

3.15 Ruamahanga (Wairarapa) Aerial Hydrogeology Survey

Evaluation, Cover Sheet and Decision Form

Project:	Ruamahanga (Wairarapa) Aerial Hydrogeology Survey	FOR:	Approval
Applicant:	Wellington Regional Council	Pipedrive ID:	Commercial I
Application type:	Main PGF	(A) Total Project Value:	\$ Commercial Information
Funding type:	Grant	(B) PGF Funding Sought:	\$ Commercial Information
Entity Type:	Local Authority	(C) PGF Funding Recommended:	\$1,402,000
Region:	Hawkes Bay	(D) Applicant Contribution:	\$ Commercial Information
Tier:	3 - Infrastructure	(D/A) Co-contribution Rate:	Comm %
Sector:	Water Storage / Management		
Application summary:	<p>Applicant is seeking funding to carry out aerial mapping of deep aquifers in the Wairarapa.</p> <p><i>[Please see full project description in the Application Description Section]</i></p>		

It is recommended that the IAP:

Support the PDU recommendation to approve a \$1,402,000 grant from the PGF to the Wellington Regional Council (GWRC) towards the Ruamahanga (Wairarapa) Aerial Hydrogeology Survey Commercial Information:

- Because this project
 - will increase the understanding of the region's water resources – this will enable greater utilisation of water resources to create economic benefits across the region and support better environmental outcomes.
 - forms part of the Water Security Package (WSP) for the Wairarapa.
 - is not for 3 waters infrastructure, but will have some benefit for local authorities in respect of 3 waters.
- Note
 - investigations will be made as to whether the Wairarapa can leverage the Hawkes Bay arrangements.
 - this funding can be conditional Commercial Information
- Consider
 - whether there is a sufficient link between aerial mapping and the sustainable, productive use of water (as

opposed to Council's core obligations under the Resource Management Act).

Section A: Triage – Assessment against PGF eligibility criteria

➤ Is the project an illegal activity?	No
➤ Is the project located in the three main metropolitan areas?	No
➤ Is the project seeking investment in large scale infrastructure of social assets?	No
➤ Is the project seeking investment for three waters?	No

Application description

A significant amount of background work has been conducted to justify the need for, the use of advanced technology and the utilisation of that data to make considerable strides in the area of Wairarapa’s water resilience management.

However, until the advent of AEM technology, fieldwork on the Ruamāhanga’s groundwater resource has been subject to significant limitations preventing full disclosure of its structure. To date, our knowledge has been restricted to the information gathered from a network of boreholes. However, these are very site specific, hugely expensive and spatially limiting compared with the quality and quantity of information AEM can gather. Recent studies/reports have recognised that access to reliable high quality water in the Wairarapa is a significant potential weakness.

Unless this issue is addressed, the combination of climate change, tighter environmental constraints and increased demand will severely constrain the areas economic and employment capabilities, as well as threaten its social and cultural resilience.

Commercial Information

Commercial Information

Commercial Information

Background

The PGF is supporting the Wakamoekau water storage project in the Wairarapa. It is unlikely that the Wakamoekau project, or alternative surface water based storage will be able to meet the needs of parts the Southern Wairarapa. Therefore ground water is expected to be part of any solution. This aerial mapping project will be critical in providing a much better understanding of those aquifers.

GWRC is proposing mapping 100% of Wairarapa ground water zones. Similar to the Hawkes Bay, this data will be invaluable for supporting the Wairarapa long term water resilience plan, and as a data set for future productive water related projects. It will also be beneficial to the region for wider water management considerations

The table below sets out the budget for the project.

Preliminary estimate of costs (excluding GST)	
1. Data preparation & planning	\$ Commercial Information
2. Project management & communication	\$ Commercial Information
3. Aerial survey data collection	\$ Commercial Information
4. Commercial Information data processing and inversion	\$ Commercial Information
5. Hydrogeological (Leapfrog) modelling	\$ Commercial Information
TOTAL	\$ Commercial Information

Co-Funding Table

Co-Funder	Pledged/Confirmed/Cash/In-Kind	\$x,xxx,xxx
Provincial Growth Fund	(via this application)	1,402,000
Commercial Infor	Confirmed	\$ Commercial Informat
Commercial Information	Confirmed	\$ Commercial Inform
Commercial Information	Confirmed	\$ Commercial Inform
Commercial Information	Confirmed	\$ Commercial Informat
Local Industry	Approved in principle and subject to due diligence by the PDU	\$ Commercial Informat
Total		\$ Commercial Information

Overseas Investment Office

➤ Is the application being made by a non-New Zealand based legal entity? (Foreign investment laws may apply and the Overseas Investment Office consulted)	No
---	-----------

Does the Application have a Te Ara Mahi (TAM) component?

No

Section B: Operational Assessment Criteria (Complete for Eols and Applications)

(Rate and comment – 1= poor, 5 = very good - Provide the number for this project, not subsequent phases)

Fund and government outcomes

Please highlight number below

Would the project:

➤ create permanent jobs?	Increasing productivity and enabling jobs and growth is an expected indirect benefit of this project.	N/A 1 2 3 4 5
➤ deliver community benefits?		
➤ increase utilisation of and returns on Maori assets?		
➤ enhance the sustainability of natural assets?	This project should provide data to enable materially improved management of natural assets.	N/A 1 2 3 4 5

➤ mitigate climate change effects, or assist with the lowering of emissions?	The materially improved management of natural assets will make the Wairarapa region more resilient to the impacts of climate change.	N/A 1 2 3 4 5
Additionality		
Would the project:		
➤ add value by building on what is already there, without duplicating effort?	Greater utilisation of water resources will create economic benefits across the region Commercial Information	N/A 1 2 3 4 5
➤ be a catalyst for productivity potential in the region?	This project will build on an existing natural resource, water, acting as a catalyst. Water is a scarce resource in an area that otherwise has the key components required for a successful, high value sustainable primary sector industry (e.g. climate, downstream infrastructure, etc.).	N/A 1 2 3 4 5
Connected to regional stakeholders and frameworks		
Does the project:		
➤ align with regional priorities, such as frameworks, or regional plans?	This project is aligned with the region's identified need for water supply resilience, and regional economic development including supporting the productive capacity of its primary sector, and generating increased long-term employment opportunities.	N/A 1 2 3 4 5
➤ have the support of local governance groups (councils, iwi and hapu)?	In the context of the Wairarapa regional water resource planning process (Whaitua), Mana whenua have been clear that their values will not have been protected in full if timeframe for improvements in the health of the rivers and lakes stretch out to 2080, and they wish to see an acceleration of the timeframes for improvement. Aerial mapping is a critical tool for achieving these aspirations.	N/A 1 2 3 4 5
Governance, risk and project execution		
Does the application show:		
➤ robust project management and governance systems?	Governance and project management is sufficiently outlined.	N/A 1 2 3 4 5
➤ plans for future ownership and operational management?	Key risks are sufficiently outlined and an appropriate approach to manage these.	N/A 1 2 3 4 5

➤ how the project will be delivered and managed?	N/A	N/A 1 2 3 4 5
--	-----	----------------------

Section C: Risk Management Evaluation

Does this application demonstrate consideration of the following risks?		Yes
Risk description	Mitigations	Risk Rating
New Technology and appropriate capability – GWRC does not possess specific skillsets and experience with inversion procedures and interpretation of TEM data.	Learnings from HBRC will be important. As per the HBRC approach, GNS Science will be engaged as part of delivery.	Low
Necessary approvals may be required from landowners, stakeholders and local authorities.	HBRC are currently working through this for their project. Learnings will be sought. GWRC will also assess further part of planning.	Low
Co-funding not available	Majority of co-funding from local authorities has been confirmed. The applicant asserts that \$250k has been approved in principle by local industry. This will be subject to PDU due diligence. If full co-funding is not available, the scope can be reduced proportionately (i.e. less of the ground water areas scanned).	Medium

Section D: Funding and financial analysis

Please highlight number below

Does the application show:		
➤ How strong is the financial position of the applicant organisation?	The Council's financial position is considered adequate.	N/A 1 2 3 4 5
➤ How does the scale of the project compare to their overall business?	The scale of this project is within the Council's overall capacity to manage effectively.	N/A 1 2 3 4 5

<p>➤ Why is Crown funding being sought rather than commercially-available funding?</p>	<p>N/A</p>	<p>N/A 1 2 3 4 5</p>
<p>➤ What does the independent financial analysis/ business case indicate?</p>	<p>N/A</p>	<p>N/A 1 2 3 4 5</p>
<p>➤ Is the funding model requested appropriate? Is the PDU recommending a different model?</p>	<p>Funding model requested is appropriate.</p>	<p>N/A 1 2 3 4 5</p>
<p>➤ Has the applicant provided evidence of market pull for this project?</p>	<p>N/A</p>	<p>N/A 1 2 3 4 5</p>
<p>➤ Has the applicant provided evidence that their supply chain is secure?</p>	<p>N/A</p>	<p>N/A 1 2 3 4 5</p>
<p>Summary of funding and financial analysis:</p>		<p>N/A 1 2 3 4 5</p>

Funding arrangements

The funding will be provided by a grant and distributed on completion of agreed deliverables.

Proposed Term Sheet Summary (noting full term sheet will be developed post decision)

Is the application a Grant or Loan?

Grant - Loan Details Table deleted

Consultation from partner agencies undertaken or implications

DoC is supportive of this initiative as it is from our perspective, the least intrusive method of conducting a survey of underground water resources with the added benefits of time and cost saving by sharing the technology with the HBRC. Additionally, other data that would be gleaned from this technology would be extremely valuable for other agencies in making decisions on future land use. DoC would also be supportive of this data be made available to the public sector for future use.

Conflicts of interest and T&Cs

N/A

Due diligence has not been carried out on the applicant as it is a local authority (as per PDU policy).

Summary statement of Application Review undertaken

The following Review has taken place in connection with this application:


All applications are discussed between the Regions Team and Investment Team during the assessment process and prior to submission to SROs / IAP.

Consultation with the relevant partner agencies has occurred allowing them to provide any relevant technical advice with any feedback included verbatim within this application form.

In the development of this form:

- i. A review by an Investment Director has taken place and included the following to the satisfaction of the reviewer:
 - a. An evaluation against the PGF criteria;
 - b. Financial analysis;
 - c. A risk assessment, highlighting any relevant or key risks;
 - d. Conflicts of interest have been noted and accepted and the reviewer concurs with the recommendation proposed.
- ii. The Head of Investment has reviewed this recommendation.
- iii. This application has been reviewed by the PDU SLT.

Review has been completed	Yes
---------------------------	-----

Supporting proposal:	Yes
Appendices:	Yes – Applications and supporting letters are as annexes Letters withheld - Commercial Information
Author of paper:	 , PDU Investment Team