RESOURCE CONSENT CRC241002

Pursuant to Section 104 of the Resource Management Act 1991

The Canterbury Regional Council (known as Environment Canterbury)

GRANTS TO:	Burnham 2020 Limited
A LAND USE CONSENT (S9):	To use land for earthworks and backfilling (quarrying activities)
COMMENCEMENT DATE:	12 February 2025
DATE CONSENT NUMBER ISSUED:	12 February 2025
EXPIRY DATE:	Unlimited
LOCATION:	Corner of Grange Road and Aylesbury Road, BURNHAM

Definitions

CLG	Community Liaison Group
Construction Phase Activities	Construction Phase Activities means: - Construct the vehicle crossing and internal access road; - Widen Aylesbury Road; - Construct Site facilities – site office, staff amenities, parking and weighbridge area; - Establish the wheel wash; - Install services; - Establish initial stockpile and extraction area; - Establish and plant the long-term bund from the Site access for 1 kilometre south along Aylesbury Road; - Plant gaps in the existing shelterbelt; - Permeation of stormwater that falls on unsealed surfaces.
CRC Manager	Means the RMA Monitoring and Compliance Manager or any replacement role that performs their monitoring and compliance functions.
DMP	Means Dust Management Plan
Extraction and Processing Phase Activities	Extraction and Processing Phase Activities means: - Removal of overburden; - Construct short-term bunds along boundaries; - Establish the plant processing and stockyard areas; - Extract and process aggregate;

	- Stockpile overburden, topsoil and aggregate in the stockyard; - Manage dust; - Generate traffic; - Undertake monitoring; - Store hazardous substances; - Plant short-term bunds and setbacks from and around the Grange Road access and the southeast corner of the Site; - Permeation of stormwater that falls on unsealed surfaces.
Hazardous Substances	Means plant and machinery fuel (diesel, unleaded petrol, bio-ethanol mix, hydrogen, ad-blue etc.), lubrication (oils and greases), and small quantities of laboratory chemicals for use in aggregates compliance testing.
Highest groundwater level	Means the single highest elevation to which groundwater has historically risen that can be reasonably inferred for the site, based on all relevant hydrogeological and topographic information.
LMP	Means Landscape Management Plan.
NMP	Means Noise Management Plan.
Overburden	Means the topsoil and subsoil layers that lie above the aggregate.
QMP	Means Quarry Management Plan.
Quarry activities	Means all construction phase, extraction and processing phase and rehabilitation phase activities as set out in Condition 1.
RCS	Means Respirable Crystalline Silica
Rehabilitation Phase Activities	Rehabilitation Phase Activities means: - Deposit silts from silt ponds on the quarry floor; - Reinstate soils/backfilling; - Deconstruct short-term bunds; - Batter quarry slopes; - Plant regraded quarry slopes; - Permeation of stormwater that falls on unsealed surfaces.
RMP	Means Rehabilitation Management Plan.
SDC Manager	Means the Team Leader – Compliance Environmental Services or any replacement role that performs their monitoring and compliance functions..
Site	Means Rural Section 19387, Rural Section 25412, Rural Section 27776, Rural Section 27777 and Rural Section 27724.
Site facilities	Means the site office, staff amenities, car parking and weighbridge area.
SMP	Means Soil Management Plan.
SPMP	Means Spill Management Plan
SQEP	Means a Suitably Qualified and Experienced Practitioner.
SWMP	Means Stormwater Management Plan
TMRP	Means Transportation Management and Routing Plan.

SUBJECT TO THE FOLLOWING CONDITIONS:

Authorised Activities

1 This Consent authorises the following activities undertaken at Grange Road and Aylesbury Road, Burnham, legally described as Rural Section 19387, Rural Section 25412, Rural Section 27776, Rural Section 27777 and Rural Section 27724, as shown on the Boffa Miskell and Pro-Manage Plan Set dated 20 January 2025, attached to and forming part of this resource consent:

	CONSTRUCTION PHASE ACTIVITIES
(a)	Construct the vehicle crossing and internal access road.
(b)	Widen Aylesbury Road.
(c)	Construct Site facilities – site office, staff amenities, parking and weighbridge area.
(d)	Establish the wheel wash.
(e)	Install services.
(f)	Establish initial stockpile and extraction area.
(g)	Establish and plant the long-term bund from the Site access for 1 kilometre south along Aylesbury Road.
(h)	Plant gaps in the existing shelterbelt.
(i)	Permeation of stormwater that falls on unsealed surfaces.
	EXTRACTION AND PROCESSING PHASE ACTIVITIES
(j)	Removal of overburden.
(k)	Construct short-term bunds along boundaries.
(l)	Establish the plant processing and stockyard areas.
(m)	Extract and process aggregate.
(n)	Stockpile overburden, topsoil and aggregate in the stockyard.
(o)	Manage dust.
(p)	Generate traffic.
(q)	Undertake monitoring.
(r)	Store hazardous substances.
(s)	Plant short-term bunds and setbacks from and around the Grange Road access and the southeast corner of the Site.
(t)	Permeation of stormwater that falls on unsealed surfaces.
	REHABILITATION PHASE ACTIVITIES
(u)	Deposit silts from silt ponds on the quarry floor.
(v)	Reinstate soils/backfilling.

(w)	Deconstruct short-term bunds.
(x)	Batter quarry slopes.
(y)	Plant regraded quarry slopes.
(z)	Permeation of stormwater that falls on unsealed surfaces.

2 Except as required by consent conditions, the authorised activities must be undertaken generally in accordance with the information and plans submitted with the application submitted on 7 September 2023 and addendum to the application submitted on 11th October 2023 and subsequent amendments made during the hearing process. Where there is any conflict between these documents and the conditions, the conditions of consent prevail.

Supervision and Notification

3 Prior to the exercise of this resource consent, CRC241000 and CRC241001, the Consent Holder must appoint a representative(s), who will be the Council's principal contact person(s) in regard to matters relating to this consent and provide the name of that person(s) to the CRC Manager.

4 Should any representatives change during the term of this resource consent, CRC241000 and CRC241001, the Consent Holder must inform the SDC Manager and must also give written notice to the CRC Manager of the new person's name and how they can be contacted as soon as practicable.

5 This resource consent, CRC24100 and CRC241001; and the certified copies of Management Plans required by this consent, CRC241000 and CRC241001 must be kept on Site at all times, and the Consent Holder must ensure personnel are made aware of each document's contents, where the plan relates to *quarry activities* or *rehabilitation activities* for which those personnel are responsible. All certified Management Plans must also be publicly available on the Consent Holder's web site.

6 All *quarry activities* must be overseen by a quarrying SQEP.

7 At least one month prior to commencement of *quarry activities*, the Consent Holder must arrange and conduct a pre-construction site meeting(s) with the CRC Manager. At a minimum, the following must be covered at the meeting:

(a) Scheduling and staging of the works, including the proposed start date;

(b) Responsibilities of all relevant parties;

(c) Contact details for all relevant parties;

(d) Expectations regarding communication between all relevant parties;

(e) Site inspections; and

(f) Confirmation that all relevant parties have copies of the contents of these consent documents and all associated management plans.

8 The Consent Holder must use best endeavours to establish a CLG in accordance with the following requirements:

(a) The objectives of the CLG are to:

i) Provide a means for all parties to give and receive regular updates on matters associated with the *quarry activities*;

ii) Provide a regular forum through which information about the quarry can be provided to neighbours and interested parties;

iii) Enable opportunities for concerns and issues to be reported to and responded to by the Consent Holder;

iv) Discuss the results of monitoring and any matters that may arise as a result of monitoring; and

v) Provide feedback on the development of the SMP, SPMP, SWMP, TMRP, RMP, NMP, LMP, QMP and DMP.

(b) The CLG must initially comprise up to two representatives of the Consent Holder and the Consent Holder must invite one representative of the Selwyn District Council, one representative of the Canterbury Regional Council, one representative from Burnham Camp, representatives from the surrounding community and representatives of the relevant Kaitiaki Rūnanga.

Advice Note: This condition only governs initial membership for the purposes of convening the first meeting of the CLG. On-going membership will be determined by the CLG.

(c) The Consent Holder must ensure that members of the CLG are provided with the opportunity and facilities to meet:

i) At least 30 working days prior to the start of any *construction phase activities*; and

ii) Not less frequently than quarterly during the first year of *quarry activities* and six monthly thereafter, unless all members of the CLG agree there is no need for a meeting.

(d) If the Consent Holder, in progressing any element of the quarry, wishes to call a meeting of the CLG to obtain community input, the meeting regime may be shifted to accommodate such a request;

(e) The time, date and venue of proposed meetings must be notified to members of the CLG;

(f) Minutes of the CLG meetings must be kept by the Consent Holder and be made publicly available; and

(g) A draft version of each of the Management Plans required under condition 15 (9 of them) shall be provided to the CLG, and a period of at least 20 working days shall be allowed for consultation with the CLG Group and for feedback to be provided by the CLG on the contents of each plan. The final version of each plan shall set out how any issues raised by the CLG have been incorporated, and where they have not, outline the reasons why.

9 The Consent Holder must meet the reasonable administrative costs of the CLG meetings (e.g. meeting invitations; meeting venue; preparation of meeting minutes).

***Advice Note**: In the event that it is not possible to establish a CLG or convene meetings through lack of interest or participation from the local community, then such failure to do so will not be a breach of these conditions. Should the local community wish to re-establish meetings after a period of inactivity then the conditions above shall continue to apply.*

Reporting

10 The Consent Holder must maintain a Complaints Register. The Complaints Register must include details of when a complaint was received, the steps taken by the Consent Holder to investigate the complaint, and any steps taken to address the issue(s) raised. The complaints register must be provided to the CRC Manager annually, and otherwise must be available to either of them on request.

11 Records of all staff training relevant to compliance with conditions of this consent must be retained on Site and provided to the CRC Manager on request.

Management Plan Certification Process

12 The following Management Plans must be submitted to the CRC Manager for certification at least 40 working days prior to the commencement of any *construction phase activities:*

(a) Quarry Management Plan prepared in accordance with Condition 16;

(b) Soil Management Plan in accordance with Condition 20; and

(c) Spill Management Plan in accordance with Condition 21.

13 Works to which a Management Plan relates must not commence until the Consent Holder has received written certification from the relevant CRC Manager that the Management Plan adequately achieves the purpose of the relevant Condition(s).

Advice Note*: If the relevant CRC Manager's response is that that they are not able to certify the Management Plan they must provide the Consent Holder with reasons and recommendations for changes to the Management Plan in writing. The Consent Holder must consider any reasons and recommendations of the CRC Manager and resubmit an amended Management Plan for certification.*

14 Once certified a Management Plan may be varied by the Consent Holder. Any application for a variation must also be prepared by a SQEP and be consistent with the conditions of the resource consent and the original objectives or purpose stated for the Management Plan. The *quarry activities* subject to the variation must not commence until the variation has been certified by the relevant CRC Manager.

Quarry Activities to be undertaken in accordance with Management Plans

15 The Consent Holder shall undertake all *quarry activities* in accordance with the following management plans certified by the Canterbury Regional Council:

(a) Quarry Management Plan;

(b) Soil Management Plan;

(c) Spill Management Plan;

(d) Dust Management Plan; and

(e) Stormwater Management Plan.

and the following management plans certified by Selwyn District Council:

(f) Noise Management Plan;

(g) Landscape Management Plan;

(h) Transportation Management and Routing Plan; and

(i) Rehabilitation Management Plan.

Quarry Management Plan

16 The Consent Holder must engage a suitably qualified and experienced quarrying practitioner to prepare a QMP and provide it to the CRC Manager for certification. Once certified, it shall also be provided to SDC Manager for information purposes only. The purpose of the QMP is to detail operational parameters including hours of operation, staff training procedures and extraction methodologies.

As a minimum the QMP must include:

(a) A description of the content and purpose of the QMP;

(b) The name, experience and qualifications of the person(s) nominated by the Consent Holder to supervise the implementation of, and adherence to, the QMP;

(c) A plan showing the boundaries of the phases of extraction;

(d) Details of proposed setbacks from Aylesbury Road and Grange Road, shelterbelts to be retained, areas of planting and the location of long-term and short-term bunds;

(e) Details of the operation of the site, including details of the different phases of works, area, depth, backfilling activities and site rehabilitation;

(f) Details of the on-site staff training procedures;

(g) A description of the proposed methods of any site preparation works including overburden removal operations including stripping and placement of material;

(h) A description of all relevant site operations and procedures; and

(i) All consent conditions and any other mitigation measures to be employed to minimise environmental effects and/or adhere to best practice.

17 The QMP referred to in Condition 16, must be reviewed at least annually and updated if necessary and as quarry phases progress. Any amendments must be:

(a) For the purpose of applying best practicable measures to mitigate adverse effects resulting from the activities occurring on-site; or

(b) For the purpose of improving the efficacy of the QMP; or

(c) To ensure consistency with the conditions of this resource consent; or

(d) To address and mitigate any complaints.

18 The updated QMP must be submitted to Canterbury Regional Council, Attention: Regional Leader - Compliance Monitoring (ecinfo@ecan.govt.nz), for certification in accordance with Conditions 12 - 14 prior to any amendment being implemented.

***Advice Note**: For the avoidance of doubt if any management plan conflicts with this consent, the consent must take precedence.*

19 Prior to undertaking *extraction and processing phase activities,* the Consent Holder must:

(a) establish a surveyed datum point at natural ground level (as measured relative to the Lyttelton Vertical Datum 1937) in an area that will not be excavated. This point must thereafter be used to determine the depth of excavation at any point within the Site described in Condition 49.

(b) survey the Site to determine elevations of the natural ground level of the Site relative to Mean Sea Level (as measured relative to the Lyttelton Vertical Datum 1937). The survey must be undertaken by a registered surveyor to an accuracy of +/- 50 millimeters vertically and be provided to the CRC Manager.

Preparation of Soil Management Plan

20 The Consent Holder must engage a suitably qualified and experienced quarrying practitioner to prepare a SMP and provide it to the CRC Manager for certification. Once certified, it shall also be provided to SDC Manager for information purposes only. The purpose of the SMP is to:

(a) ensure that the removal, management and placement of soil avoids or minimises impacts on the soil properties prior to and following placement, and that the re-established soil retains or exceeds the soil versatility of the original soil on the site;

(b) ensure that soil management activities avoid potential adverse effects on the surrounding environment; and

(c) ensure the re-establishment of soil minimises the loss of contaminants (nutrients, pathogens and pesticides) through the soil in a manner that is at least equivalent to the pre-quarry soils.

As a minimum the SMP must:

(d) detail how overburden (topsoil and subsoil layers) will be removed, placed, transported and stored;

(e) detail how the land will be prepared for rehabilitation;

(f) detail how soil will be placed in areas being rehabilitated and managed to develop soil structure;

(g) detail how the land will be managed to minimise the loss of contaminants during the soil rehabilitation period in a manner that is at least equivalent to the loss of contaminants through the pre-quarry soils;

(h) detail the criteria for determining when soil rehabilitation is complete and the land can be used for various future uses, within the constraints of Condition 33;

(i) set out the nature of any staff training required in relation to soil removal and placement;

(j) set out the matters to be recorded to ensure the SMP is being complied with; and detail the monitoring required to ensure the re-establishment of the soil generally retains or exceeds the soil versatility of the original soil on the site; and

(k) Training all staff involved in the refueling or maintenance activities in the use of spill kits.

Preparation of Spill Management Plan

21 The Consent Holder must engage a suitably qualified and experienced quarrying practitioner to prepare a SPMP and provide it to the CRC Manager for certification. Once certified, it shall also be provided to SDC Manager for information purposes only. The purpose of the SPMP is minimize the risks of spills to groundwater and ensure the land does not become contaminated.

As a minimum the SPMP must include the following information:

(a) Staff training requirements to minimise the risk of spills and to ensure an appropriate and timely response to any spills that do occur;

(b) Emergency contact information for the Canterbury Regional Council Pollution Hotline;

(c) Emergency contact information for a waste management service provider with appropriate qualifications and equipment for cleaning up spills of oil and petroleum products;

(d) Instructions for using the spill kit kept on site in accordance with Condition 67(d);

(e) Instructions for removing and disposing of contaminated material excavated during the remediation works in a manner suitable to ensure no contamination of groundwater occurs;

(f) Include a Spill Response Plan;

(g) Instructions for removing and disposing of all material potentially contaminated or contaminated by a spill; and

(h) Measures to prevent leaks and avoid spills of fuel or any other hazardous substance.

Prior to commencing *quarry activities*

Bond

22 Prior to the first exercise of these consents, the Consent Holder must enter into an enforceable written agreement acceptable to the Canterbury Regional Council, that provides for a bond in favour of Canterbury Regional Council pursuant to sections 108(2)(b) and 108A of the Resource Management Act 1991. The purpose of the bond is to undertake groundwater monitoring and secure the rehabilitation of the site, as required by Conditions 59-65 and 68 of this resource consent in the event of any default by the Consent Holder.

23 The bond must be a cash bond or bank bond provided by a registered trading bank of New Zealand; acceptable to the Canterbury Regional Council.

24 The bond amount must be sufficient to cover all *quarry activities*.

25 The Consent Holder must engage a SQEP(s) to assess the maximum costs of the Rehabilitation Phase Activities referenced in RC235522 and to subsequently peer review that assessment.

26 The bond amount may be adjusted by the Canterbury Regional Council or the Consent Holder giving notice on the fifth anniversary of the commencement of these consents and every five years thereafter. The purpose of the adjustment is to reflect changes in the risk profile of the quarry or the Consumer Price Index. Within two months of such notice, the Consent Holder must provide a report to the Canterbury Regional Council which addresses whether the bond quantum should be revised. The Canterbury Regional Council must engage a SQEP to peer review the report and respond within two months of receipt of the report on the appropriateness of any proposed revised bond quantum.

27 Following any review, should the assessments agree that the current bond amount is insufficient or excessive, the Consent Holder shall adjust the bond quantum accordingly within 30 days of receiving the review findings. If the SQEPs, after reasonable endeavours, cannot agree a quantum, for the bond, the dispute must be resolved through an agreed disputes resolution process or referred to arbitration.

28 The costs of, and incidental to, the preparation of all bond documentation, including the Canterbury Regional Council's costs, must be met by the Consent Holder.

29 If these consents are transferred in part or whole to another party or person, the bond lodged by the transferor must be retained until a replacement bond is entered into by the transferee to ensure compliance with the groundwater monitoring and rehabilitation conditions of these consents.

30 For the avoidance of doubt, the enforceable written agreement may provide for the bond to be held after the expiry of these consents.

31 The bond, or any remaining portion thereof, will be released to the Consent Holder upon the satisfactory completion of the *quarry activities* and compliance with the groundwater monitoring and rehabilitation conditions of these consents.

Covenant

32 Prior to the commencement of the *quarry activities*, the Consent Holder must register an encumbrance or covenant against all land titles of the site in favour of the Canterbury Regional Council under section 108(2)(d) of the Resource Management Act 1991 to give effect to the limitations on subsequent land use activities set out in Condition 33.

33 On completion of the soil rehabilitation activities described in the SMP, the rehabilitated area within the area labelled as 'Site' on Plan CRC241002A (attached as Appendix A) must not be used for the following activities:

(a) Livestock farming which exceeds stock rates of more than 10 stock units per hectare of the area(s) which have been rehabilitated, whether housed inside or not (including cattle feedlots, pig farms, poultry farms or any other farming operation where animals are housed), or

(b) Intensive winter grazing or strip grazing at any time of the year where the stocking rate exceeds 10 stock units per hectare within the grazed area(s); or

(c) The disposal of collected animal effluent within 700 metres of any drinking-water bore in operation at the time this consent was granted (as shown in the plan attached as Appendix A); or

(d) Applications of pesticides at rates above the minimum required to achieve healthy plant growth that may threaten groundwater quality at downgradient drinking-water bores; or

(e) Any activity involving the use or storage of hazardous chemicals, including petroleum products, in quantities greater than normal on a rural- property; or

(f) Any onsite wastewater or stormwater disposal where there is a separation distance to the highest recorded groundwater level of less than 1 metre.

34 Prior to commencing *quarry activities*, the Consent Holder shall provide the following information to the CRC Manager:

(a) The highest measured on-site groundwater levels (as measured relative to the Lyttelton Vertical Datum 1937);

(b) The estimated surface of the highest recorded groundwater level (HRGL) (as measured relative to the Lyttelton Vertical Datum 1937);

(c) The quarry management surface, being a contour map of a surface at an elevation that is one metre above the estimated highest groundwater level relative to mean sea level (as measured relative to the Lyttelton Vertical Datum 1937).

General conditions

Hours of operation

35 The hours of operation and the activities that may be undertaken during those hours are limited to those set out in Table 1 below:

Table 1: Hours of quarry activities and other associated activities.

When			Allowable activities
At all times			Environmental mitigations (including dust control), light vehicle movements into and on Site, operation of Site office, Site security and maintenance.
Early-Morning	Monday to Saturday (excluding public holidays) up to a maximum of 30 times per annum.	5.00am to 7.00am.	Loadout and access / egress of trucks operated by the quarry operator (10 heavy vehicle movements per hour).
Morning	Monday - Sat (excluding public holidays).	6.00am to 7.00am.	Rehabilitation and movement of vehicles within Site associated with that activity. Site pre-startup including operational warmup of on-site plant.

Day-Time	Monday to Friday excluding Public Holidays.	7.00am to 8.00pm.	Full range of quarry activities.
	Saturday excluding Public Holidays	7.00am to 1.00pm.	

Security

36 The Site must be fully fenced and gated, and the gates must be locked when the quarry is not operating.

37 Signage that is able to be read from a distance of five metres, must be installed and maintained for the operation life of the quarry at the Site entrance advising access for unauthorised vehicles and persons is prohibited, and

(a) Name of the Site;

(b) Name of the owner of the Site, a contact telephone number and email address; and

(c) Health and safety information.

37A A sign shall be located at the Grange Road entrance to the site advising that the Grange Road entrance is not to be used to access the quarry.

Construction-Phase Activities

Site facilities and services

38 The Consent Holder must establish all Site facilities as per Figure 3 of the Landscape and Phasing Plans prepared by Boffa Miskell and Pro-Manage provided on 20 January 2025 (attached as Appendix B).

39 The Consent Holder must ensure that all services (potable water, electricity, wastewater) are installed or upgraded to accommodate site demand.

Site preparation works

40 The stripping of overburden and extraction of aggregate must only occur within that part of the Site where the stockyard, plant processing areas and the site amenities will be located.

Extraction and Processing Phase Activities

Open areas

41 Each of the following aspects of the *quarry activities* must be limited at any one time to the maximum area of open ground set out in Table 2 below. These areas exclude the sealed access road(s) and any Site buildings.

Table 2: Open area limits

Zone	Area (ha)
Fixed processing plant, other processing, stockpiling, unsealed customer loadout	11
Silt processing and storage	3.2
Excavation and active rehabilitation (excluding rehabilitated areas), including conveyance and unsealed accessways	12.8
Total active area	27

Accidental Discovery Protocol

42 Immediately following the discovery of material suspected to relate to an archaeological site as defined in the Heritage New Zealand Pouhere Taonga Act 2014:

(a) All work in the vicinity of the discovery must cease and the relevant manager must be advised of the discovery;

(b) Immediate steps must be taken to ensure the archaeological material is not further disturbed;

(c) The Consent Holder must notify a qualified archaeologist, in order to assess the nature of the potential archaeological finds and provide further advice on how to proceed;

(d) If the finds are confirmed to be the remains of pre-1900 archaeological sites, the Consent Holder must contact Heritage New Zealand Pouhere Taonga Area Archaeologist;

(e) ensure that an archaeological assessment is carried out by a qualified archaeologist. If appropriate, an archaeological authority must be obtained from Heritage New Zealand Pouhere Taonga before work resumes (as per the Heritage New Zealand Pouhere Taonga Act 2014);

(f) If Māori archaeological remains are encountered, Mahaanui Kurataiao Ltd, Taumutu Rūnanga, and Ngāi Tūāhuriri Rūnanga must also be contacted by the Consent Holder;

(g) on any matters of tikanga (protocol) that are required in relation to the discovery of Māori archaeological remains and prior to the commencement of any investigation. In the case of kōiwi (human remains) the New Zealand Police must also be notified;

(h) 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 Mahaanui Kurataiao Ltd, Taumutu Rūnanga and Ngāi Tūāhuriri Rūnanga;

(i) Works in the vicinity of the archaeological site must not recommence until confirmation by the SDC manager in consultation with Heritage New Zealand Pouhere Taonga – and Mahaanui Kurataiao Ltd, Taumutu Rūnanga, Ngāi Tūāhuriri Rūnanga as appropriate (and the NZ Police in the case of kōiwi) that all statutory and cultural requirements have been met; and

(j) The Consent Holder must notify SDC prior to the recommencement of work, and copies of all relevant authorisations must be provided to the SDC Manager.

Advice Note: *It is expected that 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. Although bound to uphold the requirements of the Protected Objects Act 1975, the Consent Holder recognises the relationship between Ngāi Tahu whānui, including its Runanga, and any taonga that may be discovered.

Groundwater Level Monitoring

43 Once *extraction and processing phase activities* commence, the Consent Holder must monitor and record the groundwater levels daily in the four bores specified below and shown on the Plan attached as Appendix C:

(a) Bore 1 (Bore ID BX23/1342) - Located at or about map reference: NZTM X and Y 1542400 – 5173876 (upgradient)

(b) Bore 2 (Bore ID BX23/1343) - Located at or about map reference: NZTM X and Y 1543488 – 5173014 (downgradient)

(c) Bore 3 (Bore ID BX23/1399) - Located at or about map reference: NZTM X and Y 1541138 – 5172130 (upgradient)

And the shallowest screened interval that allows reliable groundwater monitoring in either:

(d) Bore 4 (Bore ID M36/5785) - Located at or about map reference: NZTM X and Y 1543949 – 5171929 (downgradient)

Or

(e) Bore 5 (Bore ID BX23/1398) - Located at or about map reference: NZTM X and Y 1543901 - 5171891 (downgradient)

44 At least annually after commencing extraction and processing activities on the site, the Consent Holder shall provide the following information to the CRC Manager:

(a) The highest measured on-site groundwater levels.

(b) The surveyed base of the quarry pit.

(c) The current quarry management surface.

(d) The difference between the surfaces described in (b) and (c).

45 At least five-yearly after commencing extraction and processing activities on the site, the Consent Holder shall provide to the CRC Manager a review of the on-site groundwater level records and, if warranted, a revised estimate of the highest recorded groundwater level and a new quarry management surface for future excavations.

46 Should groundwater levels rise into the quarry floor, the Consent Holder must notify the CRC Manager within 24 hours. The *quarry activities* authorised by this consent must not occur in any area of exposed groundwater.

47 If, at any time, the groundwater level rises above the base of the quarry pit excavation in an area that has yet to be rehabilitated, then:

(a) Any machinery must immediately be moved away, further than a distance of 10 metres, from the exposed groundwater;

(b) Once the groundwater level has receded below the quarry base, the affected area must be backfilled with virgin excavated natural materials sourced from within the Site to re-establish at least one metre of separation to the highest measured groundwater level;

(c) The Consent Holder must reduce the maximum allowable depth of future excavations to ensure that there is at least one metre separation to the measured groundwater level specified in 47(b); and

(d) The Consent Holder must notify the Canterbury Regional Council, Attention: Regional Leader - Compliance Monitoring, in writing within five days.

Advice Note: *For the purpose of this consent, 'virgin excavated natural materials' is aggregate that is of comparable quality and composition to aggregate which was excavated.*

48 The Consent Holder shall review the highest recorded groundwater level (in addition to the 5-year review outlined in condition 45) and review the quarry management surface for future excavations and provide a copy of the results to the CRC Manager in the event that:

(a) the groundwater level monitoring under Condition 43 indicates that the groundwater level has risen; and

(b) the groundwater level rises above the base of the quarry pit excavation in an area that has yet to be rehabilitated as outlined in Condition 47.

Extraction Depth

49 Excavation of aggregate and deposition of soil rehabilitation material and material generated from the processing of aggregate and backfill must only occur where the quarry floor does not go below the quarry management surface.

50 Once *extraction and processing phase activities* have commenced the Consent Holder must undertake, at three monthly intervals, a drone survey of all depths of excavated and filled areas on the Site. The survey must be provided to the CRC Manager. The survey is not required if there has been no excavation in the preceding three-month period. Alternative methods for providing this information, such as photogrammetry laser level survey and GPS depth technology on excavation machinery, may be used subject to approval in writing from the CRC Manager.

51 In February of each year, utilising the survey data obtained under Condition 50, the Consent Holder must produce a contour map showing the surveyed maximum quarry depth relative to the highest recorded groundwater level for the Site derived from the groundwater level data obtained from Condition 43 and also a contour map showing the thickness of the vadose zone (i.e. the difference between the ground surface and the inferred surface of the highest recorded groundwater level) of the rehabilitated land. These maps shall be provided to the CRC Manager.

Advice Note: *a post rehabilitation vadose zone contour map is required to implement the future land use covenant conditions.*

52 If the groundwater level monitoring under Condition 43 indicates that the groundwater level has risen so that there is less than one metre separation between the measured groundwater level and the current ground level of the base of the active quarry pit, then:

(a) Any machinery, other than used in accordance with (b), must be moved away from these areas immediately;

(b) The affected area must be backfilled with virgin excavated natural materials sourced from within the Site to re-establish at least one metre of separation to the highest measured groundwater level;

(c) The Consent Holder must reduce the maximum allowable depth of excavation to ensure that there is at least one metre separation to the measured groundwater level specified in (b); and

(d) The Consent Holder must notify the Canterbury Regional Council, Attention: Regional Leader - Compliance Monitoring, in writing within five days.

Excavation of Aggregate

53 Excavation of aggregate must occur in a progressive sequence (anticlockwise) generally in accordance with Boffa Miskell and Pro-Manage Plan Set dated 20 January 2025 (attached as Appendix B).

Contaminated Material

54 The Consent Holder shall engage a SQEP to undertake a detailed site investigation (DSI) for each phase of quarrying as identified on the Staging Plan appended to this Consent at least six months prior to the commencement of quarry activities.

55 The Detailed Site Investigation required under Condition 54 shall:

(a) Be undertaken in accordance with the Resource Management (National Environmental Standard for Assessing and Managing Contaminants in Soil to Protect Human Health) Regulations 2011;

(b) Delineate the lateral and vertical extents of the identified HAIL sites; and

(c) Determine if remediation is required.

56 If, contaminated materials are discovered, the handling and reuse of contaminated material must be undertaken in accordance with a Remediation Action Plan (RAP). The RAP must be prepared and submitted to the SDC Manager for certification at least 20 working days prior to the remediation works commencing. The RAP will be provided to Canterbury Regional Council for information only.

57 The excavation and re-use of the material identified in Condition 56 must be supervised and validated by a SQEP as defined in the NES Contaminated Land Users' Guide (MfE 2012). On completion of the works, the Consent Holder must submit a site validation report confirming compliance with the certified RAP to the SDC and CRC Managers.

58 Any material removed from the Site shall be disposed of at a facility authorised to receive such material, and the Consent Holder shall provide the Council, Attention: Regional Leader – Monitoring and Compliance, with written confirmation of such disposal within 10 working days.

Accidental Discovery of Contaminated Material Protocol

59 In the event that any unexpected, contaminated soil or material is uncovered by the works, an accidental discovery protocol must be implemented, including but not limited to the following steps:

(a) Earthworks within ten metres of the encountered contaminants must cease immediately;

(b) All practicable steps must be taken to prevent the contaminated material becoming entrained in stormwater or being directed to the base of the quarry pit where the depth to groundwater is at its lowest. Immediate steps must include:

(c) Diverting any stormwater runoff from surrounding areas away from the contaminated material where practicable;

(d) Minimising the exposure of the contaminated material;

(e) Notification of the Canterbury Regional Council, Attention: Contaminated Sites Manager and Regional Leader – Compliance Monitoring, within 24 hours of the discovery;

(f) Earthworks within ten metres of encountered contaminants must not recommence until a suitably qualified and experienced contaminated land practitioner (SQEP) confirms to Canterbury Regional Council, Attention: Regional Leader – Compliance Monitoring that continuing works does not represent a significant risk to the environment;

(g) All records and documentation associated with the discovery must be kept and copies must be provided to the Canterbury Regional Council upon request; and

(h) Material must be managed under Conditions 55 to 57 above.

Groundwater Quality Monitoring and Reporting

60 The Consent Holder must undertake the following groundwater sampling regime for all 5 of the bores listed in Condition 43 of this Consent.

(a) Representative samples of groundwater shall be taken prior to the commencement of this resource consent, at three-monthly intervals for a period of five years after *quarry activities* commence and thereafter at six-month intervals for the duration of this resource consent; and The Consent Holder shall use their best endeavours to collect samples within 3 days, or as soon as practicable, of any storm event of 1:10 year annual exceedance probability (after the rainfall at Christchurch Airport exceeds 20 mm in 1 hour or 80 mm in 24-hours);

(b) Samples must be taken after adequate purging to remove all stagnant water from the bores or by using an alternative method, such as a low-flow sampling technique, to ensure that fresh groundwater is drawn through the bore screens;

(c) All samples must be taken by a suitably qualified environmental practitioner and analysed for the contaminants listed in Table 3 and Table 4 by an accredited laboratory;

(d) The water quality monitoring results shall be provided to the CRC, Attention: Regional Leader – Monitoring and Compliance within two weeks of them being received in an electronic format, suitable for automatic upload to a water quality database.

Table 3: Contaminants and Trigger Concentrations

Contaminant	Trigger Concentration
Alkalinity	*100 mg/L as $CaCO_3$*
Ammoniacal Nitrogen	*1.2 mg/L*
Chloride	*125 mg/L*
Electrical conductivity	*70 mS/m*
Total Hardness (calcium + magnesium)	*200 mg/L as $CaCO_3$*
Dissolved iron	*0.3 mg/L*
pH (laboratory measurement)	*Less than 6.5 or more than 8.5*
Total Petroleum Hydrocarbons	*Any detection greater than 0.1 mg/L*

Table 4: Contaminants

Table 2 Contaminants
E. coli
Nitrate nitrogen

61 The bores shall be accessible to the CRC Manager for the purpose of groundwater sampling.

62 The results of the analyses of groundwater samples tested must be compared with the contaminant trigger values in Table 3. Any contaminant concentration for analyses containing trigger values will be deemed in-exceedance if:

(a) The tested result is in excess of the trigger values for a contaminant given in Table 3 and the year-to-year median concentration of the same contaminant in both of the upgradient wells is less than the Table 1 trigger levels; or

(b) The year-to-year median concentration of a contaminant in the downgradient wells exceeds the year-to-year median concentration of the same contaminant in both of the upgradient wells by more than 10 percent of the respective Table 1 contaminant trigger value, where any year-to-year median concentration in both of the upgradient wells for a sampling event exceeds the Table 3 trigger.

Advice Note: *The trigger levels are intended to establish if there has been an increase in concentration of any contaminant across the Consent Holder's site. The upgradient wells are to monitor if any contamination is coming from other upgradient properties. Condition 62(b) makes allowance for Table 3 trigger values being exceeded because of an upgradient contamination source, by requiring a further increase of more than 10 percent of the trigger level across the site before a consent exceedance is triggered. Where Conditions 62(a) and 62(b) refer to a year-to-year median concentration, the median is to be calculated for each individual well (either upgradient or downgradient) from all the test results of that well within the 1 year prior to the sampling round considered.*

63 If there is an exceedance in a downgradient bore as determined by Condition 62, the Consent Holder shall as soon as practicable and within 72 hours of receiving that result:

(a) Obtain a second sample of groundwater from the bore(s) in which the exceedance was identified in accordance with Condition 62 (a) and (b);

(b) Analyse these samples in accordance with Condition 60 (c).

64 If the results of analysis of the second groundwater samples carried out in accordance with Condition 60 show that none of the concentrations of contaminants analysed exceed the trigger concentrations in Table 3 as determined by Condition 62, the Consent Holder must continue to sample groundwater in accordance with Condition 60.

65 If the results of analysis of the second groundwater samples carried out in accordance with Condition 63 show an exceedance of the trigger concentrations in Table 3 as determined by Condition 62, the Consent Holder shall:

(a) Notify the Council Regional Leader – Monitoring and Compliance within 7 days;

(b) Conduct an investigation into the potential cause(s) of the exceedance, which may include undertaking additional monitoring beyond the routine sampling;

(c) Implement necessary measures to managethe concentration of the contaminant in groundwater. Such measures may include:

i. Cessation of activities that may have caused the exceedance;

ii. Removal of the contaminant source(s);

iii. Revision of soil management procedures and updating the relevant plans accordingly;

iv. Notifying any downgradient bore owners who might be affected by the change in groundwater quality and, with the agreement of the bore owner, implement measures to avoid, remedy or mitigate any adverse effects on their water supply that are caused by the quarrying activity.

(d) If notification to downgradient bore owners is required under Condition 65(c), also notify the CLG.

66 The water quality monitoring results must be supplied to the CRC Manager and the CLG within two weeks of them being received in an electronic format, suitable for automatic upload to a water quality database (preferably directly from the analytical laboratory immediately after quality checking).

Spills

67 The Consent Holder must take all practicable measures to prevent leaks and avoid spills of fuel or any other hazardous substances. This includes but is not limited to:

(a) No refuelling or maintenance of vehicles or machinery can occur on the quarry pit floor, with the exception of generators for mobile plant;

(b) All refuelling shall be undertaken at least 3 metres above the highest groundwater level recorded at the Site;

(c) Appropriate servicing and maintenance of vehicles and machinery such that they do not result in leaks or spills; and

(d) Keeping a spill kit capable of absorbing all fuel and oil products on site and available at all times.

68 In the event of a spill of fuel or any other hazardous substance, the Consent Holder must ensure that:

(a) The spill is cleaned up as soon as practicable and measures taken to prevent a reoccurrence;

(b) The CRC Manager is informed within 24 hours of a spill event exceeding five litres and the following information provided:

(i) The date, time, location and estimated volume of the spill;

(ii) The cause of the spill;

(iii) The type of hazardous substance(s) spilled;

(iv) Clean up actions undertaken;

(v) Details of the steps taken to control and remediate the effects of the spill on the receiving environment;

(vi) An assessment of any potential effects on the environment of the spill; and

(vii) Measures to be undertaken to prevent a reoccurrence of the spill.

Site Rehabilitation

69 Rehabilitation of the Site must be undertaken in accordance with the RMP certified by the SDC Manager under consent RC235522.

Annual Report

70 The Consent Holder must prepare an annual report containing the groundwater level and quality monitoring data and assessments required to be collected under the conditions of this consent. The report must discuss groundwater quality trends, including changes to the highest recorded groundwater level in the monitoring data and their relationship to the *quarry activities*. The annual report must be provided to the CRC Manager by 31 August each year.

Review of Conditions

71 The Canterbury Regional Council may, once per year, on any of the last five working days of May or November, serve notice of its intention to review the conditions of these consents for the purposes of:

(a) Dealing with any adverse effect on the environment which may arise from the exercise of this consent and which it is appropriate to deal with at a later phase; and

(b) Amending groundwater monitoring requirements; and

(c) Ensuring compliance with any relevant National Environmental Standards; and

(d) Avoiding, remedying, mitigating, off-setting or compensating for any adverse effects on human health that can be proven to be generated by *quarry activities*.

Lapse date

72 If these consents are not exercised before 12 February 2030, they must lapse in accordance with Section 125 of the Resource Management Act 1991.

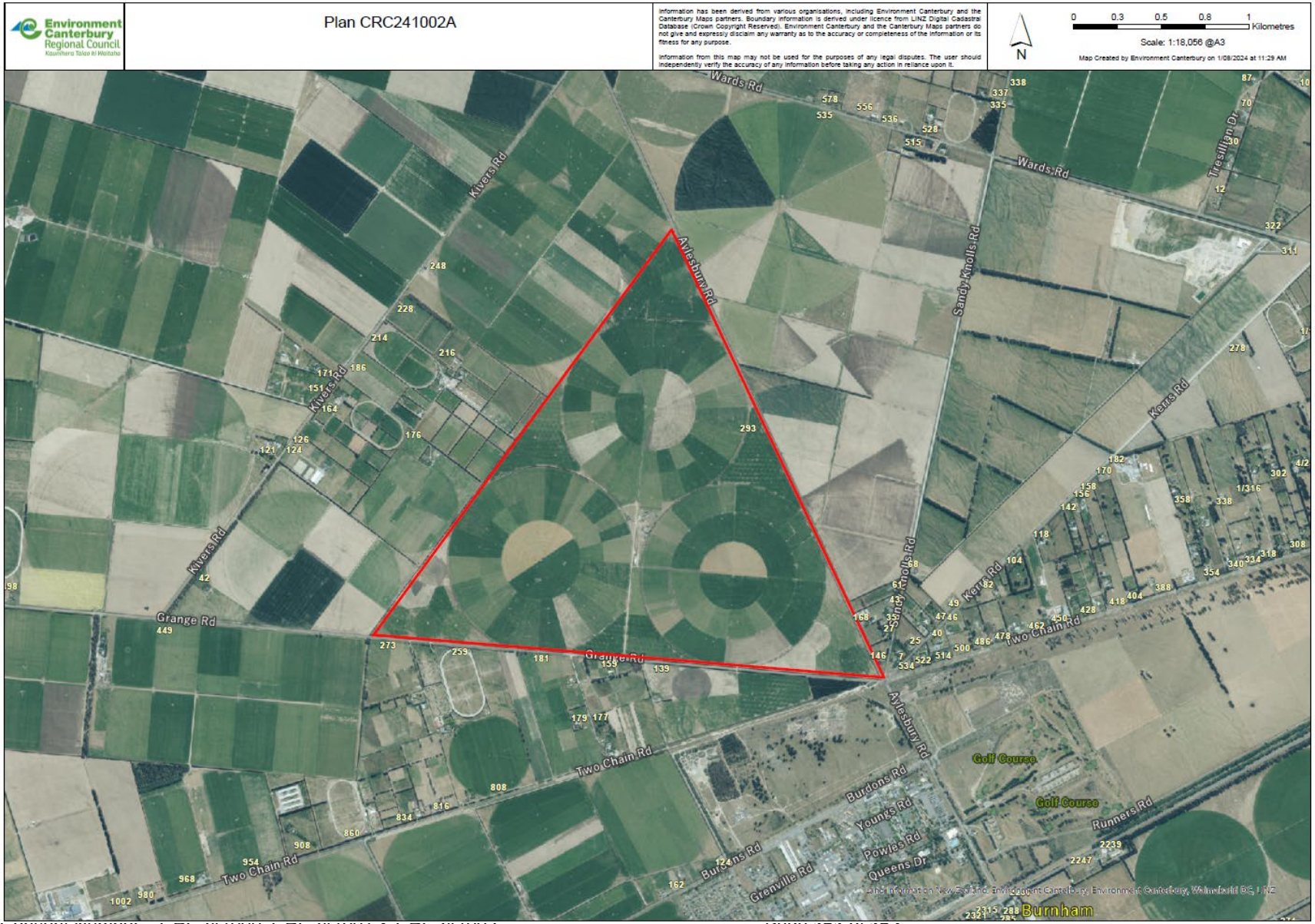
Appendices

Appendix A: Plan CRC241002A showing the site area.

Appendix B: Boffa Miskell and Pro-Manage Plan Set dated 20 January 2025.

Appendix C: On-site monitoring bore location plan.

Appendix D: Figure 1: Drinking water supply bores and community drinking water protection zones within 1km of the site.


Plan CRC241002A
Information has been derived from various organisations, including Environment Canterbury and the Canterbury Maps partners. Boundary information is derived under licence from LINZ Digital Cadastral Database (Crown Copyright Reserved). Environment Canterbury and the Canterbury Maps partners do not give and expressly disclaim any warranty as to the accuracy or completeness of the information or its fitness for any purpose.
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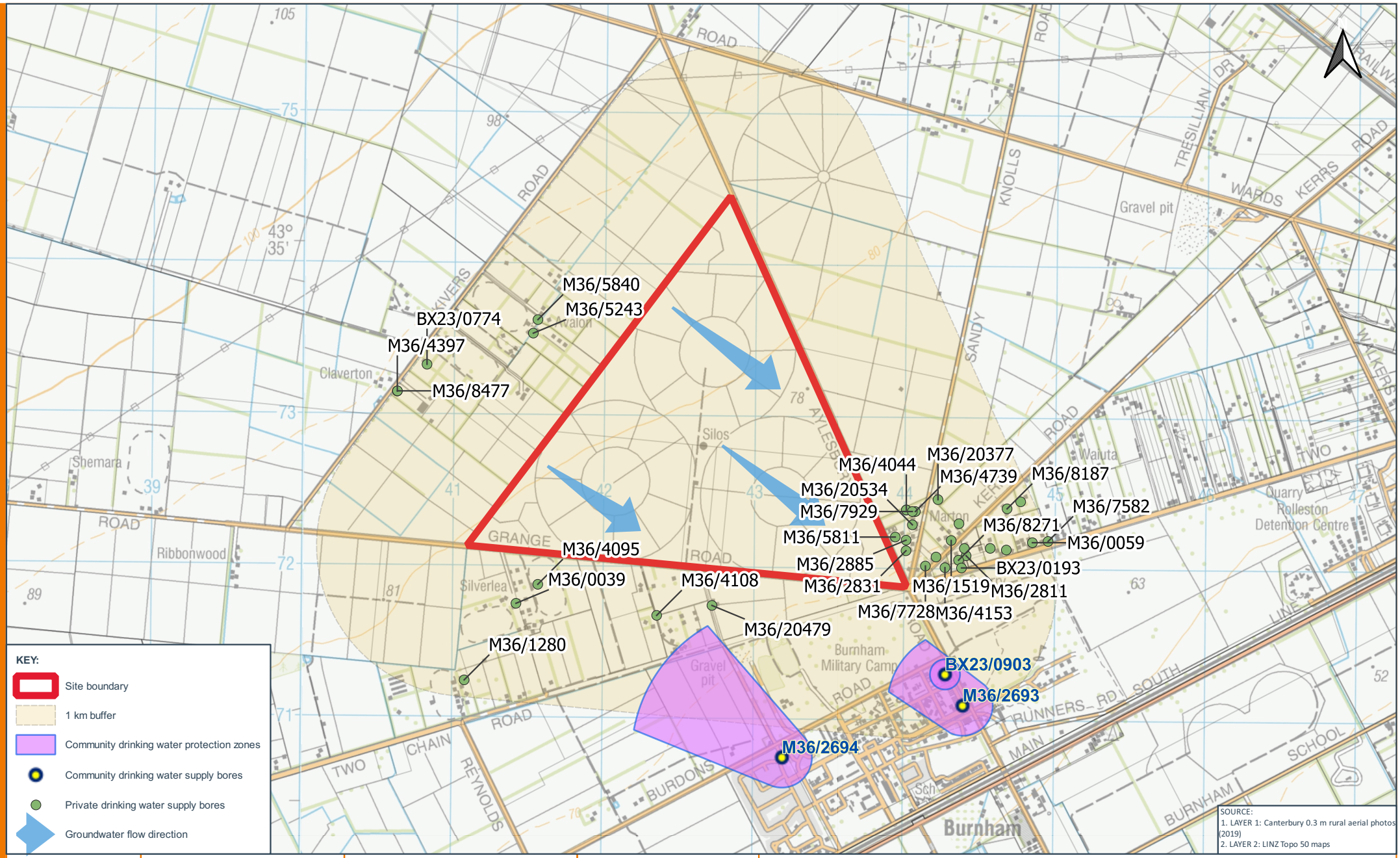
N
0 0.3 0.5 0.8 1 Kilometres
Scale: 1:18,056 @A3
Map Created by Environment Canterbury on 1/08/2024 at 11:29 AM
Wards Rd
Kivers Rd
Aylesbury Rd
Sandy Knolls Rd
Tresillian Dr
Kerrs Rd
Grange Rd
Two Chain Rd
Burdons Rd
Younks Rd
Powles Rd
Queens Dr
Grenville Rd
Runners Rd
Golf Course
Burnham

APPENDIX C – ON-SITE MONITORING BORE LOCATION PLAN



0 400 800 m

METRES

SCALE : 1:45,000 (A4)

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A	FINAL	AUG 22	TG

CLIENT

BURNHAM 2020 LTD

FIGURE

FIGURE 1: DRINKING-WATER SUPPLY BORES AND COMMUNITY DRINKING WATER PROTECTION ZONES WITHIN 1 KM OF SITE

PROJECT

E.COLI MIGRATION ASSESSMENT FOR BURNHAM FARM