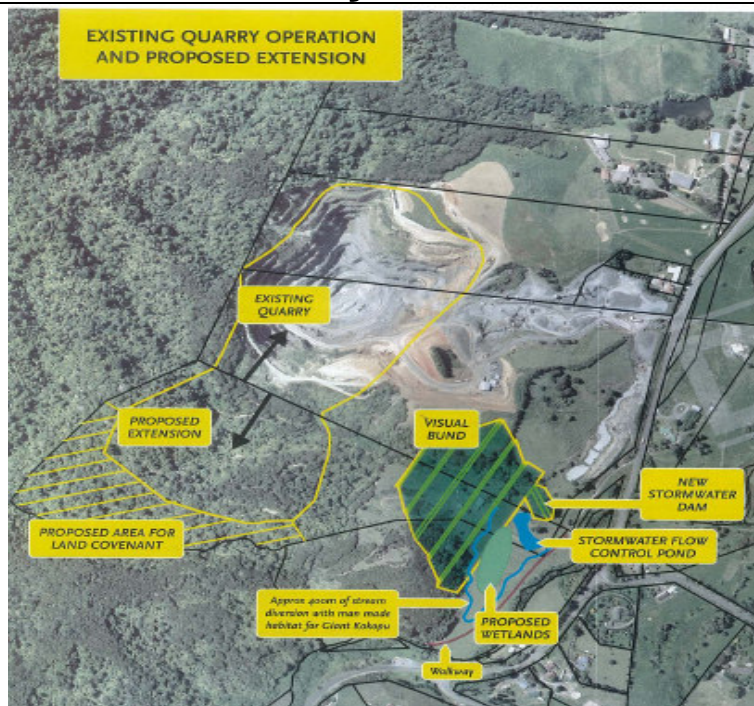


Waingaro Road Quarry 2008

Consent Compliance Plan Version 3 May 2008



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		Last Review	May 2008
		Next Review	May 2009

Quality Control Record

Site Manager (Name) _____ has read & understood
this document and how it fits into my job

Signed _____ Date: _____

Site Staff (Name) _____ have been
inducted by the Site Manager on how this document fits into my job

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1 PURPOSE OF A COMPLIANCE PLAN

This document represents the current best practice compliance plan for the Waingaro Road Quarry Consent No's >>>>. The purpose of this plan is to ensure that operations and environmental risks are managed appropriately, and within the conditions of the resource consents issued by Waikato District Council and Environmental Waikato.

All reviews and changes **MUST** be approved by **both Councils** before implementation

ALL actions in this management plan will be entered into the Perry Group Consent Management Database (CS-vue), and treated as individual consent conditions

1.1 Site process

The site operates as a commercial hard metal quarry with operations including

1. Operations
 - Rock extraction, blasting, crushing, screening and sales
 - Control of dust, noise, stormwater and traffic
2. Projects
 - Visual bund and planting
 - Stormwater treatment systems
 - Overburden stripping
 - Wetland
 - Stream Diversion
 - Remediation
 - Temporary silt and sediment controls
3. Monitoring
 - Control of dust, noise, stormwater and traffic
 - Planting

1.2 Emergency contact numbers

In an emergency event, which may include:

- Environmental compliance
- Civil defence

A list of key contacts is shown as Appendix B.

2 OPERATIONS

2.1 General

2.1.1 Traffic movement

1. *The Site Manager to ensure queuing on Waingaro Road is kept to an absolute minimum*

The Site Manager and weighbridge operator to ensure at all times that trucks entering the weighbridge off Waingaro Road will be given priority over trucks exiting the site¹

2. *Noise must not exceed Landuse Consent condition XX attached as appendix A*

The Site Manager to check the entrance planting **6 monthly** to ensure it is not impeding site visibility out of the site and arrange for this to be trimmed as soon as practical

3. *The boundary is defined as the land leased to Perry Aggregates for the Quarry operation attached as Appendix E*

2.2 Air discharge

The site is to be managed to ensure no particulate matter or excessive² noise is released outside the boundaries³ of the land leased (or owned) for the Quarry that is deemed a nuisance or objectionable⁴

4. *The term objectionable is defined by 2.2.3 however this will be determined by either Council taking into consideration the events frequency and duration "refer 2.1.3.3"*

2.2.1 Dust

Methods used on site to manage dust include

- Tar sealed entrance
- Truck wheel wash
- Sprinkler system for the internal access road and front yard, and main road frontage
- On site water cart
- Regular entrance road sweeping

The Site Manager will ensure

- The site entrance is inspected **daily** to ensure it is clear of debris
- The wheel wash is inspected **daily** to ensure it is operational
- On site water cart is inspected **weekly** to ensure it is operational
- The sprinkler system tested **weekly** to ensure it is operational

Should one of these dust suppression tools not be operating then contingency plans under item 2.2.1.2 to be used

2.2.1.1 Compliance monitoring

The Site Manager shall ensure that dust levels are kept to a minimum, to the effect that there are no objectionable dust discharges beyond the boundary of the site

In determining “objectionable”, the Regional Council officer will determine

- *The frequency, intensity, duration, location, and effect of the dust emission and/or*
- *Receipt of complaints from neighbours or the public and/or*
- *Where a relevant written advice from an experienced officer of the Waikato District Council or the Waikato District Health Board has been issued*

2.2.1.2 Dust contingency plan

5. *The Site Manager may need to use the existing site water cart to water the haul roads and the fill area as well as a project water cart*
6. *Some project work may need to be stopped if there is excessive dust created*

Should dust become a nuisance as defined by 2.2.1.1, then the Site Manager will attempt to mitigate the dust by either

- Adding an extra water cart⁵
- Stopping work⁶
- Progressively topsoiling any fill area’s to stabilise with grass, mulch or hydro-seed

2.2.2 Noise

Noise from the normal day to day operations consist of

1. On site machinery
2. Vehicle traffic
3. Crushing plant
4. Blasting

2.2.2.1 Machinery

7. *All machinery should be operating to noise levels recommended by the manufacturer*
8. *Relates to issues like broken exhausts that may cause a noise compliant on our site. All vehicles entering the site must comply with noise limits prescribed by the LTSA*

The Site Manager to ensure **daily** that all machinery used on site is fitted with appropriate silencing equipment⁷

The Site Manager to audit contractors and customers daily to ensure their vehicles/machinery comply with site machinery rules

2.2.2.2 Vehicle traffic

The Site Manager and weighbridge operator to audit vehicles arriving and leaving the site **daily** to ensure their vehicles comply with site noise limits⁸ Should a vehicle exceed these limits in the view of the Site Manager it will be refused entry until it complies. Any vehicles turned away should be recorded on weekly diary

2.2.2.3 Crushing Plant

The Site Manager to ensure that the noise from the crushing plant is monitored **daily** to ensure that noise from the plant will not cause an objectionable effect off the site boundary (refer note 2)

2.2.2.4 Blasting

The Site Manager to ensure that prior to each blast occurring the immediate neighbours listed below are advised by phone

1. Waikato District Council compliance officer
- Allan Jessop 0272455198
2. Phillip Wells 07 8248329
3. CYC -Ted Muir 07 8248495
4. Angus McDonald 07 8247094
5. Hilda McLean 078248621
6. Al Wilson 223 Waingaro Road 8245510
7. Barbra Burrows 7 Clark Road 8249230

9. *Only staff who hold a current shot firers certificate or an independent blasting company approved by the Site Manager*

Each blast to be done by a suitably qualified person⁹, with records of the blast and the seismic readings from the on site monitoring equipment recorded on the weekly diary sheet

10. *Operations are defined as screening, crushing and associated works, excludes blasting and off site sales after 5.30pm*

2.2.2.5 Hours of operation

The hours of operation will vary dependent on the construction season

The site will be open for sales via the weighbridge from 7:00am to 5:30pm Monday to Friday and 7:00am to 12:00pm Saturday

11. *Contaminated means anything that has been in contact with the active exposed soil and is likely to carry sediments*

The site operations¹⁰ will be from 7:00am to 9:00pm Monday to Friday and 7:00am to 5:00pm Saturday.

2.3 Stormwater

2.3.1 General

12. *Non-Contaminated means clean natural paddock run-off*

Operational stormwater from the site is defined as contaminated¹¹, non-contaminated¹² and water take¹³

2.3.2 Non-contaminated stormwater

13. *Water take is defined as the approved water take from the Waipa River, Consent attached as appendix A*

Is defined as

- Diverted water upslope from the haul road cuttings
- Surrounding grassed paddocks
- Water take

The Site Manager will **check these areas weekly** to ensure that there is no silt contamination present

If a contamination is found this to be remedied “as soon as practicable” and recorded on the weekly diary

2.3.3 Contaminated stormwater

2.3.3.1 Silt ponds

The silt ponds are shown in Appendix C, however it is important that during

- Soil relocation
- Stockpile maintenance

That the integrity of the silt retention ponds and design storage capacities are maintained

2.3.3.2 On completion of operations

On completion of each soil relocation process the Site Manager will ensure that these area’s are stabilised with topsoil and grass

14. *The Site Closure Plan is referred under section 4 monitoring and reporting*

No later than **3 years prior to the site closure** the Site Manager will complete a “Site Closure Plan”¹⁴ to ensure that the Site Manager gains approval from Environment Waikato to remove **any** silt ponds

2.3.3.3 Stormwater contingencies

15. *Remedied means immediately and systems should be put in place to ensure does not happen again*

If there is a discharge of, silt or fuel/oil during the operation, then the Site Manager will

16. *Weekly diary sheet attached as appendix D*

1. Identify the cause
2. Remedy the non- complying discharge by¹⁵ either
 - a. Installing hay bales to filter sediment
 - b. Repair silt ponds if required
 - c. Add additional bunds if contaminated stormwater is bypassing the treatment pond
 - d. Bunding the vehicle storage area, and removing contaminated soils to a consented waste facility
 - e. Cap and seal completed area’s with topsoil and grass
3. Record this event on the weekly diary sheet¹⁶
4. Advise EW and WDC within 48 hours of
 - a. What happened
 - b. How was it remedied
 - c. How he intends to stop it happening again

2.3.3.4 Water Take

The Site has a Water Take Consent approved by EW. The Site Manager to ensure that the pump flow meter is read **Weekly** with the average daily take for the week not to exceed 1000m³/day

Should the daily take exceed the consented volume the Site Manager is to advise EW

- Why the consent limit was exceeded
- What systems have been put in place to avoid it happening again

2.4 Tangata Whenua Interests

In the event of any artefacts or remains being discovered, the Site Manager **will cease work in the area immediately** and consult with Tangata Whenua and other appropriate authorities in accordance with the provisions of the Historic Places Act 1993. Any artefacts will be removed in accordance with appropriate iwi protocols and any legal requirements of the Historic Places Act 1993 which shall be implemented prior to work recommencing in the location of the site of the artefacts or remains discovered.”

The Site Manager to notify Environment Waikato and Waikato District Council within 48 hours of the stop work and the actions taken

3 Projects

3.1 Initial Mclean Block development

(refer plan XXX attached as appendix C and check sheet appendix D)

3.1.1 General

3.1.1.1 Air Discharge

The site is to be managed to ensure no particulate mater is released outside the boundaries of the land leased by the Quarry that are deemed objectionable

3.1.1.1.1 Visual Bund Construction

During construction of the visual bund special care is to be taken to ensure dust does not become a nuisance, due to the close proximity of the houses on Waingaro Road.

To monitor compliance during this operation the Site Manager is to

- Relocate one of the on site dust monitors to a point between the walking track and the residence at 238 Waingaro Road **prior to commencement**
- **Monitor this gauge monthly** along with the other gauges on site
- Recording levels should not
 - **Increase more than 4g/m²/30days above back ground levels**¹⁷
 - **Exceed 130mg/m2 averaged over 24 hours**

Not with standing the visual bund monitoring general dust control and contingency methods in the event of non-compliance are covered by section 2.2.1.2

3.1.1.1.2 Dust

3.1.1.1.3 Machinery

The Site Manager will ensure that either the site water cart or a hire water cart (**or both**) will be applying water on access tracks while any¹⁸ machinery is operating within the visual bund and subsequent stripping construction area¹⁹

All trucks transporting overburden shall travel below the site speed limit²⁰ to minimise the risk of dust

17. Determined by the existing monitors already onsite

18. This includes all parts of the project from building ponds to final topsoiling

19. The stripping area includes the cut area as well as the fill area

20. The current site speed limit is 20km/hour

3.1.1.1.4 Static dust

At times during the project there will be no machinery operating.

During this time the Site Manager shall ensure

- All exposed areas are monitored or stabilised to ensure dust is not objectionable beyond the boundary of the quarry
- Where possible reinstatement should occur as soon as contours meet finished levels

3.1.1.1.5 Dust contingency plan

Should dust become a nuisance as defined by 3.1.2.3, then the Site Manager will attempt to mitigate the dust by either

- Adding an extra water cart
- Stopping work
- Progressively topsoiling the fill area to stabilise with grass, mulch or hydro-seed

3.1.1.1.6 Noise

3.1.1.1.7 Machinery

The Site Manager to ensure that all machinery on site is fitted with appropriate silencing equipment, and ensure this is maintained during the project

3.1.1.1.8 Hours of operation

Construction projects will operate the same hours as the quarry operation (refer 2.2.2.5)

3.1.1.2 Stormwater

3.1.1.3 General

Stormwater from construction projects is defined as contaminated and non-contaminated

3.1.1.4 Non-contaminated stormwater

All the stormwater from the

- Diverted water upslope from the haul road cuttings
- Surrounding grassed paddocks
- Existing streams
- Existing undisturbed vegetation area

These areas to be diverted around the silt ponds to the natural water course

The Site Manager will ensure these areas are checked **daily** during construction operations to ensure there is no silt contamination present.

If a contamination is found this to be remedied “as soon as practicable” and recorded on the weekly diary (refer stormwater contingencies 2.3.3.3)

3.1.1.5 Contaminated stormwater

3.1.1.6 Silt pond construction

The approved consent has a silt and sediment plan approved by Environment Waikato refer Appendix C

This is to be installed in accordance to the design plans and ***signed off by Environment Waikato prior to commencing any earthworks***

3.1.1.7 During operations

It is important that during any soil relocation that the integrity of the silt retention ponds and design storage capacities are maintained

To ensure this the Site Manager shall

- Ensure the ponds are maintained to a **minimum of 80% design capacity** prior to large rain events
- Check on any discharges from the pond(s) **daily during rain** events, **otherwise weekly**
- Ensure that all contaminated run-off is reaching the silt ponds
- Check to ensure there **is no visible oil or scums**²¹ forming in the ponds
- Ensure **no discharge bypasses the treatment processes**
- Ensure there shall be **no increase in suspended solids just prior to the junction of the unnamed tributary and the Firewood Creek**

21. The Site Manager to ensure that there is no hazardous discharge from the pond at any time

- Ensure that exposed areas completed to finished levels are **reinstated as soon as practicable**
- Ensure all machinery is located in a position so that there is no risk during parking, fuelling and oiling that a discharge can reach either of the stormwater management systems

3.1.1.8 On completion of earthworks

Once the site has been stabilised with topsoil and grass, the Site Manager will request and gain approval from Environment Waikato to remove the temporary silt and sediment controls systems

3.1.2 Stream diversion

In preparation for the stream diversion and construction of the wetlands below the visual bund. The Site Manager to

- Contact Charles Mitchell contact 8255122, to arrange fish removal
- Install silt and sediment controls
- Complete stream and wetlands construction²² under the supervision of Charles Mitchell
- Arrange for planting under supervision of Bernard Brown and Charles Mitchell
- Arrange for fish reintroduction once habitat has established²³

3.1.3 Culvert installation

Prior to the visual bund construction 2 culverts are required to drain the existing stream through the bund and to provide fish passage (refer appendix C)

The Site Manager to ensure prior to construction that

- Charles Mitchell (refer details 3.1.2) **relocates any Giant Kokopu** to his hatchery in Raglan
- **All silt and sediment controls are in place**
- The work to be **undertaken during the summer** when the stream flows are at their lowest
- As far as practical the **culvert installation should be completed prior to the diversion of the stream** through the pipe minimising the chance of silt run-off

22. The stream construction and wetlands is as approved in the Resource Consent Appendix C

23. Once the stream and planting has established Charles Mitchell will arrange the fish relocation

3.2 Visual bund and storage dam

The construction plans for the visual bund and storage dam have been approved as part of the Resource Consent process and are attached as Appendix C, however the Site Manager to ensure

- A suitably qualified Geotech Engineer
 - Checks the base of the fill areas and advises on any **unsuitable material to be removed**
 - Monitors the filling process to ensure fill is placed and compacted in layers **not exceeding 300mm**
 - An independent report is provided, certifying the fill has been placed in accordance with good “Engineering Practice”
 - Once passed for compaction and level that **at least 150mm of topsoil** is placed and grassed as soon as practical

3.3 Vegetation Removal & Planting

3.3.1 Vegetation removal

In total an area of approximately 6.0ha of vegetation is to be progressively removed to allow the quarry extension.

This work is to be planned annually²⁴ to take into consideration (refer also Check sheet Appendix D)

24. The Site Manager to submit an annual vegetation removal plan with the annual report 5.1

25. The Site Manager is to define the width of trees to be removed for the “safe” operation of the upper benches

26. Once the operating quarry is below the visual bund level this is not required

27. This to be done by tracking for Bats prior to removal

- The “minimum”²⁵ width of trees and vegetation to be removed
- What Visual effects removing these trees will have?
 - Only trees that need to be removed for the stripping project are removed or damaged
 - Mature trees on the eastern side of any stripping to be left in tact as much as possible to provide visual screening to the east²⁶
- Identify any trees that may have bat roosts in them²⁷
 - If bats are present then the Site Manager to take advise from an independent expert, however the 2 methods are
 - Remove the roosting trees at night
 - Wait until there is very little roosting, during the winter months
- Identify trees/plants than can be recovered
- Plant relocation opportunities including
 - The landowner
 - Local IWI
 - DOC
 - Hakarimata Restoration Trust
 - CYC Youth programme
 - EW
 - Local nurseries
 - Firewood

28. *The forest humus will be a great source of natural seed for the quarry high wall batters*

- Stockpiling of forest Humus²⁸
- Stockpiling of topsoil for re-use

3.3.2 Planting

There are a number of planting projects in relation to the quarry extension

- Visual bund
- Stream diversion
- Wetlands
- Quarry batters

All the planting projects will be planned either during the consent process or through the annual report process

29. *Bernard Brown is Perrys **current** planting and visual consultant contact 07 8258519*

All the planting to be managed by experienced technical consultants²⁹ to ensure plant sourcing is

- From on site salvaged native plants OR
- A “gene pool nursery³⁰”

30. *Gene pool nurseries use locally sourced plants and are registered through EW*

When planning planting issues to be considered are

- Plant densities
- Species (native), where possible except the fast growing visual screen trees
- Installation including
 - Staking
 - Crystal rain
 - fertilizer
- A maintenance plan which includes
 - The Site Manager will arrange **monitoring quarterly** with technical experts until such time as the planting has established and then monitoring to be done annually if required. These inspections to be recorded in the Annual Report.
 - Weeding and replacements if necessary
 - Predator control

4 MONITORING & REPORTING

4.1 Annual reports

An annual report to be sent to Environment Waikato and Waikato District Council by the 1 September of each year, for the period ended 31st July

The report to included

- **Current year**
 - Operations
 - Dust
 - Noise
 - Blasting
 - Stormwater
 - Vegetation removed
 - New planting and ongoing maintenance
 - Maintenance of control systems
 - Improvement works completed during the year
 - Consultation
 - Compliance issues
 - Complaint management
- **Upcoming year planning**
 - Mining plan
 - Construction plan
 - Operational upgrades
 - Maintenance of controls systems
 - Vegetation planned for removal
 - Planting and maintenance plan

4.2 Closure plan

The Site Manager to ensure at least 3 years prior to closure that an exit and remediation plan to submitted to both Councils for approval

The plan should include but not be limited to

- Estimated date of closure
- Reinstatement plan for
 - Exposed area's
 - The "Quarry Pit"
 - Office and facilities removal
 - Removal of silt and sediment control systems
 - Future stormwater discharge points
 - Landowner agreements

Appendix A – Resource Consent No's ??? to be added

(as at the date of this Management Plan and subject to change via the normal RMA processes.)

Appendix B – Waingaro Road Quarry Emergency Contacts

NOTIFICATION NUMBERS

EXTERNAL

Environment Waikato	0800 800 401
Waikato District Council	0800 492 452

INTERNAL

Terry Takiari (Site Manager)	021 956 755
Stephen Martin (Coordinator)	021 580075
Ingrid Chettleburgh (Manager Rock Resources)	07 834 6328

Appendix C – Construction Plans

Plans

1. 9689-123 Visual Bund Culvert outlet details
2. 9689-127A Fish Passage design
3. 9689-129,A,B Haul Roads and Silt control plan
4. 9689-130,131,138 Visual Bund design
5. 9689-206 Vegetation Stripping plan
6. 9689-220 Site Staging plan

Appendix D – Check sheets

Appendix E – Site property boundaries

Appendix F – Proposed Landscape plan

Plans

1. 8689-10 Landscape Plan
2. Visual bund planting
3. High Wall batter planting