From: no-reply@mbie.govt.nz

To: Research, Science and Innovation Strategy Secretariat

Subject: Late submission on draft RSI strategy **Date:** Monday, 18 November 2019 6:22:08 a.m.

Attachments: Online-submission-form-uploadsdraft-research-science-and-innovation-strategy-submissionsSubmission-of-

TTW-to-RSI-Strategy.pdf

Are you making your submission as an individual, or on behalf of an organisation? Organisation

Name

Melanie Mark-Shadbolt

Name of organisation or institutional affiliation

Te Tira Whakamataki

Role within organisation

CEO

Email address (in case we would like to follow up with you further about your submission)

privacy of natural persons

Which of the below areas do you feel represents your perspective as a submitter? (Please select all that apply)

If you selected other, please specify here:

Gender

Ethnicity

Name of organisation on whose behalf you are submitting, if different to the organisation named above

In which sector does your organisation operate: (Please select all that apply)
Non-profit

If you selected other, please specify here:

How large is your organisation (in number of full-time-equivalent employees)?

Please indicate if you would like some or all of the information you provide in your submission kept in confidence, and if so which information.

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Submission of Te Tira Whakamātaki on New Zealand's Research, Science & Innovation Strategy (DRAFT)

17 November 2019

Addressed to:

The Ministry of Business, Innovation and Employment (MBIE)

Copies to:

Te Tira Whakamātaki members and stakeholders

privacy of natural persons

1.0 Introduction

1.1 Te Tira Whakamātaki (TTW) is the leading Māori voice for biosecurity issues in Aotearoa New Zealand, and increasingly the leading indigenous voice internationally.

Te Tira Whakamātaki began its life as a Vision Mātauranga Connect project funded by the Ministry of Business, Innovation and Employment (MBIE) in 2015. The purpose of the Connect project was to determine if a Māori Biosecurity Network was needed and wanted by Māori communities, and if so what that would look like. In April 2017 that vision was realised when the establishment of TTW was mandated at a hui in Auckland at Mahuruhuru Marae, and again in August 2017 when the Iwi Chairs Forum mandated TTW as its biosecurity technicians.

- 1.2 Since its inception TTW has had its feet firmly embedded in research contract work via several Crown Research Institute (CRI), University, and Ministry programmes. TTW has been vocal about its concerns with the research, science and innovation (RSI) sector, taking advantage of opportunities to raise those concerns, even noting them at select committee hearings in 2018 and again in 2019. Those concerns are noted briefly below and then detailed further in the submission. They are;
 - 1. The RSI sector is inherently racist by design and therefore unable to deliver impact or transformation for Māori.
 - 2. Contestability is sucking the innovation and creativity out of the RSI sector and promoting bad behaviour.
 - 3. The RSI sector is unable to clearly articulate what its unique advantage is and what international collaborators want to access the most, and that is mātauranga Māori.
 - 4. The RSI sector largely ignores its obligations under the Treaty of Waitangi and fails to respect the intellectual property rights of Māori.

The above points are fleshed out further in the submission below.

2.0 Te Tira Whakamātaki

- 2.1 Te Tira Whakamātaki, is an award-winning Māori environmental not-for-profit and social enterprise, made up of members who are committed to:
 - Representing a collective voice of Māori, iwi, hapū, whānau for the conservation and preservation of Aotearoa New Zealand's natural environment;

- Educating and empowering Māori, iwi, hapū, and whānau about the conservation and preservation of Aotearoa New Zealand's natural environment;
- Supporting projects and collaborating on initiatives that empower and resource Māori communities that work to conserve and preserve Aotearoa New Zealand's natural environment;
- Educating the wider New Zealand public about Te Ao Māori, promoting the integration and application of Māori knowledge, culture and perspectives within the national science framework (research and policy development); and
- Developing new knowledge and understanding (mātauranga hau), based on our rich knowledge built up over many generations (mātauranga) and safeguarded by guardians from our past, related to conserving and preserving our natural environment.
- 2.2 We are mandated by the Iwi Leaders Forum as biosecurity technicians, our sponsor is Haami Piripi of Te Rarawa. Our entities are guided by our Kaumatua which include Kevin Prime, Tohe Ashby and Jim Tahae Doherty.
- 2.3 Trustees of the Foundation (the Trust) are Nick Waipara, Amanda Black, and Melanie Mark-Shadbolt who is also the CEO of our social enterprise (limited liability company). Tame Malcolm is TTW's Operations Manager; he is on the ground working with our members and communities, as well as our partners and government agencies to ensure Māori are resourced and empowered to protect and preserve our taiao (environment).
- 2.4 We have regional leads out in the communities who act as the conduits between TTW, hapu and whānau. They share the aspirations and needs of their communities with TTW, and TTW supports them to resource the needs and achieve their aspirations.

3.0 Research, Science & Innovation Strategy Response

3.1 We are pleased to see a review of New Zealand's Research, Science & Innovation Strategy (henceforth the Strategy) and a commitment towards an extended Vision Mātauranga. We acknowledge the Ministry for the time and effort that has gone into developing this document and socialising it with the RSI sector. There is much to like about the Strategy but equally much that could be done to strengthen it to ensure it is much more equitable, responsive to Māori and inclusive of Te Tiriti o Waitangi, and that it delivers benefit for the whole of Aotearoa New Zealand.

General Feedback

3.2 **Connections**: we like the emphasis on 'connections' in addition to the usual 'excellence' and 'impact' in the Strategy. We agree that the greatest opportunity for strengthening our RSI system lies in building stronger connections with and beyond the system. We note though that in the 'summary' building connections with the Treaty partner or Tangata Whenua is not included, we think this is an oversight.

The focus on 'connections' in the Strategy is some what contradicted by many other parts in the Strategy including the focus on 'excellence' and 'H1 and competitive investment' both of which act to encourage behaviours that promote exclusion of Māori, and others, and fragmentation of investment.

Building connections, or whanaungatanga, is an important concept to Māori and an underlying principle in Kaupapa Māori research. It is often seen as 'soft' or 'not science' and carries a high transactional cost. The costly front-end investment required to create connections needs to be reflected in the Strategy. Investment in relationships with Māori is consistent with Te Arawhiti Guidelines for engagement with Māori (https://tearawhiti.govt.nz/assets/Maori-Crown-Relations-Roopu/6b46d994f8/Engagement-Guidelines-1-Oct-18.pdf).

- 3.3 Investment Framework: we would like to see more investment in 'mission-led science' as arguably this has seen better connections across the system with Māori, better outcomes for Māori, and is more conducive to aspirational and need driven research. Equally we would like to see less focus on competition in the framework. Competition, we believe, has driven innovation and creativity out of the RSI system and increased 'bad behaviour' amongst research organisations and researchers, especially as they look to exploit Māori and extract mātauranga. Additionally, 'mission-led' science is one of the few mechanisms the NZ science system currently has to achieve connections yet investment in this area is extremely small relative to the other investments shown in the diagram on page 15.
- 3.4 **Competition**: As noted in the Strategy some policy instruments such as Centres of Research Excellence and National Science Challenges have helped increase the scale and nature of connection across the research sector but incentives, such as excellence and best team, encouraged by the same policy instruments result in a less connected approach. If researchers feel incentivised to pursue individual projects rather than collaborate more broadly, then this impacts Māori inequitably. Competition in the sector not only disincentivises creativity but it disincentivises the inclusion of Māori and

mātauranga. It is one of the major drives against innovation, because it discourages individuals and institutions from sharing knowledge and thinking about the big picture. Competitive funding grants is one of the issues hampering connectivity. The Endeavour fund is not being used strategically and bidding is stretching research organisations resources, stressing researchers, and putting undue pressures on communities especially Māori who are constantly engaging with research bidders who often don't get funded and then disappear. Surely it is time to rethink the waste being created in the system by endless bidding, and how we can stimulate connectivity through larger funds that encourage connections to be built by encouraging a 'right teams' approach to new knowledge generation (Question 17).

- 3.5 Innovation: Innovation is, as noted in the Strategy, reliant on the availability of skills, regulation, availability of capital and investment, international connections, and the quality of infrastructure. Equally it is necessary for the transformation needed to advance New Zealand. However, the focus on frontier science is troublesome, and we don not agree that the focus on frontier science (c.f. 'behind the frontier) is the right approach for Aotearoa New Zealand. There is much 'behind the frontier' science that New Zealand still needs to get right, and that New Zealand can and should be good at for example its work with indigenous people (Question 4).
- 3.6 Excellence: We acknowledge that this Strategy attempts to broaden the definition of 'excellence' by defining its various characteristics; people, global outlook and partnership, however the focus on extending the frontier in part compromises that attempt. While we acknowledge the importance of 'excellence' within the system the continued focus on excellence within a global context means there aren't any real incentives for the science system to respond in a way that is different to how it currently operates i.e. focusing on H-indices and citation metrics. The traditional definition of 'excellence' has and continues to exclude Māori from participating fully in the system. We see nothing in this Strategy that will change that for Māori if the focus remains on frontier science. We believe that under the proposed Strategy, individuals and organisations will continue to assume that excellence can and should be measured in the same traditional ways, instead of being incentivised to seek different or novel metrics. We believe that excellence can and should be measured in many different ways not simply these traditional and increasingly outdated metrics.

Additionally, we believe a focus on excellence is counter to the claims that diversity is a key focus as the excellence interpretation to date has meant those who are fragmented across projects, who are new to RSI, who take time off to have children, or who do not

have typical academic careers are penalised through gaps in their CV's. We strongly suggest that MBIE consider a new and explicit definition of excellence that allows for Māori, women, early career researchers and industry to participate more fully in the RSI system (Question 11, 12 & 13).

- 3.7 **Diversity**: Acknowledging the lack of diversity in the current system is commendable, as is the inability of the current system to fully engage productively with Māori. However, it is concerning that Māori are being bundled in with diversity issues. Māori are Treaty partners with the Crown and its agents, the relationship between the two is unique and separate from a discussion on diversity. This needs to be clearly stated in the final Strategy.
- 3.8 Making New Zealand a Magnet for Talent: Attracting offshore talent maybe necessary in some disciples but as noted in the Strategy making the most of the talent we have is equally, if not more, important. There are approximately 700 Māori with PhD's, the large majority of whom are not working in the RSI system. We assert that creating a system that our own people want to and can work in must be our first priority. This means we need to ensure the system is free from institutional racism & systemic-biases, and extractive behaviours. Proactive investments in building a pipeline for future research leaders is vital but it maybe necessary that for Māori these are held outside of typical research organisations (Question 19). Policy instruments can be used to nurture and grow emerging Māori researchers by ensuring their time is less fragmented, their unique world view is valued, they are included in publications, and their communities are resourced to fully participate in their research.
- people around the world, especially in the Pacific, to be pursued in addition to those noted in the Strategy. Our approach to indigenous inclusion in RSI is arguably world leading, despite its deficiencies, and increasingly international collaborators are interested in accessing mātauranga. This means that the Strategy needs to protect Māori rights and interests as noted in the extending Vision Mātauranga section.
- 3.10 **Start-Up's**: Increasingly Māori enterprises are looking offshore for research partners, choosing to bypass the complexities and biases in the New Zealand RSI sector i.e. Tuaropaki, Ngāi Tahu, Te Awa Tupua. The consequence of this is Māori researchers are increasingly unable to work in the areas they are trained to work or with the communities they know, and thus unlikely to stay in the RSI system. A Māori investment strategy or procurement mechanism could help address this.

- 3.11 Strategic Science investment Fund (SSIF) Platform: We strongly urge against increasing funding for CRIs until they can demonstrate outcomes for Māori. We believe that there are to many CRI's competing for limited funds and talent, and this is leading to perverse behaviour in their approaches to working with and for Māori. We argue that consideration must be given to Māori funding procurement and dedicated Māori SSIF Platforms.
- 3.12 **Building Firm Foundations**: Ensuring funds are closely aligned to the government's goals cannot be achieved without direction. In our opinion the Strategy is not clear about which areas we should prioritise, and how we would go about choosing them. As noted already we think the Strategy fails to take advantage of what is unique to New Zealand and what increasingly brings the most international interest, mātauranga Māori. The Treaty of Waitangi must therefore be a foundation for the Strategy if we are to realise our potential in this space.

We do not believe a dynamic network of research providers across the horizons of research and innovation is achievable without considerable changes to policy instruments and direct intervention by MBIE. Changes must be made to the way research organisations hire, incentivise and promote talent, and changes to the definition of 'researcher' must also be considered. CRIs and Universities must be encouraged to make efficiencies, we would go as far as to suggest we have to many CRIs and Universities, almost all of which are under delivering for Māori.

- 3.13 Indicators of Success: We believe it is time that MBIE gets real with its KPI's and measures, the KPI's in this Strategy will arguable give rise in the same results and behaviours we have now. Excellence and impact measured by citation will exclude Māori, early career researchers and many women. Citations do nothing to transform New Zealand or meet the governments priorities. Diversity as a measure alone will not counter this. Impact on communities and their uptake and engagement in research is a better measure of success. We support the 'connection' indicators of success, though note there are no measures of connection with Māori communities.
- 3.14 **Te Taiao**: Whilst we understand that the Strategy is not written to focus on particular themes or topics, its focus on frontier science could severely hamper our ability to deliver good environmental outcomes. As the PCE pointed out in his report just last week, much solid science, research and mātauranga knowledge must be brought to bear to improve environmental outcomes for the benefit of Aotearoa. However, these areas of urgent need could easily be deemed mundane or 'BAU' under the Strategy as

- it stands, further limiting our ability to manage for environmental sustainability at a time when we need to be, and can be, a global leader here.
- 3.15 **Government priority Build closer partnership with Māori**: The RSI system does need to build closer partnerships with Māori and remove barriers to Māori participation, as noted on page 12 of the Strategy. The initial ideas on how the system could do that are a start but need to be strengthened significantly in the final version of the Strategy.

4.0 Vision Mātauranga & Māori Feedback

- 4.1 The Strategy noted that inclusive means 'the ability to participate in and benefit from RSI, which will be widely and equitably shared' but there is little detail on how that will be achieved. Below we discuss some of the positives, negatives and gaps in the Strategy, and offer guidance on how this could be mitigated.
- 4.2 The five initiatives being considered are a good starting place for the Strategy, in particular initiatives 2, 3, 4 & 5. Initiative 1, ensuring the RSI system is open to the best Māori thinkers and researchers, and allow them to thrive in the broadest range of endeavours, is an admiral goal for the Strategy but would require a change to the definition of 'excellence' to include non-traditional researchers (i.e. Rongoā practitioners) with non-traditional outcomes (i.e. health benefits without publications).
- 4.3 Partnership with Māori: It is disappointing that the Strategy excludes a Treaty-Based framework. We suggest working with Treaty partners to develop a framework for the Strategy going forward. The emphasis on co-design is great but needs to go much further if we are to achieve a system shift towards acceptance of mātauranga and Kaupapa Māori as important scholarly activities that have enormous cultural, social, economic and environmental benefits for Aotearoa/NZ in their own right. The current system is failing Māori, despite the VM policy and the statistics are woeful, so a deeper analysis is needed for the current systemic failure to ensure that Māori are trained, supported and empowered to make a contribution to the future of Aotearoa. There may also be more novel mechanisms to consider. For example, a Māori-led and run fund that the rest of the system needed to bid into could redress the current power imbalance in the system. That is just one mechanism that could be used to shift current paradigms and norms.
- 4.4 **Te Tiriti o Waitangi**: While the Strategy acknowledged the framework of the Treaty of Waitangi, we prefer to see the Strategy acknowledge Te Tiriti o Waitangi and include it in the Strategy.

- 4.5 Measures and Weighting of Vision Mātauranga (VM): While not expressly dealt with in the Strategy we felt it important to note that VM is currently not given a fair weighting in the assessment of funding applications. Rather than be given a percentage metric it is assessed via narrative. We would prefer to see VM given a percentage weighting of around 30-50%, or for all funding applications to be assessed by a VM panel first, those that don't pass should not move on to the second round.
- 4.6 **WAI 262:** A response to WAI 262 can not be deferred any longer, the Strategy cannot wait for a government response, as it could take another decade. Working with Māori the Strategy can include an appropriate response to WAI 262 that is able to include the government's response at a later date. We urge MBIE to be proactive in this space.
- 4.6 **Māori Procurement**: We believe that the current RSI sector is unable to procure and manage Māori research. We suggest that a separate mechanism be developed within MBIE to manage Māori research procurement and investment and that Māori SSIF Platforms should be funded.
- 4.7 Engagement & Workforce Development: The Strategy must recognise and align with Te Arawhiti Engagement Guidelines. We recommend that not only is a Māori Engagement Framework developed, but so too is a Māori Workforce Development Plan. The Māori Workforce Development Plan must include provisions for building operational capability within the relevant Ministries.
- 4.8 **Legislative Status:** The Māori Health Committee has a statutory role for ensuring the ethical consideration of Māori in HRC research, more consideration should be given to legislative mechanisms for ensuring Māori are provided for equitably in the RSI system and Te Tiriti o Waitangi is recognised. Equally consideration should be given to employment laws that allow for target employment of Māori in RSI.
- 4.9 **Māori Investment**: It is important to note that increasingly large Māori corporations, iwi, trusts etc., are turning to offshore research institutes for their collaborations. When asked why the response includes frustrations with complex application processes and difficulties engaging with research organisations. Incentives for increasing Māori investment in RSI must be made in collaboration with mechanisms that shift the balance of power and address the behaviour of researchers and research organisations.
- 4.10 **Cultural Safety**: The RSI system has created and allowed racist behaviour to permeate it at all levels. Without strong mechanisms that shift the power imbalance and promote different and better behaviours in the system, there will be no system shift towards a genuine acceptance of mātauranga and Kaupapa Māori research. We urge caution

when using language such as the 'best Māori thinkers and researchers', and 'Māori knowledge, culture and world views are integrated' as it should be seen as extractive. We would encourage mechanisms be developed and included in the Strategy that acknowledge not only the need to increase Māori participation and mātauranga but also safety for Māori already in the system.

5.0 Summary

5.1 Making NZ the best it can be: it is laudable that the vision aims to ensure NZ can shine on the world stage, and we agree that there is a lot that NZ science can, and should, offer the world. However, relative to many countries, our investment in science and research is modest (at best) and in fact miniscule (on the world stage). In turn this means that we might need to make choices, and in our opinion the Strategy is not clear about which areas we should prioritise, and how we would go about choosing them. Additionally, we think the Strategy fails to take advantage of what is unique to New Zealand, and what increasingly brings the most international interest, mātauranga Māori.

The strategy is light on detail as to the mechanisms needed to choose what NZ wants to be really good at - and how we will invest purposefully for both excellence and impact. Currently, the Strategy is weighted heavily towards H1 science – which naturally incentivises an emphasis on traditional metrics of excellence. This approach does not lend itself well to having a strategic overview or focus on what NZ can, and should, choose to do well – which would in turn incentivise investment in priority areas. The Strategy is light on content directly relevant to Māori and incentives or the sector or Māori to

5.2 Resources, Realignment, Relationships: We support the statements made by Tā Mason Durie that realignment is needed to ensure the RSI sector is able to respond to iwi priorities and whānau aspirations and that the results and measures of RSI progress reflect Māori aspirations. To achieve that resourcing of Māori talent and infrastructure, and relationships with and within Māori communities is vital.

5.3 Response to TTW statements in section 1:

TTW Statements	Response
The RSI sector is inherently racist by design and	The system has no mechanisms to ensure Māori
therefore unable to deliver impact or	rights and interests are equitably considered or
transformation for Māori.	enforced. Equally the weighting given to and
	measures of VM success are unfair and biased,
	as is the assessment of VM by non-Māori

Contestability is sucking the innovation and creativity out of the RSI sector and promoting	assessors. We believe the Māori exodus of the system is evidence of inherent racism and bias. A lack of Treaty framework means the system is unable to deliver transformation for Māori. Contestability, as noted above, removes creativity and innovation and promotes what we
bad behaviour.	deem 'bad behaviours' in the system. Research organisations and researchers are extractive, tokenistic and exclusive, and have led to the Māori exodus of the system.
The RSI sector is unable to clearly articulate what its unique advantage is and what international collaborators want to access the most, and that is mātauranga Māori.	A focus on international collaborations and 'shiny new technologies' is ignorant of the uniqueness of Aotearoa New Zealand. Its also inconsistent with what the sector is hearing from international collaborators, current and new, who are increasingly interested in mātauranga (e.g. Callaghan Innovation feedback re interest in NZ RSI).
The RSI sector largely ignores its obligations under the Treaty of Waitangi and fails to respect the intellectual property rights of Māori.	Te Tiriti o Waitangi is excluded from the Strategy and obligations to it and Māori are not enforced in the system.

5.3 Response to Questions

No.	Question	Response
The Contribution	on of Research, Science, and Innovation	
1.	Where can the RSI System make the greatest contribution towards the transition to a clean, green carbon-neutral New Zealand?	Inclusion of mātauranga solutions and defragmentation of the system through targeted investment.
2.	Where else do you see it making a major contribution?	Prioritisation of investment, and increased investment in Mission-led research.
3.	What else could the RSI system be doing to accelerate the progress towards the government's priorities?	Prioritisation of investment, increased spend on Mission-led research, and accelerated investment in diversity programmes.
Researching an	nd innovating towards the frontier	
4.	Do you agree that the RSI Strategy should be focused on innovation at the "frontier" (creating new knowledge) rather than behind the frontier (using existing knowledge to improve ways we do things)?	No. See 3.5
5.	In which research and innovation areas does New Zealand have an ability to solve problems that nobody else in the world has solved/ Why?	Indigenous solutions especially to environmental issues.
6.	In which areas does New Zealand have a unique- opportunity to become a world leader? Why?	Indigenous solutions especially to environmental issues.

	Ia	T
7.	What do you consider to be the unique	Indigenous solutions
	opportunities or advantages available to the RSI	especially to environmental
	System in New Zealand?	issues.
8.	What RSI challenges are unique to New Zealand,	Many of our environmental
	that New Zealand is the only country likely to	issues are unique to NZ, as
	address?	is our Treaty and our
	addi coo:	indigenous people (Māori).
0	NATIONAL CONTRACTOR OF THE CON	
9.	What are the challenges of innovating in the public	Public sector is slow to
	sector? How do they differ from those in the	adopt and change and
	private sector?	therefore it can be
		frustrating for participants
		and to slow to create
		impact. Is colonial
		structures prevent
		creativity and innovation.
Strongthoning	Connections	Creativity and innovation.
Strengthening		V-0 2-2-2
10.	Do you agree that the key challenge for the RS	Yes. See 3.2
	system is enabling stronger connections/ Why or	To date it has failed to
	why not?	connect to Māori.
Excellence		
11.	Do you agree with the definition of excellence	No. See 3.6
	presented here as the best thing possible in its	
	context? Why or why not?	
12.	How can we achieve diversity within our research	See 3.6 & 3.7
12.		
	workforce? What are the current barriers	Incentivise, change
	preventing a diverse range of talent from thriving	regulations to allow for
	in the RSI system?	targeted recruitment, set
		targets, develop a
		Workforce Plan.
13.	Do you agree that excellence must be seen in a	No. See 3.6
	global context, and draw from the best technology,	New Zealand needs to focus
	people, and ideas internationally? Why or why not?	on what it does well and
		what it is world-leading in.
		Our investment is
		insignificant by world
		standards, we should not
		try to compete.
14.	Do you agree that excellence is strengthened by	Yes. But we also agree that
	stronger connections? Why or why not?	excellence needs to be
		defined to acknowledge
		that.
Impact		
15.	How can we improve the way we measure the	By moving away from
13.		metrics that revolve around
	impact of research?	
		citations. Instead we need
		to use collective impact
		measures for the social
		sector. See 3.6
Connections		

	I.a	T
16.	Where do you think weak connections currently	With Māori, barriers include
	exist, and what are the barriers to connections at	
	present?	
17.	What actions will stimulate more connectivity	See 3.4
	between parts of the RSI system?	
18.	How could we improve connections between	See 3.2
	people within the RSI system and people outside it,	
	including users of innovation, international experts,	
	business communities and markets?	
Making Now 7	ealand a Magnet for Talent	
		See 3.8
19.	How can we better nurture and grow emerging	See 5.8
	researchers within New Zealand, and offer stable	
	career pathways to retain young talent in New	
	Zealand?	
20.	How could we attract people with unique skills and	See 3.8
	experience from overseas to New Zealand?	
21.	What changes could be made to support career	See 3.8
	stability for researchers in New Zealand? What	
	would be the advantage and disadvantage of these	
	approaches?	
22.	Do you agree with the initiatives proposed in the	No all, see 3.8
	Strategy to support and attract talented	,,
	researchers and innovators? Are any changes	
	needed for these initiatives to be successful? Are	
	there any other initiatives needed to achieve these	
C D	objectives?	
	search and Innovation	<u> </u>
23.	What elements will initiatives to strengthen	See 3.2, 3.9 and 4.3
\	connections between participants in the RSI	
	system need to be successful?	
24.	What elements will initiatives to strengthen	See 3.2, 3.9 and 4.3
	connections between participants in the RSI	
	system and users of innovation need to be	
	successful?	
25.	What elements will initiatives to strengthen	See 3.2, 3.9 and 4.3
	connections between participants in the RSI	,
	system and international experts, business	
	communities and markets need to be successful?	
26.		Treaty Framework
20.	Are there any themes, in addition to those	Treaty Framework
	proposed in the RSI Strategy (research	
	commercialisation and international connections),	
	that we need to take into consideration?	
Start-Ups	T	-
27.	How can we better support the growth of start-	See 3.10 and 4.9
	ups?	Māori procurement
		mechanism, Māori
		investment strategy
28.	Do the initiatives proposed in the draft Strategy to	Yes. See 3.10 and 4.9
	support growth of start-up need to be changed?	Māori procurement
	Are there any other initiatives needed to support	mechanism, Māori
	start-ups?	investment strategy
	start ups:	mvestment strategy

barriers, exist that prevent start-ups and other businesses from conducting research and innovation? Innovating for public good 30. What elements will initiatives to support innovation for the public good need to be successful? 31. What public good opportunities should our initiatives in this area be focused on? Māori investment, Māori workforce development, Māori priorities Scale-up 32. What elements will initiatives to build scale in focused areas need to be successful? 33. Do the initiatives proposed in the Strategy to build scale in focused areas need to be changed? Are there any other initiatives needed to build scale? Towards an Extended 'Vision Mātauranga' 34. Does our suggested approach to extending vision Mātauranga focus in the right five areas? If not, where should it focus? 45. How can we ensure the RSI system is open to the best Māori thinker and researchers? 36. How can we ensure that Māori knowledge, culture and world views are integrated throughout our RSI system? 37. How can we strengthen connections between the RSI system and Māori businesses and enterprises? Building Firm Foundations 38. Do the current structures, funding, and policies encourage public research organisations to form a coordinated dynamic network of research across the horizons of research and innovation? What changes might be made? 39. Is the CRI operating model appropriately designed to support dynamic, connected institutions and globally leading research? What changes might be made? 40. What additional research and innovation 5ee 3.11 and 3.12	20	Add a library to the	I.,
businesses from conducting research and innovation?	29.	What additional barriers, including regulatory	Unsure
Innovating for public good What elements will initiatives to support innovation for the public good need to be successful? What public good opportunities should our initiatives in this area be focused on? Māori investment, Māori workforce development, Māori priorities			
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this strategy? What opportunities are there to infrastructure would help			
share infrastructure across institutions or with achieve goals of the			
international partners? Strategy.			_
Efficiencies should be			
sought out across			
institutions, in particular			
through shared boards,			
administration etc.			

41.	What elements will initiatives in this area need to be successful?	
42.	How should the government prioritise the areas of action, and the initiatives proposed under each area?	A criteria needs to be developed in partnership with Māori to guide prioritisation
Success		
43.	Do you have any other comments on the Strategy which have not yet been addressed?	Treaty of Waitangi Framework