

Resource Management Act 1991

Christchurch City Council

Resource Consent RMA/2017/2171

Applicant: **BL & AM Parkinson Family Trust**

Proposal: Quarrying activities including bunding, extraction and rehabilitation involving cleanfilling

Canterbury Regional Council

Resource Consent CRC176146

Applicant: **BL & AM Parkinson Family Trust**

Proposal: A land use consent to deposit cleanfill over the unconfined/semi-confined aquifer

Resource Consent CRC202022

Applicant: **BL & AM Parkinson Family Trust**

Proposal: A discharge permit to discharge contaminants that may enter groundwater associated with the deposition of cleanfill for site rehabilitation

Resource Consent CRC176147

Applicant: **BL & AM Parkinson Family Trust**

Proposal: A discharge permit to discharge dust and contaminants into air associated with the operation of an industrial and trade premise

Notice of Decisions by John Iseli and David Mountfort, Hearings Commissioners

Summary of Decision

That the applications be granted subject to conditions.

Introduction

These decisions are for a set of resource consent applications to the Canterbury Regional Council and the Christchurch City Council to establish and operate a gravel quarry at the site at 137 Miners Rd. The applicant proposes an extraction only quarrying operation, meaning no processing, sorting or washing of aggregate is proposed to occur at the site. Instead, the applicant intends to transport excavated aggregate to nearby quarry sites for processing.

The applicant seeks to extract a total volume of 200,000m³ of aggregate from the site over a duration of six to seven years. The applicant has estimated this is likely to result in an annual volume in the order of 30,000m³ of aggregate extracted from the site. However, it is acknowledged that extraction volumes and duration at the site will be dictated by operational requirements and customer demand. The applicant proposes to undertake the extraction of aggregate in five stages comprising of four stages of approximately 5,000m² each; and one stage of approximately 4,000m². Only one stage is proposed to be excavated at any one time, with the previous stage being backfilled before excavation commences in the next stage (a maximum of two stages “open” at any one time).

Notification

The applications were limited notified to one party (owner and occupier of 387 Old West Coast Road). No submissions were received at the closing of submissions.

Assessment

The applications were comprehensively assessed and reported on under section 42A of the Resource Management Act by Mr Paul Lowe, the Manager Resource Consents for the Christchurch City Council and Ms Hannah Goslin, a consultant planner for the Canterbury Regional Council, who were both assisted by specialists in the technical fields. The reporting officers described the proposals, identified potential adverse and positive effects and assessed them against the provisions of the Christchurch District Plan, the Regional Policy Statement and the regional plans, the relevant National Policy Statements and the Resource Management Act. They discussed the effects of the applications, concluded that the effects would be no more than minor and recommended that the applications be approved subject to a suite of conditions. Their recommended conditions were accepted by the applicant.

For our part we have reviewed the applications and read and considered the s42A reports. We accept and adopt the analysis, conclusions and recommendations of these reports, with the exception of some amendments to some of the conditions to improve their legibility and effectiveness. We do not need to repeat this analysis, which we adopt in full and which can be read in the original reports by any interested parties. Our only substantive amendment to the conditions is to Condition 13(j) of Consent CRC176147 to ensure that topsoil stripping, bund formation/removal and land rehabilitation works are carried out at suitable times of year and in suitable weather conditions to ensure a dust nuisance is not created. We are aware that these works have potential to cause adverse dust effects at nearby properties if the soil is not damp and appropriate controls are not applied.

Decision

That the applications are approved, subject to the conditions contained in Appendices 1 and 2 of this decision.

D. L. Mountfort

David Mountfort

Commissioner

John Iseli

John Iseli

Commissioner

Date: 30 December 2022

APPENDIX 1 –CONDITIONS

A. Resource Consent CRC176146

LIMITS

1. The activity authorised by this resource consent shall be limited to:
 - a. Deposition of cleanfill; and
 - b. Remediation at the completion of cleanfill deposition

at 137 Miners Road, Templeton, Christchurch, legally described as Lot 12 DP 25750, within the area labelled as 'quarry footprint' as shown on Plan CRC176146A, attached to and forming part of this resource consent.
2. There shall be no deposition of cleanfill greater than nine metres below natural ground level at the site.

PRIOR TO THE COMMENCEMENT OF WORKS

3. Prior to the commencement of activities authorised in Condition (1), all personnel working on the site shall be made aware of and have access to:
 - a. The contents of this resource consent document; and
 - b. Resource Consent CRC176147 and all associated documents including:
 - i. The Cleanfill Management Plan, prepared in accordance with Condition (5) of this resource consent;
 - ii. The Rehabilitation Plan, prepared in accordance with Condition (32) of this resource consent; and
 - iii. The Spill Management Plan, prepared in accordance with Condition (27) of this resource consent.
4. The following site management works must be undertaken prior to activities authorised in Condition (1) commencing:
 - a. The consent holder shall ensure that warning notices are erected and maintained at all entrances to the site;
 - b. Warning notices shall be able to be read from a distance of five metres;
 - c. The warning notices shall state:
 - i. Name of the site;
 - ii. Name of the owner of the site, and a contact telephone number;
 - iii. Groundwater is vulnerable to contamination and is a source of drinking water; and
 - iv. Only clean soil may be deposited at this site; general refuse, greenwaste and hazardous waste shall not be dumped at this site.

CLEANFILL MANAGEMENT PLAN (CMP)

5. At least one month prior to the commencement of any cleanfilling activity, the consent holder shall prepare a Cleanfill Management Plan (CMP) prepared in accordance with Section 7.2 of WasteMINZ Technical Guidelines for Disposal to Land (Rev 3), October 2022, and submit it to the Canterbury Regional Council, Attention RMA Compliance and Monitoring Manager (the CRC Manager) for certification that it complies with Section 7.2 of WasteMINZ Technical Guidelines for Disposal to Land (Rev 3), October 2022 and condition (7) of this resource consent.

6. The exercise of this consent must be undertaken in accordance with the certified CMP. In the event of any inconsistency between the conditions of this consent and the provisions of the CMP, then the conditions of this consent must prevail.

7. The CMP must include but not be limited to:
 - a. A description of the content and purpose of the CMP;
 - b. Details of quarrying operations relevant to the deposition of cleanfill material;
 - c. The actions to be undertaken to ensure compliance with the conditions of this consent and actions to be undertaken in response to any incident that may adversely affect the environment;
 - d. Identifying and providing contact details of the staff member responsible for each action;
 - e. The steps to be undertaken to correct incidences of non-compliance with the conditions of this consent;
 - f. The specific location of cleanfill placement areas;
 - g. A description of operational procedures and monitoring that will be implemented to prevent unauthorised cleanfill material entering the site;
 - h. A list of acceptable and unacceptable cleanfill material;
 - i. How rejected cleanfill material will be stored pending its removal to an authorised landfill;
 - j. The maximum length of time that rejected material can be stored on site pending its removal;
 - k. Construction procedures to ensure the long-term stability of cleanfill areas;
 - l. Timetable of works and re-vegetation measures;
 - m. Procedures for improving and/or reviewing the CMP; and
 - n. Procedures for responding to complaints.

8. The CMP may be reviewed and updated if required. Any amendments shall be:
 - a. Only for the purpose of improving the efficacy of the mitigation measures and management of the deposition activity;
 - b. Consistent with the conditions of this resource consent;
 - c. Be prepared in accordance with the Section 7.2 of WasteMINZ Technical Guidelines for Disposal to Land (Rev 3), October 2022; and
 - d. Submitted in writing to the Council, Attention: Regional Leader – Monitoring and Compliance, for certification prior to any amendment being implemented.

9. The consent holder must ensure that a copy of the certified CMP is held at the site at all times and all personnel working at the site are made aware of and have access to it.

STAFF TRAINING

10. The consent holder shall ensure staff training specified in the CMP is provided in accordance with Section 7.3 of WasteMINZ Technical Guidelines for Disposal to Land (Rev 3), October 2022. All records of staff training must be retained and provided to the CRC Manager upon request.

CLEANFILLING

11. Material deposited in the excavated area shall:
 - a. Only include cleanfill material included in Schedule 1 of CRC176146;
 - b. Not exceed more 2% vegetative matter by volume, in any cubic metre of material deposited;
 - c. Only include material which meets:
 - i. Canterbury Regional background levels which are described in Background concentrations of selected trace elements in Canterbury soils. Addendum 1: Additional samples and Timaru specific background levels. Environment Canterbury Report R07/1/2, Trace Elements Level 2: Regional – Recent for Heavy Metals and/or Christchurch Urban area.
 - ii. the ambient concentration of DDT in Canterbury soils of 0.431 milligrams per kilogram¹;
 - iii. the regional background concentration for polycyclic aromatic hydrocarbons in Canterbury soils of 0.922 milligrams per kilogram².
 - iv. Not be deposited into groundwater or standing water; and
 - v. Be located at least one metre above the highest recorded groundwater level as determined under condition (17) of this resource consent.
12. When material is received for deposition, the consent holder shall:
 - a. Inspect all incoming loads of cleanfill material at the entrance to the site;
 - b. Deposit loads of cleanfill material in an area at the site set back from the front of the tip face to enable the inspection of loads before filling occurs;
 - c. Inspect the load deposited under Condition (122)(b) to ensure it meets the cleanfill acceptance criteria specified in Condition (11) and the load description provided in accordance with Condition (14)(d) before filling occurs;

¹Buckland, S. J., Ellis, H. K., Salter, R. T. 1998. Organochlorines in New Zealand: Ambient concentrations of selected organochlorines in soils. Published by Ministry for the Environment.

²Tonkin & Taylor. 2007. Background concentrations of polycyclic aromatic hydrocarbons in Christchurch urban soils. Published by Environment Canterbury. Report No. R07/19

- d. Reject any load that does not meet the cleanfill acceptance criteria specified in Condition (11) and/or the load description provided in accordance with Condition (14)(d); and
 - e. Update the electronic record in accordance with Condition (14) by recording inspection information referred to in Condition (12)(a).
13. The consent holder must ensure that the contractor depositing material at the site has a written contract with the consent holder and is provided with a copy of this consent before entering the site.
14. An electronic record of all cleanfill material deposited at the site shall be maintained and held on site for the duration of this resource consent. This record shall include:
- a. The name of the company delivering the material;
 - b. The date of delivery;
 - c. The physical address of the land the material was sourced from;
 - d. A description of the material;
 - e. Any laboratory reports pertaining to the composition of the material;
 - f. The volume of the delivered material.
15. Any material rejected in accordance with Condition (12)(d) must be disposed of at an appropriate facility. The consent holder must provide to the CRC Manager with written confirmation of such disposal within ten working days of the disposal taking place.
16. No cleanfill material shall be deposited at the site which has been sourced from a site defined as 'potentially contaminated'.

Advice Note: *For the purpose of this consent, 'potentially contaminated' means a part of a site where an activity or industry described in the list in Schedule 3 of the Canterbury Land and Water Regional Plan, which is attached and forms part of this resource consent, has or is being undertaken on it or where it is more likely than not an activity or industry described in the list in Schedule 3, is being or has been undertaken on it, but excludes any site where a detailed site investigation has been completed and reported and which demonstrates that any contaminants in or on the site are at, or below, background concentrations.*

DEPTH TO GROUNDWATER MONITORING

17. Once the deposition of cleanfill has commenced at the site, the consent holder must monitor and record, at weekly intervals or otherwise on request of the CRC Manager, the groundwater level in onsite well M35/6933 to ensure conditions (2) and (11)(c)(v) are met.
18. Should the groundwater water level increase (at times of high-water table) so that the separation is less than one metre between measured groundwater level and the current (at that time) ground level within the active quarry floor area then:
- a. Any machinery (other than that used for applying virgin materials under (b) below) must be moved away from these areas;

- b. The consent holder must apply virgin materials to the area, so as to re-establish a one metre separation distanced throughout the quarry site. For the avoidance of doubt, this requirement does not apply to areas which have already been rehabilitated; and
- c. The consent holder must decrease the maximum allowable depth of deposition in conformance with conditions (2) and (11)(c)(v). The decreased maximum allowable depth must be reported to the CRC Manager.

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

19. Should groundwater levels rise into the quarry floor during deposition of cleanfill the consent holder must notify the CRC manager within 24 hours.

GROUNDWATER QUALITY MONITORING

20. Prior to the commencement of clean filling activities, the consent holder shall install groundwater monitoring bores within 25 metres of the northwest boundary (upgradient) and south east corner of the site as shown on Plan CRC176146A. The location of this bore may be amended subject to obtaining approval in writing from the CRC Manager.
21. The consent holder shall undertake the following groundwater sampling regime at the bores installed in accordance with Condition (20):
 - a. Groundwater quality shall be sampled on at least two occasions at least one month apart, within three months after obtaining consent. The maximum value for each parameter observed will form the baseline against which subsequent samples will be assessed.
 - b. Representative samples of groundwater shall be taken at six monthly intervals for the duration of this consent;
 - c. Samples shall 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; and
 - d. All samples shall be taken by a suitably qualified practitioner and analysed for the following contaminants by an accredited laboratory:

Dissolved Metals

- i. *Dissolved Aluminium*
- ii. *Dissolved Arsenic*
- iii. *Dissolved Boron*
- iv. *Dissolved Cadmium*
- v. *Dissolved Chromium*
- vi. *Dissolved Copper*
- vii. *Dissolved Lead*
- viii. *Dissolved Manganese*
- ix. *Dissolved Nickel*
- x. *Dissolved Zinc*

Other Contaminants

- xi. Alkalinity
- xii. Ammoniacal Nitrogen
- xiii. Chloride
- xiv. E. Coli
- xv. Hardness (CaCO₃)
- xvi. Iron
- xvii. pH
- xviii. Total Petroleum Hydrocarbons
- xix. Nitrate-N
- xx. Sodium
- xxi. Sulphate

22. The water quality monitoring results shall be provided to the CRC Manager within one month of them being received in an electronic format, suitable for automatic upload to a water quality database.

RESPONSES TO MONITORING

23. The results of the analyses of groundwater samples tested must be compared with the contaminant trigger values in Table 1 for dissolved metals, or the baseline values determined in accordance with Condition (21)(a) for all other contaminants. Any contaminant concentration in the downgradient bores will be deemed an exceedance if:
- a. The tested result is more than the trigger values for a contaminant given in Table 1; and the concentration of the same contaminant in the upgradient bore as established by Condition (211) for that sampling event is less than the Table 1 trigger levels; or
 - b. The concentration of a contaminant in the downgradient wells exceeds the upgradient concentration of the same contaminant, by more than 10 percent of the respective Table 1 contaminant trigger value, where any concentration in the upgradient wells for a sampling event exceeds the Table 1 trigger.

Table 1. Dissolved metal trigger values

Parameter	Trigger Value (g/m³)
Dissolved Aluminium	0.5
Dissolved Arsenic	0.005
Dissolved Boron	1.2
Dissolved Cadmium	0.002
Dissolved Chromium	0.025
Dissolved Copper	1
Dissolved Lead	0.005
Dissolved Manganese	0.2
Dissolved Nickel	0.04

Dissolved Zinc	0.75
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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 well is to monitor if any contamination is coming from other upgradient properties. Condition (23)23(b) makes allowance for Table 1 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.*

24. If there is an exceedance in a downgradient bore as determined by Condition (23), the consent holder shall within one month of receiving the results:
- Obtain a second sample of groundwater from the bore sampled in accordance with Condition (211);
 - Obtain a sample of groundwater from the upgradient bore specified in Condition (20); and
 - Analyse these samples in accordance with Condition (211).
 - In the event of a trigger exceedance, an increase in sampling frequency to quarterly for two years following the initial trigger exceedance and six monthly thereafter.
25. If the results of analysis of the second groundwater samples carried out in accordance with Condition (244) show an exceedance of the trigger concentrations in Table 1 as determined by Condition (23), the consent holder must:
- Notify the CRC Manager;
 - Conduct an investigation into the potential cause(s) of the exceedance, which may include undertaking additional monitoring beyond the routine sampling;
 - In consultation with the CRC Manager, implement necessary measures to reduce the concentration of the contaminant in groundwater. Such measures may include:
 - Cessation of activities that may have caused the exceedance;
 - Removal of the contaminant source(s);
 - Stabilisation or capping of the contaminant source(s); and
 - Revision of cleanfill management procedures.
26. Condition (25)(b) and (c) shall not apply where the consent holder provides a report prepared by a SQEP to the CRC Manager, which concludes that the adverse effect is unlikely to be caused by the exercise of this consent, unless within 20 working days of receipt of the report, the CRC Manager gives written notice to the consent holder that the CRC does not accept the conclusions of the report.

SPILLS

27. The consent holder must prepare a Spill Management Plan (SMP) for the site and provide the SMP to the CRC Manager for certification that it complies with conditions (30) and (31) of this resource consent. The SMP may be included within the CMP required by Condition (5).

28. The exercise of this consent must be in accordance with the certified SMP. In the event of any inconsistency between the conditions of this consent and the provisions of the SMP, then the conditions of this consent must prevail.

29. The SMP shall as a minimum:
 - a. Contain a description of the content and purpose of the SMP;
 - b. Document measures to prevent leaks and avoid spills of fuel or any other hazardous substance (including fuel reconciliations);
 - c. Set out procedures to be undertaken in the event of a spill of fuel of any hazardous substance, in accordance with Condition (310); and
 - d. Setout staff training requirements for responding to spills

30. The consent holder shall take all practicable measures to prevent leaks and avoid spills of fuel or any other hazardous substances in accordance with the SMP including but not limited to:
 - a. No refuelling or maintenance of vehicles or machinery can occur on the cleanfill deposition area;
 - b. Appropriate servicing and maintenance of vehicles and machinery such that they do not result in leaks or spills;
 - c. Keeping a spill kit capable of absorbing all fuel and oil products on site and available at all times; and
 - d. Training all staff involved in the refuelling or maintenance activities in the use of spill kits.

31. 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 four 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. Cleanup 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.

REHABILITATION PLAN

32. Rehabilitation shall be undertaken in accordance with the Rehabilitation Plan. The Rehabilitation Plan shall be retained at the site and the consent holder shall ensure all appropriate personnel working on the site are made aware of and have access to it.

33. The consent holder shall progressively rehabilitate the site and within one month of the completion of cleanfilling activities within a stage, the rehabilitation of that area shall be completed. The rehabilitation shall include but not be limited to:
- a. Backfilling of the stage with cleanfill so as to establish batter slopes no less than 1:3 around the site boundaries.
 - b. Spreading a minimum depth of 300mm of topsoil over the site.
 - c. Topsoil is not to be compacted during spreading; rather topsoil is to be tilled or ripped to improve drainage;
 - d. The development of a free-draining and stable landform;
 - e. Re-grassing and re-planting all exposed areas as soon as practicable to prevent erosion losses;
 - f. Monitoring and maintaining rehabilitated areas to ensure they are functioning appropriately post-closure;
 - g. Ensuring the site is suitable for the future use of the site as detailed in the Rehabilitation Plan;
 - h. Rehabilitation of the site shall be undertaken so that a completed grass cover is achieved no later than 6 months after completion of all cleanfilling activities; and
 - i. Monitoring and maintaining the progress of the vegetation and reseedling if necessary, i.e. if the germination rate is satisfactory, controlling weeds, mowing and/or grazing to ensure rehabilitated areas are functioning appropriately, with a minimum 80% grass cover, post-closure, for a period of 24 months.
34. Any amendments made to the Rehabilitation Plan shall be submitted to the CRC Manager for review and certification that it meets the requirements of condition (34) prior to being implemented.

COMPLAINTS REGISTER

35. 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 raised. The complaints register must be provided to the CRC Manager annually and must otherwise be available to the CRC Manager on request.

ANNUAL REPORT

36. The consent holder shall prepare an annual monitoring report for the period of 1 July to 30 June to the CRC Manager, by 30 September each year for the duration of this resource consent. The annual monitoring report shall include but not be limited to:
- a. The electronic record of cleanfill accepted at the site as required by Condition (13);
 - b. A record of any material rejected at the site as required by condition (12) and (15);
 - c. Results of groundwater depth and quality monitoring as required by Condition (17) to (26). This shall include:

- i. A discussion of the groundwater quality trends;
 - ii. Any exceedances of the Table 1 contaminant trigger concentrations;
and
 - iii. Any mitigation actions taken in response to the exceedances;
- d. A record of any spills on-site and remedial actions in accordance with Condition (312);
- e. A record of any discovered contamination and any measures taken to address the contamination such as remediation and validation, resource consent (if required); and
- f. An update of the progress of the rehabilitation at the site.

ADMINISTRATION

37. The Canterbury Regional Council may annually, on any of the last five days of May or November, serve notice of its intention to review the conditions of this resource consent for the purposes of:
- a. Dealing with an adverse effect on the environment occurring as a result of the exercise of this resource consent;
 - b. Requiring best practicable options to be adopted by the consent holder to remove or reduce any adverse effect on the environment as a result of the exercise of this resource consent;
 - c. Requiring the consent holder to carry out monitoring and reporting instead of, or in addition to, that required by the resource consent; or
 - d. Requiring the consent holder to comply with a relevant rule in an operative regional plan.
38. If this consent is not exercised before 19 December 2027 it shall lapse in accordance with section 125 of the Resource Management Act 1991. If given effect to, this consent shall expire 20 years from the date of the consent.

CRC176146 - SCHEDULE 1

'Cleanfill' is defined as material that when buried will have no adverse effect on people or the environment. Cleanfill material includes virgin natural materials such as clay, soil and rock, and other inert materials such as concrete or brick that are free of:

- a. combustible, putrescible, degradable or leachable components;*
- b. hazardous substances;*
- c. products or materials derived from hazardous waste treatment, hazardous waste stabilisation or hazardous waste disposal practices;*
- d. materials that may present a risk to human or animal health such as medical and veterinary waste, asbestos or radioactive substances and liquid waste; and*
- e. concrete slurry, coal tar and hydro-excavated waste.*

B. Resource Consent CRC202022

1. The deposition of cleanfill material onto and into land must be undertaken in accordance with Land Use consent CRC176146.
2. This consent shall expire 20 years from the date of of this consent

C. Resource Consent CRC176147

LIMITS

1. The discharge of contaminants to air shall be only particulate matter from:
 - a. Site preparation, topsoil stripping, overburden removal and storage
 - b. Construction and maintenance of bunds
 - c. Extraction, loading and transportation of material;
 - d. Importation and deposition of cleanfill; and
 - e. Site rehabilitation works,associated with a quarry located at 137 Miners Road, Templeton, Christchurch, legally described as Lot 12 DP 25750, within the area labelled as 'quarry footprint' as shown on Plan CRC176147A, attached to and forming part of this resource consent.

Advice note: For the avoidance of doubt, no blasting is authorised by this consent.

2. Extracted aggregate from the site must not be processed, crushed, screened, sorted or stockpiled on the site.
3. To minimise the production of dust, the excavation of aggregate shall be undertaken in stages as follows:
 - a. Four stages no greater than approximately 5,000m²; and
 - b. One stage no greater than 4,000m².
4. There shall be only two stages 'open' at any one time. This shall comprise of:
 - a. One stage where extraction is taking place in accordance with condition (3); and
 - b. One stage where deposition is taking place.
5. The discharge shall not cause suspended or deposited particulate matter, which is offensive or objectionable, beyond the boundary of the property on which the consent is exercised as shown on Plan CRC176147A.
6. If at any time, including outside normal operating hours, visible dust is blowing beyond the site boundary, the consent holder shall:
 - a. Cease all activities aside from dust suppression activities;
 - b. Investigate the possible source of dust;
 - c. Only resume activities, once there is no longer visible dust blowing beyond site boundaries.

PRIOR TO THE COMMENCEMENT OF WORKS

7. The consent holder shall inform the CRC Manager of the date which these resource consents are first exercised.
8. Prior to exercising this consent, the consent holder shall install and maintain equipment onsite that accurately monitors and records wind speed and direction. The consent holder shall keep accurate records of wind speed and direction throughout the period when quarry activities occur at the site.
9. This record shall be provided to the Canterbury Regional Council on request.
10. The consent holder shall compile and maintain a Dust Management Plan (DMP). The DMP shall include but not be limited to:
 - a. The actions required to ensure compliance with the conditions of this consent;
 - b. Identifying the persons responsible for carrying out all actions in relation to meeting the requirements of this consent;
 - c. The frequency and triggers for the use of water sprays;
 - d. Details of actions to be taken in response to non-compliance with condition (3) of this consent.
11. The DMP shall:
 - a. Be reviewed and updated within a month of this consent being granted to address the activities on site and address any additional matters required by Schedule 2 of the CARP;
 - b. Be retained on the site at all times; and
 - c. Be forwarded within six months of commencement of activities authorised by this consent to the Canterbury Regional Council, Attention: Regional Leader – Compliance Monitoring. Any updated versions of the QEMP shall be forwarded to The Manager within 30 days of completing a review.
12. A record of all complaints relating to contaminants shall be maintained and shall include:
 - a. The location where the contaminants were detected by the complainant;
 - b. The date and time when the contaminants were detected;
 - c. A description of the wind-speed and wind-direction when the contaminants were detected by the complainant;
 - d. The most likely cause of the contaminants detected; and
 - e. Any corrective actions undertaken by the consent holder to avoid, remedy, or mitigate the effects of the contaminants detected by the complainant.

The record shall be provided to the Canterbury Regional Council on request.

13. The consent holder shall take all practicable measures to minimise the discharge of dust from the site. These measures shall include but not be limited to:
 - a. Minimising the areas of exposed ground;
 - b. Maintaining shelter belts along the western, northern and eastern site boundaries;
 - c. Setting back works, except for the construction of bunds, at least 10 metres from immediately adjacent land parcels and the Miners Road boundary;
 - d. Regrassing bare areas such as bunds, and rehabilitated areas as soon as practicable;
 - e. Limiting drop heights of excavators loading trucks;
 - f. Taking wind conditions into account in planning and carrying out work to minimise dust dispersion;
 - g. Using water and/or dust suppressants on all disturbed surfaces including roads when required;
 - h. Applying a speed restriction on all internal roads of 15 kilometres per hour at all times;
 - i. Site operations shall only occur between 0700 to 1800 hours Monday to Friday and 0700 to 1300 hours Saturday, excluding Sundays and public holidays;
 - j. Carrying out topsoil stripping, bund formation/removal and land rehabilitation during favourable weather conditions when ground conditions are damp (or the ground or material to be used for rehabilitation has been thoroughly wetted with a water cart) and winds are below 7m/s (10 minute average) with removal of bunds and final rehabilitation to occur during the months of February to May or July to November inclusive;
 - k. Maintaining an adequate supply of water and equipment onsite for the purposes of dust suppression at all times.

14. 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 this consent for the purposes of:
 - a. Dealing with any adverse effect on the environment which may arise from the exercise of the consent and which it is appropriate to deal with at a later stage;
 - b. Complying with the requirements of a relevant rule in an operative regional plan; or
 - c. Requiring the consent holder to conduct monitoring instead of, or in addition to, that required by the consent.

15. If this consent is not exercised before 19 December 2027 it shall lapse in accordance with section 125 of the Resource Management Act 1991. If given effect to, this consent shall expire 20 years from the date of the consent.

Appendix 2

Conditions relating to Consent RMA/2017/2171

GENERAL

1. Except as required by subsequent conditions the consented activities shall proceed in accordance with the information and plans submitted with the application entered as pages 1 to 160 of the Approved Consent Documentation. The approved plans are illustrated on pages 1 and 2
2. The duration of this consent shall be limited to 10 years from the date of the commencement of the consent. The consent holder is to notify the Team Leader, Christchurch City Council Compliance and Investigations Team, Regulatory Compliance Unit via email to rcmon@ccc.govt.nz upon commencement of extraction at the RM4 site. Extraction of material shall cease no longer than seven years after the commencement of this consent.
3. A water supply shall be available to the site at all times for the purposes of erosion and sediment control and irrigation as set out in the conditions of this consent.
4. The lapsing date for the purposes of section 25 shall be five years from the date of commencement of the consent.

SITE PREPARATION

5. Prior to any other preparation works at the site or the extraction of aggregate commencing, the following shall occur:
 - a. Bunds shall be installed in accordance with approved plan 1 that are 3m high, with batter slopes no steeper than 1 vertical: 2 horizontal. The surface is to be grassed on a minimum of 100mm of topsoil.
 - b. Immediately following construction, the bunds are to be sown with grass or hydroseeded to achieve swift grass cover and watered regularly to ensure grass cover is established immediately after construction.
 - c. To assist in achieving swift grass cover, construction of the bunds shall take place between the months of February to May or July to November to enable grassing of the bunds to occur in autumn or spring.
 - d. The bunds should be set back a minimum of 1m from the closest part of the shelterbelt and at least 4m from the tree trunks, whichever is the furthest, in order to avoid undermining the shelterbelt and/or damaging its roots.
6. The grassed bunds shall be mown regularly or grazed to give a tidy appearance.

7. The bunds shall be watered (to suppress potential dust) until a grass cover has been established.
8. All landscaping required for this consent shall be maintained. Any dead, diseased, or damaged landscaping is to be replaced immediately with plants of a similar species.

OPERATIONAL

9. Staging shall be limit quarrying (including backfilling) to five stages each no more than 5,000m² in area.
10. No more than 5,000m² of exposed earth shall be present without vegetation cover at any one time.
11. The extraction of aggregate shall only be limited to the area shown in Approved Plan 1.
12. There shall be no processing, crushing and screening of aggregate extracted from the site.
13. The quarrying activity (including construction of bunds and access, quarrying and cleanfilling) shall only operate between the hours of 0700 to 1900, Monday to Friday and 0700 to 1200 Saturday except that these operations are not permitted on a public holiday. No activities, other than dust mitigation measures, shall take place outside of those days and times.
14. The stockpiling of overburden for the purpose of rehabilitation is allowed by this consent. However, any overburden stockpiles must be stabilised and re-grassed as soon as practicable.
15. Stockpiles shall be no more than 5m high and more than 20m from any property in the Rural Urban Fringe zone and Miners Road.
16. Excavation shall not occur within 20m of any property boundary.
17. The maximum internal batter slope for excavations shall be 1 vertical to 2 horizontal.
18. Vehicles shall be restricted as follows:
 - a. Overburden removal and bund construction: One scrapper, one excavator and one truck.
 - b. Product Excavation: One excavator and one truck and trailer unit.
 - c. Cleanfill: One excavator and one truck and trailer unit.
 - d. Stage rehabilitation: One dozer, one excavator, one truck and one tractor.
 - e. Note: These figures are not cumulative.
19. Outside of working hours, the site shall be made secure, to ensure that no member of the public can gain access. Signage shall be erected stating that unauthorised access is prohibited.

DEPTH OF EXTRACTION

20. The maximum depth of extraction shall ensure that 1m of undisturbed material/soil is maintained between the floor of the highest groundwater level at the site and no more than 10.3m below existing ground level.

TRANSPORT

21. Prior to the commencement of any activities authorised by this resource consent, the vehicle crossing shall be upgraded and maintained as per Approved Plan 2 and in accordance with the Infrastructure Development Standard, Christchurch Construction Standard, Figure 14 and Chapter 7 of the District Plan. The access shall be designed so there is no conflict with any power poles.
22. A plan from a suitably qualified and experienced engineer shall be submitted for acceptance by the Subdivision Engineer to confirm compliance with condition 19 above prior to construction.
23. To avoid material being deposited, dropped or tracked onto the road, the following measures shall be put in place:
 - a. The new vehicle crossing shall be sealed along with the first 20m of access within the application site.
 - b. The unsealed access is to have clean chip placed on it to minimise dust and movement of larger material to the sealed portion of the access.
 - c. A water cart is to be used regularly on unsealed access roads near the entrance, to minimise dust.
 - d. The sealed access to the road is to be swept regularly, as and when required, and shall be swept as soon as practicable should it be identified that there is a build-up of material on the road and the seal access.
 - e. The edges of the sealed access road shall be inspected and maintained, particularly where pot holes emerge. Before they are filled, pot holes shall be coned off to avoid further damage and likelihood of material transfer to the road;
 - f. The consent holder shall visually inspect all trucks for overloading and loose gravel on or around the body of the truck before exiting the site.
24. The consent holder shall be responsible for ensuring any material from the site and deposited on the Miners Road is removed as soon as reasonably practicable, at their cost.
25. All works for the new access shall be carried out in accordance with an approved Traffic Management Plan (TMP). The consent holder shall prepare a TMP and submit this to Council, Attention: Christchurch Transport Operation Centre (CTOC) by way of email to rcmon@ccc.govt.nz, at least 10 working days prior to the commencement of construction work associated with this consent. The TMP shall identify the nature and extent of temporary traffic management and how all road users will be managed by the use of

temporary traffic management measures and comply with the NZTA Code of Practice for Temporary Traffic Management (CoPTTM). The TMP shall also identify the provision of on-site parking for construction staff. Activities on any public road should be planned so as to cause as little disruption, peak traffic delay or inconvenience to road users as possible without compromising safety.

26. Except to form the new vehicle access, vehicles associated with the activity shall not be parked or queue on the road.
27. Heavy vehicle access to and from the quarry (including from trucks) shall be on Miners Road and to the south of the proposed access only. No heavy vehicle access to and from the site (including from trucks) shall occur along Old West Coast Road.

NOISE

28. All construction activities (i.e. for the formation of bunds, access and topsoil stripping and re-establishment) on the site shall be designed and conducted to ensure that construction noise from the site is controlled so as to comply with NZS 6803:1999 — Acoustics: Construction Noise.
29. Operational noise from the quarrying activity on the site (including backfilling) shall comply with the following noise limits:

Daytime (0700-1900)	
Measured at the notional boundary of any dwelling external to the application site.	50dB LAeq
Measured at the boundary of the site receiving noise from the activity	55dB LAeq
The exception is at the west boundary of the site (in common with 367 Old West Coast Road) where there is a breach by 1dB).	

DUST

30. The quarrying activity on the site shall not cause suspended or deposited particulate matter, which has a noxious, dangerous, offensive or objectionable effect, beyond the boundaries of the site.
31. The consent holder shall undertake all practicable measures to ensure compliance with Condition 30. Such measures shall include but not be limited to:
 - a. Applying water to unconsolidated surfaces (including roads) and stockpiles, as necessary, to minimise dust emissions during dry and windy conditions;
 - b. Making a water cart with a water gun capable of reaching the tops of stockpiles and trucks available for use on the site at all times;

- c. The consent holder shall ensure that the overburden of the next stage is only removed once quarrying of a stage is nearing completion;
- d. Regrassing bare areas such as bunds, overburden stockpiles and rehabilitated areas as soon as practicable;
- e. Carrying out land stripping and land restoration, including bund formation, during favourable weather conditions and at times of least vulnerability to neighbours;
- f. Maintaining exposed bare soil in a damp condition while bunds are being formed;
- g. Taking current and predicted wind conditions into account in planning and carrying out work to minimise dust discharge;
- h. Maintaining a cover of fresh washed chips or rounds;
- i. Checking trucks for load security before they leave the site.
- j. Retaining the established shelterbelts on the site.

HAZARDOUS SUBSTANCES

32. All practicable measures shall be undertaken to prevent oil and fuel leaks from vehicles and machinery, including:

- a. No hazardous substances (including fuel and oil) shall be stored on the floor of the quarry.
- b. No refuelling shall occur on the floor of the quarry.
- c. A spill kit that is capable of absorbing the quantity of oil and petroleum products that may leak or be spilt shall be kept on the site at all times.
- d. In the event of a spill of fuel or any other contaminant, the consent holder shall clean up the spill as soon as practicable and take measures to prevent a recurrence.

33. The consent holder shall inform the Team Leader, Christchurch City Council Compliance and Investigations Team, Regulatory Compliance Unit within 24 hours of any spill event greater than 4 litres and shall provide the following information:

- a. The date, time, location and estimated volume of the spill;
- b. The cause of the spill;
- c. The type of contaminant(s) spilled;
- d. Clean up procedures undertaken;
- e. Details of the steps taken to control and remediate the effects of the spill on the receiving environment;
- f. As assessment of any potential effects of the spill and measures to be taken to prevent a recurrence.

CONTAMINATED MATERIAL

34. In the event that soils are unexpectedly found that have visible staining, odours and/or other

conditions that indicate soil contamination then work must cease and all workers shall vacate the immediate area, notify the site manager and ensure that the local authorities are informed (via Christchurch City Council at envresourcemonitoring@ccc.govt.nz and the Environment Canterbury pollution hotline on 0800 76 5588). No excavation of such soil shall occur without advice from a Suitably Qualified and Experienced Practitioner (SQEP) on land contamination and the agreement of local authorities.

REHABILITATION AND CLEANFILLING

35. Prior to the commencement of any activities authorised by this resource consent in the site, the consent holder shall submit a Quarry Rehabilitation Plan (QRP) via email to rcmon@ccc.govt.nz for certification by Manager Resource Consents (or their nominee)
36. The overarching objective of the QRP shall be to ensure that the site is rehabilitated in a way which enables subsequent use of the land for other permitted or consented activities. It shall include those matters listed in Standard 17.8.3.14 in the Christchurch District Plan and be consistent with the memorandum from E2 Environmental Consulting Engineers dated 16 June 2020 and the Quarry Rehabilitation Plan by Inovo Projects in Appendix G of the Application Report.
37. The QRP may be modified at any time following submission of a revised QRP via email to rcmon@ccc.govt.nz and its certification by the Head of Resource Consents (or their nominee).
38. Rehabilitation of the quarry shall be undertaken in accordance with the certified Quarry Rehabilitation Plan.
39. Winter grazing, stockholding areas, effluent irrigation and onsite wastewater discharges are prohibited on the land following filling and remediation.
40. No cleanfill is to be accepted for filling which contains coal tar or material sourced from land which is described as on the Canterbury Regional Council's Listed Land Use Register as 'verified,' 'contaminated for,' 'significant adverse environmental effects,' or 'managed for' site.
41. All source material for backfilling in the quarry must be cleanfill as defined in the advice note below. Under this definition:
 - a. The cleanfill may contain the materials listed in (Appendix F of the Application).
 - b. The cleanfill may not contain more than 2% organic material.
 - c. The cleanfill may not contain more than 2% biodegradable material.

Advice Note: "Cleanfill" is defined as:

Material that when buried will have no adverse effect on people or the environment. Clean fill material includes virgin natural materials such as clay, soil and rock, and other inert materials such as concrete or brick that are free of.

- *combustible, putrescible, degradable or leachable components*
- *hazardous substances*
- *products or materials derived from hazardous waste treatment, hazardous waste stabilisation or hazardous waste disposal practices*
- *materials that may present a risk to human or animal health such as medical and veterinary waste, asbestos or radioactive substances*
- *Liquid waste.*

42. The site shall be fully rehabilitated within one year of the completion of extraction.

43. Rehabilitation of the Quarry shall be by means that include, but are not limited to:

- a. Re-shaping the quarry walls to a maximum gradient no steeper than 1 vertical:3 horizontal;
- b. Spreading enough topsoil to allow for a minimum compacted depth of 300mm of topsoil across the base;
- c. Scheduling rehabilitation in autumn or spring wherever practicable, or by watering, to ensure that grass cover is established quickly;
- d. Re-grassing within 60 days of placement of the final topsoil capping to minimise dust generation and erosion losses; and
- e. All finished surfaces to be designed and constructed to be free draining.
- f. Where additional fill is required to be brought into the site for rehabilitation purposes, the consent holder shall ensure that all material deposited in the excavated area is:
 - Only material defined as 'Cleanfill' as set out in the advice note above under condition 41; and
 - Not deposited into groundwater; and is at least one metre above the highest groundwater level expected at the site.
- g. Material is deposited in accordance with a management plan which has been prepared in accordance with Cleanfill Management Plan (CMP) prepared in accordance with Section 7.2 of WasteMINZ Technical Guidelines for Disposal to Land (Rev 3), October 2022, and submit it to the Canterbury Regional Council, Attention RMA Compliance and Monitoring Manager (the CRC Manager) for certification that it complies with Section 7.2 of WasteMINZ Technical Guidelines for Disposal to Land (Rev 3), October 2022.
- h. Material to be deposited is checked by the site manager prior to deposition. If the material is not classified as Cleanfill, the consent holder shall immediately remove the material and arrange for the disposal of it at an appropriate location; and
- i. Material received is recorded in a log book by the site manager. The log book shall include a detailed record of all materials deposited into the Cleanfill site and shall provide to the CCC upon request.

Advice Note: No cleanfilling shall occur until such time as a licence is approved under the Cleanfill and Waste Handling Operations Bylaw 2015.

OTHER

44. The consent holder shall keep a record of any complaints relating to dust and shall provide the record to the Team Leader, Christchurch City Council Compliance and Investigations Team, Regulatory Compliance Unit, upon request. The record shall include:
- a. The location where the dust was detected by the complainant;
 - b. The date and time when the dust was detected;
 - c. A description of the wind speed and wind direction when the dust was detected by the complainant;
 - d. The most likely cause of the dust detected; and
 - e. Any corrective action undertaken by the consent holder to avoid, remedy or mitigate the dust detected by the complainant.
45. In the event of any disturbance of Koiwi Tangata (human bones) or taonga (treasured artefacts), the consent holder shall:
- a. Immediately cease earthmoving operations in the affected area; and
 - i) Mark off the affected area until earthmoving operations recommence;
 - ii) Advise the Team Leader of the Resource Consents Team, Christchurch City Council, of the disturbance; and
 - iii) Advise the Upoko Runanga of Tuahuriri, or their representative (contact information can be obtained from the Christchurch City Council) and the New Zealand Historic Places Trust, of the disturbance; and
 - b. Not recommence earthmoving operations until either:
 - i) The consent holder provides a certificate in writing to the Team Leader, Christchurch City Council Compliance and Investigations Team, Regulatory Compliance Unit, signed by Upoko Runanga of Tuahuriri, or their representative(s), stating that appropriate action has been undertaken in relation to the discovered culturally sensitive material; or
 - ii) After five working days after advising Tuahuriri Runanga, a certificate signed by an archaeologist (i.e., a person with a post graduate degree in archaeology and who is a member of the New Zealand Archaeological Association) is provided to the Team Leader, Christchurch City Council Compliance and Investigations Team, Regulatory Compliance Unit, that states that in the archaeologist's professional opinion appropriate action has been undertaken in relation to the discovered culturally sensitive material. That certificate shall detail the action that has been undertaken by the consent holder. A copy of the archaeologist's qualifications shall also be provided with any such certificate.

REVIEW

46. The Christchurch City 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 this consent for the purpose of:

- a. Dealing with any adverse effect on the environment which may arise from the exercise of this consent including but not limited to dust management, management of cleanfill and maintenance of the road surface.
- b. Requiring the adoption of the best practicable option to remove or reduce any adverse effect on the environment.

ADVICE NOTES:

i) *Monitoring*

The Council will require payment of its administrative charges in relation to **monitoring of conditions**, as authorised by the provisions of section 36 of the Resource Management Act 1991. The current monitoring charges are:

- (a) A monitoring programme administration fee of \$102.00 to cover the cost of setting up the monitoring programme; and
- (b) A monitoring fee of \$175.50 for the first monitoring inspection to ensure compliance with the conditions of this consent; and
- (c) Time charged at an hourly rate if more than one inspection, certification of conditions, or additional monitoring activities (including those relating to non-compliance with conditions), are required.

The monitoring programme administration fee and initial inspection fee / documentation fee / inspection fees will be charged to the applicant with the consent processing costs. Any additional monitoring time will be invoiced to the consent holder when the monitoring is carried out, at the hourly rate specified in the applicable Annual Plan Schedule of Fees and Charges.