants needs to be urgently addressed, so there are increased levers to trigger pest and weed control and respond to browsing, land use change and other pressures. Including plants under the Wildlife Act would be a valuable start.


*Kauri die-back sign in the Waitākere Ranges. A spatial planning approach was adopted to eradicate wild pigs from areas critical for kauri survival whilst retaining them as an important hunting and taonga species elsewhere*

## Endnotes

1 Ministry for the Environment and Stats NZ, 2020, *New Zealand's environmental reporting series: Our freshwater,* Ministry for the Environment and Stats NZ, Wellington

2 Fea N, W Linklater and S Hartley, 2020, 'Responses of New Zealand forest birds to management of introduced mammals', *Conservation Biology*, 35(1), 35

3 Ministry for the Environment and Stats NZ, 2022, *New Zealand's environmental reporting series: Environment Aotearoa 2022,* 20

4 Forest and Bird, 2021, 'Maps reveal nations forests under attack from wild deer, pigs and goats' (Press release, 27 October 2021)

5 https://www.doc.govt.nz/globalassets/documents/about-doc/annual-reports/annual-report-2021/annual-report-2021.pdf

6 Parliamentary Commissioner for the Environment, 2021, *Space invaders: A review of how New Zealand manages weeds that threaten native ecosystems,* Parliamentary Commissioner for the Environment, Wellington, 78

7 Pyšek P, P Hulme, D Simberloff, S Bacher, T Blackburn, J Carlton, W Dawson, F Essl, L Foxcroft, P Genoves, I Kühn, A Liebhold, L Meyerson, A Pauchard, H Seebens, M van Kleunen, M Vilà, M Wingfield and D Richardson, 2020, 'Scientists warning on invasive alien species', *Biological reviews,* 95, 1511

8 Ministry for Primary Industries, 2016, *Biosecurity 2025 direction statement for New Zealand's biosecurity system,* Ministry for Primary Industries, Wellington, 4

9 Hulme P, 2020, 'Plant invasions in New Zealand: Global lessons in prevention, eradication and control', *Biological Invasions,* 22, 1539

10 Trewick S, D Hegg, M Morgan-Richards, T Murray, C Watts, P Johns and P Michel, 2022, 'Conservation status of Orthpotera (weta, crickets and grasshopper) in Aotearoa New Zealand 2022', *New Zealand Threat Classification Series 39*, 12, 15

11 Walker K, F Brook, G Barker, D Roscoe, E Edwards, R Hitchmough, J Rolfe and P Michel, 2021, 'Conservation status of New Zealand terrestrial Gastropoda (slugs and snails) 2020, *New Zealand Threat Classification Series 33*, 2

12 https://www.doc.govt.nz/globalassets/documents/science-and-technical/nztcs18entire.pdf 12-13

13 https://blog.tepapa.govt.nz/2021/02/01/new-zealands-native-bees-quiet-lives-of-desperation/

14 Several are now critically endangered, including the native bee *Leioproctus nunu* and native wasp *Leioproctus keehua.* Despite their status neither have been scheduled for protection, see https://www.doc.govt.nz/globalassets/documents/science-and-technical/nztcs18entire.pdf 12-13

15 De Lange P, J Rolfe, J Barkla, S Courtney, P Champion, L Perrie, S Beadel, K Ford, I Breitwieser, I Schönberger, R Hindmarsh-Walls, P Heenan and Ladley, 2017, 'Conservation status of New Zealand indigenous vascular plants, 2017', *New Zealand Threat Classification Series 22*, 8

16 Ministry for the Environment & Stats NZ, 2020, *New Zealand's environmental reporting series: Our freshwater 2020, 25*

17 Ministry for the Environment & Stats NZ, 2022, *New Zealand's environmental reporting series: Environment Aotearoa 2022*, 20

18 See New Zealand Fish and Game Council, 2023, *Briefing to the Incoming Minister for Hunting and Fishing,* New Zealand Fish and Game Council, Wellington, and New Zealand Game Animal Council, 2023, *Briefing to the Incoming Minister for Conservation,* New Zealand Game Animal Council, Te Puke

19 New Zealand Game Animal Council, 2022, *2022 Game Animal Council hunter survey results,* New Zealand Game Animal Council, Te Puke

20 Recreation/well-being was the primary driver for hunting for 37% of respondents. See Game Animal Council New Zealand, 2022, *2022 Game Animal Council hunter survey results,* New Zealand Game Animal Council, Te Puke

21 The definition of "wildlife" only covers animals not plants, and its definition of "animal" excludes invertebrates, fish or marine species, although protection for the later three may be added through schedules to the Act

22 Section 4, Wild Animal Control Act 1977

23 Smith, 8 May 1956, Noxious Animals Bill, *New Zealand Parliamentary Debates* 308, 755

24 Talbot, 29 November 1977, Noxious Animals Bill, *New Zealand Parliamentary Debates* 416, 4837

25 Ibid at 4838

26 Section 29, Wild Animal Control Act 1977

27 https://www.beehive.govt.nz/release/game-animal-council-be-established

28 Section 16, Game Animal Council Act 2013

29 https://www.dpmc.govt.nz/cabinet/portfolios/hunting-and-fishing

30 See Ewing I, 2023, 'Calls for next Government to fund pest control as deer, pig, goat and wallaby numbers explode', *Newshub* (30 September 2023) and Forest and Bird, *DOC plan for feral deer, pigs misses the mark on climate* (Press release, 28 June 2022)

31 The language remains in the preamble of the the Wild Animal Control Act 1977

32 See sections 19-21, Reserves Act 1977 and section 4, National Parks Act 1980

33 See, for example, European Union Regulation (No 1143/2014) on the prevention and management of the introduction and spread of invasive alien species

34 https://www.cbd.int/idb/2009/about/what/

35 Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020,* Department of Conservation, Wellington, *9*

36 Ibid at 31

37 Section 41(1)(c), Wildlife Act 1953

38 Section 41(1)(e), Wildlife Act 1953

39 Section 5, Wild Animal Control Act 1977

40 See Koolen-Bourke D, R Peart, B Wilde and T Turner, 2021, *Independent review of the conservation management planning system*, Environmental Defence Society, Auckland

41 Policy 4.1(b)(iv), Conservation General Policy

42 Policy 4.2(d), Conservation General Policy

43 Policy 4.2(f), Conservation General Policy

44 Section 4(2)(b), National Parks Act 1980

45 Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020,* Department of Conservation, Wellington, 13

46 Ibid at 53

47 https://www.doc.govt.nz/globalassets/documents/conservation/biodiversity/te-ara-ki-mua-framework.pdf

48 Ministry for Primary Industries, 2021, *Regulatory impact statement – national* phtophthora agathidicida *pest management plan*, Ministry for Primary industries, Wellington, 26

49 Ibid at 24

50 Forde B, 1986, 'Science and the law', *New Zealand Science Review,* 43, (1-2), 12

51 Parliamentary Commissioner for the Environment, 2021, *Space invaders: A review of how New Zealand manages weeds that threaten native ecosystems,* Parliamentary Commissioner for the Environment, Wellington, 118

52 Ibid at 10

53 Hulme P, 2020, 'Plant invasions in New Zealand: Global lessons in prevention, eradication and control', *Biological Invasions,* 22, 1539, 6

54 https://fishandgame.org.nz/assets/Uploads/KAI-IWI-LAKES.pdf (pamphlet)

55 See Vidyadharan A, 2021, 'Northland's Kai Iwi Lakes: Save native biodiversity or fishing-based tourism?', *New Zealand Herald* (24 July 2021)

56 Ibid

57 Ibid

58 Ibid

59 Kaipara District Council, 2016, *Reserve management plan Kai Iwi Lakes (Taharoa Domain) 2016,* Kaipara District Council, Dargaville, 8

60 Ibid

61 Vidyadharan A, 2021, 'Northland's Kai Iwi Lakes: Save native biodiversity or fishing-based tourism?', *New Zealand Herald* (24 July 2021)

62 Ibid

63 Expressed by Iwi Representative and Science Manager for Te Roroa, Taoho Patuawa, member of the Dune Lake Galaxias Science Group (meeting minutes, 21 December 2020), https://pub-kaipara.escribemeetings.com/filestream.ashx?DocumentId=3499

64 Kaipara District Council, 2020, Taharoa Domain Fish and Game trout release. Meeting minutes of the Taharoa Governance Committee, 28 May 2020, https://pub-kaipara.escribemeetings.com/filestream.ashx?DocumentId=1214

65 Vidyadharan A, 2021, 'Northland's Kai Iwi Lakes: Save native biodiversity or fishing-based tourism?', *New Zealand Herald* (24 July 2021)

66 Kaipara District Council, 2020, Taharoa Domain Fish and Game trout release. Meeting minutes of the Taharoa Governance Committee, 28 May 2020, https://pub-kaipara.escribemeetings.com/filestream.ashx?DocumentId=1214

67 Letter from Taharoa Domain Governance Committee, 10 November 2020, Kai Iwi Lakes Dune Lakes Galaxias working group update

68 Ibid

69 Expressed by Iwi Representative and Science Manager for Te Roroa, Taoho Patuawa, member of the Dune Lake Galaxias Science Group (meeting minutes, 21 December 2020), https://pub-kaipara.escribemeetings.com/filestream.ashx?DocumentId=3499

70 Kaipara District Council, Kai Iwi Lakes Dune Lakes Galaxia Working Group, meeting minutes of the Taharoa Domain Governance Committee, 11 May 2021, seeking resolution to disestablish the Working Group

71 Dune Lake Galaxias science group meeting minutes, 21 December 2020

72 Letter from Northland Fish and Game Council to Taharoa Domain Governance Committee, 3 May 2021, Request to liberate trout into Lake Taharoa and Lake Waikare 2021

73 Letter from Northland Fish and Game Council to Taharoa Domain Governance Committee, 3 May 2021, Request to liberate trout into Lake Taharoa and Lake Waikare 2021

74 Ibid

75 Section 54, Biosecurity Act 1993

76 Section 62, Biosecurity Act 1993

77 Quinlan M, J Alden, F Habbel and R Murphy, 2016, *The biosecurity approach: A review and evaluation of its application by FAO, internationally and in various countries,* Food and Agriculture Organisation of the United Nations, Rome, 27

78 A good comparison of the distinctions between the two options is set out by MPI at https://mpi.govt.nz/dmsdocument/14362-nppa-and-regional-pest-management-strategies

79 Section 61, Biosecurity Act 1993

80 Ministry for Primary Industries, 2015, *National policy direction for pest management 2015: Regulatory impact statement*

81 Section 62(e), Biosecurity Act 1993

82 Section 64(4), Biosecurity Act 1993

83 Section 60(2), Biosecurity Act 1993

84 Section 64(5), Biosecurity Act 1993

85 Section 55, Biosecurity Act 1993

86 Section 62(g), Biosecurity Act 1993

87 Koolen-Bourke D and R Peart, 2021, *Conserving nature: Conservation reform issues paper*, Environmental Defence Society, Auckland, 136

88 Ibid

89 Russell D, 2019, *Briefing on kauri dieback: Report of the environment committee*, House of Representatives, Wellington

90 https://www.mpi.govt.nz/legal/legislation-standards-and-reviews/biosecurity-legislation/biosecurity-act-1993-overhaul/

91 Section 4(1), Wild Animal Control Act 1977

92 Davis, Biosecurity Law Reform Bill – Second reading (16 August 2011), *Parliamentary Debates* 675, 20636

93 Southland Regional Council, *Southland biosecurity strategy 2019-2024*, Southland Regional Council, Invercargill

94 Craw J, 2015, 'Focus and performance in managing post-border biosecurity in New Zealand', *Perspectives in Biosecurity,* 3, 28

95 Ibid at 27

96 Impact statement for the Wildlife (Canada Goose) Order 2011 (SR 2011/128)

97 https://www.doc.govt.nz/globalassets/documents/about-doc/role/legislation/regulatory-impact-statement-canada-goose.pdf at 9

98 https://www.mpi.govt.nz/dmsdocument/54358-Aotearoa-New-Zealand-Wallaby-Strategy-Full-version

99 See Lee W, R Wood and G Rogers, 2010, 'Legacy of avian-dominated plant-herbivore systems in New Zealand', *New Zealand Journal of Ecology,* 34(1), 28-47

100 International Union for Conservation of Nature, 2020, *IUCN EICAT categories and criteria: The Environmental Impact Classification for Alien Taxa,* International Union for Conservation of Nature, Swtizerland, 2

101 Ibid

102 Ibid

103 Vimercati G, A Probert, L Volery, R Bernardo-Madrid, S Bertolino, V Céspedes, F Essl, T Evans, B Gallardo, L Gallien, P González-Moreno, M Grange, C Hui, J Jeschke, S Katsanevakis, I Kühn, S Kumschick, J Pergl, P Pyšek, L Rieseberg, T Robinson, W Saul, C Sorte, M Vilà, J Wilson and S Bacher, 2022, 'The EICAT+ framework enables classification of positive impacts of alien taxa on native biodiversity', *PLoS Biolology,* 20(8), e3001729

104 Regulation 1143/2014, at https://faolex.fao.org/docs/pdf/eur140066.pdf

105 Assessments utilise the template set out in European Commission and Directorate-General for Environment, 2022, *Study on invasive alien species – development of risk assessments to tackle priority species and enhance prevention: Final report and Annexes,* European Union, Brussels

106 Article 11, Regulation 1143/2014

107 European Commission, Directorate-General for Environment and H Roy, 2015, *Invasive alien species - prioritising prevention efforts through horizon scanning – Final report*, Publications Office, Brussels (ENV.B.2/ETU/2014/0016), 21

108 Kelsche A, Y Takahashi, R Dasgupta, A Mader, B Johnson and P Kumar, 2020, 'Invasive alien species and local communities in socio-ecological production landscapes and seascapes: A systematic review and analysis', *Environmental Science and Policy*, 112, 275

109 Ibid

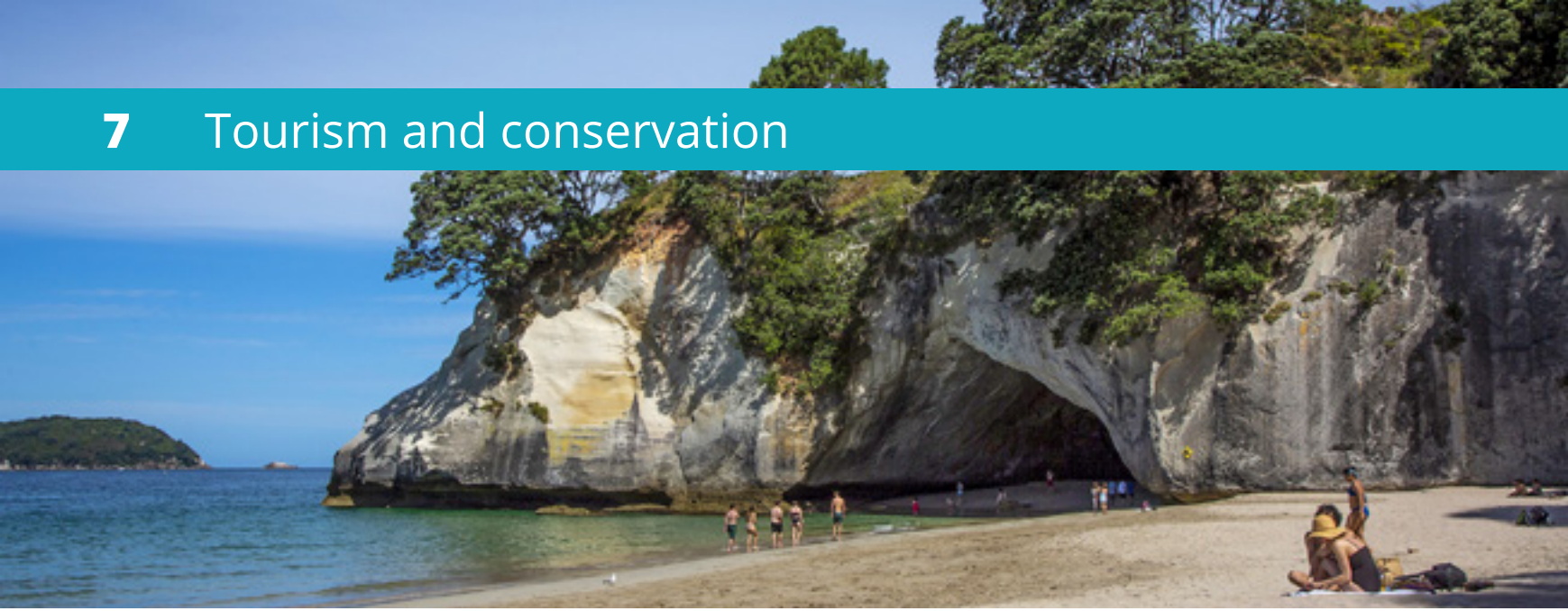
110 Jaric I, F Courchamp, R Correia, S Crowley, F Essi, A Fischer, P Gonzalea-Moreno, G Kalinkat, X Lambin, B Lenzner, Y Meinard, A Mill, C Musseau, A Novoa, J Pergi, P Pysek, L Pyskova, P Robertson, M von Schmalensee, R Shackleton, R Stefansson, K Stajerova, D Verissimo and J Jeschke, 2020, 'The role of species charisma in biological invasions', *Frontiers in Ecology and the Environment,* 18, 345

111 'Contraceptive injections to cull kaimanawa wild horse herd growth', *Radio New Zealand* (30 May 2022)

112 Sax D, M Schlaepfer and J Olden, 2022, 'Valuing the contributions of non-native species to people and nature', *Trends in Ecology and Evolution*, 37(12), 1058

113 Jaric I, F Courchamp, R Correia, S Crowley, F Essi, A Fischer, P Gonzalea-Moreno, G Kalinkat, X Lambin, B Lenzner, Y Meinard, A Mill, C Musseau, A Novoa, J Pergi, P Pysek, L Pyskova, P Robertson, M von Schmalensee, R Shackleton, R Stefansson, K Stajerova, D Verissimo and J Jeschke, 2020, 'The role of species charisma in biological invasions', *Frontiers in Ecology and the Environment,* 18, 345

# 7 Tourism and conservation



*Cathedral Cove, Hahei. Damage from Cyclone Gabrielle led to closure of the track to the Cove and DOC is coming under strong pressure to repair and reopen it due to the impact of closure on tourism revenues*

This chapter focuses on the management of tourism within the conservation system. The Conservation Act makes reference to both tourism and recreation, but the two are highly connected.[1] The term 'tourism' is commonly used to refer to 'visitors' or those traveling to a location outside their usual place of residence. This may or may not involve commercial enterprises, like tourism operators, and such visitors will typically engage in an array of recreational activities (ie for enjoyment rather than for work).[2] This means tourism often involves 'recreation' and much (though not all) recreation is undertaken by tourists. In this chapter the focus is on both managing visitation to conservation areas and commercial activities designed to cater for such visitors.

> The World Tourism Organisation defines "tourism" as "a social, cultural and economic phenomenon which entails the movement of people to countries or places outside their usual environment for personal or business/professional purposes. These people are called visitors (which may be either tourists or excursionists; residents or non-residents) and tourism has to do with their activities, some of which involve tourism expenditure."[3]

Before the collapse of international tourism, as a result of the Covid-19 border closures in March 2020, tourism was Aotearoa New Zealand's largest export earner generating some $17.2 billion which comprised over 20 percent of the country's total export revenues.[4] The border reopened in February 2022, and by the following year, international visitor numbers had returned to 76 percent of pre-pandemic levels (totalling 2.96 million) although spending was proportionally less, totalling $9.9 billion.[5]

Conservation land makes a substantive contribution to the country's tourism offering and therefore to the generation of this revenue. During the year ended February 2019, around 3.9 million New Zealanders visited public conservation land at least once, as did 1.8 million international visitors (around half the total who visited the country that year).[6]

To provide for such visitors, DOC manages a vast portfolio of facilities, at a cost of around $150 million a year. They include tracks for walking, biking and four-wheel-driving, huts, campsites and visitor centres. The track network stretches over some 14,800 kilometres and there are around 970 huts and 13,000 supporting structures.[7] Maintaining such a large network places a significant financial burden on DOC, with the book value of deferred renewal of visitor assets in 2023 being some $300 million, more than half being work on tracks.[8]

From 2012, until the Covid-related border closures in 2020, international visitor numbers increased exponentially, and at a greater rate than ever previously seen in Aotearoa New Zealand (see Figure 7.1). Visits to national parks increased at an even greater rate. For example, during 2019 there was a 9 percent growth in visitors to national parks, which was more than

double the 4 percent growth in overseas visitor arrivals that year. Such pressures on conservation areas are not evenly spread. Some places have experienced a massive increase in visitor numbers. For example, visits to Otago's Blue Pools rose from 3,400 to 102,000 in just three years (an increase of 3,000 percent), Rakiua/Stewart Island had a 76 percent increase (to 17,000 visits) and Northland's Tane Mahuta Walk had a 44 percent increase (to 152,000 visits).[9]

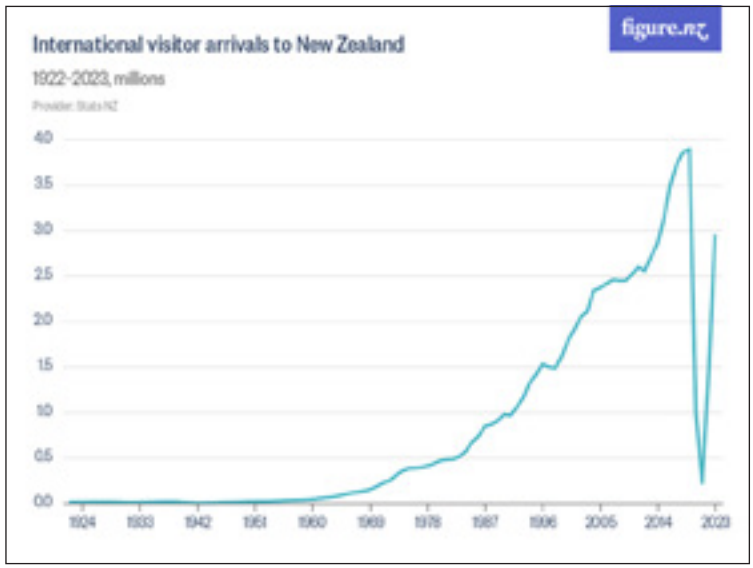



**Figure 7.1: International visitor arrivals to New Zealand 1922-2023[10]**

In 2017, around 1,100 businesses provided for recreational activities in public conservation areas including 465 businesses involved in guiding, 72 in boating and 15 in snow sports. Many other businesses benefit from visitors to public conservation areas including commercial transport operators, vehicle rental businesses and accommodation providers.[11]

As well as generating economic benefits, such high visitor numbers can have multiple negative impacts on conservation land. This section examines the challenges that tourism poses for managing the conservation estate, how well the current conservation management system is configured to deal with them, and some options for reform.

## 7.1 The nature of the challenge

Several recent reports have identified significant problems with the current tourism model. In April 2020, EDS published a report on the interface between tourism and landscape protection.[12] This topic is of particular relevance to the conservation management system because (as highlighted above) many landscapes of interest to tourists and the tourism industry are on public conservation land. The report highlighted the difficulties created by the prime focus being on attracting increasing visitor numbers to Aotearoa New Zealand, rather than how to manage them once they have arrived.

The report highlighted the significant negative impacts that tourism was having on communities, infrastructure and the natural environment. It described small communities being swamped by visitors, local infrastructure being overwhelmed, and the natural environment being degraded by the sheer number of visitors. To the address these issues, the report recommended a move towards more sustainable forms of tourism, which has been reflected in the more recent government documents described below. Key recommendations were to mainstream destination planning (which has now happened) and undertake a first principles review of the concessions system.

### Spotlight on Tongariro alpine crossing

Issues on the Tongariro alpine crossing highlight some of the problems that exist in tourism management at present. Growing numbers of walkers have created logistical issues, not least for waste management, with large queues at toilet facilities and "deposits" frequently left beside the track and becoming a "a huge detrimental issue".[13] Such adverse impacts are in direct conflict with the Tongariro NPMP, which requires effluent in the park to be removed or treated, and where no facilities are provided "visitors should remove all waste, including human waste themselves".[14]

The annual reports of the Tongariro-Taupo Conservation Board raise this issue as being of continual concern, noting that prior to Covid-19, tourist "numbers were threatening to overwhelm capacity and seriously impact both natural and cultural/spiritual values" in this dual World Heritage Area.[15] The Board speaks of increasingly larger numbers of people using the Tongariro alpine crossing, flocking to the ski fields and "just wanting to visit and play in the snow".[16] The Board urged the collapse of international tourism during Covid-19 to be viewed as an opportunity to "rethink the way visitor use is managed".[17]

The Parliamentary Commissioner for the Environment also reviewed the impacts of the tourism industry on Aotearoa New Zealand's environment in his 2019 report titled *Pristine, Popular… Imperilled? The Environmental Consequences of Projected Tourism Growth*. The report highlighted the challenges of waste generation, overloaded wastewater treatment

facilities, infrastructure provision, biosecurity risks, and greenhouse gas emissions associated with travel and increasing visitor numbers:[18]

> The environmental pressures from tourism growth are manifesting across temporal and spatial scales. The cumulative impact of growing visitor numbers is eroding visitor experience and making management of waste more difficult in popular locations. Infrastructure is often not designed to meet current needs, and where it is being built to accommodate growth it may contribute to greater environmental pressure. Most tourism activity results in greenhouse gas emissions. The emissions footprint is particularly high for international tourists for whom Aotearoa New Zealand is often a distant destination.[19]

The Commissioner's subsequent report, released in 2021,[20] provided some potential solutions including for how to address the "slow but persistent erosion of wildness and natural quiet that has resulted from tourism growth in parts of the conservation estate".[21] The report also notes the issue of new entrants being frozen out, when the allowable concession activity is fully allocated, which is a barrier to the aspirations of iwi and hapū as well as others:[22]

> Put simply, a number of Aotearoa New Zealand's premier natural attractions had become difficult to visit without encountering throngs of other visitors, the intermittent buzz from planes and helicopters, or the visual effects of cruise ships, buses and cars in an otherwise natural environment.[23]

The Commissioner put forward a number of potential solutions. First, he proposed that DOC should apply a more stringent lens when considering concession applications in order to better engage with the letter and spirit of the legislation. Secondly, he suggested that DOC should seek a fair return from commercial activity in the conservation estate. On this point the Commissioner concluded that DOC had been setting fees far below fair market value (as further discussed in Part Four of this report) and should consider tendering and auctioning concessions. Thirdly, he proposed that the ability of DOC to restrict day visitors on experiential grounds needed to be clarified. The Commissioner suggested that DOC should have the ability to restrict access "where the weight of numbers starts to degrade the inspiration or enjoyment that can be derived from a location".[24] This could be through a first in first served system or a booking system (both with numbers capped), or a pricing system.

EDS's *Conserving Nature* report[25] built on such work and identified a series of issues with the current conservation management system of relevance to tourism. It highlighted a number of problems with the concessions system including current strategies and plans (which provide the framework for concessions) being dated; Ministerial discretion being exercised so that strategies and plans were not necessarily complied with; most concessions being processed on a 'first come first served' basis rather than being allocated to applicants which best support the purposes of the conservation system; iwi not being afforded an appropriate degree of preference in concession allocation; and monitoring and enforcement being weak.

The numerous reports and investigations of Aotearoa New Zealand's tourism sector identify a number of issues to resolve in terms of its intersection with the conservation system. They include a lack of adequate tools to manage visitor numbers and inadequacies in the concessions regime. All studies have emphasised the need to shift towards more sustainable forms of tourism.

## 7.2 Conservation system response to tourism

Current settings for the management of tourism in conservation areas are set out in statutes, conservation policies and plans, and other non-statutory government documents relevant to tourism. We review these below.

### *7.2.1 Statutory documents*

Conservation statutes barely acknowledge that tourism associated with conservation areas exists. The word 'tourism' does not appear in the Reserves Act 1977 despite the 389,504 international visitor arrivals into the country the year the Act was passed. Nor does the word appear in the National Parks Act 1980, which was enacted in the year when there were 445,195 international arrivals. As earlier noted, the Act does refer to freedom of entry and access to national parks by the public.[26]

The Conservation Act 1987 mentions the tourism industry in passing (being brought into law when there was 844,313 international visitor arrivals), acknowledging that DOC has a function to "allow for" the use of any natural or historic resource for "tourism" to the extent that it is not inconsistent with its "conservation".[27] The term "tourism" is not defined in the Act, nor is it differentiated from "recreation", which is also undefined.

It is not clear what the function to "allow for" tourism actually entails. Does it obligate DOC to grant concessions to tourists operators so long as this is not inconsistent with conservation? And when might tourism be so inconsistent given that the definition of conservation includes providing for recreational enjoyment which is what tourism effectively does (see definition below)?

> "**conservation** means the preservation and protection of natural and historic resources for the purpose of maintaining their intrinsic values, providing for their appreciation and *recreational enjoyment by the public*, and safeguarding the options of future generations"[28]

Tourism does get a mention in several other parts of the Conservation Act. The Minister appoints members to Conservation Boards after having regard to the interests of tourism amongst many other sectors.[29] In addition, CMSs and CMPs have the purpose of establishing objectives for the integrated management of natural and historic resources for "recreation, tourism, and other conservation purposes".[30]

The Act also has a regime for the grant of concessions which gives some hint as to the meaning of tourism. As a starting point, Section 17O states that "no activity shall be carried out in a conservation area unless authorised by a concession". The section then goes on to set out a range of exemptions to this requirement. They include "an individual or organised group undertaking any recreational activity" where there is no "specific gain or reward for that activity, whether pecuniary or otherwise". This implies that tourism (in the context of the Act) is defined in the converse, that it includes all recreational activities undertaken for "specific gain or reward".

But these brief mentions and hints in the legislation hardly give the management of tourism in conservation areas the level of priority that is merited today, with pre-Covid international visitor arrival figures burgeoning close to four million a year (3,888,473).

The same lax approach to tourism has followed through into conservation policy. The Conservation General Policy has no provisions specifically focused on tourism. In addition, it unhelpfully blurs the line between recreation and tourism, stating that CMSs should identify how "public access is to be enabled" and what types are suitable in different places and to what extent "(including those provided by concessionaries)",[31] and that recreational activities should be managed using a variety of tools including zoning and limitations on the number of people or activities "including those managed by concessionaries".[32]

There are some specific policies which apply to concessions. These state that, for accommodation and related facilities, the concession application "should" (but not "must") meet a set of criteria including that the facility cannot reasonably be located outside public conservation lands and waters; cannot reasonably be built elsewhere where the potential adverse effects would be significantly less; and cannot reasonably use or share an existing structure or facility. But these largely mirror the requirements in section 17U(4) of the Conservation Act, although in a less rigorous manner.[33] There is also a policy stating that activities requiring specific authorisation not covered elsewhere (which would include tourism although this is not explicitly stated) should "where relevant" avoid, remedy or mitigate adverse effects and maximise any positive effects.[34] Such effects should also be monitored by concessionaires and DOC.[35]

A similar approach is taken in the General Policy for National Parks. Policy 10 deals with activities requiring specific authorisation, this time explicitly including tourism. It states that CMSs and NPMPs "should" require all activities in national parks which require a concession or other authorisation to be consistent with outcomes planned for places, be consistent with "the preservation as far as possible of the national park in its natural state"; minimise adverse effects, including cumulative effects on other national park values; and not have any adverse effects on the existing recreational opportunities in the area.[36] Also, the effects of such activities should be monitored.[37] Interestingly, this means that where there are adverse effects on national park values these must be "minimised", but when there are adverse effects on other recreational opportunities, these must not occur at all. This indicates a policy priority for protecting recreational opportunities over other national park values.

Unlike the Conservation General Policy, which has little to say on specific tourism activities, the General Policy for National Parks has more specific provisions relating to ski fields (stating NPMPs "will" identify the conditions under which ski field applications may be considered),[38] aerial cableways (which "should" be confined to defined amenities areas and existing ski fields),[39] and powered aircraft for which there is a range of provisions including that NPMPs "should" specify sites where landing, hovering and take-off may be authorised and the extent to which the activity may be undertaken on any site.[40]

Overall, the statutes and General Policies do not provide a coherent legal and policy framework for managing the interface of tourism and conservation areas. They blur the line between recreation and tourism. They fail to acknowledge that tourism was (and will likely be again) an economic powerhouse in Aotearoa New Zealand that is largely dependent on access to

conservation areas. Nor is there sufficient recognition that tourism activities can significantly impact, in a cumulative manner, on conservation values (including public interest values described in Chapter 2) if not well managed in a holistic manner. In addition, as discussed in Part Four of this report, the industry has not adequately contributed to the conservation asset base on which it largely relies.

*The Franz Josef Glacier in the Westland Tai Poutini National Park has been a tourism drawcard since the late 1890s. The use of aircraft to enable tourists to access the retreating glacier has been controversial*

The General Policies are implemented through CMSs and NPMPs. To provide some flavour for how this has been achieved in practice we provide spotlights below of how the West Coast Te Tai Poutini CMS and Wellington CMS address tourism.

**Spotlight on conservation planning for the West Coast Te Tai Poutini area and tourism**

The West Coast Te Tai Poutini CMS (2010-2020) covers an area comprising some 2.277 million hectares of land in the South Island, west of the Main Divide, and in the rohe of Ngāi Tahu. Public conservation land comprises some 84 percent of the total land area in the region.[41] It includes the Westland Tai Poutini National Park, part of a World Heritage Area, which has a varied landscape including lakes, rivers, wetlands, forest, mountainous terrain, snowfields and glaciers.

The CMS provides more clarity regarding the term "recreation" which is said to encompass "the full range of activities undertaken by people for leisure purposes and the experiences they gain through these activities". More specifically, "recreational uses" are said to include passive enjoyment and more active outdoor activities. Tourism is still not defined but "tourism uses" are "allowed via the granting of concessions for recreational activities, facilities and services".[42] In this way, tourism is seen in the sole context of granting concessions for recreational activities.

The CMS provides a recreational zoning framework that provides rules for the management of concessions according to the features of a particular zone. The zones, which have been applied to conservation land within the region, include wilderness area[43] (where no motorised vehicles should be authorised and only small groups), remote zone[44] (where only occasional aircraft landings should be allowed), backcountry-remote zone[45] (where regular aircraft landings may be authorised), front-country sites[46] (where regular aircraft should not be authorised) and intense interest sites[47] (which are to have easy access and high public use and no aircraft landings should be authorised).

Interestingly, in the backcountry remote zone which includes the Franz Josef and Fox glaciers, there are specific limits for the number of people per group (8 increased to 15 for allowed tracks, guided walks and heli-hikes) but not for the number of aircraft landings. In 2017 there were 40,000 helicopter flight landings on Franz Josef Glacier[48] raising the issue of whether this complies with DOC's function to only allow for tourism to the extent it is not inconsistent with conservation.

**Spotlight on conservation planning for Wellington and tourism**

The Wellington CMS (2019-2029) covers much of the lower portion of the North Island. This includes the Ruahine, Tararua, Remutaka and Aroangi forest parks and the country's second largest area of duneland and dune wetlands.[49] The area is within the rohe of multiple iwi.[50] In terms of visitor management the strategy has adopted visitor management zones based on the Recreational Opportunity Spectrum in a similar manner as for the West Coast (see above spotlight). However, the strategy also indicates an intent to increase recreational use of public conservation land by promoting "icon destinations", "gateway destinations", "local treasure destinations" and "backcountry" depending on the different recreational needs of visitors.[51] Although this could be expected to increase visitor pressure there is a policy to "avoid, or otherwise minimise, adverse effects on the qualities of peace and natural quiet, solitude and remoteness in places where this is an important feature and expectation of the visitor experience".[52]

A review of current legislative and statutory planning documents highlights the regulatory gap that exists in relation to tourism within the conservation system. This is despite its significant economic importance to the country and potential to have negative impacts on conservation areas. "Tourism" remains undefined creating ambiguity about its scope and role in the conservation system. General Policies and planning documents lack specific provisions for managing tourism and do not offer a coherent tourism management framework.

### *7.2.2 DOC non-statutory documents*

Alongside these regulatory provisions, DOC has developed several policy documents to guide its management of tourism. An earlier one is DOC's *Destination Management Framework* which dates back to 2011.[53] It is premised on a strongly economic-focused vision of tourism and conservation and appears to be very much about encouraging more recreational and commercial use of the conservation estate. Its vision statement includes the objective that "[b]usinesses realise the economic value of investing in activities associated with recreation and tourism. In turn, commercially delivered recreation enables a wider range of people to enjoy the outdoors and complements other available choices."[54]

To achieve this, the Framework indicates that DOC needs to, amongst other things, "develop a plan to *promote opportunities*, focusing on *ongoing refreshing of destinations* that support domestic and international tourism; encouraging New Zealanders to recreate at family-friendly destinations, and providing access to a wide range of front country and backcountry opportunities" (emphasis added).[55]

The Framework also emphasises that DOC needs to work with others, stating, "there is a strong incentive for tourism and outdoor recreation businesses to establish and grow when the infrastructure and setting is being managed as a public good." To achieve this, the document goes on to explain that DOC needs to "facilitate discussion with the tourism sector to explore opportunities that will encourage their investment and business commitments at specific tourist destinations."[56]

A more recent document, DOC's 2021 *Heritage and Visitor Strategy*, is much more focused on demand management, user charging and driving co-benefits rather than increasing usage of conservation areas per se. This is likely in response to the pre-covid 'overshoot' in international visitor numbers. The document refers to the trialling of differential pricing for international visitors on four of the Great Walks and using park and ride arrangements to reduce vehicle pressures.[57] It also indicates that DOC is exploring the closer integration of visitor management with biodiversity conservation including involving visitors in biodiversity restoration activities.

There is reference in the strategy to DOC actively working with tangata whenua to identify more and varied opportunities for Māori to benefit from visitors to public conservation areas.[58] A key focus is supporting long term destination planning[59] which has also been a focus of the tourism arm of the Ministry of Business, Innovation and Employment (MBIE) more generally in the wake of Covid-19 (see below). This all sounds promising, but many of these adjustments and innovations are not well supported under the existing legislative framework.

In its 2022 *Annual Report*, DOC noted that the tourism sector "does not wish to return to pre-Covid-19 visitor pressures on communities and the environment" and that DOC needs "to take an active and strategic role in shaping a more sustainable and regenerative tourism system".[60] This indicates a desire by DOC to become more actively involved in the tourism system itself, rather than being a largely passive provider of visitor infrastructure and grantor of concessions.

DOC has developed various non statutory policy documents to guide its approach to tourism management. They highlight the Department's shift in approach over time. The Destination Management Framework, put in place in 2011, focused on tourism growth and its economic aspects while the more recent Heritage and Visitor Strategy acknowledges the need to manage visitor numbers and work in partnership with tangata whenua to create opportunities. In a post-Covid context, sustainable and regenerative tourism, under which DOC takes a more active leadership role is viewed as the way forward.

### *7.2.3 MBIE-related documents*

In 2019, MBIE in partnership with DOC released the *New Zealand-Aotearoa Government Tourism Strategy* which articulated a vision to "[e]nrich New Zealand-Aotearoa through sustainable tourism growth". Notable is the emphasis on sustainability but still with a focus on "growth" rather than demand management. In terms of the environment, the desired outcome is "tourism protects, restores and champions New Zealand-Aotearoa's natural environment, culture and historic heritage".[61]

The top priorities for government implementation include coordination across the tourism system; long-term sustainable funding mechanisms including an international visitor levy; "evaluate options to allow more strategic revenue and pricing decisions by DOC"; destination management planning; and better data and insight.[62]

The strategy teases out more detail regarding the environment outcome, with a focus on how "tourism can be a champion for the restoration of the natural environment" and how it "can contribute to conservation and manage its impacts on conservation lands". Relevant actions to achieve this include implementing the International Visitor Conservation and Tourism Levy (IVL) and building "a pathway to enable tourism businesses to easily undertake conservation restoration".[63]

The strategy places much more emphasis on destination management and tourism paying its way in terms of impacts on conservation areas. It also signals the potential for tourism businesses to be more directly involved in conservation activities which could include predator control and track and hut maintenance. However, as mentioned above, this is all couched in an overall growth scenario and does not seem to contemplate that Aotearoa New Zealand may have reached 'peak tourism' pre-Covid.

Also in 2019, Tourism Industry Aotearoa released a sustainable growth framework titled *Tourism 2025 and Beyond*. This includes a series of actions over a broad range of issues including the economy, visitors, the community and the environment. In terms of the environment, it highlights the need for tourism businesses to contribute to restoring and enhancing nature, and for them to measure and understand their environmental footprint. In terms of engagement with DOC, its refers to the Department's *Visitor and Heritage Strategy* enabling visitor access reflecting "the importance of concessionaires as facilitators of managed tourism and recreation activities on the public conservation estate".[64] However, this needs to also recognise DOC's statutory role, which is not to facilitate tourism use, but to ensure that concessionaires are (at the very least) not negatively impacting conservation values.

**Spotlight on the Tourism Futures Taskforce**

In June 2020, the Minister of Tourism set up an independent Tourism Futures Taskforce to advise on what changes could be made to the country's tourism system in the wake of Covid-19. The terms of reference included making recommendations on sustainability, including environmental sustainability.[65] The process is of value in understanding how the conservation system might better manage its interface with tourism as Conservation Boards and the NZCA made substantive submissions to the Taskforce.

Conservation Boards made a number of recommendations in their submissions to the Taskforce which included the need to:[66]

- Maintain the integrity of conservation legislation, policy and plans to protect taonga
- Better resource, prioritise and adhere to existing conservation legislation
- Strengthen climate change legislation and direction and link it to decision-making
- Acknowledge and maintain a core role for DOC in tourism planning
- Invest more in biodiversity protection measures
- Encourage domestic and short haul markets and regional spread, noting that domestic and short haul have greater appreciation for the environment and local culture
- Improve waste management

- Create a Visitor Management Strategy to manage visitor numbers to protect natural resources
- Increase the IVL to fund needed infrastructure
- Change legislation to enable DOC to charge for access to all national parks

The NZCA additionally noted in its submission that "existing legislation, plans and strategies, which guide access to and use of public conservation land must be correctly resourced, prioritised and adhered to. The tourism industry must be required to be familiar with these documents in detail, respect their provisions and how important they are". The NZCA further urged that the tourism industry needs to acknowledge the primary role of DOC to protect the natural and cultural environment.[67]

The Taskforce released its interim report in December 2020, after which it was disbanded. The report noted that the tourism sector "is largely unregulated and is managed through disparate pieces of legislation that were not designed with the peculiarities of tourism in mind." It called for dedicated legislation for the visitor industry alongside the modernisation of the Conservation Act.[68] The report also noted that DOC is frequently constrained by "legacy decisions and legislative restrictions" that have created pricing decisions that did not reflect the true value of what is being offered.[69]

In terms of the modernisation of the Conservation Act, the Taskforce called for amendments to give DOC the necessary powers to implement changes effectively including:[70]

- New pricing and supply management tools
- Enabling private investment by the private sector to support visitor and conservation goals
- Greater involvement of iwi and use of co-governance approaches for managing DOC lands and delivering visitor experiences there
- A new concessions approach with tools to achieve visitor and conservation outcomes "through prescribed high standards"
- Facilitating new product development in "regenerative and environmental tourism"
- Aligning conservation management planning with destination planning.

During 2021, the government launched a Tourism Communities Support Recovery and Re-set Plan. This $200 million programme was designed to target five communities particularly hard hit by the Covid-19 related tourism downturn given their dependence on international tourism. The funding has supported the development of destination management plans, the tourism industry transformation plan (see below); Māori tourism; and the extension by DOC of a temporary fee waiver for concessionaires. It has also supported the further development of the Milford Opportunities Project (also see below).[71]

Following on from this initiative, a 'Tourism Industry Transformation Plan' was being developed through a partnership between government, industry, Māori and the community. Its objective was "to contribute to building a regenerative tourism system" which is one that "leaves a community and environment better than it was before".[72] The first phase was focused on the tourism workforce. The second phase was focusing on the environment and "actions required to deliver systemic change" rather than being another stocktake of issues and challenges facing the industry.

The focus has been on three pillars: climate change adaptation; climate change mitigation; and fostering positive ecological outcomes, such as biodiversity and ecosystem restoration.[73] A consultation document was released in June 2023 which included proposals such as developing a tourism decarbonisation roadmap, developing measures for regenerative tourism, and assessing ideal minimum and maximum visitor numbers at specific sites.[74] More recently, Government has suspended work on all industry transformation plans.

Destination management planning has been a focus of the government's support for the tourism industry over the past few years. By the end of 2022, the government had invested over $47 million in such planning across the country. This raises the issue of the relationship between CMSs and NPMPs, on one hand, and destination management plans on the other. A recent report to the NZCA on this interface concluded that destination management plans are something that CMSs and NPMPs can consider as part of their development process but there is no statutory lever requiring this to happen. The report author highlighted that this creates a risk that destination management plans will raise expectations that cannot be delivered through statutory pathways.[75]

While MBIE and tourism sector strategies acknowledge the need for sustainability and better visitor management they maintain a focus on tourism growth. They also remain largely unintegrated with the conservation system, and its purposes and priorities, which may increase complexity rather than improve tourism management overall. There is a need for better connectivity at the tourism-conservation interface.

**Spotlight on the Milford Opportunities Project**[76]

This project arose in response to significant visitor congestion within Milford Sound Piopiotahi and along the access road. Milford Sound is one of Aotearoa New Zealand's most popular visitor attractions, hosting some 870,000 visitors in 2019. It is located in Fiordland National Park and holds UNESCO World Heritage status.

A governance group was set up in 2017 to investigate how Milford Sound and the wider region should be managed for tourism. It included representatives from iwi, Southland District Council, Queenstown Lakes District Council, DOC, New Zealand Transport Agency, MBIE, and two tourism business operators. The governance group was led by independent chair Dr Keith Turner.

The group produced a masterplan for Milford Sound and tourism in the broader area. This sought to embed the role of Ngāi Tahu as mana whenua and Treaty partner as well as te ao Māori; protect the area; provide a world class visitor experience that enhances conservation and community (effectively regenerative tourism); provide effective, efficient, resilient and sustainable infrastructure; and provide benefits to the communities of Te Anau, Southland and Otago.

The masterplan includes several novel visitor management approaches. Control of tourist numbers visiting the Sound is to be achieved through controlling the access road. Zero emission 'hop on hop off' buses are planned to be the main transport on the road, with a park and ride system established. Most international visitors will only get access to Milford Sound via the bus system, with those in campervans only gaining access if they have a booking along the road or at Milford Lodge. Access to the road is to be via a permit system, with permits issued free to New Zealanders and at a charge to international visitors.

A fund is to be set up from the permit fees to enable investment in conservation management, infrastructure and the community. Possible projects to be funded include predator free initiatives, bird recovery, integration of culture and history, and developing tracks and pathways.

A new visitor centre and bus hub in Te Anau are also to be established to enable a stop off point before tourists head to Milford Sound. At the Sound itself, there are plans to prohibit cruise ships from entering the marine area and to remove the airport (which takes up much of the available flat land). An innovative visitor centre is planned to provide a central point for visitors to gather and gain shelter from the weather. This is to be accompanied by a new hotel and staff accommodation.

The masterplan also provides for the development of multiple experiences along the corridor between Te Anau and Milford, including shared walking and cycling trails, and enhanced accommodation. Ngāi Tahu culture and history is to be woven throughout the experience of people and place.

All in all such an integrated master planning exercise has come up with innovative solutions to manage demand in an over-visited site while at the same time enhancing the visitor experience, providing greater opportunities for Māori, and generating additional income for conservation activities. Whether it will be implemented remains to be seen.

The conservation estate is an integral part of Aotearoa New Zealand's tourism industry and, in return, the tourism industry has the potential to contribute positively to conservation outcomes. However this is not currently happening, with tourism not paying its way, and significantly impacting on conservation values in some areas. Below we propose a series of reforms which would help ensure that a sustainable and regenerative tourism model is increasingly adopted and contributes positively to achieving conservation outcomes.

## 7.3 Recommendations for reform

**Recommendations for managing tourism within the conservation system**

1. *Provide a definition of tourism in conservation legislation:* The Conservation Act and National Parks Act should be amended to include a definition of tourism. A simple definition could be "tourism means any commercial activities associated with visitors to conservation areas".

2. *Clarify where tourism sits within the hierarchy of conservation values:* The Conservation Act and National Parks Act need to explicitly provide for a hierarchy of conservation values so it is clear which take precedence when there is a conflict between them. Drawing from the hierarchy articulated in Te Mana o te Wai,[77] conservation legislation could specify a hierarchy where the protection of species, ecosystems and landscapes is ensured first, followed by enabling cultural use and then recreation, after which provision could be made for economic uses such as tourism.

3. *Develop new General Policies which explicitly address the interface between tourism and conservation:* Such direction could usefully encourage sustainable and regenerative tourism and identify ways in which tourism operators will be expected to make a positive contribution to conservation outcomes. It could also provide guidance for engaging tourism operators and their customers in conservation activities such as pest and weed control, replanting, and hut and track maintenance. Such matters could be further fleshed out in CMSs and NPMPs for particular places.

4. *Provide a statutory link between destination management plans and CMSs:* Destination management plans are currently non-statutory documents so it is difficult to create a formal linkage between them and the conservation management system. However, it will be important that DOC is actively engaged in the development of these plans to ensure they take full account of the interface between tourism and conservation areas in each region. The Conservation Act could provide that, when developing CMSs and NPMPs, other documents including destination management plans, are taken into account. However, care will need to be taken to ensure that the tail is not wagging the dog so to speak, in that destination management plans, which are largely written from the perspective of tourism, do not drive conservation management planning.

5. *Make CMSs and NPMPs clearer and more directive:* As recommended in EDS's conservation management planning report,[78] clear and directive rules in CMSs and NPMPs which are developed with iwi and after wide public consultation, would make the concessions process more predictable and robust. Such rules could set clear limits and targets to ensure that tourism does not cumulatively degrade conservation values.

6. *Provide more robust criteria in legislation for the consideration of concession applications:* Currently the criteria to be applied under the Conservation Act, when considering concession applications under section 17U, are very wide and largely effects based. These should be amended to include requiring applicants to demonstrate positive benefits for conservation. They should also ensure that the aspirations of iwi and hapū are considered and provided for to the extent possible.

7. *Provide a fit for purpose legal framework for allocation of tourism opportunities: S*uch a framework should address any priority to be given to iwi and hapū and to applicants who can demonstrate positive conservation outcomes. It should provide for a range of allocation mechanisms such as first in, first served, financial tendering, weighted attribute tendering (where a range of weighted criteria are considered), auctioning and balloting. This could draw on the approach taken to allocating coastal marine space for aquaculture under the RMA.[79]

8. *Provide a statutory framework for concessions which requires a fair market return:* Many commentators, including the Parliamentary Commissioner for the Environment and Tourism Task Force, have concluded that DOC has been undercharging for access to conservation areas. This is of concern given the current paucity of funding for conservation activities. The Conservation Act should provide a framework for the fair pricing of commercial access to conservation areas.

9. *Provide a legislative framework for regular monitoring and reporting on tourism impacts:* Neither the Conservation Act nor the National Parks Act provide an obligation for monitoring and reporting, or a framework under which it can occur. Regular monitoring and reporting is important to ensure that the overall impacts of tourism on the conservation estate are regularly measured and communicated to the public. The statutes should be amended to place a positive obligation on DOC to regularly monitor and report on such matters.

9. *Provide DOC with new statutory tools for demand management:* As recommended by the Parliamentary Commissioner for the Environment, the requirement to provide free public access to national parks needs to be more nuanced and DOC needs to be given an explicit ability to restrict numbers in places where there is overcrowding and/or a degradation of conservation values.

*Tourism management at Aoraki Mount Cook National Park has been a challenge for DOC with the park receiving more than a million visitors in 2019*

**Endnotes**

1 Section 6(e), Conservation Act 1980

2 See definition of "recreation" in https://dictionary.cambridge.org/dictionary/english/recreation

3 https://www.unwto.org/glossary-tourism-terms

4 StatsNZ, 2019, *Tourism satellite account 2019: The contribution made by tourism to the New Zealand economy*, New Zealand Government, Wellington, 6

5 https://www.mbie.govt.nz/about/news/new-tourism-data-shows-continued-recovery

6 Department of Conservation, 2019, *DOC Visitor sites data to 28 February 2019*, Department of Conservation, Wellington

7 Department of Conservation, 2021, *Journey to the Heritage and visitor strategy, He haerenga ki to rautaki taonga tuku iho, manuhiri tūārangi hoki*, Department of Conservation, Wellington, 17 and 28

8 Williams D, 2023, 'Crisis-hit Conservation Dept considers closures, offloads', *Newsroom*, 2 May

9 https://www.doc.govt.nz/about-us/our-role/managing-conservation/recreation-management/visitor-research/annual-visitor-reports/

10 https://figure.nz/chart/3wdeCHBIP84nSEp7

11 Department of Conservation, 2021, *Journey to the heritage and visitor strategy, He haerenga ki to rautaki taonga tuku iho, manuhiri tūārangi hoki*, Department of Conservation, Wellington, 32

12 Peart R and C Woodhouse, 2020, *Tourism and landscape protection*, Environmental Defence Society, Auckland

13 Parliamentary Commissioner for the Environment, 2019, *Pristine, popular… imperilled? The environmental consequences of projected tourism growth,* Parliamentary Commissioner for the Environment, Wellington, 58

14 Department of Conservation, 2006, *Tongariro National Park Management Plan 2006–2016: Te Kaupapa Whakahaere mo Te Papa Rēhia o Tongariro*

15 Tongariro-Taupo Conservation Board, 2021, *Tongariro-Taupo Conservation Board annual report 2020/2021*, Department of Conservation, Taupo, 4

16 Tongariro-Taupo Conservation Board, 2020, *Tongariro-Taupo Conservation Board annual report 2019/2020*, Department of Conservation, Taupo, 4

17 Tongariro-Taupo Conservation Board, 2021, *Tongariro-Taupo Conservation Board annual report 2020/2021*, Department of Conservation, Taupo, 4

18 Parliamentary Commissioner for the Environment, 2019, *Pristine, popular…imperilled? The environmental consequences of projected tourism growth*, Parliamentary Commissioner for the Environment, Wellington

19 Ibid at 51

20 Parliamentary Commissioner for the Environment, 2021, *Not 100% but four steps closer to sustainable tourism*, Parliamentary Commissioner for the Environment, Wellington

21 Ibid at 63

22 Ibid at 82

23 Ibid at 64

24 Ibid at 88

25 Koolen-Bourke D and R Peart, 2021, *Conserving nature: Conservation reform issues paper*, Environmental Defence Society, Auckland

26 Section 4(2)(e), National Parks Act 1980

27 Section 6(e), Conservation Act 1987

28 Section 2, Conservation Act 1987

29 Section 6P(2)(b), Conservation Act 1987

30 Sections 17D(1) and 17E(1), Conservation Act 1987

31 Policy 9.1(d), Conservation General Policy

32 Policy 9(1)9e), Conservation General Policy

33 Section 17U(4) of the Conservation Act states that the Minister "shall not" grant any application for a concession if these criteria are not met

34 Policy 11.1(b), Conservation General Policy

35 Policy 11.1(c), Conservation General Policy

36 Policy 10(1)9(c), General Policy for National Parks

37 Policy 10.1(d), General Policy for National Parks

38 Policy 10.4(a), General Policy for National Parks

39 Policy 10.5, General Policy for National Parks

40 Policy 10.6(a), General Policy for National Parks

41 Department of Conservation, 2010, *West Coast conservation management strategy 2010 – 2020,* Volume 1, 11

42 Ibid at 113

43 Ibid at 117

44 Ibid at 120

45 Ibid at 123

46 Ibid at 125

47 Ibid at 126

48 Carroll J, 2018, 'Helicopter noise at Franz Josef called 'elder abuse' as spotlight thrown on enforcement', *Stuff Media* (20 July 2018)

49 Department of Conservation, 2019, *Conservation management strategy: Wellington 2019,* Volume 1, 16

50 Ibid at 20-23

51 Ibid at 38

52 Ibid at 41

53 Department of Conservation, 2011, *Destination management framework: A new approach to managing destinations*, Department of Conservation, Wellington

54 Ibid at 2

55 Ibid at 9

56 Ibid at 13

57 Department of Conservation, 2021, *Heritage and visitor strategy, He rautaki taonga tuku iho, manuhiri tūārangi hoki*, Department of Conservation, Wellington, 17

58 Ibid at 18

59 Ibid at 24

60 Department of Conservation, 2022, *Annual report for the year ended 30 June 2022*, Department of Conservation, Wellington, 37

61 Ministry of Business, Innovation and Employment and Department of Conservation, 2019, *New Zealand-Aotearoa government tourism strategy*, New Zealand Government, Wellington, 5-6

62 Ibid at 11

63 Ibid at 13

64 Tourism Industry Aotearoa, 2019, *Tourism 2025 and beyond: A sustainable growth framework*, Tourism Industry Aotearoa, Wellington, 20

65 Tourism Futures Taskforce, 2020, *Tourism Futures Taskforce interim report: We are Aotearoa,* Tourism Futures Taskforce, Wellington, 4

66 https://www.mbie.govt.nz/dmsdocument/13589-appendix-a-invitation-to-contribute-summary-of-submissions-report

67 https://www.doc.govt.nz/about-us/statutory-and-advisory-bodies/nz-conservation-authority/submissions/submission-on-the-future-of-tourism/

68 Tourism Futures Taskforce, 2020, *Tourism Futures Taskforce interim report: We are Aotearoa,* Tourism Futures Taskforce, Wellington

69 Ibid at 45

70 Ibid at 62

71 https://www.mbie.govt.nz/immigration-and-tourism/tourism/tourism-recovery/tourism-communities-support-recovery-and-re-set-plan/

72 https://www.mbie.govt.nz/assets/tourism-itp-environment-scope-october-2022.pdf, 1

73 https://www.mbie.govt.nz/assets/tourism-itp-environment-scope-october-2022.pdf, 1

74 Ministry of Business, Innovation and Employment, 2023, *Draft tourism environment action plan: Tourism industry transformation plan*, Ministry of Business, Innovation and Employment, Wellington

75 Taylor S, 2021, *Overview of how destination management planning and statutory planning work together*, New Zealand Conservation Authority Meeting No 179, Agenda item 179.15, 17-18 June

76 Stantec and Boffa Miskell, 2021, *Milford opportunities project: A masterplan for Milford Sound Piopiotahi and the journey* (2 May 2021)

77 This ensures that the health and well-being of the water is protected and human health needs are provided for before enabling other uses of water, see https://www.horizons.govt.nz/HRC/media/Media/Te-Mana-o-te-Wai-Factsheet.pdf

78 Koolen-Bourke D, R Peart, B Wilde and T Turner, 2023, *Independent review of the conservation management planning system*, Environmental Defence Society, Auckland

79 See https://www.mpi.govt.nz/dmsdocument/15949-Aquaculture-legislative-reforms-2011-Technical-Guidance-note-5-Mechanisms-for-managing-allocation-of-coastal-space-

# PART 4
## Core areas of reform

In this Part of the report we focus on four core areas which will need to be considered in any conservation reform process. Chapter 8 considers the institutional landscape for conservation management, Chapter 9 focuses on reform of the Wildlife Act and summarises the findings of the recent EDS review of that Act; Chapter 10 focuses on reform of the conservation management planning system and summarises EDS's recent independent review of that system; and Chapter 11 reviews the funding options for conservation.

*A group exploring Tiritiri Matangi Island, a scientific reserve*

*A visitor to Abel Tasman National Park*

# 8 Conservation institutions

*Group arriving at DOC hut in South Westland*

It is clear from the preceding chapters that providing for proper inclusion of Māori in the conservation system, navigating the complex management responses required to address issues such as climate change and introduced species, and shifting settings towards a more integrated and responsive regime, will require institutional reformation.

When considering what form conservation institutions might take it is important to keep in mind some key matters. First is the fundamental importance of adopting a robust, evidence-based approach within the conservation system. Our formulation of options for institutional reform therefore consider how the level of expertise within the system, including scientific and technical support, might be strengthened. This is important to ensure system effectiveness (eg that the approaches and solutions crafted will work) as well as to help provide an objective starting point when seeking to align diverse voices within the conservation system.

Secondly, when designing institutions, it is important to acknowledge the special role and relationship of indigenous peoples to their traditional lands and taonga and tribal authority (rangatiratanga). This may include co-management and joint decision-making with mana whenua at place and/or devolved management to iwi authorities.

Thirdly, it is important that conservation institutions operate in the public interest, and for the public good, as well as responding to the specific concerns of stakeholders. Institutions need to adopt an inclusive and collaborative approach and incorporate a diversity of values and perspectives.

Fourthly, is the need for greater accountability and transparency within the system. Interviewees variously articulated this as the need for a "more open and transparent framework", for the roles and functions of institutions to be more clearly delineated and their performance regularly checked, and for the basis of planning, management and concession decisions to be more visible.

Fifthly, there is a need to better resource conservation institutions to reflect the true cost (and value) of the tasks they are expected to undertake.

To better understand the purpose, roles and functions of our core conservation entities we examine the historical roots and rationale for their establishment, and some of the changes in settings that have occurred over time, before exploring options for reform.

## 8.1 Department of Conservation's structure

Like all areas of government work, conservation requires a national coordinating agency, and this role is currently performed by DOC. The core work of all government agencies is to administer their assigned legislation, develop high level national policy, and provide expert advice to the relevant Minister. Some agencies, such as DOC, also have a more direct managerial and policy implementation role. Notably, the first DOC function

listed under section 6 of the Conservation Act is to "manage". In addition, DOC is to "advocate" for conservation and to "promote the benefits" of conservation "to present and future generations".[1]

Overall, this means that DOC has strong management and advocacy functions on top of the usual administrative, policy and expert advisory roles that government departments perform. However, the enormity of DOC's management task, which encompasses some third of the country's land area, has arguably come at the cost of its other functions resulting in:

- A lag in policy development
- A failure of DOC to maintain system currency
- Systemic delays in the management planning system
- An undermining of the Department's statutory advocacy role.

This has meant that the question of how best to configure DOC has been a matter of ongoing debate. These debates have traversed how the various functions (including decision-making roles) within the conservation system should be split between DOC, Conservation Boards and the NZCA, and the extent to which DOC's functions should be centralised or regionalised around the country.

### *8.1.1 Structural evolution*

After its establishment, in 1987, DOC operated under a 'conservancy model' where it regionalised many functions including core planning and managerial roles. In 2013, a drive to improve efficiency and cut costs saw the network of 11 regional conservancies reduced to just six operations offices. It also saw a reduction in managerial, legal services, planning, science and technical advice at the regional level in favour of a more centralised approach.[2]

The NZCA warned at the time "that the separation of those who plan, strategise, integrate and build partnerships from those who know the lie of the land" was inadvisable.[3] It emphasised that significant institutional knowledge, core competencies and expertise held in the regions would be lost, and that cutting regional management accountabilities would undermine an integrated approach since they were "the glue that provides organisational cohesion".[4]

Iwi groups also spoke out against the change which they saw as being an abandonment of a partnership approach.[5] Even the Public Services Association warned against the restructure and the effects it would have on the capacity and functionality of area offices.[6] Subsequent surveys and reviews of the changes found they had reduced role clarity and leadership at the front line. The overwhelming majority of staff considered the changes made DOC less, not more, efficient.[7] The 2013 review of Conservation Boards also noted that DOC's new operational boundaries were "too large to be adopted by Conservation Boards" and undermined community links.[8]

The number of DOC operational offices has since been increased back up to 10, just one short of the number that operated during the conservancy era. Although this has improved DOC's capacity in the regions, it has not resolved other problems (such as inertia in the conservation management planning system). This may be, in part, because higher-level management roles and significant expertise (scientific, planning and legal) remain centralised.

At the time of writing, the Department was in the midst of an internal 're-set' including establishing a new Office of Regulatory Services and development of a new regulatory strategy to support its work.[9] A deputy director-general level governance group was established to better integrate National Operations and Regulatory Services within DOC's operations groups.[10] However, these changes do not resolve the structural problems described below, and with a recent change of government it is unclear whether this work will now proceed.

### *8.1.2 Lack of boundary alignment*

There is currently a lack of alignment between DOC's operational boundaries and other elements of the system that manage conservation and biodiversity more broadly. For a start, DOC regional offices are not aligned with the boundaries of the CMSs they are tasked with implementing.[11] Nor do they align with the boundaries of the 15 regionally-based Conservation Boards (which are largely aligned with CMSs) that need to be supported by those offices, or with the 12 Fish and Game Councils that undertake an array of conservation management functions at place.[12] There is also a lack of alignment with the resource management system, with the boundaries of conservation entities differing from those of regional councils. Further, none of these boundaries are reflective of the traditional rohe of iwi and hapū.

In short, although the prime function of DOC is to manage areas for conservation purposes, the Department is not configured in a way that enables it to do so, and in particular to implement its own planning documents at place. DOC's recent internal review of the conservation management planning system identified that it does not currently have "a clear understanding of the purpose of management planning".[13] The disconnect between DOC management (which is largely centralised) and DOC operations (which are largely regionalised), the lack of alignment between DOC operations and delivery of CMS objectives, and the lack of connection between DOC offices and Conservation Boards, is likely a key contributing factor to this.

The boundaries of the conservation management planning system are also not configured to align with local government planning boundaries. Doing so would help join up planning frameworks as well as environmental monitoring and data sharing networks. It would also better facilitate DOC's conservation advocacy function and input into RMA decision-making. In addition, such boundary consistency would enable planning documents to more easily 'talk to each other' so that policies and objectives across both systems could be better aligned. For example, it could help inform the identification of priority areas for purchase, reclassification of land, pest management and restoration work.

### *8.1.3 Lack of presence at place*

Many of the interviewees we spoke to considered that problems with the conservation system, especially in relation to planning and Tiriti relationships, were exacerbated by a lack of expertise and leadership at place. In their view, DOC's current configuration does not enable it to sufficiently value place or local knowledge. This is a particular problem when it comes to strengthening Treaty partnerships. A more biocultural approach, that empowers joint decision-making and is more inclusive of iwi and hapū, requires a greater presence at place.

An increase in DOC management and expertise at the regional level, would enable better provision of expert advice and support services to iwi and hapū, and Conservation Boards. It would foster more linked up monitoring and data collection, better incorporation of local knowledge (including mātauranga Māori) into planning, and better support for iwi and community conservation initiatives. Adoption of a more evidence-informed and inclusive approach, that harnesses the knowledge and involvement of local communities, will require greater capacity and expertise (managerial, scientific, mātauranga, planning and legal) at place.

### *8.1.4 Recommendations for reform*

**Recommendations for strengthening DOC's structure to better support the conservation system**

1. *Align planning and management boundaries*: The boundaries of DOC offices should be aligned with Conservation Boards and conservation management planning documents. In addition, the boundaries of the conservation and resource management systems should be gradually aligned, as conservation planning documents come up review, to enable better integration between both systems.

2. *Produce regionally-relevant information*: Monitoring and information systems should be configured to deliver data and information at the regional scale to inform management planning and implementation.

3. *Strengthen DOC's technical, scientific, legal and planning capacity at the regional level*: This is required to better support conservation management planning and implementation; better interface with the resource management planning and consents system; and to more strongly assist the work of Conservation Boards, iwi and hapū, and community conservation groups.

4. *Strengthen DOC regional office decision-making*: Regional offices should have greater delegated decision-making power, overseen by a new Regional Manager role, to enable them to perform a stronger regional leadership role and better collaborate with iwi, hapū and the local community.

5. *Strengthen the checks and balances on the performance of DOC regional offices*: This is important if the offices are to have more delegated power and should include:

    a) Providing clearer statutory direction as to the purposes, priorities and core objectives of the conservation (and conservation management planning) system

    b) Providing clearer, more directive (and less discretionary) national policy

    c) Requiring regional (CMS boundary) focused reporting

    d) Providing clear lines of accountability and mechanisms for Regional Managers to escalate complex matters to more senior staff.

## 8.2 New Zealand Conservation Authority

A central pillar of the conservation system is the NZCA. The modern iteration of the Authority was put in place in 1990 when the Conservation Law Reform Act was promulgated. The NZCA is a core planning entity within the conservation management planning system, a provider of policy and nature conservation advice, an oversight agency and an independent conservation advocate. It also has broad publicity and education related roles.[14]

### *8.2.1 History of the NZCA*

The NZCA's functions were drawn from two different entities: the National Parks and Reserves Authority, which had a range of policy and management planning functions under the National Parks Act; and the Nature Conservation Council, which had a strong oversight and expert advisory role under the Nature Conservation Council Act 1962.

Figure 8.1 tracks the historical pathways of the NZCA's functions and powers today. It highlights that the NZCA has a wide ranging role extending across several statutes and the broader management planning system. When the national conservation management planning regime was established under Part 3A of the Conservation Act, in 1990, many of the National Parks and Reserve Authority's traditional policy and planning related functions were incorporated into the new regime. However, some powers were weakened. For example, while the National Parks Act provides for the NZCA to prepare and approve statements of General Policy for National Parks, the NZCA is only consulted in relation to the preparation of the Conservation General Policy under the Conservation Act, with the Minister having final approval.[15] The stronger role of the NZCA under the National Parks Act is explained by its historical connection to the former National Parks and Reserves Authority.

The NZCA also gained some functions more closely connected to those of the Nature Conservation Council which had a range of expert advisory, conservation advocacy and investigatory powers under the Nature Conservation Council Act 1962. The Council had been formed as an additional system check on development on conservation land in the wake of large government development projects, particularly the Manapōuri dam.[16] The Council was an expert advisory body which provided scientific and technical advice and could undertake inquiries. It was also a central coordinating body for obtaining views from a wide range of persons and organisations interested in nature conservation.

The NZCA's advocacy, investigative and educational roles under the Conservation Act attempted to fill the gap created when the Nature Conservation Council was disbanded in 1990. However, the NZCA only inherited a very weakened form of these functions, with most of the specialist scientific advisory functions and more serious investigatory powers being removed. For example, the Nature Conservation Council had a broad mandate to investigate any nature conservation matter, including inquiring into the effects of public works and mining. It could compel Departments to produce information and even launch official Commissions of Inquiry.[17] In this regard it was an early form of an environmental ombudsman.

*Aoraki Mount Cook National Park. The NZCA approves statements of General Policy for National Parks*

| National Parks and Reserves Authority[18] | New Zealand Conservation Authority |
|---|---|
| Prepare and approve statements of general policy for national parks | **Retained**: s18(a), National Parks Act 1980<br>**Extended but reduced** role to also "advising" on statements of General Policy under the Conservation Act |
| Approve management plans for national parks and changes and reviews of these plans | **Retained:** s18(b), National Parks Act 1980<br>**Extended**: s6B(1)(b), Conservation Act 1987 to "approving" conservation management strategies and plans |
| Advise the Minister and Director-General on priorities for the expenditure of money appropriated for the purposes of the National Parks Act | **Retained:** s18(c), National Parks Act 1980<br>**Extended**: s6B(1)(h), Conservation Act advising on priorities for annual expenditure |
| Review and report on the effectiveness of the administration of general policies for national parks | **Retained:** s18(d), National Parks Act 1980<br>**Extended**: s6B(1)(c), Conservation Act 1987 to reviewing and reporting on the effectiveness of the administration of General Policies more broadly |
| Make proposals for the addition of lands to national parks and the establishment of new national parks | **Retained**: s18(e), National Parks Act 1980 |
| Exercise various powers under s9 of the Reserves Act | **Retained**: s9(3), Reserves Act enables Minister to appoint the NZCA as a committee with powers and functions under the Reserves Act |
| Advise the Minister on any matter relating to any national park | **Retained**: s18(g), National Parks Act 1980 |
| Release to the public recommendations, reports or advice provided to the Minister or Director-General | **Retained**: s6C(2)(b), Conservation Act 1987 |
| Make an annual report to the Minister on the exercise of its powers and functions. | **Retained**: s6E, Conservation Act 1987 |
| **Nature Conservation Council[19]** | |
| Act as "a central body for obtaining and coordinating the views of organisations, bodies and persons interested in nature conservation" | **Removed** |
| Provide the Minister with advice on the scientific and technical aspects of nature conservation | **Removed** |
| Inquire into the "effects of any proposed public works" on places of scenic, scientific, recreational or "any aspect of nature conservation" and make recommendations to the Minister | **Removed** |
| On request of the Minister, report on the effects of mining over land in national parks or scenic reserves | **Adjusted:** s18A, National Parks Act 1980 Minister to consult NZCA on notices requesting access under the Crown Minerals Act 1991 |

| | |
|---|---|
| In consultation, draw up and recommend to the Minister "a national policy for conservation of nature" and recommend changes to that document | **Reduced role:** s6B(1)(a), Conservation Act 1987 NZCA to provide advice on statements of General Policy. Role altered to advisory function only with DOC initiating and drafting policy |
| Power to inquire into and make reports and investigations on scientific and technical aspects of nature conservation | **Removed** |
| Power to hold inquiries on nature conservation matters of national importance | **Retained**: s6B(1)(d), Conservation Act 1987 |
| Advise the Minister on the reservation of sites and protection of plant and animal species of special scenic, scientific, educational or recreational interest. This could encompass introduced species but not "noxious animals" | **Reduced role**: s6B(1)(e), Conservation Act 1987 NZCA may still consider and make proposals for the change of status or classification of areas but only where these are of "national and international importance". No specific role prescribed in relation to wildlife |
| Encourage and participate in educational and publicity activities to bring about better understanding of nature conservation | **Retained**: s6B(g), Conservation Act 1987 |
| Receive representations from organisations and government departments concerned with nature conservation | **Removed** as a specific function but not prohibited |
| Encourage nature conservation surveys and research | |
| Become a member or affiliate of any international body concerned with nature conservation | **Removed** |
| Examine technical implications of legislative proposals affecting nature conservation referred to it by the Minister | **Removed** |
| Publish any recommendation, report or observations on "any matter considered by it" so long as these were first conveyed in writing to the Minister | **Adjusted:** Reduced role to only investigate and report on matters of "national importance" to the Minister and Director-General. But these reports may be released, see s6C(2)(b), Conservation Act 1987 |
| May act as a Commission of Inquiry with consent of Minister | **Removed** |
| Government departments to provide information and assistance as required by the Council to carry out its functions | **Removed** |
| To be appointed a Secretary and such other officers and employees as "necessary for the efficient carrying out of the functions of the Council" | **Adjusted and weakened:** Section 6J, Conservation Act DOC required to service the NZCA in "such a manner as the Minister may from time to time direct" |
| To prepare and submit an annual report | **Retained** |

**Figure 8.1: Powers and functions of the NZCA and its historical counterparts**

The establishment of DOC, with a clear conservation advocacy function, was seen as making many of the functions of the Nature Conservation Council obsolete. It was also argued that the NZCA could largely fulfil the oversight function through a general power to investigate matters of national importance.[20] The disestablishment of the Nature Conservation Council, and the amalgamation of its functions across DOC, the NZCA and Conservation Boards, was also seen as a cost saving 'efficiency' measure.[21]

A number of Members of Parliament lamented the loss of the Council, because of the high level expert advice it provided, its independent advocacy, and due to it being "such an effective body" and "safeguard of the environment".[22] Interestingly, the reason credited for its effectiveness was its true independence from the Minister and relevant government department.[23] Information could not be withheld from the Council, and it had its own independent staff. As at 31 July 1980, this included "nine full-time staff including four field advisory officers and an executive officer who also engage[d] in fieldwork."[24] There were warnings at the time that the NZCA had not been provided with sufficient independence to be as effective.[25]

### *8.2.2 Unclear purpose and functions*

Our interviews indicated that there is some confusion about the role of the NZCA and lack of clarity as to whether it is an expert advisory body or stakeholder group. The statutory direction is for the Minister to make appointments having regard to the "interests of conservation, natural and earth sciences and recreation", but the Conservation Act also provides for membership appointments after consultation with the Minister of Tourism and Minister of Local Government. This provides a confusing starting point (see Figure 8.2 which also contrasts the approach with the former authorities).

***Ancient kahikatea swamp forest in the Ship Creek area, South Westland*** (Neil Silverwood)

| Membership criteria | | |
|---|---|---|
| **NZCA** | **National Parks and Reserves Authority** | **Nature Conservation Council** |
| 2 persons appointed after consultation with the Minister of Tourism | Three persons appointed by the Minister after consultation with the Minister of Tourism and the Minister of Local Government | 5 – 7 members appointed by the Governor-General on the recommendation of the Minister of Lands<br><br>Requirement that the Minister be of the opinion they "are possessed of special knowledge, scientific qualifications or interest in matters connected with nature conservation"<br><br>"Nature conservation" defined as "the preservation of the native flora and fauna and natural features and natural beauty of New Zealand" |
| 1 person appointed after consultation with the Minister of Local Government | | |
| 1 person appointed on the recommendation of the Royal Society of New Zealand | 1 person appointed on the recommendation of the Royal Society of New Zealand | |
| 1 person appointed on the recommendation of the Royal Forest and Bird Protection Society of New Zealand | 1 person appointed on the recommendation of the Royal Forest and Bird Protection Society of New Zealand | |
| 1 person appointed on the recommendation of the Federated Mountain Clubs of New Zealand | 1 person appointed on the recommendation of the Federated Mountain Clubs of New Zealand | |
| 4 persons appointed from nominations following public notice | 4 persons "having special knowledge of or interest in matters connected with the policy for and management of national parks and reserves" or "matters connected with wildlife" following public notice | |
| 2 persons appointed after consultation with the Minister of Māori Affairs | | |
| 1 person nominated by Te Rūnanga o Ngāi Tahu | | |

**Figure 8.2: Membership of the NZCA contrasted with that of the former National Parks and Reserves Authority and Nature Conservation Council**

It is clear that the current model is based on stakeholder representation with the interests of tourism, recreation, local government and Māori all included. This basic structure was inherited from the National Parks and Reserves Authority with three important alterations. The addition of two persons appointed after consultation with the Minister for Māori Affairs was added in 1990 followed by representation for Ngāi Tahu through section 6 of Te Runanga o Ngai Tahu Act in 1996. These positions help fill the historical gap in providing for Māori voices.

The four positions drawn from nominations through a public notification process have gone through an interesting historical adjustment. Prior to the Conservation Law Reform Act, the Minister had to select these positions based on the candidates' "special knowledge of or interest in matters connected with the policy for and management of national parks and reserves" or "matters connected with wildlife".[26] The decision was made in 1990 to make these positions more general rather than knowledge or expertise based.

The original bill directed the Minister to have regard to the interests of conservation, natural and earth sciences, recreation and the particular relationship with Māori, however this was removed at some point. The *Hansard* records that the wording for the four public member positions was contentious and there had been debate over "undue weighting to Māori interests" and the need to provide for the interests of local communities.[27] Removal of the direction for membership based on

knowledge, rather than interests, took the membership of the NZCA a step closer to a stakeholder based model.

What these historical alterations have meant is that, although the NZCA inherited some of the expert advisory, advocacy and investigatory functions of the Nature Conservation Council, it has a differently composed membership to deliver them. The appropriateness of tasking an entity comprised of stakeholders, with system oversight as well as approval of NPMPs and CMSs, was an issue raised by a number of interviewees.

**Spotlight on appointments based on 'interests' versus 'knowledge' or 'expertise'**

A number of interviewees raised concern at the level of stakeholder influence within the conservation system. They took issue with current statutory direction for appointments to Conservation Boards and the NZCA to be made having regard to specified "interests".[28] In response, others pointed out that, in practice, appointments to both bodies are primarily based on knowledge, skills and expertise. They therefore considered it unfair to characterise these entities as 'stakeholder based'.

If appointments are already based on knowledge, skills and expertise, then amending the legislation to more clearly state this, could add valuable clarity and help improve trust. This will be important if the functions and powers of the NZCA (along with Conservation Boards) are to be expanded (as recommended in this report).

The extent to which current NZCA statutory powers and functions have been exercised is reported on each year in the NZCA annual reports (see Figure 8.3). This indicates that some functions have been regularly exercised whereas others have languished. In particular, between 2017 and 2022:

(a) The NZCA had not reviewed or reported on the effectiveness of DOC's administration of the General Policies under either section 18(d) of the National Parks Act or s6B(c) of the Conservation Act.

(b) The NZCA had been active in conservation management planning through its statutory role in reviewing and amending NPMPs and CMSs and approving them. However, it has no powers to force plan reviews and it is not involved in DOC's prioritisation of plans and strategies for review.[29]

(c) The NZCS appeared to only sporadically advise on matters relating to national parks, likely reflective of the decreased focus on national parks within the conservation system.

(d) The NZCA regularly used its functions to consider proposals for additions to national parks (under s6B(e) of the Conservation Act) and to consider and propose changes to the status or classification of areas of national or international importance.

(e) The NZCA frequently investigated matters of national importance and undertook advocacy in public fora and statutory planning processes. It also regularly released information and advice and established committees to progress work on specific issues.

(f) The NZCA did not appear to exercise its function of encouraging and participating in educational and publicity activities for nature conservation.

Of the NZCA's core functions, many interviewees highlighted oversight as being the most important, and thought this function should be strengthened. Some DOC staff we spoke to disagreed on this point, considering there was no longer a need for an independent oversight entity, given the Department's clear conservation advocacy role. However, as noted previously, DOC's "conservation" advocacy role is impeded by the broad definition of conservation and is not specifically orientated towards "nature conservation". Also, as documented in the *Conserving Nature* report, environmental NGOs have often successfully challenged DOC's statutory compliance, demonstrating the value of an independent system check.[30]

Interviewees also raised concerns about the NZCA's lack of connectivity with the plan preparation and submission process in light of its final approval role. The 2013 review of Conservation Boards identified this as an "unusual constitutional arrangement".[31] DOC staff endeavour to keep the NZCA abreast of issues traversed in plan development and review, but such a process is not formally set out in the Conservation Act, and constitutes an informal 'work around'.

| NZCA functions and powers under legislation | 2022 | 2021 | 2020 | 2019 | 2018 | 2017 |
|---|---|---|---|---|---|---|
| **Conservation Act** | | | | | | |
| s6B(a) Advise the Minister on Statements of General Policy | N | N | N | N | N | N |
| s6B(b)[32] Approve, review and amend CMS and CMP | Y | N | Y | Y | Y | Y |
| s6B(c) Review and report on the effectiveness of DOC administration of General Policies | N | N | N | N | N | N |
| s6B(d) Investigate conservation matters of national importance, advise Minister or Director-General | Y | Y | Y | Y | Y | Y |
| s6B(e) Consider and propose changes to status/classification for areas of national/international importance | Y | Y | Y | Y | Y | Y |
| s6B(g) Encourage and participate in educational and publicity activities for nature conservation | N | N | N | N | Y | N |
| s6B(h)[33] Advise Minister and Director-General annually on priorities for expenditure of monies | Y | Y | Y | N | Y | Y |
| s6B(i) Liaise with Fish and Game | Y | Y | Y | Y | Y | Y |
| s6B(j) Exercise such other powers and functions as delegated by the Minister | N | N | N | N | N | N |
| **Statutory powers (Conservation Act 1987)** | | | | | | |
| s6C(2)(a) Establish committees | Y | Y | Y | Y | Y | Y |
| s6C(2)(b) Release public information, recommendations, advice or reports | Y | Y | Y | Y | Y | Y |
| s6C(2)(c) Advocate the interests of the NZCA in public forum or statutory planning processes | Y | Y | Y | Y | Y | Y |
| **National Parks Act 1980** | | | | | | |
| s18(a) Prepare and approve statements of General Policy for National Parks | N | N | N | N | N | N |
| s18(b) Approve NPMPs and any amendments or reviews of them | Y | N | Y | Y | Y | Y |
| s18(c) Advise on expenditure priorities | N | N | N | N | N | N |
| s18(d) Review and report on the effectiveness of General Policies | N | N | N | N | N | N |
| s18(e) Consider and make proposals for additions to (or new) national parks | Y | Y | Y | Y | Y | Y |
| s18(g) Provide advice on any matter relating to a national park | N | Y | N | N | Y | N |
| s4(2)(b) Make determinations to depart from direction to protect indigenous/exterminate introduced species | N | Y[34] | N | N | N | N |
| s5A(2)(a) Minister to consult NZCA when authorising introduction of biological organisms to a park[35] | Y | Y | Y | Y | N | N |
| s12(1) Minister to consult NZCA when setting "specially protected areas" | Y | Y | Y | Y | Y | |
| s14(1) May recommend to Minister setting aside or revocation of "wilderness areas" | Y | Y | Y | N | N | |
| s15(1) May recommend to Minister setting aside or revocation of "amenities areas" | N | N | N | N | N | |
| s18A Minister to consult NZCA on notices requesting access under Crown Minerals Act | N | N | N | N | N | |
| s44(1) May adopt or amend statements of General Policy for National Parks | N | N | N | N | N | |

**Figure 8.3: Reported NZCA performance of core functions and powers between 2017 and 2022**

### *8.2.3 Dependence on DOC*

Interviewees noted that the NZCA is entirely reliant on DOC in order to undertake most of its functions and in particular to initiate management planning processes. From our discussions with NZCA members, and our review of NZCA meeting minutes, it is clear that the Authority frequently struggles to access information, to get questions answered, or to obtain clarity around DOC's internal decision-making policies and processes. Our review of the conservation management planning system also noted, for example, that although the NZCA provides DOC with strategic advice on priorities for expenditure (under section 6(1)(h) of the Conservation Act), it struggles to gain feedback as to how the advice is considered and what impact if any it has.[36] All this hampers the ability of the NZCA to effectively carry out its oversight role.

Accessing the necessary administrative support has also been an ongoing issue. The NZCA does not have its own independent secretariat and is highly reliant on DOC to provide support. DOC capacity in this area is often lacking. The Authority has frequently raised the issue of inadequate secretarial support with the Minister and Director-General.[37] No true oversight agency can be effective under an arrangement where it is reliant on support from the very agency it is tasked with overseeing.

### *8.2.4 Lack of funding*

It is also clear that the NZCA is severely underfunded. Its budget has not been adjusted significantly for years. The current level of funding is approximately $148,000 per annum, just $3,000 more than it was in 2007/2008. Interviewees underscored that current allocations fail to recognise the value or significant role of the NZCA.

NZCA members sit in a voluntary capacity and are only able to claim meeting fees and travel expenses. The Authority meets bi-monthly so holds six meetings a year. A daily meeting fee of $215 for members and $290 for the Chair was set in 2006 and remained static for more than a decade. It was only adjusted in 2019, to $450 and $700 respectively, although this was not accompanied by any increase in the Authority's overall operating budget.

| | |
|---|---|
| **2007/08** | $145,000 |
| **2009/10** | $137,500 |
| **2011/12** | $145,000 |
| **2013/14** | $146,000 |
| **2015/16** | $146,000 |
| **2017/18** | $146,000 |
| **2019/20** | $146,000 |
| **2021/22** | $148,000 |

**Figure 8.4: NZCA annual funding**

Such a low level of funding impedes the functioning of the NZCA across a wide range of areas, but particularly in its ability to engage expert advice to support advocacy and investigatory functions.

*Tongariro National Park is Aotearoa New Zealand's oldest national park and a UNESCO World Heritage area*

### *8.2.5 Recommendations for reform*

**Recommendations for strengthening the role of the NZCA in the conservation system**

1. *Strengthen the independent oversight functions of the NZCA: This is* to improve independence and enable the Authority to better fulfil its role. It would include restoring some of the historical powers of the former Nature Conservation Council including:

    a) Holding inquiries on nature conservation matters and removing the requirement these must constitute matters of national importance

    b) Acting as a Commission of Inquiry, with consent of the Minister

    c) Requiring government agencies and public bodies to provide such information and assistance as necessary

    d) Notifying such concession applications as the Authority deems appropriate and providing an opportunity to make recommendations on them

    e) Inquiring into and reporting on the effects of public works, mining and development-associated projects on conservation land and making recommendations to the Minister

    f) Consulting on changes to the status and designation of conservation areas, including the disposal and exchange of any conservation land (including stewardship land) and making recommendations

    g) Inquiring into scientific and technical aspects of nature conservation

    h) Identifying areas where additional research is required and encouraging research to support conservation management, including surveys of public opinion

    i) Providing independent expert advice to the Minister as required

    j) Liaising with the proposed Kura Taiao Council (see below)

    k) Providing a central point of contact for Conservation Boards.

2. *Move towards a partnership model:* Shifting the NZCA towards a partnership based model, and strengthening its advisory and oversight role in the area of Te Tiriti compliance, should also be considered (see fuller discussion of this option in section 8.4.1).

3. *Change membership criteria to reflect expert body:* To increase independence, membership appointments to the NZCA could be made by an agency which operates at arms' length from government, such as the Parliamentary Commissioner for the Environment. The membership criteria for appointment should be changed to specify membership based on experience, skills and expertise, including:

    a) Scientific and technical aspects of nature conservation

    b) Law, regulatory governance, monitoring, planning and compliance

    c) Te ao Māori, tikanga and mātauranga Māori

    d) Science communication, nature conservation advocacy and education.

## 8.3 Conservation Boards

One of the core pillars of the current conservation system is the network of regionally based Conservation Boards. These play a key, locally based, conservation advocacy function and a core role within the conservation management planning system.

### *8.3.1 History of Conservation Boards*

The precursors to today's Conservation Boards were a plethora of national park, domain and reserve boards. This was due to the network of conservation parks and reserves developing in an ad hoc way, with early national parks operating under their own legislative framework,[38] and others being added later under the Public Reserves, Domains and National Parks Act 1928 and then the National Parks Act 1952. Historically, national parks had their own governance boards which undertook planning functions and day-to-day operations.[39]

When the National Parks Act was enacted in 1980, there was significant debate over what the core functions and powers of boards should be, and where the authority for policy-making, planning, decision-making and operations should lie. There was also concern that existing boards, particularly national park boards, had become too remote and disconnected from the public at a time when public use of conservation

land was escalating. Boards were often small entities, with as few as five members, and meetings were often held in private.[40]

The National Parks Act 1980 made a number of adjustments. A system of at least 10 national parks and reserves boards was established with each board being allocated a broad jurisdictional area that could include several national parks and reserves.[41] A public nominations process for board membership was put in place, membership was increased to 10, meetings were required to be public, and a public submissions process as part of management planning was proscribed.[42] These measures aimed to improve visibility, openness and the responsiveness of the boards to public interests and concerns.

At the same time, the role of the boards was adjusted away from "detailed day to day management" and administration to the "policy and management-plan level".[43] The boards were to "prepare, review and amend management plans for parks within the[ir] jurisdiction".[44] They were also tasked with receiving and hearing submissions on plans and making final recommendations for approval to the then National Parks and Reserves Authority.[45]

The role of the relevant Department, which at that time was the Department of Lands and Survey, was to implement the plans that had been developed by boards (rather than develop them), with the boards having a statutory role to monitor and report on Departmental compliance with the plans.[46] Today, section 30(1)(d) of the National Parks Act still provides for Conservation Boards to review and report "on the effectiveness of the administration of the general policies for national parks" within their jurisdiction.

The original aim of the reforms was to divest boards of the need to consider trivial operational matters so they could focus their considerable skill and expertise on more important matters.[47] Assurances were given that the Department of Lands and Survey would not "seek to centralise the exercising of responsibilities" delegated to it so that most decision-making could continue to be made "at the park or local level".[48] In addition, it was made clear that "the department will be the servant of the parks and reserves boards, and not the master of those boards".[49]

The next significant institutional change came in 1990 with the Conservation Law Reform Act. This saw core institutional roles and functions of conservation entities reformulated and consolidated under a new Part 2A of the Conservation Act. It was at this point that the system of modern Conservation Boards was established and there are currently 15 Boards. The core components of today's conservation management planning system were also laid out, under Part 3A, prescribing todays system of regional CMSs.

In addition to their functions under the National Parks Act, Conservation Boards were now to have input into a broader range of planning documents and processes. They were also given additional conservation advocacy functions.[50] However, at the same time, their role was subtly narrowed away from the preparation and review of NPMPs, to simply 'recommending' their review or amendment[51] and 'recommending' the approval of CMSs under the Conservation Act. The Director-General was given the key role of preparing draft NPMPs and CMSs "in consultation" with the relevant Conservation Board,[52] as well as notifying the documents and running the public submissions process.[53]

CMPs were also introduced at this time, enabling more detailed plans to be developed in areas where they were considered necessary. The process for developing these parallels that for CMSs with a critical exception that, following revision and amendment by the Director-General, the Conservation Board considers – and has the authority to approve – a CMP.[54]

**Note on national parks**
Despite national parks being widely viewed as the jewels in the conservation 'crown', and places of high public (and tourism) value, NPMPs are not sufficiently prioritised or updated. Removal of a dedicated management agency has reduced the focus on national parks and they are now much less front of mind. Consideration should be given to providing greater oversight of the management of national parks and undertaking specific 'state of park' reporting. Bespoke or dedicated governance arrangements may be needed for such areas. The management and oversight of national parks requires deeper thought and a broader public conversation.

### *8.3.2 Unclear purpose and functions*

The core functions of Conservation Boards, as currently proscribed in legislation, include:[55]

- Recommending the review, amendment and approval of CMSs by the NZCA;

- Approving CMPs and reviewing and amending these as necessary;

- Advising the NZCA and Director-General on the implementation of CMSs and CMPs in their jurisdictional area;

- Advising the NZCA and Director-General on proposed changes of status or classification of areas of national or international importance and "any other conservation matter relating to any area within the jurisdiction of the Board"; and

- Liaising with Fish and Game on matters in its jurisdictional area.

Under section 6N of the Conservation Act, a Conservation Board also has the power to "advocate its interests at any public forum or in any statutory planning process" and appoint committees and delegate functions to them as necessary. Boards also have "the right to appear before courts and tribunals" and be heard on matters affecting their functions.

It is clear from the above that Conservation Boards are primarily advisory and advocacy bodies. The only arena where they have clear authority, is in the approval of CMPs, but these documents are being withdrawn as a management tool.[56] Despite their relatively limited statutory functions, Conservation Boards have undertaken a wide range of functions, with some of their core roles discussed below.

***Informing and educating***

Conservation Boards are frequently the first point of contact within the conservation system with the community. Board members often hear about local conservation concerns and keep abreast of significant community conservation initiatives. The Boards are important knowledge translators for the general public, providing information and updates on local conservation matters, and communicating (often through their annual reports) the large body of information they receive from DOC. Through doing this, Conservation Boards have become important to iwi and hapū, enabling access to information that is otherwise difficult to obtain. This is just one reason why iwi representation on the Boards is so valued.

**Integrating the system**

Conservation Boards are increasingly becoming involved in advocating complex matters within the resource management system including through becoming a party to legal proceedings. Boards have also initiated legal proceedings themselves.[57] This means they hold knowledge across

*Patea Doubtful Sound in Fiordland National Park*

both the conservation and resource management systems, thereby providing an important point of system integration. They also often have close links to conservation projects and initiatives in their region, enabling them to better understand the full array of conservation work being undertaken, and how it connects to conservation management planning purposes and objectives.

**Concentrating local knowledge and expertise at place**

Conservation Boards bring together and make accessible considerable expertise and place-based knowledge at the regional level. Members often have a deep understanding of the ecology, wildlife, geology and natural resources of the region. Iwi membership on boards has helped to enrich this knowledge base and deepen understanding of landscapes, values and histories.

Although Conservation Boards can perform valuable roles at the regional level, there is a lack of clarity on whether they are primarily a representative body, bringing a range of interest group views into the conservation system, or an expert body, contributing technical expertise. In appointing members, the Minister is to have regard to "the interests" of nature conservation, alongside the interests of other sectors including recreation, tourism, the local community and tangata whenua.[58] The term "interest" muddies the water in terms of role clarity and suggests they are more of a representative body. However, the core functions of Conservation Boards appear more appropriate for an expert advisory body.

Feedback we received from interviewees emphasised that Conservation Board membership often includes stakeholders with very different views and that dispute resolution processes or guidance is required to assist boards to manage internal disagreements.

**Spotlight on the Sanford Principle**

In the United Kingdom, conservation entities operate under what is known as the 'Sanford Principle'. The principle means that when a conflict arises between any purposes, greater weight must be placed on nature conservation and the protection and enhancement of wildlife and cultural heritage.[59] That sentiment is matched in the Conservation Act, in relation to DOC's functions, where recreation and tourism uses must not be "inconsistent with conservation".[60] It would be valuable to articulate this hierarchy of purposes more clearly for other conservation entities, including Conservation Boards.

The role and purpose of Conservation Boards needs greater clarity and refinement. In general, if Board membership is 'interest based', their role needs to be limited to consultation, in order to prevent conflict of interests affecting the conservation management planning system. Conversely, the more expert and knowledge based the role, the more appropriate it is to give Boards active planning, advisory and advocacy functions in the conservation system.

### *8.3.3 Dependence on DOC*

The effect of the 1990 conservation reforms was to further increase the dependence of Conservation Boards on DOC for their ability to function effectively. Boards are now dependent on DOC Operations to implement policy and plans and provide information on progress; and on DOC administrative and technical support to progress management planning processes.[61] For example, until the Department agrees to update a CMS or NPMP, a board is unable to complete its statutory functions of reviewing and amending these documents.

DOC's support role in relation to boards is clear. Section 6V of the Conservation Act directs that "Boards shall be serviced by the Department in such a manner as the Minister may from time to time direct". However, the changes made in 2013 when the conservancy model was abandoned, impede this servicing. They weakened direct links between Boards and their servicing office, and reduced access to critical planning, science and legal expertise, as well as to more senior DOC staff.

A very low level of service is currently provided to each Board via the local DOC Operations Office Statutory Manager and a single "Board Support Officer" who is employed in a part-time capacity (at 0.5FTE). The Conservation Board members we spoke to emphasised that while DOC staff continue to do their best to assist them, structural, capacity and funding constraints impede effective servicing and support. A 2013 review of Conservation Boards noted that members felt increasingly ineffective and undervalued and their interaction with the Department had been slowly diminishing over the years.[62]

At the time of writing DOC was undertaking a Board Servicing Review. This will hopefully address the inadequate support for Conservation Boards and staff capacity allocated to them (see spotlight).[63]

**Spotlight on findings of DOC Board Servicing Review[64]**

DOC's Board Servicing Review is part of a broader Board Improvement Project. A core focus is to understand what DOC's legal obligations are to service the Conservation Boards. Three initial findings have been made to date.

*"Inadequate staff capacity and capability" to service Boards*

The review identified that staff burnout and high staff turnover impedes the work of Boards and the 0.5FTE part-time role of Board Servicing Officers is insufficient. It also noted that officers often work in isolation, sitting in-between DOC and the Board, but outside both. Concerns were also identified around the adequacy of staff capability and skills and the limited investment in renumerating or valuing the support role. Significant gaps can arise when staff leave with the report highlighting that a single Board Operating Officer had been left to cover three boards.

*"Inadequate support and resourcing to Boards to fulfil their functions"*

This was a broad finding that support and resource for Boards is lacking and a number of areas where additional support is required were identified. These included assistance in media and communications, responding to official information requests, technical matters (eg IT advice), security and legal matters. It was recognised that these skills were required to ensure Boards were well placed to provide high quality advice to DOC and the NZCA.

*Board skills and expertise under-utilised*

The review highlighted that Boards were comprised of passionate and often highly skilled individuals but there was a "need to ensure this talent is utilised". The lack of value accorded their advice was a factor impacting on the "health of the relationship" between Boards and DOC, which varies around the country.

### *8.3.4 Lack of funding*

The budgetary allocation for Conservation Boards has always been extremely poor. It does not adequately reflect the value of their role and function in the conservation system, and the skills and expertise of their members. The 2013 review of Conservation Boards underscored the importance of a "realistic operating budget" if they were to reach their potential. It recommended that budgets be developed in consultation with Boards. However, this recommendation has not been implemented.[65]

Figure 8.5 sets out the budgets allocated to the Auckland, Tongariro-Taupo and Southland Conservation Boards for selected dates. It highlights that budgets fluctuate with political cycles going through booms and busts in a similar way to DOC's funding. For example, budgets were cut in 2011 when a new government came into power, and were not restored to previous levels until 2016. They were gradually increased again in 2020/21. They range on average between $25-35,000 per annum which is a tiny budget considering their core role in the conservation system.

| Board | Auckland[66] | Tongariro Taupo[67] | Southland |
|---|---|---|---|
| **2006** | $23,000 | $33,913 | N/A |
| **2008** | $23,000 | $23,387 | $32,000[68] |
| **2011** | $19,500 | $18,000 | N/A |
| **2014** | $19,500 | $18,000 | N/A |
| **2016** | $28,000 | N/A | $26,000[69] |
| **2021** | $35,000 | $27,197 | $34,000 |

**Figure 8.5: Historical budgets for selected Conservation Boards**

In addition to the small amount of funds provided, DOC's budgetary allocation system for Conservation Boards lacks transparency and is poorly understood. Boards have continuously raised concerns about the level of, and rationale for, their budget allocations, as well as the variations in budgets between Boards.[70] A further constraint is that the budget allocations are held by Operations Directors, attached to the local DOC operations office, rather than by the Boards themselves.

The level of renumeration set for Board members also impedes operations. At present, payment to members only covers meeting attendance and expenses, such as travel and accommodation, rather than providing a salary or stipend. In addition, payment is at the low end of the fees paid to public entities (as set out in Cabinet office circular CO(22) 2) with chairs being paid a meeting fee of $330 a day and other members only $250.

The small amount of renumeration privileges those who are more well-resourced and time rich, with implications for the representativeness of Conservation Boards and what voices can participate. It also means that the amount of time individual members can devote to the work of the Board is highly variable, which can create significant imbalances in participation. Members told us that the high workload without sufficient renumeration contributes to role dissatisfaction and burnout. There is high

turnover in membership which in turn impacts on institutional knowledge and stability.

There is no statutory bar to paying Board members more appropriately. Section 6W of the Conservation Act provides not only for allowances and expenses to be covered but also for "members of every Board" to be paid "out of money appropriated by Parliament, renumeration by way of fees, salary or allowances".

### *8.3.5 Recommendations for reform*

**Recommendations for strengthening the role of Conservation Boards in the conservation system**

1. *Clearly articulate the purposes of Conservation Boards:* The Conservation Act should clearly state the purpose of Boards, which is to support the purpose of the broader conservation system, but also to focus on two core aspects:

    a) Nature conservation, including the restoration, enhancement and protection of indigenous biodiversity, and natural and cultural heritage

    b) Enhancing public understanding and awareness of the conservation values in their region and providing opportunities to connect with nature (Papatūānuku).

2. *Increase the functions of Conservation Boards*: Additional functions should include:

    a) Drafting planning documents in *partnership* with DOC and tangata whenua (as well as recommending their approval)

    b) The power to direct DOC to consider reviewing a plan (including undertaking a partial review), in response to new information, with the Department having a duty to provide reasons for its decision in response to the direction

    c) The ability to trigger a formal investigation by the NZCA where DOC fails to comply with the statutory timeframes for review, or comply with the standards and directions set out within planning documents

    d) The power to require DOC to produce documents and information necessary to support a Board's functions (including advice and advocacy), with a duty placed on DOC to provide reasons for withholding information, and the ability of Boards to refer matters to the NZCA for review where necessary

    e) Involvement (in an advisory and consultative capacity) in setting DOC annual priorities for expenditure of money towards plan development and implementation, and annual workplans and budgets, in their region

    f) Undertaking a public education and communication role in relation to their local communities, to foster engagement, participation and understanding of conservation values. They should also receive feedback and advise DOC on local pressures and concerns.

3. *Appoint Conservation Board members based on expertise:* The membership direction for Conservation Boards (under section 6P) should be amended by removing the term "interests" and instead directing appointment having regard to the "skills, knowledge and expertise" of applicants, particularly in relation to:

    a) nature conservation, natural earth and marine sciences including restoration and rewilding;

    b) mātauranga Māori;

    c) environmental and natural resource management;

    d) governance, law, planning and compliance;

    e) social science, education, communication and advocacy; and

    f) depth of knowledge of local landscapes and features of the area administered.

4. *Consult Conservation Boards on new member appointments*: This is in order to identify the skills and knowledge most needed to create an effective Board. This would help ensure gaps in knowledge or expertise are filled. It may be more appropriate for the NZCA to make Board appointments rather than the Minister.

5. *Strengthen servicing of Conservation Boards:* The secretariat and staff support services to Boards should be increased and support staff should have greater capacity, skills and resourcing to undertake their role. Such support should be provided through an independent secretariat (which could manage the budget to service all the Boards and the NZCA) to increase board independence and authority.

6. *Increase funding for Conservation Boards:* Budgets and workplans should be directly negotiated with each Conservation Board and be aligned with the budget and workplan of the regional DOC Operations office. Higher renumeration should be provided to Conservation Board members to better reflect the true value of their work. Consideration could be given to paying a stipend or part-time salary (as opposed to meeting fees), to help broaden membership and better reflect the workload (and expectations) on members, particularly the chair.

## 8.4 Providing for Māori

The area that requires perhaps the most significant institutional innovation within the conservation system is the interface with tangata whenua. The broad direction under section 4 of the Conservation Act to give effect to the principles of Te Tiriti, absent any statutory, institutional or procedural support, has created a significant institutional void in this area.

### *8.4.1 National institutions*

There are several potential institutional models which could better provide for Māori within the conservation system at the national level. As noted by the Options Development Group, partnership needs to operate by default, not by discretion. Institutional innovation could help enable this.[71]

As noted in Chapter 4, the Waitangi Tribunal has recommended the creation of a national *Kura Taiao Council,* in order to formalise the partnership between DOC and iwi. The Council would be responsible for setting Kura Taiao strategies at the national level and these could form part of relevant CMSs and CMPs (and presumably General Policies).[72] The Council would therefore play a key role in developing policies and strategies that guide the overall conservation system.

Exactly what functions, services and roles such an entity should perform requires detailed discussion with iwi and hapū. But a high-level system advocate and coordinator to support co-management at place would be valuable. This could extend to the ability to take complaints and trigger review or reconsideration of decisions, policies and plans. It would be important for Council membership to include expertise in tikanga Māori, Te Tiriti, conservation science, mātauranga Māori, legal compliance, and conservation management and planning.

Such a dedicated statutory structure could facilitate better Crown-Māori dialogue and provide a clear forum where Māori voices could help set the agenda (see spotlight on Kahui Wai Māori). Similar entities have been established in the health-care space (see spotlight on provision for Māori under in the healthcare system).

**Spotlight on Kahui Wai Māori**

In 2022, EDS undertook a review of the process for developing the National Policy Statement for Freshwater Management 2020 under the RMA.[73] That policy workstream had a Māori advisory group, in the form of Kahui Wai Māori, which was able to work through the many complex freshwater management issues that arose through a te ao Māori lens. It meant that conversations could take place in te reo, and that the options and solutions canvassed could be set out in a stand-alone, independent and uncensored report.

The consensus of all those EDS interviewed for that piece of work, was that this enabled greater space to think outside the box, and created a clearer vision (through an elaboration of Te Mana o te Wai) that was central to progressing freshwater matters much further than previous policy iterations. Simply from a perspective of fostering greater cross-cultural understanding, the provision of a separate distinct Māori perspective and voice was powerfully effective.

***Ahuriri River, Mackenzie Basin which is protected by a water conservation order***

**Spotlight on provision for Māori under in the healthcare system**

In 2022, the Pae Ora (Healthy Futures) Act established a Māori Health Authority, the Hauora Māori Advisory Committee and a network of 15 Iwi-Māori Partnership Boards at the regional level. The reforms were driven by the need for more targeted management, design and delivery of health services to Māori as well as to promote Māori health more generally.

The functions of the Māori Health Authority were heavily focused on the commissioning and delivery of services (including direct ownership and operation). In contrast, the role of the Hauora Māori Advisory Committee was to provide advice to the Minister.

The Iwi-Māori Partnership Boards represent Māori perspectives on needs and aspirations at the regional level and input into the design and delivery of services at place.[74] Their core functions include:

- Engagement with whānau and hapū on local health needs and communication of insights and results from their work to Health New Zealand and the Māori Health Authority;
- Evaluation of current state of well-being of Māori in their area;
- Input into and development of relevant plans and monitoring performance at place;
- Engagement with Health New Zealand;
- Locally based reporting on activities and provision for Māori; and
- Nominating members to the Hauora Māori Advisory Committee – a leadership group helping provide advice on the new governance arrangements.

The framework does not prescribe a process for the establishment of the Boards or their membership, rather any organisation that meets the criteria may become recognised as such an entity.[75]

Controversially, the Māori Health Authority (which had been recommended by the Waitangi Tribunal), has been disbanded in fulfilment of pre-election promises.[76] This underscores the importance of securing broad social licence and public understanding of the need for and purposes of any institutional reform.

Conversely, the Hauora Māori Advisory Committee and Iwi-Māori Partnership Boards are being retained, including the ability of the Boards to monitor health service provision. The importance of the role these entities play in driving health targets, and the forum they provide for Māori voices, is broadly acknowledged.[77]

An alternative option to the Kura Taiao Council would be to reconfigure the NZCA towards a partnership-based model and expand its functions into this area. This would comprise a simpler, more integrated and streamlined approach as there would be a single oversight and advisory entity. If this model were adopted, it would be important to ensure the NZCA provided sufficient oversight, advice and input to ensure the conservation system provided for Māori, supported true partnership with tangata whenua and was Tiriti compliant. There is a danger that the focus on delivering for Māori would be weakened if it became one of many functions undertaken by the NZCA that must compete for capacity, expertise and resource.

Institutional innovation will be important to support and enhance Māori involvement in the conservation system at the national level. A new national entity (Kura Taiao Council) could operate as a system integrator, providing expert advice and recommendations to Government and DOC, facilitating information sharing, assisting to address collective concerns and triggering policy reviews. An alternative option would be to reconfigure the NZCA on a partnership model and expand and strengthen its role and oversight functions in this area.

### *8.4.2 Place-based institutions*

As previously traversed, iwi and hapū are connected to place and it is there where core Treaty partnerships reside. Co-management, joint decision-making, delegated management arrangements, specific protocols and place-based objectives all operate at the local level. The conservation system therefore needs to be configured to ensure robust and supported Māori engagement and inclusivity at that level. There are several options for institutional innovation to achieve this.

The Waitangi Tribunal recommended establishment of regionally based *Kura Taiao Boards* to complement the national Kura Taiao Council. The structure of such Boards could be statutorily prescribed, but with flexibility for more bespoke arrangements according to local needs. This would

recognise the significant variability that exists between regions. Over time, the work of such boards could potentially increase collective knowledge and understanding at place.

The Kura Taiao Board approach has the additional value of being able to clearly articulate the distinctive voice of mana whenua (see previous spotlights on Iwi-Māori Partnership Boards and Kahui Wai Māori ). It would not only assist to identify core points of difference (to be resolved) between te ao Māori and te ao Pākēhā, it could also better reflect the diversity of opinion across iwi and hapū, deepening discussions and understanding. Such an approach could also provide a forum for more joined-up and coordinated conservation work between iwi and hapū in the various regions. If this model were to be pursued, the interface between Kura Taiao Boards and Conservation Boards, and tools and arrangements to support such a framework, would require further consideration.

An alternative approach would be to reconfigure Conservation Boards around a partnership-based model. This has already been happening to some extent (see spotlight on Te Hiku o Te Ika Conservation Board). A number of other Conservation Boards also contain iwi members, often due to requirements in Treaty settlements. These could be built on to address the significant gaps that remain, especially for unsettled iwi and hapū. Under this model, decision-making may be less transparent since differing views will be negotiated within the confines of the Conservation Board. It would also limit the number of membership positions available to Māori. A number of interviewees preferred this option, instead of establishing Kura Taiao Boards, out of concern for how the system might struggle to deal with two separate entities where there is conflicting advice.

*Wharenui at Whakarewarewa*

**Spotlight on the Te Hiku o Te Ika Conservation Board model**

The Te Hiku o Te Ika Conservation Board was established in 2015 as a result of four different Te Hiku Treaty settlements.[78] The settlement legislation provides for a new board consisting of eight members (four appointed by the Minister and four appointed by the Minister on the nomination of specified trustees (eg rūnanga)) to be established for the Te Kowowai area thereby implementing a joint partnership approach.

Treaty settlement legislation also set out a bespoke process for developing the Board's CMS (which is a sub-component of the Northland CMS). Public submissions go before a hearings panel comprised of representatives from the Board, Te Hiku o Te Ika iwi and the Director-General. The draft CMS is considered by Te Hiku o Te Ika iwi along with the Minister before a final draft is sent to the NZCA with recommendations for approval. As noted in the Board's most recent annual report, "drafting a CMS is an opportunity to create a model for other unsettled iwi and to also test ways forward on some tricky issues, such as issuing concessions where iwi have an interest."[79]

Reconfiguring Conservation Boards on a partnership model has some merit and is worth exploring with iwi and hapū in more depth. It would represent a 'modified status quo' response and require amendments to conservation management planning processes to properly support it.

Alternatively, a more fully fledged framework of Kura Taiao Boards could be introduced, in line with the recommendations of the Waitangi Tribunal, and be provided with a clear role within the conservation (including management planning) system.

### *8.4.3 Other DOC institutional reforms*

Institutional innovation to enable a stronger partnership-based approach will place much greater demands on DOC in terms of cultural competencies and the ability to support new structures and processes. This means DOC needs to consider additional changes that would help strengthen cultural competencies, support greater input from Māori, and help improve relationships.

A reformed conservation system will need to provide structures at multiple levels to support a stronger biocultural approach. Part of this will be ensuring the system can incorporate inputs from mātauranga Māori and provide for the scientific and research needs of iwi and hapū conservation managers/kaitiaki. This includes providing clear pathways, processes and institutional support. The Department used to have a chief science officer. This position needs to be reinstated and there is also likely need for an equivalent chief Māori science adviser. Some entities, such as the Environmental Protection Authority, already have this mechanism in place and could provide a model.

In addition, the creation of Iwi Taiao Teams or similar within DOC, would help ensure there is an internally-driven focus on increasing cultural competencies and improving support for iwi representatives and entities in the conservation system. Precursors to this likely already exist, but should be developed and expanded to craft a more integrated approach within the conservation system.

*Carving on waka on the shores of Lake Rotorua*

### *8.4.4 Recommendations for reform*

Our recommendations in this area are only preliminary, and should be treated as possible starting points only, aimed at stimluating further discussion. Many more nuanced and bespoke options are also possible. It will be crucial for any reformulation of institutional settings, functions and roles within the conservation system, to better support tangata whenua, to be driven by Māori. This will be one of the most important conversations within the conservation law reform process.

Recommendations on institutions to better provide for Māori in the conservation system

1. *Establish a national Kura Taiao Council at a national level*: The Council's core functions would include:

    a) Providing advice to the Minister, DOC, Conservation Boards and other conservation entitles (such as Fish and Game), including advice on relevant expenditure

    b) Working with DOC to develop national policy that reflects te ao Māori and supports the needs and aspirations of iwi and hapū

    c) Overseeing DOC policy, processes and decision-making impacts on Māori

    d) Providing support for iwi and hapū within the conservation system including advice and information, investigating issues and reviewing system performance

    e) Initiating research, undertaking it through subcommittees or contracting it out

    f) Broad advocacy including helping to foster increased cross-cultural understanding.

2. *Alternatively to Recommendation 1, reconfigure the NZCA on a partnership based model*: Express statutory provision could extend NZCA's functions to the matters listed in Recommendation 1.

3. *Establish regionally based Kura Taiao Boards to complement the national Kura Taiao Council:* These would not replace the broad obligation to consult with Treaty partners but could become an important conduit for:

a) Identifying culturally important sites and management objectives at the regional scale, including milestone targets for them

b) Identifying local taonga and formulating management approaches for them

c) Developing principles and protocols for customary use and practices including power sharing and delegated management functions

d) Strengthening input into the conservation management planning system and working closely with Conservation Boards

e) Strengthening the knowledge base for conservation management and facilitating greater information sharing and place-based knowledge

f) Supporting iwi-led conservation initiatives

g) Advising on research, funding and system support needs

h) Liaising with Fish and Game Councils.

4. *Alternatively to Recommendation 3, reconfigure Conservation Boards on a partnership-based model:* These would perform the same functions as set out in Recommendation 3 and provide a forum for the local community, iwi and hapū to collectively work in a more cohesive way.

5. *Strengthen DOC's internal cultural capacity:* This could be supported through the appointment of a Chief Māori science [including mātauranga Māori] advisor and the creation of Iwi Taiao Teams to provide an internally-driven focus on increasing cultural competency.

## 8.5 Fish and Game

One of the most enduring entitles within the conservation system is Fish and Game and the network of regional Fish and Game Councils. Fish and Game is established under section 26B of the Conservation Act "to represent nationally the interests of anglers and hunters and provide co-ordination of the management, enhancement and maintenance of sports fish and game".

**Spotlight on "sports fish and game"**

Fish do not fall under the Wildlife Act so it is the Conservation Act that provides for the management of freshwater fish, including sports fish. "Sports fish" are defined simply as freshwater fish species declared by Order in Council to be sports fish for the purposes of the Act.[80] Declared sports fish are currently all introduced species and include trout, salmon and some coarse fish like perch and tench.

Fish and Game also has jurisdiction over "game" and under the Wildlife Act this refers to game birds only. The specific species covered are listed under schedule 1 of that Act and include mostly introduced species (eg mallard ducks, partridge, pheasant and quail) but also some natives (eg pukeko, paradise shelduck and grey duck). Most of the management functions for game birds are set out under the Wildlife Act.

### *8.5.1 History of Fish and Game*

Acclimatisation societies were initially established during the 1860s to help introduce new species into Aotearoa New Zealand. The societies successfully introduced many of the common species we see today. They were central to establishing species like trout and mallard ducks as fishing and hunting resources. The regulatory regime for acclimatisation societies was set out under the Wildlife Act and its predecessor legislation.

Acclimatisation societies were disbanded in 1990 by the Conservation Law Reform Act. This reform both rationalised the number of councils and established a new national entity (Fish and Game) to provide greater integration and efficiencies.[81] The Wildlife Service was also disbanded at this time and its assets and functions allocated to either DOC or Fish and Game. Fish and Game was therefore formed from a mixture of the old acclimatisation societies and sections of the Wildlife Service.

### *8.5.2 Functions*

Fish and Game's management functions are split across the Conservation Act and Wildlife Act. Under the former its functions include developing national policy, advising the Minister (including on restrictions to be placed on angling and hunting), and participating in the "development of a research programme promoting the management of sports fish and game". Importantly, Fish and Game also has the function of *advocating generally*, including in statutory processes, "the interests of the New Zealand Fish and Game Council" and with its agreement any

regional Fish and Game Council "in the management of sports fish and game and habitats".[82]

Twelve regional Fish and Game Councils have been established for "the purposes of the management, maintenance and enhancement of sports fish and game".[83] Their functions are more hands on and include:[84]

- Assessing and monitoring sports fish and game populations and "the condition and trend of ecosystems as habitats for sports fish and game"
- Maintaining and improving the resource, including operating breeding and hatchery programmes and maintaining and enhancing habitat
- Planning and advocating for the interests of the Council "including its interests in habitats"
- Recommending licence fees and issuing licences to hunt or kill game
- Promotion and education more generally.

Fish and Game also has a broad monitoring and enforcement function. Employees of either Fish and Game or any regional Fish and Game Council may be appointed as "fish and game rangers",[85] with a range of monitoring and enforcement powers under both the Conservation Act and Wildlife Act. Such powers were expanded in 2018 to enable the broader conservation system to benefit from the skills and capacity of the organisation. Fish and Game rangers can now exercise all the same powers as DOC warranted officers: they can confiscate equipment, search vehicles, stop transport, enter land and issue infringement notices.[86]

A reliable funding stream is provided through the game licensing system and game habitat stamp which has enabled staff to be employed at the local level. They include resource management officers and planning advisors, game bird officers/managers, rangers (with a compliance function), logistical field support staff, research scientists and administrative staff. Monies also fund hatchery management and releases, species monitoring and harvest assessments, and reserve management. The organisation's resource has also helped build an RMA legal fund to support advocacy work in the Environment Court.

The role of Fish and Game is somewhat unusual. It is a statutory entity with important public sector functions including a monitoring and enforcement role. Yet it is also an independent non-State actor representing sectoral interests. There is an inherent tension between the functions it undertakes principally for the benefit of its licence holders, and the hunting and angling community more generally, and its broader role within the conservation system.

The extension of the infringement system to Fish and Game rangers, in 2018, was a matter of some controversy. The National Party was opposed, raising concern over the lack of checks, and the fundamental inappropriateness of providing such powers to non-State sector employees not subject to the States Services Act.[87] The select committee was also divided on the matter noting that "[i]t is rare for a non-government body to have the power to issue infringement notices. However, the Fish and Game Councils are already well versed in managing their enforcement powers and therefore some of us recommend they also be given the power to issue infringement notices under the bill. Some of us recommend including some safeguards".[88]

DOC strongly supported the extension of Fish and Game's role noting that, without access to an infringement system, Fish and Game was "limited to using warnings, reparation (an informal donation scheme) or prosecution to deal with offences".[89] The debate reflects the complexity of Fish and Game's role in the conservation system.

A number of interviewees highlighted that Fish and Game works increasingly closely with DOC, and often monitors all bird species sighted when out in the field, as well as native freshwater species like eel. Fish and Game monitoring programmes provide information on indigenous freshwater species and contribute to NIWA's Freshwater Fish Database. Fish and Game also offers expertise and advice on wetlands projects, including funding advice.[90]

It is also widely accepted that the organisation's freshwater advocacy, and focus on habitat protection for game bird species in wetland areas, has brought significant gains for indigenous species that share those habitats.[91] Indeed, the important advocacy role of Fish and Game in the freshwater space was highlighted in EDS's recent advocacy report.[92]

A key question is whether Fish and Game's functions could or should be expanded to include indigenous species that are harvested, such as eels and whitebait. This might take better advantage of existing expertise within the organisation and increase the applicability of Fish and Game's advocacy functions in the freshwater space. There is a broader conversation to be had as to who is the best regulator of freshwater fish – MPI, DOC or Fish and Game.

### *8.5.3 Governance*

Fish and Game currently has 12 members, one appointed from each regional Fish and Game Council.[93] This mixture of locally elected representatives on the national council has created tensions, as the councillors have the multiple complex tasks of being representatives for their region, collectively setting national policy, providing national oversight, and integrating implementation of national policy at place. Regional Fish and Game Councils also have 12 members who are elected by eligible game bird and sports fish licence holders.[94]

Councillors operate on an unpaid voluntary basis, which affects who can participate, and the capacity and capabilities of the organisation. The 2022 chairs report of Fish and Game Councils noted the significant time commitment and skills required to direct what is a "multi-faceted, demanding operation with significant financial assets and turnover, and at times scientific and technical interface in environmental protection".[95] In any upcoming amendments to the Conservation Act, Fish and Game is seeking provision for payment and more tangible recognition of councillors.[96]

One issue with council membership is that there are currently no mechanisms to ensure sufficient skills and expertise at the local or national level. This can be contrasted with the Conservation Board system where Ministerial appointment enables some selectivity and quality control. Several Fish and Game members we spoke to said that the current model fosters parochialism within the organisation and reduces the diversity of voices. It has been described as a "user pays, user says" approach,[97] because the sports fish and game bird resource is regulated by a user-based fishing and hunting advocacy group, rather than an independent body. This can mean it is less responsive to other values and perspectives.

The findings of a recent governance review of Fish and Game (see spotlight), as well as feedback received from interviewees, make it clear that some form of organisational re-set is necessary to resolve ongoing issues between national and regional Fish and Game Councils and the mismatch of capabilities on Councils.


***A banded kōkopu being measured by Otago Fish and Game staff with the data collected being added to the New Zealand Freshwater Database*** (Fish and Game)

**Spotlight on the 2021 Fish and Game governance review**

This review was triggered by a range of concerns including continuing declines in participation and numbers of licence holders (and so revenue), a series of audit reports which had identified board dysfunction, conflict of interest and staff issues, and a tense relationship between the national and regional councils.[98] Findings of the review included that:

- The narrow focus of Fish and Game creates a conflict of interest with other interests, including those of conservationists and Māori.
- The statutory requirement to "have regard to the impact on other natural resources and other users" (under section 17 of the Conservation Act) was "mostly ignored".[99]
- The relationship and accountabilities between the national council and regional councils was unclear, and with 144 councillors, the organisation was very top heavy.
- There was a lack of good governance practice at all levels and significant inconsistencies between regions.
- There was a wide variation in provision for Māori and understanding of Treaty requirements, with licence holder concerns held to be "paramount", even where there was conflict with section 4.[100] The review found that "there is a widely held view among Māori that Fish and Game as an organisation does not adequately recognise, let alone accommodate, Māori interests in freshwater and the protection of native species".[101]

The governance review provided a wide range of recommendations, including that:

- The national council should be reduced to eight members, of which four should be appointed and paid (to bring the requisite skills for the organisation) and four should be directly elected by fish and game licence holders. An independent chair should be appointed by the Minister.[102]
- The regional Fish and Game Councils should also be reduced in size to eight members, with half elected by licence holders, three appointed by the Minister, and an iwi nominee/appointee. The Minister would have powers to remove any councillor.
- The regional Fish and Game Councils should be given greater direction to "have regard to the interests of Māori as Treaty partner" and the organisation should urgently initiate dialogue with Māori with a view to "developing a national policy governing a system of consultation" with protocols and procedures to guide operations.[103]

All interviewees we spoke to directly about the governance review's recommendations, including most Fish and Game interviewees, were supportive of the proposals put forward. In fact, the majority considered the changes should go further.

The governance review was subject to a range of limitations, including not considering material changes to statutory responsibilities or their allocation to other entities. This prevented consideration of whether some tasks should be delegated to iwi authorities, go back to DOC, or be given to a new entity with new purposes and scope. Neither was the review permitted to consider changes to the regional structure of the organisation. Several interviewees considered the review should have had a broader scope and the options for reform were overly constrained by the limited brief.

### *8.5.4 Recommendations for reform*

**Recommendations for strengthening the role of Fish and Game in the conservation system**

1. *Strengthen membership of national and regional councils*: Building on the recommendations of the 2021 Fish and Game review, changes should be made so that:
    a) The size of both regional councils and the national council is reduced to eight members
    b) Half the members of the national council, including the chair, are paid positions appointed by the Minister
    c) Ministerial appointments are based on knowledge and expertise, including in areas such as species management, ecology, planning and law
    d) The remaining four positions on the national council are equally split between two members elected from licence holders and two iwi/Māori members. These could be appointed on nomination by the Kura Taiao Council (or reformed NZCA) and also be paid positions

e) At the regional level there is a member nominations process with appointment by the national council

f) Provision should also be made for iwi representation at the regional level. One option is to adopt a partnership approach where applications for half the positions comprise iwi appointees. In areas with multiple iwi interests the local Kura Taiao Board could take applications for iwi appointees

g) The arrangement where Ngāi Tahu has a "statutory advisor" sitting on each local Fish and Game Council (through a requirement under section 278 of the Ngāi Tahu Claims Settlement Act) is retained.

2. *Alternatively to Recommendation 1*, replace Fish and Game with a public agency similar to the former Wildlife Service.

3. *Strengthen the ability of Fish and Game to contribute to positive conservation outcomes:* Irrespective of the model chosen, priority should be placed on:

a) Retaining and improving scientific and technical expertise and support

b) Retaining the independent advocacy function for habitat protection and freshwater

c) Improving professionalism and internal and external relationships

d) Fostering a more integrated, nationally consistent approach

e) Providing increased access to government funding as a result of the shift towards a more public rather than private stakeholder entity

f) Strengthening the advocacy role in relation to habitat protection.

## 8.6 Game Animal Council

The Game Animal Council is a more recent entity than the others already discussed. It has a statutory role to advise and make recommendations on game animals to the Minister under section 7 of the Game Animal Council Act. The Act currently identifies tahr, chamois, pigs and deer as "game animals". All species identified as "game animals" are also "wild animals" under the jurisdiction of the Wild Animal Control Act.[104]

Submissions on the Game Animal Council Bill highlight some of the reasoning behind the establishment of the Council.[105] There had been significant resentment at the characterisation of game animals as pests and the failure of conservation frameworks to adequately acknowledge their subsistence and recreational value. There was also concern that an eradication approach would deprive future generations of the ability to participate in wild food gathering.

Without a dedicated entity, such as the Game Animal Council, some submitters argued that the hunting community lacked sufficient voice and representation. In their view, the management of game animals was not given sufficient resource and prioritisation in comparison to other DOC priorities. It was also thought the Game Animal Council would help reduce conflict, increase communication and dialogue, and foster trust in the management of game species.

Many submissions referenced conservation values and argued these could be reconciled with the needs of hunters through better management and greater representation. Overall, it was contended, this would result in improved control of the negative impacts of wild animals. While there were some who asserted that game animals had little or even no impact on indigenous biodiversity, and that hunting interests should be accorded primacy over other values, this was a minority.

### *8.6.1 Structure and functions*

The functions of the Game Animal Council focus on game animals and are primarily advisory, educational and facilitative rather than involving hands on management.[106] However, where the Minister designates "herds of special interest", management powers for hunting purposes are delegated to the Council.[107] No herds of special interest have been designated to date.

One of the express roles of the new Minister for Hunting and Fishing is herds of special interest, and their designation,[108] so it seems likely there will be greater developments in this area shortly. The establishment of herds of special interest will require careful planning to ensure their management is consistent with broader conservation and introduced species legislation and policy. The Game Animal Council is currently working with DOC to put in place a formal process to develop best practice templates for designation.

As a more modern institution, the Game Animal Council Act has far clearer direction as to priorities than Fish and Game. The Act requires that any

powers delegated to the Council and any herd management plans (for herds of special interest) be consistent with conservation objectives, policies and plans (constituting "overriding considerations").

There are between nine and 11 Council members who are appointed by the Minister following public nominations. Unlike other conservation entities, the Act directs selection on the basis of knowledge and experience (rather than "interests"), and includes not just knowledge of hunting but also of farming, forestry, nature conservation, science and kaitiakitanga.[109] Amongst the areas of hunting referenced, "Māori hunting interests" are also identified as relevant to selection.[110]

At present all members on the Council, regardless of their area of skill or expertise, are drawn from the hunting community.[111] There is low representation of members with scientific, ecological or conservation related expertise indicating a potential lack of breadth in skill sets.

Ministerial discretion has been used to ensure more significant Māori membership on the Council, than required under the statute, with at least three of the 10 current council members having iwi affiliations.[112] It could be useful to formalise such increased Māori membership so that representation is less dependent on Ministerial discretion.

Funding of the Council is through government appropriations rather than directly from hunting licences. This is because, unlike the model operated for Fish and Game, a licence is not required to hunt game animals. This is primarily so hunting effort for species such as deer and wild pigs, whose numbers need to be kept under control, is not impeded.

Attempts have been made to establish a Game Trophy Export Levy. However, this has been widely opposed by the commercial hunting sector due to its potential impact on business.[113] While most recreational hunters expressed support for a levy, the commercial hunting sector considered it unfair that they shoulder the cost of funding the Council.

Section 40 of the Game Animal Council Act requires the operation of the Council to be reviewed within three years of its commencement. That review was released in 2017. It was relatively high level, traversing the work undertaken by the Council since its inception, and noting that parts of the Act had yet to be fully tested. Some matters were identified as warranting consideration as part of a "future detailed review", including the intersection between the Game Animal Council Act and the Wild Animal Control Act, in order to address and clarify overlaps.[114]

There are considerable synergies between the functions of Fish and Game and the Game Animal Council when it comes to the management of valued introduced species. It could make sense to merge the two organisations to provide a more consistent and coherent approach. This would also enable more direct participation of the hunting community in the conservation system, at the regional level, through the connectivity that already exists via the network of regional Fish and Game Councils.

If such a merger was undertaken, the hunting community could be given specific representation on the national Fish and Game council, expertise could be shared, and greater resource would be available. More specific sub-committees could be established to support, for example, the development of management plans for herds of special interest.

### *8.6.2 Recommendations for reform*

**Recommendations for strengthening the role of the Game Animal Council in the conservation system**

1. *Merge the Game Animal Council with Fish and Game*: A consolidation exercise could be achieved within a reformed Wildlife Act which which would need to set clear and aligned overarching priorities, purposes and definitions of 'game'. The management needs of valued introduced species could be more carefully prescribed, and be better linked to threat management, threatened species recovery planning and habitat restoration objectives.

2. *Alternatively to Recommendation 1, Better integrate the Game Animal Council within the conservation system:* Under a reformed Wildlife Act the Game Animals Council's functions could be broadened to include habitat protection and advocacy (to align with Fish and Game).

3. *Alternatively to Recommendations 1 or 2, Replace the Game Animal Council (and Fish and Game) with a public agency similar to the old Wildlife Service.*

4. *Strengthen provision for Māori*: Irrespective of the precise institutional arrangements adopted, provision needs to be made for greater representation of tangata whenua along the lines of a partnership model.

## 8.7 Bespoke conservation institutions

In addition to all the different institutional arrangements discussed above, there are a range of other more bespoke and localised arrangements that need to be considered in any conservation reform process.

### *8.7.1 Range of institutions*

There are currently a plethora of locally crafted institutional arrangements that are either a part of, or linked closely to, the conservation system. For example, under the Reserves Act, along with local authorities there are 21 reserve boards and 18 reserve administering authorities.[115] Many novel governance models, such as for Te Urewera and Te Awa Tupua Whanganui River, have been heralded internationally as ground breaking.[116]

A range of other more collaborative models (such as the Hauraki Gulf Forum) have also been developed to deal with complex areas. Treaty settlements have been a conduit for institutional innovation where a wide range of solutions have been canvassed and crafted. These highlight that a range of additional institutional regimes and bespoke configurations are already possible within the conservation system.

There are many other conservation-related initiatives such as privately owned eco-sanctuaries, areas of council-owned land held for conservation purposes, private land (including Māori land) held under various conservation covenant arrangements, and bespoke protected areas that exist under their own legislative frameworks.

***Motuihe Island is a recreational reserve administered by DOC with volunteers (some shown here) replanting the island through the Motuihe Restoration Trust***

Because local institutions are often site-focused, they can improve place-based management by bringing to bear local knowledge and capacity. However, they can also be administratively cumbersome and costly.[117] Ideally, such management entities should be connected together in some way, so that joint learnings, expertise, support and innovation can be shared. A regular, annual meeting of all the governance entities in a region could foster 'bigger picture' thinking and connect groups with similar objectives.

Conservation reform will need to consider what degree of support, recognition and linkages might be created to help better join up the wide range of institutional 'green dots'. It may also be possible to develop mechanisms for new types of non-government owned protected areas to be recognised and supported.

**Spotlight on Australian Indigenous Protected Areas**

In Australia there is an 'Indigenous Protected Areas' regime that enables aboriginal-held land to be voluntarily declared as a protected area and formally recognised as part of the system of national reserves. A declaration triggers government assistance and support. The initiative has exceeded all expectations and now constitutes more than 35 percent (some 48 million hectares) of Australia's reserve system.[118] Assessments of governance and management processes consistently report empowerment of the Aboriginal owners, increased economic participation and opportunity, and improvements in local capacity for biodiversity conservation.[119]

Section 7 of the Reserves Act enables the appointment of a Director of Reserves to assist with the oversight and administration of reserves. It is unclear whether such an appointment has ever been made, but such a Director could perform a valuable coordination role between entities involved in managing conservation areas. The Director could have a corresponding counterpart undertaking the role in the iwi space, or the function could be undertaken by the national Kura Taiao Council if it were to be established.

There is currently scant information on the performance of entities such as reserve boards other than basic auditing information on their financial details set out in DOC annual reports. There would be value in reviewing existing institutional arrangements to better understand how well the various models are operating in practice. Such a review could identify what core types of arrangements should be better enabled, as part of

conservation law reform, and what kind of support frameworks might assist. It will be important for a reformed conservation system to support localised bespoke models to develop.

**Spotlight on legal personality for nature**

One new institutional option meriting consideration is a formal statutory process that enables sites or natural features to be recognised as entities in their own right. This could recognise the special relationship and status of nature as an ancestor in relation to mana whenua and their role as guardian. Legislation could enable applications to be submitted that trigger such consideration. Bespoke management arrangements could then be developed as well as a mechanism for adjusting legal title as appropriate. Authority could be devolved to such bespoke entities to undertake functions such as conservation planning, making of bylaws (eg rāhui), authorisation of specified activities, preparation and commission of reports and issuing hunting permits. The limit and scope of such authority would need to be carefully proscribed with accountability checks such as reporting.

Existing institutional arrangements for the localised management of reserves and other conservation-related areas need to be reviewed to identify how well the various models are operating in practice, what models should be supported in the future, and what kind of support framework they might require.

### *8.7.2 Recommendations for reform*

**Recommendations for strengthening the role of bespoke institutions in the conservation system**

1. *Appoint a Director of Reserves*: This is to assist with the oversight and management of the plethora of reserves and reserve management bodies that currently exist under the Reserves Act.

2. *Review existing bespoke institutional arrangements*: This is to better understand how well different models are operating in practice, which have been the most successful, and what support might be required in the future.

3. *Provide a framework for bespoke institutions*: This is to enable and encourage effective localised bespoke models to develop.

## 8.8 Specialist scientific advisory bodies

DOC is linked into the Intergovernmental Science-Policy Platfom on Biodiversity and Ecosystems services (see spotlight). However, under a reformed conservation system, there will also be a requirement for additional expert advisory entities in order to support the proposed new approach for wildlife protection set out in Chapters 6 and 9.

**Spotlight on the Intergovernmental Science-Policy Platform on Biodiversity and Ecosystem Services**

Following a resolution of the UN General Assembly, the Intergovernmental Science-Policy Platform on Biodiversity and Ecosystem Services was established in 2011 to provide institutional support at the science-policy interface in order to strengthen conservation and biodiversity protection.[120] Its specific functions are to:

- Support policy by establishing a forum for continuous dialogue between decision-makers, scientists and other knowledge holders
- Improve understanding of the impact of human actions on biodiversity and ecosystem services by conducting assessments on pressing conservation issues
- Generate new knowledge on the interaction between human society and biodiversity by assembling existing data, analysing that data in policy relevant ways, and building capacities to fill knowledge gaps.

Nearly 140 member states, including Aotearoa New Zealand, currently participate as members. The platform has been influential around the world (including in this country) particularly in increasing understanding of how nature contributes to well-being and ecosystem services and in prioritising nature-based solutions. DOC is Aotearoa New Zealand's lead agency working within the platform.

First, there is need for an independent advisory committee focused on the protection of indigenous biodiversity, including undertaking species assessment under the NZTCS framework. Basic components of such an entity likely already exist within DOC's internal organisational structures, since NZTCS assessments are routinely undertaken. However, there would be considerable value in creating an independent scientific entity to make the work more visible and decisions more transparent. Its functions and powers could be formally linked to the statutory framework (in a reformed

Wildlife Act) to help ensure that management responses are linked to threat status.

A second advisory body is needed to focus on threat management, an area of the current conservation management system which is particularly weak. This body would focus on undertaking risk and threat assessments, in order to identify threatening processes, and schedule species according to the threat they pose to indigenous biodiversity.

Both new expert advisory entities should have membership appointed on the basis of scientific and technical skills in the relevant area. This should encompass knowledge of mātauranga Māori, particularly in relation to taonga species. The power to establish more bespoke review panels should also be provided for, as necessary, to critique specific plans, species status assessments and impact/risk assessments.

***A red billed gull with chicks. The species is at-risk declining*** (Bernard Spragg)

### *8.8.1 Recommendations for reform*

**Recommendations on strengthening the role of science in the conservation system**

1. *Establish an independent Scientific Advisory Committee on Indigenous Biodiversity:* This should be given statutory status under the Wildlife Act and be tasked with the following functions (amongst others):
    a) Undertaking species status assessments under the NZTCS framework and assigning designations as appropriate
    b) Making recommendations to the Director-General on the prioritisation of species recovery and management plans
    c) Establishing specialist sub-committees to undertake work as necessary
    d) Advising the Director-General on areas where research on indigenous biodiversity is required
    e) Advising the Minister on any matter relating to indigenous biodiversity protection including legislative proposals.
2. *Establish an independent Scientific Advisory Committee on Threat Management:* This should also be given statutory status under the Wildlife Act with the following core functions:
    a) Investigating threats (including threatening processes) to at-risk and endangered species, and indigenous biodiversity more broadly, and reporting with recommendations
    b) Investigating such matters referred to it from the Scientific Advisory Committee on Indigenous Biodiversity (see above) or the Minister
    c) Undertaking impact assessments in relation to introduced species under EICAT (as discussed in Chapter 6) and assigning designations as appropriate
    d) Making recommendations to the Director-General for prioritisation of control and/or eradication
    e) Reviewing and making recommendations on animal control plans
    f) Establishing specialist sub-committees to undertake work as necessary.

## Endnotes

1 See sections 6(b) and (c) of the Conservation Act 1987

2 https://www.doc.govt.nz/news/media-releases/2011/doc-to-re-organise-support-systems-for-field-staff/

3 https://www.doc.govt.nz/about-us/statutory-and-advisory-bodies/nz-conservation-authority/advice-to- the-minister-and-or-director-general/doc-restructuring-april-2013/

4 https://www.doc.govt.nz/about-us/statutory-and-advisory-bodies/nz-conservation-authority/advice-to- the-minister-and-or-director-general/doc-restructuring-april-2013/

5 See New Zealand Conservation Authority, 2013, *NZCA advice to the Director-General about DOC restructuring,* New Zealand Conservation Authority, Wellington

6 https://community.scoop.co.nz/2013/04/psa-urges-doc-to-put-restructuring-proposals-on-hold/

7 https://www.odt.co.nz/news/dunedin/doc-reassessing-its-structure-over-shortcomings

8 Department of Conservation, 2013, *Conservation Boards review: Final report of the Conservation Boards Review Panel,* Department of Conservation, Wellington, 3

9 Department of Conservation, 26 May 2023, 'Statutory planning and marine update', in NZCA meeting minutes [DOC-7206174]

10 Ibid

11 https://www.doc.govt.nz/about-us/our-structure/business-groups/

12 https://www.doc.govt.nz/about-us/statutory-and-advisory-bodies/fish-and-game-councils/

13 Department of Conservation, 26 May 2023, 'Statutory planning and marine update', in NZCA meeting minutes [DOC-7206174]

14 See discussion in Woollaston, 8 March 1990, 'Conservation Law Reform Bill (second reading)', *New Zealand Parliamentary Debates*, 505

15 Sections 17B(1) and 17B(3)(a)(ii), Conservation Act 1987

16 See discussion in Mark A, 1973, 'Man and the environment: The New Zealand situation', *Otago Law Review*, 393

17 Sections 14-16, Nature Conservation Council Act 1962

18 The functions and powers of the National Parks and Reserves Authority were originally set out under Part II of the National Parks Act 1980, see sections 17-28

19 Provisions set out under the Nature Conservation Council Act 1962

20 See discussion in Woollaston, 10 August 1989, 'Conservation Law Reform Bill (Introduction)', *New Zealand Parliamentary Debates*, 500

21 See discussion in the *Hansard*: Woollaston, 10 August 1989, 'Conservation Law Reform Bill' (Introduction), *New Zealand Parliamentary Debates*, 500, 11824 and Palmer, 10 August 1989, 'Questions for oral answer: Quangos', *New Zealand Parliamentary Debates*, 500, 11845

22 Marshall, 10 August 1989, 'Conservation Law Reform Bill (Introduction)', *New Zealand Parliamentary Debates*, 500 and Young, 10 August 1989, 'Conservation Law Reform Bill (Introduction)', *New Zealand Parliamentary Debates*, 500

23 Young, 9 August 1990, 'Conservation Law Reform Bill' (Second reading), *New Zealand Parliamentary Debates*, 505

24 See discussion of the court in *Nature Conservation Council v Southland County Council* [1980] 7 NZTPA 464

25 Ibid

26 Section 17(2)(e), National Parks Act 1980 (as enacted – amended in 1990 by the Conservation Law Reform Act 1990)

27 Storey, 12 December 1989, 'Conservation Law Reform Bill' (report of the Planning and Development Committee), *New Zealand Parliamentary Debates*, 504

28 See sections 6D(1) and 6P, of the Conservation Act 1987

29 See sections 17F(j) and (l), Conservation Act 1987, as well as section 17H(4)(c), the latter which provides the Minister with a power to extend the period of review following consultation with the NZCA

30 Koolen-Bourke D and R Peart, 2021, *Conserving nNature: Conservation reform issues paper*, Environmental Defence Society, Auckland

31 Department of Conservation, 2013, *Conservation Boards review: report of the Conservation Boards Review Panel*, Department of Conservation, Wellington, 22

32 The 2017 NZCA annual report notes that in practice, although they can be asked to approve a CMP, these are generally approved by Conservation Boards, 12

33 It is unclear how this function is to be executed eg can it be fulfilled simply through discussions as appears to be the case in the 2017 NZCA Annual Report, 16

34 Possibly an incorrect entry, a "Y" is recorded in schedule 4 of the 2021 Annual Report but the report itself (at 19) states that no determinations were made

35 This provision is to enable control of pests and wild animals

36 The meeting minutes of the NZCA show reoccurring questioning seeking clarity around how its advice was taken into account. See for example NZCA meeting minutes 22 November 2021

37 See discussion in NZCA meeting minutes 9-10 December 2019 [DOC-6161079]

38 For example the Tongariro National Park Act 1922 and the Egmont National Park Act 1924. Others were established later under the Public Reserves, Domains and National Parks Act 1928 and National Parks Act 1952

39 See section 73, Public Reserves, Domains and National Parks Act 1928 and section 16(1), National Parks Act 1952

40 See Young, 25 November 1980, National Parks Bill, Second reading, *New Zealand Parliamentary debates*, 435, 5350-1

41 Section 29, National Parks Act 1980 (repealed in 1990 under the Conservation Law Reform Act 1990 (1990 No 31))

42 See Young, 25 November 1980, National Parks Bill, Second reading, *New Zealand Parliamentary debates*, 435, 5351

43 Ibid at 5352

44 Section 30, National Parks Act 1980

45 Under section 47(3) of the National Parks Act 1980

46 See Young, 25 November 1980, National Parks Bill, Second reading, *New Zealand Parliamentary debates*, 435, 5352

47 Ibid at 5353

48 Ibid

49 See Young, 13 November 1980, National Parks Bill, report of Lands and Agriculture Committee, *New Zealand Parliamentary debates*, 435, 4982

50 Section 6N, Conservation Act 1987

51 Section 30(1)(a), National Parks Act 1980

52 Section 17F(a), Conservation Act 1987 and section 47(1), National Parks Act 1980

53 Section 17F(f), Conservation Act 1987 and section 47(3), National Parks Act 1980

54 Section 17G(2), Conservation Act 1987

55 Section 6M, Conservation Act 1987

56 https://www.doc.govt.nz/about-us/our-policies-and-plans/statutory-plans/statutory-planning-status-report/. A list of 19 current CMPs is provided on DOC's website, and beside eight of these is a note that they are "to be revoked" when a new CMS for the area is approved

57 For example, in 2018 the Taranaki-Whanganui Conservation Board successfully took a case against the Environmental Protection Authority for granting consent to Trans-Tasman Resources Limited to mine iron sands off the Taranaki Bight. See *Trans-Tasman Resources Ltd v Taranaki-Wanganui Conservation Board* [2021] NZSC 127

58 Section 6P(2)(b), Conservation Act 1987

59 Section 62, Environment Act 1995 (UK)

60 Section 6(e), Conservation Act 1987

61 Section 6V of the Conservation Act 1987 directs that "Boards shall be serviced by the Department in such a manner as the Minister may from time to time direct".

62 Department of Conservation, 2013*, Conservation Boards review: Final report of the Conservation Boards Review Panel,* Department of Conservation, 17

63 NZCA meeting minutes 25 July 2023 [DOC-740407], 58

64 A copy of the findings is available as part of DOC's reporting to the NZCA, see NZCA meeting minutes 25 July 2023 [DOC-740407], 58

65 Department of Conservation, 2013, *Conservation Boards review: Final report of the Conservation Boards Review Panel*, Department of Conservation, 4 and 34

66 Source: Auckland Conservation Board Annual reports

67 Source: Tongariro-Taupo Conservation Board Annual reports

68 NZCA meeting minutes 1-2 August 2016 [DOCCM-2833048]

69 Ibid

70 See NZCA meeting minutes 17-18 February 2022 [DOC-6931202]

71 Options Development Group, 2022, *Partial reviews of the Conservation General Policy*

*and General Policy for National Parks regarding Te Tiriti o Waitangi/the Treaty of Waitangi,* Department of Conservation, Wellington, 42

72 Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity*, Waitangi Tribunal, Wellington, 372

73 Koolen-Bourke D and R Peart, 2022, *Science for policy: The role of science in the National Policy Statement for Freshwater Management,* Environmental Defence Society, Auckland

74 Section 29, Pae Ora (Healthy Futures) Act 2022

75 Section 31 (4), Pae Ora (Healthy Futures) Act 2022

76 At the time of writing the Pae Ora (Disestablishment of Māori Health Authority) Amendment Bill was in Committee

77 Reti, 27 February 2024, Pae Ora (Disestablishment of Māori Health Authority) Amendment Bill, First reading, *New Zealand Parliamentary debates*, 773

78 Under section 80, Ngāi Takoto Claims Settlement Act 2015, section 85, Te Aupouri Claims Settlement Act 2015, section 95, Te Rarawa Claims Settlement Act 2015, and section 83 Ngāti Kuri Claims Settlement Act 2015

79 Te Hiku o Te Ika Conservation Board, 2020, *Annual report 2020-2021*, Te Hiku o Te Ika Conservation Board, Kaitaia

80 Section 2, Conservation Act 1987

81 Palmer, 10 August 1989, 'Questions for oral answer: Quangos', *New Zealand Parliamentary Debates*, 500, 11845

82 Section 26C(1)(g), Conservation Act 1987

83 Section 26P, Conservation Act 1987

84 Section 26Q, Conservation Act 1987

85 Section 26FA, Conservation Act 1987

86 See sections 26HA, 40A and a range of new powers under Part 6A. These were instituted through the Conservation (Infringement System) Act 2018

87 Scott (18 December 2018) Conservation (Infringement System) Bill, Third reading, 9086

88 Environment Committee, 2018, *Conservation (Infringement System) Bill as reported from the Environment Committee*, 3

89 Department of Conservation, 2018, *Advice to select committee on provision of an infringement regime for Fish and Game Councils,* Department of Conservation, Wellington, 1

90 Fish and Game, 2023, 'Call to halt decline of wetlands ahead of world wetlands' (Press release, 31 January 2023)

91 https://www.stuff.co.nz/environment/122545382/southlands-duck-ponds-teeming-with-eels

92 Severinsen G, 2023, *Environmental advocacy in the future resource management system,* Environmental Defence Society, Auckland, 36

93 Section 26D, Conservation Act 1987

94 Section 26Z, Conservation Act 1987

95 New Zealand Fish and Game Council, 2022, *Performance report of the New Zealand Fish and Game Council for the year ended 31 August 2022,* New Zealand Fish and Game Council, Wellington, 5

96 Ibid at 6

97 https://fishandgame.org.nz/about/what-does-fish-and-game-do/

98 Clark B and J Mills, 2021, *Review of the Governance of Fish and Game New Zealand and the regional Fish and Game Councils,* Report prepared for the Minister of Conservation, 6

99 Ibid at 34

100 Ibid at 22

101 Ibid at 30

102 Ibid at 41

103 Ibid at 43

104 The only "wild animal" not also a "game animal" is goats

105 Department of Conservation, 2012, *Report of the Department of Conservation to the Local Government and Environment Committee on the Game Animal Council Bill, summary of submissions,* Department of Conservation, Wellington

106 Section 7, Game Animal Council Act 2013

107 Section 7(1)(i), Game Animal Council Act 2013

108 https://www.dpmc.govt.nz/cabinet/portfolios/hunting-and-fishing

109 Section 8(3), Game Animal Council Act 2013

110 Section 8, Game Animal Council Act 2013

111 https://nzgameanimalcouncil.org.nz/who-we-are/

112 Ibid

113 See Department of Conservation, 2017, *Game Trophy Export Levy: Summary of consultation submissions,* Department of Conservation, Wellington, 4

114 *Review of the Operation of the Game Animal Council Act 2013: report*, 6

115 Department of Conservation, 2022, *Regulatory impact statement: Introducing a threshold for the auditing of reserve boards and reserve administrative bodies,* Department of Conservation, Wellington, 1

116 See: 'New Zealand river first in the world to be given legal human status' (15 March 2017) *BBC News*; 'New Zealand's Whanganui river has been granted the same legal rights as a person', (16 March 2017) *Time Magazine*

117 Department of Conservation, 2022, *Regulatory Impact Statement: Introducing a threshold for the auditing of reserve boards and reserve administrative bodies,* Department of Conservation, Wellington, 2

118 Taylor P, 2015, 'Valuing people in the landscape: Re-thinking conservation approaches', *USDA Forest Service Proceedings,* 187-194

119 Lyver P, J Davies and R Allen, 2014, 'Settling Indigenous claims to protected areas: Weighing Māori aspirations against Australian experiences', *Conservation and Society,* 12(1), 89-106

120 Intergovernmental Science-Policy Platform on Biodiversity and Ecosystem Services, 2010, Resolution 65/162 adopted by the United Nations General Assembly, 65th session

# 9 Wildlife protection

***Kea*** (Neil Silverwood)

Wildlife reform can provide a valuable starting point for broader conservation system change. This is because changes to the Wildlife Act have significant potential to halt biodiversity loss and increase resilience to climate change impacts. The Wildlife Act is also is a key pinch-point for Māori issues relating to the conservation system. Keeping an eye on implications for the wider system, reform of the Wildlife Act is an opportunity to re-design the conservation system 'from the inside out'.

We set out below the key findings from our separate review of the Wildlife Act. More detail can be found in the standalone report released in July 2023, titled *Reform of the Wildlife Act 1953*, and its five appendices which variously consider international best practice, Te Tiriti, introduced species, the marine space and tax incentives for biodiversity conservation.[1] We have also drawn from our analysis on introduced species in Chapter 6.

## 9.1 Starting points

The Wildlife Act seeks to 'absolutely protect' those species defined to be "wildlife". It distinguishes between different types of wildlife, and the extent of their protection and management, using schedules. Apart from two schedules, which are used to extend absolute protection to invertebrates and marine species not automatically captured under Act, the rest deal primarily with introduced species. The main way in which the Wildlife Act absolutely protects species is via 'no take' rules which mandate that 'use' of wildlife requires a permit.

Habitat can also be protected under the Wildlife Act. Wildlife sanctuaries, refuges and management reserves are managed by DOC and can be on private or public land. These habitat protection mechanisms have not been extensively used with only 20 such areas in existence. The Act does not provide for any habitat protection based on the presence of threatened species, or for areas necessary for their survival, such as critical habitat or residence areas.

Reflecting its historical origins (and as noted in Chapter 6), the Wildlife Act also has a strong focus on the regulation of game hunting to ensure the sustainability of the game resource. Overall, the Act is antiquated and does not reflect modern values with respect to the protection, management, use and recovery of wildlife.

## 9.2 Reform options

Wildlife Act reform will occur within the context of the twin crises of biodiversity loss and climate change and conceptual advances in incorporating te ao Māori into environmental laws. These matters have been centered throughout our analysis of current settings and development of options for reform. Figure 9.1 provides a high level summary of some of the most significant issues and EDS's recommendations to address them.

| Issue | Description | Recommendation |
|---|---|---|
| The Wildlife Act has an inequitable values regime | The Wildlife Act has several inequities when it comes to the use of wildlife. Significantly, it caters for a number of commercial and recreational uses but is not designed with Māori customary use in mind. | To minimise inequities, new wildlife legislation will need to re-calibrate how it enables the use of wildlife at place across all sectors and domains: customary, social, commercial; and marine and terrestrial. |
| Not all wildlife is covered by the Wildlife Act | Many species, and sometimes entire taxonomic groups, are not afforded the Wildlife Act's absolute protection because they are excluded from the Act's jurisdiction including plants, freshwater fish, and all invertebrates and marine mammals not listed in the schedules. | New wildlife legislation should be inclusive of all taxonomic groups. This would align with international best practice and the NZTCS. |
| The Wildlife Act does not have any dedicated threatened species law | Except for threatened marine wildlife (which is limited to those species listed in Schedule 7A), the Wildlife Act makes no distinction between threatened species and other wildlife. Targeted threatened species management is central to preventing species extinction. | New wildlife legislation should include specific provision for threatened species, including by narrowly defining the use of such species, requiring an overall net gain when they are used, adopting the precautionary principle to threatened species decision-making and providing for their habitat protection. |
| The Wildlife Act does not give effect to Te Tiriti | The Wildlife Act vests ownership of wildlife in the Crown and Māori are required to get permission for customary use on a case-by-case basis. These framings have made it difficult for Māori to maintain their ancestral relationships with taonga species. Further, the Wildlife Act does not specifically protect taonga species or require that decision-making be informed by mātauranga Māori. | A range of options could be effective, in different contexts, to give effect to the principles of Te Tiriti. This includes a shared management framework (in line with the partnership principle) which enables bespoke and highly placed-based responses.<br><br>New wildlife legislation should also include provision for the heightened protection or prioritisation of indigenous taonga species and provide for decision-making based on the best available information, including mātauranga Māori and science. |

*Tōrea pango variable oystercatchers, Thames coast*

| Issue | Description | Recommendation |
|---|---|---|
| Management of introduced species is largely left to other laws | The management of introduced species is divided between the conservation and biosecurity systems and these two systems are not well integrated. The Biosecurity Act is not well framed for protection of indigenous biodiversity.<br><br>The current regime has failed to ensure that introduced animals do not negatively impact indigenous, including threatened, flora and fauna. The multitude of statutes and potential management models applicable to wild animals make the purposes and approach to this grouping of animals especially unclear. | New wildlife legislation should include schedules to cluster groups of introduced species according to the degree of risk or threat they pose. Risk assessments should adopt a climate change lens (eg that considers changing risk profiles and ranges, and the need to increase and improve carbon sinks).<br><br>The management of valued introduced species should be linked to the biodiversity values present at place. As a starting point, sports fish and "wild animals"[2] should not be allowed to persist in priority areas of high biodiversity. Species with a high risk assessment profile should be more broadly controlled.<br><br>To ensure that new wildlife legislation is responsive to threats, a new Act should include mechanisms to trigger management responses, including clear pathways to initiating biosecurity/pest management planning.<br><br>The conservation and biosecurity systems should be better integrated. |
| Protection of marine species is not well addressed by the Wildlife Act | The Wildlife Act was not designed with the marine environment in mind. Most marine species are managed under laws other than the Wildlife Act (if they are managed at all). Yet much of Aotearoa New Zealand's biodiversity is found in the marine area and many species are threatened with extinction or are at risk of becoming threatened.<br><br>Further, the Wildlife Act fails to protect habitat important to the survival of marine species and this is not adequately addressed by other marine-related laws. There are large 'carve outs' from marine species protection (where it is in place) for accidental or incidental take. | All marine species should be brought under the protective auspices of new wildlife legislation.<br><br>Exemptions to marine species protection should be limited but could include all species in the Quota Management System. Non quota species could also be excluded from protection on a case-by-case basis when enough is known about the species and adequate management measures are in place to sustainably manage harvest pressures on them.<br><br>Better and more marine spatial protection is required and needs to interface with other marine species laws.<br><br>New wildlife legislation needs to include a mechanism for better managing threatened bycatch of marine species, including by the creation of a threat management and recovery plan which can restrict fishing activities. A greater duty of care should also be imposed on fishers to not catch threatened marine species. |
| The Wildlife Act has too much statutory discretion | Several significant decision-making powers under the Wildlife Act are unrestrained by statutory guidance or criteria including the issue of permits, alteration of schedules and creation of habitat protection areas. | Political decision-making under new wildlife legislation should be generally eliminated except for highly proscribed carve-outs. Instead, decisions concerning wildlife should be directed by independent scientific knowledge and mātauranga Māori. |

| Issue | Description | Recommendation |
|---|---|---|
| Indigenous and threatened species are disparately managed across land tenure, domain and location | There is no broad mandate to protect and plan for indigenous and threatened species across all environments in Aotearoa New Zealand. Although the Wildlife Act's 'absolute protection' applies throughout the country, and across all land tenures, a species is afforded differing degrees of protection (under different Acts) depending on what land it inhabits, what plan it is managed under and its location. | New wildlife legislation should cast a net over the various management regimes and apply a consistent protective approach to threatened and indigenous species. |
| Dual consenting regime | Many large developments or land uses 'trigger' the Wildlife Act and the RMA. This can necessitate a permit under the former and a resource consent under the latter. In many cases, the RMA does most of the heavy lifting, but it has a sustainable management purpose and is not a species protection law. | New wildlife legislation should clarify the dual consenting regime, by making resource consents contingent on first obtaining all necessary wildlife permits, and including triggers for wildlife permits in resource consent conditions. |
| The Wildlife Act does not include an ability to permit disturbance activities unrelated to catching alive or killing | No permit can be issued for pursuing, disturbing or molesting an animal if that activity is unconnected to catching alive or killing it. This means that the Director-General can permit the killing of an animal, but not lesser harm such as disturbance, even if that disturbance is required for the protection of the animal. | New wildlife legislation should rectify the mismatch between offences and what can be permitted. This will require a broader discussion about what activities should be permitted and under what circumstances. |
| Poor monitoring and enforcement | Biodiversity is poorly funded and therefore monitored in Aotearoa New Zealand. However, even when monitoring is undertaken, there are few 'triggers' in the system to require action.<br><br>The Wildlife Act is hard to enforce unless there is a dead body or very clear evidence of intentional harm. | New wildlife legislation should require monitoring which is linked to management responses.<br><br>New wildlife legislation also needs to be carefully designed so it can be readily enforced to ensure an even balance between 'carrot' and 'stick' in species management. |

**Figure 9.1: Summary of key issues with the Wildlife Act and reform options**

In EDS's view, new wildlife legislation should apply to all taxonomic groups. This would be a significant shift from the current approach under the Wildlife Act, particularly in relation to plants, fish and insects. Providing such a wide coverage would ensure that all species have an opportunity to be afforded the protective provisions of the new law, threats can be more strategically managed and wildlife protection, management and recovery can be undertaken in a more integrated manner. Further, including all taxonomic groups would provide new wildlife legislation with the flexibly to apply different management regimes to different species over time, without the need for further fundamental reform.

The scope of a new wildlife statute could include (from narrow to wide):

- Threatened species (Option 1);
- Indigenous species (Option 2); or
- All wild species (indigenous and introduced) (Option 3).

Overall, we favour a single new law dealing with all species (Option 3) on the basis that it would provide for a more integrated approach. It could better prioritise indigenous species and more effectively address conflicts between indigenous and introduced species.

Such a broad ranging Act could include specific provision for threatened species, and apply different management responses to different categories of non-threatened species.

It could also address management of introduced, highly valued and pest species 'in-house' rather than relying on other legislation. Currently, introduced species are managed under a multitude of laws that do not often 'speak' to one another. This is a complex area meriting further work.

### *9.2.1 Crafting new purposes*

An important aspect of wildlife reform will be the crafting of a clear purposes provision, something currently lacking. The purpose of new wildlife legislation (assuming Option 3 is adopted) needs to clearly prioritise the management, protection and recovery of different categories of species. Threatened species should have the highest priority and preventing extinctions should be the central purpose of a new Act. Stepping down from this, a new Act should prioritise indigenous species, and then manage all other wildlife.

A new Wildlife Act should recognise as primary underpinning purposes: (a) prevention of extinction of indigenous species; (b) protection, restoration and enhancement of indigenous biodiversity; and (c) control and management of threats to indigenous species and biodiversity including invasive introduced species.

Secondary purposes, subject to those overriding considerations, could then include provision for sustainable utilisation and harvest of wildlife. Where a resource is limited and restrictions apply, consideration should be given to prioritising: first, the provision for customary use and cultural practices; secondly, subsistence use, in consideration of the socio-economic well-being of local communities; and thirdly, recreational and commercial use. This would shift the lens away from 'game management' and 'recreation' towards 'sustainable utilisation' and make clear that these purposes are secondary, and subject to, the protection of endangered species and indigenous biodiversity.

The prioritisation level of different categories of species should be made clear in the legislation and a hierarchy established. Threatened species should have the highest priority, followed by indigenous species and then valued introduced species. There should be a requirement that management actions prioritise species higher in the hierarchy where interests between species come into conflict.

### *9.2.2 Threat management*

Currently, the Wildlife Act only manages the take of species, and does not address other threats to them. Without a threat component to the legislation, it will remain reactionary, and only responsive to direct harvest. A new wildlife statute that addressed threats would more strategically protect, manage and recover indigenous and threatened wildlife.

Introduced species are one of the most significant threats to indigenous flora and fauna in Aotearoa New Zealand. New wildlife legislation should therefore a bespoke conservation-focused pest management planning regime. It should also better integrate with invasive species management laws such as the Biosecurity Act.

### *9.2.3 Recovery planning for threatened species*

Recovery planning is a significant component of threatened species laws overseas and, if done well, can be an effective mechanism for species recovery. Requiring a recovery plan for all species listed as threatened in the NZTCS (of which there are 1,103) would be unrealistic and set the system up for failure. Instead, new wildlife legislation could include a mechanism for

DOC to undertake regional or catchment-scale threatened species recovery planning (preferably called 'restoration planning' to have a more positive future-focused outlook). Such planning could link to regional biodiversity strategies required under the National Policy Statement on Indigenous Biodiversity 2023. Alongside this, the new regime should also enable promulgation of individual species recovery plans.

Species protection goes hand in hand with habitat protection. This means that new wildlife legislation, if it is to be effective in achieving recovery, needs to protect the residence of threatened fauna (eg nesting or breeding sites, like a tree occupied by a threatened bird). Such areas would complement those already required to be identified and managed under the National Policy Statement for Freshwater Management 2020 for indigenous freshwater fish and for specified threatened and at risk highly mobile species under the National Policy Statement on Indigenous Biodiversity (birds and bats). Going further, and providing some form of protection for the critical habitat of threatened fauna would be a positive move, but doing so could be challenging for various reasons.

An incentives scheme would help reduce opposition to habitat protection on private land and we recommend development and implementation of a biodiversity credit scheme to accompany new wildlife legislation. We understand that the Government is looking closely at incentive regimes, and we support the process of developing one specifically designed for Aotearoa New Zealand.

### *9.2.4 Species management, permitting and utilisation*

Species management is where the 'rubber hits the road' in new wildlife legislation as it determines the level and degree to which species are protected and can be used. A challenge will be striking the right balance between provision of national direction (which sets out what can and cannot be done) and place-based decision-making (which provides greater flexibility at the local scale).

A 'top down' regulatory approach could centre on the NZTCS, with more protective provisions applying to species listed as threatened (and possibly also those listed as at-risk). Greater ability to use wildlife, including Māori customary use, could be provided outside of those categories. The system will need to be agile, at this level, to enable local partnerships and place-based decision-making. Designing such a regime requires further and specialist input from Māori.

Different management regimes could apply to different categories of species. It will be important that new wildlife law sets clear parameters around the take of both at-risk and threatened species. If a management hierarchy is adopted, careful consideration would need to be given to the approach taken for taonga species. It will be important to identify these species so Māori can have an equal say in how they are protected, managed and recovered. Taonga species will need heightened protection or prioritisation, with decision-making based on the best available information, including mātauranga Māori and scientific knowledge. Legal provision for taonga species should be designed in partnership with Māori. Overall, prioritisation of certain species over others needs to be informed, not only by threat classification, but also by taonga status.

Careful consideration would also be needed for the management of marine species which are currently harvested. A mechanism could provide exemptions for those within the quota management system. Species outside that could also be excluded from protection, on a case-by-case basis, when enough is known about the species to ensure effective management of harvest.

The Wildlife Act is in dire need of reform. It is not working for species or for most people. It is beyond salvaging by mere tinkering and needs a wholesale re-write. This should be done as a matter of urgency, so that Aotearoa New Zealand can better address its biodiversity loss.

*Toanui Flesh-footed shearwater which is at risk and primarily threatened by commercial and recreational fishing bycatch*

Below we have set out recommendations aimed at creating comprehensive and inclusive wildlife legislation that prioritises the protection, management and recovery of indigenous and threatened species. This is while also recognising valued introduced species and taonga species and addressing threats posed by introduced species.

## 9.3 Recommendations for reform

**Recommendations for reform of wildlife protection**

1. *Design inclusive and integrated wildlife legislation*: New wildlife legislation should apply to all taxonomic groups. This is to ensure that all species have the opportunity to be afforded protective provisions, enabling integrated wildlife protection, and providing flexibility for different management regimes. It would include extending the new statute's reach to freshwater fish, plants, marine species and marine mammals. Mechanisms for providing exemptions from protection, in relation to indigenous species, would need to be clearly prescribed and adequate management measures put in place where the level of protection is adjusted.

2. *Set a clear legislative purpose:* It is important that a clear purposes provision is crafted for the new Act. As the legislation would provide for species protection, recovery and threat management, the prioritisation level of different categories of species should be made clear. Threatened species should have the highest priority and prevention of extinction should be a central goal, followed by the prioritization of indigenous species, and then management of all other wildlife. The legislation should also recognise taonga species and prioritise their protection and management.

3. *Provide for restoration planning:* Restoration planning needs to be a core part of a reformed Act including threatened species recovery planning. This will need to be linked to freshwater and biodiversity strategies under the resource management system. Consideration should be given to protecting critical habitat, including development of an incentives scheme for habitat on private land.

4. *Include a threat management framework:* This is necessary to address threats to species and enable a more strategic approach. A core component should be a responsive, conservation focused pest management planning regime to replace existing provisions under the Wildlife Act and the Wild Animal Control Act (which should be repealed). The new legislation should include mechanisms to trigger management responses to threats, with clear pathways for initiating pest management planning.

5. *Continue to provide for species categorisation:* The Act should continue to provide a sorting system for species through schedules. However, clear criteria to guide such classification needs to be provided. Species should be clustered according to science based assessments as to the degree of risk or threat associated with them. Species with a high risk assessment should be broadly controlled with links to the pest management planning regime. Assessments should take climate change and emissions reduction goals into account.

6. *Reconfigure utilisation and permitting:* Utilisation of threatened species (and potentially also those 'at risk') should be narrowly defined, require an overall 'net gain', and adopt a precautionary approach. More flexibility could be provided in other categories. Consents under the resource management system should be contingent on obtaining all necessary wildlife permits with resource consents triggering wildlife permits. The permitting system and the scope of 'take' should be reviewed, including consideration of what kinds of wildlife interactions should require permits.

7. *Provide for a shared management framework*: The new legislation should establish a shared management framework in line with the partnership principle of Te Tiriti, enabling bespoke and place-based responses. There should be heightened protection or prioritization of indigenous taonga species, with decision-making based on the best available information, including mātauranga Māori and scientific knowledge. The management regime for taonga species should be designed in partnership with Māori.

8. *Recognise valued introduced species*: These should be provided with a degree of recognition in a purpose statement. However, the Act should make clear that this is subject to the Act's overriding purpose of protecting, managing and recovering threatened and indigenous species. Like other introduced species, those that are valued should still be categorised according to a risk assessment, and pest management planning should be triggered where a species has a high-risk profile. Management approaches should be linked to biodiversity values at place.

**Endnotes**

1 These can all be accessed from the EDS website at https://eds.org.nz/resources/documents/report-library/

2 Currently defined to include pigs, tahr, chamois, deer and goats under Schedule 6 of the Wildlife Act 1953

# 10 Conservation management planning

*The Ben Ohau Range shown here is part of the Ruataniwha Conservation Park managed by DOC*

This chapter summarises the key findings from EDS's independent review of the conservation management planning system.[1] Portions of that analysis have already been incorporated into other chapters, particularly Chapter 3 (Key challenges for Māori in the current system) and Chapter 8 (Conservation institutions). The reader is encouraged to read the full independent review to obtain a deeper analysis of the issues with the current planning system.

**Spotlight on core statutory conservation management planning documents**

The Conservation Act provides for a policy and planning hierarchy cascading from the nation-wide General Policies, to the regional CMSs, to the place-specific NPMPs and CMPs, and finally to individual concessions:

*General Policies:* national-level documents which assist with the implementation of the legislation through providing a framework for lower-level strategies and plans.[2]

*Conservation Management Strategies:* implement the General Policies at place by establishing the core objectives necessary for integrated management at the regional (Conservation Board) level. Where a national park sits within that area, the CMS must also set the objectives for the relevant national park(s).[3]

*National Park Management Plans:* sit underneath CMSs in the planning hierarchy, setting the more specific management direction necessary to implement policy and objectives set under the General Policy and CMS(s), and guiding the grant and management of concessions. NPMPs must not derogate from the relevant CMS(s).[4]

*Conservation Management Plans:* may also be developed to provide management direction for a specified area. They were traditionally utilised to provide for the management of areas, that were not national parks, but which had significant conservation values or management requirements. More recently, DOC has been phasing out their use.

*Concessions:* operate at the lowest level of the planning hierarchy. Concessions may not be granted unless they are "consistent with" all of the relevant plans and CMSs that apply, as well as the General Policies.[5]

## 10.1 Issues with conservation management planning system

There are a host of problems evident within the conservation management planning system. Four issues were identified in EDS's independent review as being of particular concern:

- The significant delays in the conservation management planning system
- Conservation management planning documents being outdated, inconsistent and difficult to use
- Institutional roles and relationships being unclear and lacking support
- Data and information systems poorly configured to support planning.

### *10.1.1 Significant delays*

Development timelines for the preparation of statutory planning documents are often not met. For example, a third of the country's CMSs are now more than a decade past their date for review, many dating back to the 1990s.[6] Delays for review of NPMPs are even more serious. As can be seen from Figure 10.1, only 2 of 13 national parks have current plans in place.

Delays and constant alterations to plan development timelines undermines a strategic approach to the planning system, contributes to high levels of frustration and 'burn-out' of Conservation Board members, and represents a considerable waste of time and resources. The reasons for delays in the development and revision of CMSs are multiple, and include:

- Lack of resourcing and capacity within DOC to progress CMS reviews

| National Park | Established | Full review | Partial review or amendment | Status |
|---|---|---|---|---|
| Kahurangi | 2001 | Nil | 2010 & 2017 | Review not yet scheduled |
| Westland Tai Poutini | 2001 | Nil | 2008 & 2014 | Review not yet scheduled |
| Egmont | 2002 | Nil | Nil | Review not yet scheduled |
| Nelson Lakes | 2002 | Nil | Nil | Review not yet scheduled |
| Aoraki/Mount Cook | 2004 | Nil | 2012 | Under review |
| Tongariro | 2006 | Nil | 2011 & 2018 | Review not yet scheduled |
| Arthurs Pass | 1994 | 2007 | 2012 | Review not yet scheduled |
| Fiordland | 2007 | Nil | Nil | Review not yet scheduled |
| Abel Tasman | 1986 | 2008 | Nil | Review not yet scheduled |
| Mount Aspiring | 1994 | 2011 | Nil | Review not yet scheduled |
| Rakiura | | 2011 | Nil | Review not yet scheduled |
| Whanganui | 1989 | 2012 | Nil | Current |
| Paparoa | 1992 | 2017 | Nil | Current |

**Figure 10.1: Status of National Park Management Plans**

- Ongoing impacts attributed to the 2013 restructuring of the Department, which removed presence and capacity at place, took focus away from the regions and concentrated expertise in the national office
- Lack of value attributed to CMS reviews within DOC and therefore a lack of prioritisation within the broader conservation system
- The complexity of navigating Treaty settlement requirements
- Difficulty in meeting the different expectations of iwi, hapū and whānau and ensuring section 4 compliance
- Jurisdictional complexity with some Conservation Board areas being altered and some sitting across more than one DOC operational office. This highlights the need for stability and for alignment between Board boundaries and DOC operational offices.

### *10.1.2 Outdated and inconsistent planning documents*

Ongoing delays in plan review have impacted the currency, consistency, clarity and so quality of CMSs and NPMPs and the provisions they contain. This has serious implications for multiple parts of the conservation system, including DOC permissions and operations, which depend on these documents for direction regarding what activities and uses may be approved, and what work is to be prioritised.

The numerous CMSs and NPMPs developed during the 1990s, which have not yet been reviewed, were not crafted to deal with many of the issues and pressures that now exist on conservation land. E-bikes and drones are just two examples of new technologies that were not on the radar of DOC planners in the mid 1990s and for which use has rapidly expanded. Visitor numbers at national parks have also increased dramatically during this period, and the broader context has fundamentally changed, with the impacts of climate change becoming much more frequent and serious.

In addition, the diversity of age across the different CMSs and NPMPs means the style and content of documents is highly variable. This reflects shifts in approach by DOC, relevant planning staff and Conservation Boards. It is also due to the Department's efforts, in recent years, to work in stronger partnership with iwi and hapū. It means that determining what is permitted, and what rules are applicable to concessions, often necessitates much legal advice and checking of multiple documents within the planning hierarchy.

The documents themselves can be internally inconsistent or confusing. Older NPMPs are often inconsistent with the applicable CMS and General Policies, so do not reflect current requirements. This means there is significant legal risk in relying on any single document in the hierarchy.

There is also a preponderance of discretional terminology across policies, strategies and planning documents. General Policies have not been used to set nationally enforceable standards and they leave considerable discretion to the Minister. This means that national policy is not driving a consistent approach through conservation management planning documents or setting clear requirements for decision-makers.

Many planning documents are outdated and do not address current challenges like new technologies and increased visitor numbers. The wide diversity in document age and style, internal inconsistencies and differences between planning and policy documents, makes them difficult to navigate and legally risky for permissions staff to rely on. The overuse of discretionary language has led to a lack of clear and enforceable standards. This all undermines the effective operation and implementation of the conservation management planning system.

### *10.1.3 Unclear institutional roles and relationships*

A further issue with the conservation management planning system, and one that EDS first noted in its *Conserving Nature* report, is that the roles and relationships of the different conservation institutions have become unclear over time.[7] The key institutions at play in this arena are DOC, the NZCA and Conservation Boards.

DOC plays a core role in the development of policy and planning documents, with the Director-General being responsible for preparing, in *consultation* with other parties, draft statements of General Policy,[8] CMSs[9] and NPMPs.[10] The Director-General is also responsible for coordinating the overall process for the development and review of these documents, including the public notification, submissions and hearings process.[11]

In turn, DOC is bound by those statutory documents. Section 17A of the Conservation Act specifies that DOC shall administer and manage conservation land and resources in accordance with statements of General Policy and CMSs. Similarly, section 43 of the National Parks Act provides that DOC has the role of administering national parks "in accordance with" the General Policies and relevant CMSs and NPMPs.

This all makes it clear that General Policies, as well as relevant planning documents, are intended to bind and direct the Department's management of the conservation estate. However, DOC's business planning is not connected to the conservation management planning system, so struggles to resource and operationalise planning documents. This means that despite such legislative direction, DOC's operations are primarily directed by non-statutory documents, which are better linked to the Department's internal systems.

In addition, and as discussed previously in Chapter 8, DOC's current management structure is heavily centralised. After the 2013 restructuring, significant expertise and capacity in the regions was lost, particularly in management, legal services, planning, science and technical advice.[12] These roles and expertise were central to the proper functioning and resourcing of the conservation management system.

While CMS documents are intended to direct DOC management at place, and DOC operational offices are the primary mechanism through which conservation management is *delivered*, the boundaries of CMSs (and NPMPs) are not configured to align with DOC's operational offices and these offices have little regulatory responsibility and connectivity to CMSs in their area.

The NZCA also has a strong role within the system, being the approval authority for CMSs, NPMPs and CMPs, and preparing and approving the General Policy for National Parks. It also has an important advisory role to the Minister and Director-General. However, the NZCA is wholly reliant on DOC for support and as discussed previously, its functions can be easily impeded if DOC is reluctant to supply information to enable the Authority to undertake investigations.

The regional Conservation Boards have the role of reviewing, amending and recommending for approval by the NZCA, CMSs (and NPMPs under section 45 of the National Parks Act) and reviewing, amending and even approving CMPs. The Boards also advise the NZCA and Director-General on "the implementation" of CMSs and CMPs. However, like the NZCA, Conservation Boards are incredibly reliant on DOC for prioritisation and support, and often struggle to obtain the resources and information to undertake these functions effectively.

DOC reporting on progress towards meeting objectives and milestones set in planning documents was highlighted by interviewees as being poor. There is also a lack of alignment between Conservation Board regions and DOC operational boundaries, meaning that some boards have one statutory manager as a central liaison point with the Department, others share a statutory manager with another board, and some boards have several statutory managers. Partly as a result of this lack of jurisdictional alignment, boards can struggle to obtain basic information on what activities and work is being undertaken in their CMS region, including information on concessions and the extent of animal control.

Unclear roles and relationships among key institutions has resulted in a lack of alignment, poor information flow, and difficulties in the effective implementation of conservation plans. DOC's business planning is not linked to, and fails to sufficiently prioritise, the conservation management planning system. Neither are the boundaries of DOC's regional operations aligned with those of Conservation Boards or CMSs. This impedes the funding for and implementation of planning documents. It means that, despite clear legislative direction that DOC administer the Act in accordance with relevant planning documents, they fail in practice to compete with other priorities and direct the work of the Department.

*Group arriving by helicopter, South Westland*

### *10.1.4 Data and information systems poorly configured to support planning*

One key aspect that EDS investigated as part of the independent review was the use of evidence-informed planning and decision-making. It was clear from interviewees that the data and information systems currently utilised by DOC are patchy, not joined up, and not fit for purpose in terms of informing conservation management planning.

A further issue identified by Conservation Boards, statutory managers and permissions advisors alike, was that existing frameworks are generally configured to capture data at a national, not regional scale. This is in order to meet DOC's reporting requirements and to inform national budgeting decisions rather than regional planning and operations.

There is a need for DOC's monitoring and information systems to be configured to meet the needs of the conservation management planning system. In particular, the system should enable information to be provided on a regional basis so that it can:

- Inform CMS and plan development and review;
- Inform operations and implementation of CMS and NPMP objectives and milestones;
- Enable better monitoring, tracking and reporting of progress towards meeting those objectives and milestones; and
- Support permissions decisions at the regional scale.

## 10.2 Māori within the conservation management planning system

Many of the issues for Māori in the conservation management planning system have already been canvassed in Part Two of this report and include outdated General Policies which do not comply with section 4, CMSs failing to identify relevant Treaty principles and set clear objectives and milestones for implementation, lack of partnership in developing and implementing planning documents, and lack of DOC presence at place.

DOC needs clearer statutory guidance for compliance with section 4 in the conservation management planning system. The General Policies need to be updated, as a matter of urgency, to reflect the full set of Tiriti principles currently identified. They need to identify a clear role for tangata whenua which is supported within an updated conservation management planning system. Crucially, the planning system needs to be much more strongly focused on, and supported at, place.

## 10.3 Public participation in the conservation system

In addition to formal statutory processes and institutional arrangements, there are numerous opportunities where the conservation system could and should engage more directly with the public. Policy 3 of each of the General Policies identifies a number of areas where public engagement *should* be sought, including through relationship-building, partnership to support conservation goals, use of negotiated agreements to formalise relationships, and consultation with those "interested in" conservation and to whom a specific proposal has significance. The General Policies also set out broad goals for encouraging active participation of the public in conservation work, and for DOC's educational and information role.

### *10.3.1 Role of conservation groups*

The appropriate role of local communities and conservation groups in conservation management is a continuing and evolving conversation. Increasingly, more participatory responses are being advocated by social scientists as a mechanism to directly grapple with community engagement and equity issues.[13] Recent research on eco-sanctuaries highlights the positive effect these have on indigenous biodiversity protection, demonstrating what is possible when communities are engaged in projects that aim to reconnect people with nature at the local level.[14]

*The Ōkārito Plant Project plants native plants on farms at no cost to the landowners*

**Spotlight on engaging the public in conservation**

A 2019 survey canvassed the level of public participation in "environment related activities" highlighting the types of activities people were most engaged in. Activities with the highest participation rates were those that could be undertaken in a domestic context: recycling, reducing waste and energy use, purchasing products marked as environmentally friendly, composting and gardening. More than 50 percent of people said they had been involved in such activities. Interestingly, around 50 percent of people had also visited a national park. This reflects the high value placed on national parks above other areas of the conservation estate.

Less popular but still important activities included visiting other natural areas, either making a donation to an environmental NGO or active participation in environmental organisations, replanting or restoration, and improvement projects. These were more common than might be expected, being undertaken by between 20 and 30 percent of those surveyed. Not only were almost 1 in 3 people actively engaged in conservation in some capacity, involvement in restoration and pest management projects and groups was noted as an "increasing trend".[15] However, only around 16 percent of people had taken part in hearings or consent processes about the environment.

What these surveys indicate is that only a minority of the population are likely to actively engage in formal conservation management planning or consenting (conservation or RMA) hearings and submissions processes. However, there is much more scope for participation in other arenas, given we know that the public is increasingly willing to take personal action, such as growing and selling native trees, promoting planting or participating in restoration work, or even just making a donation. These are areas where the conservation system could engage with the public more effectively.

Notably, of all groups, surveys found that Māori had the highest participation rates for 9 of the 15 activities reported on. In particular, the active involvement of Māori in replanting and restoration was "significantly higher" than any other group.[16]

There are estimated to be more than 600 community conservation groups in Aotearoa New Zealand with a combined membership of over 40,000 people.[17] In the 2020-2021 year, volunteers contributed the equivalent of around 37,000 workdays.[18] The work of these organisations makes a significant contribution to conservation, from restoration projects, to pest management and wildlife protection, to the management of tracks and historic places.[19] However, the conservation system provides few accessible mechanisms to support community-based conservation initiates or co-management approaches:

> The current system has no single, over-arching point of governance, leadership or coordination. Because of the vast number of players (each with their own governance and leadership structures), strategic policy, planning and implementation are for the most part carried out independently. This also means that there is no overarching accountability for any of the players, or at least no single body that actively monitors and polices the system and those in it. In any system, all players must play their roles effectively for the whole to be effective. Therefore, the challenge in the first instance is to try to link these structures".[20]

Not surprisingly, a recent study of ecosanctuaries, grassroots community development and partnerships with tāngata whenua found that most interviewees had not engaged with Te Mana o Te Taiao, and funding was limited, especially for the community education necessary for the nation to reach its biodiversity goals.[21] Community groups often struggle to engage with more powerful entities such as regional councils, and in the ecosanctuary space, there is frustration at the lack of enabling support for what those entitles are trying to do.[22] The system needs to support and harness the capacity and outreach potential of these entities more effectively. How we facilitate this needs much deeper thought.

Le Heron et al, after undertaking a national inventory of participatory approaches in Aotearoa New Zealand's marine space,[23] made a key observation that the most collaborative projects and initiatives that provide for enhanced public participation are "only possible because they are largely outside established formal institutions".[24] This is because collaborative projects are not actively enabled or supported by existing regulatory and policy frameworks. Groups and initiatives must emerge spontaneously and are then highly "reliant on wider acceptance into existing institutions" before change is initiated.[25]

There are also active barriers to restoration work that need to be addressed. An example is the complex set of permissions required to take parts of plants or seeds from conservation land to support restoration work, or to introduce indigenous flora to conservation land for the purposes of restoration.[26] Indeed there is scant reference to or support for "restoration" in any conservation legislation.

There is a need for the conservation management planning system and DOC, in conjunction with Conservation Boards, to better harness and support the considerable energy, capacity and capabilities of the myriad of community conservation groups and conservation initiatives of tangata whenua and local communities. Consideration should be given to the establishment of regional community conservation hubs and other ways in which DOC might better support and connect-up these entities.

In order to inform work in this area, the Department should consider surveying the array of community conservation groups to identify what support they need and what impediments they experience. More effective publicity, education and communication is also important, so the conservation system is more visible, and the ways people can become involved is clearer.

### *10.3.2 Role of citizen science*

'Citizen science' comprises public participation in science, research and data gathering systems. It can be a powerful driver for people to engage in the conservation system.[27] The sheer number of potential 'extra boots on the ground' that could be harnessed as data collectors and observers through citizen science also represents an under-utilised resource.

Citizen science is in many ways what iwi, hapū and whānau have been doing for centuries, interacting with, observing and recording the conditions and trends they see all around them. While there are significant points of difference between the two approaches (for example cultural sensitivities around data) mechanisms designed to expand knowledge inputs more broadly would enhance the deployment of both.

There is a need to develop criteria and guidance for policy-makers, funding agencies and citizens, so that better quality control mechanisms for citizen science are in place.[28] A lack of clear policy, standards and guidelines is a significant barrier, since policy-makers tend to be reluctant to use data generated in citizen science projects for the purposes of decision-making[29] thereby decreasing its value, use and credibility. Support, resources and funding to provide such a support framework is also currently lacking.[30]

**Spotlight on the New Zealand Bird Atlas[31]**

The New Zealand Bird Atlas is a five-year project collating information on what bird species are in the country and where they are located. People can submit sightings (checklists) through an "eBird app" which allows them to log counts year round as well as view sightings by others. The eBird app divides the country up into 10 km² blocks allowing comparison of bird species and numbers around Aotearoa New Zealand.

The project aims to capture an up-to-date dataset which will be compared to data collected in a similar project conducted 20 years ago. This will help identify changes resulting from urban sprawl, habitat loss and the impacts of introduced species. This can, in turn, inform conservation and local government policy and planning.

The conservation management planning system needs to incorporate diverse forms of knowledge including that generated by citizen science. This includes considering what forms of support, funding and other resources might be required to strengthen the citizen science movement in Aotearoa New Zealand.

## 10.4 Protected area designation

At present, land designations are scattered across the Wildlife Act, Reserves Act, Conservation Act and National Parks Act. The complexity of navigating the requirements for the myriad of land designations in place, under different statutory regimes, has long been acknowledged as a problem. At the time the Conservation Act was introduced, such a rationalisation and consolidation project was canvassed, but the task was deferred to another day.[32]

The scope of our research did not include in-depth examination of conservation land classifications and legislative provision for protected areas. However, EDS engaged ecologist Mike Harding to review the current system and provide advice. Figure 10.2 sets out his recommendations for updating land designations, comparing existing conservation area designations with the proposed new regime.

Harding proposes reducing the number of designations from 26 to 12, in order to reduce duplication, as well as adding five new designations. This would bring the total to 17. The proposal gives prominence to the Reserves Act, transferring existing designations under the Conservation Act and Wildlife Act to that legislative framework. This could be retitled as a *Protected Areas Act.*

| Existing Conservation Area Designation | Proposed Conservation Area Designation (Likely designation, subject to assessment) |
|---|---|
| **Wildlife Act 1953** | |
| Wildlife Sanctuary | Scenic Reserve or Nature Reserve (Reserves Act) |
| Wildlife Refuge | Scenic Reserve or Nature Reserve (Reserves Act) |
| Wildlife Management Reserve | Wildlife Management Reserve or Scientific Reserve (Reserves Act) |
| **Reserves Act 1977** | |
| Recreation Reserve | Recreation Reserve (Reserves Act) |
| Historic Reserve | Historic Reserve (Reserves Act) |
| Scenic Reserve s 19(a) | Scenic Reserve (Reserves Act) |
| Scenic Reserve s 19(b) | Local Purpose Reserve or Scenic Reserve (Reserves Act) |
| Nature Reserve | Nature Reserve, Local Purpose Reserve or Scenic Reserve (Reserves Act) |
| Scientific Reserve | Scientific Reserve (Reserves Act) |
| Government Purpose Reserve | Government Purpose Reserve (Reserves Act) |
| Local Purpose Reserve | Local Purpose Reserve (Reserves Act) |
| National Reserve | National Park (National Parks Act) or Scenic Reserve (Reserves Act) |
| **National Parks Act 1980** | |
| National Park | National Park (National Parks Act) |
| Specially Protected Area | Specially Protected Area (National Parks Act) |
| Wilderness Area | Wilderness Area (National Parks Act) |
| Amenity Area | Amenity Area (National Parks Act) |
| **Conservation Act 1987** | |
| Conservation Park | Conservation Park (Reserves Act) |
| Wilderness Area | Wilderness Reserve (Reserves Act) |
| Ecological Area | Scenic Reserve, Nature Reserve, Scientific Reserve, or Climate Adaptation Reserve (Reserves Act) |
| Sanctuary Area | Scenic Reserve, Nature Reserve, Scientific Reserve, or Climate Adaptation Reserve (Reserves Act) |
| Watercourse Area | Scenic Reserve, Riparian Reserve or Floodplain Reserve (Reserves Act) |
| Amenity Area | Recreation Reserve or Local Purpose Reserve (Reserves Act) |
| Wildlife Management Area | Wildlife Management Reserve (Reserves Act) |
| Marginal Strip | Riparian Reserve or Floodplain Reserve (Reserves Act) |
| Stewardship Area | Any designation, subject to assessment. |

**Figure 10.2: Proposed conservation area designation reclassification**

Five new area designations are proposed. Three of these – Wilderness Reserves, Wildlife Management Reserves and Riparian Reserves – largely replace existing designations. Two further reserve types are new and respond to climate change impacts:

- *Floodplain Reserves* for the purpose of maintaining the natural floodplain of waterways free of structures and activities that may obstruct or hinder the natural hydrological functioning of the waterway, including during climate-induced flood events; while wherever possible providing for the protection and restoration of indigenous biodiversity and ecological processes. Watercourse Areas and Marginal Strips would be reclassified as Floodplain Reserves.

- *Climate Adaptation Reserves* for the purpose of protecting areas for their potential to support or restore indigenous biodiversity and ecological processes, and to enable adaptation or evolution of indigenous biodiversity in response to natural or human-induced changes to the environment. These would protect areas which may have low to no existing ecological values, but which have been identified as important for inland migration of species and ecosystems (coastal retreat) or for species movement or adaptation in response to natural or human-induced changes to the environment.

***Eroding dunes at Tāhunanui Beach, Nelson. Climate Adaptation Reserves could provide for the inland migration of species and ecosystems in response to sea-level rise***

Changes to the protected areas regime could include:

- Rationalising and consolidating existing protected area designations (building on the proposals shown in Figure 10.2), under a reformed Reserves Act, which could be renamed a Protected Areas Act.

- Modernising the terminology of purposes provisions and descriptions of area designations so they reference "indigenous biodiversity" and "ecological integrity" (instead of natural state), as appropriate.

- Strengthening provision for the protection of Māori cultural values. Specific consideration, in consultation with Māori, should also be given to the need for specific cultural or taonga reserves.

- Providing for new area designations for 'floodplains reserves' and 'climate adaptation reserves' to support climate change adaptation and the restoration and adaptation of indigenous biodiversity. Ensuring some reserves are moveable, not fixed will also be important.

- Retaining the National Parks Act but updating it.

The above review of land designations is only very preliminary and does not extend into the marine space. It is intended as an initial contribution to a much needed more comprehensive and inclusive national conversation on protected area reform.

## 10.5 A new conservation management planning system

EDS's independent review of the conservation management planning system set out concrete proposals for reform. It did so acknowledging that there is no 'ideal' system, given the considerable complexities that conservation management faces, particularly with the growing biodiversity and climate change crises. The report's recommendations for what a reformed system could look like are discussed below and summarised in Figure 10.3.

### *10.5.1 New national documents*

At present, the General Policies contain gaps, unnecessary duplication and lack binding standards. Under the new recommended system a *Conservation Policy Statement* would replace the General Policies. It would be mandatory, approved by the Minister and binding on Ministerial decision-making. It would also bind new Regional Conservation Plans and consents (see more detail on these below).

**Spotlight on change to General Policies to better support Tiriti partnership**

In the new Conservation Policy Statement, which we have recommended should replace the General Policies, the following changes would need to be made to better reflect Tiriti partnership:

- Update the policy settings to mandate working in partnership with tangata whenua (removing current "will" and "should" direction")
- Update the list of Treaty Principles to reflect the most recent articulation by the courts and Waitangi Tribunal
- Confine use of the term "partnership" for Treaty partners, and adopt different terminology for work with commercial entities (eg sponsors) and community groups (eg teams)
- Set clear policies and guidelines to facilitate customary use, within carefully prescribed limits and criteria
- Provide for a "reasonable degree of preference" to be provided to tangata whenua in conservation decision-making.

It will be important for policies made in relation to or impacting on, tangata whenua interests and values, to be developed in partnership with them.

New *National Conservation Standards* would set prescribed national rules, including targeted standards for different components of the conservation management planning system. The standards would be binding on Regional Conservation Plans and consents. They would include a template for Regional Conservation Plans to simplify plans and ensure consistency. They could also include mandatory requirements for consents and specify requirements for different categories of activity.

### *10.5.2 New plans*

*Regional Conservation Plans* would be at the heart of the new conservation planning system, and would replace CMSs and potentially NPMPs and CMPs. They would:

- Provide mandatory information on conservation values
- Set objectives for the integrated management of those values
- Set objectives for recreation, tourism and other activities
- Set policies and criteria for processing consents – including activity categories, which activities are permitted, discretionary or prohibited and criteria for considering consent applications
- Clearly outline Tiriti partner roles and any protocols or requirements in relation to these
- Be required to have "particular regard" to planning documents prepared by iwi authorities
- Have a mandatory review every 10 years.

A key element of the new system is that these planning documents would minimise the overuse of discretionary language so as to establish clear and enforceable standards. It is envisaged, in the streamlined planning model (shown in Figure 10.3), that NPMPs would be incorporated into the broader Regional Conservation Plans. Many existing NPMPs are extremely out of date at present, demonstrating that the planning regime under the National Parks Act is not currently being prioritised, and the currency of plans is not being maintained. Indeed planning and management of national parks may be improved through being incorporated into Regional Conservation Plans.

In addition to existing NPMPs mandated under the National Parks Act, a number of other mechanisms provide for more site specific management planning. These can be generated by Reserve Boards and authorities under the Reserves Act, by iwi under bespoke Treaty settlement agreements, or by DOC through the CMP provisions in the Conservation Act.

Many of these site-based and bespoke management plans may be driving higher management standards in areas that are highly valued. If the broad preference is to retain such plans (including NPMPs), provision could be

made to do so, on a case-by-case basis, and for these to operate as new *Overlay Plans* which provide increased management detail, including devolved management, at specific sites.

*Regional Operational Plans* would be developed to support the implementation of Regional Conservation Plans and would set out DOC's annual workplan for a region over the short term (1-3 yrs). They would also detail DOC's annual operational expenditure and inform the Department's Business Plans. Formal public reporting on implementation and progress would be mandatory and would be provided to Conservation Boards and Kura Taiao Boards (if established). The operational plans would increase transparency and accountability and introduce an important funding lever.

The Director-General would also have the role of preparing a publicly available *Conservation Annual Review Report* which would assess the implementation of management actions specified in the Regional Operational Plans as well as the effectiveness of the administration of the National Policy Statement, Regional Conservation Plans and consents. This would improve accountability and transparency. Better tracking of progress would also help inform budgeting and operational priorities and provide insights that could be linked to longer-term management planning.

Some interviewees raised concerns at the increased role of the Minister of Conservation under this model. In particular, there is a risk that increased political influence might reduce certainty and consistency, making the regime more prone to shift in response to political cycles. At present, the NZCA approves CMSs, which are the equivalent to the new proposed Regional Conservation Plans. The Minister already approves the Conservation General Policy (although the NZCA approves national policy that relates to national parks) so Ministerial approval of a Conservation Policy Statement is a more minor adjustment.

Whether final approval should lie with the NZCA or the Minister is a matter that needs to be reviewed in more detail. Which pathway is preferrable will depend on a number of factors, including changes to institutional settings and any reconfiguration of the NZCA and its membership and functions. Additional checks and balances would also need to be put in place to prevent Ministerial over-reach, such as clear priorities and criteria that must be considered, and which would guide the approval process and increase accountability.

### *10.5.3 New planning procedures*

The Conservation Policy Statement and National Conservation Standards would be initially prepared by the Director-General, with comments and recommendations on the drafts invited from Tiriti Partners, the NZCA and Kura Taiao Council, as well as Conservation Boards and Kura Taiao Boards. The Director-General would then publicly notify the proposed document and take submissions.

An Independent Hearings Panel would be established by the Minister to hear submissions on the documents and make recommendations. DOC would manage the submission and hearing process on delegated authority from the Director-General. The Department would also prepare a report on submissions for the Independent Hearings Panel recommending any changes to the draft document. The NZCA, Kura Taiao Council and Te Tiriti partners would provide final comments on the Panel's recommendations to the Minister. Any dissenting views should be recorded.

Final approval would be by the Minister, following consideration of the Panel's recommendations and feedback from the NZCA, Kura Taiao Council and Tiriti partners.

***Rakitu Arid Island is a scenic reserve managed by DOC***

**Spotlight on Independent Hearings Panels**

To streamline the consultation process for both policy and plan development, we recommend that Independent Hearings Panels be established. Panels would:

- Hear submissions on the proposed Conservation Policy Statement and National Conservation Standards and make recommendations to the Minister on any amendments;
- Hear submissions on Regional Conservation Plans and consider and provide recommendations to the Minister prior to their approval; and
- Be appointed by the Minister.

At present, hearings panels are set up on an ad hoc basis and comprise a mixture of DOC staff and Conservation Board members. The functions, role and membership criteria are not statutorily proscribed. Our recommendations would clarify and strengthen the role of hearings panels, including through providing them with the power to make recommendations to the Minister. We tested this proposal with a number of interviewees and it had broad support. It formalises a part of the process that is already in place on an ad hoc basis.

Panel membership would need to be based on clear statutory criteria. At the regional planning level, appointment of an Independent Hearing Panel would enable bespoke membership arrangements, appropriate to a region and local issues, to be established. The panel should include representatives from hapū, iwi and Māori alongside Conservation Board representatives and other experts (including potentially NZCA members). Members should be appointed based on their knowledge, skill and experience of the statutory framework and the subject matter under consideration. Collectively, members should have legal, planning, tikanga Māori and other relevant technical expertise. Persons with a conflict of interest should be prohibited from appointment to the Panel.

There would be a requirement for members to work collectively to achieve the purpose of the Act and to strive for consensus. Additional provision should be made for minority reports in order to record dissent. This latter aspect greatly increases transparency and enhances information on core matters under contention.

A core point of difference at the regional plan-making level, from the current system, is much greater involvement of regionally based conservation entities. Regional Conservation Plans would be prepared collaboratively by the Conservation Board, Kura Taiao Board, relevant Tiriti Partners and the Director-General. The Director-General would then seek comments on the draft plan from the NZCA and Kura Taiao Council before publicly notify the Proposed Plan and inviting submissions.

An Independent Hearings Panel (as described in the spotlight) would be established by the Minister to hear submissions and make recommendations on them to the Minister. DOC would manage the hearings and submissions process on delegated authority from the Director-General, and prepare the submissions report, including recommendations to the Panel on any amendments to the plan. The NZCA, Kura Taiao Council and Tiriti partners would provide final comments on the Panel's recommendations to the Minister. Any dissenting views would be recorded. Final approval would be by the Minister.

The above arrangements carve out a clearer statutory role for Tiriti partners and Conservation Boards, and also see a strengthening of the role of the Minister. The quid pro quo of the latter is that the Minister would also be bound by more directive documents. The role of the Director-General remains substantially unchanged.

There are increased risks associated with the strengthened Ministerial role, and movement towards such a framework should only occur alongside acknowledgement that Ministerial discretion can be fettered and the revision of documents to set clearer, more directive and binding policies. As set out in Chapter 8, a strengthened oversight role for the NZCA has also been proposed as part of improving system checks and balances.

### *10.5.4 New consenting system*

A new *consenting system* would replace concessions, thereby shifting the terminology from "permission" to "consent", a term more linked to the resource management system. This would help make it clear that the use of public conservation land is a privilege rather than a right.

The consenting system would sit beneath the above documents in the planning hierarchy and be bound by them. Detailed 'activity categories' identifying what activities are permitted, discretionary and prohibited would be set out within the Regional Conservation Plan. For clarity, statutory direction should be provided to make it clear that prohibited activities can be prescribed (and will bind the Minister). Plans would also

prescribe criteria for public notification of consent applications and set out the Tiriti partner role in relation to these.

Consent fees for each application should be required to cover the full cost of application assessment and compliance monitoring. This would help ensure sufficient funding for DOC's significant monitoring function. If DOC is unable to effectively assess and monitor a consent application, then a precautionary approach should be adopted, with a requirement that it must not be granted. Providing for more robust monitoring would support a shift to a more responsive and evidence-based regime.

A range of additional changes would also help improve the consenting system:

- *Monitoring and compliance:* A revised Conservation Act should place an obligation on DOC to regularly monitor and report on consents and the consenting system more broadly. This is to ensure that the impacts of consented activities on conservation values are regularly measured and communicated to the public and costs factored into consent fees.

- *Clearer direction:* Use of "may" and "should" directions within the Conservation Policy Statement and Regional Conservation Plans should be avoided. Where specific standards cannot be set, clear criteria and priorities should be provided to direct decision-makers. This should include clear limits and targets, including ones to ensure commercial activity does not cumulatively degrade conservation values.

- *Positive conservation outcomes:* The consents system needs to be refocused on delivering positive conservation outcomes rather than mitigating effects. For example, the new Conservation Policy Statement could explicitly address the interface between tourism and conservation, encourage sustainable and regenerative tourism, and identify ways operators will be expected to make a positive contribution. This could include guidance for engaging tourism operators and their customers in conservation activities like pest and weed control, replanting and hut and track maintenance, with details elaborated within Regional Conservation Plans.

- *Tendering and allocation of consents:* The current 'first come first served' model of granting concessions favours incumbents, making it difficult for new entrants to establish potentially more innovative and sustainable operating models, including tourism offerings. This is also a barrier to iwi and hapū groups who may find it difficult to obtain access to tourism opportunities within their rohe. A reformed Conservation Act needs to provide a revised consenting framework that enables a range of allocation mechanisms including first in, first served, financial tendering, weighted attribute tendering (where a range of weighted criteria are considered), auctioning and balloting. This could draw on the approach taken to allocating coastal marine space for aquaculture under the RMA. Options should be designed that will enable priority to be provided to iwi and hapū and to applicants who can demonstrate positive conservation outcomes.

- *Climate change adaptation and emissions:* Decision-makers must be required to consider climate change and emissions reduction targets when approving any new consent application. Conditions of consent should be able to modified where it is considered necessary to enable adaptation to the effects of climate change or to reduce the risks from natural hazards (see next bullet).

- *Greater powers to review conditions and cancel consents:* DOC needs to be provided with greater ability to review the conditions on consents, and to alter them, even cancelling consents on a carefully proscribed basis. Such power could be restricted to an "exceptional circumstances" test or criteria such as that "significant impacts on indigenous wildlife" have become evident. The inability to cancel a consent or adjust its conditions based on new information undermines a more adaptive management framework and precautionary approach. Such review provisions could be modelled on those in the recent Natural and Built Environment Act (now repealed).


***Tourism vessels berthed at Piopiotahi Milford Sound***

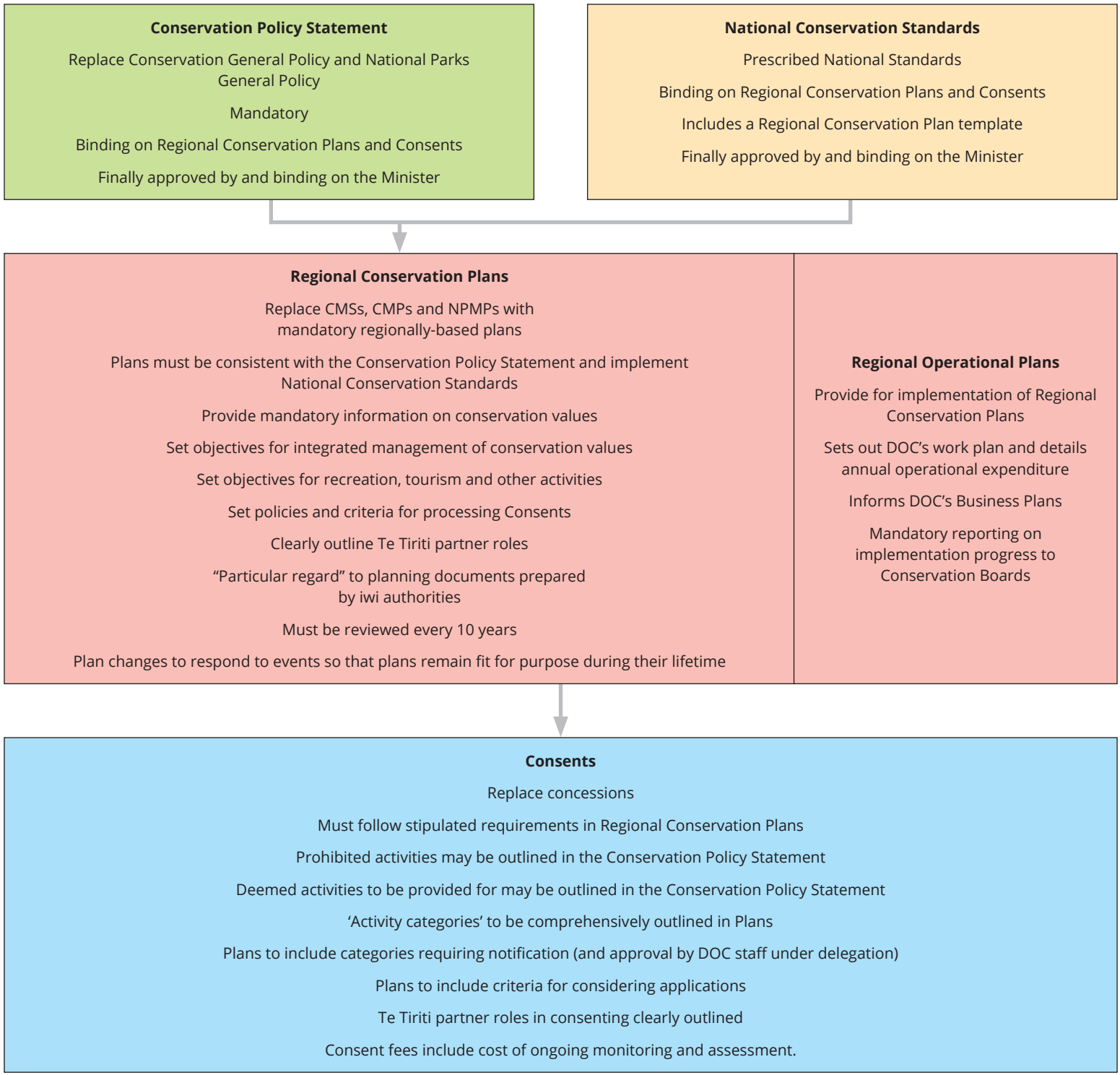



**Figure 10.3: Summary of a proposed strengthened conservation management planning system**

## 10.6 Recommendations for reform

Recommendations for reform of conservation management planning system

1. *Replace the Conservation General Policy and the National Parks General Policy with a single Conservation Policy Statement*: This would, amongst other things, set out clearly how section 4 is to be implemented within the planning system. The Statement would be mandatory, would be approved by the Minister, and would be binding on Ministerial decision-making.

2. *Provide for new statutory National Conservation Standards:* These would set national rules for the conservation management planning system, including targeted standards for different components. The Standards would include a template for Regional Conservation Plans (see below) to simplify plans and provide consistency between them. Such standards could also include mandatory matters that apply to consents and specify the application of activity categories to consenting.

3. *Replace CMSs, CMPs and NPMPs with Regional Conservation Plans*: Such plans would need to be mandatory and consistent with the National Policy Statement and any National Conservation Standards (including the plan template) referenced above. The Plans would be approved by the Minister and be binding on Ministerial decision-making.

4. *Require Regional Operational Plans: These* would set out the DOC annual workplan over the short term (1-3 years) to implement the Regional Conservation Plans and identify associated operational expenditure. The Plans would be mandatory, as would reporting progress to Conservation Boards towards implementing them.

5. *Replace concessions with consents*: Activity categories would be set out in the Regional Conservation Plans and could include permitted, discretionary and prohibited activities. Plans would prescribe criteria for the public notification of consent applications.

16. *Rationalise and consolidate existing protected area designations*: This could be under a reformed Reserves Act which could be renamed a Protected Areas Act. It could provide for new area designations for 'floodplains reserves' and 'climate adaptation reserves'. Specific consideration, in consultation with Māori, should also be given to the need for specific cultural or taonga reserves.

*Po at Arataki Visitor Centre, Waitākere Ranges Regional Park*

**Endnotes**

1 Koolen-Bourke D, R Peart, B Wilde and T Turner, 2021, *Independent review of the conservation management planning system*, Environmental Defence Society, Auckland

2 Section 17B(1), Conservation Act 1987

3 Section 44A, National Parks Act 1980

4 Section 44A(2), National Parks Act 1980

5 Section 17W(1), Conservation Act 1987

6 These include Nelson/Marlborough, Bay of Plenty, East Coast Hawkes Bay and Chatham Islands. The Tongariro-Taupō CMS dates to 2002.

7 In EDS's *Conserving Nature* report we detailed a number of examples of DOC non-compliance with statutory and planning provisions, in particular see chapter 3 of Koolen-Bourke D and R Peart, 2021, *Conserving Nature: Conservation reform issues paper*, Environmental Defence Society, 44

8 Section 17B, Conservation Act 1987

9 Section 17D(2), Conservation Act 1987

10 Section 44(2), National Parks Act 1980

11 Under sections 17B and 17F of the Conservation Act respectively.

12 https://www.doc.govt.nz/news/media-releases/2011/doc-to-re-organise-support-systems-for-field-staff/

13 Sanborn T and J Jung, 2021, 'Intersecting social science and conservation', *Frontiers in Marine Science,* 8, 676394

14 Scott B, 2022, *Ecosanctuaries, grassroots community development and partnerships with tangata whenua: A post-development perspective*, (A thesis presented in partial fulfilment of the requirements for the degree of Masters in International Development, Massey University, Palmerston North)

15 Hughey K, G Kerr and R Cullen, 2019, *Public perceptions of New Zealand's environment: 2019,* Lincoln University, Lincoln, 21

16 Ibid at 20

17 Scott B, 2022, *Ecosanctuaries, grassroots community development and partnerships with tangata whenua: A post-development perspective*, (A thesis presented in partial fulfilment of the requirements for the degree of Masters in International Development, Massey University, Palmerston North), 30

18 Department of Conservation, 2021, *Department of Conservation annual report for the year ended 30 June 2021,* Department of Conservation, Wellington, 47

19 Peters M, D Hamilton and C Eames, 2015, 'Action on the ground: A review of community environmental groups restoration objectives, activities and partnerships in New Zealand', *New Zealand Journal of Ecology,* 39(2), 179

20 Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020,* Department of Conservation, Wellington, 22

21 Burnett S, 2023, *Ecosanctuaries, grassroots community development and partnerships with tangata whenua: A postdevelopment perspective*, (A thesis present in partial fulfilment of the requirements for the degree of Master of International Development, Massey University, Palmerston North), 71

22 Ibid at 74

23 Le Heron E, J Logie, W Allen, R Le Heron, P Blackett, K Davies, A Greenaway, B Glavoic and D Hikuroa, 2019, 'Diversity, contestation, participation in Aotearoa New Zealand's multi-user marine spaces', *Marine Policy*, 106, 103536

24 Ibid

25 Ibid

26 For example, see section 30 of the Conservation Act 1987 and section 5 of the National Parks Act 1980

27 See spotlight 'Everyone is a scientist' in Department of Conservation and Land Information New Zealand, 2023, *Long-term insights briefing: How can we help biodiversity thrive through innovative use of information and emerging technologies?* Department of Conservation, Wellington, 30

28 See discussion in Heigl F, B Kieslinger and K Paul, 2019, 'Toward an international definition of citizen science', *Proceedings of the National Academy of Sciences,* 116(17), 8089

29 Heigl F, B Kieslinger and K Paul, 2019, 'Toward an international definition of citizen science', *Proceedings of the National Academy of Sciences,* 116(17), 8092

30 See spotlight 'Everyone is a scientist' in Department of Conservation and Land Information New Zealand, 2023, *Long-term insights briefing: How can we help biodiversity thrive through innovative use of information and emerging technologies?* Department of Conservation, Wellington, 30

31 https://www.sciencelearn.org.nz/resources/2724-ebird

32 See more detailed discussion in Koolen-Bourke D and R Peart, 2021, *Conserving nature: Conservation law reform issues paper,* Environmental Defence Society, Auckland, 29-30

# 11 Funding conservation[1]

*Tourists at Lindis Pass scenic reserve*

As highlighted in the previous chapters, the conservation system needs to be adequately funded and resourced to operate efficiently. At present it is not. Setting ambitious goals through conservation law reform becomes futile if the system is undervalued and DOC lacks the necessary resources, capacity and capability to fulfil even its core statutory functions.

The challenge of effectively funding biodiversity protection is a global one. Internationally, there is a significant gap between the funding needed for nature conservation and the resources provided for the task. This chapter discusses the historical underfunding of conservation efforts and canvasses a number of potential solutions. It then sets out a range of options and recommendations that could assist to bridge the funding gap.

## 11.1 The funding gap

Globally, the biodiversity finance gap has been estimated at between $598 and $824 billion USD per year based on 2019 figures. This is around five times the quantum of actual biodiversity spending which was estimated at $124 to $143 billion per year.[2] It is not known what the size of the biodiversity funding gap is in Aotearoa New Zealand, but given the country's large jurisdiction (including an extensive exclusive economic zone), relatively small population and high percentage of endemic species, the finance needs per capita are likely to be relatively large and the funding gap significant.

Underpinning this funding gap is a lack of recognition that the economy operates within the biosphere and depends upon it. In other words nature provides an underlying asset base for economic activity, and to the extent the natural asset base continues to be degraded, the sustainability of the economy and society is threatened.[3] As highlighted in the recent UK Dasgupta review of the economics of biodiversity,[4] because nature's true worth to society is not reflected in market prices, we have underinvested in natural assets. If the asset value of nature was more explicitly recognised in market decisions, capital would be reallocated into investing in biodiversity protection and restoration.

It is well acknowledged that conservation in Aotearoa New Zealand has been underfunded for a long time. In *Conserving Nature* we traversed the historical context to the funding of DOC. In short, when DOC was established it was provided with only two-thirds of the pre-1987 conservation budget. This was insufficient to support the functioning of the organisation and prompted an early restructuring. This was followed by further restructurings and losses of staff due to additional budget cuts. Of particular note is the 2013 budget cut where DOC was required to save an additional $8.7 million on the back of a $54 million funding cut in 2012. At the same time government announced an additional $158 million for tourism promotion thereby increasing the visitor pressures that DOC was required to manage with less resource.[5]

DOC's funding has gone through a number of expansion and contraction periods which have created budgetary uncertainties within the organisation and hindered long term planning (See Figure 11.1).[6] Such uncertainty in funding can make it difficult for an organisation to maintain essential services and functions including performance of statutory functions. DOC is currently undertaking a review of its baseline funding and future capability to better understand the scope and costs of its work programme and what can be delivered.[7]

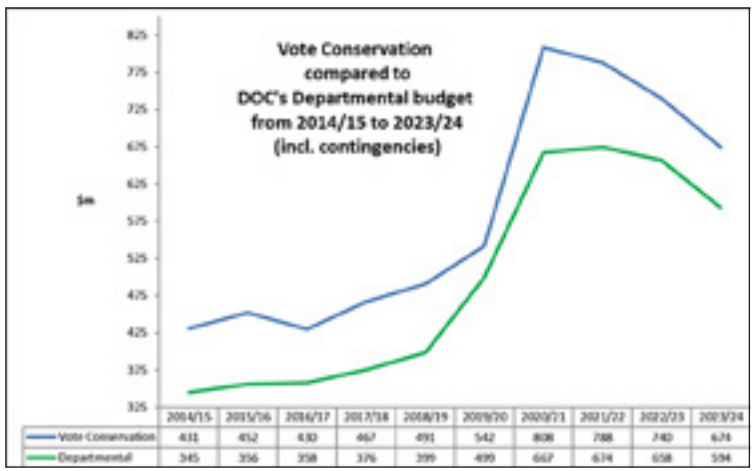



**Figure 11.1: Changes in DOC and Vote Conservation Budgets 2014/15 – 2023/2024** *(Source: Department of Conservation)*[8]

As highlighted in Chapter 8, the NZCA and Conservation Boards are also significantly underfunded, with the NZCA budget being just $150,000 per annum. The Boards operate on average budgets of just $30-35,000 per annum (see Figure 11.2). These entities play a core role in the conservation management planning system, and are important advocates in the resource management space, but operate on a shoestring.

| Statutory Bodies | 2022/23 | 2021/22 | 2020/21 |
|---|---|---|---|
| New Zealand Conservation Authority | $148,000 | $148,000 | $148,000 |
| Te Hiku o Te lka CB | $33,520 | $33,520 | $36,000 |
| Northland CB | $32,000 | $32,000 | $36,000 |
| Auckland CB | $35,000 | $35,000 | $35,000 |
| Waikato CB | $36,500 | $36,500 | $36,500 |
| Bay of Plenty CB | $24,000 | $24,000 | $21,994 |
| East Coast Hawke's Bay CB | $34,000 | $34,000 | $34,000 |
| Tongariro Taupo CB | $24,000 | $24,000 | $27,197 |
| Taranaki Whanganui CB | $36,500 | $36,500 | $36,500 |
| Wellington CB | $36,000 | $36,000 | $36,000 |
| Chatham Islands CB | $25,000 | $25,000 | $25,000 |
| Nelson Marlborough CB | $31,000 | $31,000 | $31,000 |
| West Coast Tai Poutini CB | $48,000 | $48,000 | $44,000 |
| Canterbury Aoraki CB | $57,000 | $57,000 | $57,000 |
| Otago CB | $82,650 | *$82,650 | $63,010 |
| Southland CB | $34,000 | $34,000 | $34,000 |
| **TOTAL** | **$717,170** | **$717,170** | **$701,201** |

**Figure 11.2: Conservation Board budgets 2020-2022** *(Source: Vote Conservation)*[9]

***Queen Charlotte Sound. Much of land in the Sound is scenic reserve managed by DOC***

To put this in perspective, central government funding for the Game Animal Council in 2022/23 was $670,000, a figure not far shy of the budget of the NZCA and Conservation Boards combined. This highlights the stark disparities between the funding of conservation entities. As noted in *Conserving Nature*:

> Regardless of any legislative reforms that might be made to the conservation management system, without a more adequate and reliable income stream over multiple electoral cycles, DOC will continue to struggle to undertake its core function – the effective management and protection of Aotearoa New Zealand's unique indigenous species, its waters and one third of the country's most precious lands.[10]

Conservation has been historically underfunded, and the ongoing cycle of budget fluctuations has impeded long-term planning, the undertaking of critical functions by DOC and the functioning of other core conservation institutions. Such lack of investment reflects a fundamental undervaluing of nature and under-appreciation of its role in supporting the economy. Greater investment in biodiversity protection and restoration is required to bridge the financing gap.

## 11.2 Current sources of funding

As shown in Figure 11.3, which is an estimate of total biodiversity finance in Aotearoa New Zealand undertaken by Envirostrat,[11] most of DOC's budget (90.7%) is sourced from government. The Department also raises funds from charges, cost recovery and retail operations (2.3%) and donations (3.8%). Concessions also generate revenue (3.2%), although this is strictly speaking revenue that is collected by DOC on behalf of the Crown, rather than being paid directly to DOC.

*Commercial guided trip in Aoraki Mount Cook National Park*

**Total Biodiversity Finance is:**
$1,422.3 million NZD

**DOC's budget:**

- 3.2% from concessions

- 2.3% from other sources (cost recoveries, retail).

- 3.8% donations

- 90.7% GOVT

*All values are in millions of NZD.*

EnviroStrat

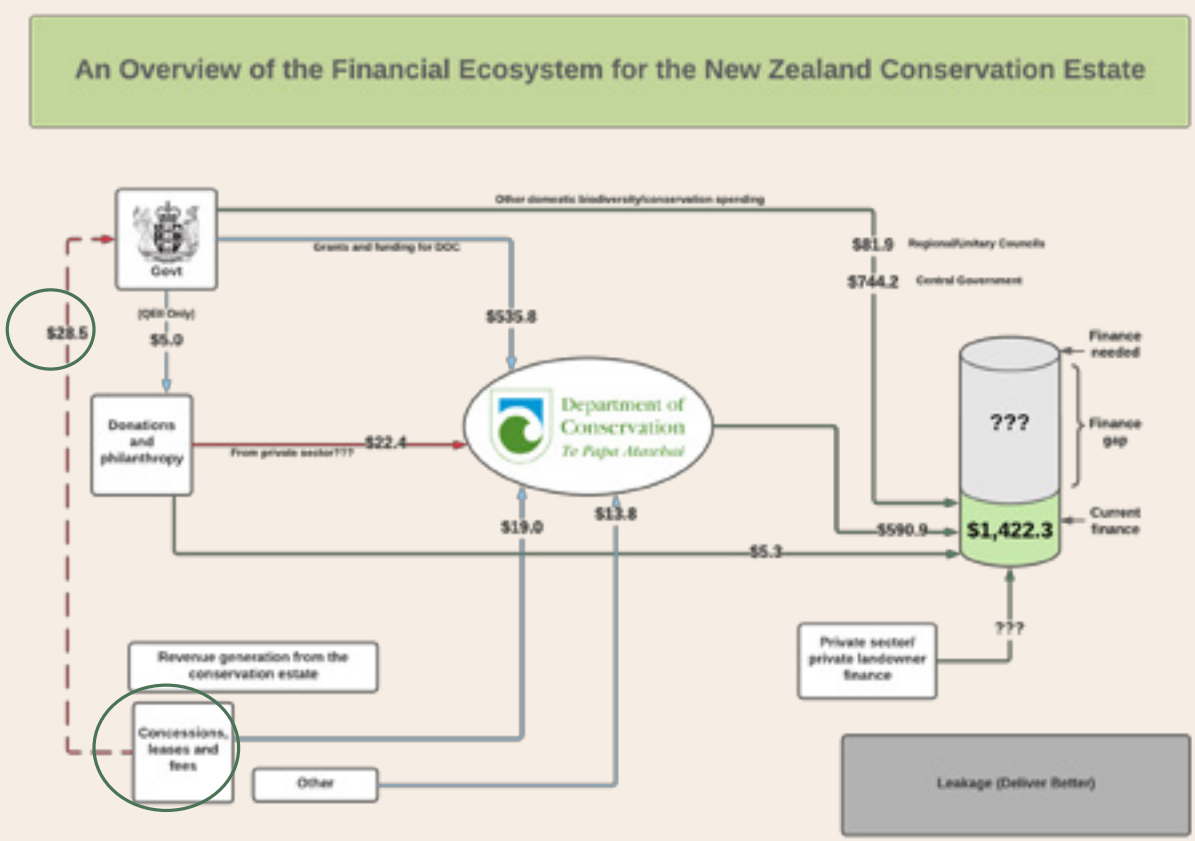



**Figure 11.3: Overview of the financial ecosystem for the conservation estate**

Regional and unitary councils also invest a significant amount in biodiversity conservation, with direct spending estimated at close to $82 million a year (see Figure 11.4). However, this amount is less than three percent of total rate collection by those councils, potentially indicating the low priority that biodiversity conservation is given in budgetary decisions. There is an interesting variation between councils, with some rural councils with a large dairy sector (such as Horizons, Taranaki and Waikato) spending more than 10 percent of their rates on biodiversity while others such as Southland spend much less (only 1.2%).

## 11.3 Recognising the value of the conservation estate to tourism

Tourism in Aotearoa New Zealand, and the marketing of it, relies strongly on the '100% Pure' brand. Environmental attributes (such as beautiful scenery, walks, lakes and biodiversity) attract domestic and international tourists to a wide variety of sites around the country. Thus the environment generates recreational value (non-market use value).[12]

While it is difficult to estimate such values directly, it is possible to roughly estimate the value added to tourism by such natural assets. This is on the basis that many operators in the tourism industry (accommodation providers, hospitality businesses and recreational activity businesses) rely directly on conservation land and/or its contribution to the attractiveness of the country to tourists.

In rough terms, given that around a third of the country's land area (32.2%) is managed by DOC as conservation land, this area could be expected to support at least a third of the added value created by the tourism sector. This is likely an under-estimate as conservation land will inherently have greater environmental value/attraction on average than the remaining two thirds of the country's land.[13]

| | Total rates (excluding targeted water rates) (NZD) | Direct biodiversity spending from rates (NZD) | Proportion of rates revenue spent directly on biodiversity |
|---|---|---|---|
| Bay of Plenty Regional Council | $57,400,000 | $1,651,302 | 2.9% |
| Environment Canterbury | $112,414,000 | $10,444,000 | 9.3% |
| Environment Southland | $19,038,000 | $234,000 | 1.2% |
| Greater Wellington Regional Council | $143,356,000 | $7,651,500 | 5.3% |
| Hawke's Bay Regional Council | $25,154,000 | $644,700 | l.6% |
| Horizons Regional Council | $47,423,608 | $8,281,000 | 17.5% |
| Northland Regional Council | $31,542,000 | $907,410 | 2.9% |
| Otago Regional Council | $26,953,000 | $775,393 | 2.9% |
| Taranaki Regional Council | $13,895,616 | $1,985,485 | 14.3% |
| Waikato Regional Council | $101,885,000 | $11,458,270 | 11.2% |
| West Coast Regional Council | $6,129,088 | $176,324 | 2.9% |
| ***Unitary Authorities*** | | | |
| Auckland Council | $1,982,000,000 | $30,000,000 | 1.5% |
| Gisborne District Council | $65,973,000 | $1,804,000 | 2.7% |
| Marlborough District Council | $69,719,000 | $1,744,000 | 2.5% |
| Nelson City Council | $65,511,000 | $1,884,641 | 2.9% |
| Tasman District Council | $77,862,000 | $2,239,959 | 2.9% |
| **Total** | **$2,846,255,312** | **$81,881,983** | **2.9%** |

**Figure 11.4: Total biodiversity spending by regional and unitary councils**

In 2018, recognising that more recent data is caveated by Covid-19 travel restrictions, $27.55 billion of value-add was directly or indirectly produced by the tourism sector. The above logic suggests that at least $8.80 billion value added (a third of the total) likely depends on the conservation estate. In addition, $3.80 billion of GST was collected from tourism expenditure, $1.8 billion which was from international tourists. In comparison, DOC's funding is only around $0.58 billion, which is just 14 percent of the GST take from tourism expenditure and a small fraction of the overall value-add to the tourism sector from the conservation estate.[14] This suggests that the tourism sector is not paying its way when it comes to maintaining the conservation estate on which much of it is dependent.

Although the tourism industry sector draws considerable value from the conservation estate, very little of the sector's $27.5 billion value-added is returned to DOC, whose funding is just $0.58 billion. The GST collected from tourism expenditure alone, some $3.8 billion annually, is more than six times DOC's budget. In recognition of the sector's reliance on the conservation estate, there is a need to better connect tourism revenue with the conservation system.

## 11.4 Potential new sources of biodiversity funding

There are a range of opportunities to potentially increase funding for biodiversity conservation in Aotearoa New Zealand and we canvass some of the more promising below.

### *11.4.1 International Visitor Conservation and Tourism Levy*

The IVL came into force in July 2019, charging most international visitors $35 to enter the country, but excluding Australians and many Pacific Islanders. When established, it was expected to generate around $82 million per year with around half going to DOC for biodiversity work (40-45%) and responding to visitor pressures (5-10%), totalling around $40 million. The flow of IVL money was impacted by subsequent Covid-19 border closures. With the border now re-opened the role of the IVL has come under renewed scrutiny.

In August 2022, former Tourism Minister Stuart Nash went to Cabinet with a proposal to increase the IVL to up to $200 per visitor, thereby raising up to $444 million a year. He was unable to get the proposal approved by cabinet, likely due to the projected impact on visitor numbers which was assessed as being up to 6 percent. Minister Nash's rationale for the increase was that international tourists were still not paying their way including covering the estimated $150 million a year in costs to local infrastructure and $96 million a year in environmental costs to public conservation land. In his covering explanation to a proposed discussion document on the topic, Minister Nash stated: "There is no link between the cost and revenue required to ensure a regenerative model for conservation land. We currently undervalue the natural landscape that international tourists spend a lot of money, and travel a long way to experience".[15]

Increasing the IVL still remains a potential option for increasing revenue from tourism to help fund management of the conservation estate. A new round of consultation on the IVL is currently underway.[16]

### *11.4.2 Concession charges*

As indicated above, tourism pays only a small fraction of the added value that the conservation estate makes to the sector. In addition, other activities take place on the conservation estate through the grant of concessions, and are not necessarily paying an amount commensurate with the added value that the estate provides to their businesses. One way of addressing this, would be to shift the basis on which concessionaires are charged, so that the conservation estate was the recipient of a share of the profits from the businesses deriving benefit from it. For example, Envirostrat has calculated that earmarking a small proportion of the profits of concessionaires could generate significant additional funds for conservation (see Figure 11.5)

| Proportion of profits earmarked | Additional funds for conservation | Percentage increase in DOC revenue from charges |
|---|---|---|
| 2.5% | $19,031,066 | 104% |
| 5.0% | $38, 062, 133 | 207% |
| 7.5% | $57,093,199 | 311% |
| 10.0% | $76,124,265 | 414% |

**Figure 11.5: Additional funds generated for conservation by earmarking profits from the estate**

### *11.4.3 Realigning income and revenue*

Annual revenue of $27.3 million from concessions and a projected $41 million from the IVL go to the Crown and then *may* be allocated to DOC. However, it is difficult to determine whether these income sources translate into any increases in DOC's operating budget. The system could be simplified, and be made more transparent, if the funds were paid directly to DOC.

### *11.4.4 Carbon credits*

Much of the conservation estate is covered in indigenous forest (58%), and such forests deliver significant carbon sequestration, therefore playing an important role in achieving the country's net emission reductions. Much forest on DOC land is old growth, or was planted before 1989, so is not eligible for credits under the ETS. However, there is forest land planted post 1990 that would theoretically be eligible including 3,104 hectares of non-native and 2,864 hectares of native forest, which together could potentially generate $9 million a year.[17] Over half of this post-1990 forest is on stewardship land.

Currently DOC is unable to receive ETS credits for planting and managing post-1990 forest. This exclusion could be re-examined, so that DOC could generate revenue from planting new indigenous forests, which would also deliver biodiversity benefits. This could both help generate greater revenue, and better management of the conservation estate, as well as incentivising adding further value to it.

While most forest in the conservation estate is ineligible for the ETS, pest and disease pose a significant threat to the maintenance and increase of carbon stocks on all forest land. Several studies show that in the presence of pests, trees sequester less carbon, and they result in declining carbon stocks if the tree has reached maturity.[18] This means that pest management and other conservation activities deliver carbon sequestration benefits alongside biodiversity, social and cultural benefits. Such carbon benefits are currently not accounted for. Options to finance pest management through a carbon loss lens could be explored, potentially leveraging funding through the ETS.

### *11.4.5 Payment for biodiversity performance*

Another way of obtaining value from the biodiversity benefits provided by the conservation estate is to explore the concept of biodiversity credits. Such credits are typically based on a measurement (based on a basket of metrics) of the ecosystem services provided by a particular area of conservation land. A credit could be defined as a one percent improvement or avoided loss per hectare at the site compared to its initial state. The number of awardable credits per area is then determined by using the overall biodiversity proportion uplift, or avoided loss, over the entire area.

Such credits do not currently exist in Aotearoa New Zealand so a robust measurement system, potentially through the establishment of a biodiversity standard, would need to be developed. The Ministry for the Environment is currently exploring incentives for the protection of indigenous biodiversity on private land, as part of the implementation of the National Policy Statement on Indigenous Biodiversity.[19] The applicability to conservation land, of any new approaches developed in that arena, could be explored further. Additional protections and adjustments to any biodiversity credit scheme would likely be necessary in the conservation context.

### *11.4.6 Environmental footprint tax*

An Environmental Footprint Tax could operate as an incentives scheme for biodiversity conservation.[20] It essentially proposes a 'polluter pays' model aimed at natural capital conservation. The level of tax is set according to the intensity of land use and consequent impact on the environment.

The tax categories could range from high environmental impact (eg impermeable surfaces) which would be subject to higher tax rates, to low-impact categories (eg riparian vegetation and natural water bodies) which would be eligible for tax rebates. This could be seen as a fair and progressive approach to taxation while aligning economic activities with environmental sustainability. Such a regime could be designed to:

- Implement the polluter/user-pays principle by putting a price on environmental costs of land use
- Reward landowners for maintaining and enhancing biodiversity and ecosystem services
- Distribute the tax burden more fairly across different sources, potentially lowering income, company and consumption taxes
- Encourage a shift from volume-based commodity production to high-value added production
- Mitigate wealth inequality by taxing returns from land-based assets more equitably
- Complement greenhouse gas tax schemes with rebates for conservation
- Fund future liabilities such as climate change mitigation, superannuation, and infrastructure.

There are a number of opportunities to create funding streams for DOC's operations in addition to Vote Conservation allocations.

## 11.5 Recommendations for reform

**Recommendations on increasing funding for conservation**

1. *Increase the IVL:* Revise the IVL to $200 per visitor to generate more revenue for conservation.

2. *Reform concession charges:* Modify the way concessionaires are charged for using conservation land, by earmarking a percentage of their profits, to generate additional funds for conservation.

3. *Direct revenue to DOC:* Simplify the revenue flow from concessions and the IVL by directing funds directly to DOC for better transparency and resource allocation.

4. *Utilise carbon credits:* Explore the eligibility of DOC-managed post-1990 forest for carbon credits under the ETS to generate revenue, incentivise forest management, and account for carbon benefits from conservation efforts. In particular, options for funding pest management under the ETS, through a carbon loss lens, should be explored.

5. *Implement biodiversity credits:* Investigate what a system for biodiversity credits might look like in the context of conservation land based on ecosystem service metrics, potentially through a biodiversity standard, to incentivise conservation and reward performance.

6. *Explore the utility of an environmental footprint tax:* This could incentive biodiversity conservation and generate additional revenues for the conservation system.


*Tourists disembarking at Lake Manapōuri on their way to Doubtful Sound*

**Endnotes**

1 Most of this section has been drawn from a powerpoint report commissioned by EDS from Envirostrat

2 Deautz A, G M Heal, R Niu, E Swanson, T Townshend, L Zhu, A Delmar, A Meghji, S A Sethi and J Tobin-de la Puente, 2020, *Financing nature: Closing the global biodiversity financing gap*, The Paulson Institute, The Nature Conservancy and the Cornell Atkinson Center for Sustainability, 9

3 Dasgupta P, 2021, *The economics of biodiversity: The Dasgupta review*, Final report of the Independent Review on the Economics of Biodiversity led by Professor Sir Partha Dasgupta, The Treasury, London, 2

4 Ibid

5 Koolen-Bourke D and R Peart, 2021, *Conserving nature: Conservation reform issues paper*, Environmental Defence Society, Auckland, 36

6 Ibid at 37

7 Environment Committee, *2023/2024 Estimates for Vote Conservation* (29 June 2023)

8 https://www.doc.govt.nz/news/issues/budget-2020-overview/

9 Vote Conservation, Supplementary standard estimates questions from the Environment Select Committee (2022/23), https://www.parliament.nz/resource/en-NZ/53SCEN_EVI_123922_EN10075/9742112292ab40926f31cea34777a83a8cf7e5bf

10 Koolen-Bourke D and R Peart, 2021, *Conserving nature: Conservation reform issues paper*, Environmental Defence Society, Auckland, 38

11 Envirostrat, 2022, *Conservation law reform economics of the conservation estate: Understanding the current status and options for conservation finance: Draft findings to Environmental Defence Society* (Powerpoint slides), Envirostrat, Auckland

12 Ibid at slide 56

13 Ibid

14 Ibid

15 Nash S, 2022, *Release of discussion document: Proposed changes to International Visitor Conservation and Tourism Levy*, Ministry of Business, Innovation and Employment, Wellington, 4

16 Ministry of Business, Innovation and Employment, 2024, *Proposed changes to the International Vistor Conservation and Tourism Levy: Discussion document,* New Zealand Government, Wellington

17 Envirostrat calculation based on a carbon price of $80

18 Ontl T A, M K Janowiak, C W Swanston, J Daley, S Handler, M Cornett, S Hagenbuch, C Handrick, L Mccarthy and N Patch, 2020, 'Forest management for carbon sequestration and climate adaptation', *Journal of Forestry*, 119(1), 86-101; Peltzer D A, R B Allen, G M Lovett, D Whitehead and D A Wardle, 2010, 'Effects of biological invasions on forest carbon sequestration', *Global Change Biology*, 16(2), 723-746; Quirion B R, G M Domke, B F Walters, G M Lovett, J E Fargoine, L Greenwood, K Serbesoff-King, J M Randall and S Fei, 2021, 'Insect and disease disturbances correlate with reduced carbon sequestration in forests of the contiguous United States', *Frontiers in Forests and Global Change*, 4, October

19 See Ministry for the Environment, 2022, *National Policy Statement for Indigenous Biodiversity draft implementation plan*, New Zealand Government, Wellington, 11 and following and Ministry for the Environment, 2023, *Helping nature and people thrive: Exploring a biodiversity credit system for Aotearoa New Zealand – Discussion document,* Ministry for the Environment, Wellington

20 See https://eds.org.nz/wp-content/uploads/2023/07/Wildlife-Act-Report-Appendix-E-Incentives.pdf

# 12 Closing comments

*Waikawau Bay, Coromandel Peninsula, a recreation reserve managed by DOC*

The task of reforming Aotearoa New Zealand's conservation system is significant in scope. However, the basic building blocks are already in place and can be remodelled and repurposed. At the core of the system is the *Conservation Act* which needs to be modernised with new definitions, purposes and priorities; a strengthened and streamlined conservation management planning system; and more clearly focused and strongly supported institutions.

The Wildlife Act, which should be replaced by a *Species Protection Act*, needs to be more fundamentally overhauled to bring it into the modern context. It should apply to all species, protect endangered species and indigenous biodiversity, contain a robust threat management system, and provide a clearer framework for the sustainable utilisation of wildlife. A new dedicated *Protected Areas Act*, crafted from the bones of the Reserves Act, could provide an updated array of protective purposes and governance options. These would constitute the three core statutes of the conservation system, at least in the terrestrial arena.

The marine space however, is even more complex. We have not attempted to address this area in any depth in this report. EDS is currently examining oceans conservation in more detail in Phase 2 of its Ocean Reform project.

Our recommendations for conservation reform aim at greater simplicity, greater alignment of purposes across legislation and greater clarity and alignment of institutional purposes and priorities. This is necessary to ensure that all parts of the system are headed in the same direction. Our recommendations have also attempted to strengthen an evidence-informed approach to help ensure decision-making is based on solid ground.

Funding is likely one of the most important aspects of any conservation reform, since effective conservation will require significant investment. Similarly, harnessing the energy, capacity and capability of the public, community conservation groups and tangata whenua is a 'must have'. The conservation estate is simply too vast for DOC to manage on its own. This means that bringing the conservation management planning system back to place, where it is closer to mana whenua and local communities, has been a core focus throughout our recommendations.

Conservation law reform must grapple with a range of complex matters. What does our climate change response framework require to be effective and ensure that precious indigenous biodiversity can meet the challenges that lie ahead? What does a bio-cultural approach look like and how do we create more equitable frameworks? How do we bring communities along on the conservation journey – and foster the socio-cultural shifts necessary to strengthen connections with nature?

Globally, these are matters every nation is attempting to resolve. Aotearoa New Zealand has an advantageous starting point, having one third of the country's land area under protection, with a (comparatively) small population and a rich indigenous culture with deep knowledge, understanding and connection with te Taiao. These are strong foundations for successful conservation reform to build on.

# Summary of recommendations

Current priorities for conservation include biodiversity protection, reconnection with nature, restoration, resilience, climate adaptation and regenerative tourism.[1] Existing conservation statutes are unable to be deliver on these objectives without significant reform.

In crafting new conservation legislation there are a number of factors to be considered including the need to:

- Establish what the conservation system needs to deliver over the next 30 or more years (the likely lifetime of the next tranche of legislation);
- Update and more clearly articulate the public interest in conservation, potentially through public value mapping. This would help ensure that reform is centred around delivering, first and foremost, in the public (rather than private, 'user' or stakeholder) interest;
- Acknowledge our collective responsibility to te Taiao (the natural world), not simply as citizens of Aotearoa New Zealand, but as global citizens with international commitments;
- Prioritise the importance of responding to the joint climate change and biodiversity crises, and adopting a strengthened evidence-informed approach to ensure effective response;
- Craft a uniquely Aotearoa New Zealand framework, that builds on the synergies and collective lessons of te ao Māori and mainstream conservation perspectives, and incorporates te ao Māori concepts and values into the heart of the conservation system; and
- Address historical bias and inequities in the conservation system by applying a broad environmental justice and equity lens.

Below we set out a summary of our core recommendations for a reformed and modernised conservation system. More detail on the rationale behind these recommendations, and their detailed design, is contained in the body of the report.

## 1 Reformed Conservation Act

At the heart of the conservation system is the Conservation Act 1987, which operates as an important system integrator. The Act:

1. Sets out core definitions, priorities and purposes;
2. Establishes key conservation entities; and
3. Provides the framework for the conservation management planning system.

In our view, the Act should continue with these functions, which form the backbone of a revised Conservation Act.

At present the Conservation Act also contains a number of protected area provisions, including conservation, wilderness, ecological, sanctuary, watercourse, amenity, wildlife management and stewardship areas, marginal strips and covenanting provisions. With land designations currently sprawled across an array of different statutes, we propose rationalising and consolidating these under new protected areas legislation.

The Conservation Act also contains a number of wildlife-related provisions, in particular for freshwater fisheries. We consider these matters would be better woven into a reformed Wildlife Act which would consolidate provisions relating to both introduced and indigenous species management (including fish and dog control). The provisions related to the New Zealand Fish and Game Council (Fish and Game) could also be placed under the Wildlife Act.

The infringement offences associated with these two areas could also be transferred out of the Conservation Act, resulting in a crisper, clearer and more focused Act where the conservation management planning system is a central pillar. The remaining components would be significantly adjusted to make the priorities and purposes of the Conservation Act, the roles and functions of the core entities established under it, and the purposes of conservation management planning system, much clearer and more aligned.

### *1.1 Setting clear purposes, definitions and priorities*

At present the Conservation Act lacks a unified purpose and the definition of 'conservation' combines a range of objects with unresolved tensions between them. The result is a confusing combination of conflicting objectives without a clear hierarchy to reconcile them. There is a need to reformulate our understanding and frame for 'conservation' to:

- Shift from preservation towards "protection, restoration and enhancement";
- Shift from protecting natural and historic "resources" to protecting natural and historic "heritage";
- Centre on protecting indigeneity and define "natural heritage" more narrowly to reflect this focus;
- Centre, first and foremost, on the ecological integrity and well-being (the mauri and the mana) of "nature" or "te Taiao";
- Provide for future generations, safeguarding their rights and interests in a thriving healthy natural world;
- Recognise the importance of fostering connections with nature and the contribution this has to health and well-being; and
- Recognise the special relationship of tangata whenua to their lands and taonga, and the need to strengthen connections with customary practices and traditions.

Providing a clearer and more focused purpose for the conservation system, which reflects the above elements, would help clarify DOC's conservation advocacy role and requirement to manage land for "conservation" purposes. It would also help align the purposes and priorities of DOC, the New Zealand Conservation Authority (NZCA) and Conservation Boards.

In addition to this primary purpose, secondary purposes for the conservation system could also be specified, to recognise the need to provide for uses such as recreation and tourism, and for the social and economic well-being of local communities. Such purposes could be clearly defined in the legislation, including the terms "recreation" and "tourism".

It will be important that the Conservation Act provides clear guidance for decision-making when priorities, such as between indigenous biodiversity and introduced species, and recreation and tourism, come into conflict. A purposes hierarchy can be a useful way to achieve to this. This could specify:

- The *first priority* as the ecological integrity and well-being of te Taiao, recognising the overarching importance of Aotoearoa New Zealand's indigenous biodiversity.
- The *second priority* as providing for connections with te Taiao. This would include supporting the customary practices and traditions of iwi, hapū and whānau as well as recreational use (including non-commercial hunting and fishing).
- The *third priority* as providing for the economic and social well-being of local communities.

### *1.2 Strengthening institutional settings*

There are a number of areas where institutional innovation and reformulation is necessary, to both improve system functionality, and ensure there is a clear role and institutional support for Māori. Some practical ways of achieving such improvements are summarised below.

#### *Strengthen the New Zealand Conservation Authority*

The NZCA needs to remain a core conservation entity, becoming a more expert advisory body, with increased oversight functions and powers. To support this stronger oversight role, it will be important to restore many of the historical powers that the NZCA's predecessor, the Nature Conservation Council, possessed. In particular, the NZCA should have the power to hold inquiries including acting as a Commission of Inquiry with the consent of the Minister. It should also have the power to require government bodies to provide information.

We have also suggested a number of adjustments that could be made to the NZCA's functions within a revised conservation planning system (described below). These include removal of the NZCA's role of approving Conservation Management Strategies (CMSs), National Park Management Plans (NPMPs) and Conservation Management Plans (CMPs). Instead, the NZCA would have input into draft policy and planning documents and NZCA members could participate as panel members on the proposed new regime of Independent Hearings Panels. Consideration should also be given to whether, as an additional check on the Minister, the NZCA should be provided with the power to trigger the review of decisions, policy and plans (on specified grounds).

Membership criteria for appointment to the NZCA would need to be changed to support its new functions. Membership should be based on experience, skills and expertise in relevant areas. To increase independence, membership appointments could be made by an agency which operates at arms' length from government, such as the Parliamentary Commissioner for the Environment.

It is also important that DOC is directed to provide greater support to the NZCA, including through providing sufficient access to information to enable it to fulfil its functions. Importantly, the NZCA should be given its own dedicated secretariat to maintain independence from DOC, and support its work.

***Strengthen Conservation Boards***

The adjustments proposed to Conservation Boards, are similar in kind to those for the NZCA, in that they clarify the independence and expert (rather than stakeholder) based role of these entities. However, a point of difference is the role of Boards within the conservation management planning system, which is proposed to be strengthened in recognition of the regional focus of conservation planning.

To that end, EDS proposes extending the functions of Conservation Boards to include: drafting planning documents in partnership with DOC and tangata whenua (as well as recommending their approval); an ability to direct DOC to consider plan review (including undertaking a partial review) in response to new information; and an ability to trigger a formal investigation by the NZCA where DOC fails to comply with the statutory timeframes for plan review or the standards and directions set out within planning documents.

The secretariat and staff support services for Conservation Boards will need to be increased, and support staff should have greater capacity, skills and resourcing to undertake their role. Such support could be provided through an independent secretariat (which could manage the budget to service all the Boards and the NZCA), to increase board independence and authority.

Board budgets and workplans should be directly negotiated with each Conservation Board and be aligned with the budget and workplan of the regional DOC Operations office. Higher renumeration should be provided to Conservation Board members to better reflect the true value of their work.

Selection of Board membership would also need to be more strongly based on skills and expertise (rather than stakeholder representation). Accordingly, membership direction for Conservation Boards (under section 6P of the Conservation Act) should be amended by removing the term "interests" and instead directing appointment having regard to the "skills, knowledge and expertise" of applicants in a number of key areas. It may be more appropriate for the NZCA to make Board appointments rather than the Minister. Additional direction to ensure a broad diversity of membership is achieved would also be valuable.

***Establish a Kura Taiao Council***

As recommended by the Waitangi Tribunal, this national Māori entity could operate as a system integrator, providing expert advice and recommendations to the government and DOC, facilitating information sharing, assisting to address collective concerns and triggering policy reviews. It could also develop national policy, oversee DOC policy impacts on Māori, support iwi and hapū, conduct research, and promote cross-cultural understanding.

An alternative to establishing a completely new body would be to reconfigure the NZCA and expand its functions to include the above matters. It would be important for membership of either body to include expertise in tikanga Māori and the Treaty of Waitangi/Te Tiriti o Waitangi (Te Tiriti), conservation science, mātauranga Māori, legal compliance, management and planning. Any new model along these lines would need to be developed in partnership with iwi and hapū.

***Establish Kura Taiao Boards***

The Waitangi Tribunal also recommended the establishment of regionally based Kura Taiao Boards to complement the national Kura Taiao Council. The structure of such boards could be statutorily prescribed, but with flexibility for more bespoke arrangements according to local needs. They could become a core entity in the conservation management planning system for: identifying culturally important sites and management objectives; developing principles and protocols for customary use and practices; strengthening iwi/hapū/whānau input into the conservation management planning system; facilitating greater information sharing and place-based knowledge; supporting iwi-led conservation initiatives; and liaising with Fish and Game Councils, amongst other things.

An alternative approach would be to reconfigure Conservation Boards along a partnership-based model. However, because the Conservation Board model was not configured with Māori front of mind, Kura Taiao Boards would provide a more independent and transparent framework. Again, any new model would need to be developed in partnership with iwi and hapū.

### *1.3 Strengthening the conservation management planning system*

We have proposed a system re-design of the conservation management planning system in order to create a more integrated regime. This would provide clearer direction and better support implementation of policies and plans.

***New national documents***

At present, both the Conservation General Policy[2] and the General Policy for National Parks[3] (General Policies) contain gaps, have unnecessary duplication and lack binding standards. Under the new recommended system a *Conservation Policy Statement* would replace the General Policies. It would be mandatory, approved by the Minister and binding on Ministerial decision-making. It would also bind the new Regional Conservation Plans and consents (see more detail on these below).

New *National Conservation Standards* would set prescribed national rules, including targeted standards for different components of the conservation management planning system. The Standards would be binding on Regional Conservation Plans and consents. They would include a template for Regional Conservation Plans to simplify plans and ensure consistency. They could also include mandatory requirements for consents and specify requirements for different categories of activity.

We also recommend that DOC's Climate Change Adaptation Action Plan[4] be made a formal part of the conservation management planning system, be explicitly linked to the new Conservation Policy Statement and National Conservation Standards and be mandatory to implement through the new Regional Conservation Plans. In this way its provisions could be binding on the consents system thereby influencing consenting decisions.

***New plans***

More detailed planning direction, implementing national policy at place, would be provided by mandatory *Regional Conservation Plans* which would replace CMSs and potentially CMPs and NPMPs. They would be required to be consistent with the Conservation Policy Statement and National Conservation Standards (including the plan template described above) and would implement that national direction. The plans would be approved by the Minister and be binding on Ministerial decision-making and the Director-General of Conservation (Director-General) .

Regional Conservation Plans would cover a range of matters including identifying conservation values, setting objectives for the integrated management of those values, and setting policies and criteria for processing consents. This would include identifying which activities are permitted, discretionary or prohibited and specifying criteria for considering consent applications. Regional Conservation Plans would also clearly outline Tiriti partner roles and any protocols or requirements in relation to these.

The geographical scope of Regional Conservation Plans (and associated Conservation Boards) should, as far as possible, be aligned with those of the resource management system and regional councils. This would better support the advocacy work of Conservation Boards, facilitate improved connectivity of environmental monitoring and data sharing networks across the conservation and resource management systems, and enable planning documents to talk to each other.

Where site-based and bespoke management plans (including NPMPs and CMPS) are driving higher management standards in areas that are highly valued, they could be retained on a case-by-case basis, operating as new *Overlay Plans* to provide increased management detail, including devolved management, at specific sites.

New *Regional Operational Plans* would support implementation of Regional Conservation Plans and set out DOC's annual workplan for a region over the short term (1-3 years). They would also detail DOC's annual operational expenditure and inform the Department's Business Plans.

The Director-General would have the role of preparing a publicly available *Conservation Annual Review Report* which would track and assess the implementation of management actions specified in the Regional Operational Plans. The Director-General would also be tasked with reviewing the effectiveness of the administration of the National Policy Statement, Plans and Consents.

***Reformed planning procedures***

The Conservation Policy Statement and National Conservation Standards would be initially prepared by the Director-General, with comments and recommendations on the drafts invited from Tiriti Partners, the NZCA and the Kura Taiao Council, as well as Conservation Boards and Kura Taiao Boards. The Director-General would then publicly notify the proposed document and take submissions.

An Independent Hearings Panel would be established by the Minister to hear submissions on the documents and make recommendations. Final approval would be by the Minister, following consideration of the Panel's

recommendations and feedback from the NZCA, Kura Taiao Council and Tiriti Partners.

Regional Conservation Plans would be prepared collaboratively by the Conservation Board, Kura Taiao Board, relevant Tiriti Partners and the Director-General of DOC. The Director-General would then seek comments on the draft plan from the NZCA and Kura Taiao Council before publicly notifying the Proposed Plan and inviting submissions.

An Independent Hearings Panel would similarly be established by the Minister to hear submissions on Regional Conservation Plans and make recommendations on them to the Minister. The NZCA, Kura Taiao Council and Tiriti partners would provide final comments on the Panel's recommendations to the Minister. Final approval would be by the Minister.

The above arrangements carve out a clearer statutory role for Tiriti partners and Conservation Boards, and also see a strengthening of the role of the Minister. The quid pro quo of the later is that the Minister would also be bound by more directive documents. There are increased risks associated with the strengthened Ministerial role, and movement towards such a framework should only occur alongside acknowledgement that Ministerial discretion can be fettered and the revision of policy and planning documents to set more clear, directive and binding policies. The proposed strengthened oversight role for the NZCA would also improve system checks and balances.

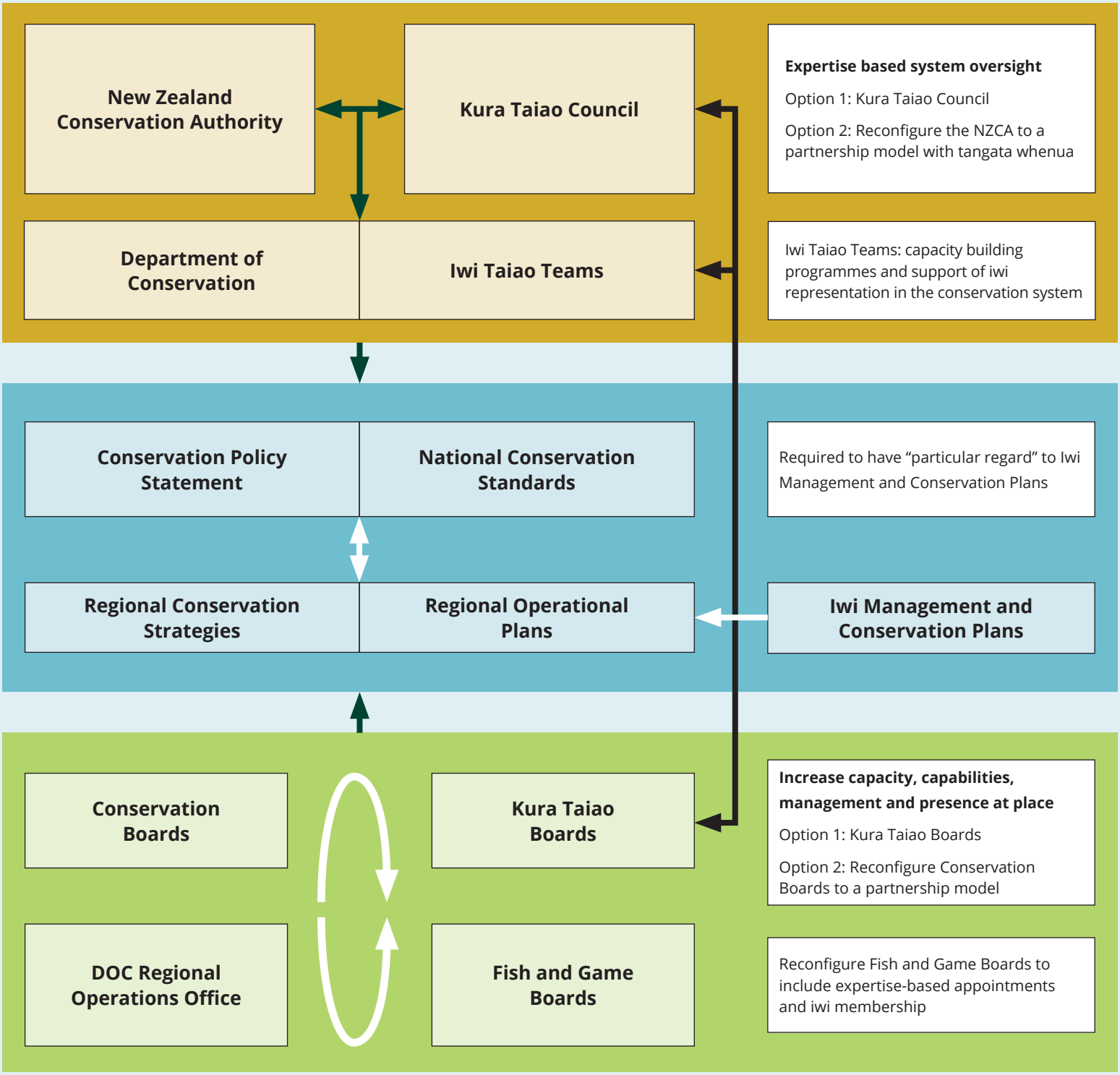
***New consenting system***

A new *consenting system* would replace concessions which would operate within the framework of Regional Conservation Plans. Consent fees for each application should be required to cover the full cost of application assessment and compliance monitoring. If DOC is unable to effectively assess and monitor a consent application, then a precautionary approach should be adopted, with a requirement that they must not be granted.

A revised Conservation Act should place an obligation on DOC to regularly monitor and report on consents and the consenting system more broadly. This is to ensure that the impacts of consented activities on conservation values are regularly measured and communicated to the public, and costs factored into consent fees.

DOC should also have a greater ability to review the conditions on consents, to alter and even cancel them, on a carefully proscribed basis. Such power could be restricted by an "exceptional circumstances" test or specific criteria (for example, that "significant impacts on indigenous wildlife" have become evident). The current inability to cancel a consent, or adjust its conditions based on new information, hinders adaptive management and the adoption of a precautionary approach. Such review provisions could be modelled on those in the recent Natural and Built Environment Act 2023 (now repealed).

***Looking out over Aotea Conservation Park towards Repanga Cuvier Island***




**Key elements of a new conservation system**

## 2. Reformed Wildlife Act

Due to the significance of the issues identified, and the extent of changes proposed, we consider the Wildlife Act 1953 needs to be repealed in its entirety with new wildlife legislation drafted. This should re-calibrate how the use of wildlife is enabled across all sectors and domains: including customary, social and commercial; and marine and terrestrial.

EDS contemplated a range of options for reconfiguring the Wildlife Act and concluded the most appropriate option is to retain a single statute that applies across all species (indigenous and introduced) on the basis that this provides the most integrated and internally coherent approach.

***Broader scope***

The reach of new wildlife legislation should be extended to all taxonomic groups, including marine mammals, fish, plants, fungi and invertebrate species. This would align Aotearoa New Zealand with international best practice and the New Zealand Threat Classification System (NZTCS). It would remedy current gaps and lack of statutory protection for both indigenous freshwater fish (to help prioritise their protection, especially in relation to introduced sports fish) and indigenous plants (to operate as a lever for the control of introduced browsing mammals and invasive weeds). Mechanisms for providing exemptions from protection, in relation to indigenous species, could be provided. These would be need to be clearly prescribed including ensuring that adequate management measures were in place.

***Clearer purposes and priorities***

A new Wildlife Act, as proposed in this report, would provide for species protection, recovery and threat management. It would set out a framework for regulating and permitting the utilisation of, and interactions with, wildlife. The Act would recognise as primary underpinning purposes: (a) prevention of extinction of indigenous species; (b) protection, restoration and enhancement of indigenous biodiversity; and (c) control and management of threats, including the eradication and effective management of invasive alien species. Secondary purposes, subject to those overriding considerations, could then include provision for sustainable utilisation and harvest of wildlife.

The prioritisation level of different categories of species would be made clear in the legislation and a hierarchy established. Threatened species would have the highest priority, followed by indigenous species, and then valued introduced species. There would be a requirement that management actions must prioritise species higher in the hierarchy where interests come into conflict.

***Stronger protection and threat management***

Listing of threatened species would continue to be based on scientific assessments under the NZTCS, which would be directly linked to the new Act. The new wildlife legislation would include specific provision for threatened species, including adopting a precautionary approach to decision-making, and providing mechanisms for protection of their critical habitat.

Restoration planning for threatened species would be a core part of a reformed Act, linked to NZTCS assessments, which could trigger consideration of the need and feasibility of recovery planning. Such a regime would be focused at the regional or catchment scale and be integrated with regional biodiversity strategies under the resource management system. Consideration would be given to providing a mechanism to protect critical habitat, including through the development of an incentives scheme in relation to habitat on private land.

There would be a shared management framework for taonga species in line with the partnership principle of Te Tiriti, enabling bespoke and place-based responses. The legislation would provide for heightened protection of indigenous taonga species, with decision-making based on the best available information, including mātauranga Māori and scientific knowledge. A management regime for taonga species would be designed in partnership with Māori.

A *Threat Management Framework* would better address threats to species and enable a more strategic approach to their management. Species status assessments under the NZTCS, that identify threats, would be linked to and operate as triggers for consideration of the need for a threat management response. A core component would be a responsive, conservation-focused *Pest Management Planning* regime. This would replace existing provisions under the Wildlife Act as well as the Wild Animal Control Act (which should be repealed to ensure a more integrated approach).

Species would be categorised and scheduled, based on the level of threat they pose, and the severity of their impact. As a general rule, species with a high risk assessment would be prioritised for broader scale eradication and pest control. A containment and control approach could be adopted for those with lower threat levels.

Under the new regime, 'valued introduced species' would be categorised along with other introduced species according to their risk assessment. Management and control planning would be triggered where a species had a high risk profile. However, the specific details of any management response would be crafted in consultation with local communities and tangata whenua, in recognition of the values associated with the species.

Management approaches would be closely linked to biodiversity values at place and a spatial planning approach adopted to support this.

***Stronger permitting and utilisation framework***

Under the new regime, utilisation of threatened species (and potentially also those 'at risk') would be narrowly defined and require an overall 'net gain', thereby adopting a precautionary approach. More flexibility would be provided for other categories. In particular, as noted above, there would be a shared management framework for taonga species, enabling bespoke and place-based responses, including the management of cultural harvest.

Resource consents under the resource management system would be contingent on obtaining all necessary wildlife permits. Resource consents would include triggers for wildlife permits. The scope of 'take' under the permitting system would be reviewed, including consideration of what kinds of wildlife interactions should require permits.

***Better alignment with the Biosecurity Act***

The Biosecurity Act is currently under review and it will be important to strengthen the connectivity and integration of that regime with any new framework under the Wildlife Act. This will include providing a clearer role for DOC under the Biosecurity Act and providing the Department with more bespoke powers to trigger processes and make decisions.

There is also a need for better alignment between regional council biosecurity functions and the conservation system. The Wild Animal Control Act should be repealed (as proposed above) as should the requirement for Fish and Game approval to control introduced game bird species where councils deem them to be a pest.

***Stronger science advice***

Political decision-making under new wildlife legislation should be generally eliminated except for highly proscribed carve-outs. Instead, decisions concerning wildlife should be directed by independent scientific knowledge and mātauranga Māori through two new expert scientific advisory entities.

An independent *Scientific Advisory Committee on Indigenous Biodiversity* should be established to undertake species status assessments under the NZTCS framework and assign designations as appropriate. It would also make recommendations to the Director-General on the prioritisation of species recovery and management plans. An independent *Scientific Advisory Committee on Threat Management* should also be established, to focus on risk and threat assessments, which would identify threatening processes and schedule species according to the threat they pose to indigenous biodiversity.

***Strengthened Fish and Game***

The statutory functions and provisions for Fish and Game would be transferred from the Conservation Act to the new Wildlife Act and its role reformulated away from 'game management' towards 'sustainable utilisation'. Fish and Game's management of different species would be subject to the purpose and principles of the new Act and the risk assessments carried out under it. The core functions and purposes of Fish and Game would be adjusted accordingly.

Consideration should be given to providing a broader management function for Fish and Game, in relation to "water fowl" (rather than "game birds") and freshwater fisheries (eg whitebait and eels) rather than "sports fish". This would enable the expertise and capacity of Fish and Game to be applied to a broader area. Consideration should also be given to strengthening Fish and Game's advocacy functions in relation to habitat and freshwater protection.

Under the new model, the role of tangata whenua would be more appropriately provided for, especially in relation to indigenous species. In addition, governance arrangements would better reflect the new important public functions to be undertaken by Fish and Game. This would be achieved through reconfiguring membership of Fish and Game at both the national and regional levels. Alternatively, Fish and Game (and the Game Animal Council) could be replaced with a public agency similar to the former Wildlife Service.

***Strengthened Game Animal Council***

Under a reformed Wildlife Act, the Game Animal Council would be merged with Fish and Game. This would enable valued introduced species to be managed collectively under a single integrated statutory regime and more comprehensive wildlife management system. The hunting community would be given specific representation on the national Fish and Game Council, and sub-committees would be established as necessary, including to support the development of herd management plans for herds of special interest. The management needs of valued introduced species would be carefully prescribed and better linked to threat management, threatened species recovery planning and habitat restoration objectives.

An alternative would be to retain the Game Animal Council as a separate entity, but within a more integrated framework under a reformed Wildlife Act. Under this option, the functions and membership of the Game Animal Council would be shifted to a more partnership based approach, to improve the diversity of voices within its membership and ensure increased expertise and focus on habitat protection. A third alternative would be to replace the Game Animal Council (and Fish and Game) with a public agency similar to the former Wildlife Service.

## 3. Modernised Protected Area legislation

Conservation law reform could also incorporate a review of protected area legislation and undertake the long-deferred task of reviewing, rationalising and consolidating land designations. At present, these are scattered across the Wildlife Act, Reserves Act 1977, Conservation Act and National Parks Act 1980. The complexity of navigating the requirements for the myriad of land designations in place, under different statutory regimes, has long been acknowledged as a problem.

The scope of our research did not include an in-depth examination of conservation land classifications and legislative provision for protected areas. However, EDS sought preliminary advice in this area with a focus on terrestrial (and not marine) designations. This indicated that a number of changes would merit further consideration.

Existing protected area designations could be rationalised and consolidated under a new Protected Areas Act (while retaining but updating the National Parks Act). The new Act should include area designations for 'floodplains reserves' and 'climate adaptation reserves' to support climate change adaptation and the restoration and adaptation of indigenous biodiversity. Ensuring some reserves are moveable will also be important.

There would need to be a strengthening of provision for the protection of Māori cultural values. Specific consideration, in consultation with Māori, should also be given to the need for specific cultural or taonga reserves. At the same time, the terminology of purposes provisions and descriptions of area designations could be modernised so they reference "indigenous biodiversity" and "ecological integrity" (instead of "natural state") as appropriate.

## 4. Increased conservation funding

There are a variety of mechanisms that could be explored to help generate additional finance for the conservation system. They include:

- Increasing the International Visitor Conservation and Tourism Levy
- Reforming the concession charging system so concessionaries pay a fairer amount for use of the conservation estate
- Direct revenue from the Internation Visitor Conservation and Tourism Levy and concessions to DOC
- Provide carbon credits for post-1990 forests to account for carbon benefits from conservation efforts including pest control
- Develop a system for biodiversity credits to incentivise conservation and reward biodiversity improvements
- Develop a tax system based on impacts on natural capital, taxing impacts on the environment and rewarding restoration efforts.

The implications and appropriateness of the options (including their compatibility with conservation goals) will require more detailed consideration.

## 5. Concluding comments

The task of reforming Aotearoa New Zealand's conservation system is significant in scope. However, the basic building blocks are already in place and can be remodelled and repurposed. At the core of the system is the *Conservation Act* which needs to be modernised with new definitions, purposes and priorities; a strengthened and streamlined conservation management planning system, and more clearly focused and strongly supported institutions.

The Wildlife Act, which could be retitled the *Species Protection Act*, needs a more fundamental overhaul to bring it into the modern context. A new dedicated *Protected Areas Act*, crafted from the bones of the Reserves Act, could provide an updated array of protective purposes and governance options. These would constitute the three core statutes of the conservation system, at least in the terrestrial arena.

Our recommendations aim at greater simplicity, greater alignment of purposes across legislation, and greater clarity and alignment of institutional purposes and priorities. They have also attempted to strengthen an evidence-informed approach to help ensure decision-making is based on solid ground.

We have also sought to provide recommendations which better harness the energy, capacity and capability of the public, community conservation groups and tangata whenua. The conservation estate is simply too vast for DOC to manage on its own. Bringing the conservation management planning system back to place has been a core focus throughout our recommendations.

With one third of the country's land area under protection, a (comparatively) small population, and a rich indigenous culture with deep knowledge, understanding and connection with te Taiao, Aotearoa New Zealand has strong foundations for successful conservation reform to build on.

*Walkers in Tongariro National Park*

**Endnotes**

1 Department of Conservation, 2022, *Department of Conservation statement of intent 2022-2026*, Department of Conservation, Wellington

2 Department of Conservation, 2005, *Conservation general policy*, (revised edition 2019), Department of Conservation, Wellington

3 Ibid

4 Christie J, P Pearce, P Phifer, S Parsons and A Tait, 2020, *Department of Conservation climate change adaptation plan 2020/21 – 2024/25*, Department of Conservation, Wellington

## Appendix: Methodology

The starting point for the project was a detailed examination of the *Parliamentary Debates (Hansard)*. This provided insights into the history and context of current conservation legislation, what the drivers for the legislation were, what interest groups had a key role in shaping the provisions, and what the dominant concerns of the day were.

A detailed review and analysis of legal frameworks, including mapping of legislative purposes and definitions for each of the core conservation statutes was undertaken. This was followed by a close examination of:

- Non-statutory strategy documents produced by DOC, focusing on those dating from 2000 to 2023;
- DOC's Annual Reports from 2000 onwards and the Department's annual Statements of Intent from 2001 onwards;
- CMSs and NPMPs;
- Departmental Performance Improvement Framework reviews;
- Annual reports of Conservation Boards (from 2006) and the NZCA (from 2002); and
- Meeting minutes and papers of the NZCA.

In order to better understand what commentators and academics had written about Aotearoa New Zealand's conservation system, we reviewed national literature. We then undertook three internationally-focused literature reviews on endangered species protection, international best practice in conservation planning, and co-management and indigenous peoples. In addition, we carried out a review of relevant case-law and Waitangi Tribunal reports (in particular Wai 262). This helped identify core areas of legal risk and contention, in particular around Treaty compliance, Wildlife Act permitting, conservation planning and concessions, and wild animal control.

Since the Conservation Law Reform project was first initiated, in 2020, we have also undertaken a large number of interviews with those working at the 'coal face' of the system. These included DOC staff, permissions advisors, statutory managers, members of the GIS and information system and services team, legal advisors and scientists. We also interviewed members of the NZCA, Fish and Game, Game Animal Council and Conservation Boards, as well as staff from environmental NGOs.

In total, EDS interviewed more than 100 people throughout the country. A further 30 interviews were conducted with overseas experts, mostly in the area of wildlife and endangered species protection. All interviews and more informal discussions were held in confidence, to encourage frankness, and for this reason we have not listed interviewees or attributed any comments to specific individuals.

In a project such as this, which seeks to take an approach informed by te Ao Māori, science and practical realities on the ground, expert advice is essential. To that end, EDS drew on the following assistance.

- Ecologist Mike Harding was engaged to review existing purposes and priorities in relation to land designations and provide independent advice on how these might be rationalised and reformulated. His full advice has been published on the EDS website along with this report.
- Senior planner Peter Reaburn was engaged to review our preliminary findings on the conservation management planning system and to assist with the development of recommendations for reform in that area.
- Envirostrat was engaged to provide high-level economic analysis of the conservation system, investigate the current funding model, assess the funding gap and develop new funding models. This work was led by Envirostrat Sustainability Director Ceraselu Stancu.

In addition, Dr Billy van Uitregt (Ngā Rauru, Te Ātihaunui-a-Pāpārangi, Tūhoe) and PhD student Claire Dowsett (Ngāti Raukawa) were engaged to assist with the Māori aspects of the review. They provided high level insights and advice, and contributed to the drafting of specific material (particularly the content of Chapter 4). Their significant contributions have been acknowledged through co-authorship of this report.

## References

### *Legislation*


Animal Welfare Act 1999

Biosecurity Act 1993

Environment Act 1986

Climate Change Response Act 2002

Conservation Act 1987

Conservation (Infringement System) Act 2018

Conservation Law Reform Act 1990

Crown Minerals Act 1991

Crown Pastoral Land Act 1998

Dumping and Countervailing Duties Act 1988

Environmental Reporting Act 2015

Fisheries Act 1993

Fisheries Act 1996

Game Animal Council Act 2013

Heritage New Zealand Pouhere Taonga Act 2014

Marine Mammals Protection Act 1978

Marine Reserves Act 1971

National Parks Act 1980

Native Plants Protection Act 1934

Natural and Built Environment Act 2023 (repealed)

Ngāi Tahu Claims Settlement Act 1998

Ngā Mana Whenua o Tāmaki Makaurau Collective Redress Act 2014

Ngāti Kuri Claims Settlement Act 2015

Ngāi Takoto Claims Settlement Act 2015

Pae Ora (Healthy Futures) Act 2022

Public Service Act 2020

Reserves Act 1977

Resource Management Act 1991

Resource Management Amendment Act 2020

Spatial Planning Act 2023 (repealed)

State Owned Enterprises Act 1986

Te Aupouri Claims Settlement Act 2015

Te Awa Tupua Act 2017

Te Rarawa Claims Settlement Act 2015

Te Runanga o Ngai Tahu Act 1996

Te Urewera Act 2014

Trade in Endangered Species Act 1989

Treaty of Waitangi Act 1975

Wild Animal Control Act 1977

Wildlife Act 1953


### *Historical Legislation*


Animal Protection and Game Act 1921

Egmont National Park Act 1924

National Parks Act 1952

Nature Conservation Council Act 1962

Noxious Animals Act 1977

Noxious Animals Act 1956

Noxious Plants Act 1978

Public Reserves, Domains and National Parks Act 1928

Tongariro National Park Act 1922


### *Cases*


*Nature Conservation Council v Southland County Council* [1980] 7 NZTPA 464

*New Zealand Māori Council v Attorney- General* [1987] 1 NZLR 664

*Ngai Tahu Māori Trust Board v Director-General of Conservation* [1995] 3 NZLR 553 (CA)

*Ngāi Tai Ki Tāmaki Tribal Trust v Minister of Conservation* [2018] NZSC 122

*Norman v Tūpuna Maunga O Tāmaki Makaurau Authority* [2020] NZHC 3425

*Royal Forest and Bird Protection Society of New Zealand Inc v New Zealand Conservation Authority* [2021] NZHC 1194

*Trans-Tasman Resources Ltd v Taranaki-Wanganui Conservation Board* [2021] NZSC 127

***Publications***


Ahuriri A, S Lovell, D Te Kawa, L Te Ata o Tu MacDonald and K Mathias, 2022, 'The future of Māori health is here – the 2022 Aotearoa New Zealand health reforms', *The Lancet Regional Health – Western Pacific* 28, 100589

Antarctica New Zealand, 2022, *Statement of intent 2022 – 2026*, Antarctica New Zealand, Christchurch

Ataria J, M Mark-Shadbolt, A Mead, K Prime, J Doherty, J Waiwai, T Ashby, S lambert and G Garner, 2012, 'Whakamanahia te mātauranga o te Māori: Empowering Māori knowledge to support Aotearoa's aquatic biological heritage', *New Zealand Journal of Freshwater Research*, 52(4), 467

Bateman, 2005, *Bateman New Zealand encyclopaedia,* (6th ed), David Bateman, Auckland

Bertuol-Garcia D, C Morsello, C El-Hani and R Pardini, 2018, 'A conceptual framework for understanding the perspectives and causes of the science-practice gap in ecology and conservation', *Biological Reviews,* 93, 1032

Bracewell-Worrall A, 2017, 'Visitors will keep coming if national park fees introduced – industry', *Newshub* (21 February 2017)

Brockington D, 2002, Fortress *conservation: The preservation of the Mkomazi Game Reserve, Tanzania*, James Currey, Oxford

Burnett S, 2023, *Ecosanctuaries, grassroots community development and partnerships with tangata whenua: A postdevelopment perspective*, (A thesis presented in partial fulfilment of the requirements for the degree of Master of International Development, Massey University, Palmerston North)

Caillon S, G Cullman, B Verschuuren and E Sterling, 2017, 'Moving beyond the human–nature dichotomy through biocultural approaches: Including ecological well-being in resilience indicators', *Ecology and Society*, *22*(4), 27

Carroll J, 2018, 'Helicopter noise at Franz Josef called "elder abuse" as spotlight thrown on enforcement', *Stuff Media* (20 July 2018)

Christie J, P Pearce, P Phifer, S Parsons and A Tait, 2020, *Department of Conservation climate change adaptation action plan 2020/21 – 2024/25,* Department of Conservation, Wellington

Clark B and J Mills, 2021, *Review of the governance of Fish and Game New Zealand and the regional Fish and Game councils,* Report prepared for the Minister of Conservation

Cook C, R Carter, R Fuller and M Hockings, 2012, 'Managers consider multiple lines of evidence important for biodiversity management decisions', *Journal of Environmental Management,* 30, 1

Craw J, 2015, 'Focus and performance in managing post-border biosecurity in New Zealand', *Perspectives in Biosecurity,* 3, 28

Dasgupta P, 2021, *The economics of biodiversity: The Dasgupta review*, Final report of the Independent Review on the Economics of Biodiversity led by Professor Sir Partha Dasgupta, The Treasury, London

Davies L, 2019, 'More scenic flights proposed for Mount Cook – but some are concerned about noise', *1News* (2 February 2019)

De Lange P, J Rolfe, J Barkla, S Courtney, P Champion, L Perrie, S Beadel, K Ford, I Breitwieser, I Schönberger, R Hindmarsh-Walls, P Heenan and Ladley, 2017, 'Conservation status of New Zealand indigenous vascular plants, 2017', *New Zealand Threat Classification Series 22*

Department of Conservation, 2006, *Tongariro National Park management plan 2006–2016: Te kaupapa whakahaere mo Te Papa Rēhia o Tongariro*

Department of Conservation, 2010, *West Coast conservation management strategy 2010 – 2020*, Volume 1

Department of Conservation, 2011, *Destination management framework: A new approach to managing destinations,* Department of Conservation, Wellington

Department of Conservation, 2012, *Report of the Department of Conservation to the Local Government and Environment Select Committee on the Game Animal Council Bill: Summary of submissions*, Department of Conservation, Wellington

Department of Conservation, 2013, *Conservation Boards review: Final report of the Conservation Boards Review Panel*, Department of Conservation, Wellington

Department of Conservation, 2014, *Conservation management strategy: Auckland 2014 – 2024,* Volume 1

Department of Conservation, 2014, *Conservation management strategy: Waikato 2014 – 2024,* Volume 1

Department of Conservation, 2014, *Statement of intent 2014-2017*, Department of Conservation, Wellington

Department of Conservation, 2016, *Conservation management strategy: Otago 2016* (revised edition 2022), Volume 1

Department of Conservation, 2016, *Conservation management strategy: Southland Murihiku 2016,* Volume 1

Department of Conservation, 2016, *Department of Conservation statement of Intent 2016 – 2020*, Department of Conservation, Wellington

Department of Conservation, 2017, *Game Trophy Export Levy: Summary of consultation submission*, Department of Conservation, Wellington

Department of Conservation, 2018, *Advice to select committee on provision of an infringement regime for Fish and Game Councils*, Department of Conservation, Wellington

Department of Conservation, 2018, *Draft Aoraki/Mount Cook national park management plan*

Department of Conservation, 2019, *Conservation management strategy: Wellington 2019,* Volume 1

Department of Conservation, 2019, *DOC Visitor sites data to 28 February 2019*, Department of Conservation, Wellington

Department of Conservation, 2019, *New Zealand's sixth national report to the United Nations Convention on Biological Diversity: Reporting period 2014 – 2018,* Department of Conservation, Wellington

Department of Conservation, 2020, *Biodiversity in Aotearoa: An overview of state, trends and pressures,* Department of Conservation, Wellington

Department of Conservation, 2020, *Te mana o te taiao - Aotearoa New Zealand biodiversity strategy 2020,* Department of Conservation, Wellington

Department of Conservation, 2021, *Annual report for year ended 30 June 2021*, Department of Conservation, Wellington

Department of Conservation, 2021, *Heritage and visitor strategy, He haerenga ki to rautaki taonga tuku iho, manuhiri tūārangi hoki*, Department of Conservation, Wellington

Department of Conservation, 2022, *Annual report for year ended 30 June 2022*, Department of Conservation, Wellington

Department of Conservation, 2022, *Department of Conservation statement of intent 2022–2026*, Department of Conservation, Wellington

Department of Conservation, 2022, *Regulatory impact statement: Introducing a threshold for the auditing of reserve boards and reserve administrative bodies,* Department of Conservation, Wellington

Department of Conservation, 2023, *Briefing to the incoming Minister of Conservation,* Department of Conservation, Wellington

Department of Conservation and Land Information New Zealand, 2023, *Long-term insights briefing: How can we help biodiversity thrive through innovative use of information and emerging technologies?,* Department of Conservation, Wellington

Deautz A, G M Heal, R Niu, E Swanson, T Townshend, L Zhu, A Delmar, A Meghji, S A Sethi and J Tobin-de la Puente, 2020, *Financing nature: Closing the global biodiversity financing gap*, The Paulson Institute, The Nature Conservancy and the Cornell Atkinson Center for Sustainability

Envirostrat, 2022, *Conservation law reform economics of the conservation estate: Understanding the current status and options for conservation finance: Draft findings to Environmental Defence Society,* Envirostrat, Auckland

European Commission, Directorate-General for Environment and H Roy, 2015, *Invasive alien species - prioritising prevention efforts through horizon scanning – Final report*, Publications Office, Brussels (ENV.B.2/ETU/2014/0016)

European Commission and Directorate-General for Environment, 2022, *Study on invasive alien species – development of risk assessments to tackle priority species and enhance prevention: Final report and Annexes,* European Union, Brussels

Ewing I, 2023, 'Calls for next Government to fund pest control as deer, pig, goat and wallaby numbers explode', *Newshub* (30 September 2023)

Fea N, W Linklater and S Hartley, 2020, 'Responses of New Zealand forest birds to management of introduced mammals', *Conservation Biology*, 35(1), 35

Federated Farmers, 2019, *Submission on Action for Healthy Waterways documents: Discussion document, draft NPS, proposed NES and draft stock exclusion regulation* (31 October 2019)

Forde B, 1986, 'Science and the law', *New Zealand Science Review,* 43, (1-2), 12

Gavin M, J McCarter, F Berkes, A Mead, E Sterling, R Tang and N Turner, 2018, 'Effective biodiversity conservation requires dynamic, pluralistic, partnership-based approaches', *Sustainability*, *10*(6), 1846

Gavin M, J McCarter, A Mead, F Berkes, J Stepp, D Peterson and R Tang R, 2015, 'Defining biocultural approaches to conservation', *Trends in Ecology & Evolution*, *30*(3), 140

Geddis A and J Ruru, 2019, 'Places as persons: Creating a new framework for Māori-Crown relations', in Varuhas J (ed), *The frontiers of public law*, Hart Publishing, Oxford

Grear A, 2020, *Environmental justice,* Edward Elgar Publishing, Cheltenham

Hackwell K and M Robinson, 2021, *Protecting our natural ecosystems carbon sinks,* Forest and Bird, Wellington

Heigl F, B Kieslinger and K Paul, 2019, 'Toward an international definition of citizen science' *Proceedings of the National Academy of Sciences,* 116(17), 8089

Holling C and G Meffe, 1996, 'Command and control and the pathology of natural resource management', *Conservation Biology,* 10(2), 328

Hughey K, G Kerr and R Cullen, 2019, *Public perceptions of New Zealand's environment: 2019,* Lincoln University, Lincoln

Hulme P, 2020, 'Plant invasions in New Zealand: Global lessons in prevention, eradication and control', *Biological Invasions* 22, 1539

Intergovernmental Panel on Climate Change, 2022, *Impacts, adaptation and vulnerability,* Contribution of Working Group II to the Sixth Assessment Report of the Intergovernmental Panel on Climate Change*,* Cambridge University Press, Cambridge and New York

Intergovernmental Panel on Climate Change, 2023, *Synthesis report of the IPCC Sixth assessment report (AR6),* Cambridge University Press, Cambridge and New York

International Union for Conservation of Nature, 2020, *IUCN EICAT categories and criteria: The Environmental Impact Classification for Alien Taxa*, International Union for the Conservation of Nature, Switzerland

Jaric I, F Courchamp, R Correia, S Crowley, F Essi, A Fischer, P Gonzalea-Moreno, G Kalinkat, X Lambin, B Lenzner, Y Meinard, A Mill, C Musseau, A Novoa, J Pergi, P Pysek, L Pyskova, P Robertson, M von Schmalensee, R Shackleton, R Stefansson, K Stajerova, D Verissimo and J Jeschke, 2020, 'The role of species charisma in biological invasions', *Frontiers in Ecology and the Environment,* 18, 345

Kadykal A, R Buston, P Morrison, C Anderson, H Bickerton, C Francis, A Smith and L Fahrig, 2020, 'Bridging research and practice in conservation'*, Conservation Biology,* 35(6), 1725

Kāhui Wai Māori, 2019, *Te mana o te Wai: The health of our wai, the health of our nation*, Kahui Wai Māori Report to Hon Minister David Parker

Kaipara District Council, 2016, *Reserve management plan Kai Iwi Lakes (Taharoa Domain) 2016*, Kaipara District Council, Dargaville

Kawharu M, 2000, 'Kaitiakitanga: A Māori anthropological perspective of the Māori socio-environmental ethic of resource management', *The Journal of the Polynesian Society,* 109(4), 349

Kelsche A, Y Takahashi, R Dasgupta, A Mader, B Johnson and P Kumar, 2020, 'Invasive alien species and local communities in socio-ecological production landscapes and seascapes: A systematic review and analysis', *Environmental Science and Policy*, 112, 275

Koolen-Bourke D and R Peart, 2021, *Conserving nature: Conservation law reform issues paper,* Environmental Defence Society, Auckland

Koolen-Bourke D and R Peart, 2022, *Science for policy: The role of science in the National Policy Statement for Freshwater Management,* Environmental Defence Society, Auckland

Koolen-Bourke D, R Peart and S Schlaepfer, 2023, *Reform of the Wildlife Act 1953: An opportunity for transformative change of Aotearoa New Zealand's Biodiversity Law*, Environmental Defence Society, Auckland

Koolen-Bourke D, R Peart, B Wilde and T Turner, 2023, *Independent review of the conservation management planning system*, Environmental Defence Society, Auckland

Kuehn R, 2000, 'A taxonomy of environmental justice', *Environmental Law Reporter,* 30, 10681

Langer L, S Wegner, G Pearce, N Melia, N Luff and D Palmer, 2021, *Adapting and mitigating wildfire risk due to climate change: Extending knowledge and best practice*, report for Ministry of Primary Industries, Scion, Rotorua

Lee W, R Wood and G Rogers, 2010, 'Legacy of avian-dominated plant-herbivore systems in New Zealand', *New Zealand Journal of Ecology,* 34(1), 28

Le Heron E, J Logie, W Allen, R Le Heron, P Blackett, K Davies, A Greenaway, B Glavoic and D Hikuroa, 2019, 'Diversity, contestation, participation in Aotearoa New Zealand's multi-user marine spaces', *Marine Policy*, 106, 103536

Lenihan R, 2016, *Oxford Dictionary Plus History*, Oxford University Press, Oxford

Linkov I, D Loney, S Cormier, F Satterstrom and T Bridges, 2009, 'Weight-of evidence evaluation in environmental assessment: Review of qualitative and quantitative approaches', *Science of the Toral Environment,* 407, 5199

Lyver P, J Davies and R Allen, 2014, 'Settling Indigenous claims to protected areas: Weighing Māori aspirations against Australian experiences', *Conservation and Society,* 12(1), 89

Lyver P, A Akins, H Phipps, V Kahui, D Towns and H Moller, 2015, 'Key biocultural values to guide restoration action and planning in New Zealand'*, Restoration Ecology*, 24(3), 314

Lyver P, J Ruru, N Scott, J Tylianakis, J Arnold, S Malinen, C Bataille, M Herse, C Jones, A Gormley, D Peltzer, Y Taura, P Timoti, C Stone, M Wilcox and H Moller, 2019, 'Building biocultural approaches into Aotearoa – New Zealand's conservation future', *Journal of the Royal Society of New Zealand*, *49*(3), 394

MacDonald N, 2020, 'Glacier tourism is on thin ice', *Stuff Media* (30 September 2020)

Mark A, 1973, 'Man and the environment: The New Zealand situation', *Otago Law Review*, 393

Marsden M and T Royal (eds), 2003, *The woven universe: Selected writings of Rev. Māori Marsden*, Estate of Rev. Māori Marsden, Otaki

Maxwell K, K Ratana, K Davies, C Taiapa and S Awatere, 'Navigating towards marine co-management with Indigenous communities', *Marine Policy* 111, 103722

McNeill J, 2016, 'Different meanings of 'nature' for New Zealand's Conservation institutions', *Policy Quarterly* 12(1), 3

Mead S, 2003, *Tikanga Māori: Living by Māori values,* Huia Publishers, Wellington

Meyer R, 2011, 'The public values failures of climate science in the US', *Minerva*, 49, 47

McGlone M and S Walker, 2010, 'Potential effects of climate change on New Zealand's terrestrial biodiversity and policy recommendations for mitigation, adaptation and research', *Science for Conservation 312*, 50

Ministry for Primary Industries, 2016, *Biosecurity 2025 direction statement for New Zealand's biosecurity system,* Ministry for Primary Industries, Wellington

Ministry for Primary Industries, 2021, *Regulatory impact statement – national* phytophthora agathidicida *pest management plan*, Ministry for Primary Industries, Wellington

Ministry for the Environment, 2022, *National Policy Statement for Indigenous Biodiversity draft implementation plan*, New Zealand Government, Wellington

Ministry for the Environment, 2023, *Helping nature and people thrive: Exploring a biodiversity credit system for Aotearoa New Zealand: Discussion document*, Ministry for the Environment, Wellington

Ministry for the Environment and Stats NZ, 2020, *New Zealand's environmental reporting series: Our freshwater 2020,* Ministry for the Environment and Stats NZ, Wellington

Ministry for the Environment and Stats NZ, 2022, New Zealand's environmental reporting series: *Environment Aotearoa 2022,* Ministry for the Environment and Stats NZ, Wellington

Ministry of Business, Innovation and Employment and Department of Conservation, 2019, *New Zealand-Aotearoa government tourism strategy*, New Zealand Government, Wellington

Ministry of Business, Innovation and Employment, 2023, *Draft tourism environment action plan: Tourism industry transformation plan*, Ministry of Business, Innovation and Employment, Wellington

Ministry of Business, Innovation and Employment, 2024, *Proposed changes to the International Visitor Conservation and Tourism Levy: Discussion document,* New Zealand Government, Wellington

Morgan T, 2011, 'Waiora and cultural identity: Water quality assessment using the Mauri Model', *AlterNative: An International Journal of Indigenous Peoples*, 3(1), 42

Morton J, 2020, 'How climate change is throwing beech forests "out of synch"', *New Zealand Herald* (12 February 2020)

Mutu M, 2021, 'Maori concepts and practices of sovereignty', in Hokowhitu B, A Moreton-Robinson, L Tuhiwai-Smith, C Andersen and S Larkin (eds) *Routledge handbook of critical indigenous studies*, Taylor & Francis Group

Nash S, 2022, *Release of discussion document: Proposed changes to International Visitor Conservation and Tourism Levy*, Ministry of Business, Innovation and Employment, Wellington

Newnham R, 2021, 'Monitoring airborne pollen in New Zealand', *Journal of the Royal Society of New Zealand,* 52, 192

New Zealand Conservation Authority, 2013, *NZCA advice to the Director-General about DOC restructuring*, New Zealand Conservation Authority, Wellington

New Zealand Fish and Game Council, 2022, *Performance report of the New Zealand Fish and Game Council for the year ended 31 August 2022*, New Zealand Fish and Game Council, Wellington

New Zealand Fish and Game Council, 2023, *Briefing to the Incoming Minister for Hunting and Fishing*, New Zealand Fish and Game Council, Wellington

New Zealand Game Animal Council, 2022, *2022 Game Animal Council hunter survey results*, New Zealand Game Animal Council, Te Puke

New Zealand Game Animal Council, 2022, *Statement of performance expectations, financial year 2022-23,* New Zealand Game Animal Council, Te Puke

New Zealand Game Animal Council, 2023, *Briefing to Incoming Minister of Conservation*, New Zealand Game Animal Council, Te Puke

New Zealand Game Animal Council, 2023, *Submission on Natural and Built Environment Bill* (12 February 2023)

New Zealand Government, 1989, *Principles for Crown action on the Treaty of Waitangi*, New Zealand Government, Wellington

New Zealand National Party, 2023, *Recreation, culture and food: National's plan for hunting and fishing*

Ngata A and W Ngata, 2019, 'The terminology of whakapapa', *Journal of the Polynesian Society*, 128(1), 19

Office of the Ombudsman, 2019, *Public interest: A guide to the public interest test in section 9(1) of the OIA and section 7(1) of the LOGIMA,* Office of the Ombudsman, Wellington

O'Higgins T, L Manuel and T DeWitt, 2020, *Ecosystem-based management, ecosystem services and aquatic biodiversity: Theory, tools and applications*, SpringerOpen, London

Ontl T A, M K Janowiak, C W Swanston, J Daley, S Handler, M Cornett, S Hagenbuch, C Handrick, L Mccarthy and N Patch, 2020, 'Forest management for carbon sequestration and climate adaptation', *Journal of Forestry*, 119(1), 86

Options Development Group, 2022, *Partial reviews of the Conservation General Policy and General Policy for National Parks regarding Te Tiriti o Waitangi/the Treaty of Waitangi,* Report of the Options Development Group, Department of Conservation, Wellington

Otago Conservation Board, 2021, *Annual report 1 July 2021-30 June 2022*, Otago Conservation board, Dunedin

Parliamentary Commissioner for the Environment, 2013, *Investigating the future of conservation: The case of stewardship land,* Parliamentary Commissioner for the Environment, Wellington

Parliamentary Commissioner for the Environment, 2013, *On a pathway to extinction? An investigation into the status and management of the longfin eel,* Parliamentary Commissioner for the Environment, Wellington

Parliamentary Commissioner for the Environment, 2019, *Pristine, popular… imperilled? The environmental consequences of projected tourism growth,* Parliamentary Commissioner for the Environment, Wellington

Parliamentary Commissioner for the Environment, 2021, *Not 100% but four steps closer to sustainable tourism*, Parliamentary Commissioner for the Environment, Wellington

Parliamentary Commissioner for the Environment, 2021, *Space invaders: A review of how New Zealand manages weeds that threaten native ecosystems,* Parliamentary Commissioner for the Environment, Wellington

Parliamentary Commissioner for the Environment, 2023, *Submission on the Natural and Built Environment Bill and Spatial Planning Bill* (7 February 2023)

Parsons M, K Fisher and R Crease, 2021, *Blue spaces in the Anthropocene: Freshwater management in Aotearoa New Zealand*, Palgrave, London

Paul T, M Kimberley and P Beets, 2019, *Carbon stocks and change in New Zealand's natural forests: Estimates from the first two complete inventory cycles 2002-2007 and 2007 -2014*, Scion contract report for the Ministry for the Environment, Scion, Rotorua

Peart R and C Woodhouse, 2020, *Tourism and landscape protection*, Environmental Defence Society, Auckland

Peltzer D A, R B Allen, G M Lovett, D Whitehead and D A Wardle, 2010, 'Effects of biological invasions on forest carbon sequestration', *Global Change Biology*, 16(2), 723

Peltzer D and G Nugent, 2023, *Review of the likely magnitude and manageability of deer impacts on carbon stores in indigenous forests*, report prepared for Game Animal Council, Landcare Research, Lincoln

Peters M, D Hamilton and C Eames, 2015, 'Action on the ground: A review of community environmental groups restoration objectives, activities and partnerships in New Zealand', *New Zealand Journal of Ecology* 39(2), 179

Pingram M, K Collier, A Williams, B David, J Garrett-Walker, K Gorski, D Ozkundakci and E Ryan, 2021, 'Surviving invasion: Regaining native fish resilience following fish invasions in a modified floodplain environment', *Water Resources Research*, 57(9), e2020WR029513

Pirini A and A High, 2022, 'Dignity and mana in Aotearoa New Zealand legislation', *Policy Quarterly,* 18(1), 52

Pörtner H, R Scholes, J Agard, E Archer, A Arneth, X Bai, D Barnes, M Burrows, L Chan, W Cheung, S Diamond, C Donatti, C Duarte, N Eisenhauer, W Foden, M Gasalla, C Handa, T Hickler, O Hoegh-Guldberg, K Ichii, U Jacob, G Insarov, W Kiessling, P Leadley, R Leemans, L Levin, M Lim, S Maharaj, S Managi, P Marquet, P McElwee, G Midgley, T Oberdorff, D Obura, E Osman, R Pandit, U Pascual, A Pires, A Popp, V Reyes García, M Sankaran, J Settele, Y Shin, D Sintayehu, P Smith, N Steiner, B Strassburg, R Sukumar, C Trisos, A Val, J Wu, E Aldrian, C Parmesan, R Pichs-Madruga, D Roberts, A Rogers, S Díaz, M Fischer, S Hashimoto, S Lavorel, N Wu, H Ngo, 2021, *IPBES-IPCC co-sponsored workshop report on biodiversity and climate change*, IPBES and IPCC

Prober S, V Doerr, L Broadhurst, K Williams and F Dickson, 2019, 'Shifting the conservation paradigm: A synthesis of options for renovating nature under climate change', *Ecological Monographs* 89(1), e01333

Purdie H, J Hughes Hutton, E Stewart and S Espiner, 2020, 'Implications of a changing alpine environment for geotourism: A case study from Aoraki Mount Cook, New Zealand', *Journal of Outdoor Recreation and Tourism* 29, 100235

Pyšek P, P Hulme, D Simberloff, S Bacher, T Blackburn, J Carlton, W Dawson, F Essl, L Foxcroft, P Genoves, I Kühn, A Liebhold, L Meyerson, A Pauchard, H Seebens, M van Kleunen, M Vilà, M Wingfield and D Richardson, 2020, 'Scientists warning on invasive alien species', *Biological reviews,* 95, 1511

Quinlan M, J Alden, F Habbel and R Murphy, 2016, *The biosecurity approach: A review and evaluation of its application by FAO, internationally and in various countries,* Food and Agriculture Organisation of the United Nations, Rome

Quirion B R, G M Domke, B F Walters, G M Lovett, J E Fargoine, L Greenwood, K Serbesoff-King, J M Randall and S Fei, 2021, 'Insect and disease disturbances correlate with reduced carbon sequestration in forests of the contiguous United States', *Frontiers in Forests and Global Change*, 4

Resource Management Review Panel, 2020, *New directions for resource management in New Zealand,* Ministry for the Environment, Wellington

Roberts M, W Norman, N Minhinnick, D Wihongi and C Kirkwood, 1995, 'Kaitiakitanga: Māori perspectives on conservation', *Pacific Conservation Biology,* 2(1), 7-10

Rolfe J, T Makan and A Tait, 2021, *Supplement to the New Zealand Threat Classification System manual 2008: New qualifiers and amendments to qualifier definitions,* Department of Conservation, Wellington

Ruru J, 2004, 'Indigenous peoples' ownership and management of mountains: The Aotearoa/New Zealand experience', *Indigenous Law Journal*, 3*,* 111

Ruru J, 2004 'Managing our treasured home: The conservation estate and the principles of the Treaty of Waitangi', *New Zealand Journal of Environmental Law*, 8, 243

Ruru J, 2021, 'Seeing indigenous humanness', *Human Rights Defender,* 30(1), 43

Ruru J, P O'B Lyver, N Scott and D Edmunds, 2017, 'Reversing the decline in New Zealand's Biodiversity: Empowering Māori within reformed conservation law', *Policy Quarterly,* 13(2), 65

Russell D, 2019, *Briefing on kauri dieback: Report of the environment committee*, House of Representatives, Wellington

Sanborn T and J Jung, 2021, 'Intersecting social science and conservation', *Frontiers in Marine Science,* 8, 676394

Sax D, M Schlaepfer and J Olden, 2022, 'Valuing the contributions of non-native species to people and nature', *Trends in Ecology and Evolution*, 37(12), 1058

Schallenberg M, D Kelly, J Clapcott, R Death, C MacNeil, R Young, B Sorrell and M Scarsbrook, 2011, 'Approaches to assessing ecological integrity of New Zealand freshwaters', *Science for Conservation 307*

Scott B, 2022, *Ecosanctuaries, grassroots community development and partnerships with tangata whenua: A post-development perspective*, (A thesis presented in partial fulfilment of the requirements for the degree of Masters in International Development, Massey University, Palmerston North)

Severinsen G, 2023, *Environmental advocacy in the future resource management system,* Environmental Defence Society, Auckland

Severinsen G, R Peart, B Rollinson, T Turner and P Parson, 2022, *The breaking wave: Oceans reform in Aotearoa New Zealand*, Environmental Defence Society, Auckland

Shadbolt, A Mead, K Prime, J Doherty, J Waiwai, T Ashby, S Lambert and G Garner, 2012, 'Whakamanahia Te mātauranga o te Māori: empowering Māori knowledge to support Aotearoa's aquatic biological heritage', *New Zealand Journal of Marine and Freshwater Research* 52(4)**,** 467

Southland Regional Council, *Southland biosecurity strategy 2019 – 2024*, Southland Regional Council, Invercargill

Stantec and Boffa Miskell, 2021, *Milford opportunities project: A Masterplan for Milford Sound Piopiotahi and the journey* (2 May 2021)

Star P, 2002, 'Native forest and the rise of preservation in New Zealand (1903-1913)', *Environment and History*, 8(3), 275

State Services Commission, Treasury and Department of the Prime Minister and Cabinet, 2016, *Performance improvement framework follow-up report of the Department of Conservation*, New Zealand Government, Wellington

StatsNZ, 2019, *Tourism satellite account 2019: The contribution made by tourism to the New Zealand economy*, New Zealand Government, Wellington

Tait A, 2019, 'Risk-exposure assessment of Department of Conservation coastal locations to flooding from the sea: A national risk assessment of DOC assets, archeological sites, recreational functional locations, and ecosystem and species management units vulnerable to coastal inundation and sea-level rise', *Science for Conservation 332*

Tanentzap A, L Burrows, W Lee, F Nugent, J maxwell and D Coomes, 2009, 'Landscape-level vegetation recovery from herbivory: progress after four decades of invasive red deer control', *Journal of Applied Ecology,* 46, 1064

Taylor P, 2015, 'Valuing people in the landscape: Re-thinking conservation approaches', *USDA Forest Service Proceedings,* 187

Te Hiku o Te Ika Conservation Board, 2021, *Annual report 2020-2021*, Te Hiku o Te Ika Conservation Board, Kaitaia

Te Rito J, 2007, 'Whakapapa: A framework for understanding identity', *MAI Review*, 2, Article 2

Te Urewera Board, 2017, *Te Kawa o te Urewera*

Tipa G and L Teirney, 2006, *A cultural health index for streams and waterways: A tool for nationwide use,* Ministry for the Environment, Wellington

Tongariro-Taupo Conservation Board, 2020, *Tongariro-Taupo Conservation Board annual report 2019/2020*, Department of Conservation, Taupo

Tongariro-Taupo Conservation Board, 2021, *Tongariro-Taupo Conservation Board annual report 2020/2021*, Department of Conservation, Taupo

Tourism Futures Taskforce, 2020, *Tourism futures taskforce interim report: We are Aotearoa*, Tourism Futures Taskforce, Wellington

Tourism Industry Aotearoa, 2019, *Tourism 2025 and beyond: A sustainable growth framework*, Tourism industry Aotearoa, Wellington

Trewick S, D Hegg, M Morgan-Richards, T Murray, C Watts, P Johns and P Michel, 2022, 'Conservation status of Orthpotera (weta, crickets and grasshopper) in Aotearoa New Zealand 2022', *New Zealand Threat Classification Series 39*

Vance A, 2021, 'Outgoing conservation boss Lou Sanson on New Zealand's move away from exploiting nature: the balance has shifted', *Stuff News* (9 September 2021)

Vidyadharan A, 2021, 'Northland's Kai Iwi Lakes: Save native biodiversity or fishing-based tourism?', *New Zealand Herald* (24 July 2021)

Vimercati G, A Probert, L Volery, R Bernardo-Madrid, S Bertolino, V Céspedes, F Essl, T Evans, B Gallardo, L Gallien, P González-Moreno, M Grange, C Hui, J Jeschke, S Katsanevakis, I Kühn, S Kumschick, J Pergl, P Pyšek, L Rieseberg, T Robinson, W Saul, CS orte, M Vilà, J Wilson and S Bacher, 2022, 'The EICAT+ framework enables classification of positive impacts of alien taxa on native biodiversity', *PLoS Biolology,* 20(8), e3001729

Waitangi Tribunal, (undated), *The principles of the Treaty of Waitangi as expressed by the courts and the Waitangi Tribunal,* Waitangi Tribunal, Wellington

Waitangi Tribunal, 1988, *Report of the Waitangi Tribunal on the Muriwhenua fishing* claim *(Wai 22)*, Waitangi Tribunal, Wellington

Waitangi Tribunal, 1990, *Report of the Waitangi Tribunal on claims concerning the allocation of radio frequencies (Wai 26 and 150)*, Waitangi Tribunal, Wellington

Waitangi Tribunal, 2011, *WAI262: Ko Aotearoa tēnei: A report into claims concerning New Zealand law and policy affecting Māori culture and identity,* Volume 1, Waitangi Tribunal, Wellington

Waitangi Tribunal, 2013, *Te Kāhui Maunga: The National Park District inquiry report (Wai 1130),* Waitangi Tribunal, Wellington

Walker E, 2016, *Reclaiming kaitiakitanga: An intergenerational perspective of Kaitiakitanga within Te Parawhau* (A thesis submitted to University of Waikato in fulfilment of the requirements for the degree of Master of Maori and Pacific Development)

Walker K, F Brook, G Barker, D Roscoe, E Edwards, R Hitchmough, J Rolfe and P Michel, 2021, 'Conservation status of New Zealand terrestrial Gastropoda (slugs and snails) 2020', *New Zealand Threat Classification Series 33*

Walker E, P Wehi, N Nelson, J Beggs and H Whaanga, 2019, 'Kaitiakitanga, place and the urban restoration agenda', *New Zealand Journal of Ecology,* 43, 1

Wehrens B and R Bal, 2011, 'The coordination of research, policy and practice: A case study of collaboration in the field of public health', *Science and Public Policy*, 38(10), 755

Wehrens R, 2014, 'Beyond two communities–from research utilization and knowledge translation to co-production?', *Public Health*, 128(6), 545

Welch J, H Rimes and B Bozeman, 2015, 'Public value mapping' in Bryson J, B Crosby and L Bloomberg (eds) *Public value and public administration*, Georgetown University Press, Washington DC

Williams T, 2010, *Te mana motuhake o Tūhoe* (A thesis submitted to Victoria University in fulfilment of the requirements for the degree of Master of Laws)

Winter C, 2021, 'A seat at the table: Te Awa Tupua, Te Urewera, Taranaki Maunga and political representation', *Borderlands Journal*, *20*(1), 116

The vision for Aotearoa New Zealand's conservation system, Te Mauri Hikahika o te Taiao (the life force of nature is vibrant and thriving), is a stark contrast to current biodiversity outcomes. Around 4,000 indigenous species are at risk of extinction including 94 percent of reptiles, 91 percent of marine birds and 76 percent of freshwater fish. This highlights the extent to which the current conservation system is not working as it should.

This report builds on EDS's earlier *Conserving Nature: Conservation Reform Issues Paper* to set out how the conservation system can be made fit for purpose to address current and future challenges. It describes how the Conservation Act can be given a clearer purpose and priorities; how better provision can be made for Māori; how current institutions such as the New Zealand Conservation Authority, Conservation Boards, Fish and Game and the Game Animal Council can be strengthened; how the conservation management planning system can be streamlined; how the Wildlife Act can be reformed; and how additional funding can be sourced.

Overall, the recommendations provide for greater simplicity and greater clarity and alignment of institutional purposes and priorities. They are designed to provide a conservation system that will serve current and future generations of New Zealanders, and the unique biodiversity in their care, well into the future.

Environmental Defence Society

ISBN 978-0-9951186-7-6

9 780995 118676 >