

CULTURAL ADVICE REPORT

J7005 – 1352 Homebush Road, Darfield (RC245775)

To: Selwyn District Council

Contact: Carlo Botha

1.0 Mana Whenua Statement

Ngāi Tahu holds and exercises rangatiratanga within the Ngāi Tahu Takiwā and has done so since before the arrival of the Crown. The rangatiratanga of Ngāi Tahu resides within the Papatipu Rūnanga. The Crown and Parliament have recognised the enduring nature of that rangatiratanga through:

- Article II of Te Tiriti o Waitangi (Te Tiriti);
- the 1997 Deed of Settlement (Deed of Settlement) between Ngāi Tahu and the Crown; and
- the 1998 Ngāi Tahu Claims Settlement Act (NTCSA) in which Parliament endorsed and implemented the Deed of Settlement.

The contemporary structure of Ngāi Tahu is set down through the Te Rūnanga o Ngāi Tahu Act 1996 (TRoNT Act). Article II of Te Tiriti o Waitangi (Te Tiriti), the TRoNT Act, Ngāi Tahu Claims Settlement Act (NTCSA) 1998, and the 1997 Deed of Settlement (Deed of Settlement) between Ngāi Tahu and the Crown sets the requirements for recognition of tangata whenua in Canterbury.

As recorded in the Crown Apology to Ngāi Tahu in the NTCSA, the Ngāi Tahu Settlement marked a turning point, and the beginning of a “new age of co-operation”. The Crown apologised for its “past failures to acknowledge Ngāi Tahu rangatiratanga and mana over the South Island lands within its boundaries” and confirmed that it “recognises Ngāi Tahu as the tāngata whenua of, and as holding rangatiratanga within, the Takiwā of Ngāi Tahu Whānui

Each Papatipu Rūnanga has their own respective takiwā, and each is responsible for protecting the tribal interests in their respective takiwā, not only on their own behalf of their own hapū, but again, on behalf of the entire tribe.

The following Rūnanga hold mana whenua over the project’s location, as it is within their takiwā:

- Te Ngāi Tūāhuriri Rūnanga
- Te Taumutu Rūnanga

2.0 Summary of Proposal

Darfield Solar and Energy Storage Limited has applied for resource consent from Selwyn District Council (RC245775) to construct, operate, and maintain a solar farm and battery energy storage facility.

The activity status is discretionary.

3.0 Consultation Methodology

Mahaanui Kurataiao Limited review the application documents and undertake an assessment of the application against the Mahaanui Iwi Management Plan.

A briefing report is prepared for Kaitiaki representatives who have been mandated by the Papatipu Rūnanga they represent to speak on behalf of hapū on environmental issues.

A Mahaanui Kurataiao Limited staff member meets with Kaitiaki representatives to discuss the application and Kaitiaki provide feedback based on Mātauranga Māori.

The Cultural Advice Report is provided to outline the relevant policies in the Mahaanui Iwi Management Plan and the feedback provided by Kaitiaki representatives.

The relevant policies and Kaitiaki feedback for this application are provided in the following sections of this report.

4.0 Mahaanui Iwi Management Plan 2013

The Mahaanui Iwi Management Plan (IMP) is a written expression of kaitiakitanga, setting out how to achieve the protection of natural and physical resources according to Ngāi Tahu values, knowledge, and practices. The plan has the mandate of the six Papatipu Rūnanga, and is endorsed by Te Rūnanga o Ngāi Tahu, as the iwi authority.

Natural resources – water (waterways, waipuna (springs), groundwater, wetlands); mahinga kai; indigenous flora and fauna; cultural landscapes and land - are taonga to mana whenua and they have concerns for activities potentially adversely affecting these taonga. These taonga are integral to the cultural identity of ngā rūnanga mana whenua and they have a kaitiaki responsibility to protect them. The policies for protection of taonga that are of high cultural significance to ngā rūnanga mana whenua are articulated in the IMP.

The policies in this plan reflect what Papatipu Rūnanga support, require, encourage, or actions to be taken with regard to resolving issues of significance in a manner consistent with the protection and enhancement of Ngāi Tahu values, and achieving the objectives set out in the plan.

The relevant Policies of the IMP to this proposal have been identified as:

5.3 WAI MĀORI

WM1.1 Ngāi Tahu, as tāngata whenua, have specific rights and interests in how freshwater resources should be managed and utilised in the takiwā.

CHANGING THE WAY WATER IS VALUED

WM2.1 To consistently and effectively advocate for a change in perception and treatment of freshwater resources: from public utility and unlimited resource to wāhi taonga.

WM2.3 To require that decision making is based on intergenerational interests and outcomes, mō tātou, ā, mō kā uri ā muri ake nei

Controls on land use activities to protect water quality.

WM6.17 To require the development of stringent and enforceable controls on the following activities given the risk to water quality.

- (a) Intensive rural land use (see Issue WM.7);
- (b) Subdivision and development adjacent to waterways;
- (c) Discharge to land activities associated with industry; 82
- (d) Activities in the bed and margins of waterways, including gravel extraction; and
- (e) Upper catchment activities such as forestry and vegetation clearance.

WATER QUALITY

WM6.2 To require that water quality in the takiwā is of a standard that protects and provides for the relationship of Ngāi Tahu to freshwater. This means that:

- (a) The protection of the eco-cultural system (see Box - Eco-cultural systems) is the priority, and land or resource use, or land use change, cannot impact on that system; and
- (b) Marae and communities have access to safe, reliable, and untreated drinking water; and
- (c) Ngāi Tahu and the wider community can engage with waterways for cultural and social well-being; and
- (d) Ngāi Tahu and the wider community can participate in mahinga kai/food gathering activities without risks to human health.

WM6.5 To require that water quality standards in the takiwā are set based on “where we want to be” rather than “this is the point that we can pollute to”. This means restoring waterways and working toward a higher standard of water quality, rather than establishing lower standards that reflect existing degraded conditions.

Discharges

WM6.8 To continue to oppose the discharge of contaminants to water, and to land where contaminants may enter water.

ACTIVITIES IN THE BEDS AND MARGINS OF RIVERS AND LAKES

Riparian areas

WM12.2 To require the protection and restoration of native riparian vegetation along waterways and lakes in the takiwā as a matter of priority, and to ensure that this can occur as a permitted activity.

Use and enhancement of river margins in the built/ urban environment.

WM12.5 To require that all waterways in the urban and built environment have buffers or set back areas from residential, commercial or other urban activity that are:

- (a) At least 10 metres, and up to 30 metres; and
- (b) Up to 50 metres where there is the space, such as towards river mouths and in greenfield areas.

WETLANDS, WAIPUNA AND RIPARIAN MARGINS

Riparian margins

WM13.7 To recognise the protection, establishment, and enhancement of riparian areas along waterways and lakes as a matter of regional importance, and a priority for Ngāi Tahu.

Comment: *Water is a significant cultural resource that connects Ngāi Tahu to the landscape and the culture and traditions of the tūpuna. Water is a taonga, and there is a collective responsibility to protect and enhance the mauri of this taonga. The RMA recognises the relationship of Māori to freshwater as a matter of national importance.*

5.4 PAPATŪĀNUKU

SUBDIVISION AND DEVELOPMENT

Basic principles and design guidelines

P4.3 To base tāngata whenua assessments and advice for subdivision and residential land development proposals on a series of principles and guidelines associated with key issues of importance concerning such activities, as per Ngāi Tahu subdivision and development guidelines (Appendix 2).

EARTHWORKS

P11.1 To assess proposals for earthworks with particular regard to:

- (a) Potential effects on wāhi tapu and wāhi taonga, known and unknown;
- (b) Potential effects on waterways, wetlands and waipuna;
- (c) Potential effects on indigenous biodiversity;
- (d) Potential effects on natural landforms and features, including ridge lines;
- (e) Proposed erosion and sediment control measures; and
- (f) Rehabilitation and remediation plans following earthworks.

Indigenous vegetation

P11.7 To require that indigenous vegetation that is removed or damaged as a result of earthworks activity is replaced.

P11.8 To require the planting of indigenous vegetation as an appropriate mitigation measure for adverse impacts that may be associated earthworks activity.

Erosion and sediment control

P11.9 To require stringent and enforceable controls on land use and earthworks activities as part of the resource consent process, to protect waterways and waterbodies from sedimentation, including but not limited to:

- (a) The use of buffer zones;
- (b) Minimising the extent of land cleared and left bare at any given time; and
- (c) Capture of run-off, and sediment control.

ENERGY

P17.4 To require that local authorities develop and implement effective policies requiring the use of renewable energy and energy saving measures in residential, commercial, industrial and other developments.

P17.5 To support in principle the use of wind and solar energy generation in the region (see Section 5.7, Issue TAW1).

Comment: *Papatūānuku is profoundly important in the Ngāi Tahu worldview, as the birthplace of all things of the world, and the place to which they return. Land use and development activities in the takiwā must be managed in way that works with the land and not against it.*

5.5 TĀNE MAHUTA

INDIGENOUS BIODIVERSITY

Ecosystem services

TM2.10 To require that indigenous biodiversity is recognised and provided for as the natural capital of Papatūānuku, providing essential and invaluable ecosystem services.

Comment: *Ngāi Tahu has a particular interest in indigenous biodiversity, both for its inherent value on the landscape and the ecosystem services it provides. The relationship between tāngata whenua and indigenous biodiversity has evolved over centuries of close interaction and is an important part of Ngāi Tahu culture and identity.*

5.8 NGĀ TŪTOHU WHENUA

WĀHI TAPU ME WĀHI TAONGA

CL3.1 All taonga within the takiwā of Ngāi Tahu, accidental discovery or otherwise, belong to the Papatipu Rūnanga/ Te Rūnanga o Ngāi Tahu.

CL3.8 To require, where a proposal is assessed by tāngata whenua as having the potential to affect wāhi tapu or wāhi taonga, one or more of the following:

- (a) Low risk to sites:
 - (i) Accidental discovery protocol (ADP)
- (b) High risk to sites:
 - (i) Cultural Impact Assessment (CIA);
 - (ii) Site visit;
 - (iii) Archaeological assessment, by a person nominated by the Papatipu Rūnanga;
 - (iv) Cultural monitoring to oversee excavation activity, record sites or information that may be revealed, and direct tikanga for handling cultural materials;
 - (v) Inductions for contractors undertaking earthworks;
 - (vi) Accidental discovery protocol agreements (ADP); and/or

(vii) Archaeological Authority from the New Zealand Historic Places Trust.

Comment: *For Ngāi Tahu cultural heritage isn't something that happened in the past; but rather a reflection of an ongoing and enduring relationship with the land. The relationship of Māori with wāhi tapu and wāhi taonga is a matter of national importance in the RMA.*

4.1 Guidance to Moderate Impacts on Cultural Values

The above policies from the Mahaanui Iwi Management Plan provide a framework for assessing the potential negative impacts of the proposed activity on cultural values and provide guidance on how these effects can be moderated.

Te Ngāi Tūāhuriri Rūnanga and Te Taumutu Rūnanga have a unique and abiding interest in the sustainable management of te taiao – the environment. Wai māori (freshwater) is a taonga of Ngāi Tahu, governed under the domain of rangatiratanga and defined by Ngāi Tahu tikanga and ritenga.

The consent duration must not exceed the duration stipulated below in Consent Condition 1. Consent durations are assessed by kaitiaki on a case-by-case basis. Usually, shorter durations are requested by kaitiaki as long consent durations remove the ability for future generations of mana whenua to fulfil their kaitiakitanga obligations, where there is a duty to pass the environment to future generations in a state that is as good as, or better than, the current state.

A cultural landscape is (but not limited to) a geographical area with traditional, spiritual, and ecological value to Ngāi Tahu. These include wāhi tapu, wāhi taonga, mahinga kai, and other sites that Ngāi Tahu consider significant. Any activity that involves ground disturbance has the potential to uncover cultural material or wāhi tapu. To manage risks that are involved with earthworks, an Accidental Discovery Protocol (ADP), as shown in Appendix 1, must be in place for all earthworks required to give effect to this consent.

One of the key issues associated with earthworks is erosion and sediment control. During earthworks, there is an increased chance that larger areas of land will be left cleared with exposed soil. Mana whenua take interest in the measures that are in place, due to the risks that are involved with erosion and soil loss. Therefore, Consent Condition 3 has been provided.

Kaitiaki are concerned about the risk of potential contaminants leaching from the solar panels into land. Contaminated land can have adverse effects on the environment, including the potential for contaminants to leach into groundwater and nearby water races. This can also have effects on Ngāi Tahu cultural associations, such as mahinga kai, wāhi tapu, or historical associations. To reduce the risks associated with contaminated materials, Consent Conditions 4, 5 and 10 have been provided.

Indigenous biodiversity is a fundamental part of the culture, identity, and heritage of Ngāi Tahu. Restoring indigenous biodiversity values is one of the most important challenges for future management in the takiwā. Indigenous planting must be established and maintained on site to enhance the cultural landscape, increase indigenous habitat, filter sediment and sequester carbon. Consent Condition 7 has also been provided.

Stormwater run-off from urban environments can have significant effects on water quality. Tāngata whenua have always supported discharge to land as an alternative to discharge to water, given the natural ability of Papatūānuku to cleanse and filter contaminants from waste. However, support for discharge to land is provisional on appropriate management of the activity. Therefore, protection and mitigation measures have been provided in Consent Conditions 8 and Advice Notes 1 and 2.

Wetlands, waipuna and riparian areas are all considered to be wāhi taonga by Ngāi Tahu, treasured for their role in protecting and enhancing mauri, as providing habitat for mahinga kai. It is critical that existing wetlands, waipuna and riparian areas are protected, maintained or enhanced, degraded areas are restored, and opportunities taken to re-establish wāhi taonga across the landscape. Having information on where wetlands or springs are on sites, allows for the correct measures to be taken to protect and naturalise such areas. Therefore, Consent Condition 9 has been provided.

5.0 Rūnanga – Affected Party or Not

In terms of this response, Mahaanui Kurataiao has taken a targeted approach and only addresses matters of fundamental concern to Te Ngāi Tūāhuriri Rūnanga and Te Taumutu Rūnanga. The fact that Mahaanui Kurataiao has not commented on any particular matter should not be taken as support thereof and Te Ngāi Tūāhuriri Rūnanga and Te Taumutu Rūnanga reserves the right to comment on additional matters at a hearing or in the future.

The Kaitiaki representatives of Te Ngāi Tūāhuriri Rūnanga and Te Taumutu Rūnanga have reviewed this application and provided the consent conditions and advice notes outlined in Section 6.0 to align this proposal more closely with the provisions in the Mahaanui IMP.

If the consent conditions are provided for, the Rūnanga will not consider themselves to be an adversely affected party.

6.0 Consent Conditions and Advice Notes

If a resource consent is granted, the following conditions must be included to moderate effects of this proposed activity on mana whenua values:

1. The duration of this consent must not exceed 15 years.
2. An Accidental Discovery Protocol (ADP) must be in place during all earthworks required to give effect to this consent to deal with archaeological finds and protect the interests of mana whenua. This condition does not constitute a response under the Heritage New Zealand Pouhere Taonga Act (HNZPT 2014).
3. A site-specific Erosion and Sediment Control Plan (ESCP) for any earthworks required to give effect to this consent must be developed and implemented on-site during all earthwork activity. All contractors working on-site must be made aware of this plan and strictly adhere to it. This plan must:

- I. Ensure the protection of the surrounding environment including water soil and air.
 - II. Restrict sediment runoff and erosion from entering the drain.
4. An accidental discovery protocol for contaminated soils must be developed and implemented in case unexpected contamination is identified in the soil.
 5. Excavated contaminated material must be removed from site, disposed of at an appropriate facility, and not reused onsite.
 6. The applicant must establish and maintain indigenous planting on site to enhance the cultural landscape, increase indigenous habitat, filter sediment and sequester carbon.
 7. Indigenous planting must be established within a riparian buffer zone from the drains to protect and enhance the ecological values of the waterways. The plants must mature to a height of at least the width of the waterway.
 8. Untreated stormwater must not be discharged into the drains.
 9. A site survey for wetlands and springs must be undertaken on site by a suitably qualified wetland specialist prior to any works commencing on site.
 - (a) Any waipuna/springs or artesian flows discovered must be protected, naturalised and not be capped.
 - (b) Wetland areas on site must be retained and planted with an indigenous riparian margin.
 10. There must be a regular monitoring program for contaminants and the accumulation of heavy metals in soil.

The following advice notes must be included in the final decision:

1. The overall development of the proposed buildings should align with the *Ngāi Tahu Subdivision and Development Guidelines* to the greatest practical extent; particularly with regards to stormwater controls and indigenous plantings.
2. The design of stormwater infrastructure should have sufficient capacity to prevent ponding at the site.

On behalf of Mahaanui Kurataiao Ltd, this report has been prepared by Tama Hamilton-Morrison | Mahaanui Kurataiao Ltd Environmental Advisor, and peer reviewed by Angela Burton | Mahaanui Kurataiao Ltd Environmental Advisor.

Date: 18/11/2024

Appendix 1: Accidental Discovery Protocol (ADP)

PRIOR TO COMMENCEMENT OF ANY WORKS, A COPY OF THIS ADP SHOULD BE MADE AVAILABLE TO ALL CONTRACTORS WORKING ON SITE.

Purpose

This Accidental Discovery Protocol (ADP) sets out the procedures that must be followed in the event that taonga (Māori artefacts), burial sites/kōiwi (human remains), or Māori archaeological sites are accidentally discovered. The Protocol is provided by Te Ngāi Tūāhuriri Rūnanga and Te Taumutu Rūnanga. Te Ngāi Tūāhuriri Rūnanga and Te Taumutu Rūnanga are the representative body of the tangata whenua who hold mana whenua in the proposed area.

Background

Land use activities involving earthworks have the potential to disturb material of cultural significance to tangata whenua. In all cases such material will be a taonga, and in some cases such material will also be tapu. Accidental discoveries may be indicators of additional sites in the area. They require appropriate care and protection, including being retrieved and handled with the correct Māori tikanga (protocol).

Under the *Heritage New Zealand Pouhere Taonga Act 2014*, an archaeological site is defined as any place associated with pre-1900 human activity, where there is material evidence relating to the history of New Zealand. It is unlawful for any person to destroy, damage or modify the whole or any part of an archaeological site (known or unknown) without the prior authority of the Heritage New Zealand Pouhere Taonga (HNZPT). This is the case regardless of the legal status of the land on which the site is located, whether the activity is permitted under the District or Regional Plan or whether a resource or building consent has been granted. The HNZPT is the statutory authority for archaeology in New Zealand.

Note that this ADP does not fulfil legal obligations under the Heritage New Zealand Pouhere Taonga Act 2014 regarding non-Māori archaeology. Please contact the HNZPT for further advice.

Immediately following the discovery of material suspected to be a taonga, kōiwi or Māori archaeological site, the following steps shall be taken:

1. **All work on the site will cease immediately.**
2. Immediate steps will be taken to secure the site to ensure the archaeological material is not further disturbed.
3. The contractor/works supervisor/owner will notify the Kaitiaki Rūnanga and the Area Archaeologist of the HNZPT. In the case of kōiwi (human remains), the New Zealand Police must be notified.

4. The Kaitiaki Rūnanga and HNZPT will jointly appoint/advise a qualified archaeologist who will confirm the nature of the accidentally discovered material.
5. If the material is confirmed as being archaeological, the contractor/works supervisor/owner will ensure that an archaeological assessment is carried out by a qualified archaeologist, and if appropriate, an archaeological authority is obtained from HNZPT before work resumes (as per the *Heritage New Zealand Pouhere Taonga Act 2014*).
6. The contractor/works supervisor/owner will also consult the Kaitiaki Rūnanga on any matters of tikanga (protocol) that are required in relation to the discovery and prior to the commencement of any investigation.
7. If kōiwi (human remains) are uncovered, in addition to the steps above, the area must be treated with utmost discretion and respect, and the kōiwi dealt with according to both law and tikanga, as guided by the Kaitiaki Rūnanga.
8. Works in the site area shall not recommence until authorised by the Kaitiaki Rūnanga, the HNZPT (and the NZ Police in the case of kōiwi) and any other authority with statutory responsibility, to ensure that all statutory and cultural requirements have been met.
9. All parties will work towards work recommencing in the shortest possible time frame while ensuring that any archaeological sites discovered are protected until as much information as practicable is gained and a decision regarding their appropriate management is made, including obtaining an archaeological authority under the *Heritage New Zealand Pouhere Taonga Act 2014* if necessary. Appropriate management may include recording or removal of archaeological material.
10. Although bound to uphold the requirements of the Protected Objects Act 1975, the contractor/works supervisor/owner recognises the relationship between Ngāi Tahu whānui, including its Kaitiaki Rūnanga, and any taonga (Māori artefacts) that may be discovered.

IN DOUBT, STOP AND ASK; TAKE A PHOTO AND SEND IT TO THE HNZPT ARCHAEOLOGIST

Contact Details

HNZPT Archaeologist: (03) 357 9615 archaeologistcw@heritage.org.nz

HNZPT Southern Regional Office (03) 357 9629 infosouthern@heritage.org.nz

HNZPT Māori Heritage Advisor (03) 357 9620 pouarahisouth@heritage.org.nz

Kaitiaki Rūnanga:

Te Ngāi Tūāhuriri Rūnanga: (03) 313 5543, TuaHiwi.Marae@ngaitahu.iwi.nz

Te Taumutu Rūnanga: 03 371 2660, taumutu@ngaitahu.iwi.nz

Appendix 2: Ngāi Tahu Subdivision and Development Guidelines

Note: These guidelines are to be read in conjunction with Policies P4.1, P4.2 and P4.3 within the Mahaanui IMP.

Cultural landscapes

- 1.1** A cultural landscape approach is the most appropriate means to identify, assess and manage the potential effects of subdivision and development on cultural values and significant sites [refer Section 5.8 Issue CL1].
- 1.2** Subdivision and development that may impact on sites of significance is subject Ngāi Tahu policy on Wāhi tapu me wāhi taonga and Silent Files (Section 5.8, Issues CL3 and CL4).
- 1.3** Subdivision and development can provide opportunities to recognise Ngāi Tahu culture, history and identity associated with specific places, and affirm connections between tāngata whenua and place, including but not limited to:
 - (i) Protecting and enhancing sites of cultural value, including waterways;
 - (ii) Using traditional Ngāi Tahu names for street and neighbourhood names, or name for developments;
 - (iii) Use of indigenous species as street trees, in open space and reserves;
 - (iv) Landscaping design that reflects cultural perspectives, ideas, and materials;
 - (v) Inclusion of interpretation materials, communicating the history and significance of places, resources, and names to tāngata whenua; and
 - (vi) Use of tāngata whenua inspired and designed artwork and structures.

Stormwater

- 2.1** All new developments must have on-site solutions to stormwater management (i.e. zero stormwater discharge off site), based on a multi-tiered approach to stormwater management that utilises the natural ability of Papatūānuku to filter and cleanse stormwater and avoids the discharge of contaminated stormwater to water [refer to Section 5.4, Policy P6.1].
- 2.2** Stormwater swales, wetlands and retention basins are appropriate land-based stormwater management options. These must be planted with native species (not left as grass) that are appropriate to the specific use, recognising the ability of particular species to absorb water and filter waste.

- 2.3** Stormwater management systems can be designed to provide for multiple uses. For example, stormwater management infrastructure as part of an open space network can provide amenity values, recreation, habitat for species that were once present on the site, and customary use.
- 2.4** Appropriate and effective measures must be identified and implemented to manage stormwater run-off during the construction phase, given the high sediment loads that stormwater may carry as a result of vegetation clearance and bare land.
- 2.5** Councils should require the upgrade and integration of existing stormwater discharges as part of stormwater management on land rezoned for development.
- 2.6** Developers should strive to enhance existing water quality standards in the catchment downstream of developments, through improved stormwater management.

Earthworks

- 3.1** Earthworks associated with subdivision and development are subject to the general policy on Earthworks (Section 5.4 Issue P11) and Wāhi tapu me wāhi taonga (Section 5.8, Issue CL3), including the specific methods used in high and low risk scenarios for accidental finds and damage to sites of significance.
- 3.2** The area of land cleared and left bare at any time during development should be kept to a minimum to reduce erosion, minimise stormwater run-off and protect waterways from sedimentation.
- 3.3** Earthworks should not modify or damage beds and margins of waterways, except where such activity is for the purpose of naturalisation or enhancement.
- 3.4** Excess soil from sites should be used as much as possible on site, as opposed to moving it off site. Excess soil can be used to create relief in reserves or buffer zones.

Water supply and use

- 4.1** New developments should incorporate measures to minimise pressure on existing water resources, community water supplies and infrastructure, including incentives or requirements for:
- (i) low water use appliances and low flush toilets;
 - (ii) grey water recycling; and
 - (iii) rainwater collection.
- 4.2** Where residential land development is proposed for an area with existing community water supply or infrastructure, the existing supply or infrastructure must be proven to be able to accommodate the increased population prior to the granting of subdivision consent.

4.3 Developments must recognise, and work to, existing limits on water supply. For example, where water supply is an issue, all new dwellings should be required to install rainwater collection systems.

Waste treatment and disposal

5.1 Developments should implement measures to reduce the volume of waste created within the development, including but not limited incentives or requirements for:

- (i) Low water use appliances and low flush toilets;
- (i) Grey water recycling; and
- (ii) Recycling and composting opportunities (e.g. supporting zero waste principles).

5.2 Where a development is proposed for an area with existing wastewater infrastructure, the infrastructure must be proven to be able to accommodate the increased population prior to the granting of the subdivision consent.

5.3 New rural residential or lifestyle block developments should connect to a reticulated sewage network if available.

5.4 Where new wastewater infrastructure is required for a development:

- (i) The preference is for community reticulated systems with local treatment and land-based discharge rather than individual septic tanks; and
- (ii) Where individual septic tanks are used, the preference is a wastewater treatment system rather than septic tanks.

Design guidelines

6.1 New developments should incorporate low impact urban design and sustainability options to reduce the development footprint on existing infrastructure and the environment, including sustainable housing design and low impact and self-sufficient solutions for water, waste, energy such as:

- (i) Position of houses to maximise passive solar gain;
- (ii) Rainwater collection and greywater recycling;
- (iii) Low energy and water use appliances;
- (iv) Insulation and double glazing; and
- (v) Use of solar energy generation for hot water.

- 6.2** Developers should provide incentives for homeowners to adopt sustainability and self-sufficient solutions as per 6.1 above.
- 6.3** Urban and landscape design should encourage and support a sense of community within developments, including the position of houses, appropriately designed fencing, sufficient open spaces, and provisions for community gardens.
- 6.4** Show homes within residential land developments can be used to showcase solar hot water, greywater recycling and other sustainability options, and raise the profile of low impact urban design options.

Landscaping and open space

- 7.1** Sufficient open space is essential to community and cultural wellbeing, and the realization of indigenous biodiversity objectives, and effective stormwater management.
- 7.2** Indigenous biodiversity objectives should be incorporated into development plans, consistent with the restoration and enhancement of indigenous biodiversity on the landscape.
- 7.3** Indigenous biodiversity objectives to include provisions to use indigenous species for:
- (i) street trees;
 - (ii) open space and reserves;
 - (iii) native ground cover species for swales;
 - (iv) stormwater management network; and
 - (v) home gardens.
- 7.4** Indigenous species used in planting and landscaping should be appropriate to the local environment, and where possible from locally sourced seed supplies.
- 7.5** Options and opportunities to incorporate cultural and/or mahinga kai themed gardens in open and reserve space can be considered in development planning (e.g. pā harakeke as a source of weaving materials; reserves planted with tree species such as mātai, kahikatea and tōtara could be established with the long-term view of having mature trees available for customary use).
- 7.6** Developers should offer incentives for homeowners to use native species in gardens, including the provision of lists of recommended plants to avoid, discounts at local nursery, and landscaping ideas using native species.